

The Journal of Public Space is the first, international, interdisciplinary, academic, open access journal entirely dedicated to public space. It speaks different languages and is open to embrace diversity, inconvenient dialogues and untold stories, from multidisciplinary fields and all countries, especially from those that usually do not have voice, overcoming the Western-oriented approach that is leading the current discourse.

As a proper public space, The Journal of Public Space is free, accessible and inclusive, providing a platform for emerging and consolidated researchers; it is intended to foster research, showcase best practices and inform discussion about the more and more important issues related to public spaces in our changing and evolving societies.

ISSN 2206-9658



<http://www.journalpublicspace.org>

The Journal of Public Space

2024 | Vol. 9 n. 2

Young Gamechangers

Editors Luisa Bravo, Christelle Lahoud and
Cherie Enns

Founder



City Space
Architecture

Partner



UN-HABITAT

in cooperation with



RMIT
UNIVERSITY



University of the
Sunshine Coast
Australia



EDITORIAL TEAM

Founder, Editor in Chief

Luisa Bravo, City Space Architecture, Italy

Associate Editor (2021-)

Manfredo Manfredini, University of Auckland, New Zealand

Associate Editor (2021-2022)

Dorotea Ottaviani, University of Bologna, Italy

Cecilia De Marinis, Institute for Advanced Architecture of Catalonia (IAAC), Spain

Scientific Board

Davisi Boontharm, Meiji University, Japan

Simone Brott, Queensland University of Technology, Australia

Julie-Anne Carroll, Queensland University of Technology, Australia

Margaret Crawford, University of California Berkeley, United States of America

Philip Crowther, Queensland University of Technology, Australia

Simone Garagnani, University of Bologna, Italy

Pietro Garau, Sapienza University of Rome, Italy

Carl Grodach, Monash University, Australia

Chye Kiang Heng, National University of Singapore, Singapore

Maurice Hartevelde, Delft University of Technology, Netherlands

Fiona Hillary, RMIT University, Australia

Aseem Inam, Cardiff University, United Kingdom

Setha Low, The Graduate Center, City University of New York, United States of America

Miquel Marti, Universitat Politècnica de Catalunya, Spain

Alessandro Melis, University of Portsmouth, United Kingdom

Darko Radović, Keio University, Japan

Estanislau Roca, Universitat Politècnica de Catalunya, Spain

Joaquin Sabate, Universitat Politècnica de Catalunya, Spain

Robert Saliba, American University of Beirut, Lebanon

Ellen Marie Sæthre-McGuirk, Nord University, Norway

Hendrik Tieben, Chinese University of Hong Kong, Hong Kong

Martin Zebracki, University of Leeds, United Kingdom

Strategic Advisory Board

Cecilia Andersson, UN-Habitat Global Public Space Programme, Kenya

Tigran Haas, KTH Royal Institute of Technology, Sweden

Maggie McCormick, RMIT University, Australia

Laura Petrella, UN-Habitat Global Public Space Programme, Kenya

Advisory Board for Research into Action

Ethan Kent, PlacemakingX, United States of America
Gregor Mews, Urban Synergies Group, Australia
Luis Alfonso Saltos Espinoza, Observatorio Ciudadano por el Derecho a la Ciudad y Espacios Públicos de Guayaquil, Ecuador
Laura Sobral, Instituto A Cidade Precisa de Você [The City Needs You Institute], Brasil
Insaf Ben Othman Hamrouni, CECumene Studio, Ireland, Tunisia and Egypt

Section Editors

Beitske Boonstra, Erasmus University Rotterdam, Netherlands
Luke Hespanhol, University of Sydney, Australia
Fiona Hillary, RMIT University, Australia
Jeroen Laven, Placemaking Europe, Netherlands
Maggie McCormick, RMIT University, Australia
Ellen Marie Sæthre-McGuirk, Nord University, Norway

Special series ‘Art and Activism in Public Space’

Cameron Bishop, Deakin University, Australia
Luisa Bravo, City Space Architecture, Italy
Catherine Clover, RMIT University, Australia
Henning Eichinger, Reutlingen University, Germany
Ruth Fazakerley, University of South Australia, Australia
Fiona Hillary, RMIT University, Australia
Sophie Jerram, Letting Space and Urban Dream Brokerage, New Zealand
Maggie McCormick, RMIT University, Australia
Daniel Palmer, RMIT University, Australia
Monique Redmond, Auckland University of Technology, New Zealand
Ellen Marie Sæthre-McGuirk, Nord University, Norway
Jacek Ludwig Scarso, London Metropolitan University, United Kingdom
Amy Spears, RMIT University, Australia

Assistant Editor

Zoë Atkinson Fiennes (Vol. 2 n. 3, 2017 / Vol. 4 n. 1, 2019 / Vol. 4 n. 2, 2019)
Merham M. Keleg (Vol. 6 n. 1, 2021)

Journal Manager

Luisa Bravo, City Space Architecture, Italy

Correspondents and Peer Reviewers

Europe and Middle East

Galal Abada, Ain Shams University, Egypt
Gem Barton, Brighton University, United Kingdom
Michael Barke, University of Northumbria at Newcastle, United Kingdom
Simon Bell, Estonian University of Life Sciences, Estonia
Pedro Ressano Garcia, Universidade Lusófona, Portugal

Konstantinos Ioannidis, Aristotle University of Thessaloniki, Greece
Marjut Kirjakka, Aalto University, Finland
Yoav Lerman, Tel Aviv University, Israel
Nicola Marzot, TU Delft, Netherlands
Fabiano Micocci, University of Thessaly, Greece
Vitor Oliveira, University of Porto, Portugal
Lakshmi Priya Rajendran, University College London, United Kingdom
Yodan Rofe, Ben-Gurion University of the Negev, Israel
Massimo Santanicchia, Iceland Academy of the Arts, Iceland
Goran Vodicka, University of Sheffield, United Kingdom
Katharine Willis, Plymouth University, United Kingdom
Parisa Ziaesaeidi, Erfan Institute of Higher Education, Iran

America

Camilo Vladimir de Lima Amaral, Universidade Federal de Goias, Brazil
Roberto Andrés, Universidade Federal de Minas Gerais, Brazil
Deland Chan, Stanford University, United States of America
Dave Colangelo, Portland State University, United States of America
Amir Gohar, University of California Berkeley, United States of America
Thomas Fowler, California Polytechnic State University, United States of America
Maria Goula, Cornell University, United States of America
Adrian Gras-Velazquez, Swarthmore College, United States of America
Matthew D. Lamb, Pennsylvania State University, United States of America
Marieta Maciel, Universidade Federal de Minas Gerais, Brazil
Leonardo Parra, Universidad de Los Andes, Colombia
Renato Rego, Universidade Estadual de Maringá - UEM, Brazil

Asia

Pak Damrongsak, Thammasat University, Thailand
Nga Nguyen, Vietnam National University Ho Chi Minh City, Vietnam
Bing Wang, Beijing University of Civil Engineering and Architecture, China
Zhen Xu, Nanjing Forestry University, China

Africa

Sahar Attia, Cairo University, Egypt
Izak van Zyl, Cape Peninsula University of Technology, South Africa

Australia and New Zealand

Christopher Brisbin, University of South Australia, Australia
Liz Brogden, Queensland University of Technology, Australia
Martin Bryant, University of Technology Sydney, Australia
Glenda Caldwell, Queensland University of Technology, Australia
Philippa Carnemolla, University of Technology Sydney, Australia
Debra Cushing, Queensland University of Technology, Australia
Emilio Garcia, University of Auckland, New Zealand
Morten Gjerde, Victoria University of Wellington, New Zealand
Kai Gu, University of Auckland, New Zealand
Daniel O'Hare, Bond University, Australia

Anoma Kumarasuriyar, Queensland University of Technology, Australia
Manfredo Manfredini, University of Auckland, New Zealand
Michael Marriott, Queensland University of Technology, Australia
Ari Mattes, University of Notre Dame, Australia
Linda Matthews, University of Technology Sydney, Australia
John Mongard, The Designbank, Australia
Milica Muminović, University of Canberra, Australia
Kaan Ozgun, University of Queensland, Australia
Mark Pennings, Queensland University of Technology, Australia
Gavin Perin, University of Technology Sydney, Australia
Helena Piha, Queensland University of Technology, Australia
Dorina Pojani, University of Queensland, Australia
Annabel Pretty, Unitec Institute of Technology, New Zealand
Paul Sanders, Deakin University, Australia
Leigh Shutter, Griffith University, Australia
Thomas Sigler, University of Queensland, Australia
Claudia Justino Taborda, Queensland University of Technology, Australia
Mark Taylor, University of Newcastle, Australia
Margaret Ward, Griffith University, Australia
Yannis Zavoleas, University of Newcastle, Australia

Privacy statement

The names and email addresses entered in The Journal of Public Space's website will be used exclusively for the stated purposes of the journal and will not be made available for any other purpose or to any other party.

Publication frequency

The Journal of Public Space is published 3 times per year. One or more special issues, focusing on specific topics, could be published every year.

“Public space in cities is a common good, meant to be open, inclusive and democratic, a fundamental human right for everybody.”

Dr Luisa Bravo

The Journal of Public Space, *Founder and Editor in Chief*

City Space Architecture, *Founding Member and President*

(from the statement submitted at the 26th UN-Habitat Governing Council held in Nairobi, Kenya, 8-12 May 2017)

FOCUS AND SCOPE

The Journal of Public Space is the first, international, interdisciplinary, academic, open access journal entirely dedicated to public space.

Established on a well-consolidated global network of scholars and professionals, The Journal of Public Space is committed to expand current scholarship by offering a global perspective and providing the opportunity for unheard countries to speak up and to discuss neglected as well as emerging topics that are usually sidelined in mainstream knowledge.

The Journal of Public Space is addressing social sciences and humanities as a major field, and is interested also in attracting scholars from several disciplines. It will perform as a scholarly journal but also as an interdisciplinary platform of discussion and exchange by scholars, professionals, organizations, artists, activists and citizens, whose activities are related to public space.

The Journal of Public Space will be enriched by hosting papers on design projects, art performances and social practices, fostering civic engagement and non-expert knowledge.

TOPICS

Authors are welcome to submit original research articles dealing with themes relating to the vision of the journal, which may include, but are not confined to:

SPACE

Architecture
Urban Planning
Urban Design
Urban Morphology
Urban Resilience
Landscape architecture
Interior design
Interactive and visual design
Art
City transformation
Infrastructure
Environment
Ecology
Climate change

SOCIETY

Gender
Human scale
People
Everyday life
Social engagement
Health and safety
Perception and senses
Human rights
Social justice
Education
Heritage
History
Culture
Geography
Anthropology
Ethnography
Community empowerment
Migrations
Conflicts
Inclusion/Exclusion
Informality
Sub and fringe cultures

SYSTEMS

Economy
Political power
Governance
Law and regulations
Public policies
Private sector/interest
Developing countries
Management and maintenance
Digital/Virtual world
Technology
Media
Third sector
Decision-making process

POLICIES

Peer Review Process

A double-blind peer review process, based on a distinguished board of editors and editorial advisors, ensures the quality and high standards of research papers. Each paper is assessed by two reviewers and any identifying information in relation to the author is removed during the review process. Reviewers follow an evaluation framework and recommendation guidelines to ensure objectivity and fairness.

Submitted articles should not have been previously published. If publication or dissemination through presentation has occurred, then the article should acknowledge this and pay due credit to the original source.

Read more: <https://www.journalpublicspace.org/index.php/jps/peer-review-process>

Publication Ethics Statement

The Journal of Public Space aligns itself with the Committee on Publication Ethics (COPE) best practice guidelines for dealing with ethical issues in journal publishing and has adopted the COPE guidelines which the journal members (Scientific Board, Advisory Boards, Editorial Board and the Journal Manager) have agreed meet the purposes and objectives of the Journal - <http://publicationethics.org/>

COPE provides international standards for authors of scholarly research publications and describes responsible research reporting practice. They may be summarised as follows:

- the research being reported should have been conducted in an ethical and responsible manner and should comply with all relevant legislation;
- researchers should present their results clearly, honestly, and without fabrication, falsification or inappropriate data manipulation;
- researchers should strive to describe their methods clearly and unambiguously so that their findings can be confirmed by others;
- researchers should adhere to publication requirements that submitted work is original, is not plagiarised, and has not been published elsewhere;
- authors should take collective responsibility for submitted and published work;
- the authorship of research publications should accurately reflect individuals' contributions to the work and its reporting;
- funding sources and relevant conflicts of interest should be disclosed.

Open Access Policy

The Journal of Public Space is licensed under a Creative Commons Attribution-NonCommercial 4.0 International License. It provides immediate open access to its content on the principle that making research freely available to the public supports a greater global exchange of knowledge.



<https://creativecommons.org/licenses/by-nc/4.0/>

Article processing charges (APCs)

The Journal of Public Space does not require authors to pay any article processing charges (APCs) when submitting an article for possible publication.

CONTACT

Publisher

City Space Architecture
non-profit cultural association
Via Paolo Giovanni Martini 26/d
40134 Bologna, ITALY
jps@cityspacearchitecture.org
www.cityspacearchitecture.org

Partner

UN-Habitat / United Nations
Human Settlements Program
Nairobi, KENYA
www.unhabitat.org

in cooperation with

KTH Royal Institute of Technology
Centre for the Future of Places
Stockholm, SWEDEN
<https://www.kth.se/en>
<https://www.cfp.abo.kth.se/>

RMIT University
Melbourne, AUSTRALIA
<https://www.rmit.edu.au/>

University of the Sunshine Coast
Brisbane, Australia
<https://www.usc.edu.au/>

with the IT support of

Genius Saeculi srls
Bologna, ITALY
<http://www.genius-saeculi.com/>

CALL FOR PAPERS

Due to the large number of submissions and the many requests we receive for special issues, we have temporarily closed the online submission process. We are NOT accepting submissions at this time. The online submission process will reopen after the summer of 2024.

For those who have already submitted, please [check here](#) to see if your article is currently under review.

For any questions, please send an email to this email address:
submission@journalpublicspace.org

<https://www.journalpublicspace.org/>

The Journal of Public Space

ISSN 2206-9658

2024 | Vol. 9 n. 2

<https://www.journalpublicspace.org>



Young Gamechangers. Amplifying Youth Voices for Healthier Public Spaces

Editors

Luisa Bravo, Christelle Lahoud, Cherie Enns

Vol. 9 n. 2 | 2024

in collaboration with
UN-Habitat

The Journal of Public Space

ISSN 2206-9658

2024 | Vol. 9 n. 2

<https://www.journalpublicspace.org>



Cover image: Girls team training in Freetown, Sierra Leone. Supported by 'Football for a New Tomorrow (FANT)'. Credit: Sticker, 2023

DISCLAIMER

The designations employed and the presentation of the material in this journal do not imply the expression of any opinion whatsoever on the part of the Secretariat of the United Nations concerning the legal status of any country, territory, city or area or of its authorities, or concerning the delimitation of its frontiers or boundaries, or regarding its economic system or degree of development. The analysis, conclusions and recommendations of this publication do not necessarily reflect the views of the United Nations Human Settlements Programme. Reference in this journal of any specific commercial products, brand names, processes, or services, or the use of any trade, firm, or corporation name does not constitute endorsement, recommendation, or favouring by UN-Habitat or its officers, nor does such reference constitute an endorsement of UN-Habitat.

TABLE OF CONTENTS

EDITORIAL

- Young Gamechangers.
Amplifying Youth Voices for Healthier Public Spaces 1-8
Christelle Lahoud, Cherie Enns

ACADEMIC

- Play for All.
Towards Inclusive Public Spaces for Young Women in Cairo. 9-30
Salma Mohamed Mahmoud Elshafie, Anne-Sophie Lucrezia Spinaci
and Merham M. Keleg
- A Digital Blueprint of Breathing Spaces in Mumbai 31-54
Ashwini Uday Deshpande, Pranil Chitre, Anaushka Goyal, Prerna Yadav
- Pedalling Towards Improved Well-being.
Impact of Non-Motorised Transport Infrastructure on the Quality of Life of
the Youth in Delhi 55-78
Shreya Khurana
- An Empirical Case Study on Public Space and Youth Health and Mental
Well-being in Botswana Cities and Major Urban Villages 79-108
Rebaone Ruth Dick, Tepo Kesaobaka Mosweu
- Placemaking and People-Making.
The Interplay between Youth Activities and Built Environment Design in a
Philippine Public Park 109-128
Ferdinand Isla III, Sandra Samantela
- How India Can Support Teenage Girls' Mental Well-being via Inclusion of
Park Planning through Digital Engagement, Learning from Scotland's Mistakes 129-146
Holly Gray
- The Intangible Values of Placemaking in Engaging Youth for Activating and
Shaping Places in Italy 147-166
Martina Borini, Stefania Campioli
- ### NON ACADEMIC
- The Roots and Vaccine of the City.
African Youth as Catalysts for Urban Vitality and Well-being 167-184
Annabel Nyole, Daphne Randall and Naserian Saruni

Hands Together. Nature-Based Placemaking in an Urban Poor Resettlement Colony Dulari Parmar	185-198
Exploring the Digital Practices of Youth. A Case Study of Saigon Zoo and Botanical Garden Thien Nguyen, Shoshana Goldstein	199-208
Case Study in Girl-led Placemaking. Mya Malar Community Park (Yangon, Myanmar) Swan Yee Tun Lwin	209-222
Youth Empowerment in Urban Kampung Neighbourhood through Placemaking. A Case Study of Bandung and Jakarta, Indonesia Dheamyra Ihsanti, Widiyani	223-232
Towards Hope as Practice. Young Residents Reclaiming a Neighbourhood's Identity through Arts and Placemaking Natasha Sharma, Sandra Alexander	233-244
Digital Public Spaces for Youth Engagement in Informal Settlements. Case Examples from Mathare Settlement in Kenya Stephen Nyagaya, Diana Mwau	245-258
<u>CREATIVE CONTENT</u>	
The Story of Makanuna Malak Alaa Eldeen Abbas, Henry Spencer, Hadeer Saeed Dahab	259-264
Thank You for Allowing Us to Speak Nitya Jaiswal, Radha Patel, Boopsie Maran	265-280
Where it Should Always Be Carlos Andres Olivera Caballero	281-286
Steering through Negotiations: Of the Self and the Surround Arryan Siingh	287-292

EDITORIAL

Young Gamechangers. Amplifying Youth Voices for Healthier Public Spaces

Christelle Lahoud

UN-Habitat, Lebanon

christelle.lahoud@un.org

Cherie Enns

University of the Fraser Valley, Canada

cherie.enns@ufv.ca

Abstract

On the occasion of the 12th World Urban Forum, taking place in Cairo on 4-8 November 2024, City Space Architecture and UN-Habitat will launch this thematic issue of The Journal of Public Space dedicated to the Young Gamechangers Initiative (YGI), during a side event at the Urban Library. The Journal of Public Space is committed to diversity, inclusivity, and open access and provides an exemplary platform for such an issue featuring emerging scholars, young practitioners, and storytellers, **often underrepresented in mainstream academia**. Each research article, case study, and creative submission included in this thematic issue focuses on public spaces in diverse urban spaces, primarily in the Global South, and **explores the nexus between governance, youth participation in placemaking, digital tools, and implications for youth health and well-being**.

Keywords: youth health and well-being, gamechangers, digital tools, Global South

To cite this article:

Lahoud, C. and Enns, C. (2024) "Young Gamechangers: Amplifying Youth Voices for Healthier Public Spaces", The Journal of Public Space, 9(2), pp. 1–8. doi: 10.32891/jps.v9i2.1826.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

In September 2023, City Space Architecture and UN-Habitat opened a call for papers of *The Journal of Public Space*, targeting those under 32 years of age who wanted to publish research, case studies, or creative stories on how the process of creating public spaces and digital engagement can enhance the health and well-being of young people. The Young Gamechangers Initiative (YGI), a three-year project funded by Fondation Botnar and led by UN-Habitat's Global Public Space Programme, is dedicated to harnessing innovative digital tools to amplify young people's voices and empower them to express their opinions on creating fair city systems for the future. YGI is based on a global agenda that emphasises the importance of public spaces in promoting inclusivity, well-being, safety, and sustainability, as highlighted in SDG 11.7.1 (UN-Habitat, 2018). YGI is being piloted in three intermediary cities: Bargny (Senegal), Armenia (Colombia), and Jatni (India). The project demonstrates how digital tools can empower young people to design, propose, and contribute to better public spaces and city youth-centred policies.

This special issue focuses on public space for youth health and well-being and expands the learning of YGI through **seven academic papers, seven applied case studies, and four visual photo essays or creative expressions**. This issue highlights how public space design, exclusion from city planning decisions, and other urban health issues affect youth well-being. The studies go beyond the three cities of YGI to include a global perspective of youth challenges worldwide.

Given the current global demographic trends, understanding young people's roles and perspectives concerning urban health and public spaces is crucial. The global population of adolescents and young adults has exceeded 1.8 billion, with over 85% concentrated in developing countries (United Nations Population Fund, 2022). It is important to note that over 90% of urban expansion is driven by cities in the Global South, with young people making up a significant portion of this growth (UN-Habitat, 2020). Projections suggest that by 2030, up to 60% of urban dwellers will be under 18 years old (UN-Habitat, 2024). One in every three people is expected to live in slums by 2050 (UN-Habitat, 2022), indicating a pressing need to address youth problems in urban environments. The World Health Organisation (WHO) recently highlighted the crucial link between health and well-being in urban environments (2024). WHO underscores the negative impact of poorly planned cities on urban health and offers strategies for policies and plans to address health issues (WHO, 2024). **Demographic shifts and the rise of the burden of disease problems require decision-makers, policymakers, and planners to prioritise and commit to a healthier, more inclusive, youth-focused urban environment** (Huang et al., 2023; UN-Habitat, 2020).

Scholars have documented the relationship between the health and wellness of young people and their inclusion in public space, placemaking, and city planning (Kenrick, 2023; Lundy, 2023; Cahill, 2023). Prioritising the health and well-being of young urban dwellers, as defined by Fondation Botnar (2023), also entails granting youth autonomy over their lives, experiences, and emotions. Many international, regional, and local policy instruments recognise the importance of engaging youth in public space and urban policy design. For example, the rights of youth to have a voice in decisions that affect their lives are clearly outlined in the UN Convention on the Rights of the Child (1989). The UN Sustainable Development Agenda 2030 also acknowledges children and youth as agents of change through the Sustainable Development Goals (SDGs). For instance, SDG Goal 11 calls for cities to consider the interests and welfare of groups in vulnerable situations, including

youth (Enns et al., 2023). The New Urban Agenda, backed by the Habitat III Children's Charter, reflects the inclusion of youths' rights in urban issues related to their well-being and advocates for including youth in dialogues with urban stakeholders.

A scan of city policies and a literature review confirms that the perspectives of young people regarding the connections between urban design and their health and well-being are not given sufficient consideration in formal official planning processes (Enns et al., 2023; Tuhkanen et al., 2022; Abebe, 2019). When urban planners attempt to engage young people in design processes, the activities are often tokenistic or superficial, co-opting young people without allowing for meaningful debate or influencing decision-making (Lundy, 2023; Pridmore, 2010; Arnstein, 1969). Nevertheless, youth perspectives have proven to be fundamental in addressing urban challenges and advocating for climate justice (C40, 2024)), potentially leading to policy changes and inclusive urban designs (Enns et al., 2022). Drawing on more than 10 years of experience at UN-Habitat's Global Public Space Programme (Bravo, 2020), it became clear how creative and innovative young people's ideas can be. They know their issues and have innovative ways to address them (UN-Habitat, 2023b). Lack of inclusive participation in planning processes and limited consideration of youth intersectionality and aspirations in public space design further harms youth health and well-being and constrains their transformative potential in urban settings (Tuhkanen et al., 2022; Enns et al., 2023).

Young people tend to be excluded from formal urban governance frameworks (UN-Habitat, 2023c), which may present barriers to effectively and naturally engaging them in formal planning processes. This lack of inclusion in formal urban planning highlights the need for research on tools and approaches for involving youth in creating better urban environments. Most of the literature on this topic originates from northern countries, so it is crucial to give special attention to authors from the Global South (Tuhkanen et al., 2023). Therefore, this journal's issue presents an opportunity for policymakers and practitioners to gain insights from young people through academic papers, case studies, and creative submissions, primarily from the Global South. These insights will focus on the tools and support needed for young people to more actively participate in the planning and management of public spaces, taking into account their health and well-being. We received more than **160 abstracts** from research articles and case studies. After the review process, **45 were invited**; ultimately, only 14 were published.

We also reviewed over **100 creative submissions**, primarily from a younger demographic (15-24 years old), with 4 to be included in this special issue. The final submissions represent diverse countries, including **Kenya, Myanmar, Bolivia, Italy, India, New Zealand, Indonesia, Egypt, Botswana, Vietnam, Scotland, and the Philippines**. The themes woven through this issue include the role of digital technology in participation, the linkages between health and well-being and the design of public spaces. **The call gained over 30,000 impressions on social media and earned 1,857 engagements, reaching around 29,000 accounts, reflecting the high degree of interest and relevance in the issue.**

The diversity of the articles, gathered from various parts of the world, allows us to gather different perspectives on the needs and priorities of young people. Many of the articles and case studies focus on the relationship between digital tools, technology, and the health and well-being of youth. The authors provide insights for more equitable and youth-centric planning principles. They also highlight the importance of integrating climate actions into the design of public spaces to help maintain a sense of home, especially

during resettlement. The leading research article on this issue examines how public spaces impact the physical activities and social interactions of vulnerable groups, such as young women in Cairo. The study found that these areas are not easily accessible to young women due to cultural norms and safety concerns. The authors used digital ethnography to demonstrate how social media can serve as a research tool for collective action, helping in the understanding of young women's engagement with urban space. The case study on Mya Malar community park in Yangon, Myanmar, demonstrates the value of youth-led placemaking by showing how engaging with girls through participatory design can improve their health, wellness, and civic involvement. The case study of Lallubhai Compound in Mumbai offers a model for scaling up climate adaptation actions, incorporating nature-based solutions, and advocating for systemic change towards climate justice while addressing social issues such as substance abuse. A creative submission titled 'Where it Should Always Be' discusses public places as sites of collective youth action and contestation. It serves "as catalysts for change, embodying the hopes, fears, and aspirations of a community yearning for a more just and equitable society."

The research on the Carpi Campus, Italy, offers valuable insights for planning practitioners and youth organisations, highlighting placemaking as a multipurpose strategy to engage youth in urban planning by fostering community identity and a sense of belonging. Several submissions emphasise the growing reliance on digital connections over connecting in physical spaces, showing how blending digital and physical realms can improve youth health and well-being, and employability. The case of Govandi's resettlement community in Mumbai illustrates how digital tools, technology, and the arts can enhance placemaking by supporting young people in defining a sense of place, identity, and community significance. This diversity of cases from young scholars worldwide demonstrates innovative ways to empower youth in urban environments and has inspired us to look at how we can better improve health and well-being through technology and creative expression.

Our reflections and takeaways from youth submissions

UN-Habitat worked on various projects that engaged youth in planning processes and utilised digital engagement tools. These projects have consistently received testimonies from young participants about their improved **well-being** following the engagement workshops. Many have shared that they learned to code, felt happy from contributing ideas, and enjoyed seeing their digital designs become a reality. However, UN-Habitat has yet to measure and quantify whether technology is improving young people's **health and well-being**. The Young Gamechangers Initiative's goal is to continue gathering evidence to demonstrate that digital engagement significantly enhances youth well-being and contributes to their development. This journal issue is also a testimony written by young scholars who have identified, through various case studies and work, that technology plays a crucial part in improving their well-being.

Based on the literature review of public space design, youth health and well-being, and youth participation, insights from the participants in the Young Gamechangers project and submissions for this issue, we have identified three main recurring and overlapping themes: **"Balancing digital and physical spaces"**, **"Integrating Health and Well-being"**, and **"Becoming the true gamechangers in the public realm"**.

Balancing digital and physical spaces

Public spaces now integrate physical and digital elements, enabling people, especially young individuals, to be physically present while connecting to the digital world. This idea of being in “two spaces at once” – being physically in a local environment while digitally connected to a global network – is becoming a prominent feature in urban design. The articles discussing this concept highlight the significance of incorporating unseen digital elements such as QR codes, digital projections, interactive apps like Pokémon Go and Minecraft Earth, and social media platforms that facilitate a blended experience between physical spaces and digital interaction, such as TikTok. These elements help to expand small physical spaces into broader social and interactive realms.

For young people, having access to this digital layer in public spaces is crucial and has been mentioned in various articles. It expands their opportunities, providing avenues for skill-building, employability, and creative expression beyond the immediate physical environment. For example, the article “Digital Spaces for Public Participation in Informal Settlements” from Mathare, Kenya, explores how a government’s strategy for digital hubs in public spaces promotes employment and creativity. Similarly, the “Digital Blueprint of Breathing Spaces in Mumbai” highlights the role of technology in allowing youth to monitor and interact with their environment. The photo essay on Mumbai reflects on the concept of ‘dis’connection between digital and public spaces, underscoring the need to harmonise the two for a more cohesive urban experience.

Digital engagement in public spaces can improve urban experiences, but it also brings potential risks, especially related to sedentary behaviour. Using phones or digital devices in public spaces can reduce physical activity and disrupt face-to-face social interactions. At UN-Habitat, we acknowledge these risks and promote a balanced approach. Our strategy involves incorporating elements that promote movement and activity, preventing people from exclusively socialising in the digital world and neglecting their physical environment. Striking a balance between digital and physical interaction in public spaces is important for promoting well-being and social connection among youth.

Integrating health and well-being

In 2023, the Global Youth Development Index (YDI) Report emphasised the significant impact of supportive environments on enhancing young people’s health, well-being, and productivity (Commonwealth, 2023). Despite this, health and well-being are still not directly integrated into planning policies and practices concerning youth. Many articles and case studies in this issue highlight the importance of bridging this gap. For instance, ‘The Roots and Vaccine of the City: African Youth as Catalysts for Urban Vitality and Well-being’ creatively illustrates how youngsters in Nairobi are revitalising urban spaces, offering “vaccinations”—metaphors for urban improvements—against health challenges and social decay. Similarly, the article ‘An Empirical Case Study on Public Spaces and Youth Health and Mental Well-being in Botswana Cities and Major Urban Villages’ discusses how colonialism and urbanisation have shaped public spaces, underlining the need to monitor the health and well-being of youth in these environments. Another article on alternative transportation in Indian cities, focusing on the role of cycling and ‘pedalling’, highlights the youth’s valuable understanding and insights into policy changes that could improve urban health and promote healthier lifestyles. Several other contributions explore how innovative approaches, such as applied arts and co-design digital tools, can be embedded in

city planning systems to address the issue of expression.

This collaborative journal issue presents a strong call from youth for the inclusion of digital skills in urban planning, not only to formalise their participation but also to support youth-led research that examines health considerations in public space design. Importantly, it also advocates incorporating participation metrics to assess better how public spaces contribute to youth well-being.

Public spaces also hold emotional and symbolic significance, often serving as sources of comfort and resilience in challenging times. In today's world of uncertainty, the co-design space and reconstruction of public spaces provides hope, a sense of belonging, and improved well-being for youth, especially those temporarily displaced or resettled. This sentiment is powerfully expressed in the imaginative work "Where It Should Always Be," where the author views public spaces as catalysts for social change and calls for decision-makers to centre youth values and health in urban planning.

Becoming the true gamechangers in the public realm

The article "The Interplay between Youth Activities and Built Environment Design in a Philippine Public Park", alongside many others in this issue, sheds light on youth-led policy directions that local governments often overlook. Despite the uncompensated and informal roles youth already play in improving public spaces, these contributions often go unrecognised (Enns, 2022). This oversight is addressed in the Natwar Parekh Compound case study in Mumbai's Govandi, which beautifully illustrates how youth are reshaping urban spaces and contributing to urban health.

The articles and photo essays focusing on Asian cities also acknowledge the significant challenges and barriers young people face in governance and planning. In the case of Mumbai, for example, the authors recognise that specific systemic issues may not be resolved in their lifetime. However, this reality does not deter youth from stepping up to improve public spaces and from pushing to measure the impact of these interventions on their health and well-being. The case studies underscore the emerging roles of young people, who are eager to become part of a movement that integrates their voices into nature-based public space designs and city governance, aiming for more substantial outcomes in terms of health and well-being.

Importantly, when local governments fail to address pressing urban challenges, it is often youth who take the initiative. We have seen this through numerous UN-Habitat projects, where youth-led organisations and groups have mobilised themselves to innovate and create better environments. Their transformative impact is a testament to the potential for change. Whether through placemaking initiatives, activating public spaces, or programming creative activities, young people are far more than passive participants. Their role transcends the checkbox of engagement or consultation—they are **becoming the true gamechangers in the public realm**. As the Makanuna creative submission captures:

*Look there! Do you see the light? These are our triangles, shining with all our might.
Here is our place and our story:
So what do you think of our idea, in all its Glory?*

The response to the call for papers and youth submissions in this special issue highlights

an escalating need for platforms where young researchers can publish their work and showcase their insights. The analysis demonstrates how youth contribute to improved planning and policies for public space design and voicing critical concerns about their urban environments—such as the impact of commercialisation and the dominance of automobiles in public spaces. As the WHO has pointed out, open spaces are becoming increasingly vital for improving urban health during rapid urbanisation (WHO, 2023). International agencies, academicians, urban professionals, policymakers, and young people should continue co-creating knowledge, exploring best practices, and integrating digital technology into governance to foster healthier, more inclusive urban environments. The future of urban health and well-being depends on this collaborative effort.

A statement acknowledging the use of Artificial Intelligence (AI)

While preparing this work, Cherie Enns used ChatGPT to identify a composite of shared themes in the papers and cases. After using this tool/service, the author(s) reviewed and edited the content as needed and took full responsibility for the publication's content. **It is worth noting that for many of the cases and articles in this issue, AI was used by youth for translation and editing purposes, highlighting the critical role of technology and relevance of this issue.**

References

- Abebe, T. (2019) 'Reconceptualising children's agency as continuum and interdependence,' *Social Sciences*, 8(3) [online]. Available at: <https://doi.org/10.3390/socsci8030081>
- Arnstein, S.R. (1969) 'A ladder of citizen participation', *Journal of the American Institute of Planners*, 35(4), pp.216-224.
- Bravo, L. (2020) 'Public Space and the New Urban Agenda. Fostering a Human-centred Approach for the Future of our Cities', in Metha, V., Palazzo D. (eds.) *Companion to Public Space*, New York: Routledge.
- Cahill, H. (2015) 'Approaches to understanding youth well-being' in Wyn, J., Cahill, H. (eds) *Handbook of children and youth studies*. 1st Edition, Singapore: Springer, pp. 95–113. [online] Available at: https://doi.org/10.1007/978-981-4451-15-4_10
- The Commonwealth. (2023) *Global youth development index update report 2023*. [online]. Available at: <https://thecommonwealth.org/publications/global-youth-development-index-update-report-2023>
- C40 Cities. (2024) *Why youth are powerful allies for your city's climate ambitions* [online]. Available at: https://www.c40knowledgehub.org/s/article/Why-youth-are-powerful-allies-for-your-city-s-climate-ambitions?language=en_US
- Enns, C., Ragan, D., and K. Koernig (2023) *UN-Habitat youth governance report* [unpublished report] UN-Habitat.
- Enns, C. (2022) 'Sustainable community design amidst social challenges: Insights from Nairobi, Kenya' in Finger, M and Yanar, N. (eds.) *The Elgar companion to urban infrastructure governance: Innovation, concepts and cases*. [online] Cheltenham: Edward Elgar Publishing, pp. 87-108. Available at: <https://doi.org/10.4337/9781800375611.00013>
- Enns, C., and Kombe, W. J. (2023) *Child rights and displacement in East Africa agency and Spatial justice in planning policy*. 1st Edition. New York: Routledge.
- Fondation Botnar (2023) *Youth Gamechangers Initiative* [online]. Available at: <https://www.fondationbotnar.org/project/young-gamechangers-initiative-ygi/>

- General Assembly Resolution 44/25. (1989) Convention on the rights of the child [online]. Available at: <https://www.ohchr.org/en/instruments-mechanisms/instruments/convention-rights-child>
- Huang, W. and G, Lin (2023) 'The relationship between urban green space and social health of individuals: A scoping review', *Urban Forestry & Urban Greening*, 85 [online]. Available at: <https://doi.org/10.1016/j.ufug.2023.127969>
- Kenrick, J. (2023) 'The impact of participation in decision-making on young people's mental health and well-being: an evaluation of MAP's youth voice programmes', ResearchGate [online]. Available at: <http://dx.doi.org/10.13140/RG.2.2.15738.26563>
- Lundy, L. (2023) Involving children in decision-making: the Lundy model [online]. Available at: https://ceforum.org/uploads/event/event_documents/594/LUNDYMODELCEX.pdf
- Pridmore, P. (2010) 'Children's participation in development for school health', *Compare: A Journal of Comparative and International Education*, 20(1), pp. 103-113 [online]. Available at: <https://doi.org/10.1080/030579200109888>
- Tuhkanen, H. et al. (2022) 'Health and well-being in cities – Cultural contributions from urban form in the Global South context', *Well-being, Space and Society*, 3 [online]. Available at: <https://doi.org/10.1016/j.wss.2021.100071>
- UN-Habitat (2018) Tracking Progress Towards Inclusive, Safe, Resilient and Sustainable Cities and Human Settlements. SDG 11 Synthesis Report-High Level Political Forum 2018.
- UN-Habitat (2020) World cities report 2020 the value of sustainable urbanisation [online]. Available at: https://unhabitat.org/sites/default/files/2020/10/wcr_2020_report.pdf
- UN-Habitat. (2023a) Global public space programme [online]. Available at: https://unhabitat.org/sites/default/files/2024/03/final2_gpssp_annual_report_2023.pdf
- UN-Habitat (2023b) 10 years of Global Public Space Programme – Annual Report 2022 and reflections on a Decade of Public Space [online]. Available at: <https://unhabitat.org/10-years-of-global-public-space-programme-annual-report-2022-and-reflections-on-a-decade-of-public>
- UN-Habitat (2023c) Models & programs for youth's governance & participation in planning: More inclusive & sustainable cities [online]. Available at: <https://www.unhabitatyouth.org/wp-content/uploads/2024/07/Models-Programs-for-Youths-Governance-Participation-in-Planning-Dr.-Cherie-Enns.pdf>
- UN Population Fund (no date) Adolescent and youth demographics: A brief overview [online]. Available at: <https://www.unfpa.org/sites/default/files/resource-pdf/One%20pager%20on%20youth%20demographics%20GF.pdf>
- World Economic Forum (2023) More than 3 billion people could be living in slums by 2050: UN [online]. Available at: <https://www.weforum.org/videos/more-than-3-billion-people-could-be-living-in-slums-by-2050-says-the-un/>
- World Health Organisation (2023) Healthy and thriving cities demand social, economic, human and planetary well-being [online]. Available at: <https://www.who.int/azerbaijan/news/item/23-11-2023-healthy-and-thriving-cities-demand-social--economic--human-and-planetary-well-being>
- World Health Organisation (2024) Urban health WHO response [online]. Available at: https://www.who.int/health-topics/urban-health#tab=tab_3

Play for All. Towards Inclusive Public Spaces for Young Women in Cairo

Salma Mohamed Mahmoud Elshafie

Independent researcher, Egypt
96salmamohamed@gmail.com

Anne-Sophie Lucrezia Spinaci

Independent researcher, Switzerland
asspinaci@gmail.com

Merham Keleg

Ain Shams University, Egypt
merhamkeleg@eng.asu.edu.eg

Abstract

The practice of play, encompassing physical activity and social connectedness, exerts a positive effect on communities' health and overall urban quality of life. Depending on design and social dynamics, public spaces in cities can be more or less welcoming for young women. Public spaces in Cairo, Egypt, lack playful elements that attract young women to partake in physical activities. This study seeks to identify and assess the current situation of physical activity and play in Cairo for young women. This shall be achieved through exploring their experiences with means of appropriation of public spaces and empowerment, according to the cultural norms, safety concerns and physical design elements. To do so, the study used digital ethnography to gain an understanding of the types of activities young women engage in public spaces and their modes of collective organisation. Observations across the city have then been conducted, and the three neighbourhoods of Al Rehab, Madinati and Zamalek have been selected to pursue more in-depth field observations and interviews. Doing so highlighted the challenges and the opportunities these young women face, shedding light on ways to strengthen their use of play-based urban forms and sports infrastructures in public spaces. The study finds that to pursue physical activity, young women tend to privilege certain safer urban spaces, such as Gated Communities and temporalities allowing for less risks of street harassment. Social media platforms have been understood as instruments for collective organisation, catalysing and multiplying female physical activity in Cairo's public spaces. The study suggests that the use of social media platforms can be instrumentalised for young women's empowerment in shaping diverse public spaces and placemaking processes. In the end, the research sheds light on the pathways forward to enhance young women's engagement in the design and use of playful and active public spaces in culturally sensitive contexts.

Keywords: placemaking, young women engagement, culturally sensitive design, physical activity, social norms

To cite this article:

Elshafie, S. M. M., Spinaci, A.-S. and Keleg, M. M. (2024) "Play for All: Towards Inclusive Public Spaces for Young Women in Cairo", *The Journal of Public Space*, 9(2), pp. 9–30. doi: 10.32891/jps.v9i2.1797.

This article has been double blind peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

I. Introduction

In 2018, articles from outlets such as Reuters and Global Citizen highlighted Egyptian women breaking social norms by practising parkour throughout the streets of Cairo, Egypt. This narrative carried significant weight as it intertwined issues of women's empowerment, reclaiming public spaces, and (re-)shaping urban environments. Play and sports are key in enhancing the physical and mental well-being of city-dwellers, particularly children and youth, contributing to the development of social skills, cognitive abilities, and physical prowess (Gil-Madrone et al., 2019). Physical activity, when viewed from the angle of playfulness, is not solely considered an act of exercise and physical performance because play enables more engaging forms of social connectedness, an important determinant of healthy urban life and communities (Wray et al., 2020). Urban play in youth contributes to the social capital of cities and quality placemaking. Play involves a wide spectrum of emotions and actions such as amusement, pleasure, movement, relaxation, recreation, leisure, learning and sensory experience. The desire for liveable and active urban environments isn't solely driven by some shortage of sports infrastructure; it also stems from the absence of opportunities to claim space through unexpected, unconventional, spontaneous, or informal activities. Gender studies and feminist geography, wherein authors such as Boys (1984) and Massey (1994) and practitioners such as Matrix, one of the first feminist design and architecture collective, have been analysing spaces and places from a gender perspective and have claimed the injustices emerging from male-dominated cities. Academic literature focusing on the dual vulnerability of age and gender, namely girls and young women in *playful activities* in public spaces, remains relatively understudied, especially in cities in the Global South. There are numerous emerging calls and practices for the integration and encouragement of teenage girls to take part in the playing opportunities in parks and public spaces, such as the 'Make Space for Girls' movement that emerged in the UK. Cairo, the capital of Egypt, faces multiple challenges in this area, morphologically and operationally. Open areas in Cairo constitute only 1.2% to 4.6% of the total city area (Thoraya, 2010). Green public spaces, which often attract various types of activities, are not only lacking (Aly and Dimitrijevic, 2022) but also unevenly distributed, primarily favouring high-income residential areas, leading to a disconnection from local and neighbourly relations (Hossameldin and Mohamed, 2021). As a result, according to Thoraya (2010), 40 to 50% of Egyptian children do not engage in outdoor play, perhaps emerging from a lack of quality placemaking in urban environments. The Egyptian government has recently acknowledged this deficiency and initiated projects such as the renovation of Abdeen Square to address the lack of safe recreational spaces; yet this research posits that activating public spaces for playfulness requires a more integrated approach, especially regarding the integration of young women. This article examines the forms of young women's participation and appropriation through physical activity in Cairo's public spaces from a social construction standpoint. Quality placemaking is rooted in gender, age, and geographical considerations and thus influences the way individuals experience and imagine public spaces. The realm of sports for girls remains stigmatised, hindering their participation due to concerns related to femininity and societal expectations (Mohamed, 2022). Fear of violence is another common factor determining women's engagement in public spaces (Navarrette-Hernandez et al., 2021). Societal norms, influenced by Egypt's cultural and religious values, segregate women from the urban realm and restrict their mobility and movement (Bassam, 2023). Thus, this article will add to the literature on playful placemaking and gender and provide evidence on the current

situation, which shall pave the way towards more studies and action areas in this arena. This study distinguishes planned and unplanned playful urban spaces, similarly based on Kostrzewska's (2017) analysis of physical activity in urban environments, which divides formal and informal activity spaces. Formal play-based interventions embody playful design elements and allow physical activity through forms, colours, and equipment such as swings and climbing walls. Informal playful spaces are spaces that have become playful through active re-appropriation processes, making use of playable basic infrastructure, urban typologies and open spaces. In this study, sports should not involve professional or club training to be considered as play; livelihoods do not depend on it, which is the criteria for our empirical part and fieldwork.

It is noteworthy to mention that this article won't delve into the voluptuous debate about different gender identities but will focus on the intersection between young females' place and experiences and Cairo's public spaces. Aiming for awareness of inclusivity-related issues, it is claimed that the reference of young women and gender dynamics throughout the paper refers to cis-gender women and the gender binary paradigm. This choice is based on the premise that the feminine character of bodies which is the important determinant in their behaviour and their perception. Even so, trans young women, for example, are not subjects of study. This paper considers the terms 'women' and 'female' semantically equivalent and thus are used interchangeably throughout.

1.1. Research objectives

This research aims to investigate whether young women engage in specific physically active play activities within the urban setting of Cairo. It then unveils the challenges and the forms of resilience experienced by young women who practise physical activity and play in Cairo's urban public space. These challenges can be categorised into a) the design and planning of public spaces and b) the socio-cultural atmosphere - namely, sexual harassment, safety issues, and the level of friendliness of spaces. The paper then seeks to detail how certain young women in Cairo reclaim (semi-)public spaces for play and physical activities, such as biking, skating, and walking.

2. Methodology

The research is an exploratory study and uses a mixed-method approach, integrating primary and secondary data, including media articles and academic literature, as shown in Figure 1. The research was first prompted by the method of digital ethnography to map forms of physical activity and collective organisational processes taking place in public spaces in Cairo, Egypt. Then field observations were utilised in the three identified case studies followed by semi-structured interviews and in-depth interviews with young women with pioneering experiences of practising play and sports in public spaces. Concurrently, an analytical descriptive survey was conducted to provide a more holistic understanding of the community's perspective on the subject of the study, as illustrated in Figure 1.

a. Digital ethnography via social media platforms such (Facebook, Instagram and LinkedIn)

This method was used to map physical activity and the organisational processes allowing it in public spaces, to map forms of physical activity and collective organisational processes taking place in public spaces. Because Cairo lacks quality placemaking for play and physical

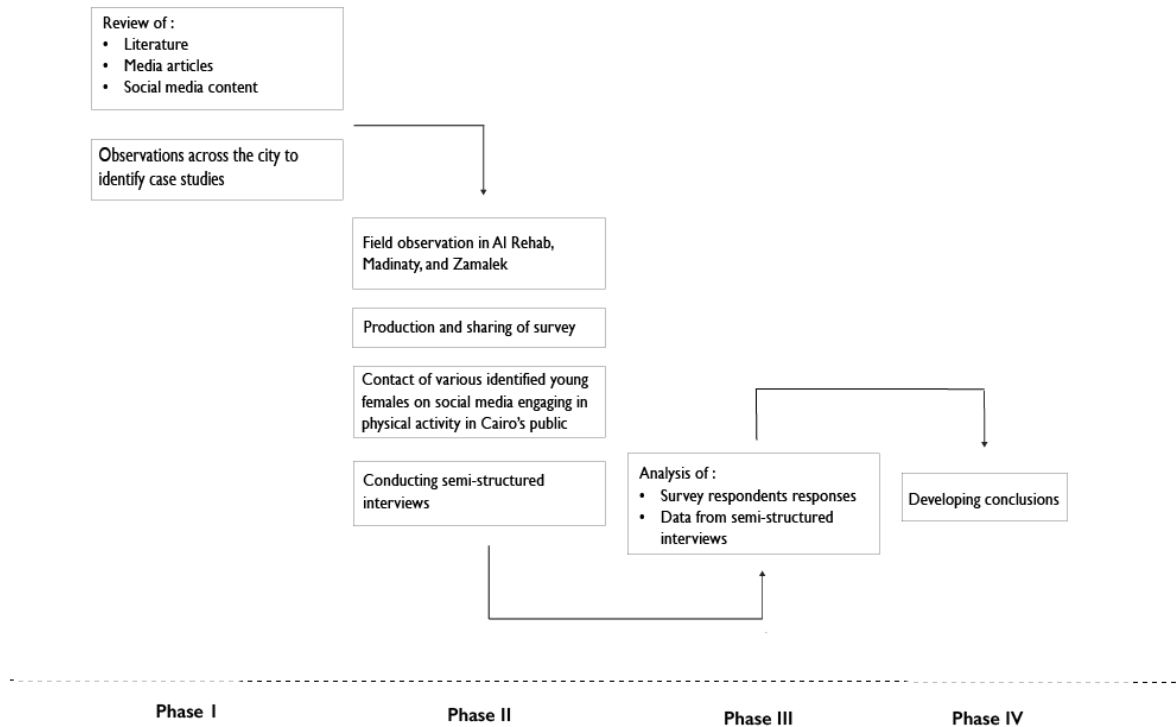


Figure I. Methodology flowchart

activities, the presence of informal behaviours and interactions through the exploration of social media posts, photos and videos becomes a useful angle of analysis to identify and map user-based urban activities.

b. Field observations

Field observations were conducted in Al Rehab, Madinaty, and Zamalek, focusing on the experiences of young females in male-dominated public spaces. These case studies were selected based on preliminary social media research, which indicated that most young females engaged in sports activities were concentrated in these areas. Their distinct urban environments and varying levels of public space use and access further justify their conclusion in the study.

3. The context of the three case studies

A sustainable environment not only enhances health and well-being but also offers comfort, satisfaction, and stress reduction. The standard of urban living is a primary concern in developing countries, often involving critical challenges such as poverty, lack of clean water, waste management, pollution, and congestion (Azab and Farahat, 2018). In Egypt, gated communities (GCs) are designed to attract residents seeking a better lifestyle, complete with various services, leisure options, and activities.

Al Rehab and Madinaty are gated communities noted for their organised and relatively secure settings. These communities integrate urban green spaces into their layouts, featuring squares, parks, and plazas that encourage residents to be active. Overall, these environments are safe for users, facilitating easy movement between different destinations

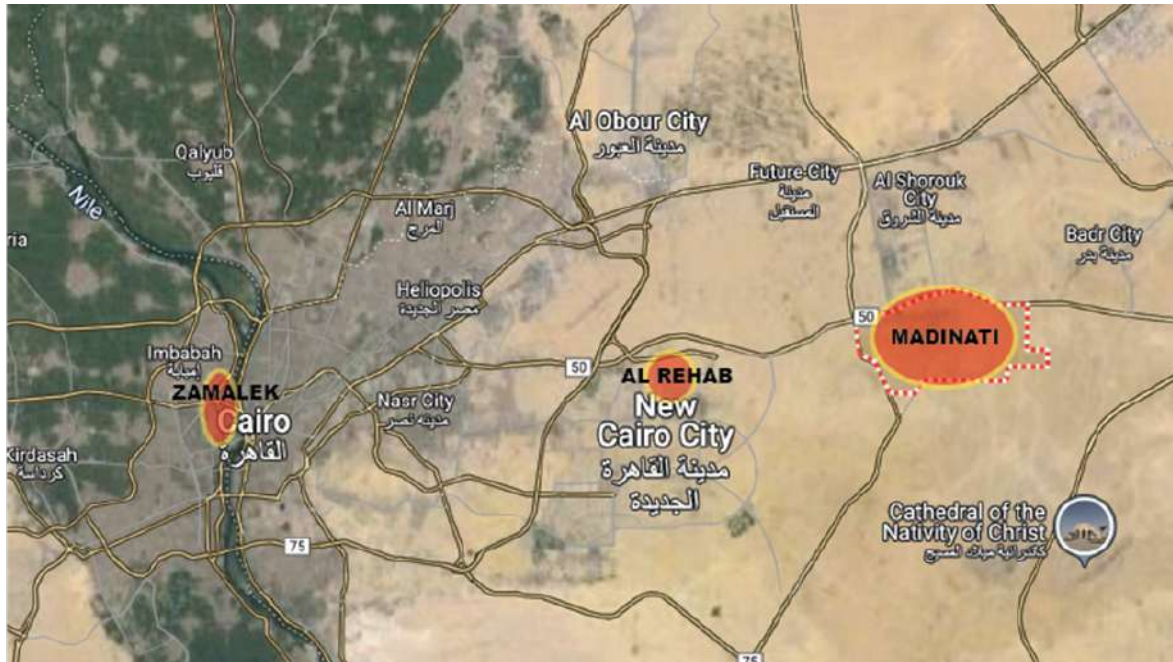


Figure 2. Map of the three neighbourhoods: Zamalek, Al Rehab, and Madinati. Source: Google Satellite.

during the day as seen in Figures 3 and 4.

In contrast, the more open and cosmopolitan area of Zamalek provides a different urban experience. Situated on Gezira Island in the middle of the Nile and connected to the mainland by bridges, Zamalek is a privileged neighbourhood due to its historical architectural and urban qualities, with nearby tourist attractions. However, it is currently facing many challenges. Its narrow streets, as shown in Figure 5, do not give the opportunity for diverse activities (ElSerafi, ElKerdany and Shalaby, 2017).

By examining these neighbourhoods, the study seeks to offer a small sample of Cairo's urban spaces. The study provides an in-depth rather than a wide perspective on how young females navigate and actively use urban spaces in Cairo.

a. Descriptive-analytical survey

A survey was conducted using Survey Monkey with 35 respondents, aged 18-44. The respondents' sample has a relative gender balance with 40% of the respondents being males and 60% females whilst 84% of the respondents are single. The survey targeted both males and females to include a range of insights and experiences. The questions aimed to uncover general perceptions and societal influences as well as personal experiences that shape girls and young women's social and physical interactions within the city of Cairo to provide an understanding of the factors determining the presence of the targeted demographic in urban public spaces. The survey has been shared on various social media platforms and, for simplicity of study, the survey questions and answers were in English.

b. Semi-structured interviews

Semi-structured interviews were conducted in the three neighbourhoods of Al Rehab, Madinaty, and Zamalek with young women aged 22-30 engaged in sports in public spaces. The interviews were conducted in Arabic and translated to English. The interviews were pivotal in understanding the behavioural patterns of these women and their motives

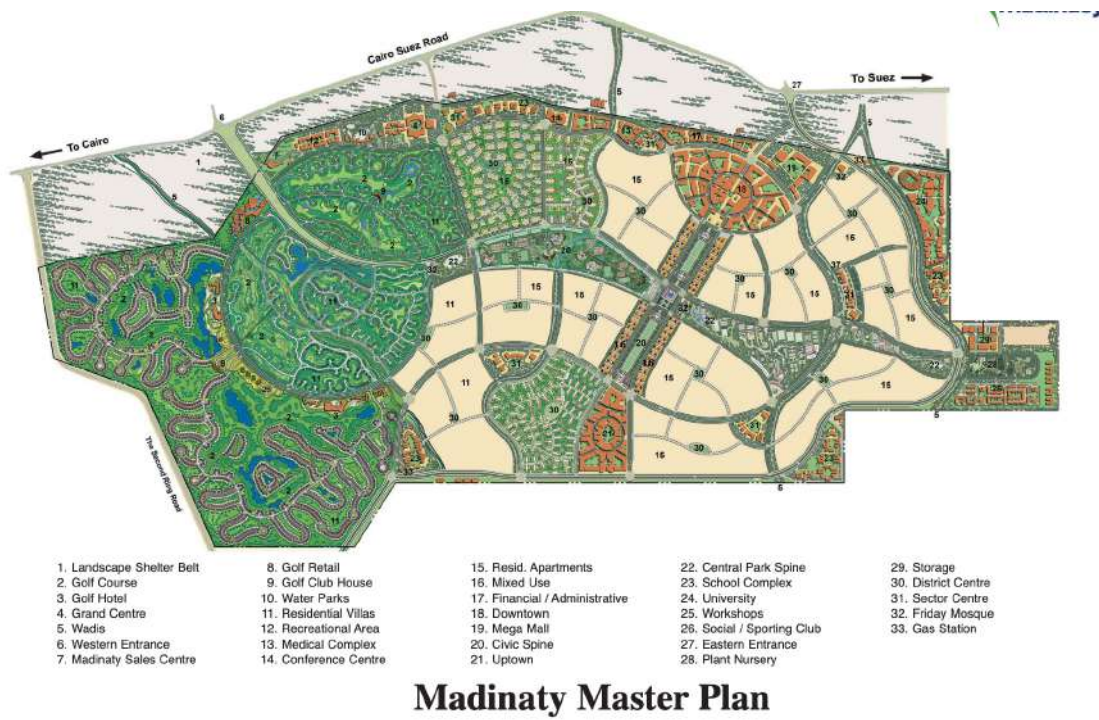


Figure 3. Master Plan of Madinaty City. Source: Talaat Moustafa Group Holding Company.



Figure 4. Master Plan of Al-Rehab City. Source: Elbayt.



Figure 5. Zamalek Master plan. Source: Google satellite.

for sports despite the discouraging atmosphere. The interviews began with inquiries about enjoyment and initiation of sports participation and then delved into the factors influencing comfort and safety while practising sports in public spaces. Subsequent questions targeted the spatial and social requirements for practising a specific sport, shedding light on the participants' expectations and desires. The interviews also sought to uncover the roles of familial support, disapproval or fears, and the impact of societal norms, aiming to provide a comprehensive understanding of the challenges, motivations and adaptive strategies of girls and young women practising physical activity in Cairo's public spaces.

c. In-depth interviews

In parallel, in-depth interviews were conducted with young women between 22 and 30 years old engaged in sports practice in Cairo's public spaces. These interviews were essential to gain first-hand experience and understanding of the perceptions of young women already practising sports in public urban spaces in Cairo. After pinpointing relevant individuals on social media platforms such as Instagram, outreach efforts were initiated by sending text messages to gauge their willingness to participate in the study. The communication transitioned to exchanging phone numbers, and confirmation of interview details took place on WhatsApp. At the start of each interview, the study was described to the interviewees and they were informed that they could withdraw at any time from the process. All interview questions were about enjoyment, initiation, comfort, safety, spatial and social requirements, familial support, societal norms, and adaptive strategies.

The research methodology integrated qualitative and exploratory characteristics and was fed by the thoughts, perceptions and experiences of the interviewees and the survey respondents. The research peers all identify as young women and have feminine bodies, creating thus an intimate and legitimate link with and understanding of the subjects and dynamics analysed. Two out of three of the research peers are Cairenes thus familiar with

the local context. The combination of insider and outsider outlooks enriched the study by bringing diverse viewpoints and minimising potential biases associated with both statuses.

3.1. Study limitations

The survey's results are tied to the perspectives and experiences of a small group of the Cairene population because of the linguistic bias arising from the use of English, a language that is primarily understood by the country's younger and nearly all educated citizens. As discussed in Section 3, education and international experiences influence perceptions and behaviours, as well as about urban public life and attitudes. Additionally, a tight schedule of less than two months limited the study's research and analysis and the number of interviewers.

4. Findings

4.1. The dominance of boys in playful spaces

Cairo lacks public spaces that encourage physical activities and playfulness especially for age sectors other than kids. Yet, various urban forms such as sidewalks, public green spaces, and streets have often been appropriated by boys and young males for playing football since the 20th century. The current physical and social atmosphere does not allow girls and young women to pursue similar activities, consequently excluding them from early age in public spaces resulting in a significant gap in spaces dedicated for youth/teenagers. It was crucial to map the typologies of spaces, as far as possible, within the city of Cairo used for sports and playfulness in general and the ones that encourage or allow the presence of women specifically, illustrated in Figure 6. The mapping was achieved relying on data collected through digital ethnography, observations, interviews, and the survey. As previously mentioned, streets and sidewalks have been an arena for physical activities in Cairo. These spaces have been appropriated for football and cycling for many years. However, new activities like parkour and inline skating are emerging on the streets (Figure 6). Public green spaces are usually fenced in in Cairo and those that are free to access are not equally distributed in the city. These spaces are predominantly used by boys for their daily football matches or sometimes, for cycling. Recently, other activities emerged such as skateboarding and yoga classes, but these remain less significant than other sports. In addition, public parks in Cairo that are fenced and have entry tickets integrate larger areas allowing users to practise a wider range of sports and play, such as inline skating, cycling, and ball games. Another space within the city that welcomes amateur sports activities is the sports playgrounds that are open for rental to anyone. These are usually football playgrounds that attract boys and young male adults, as shown in Figure 6. Most sports playgrounds are male-dominated. Girls and young women are rarely witnessed practising any physical activities. They are, however, more present and visible in public parks and green spaces, and they are able to practise in a more relaxed environment. Another shift in spaces that allow an encouraging environment for girls and young women are within the walls of gated communities like Al Rehab and Madinaty in New Cairo, as highlighted by the interviewees. From this analysis, it is evident that girls and young women have been trying to reclaim and appropriate the public spaces more and more in their favour, as seen in the cases of sidewalks, streets, and public green spaces for physical activities like running, cycling, inline skating, parkour, and yoga classes.

4.2. Changing social norms on female practising physical activity in public spaces

The survey was answered by 35 people, 60% of whom were female respondents. This ratio is important because we regard women as having a less biased judgment due to the closer relationship and intimacy to the subject of study. Most respondents agreed that people, including girls and young women, are encouraged to practise sports. However, this doesn't involve practice in public spaces. 76% of the respondents view public spaces in Cairo as unwelcoming and unfriendly for girls and young women to practise physical

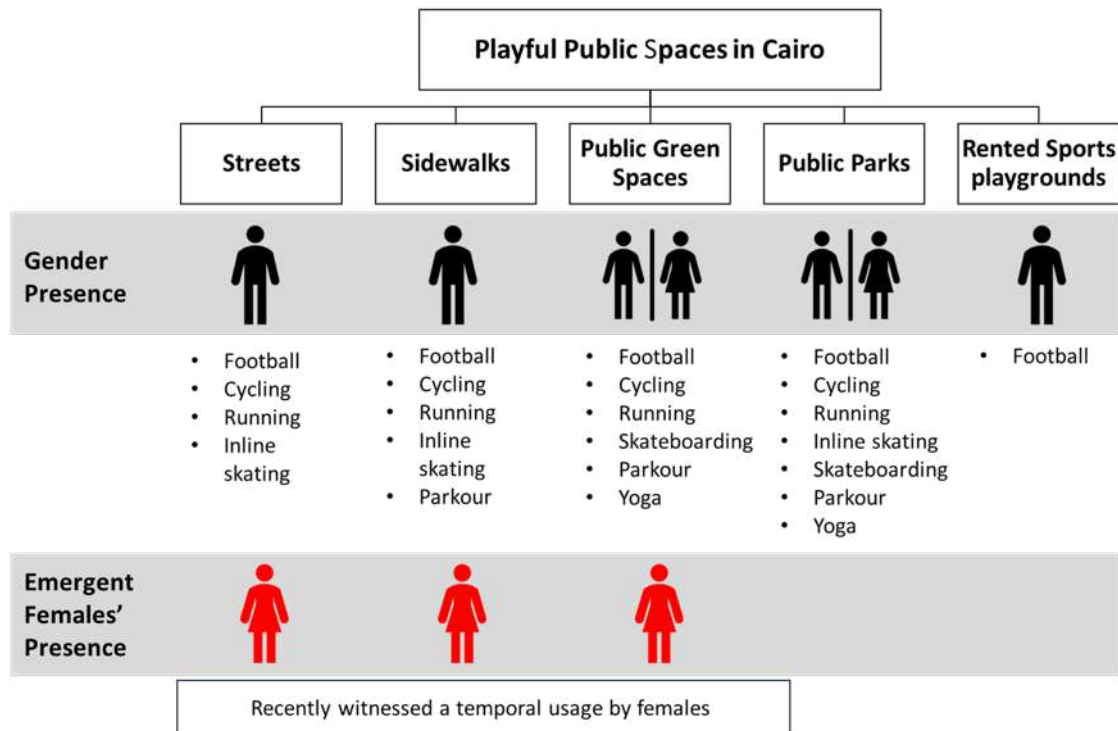


Figure 6. Various types of public spaces in Cairo that people use for sports and physical activities.



Figure 7. Teenagers skate along the Nile waterfront in Cairo (sidewalks) The right picture illustrates a playground open for rental to the public in Nasr City, Cairo . Source: the authors.

activity. Sixty percent of respondents report having faced or know girls and young women who faced challenges in practising physical activity in public spaces. They listed issues such as stereotyping, negative language, following, and feelings of insecurity due to drunk men in the streets in the early hours of the morning. Such issues touch upon forms of harassment and perceptions of safety.

“I was running in a public space when I was younger, a man was watching me, tried to talk to me when I was done, and when I refused to talk he followed me to my house.”

Such phenomena are, however, not generalised across the city of Cairo; they depend on location. One respondent wrote that *“women in Egypt suffer from street harassment, but it will depend on the district, there are some districts where women can freely practise whatever they want, while in other districts they can’t even walk freely.”* Another respondent highlighted the fact that the city of Cairo is large and diverse; therefore, some areas have better infrastructure for physical activity than others. Such perspectives are also shared by interviewees, showing findings that intersect coming from different research tools.

One respondent mentioned that the education of people coming from all social classes should be an important approach to integrate in the quest of creating more welcoming public spaces for girls and young women to practise physical activity. Some interviewees have expressed a certain level of socio-cultural openness due to international experiences and contacts, usually regarded as symbolic of higher education and social classes.

The respondents were then asked, according to their own point of view, to select priority actions which could help alleviate such shortcomings and create more welcoming environments. The respondents were presented with various actions and strategies to choose from which are physical improvements, cultural norms, safety, regulations and law, or other where they can specify. The results show that improving cultural norms and safety should be the main focal point. Nevertheless, 68% of the respondents believe that the community tends to support girls and young women active in sports, regardless of the place of practice. This defies the widely held belief that men should play a more patriarchal role in society (Bassam, 2023).

4.3. Breaking cultural norms in the practice of physical activity

The results obtained from the conducted interviews validate the significant gap within Cairo’s public spaces, confirming a lack of dedicated areas for girls’ and young women’s sports and physical activities. This absence not only results in feelings of exclusion but also raises valid safety concerns among the female youth. Instances of parkour, showcasing females venturing outside the city, exemplify the lengths to which women are willing to go to pursue their passion in the face of spatial and societal restrictions, exemplified in Figure 8. A 2017 Thomson Reuters Foundation’s study on how women are treated in the world’s biggest cities rated Cairo as the world’s most dangerous “megacity” for women (Abdallah, 2018).

Yara, 25 years old, began her sports journey in Saudi Arabia and faced initial challenges upon bringing her passion for inline skating to Egypt. Beyond the comments she received, Yara encountered hurdles that highlighted the cultural gap surrounding skating in Cairo. Car and transportation drivers often expressed anger, shouting at skaters as they believed the activity posed a danger and obstructed the roads. To navigate these challenges, Yara initially preferred skating in groups, often with a male companion, for additional feeling of safety, as shown in Figure 9.

In her firm commitment to inline skating, Yara used social media, joining Facebook groups dedicated to skating. The virtual community was important for her to connect with like-minded individuals. One of her most favourite connections, is her current best friend from one of these online skating gatherings. This highlights the transformative role of social media in bringing together individuals to overcome certain challenges.

Salma Bahgat, 23 years old, the visionary founder of Solys Space, has become a pivotal figure in reshaping the image of female inline skating in Egypt. Her creation of a dedicated space for women and girls, designed to accommodate skaters of all ages, addresses a critical void in public spaces. Salma's insights also bring to the forefront the key elements skaters seek in public spaces. Egyptian skaters, in their quest for suitable spaces, face a scarcity of areas that encompass the desired design elements essential for an enriching inline skating experience, illustrated in Figure 10. The search for the ideal spot involves identifying locations with stairs and handrails, offering challenges to enhance technique



Figure 8. Egyptian women practising Parkour around their buildings on the outskirts of Cairo.
Source: Reuters, Amr Abdallah Dalsh.

and skills development. Moreover, skaters seek well-paved, spacious streets that allow for unrestricted movement. Soft flooring is also a crucial consideration, ensuring smooth and safe manoeuvres. Notably, specific areas in Egypt, such as Rehab and Madinaty City, have emerged as havens for skaters due to the presence of these desired elements, emphasising the need for a broader integration of such features in public spaces to foster a thriving skating community. Salma's initiative and these insights collectively highlight the imperative for creating inclusive, well-designed spaces that cater to the diverse needs of skaters, fostering a more supportive environment for skaters in Egypt in general and female skaters specifically

Salma's impactful journey extended beyond the streets of Cairo as she ventured into the realm of social media, creating an Instagram page where she shared videos and images depicting her skating pursuits. A defining moment emerged when one of her videos unexpectedly went viral, garnering a viewership of 1.3 million individuals. This surge in visibility transcended geographical boundaries, capturing the attention of a German skating shoe brand, illustrated in Figure 11. Notably, the brand featured one of Salma's photos from her Instagram page on their official website, marking her as the first hijabi Egyptian girl to be showcased by a German skating brand. Salma's vision re-echoed not only within the local Egyptian community but also with Western audiences. Her Instagram profile became a hub of inspiration for females of all ages, motivating them to join the skating community.



Figure 9. Yara enjoys skating with her brother in Alexandria, Egypt, during her winter break.
Source: Yara shared it with the authors.

Figure 10 shows how an influential video of a 56-year-old woman skating at her school further persuaded this inspiration and inspired many women to express their newfound interest in skating. In a remarkable proof to breaking societal norms, Salma proudly mentioned that she now conducts her grocery shopping adorned in her skating shoes, embodying a fusion of personal style and passion that transcends conventional expectations. Despite the negative comments and the numerous challenges, Yara and Salma both remained steadfast and persistent in pursuing their passion, unwavering in their belief in the transformative power of skating. Over time, as Yara and Salma continued to navigate the streets on their skates, a remarkable transformation occurred. Initially faced with scepticism and disapproval, they became recognisable figures in the community. The shift in public perception became evident as cheers and support replaced the earlier derision. Moreover, the community stepped in to address instances of harassment, taking a collective stand against verbal abuse.

“Women are now training and more women are starting to come” (Salma, 2024).

“As the skating sport spreads, the acceptance of women training increases and it is not unusual for women to have a team and train,” she added.

Nour Taha, a 30-year-old runner making her way through Cairo’s busy streets, revealed



Figure 10. On the left, despite the unsafe conditions with many cars blocking her way, Salma breaks cultural norms and fears by skating in the street. On the right, Salma showcased her impressive skating skills in a well-designed pedestrian lane with smooth flooring, perfect for effortless manoeuvring. Source: Salma shared it with the authors.

her inspiring journey. Her running journey began with a unique birthday wish on her 28th birthday – a commitment to run 28 miles. Surprisingly, this single desire provoked a passion that has lasted ever since. Every day, Nour would exercise before heading to work; Nour found that starting the day with a run had unexpected rejuvenating effects, contrary to the anticipated fatigue. She stressed the critical need of bringing sports into the early hours of the day.

Nour's story describes the unconventional concept of street running in Egypt, recounting the inception of "Cairo Runners" in 2012, illustrated in Figure 13. Cairo Runners was started by Ibrahim, a visionary who drew inspiration from international practices. It started off as a Facebook page inviting followers to join. The first event witnessed the participation of 90 individuals, setting the stage for the widespread adoption of running initiatives across Egypt, a typical example by platforms like Alexandria Runners. Nour discussed the early societal challenges female runners had to overcome, relating stories of being met with scepticism, exemplified by a doorman questioning her motives.

"Why are you running... anyone following you?", Nour quotes.

Moreover, she highlighted the infrastructural limitations of Cairo's streets, underscoring the narrow pavements cluttered with obstacles, making running a logistical challenge. Despite these hurdles, the booming popularity of initiatives like Cairo Runners has transformed the running landscape. Recognising their impact, governments now support these events, implementing street closures during running hours to ensure the safety of the participants, a testament to the transformative influence of collective passion and perseverance.

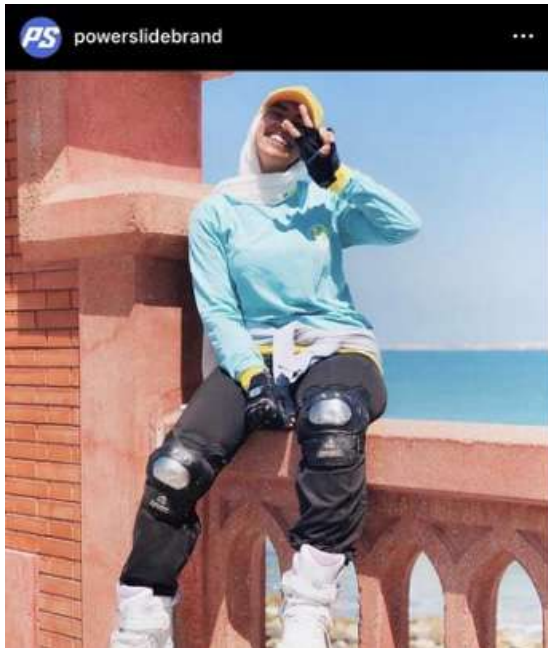


Figure 11. (Left) Yara's picture as the first hijabi and Egyptian girl. Source: Powerslide brand.
Figure 12. (Right) Breaking cultural norms, a 56-year-old woman practices skating at Salma's studio, living her dream. Source: Solyspace.

In expressing her love for street running, Nour Taha spoke about the beauty of her experiences, particularly in the enchanting district of Zamalek. Running through this area offers glimpses of breathtaking old palaces and the majestic Nile, creating a picturesque backdrop for her daily pursuits. However, Nour candidly addressed the hurdles encountered during the early morning hours, particularly as a female runner. The presence of inebriated individuals becomes an unfortunate reality, resulting in unwarranted attention and verbal harassment. The discomforting encounters, marked by inappropriate comments and intrusive stares, prompted Nour and fellow female runners to seek refuge in semi-public spaces like Cairo Festival City, Rehab, and Madinaty (gated communities in Cairo that allow outsiders to enter). Despite the respite offered by these areas, characterised by a lack of shading and uneven topography due to varied elevations, running becomes a formidable challenge. The pursuit of a safe and enjoyable running experience thus continues to be marred by the need for alternative spaces that balance security and convenience for female runners in the diverse landscapes of Cairo.

The interviews provided insights into a spectrum of health and well-being issues that have transformed the lives of these young women. A key element of achieving mental balance was emphasised through various outlets, such as physical activity and social interactions. Embracing a more sociable lifestyle not only fostered meaningful connections but also induced a feeling of flying—elevating spirits and cultivating a profound sense of happiness. Many embarked on fitness journeys, incorporating gym workouts for body maintenance and strength. Time management, consistency, and discipline emerged as foundational pillars. Notably, these transformations also correlated with higher levels of academic achievement, reflecting the holistic impact of prioritising health and well-being.

4.4. Discussion: Reclaiming public spaces for physical activity: Young women's manoeuvres for resilience and re-appropriation

The perceptions collected through the survey and the stories shared by Salma, Yara and Nour collide in significance. The fear of violence and the inadequacy of the physical environment to pursue physical activities and play are common sentiments and judgements amongst the observers and the users. This study suggests that the participation of girls and young women in physical activity and playfulness in Cairo is still limited and faces several challenges. Yet, the results we found from studying the overall context via digital ethnography, the interviews, and the surveys signify resilience of motivated females to claim their space in such a bustling city. We argue that the young women we interviewed have developed practical strategies to diminish the risk of negative experiences emerging from the social and physical constraints inherent to the city's socio-cultural and urban environment. We view these strategies as adaptive and as material manifestations of resilience through the use of social media platforms. In the context of Islamic education and tradition, wherein public space behaviour should be modest and even more so restricted for women (Jalalkamali and Doratli, 2022), still making the decision to be public and active in the urban is *per se* a small act of subversion. For instance, the lifting of the



Figure 13. The various running events organised by Cairo Runners are depicted in the figure, indicating street closures for the safety of runners. Women are seen running freely alongside their peers.

Source: Cairo Runners.

ban on sports for women in Saudi Arabia in 2017 stems from both the negative effects of gender segregation and the emerging trend of creating women-only spaces as a response to discrimination (Human Rights Watch, 2017). Therefore, limited access or restrictions to traditional public spaces can lead to the creation of alternate forums by women.

4.5. Finding the right space

Another crucial aspect of physical activity is the robustness of the built environment for such activities. Playful aspects of public spaces should be prioritised by designers and decision-makers. The significance of well-designed public spaces for physical activities is emphasised by Salma's and Nour's insights in section 3.3. The current status of infrastructure provided within the various types of public spaces is illustrated in Figure 14. Desirable features of public spaces that encourage physical activities and play include: (1) proximity to the place of residence is key for the elderly, children, and families with young children, and busy adults who do not want to spend extra time commuting, as highlighted by Nour who preferred running around her residence before work; (2) a network of public spaces linked into a cohesive system enabling active commute between different urban services and facilities, allowing for the creation of trails for activities like walking, running, and skating; (3) multifunctionality and diversity of architecture and facilities to encourage the widest range of users of all ages and fitness levels to undertake physical activity, also in a manner not necessarily foreseen by the designers, this was captured and portrayed by Nour who emphasised the impact of the beautiful scenery and built environment in creating a more lovable experience for her daily run; (4) climate sensitive designs incorporating natural elements with various enclosure ratios that are easily accessible, especially in arid regions like Cairo where shade is essential for enhancing the microclimate of the urban areas and hence provide a better atmosphere for sports; (5) equal access: ensuring equal access to public spaces is not only a matter of fundamental rights but also plays a crucial role in the context of cultural and gender inclusivity. As Salma's insights reveal, women skaters in Egypt face challenges in finding suitable public spaces catering to their specific needs. The quest for well-designed spaces for physical activity intersects with the broader issue of equal access for women. Salma's observations align with the notion that exclusion from public spaces can manifest through various means, such as dress codes, behavioural expectations, and spatial constraints. This exclusion is not limited to recreational activities such as skating but extends across different spheres of sports; (6) Immersion in play: the concept of immersion in play extends beyond childhood and holds significant implications for adults within public spaces. This immersive play experience may signal a departure from traditional spaces, particularly for women who seek to assert agency and challenge societal norms. Incorporating elements like greenery, multifunctionality, and diverse architecture contributes to the creation of physically active and inclusive public spaces. Just as traditional art materials are manipulated to create artistic expressions, public spaces become a creative material in the context of playable cities as mentioned by Nour in section 3.3. Finally, Salma's and Ibrahim Cairo Runner's initiative and these insights collectively underscore the need for collaborative efforts in creating urban spaces that not only accommodate, but actively promote a variety of physical activities, contributing to the overall well-being of the community.

4.6. Finding the right time

One of the clear manifestations of the adaptive strategies is the creative utilisation of time and place in the cityscape. According to the interviews, women in Cairo modified their daily routines in order to avoid harassment or feeling uncomfortable. As such, they either practise in the early hours of the mornings or seek remote areas to enable their freedom of public spaces usage away from the eyes of the usual crowds during the day. Yet some do both, seeking remote areas and heading there in the very early hours of the mornings especially on the weekends. This situation challenges Jane Jacobs' 'eyes on the street' theory (Jacobs, 1960). In this case, girls and young women preferred to seek haven out of the sights of the crowds to ensure more freedom. During the early morning hours,

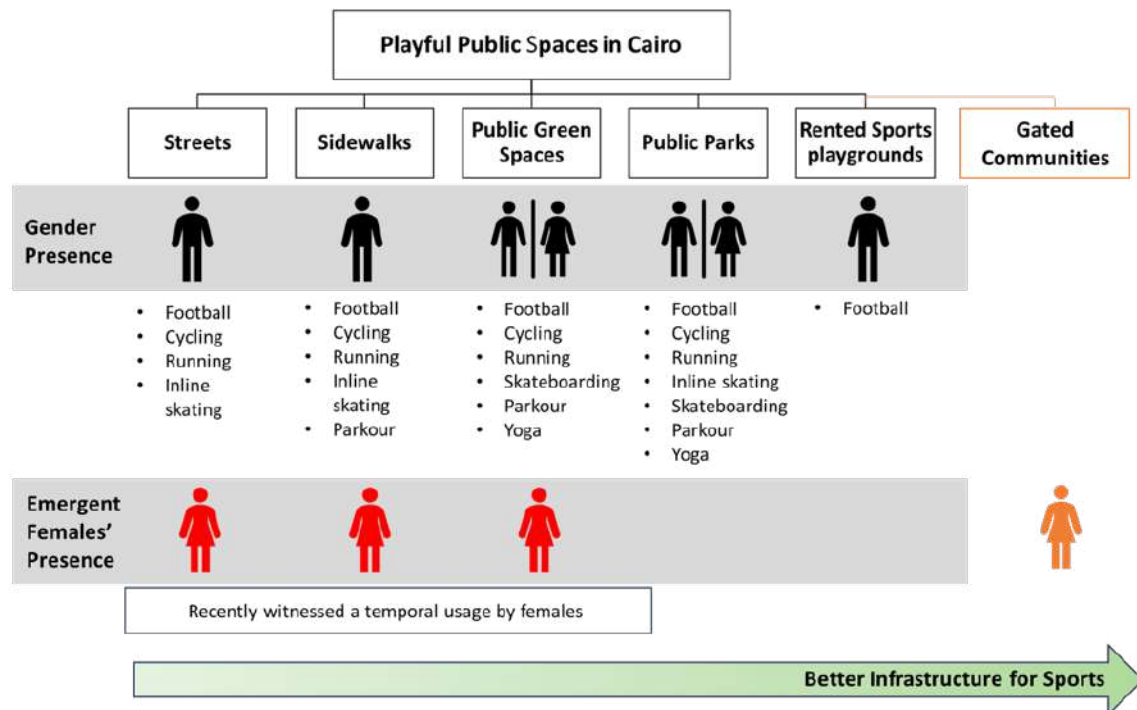


Figure 14. The relation between the various types of public spaces and the provided infrastructure within that encourages sports and physical activities. As you move to the right, the spaces provide better infrastructure for sports and physical activities. GCs emerged as a new typology according to the interviewees.

public spaces are almost empty, which adds to the women's freedom of re-appropriate such places in any way needed, such as parkour activities. The temporality of public spaces usage for physical activities and sports was mapped concerning the types of public spaces in Cairo, as illustrated in Figure 15 below.

Yet, further evidence from the girls who chose not to change their daily routines like Salma and Yara, who practised during the day and evenings, shed the light on another crucial aspect - the importance of public awareness and familiarisation of such activities in the cityscape. It was evident that familiarisation and elevated awareness of sports for girls added to the community's acceptance and the overall feeling of safety for the girls and young women practising physical activities in public spaces, as emphasised by Yara. Thus, it is crucial to increase the awareness about the importance of sports and physical activities for all city dwellers equally. Improving the safety of women in public spaces involves

addressing issues such as improper lighting, narrow areas, and the lack of designated pedestrian pathways.

4.7. Practising collectively

The experiences of Yara, Salma, and Nour practising physical activity in Cairo show that being part of a virtual group that is also connected to a physical group, can be empowering. This group dynamic helps alleviate insecurity and fear, fostering a greater sense of self-confidence (Bynner and Hammond, 2004). This newfound confidence can encourage independent practice, as seen with these three young women. All interviewees agreed on the pivotal role of social media in their pursuit of sports in Cairo’s public streets. Platforms such as Facebook and Instagram transcend boundaries and foster a global community. Witnessing females engaged in sports through online platforms serves as a powerful source of inspiration, encouraging them to challenge societal norms and embark on their own athletic journeys. Social media positively impacted their participation in urban spaces. Gatti and Procentese (2021) suggest that social media community-related practices can give new social meanings and livability to urban spaces. Instagram’s reels revolutionised content creation, providing a dynamic space for individuals like Salma to share their passions and talents. Social media connected like-

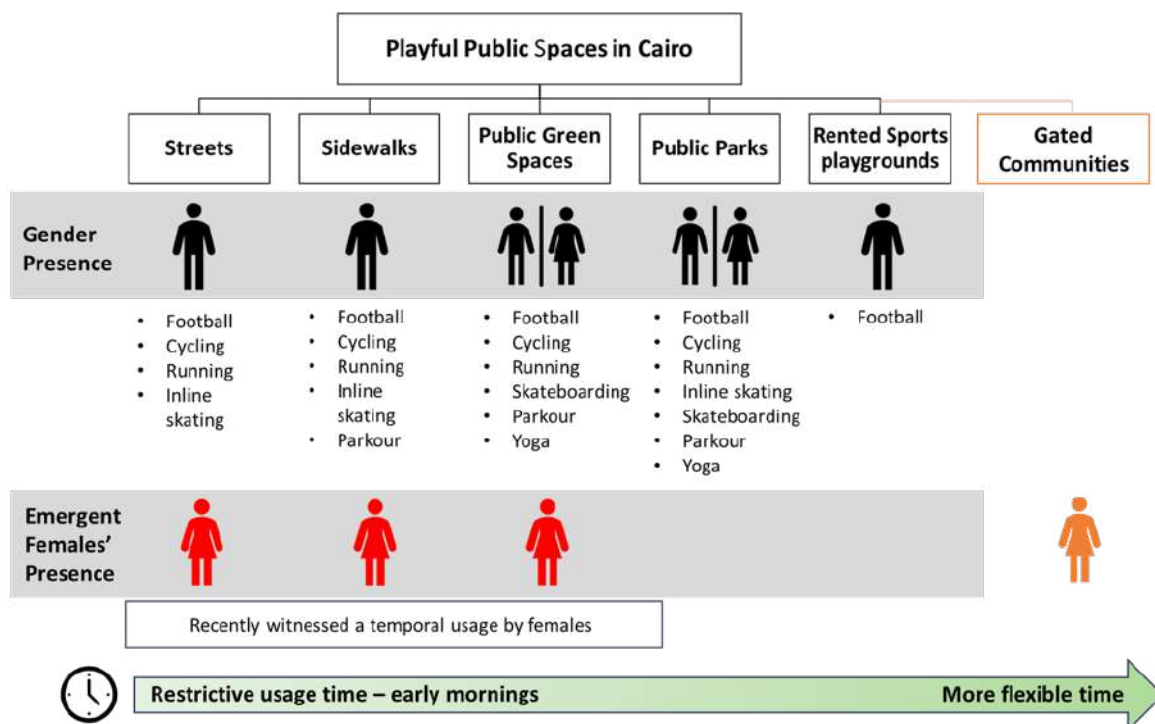


Figure 15. Illustration of the temporality of young women using public spaces for physical activities and sports. Through the findings analysis, it appeared that young women are more cautious in selecting the right time when using the types of public spaces on the left and it gets more flexible as you transcend to the spaces on the right.

mindful individuals and enabled the organisation of group events, overcoming geographical limitations. This digital connectivity has been instrumental in spreading the concept of sports within Egyptian culture, challenging stereotypes, and reshaping societal perceptions. Social media's transformative force is evident in breaking cultural barriers, and fostering inclusivity, ultimately contributing to the positive cultural shift towards embracing diverse sports and creating a more open-minded society in Cairo. These young women are playing key roles in creating safer urban spaces. By normalising females' physical activity in public spaces, they shift social representations of these spaces, challenging male-dominated spaces, and perhaps even incentivise other young women to follow their lead.

Despite these positive enablers, such mechanisms of resilience and re-appropriation should not be seen as panacea for the fundamental urban problems related to safety, social exclusion and physicality. They are initial steps for women's emancipation and not justifications for inaction by public and institutional actors. Stakeholders can leverage social media to activate inclusive public spaces use and female physical activity. Cairo's local governance actors, such as councils and community organisations, can legitimise and enhance this system of collective organisation. Participatory methods can be used to include young women 'norm-breakers' such as Yara, Nour, and Salma, as 'flagships' for empowerment and appropriation. Furthermore, local actors can conduct pilot studies to identify replicable design measures for scaling up. Cities' policies should focus on providing opportunities for public spaces appropriation by communities, especially young women. Policies should acknowledge the needs of the various age and gender groups, allowing for a continuous process of appropriation and evolution.

5. Conclusion

This study explores the perceptions and experiences of young women participating in physical activities and play within public spaces in Cairo. It highlights the fundamental connection between the conservative culture of Egypt and the lack of safe urban public spaces for female users. Through a contextual analysis, this study adds to the understanding of the socio-cultural and urban physical constraints on the gendered access and use of urban public spaces in Egyptian cities. Young women's engagement in physical activity and play in public spaces is influenced by fear of violence, perception of safety, and urban design aspects that discourage certain behaviours. Interviewees and survey participants shared stories of their initial struggles encountered amidst societal expectations. The Cairo Runners project and Yara and Salma's passion for inline skating are examples of the increased acceptability of female participation in the urban realm which the research also highlights as positive development. These shifts, such as Solys Space's use of social media to build communities and Salma's viral success that encourage women to take up line skating, are viewed as forms of resilience and re-appropriation. They likewise build inclusive communities with the shared interest of health and well-being, improving spaces while also acting as proof of the importance of visibility and community support. There are ways to reduce the likelihood of unpleasant social interactions and increase the safety and enjoyment of play, including group support and site selection. The rise of female physical activity normalisation and the development of stronger, healthier communities are both directly due to social media platforms.

Expanding on the identified themes, the paper makes practical recommendations for developing Cairo public spaces for more inclusivity:

- *Placemaking and Urban Design Enhancements* that include well-designed walkways, improved pedestrian infrastructure, more greenery and enhanced accessibility in public spaces. To attract different sport communities, particular emphasis can be placed on certain sports areas like skateparks and running tracks;
- *Prioritising Street Design* including wider sidewalks, proper lighting, and smooth pavements, are essential to enhancing the safety and accessibility of public spaces for informal play activities. It is agreed as the survey results that Cairo public spaces are not friendly to women engaging in physical activity. The personal stories of Yara, Salma, and Nour provide a deeper understanding of the struggles and triumphs of young women pursuing physical activities in Cairo;
- *Cultural and Educational Shifts* that address the cultural and educational factors that contribute to girls and young women exclusion from public spaces is essential. Campaigns for education and awareness can shift societal norms and create a more welcoming environment for female physical activities.

More research could help define and map safety indicators and hotspots as seen by girls and young women and examine contextually relevant social variables. These efforts could act as a roadmap for Cairo's placemaking projects and aid in the contribution of safer and more accessible urban environments that encourage women to actively participate in urban public areas.

A statement acknowledging the use of Artificial Intelligence (AI)

During the preparation of this work the authors used DeepL, ChatGpt and Grammarly in order to partly translate interviews from Arabic to English, rephrasing comments of survey respondents, rephrasing basic syntax of sentences when necessary. After using these tools, the authors reviewed and edited the content as needed and take full responsibility for the content of the publication.

References

- Abdallah, A. (2018) 'Egyptian women challenge social norms by practising Parkour', Reuters [Online]. Available from: <https://www.reuters.com/article/us-egypt-parkour-idUSKBN1KC0T/> [Accessed: 5 January 2024].
- Aly, D., Dimitrijevic, B. (2022) 'Public green space quantity and distribution in Cairo, Egypt.', Journal of Engineering and Applied Science, 69 (15).
- Azab, N. and Farahat, B. (2018) 'Gated communities; images of sustainability; Al-Rehab and Madinaty case studies', BAU Journal - Health and Well-being, 1(3), Article 47.
- Cairo Runners. (2024) Cairo Runners [Online]. Available from: <https://www.cairorunners.com/> [Accessed: 5 January 2024].
- Human Rights Watch. (2017) Saudi Arabia: State Schools to Allow Girls' Sports [Online]. Available from: <https://www.hrw.org/news/2017/07/13/saudi-arabia-state-schools-allow-girls-sports>. [Accessed: 31 January 2024].
- Bassam, N. (2023) The Gendered City: How Cities Keep Failing Women. Independently published.
- Boys, Jos. (1984) 'Women and Public Space' in. ed. Matrix, Women and the Man-Made Environment, 37-54, London and Sydney: Pluto Press.
- Elbayt. (2024) Apartments, Villas, Townhouses in New Cairo, Egypt [Online]. Available from: <https://elbayt.com/en/projects/giza/new-cairo/2nd-district/al-rehab> [Accessed 20 July 2024].

- Elkhouly, A., Attia, S. and Zayed, M. (2017) 'Quality of Life of Children in the Egyptian Communities: Investigating Current Situations, Cairo as a Case Study', *SSRN Electronic Journal*.
- El-Ghazaly, Y. (2018) 'Moral and cultural discourses surrounding women athletes in Egypt' [Master's Thesis, the American University in Cairo]. AUC Knowledge Fountain.
- ElSerafi, T., ElKerdany, D. and Shalaby, A. (2017) 'Challenges for sustainable urban mobility in Zamalek District', *Open House International*, 42(4), pp. 13-27.
- Forrest, R. and Kearns, A. (2001) 'Social cohesion, social capital and the neighbourhood', *Urban studies*, 38(12), p2125-2143.
- Gatti, F., and Procentese, F. (2021) 'Experiencing urban spaces and social meanings through social Media: Unravelling the relationships between Instagram city-related use, Sense of Place, and Sense of Community', *Journal of Environmental Psychology* (78), 101691.
- Gil-Madrona, et al. (2019) 'Contribution of Public Playgrounds to Motor, Social, and Creative Development and Obesity Reduction in Children', *Sustainability*, 11(14), p. 3787.
- Hegazy, I.R. (2020) 'The quality of life between theory and implementation in Egypt: The case of Al-Rehab City, Egypt', *Ain Shams Engineering Journal*, 12(2), pp. 2285-2296.
- Ibrahim, H. (2020) 'The quality of life between theory and implementation in Egypt: The case of Al-Rehab City, Egypt', *Ain Shams Engineering Journal*, 11(4), pp. 1041-1049.
- Ilahi, N. (2009) 'You gotta fight for your right(s): street harassment and its relationship to gendered violence, civil society, and gendered negotiations', *Archived Theses and Dissertations* [Online]. Available from: https://fount.aucegypt.edu/retro_etds/2297 [Accessed 31 January 2024].
- Jalalkamali, A., and Doratli, N. (2022) 'Public Space Behaviours and Intentions: The Role of Gender through the Window of Culture, Case of Kerman', *Behavioural sciences*, 12(10), p. 388.
- Kostrzewska, M. (2017) 'Activating Public Space: How to Promote Physical Activity in Urban Environment', *IOP Conference Series: Materials Science and Engineering*, (245), 1052074.
- Make Space for Girls [Online]. Available from: <https://www.makespaceforgirls.co.uk/> [Accessed: 6 July 2024].
- Massey, D. (1994) *Space, Place, and Gender*. Minneapolis: University of Minnesota Press.
- Mohamed, D. H. I. L. (2021). *Cairo: An Arab city transforming from Islamic urban planning to globalisation*. *Cities*, 117.
- Navarrete-Hernandez, P. and Arielle Vetro, P. C. (2021) 'Building safer public spaces: Exploring gender difference in the perception of safety in public space through urban design interventions', *Landscape and Urban Planning*, 214.
- Nessim, M.A. and Mosallamy, R.A. E. (2021) 'Zamalek Educational Land Use Re-evaluation Addressing Problems and Recommendations', *HBRC Journal*, 17(1), pp. 201–230.
- Schuller, T., et al. (2004) *The Benefits of Learning: The Impact of Education on Health, Family Life and Social Capital* (1st ed.). Routledge.
- Seemantini Soraganvi, A. (2018) 'Safe Public Places: Rethinking Design for Women Safety', *International Journal on Emerging Technologies*, 8(1), p. 304-308.
- Selby, D. (2018) 'Women In Egypt Help Shift Social Norms With Parkour', *Global Citizen* [Online]. Available from: <https://www.globalcitizen.org/en/content/women-egypt-parkour-sports-gender-inequality/> [Accessed: 20 January 2024].
- SolySpace (2023) Powerslidebrand [Online]. Available from: <https://www.instagram.com/p/CQq77WajY9y/?igsh=MzRIODBiNWFIZA==> . [Accessed: 10 January 2024].
- Thoraya, H. (2010) *Principles of planning and design of open areas for children in the Egyptian city*. Master of Science thesis, Assuit University.
- United Nations (2016) *New Urban Agenda*. UN-Habitat [Online]. Available from: <https://unhabitat.org/about-us/new-urban-agenda> [Accessed 12 January 2024].
- UN-Habitat (2019) *Cairo Transforms Car Park into Public Park* [Online]. Available from: <https://unhabitat.org/news/16-may-2019/cairo-transforms-car-park-into-public-park> [Accessed: 20 December 2023].

- United Nations Human Settlements Programme (UN-Habitat) (2015) *Global Public Space Toolkit From Global Principles to Local Policies and Practice*, Nairobi: UN-Habitat.
- Wray A, et. al. (2020) 'Physical activity and social connectedness interventions in outdoor spaces among children and youth: a rapid review', *Health Promotion and Chronic Disease Prevention in Canada*, 40(4), p. 104-115.

A Digital Blueprint of Breathing Spaces in Mumbai

Ashwini Uday Deshpande, Pranil Chitre

NAGAR, India

dashwini7395@gmail.com | pranilchitre23@gmail.com

Anaushka Goyal, Prerna Yadav

Urban Design Research Institute (UDRI), India

goyalanaushka@gmail.com | prema97yadav@gmail.com

Abstract

Mumbai, amongst the most densely populated cities in India, offers an alarming ratio of 1.24 square meters of public open space per capita (MCGM, 2016, p. 70). The negligence in the provision and protection of public open spaces in the city's recent Development Plan 2034 further exacerbates this deficiency. The lack of comprehensive guidelines and policy frameworks for efficient tracking, monitoring and management makes it extremely difficult to ensure the safety of these breathing spaces in the city. Public open spaces are further endangered owing to ill maintenance and heavy encroachments. The research underlying this paper outlines a strategic framework for developing a digital inventory of open spaces designated by the Municipal Corporation of Greater Mumbai (MCGM). This framework is intended to facilitate the management and monitoring of these areas¹. By annotating descriptive, quantitative, and analytical parameters, the study begins with an exhaustive ground survey of around 634 public open spaces in the suburban areas of Mumbai. The research critically evaluates the collated survey data and employs a GIS mapping methodology for geospatial analysis. Finally, it aims to make the inventory readily available to all stakeholders and citizens through digital tools and platforms that allow real-time engagement with local communities. The focus of this paper is on the role of digital tools in creating a repository available on an open-source platform that can help identify issues with public open spaces and encourage public participation in preserving and improving open spaces in the city with respect to health, safety, and comfort. The database created based on the survey focuses on governance, accessibility, safety, encroachments, and design aspects. The findings from the study will help navigate the issues of public open spaces in dense urban conglomerations like Mumbai.

Keywords: GIS analysis, community participation, digital toolkit, inequalities, urban policy

¹The research is a direct outcome of an ongoing project 'Public open spaces mapping in Mumbai' undertaken by NAGAR NGO and Urban Design Research Institute (UDRI) in collaboration.

To cite this article:

Deshpande, A., Chitre, P., Goyal, A. and Yadav, P. (2024) "A Digital Blueprint of Breathing Spaces in Mumbai", *The Journal of Public Space*, 9(2), pp. 31–54. doi: 10.32891/jps.v9i2.1784.

This article has been double blind peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

Abbreviations

DCPR	Development Control & Promotion Regulations
DP	Development Plan
EOS	Existing Open Spaces
MCGM	Municipal Corporation of Greater Mumbai
NGO	Non-Government Organisation
RDDP	Revised Draft Development Plan
PG	Playground
POS	Public Open Spaces
RG	Recreation Ground
ROS	Reserved Open Spaces
SRA	Slum Rehabilitation Authority
URDPFI	Urban and Regional Development Plans Formulation and Implementation
MHADA	Maharashtra Housing and Area Development Authority
NBC	National Building Codes of India
SPA	Special Planning Authority

I. An introduction to public open spaces in Mumbai

Mumbai's transition from seven separate islands to a continuous landmass by the early 20th century, achieved through extensive land reclamation, has reshaped its geological structure and urban fabric. This transformation has not only altered the city's physical environment but has also had significant impacts on its infrastructure, land use patterns, and overall urban development. Initially restricted to the island city, the limits of Greater Mumbai have spread to include a vast metropolitan area stretching towards the north. This expansion now covers western and eastern suburban areas and reflects the city's substantial growth and urban sprawl over the years. According to the 2011 census, Mumbai's population density has reached 20,634 per sq. km making it one of the most densely populated cities in the world (Maharashtra, 2014). The city is grappling with significant pressure on its limited land resources as it tries to accommodate its ever-growing population. The high population density has led to overcrowding in many suburban areas; this is evident in the presence of informal settlements and slums in the city (Yadav & Bhagat, 2017, p. 273).

The quality of life is further affected by the significant reduction in public open spaces (POS) and natural areas (NA). Public open spaces are essential amenities that provide residents with areas for recreation, social interaction, exercise, and connection with nature (MCGM, 2016, p. 147). The total area of all types of natural areas and open spaces in Mumbai amounts to 128.41 square kilometres (Figure 3), which translates to an average per capita open space availability of 10.32 square meters. However, a substantial portion of these open spaces is not accessible to much of the population. As mentioned in the Development Plan, of the total open space, only 15.37 square kilometres is publicly accessible, meaning they are available for entry by all citizens or local communities. This provides a per capita POS availability of just 1.24 square meters (MCGM, 2016, p. 70).

The limited accessibility of open spaces highlights a critical issue: the actual amount of POS available for public use is much smaller, affecting the quality of life for residents and their access to recreational and social areas. When compared to various national and international guidelines, Mumbai's availability of POS is significantly below the recommended standard (Figure 4). For instance, the Urban and Regional Development Plans Formulation and Implementation (URDPFI) guidelines in India suggest a minimum of 10-12 square meters per person of open space. Mumbai falls short of this benchmark (Development, 2015, p. 362). The accessible POS comprises different types of open spaces such as gardens, playgrounds, recreation grounds, beaches, promenades, sports complexes, botanical gardens and green belts. These open spaces are further categorised under two divisions:

Existing Open Spaces (EOS)	Reserved Open Spaces (ROS)
Open spaces that are acquired by the government and are developed for the purpose of sports, recreation, social, and cultural activities.	The parcels of land that are reserved as open spaces but are yet to be acquired by the government. Most of these plots are under private ownership. These are expected to be acquired by 2034.
Categories of EOS and ROS as per DP 2034 Tank/Pond/Lake, Promenade, Beach, Playground, Garden/park, Club/Gymkhana, Swimming Pool, Zoo, Municipal Sports Complex, Sports Complex/Stadium, Recreation Ground, Green Belt, Botanical Garden	

Figure 1. Different Categories of Public Open Spaces as stated in the Development Plan 2034 (Source: RDDP 2034)

As stated earlier, Mumbai offers only 1.24 square meters of public open space per capita, a total of 15.37 square kilometres of POS spread across the city's 25 wards. The distribution of these spaces is uneven, with certain wards, particularly in South Mumbai, providing having significantly more POS than the suburbs. Figure 4 shows this disparity, where population of each administrative ward (census 2011) is compared against the availability of open space per capita. Administrative Wards A, B, and D in the Island City offer over 4 square meters per capita, far above the city average. This disparity can be attributed to historical, socio-economic, and planning factors. During colonial times, South Mumbai was the centre of power, trade, and administration. Creation of vast open spaces originated from that time. Large government and institutional campuses, along with docks and naval areas, contributed to a higher number of open spaces and green cover in this part

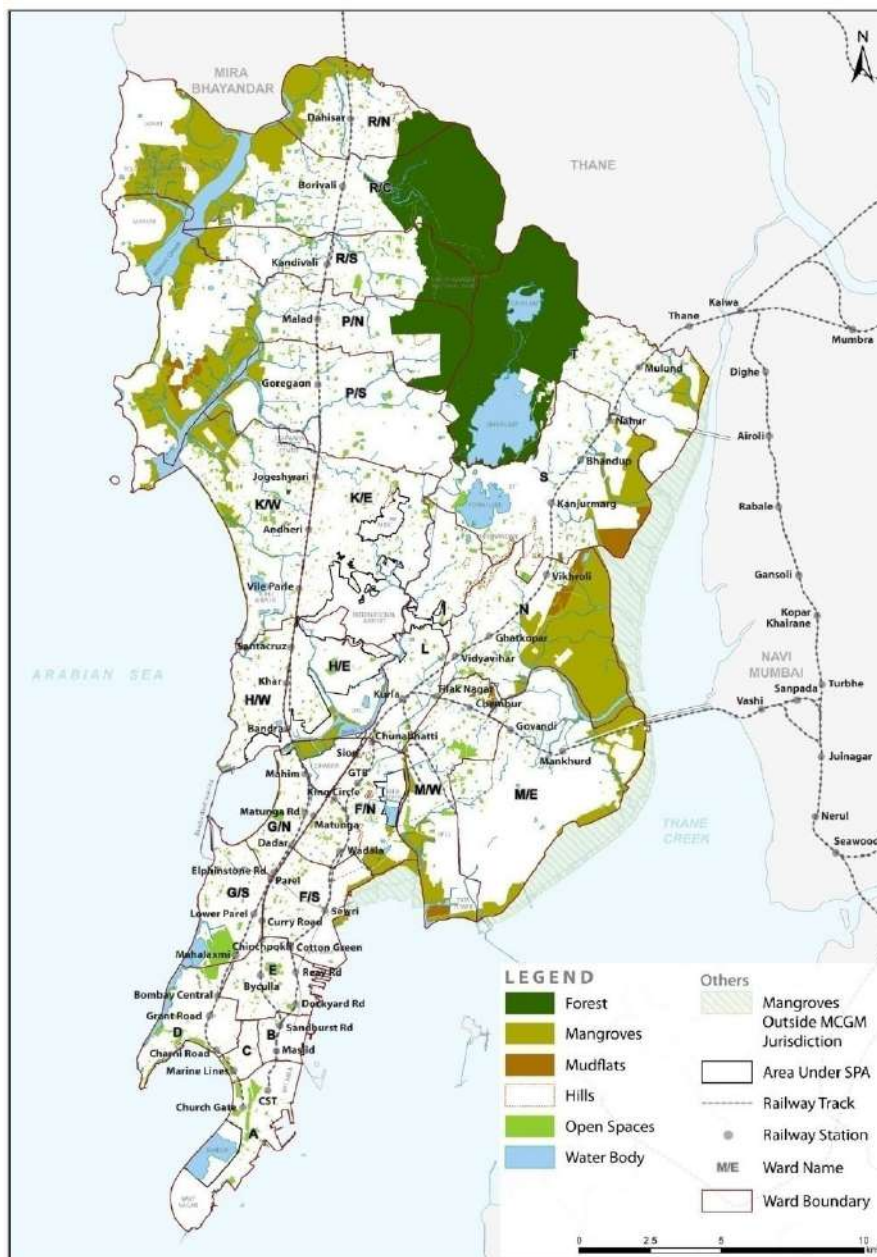


Figure 2. Existing natural areas and open spaces in Mumbai (Source: RDDP 2034)

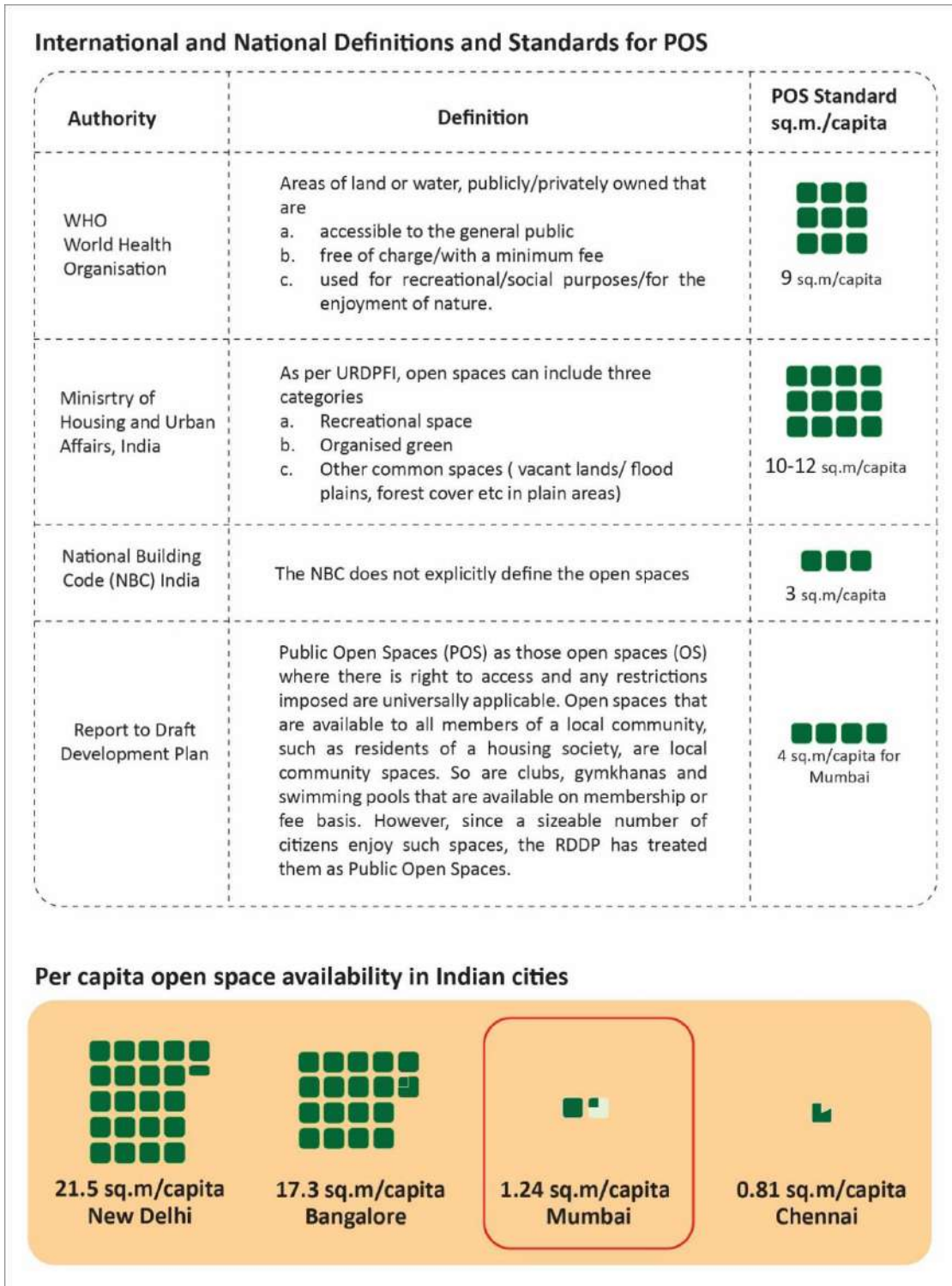


Figure 3. Standards for open spaces: Definitions and per capita availability (Source: Diagram by authors from (Udas-Mankikar, 2020), (MCGM, 2016))

of the city. While South Mumbai was planned with considerations for open spaces, the suburbs which expanded rapidly post-independence, often grew without comprehensive urban planning. The expansion was driven by the need to accommodate rapidly growing population, leading to dense, unplanned settlements, with little room and less priority for public open spaces. A stark difference between 'A' Ward and H/E Ward highlights this imbalance. While 'A' Ward offers 9.4 square meters per person with a low population density of fewer than 20,000 people per square kilometre, H/E Ward provides only 1.1 square meters per person, with a much higher population density of 60,000-80,000 people per square kilometre.

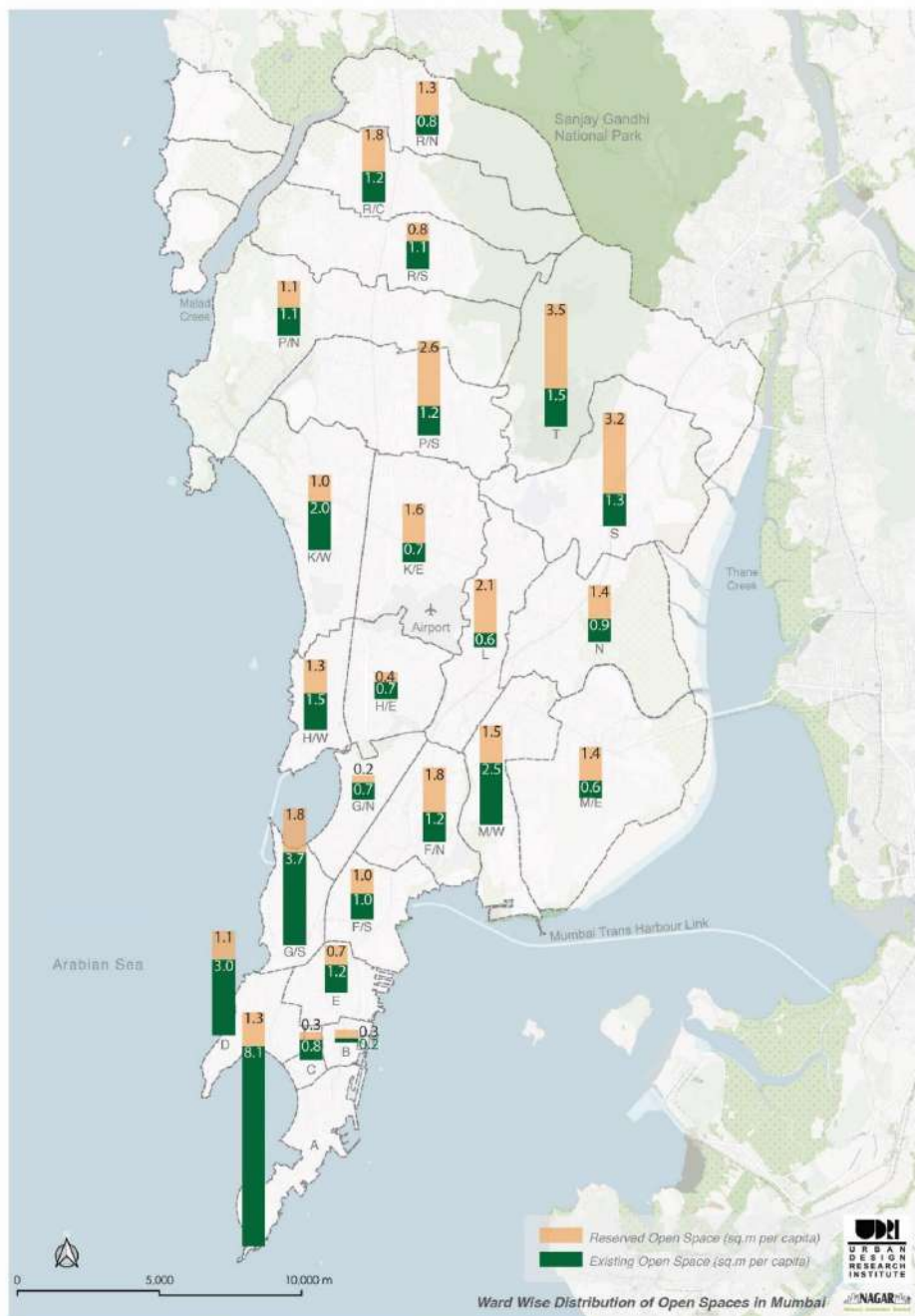


Figure 4. Ward-wise availability of open spaces (Existing Open Spaces and Reserved Open Spaces) per capita (Source: Diagram by authors created from the RDDP 2034 document data)

2. Background of POS mapping in Mumbai

When discussing the issue of POS, it is important to note the declining green areas in the city. The total green cover in Mumbai has significantly reduced from 46.42% in 1988 to 26.67% in 2018, and the areas of Land Surface Temperature (LST) higher than 30.50 °C have increased from 5232 ha in 1988 to 14,339 ha in 2018 (Rahaman et al., 2020, p. 8). The city's green and natural areas have been affected by rapid urbanisation, a high migration rate, inadequate housing, and a series of city infrastructure projects over the past decade. This scarcity of green areas makes open spaces even more crucial. Also, a lack of political will to acquire lands for Open Space amenity has had an adverse effect on the future of open spaces in the city (Adarkar, 2015, p. 9). Similar patterns of degrading conditions of open spaces are observed across many cities in India. Several studies and projects in other Indian cities primarily focused on environmental, planning, and social perspectives. For example, an assessment of POS in Nagpur city was done to evaluate qualitative aspects of POS (Ahirrao and Khan, 2021), Chennai's urban greens were studied to evaluate environmental impact (Sundaram, 2011), a study on evaluation of urban green spaces in Pune was carried out to understand changing patterns of land use (Padigala, 2012).

With respect to Mumbai, previous studies focused on objectives to enhance the quality of natural areas and open spaces and to facilitate participatory governance practices in the city (Figure 5). Projects done prior to 2019 evaluated open spaces that were designated in the 1991-2010 Development Plan. The project 'Breathing Spaces' by CitiSpace, provided an extensive fact file on 600 Reserved Open Spaces in Greater Mumbai (CitiSpace, 2012), while a comprehensive study on POS highlighting key issues and recommendations was conducted by the Mumbai Metropolitan Region – Environment Improvement Society (MMR-EIS) in collaboration with Neera Adarkar. Despite these evaluations, there has been no focus on how to update this information. Given that observations are time-specific, open spaces have experienced various changes, including modifications, due to new Development Plans. The latest Development of Mumbai, DP 2034, was released in 2018 and this was a major turning point as the formulation of DP put special emphasis on creating better guidelines for protection of public open spaces (MCGM, 2016, p. 96). What was changed in the latest DP was the integration of 'environmental areas' by changing the definition of public open spaces (Udas-Mankikar, 2020, p. 3). The Municipal Corporation of Greater Mumbai (MCGM) released the Development Plan 2034 in 2018, along with the Revised Draft of the Development Plan (RDDP) and the Development Control and Promotion Regulation (DCPR), which detailed the new policies². A GIS interface called 'DP Remarks 2034' was also made available online, marking all reservations and providing basic information about these designations³. Apart from the DCPR and RDDP documents, this portal is the sole open-access repository provided by MCGM. However, the information on this portal is limited and is not updated frequently. It is the MCGM's responsibility to ensure the safety and maintenance of these spaces. The best way to achieve this goal requires active collaboration of citizens, civil society, and the private stakeholders (UN-Habitat, 2018, p. 6). Building on previous studies, this paper investigates the state of open spaces as outlined in the latest Development Plan 2014-34 (DP 2034). The study utilised the relevant documents from the MCGM official website to assess the condition of both Existing

² <https://portal.mcg.gov.in/irj/portal/anonymous/qlcedpdocs>

³ <https://dpremarks.mcg.gov.in/dp2034/>

Open Spaces (EOS) and Reserved Open Spaces (ROS). This evaluation focuses on two administrative wards within Greater Mumbai: K-West and P-North. By integrating the latest data and designations from the Development Plan, the study provides a comprehensive understanding of the current status and utilisation of these open spaces.

3. Focus of the paper

The focus of the paper is on the role of digital tools in developing conscious citizen participation in dealing with public open spaces in the city. The research proposes a specific methodology to develop a digital repository of Public Open spaces. To demonstrate this process, the study collates data through surveys of a total of 634 Public Open Spaces (EOS + ROS) open spaces in K-West and P-North Wards. The database created from the survey findings focuses on governance, accessibility, safety and design parameters that affect the quality of open spaces.

The pilot wards, K-West and P-North are situated in the western suburbs of the city (Figure 2). These wards were selected for their diverse range of open spaces in terms of their natural and functional characteristics. Over the years, both the wards have experienced significant growth in residential developments. K-West Ward is home to a long coastal stretch, extending from Juhu Koliwada to Versova, covering a distance of eight kilometres. This expansive beach area is a major recreational asset for the city's





Open Space Mapping Projects Conducted in Mumbai		
	2010 Breathing Spaces	<i>A fact file on state of 600 open spaces. Highlighted issues of encroachment, management and access</i>
	<i>by CitiSpace</i>	
	2011 Open Mumbai Re-envisioning the city and its open spaces	<i>Consisted of Detailed Mapping of open space and comprehensive plans for their improvement.</i>
	<i>by PK Das & Associates</i>	
	2012 Inventorisation of Open Spaces and Water Bodies in Greater Mumbai	<i>Identified issues with open spaces and water bodies in Mumbai through detailed on-ground surveys, mapping and data analysis.</i>
	<i>by Neera Adarkar Associates + MMREIS</i>	
	2021 The HARITA Project	<i>Mapping gardens and recreational grounds in wards of Mumbai to create awareness and youth engagement</i>
	<i>by Project Mumbai and Ministry of Mumbai's Magic</i>	

Figure 5. Key Projects on open spaces in Mumbai (Source: projects websites)

residents. On the other hand, P-North Ward is distinguished by its large natural areas. It encompasses significant ecological features, including mangroves and natural parks located at both the eastern and western ends of the ward.

In the study, a total of 634 open spaces were surveyed, with 347 Public Open Spaces (POS) from K-West Ward and 289 POS from P-North Ward. The survey encompassed both Existing Open Spaces (EOS) and Reserved Open Spaces (ROS). The primary aim of this documentation was to assess the conditions and availability of these open spaces within the wards, offering valuable insights into their current status and their role in serving the local communities.

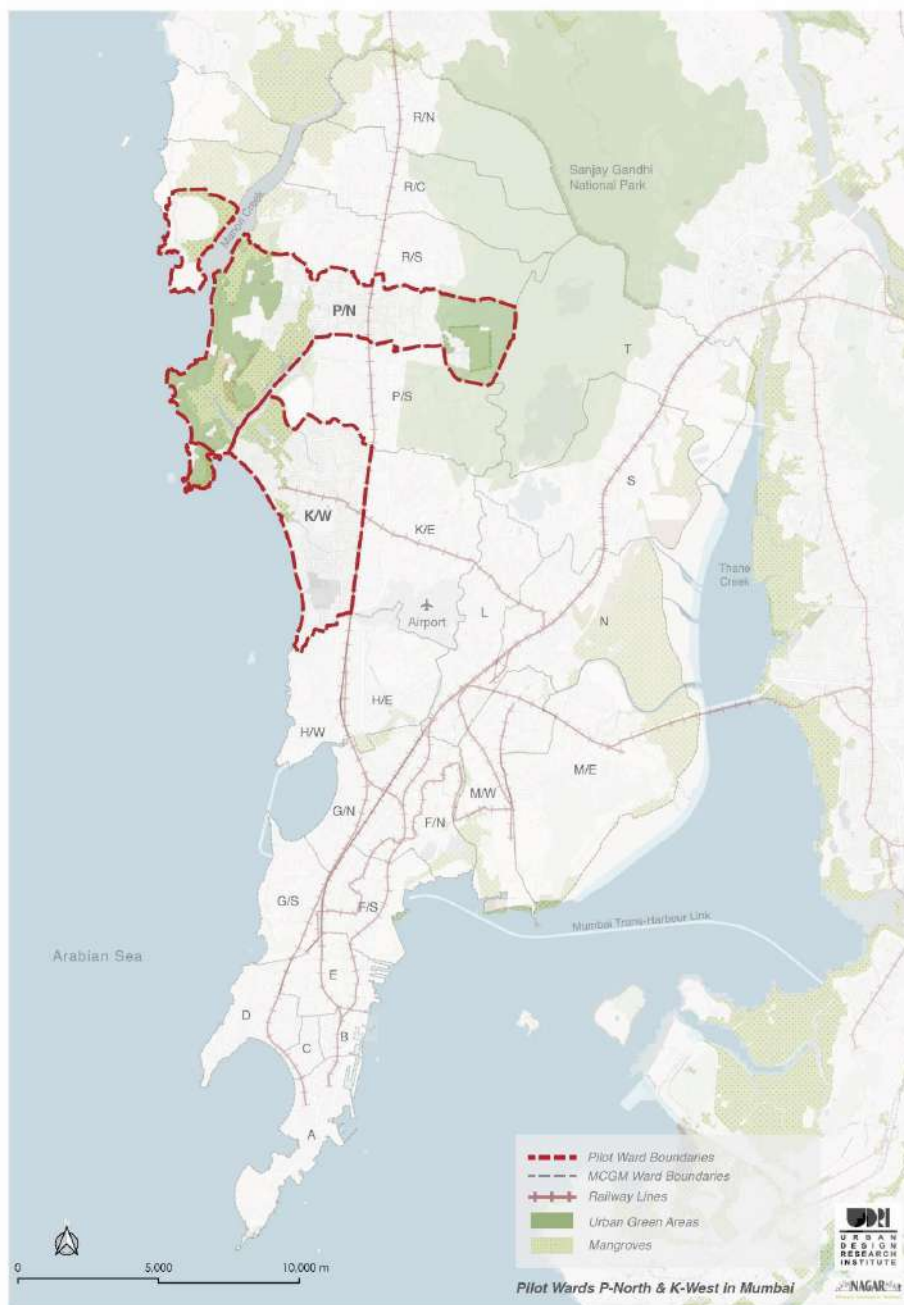


Figure 6. Pilot Wards K-West (K/W) and P-North (P/N) taken as the pilot wards for the research (Source: Diagram by authors created from the data of 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)

For this assessment, various digital tools were used, ensuring a streamlined and efficient methodology. This approach not only aids in understanding the current state of public open spaces but also establishes a replicable framework that can be applied city-wide for evaluating public open space conditions. The assessment is done at two levels. First, we analyse the existing conditions concerning access and issues discrepancies between actual conditions and what is shown on the Development Plans of the city. Secondly, we have analysed design-related parameters that affect the quality and overall user experience.

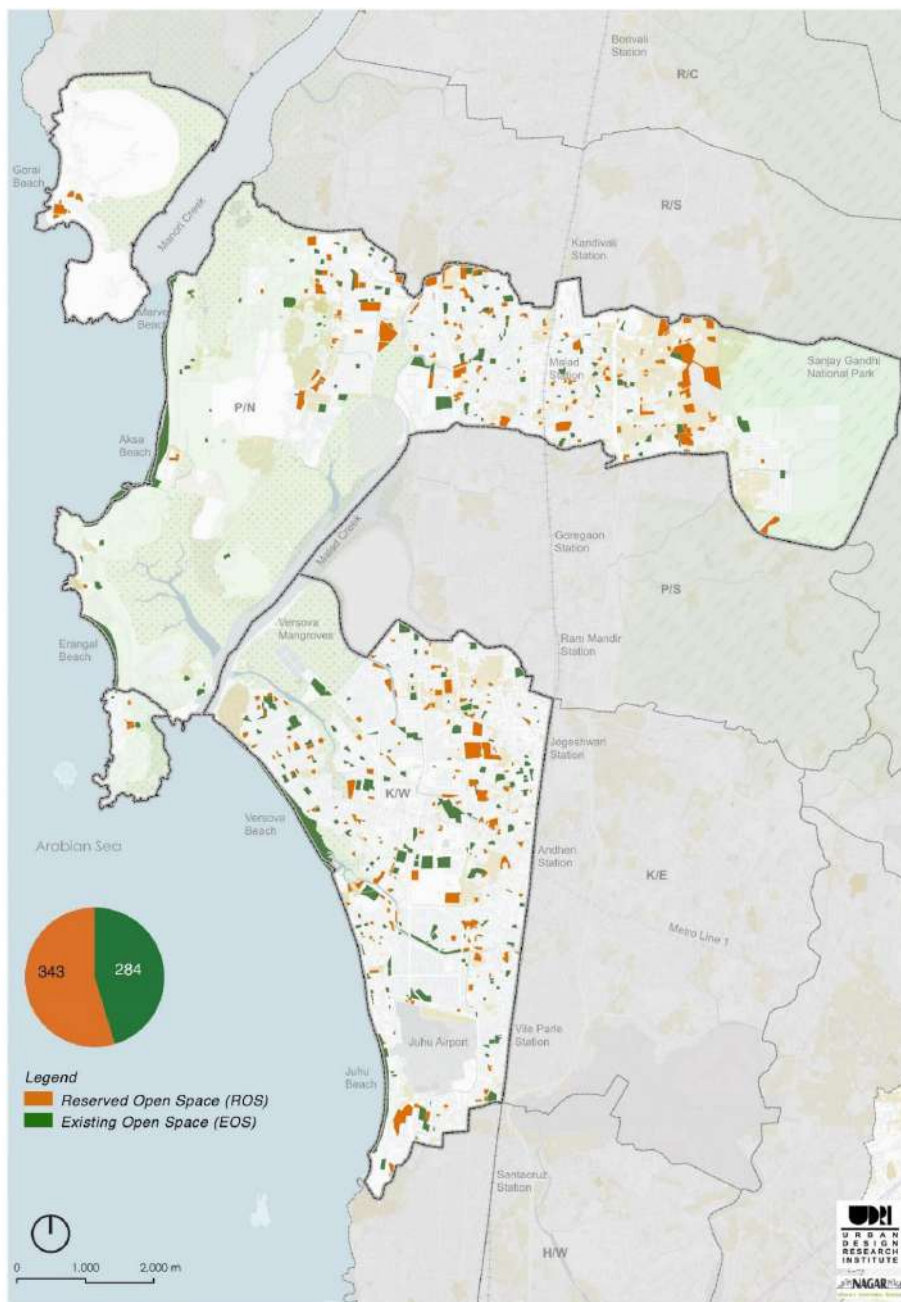


Figure 7. A total of 634 Existing Open Spaces (EOS) and Reserved Open Spaces (ROS) in K-West P-North Wards (Source: Diagram by authors created from the data of 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)

4. Mapping and documentation of POS

For the documentation of public open spaces, open-source software like QGIS, Google Forms, Google My Maps, and Google Spreadsheets were used to capture and manage data. Google Forms was used to collect structured observations and survey responses, addressing quantitative parameters. Google My Maps is used to spatially represent the surveyed open spaces, making it easier to visualise and analyse their condition. Google Spreadsheets are then used to organise and analyse the collected data in QGIS. The choice of these tools is driven by their efficiency and accessibility, ensuring that the documentation process is streamlined and that a wide range of participants can engage in and contribute to the enhancement of POS. A survey team comprising students was trained to conduct the survey of each site using these tools. With the use of individual site maps, DP Plan and digital proforma, site surveys of 634 sites were conducted. With the help of photographs, videos and sketches, the actual conditions of the POS were documented on Google My Maps (Figure 7).

Post the mapping and documentation stage, the spatial analysis involved consolidating the survey data into GIS to uncover different analysis patterns. In addition to the primary data layers generated by the mapping project, some extra layers of urban spatial data were incorporated and overlaid to facilitate a comprehensive analysis. Through this process, overarching concerns and specific gaps were identified. The collected data was analysed through statistical findings, spatial analysis through maps and graphs, and the creation of a scoring matrix for rating and analysis.



Figure 8. Stages of documenting site conditions, from the study of DP to creating Google My Maps (Source: Diagram by authors created from the survey data of 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)



Figure 9. Digitisation of Survey data by first creating the layout in Google My Maps and then transferring the layers into the GIS database (Source: Diagram by authors created from the data of 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)

5. Research Findings

After consolidating the survey data of the open spaces in pilot wards into various GIS layers, we identified the key issues like discrepancies between the details shown in the development plan (DP) and the actual condition, access problems, various restrictions, and missing design elements limiting usability. These findings highlighted a substantial disparity between the Development Plan's portrayal of public open spaces and their actual conditions.

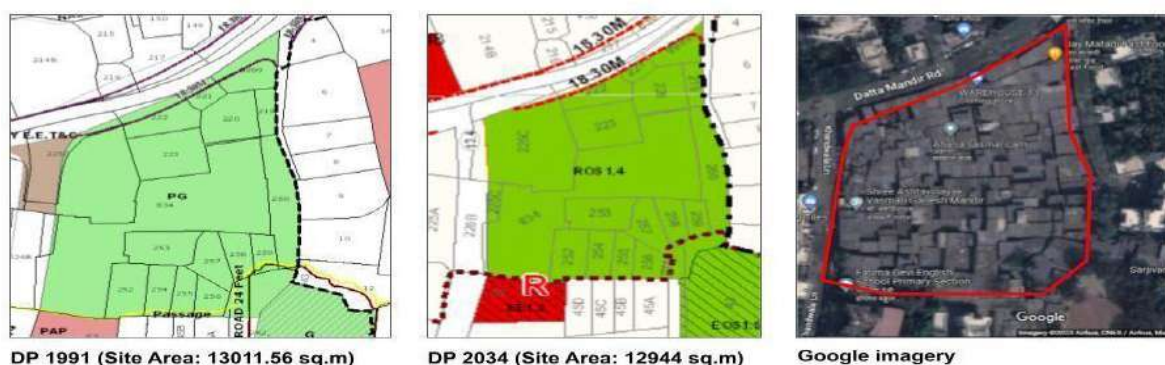
6. Issues with the Reserved Open Spaces (ROS)

6.1 Reserved Open Spaces occupied by Informal settlements and slums

Out of 634 public open spaces in the pilot wards, 343 sites are Reserved Open Spaces (ROS) - more than 50% of total reservations under POS (Figure 7). The City's current Development Plan (DP 2034) aims to secure all these reserved areas by 2034. This process involves acquiring land from private owners when these plots are earmarked for public use. However, a review of the 1991 and 2034 Development Plans shows that many plots designated as Reserved Open Spaces (ROS) since 1991 remain occupied by slums, with no progress towards their acquisition or development (Figure 9). In the pilot wards, 100 out of 343 ROS are now occupied by informal settlements or slums, with 89 designated as ROS since 1991 without any changes or development (Figure 11). The continued designation of these slum-occupied plots as ROS, particularly those unchanged since 1991, highlights a major inconsistency in DP implementation and necessitates revision. The plots occupied by slums are already high-density areas that also lack open spaces. As POSs promote various kinds of activities and functions, in such contexts, these spaces can become a symbolic element of civic engagement and citizenship (UN-Habitat, 2016, p. 32).

7. Issues with the Existing Open Spaces (EOS)

284 sites out of 634 sites in the surveyed pilot wards are Existing Open Spaces (EOS)



P/N Ward: Plot with informal settlements designated as Playground (ROS 1.4) since 1991

Figure 10. An informal Settlement designated as ROS 1.4 (Playground) since 1991 (Source: Authors)

(Figure 7). These open spaces are intended to be government-owned and developed, as defined in the development plan. Yet, many issues were observed hindering access, usability and overall experience of the open spaces.

7.1 Discrepancies in Designated vs. Existing Usage and Areas

The DP 2034 outlines open spaces on two levels: first, by designating plots for open space land use and second, by specifying the intended functions for these spaces. Errors in defining or assigning the use of Existing Open Spaces (EOS) can lead to imbalances in providing the necessary amenities as planned. Currently, 63 sites have been found where

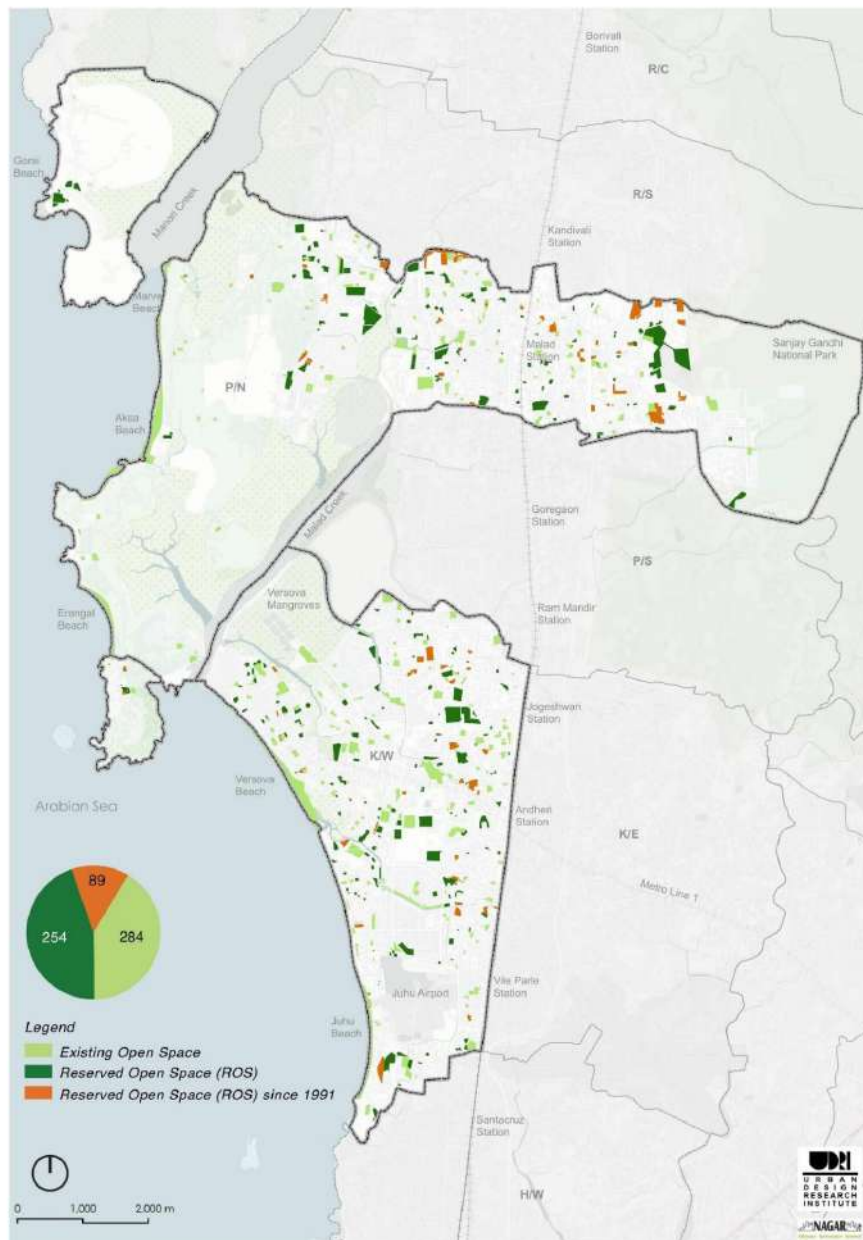


Figure 11. ROS occupied by slums since 1991 (Source: Diagram by authors created from the data of 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)

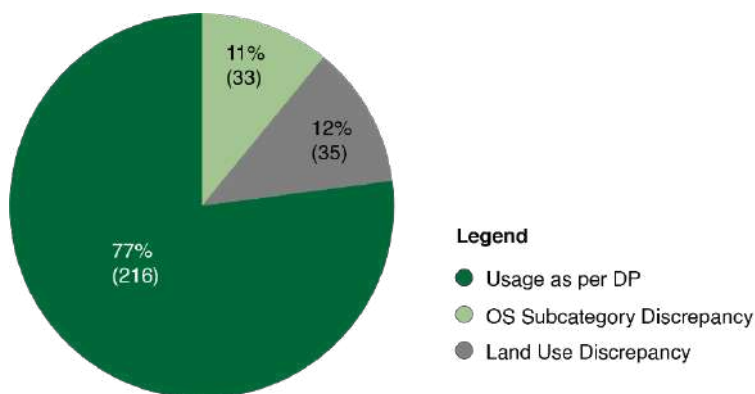


Figure 12. Number of Existing Open Spaces with usage discrepancies
 (Source: Diagram by authors created from the survey data of ‘Public Open Space Mapping in Mumbai’ project undertaken by UDRI and NAGAR NGO)

the actual usage deviates from the designated uses in the development plan. In addition to usage discrepancies, we also identified issues with the area calculations of open spaces. By comparing the site areas measured during surveys with those delineated in the development plan, we discovered inconsistencies. We found discrepancies in both the total area and boundary delineation. Sites with significant differences - exceeding 300 square meters - have been flagged for further attention. The survey revealed that 45 sites in the pilot wards exhibit errors in area delineation (Figure 13). It was observed that the loss of open space area is primarily due to residential encroachment. The table below illustrates the area loss experienced by the pilot wards due to discrepancies in delineating open space boundaries. In total, 13% of the existing open space—equivalent to 56,752 square meters or 5.67 hectares—has been lost due to these delineation errors in the two pilot wards.

Wards	No. of Sites	Area Loss
K-West	25	20857 sq.m
P-North	20	35895 sq.m
Total	45	56752 sq.m – 13 %

Figure 13. Loss in total area of existing open spaces due to discrepancies in area calculation (source: survey data of ‘Public Open Space Mapping in Mumbai’ project undertaken by UDRI and NAGAR NGO)

8. Access and restrictions

The survey also highlighted issues related to access to the existing open spaces (EOS). In general, accessibility can be measured based on the walking distance via the road networks, the management and maintenance of POS, amount of money charged for entering the space, the time which the open space is open for, and the infrastructure available to access the open space including those for the persons with disabilities (City-

Wide Public Space Assessment Toolkit, 2020). Due to the limitations of the conducted survey, we classified the open spaces into three categories based on the nature of access with the following parameters:

Accessible Sites	Sites that can be accessed via a usable DP-designated road and allow unrestricted use for all ⁴ .
Partially Accessible Sites	Sites that have filters in place before granting entry are identified as partially accessible. The filters could be <ol style="list-style-type: none"> 1. An entry fee – For Parks and recreation grounds 2. Membership and fee payment – for Clubs and Gymkhanas 3. Layout RG's - admitting only people living within the layouts 4. School Playgrounds – accessible to school students and at limited hours.
Inaccessible Sites	Inaccessible sites are those which cannot be accessed or used by people. These include natural spaces, reclaimed lands, privately owned plots, encroached and occupied sites, sites without road access, or if they are not developed and in poor condition.

102/284 EOS in the pilot wards are inaccessible as these sites are either occupied by slums or are used for other purposes such as commercial shops, vendors, hawkers, garbage dumping, and religious activities (Figure 15). Some EOSs also remain undeveloped, despite being vacant. Seventeen such EOS sites are inaccessible for various reasons, including being locked, abandoned, used for dumping garbage or construction materials,

⁴We emphasise the importance of DP Designated roads as these roads are officially designated in the development plan, they are protected from being privatised or repurposed for individual use. DP-designated roads serve as key pathways that facilitate entry for everyone to open spaces.



Figure 14. Dattaram Narayan Kasker Udyan in the K-West ward has 2500sq.m out of the DP demarcated park area being used as an MCGM-operated water treatment plant (source: Diagram by authors from the survey data of ‘Public Open Space Mappin in Mumbai’ project undertaken by UDRI and NAGAR NGO.)

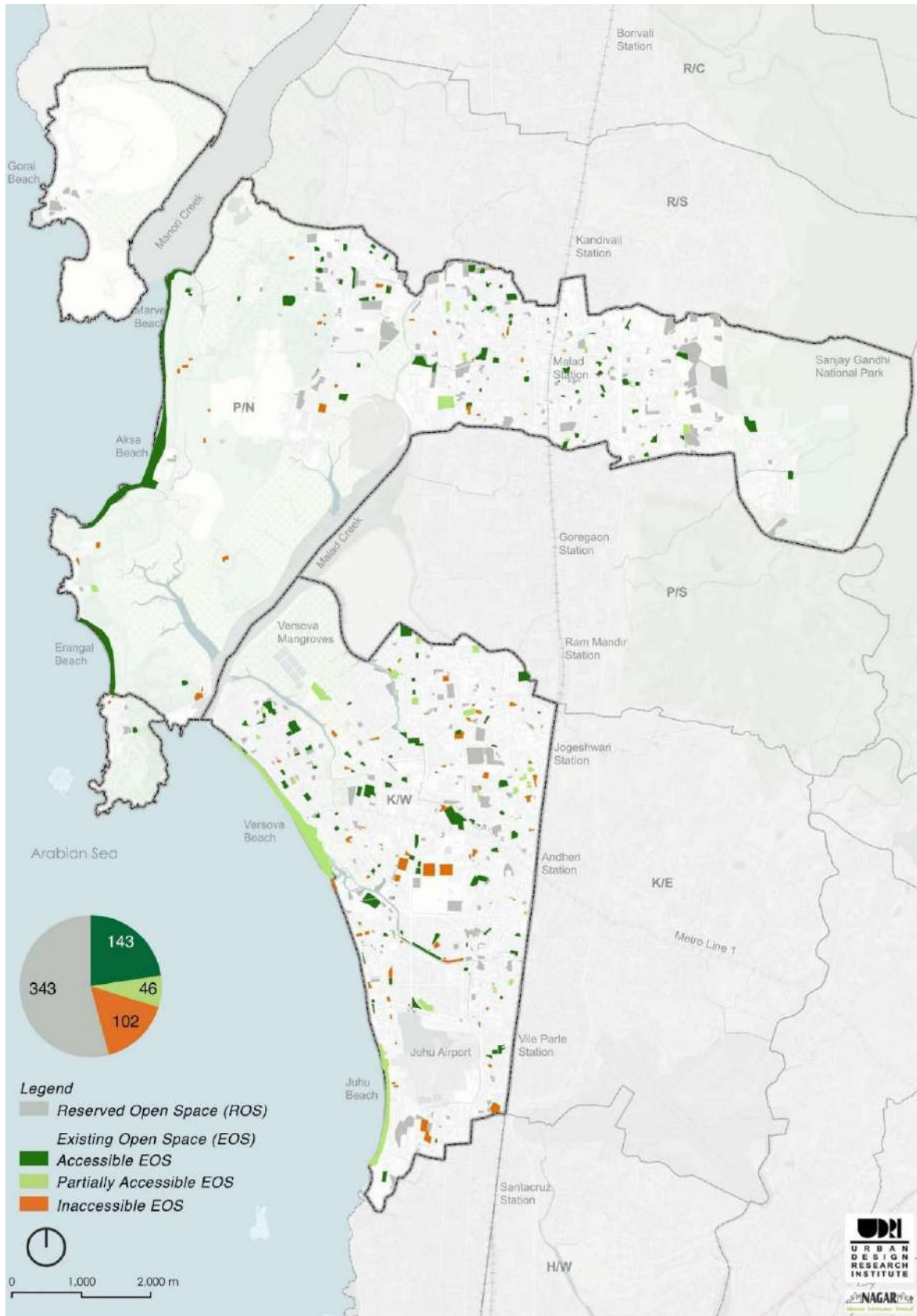


Figure 15. Accessible, Partially Accessible and Inaccessible EOS in pilot wards
 (Source: Diagram by authors created from the data of 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)

overgrown with vegetation, or utilised as parking spaces. Such conditions render these sites unsuitable for any recreational open space use.

Existing open spaces in the pilot wards are under MCGM, State Government, Central Government, or private ownership (Figure 17). In the K-West ward the number of public open spaces under private ownership were higher than those owned by the MCGM, while in the P-North Ward, public open spaces under MCGM ownership were higher than those under the private ownership. We also see that the ownership of the POS is directly linked to its access (Figure 17). The majority of open spaces owned by MCGM and other government authorities are generally more accessible to the public in comparison to privately owned sites. Although some privately-owned open spaces are well-developed and maintained, they often have restricted access, limiting usage to a select group of individuals. Most of privately-owned open spaces are under private residential societies, clubs, playgrounds and sports facilities with access limited to members. Clubs with private ownership are observed to be imposing timing and monetary restrictions. The access to such spaces is limited to clubs/gymkhana/sports facility members. While entry fees should

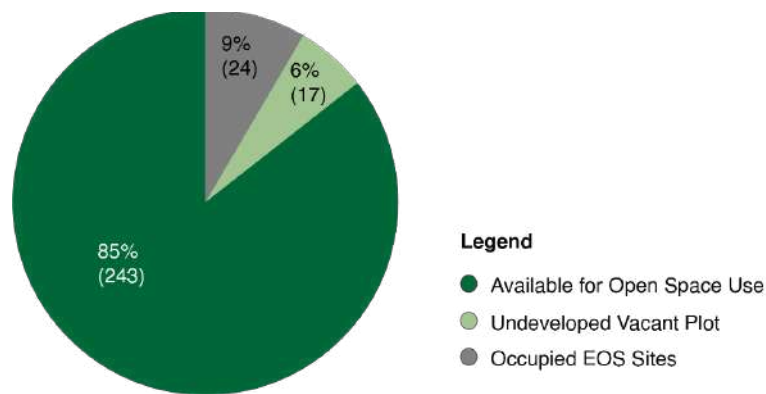


Figure 16 Physical conditions of EOS affecting access (Source: Diagram by authors created from the data of 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)

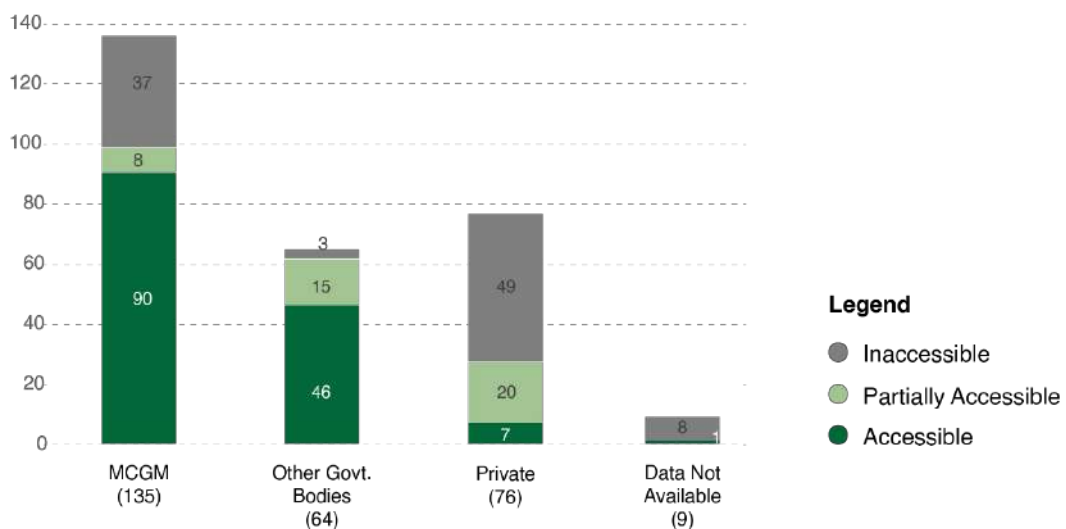


Figure 17. Ownership of EOS affects the access to the open spaces (Source: Diagram by authors created from the data of the 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)

be avoided to ensure easy access, minimal fees are charged for providing specialised facilities in open spaces. Few gardens and parks under MCGM ownership are observed to have minimum entrance fees. Playgrounds and open spaces with sports facilities charge fees to access the amenities. The highest charges are observed in the open spaces where there are privately owned clubs/gymkhanas present.

Safe and comfortable access to open space is ensured when the authority regulating open spaces also manages access roads into it. For public open spaces in Mumbai, it is important that MCGM provides a DP road as these roads offer equitable access to everyone.

Moreover, any type of encroachment on DP-designated roads is strictly prohibited.

This ensures long term upkeep and monitoring. The survey observed that there are many sites where a DP road is proposed; such sites were being accessed through private roads, leading to inaccessibility of POS.

For the evaluation of design aspects concerning health, safety and comfort, 143 Existing Open Spaces (EOS), that are both developed and accessible to all, are analysed.

9. Design aspects for health, safety and comfort

The rudimentary characteristics of public open spaces include a safe, clean and welcoming environment that promotes social and physical activities, is well-maintained and engages the community (Anon., n.d.). Based on these primary characteristics of any open space, the study has identified four essential dimensions to evaluate the 143 accessible EOSs. An open space must cater to these following four functions through Elements of Design.

1. Safety and Security

Open space users range from toddlers and children to elderly and women. For the vulnerable and their caregivers, the sense of safety and security in the open space becomes the foremost deciding factor on choosing to access it. In this study the dimension of providing 'safety and security' within an open space is thus considered the most important with 40% weightage on the scoring index.

2. Comfort and Usability

The ease of using and sense of comfort experienced in an open space decides if the user will visit that space again. An open space should have basic amenities that make the use of it convenient and comfortable. Thus, on the scoring index usability and comfort has the second priority with a 25% weightage on the scoring index.

3. Sustainability and Resilience

Parameters of sustainability and resilience include greening efforts, tree cover and vegetation and natural features. These indicators not only impact immediate perception of the space but also have a larger impact on resilience in the neighbourhood. The quality of these parameters has a positive impact on the mental perception of such spaces, nudging people to engage with these spaces and protect them.

4. Health and Hygiene

The final dimension for scoring a public open space is health and hygiene. The level of cleanliness of the area and its amenities like toilet blocks dictate the amount of time one spends in the open space. Public open spaces with inefficient management of waste

Scoring the Dimensions	Breakup of Score	Indicator	Sub-Indicator
40% Safety & Security	10	Entrance Signage Board	Does the Open Space have a visible entrance signage?
			Are the ownership & management details specified?
	10	Boundary Wall	Is a physical boundary demarcation present?
			Does the boundary allow visual access?
	10	Lighting	Does the open space have lighting?
Is the available lighting optimal?			
6	Security Guard	Does the Open Space have security guards at all times?	
		Do the security personnel have dedicated security cabin?	
4	CCTV Surveillance	Does the Open Space have functional CCTV surveillance?	
25% Usability & Comfort	5	Seating and Benches	Is there sufficient seating in the open space?
	5	Daytime Shading Device	Are there measures taken to provide shaded areas?
	5	Sidewalks	Does the open space have unbroken sidewalks?
	5	Walking Track/ Pathway	Does the open space have continuous pathways?
			Is the pathway of non-skid material?
	2.5	Informational Signages	Does the open space have signages with clear instruction on operation of open space?
2.5	Blockage Free Sidewalk	Is the sidewalk free of blockages?	
20% Sustainable Design	8	Permeability	How much area of the ground is permeable?
	8	Vegetation Cover	How much area has vegetation cover?
	2	Rain Water Harvesting	Does the open space have rain water harvesting mechanisms?
	2	Solar Light	Does the open space use solar energy for lighting?
15% Health & Hygiene	6	Waste Disposal	Does the open space waste gets disposed regularly?
	6	Dustbins	Is the open space serviced by dustbins?
			Are the dustbins segregated?
	1.5	First Aid Kit	Is there a first aid kit available on-site?
1.5	Toilet Block	Is there a toilet block in close proximity to the open space?	
		Is it clean and well maintained?	

Figure 18. Analysis parameters (Source:Authors)

and instances of littering and unclean or unhygienic conditions discourage people from using that space.

The indicators for evaluation were identified based on the physical amenities observed on most of the accessible Existing Open Spaces in K-West and P-North wards during the survey⁵. They were categorised in the dimension in which they had the most impact. A scorecard for each EOS was created by rating them based on the survey observations.

⁵ There are many other parameters that enhances the quality of open spaces, Due to the limitation of the survey which does not capture perception-based data, the study only examines quantitative parameters for the purpose of this study.

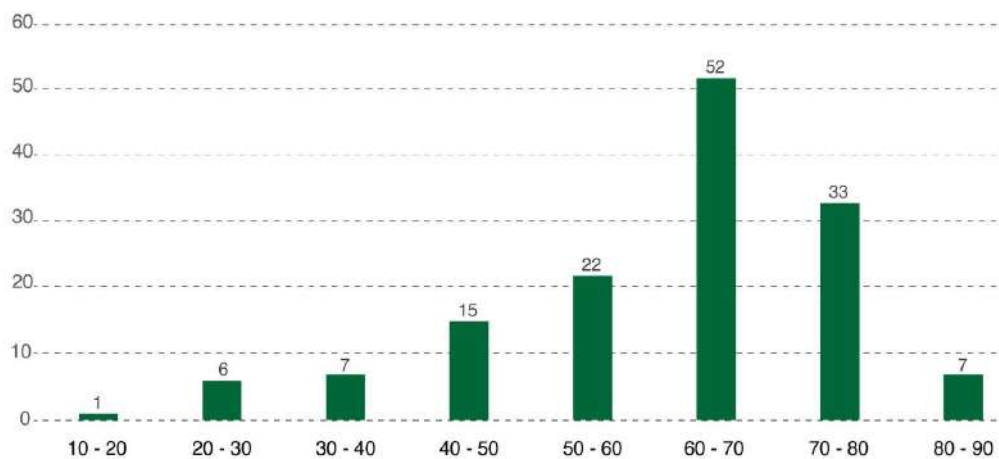


Figure 19. Range of Scores derived for EOS in the Pilot Wards, the lowest score of 18.6 and the highest score of 86.6 was calculated showing the range of (Source: Diagram by authors created from the data of 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)

These observations for the parameters were quantified/simplified into best, worst and base cases or were put either put into ranges for ease of scoring.

The four dimensions and their corresponding indicators are shown in the Figure 18 with the reasoning for the scoring. The accessible EOS sites are scored on a scale of 0-100 based on the weightage allotted to each parameter as seen in Figure 18.

10. Condition of Open Spaces

Scoring the EOSs based on the amenities available within the open spaces showed a vast disparity in their conditions. Of the 634 sites initially mapped as per the DP 2034, only 143 are accessible EOSs. However, despite being accessible, they are not up to the basic mark of providing safety, comfort, and hygiene.

51 sites out of 143 scored less than 60 points; this indicates they are performing poorly in the provision of basic amenities that render an open space safe and usable (Figure 16). 85 sites are performing in the mid-range with a score ranging 60 to 80. These sites are usable, however can improve to provide comfort and resilience.

Only seven sites are performing well when it comes to providing basic amenities. These 7 sites have scored above 80. For example, Kaifi Azmi and Kishor Kumar Park in K-West Ward were excellent examples performing well in scoring of usability and comfort parameters providing well designed seating area and shading devices. General signage and instruction boards with MCGM logos indicating ownership were also installed in these two sites (Figure 20). Similarly, Sheila Raheja Park in P-North ward provides well maintained amenities like children's play area, toilets, and attractive landscape elements (Figure 21).

However, none of the sites scored more than 90. This indicates that open spaces in pilot wards of Greater Mumbai are struggling to provide basic amenities that render an open space usable. Figure 22 and 23 highlight the sites with lowest scores with poor site conditions. These sites received scores less than 21 with very few parameters checked such as permeability and defined boundaries.



Figure 20. Kaifi Azmi and Kishor Kumar Park in K-West Ward with a score of 86.6 (source: photos by survey team for the project 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)



Figure 21. Sheila Raheja Park in P/N Ward with a score of 86.6 (source: photos by survey team for the project 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)



Figure 22. EOS in K-West Ward with a score of 20.5 (source: photos by survey team for the project 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)



Figure 23. EOS in P-North Ward with a score of 18.4 (source: photos by survey team for the project 'Public Open Space Mappin in Mumbai' project undertaken by UDRI and NAGAR NGO)

11. Discussion

The observation and analysis of the collated data of open spaces in K-West and P-North ward has highlighted the persisting issues with these public open spaces, in addition to the need for concurrent mapping using digital tools. The analysis of the data is a reminder that for land uses like open spaces, the data collation has to be done beyond just spatial parameters of area and extent. It should also reflect parameters such as ownership, access and a catalogue of amenities - missing and present.

Using simple digital analytical tools, factors affecting access and use of an open space were identified - like private ownership and management, vacant plots awaiting development, and encroachment. However, a thorough inspection of open spaces needs the data to be the most concurrent. The data available in the public domain through independent research carried out by think tanks and research groups are outdated and thus have become redundant. There is a need for a city-wide digital repository of open spaces as new age digital tools streamline the process of data management, updating, storage, and sharing and save time and effort.

Currently, MCGM has the most concurrent spatial data for city-wide open spaces, but it neither captures aspects of physical conditions nor available amenities nor is it available in the public domain. The unavailability of data makes it difficult for stakeholders to engage with public open space issues. Having publicly available digitised data can help think tanks and academic institutions to undertake the task of formulating novel solutions to deal with

urban open space issues and develop policies that can safeguard and promote them. Having the data in public domain also welcomes citizen efforts towards constant updating of such repositories by raising queries and concerns. A fine example of citizens raising their concern through digital platforms for open spaces in their cities is the 'Privately Owned Public Space in New York City' website⁶. The website provides important information about the open spaces, providing a crowd-sourcing vehicle to the public to post their observations, share photos and videos and suggest changes (Kayden & The Municipal Art Society of New York, 2012).

Mumbai, a city of civic action, has seen multiple legal battles, advocacy campaigns with respect to open spaces. The citizens not only exercise their right to question the authorities but also present their rights to open spaces. The efforts of restoring the Jawaharlal Nehru Garden led by the Nariman Point Churchgate Citizens Association (NPCCA) or the Save Rani Bagh Movement by the Save Rani Bagh Botanical Garden Foundation, or the constant effort of the OVAL Trust to maintain and protect the Oval Maidan and Cross Garden (UDRI, 2024) are testimony to the citizen's will and grit to engage and work with the government and actively participate in safeguarding the common goods- public open spaces.

Such civic action and movements find momentum when there is data transparency and availability. Having a publicly available database that gives all concurrent information allows people to actively participate and take up specific issues with their governing bodies and builds trust between them, where each contributes to the upkeep of open space. The transparency and ease of relaying their issues to the government make the vigilant citizens engage in natural surveillance or watchdogs safeguarding the public amenity of open spaces. The synergy thus created ensures long term maintenance and a strong partnership between the provider – the government, and the end user – the citizens.

References

- Adarkar, N. (2015) *Inventorisation of Open spaces & Water Bodies in Greater Mumbai, Mumbai*: MMREIS and Adarkar Associates.
- Ahirrao, P. & Khan, S. (2021). 'Assessing Public Open Spaces: A Case of City Nagpur, India', *Sustainable Urban and Rural Development*.
- Anon. (n.d.) American Planning Association. [Online] Available from: https://ddd.uab.cat/pub/disturbis/disturbis_a2011n10/disturbis_a2011n10a4/characteristics.htm [Accessed 10 July 2024].
- CitiSpace. (2012) *Breathing Space: A Fact-file of 600 Reserved Public Open Spaces in Greater Mumbai*. Mumbai: CitiSpace.
- Development, M. o. U. (2015) *Urban and Regional Development Plans Formulation and Implementation (URDPFI) Guidelines, s.l.: Government of India: Ministry of Urban Development*.
- Kayden, J. S. & The Municipal Art Society of New York (2012) *Privately Owned Public Spaces in New York City*. [Online] Available from: <https://apops.mas.org/> [Accessed 22 July 2024].
- Maharashtra, D. o. C. O. (2014) *Census of India 2011 Maharashtra, District Census Handbook Mumbai, Mumbai*: Government of India.
- MCGM. (2016) *Report on Draft Development Plan -2034*, Mumbai: MCGM.
- Padigala, B. (2012) 'Urbanization and changing green spaces in Indian cities (Case study - city of

⁶ <https://apops.mas.org/>

- Pune)', International Journal of Geology, Earth and Environmental Sciences, pp. 148 - 156.
- Rahaman, S. et al. (2020) 'Spatio-temporal changes of green spaces and their impact on urban environment of Mumbai, India', Environment, Development and Sustainability.
- Sundaram, M. (2011) 'Urban green-cover and the environmental performance of Chennai city', Environment Development and Sustainability, pp. 107-119.
- Udas-Mankikar, S. (2020) 'Formulating Open-Space Policies for India's Cities: The Case of Mumbai', Observer Research Foundation Occasional Paper.
- UDRI (2024) Mumbai Reader 22|23 [Online]. Available from: <https://www.udri.org/3d-flip-book/mr2223/> [Accessed 10 July 2024].
- UN-Habitat (2018) SDG Indicator 11.7.1 Training Module: Public Space, Nairobi: United Nations Human Settlement Programme (UN-Habitat).
- Yadav, V. & Bhagat, R. B. (2017) 'Changes in slum population and living conditions of slum dwellers in Mumbai', Mumbai Reader.

Pedalling Towards Improved Well-being. Impact of Non-Motorised Transport Infrastructure on the Quality of Life of the Youth in Delhi

Shreya Khurana

Independent researcher, India

ar.khuranashreya@gmail.com

Abstract

Rapid urbanisation and population growth in Delhi have led to a significant increase in the demand for transport infrastructure. However, a traditional adherence to car-centric development in Indian cities has contributed to escalating road injuries and degraded urban settings, exposing pedestrians and cyclists to a fatality risk of around 40 times higher than car users. To address these challenges, strategies like Non-Motorised Transport (NMT) are crucial in promoting sustainable mobility. Despite its proven effectiveness globally, the influence of NMT on the Quality of Life (QoL), especially on the youth (aged 15-29 years) in the Indian context remains unexplored. This paper investigates a recent integration of NMT infrastructure on one of Delhi's most accident-prone roads through space redistribution. The paper gathers infrastructure assessment factors and physical, social, mental and economic well-being indicators from existing literature and user perceptions on-site. Based on user perceptions, these are correlated, followed by a quantitative study of the influence of each factor on its corresponding indicator using positive responses before and after transformation. The study emphasises key factors that must be addressed while revamping public streets to enhance the health and well-being of young individuals. It suggests that layout quality and lighting significantly improve safety and comfort. Yet the design compromises safety due to a lack of city-level and neighbourhood continuity, and intersections with the high-speed road, resulting in a low rating for physical well-being. A composite well-being score is calculated to illustrate the extent of impact on QoL. Insights derived from the case of Delhi offer a practical framework for other Indian cities seeking to enhance their urban landscapes. The paper emphasises the perspectives of youth on quality well-being, shows how different design features act toward achieving a high QoL, and intends to nudge a shift toward pedestrian-friendly cities.

Keywords: well-being, quality of life, youth, non-motorised transport, Indian cities

To cite this article:

Khurana, S. (2024) "Pedalling Towards Improved Well-being: Impact of Non-motorised Transport Infrastructure on the Quality of Life of the Youth in Delhi", *The Journal of Public Space*, 9(2), pp. 55–78. doi: 10.32891/jps.v9i2.1748.

This article has been double blind peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

1. Background

In Delhi, the capital of the world's largest democracy, cyclists and pedestrians constitute an important sector of daily commuters. According to Census 2011, approximately one-third of daily commutes in Delhi happen on foot or by cycle, with 34% relying on walking (Kaur and Jain, 2020). Nearly 50% of metro users walk to or from stations, with walking being the predominant mode for 77% of urban poor commuters (Kaur and Jain, 2020). However, these pedestrians and cyclists face a fatality risk which is more than two times of motorcyclists and around 40 times higher than car users (Goel, 2023, p.1). Road accidents in Delhi increased by 17.8% between 2021 and 2022, with cyclists and pedestrians being the most affected (Crime in India, 2023, p.87; The Times of India, 2023).

As there is insufficient evidence regarding factors affecting cyclists' injury risk in Indian cities, user experiences help to cite the issues. Almost 40% of city roads lack footpaths or basic walking infrastructure (Kaur and Jain, 2020), and cyclists cite inadequate infrastructure as their primary concern (The Energy and Resources Institute, 2014, p. 93). A study by Goel (2023, p. 1) states that poor quality of roads, encroachments on footpaths, and overspeeding and honking vehicles add to cyclist vulnerability, which has led to a decline in the cycling modal share from 28% in 1954 to less than 5% in 2013 in Delhi. Ownership of cars and motorised two-wheelers has grown multiple times, affecting environmental pollution and the health of people at the same time.

Walking and cycling favour one's health; good health is the foundation of well-being and Quality of Life (QoL). Numbeo (2024) reports the QoL of Delhi as 102.34, which is comparatively lower than cities like Sydney (157), Berlin (163) and Prague (159). Unsafe mobility infrastructure, escalating traffic congestion, and accident risks are among many reasons behind Delhi's low QoL. While different contexts define QoL differently, all metrics, including the assessment tool of the Ease of Living Index (2020, p. 28) in India, rank QoL as an essential component of physical, social, and mental well-being. A safe environment and affordable transportation access promote an individual's well-being and improve QoL in Indian cities (Patil and Sharma, 2020, p.183).

Home to 1, 428.6 billion people, India has recently emerged as the world's most populous country (United Nations Population Fund, 2023). Notably, it is also one of the youngest countries globally, 27.3% of its population falls within the youth demographic (aged 15-29 years) (Ministry of Statistics and Programme Implementation, 2022, p.18). Youth play a significant role in shaping the future of a nation and a developing country, such as India, must avoid the consequences of losing its youth to dangers associated with inadequate cycle infrastructure. Therefore, it becomes essential to design urban environments that prioritise the safety and well-being of its young citizens.

2. Need of the study

India is undergoing rapid urbanisation, with a 30% decadal growth in urban areas from 2000 to 2010. This is projected to increase to 40% from 2010 to 2030 (Panda et al., 2016, p. 435), further exerting pressure on infrastructure, such as public transport, road networks, socio-economic prospects, and healthcare facilities. For a long time, India has focused on car-centric cities, with its signal-free roads and expressways over pedestrian and cyclist safety. However, this focus is beginning to shift to sustainable planning and design approaches to develop cities. One such example of enhancing the urban landscape is the recent restructuring of the busiest road in Delhi to integrate it with NMT. Pinter-Wollman, Jelić

and Wells (2018, p.1) state that modifying the built environment can impact the health and well-being of the urban population in the long run. Given the limited existing literature on the relevance of this statement in the Indian context, this study aims to assess the influence of safe cycling infrastructure on the well-being of youth, using indicators of Quality of Life (QoL) as an assessment measure.

The research sheds light on the intricacies of the interplay between demographics, urban planning, and innovative design. The analysis aims to redirect attention from vehicle-centred to pedestrian-centred cities in India. The findings are expected to guide designers in prioritising key factors for enhancing the QoL of young people while redesigning streets.

3. Methodology

As visualised in Figure 1, the study employs a systematic literature review to explore relevant international and national studies on ‘public spaces’, ‘social sustainability’, and ‘quality of life’. This helps to understand concepts such as ‘streets as public spaces’, ‘NMT as social infrastructure’ and ‘quality of life in Indian cities’ and identify knowledge gaps and challenges. Assessment factors for quality infrastructure and indicators of QoL, derived from the review, lay the foundation for the study.

These factors and indicators are compared with the Ease of Living Index (2021, p.29). The Index captures the QoL in Indian cities through indicators such as transportation and mobility, water supply management, and solid waste management, to name a few. While the Index assesses cities based on the availability of NMT infrastructure, it lacks a thorough evaluation of streets as public spaces, NMT as social infrastructure, and its quality as perceived by users. Thus, the findings from the literature review are combined with the QoL indicators from the Ease of Living Index to evaluate the quality of NMT infrastructure.

Connections between various assessment factors for NMT and QoL indicators and their impact on youth’s well-being are established through primary research grounded in on-site interactions with 96 users, structured and semi-structured interviews, and observations with ethical considerations. The stakeholders include youth aged 15 to 29, encompassing vendors, daily public transport commuters, school children, temple visitors, recreational users (for eating, observing and sitting), and residents from neighbouring areas.

Throughout the research, unforeseen delays in data collection arose due to cold weather in December and January, followed by contrasting hot days, during which the street remained deserted. Additionally, translating the urban terminologies into a local language for better user articulation was challenging.

4. Literature review

This section deconstructs the research topic into three divisions- ‘streets as public spaces’, ‘NMT as social infrastructure, and ‘QoL indicators in urban India’. Each division reviews existing literature to understand concepts and translates them to the Indian context. It ends with assessment factors and indicators extracted from the literature review for the study. These are summarised in Figure 2.

4.1. Streets as public spaces

The Charter of Public Space (2015) defines ‘public spaces’ as areas accessible and

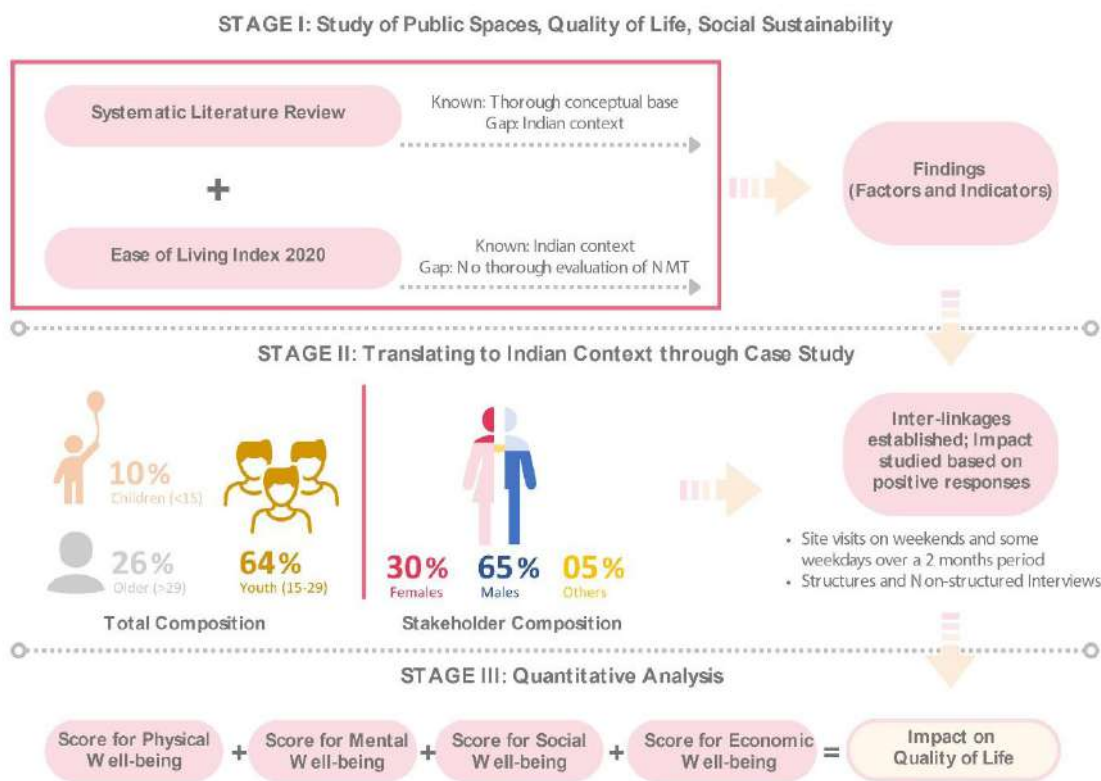


Figure 1. Study Methodology and Stakeholder Compositions Found during Field Visits. (Author, 2024)

enjoyable for all, including streets and open spaces, publicly owned or of public use. In the Indian context, the Ministry of Housing and Urban Affairs classifies public spaces into green parks, playgrounds, and forests (Mehta and Dhindaw, 2020). However, streets, often overlooked in public discourse, emerge as the most public among all spaces (Deore and Lathia, 2019, p. 138). In India, they act as dynamic spaces that serve as hubs for social interactions, economic transactions, and cultural expression within its diverse community. The United Nations (2023, p. 35) states that to achieve Sustainable Development Goal 11, i.e. Sustainable Cities and Communities, it is important to prioritise public spaces that enhance inclusion, social cohesion, and the productivity of cities (Target 11.7). Figure 2 summarises assessment factors for quality public streets, including design parameters like land use, layout quality, public space integration, pedestrian safety, privacy, built densities, connectivity, and proximity to public transport (Ahmed, 2012, pp. 44-46), accessibility, permeability, legibility, aesthetics (Karuppappan and Sivam, 2011, p. 857). Factors like citizen engagement, adaptability, street amenities, integration of the informal economy, heritage, and local culture (Ghahramanpouri et al., 2015, p. 368) are also vital.

4.2. Non-Motorised Transport (NMT) as social infrastructure

The Brundtland Report (1987) acknowledges economic, social, and environmental sustainability as fundamental pillars. Surbeck and Hilger (2014, p. 2078) state that 'social sustainability' encompasses social, societal, and human engagement, impact, and vulnerabilities in a project. Dave (2011, p. 189) underscores the relationship between social sustainability and the built environment in developing countries. A part of that built environment is NMT infrastructure, a pivotal planning concept involving engine-free

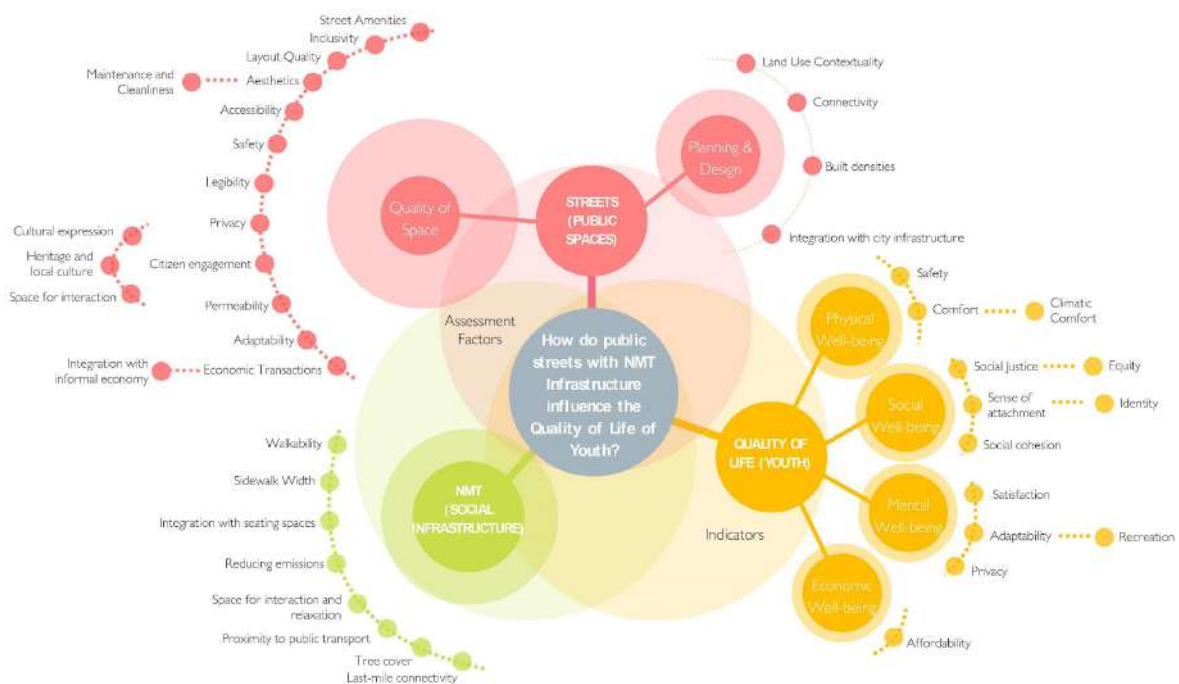


Figure 2. Assessment Factors for NMT and Indicators for Quality of Life in Cities extracted from literature review. (Author, 2024)

modes such as cycling and walking. Barton, Grant and Guise (1995, 2003) state that NMT enhances health, reduces emissions, and ensures last-mile connectivity when integrated with other transportation modes.

When public streets act as physical activity zones and spaces for social interactions, recreation, and relaxation, they contribute to individuals' physical and social well-being as social infrastructure. Despite often being neglected in urban planning, the paramount significance of NMT as social infrastructure is evident in Indian society.

Mehta (2009, p. 41) underscores the assessment factors of quality NMT as social infrastructure, emphasising walking (reduced car emissions) and specific street elements such as seating (fixed/removable/proximity to local businesses), sidewalk width, tree cover (for enhanced micro-climate), and community gathering spaces that make spaces vibrant. These factors are summarised in Figure 2.

4.3. Urban Quality of Life (QoL) and well-being of youth in urban India

Ease of Living Index (2021, p. 28) (EoLI) evaluates the 'well-being' of Indian citizens across parameters including 'QoL'. While the text uses the two terms interchangeably in some places, it considers QoL as a component of well-being. Internationally, Weingaertner and Moberg (2011, p. 122-133) define QoL as citizens' social, environmental and economic well-being. It considers well-being as a component of QoL. Since EoLI is comparatively recent and is being revised, this paper adopts the international line of thought by studying the influence of mobility on QoL as a cumulative impact on the well-being of the youth. Urban areas either promote social exclusion or encourage social sustainability and inclusion through safe public spaces (Karuppannam and Sivam, 2011, p. 849). Thus, they

should be planned to enhance physical well-being and contribute to social engagement, cultural expression, and a sense of belonging among the youth. As summarised in Figure 2, the indicators for QoL encompass aspects like safety, comfort, recreation (Ease of Living Index, 2021, p. 29), happiness and satisfaction, social justice (equity), affordability, leisure, cleanliness, economic security, choices, and social relationships.

4.4. Scope of the study

AoU (2020) highlights that settlement planning influences lifestyle patterns, which can lead to health issues. When streets fail to welcome cyclists and pedestrians through safe infrastructure, they leave them vulnerable to injuries and deaths, making them lose their interest in a sustainable transportation mode, as highlighted in Section 1. Promoting a healthy lifestyle among the youth involves providing access to inclusive streets, reducing vehicular emissions, and incorporating high-quality transport design. This discussion pivots back to the crucial role of NMT infrastructure in public spaces in governing individuals' quality of life.

5. Case study

The Public Works Department of the Government of Delhi has advocated for NMT lanes along 16 short road stretches on the busiest roads in Delhi (Mani, 2022). Among these is the Inner Ring Road, a pivotal 55 km arterial route which is almost signal-free and designed for high-speed traffic. It is also the most crash-prone road in Delhi with the most fatalities in 2022 (Bhat, 2023) because of the long-standing lack of pedestrian-friendly infrastructure.

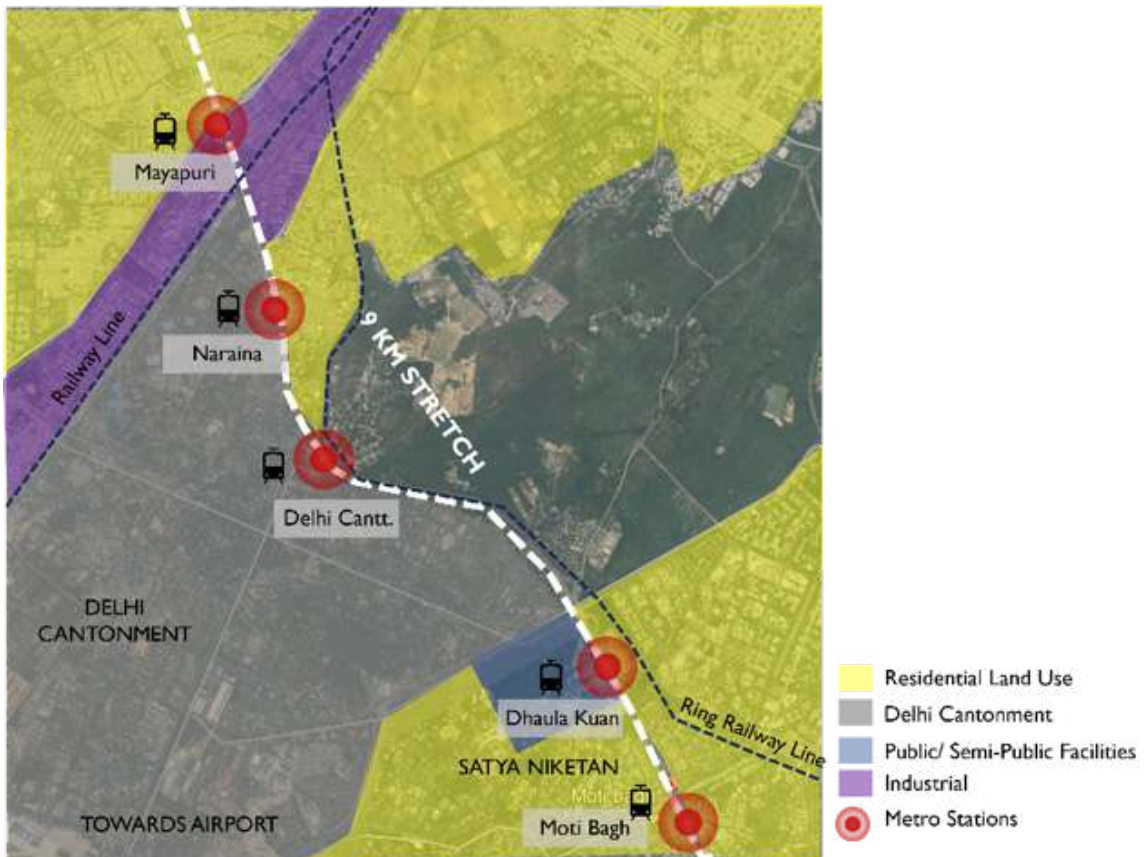
The pilot redesign of a 9 km stretch of the Inner Ring Road extends from the Core of the City to its northwest, connecting the residential, institutional, and leisure zone of Moti Bagh to the institutional and inter-city transit area of Dhaula Kuan. It extends to Delhi Cantonment's administrative zone and traverses densely populated settlements in Naraina and Mayapuri. Aligned with a metro line, it encompasses five metro stations and numerous bus stops (Figure 3).

Before the transformation, roadside spaces were either underutilised or left abandoned, hampering the safety of pedestrians and daily commuters (Figure 4). The previous Right of Way varied between 60 to 80 meters but has now been re-organised to accommodate 10 to 16-meter-wide public walkways without compromising the number of car lanes (Figure 5).

6. Gathering Youth perceptions

Youth, comprising 96 individuals aged between 15 and 29, were interviewed on their perception of the NMT street. Respondents were divided into five user groups - UG1: Females aged 15-21, UG2: Males aged 15-21, UG3: Females aged 22-29, UG4: Males aged 22-29, and UG5: Others (persons with disability), based on observations during site visits. Figure 6 summarises the stakeholder perception and compares the responses with the assessment factors from existing literature.

Users' narrations help understand how the street transformation have affected their quality of daily travel. The number of positive responses, tabulated in Table 1, aids in calculating the extent of influence of the NMT integration on their well-being. Column 'B'



Key plan



Figure 3. 9 km stretch (Moti Bagh-Mayapuri) selected for study (Google Earth, Master Plan for Delhi 2041)

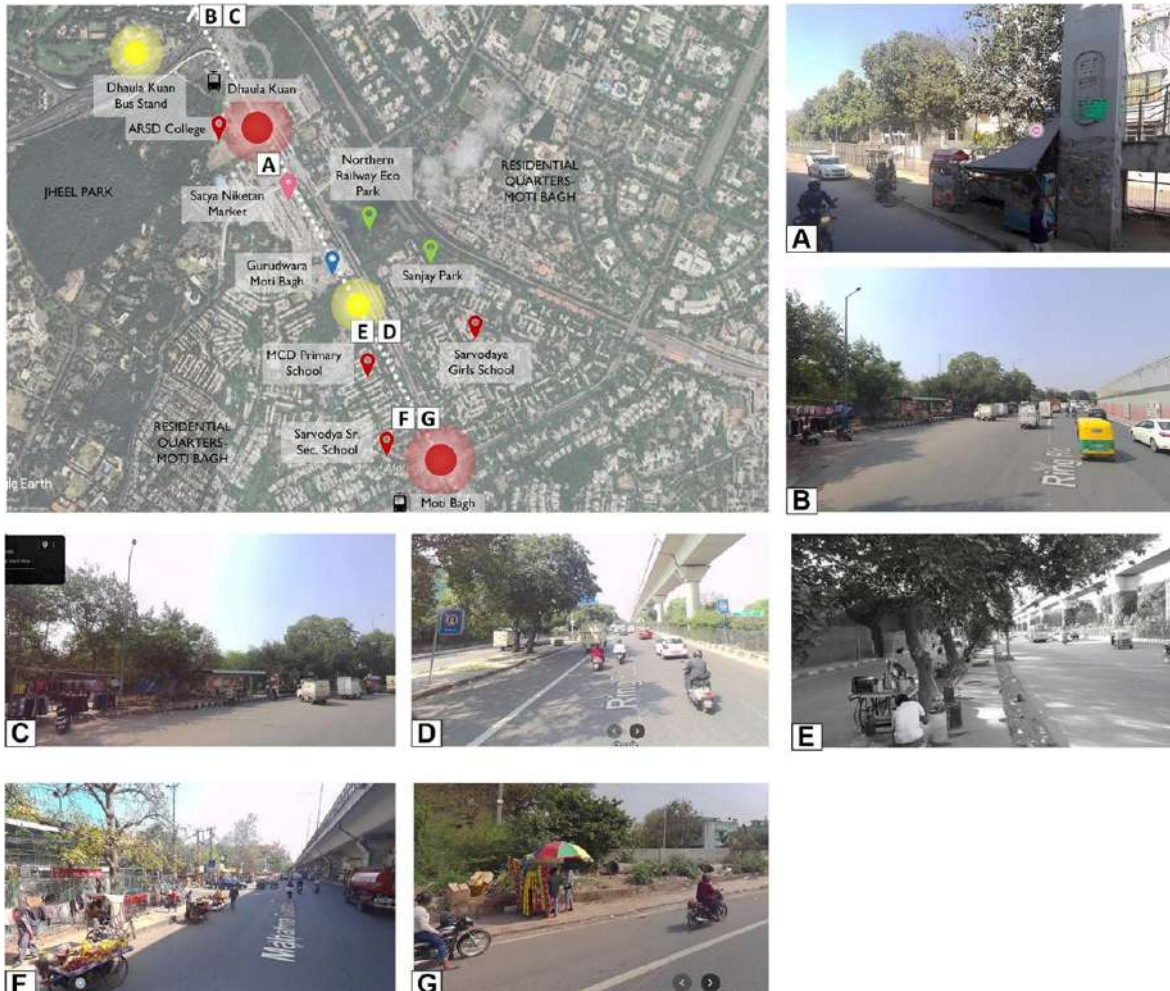
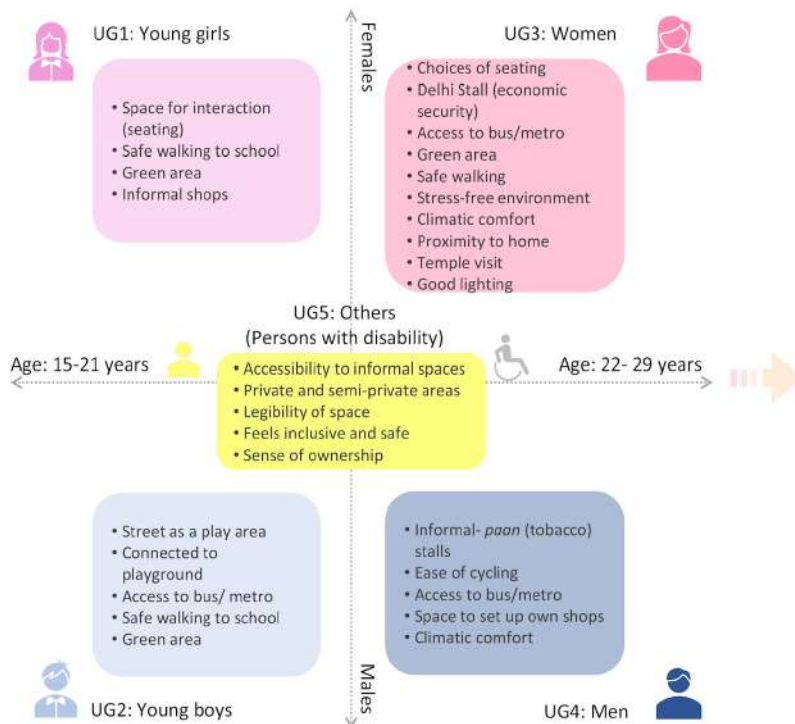


Figure 4. Google street views extracted to depict the condition of the street before NMT infrastructure. (Google Maps, 2024)



Figure 5. A comparison of the road between 2017 and 2024, showing vehicular traffic bays integrated with NMT infrastructure. (Oasis Designs Inc., 2024 and Google Earth)



Assessment Factors from Perceptions	Assessment Factors from Literature Review
Seating	Choice and Location of Seating
Aesthetics, Lighting	Maintenance
Informal Spaces	Informal Spaces, Temporal Diversity of Use
Accessibility- Walking, Public Transport	Accessibility- walking, Affordability, Economic Opportunities
Climatic Comfort	Climatic Comfort, Tree Cover, Integration with nature
Recreational (Playing/Sports)	Layout Quality
Connectivity	City-level connectivity
Legibility	Legibility
Cycle to work/ leisure	Layout Quality
Land use (Temples, Proximity to home)	Permeability, Land Use, Neighbourhood Connectivity,

Quality of Life (Well-being) Indicators from Perceptions	Quality of Life (Well-being) Indicators from Literature Review
Safety	Safety (Physical)
Stress-free	Comfort (Physical)
Ease (of walking, cycling, sitting, observing, eating)	Climatic Comfort (Physical)
Privacy	Adaptability (Mental)
Identity	Satisfaction (Mental)
	Privacy (Mental)
	Identity (Mental)
	Meaningfulness (Mental)
	Equity (Social)
	Inclusivity (Social, Economic)
	Social Cohesion (Social)

Figure 6. On-ground views gathered during interactions with the youth on how they associate with space. (Author, 2024)

lists assessment factors that impact the physical, mental, social and economic well-being, as narrated by users in order of their prevalence. Columns ‘C’ and ‘D’ show the percentage of positive responses from each user group out of 96 participants before and after the transformation respectively. Column ‘E’ indicates the variation in responses, with negative values indicating a decrease in positive feedback. Here, it must be noted that a low value does not necessarily mean a low impact but may be due to a lack of opinions from the participants or no change in services. Hence, qualitative reasoning behind the numbers is important. Column ‘F’ defines the magnitude impact based on-0-25%: Extremely low; 26-50%: Low; 51-75%: Moderate; 76-100%: High.

Table 1: Change of responses reported by 5 user groups helps justify the impact of NMT on the QoL of the youth (Author, 2024)																
S. No.	QoL Indicators	Assessment Factors for NMT that impact (A) in the order of its relevance	Positive responses reported by User Groups (before NMT integration) (in numbers)						Positive responses reported by User Groups (after NMT integration) (in numbers)						Change in a positive response (in %)	Extent of Impact on QoL (Result)
	(A)	(B)	(C)						(D)						(E)=(D)-(C)	(F)
			UG1 (12)	UG2 (28)	UG3 (17)	UG4 (34)	UG5 (05)	% (96)	UG1 (12)	UG2 (28)	UG3 (17)	UG4 (34)	UG5 (05)	% (96)		
I Indicators for Physical Well-Being																
1	Safety	Accessibility (Safe walking)	4	5	0	8	0	18%	11	22	14	33	5	89%	70.83%	Moderate
		Layout Quality	0	2	0	4	0	6%	9	24	14	28	3	81%	75.00%	Moderate
		Lighting	0	3	1	8	0	13%	11	26	15	34	4	94%	81.25%	High
		City-level Connectivity	2	4	5	19	2	33%	8	15	8	25	3	61%	28.13%	Low
		Permeability	0	22	3	29	0	56%	6	27	11	33	3	83%	27.08%	Low
		Informal Spaces	10	18	14	25	2	72%	12	28	15	33	4	96%	23.96%	Extremely Low
		Temporal Diversity of Use	3	0	2	1	0	6%	10	25	16	28	4	86%	80.21%	High
		Land Use	6	15	12	28	4	68%	8	18	15	31	5	80%	12.50%	Extremely Low
2	Comfort (ease of walking/cycling, stress-free)	Neighbourhood Connectivity	2	14	2	12	0	31%	5	20	5	14	0	46%	14.58%	Extremely Low
		City-Level onnectivity	0	4	5	15	0	35%	3	11	5	15	0	35%	10.42%	Extremely Low
		Lighting	0	3	1	8	0	13%	11	26	15	34	4	94%	81.25%	High
		Choice/Location of Seatings	0	2	0	3	0	5%	12	24	17	34	4	95%	89.58%	High
		Layout Quality	0	2	0	4	0	6%	9	24	14	28	3	81%	75.00%	Moderate
		Maintenance	0	1	0	0	0	1%	11	26	17	33	5	96%	94.79%	High
		Legibility	0	4	1	8	1	15%	11	27	17	34	5	98%	83.33%	High
3	Climatic Comfort (shade during extreme sun/rain)	Tree Cover	9	17	12	21	2	64%	12	20	17	29	3	84%	20.83%	Extremely Low
		City-level Connectivity	0	4	4	15	0	24%	1	5	4	15	0	26%	2.08%	Extremely Low
		Layout Quality (Integration with Nature)	0	2	0	4	0	6%	11	28	17	34	4	98%	91.67%	High
II Indicators for Mental Well-Being																
4		Choice/Location of Seatings	0	2	0	3	0	5%	12	24	17	34	4	95%	89.58%	High

Table 1: Change of responses reported by 5 user groups helps justify the impact of NMT on the QoL of the youth (Author, 2024)																
S. No.	QoL Indicators	Assessment Factors for NMT that impact (A) in the order of its relevance	Positive responses reported by User Groups (before NMT integration) (in numbers)						Positive responses reported by User Groups (after NMT integration) (in numbers)						Change in a positive response (in %)	Extent of Impact on QoL (Result)
			NA	2	NA	4	0	6%	NA	28	NA	34	4	69%		
	Adaptability (NMT lanes turning into spaces for relaxation/recreation)	Layout Quality	NA	2	NA	4	0	6%	NA	28	NA	34	4	69%	62.50%	Moderate
		Tree Cover	4	17	6	27	2	58%	8	20	17	29	3	80%	21.88%	Extremely Low
5	Satisfaction	Lighting	0	3	1	8	0	13%	11	26	15	34	4	94%	81.25%	High
		Permeability	0	22	3	29	9	56%	6	27	11	33	3	83%	27.08%	Low
		Tree Cover	9	17	12	21	2	64%	12	20	17	29	3	84%	20.83%	Extremely Low
		Land Use	6	15	12	28	4	68%	8	18	15	31	5	80%	12.50%	Extremely Low
6	Privacy	Choice/Location of Seatings	NA	2	0	3	0	5%	NA	19	5	28	3	57%	52.08%	Moderate
		Permeability	0	22	3	29	0	56%	6	27	11	33	3	83%	27.08%	Low
7	Indentity	Informal Spaces	10	18	14	25	2	72%	12	28	15	33	4	96%	23.96%	Extremely Low
		Temporal Diversity of Use	3	0	2	1	0	6%	10	25	16	28	4	86%	80.21%	High
		Maintenance	0	1	0	0	0	1%	11	26	17	33	5	96%	94.79%	High
8	Meaningfulness	Legibility	0	4	1	8	1	15%	11	27	17	34	5	98%	83.33%	High
		Informal Spaces	10	18	14	25	2	72%	12	28	15	33	4	96%	23.96%	Extremely Low
III Indicators for Social Well-Being																
9	Equity	Layout Quality	0	2	0	4	0	6%	9	28	17	34	4	96%	89.58%	High
		Temporal Diversity of Use	3	0	2	1	0	6%	10	25	16	28	4	86%	80.21%	High
10	Inclusivity	Accessibility	0	8	3	16	1	29%	12	28	17	34	5	100%	70.83%	Moderate
11	Social Cohesion	Temporal Diversity of Use	3	0	2	1	0	6%	10	25	16	28	4	86%	80.21%	High
		Choice/Location of Seatings	0	2	0	3	0	5%	12	24	17	34	4	95%	89.58%	High
		Informal Spaces	10	18	14	25	2	72%	12	28	15	33	4	96%	23.96%	Extremely Low
		Lighting	0	3	1	8	0	13%	11	26	15	34	4	94%	81.25%	High
IV Indicators for Economic Well-Being																
12	Inclusivity	Affordability	12	28	17	34	5	100%	12	28	17	34	5	100%	0.00%	No change
		Economic Opportunities	NA	16	NA	34	5	57%	NA	19	NA	28	5	54%	-3.13%	Decrease

7. Assessing Non-Motorised Transport (NMT) infrastructure

As stated earlier, the impact of factors collated jointly from youth perceptions and literature review was assessed using well-being as a component of QoL. The indicators of QoL (extracted in Section I) were divided into the sub-components of well-being, i.e. physical, mental, social and economic. These indicators were linked with the assessment factors based on the perceptions of the youth perceptions (Table I).

7.1. Planning assessment factors

a. Land use

The vibrant land use spans 16 schools, a college, a medical facility, a district-level park, two city-level parks, a Sikh temple, some small shrines, and a cluster of restaurants and residences along the road (Figure 7). It attracts youth, who constitutes 64% of the overall users. As land use remains unchanged post-transformation, the extent of its influence on well-being, though positive, is low (Table I).



Figure 7. Adjacent land use encompassing schools, parks, colleges and restaurants that attract youth. (Google Earth and Author, 2024)

b. City-level (Connectivity and Continuity)

The street prioritises pedestrians and cyclists within an 800-metre radius of the metro stations, creating a successful Multi-Modal Integration hub (Figure 8), per the Unified Traffic and Transportation Infrastructure (Planning and Engineering) Centre (UTTIPEC) (*Street Design Guidelines*, 2010, p.75). Metro stations, equipped with bus stops, auto rickshaw stands, e-rickshaws, foot-over bridges and car halts, are integrated with NMT and rental bike stands enabling easy access to diversified mobility options and last-mile connectivity. Youth feel comfortable adopting public transport. Thus, its impact on the physical well-being of the youth is positive (Table I). Despite providing safe walking and travel comfort with tree cover, the NMT lanes are frequently interrupted by large road intersections, like the one at Dhaula Kuan (Figure 8E) and become less than a metre wide at some points (Figure 9P), lowering the extent of the impact on physical well-being.

c. Neighbourhood continuity

The continuity of NMT lanes from the main road to lower-order streets is crucial for the user's continued comfort. However, the collector streets leading to adjacent areas (Figure 9) lack bicycle lanes, disrupting the comfort of safe walking/cycling. A high order of 'Comfort' in Table I reflects a desire for lane continuity among users but due to discontinuous NMT lanes, the extent of the impact on their physical well-being is low.



Figure 8. Last-mile connectivity with diversified mobility options within 800m of Moti Bagh metro station (Google Earth and Author, 2024) and Dhaula Kuan interchange (E) disrupting the connectivity (Tourism News Live, 2019).

7.2. Design assessment factors



Figure 9. Design features on site. (Author, 2024; Picture N: Oasis Designs Inc., 2024)

a. Layout quality

Table 1 shows an 85-92% variation in safety, comfort, equity and climatic comfort indicators. The old, hindered footpaths (Figure 4A, C, D, E) have now been replaced with segregated and wide NMT lanes that allow equitable availability of street space for pedestrians and cyclists, enhancing social well-being (Figure 9D, P). Skid-free thermoplastic surfaces provide men with adaptability for skateboarding (Figure 9N) but are unpopular among females. However, cyclists and persons with disability feel unsafe due to speeding four-wheelers at the crossings between cycle lanes and car lanes (marked in blue in Figure 9 key plan), thus limiting the change in safety and comfort to 75%. Despite the provision of bollards (Figure 9A), the intrusion of motorcyclists in NMT lanes during peak traffic hours

concerns young girls and boys. Also, the lack of amenities like toilets and drinking water affects users' comfort.

b. Accessibility

Women and persons with disability show higher favourability to segregated lanes and the use of tactile features (Figure 9C, G). A 100% variation in Table 1 reflects improved safety and inclusivity, which enhances their physical and social well-being.

c. Choice and location of seating

Figures 9F, H, I, J and M depict horseshoe-shaped seats, concrete slabs for people of different heights, and stone benches. These seats are located close to public transport stops and vending spaces, promoting comfort, spaces to interact, and adaptability, with 90% variation as compared to no seats in the old layout (Figure 4E, F). A few isolated seats also provide privacy to some, but its impact on social well-being is low.

d. Informal spaces

Informal stalls selling food and clothing significantly enhance identity, indicated by a 96% positive response, thereby promoting mental well-being (Table 1). These vendors attract people by providing affordable items, promoting meaningfulness, safety, and social cohesion (Figure 9K, L, M). While the response of integrating informal spaces with formal design is positive due to safer access to these services, its value is low because of unchanged availability before and after the transformation (Figure 4A, C, G).

e. Temporal diversity of use

The street now equips areas for diverse uses. Users have observed fun musical evenings or stalls set up under makeshift shaded areas (Figure 9B), which add an "element of surprise" and make space safer, equitable and welcoming people for interactions. It gives the public space a new identity with an 80% hike in physical, social and mental well-being (Table 1).

f. Lighting

Young girls and women rank lighting among the top contributors to safety, comfort, satisfaction and social cohesion. The provision of energy-efficient LED light poles, high-mast lights and floodlights (Figure 10B, G, J) ensures the elimination of dark spots encouraging females to use the street at night. This is demonstrated by an 81% hike in positive responses contributing to physical, mental and social well-being.

g. Permeability

Females feel safe in an open and free environment where NMT lanes co-exist with car lanes providing them with visual accessibility (Figure 10E, F). This increases the responses for safety, satisfaction and privacy. However, the variation is only 27% as men found no difference in permeability, as depicted in Table 1.

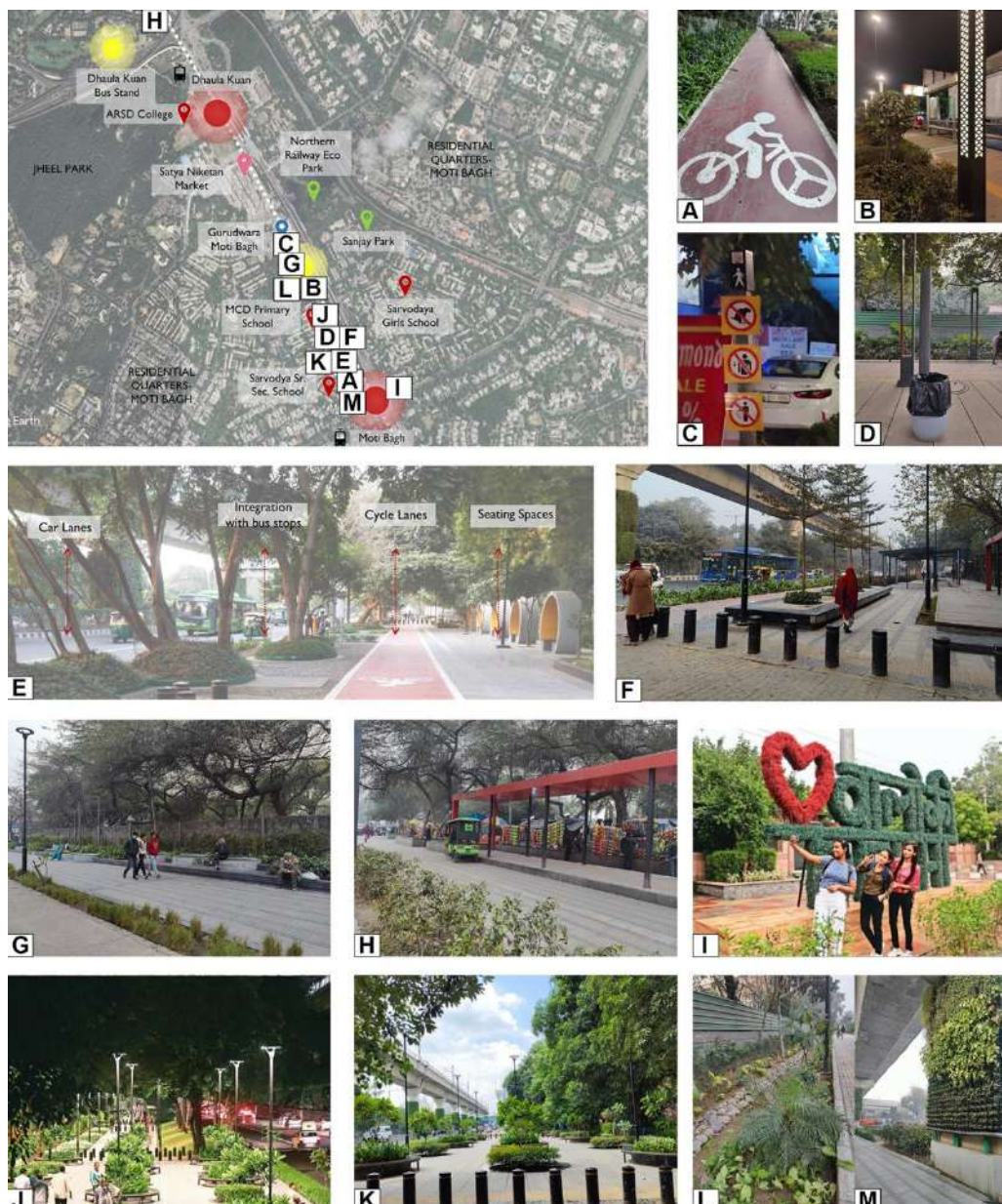


Figure 10. Design features observed on-site. (Author, 2024; Picture K: Oasis Designs Inc., 2024; Picture I, J: The Indian Express, 2022)

h. Maintenance

In contrast to the unkept sidewalks (Figure 4G), the new design prioritises cleanliness through dustbins and ‘selfie points’ as social landmarks (Figure 10D, I), leading to a 95% increase in comfort and identity.

i. Legibility

Floor signs indicating lanes for cycling and signs on poles showing prohibited uses (Figure 10A, C) have increased the legibility by 83%. It enhances comfort and meaningfulness, according to all user groups.

j. Tree cover

Vertical gardens on metro pillars, hedges and lush trees create a cool micro-climate, providing climatic comfort and satisfaction to 84% of the users interviewed (Figure 10K, L, M). Artificial bioswales enhance stormwater infiltration and drainage during rainfall, bearing environmental benefits. 80% of users, mainly men, use the shade to relax, noting its contribution to adaptability (Table 1). A low value in variation implies that the availability of tree cover remains the same. However, insufficient tree cover on wide NMT lanes forces cyclists to shift to walking lanes during scorching heat, causing discomfort to pedestrians.

k. Affordability and economic opportunities

A continued presence of informal vending, auto-rickshaws and other transport services has kept the street's affordability at 100%, showing "no change" in the value (Figure 9K, L). However, there is a slight decline in positive feedback for economic opportunities from vendors due to reduced customer foot traffic caused by NMT lanes separating them from their primary customers (four-wheelers), as compared to when they could be closer to cars (Figure 4A, F, G). This has restricted their response to inclusivity.

8. Outputs

8.1. Scoring methodology

Table 2 scores the overall QoL in four steps. First, individual scores for each assessment factor are calculated in Column E. This is based on the positive responses collected from various user groups and the multiplication factor assigned from the priority order collected from the users. An assessment factor may be prioritised differently from one indicator to the other. Next, the individual scores are added in Column F to get a collective score for each indicator. Thirdly, an average of these indicators is calculated in Column G to derive separate scores for physical, mental, social and economic well-being. Finally, a collective score for Quality of Life is derived in Column J based on the scores from the last step and an equal multiplication factor of 0.25 is assigned to each one of the four sub-components of well-being. Hence, a cumulative score of well-being depicts the contribution of well-designed NMT streets towards the QoL, as perceived by youth.

8.2. Scoring the indicators

Figure 11 highlights the factors that need to be positively addressed in a public street to improve the indicators linked with it. It depicts that a design feature may influence more than one indicator, suggesting that more than one indicator can be addressed by focusing on one design feature.

Physical well-being:

As per Figure 11, most factors relate to safety and comfort with accessibility, layout quality, lighting, maintenance, legibility, informal spaces, and tree cover being the most influential factors among others. While city-level and neighbourhood are crucial, they received less than 50% positive responses due to interruptions in safe mobility, as discussed in Section 7.

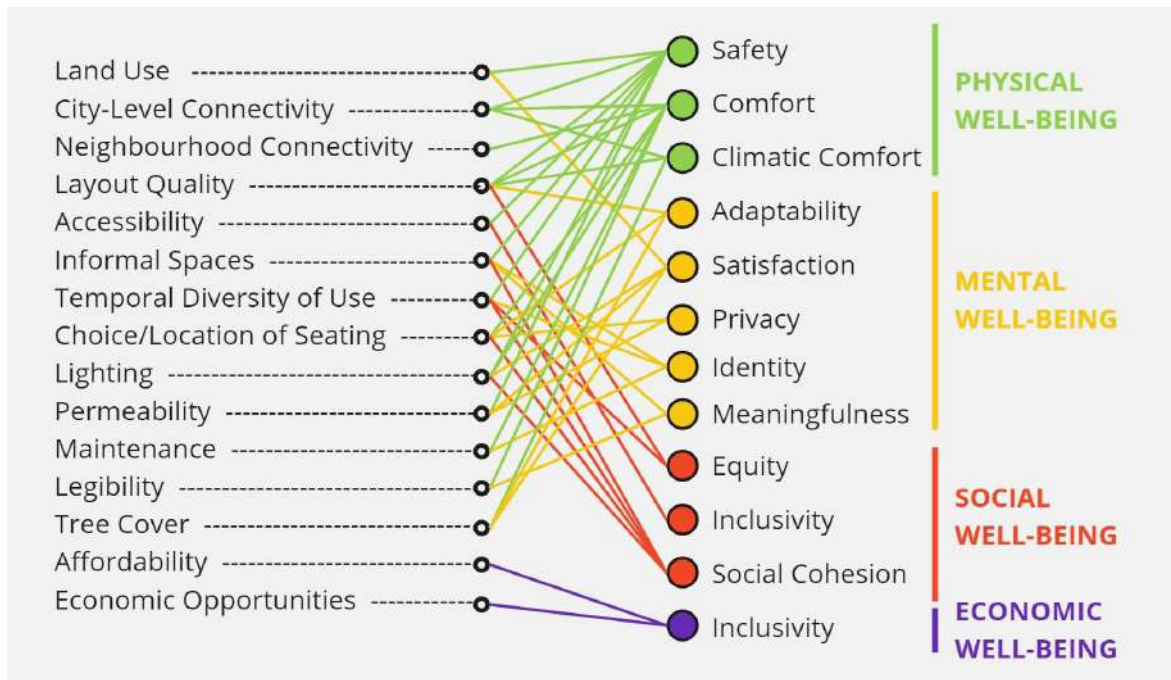


Figure 11. Linkages between assessment factors and indicators established by user groups. (Author, 2024)

Moreover, unsafe crossings, insufficient tree cover, and unavailability of public toilets limit the average score of physical well-being to 72.9 making it the least ranked among the sub-components of an individual's well-being. This suggests that there is still significant room in achieving the goal of enhancing physical well-being while re-designing streets.

Mental well-being:

Mental well-being, which includes indicators like adaptability, satisfaction, privacy, identity and meaningfulness is affected by the choice and location of seating, tree cover, permeability, informal spaces, maintenance and legibility. The score is lowered to 85.66 due to issues with layout quality and privacy of seating areas, particularly for males who prefer sleeping in the shade. Females did not respond to these factors, affecting the numerical value.

Social well-being:

In comparison to equity and inclusivity, more factors influence social cohesion in public spaces (Figure 11). These factors also receive over 85% positive feedback from users, resulting in a social well-being score of 94.5- the highest among all. This indicates that the new design enhances the social integrity of the public street by catering to informal spaces and bringing people together.

Economic well-being:

Economic well-being is impacted by affordability and economic opportunities, with the former being stagnant but the latter receiving negative feedback. The experiences of vendors, discussed in Section 7, suggest a reduction in opportunities for them due to the current layout. This suggests room for improvement in an individual's economic well-being.

Quality of Life:

The cumulative score of 83 is from a mix of positive responses in the factors linked to social and mental well-being and some negative feedback that still poses a challenge to the physical and economic integrity of the space. While it is more than the QoL score of 39.14 before transformation, a scope of improvement lies in integrating NMT with current streets in Delhi.

9. Conclusion

The issue of fatality risk and injuries reported among pedestrians and cyclists stems from a lack of footpaths and encroachments. It is addressed in the new design through segregated cycling and walking tracks, which ensure safe pathways for school children, working individuals and recreational users by enhancing their physical safety by 75-80%. Nevertheless, physical well-being can still be developed by extending NMT lanes on collector streets, enabling continuity while travelling. Moreover, safe crossings or speed control measures, integration of NMT on large road interchanges, and restricting encroachments by motorcyclists may enhance user safety and comfort.

The street integrates physical necessities with social needs by incorporating informal spaces, seating areas, and nature and providing seamless links to public transport services, ensuring last-mile connectivity for daily commuters. This holistic approach now welcomes skateboarders, joggers, entertainers and vendors during evenings and weekends. It has significantly improved their social well-being by 95% in comparison to before, promoting 'social sustainability' and underscoring the importance of NMT as a social infrastructure. While the design principally guarantees economic well-being for customers by maintaining the provision of affordable services in an organised fashion, street vendors have criticised this reorganisation as "fatal for business". Therefore, consulting vendors to better comprehend their requirements could influence innovative approaches to economic well-being.

Hence, the NMT infrastructure design improves the quality of life for users by 53%, but some indicators still show room for improvement. Once the pertaining issues are tackled, a fair allocation of road space and quality public space is expected to encourage more users to adopt cycling as a mode of transportation. Consequently, this paper lays the groundwork for further research on an anticipated shift in the modal share in car-centric Indian cities. This shift will alleviate traffic congestion and reduce carbon emissions, thus creating healthier cities, especially for the younger population.

The study fills a gap in the existing literature by examining the contribution of NMT to improved health and well-being of the youth in Indian cities, thus improving their QoL. As India navigates urbanisation, the findings can guide the policy frameworks, street design guidelines and planning strategies for NMT in other cities like Pune, Ahmedabad, Mumbai, and Bengaluru. It may also nudge a shift in the planning approaches towards inclusive, sustainable, and youth-centric strategies that shape public spaces in other cities.

Table 2: Schoring Well-being of Youth Post-NMT Integration and Computing Quality of Life (Author, 2024)											
S. No.	QoL Indicators	Assessment Factors for NMT that impact (A)	Positive responses	Factor of multiplication	Individual Score Contribution	Total score for each QoL indicator	Average score for well-being	Factor of Multiplication	Individual score contribution	Total score for Quality of Life	Quality of Life before NMT
	(A)	(B)	(C)	(D)	(E)=C*D*100	(F)=ΣE	(G)=Avg. (F)	(H)	(I)=G*H	(J)=ΣI	
Indicators for Physical Well-Being											
1	Safety	Accessibility (Safe walking)	89%	0.25	22.1	84.1	72.9	0.25	18.22	82.6	39.14
		Layout Quality	81%	0.25	20.3						
		Lighting	94%	0.15	14.1						
		City-level Connectivity	61%	0.1	6.1						
		Permeability	83%	0.1	8.3						
		Informal Spaces	96%	0.05	4.8						
		Temporal Diversity of Use	86%	0.05	4.3						
		Land Use	80%	0.05	4.0						
2	Comfort	Neighbourhood Connectivity	46%	0.25	11.5	66.4	72.9	0.25	18.22	82.6	39.14
		City-Level onnectivity	35%	0.25	8.9						
		Lighting	94%	0.2	18.8						
		Choice/Location of Seatings	95%	0.1	9.5						
		Layout Quality	81%	0.1	8.1						
		Maintenance	96%	0.05	4.8						
		Legibility	98%	0.05	4.9						
3	Climatic Comfort	Tree Cover	84%	0.6	50.6	68.2	72.9	0.25	18.22	82.6	39.14
		City-level Connectivity	26%	0.3	7.8						
		Layout Quality (Integration with Nature)	98%	0.1	9.8						
Indicators for Mental Well-Being											
4	Adaptability	Choice/Location of Seatings	95%	0.5	47.4	82.9	85.7	0.25	21.42		
		Layout Quality	69%	0.4	27.5						
		Tree Cover	80%	0.1	8.0						

S.No.	QoL Indicators	Assessment Factors for NMT that impact (A)	Positive responses	Factor of multiplication	Individual Score Contribution	Total score for each QoL indicator					
5	Satisfaction	Lighting	94%	0.4	37.5	87.4	Average score for well-being	Factor of Multiplication	Individual score contribution	Total score for Quality of Life	Quality of Life before NMT
		Permeability	83%	0.3	25.0						
		Tree Cover	84%	0.2	16.9						
		Land Use	80%	0.1	8.0						
6	Privacy	Choice/Location of Seatings	57%	0.6	34.4	67.7					
		Permeability	83%	0.4	33.3						
7	Identity	Informal Spaces	96%	0.5	47.9	97.3					
		Temporal Diversity of Use	86%	0.3	25.9						
		Maintenance	96%	0.2	19.2						
8	Meaningfulness	Legibility	94%	0.2	18.8	97.3					
		Informal Spaces	95%	0.1	9.5						
Indicators for Social Well-Being											
9	Equity	Layout Quality	96%	0.6	57.5	92.1					
		Temporal Diversity of Use	86%	0.4	34.6						
10	Inclusivity	Accessibility (for all)	100%	1	100.0	100.0					
		Temporal Diversity of Use	86%	0.4	34.6						
Table 2: Scoring Well-being of Youth Post-NMT Integration and Computing Quality of Life (Author, 2024)											
11	Social Cohesion	Choice/Location of Seatings	95%	0.25	23.7	91.6	94.6	0.25	23.64		
		Informal Spaces	96%	0.25	24.0						
		Lighting	94%	0.1	9.4						
Indicators for Economic Well-Being											
12	Inclusivity	Affordability	100%	0.5	50.0	77.1	77.1	0.25	19.27		
		Economic Opportunities	54%	0.5	27.1						

References

- Ahmed, K. G. (2012) 'Urban social sustainability: a study of the Emirati local communities' in *Ain*, *Journal of Urbanism: International Research on Placemaking and Urban Sustainability*, 5(1) pp. 44-46 [online]. Available from: <https://doi.org/10.1080/17549175.2012.659515> [Accessed: 13 December 2023].
- AoU, F. (2020) 'Six Principles for Healthier Placemaking', *Here & Now* [online]. Available from: <https://journal.theaou.org/health-equity/six-principles-for-healthier-placemaking/> [Accessed: 12 January 2024].
- Barton, H., et al. (2003) *Shaping Neighbourhoods: For Local Health and Global Sustainability* [online]. Routledge. Available from: <https://doi.org/10.4324/9780203986882> [Accessed: 13 December 2023].
- Bhat, T. (2023) 'How safe are Delhi's roads for pedestrians?' *The Patriot*, 23 December [Online]. <https://thepatriot.in/delhi-ncr/how-safe-are-delhis-roads-for-pedestrians-43913#:~:text=The%20report%20highlights%20concerns%20over, the%20report%20for%20last%20year> [Accessed: 19 June 2024].
- Brundtland, G.H. (1987) *Our Common Future: Report of the World Commission on Environment and Development* Geneva, UN-Document A/42/427 [Online]. Available from: <https://sustainabledevelopment.un.org/content/documents/5987our-common-future.pdf> [Accessed on 31 January 2024].
- Dave, S. (2011) 'Neighbourhood density and social sustainability in cities of developing countries', *Sustainable Development*, 19(3), p. 189-205 [Online]. Available from: <https://doi.org/10.1002/sd.433> [Accessed: 13 December 2023].
- Deore, P. and Lathia, S. (2019) 'Streets as Public Spaces: Lessons from Street Vending in Ahmedabad, India', *Urban Planning*, 4(2), pp 138-153 [Online]. Available from: <https://doi.org/10.17645/up.v4i2.2058> [Accessed: 23 December 2023].
- Ghahramanpouri, A., et al. (2015) 'Urban Social Sustainability Contributing Factors in Kuala Lumpur Streets', *Procedia- Social and Behavioral Sciences*, 201, p. 368-376 [online]. Available from: <https://doi.org/10.1016/j.sbspro.2015.08.188> [Accessed: 13 December 2023].
- Goel, R. (2023) 'Population-level estimate of bicycle use and fatality risk in a data-poor setting', *International Journal of Injury Control and Safety Promotion*, 30(3), pp. 333-337 [Online]. doi: 10.1080/17457300.2023.2172737. [Accessed on: 25 June 2024].
- Ita et al. (2015) *The Charter of Public Space* [Online]. Available from: <https://hdl.handle.net/11573/1658814> [Accessed on: 30 June 2024].
- Karuppannan, S. & Sivam, A. (2011) 'Social sustainability and neighbourhood design: an investigation of residents' satisfaction in Delhi', *Local Environment*, 16(9), p. 849-870 [online]. Available from: 10.1080/13549839.2011.607159 [Accessed: 10 January 2024].
- Kaur, H. and Jain, H. (2020) 'Share the Lane: Making Delhi Safer for Cycles and Pedestrians', *Council On Energy, Environment And Water*, June 3, 2020 [online]. Available from: <https://www.ceew.in/blogs/share-lane-making-delhi-safer-cycles-and-pedestrians> [Accessed: 11 January 2024].
- Mehra, A. (2022) *Pitam Pura road* [online]. Available from: <https://indianexpress.com/article/cities/delhi/european-makeover-to-delhi-roads-streetscaping-project-8199699/> [Accessed: 9 January 2024].
- Mehra, A. (2022) *Moti Bagh* [online]. Available from: <https://indianexpress.com/article/cities/delhi/european-makeover-to-delhi-roads-streetscaping-project-8199699/> [Accessed: 9 January 2024].
- Mehta, V. (2009) 'Look Closely and You Will See, Listen Carefully and You Will Hear: Urban Design and Social Interaction on Streets', *Journal of Urban Design*, 14(1), p. 29-64 [online]. Available from: <https://doi.org/10.1080/13574800802452658> [Accessed: 15 December 2023].
- Mehta, P.V. and Dhindaw, J. (2020) 'Reconfiguring public spaces within the new normal', *World Resources Institute India*, May 19, 2020 [Online]. [Blog]. Available from: <https://wri-india.org/blog/reconfiguring-public-spaces-within-new-normal> [Accessed: 20 July 2024].

- Mani, G. (2022) 'How these 16 Delhi streets will change, get a European makeover', *The Indian Express*, 10 October [online]. Available from: <https://indianexpress.com/article/cities/delhi/european-makeover-to-delhi-roads-streetscaping-project-8199699/> [Accessed: 25 December 2023].
- Ministry of Housing and Urban Affairs (2021) *Ease of Living Index 2020*, p.28-29 [online] New Delhi: Government of India. Available from: https://smartnet.niua.org/sites/default/files/resources/final_web_ease_of_living_report_2020_.pdf [Accessed: 15 July 2024].
- Ministry of Statistics and Programme Implementation (2022) *Youth in India* [Online]. Government of India, New Delhi: Youth in India Publications. Available from: https://mospi.gov.in/sites/default/files/publication_reports/Youth_in_India_2022.pdf [Accessed on: 14 December 2023].
- National Crime Records Bureau (2023) *Crime in India 2022*. Volume I. National Crime Records Bureau [online]. Available from: <https://www.ncrb.gov.in/uploads/nationalcrimerecordsbureau/custom/1701607577CrimeinIndia2022BookI.pdf> [Accessed: 29 June 2024].
- Numbeo (2023) *Quality of Life* [Online]. Numbeo. Available from: <https://www.numbeo.com/quality-of-life/> [Accessed: 31 January 2024].
- Oasis Designs Inc. (2016) *Typical Section* [Online]. Available from: <https://www.pwddelhi.gov.in/> [Accessed: 14 January 2024].
- Oasis Designs Inc. (2024) *Ring Road From Moti Bagh To Prembari Pul, New Delhi* [Online]. Oasis Designs. Available from: <https://oasisdesigns.org/motibagh.asp> [Accessed: 23 December 2023].
- Panda S., Chakraborty M. & Misra S. (2016) 'Assessment of social sustainable development in urban India by a composite index', *International Journal of Sustainable Built Environment*, 5, pp 435–450 [online]. Available from: <https://doi.org/10.1016/j.ijbsbe.2016.08.001>. [Accessed: 13 December 2023].
- Patil, G.R. and Sharma, G. (2022). 'Urban Quality of Life: An assessment and ranking for Indian cities', *Transport Policy*, 124, pp. 183–191 [online]. Available from: <https://doi.org/10.1016/j.tranpol.2020.11.009>. [Accessed: 5 July 2024].
- Pinter-Wollman, N., Jelić, A. and Wells, N.M. (2018) 'The impact of the built environment on health behaviours and disease transmission in social systems', *Philosophical Transactions - Royal Society. Biological Sciences*, 373(1753), p.1. [online]. Available from: <https://doi.org/10.1098/rstb.2017.0245>.
- Surbeck, C., Hilger H. (2014) 'Social Sustainability and Important Indicators in Infrastructure', *World Environmental and Water Resources Congress 2014*, p. 2078-2093 [online]. Available from: <https://doi.org/10.1061/9780784413548.208> [Accessed: 3 January 2024].
- The Energy and Resources Institute (2014) 'Pedalling Towards a Greener India: A Report on Promoting Cycling in the Country', *The Energy and Resources Institute*, p.93 [online]. Available from: https://www.teriin.org/eventdocs/files/Cycling_Report_LR.pdf [Accessed: 11 January 2024].
- The Times of India (2023) 'Many Lives Cut Short, By Accident or Design' *The Times of India*, 5 December [online]. Available from: <https://timesofindia.indiatimes.com/city/delhi/rise-in-road-accidents-in-delhi-a-growing-public-health-hazard/articleshow/105739998.cms> [Accessed: 16 December 2023].
- Tourism News Live (2019) *Dhaulta Kuan Interchange* [Online]. Available from: <https://www.tourismnewslive.com/2019/03/02/new-four-line-flyover-at-dhaulta-kuan-interchange-to-be-inaugurated-today/> [Accessed: 17 July 2024].
- United Nations (2022) 'World Population Prospects 2022' *United Nations Population Fund* [Online]. Available from: <https://www.unfpa.org/data/world-population/IN>. [Accessed: 14 January 2024].
- United Nations (2023) 'The Sustainable Development Goals Report 2023', *United Nations*, p.23 [Online]. United Nations Publications: New York. Available from: <https://unstats.un.org/>

[sdgs/report/2023/The-Sustainable-Development-Goals-Report-2023.pdf](#) [Accessed: 25 June 2024].

Unified Traffic and Transportation Infrastructure (Planning & Engineering) Centre (2010) 'Street Design Guidelines', Delhi Development Authority [Online]. Available from: <https://uttipec.org.in/PDF/Street%20Design%20Guidelines.pdf> [Accessed: 29 December 2023].

Weingaertner, C., Moberg, A. (2011) 'Exploring Social Sustainability: Learning from Perspectives on Urban Development and Companies and Products', *Sustainable Development*, 22(2), p. 122-133 [online]. Available from: <https://doi.org/10.1002/sd.536> [Accessed on: 15 December 2023].

An Empirical Case Study on Public Space and Youth Health and Mental Well-being in Botswana Cities and Major Urban Villages

Rebaone Ruth Dick

Pula Institute of Town Planners, Botswana

ruthiedick6@gmail.com

Tepo Kesaobaka Mosweu

University of Botswana, Botswana

tepomosweu@outlook.com

Abstract

Public spaces are vital in urban image and a settlement's sociocultural fabric and identity. Furthermore, public spaces affect the degree to which people and the community socialise, especially young people who face adverse challenges that affect their health and mental well-being. Research has proven that connection with nature and safe play spaces are vital to youth's healthy lives and cognitive and social development, where peer pressure and developing a sense of belonging are critical issues to youth who have become more susceptible to the effects of social exclusion in a digitising and urbanising world. However, intense urban transformation processes have led to an influx of challenges and sometimes threats to public spaces that require countries and the globe to revert some of the city systems and policies that govern settlements. Nonetheless, there should be an integration and interconnection between youth initiatives and urban systems for convivial public spaces. Through an empirical case study, composed of a mixed data collection approach using literature review, observation, questionnaire, and interview surveys, this research provides a more critical approach to assess public spaces in Botswana and their impact on youth mental health and social well-being who are faced with adverse challenges including social exclusion, unemployment, and drug and alcohol abuse. This paper starts by giving a background overview, then gives an in-depth understanding of public space in Africa, focusing on Botswana and probes to understand youth health and mental well-being in a continually urbanising and globalising world.

Keywords: place-making, public spaces, youth health and mental well-being, urban village

To cite this article:

Dick, R. R. and Mosweu, T. K. (2024) "An Empirical Case Study on Public Spaces and Youth Health and Mental Well-being in Botswana Cities and Major Urban Villages", *The Journal of Public Space*, 9(2), pp. 79–108. doi: 10.32891/jps.v9i2.1802.

This article has been double blind peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

I. Background information

Poor mental health is a global issue, and moreso for African youth, who make up approximately 60% of the continent's total population. African youth are at greater risk of mental health issues due to Africa's predominant challenges heightened by post-colonial era and globalisation impacts, such as unsafe digital space, high unemployment rates, and climate change (Magamelal et al., 2021). Good public spaces give youth more sophisticated social interactions, including encounters with strangers they would not ordinarily meet in their more private domains (Fleckney and Bentley, 2021, p. 114242).

Youth are often perceived as threats in society due to their association with social ills and violence (Diouf, 2003 pp. 1-4). Gray & Manning (2022, pp. 1400-1417) argue that youth are not often included in spatial politics; they are absent from social and psychological analyses of place as they are placed at 'risk' and 'risky' in the urban space. This has caused measures seeking to minimise their use of public spaces. However, young people should not be blamed for social ills; rather poorly planned environments and poorly conceived and created urban public realms have produced spatial disadvantages, resulting in reduced social networks, collective efficacy, stigmatisation, and land use patterns that impede access to community facilities, and greenspace (Fleckney & Bentley, 2021, p. 1142).

Public spaces have contested histories and perspectives, and have been understood from personal, cultural, and urban design and planning perspectives. The terms public space, open space, and place are often used interchangeably (Valdes, 2022 pp. 2-3) argues that public spaces are more than a network of streets and spaces between buildings but a building block of our communities that define and are defined by culture. Anastaciu (2021 p. 1) defines public spaces as open and enclosed places that are accessible and enjoyable by everyone for free and these can be categorised into four categories namely; streets, open spaces, public facilities, and markets.

Njokweni (2015, pp. 3-7) views public space as a new ideology in the African context; however, Blignaut (2020, pp. 1-12) argues that public spaces have always existed in Africa but have lost their unique roles due to influences from Western counterparts. He further argues that rapid urbanisation in Africa has led to the contestation of public space uses and perceptions; however they have evolved and carried out various activities such as celebrations, informal activities, and revitalisation activities to name a few. Colonial policies significantly influenced urban spaces in African settlements, challenging the development of place identity for African communities in the post-colonial era; however, African local history can enrich social and physical space through lived experience, the "spirit of place." (Home, 2021, pp. 317-337). Morobolo et al. (2018 pp 39-60) attest that colonies brought about spatial manifestations that redefined and affected spaces that created a sense of belonging to residents in Botswana.

For the past few decades, urban public space concepts in urban planning have continued to change and progress. Jane Jacobs and William H. Whyte first described place-making concepts to reclaim the urban public realm in the 1960's (Moreira 2021 pp. 1-5).

Public spaces became more recognised from this concept as it advocates for a more participatory approach to urban planning where the community is at the forefront of issues affecting cities and city development in contrast to command urban planning, for the past decades, the ideas of the concept are still of relevance and have been used in various projects and academies to improve and enhance public spaces (Moreira, 2021 pp. 1-5). Mateo-Babiano & Lee (2019 pp. 4-6) elucidate that place-making is an evolving process that involves shaping, experiencing, and contributing to a multidimensional

'place', considering socioeconomic reality, ecological conditions, and political perspectives. However, Abbott-Chapman and Robertson (2015, pp. 123-134) argue that an individual's place identity, 'leisure' times, and spaces set apart for rest, relaxation, and a sense of play are becoming more porous for today's young people.

2. Problem statement

Young people are gradually attached to their digital lives, detaching from public spaces that alter how they socialise and form socialites with the real world. However, Duivenvoorden et al. (2021, p. 1) attest that although there have been many obstacles influencing urban residents' social and mental health, especially youth, as a result of urban development, public spaces have been recognised as essential components of metropolitan public life capable of improving mental health and well-being. Fleckney and Bente (2021, pp. 1-5) contend that the urban public realm encompasses the symbolic dimensions of the public space which is a social construct and an emotional investment in social and city development. However, neoliberal urbanism has been shrinking the public domain for young people as they have raised capital needs more than social development and mental well-being.

Despite public spaces having multifaceted definitions based on their characteristics, functions, management, and government authority and influence, their significance has been widely evoked by various academia and researchers; however, their capability to improve youth mental health and well-being has not been fully explored in most African countries. Managing public spaces and the practical provision of functioning and convivial public spaces to community and youth development has been challenging, which makes it difficult to attain the 2030 UN Sustainable Development Goal 11 target 7 by the year 2030 (Duivenvoorden et al., 2021, p. 2-3). This has been the case in most settlements in Botswana and other African countries. Moshia (2014, pp. 1-4) terms public spaces as the lungs of urban centres, and further argues that public spaces in most areas, particularly Botswana, have been misused, neglected, and often used for activities impacting the urban landscape and community of the city in different forms.

3. Research aim and objectives

Through an empirical case study in one of Botswana's cities and urban villages, the study aims to understand public space roles in youth health and mental well-being, their uses, management, and how they are perceived by youth and the country's urban planning regulations.

4. Objectives

- To identify the roles, uses, accessibility, and interaction of public spaces and the youth in Botswana cities and urban settlements;
- To establish the degree to which urban planning regulations in Botswana recognise public spaces;
- To examine the role and impacts of public spaces on youth health and mental well-being.
- To examine strategies that can be employed to improve the management and performance of public spaces on social development and mental well-being of young people in Botswana and globally.

5. Geographical scope

The study is focused on the interconnection of the youth and public spaces in Main Mall Gaborone city and Central Business District (CBD) Letlhakane village in Botswana. The study examines these key areas as shown in Figure 1 and 2 assessing the accessibility, proximity and management of public spaces as well as their roles and interaction with young people in Botswana.

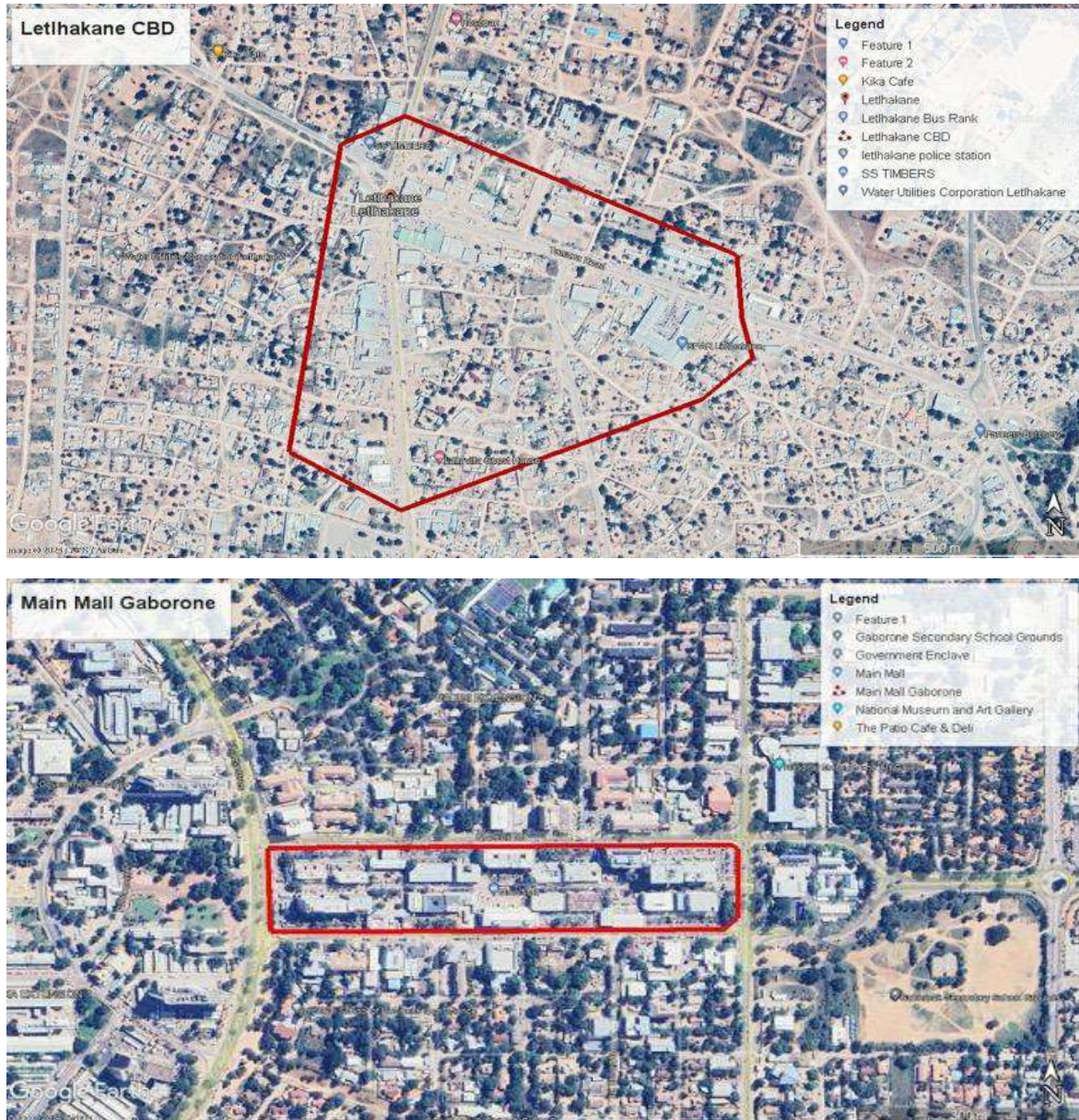


Figure 1 (top). Letlhakane Central Business District (Adopted from Google Earth, 2024)

Figure 2 (down). Gaborone Main Mall (Adopted from Google Earth, 2024)

6. Public spaces in Botswana

The morphology of settlements in most African countries, including Botswana, were affected by colonisation and the introduction of Western lifestyles to the colonies. Urban Safety Reference Group, (2020, pp. 4-6) cites examples from public spaces in South African cities which they argue have lost their quality because of colonialism and apartheid.

In Botswana, the dikgosi were responsible for the allocation and planning of their settlements' morphology through the horseshoe model. The *kgotla*, *patlelo*, or *lolwapa* were dominant public spaces that served as the backbone of the Indigenous Tswana model and the settlement, as depicted in Figure 3. According to Morobolo et al. (2018, p. 44), these spaces had various activities connecting people and serving several functions ranging from a playground for children, gathering places during cultural activities like weddings and funerals, as well as traditional games and entertainment activities for both young people and old. As time progressed, their emphasis waned, especially in urban areas due to the introduction of grid pattern morphology and adopted legislation and policies.

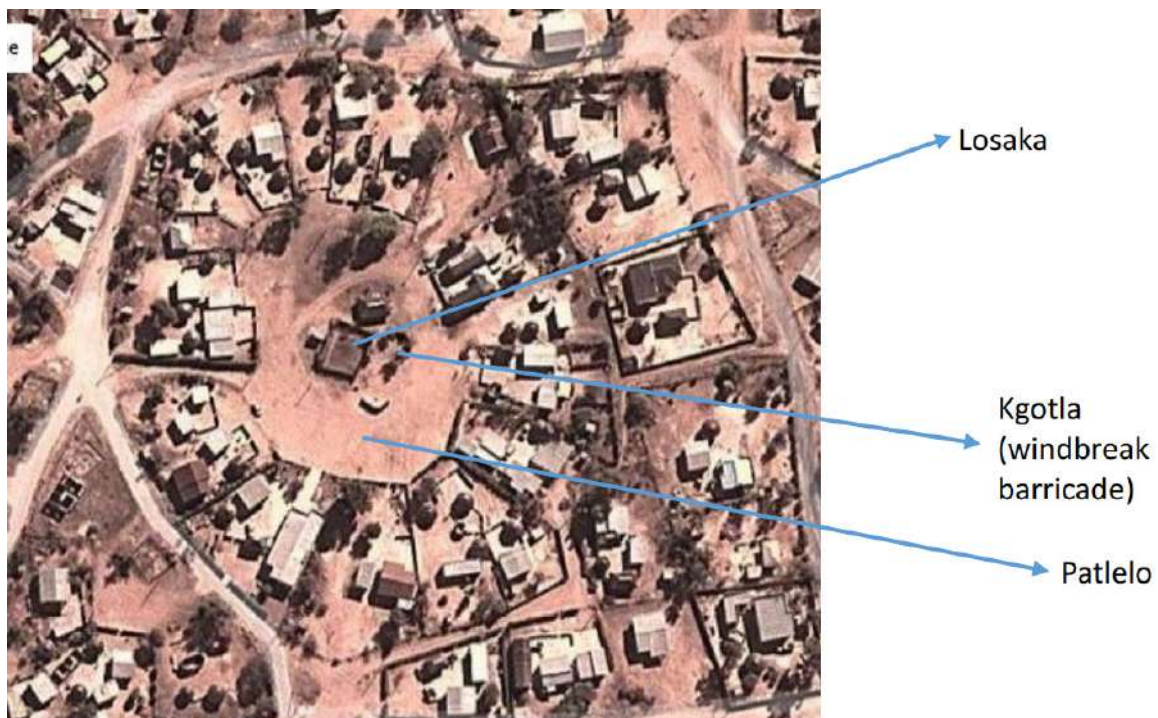


Figure 3. Indigenous Tswana Model (Morobolo et al., p. 45)

Due to the geometric layout of the streets proposed by the new model, public open spaces had to be allocated based on the number of plots within a particular neighbourhood with no specific relation to the plots surrounding it, aside from proximity (Morobolo et al., pp. 50-51). Public spaces in Botswana are now mostly recognised as open spaces that are to serve recreational activities. Mosha (2014 pp. 1-4) argues that open spaces are seen as individual sites such as parks or squares, and the continuous matrix of all unbuilt land in urban areas, public parks as well as private gardens and urban streets that provide the connectivity of different places. He further stipulates that public spaces have ecological, societal, structural, and aesthetic functions that promote health and well-being.

The Town & Country Planning Act (2013) of Botswana outlines that local authorities are responsible for regulating open spaces and any other public/community facilities as per section 19 (4) (schedule 2, part I section 2-3). However, public spaces in Botswana now have been subject to various challenges as they often have contested functions. According to Mosha (2014, pp.4-10), public spaces in Botswana are shaped by public policies, planning regulations, and conditions placed upon the granting of building permits. He articulates,

however, that in rapidly urbanising countries such as Botswana, open spaces are shrinking at an alarming rate and becoming less accessible; those that exist are used for informal activities that are not properly recognised in the planning legislation.

According to Costa et al. (2021 pp. 1-2), since the outbreak of the SARS-CoV-2 in December 2019, the global response in the form of lockdowns, confinement, restrictions on mobility, border control, etc., directly influenced the usage of urban fabric, limiting access to public spaces, and demanding a quick response from the authorities. They further contend that the current question is how a public space will respond to the needs and preferences of citizens, including adolescents, in this crisis and that policymakers, urban planners, and researchers must reflect on the consequences for public life and space sociability to city development.

Although African countries, including Botswana, have been affected by colonialism, Watson et al. (2009, pp. 198-200) suggest that planners in African and global south countries should invent their methods, processes, and techniques relevant to the context and shift from the continual direct withdrawal of global north ideas and innovations, or adapt to the methods and techniques to best suit conditions in the global south. Therefore, this research is based on the concept of 'learn globally apply locally' supported by Vanessa Watson's Global South planning theories.

7. Public spaces vs. Youth Health and Mental-Well-being in an urbanising and globalising world

According to the Revised Youth Policy of Botswana 2010, 'youth' is defined as a person aged 15-35 years (Minister of Youth, Sport and Culture, 2023, p. 5). According to UNFPA Botswana (2024 p. 1) over 60% of the population in Botswana is below 35 years and this proportion is growing. (UNFPA, 2024)

Due to various factors brought in by urbanisation and globalisation, youth have been facing complex and multifaceted mental health challenges in the African context, demanding a nuanced understanding and targeted interventions to address the unique cultural, social, and economic factors at play. Mpemba et al. (2023 pp. 11-13) stipulate that as technology advances rapidly, African youth find themselves at the forefront of the digital age, with their lives intricately woven into the digital landscape, however this has been a double-edged sword. Mpemba et al. (2023, pp. 11-13) argue that although the digital space has raised awareness of mental health issues globally, it has made youth vulnerable to issues such as threats, exploitation, cyberbullying, and the consumption of inappropriate content that has resulted in feelings of anxiety, depression, and a sense of vulnerability, impacting their mental well-being and loss of touch with the real world.

The World Mental Health Report shows that globalisation has been having a drastic impact on mental health; emerging nations have high rates of these issues, especially among young people (Amin, 2023 pp 1-2). According to Brook et al. (2022, pp. 4-6), the root causes of mental health problems among Botswana's youth identified by stakeholders included the rapid growth of technology, limited mental health knowledge among the youth and the community, family problems, poor communication, low self-esteem, and biological/genetic predisposition.

Collins et al. (2023, pp. 137-141) argue that urban life shapes the health and mental well-being of city dwellers; urban environments are often detrimental to mental health issues. This similarly relates to Guy Debord's work where he argues that in advanced capitalism,

life is reduced to an immense accumulation of spectacles, which prompts a shift from individual expression through directly lived experiences and inflicts significant and far-reaching damage to the quality of human life for both individuals and the society. Debord critiques that the ideology was “the abstract will to universality and the illusion thereof”, which was “legitimated in modern society by universal abstraction and by the effective dictatorship of illusion.” (Debord, 2021 pp. 1-215)

Abbott-Chapman & Robertson (2015) argue that public spaces are building blocks of cities and that public spaces have a mutual dependency relationship; the success of a building should be seen by how people interact with the vicinity of the building and the performance of a public space is seen by how people are attracted to a particular building. Vesterhus (2015, p 1-14) argues that despite frequent usage of public areas, youth have a limited impact on their planning and development. He contends that young people seek places where they can feel safe while meeting their requirements for social contact, self-expression, and seclusion. Vesterhus (2015, p 1-14) further articulates that public space is formed and transformed by multiple factors which have played a critical role in the usability and interaction of public space and the youth. Youth need safe public spaces to come together, engage in activities related to their diverse needs and interests, participate in decision-making processes, and freely express themselves (Costa et al., 2021).

Although architects and planners are increasingly aware of the influence of natural and built environments upon an individual’s place identity, ‘leisure’ times and spaces set apart for rest, relaxation, and a sense of play are becoming more porous for the youth (Abbott-Chapman & Robertson 2015, pp. 123-134). Although there is limited literature in Botswana regarding public spaces and youth interaction, it is evident that the above challenges are also experienced by youth in the country. Dee & Crane (2001, pp. 13) argue that in many instances attempts to include “community” and social parameters in urban planning and development processes have not incorporated meaningful involvement of those young people affected by such processes; this is due to predominant challenges such as urban governance implications and socio-economic factors. Public spaces have significant importance in the life of the settlements and is fast attracting the interest of cities all over the world; however in the African context public spaces have not been anchored in planning policies and regulations (Njokweni, 2015, p. 2).

As depicted in Figure 4, Project for public spaces (PFPS) (2023) argues that a successful public space is easily accessible and pedestrian-friendly, while offering enough parking bays for personal vehicles and public transit. PFPS further stipulates that public spaces should be comfortable in terms of safety, cleanliness, and the availability of places to sit, should be walkable and attractive, but also hold a historic and spiritual feel. A convivial public space should also be vibrant and give a variety of activities to choose from, prompting strong social interactions. However, most places and public spaces are designed with little or no due consideration to the needs and preferences of youth which has affected their psychological, social and emotional development (Khalifa et al., 2022 p.1). According to Carmona (2018, pp.47-59), strategic considerations relating to how public spaces should be designed and planned for evolve and need to be changed over time, due to social dynamics and urban transformations. This criterion will later be used in the research to measure the quality of public spaces in the two chosen areas and how they cater for Botswana youth; however other aspects will be taken into consideration to critically analyse the quality and interaction of public spaces in the chosen areas.

What Makes a Great Place?

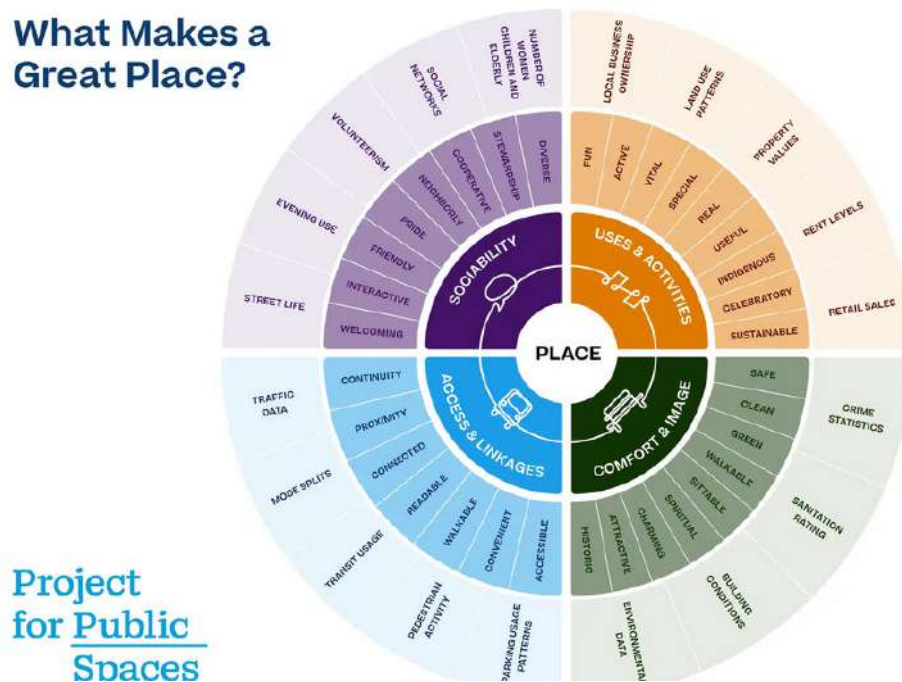


Figure 4. Tool/Criterion for successful spaces (Project for Public Spaces, 2023)
Available at: <https://www.pps.org/article/what-is-placemaking>

8. Methodology

The empirical study was conducted using a mixed data collection procedure that combines qualitative and quantitative methods to investigate the topic thoroughly, as will be evident in the research findings and analysis. The deductive approach was used through a literature review to compare theories and concepts nested in the urban public realm and spaces and their impact on youth health and mental well-being, which have previously been discussed earlier with real-life situations experienced in Botswana cities and urban settlements. The inductive approach helped draw theories and interpretations from the raw data obtained from the observatory, interview, and questionnaire survey to help understand how public spaces in Botswana are perceived their current roles, and their impact and interaction with young people in the area.

A questionnaire survey as indicated in Annexure (i) was conducted in two settlements Gaborone and Letlhakane, Botswana, narrowing it down to one of the settlement centres, Gaborone Main Mall and Letlhakane Central Business District. A total of 100 questionnaires were distributed to the two settlements, Letlhakane and Gaborone (50 each), using the systematic sampling method where the questionnaires were distributed to the young people within the vicinity of the chosen geographical scopes at an interval of 10 minutes. The physical planning officer and environmental health officer were interviewed in Letlhakane as indicated in annexure (ii) to understand the roles performed by the local councils in public spaces as well as the challenges they face concerning the utilisation and management of public spaces. An observatory survey was also conducted in both settlements through

a question checklist as indicated in annexures (iii). The question checklist was informed by the criterion for measuring good public spaces stipulated earlier in this work by the Project of Public spaces. The observatory survey was carried out 2hrs/day for a week in each for the two selected areas to study patterns and engagement of youth with public spaces in Gaborone main mall and Letlhakane central business district area.

9. Research findings and analysis

Mental health and well-being issues identified by youth

Most of the youth showed that they are faced with various mental health and well-being issues in Botswana due to limited convivial public spaces as shown in Table 1. They shared a common concern that these issues are also associated with high unemployment rates and social media impacts in Botswana, as well as other various issues.

Mental health and well-being issues	Total number of respondents (Letlhakane)	Total number of respondents in % (Letlhakane)	Total number of respondents in Gaborone	Total number of respondents in % (Gaborone)
Stress	35	70	30	60
Anger issues	22	44	25	50
Anxiety	20	40	30	60
Mental breakdown	12	24	15	30
Depression	26	52	34	68
Eating disorders	15	30	20	40
Bipolar disorder	5	10	10	20

Table 1. Youth health and mental well-being issues identified by youth in Letlhakane and Gaborone (Dick & Mosweu, 2024)

Perception of public spaces by young people in Gaborone and Letlhakane

Three dominant public spaces were identified in the Central Business District (CBD) in Letlhakane namely; the Letlhakane public library, bus rank, and the street as indicated in Figure 5. However, young people perceived private shopping complexes as forming part of the public space and inevitable in public spaces.

Young people perceive the term public space differently. In Letlhakane, 50% of the respondents identified public space as a place of interaction or where people meet, 30% identified public space as free, open, and accessible places for everyone while 20% viewed public space as areas of recreation, refreshment, and relaxation. One of the respondents stated that they believe public spaces are places of interaction where different people from different walks of life meet, relax, and share common values and interests. In Gaborone, 44% of respondents believed public spaces to be places of recreation, refreshment, and relaxation, 30% identified public spaces as places of interaction or where people meet, while 26% viewed them as free, open, and accessible places for everyone.

10. The Quality of Public Spaces around CBD, Letlhakane

Figure 6 shows how Letlhakane youth rated the quality of public spaces in the CBD area. Most of the youth view the cleanliness and attractiveness of public spaces within Letlhakane CBD as poor. Young people showed common concerns such as poor sanitation and hygiene, limited toilet facilities, and poor waste management within the area, especially along the street which has limited street furniture.

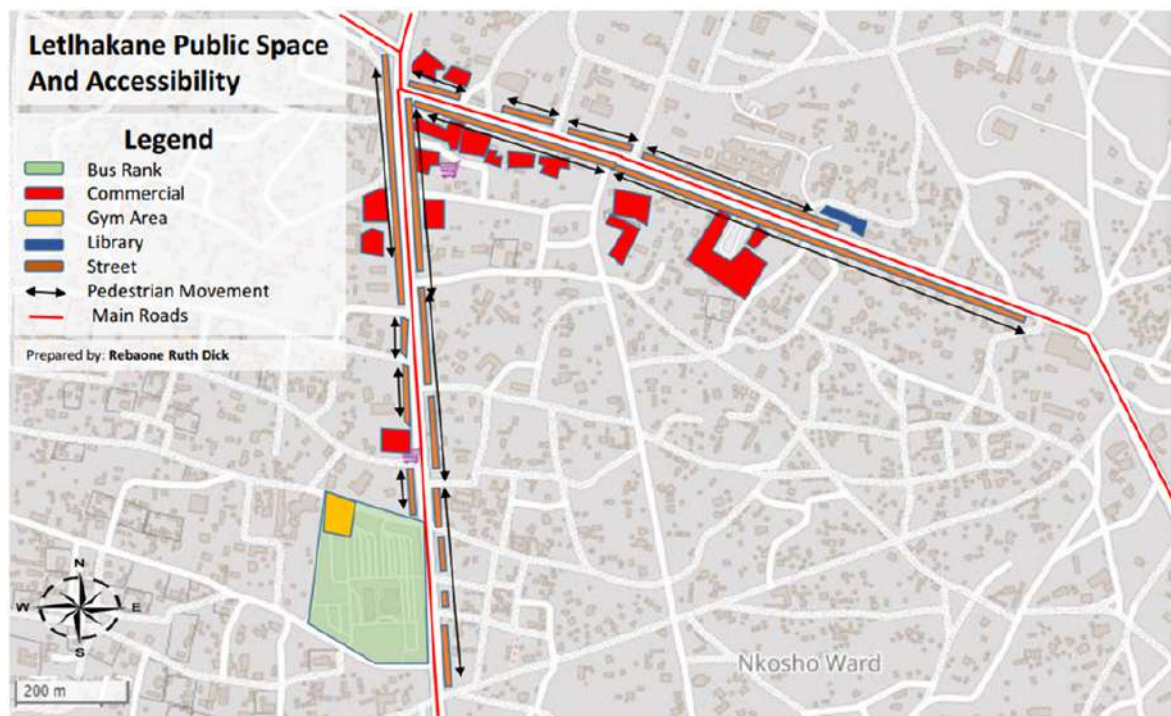


Figure 5. Letlhakane public spaces and accessibility (Dick & Mosweu, 2024)

Most of the youth rated the safety of public spaces within CBD, as average and good. Most of the respondents argued that Letlhakane generally has low crime rates; thus even the public spaces within the CBD area are safe. However, others indicated that although the aforementioned is true they do not feel safe and free, especially at night when there is little movement in the CBD area. More young people believe that the comfort of public spaces within CBD is poor as there are few places to sit and relax and no demarcated bicycle lanes and pedestrian walkways where people can walk without disturbance from vehicle movement.

Most youths view public space overall quality as poor and argued that public spaces around Letlhakane CBD do not cater to all users as they do not offer paraplegic facilities such as ramps, rails, and pattern mats for the blind. Some of the young people argued that although the public library has access to the internet and helps them conduct research and study, it is not convenient to use during weekdays as they spend most of their time at school during library hours. However, Letlhakane CBD is strategically placed at the village core along the main roads linking various locations and activities and many young people visit the bus rank area and library for various activities due to its proximity to local amenities as depicted in Figure 7.

Rating Of Quality Of Public Spaces In CBD, Letlhakane By Youth

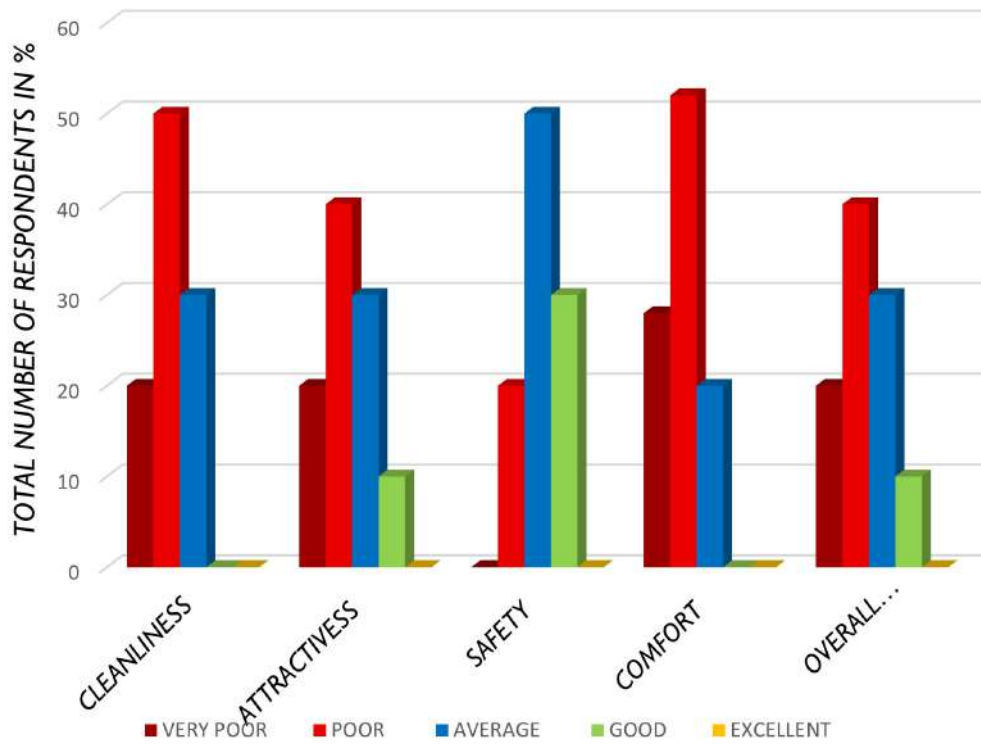


Figure 6. Rating of Quality of public spaces in Letlhakane CBD (Dick & Mosweu, 2024)

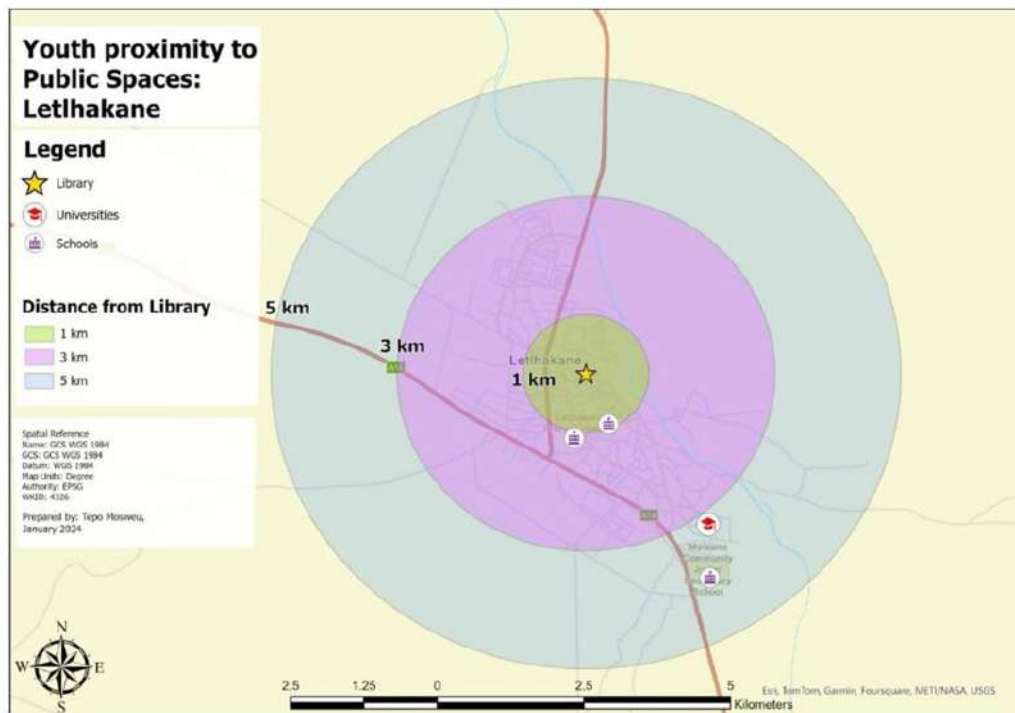


Figure 7. Youth Proximity to public spaces in Letlhakane CBD (Dick & Mosweu, 2024)

Although there are no continuously paved walkways along the area, the youth use the road reserve area as a walkway corridor as depicted in Figures 8, and 9. The youth use a variety of transportation options such as taxis, private vehicles, walking, and bicycles to get to and through the space as seen in Figures 10 and 11. The space however does not fully cater for people with special needs as there are no ramps or rails and few paraplegic parking bays.



Figure 8. (left) Pedestrian walking along walkway strip CITATION Dic24 \l 1033 (Dick & Mosweu, 2024)
Figure 9. (right) Pedestrian walking along walkway strip CITATION Dic24 \l 1033 (Dick & Mosweu, 2024)



Figure 10. (left) Motorcycling along the walkway strip (Dick & Mosweu, 2024)
Figure 11. (right) Pedestrian walking along walkway strip CITATION Dic24 \l 1033 (Dick & Mosweu, 2024)



Figure 12. (both) Refuse bins in Letlhakane CBD; Bus Rank (Dick & Mosweu, 2024)

The spatial planners of the local authority indicated that the area has been facing challenges of underutilised and mismanaged public spaces. Informal traders are predominant users of these spaces especially in the CBD where most services and people are concentrated. This has caused a lot of consternation and alarm to some settlement-dwellers and business owners as some feel the informal traders have degraded these areas and disrupted the street facade. The planners further indicated that they acknowledge public spaces role in youth health and mental well-being, hence they have guidelines for the operation, maintenance and management of un-serviced open spaces in line with the Town and Country Planning Act of 2013 that they have recently used to tender out some of the open spaces to young entrepreneurs in the village to develop, improve, and uplift the face of these spaces.

Sitting areas are only found at the bus rank area, and are usually used by young people for meet-ups and waiting for transit buses, minibuses, and taxis. The space has limited flushable toilets which are located at the bus stop and the village council which is located in the vicinity of the public library. The bus rank was the only place noted to have refuse collection areas although most were damaged as depicted in Figure 12.

It was realised that public open spaces in the Letlhakane village are frequently abused as dumping sites and most are not yet developed and in some instances breed negative implications such as crime. During an interview with environmental and public health experts in the local authority, they articulated that the area and the entire village are challenged with littering as there is no landfill in the village. They also articulated that the village experiences high wind speeds that normally cause sand storms and scatter the litter from refuse cages and the dumping sites.

11. Youth engagement in Letlhakane CBD public spaces

The youth stipulated that they usually go for recreational activities at farm gardens on the outskirts of the village's built-up area, but often visit the CBD area for various activities.

Figure 13 shows various activities the youth identified in the CBD public spaces.

Most of the youth identified commercial activities as dominant activities in public spaces.

Some identified meet-ups as the most common activities, followed by sports activities and cycling around the area. Some of the youth identified photography, social events, and exhibition shows as one of the activities they engage in within the space. The last activity identified was research and studying at the library through study groups, studying, and access to free Wi-Fi and computers. Some respondents argued that public spaces in Letlhakane do not offer a variety of choices and that most of the entertainment that youth engage in is usually at bars or liquor restaurants, while open spaces and other public spaces are under utilised and mismanaged.

Most of the youth are engaged in commercial activities such as buying and selling vegetables, and other mini essentials along the walkway corridor and the bus rank area as depicted in Figure 14. The most dominant activity in this area is street vending which the youth in this area use to improve their lifestyles through various businesses as shown in Figures 15, 16, 17 and 18.

The youth use the library for studying, research and surfing the internet as it has free Wi-Fi network. The youth usually go to bus ranks where there are notable sitting areas by the buses and the waiting room. The bus rank also has an outdoor gym and open space which youth visit for exercising and socialising at fitness clubs as shown in Figure 19.

Activities identified by youth in CBD public spaces, Lethakane

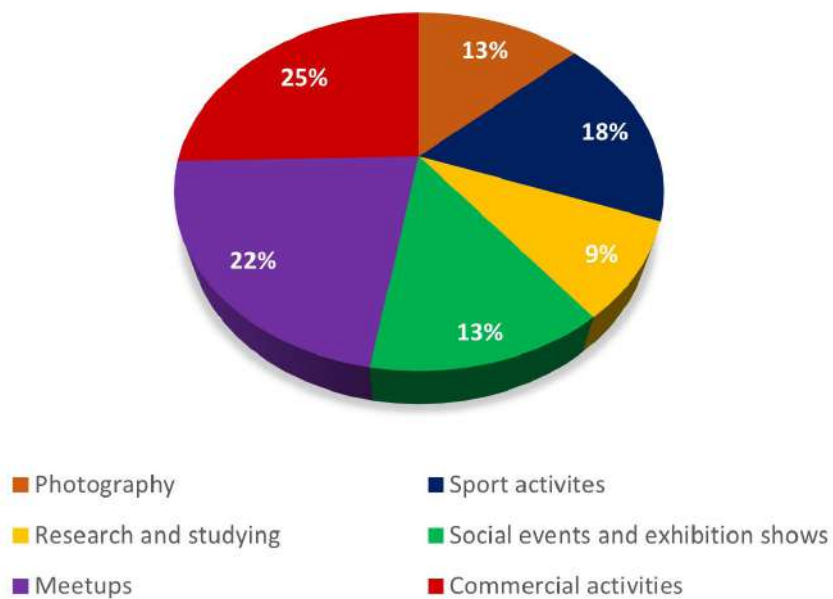


Figure 13. Activities identified by youth in Lethakane CBD Public Spaces (Dick & Mosweu, 2024)

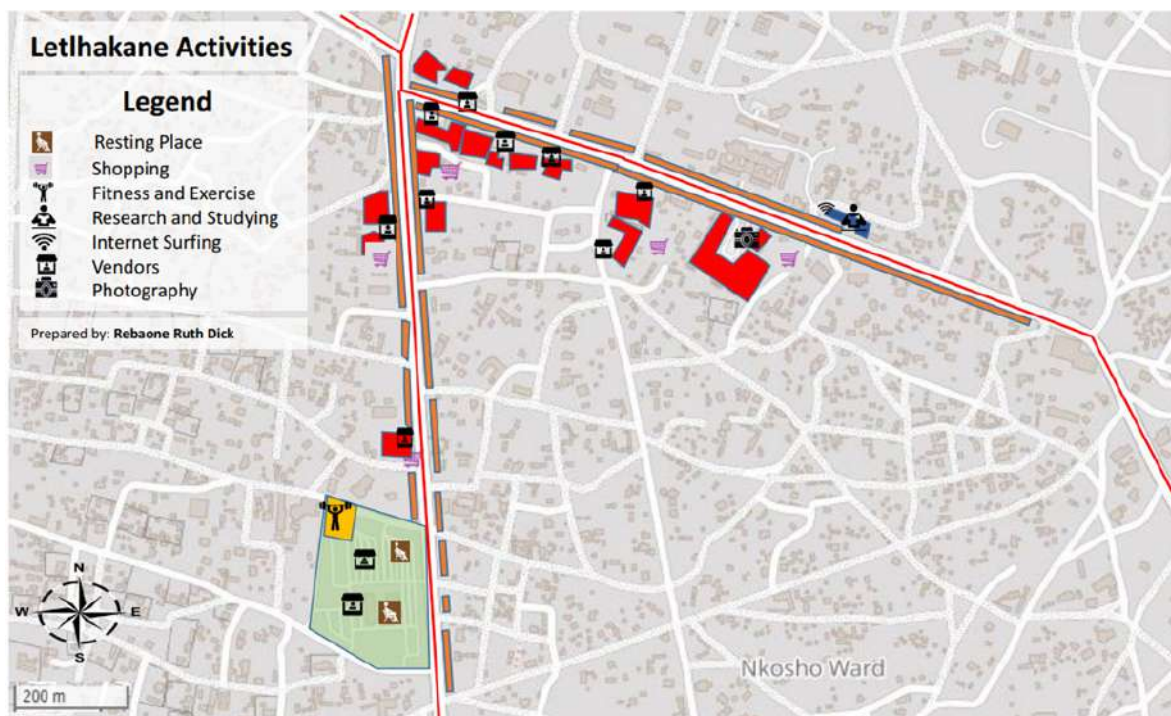


Figure 14. Activities in Lethakane CBD public spaces (Dick & Mosweu, 2024)

12. Quality of public spaces around Main Mall, Gaborone

The youth of Gaborone had various perceptions and thoughts about the quality of Main Mall public spaces as shown in Figure 20. The youth argue that the cleanliness and attractiveness of the public spaces are average and good and indicated that waste management in the area has improved over time as there are accessible refuse areas within the space. The majority of the youth mentioned that Main Mall has been improving especially after hosting the Forbes under 30 Summit Africa, which not only uplifted the face of the plaza but also played a critical role in societal engagements, interactions, and economic development for the youth in Gaborone and the country together with young internationals.

Most of the youth rated the safety and comfortability of public spaces within Main Mall in Gaborone as good as it has enough sitting areas with shades where they can relax and meet others and low crime rates due to the police station in the vicinity. However some argued that the safety in the main mall space is poor and average respectively as they do not feel safe due to the city's generally high crime rates. Some showed concern that the space has limited access to some facilities such as toilets, which poses as inconvenience.



Figure 15. (left) Street vending CITATION Dic24 \l 1033 (Dick & Mosweu, 2024)
Figure 16. (right) Street vending CITATION Dic24 \l 1033 (Dick & Mosweu, 2024)



Figure 17. (left) Street vending (Dick & Mosweu, 2024)
Figure 18. (right) Street vending CITATION Dic24 \l 1033 (Dick & Mosweu, 2024)



Figure 19. Outdoor gym (Dick & Mosweu, 2024)

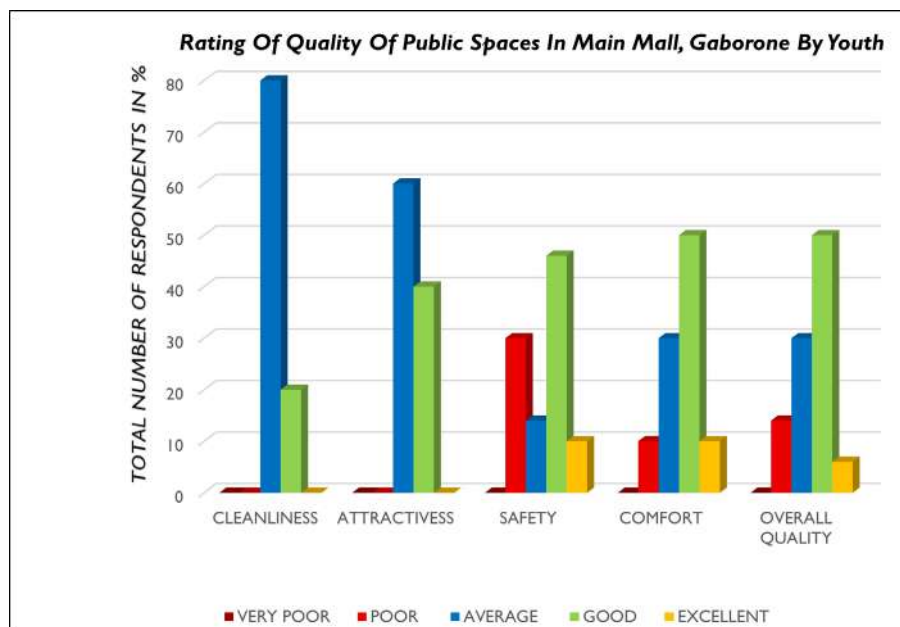


Figure 20. Rating of Gaborone Main Mall Public spaces by youth (Dick & Mosweu, 2024)

Most youth noted that due to high unemployment rates in the country, youth entrepreneurs identify this public space as a place to display their talents and businesses that build strong networks and social interactions. The majority of the respondents indicated that the space does not entirely cater to everyone, especially people with special needs, and that it only provides for one type of disability by providing ramps, rails, and paraplegic parking bays for those using wheelchairs while disregarding other disabilities. The Main Mall is strategically placed at the city core, linking various locations and activities as shown in Figure 21. Most young people visit the area as it is within walking distance of most tertiary institutions and schools. Occupants from adjacent buildings and amenities also use the space for various activities, especially during pick-up hours (lunch and after working hours).

It is easy to get to and through the space through various routes as depicted in Figure 22. The youth use a variety of transportation options such as taxis, private vehicles, walking, and bicycles to get to and through Main Mall plazas as seen in Figure 23. The space caters for pedestrian movements through continual paved walkways that connect the space and other adjacent locations and buildings. The space also has several parking bays with paraplegic parking bays and ramps from the parking bays to the pedestrian walkways and adjacent buildings.

The observatory survey showed that the space has various sitting areas convenient and comfortable to its users, especially the youth. The space has an attractive image dominated by its public art and cleanliness, the space has refuse collection areas and bins around as shown in Figure 24.

13. Youth engagement in main mall Gaborone

The youth indicated that Main Mall area has numerous services that they normally need on a day-to-day basis as shown in Figure 25.

Most youth identified meet-ups and relaxation as the most common activities they engage in, followed by attending entertainment shows such as Forbes under 30 Summit, and other seasonal shows. The youth also identified eating out in both restaurants and outdoor eateries around the main mall and attending social events and campaigns such as clean-up campaigns, health and fitness campaigns. The youth also identified photography, videography, exhibition activities, and commercial activities as one of the activities that are profound in the space. Some respondents identified showcasing artefacts and skateboarding which youth however indicated that they normally do at one of the parking lots but are often restricted from such.

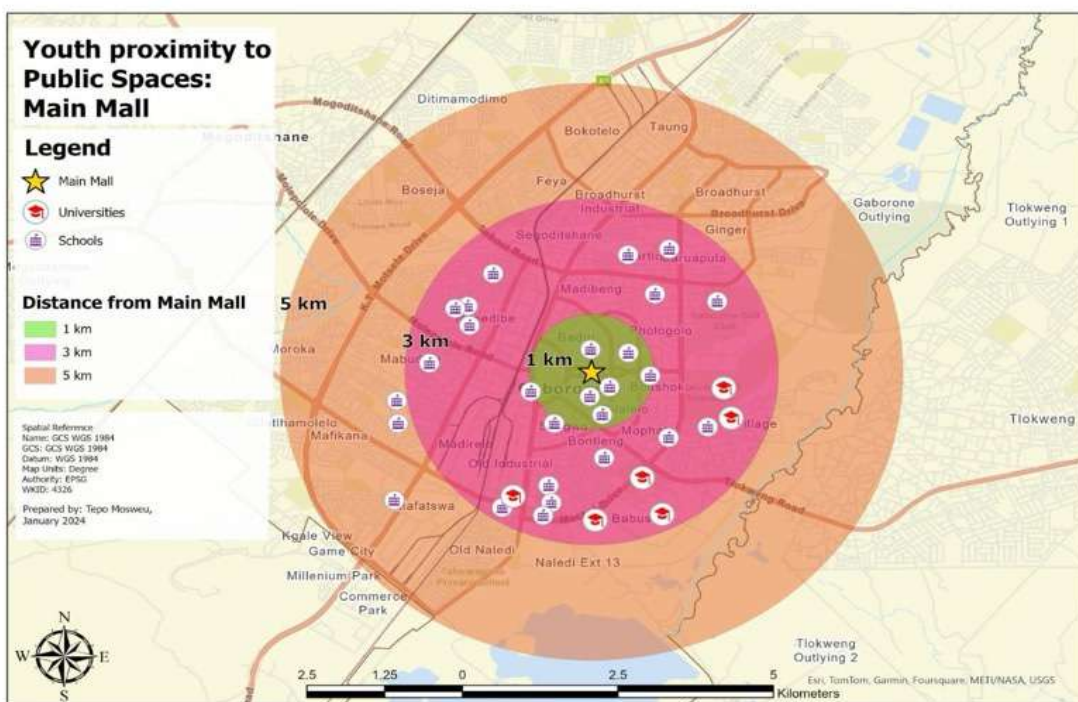


Figure 21. Youth proximity to public spaces in Gaborone Main Mall (Dick & Mosweu, 2024)

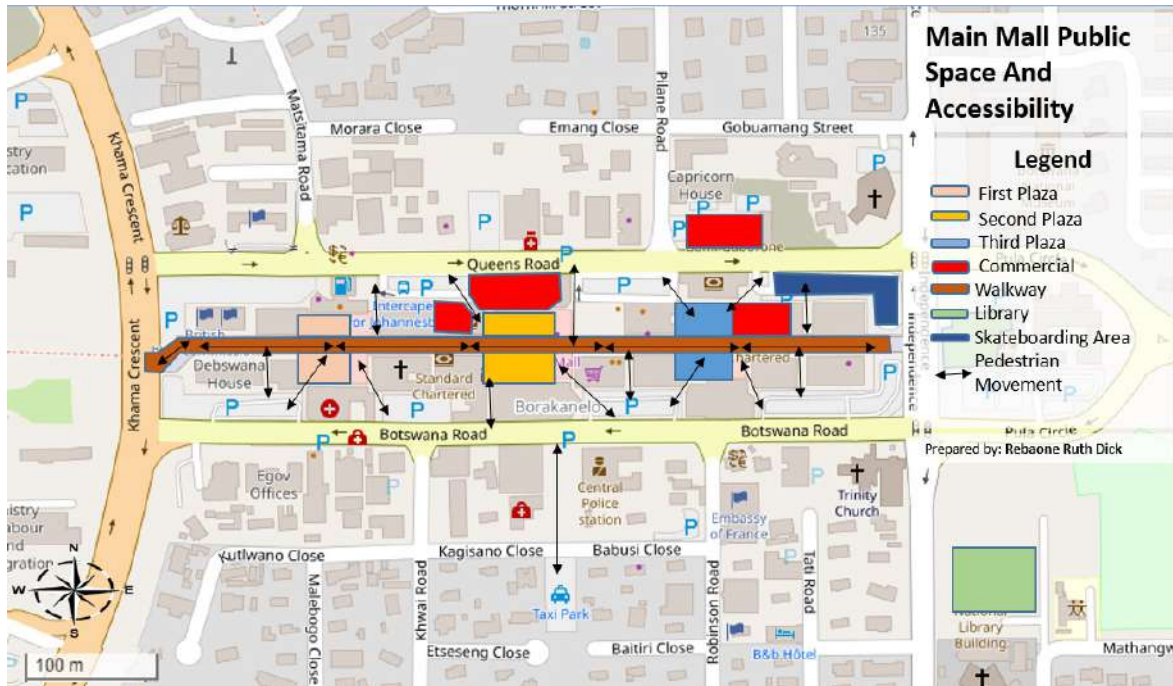


Figure 22. Activities in Gaborone Main Mall public spaces (Dick & Mosweu, 2024)

Public spaces in Main Mall offer diverse activities such as, vending, photography, videography, outdoor eateries, resting and meet ups as well as skateboarding as depicted in Figure 26.

Young people use the parking lot area behind the commercial establishments depicted in Figure 26, for skateboarding and shooting videos as it has rich public art on the walls to depict the activities happening around the area. It was noted that Main Mall has a flea market where dynamic activities are carried out. The youth were most concentrated on the third plaza popularly known as the ‘Diamond Square’, where they showcase their artefacts and take photographs as shown in Figures 27 and 28. The plaza also has vendors who have outdoor eateries that serve various food and refreshments as shown in Figures 29 and 30.

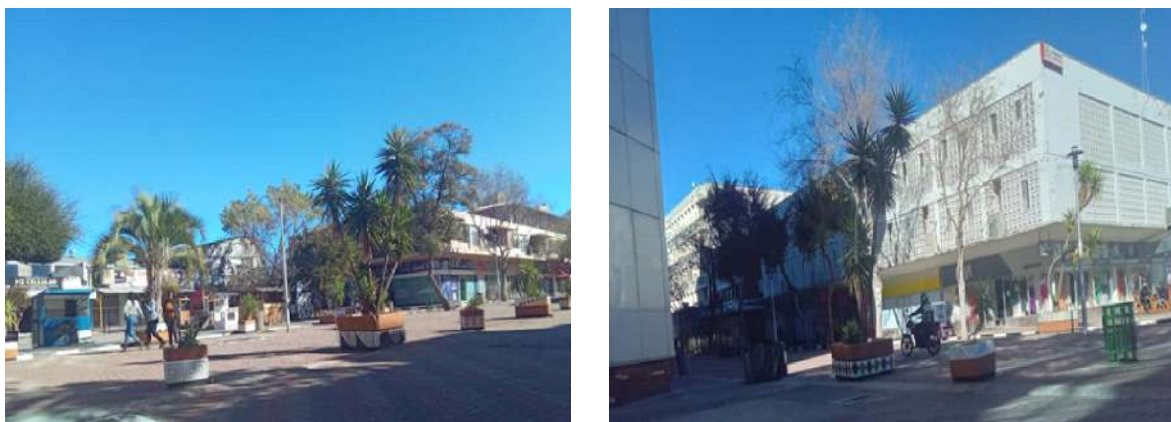


Figure 23. (both) Pedestrian movement and Motorcycling along Gaborone Main Mall
CITATION Dic24 | I033



Figure 24. Refuse bins around Main Mall public spaces (Dick & Mosweu, 2024)

Due to high unemployment rates in the country, youth entrepreneurs identify this area as an opportunity to display their talents, businesses, and at the same time, build strong networks and social interactions. Main Mall public space has a diverse and interactive feel where people usually meet and socialise. Young people were noted to be meeting in groups in this area and carrying out different activities. The plaza has sitting areas that are strategically placed with shading and youth use these for their ‘meet ups’ and to relax; hence, the youth find it comfortable.

The second plaza is where most entertainment shows and social events are carried out. The space on the walkway strip is dominated by strategically-placed vendors near the commercial complexes who sell goods such as traditional food, attires, vegetables, etc. (Figures 33 & 34).

Activities Identified By Youth In Main Mall Public Spaces, Gaborone

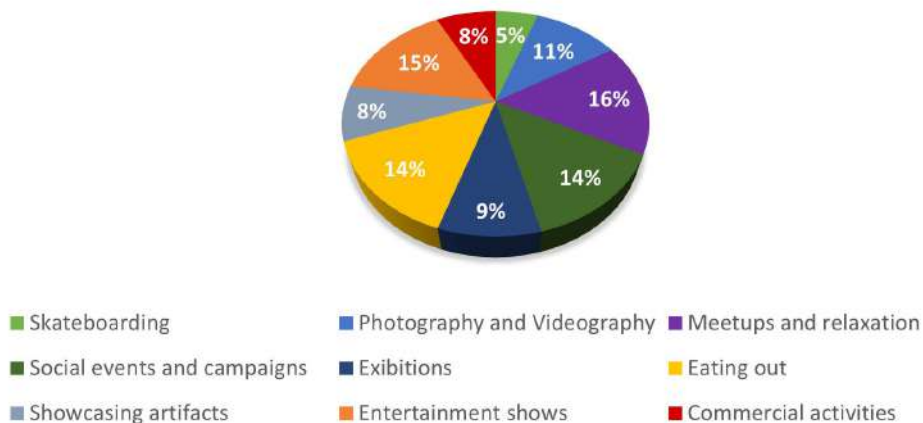


Figure 25. Activities identified by youth in Main Mall Public Spaces (Dick & Mosweu, 2024)

The first plaza has a sculpture at its centre that carries the cultural identity of Botswana as shown in Figure 35, and most people get photographs there and use the area for relaxation as it has seating areas and shade. Along the walkway corridor there are seating areas that have public art used for relaxation and photography, as shown in Figure 36. Public art was also noted on one of the pavements on the walkway strip popularly known as 'the Walk of Fame.'

In Letlhakane, the majority of respondents favoured private companies for the management of public spaces due to their financial capacity. However, 24% argued for community management, 20% suggested non-governmental organisations and 20% suggested local authorities as better placed to manage public spaces. In Gaborone, partnerships were preferred, while 24% suggested Non-Governmental Organisation management. A total of 20% of respondents favoured Local authorities for revitalising public spaces, while 16% preferred private companies for better aesthetics and activities.

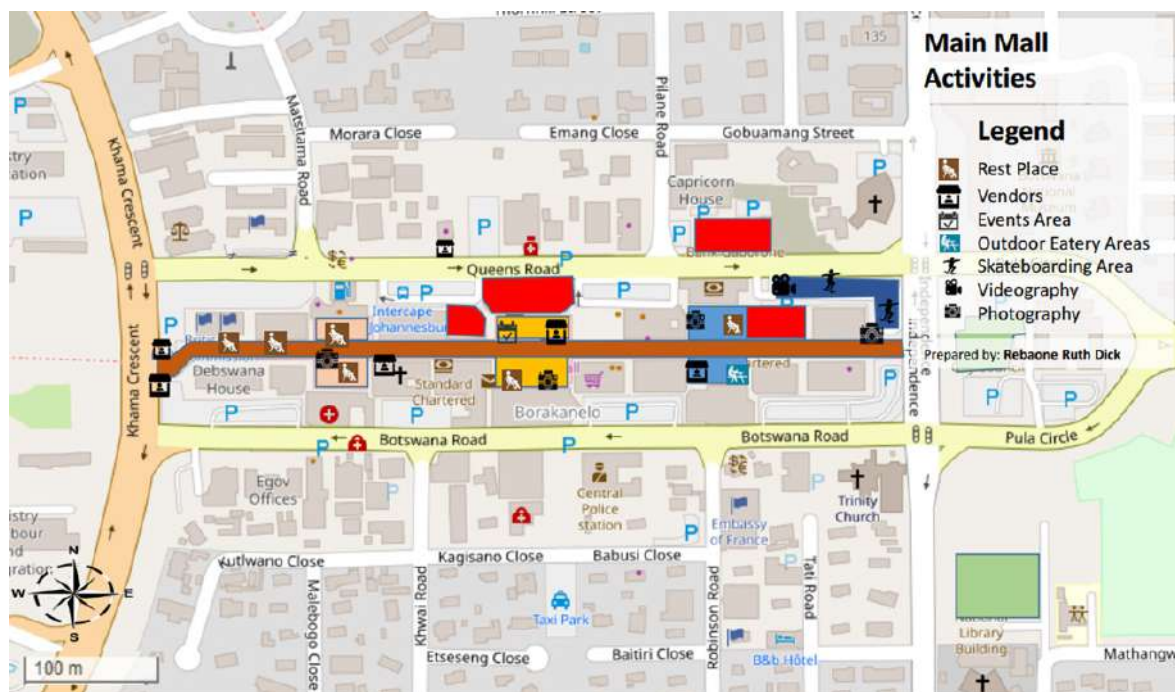


Figure 26. Activities in Gaborone Main Mall public spaces (Dick & Mosweu, 2024)

14. Recommendations and conclusion

Public spaces have always existed in Botswana but their functions and significance continued to wane due to colonisation, urbanisation and globalisation effects; however, they are gradually getting back their recognition as society is increasingly shaping public space functions and uses. Although upgrading existing spaces can be challenging due to financial constraints and bureaucratic practices, public spaces and entertainment areas are crucial in addressing the needs of youth in settlements. It is important to view public spaces as a remedy that can help improve the urban realm and create sustainable habitable places. Addressing special needs and promoting street vending and hawking is essential in the urban public realm. Encouraging young entrepreneurs and incorporating them in policy decision-making can create enabling environments for businesses in these public spaces. It is also clear that there is a need for a collaborative approach of local authorities with the



Figure 27. (left) Showcasing of artefacts CITATION Dic24 \ I 033 (Dick & Mosweu, 2024)
Figure 28. (right) Showcasing of artefacts CITATION Dic24 \ I 033 (Dick & Mosweu, 2024)



Figure 29. (left) Outdoor eatery CITATION Dic24 \ I 033 (Dick & Mosweu, 2024)
Figure 30. (right) Outdoor eatery CITATION Dic24 \ I 033 (Dick & Mosweu, 2024)



Figure 31. (left) Displays to promote businesses CITATION Dic24 \ I 033 (Dick & Mosweu, 2024)
Figure 32. (right) Displays to promote businesses CITATION Dic24 \ I 033 (Dick & Mosweu, 2024)



Figure 33. (left) Street vending (Dick & Mosweu, 2024)
Figure 34. (right) Street Vending: CITATION Dic24 V1033 (Dick & Mosweu, 2024)



Figure 35. (left) Sculpture for cultural heritage CITATION Dic24 V1033 (Dick & Mosweu, 2024)
Figure 36. (right) Sitting area with public art CITATION Dic24 V1033 (Dick & Mosweu, 2024)

community, private companies, and NGOs to help manage, monitor, and evaluate public spaces as local authorities have financial constraints to do so. There is also a need to provide varied public spaces with unique activities to lure people to these spaces and help express individual and shared lived experiences within a community. Public art and cultural heritage has been utilised to revamp these spaces.

There is a need for more evidence-based policy interventions with youth at the forefront that will promote the historical and cultural sense of public spaces in Botswana. Green infrastructure and technology should be used to reduce the effects of climate change, lower the rates of psychological issues and poor health, and improve the economic growth of Botswana through investment and reinforcement of the tourism sector. This study experienced a few challenges and these include a lack of recent previous research studies on public space impact on youth health and mental well-being, limited statistical measurements, time constraints, and limited research resources. This limited the amount of data collected, hence, there is a research gap that needs to be filled relating to public spaces in Botswana. Although data from recent documentaries from the African context were used to try to bridge this shortfall this necessitates longitudinal studies on psychogeography to assess the impact of the geographical environment on behavioural patterns in Botswana. Emphasising public spaces in built environments and academia can revitalise urban areas, promote health, and improve economic significance in a globalising world.

Acknowledgment

The authors would like to thank everyone who participated and contributed to this research. Both authors extend their gratitude to all peer reviewers for their insightful comments and suggestions which contributed to this work. Miss Dick would like to thank her co-author for his support, and dedication to this article. She would also love to show appreciation to her mentor, Dr. C. O. Molebatsi for his support over the years and for contributing to her research skills and knowledge in the built environment and urban planning issues. Mr. Tepo Mosweu shows appreciation to Miss Rebaone Ruth Dick for her insightful ideas and keen assessment of public spaces; she has been the driving force on this work.

References

- Abbott-Chapman, J. & Robertson, M. (2015) 'Youth leisure, places, spaces and identity' in *Landscapes of leisure: Space, place and identities*. London: Palgrave Macmillan UK.
- Amin, S. (2023) 'Globalisation and mental health: is globalisation good or bad for mental health? Testing for quadratic effects', *Health Economics, Policy and Law*, 19(1), pp. 1-6.
- Anastasiu, B. (2021) The pivotal role of public spaces in successful urban design. [Online] Available from: <https://www.chapmantaylor.com/insights/the-pivotal-role-of-public-spaces-in-successful-urban-design> [Accessed 13 January 2024].
- Blignaut, D. (2020) TPE420 Research report- Reimagining the African Urban space: An Explorative Study on nature, use and design of African urban public spaces. Pretoria: University of Pretoria.
- Brooksl, M. J. et al. (2022) 'Building a community based mental health program for adolescents in Botswana: Stakeholder feedback', *Community Mental Health J*, 58(6), pp. 4-6.
- Carmona, M. (2019) 'Principles for public space design, planning to do better', *Urban Design International*, Volume 24, pp. 47-59.
- Clerk of the national Assembly, Barbara N. Dithapo (2013). *Town and Country Planning Act*. Gaborone: Parliament of Botswana.
- Collins, P.Y., et. al. (2023) 'Making cities mental health friendly for adolescents and young adults', *Nature*, 627(8002), pp. 137-141.
- Costa, C. S., Batista, J. S. & Menezes, M. (2021) 'What happens when teenagers reason about public open spaces?', *Lessons learnt from co-creation in Lisbon*. *Cidades. Comunidades e Territórios*, Volume 43.
- Debord, G. (2021) *The society of the spectacle - English edition*. s.l.: Unredacted Word, First Cambridge.
- Dee, M. & Crane, P. (2001) 'Young people, public space and new urbanism', *Youth Studies Australia*, 20(1), pp. 11-18.
- Dick, R. R. & Mosweu, T. K. (2024) 'An Empirical Case Study on Public Space and Youth Health and Mental Well-being in Botswana Cities and Major Urban Villages', *The Journal of Public Space*.
- Diouf, M. (2003) 'Engaging Postcolonial Cultures: African Youth and Public Space', *African Studies Review*, 46(2), pp. 1-4.
- Duivenvoorden, E., Hartmann, T., Brinkhuijsen, M. & Hesselms, T. (2021) 'Managing public spaces—A blind spot of urban planning and design', *Cities*, Volume 109, p. 103032.
- Fleckney, P. & Bentley, R. (2021) The urban public realm and adolescent mental health and well-being: A systematic review. *Social Science and Medicine*, Volume 284, p. 114242.
- Gray, D. & Manning, R. (2022) 'Constructing the places of young people in public space: Conflict, belonging and identity', *British Journal of Social Psychology*, 61(4), pp. 1400-1417.
- Home, R. (2021) 'African Urban History, Place-Naming and Place-Making' in: H. Robert, ed. *Land issues for Urban Governance in Sub-Saharan Africa*. Cham: Springer Nature Switzerland AG,

pp. 317-337.

- Khalifa, S. I., et al. (2022) 'Young people's preferences in public spaces', Emerald insight.
- Magamelal, M. R. et al. (2021). 'COVID-19 consequences on mental health: An African perspective', South African Journal of Psychiatry, pp. 1-2.
- Mateo-Babiano, I. & Lee., G. (2020) 'People in place: Placemaking fundamentals', Placemaking fundamentals for the built environment. Springer, pp. 15-38.
- Minister of Youth, Sports and Culture (2023) Revised Youth Policy of Botswana, Gaborone: Minister of Youth, Sports and Culture.
- Moreira, S. (2021) What Is Placemaking? [Online]. Available from: <https://www.archdaily.com/961333/what-is-placemaking> [Accessed 5 January 2024].
- Morobolo, S., Molebatsi, C. & Moatshe, O. (2018) 'Cultural Identity and Physical Planning in Botswana - Challenges and Opportunities'. Botswana Journal of Technology, 23(1), pp. 39-60.
- Mosha, A. (2014) The use and misuse of urban public open spaces in Botswana: case study. Gaborone, Botswana, Gaborone: Sustasis.net.
- Mpemba, C. C., Mahamat, M. F. & Geingos, M. (2023) Youth Mental Health Toolkit on 5 Emerging Issues in Africa, s.l.: African Youth Union Envoy.
- Njokweni, F. (2015) 'Public space as a generator of growth in African cities', UCLG Peer-Learning, pp. 1-40.
- Project for Public Spaces. (2023) What is placemaking? What if We Built Our Communities Around Places? [Online]. Available at: <https://www.pps.org/article/what-is-placemaking> (Accessed 19 December 2023)
- UNFPA (2024) Youth leadership & Participation [Online]. Available at: <https://botswana.unfpa.org/en/topics/youth-leadership-participation-0> (Accessed 12 January 2024)
- United Nations Youth (2013) Definition of Youth, New York: United Nations Department of Economic and Social Affairs (UNDESA).
- Urban Safety reference group. (2020) 'Public Space and Urban Safety', Urban Safety Brief. 1(1), pp. 1-7.
- Valdes, L. (2022) Getting public space right: transforming society from the ground up. [Online]. Available at: <https://www.metropolis.org/blog/getting-public-space-right-transforming-society-ground> (Accessed 18 12 2023)
- Vesterhus, T. (2015) Youth and their needs within Public Space. Nairobi: UN-Habitat.
- Watson, V. et al. (2009) 'Shaken, shrinking, hot, impoverished and informal: Emerging research agendas in planning', Progress in Planning, 72(4), pp. 195-250.

ANNEXURE (I)

Questionnaire to Youth

This questionnaire has been prepared to assist in obtaining research data for a research article titled: ***An Empirical Case Study on public space and Youth Health and mental well-being in Botswana cities and Major Urban Villages.***

NB: It should be noted that the information gathered is for research and policy intervention purposes and not for any other reason, strict confidentiality shall be considered and adhered to.

Section A

Please tick where appropriate.

Age: 15-18yrs 19-24yrs 25-30yrs 31-35yrs
Sex: Female Male Occupation: _____

Section B

1. What do you believe/ think public spaces are?

2. How often do you visit public spaces and what activities do you do there?

3. Which health and mental issues do you think the youth in your locality are more faced with?

4. What essence or role do you think public spaces have on youth health and mental health development?

5. For each question below, tick the response that best describes how you feel about the following statements/ questions.

	Very poor	Poor	Average	Good	Excellent
How would you measure the cleanliness of public spaces in your locality?					
How would you rate the attractiveness and aesthetics of public spaces in your locality?					
How would you measure the safety of public spaces?					
How would you rate the overall quality of public spaces?					

Give reasons for the ratings given in question 5 a, b, c, and d.

6. Do you think public spaces in your locality cater to everyone?

Yes

No

Give reasons for the answer.

7. Do you think public spaces in your locality give a variety of choices and activities for the youth? Please tick where appropriate.

Yes

No

Give reasons for your answer.

8. Which facilities and improvements can/should be made to enhance youth engagement with public spaces in your locality and Botswana?

9. In your view, who would best manage public spaces in your locality? Please tick where appropriate.

Local Authority / City Council

NGO's

Community

Other

Give reasons for your answer.

10. What role do you think you should play/had played in the development of public spaces?

11. Any other comments and ideas?

Thank you!!!

ANNEXURE (II)

Interview Questions to Key Experts in Local Authority

These interview questions have been prepared to assist in obtaining research data for a research article titled: **An Empirical Case Study on public space and Youth Health and mental well-being in Botswana cities and Major Urban Villages.**

NB: It should be noted that the information gathered is for research and policy intervention purposes and not for any other reason, strict confidentiality shall be considered and adhered to.

Location: _____

Designation: _____

1. What do you believe/ think public spaces are?

2. Which health and mental issues do you think the youth in your locality are more faced with?

3. What role do you play/had played in the development of public spaces?

4. Which challenges have been faced in the development and management of public spaces by the local authority and your profession?

5. What do you think could be done to improve the state, development and management of public spaces and their engagement with the youth as well as to curb the challenges outlined above?

6. Which opportunities are there in relation to public spaces and youth health and mental well-being?

7. Any other comments?

Thank you!!!

ANNEXURE (III)

Question Schedule

Location: _____

Category	Measure	Yes	No	Additional Comments
Accessibility -Linkages -Walkability -Correctness -Convenience	Is it easy to get to and through the area?			
	Do adjacent buildings or locations' occupants (especially youth) use the space?			
	Does the space function for people with special needs or disabilities?			
	Is it pedestrian-friendly; are there sidewalks linking the area?			
	Do people use a variety of transportation options?			
Activities -Uses -Celebration -Usefulness -Sustainability	What kind of activities are done in the space?			
	Are there more young people than elderly people?			
	Which parts of the area are used more and the least by young people?	-	-	
Comfort -Safety -Good places to sit -Attractiveness -Cleanliness	Are there enough places to sit and are they utilised by youth?			
	Does the space offer photo opportunities for young people?			
	Are there enough WASH facilities?			
Sociability -Friendliness -Interactivity -Diversity	Are there young people in groups?			
	Do young people meet their various people there?			

Placemaking and People-Making. The Interplay between Youth Activities and Built Environment Design in a Philippine Public Park

Ferdinand Isla III, Sandra Samantela

University of the Philippines Los Baños

Department of Community and Environmental Resource Planning, College of Human Ecology

fgisla@up.edu.ph | sssamantela@up.edu.ph

Abstract

This study aimed to understand the interaction between young people and the built environment of Taal Park, a public park located in the poblacion (central business district) of a historical town in Batangas, Philippines. With a renewed appreciation of public spaces in the post-COVID-19 era, this work builds on the promising opportunity for people to collectively claim the right to a (city) space – and to continuously reshape it through time. Employing a qualitative case study research design, the study involved the conduct of a survey and unstructured non-participant observation. Data was then analysed through complementary descriptive and thematic analysis. The results of the study highlighted the positive impact of Taal Park on youth well-being through effective design that facilitates and encourages social interactions. The nexus between placemaking and people-making in this context illustrates how the built environment design and young people's use of public spaces are mutually reinforcing. However, limitations in terms of the planning systems that are currently in place further highlight the need for more meaningful youth engagement mechanisms. Future research should continue utilising a transdisciplinary approach to deepen the knowledge base on public space in Global South contexts focussing on exploring effective youth engagement strategies in urban planning. Overall, ensuring that youth have a substantive role in shaping these environments can lead to more inclusive, dynamic, and vibrant public spaces.

Keywords: youth, placemaking, public spaces, built environment design, sustainable development

To cite this article:

Isla, F. I. and Samantela, S. (2024) "Placemaking and People-making: The Interplay Between Youth Activities and the Built Environment Design in a Philippine Public Park", *The Journal of Public Space*, 9(2), pp. 109–128. doi: 10.32891/jps.v9i2.1714.

This article has been double blind peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

I. Introduction

“Cities have the capability of providing something for everybody, only because, and only when, they are created by everybody.”

– Jane Jacobs in *The Death and Life of Great American Cities* (1961)

The publicly accessible physical environments within our cities have always been venues for human experience, and linking youth development to the public realm is depicted as a “fundamental need” in today’s world (Owens, 2020). Ultimately, public spaces can and should support the social and psychological development of young people in the communities they aim to cater – by serving as spaces for socialisation and cultivating meaningful relationships as they unconsciously develop a sense of social responsibility and belonging before gearing towards adulthood (Ruel et al., 2018; Owens, 2020). Built environments, in general, influence human behaviour in various ways. They can facilitate relaxation and recreation, provide or constrain opportunities for physical activity, and even encourage or discourage healthy diets. For this reason, presenting more opportunities for healthy behaviours through restructured and well-planned built environments has been considered an effective approach to improving health outcomes among people (Wilkie et al., 2018).

The success of public spaces in fulfilling their purpose does not solely lie in the hands of the architects and planners who have designed them. In the long run, it also relies on the people continuously adopting, using, and managing such spaces. As Worpole and Knox (2007) described it: “people make places, more than places make people.” From a more dynamic perspective, people continuously shape, experience and contribute to these spaces through ‘placemaking’ (Mateo-Babiano & Lee, 2020). As opposed to the idea that public spaces are primarily defined in spatial terms and their physical form, there is a vast literature saying that such spaces are, in fact, co-produced, and only come into being once activated by the dynamic presence and movement patterns of people (Worpole & Knox, 2007). Consequently, the idea of placemaking puts people at its core to continuously generate positive relationships in, to, and with the place (Mateo-Babiano & Lee, 2020). Placemaking and the sociability of public spaces have long been at the centre of urban studies; however, difficulties remain in tangibly identifying, defining, and evaluating the non-material interrelationships that shape the physical space (Mahmoud, 2022), as well as how these interrelationships influence people.

People of all ages have experienced extraordinary challenges during the coronavirus-19 disease (COVID-19) pandemic, altering their physical activity behaviours and patterns (Gu et al., 2022). This led to a renewed appreciation of public spaces in the post-COVID-19 pandemic, especially among youth after the strict mobility restrictions to reduce transmission of the disease. Overwhelming evidence points out that a significant proportion of children and youth around the world have faced mental health struggles in the course of the pandemic due to key factors such as social isolation from their peers and significant adults (Collin-Vezina et al., 2022). Meanwhile, much research has also proved that public open and green spaces provide a wide array of social, economic, and environmental benefits to individuals and communities as a whole (ASSURE, 2019). Parks, for instance, offer a multi-sensorial environment that has been known to stimulate and improve people’s mental health (Sia et al, 2020). Such context, then, offers a promising opportunity for people to collectively reclaim our “right to the city” through efficient use of public spaces. This concept, originally proposed around sixty years ago by French

sociologist Henri Lefebvre, encompasses everyone's right to access the resources of the city, to participate in what a city has to offer, and most importantly, the freedom to change and reinvent it through such access and participation (Collins & Stadler, 2020). Indeed, public spaces in our cities are a common good that are meant to be open, inclusive, and democratic (Bravo, 2017).

Building on this understanding, we looked into the interplay between the activities of young people and the built environment design of Taal Park, a public park located in the poblacion (central business district) of a historical town in Batangas, Philippines. This study also intends to contribute to the growing knowledge on youth and public spaces, especially in the context of Global South where there remains a significant gap both in research and applications of public space knowledge. More specifically, it aimed to: (1) describe the movement, behaviour, and activities of young people visiting the park; (2) determine how the park's environmental attributes influence the behaviour and activities of young people, and how these behaviour and activities, in turn, influence the park's environment, and; (3) articulate the insights and perspectives of young people as critical stakeholders of the public space. Toward this end, the relationship between youth and their built environment, as well as a brief overview of public spaces in the Global South, which informs the present study will first be discussed.

2. Youth and the built environment

Since the onset of the 21st century, public health scholars have taken an interest in the link between young people and their physical or built environments, mainly focusing on how the physical environment influences physical activity. It is well known that the physical environment can influence child development (Evans, 2006), effectively promoted by providing access to recreational facilities and transport infrastructure (Davison & Lawson, 2006). This can be attributed to how certain environmental features can either promote or hinder safe recreation and active transit, thus influencing physical activity or a sedentary behaviour (Poulsen et al., 2018). With that understanding, the attributes of built environments which influence habitual physical activity among children and adolescents have the potential to inform urban design (McGrath et al., 2015). A profound understanding of the relationship between youth and their built environment can only be facilitated through a transdisciplinary approach that extends beyond public health, and into the social sciences and humanities. Evidence suggests that low-income children are disproportionately exposed to multiple suboptimal physical and social environmental conditions which affect their physical and mental health, and may cause adverse developmental impacts (Evans, 2006; Andersen et al., 2022). Integrating perspectives from public health, sociology, urban planning, and other related disciplines is necessary to generate meaningful insights that can inform policy and practice.

Rapid urbanisation has turned many streets and neighbourhoods into hostile and inaccessible spaces for socialisation and play among children and the youth. This has led to youth's perceived vulnerability in such threatening environments, and eventually, their exclusion from the public realm (Torres, 2020). Thus, the importance of acknowledging their legitimate presence within public spaces is being emphasised, as greater numbers of children and youth reside in dense urban areas (Loebach, 2020). Citing an excerpt from Torres (2020): "*Redeveloping the streets to make them more child and youth-friendly is a fundamental condition of social and spatial justice, the optimisation of our collective resources,*

and the sustainability of our human settlements.” Indeed, prioritising the design and planning of urban spaces to cater to the needs of children and youth not only fosters social inclusion but also enhances community well-being.

It is necessary to understand how young people utilise and claim public spaces to enhance their provision, as researchers, designers, and public space managers can only design more inclusive spaces when they are well aware of the specific environmental features and conditions that aligns with the aspirations of young people (Loebach, 2020). Kolay (2020) suggests that the reality of public space can only be understood by considering its design guidelines, rules, and regulations, as well as the perspectives of its users. A top-down approach reflects the city’s vision for the space, while a bottom-up, user-centric study reveals the actual impacts of these guidelines and how people feel about the space. The integration of both approaches is crucial for creating public spaces that truly serve the needs of a community.

3. Public spaces in the Global South

Given the highly interrelated challenges that urbanisation and climate change brings forth, addressing issues related to lack of accessible and inclusive public spaces are most pressing for developing countries. The emergence of interest in thinking and practising urbanism from cities of the Global South – rather than just about them – has been emphasised recently (Inam, 2022). However, current research and actual applications remain limited (Pauleit et al., 2021); many scholars have been calling for reconsidering existing planning approaches to make it more relevant in the Global South context (Landman & Mady, 2022). According to Sahakian et al (2020), it is critical to underscore how such spaces provide the satisfaction needs of diverse people in these regions for architects, town planners, and local governments to be able to work on its sound provision. Ultimately, acknowledging the current pressures on public spaces within rapidly evolving cities, it becomes imperative to conduct more research to strengthening the argument to maintain the availability and accessibility of these assets (Tuhkani et al., 2021).

In terms of built environmental design in the Global South, Bradshaw et al. (2020) suggests that the balance between natural and built environments influences perceptions of security in local green spaces. It is highlighted that while nature is valued, people often prefer it to be less wild and more well-managed, as such spaces are perceived safer and more attractive. Urban Green Spaces (UGSs) in Kumasi, Ghana have also been found to be storing significant amounts of carbon above and below ground (Nero et al., 2017), indicating potential contribution to climate change mitigation, although often unaccounted for in urban planning and climate change policy. Recent research has provided evidence that noncommunicable disease burdens can be reduced through the use of UGSs in Global South megacities, such as Dhaka, Bangladesh (Labib et al., 2020). However, a study by Olfato-Parojinog et al. (2024) reveals that in the megacity of Manila, Philippines, increasing urbanisation has led to a drastic decrease in UGS per capita over nearly two decades, with all 17 cities in the region falling below the World Health Organization’s recommended levels. This decline underscores the urgent need to prioritise the establishment, management, and protection of UGS to enhance urban sustainability and health.

Beyond health and climate change, the concept of informality is also a recurring theme in the existing research about public spaces of the Global South because of its central

role. Beza & Hernandez-Garcia (2018) focus on how the public spaces within informal settlements of Bogota, Colombia have been created outside the formal planning processes, which offered an evolutionary step in understanding community-realised places. Similarly, Agheyisi (2023) shifts attention to the temporary use of urban vacant spaces, showcasing how informal sector activities utilise these areas and challenging traditional urban planning approaches. Kamalipour and Peimani (2019) on the other hand highlight how street trading has been essential to urban economies, and propose a typology to better integrate informal trading into urban planning. Finally, Kamalipour and Peimani (2022) demonstrated the potential of optimal urban design in less formal, congested cities to support sustainable mobility and vibrant public spaces. While recent research highlights the benefits of UGSs and informal public spaces in the Global South, there remains a gap in integrating these findings into formal planning frameworks in order to fully realise their potential for sustainable urban development.

In the Philippines adequate support for the provision of public open parks and green spaces has not been given the attention it deserves despite the recent attention to sustainable urban development (ASSURE, 2019). From a political perspective, Shatkin (2005) examined how globalisation has shifted urban spaces in the nation's capital, Manila, from state-driven utopian projects to privatised, profit-oriented developments. He argues that such an approach has failed to address the needs of the entire population, and has implications for democracy and urban development in the Philippines. Meanwhile, in a more localised setting of managing public open spaces (POS), a study by Chavez (2021) revealed that while local government units (LGUs) and various stakeholders in the country play active roles in maintaining POSs, these spaces suffer from issues such as rapid development, limited budgets, and diminishing public interest. Armas and Galano (2024) highlight the underutilisation of public spaces despite their significant contribution to local economies and tourism. Holistic urban management solutions such as design improvements and support for informal enterprises, were recommended to address these gaps. These findings shed light on the need to adopt more proactive measures to ensure the sustainability and effective management of local public spaces nationwide.

Public life in public spaces is a key element of a vibrant city culture. Spaces such as parks tend to be overdetermined in spatial terms but should allow for flexibility and change (Inam, 2022). Al Skaff (2022) argues that cities should be thought of in terms of processes, rather than just things, shaped by time and place. Throughout history, public space has been a place for unresolved struggles and conflicts that have been transmuted. Despite public space being perceived as 'democratic', it has been contested that public space has long been a site of exploitation, oppression, and prohibition for vulnerable groups, including the young, women, LGBTQIA+ community, elderly, homeless, and people with disabilities (PWDs) (Inam, 2022). Moreover, the inequitable distribution of inviting public spaces within cities has demonstrated various impacts on spatial justice. Therefore, there is a necessity to fully recognise the important role that public spaces play, and more importantly, the need to integrate considerations of people's well-being in urban planning, especially in the Global South (Tuhkani et al., 2021).

4. Case study: Taal park (Batangas, Philippines)

Taal is a small municipality with a land area of around 30 km², located in the province of Batangas within the Southern Tagalog region in Luzon, Philippines. As of 2020, it has

a population of around 61,000. It is currently classified as a third-class municipality by the Philippine government based on its average annual regular income of between PHP 130 - 160 million (approximately EUR 2.07 - 2.55 million). Dubbed as a “heritage town”, the municipality is known for its astounding collection of ancestral houses and heritage structures that have been well-preserved for centuries, with some of them now turned into museums, galleries, cafes or gift shops for tourists. It is also home to Asia’s largest Catholic church, the Minor Basilica of St. Martin of Tours (known as Taal Basilica), which is a dominant structure at the town’s centre as it sits atop a hill. Immediately down the hill is Taal Park (Figure 2), a spacious public park that serves as scenery for Batangas travelers, providing a picturesque view with the basilica at its backdrop. On its own, the park can be depicted as an open green space offering a peaceful and warm vista of the townscape for locals and tourists alike.



Figure 1. Location Map of Taal Park (Isla, 2024)

Taal Park is situated within the town’s public square, which has been considered by the Philippine government as a national historic site due to its cultural significance dating back to the Spanish colonial period in the Philippines (National Historical Commission of the Philippines, 2018), especially during Taal’s glorious years as the provincial capital. Various educational institutions, small business establishments, and heritage structures, such as the municipal hall (Casa Real), can also be found nearby. The park is divided into two portions, separated by a walkway at the centre (Figure 3). The park’s left portion is faced by the municipal tourism office and one of the town’s cultural centres



Figure 2. Photo of Taal Park

(Escuela Pia). Meanwhile, within the grounds of the park's right portion, adjacent to the social plaza, is where the picture-perfect letters of "Taal" stand. Trees, lamp posts, and concrete benches under vined shades are distributed all throughout the area, encircling the various monuments of prominent historical figures. Recently, a mini-playground for children and some physical fitness amenities have been constructed within a particular section of the park.

5. Methodology

5.1. Research design

The study employed a qualitative case study research design as it strives to provide an in-depth description and analysis of a bounded system (Merriam, 2010), which, in this case, is Taal Park. It involved the conduct of survey and observation. As an in-depth study of Taal Park, meanings and understanding of youth activities that occur in the built environment were sought. This approach allowed for a holistic exploration of how the environmental design, features, and attributes influence youth behaviors and experiences, uncovering insights into the role of Taal Park as a social and recreational space for young people in the area. Ethical procedures were employed through securing informed consent from research participants before answering the survey. All individuals who agreed to participate in the survey were made aware of the purpose of the study.

5.2. Data collection

The survey utilised a combination of purposive and convenience sampling where inclusion criteria were set, requiring respondents to be residents of the municipality of Taal, aged 15 to 24 who had visited Taal Park at least once since the year before the conduct of the survey. Having experienced visiting the park within such timeline was a crucial criterion for inherently capturing and highlighting park usership in the post-pandemic setting.

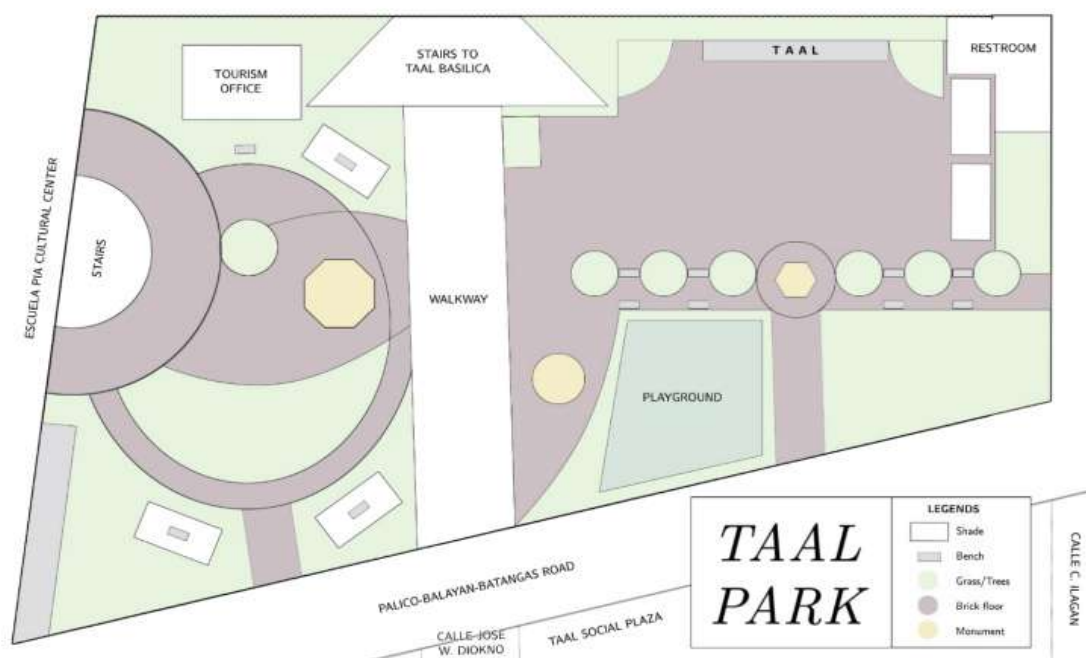


Figure 1. Layout/Design of Taal Park

Figure 3. Layout/Design of Taal Park (Isla, 2021)

The questionnaire was disseminated across various social media platforms to efficiently reach potential respondents, thus adding an element of convenience. Initially yielding 42 responses, further screening resulted in a final sample of 40 respondents. Structured to align with research objectives, the questionnaire incorporated close- and open-ended questions, Likert scale items, and free listing. The survey was divided into five sections, namely: (1) socio-demographic characteristics; (2) youth activities in the park; (3) influence of the built environment design on youth activities; (4) influence of youth activities on the built environment, and finally; (5) recommendations and concluding questions.

Meanwhile, an unstructured non-participant observation was also conducted for 20-30 minutes at different times of the day (early morning, late morning, early afternoon, late afternoon, and early evening) within one week. This was done to account for the regular movement, behaviour, and activities of young people visiting the park to complement and paint a clearer picture of the collected survey data. Such methods have been identified by Loebach (2020) as an effective way to build a profound understanding of how children and youth interact with their local environments, such as public parks and other public settings, where they congregate. These methods are frequently used in research exploring the actions of individuals in public spaces (Clark et al., 2009), and to triangulate emerging findings from other data collection methods, such as surveys (Chikowore, 2023).

5.3. Data analysis

The data collected consisting of qualitative responses from surveys and observations within Taal Park were analysed through descriptive and thematic analysis. Descriptive analysis was employed to summarise the characteristics (i.e., frequencies, means, and standard deviations) of the numerical data from the surveys using Microsoft Excel (2021

version). Thematic analysis, on the other hand, involved identifying, analysing, and reporting patterns or themes within the qualitative data generated from the observed phenomena and the open-ended questions in the survey. Themes, according to Saldaña (2020), are extended phrases or sentences that summarise the manifest (apparent) and latent (underlying) meanings of data. This combined approach was deemed appropriate for the context of the study as it leveraged the strengths of both methods to reveal the complex relationships between youth activities and the park's built environment.

6. Results and Discussion

6.1. Movement, behavior and activities of young people in the park

According to the observations, there is a distinct rhythm and pattern to the use of the park. During the early hours of the day, even before sunrise, a handful of locals go into the area to walk, jog, bike, and do other physical fitness activities. Other users start the day in the park: people attending morning mass, early tourists, cyclists from neighboring towns, and street sweepers. During daylight, busloads of tourists come and go, locals pass by, and young people hang out. When darkness falls, the volume of people in the park slowly diminishes until the park is empty until the next day. On special occasions, especially during the Christmas season (September to December), the park is full of a mix of locals, guests from neighbouring municipalities, and visitors who come to enjoy a light show/ festival in the park every night.

The survey respondents consisted of 40 individuals, with a slight majority being female ($n = 27$) as compared to male respondents ($n = 13$). The mean age of the participants was 19.7 years old, with the largest age group being 21-22 years old ($n = 20$). In terms of educational attainment, the majority of respondents are currently college students ($n = 26$), while some are high school students ($n = 12$). Few respondents identified as part of vulnerable groups ($n = 9$). The cohort of respondents represents a diverse group of young people whose knowledge and experiences have been beneficial to the conduct of the study.

The survey revealed that young people visit the park for various reasons. Most commonly cited were the appreciation of the beautiful scenery, and its proximity to other heritage and food spots. Desire for relaxation and social interaction, as well as the lights show that takes place in the park annually were also identified to enhance the appeal of the park for them. Other motivating factors include accessibility, environmental benefits, place attachment, sense of adventure, and a desire to boost creativity. Such findings indicate the importance of considering diverse preferences when planning and designing public spaces. Many of them would go to the park as often as at least once a week ($n = 15$) to at least once a month ($n = 17$), usually during afternoon hours ($n = 15$) or in the evening ($n = 13$). On a regular basis, they are either accompanied by friends and peers ($n = 20$) or by family and loved ones ($n = 17$), wherein the length of their stay would range from less than an hour ($n = 17$) to an hour or two ($n = 12$). Primarily, Taal Park serves as a place to unwind and relax ($n = 37$) for young people, while for some, it is where they celebrate holidays and other seasonal events ($n = 15$), such as town feasts or festivals. Others also view the park as a space for fun and socialisation among their peers ($n = 11$), as well as cultural and educational activities ($n = 8$).

The primary benefits of visiting Taal park for young people include opportunities for social interaction and relaxation, providing a free and welcoming space that alleviates daily



Figure 4. (left) Young cyclists enjoying a photo opportunity at Taal Park (left)
Figure 5. (right) Typical situation at the park during late mornings (right) (Photos by Joshua Mayo and Ferdinand Isla III, 2024)

life and academic pressures. This is consistent with Loebach's (2020) findings on social inclusion and community well-being. The park also promotes physical activity and outdoor recreation, which echoes Davison and Lawson (2006) and Poulsen et al. (2018) on the importance of recreational facilities for youth development. As a common landmark, it supports local culture and tourism and serves as a safe, accessible space for school-related activities. Tertiary benefits include fostering community and belonging, connecting with nature, aesthetic appreciation, and improving mental well-being, aligning with Evans (2006) and Andersen et al. (2022) on the importance of supportive environments for children's physical and mental health.

6.2. Influence of the built environment design on youth activities

Notably, the survey shows how young people's appreciation of the park's natural and green features is slightly greater than its man-made and physical features. There is a high level of agreement among the respondents in this aspect, implying that these features are particularly well-defined and universally appreciated by the park users. This finding agrees with Bradshaw et al.'s (2020) argument that balancing natural and built environments has been crucial for green public spaces in the Global South. Integrating concrete elements and colours made the space more appealing and its perception as safe encouraged more use and maximised the social and recreational benefits.

The survey also revealed that the park's size, location, and accessibility have contributed to its attractiveness for young people, in addition to the welcoming environment for social and recreational activities. Similarly, availability of space provides ample and versatile outdoor areas that can cater to a range of interests and preferences. While the ratings for accessibility and availability of space are generally positive, there may still be opportunities for improvement to enhance inclusivity, usability, and safety for all park users, as exhibited by a slightly lower rating. This underscores the importance of inclusive design in placemaking, which is critical to ensuring that all users can fully engage with the space. Overall, young people still view the park's overall design positively, with the blending of man-made structures and the natural landscape in such an appealing and functional manner. It is important to note, however, that despite the park being publicly accessible to the local community, there remains the issue of having limited options for them in terms of public spaces. In the Philippines, it is common for municipalities to have a public park

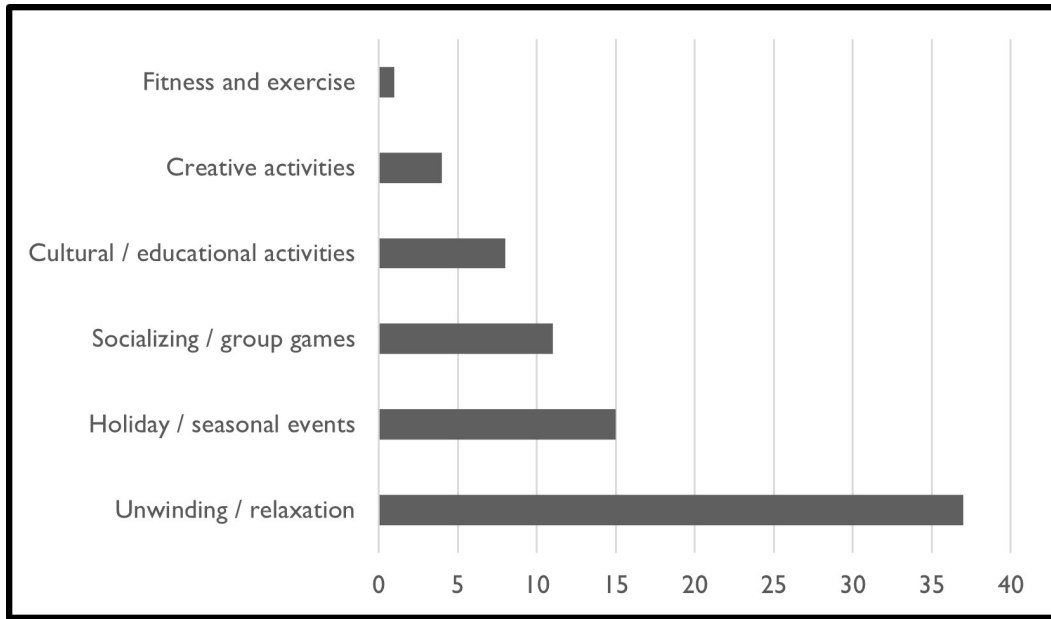


Figure 6. Youth activities in the park

or plaza within their respective commercial districts, such as in the case of Taal. But other than this, there are very limited public spaces. Young people’s appreciation of the park symbolises their interest in utilising such spaces, highlighting the need for more such areas to support their well-being and development.

On another note, the park, as perceived by young people, provides a welcoming atmosphere for diverse groups of people within the community. The presence of wide pathways, accessible parking spaces, park management personnel, and designated road officers contribute to a sense of safety among visitors. Additionally, there have been activities dedicated to the youth, as well as LGBTQIA+ friendly events that were organised by local organisations. However, there are also notable areas for improvement that were identified.

Specific aspects of the park’s design	Mean	Std. Dev.	Level
<i>Design of the park’s man-made/physical features in terms of aesthetics and functionality</i>	3.90	0.78	Good
<i>Design of the park’s natural/green features in terms of aesthetics and ecological significance</i>	4.53	0.60	Very good
<i>Appropriateness of the park’s location in terms of size and accessibility for young people</i>	4.35	0.66	Very good
<i>Appropriateness of the park in terms of availability of space for facilitating youth activities</i>	4.20	0.79	Very good

Specific aspects of the park’s design	Mean	Std. Dev.	Level
Overall park design, especially in terms of accommodating a diverse range of youth activities	3.88	0.79	Good
The park’s inclusivity and safety for visitors who are part of vulnerable groups	3.95	0.88	Good

(1 - very poor; 2 - poor; 3 - neutral; 4 - good; 5 - very good)

Table 1. Young people’s evaluation on the park’s built environment design

Concerns are raised regarding accessibility issues for persons with disabilities (PWDs), such as the lack of ramps and unsafe playground equipment, as well as safety hazards posed by the park’s proximity to a highway. Nonetheless, there lies a shared desire among young people to help address these issues and foster a more inclusive and safe environment within Taal Park through community engagement and collaborative efforts.

The perceived capabilities of Taal Park’s existing built environment design in facilitating various activities were also examined. Primarily, the park is regarded as a tranquil space for unwinding and relaxation (n = 30), and suitable for cultural and educational activities (n = 27). Young people also see the park as a venue for socialising and group games (n = 27), its potential for creative activities (n = 25), and a place to celebrate holiday and seasonal events (n = 19). Furthermore, they perceive opportunities for fitness and exercise (n = 13), as well as sports and recreation (n = 8). Some key features contributing the most to the park’s attractiveness for youth activities, include the open space (n = 37), resting areas (n = 26), recreational amenities (n = 19), vegetation (n = 16), and monuments (n = 9). These findings suggest that built environment design plays a significant role in shaping the range of activities available to young people, which, in turn, influences their recreational choices, social interactions, and overall experiences within public spaces.

	Mean	Std. Dev.	Level
Overall impact of youth and their activities on the park’s built environment	4.13	0.69	Very good
Current level of youth involvement in maintaining the quality of the park’s environment	3.78	0.83	High

(1 - very poor/low; 2 - poor/low; 3 - neutral; 4 - good/high; 5 - very good/high)

Table 2. Evaluation of youth’s impact on the park’s built environment

6.3. Influence of youth activities on the built environment

Most of the young people visiting Taal Park assert that their presence at the park improves maintenance and care (n = 24) for its physical infrastructure and amenities, and fosters

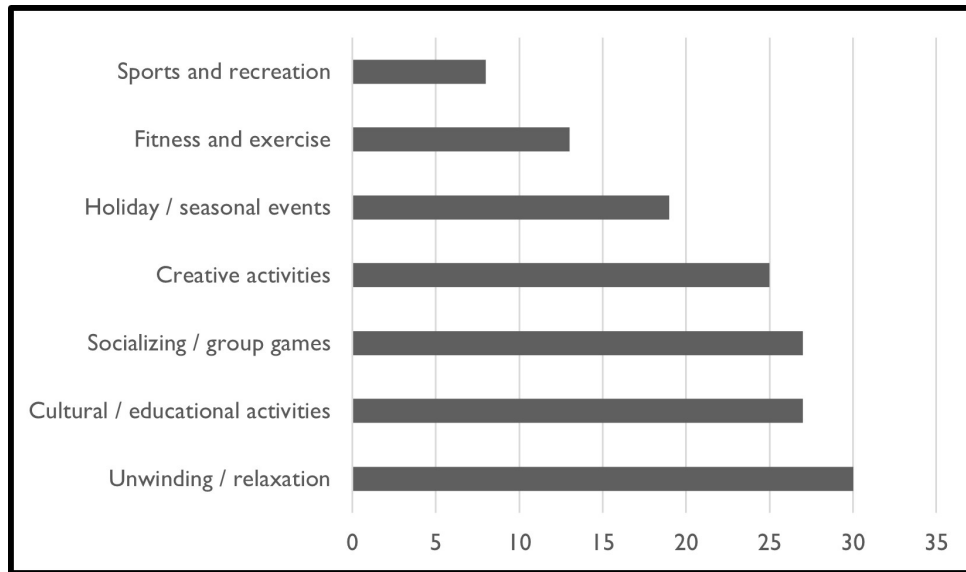


Figure 7. Activities that the park’s design allows young people

positive growth and care (n = 22) for the park’s natural vegetation and landscape as they normally conduct their activities. Consequently, acknowledgment of the increased need for maintenance efforts (n = 9) for the infrastructure and landscape further connotes the importance of responsible outdoor recreation. These results highlight the significant and generally positive role that young people play in maintaining the quality of the park’s environment. It also reflects the concept of people-making, where the active participation of individuals in their environment fosters a sense of ownership and responsibility. In fact, with a high level of agreement, there is a balanced perspective on the impact of youth activities on the park’s built environment, acknowledging both the positive contributions and the challenges associated with increased use (e.g., wear and tear, improper disposal of garbage, etc.). While the active utilisation of the park by young people provides liveliness and contributes to a positive image of the community, it also underscores the importance of responsible use to ensure the longevity and safety of the park’s infrastructure in addition to its functionality and aesthetic appeal for visitors. This balance illustrates how people-making and placemaking are intertwined – effective design should facilitate positive use while also anticipating and addressing potential challenges.

In recent years, people have seen some changes and developments in the park. Among the most noticeable are the addition of new features and amenities, such as playground facilities, benches, and shaded areas, comfort rooms, which have all greatly contributed in making the park more engaging and comfortable for users. Since 2016, the park has become a popular attraction at the heart of the province of Batangas for the local government’s annual installation of a festive lights show (locally known as “Pailaw sa Taal”) within the park grounds and the adjacent road, which has been ingrained for locals as part of their culture and traditions every Christmas season. This initiative has fostered a deeper connection between the space and its users, which exemplifies the synergy between design and community engagement. Other improvements include the expansion of brickstone flooring, and some landscaping enhancements, which have altogether created more structure and pleasing patterns within the open space. All in all, these efforts to revitalise the space have not only attracted more visitors to frequent the park, but have also created a sense of excitement among the local youth.



Figure 8. Taal Park's specific features that makes the park more attractive for young people (Photos by Joshua Mayo, 2024)

6.4. Perceived role of youth in shaping the public space

Overall, the findings presented above suggest a sense of ownership and responsibility among youth towards the upkeep of the park's built environment, indicating that they perceive themselves as critical stakeholders in ensuring its quality. Indeed, the energy of young people can be harnessed, given that they are the most frequent visitors and users of the space. Their enthusiasm, creativity, and fresh perspectives can generate ideas for sustainable practices that can enhance the experience of people visiting the park, regardless of age. Youth involvement can build connections between them and the local community, which can help ensure that the park, as a public space, remains a valuable and functional asset in the locality. Therefore, their involvement not only benefits the park's physical upkeep, but also cultivates a sense of civic duty and pride.

The local youth suggest individual involvement through participation in the maintenance of

the park, and engagement in youth activities that can benefit the park and influence others positively. Specifically, they advocate for personal responsibility in keeping the environment clean, actively participating in social gatherings to foster a sense of ownership, and engaging in productive activities like regular clean-ups and youth-led programs. Meanwhile, on a community-level, there is a call for broader, collective actions to enhance the park’s environment and ensure its sustainability. This includes advocating for the park’s needs within local government, collaborating on youth-led projects, and hosting workshops and advocacy campaigns. Assigning local barangays to maintain cleanliness, using murals to enhance visual appeal, and distributing flyers about the role of youth in shaping public spaces were also identified as key strategies to promote ongoing youth engagement and stewardship. Moreover, their specific recommendations on how Taal Park’s overall built environment design can be further improved to make it better and more inclusive are summarised in the table below.

6.5. Design recommendations from the youth	
<i>Accessibility and inclusivity</i>	<ul style="list-style-type: none"> · Install ramps to make the park accessible for persons with disabilities (PWDs). · Design areas that cater to different age groups and interests (e.g., picnic spots).
<i>Amenities and comfort</i>	<ul style="list-style-type: none"> · Add more benches, chairs, and resting places for visitors. · Consider mini-amenities for leisure and physical activities (e.g., small fountains, bicycle racks).
<i>Safety and maintenance</i>	<ul style="list-style-type: none"> · Prioritise maintenance of park amenities and infrastructure for longevity and safety. · Implement safety measures, including visible signs with safety rules and emergency procedures.
<i>Sustainability and design</i>	<ul style="list-style-type: none"> · Incorporate sustainable architecture and eco-friendly features. · Integrate elements of Taal’s culture and history into park design (e.g., markers about Taal’s heritage).
<i>Community engagement and governance</i>	<ul style="list-style-type: none"> · Ensure strong leadership and governance to oversee park improvements. · Involve the community in park planning and management.

Table 3. Design recommendations for improving the park’s built environment

Within the rationalised planning system in the Philippines (Serote, 2005), which mandates the creation of local development and land use plans for each city and municipality, the local youth is a crucial demographic that must be taken into consideration in the planning processes and related activities. Represented by a local committee on youth affairs led by an elected youth officer in the community council (Sangguniang Kabataan), this sector is often clustered with culture, arts, education, and/or sports development. However, this existing set-up, while valuable, is not without limitations. In practice, youth and public space concerns are often deprioritised, leading to insufficient support and budget allocations – especially for resource-scarce localities. This marginalisation restricts the ability of youth to meaningfully influence public space planning. As a consequence, youth perspectives may be limited to advisory roles without substantial decision-making power, reducing their impact, and undermining dedicated efforts to create inclusive and dynamic environments.

7. Conclusion

The study explored how young people interact with the built environment of Taal Park, and shed light on their perspectives as key stakeholders of the public space. It revealed youth's overall positive experiences in the use of Taal Park not only for personal or individual purposes, but also for social interactions that lead to improved well-being. By providing a space for relaxation and socialisation, the park has been able to provide young people various mental and physical health benefits. How the park was designed also influenced the nature of such activities and interactions. The nexus between placemaking and people-making in this context illustrates how the design and young people's use of public spaces are mutually reinforcing (Figure 7). Effective placemaking creates environments that support diverse activities and inclusive participation, while active engagement by users, particularly youth, contributes to the vitality and care of these spaces. Understanding these dynamics is crucial in ensuring that the park remains a vibrant and inclusive space that meets the diverse needs of its users. For instance, much has to be done to promote inclusivity in the park. Designing public spaces must also be examined along with the totality of the city, with considerations of potential hazards and disasters in the face of climate change, which is critical in the local context of the Philippines. The results of the study uncovered how young people perceive their role in maintaining the park, which adds a new dimension to understanding youth involvement in such context. It also emphasised the importance of understanding and addressing the evolving needs and preferences of youth in the design and management of public spaces, like Taal Park. However, the limitations in current planning systems further highlight the need for more meaningful engagement mechanisms. Future research should continue utilising a transdisciplinary approach to deepen the knowledge base on public space in Global South contexts, with a focus on exploring effective youth engagement strategies in urban planning. Additionally, research should expand to analyse the benefits of public spaces beyond individual experiences and address spatial injustices. By addressing these gaps and integrating youth perspectives effectively, cities can create public spaces that not only enhance the quality of life for residents but also contribute to the overall vitality and sustainability of urban communities. Ensuring that youth have a substantive role in shaping these environments can lead to more inclusive, dynamic, and vibrant public spaces.

References

- Ali, N.A., & Khoja, A. (2019) 'Growing Evidence for the Impact of Air Pollution on Depression', *The Ochsner journal* 19 (1), 4–4 [online].
- Agheyisi, J. E. (2023) 'Temporary use of urban vacant spaces: A pro-poor land use strategy in the Global South', *Journal of Urban Affairs*, 1–25. Available from: <https://doi.org/10.1080/07352166.2023.2213830>
- Al Skaff, S. (2022) 'Resilience Through Public Spaces: "Transforming Vulnerability into Opportunity"', In *Advances in Science, Technology & Innovation*. Springer, pp. 67–76. Available from: https://doi.org/10.1007/978-3-031-07381-6_6
- Alliance for Safe, Sustainable and Resilient Environments (ASSURE) (2019) *Public Parks, Open and*

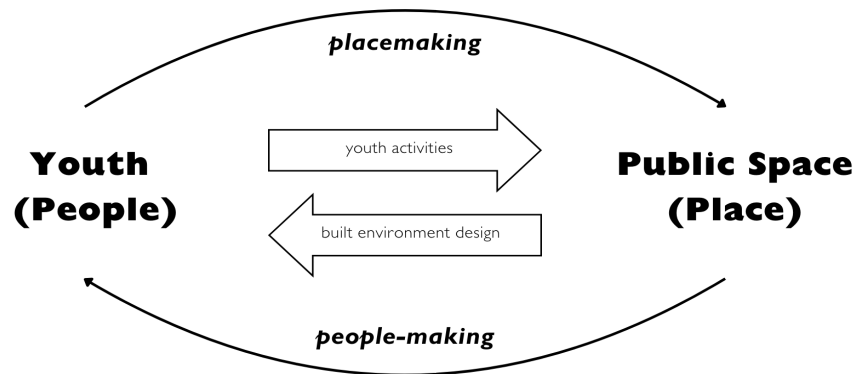


Figure 9. The nexus between placemaking and people-making in the context of youth and public spaces

- Green Spaces: A Planning and Development Guide*. Available from: <https://elibrary.bmb.gov.ph/elibrary/books/public-parks-open-and-green-spaces-a-plannin-development-guide/>
- Andersen, O. K., Gebremariam, M. K., Kolle, E., & Tarp, J. (2022) 'Socioeconomic position, built environment and physical activity among children and adolescents: a systematic review of mediating and moderating effects', *International Journal of Behavioral Nutrition and Physical Activity*, 19(1) [Online]. Available from: <https://doi.org/10.1186/s12966-022-01385-y>
- Armas, K. L., & Galano, J. A. (2024) 'Assessment of economic impact of public spaces in the Philippines: An in-depth analysis', *Corporate and Business Strategy Review* 5(2), pp.235–42[online]. Available from: <https://doi.org/10.22495/cbsrv5i2art20>
- Beza, B. B., & Hernández-García, J. (2018) 'From placemaking to sustainability citizenship', *Journal of Place Management and Development* 11(2), pp. 192–207[online]. Available from: <https://doi.org/10.1108/jpmd-06-2017-0051>
- Bradshaw, S., Linneker, B., & Lundy, L. (2020) 'Naturally feeling good? Exploring understandings of 'Green' urban spaces in the Global South' in *Naturally Challenged: Contested Perceptions and Practices in Urban Green Spaces* pp. 37–57[online]. Available from: https://doi.org/10.1007/978-3-030-44480-8_3
- Bravo, L. (2017) *Statement on behalf of City Space Architecture at the 26th UN Habitat Governing Council, Nairobi, Kenya*. Available from: https://www.journalpublicspace.org/download/csa_gc26_statement.pdf
- Chavez, E. M. (2021) 'Assessment of public open space management: Case study of Siquijor Island, Philippines', *IOP Conference Series Earth and Environmental Science* 771(1), 012013 [online]. Available from: <https://doi.org/10.1088/1755-1315/771/1/012013>
- Chikowore, N. R. (2024) 'Observation as Data Collection' in *The Handbook of Teaching Qualitative*

- and Mixed Research Methods: A Step-by-Step Guide for Instructors (pp. 80–83). Routledge. Available from: <https://doi.org/10.4324/9781003213277-21>
- Cilliers, E. J. (2023) 'Social perceptions of the value of green spaces: A view from the South', *Frontiers in Sustainable Cities* [online], 4. Available from: <https://doi.org/10.3389/frsc.2022.1037123>
- Clark, A., Holland, C., Katz, J., & Peace, S. (2009) 'Learning to see: lessons from a participatory observation research project in public spaces', *International Journal of Social Research Methodology* 12(4), pp.345–360 [online]. Available from: <https://doi.org/10.1080/13645570802268587>
- Collin-Vézina, D., Fallon, B., & Caldwell, J. (2022) 'Children and youth mental health: not all equal in the face of the COVID-19 pandemic', in *Reference Module in Neuroscience and Biobehavioral Psychology*. Elsevier, pp. 377–385. Available from: <https://doi.org/10.1016/b978-0-323-91497-0.00072-2>
- Collins, D., & Stadler, S. (2020) 'Public Spaces, Urban', in *International Encyclopedia of Human Geography* 2nd ed., Vol. 11. Elsevier, pp. 103–111. Available from: <https://doi.org/10.1016/b978-0-08-102295-5.10212-4>
- Davison, K. K., & Lawson, C. T. (2006) 'Do attributes in the physical environment influence children's physical activity? A review of the literature', *International Journal of Behavioral Nutrition and Physical Activity*, 3(1), 19 [online]. Available from: <https://doi.org/10.1186/1479-5868-3-19>
- Evans, G. W. (2006) 'Child development and the physical environment', *Annual Review of Psychology*, 57(1), pp.423–451 [online]. Available from: <https://doi.org/10.1146/annurev.psych.57.102904.190057>
- Gu, X., et al. (2022) 'Disparity in built environment and its impacts on youths' physical activity behaviors during COVID-19 pandemic restrictions', *Journal of Racial and Ethnic Health Disparities*, 10(4), pp.1549–1559 [online]. Available from: <https://doi.org/10.1007/s40615-022-01341-3>
- Harvey, D. (2003) 'The right to the city,' *International Journal of Urban and Regional Research*, 27(4), pp. 939–941 [online]. Available from: <https://doi.org/10.1111/j.0309-1317.2003.00492.x>
- Hes, D., Mateo-Babiano, I. and Lee, G. (2019) 'Fundamentals of Placemaking for the Built Environment: An Introduction' in Hes, D. and Hernandez-Santin, C. (eds.) *Fundamentals of Placemaking for the Built Environment*. Singapore: Palgrave Macmillan, pp. 1–13. Available from: https://doi.org/10.1007/978-981-32-9624-4_1
- Inam, A. (2022) 'Co-designing publics: [re]producing the public realm via informal urbanisms in cities of the global south', *Local Environment*, 27(5), pp.655–669 [online]. Available from: <https://doi.org/10.1080/13549839.2022.2045481>
- Kamalipour, H., & Peimani, N. (2019) 'Negotiating space and visibility: forms of informality in public space', *Sustainability*, 11(17), 4807 [online]. Available from: <https://doi.org/10.3390/su11174807>
- Kolay, S. (2020) 'Gerontology and urban public spaces of Global South: Case of China', in *Perception, Design and Ecology of the Built Environment: A Focus on the Global South*. Springer, pp. 473–486. Available from: https://doi.org/10.1007/978-3-030-25879-5_20
- Labib, S., Shuvo, F. K., Browning, M. H. E. M., & Rigolon, A. (2020) 'Noncommunicable diseases, park prescriptions, and urban green space use patterns in a Global South context: the case of Dhaka, Bangladesh', *International Journal of Environmental Research and Public Health*, 17(11), 3900 [online]. Available from: <https://doi.org/10.3390/ijerph17113900>
- Landman, K., & Mady, C. (2022) 'Uncovering different faces of public space in the global north and south', *Built Environment*, 48(2), pp.149–154 [online]. Available from: <https://doi.org/10.2148/benv.48.2.149>
- Loebach, J., Cox, A., & Little, S. (2020) 'Behavior mapping to support the development of youth-friendly public outdoor spaces' in *The Routledge Handbook of designing Public Spaces for Young people* (1st ed.). Routledge. Available from: <https://doi.org/10.4324/9780429505614>
- Mahmoud, I.H. (2022) *Placemaking for green urban regeneration*. Switzerland: Springer. Available

- from: <https://doi.org/10.1007/978-3-031-15408-9>.
- Mateo-Babiano, I. and Lee, G. (2019). 'People in Place: Placemaking Fundamentals' in Hes, D. and Hernandez-Santin, C. (eds.) *Fundamentals of Placemaking for the Built Environment Singapore*: Palgrave Macmillan, pp. 15–38. Available from: https://doi.org/10.1007/978-981-32-9624-4_1.
- McGrath, L., Hopkins, W. G., & Hinckson, E. (2015) 'Associations of Objectively Measured Built-Environment Attributes with Youth Moderate–Vigorous Physical Activity: A Systematic Review and Meta-Analysis', *Sports Medicine*, 45(6), pp. 841–865 [online]. Available from: <https://doi.org/10.1007/s40279-015-0301-3>
- Merriam, S. B. (2010) 'Qualitative Case Studies' in *International Encyclopedia of Education* 3rd ed. Elsevier, pp. 456–462.
- National Historical Commission of the Philippines (2018) *National Registry of Historic Sites and Structures in the Philippines* [online]. Available from: <https://nhcphistoricsites.blogspot.com/search/label/National%20Historical%20Site>
- Nero, B. F., Callo-Concha, D., Anning, A., & Denich, M. (2017) 'Urban green spaces enhance climate change mitigation in cities of the global South: the case of Kumasi, Ghana', *Procedia Engineering*, 198, pp.69–83 [Online]. Available from: <https://doi.org/10.1016/j.proeng.2017.07.074>
- Official Gazette of the Republic of the Philippines (2023) Republic Act No. 11964 (Automatic Income Classification of Local Government Units Act of 2023) [online]. Available from: <https://www.officialgazette.gov.ph/2023/10/26/republic-act-no-11964/>
- Olfato-Parojinog, A., Dagamac, N. H. A., & Limbo-Dizon, J. E. (2024) 'Assessment of urban green spaces per capita in a megacity of the Philippines: implications for sustainable cities and urban health management', *GeoJournal*, 89(3) [online]. Available from: <https://doi.org/10.1007/s10708-024-11084-9>
- Owens, P. E. (2020) 'A Fundamental Need: Linking Youth Development to the Public Realm' in *The Routledge Handbook of Designing Public Spaces for Young People* (pp. 7–22). Routledge. Available from: <https://doi.org/10.4324/9780429505614>
- Pauleit, S., Vásquez, A., Maruthaveeran, S., Liu, L., & Cilliers, S. S. (2021) 'Urban green infrastructure in the Global South' in *Urban Ecology in the Global South*, pp. 107–143 [online]. Available from: https://doi.org/10.1007/978-3-030-67650-6_5
- Peimani, N., & Kamalipour, H. (2022) 'Assembling Transit Urban Design in the Global South: Urban morphology in relation to forms of urbanity and informality in the public space surrounding transit stations', *Urban Science* 6(1), 18 [online]. Available from: <https://doi.org/10.3390/urbansci6010018>
- Percy-Smith, B. and Burns, D. (2013) 'Exploring the role of children and young people as agents of change in sustainable community development', *Local Environment*, 18(3), pp. 323–339 [online]. Available from: <https://doi.org/10.1080/13549839.2012.729565>.
- Poulsen, M. N., et al. (2018) 'Comparing objective measures of the built environment in their associations with youth physical activity and sedentary behavior across heterogeneous geographies', *Health Place*, 49, pp. 30–38 [online]. Available from: <https://doi.org/10.1016/j.healthplace.2017.11.003>
- Ruel, S., Bordes, V., Sahuc, P., & Boutineau, G. (2018) 'Toulouse's urban public spaces as seen through the eyes of its youths: Means of ownership, use and function', *Enfances, Familles, Generations*, 3 [online]. Available from: <https://doi.org/10.7202/1058686ar>.
- Sahakian, M., et al. (2020) 'Green public spaces in the cities of South and Southeast Asia. Protecting needs towards sustainable well-being', *The Journal of Public Space*, Vol. 5 n. 2, pp. 89–110. [online] Available from: <https://doi.org/10.32891/jps.v5i2.1286>
- Saldaña, J. (2020) 'Qualitative Data Analysis Strategies' in *The Oxford Handbook of Qualitative Research* 2nd ed. Oxford University Press, pp. 877–911. Available from: <https://doi.org/10.1093/oxfordhb/9780199811755.001.0001>
- Sia, A., Kua, E. H., & Ho, R. (2019) 'Building social resilience through parks and common recreational spaces' in *Advances in 21st century Human Settlements*. pp. 51–62. Available from: https://doi.org/10.1007/978-981-10-7555-5_4

[org/10.1007/978-981-13-7048-9_4](https://doi.org/10.1007/978-981-13-7048-9_4)

- Shatkin, G. (2005) 'Colonial capital, modernist capital, global capital: The changing political symbolism of urban space in Metro Manila, the Philippines', *Pacific Affairs*, 78(4), pp. 577–600 [online]. Available from: <https://doi.org/10.5509/2005784577>
- Torres, J. (2020) 'Why Is It Important to Provide Child- and Youth-Friendly Streets?' in *The Routledge Handbook of Designing Public Spaces for Young people* 1st ed. Routledge, pp. 52–63. Available from: <https://doi.org/10.4324/9780429505614>
- Tuhkanen, H. et al. (2022) 'Health and well-being in cities - Cultural contributions from urban form in the Global South context', *Well-being, Space and Society*, 3, 100071 [online]. Available from: <https://doi.org/10.1016/j.wss.2021.100071>
- Wilkie, S., Townshend, T., Thompson, E. M., & Ling, J. (2018) 'Restructuring the built environment to change adult health behaviors: a scoping review integrated with behavior change frameworks', *Cities & Health*, 2(2), pp. 198–211 [online]. Available from: <https://doi.org/10.1080/23748834.2019.1574954>
- Worpole, K., & Knox, K. (2007) *The social value of public spaces* [online]. Joseph Rowntree Foundation. Available from: <https://www.jrf.org.uk/the-social-value-of-public-spaces>

How India Can Support Teenage Girls' Mental Well-being via Inclusion of Park Planning through Digital Engagement. Learning from Scotland's Mistakes

Holly Gray

Independent researcher, United Kingdom

hollygray@gmail.com

Abstract

This paper examines how teenage girls' use of digital governance in planning parks can support mental well-being in India by drawing on existing sources and lessons learned from Scotland's approach. United Nations Sustainable Development Goal 11.7 calls for inclusive public spaces worldwide. However, both Scotland and India provide opportunities for mediocre engagement of teenage girls, allowing a lack of inclusivity in parks, fostering smartphone dependence, social isolation, and the downfall of mental well-being (Hindustan Times, 2016; Make Space for Girls, 2023a). Park professionals within the United Kingdom appear oblivious to this issue: 89% believe parks cater to everyone, but only 22% of teenage girls agree (Baker et al., 2022). Meanwhile, Indian parks seem predominantly male-centric. Boys in India use parks to age ~20, but girls stop using them at ~12 (Hindustan Times, 2016).

Previous digital engagements by Scotland and the United Nations, such as Minecraft, feel male-oriented. Instead, India can empower girls' digital skills using other governance engagements like social media and games.

This paper aims to deepen the understanding of how inadequate park provisions have contributed to well-being issues among teenage girls in Scotland and how India could address similar challenges through a proposed digital strategy. The paper will first explore barriers to sufficient park planning within Scotland and India and how these barriers impact the mental well-being and future outcomes of teenage girls. A proposed digital strategy for India will be presented, which aims to implement more parks suitable for teenage girls through digital governance and engagement, drawing on lessons from Scotland's experiences.

Keywords: youth engagement, teenage girls, inclusive parks, digital governance, India

To cite this article:

Gray, H. (2024) "How India can Support Teenage Girls' Mental Wellbeing via Inclusion of Park Planning through Digital Engagement: Learning from Scotland's Mistakes", *The Journal of Public Space*, 9(2), pp. 129–146. doi: 10.32891/jps.v9i2.1791.

This article has been double blind peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

I. Introduction

Whilst the world's population of males and females is almost equal, worldwide public spaces are predominantly planned to accommodate the needs and experiences of boys and men (United Nations, 2021). For decades, this exclusion of females in urban planning has been the subject of critical research. McDowell (1983) highlighted this gender division, stating planning was not adequately responding to women's needs, emphasising a longstanding lack of female perspectives applied to the built environment. Efforts persisted, with early 21st century global initiatives like the United Nations Millennium Development Goal 3 to "Promote Gender Equality and Empower Women" (United Nations, 2010, p.22). In more recent years, the inclusion of females' perspectives in planning has gained visibility, with cities implementing governmental strategies to enhance women's experiences within public spaces. For example, Glasgow, Scotland, has become the United Kingdom's (UK) first feminist city in terms of urban planning, while Delhi, India, launched the Safe City Project to empower females in public spaces (Brown, 2022; Indian Government, 2023). Despite this, a skewed distribution of gender representation and usage within public spaces persists, reflecting discrimination within the planning of the built environment. This highlights an urgent need for more female-inclusive public spaces.

One space that women may feel most excluded from is parks. Ninety-five per cent of women in Glasgow, Scotland experience apprehension regarding their safety visiting parks at night (Arup, 2022). Similarly, in Delhi, India, parks stood out with significant differences in usage between genders, with women completely avoiding them after dark (Viswanath and Mehrotra, 2007). For younger girls, this apprehension around parks is not confined to nighttime, rather, it extends to all times of the day. Parks should provide a safe space that enables social, emotional, and physical well-being. As regarded by United Nations (2013a, p.2) defining public spaces, including parks as, "Spaces consisting of open environments (...) for everyone's enjoyment. (...) A key element of individual and social well-being". However, naivety around planning spaces for girls is allowing unequal opportunities for play within parks, resulting in a lack of socialisation and other effects. Despite this issue affecting girls of all ages, it incurs the most severe impacts on teenage girls.

A teenager is a person between the ages of 10-19 (United Nations, 2012); these years are an emotionally delicate time between childhood and adulthood, where insufficient outdoor park spaces to play in with friends can be detrimental to development (Wales et al., 2022). Everyone under the age of 18 has the right to engage in play, but it should be noted, during teenage years play transitions from games to socialising, with play becoming a complex and unstructured way to seek social connections (Hartas, 2020; UNICEF, 1990). Thus, teenage play can be seen as hanging out or chatting. Where these connections take place also matters. Today girls are choosing their smartphones, rather than in-person hangouts. According to Wales et al. (2022) and Hartas (2020) this is an issue, as for teenagers, the social and emotional development that socialising within the public realm offers cannot be matched through virtual communication. For girls, parks can provide a versatile and unconfined space to freely socialise, without parental observation. However, through lack of engagement in both Scotland and India, there is a lack of park spaces adequate for or utilised by teenage girls (Make Space for Girls, 2023a; Ro, 2019). This lack of inclusivity in parks is causing a lack of socialisation, which could be fuelling mental health declines, heralding detrimental effects to future generations of women.

This paper will establish how India can support teenage girls' mental well-being via inclusion of park planning through digital engagement by learning from Scotland's mistakes.

It will first analyse the barriers enabling inadequate planning and engagement of parks within Scotland and India. Then, the authors will investigate how these barriers are generating a decline in teenage girls' quality of well-being. We will draw on existing sources relating to qualitative and quantitative data derived from academic literature, governmental reports, articles, and trends in mental health and substance abuse. These sections will emphasise the interconnectedness of parks and girls' well-being. A proposed strategy to develop Indian digital governance and engagement will be explored for India to improve their provision of inclusive park planning.

2. Socio-economic context of Scotland and India

Before delving into the challenges teenage girls face in utilising parks, the socio-economic context of both countries must be explored. India and Scotland are significantly different across most sectors: demographically, politically, economically, and culturally. Yet Indian trends are rising akin to Scotland's in terms of poor socialisation in girls, lack of parks inclusive to girls, and declining mental health of girls. Scotland's population stands at 5.4 million, while India holds a massive 1.2 billion (Indian Government, 2011; Scottish Government, 2023a). Scotland, being a constituent country of the United Kingdom, uses devolved powers and holds their own democratic Government. Scotland's local authorities (local governments) oversee the planning of their local parks, via their own planning documents. In India, there is a sovereign federal structure, with a central government located in New Delhi, and each Indian state also has their own level of governance and plans.

India experiences intense poverty and inequality. Despite the United Kingdom being one of the biggest economic centres in Europe, Scotland faces similar issues of poverty and discrimination (albeit to a lesser extent) (International Trade Administration, 2023). These countries hold different levels of infrastructure and organisation of urban and rural spaces. Scotland has advanced, well-organised infrastructure and India, despite widespread growth, still experiences a great deal of informal development, water sanitation, and waste-management issues. Regardless of Scotland's advanced development, there are struggles with digitalisation and participatory engagement within their planning system with the Scottish Government (2023b) Digital Strategy for Planning recently terminated due to a reduction in capital allocation. Furthermore, given resource scarcity, India faces similar issues, but valuable insights can be gained from Scotland's pitfalls and, via enhanced digital governance, India can avoid these exclusionary planning practices.

3. Inadequate park provisions for teenage girls in Scotland and India

Teenage girls' low utilisation of parks is potentially being caused by non-inclusive governmental planning. To learn lessons that are transferable to India, Scotland's naivety surrounding engagement and planning of parks for teenage girls will now be examined. In later sections, the subsequent effects experienced by girls that are exacerbated by these park issues will be investigated.

The lack of park provisions for teenage girls reflects a broader issue of insufficient youth engagement in urban planning. Scottish Government (2017) research found only 1% of those engaged in the planning process were young people. This disparity is reflected in the inadequate planning of parks which often fail to consider the needs of younger girls, with

a UK Girlguiding (2020) survey stating 82% of teenage girls believed they should be more involved in the planning of open spaces.

Successful parks for teenage girls are context-dependent and can only be created with their engagement. However, worldwide, teenage girls' want parks to feel safe, clean and social, with areas exclusively for them (Make Space for Girls, 2023a; United Nations, 2013b). Some of the features they would like, for example, are larger swings, social seating and walking loops, inclusion of lights, and secure toilets (ibid).

4. Scotland's park provisions

In Scotland, teenage girls face barriers created by local authorities planning documents and negative perceptions that limit their utilisation of park spaces. In Scotland, local authorities have power over their locality's parks, but most authorities' plans do not mention a gendered approach to teenage park design. Thus, teenage girls all over Scotland have reported parks provide little for them, and that they feel unwelcome there (Fife Council, 2023; Play Scotland, 2023). Authorities often promote Multi Use Games Areas (MUGA) to cater to teenage play. However, this cage-like structure is male-centric and designed for sport, not play. Authorities could be seen to be attempting to take a gender-neutral approach here, but, in doing so may be marginalising girls. Research by Barker et al. (2022) states MUGAs simply do not cater to girls at all, with Make Space for Girls (2023b) finding only 8% of MUGA users were female.

The Scottish Government seems to understand the essential role parks play in well-being, with their recent spending of £60 million toward play park maintenance and improvements (Scottish Government, 2022a). However, plans like Edinburgh Council's (2016) Play Area Action Plan shed negative views of teen utilisation of parks. For example, they state that lighting will usually not be provided in parks because "Lighting may make a play (park) more vulnerable to vandalism as teenagers may be more likely to congregate there after dark" (Edinburgh Council, 2016, p.16). Governmental documents stating these unfavourable opinions of teenagers not only influences decisions around, park planning, design, and budget allocations, but also generates negative perceptions regarding teenagers socialising. This in turn reinforces the belief that teenagers do not belong in parks due to antisocial behaviour. However, this antisocial behaviour could be attributed to a lack of youth engagement. In contrast to that plan's statement, studies involving local authorities showed that upgrading parks through engagement with teenagers resulted in a complete depletion of anti-social behaviour, including vandalism (Cabe Space, 2005).

5. India's park provisions

Like Scotland, India experiences a lack of representation, engagement, and gaps within governmental plans around planning for teenage girls. Research exposes discriminatory social norms and the exclusion of women and girls in the planning of public spaces has limited their ability to navigate and use these spaces (Kaul and Shrivastava, 2017; UNICEF, 2017; Viswanath and Mehrotra, 2007). This lack of inclusion, they state, leads to male-dominated parks, resulting in Indian women, especially teenage girls, being less likely to use them (ibid). Park spaces for play seem to be dismissed within Indian governmental legislation and schemes. The Delhi Parks and Gardens Society, who contributes to the

development of parks for the Government of Delhi, expressed India holds no legislative policy which provides neither overarching or detailed guidance of designing parks for play (Indian Government, 2015). The Society produced their own information on parks - however, there was no mention of catering to the needs or desires of teenagers (ibid). Given governmental unfamiliarity around teenage girl's use of park spaces, professionals are alarmed. Rahul Goel, an assistant professor at the Indian Institute of Technology called out for the feminisation of public spaces after research found teenage girls were less likely to go outside than boys (BBC News, 2023). Perhaps to counteract this issue, management of neighbourhood parks has been increased by Residents Welfare Associations (RWAs as well as the creation of governmental schemes (i.e. the Chief Minister's Park Beautification Scheme) which aims to expand and improve Delhi's parks (Hindustan Times, 2021). However, according to Ro (2019), play within parks is restricted by RWAs often catering parks to the needs of exercising and restricting opening times to allegedly reduce antisocial behaviour. Furthermore, the beautification scheme seems to be more centred around the investment of aesthetics, rather than youth utilisation. This aesthetic approach may be dismissive towards young people according to a teenage girl interviewed by Mahdiar and Dali (2016, p.126). She stated, "*The social environment of a park is more important than its beauty. Beautiful landscapes (are) for adults rather than teenagers.*" Despite efforts, India also seems to hold discriminatory planning practices towards girls, aside from impractical schemes which are dismissive of teenagers' utilisation of parks.

6. Well-being implications of inadequate park provisions for teenage girls in Scotland and India.

In both countries, lack of engagement, discrimination and exclusionary governmental plans are producing parks that girls feel unwelcome in, which in turn takes away opportunities for in-person social connections. Research shows that the main coping mechanism of Indian and Scottish teenage girls, which proved vital to their well-being involved meeting up with friends and speaking about their problems, without observation of their parents (Nagabharana et al., 2021; Scottish Government, 2022b). The following section explores the evident need for adequate parks for well-being and how, without them, girls' social development gaps may be leading to a downfall in mental health, leaving them susceptible to other issues in later life. Economic conditions and cultural norms aside, parallels can be drawn for India, suggesting that India's non-inclusive park spaces may cause major issues for future generations of women.

7. Scotland's well-being implications

In Scotland, due to the Coronavirus Pandemic, most of today's teenagers spent their last years of childhood/ earlier teenage years isolated from in-person contact. During this time, there were limitations on use of public spaces such as parks, leading to a restriction of fostering friendships in person. Evidence shows that during the Pandemic smartphone dependence and virtual socialisation spiked, followed by a deterioration of young people's mental health due to feelings of loneliness (Plan International, 2020). Today, this trend of isolation continues, states Haidt (2024), as teenagers are replacing real-life socialising, for their smartphones at home. With park spaces failing to consider gender differences, girls are seen to be more likely to seek virtual connections compared to boys. A Scottish

Government (2022b) survey highlights this, showing that teenage girls are almost 50% more likely than boys to feel socially excluded if they could not virtually communicate with their friends. This dependence on online contact could be detrimental to girls' social and emotional well-being according to Wales et al. (2022) and Hartas (2020). They emphasise that social relationships occurring in the public realm, rather than online,

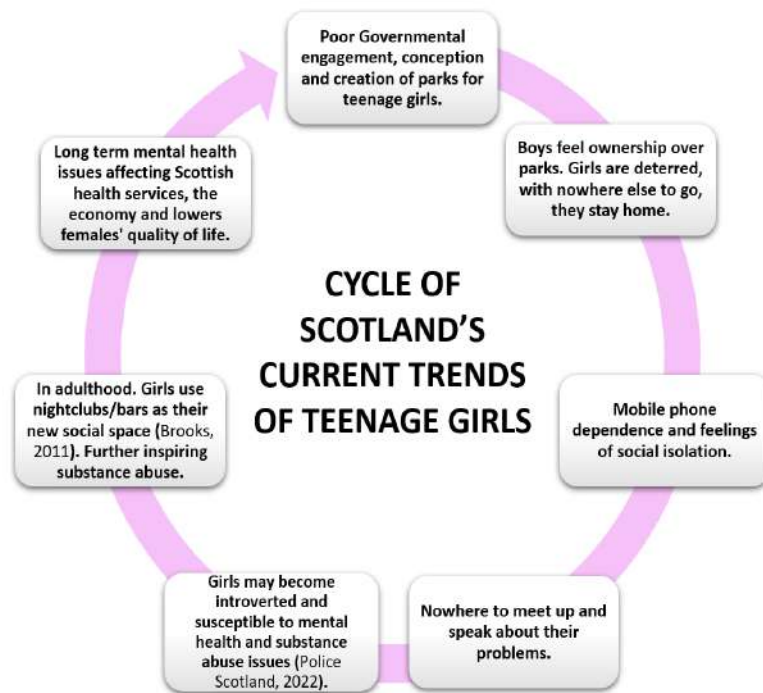


Figure 1. Cycle of Scotland's Current Trends of Teenage Girls. Source: Author, Gray (2024a).

are crucial for teenage development and mental health (ibid). Alarmingly, a lack of social interactions can also make females more susceptible to mental health issues and substance abuse later in life (Police Scotland, 2022).

Figure 1 (Gray, 2024a) shows a proposed lifecycle, displaying current trends within Scottish teenage girls. Using existing sources, this illustrates that parks failing to be adequately designed for girls may create domino-like effects that can diminish girls' quality of life. Figure 1 (Gray, 2024a) displays that the lack of adequate parks contributing to a lack of socialisation may be accelerating girls into substance abuse and poor mental health, with a well-established link worldwide between poor mental health, substance abuse and early death/ suicide (Devin et al., 2023; World Health Organization, 2023). The following Scottish studies underpin this cycle in Figure 1 (Gray, 2024a), that after teenage isolation is established, poor mental health follows, making females more susceptible to engage in substance use. Riley and Hayward (2004) found lack of social opportunities was one of the main reasons Scottish participants in their study took drugs; half experienced paranoia or anxiety because of drug use. Their study also exposed those females who tended to have access to free drugs, putting them at a vulnerable disadvantage that may incline them to engage in use (ibid). Scotland has a culture of substance abuse, with drug-related deaths the highest in Europe and moreover historically disproportionately high in females (BBC News, 2023; Scottish Government, 2018). Disproportionate female drug deaths

are attributed to social isolation and poor mental health (ibid). Thus, it could be said that social isolation of teenage girls, enabled by lack of park spaces, could be classed as a largely unrecognised root cause of girls' and women's poor mental health and substance use. This represents the critical role adequate parks may play in girls' future outcomes and quality of life.

8. India's Well-being Implications

Parallel to Scotland, India's lack of park space, powered by a lack of engagement, may also be causing the mental downfall of teenage girls. As stated previously, teenage girls use hanging out and talking with friends to sustain their mental well-being (Nagabharana et al., 2021). However, sources illustrate teenagers in India are experiencing issues such as high suicide rates and substance abuse, both of which may be attributed to social disconnection. One of the leading causes of death of young Indian females is suicide, with a key suicide risk factor for teenagers being interpersonal problems (lack of creation or maintenance of positive personal relationships) (Kay, 2013; Vijayakumar, 2022). Similarly, youth substance abuse is common with ~13% of those under 20 years old in India participating in substance abuse (ChildLine India, 2008). Teenage substance abuse in India can also be linked to inadequate socialisation according to Kaushik (2020), who states it is accelerated by a lack of emotional support, low socioemotional competence, and poor mental health. It has been proven that poor quality socialisation can have major negative impacts on young people's lives, displaying the pivotal role adequate parks could provide to foster and maintain friendships, to enhance interpersonal skills and decrease risks of suicide and substance abuse.

In both countries, a relationship has been correlated between teenagers' lack of appropriate park spaces, isolation and depletion of social relationships, which in turn, provide negative outcomes later in life (Wales et al., 2022; World Health Organisation, 2023). However, identifying these common issues early allows solutions to be found for India, which could inspire a brighter outlook. One way for India to solve a potential cause of this lack of socialisation – non-inclusive parks – is through digital governance and digital planning engagement of teenage girls.

9. Proposed digital governance model

We have already discussed how parks that are unfit for teenage girls' use results in the girls' diminished social development which leads to risks later in life. There is a recognition of the importance of effective and transformative engagement strategies towards girls' utilisation of parks for their current and future well-being. The following sections of this paper will address how India could address these issues via digital governance and engagement. India has previously been successful in improving quality of life through digital means. For example, the Delhi Government commissioned the Safetipin app, which allowed public users to complete >25,000 safety audits within the city using their smartphones. This allowed recommendations for city improvements, such as fixing street lighting and adjusting police routes (Safetipin, 2019).

To prevent India from facing potential outcomes similar to those experienced in Scotland, Figure 2 (Gray, 2024b) presents a proposed strategy to develop teenage girl governance of Indian parks digitally. For step 1, the positive impact of teaching digital skills will be

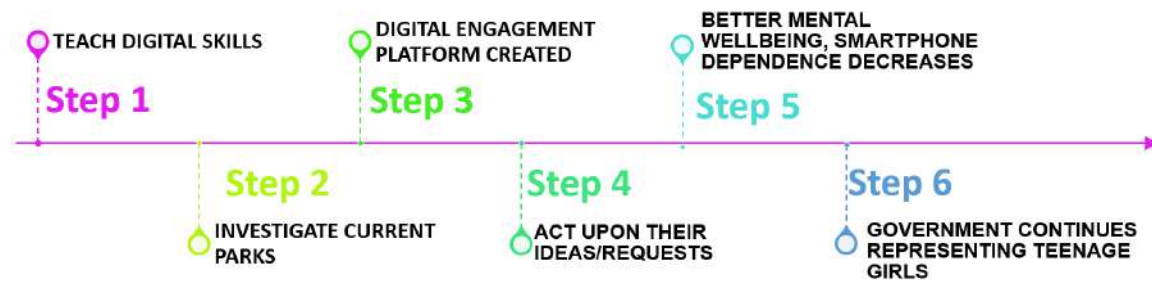


Figure 2. Proposed Digital Strategy. Source: Author; Gray (2024b).

explored, followed by step 2, explaining how to successfully investigate current parks. Step 3 then utilises digital means to gather data on teenage girls' preferences within parks, and step 4 ensures parks' successful implementation. Finally, step 5 and step 6 represent possible outcomes upon completion of this digital strategy. Additionally, with constrained resources throughout India, it is important to emphasise the following proposed process is context-dependent. It should be seen as a flexible means to utilise digital governance and engagement, which can be adapted to fit the community's needs.

Before steps within this strategy are explored in the following segments, it is important to consider Scotland's digital engagement failings, due to a lack of engagement and low governmental prioritisation of urban planning. In the United Kingdom, there are low public engagement rates in the planning process (UK Government, 2023). However, the Scottish Government (2020) Digital Planning Strategy created an opportunity to enhance engagement. It claimed it would digitally be "enabling everyone to get involved and shape their communities (...) using data to support and communicate decision making" (Scottish Government, 2020, p. 12). Unfortunately, recent governmental budget cuts have led to the termination of this investment in digital planning and this strategy. Thus, the potential to increase community involvement digitally has greatly diminished.

Furthermore, despite obvious use of social media amongst teenagers, the Government is reluctant to utilise it. Social media networks popular amongst teenagers, such as Instagram and Snapchat, are ignored as potential spaces to engage; many local authorities use Facebook as their sole social media outreach. This may be allowing a disconnect of education and communication around planning to teenagers, with Vogels et al. (2022) confirming Facebook is the site used least by teenagers. Despite this, previous initiatives have proven that engaging young people in the planning system through social media can enhance community involvement. For example, the UK Government (2023) found using social media caused an increase in responses in an online local authority poll, which collected more youthful and diverse responses. Scotland's digital failings build a foundation of knowledge surrounding issues India can avoid while striving towards better digital governance and engagement, which in turn could gather broader perspectives on spaces, potentially leading to the creation of more inclusive parks for teenage girls.

10. Step 1 - Teach Digital Skills

Step 1 of this proposed digital strategy highlights the importance of teaching digital skills to teenage girls. Later, it will be explored how these digital skills can be used in

the engagement and governance process to enhance India's parks, resulting in healthier, happier, and more educated girls.

In teaching digital skills, there is much to be considered. Firstly, cultural norms may limit girls' participation in these initiatives, so to source teenage girls, groups could utilise advertisements of digital education lessons to families, including through radio, SMS, WhatsApp, Telegram, community noticeboards or promotional leaflets. Both online and in-person signup options should be available. It is likely, due to India's cultural backdrop and lack of resources, that there will also be other barriers to digital teaching. Therefore, it is important that groups such as charities, non-governmental organisations, schools or community groups collaborate with those who could financially assist in the process and/or have an established presence in the area. Furthermore, digital devices may be subsidised by the Government for schemes like this, as the Indian Government (2019, p.193) recognises digital advances within education as a potential investment into future opportunities.

Teaching digital skills may feel like a strenuous task. However, girls having access to digital learning could create more engagement opportunities for parks, as well as provide other opportunities for India's development. Three key opportunities include the reduction of educational gaps, skill building for the future workforce, and improving future outlooks. Educational gaps exist among Indian females; ~43% of girls drop out before finishing secondary school and experience a lack of access to information (UNICEF, 2017). Despite facing these barriers, females can be seen to be perusing digital educational opportunities. This is exemplified through a study, in which ~70% of Indian teenage girls did not know how to use computer documents or social media, but almost all wanted to learn, and with more females than males using the internet for online learning purposes (Dang, 2019; Kantar, 2022). Secondly, skills of the future workforce. Digital growth could be enhanced and India's focus on STEM (science, technology, engineering, and mathematics) subjects could be utilised to good effect. The Indian Government's (2019, p.193) Roadmap to Digital Growth strategy, presents one of their goals as "Quality Education for All" alongside digital educational content delivery and learning, which could address educational disparities, and enhance skills. Lastly, via digital education, girls' mental health and quality of life could be improved. Exposing girls to smartphones, digital skills, and social media could contribute to female digital empowerment, virtual communication and future employability. However there are already alarming trends of teenagers virtual use in India. Parallel to Scotland, some Indian girls are beginning to rely on online messaging for fostering connections, leading to a decline of in-person socialisation in teenagers (Singh, 2019). In one study, teenage girls were found to be twice as likely to check their social media and virtual messaging updates compared to boys (Gangadharan et al., 2022). Therefore, within this digital education, it is important to provide girls with knowledge on how to use virtual communication responsibly, to mitigate various risks associated with overuse.

11. Step 2 - Investigate current parks

Step 2 allows girls to explore local parks and decide what they like and dislike about them. This will allow clarity of potential improvement options. After teaching digital skills to teenage girls, there should be a outreach to them. It is important that groups of teenagers investigate these parks, and not solely group leaders or decision-makers. Only teenagers

know what they want within parks. Perhaps a 'Girls Only' time within local parks could be arranged to allow girls to feel unconfined and safe to investigate. This will also allow girls to see what their digital skills could solve through engagement. Furthermore, for overall success, groups should define the desired outcome of each park visit is, and what each digital engagement strategy and park upgrade may be. Realistic expectations and budgets should also be set.

12. Step 3 - Digital platform created

Step 3 of the proposed digital strategy delves into enhancing digital governance and the creation of digital means for engagement. After step 1 of teaching digital skills and step

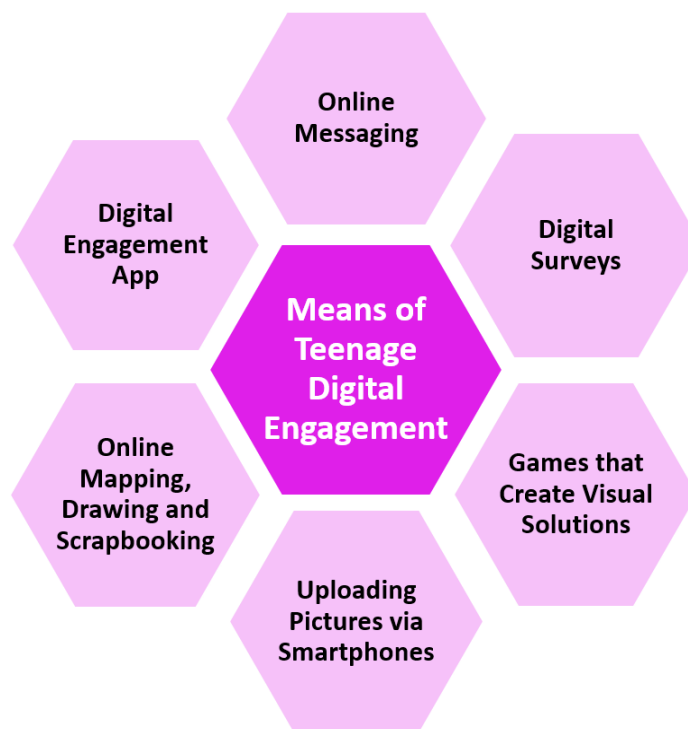


Figure 3. Means of Teenage Digital Engagement. Source: Author, Gray (2024c).

2 of investigating parks, digital engagement platforms can be created. This section will touch on alternative approaches centred around teenage girls. Femnet (2022) shares that in planning engagements, teenage girls tend to express themselves best within informal and imaginative activities, with United Nations (2015) highlighting that visualisation is an essential engagement tool for young people. Figure 3 (Gray, 2024c) presents digital engagement options ranging in cost and educational ability and reflects the importance of creativity within youth engagements.

The following points are the digital engagement options outlined in Figure 3 (Gray, 2024c) above to provide further detail.

- **Online messaging** for example through WhatsApp, Telegram, mailing lists, SMS or social media is essential for updating the girls, their communities, and other stakeholders. This also could allow for the fostering of relationships. One example

of online communication having successful outcomes, is an Indian project called WE For Us. Using a community noticeboard displaying a link to a WhatsApp community group, young people were notified of work opportunities aiding employment and skills for young people (Dar and Chopra, 2019).

- **Digital surveys** can be a low-cost and anonymous way to easily gather and analyse data. They can also present in audio form to support those with low literacy. However, Fass-Holmes (2022) found surveys aimed at young people commonly received low response rates due to participants experiencing diminishing interest and seeing it as a mundane task. However, digital surveys can be designed to be creative, colourful, and engaging. They can incorporate colour, background music and drawing options. All text should be written in a way young audiences will understand.
- **Games to create visual solutions.** The United Nations has made progress in utilising videogames like Minecraft as an effective form of youth engagement; however, it could be perceived this is not best suited for teenage girl's amusement. The University of Sheffield (2022) found almost 70% of video game users were males and United Nations (2015) stated gender must be considered when using video games as engagement tools. This is perhaps why alternative games should be researched and trialled. One example could be the Sims, a free digital game, in which players can design places within their virtual town and create 'Sims' characters within it. Imaginative park spaces could be designed by girls, producing visual representations of ideal parks. There is limited research of this game in relation to planning engagement. However, studies show Sims is preferred by females because of its realism and creativity (Vermeulen et al., 2011). With teenage girls expressing they liked the Sims game because they were able to explore "spatial possibilities (...) constructing living spaces, (...) and developing distinctive designs" (Dyson, 2008, p.199).
- **Uploading and taking pictures of parks**, easily allows for visual data to be collected and annotated to inspire ideas.
- **Basic forms of digital drawing, mapping, and scrapbooking** about parks allow visual and fun representations, which can be easily created and collected.
- **A digital engagement app could be created.** For example, a STEM workshop could allow teenage girls to aid an apps creation, followed by their utilisation of it to engage in park planning. One example of an app centring around engagement is the American app 'Community PlanIt'. This was a fun interactive digital game used by local governments, which successfully engaged young people in planning through earning digital credits for their participation (Boston City Council, 2011). Or an app could be made in collaboration with the government to be more streamlined and widespread. Apps like this have previously been successful in India. The innovative app SSG18, was created through collaboration with the Indian Government. The app allowed rural populations to facilitate governmental sanitation schemes by uploading data about their sanitation facilities via their smartphone. After just one month, the app received over 8 million responses, which in turn advocated improved sanitation, forming a better quality of life in rural areas (Kantar, 2019).

13. Step 4 - Act upon their requests

Step 4 ensures vitality of the parks created or improved through digital engagement. In

some cases, due to issues of communication, budgets, or conflicting priorities, there can be disparities between engagement inputs and implementation within the final design. This creates places that feel right to decision-makers, but do not reflect the thoughts and ideas of those engaged. It is vital that engagement data is valued throughout the implementation process to ensure teenage girls' successful utilisation in parks.

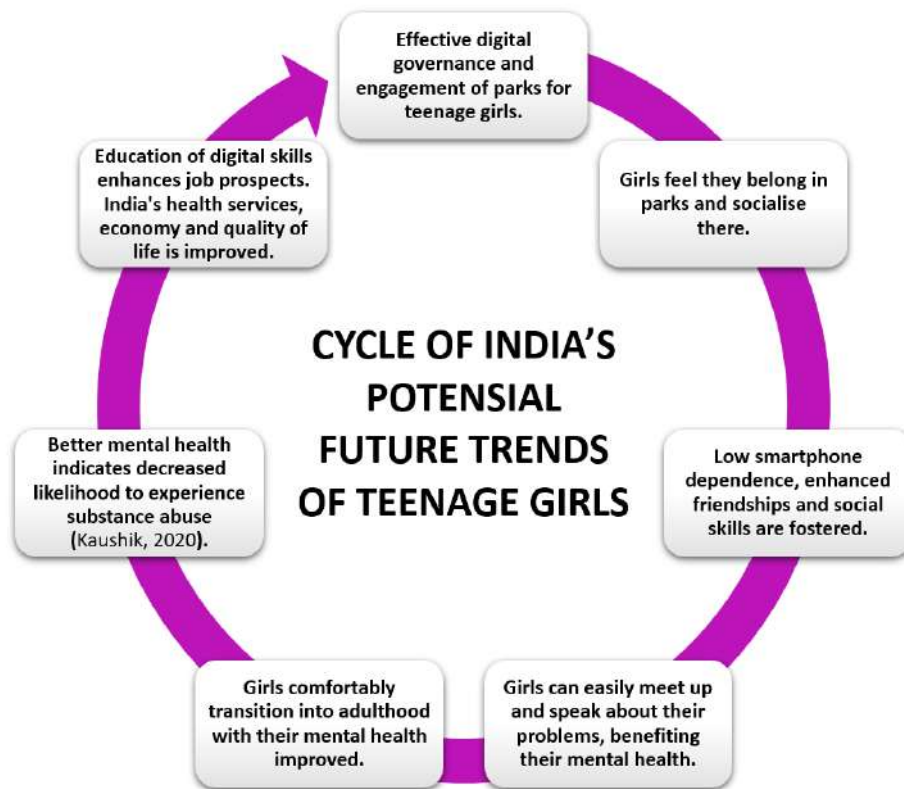


Figure 4. Cycle of India's Potential Future Trends of Teenage Girls. Source: Author, Gray (2024d).

14. Step 5 and Step 6 - Potential outcomes of digital strategy

Outcomes of the proposed digital strategy are displayed through, step 5 - Better Mental Well-being with Smartphone Dependence Decreasing and step 6 – the Government Continuing to Represent Teenage Girls.

Learning from the failings observed in Scotland, effective and transformative engagement strategies aimed at creating inclusive park spaces for girls are crucial. Steps 1 to 4 within the proposed digital strategy have highlighted a pathway to improved digital governance and engagement of teenage girls in India. Now steps 5 and 6 will portray outcomes of this process. Figure 4 (Gray, 2024d) below displays a lifecycle of India's potential positive future trends of teenage girls after using this digital strategy. This displays how digital education and engagement can potentially lead to adequate parks and influence teenage girls' current socialisation and future outcomes.

Because improving parks can foster girls' social connections, it also can potentially lead to lower reliance on online communication, and improve mental health (Make Space for

Girls, 2023a; Wales et al., 2022). Furthermore, providing digital education and engagement improves digital governance, female planning participation, and digital skills. This process also contributes to outcomes within a wider outlook. India's economy could be boosted with enhanced digitalisation and workforce education penetrating through to the lower working classes. Furthermore, India's healthcare system expenses could be lowered, with a decrease in mental health and substance abuse patient demand. Lastly, the female representation in public spaces through engagement and digital governance contributes to India's planning becoming more inclusive, allowing communities to be safer, happier, and more resilient.

15. Conclusion

In conclusion, this essay has explored how India can support teenage girls' mental well-being via inclusion of park planning through digital engagement. This was done by first exploring Scotland's mistakes in park planning and engagement. In Scotland, parks are not being planned according to teenage girls' wants and needs, due to local authorities being dismissive of teenage girls' use of parks within plans, as well as the termination of governmental provisions of digital engagement. Research within this report displayed that these failings may have led to a lack of socialisation in teenage girls, enabling social isolation and phone dependence, potentially resulting in poor mental health and substance abuse. However, these trends can be challenged and avoided. Using integrated digital learning and digital planning engagement, India could avoid Scotland's current outcomes and develop parks that are more inclusive. The proposed digital strategy could support parks to become more usable for girls through engagement, leading to enhanced socialisation, lower rates of smartphone dependence, and improvement of digital skills, which would reduce girls' mental-health related care and create a more digitally skilled female population, resulting in better career prospects.

There are two key lessons from Scotland that can be applied to India.

Lesson 1 - Recognise females within governmental plans and engage them in the planning and designing of spaces. Girls and women experience places differently than males. They hold unique concerns when it comes to parks that currently go unaddressed, which promotes discrimination and limits females' freedom of use, access, and safety in public spaces. In Scotland, lack of parks suitable for teenage girls has led to them experiencing a lower quality of life due to few social opportunities being provided. If the Government had engaged with girls on this issue, their parks could enhance socialisation, not deter it. India recognising females experiences and needs within parks via improvements in governmental policy could set a norm and reduce gender inequalities. India has challenges of resource allocation, but engagement of girls could enhance utilisation of spaces and sustainability. For example, resilient places could be created based on various local perspectives. This could provide better governance and encouragement of sustainable lifestyles in places like parks when they are designed to cater to everyone.

Lesson 2 – Utilise digital engagement and digital education to build future resilience. Despite wealth, Scotland has not kept up to date with digital means of engagement, leaving many without a voice in the planning process. India's vast and diverse population means traditional in-person planning engagement methods are unlikely to effectively capture the perspectives of numerous individuals. Unlike Scotland, if India developed their digital engagement outreach (including through social media for teenagers), regardless

of age, location or socioeconomic status, residents could be informed and empowered to contribute to the planning and design of their public spaces. India's digitalisation is developing and to build future resilience, youth digital education is essential to deliver technological skills and to create prosperous future outlooks. For teenage girls, digital platforms can also strengthen the means of communication and their access to information.

References

- Arup (2022) 'Cities Alive: Designing cities that work for women' [Online]. Available at: <https://www.arup.com/perspectives/publications/research/section/cities-alive-designing-cities-that-work-for-women> (Accessed: 03 December 2023).
- Barker, A. Holmes, G. Alam, R. Cape-Davenhill, L. Osei-Appiah, S. and Warrington Brown, S. (2022) 'What Do Teenage Girls Like And Dislike About Park Play Spaces And Multi-use Games Areas?' [Online]. Available at: <https://eprints.whiterose.ac.uk/194518/> (Accessed: 06 December 2023).
- BBC News (2023) 'Why Half of India's Urban Women Stay at Home', Soutik Biswas, 02 March [Online]. Available at: <https://www.bbc.co.uk/news/world-asia-india-64810339> (Accessed: 17 December 2023).
- BBC News (2023). 'Scottish Drug Deaths Drop to Lowest Level for Five Years', 22 August [Online]. Available at: <https://www.bbc.co.uk/news/uk-scotland-66572155> (Accessed: 07 December 2023).
- Boston City Council (2011) 'Community Planit'. Boston: New Urban Mechanics [Online]. Available at: <https://www.boston.gov/civic-engagement/community-planit> (Accessed: 24 December 2023).
- Brooks, O. (2011) 'Consuming Alcohol in Bars, Pubs and Clubs', *Annals of Leisure Research*, 11(3-4) [Online]. Available at: <https://www.tandfonline.com/doi/epdf/10.1080/11745398.2008.968680?needAccess=true> (Accessed: 06 December 2023).
- Brown, H. (2022) 'Glasgow becomes UK's first feminist city', *The Scotsman*, 27 October [online]. Available at: <https://www.scotsman.com/news/people/glasgow-becomes-uks-first-feminist-city-as-town-planning-motion-from-councillor-holly-bruce-passes-3896633> (Accessed: 01 July 2024).
- ChildLine India (2008) 'Child Drug Addiction in India' [Online]. Available at: <https://www.childlineindia.org/a/issues/addiction> (Accessed: 19 December 2023).
- Cabe Space (2005) 'Decent parks? Decent behaviour?', Commission for Architecture and the Built Environment [Online]. Available at: <https://forestry.gov.scot/images/corporate/pdf/CABEDecentparksDecentBehaviour.pdf> (Accessed: 05 December 2023).
- Dang, G. (2019) 'Teenage Girls in India: Aspirations and Reality', *Brookings*, 03 April [Online]. Available at: <https://www.brookings.edu/articles/teenage-girls-in-india-aspirations-and-reality/> (Accessed: 24 December 2023).
- Dar, A. Chopra, D. (2019) 'Placemaking through Co-Design processes: A Case Study of Jai Hind Camp, Delhi', *Social Design Studio* [Online]. Available at: <https://www.sciencedirect.com/science/article/pii/S2666558124000198> (Accessed: 26 December 2023).
- Devin, J. Lyons, S. Murphy, L. O'Sullivan, M. and Lynn, E. (2023) 'Factors Associated With Suicide In People Who Use Drugs', *BMC psychiatry*, 23(1) [Online]. Available at: <https://link.springer.com/article/10.1186/s12888-023-05131-x> (Accessed: 6 December 2023).
- Dyson, L. (2008) 'Teenage girls play house. The cyber-drama of The Sims', p.199 [Online]. Available at: https://link.springer.com/chapter/10.1057/9780230583306_19 (Accessed: 19 December 2023).
- Edinburgh Council (2016) 'Play Area Action Plan 2011-2016'. Edinburgh: Edinburgh Council, p.16

- [Online]. Available at: <https://www.edinburgh.gov.uk/downloads/file/22571/play-area-action-plan-2011-2016> (Accessed: 04 December 2023).
- Fass-Holmes, B. (2022) 'Survey Fatigue. What Is Its Role in Undergraduates' Survey Participation and Response Rates?', *Journal of Interdisciplinary Studies in Education*, 11(1) [Online]. Available at: <https://eric.ed.gov/?id=EJ1344904> (Accessed: 30 December 2023).
- Femnet (2022) 'Teenage Girls Engagement Strategy', The African Women's Development and Communication Network [Online]. Available at: <https://www.femnet.org/wp-content/uploads/2022/02/FEMNET-Teenage-Girls-Engagement-Strategy.pdf> (Accessed: 30 December 2023).
- Fife Council (2023) 'Fife's Play Sufficiency Assessment'. Glenrothes: Planning [Online]. Available at: <https://storymaps.arcgis.com/stories/7c56c8baf70d4e0a9cad84e189dc1724> (Accessed: 07 December 2023).
- Gangadharan, N. Borle, A. Basu, S. and Navya, G. (2022) 'Mobile Phone Addiction as an Emerging Behavioral Form of Addiction Among Adolescents in India', *Cureus*, 14(4) [Online]. Available at: <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC9067330/#:~:text=It%20was%20also%20observed%20that,0.015> (Accessed: 08 December 2023).
- Girlguiding (2020) 'Girls Attitudes Survey 2020' [Online]. Available at: <https://www.girlguiding.org.uk/globalassets/docs-and-resources/research-and-campaigns/girls-attitudes-survey-2020.pdf> (Accessed: 03 July 2024).
- Gray, H. (2024a) Figure 1 'Cycle of Scotland's Current Trends of Teenage Girls' (Created: 08 December 2023).
- Gray, H. (2024b) Figure 2 'Proposed Digital Strategy' (Created: 08 December 2023).
- Gray, H. (2024c) Figure 3 'Means of Teenage Digital Engagement' (Created: 08 December 2023).
- Gray, H. (2024d) Figure 4 'Cycle of India's Potential Future Trends of Teenage Girls' (Created: 08 December 2023).
- Haidt, J. (2024) 'The Anxious Generation', Random House [Online]. Available at: https://books.google.co.uk/books?hl=en&lr=&id=uCvAEAAAQBAJ&oi=fnd&pg=PT7&dq=the+anxious+generation+2024&ots=SV6dz-pdpP&sig=bwrrBmnCXZYKgljK3UvZqeQfejC&redir_esc=y#v=onepage&q=lockdown&f=false (Accessed: 05 July 2024).
- Hartas, D. (2020) 'Teenage Play and Peer Interactions: Virtual, Social and Emotional Geographies', pp. 1-31 [Online]. Available at: https://link.springer.com/chapter/10.1007/978-3-030-60001-3_1 (Accessed: 08 December 2023).
- Hindustan Times (2016) 'Girls more affected by lack of open spaces in Mumbai', Tanushree Venkatraman, 13 June [Online]. Available at: <https://www.hindustantimes.com/mumbai/girls-more-affected-by-lack-of-%20open-spaces-in-mumbai/story-32AFiNg8QS1qMVlwBlqn7H.html> (Accessed 22 December 2023).
- Hindustan Times (2022) 'Govt Draws Out Plan to Beautify Delhi's Gardens and Parks', HT Correspondent, May 24 [Online]. Available at: <https://www.hindustantimes.com/cities/delhi-news/govt-draws-out-plan-to-beautify-delhi-s-gardens-and-parks-101653330796657.html> (Accessed: 08 July 2024).
- Indian Government (2011) 'Population Finder 2011'. New Delhi: The Ministry of Home Affairs [Online]. Available at: <https://censusindia.gov.in/census.website/data/population-finder> (Accessed: 01 July 2024).
- Indian Government (2015) 'Maintenance and Up Keeps of Children Parks'. New Delhi: Delhi Parks and Gardens Society [Online]. Available at: https://dpgs.delhi.gov.in/sites/default/files/DPGS/pdf_files/minutes_of_meeting_2015-16.pdf (Accessed: 20 December 2023).
- Indian Government (2019) 'India's Trillion-Dollar Digital Opportunity', p. 193. New Delhi: Ministry of Electronics and Information Technology [Online]. Available at: https://www.meity.gov.in/writereaddata/files/india_trillion-dollar_digital_opportunity.pdf (Accessed: 28 December 2023).
- Indian Government (2023) 'Safe City Projects'. New Delhi: The Ministry of Home Affairs [Online]. Available at: <https://www.mha.gov.in/en/divisionofmha/women-safety-division/safe-city-projects>

- (Accessed: 29 June 2024).
- International Trade Administration (2023) 'United Kingdom Country Commercial Guide'. Washington DC: U.S. Department of Commerce [Online]. Available at: <https://www.trade.gov/knowledge-product/united-kingdom-market-overview> (Accessed: 02 July 2024).
- Kaul, K. Shrivastava, S. (2017) 'Safety of Women in Public Spaces in Delhi. Governance and Budgetary Challenges', Centre for Budget and Governance Accountability [Online]. Available at: <https://www.cbgaindia.org/wp-content/uploads/2017/01/Women-safety-in-delhi.pdf> (Accessed: 28 December 2023).
- Kantar (2019) 'A New Paradigm for Digital Citizen Engagement in India' [Online]. Available at: <https://www.kantar.com/uki/industries/government-and-public-sector/digital-citizen-engagement-in-india> (Accessed: 29 December 2023).
- Kantar (2022) 'Internet in India 2022' [Online]. Available at: https://www.iamai.in/sites/default/files/research/Internet%20in%20India%202022_Print%20version.pdf (Accessed: 30 December 2023).
- Kaushik, V. (2020) 'Getting the Monkey Off Your Back: Teen Perceptions of Substance Abuse among their Peers in Delhi', *Journal of Psychosocial Research*, 15(2) [Online]. Available at: <https://www.proquest.com/docview/2475528314?sourcetype=Scholarly%20Journals> (Accessed: 17 December 2023).
- Kay, M. (2013) 'Suicide Is Leading Cause of Death in Young Indian Women, Finds International Study', *MBJ*, 26 March [Online]. Available at: <https://www.bmj.com/content/346/bmj.f1900.long> (Accessed: 17 December 2023).
- Mahdiar, Z. Dali, M. (2016) 'Adolescent Use of Urban Parks and their Social Environment Consequences', *Geografia*, 12(11) [Online]. Available at: <https://www.proquest.com/docview/2488709069?pq-origsite=gscholar&fromopenview=true&sourcetype=Scholarly%20Journals> (Accessed: 19 December 2023).
- Make Space for Girls (2023a) 'Research Report 2023' [Online]. Available at: <https://www.makespaceforgirls.co.uk/resources/research-report-2023> (Accessed: 06 December 2023).
- Make Space for Girls (2023b) 'Parkwatch Report September 2023' [Online]. Available at: <https://www.makespaceforgirls.co.uk/parkwatch> (Accessed: 04 December 2023).
- McDowell, L. (1983) 'Towards an Understanding of the Gender Division of Urban Space'. *Environment and Planning, Society and Space*, 1(1) [Online]. Available at: <https://journals.sagepub.com/doi/abs/10.1068/d010059> (Accessed: 02 July 2024).
- Nagabharana, T, Joseph, S. Rizwana, A. Krishna, M. Barker, M. Fall, C. Kumaran, K. and Krishnaveni, G. (2021) 'What Stresses Adolescents? A Qualitative Study on Perceptions of Stress, Stressors and Coping Mechanisms Among Urban Adolescents in India', *Wellcome Open Research*, 6 [Online]. Available at: <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC8170530/> (Accessed: 08 December 2023).
- Plan International (2020) 'The state of girls' rights in the UK 2020' [Online]. Available at: <https://plan-uk.org/file/plan-uk-state-of-girls-rights-coronavirus-reportpdf/download?token=gddEAzLz> (Accessed: 15 December 2023).
- Play Scotland (2023) 'The State of Play in Scotland 2023' [Online]. Available at: <https://www.playscotland.org/wp-content/uploads/State-of-Play-in-Scotland-2023.pdf> (Accessed: 15 December 2023).
- Police Scotland (2022) 'Social Media Guidance for Parents & Carers', *Police Scotland Cybercrime* [Online]. Available at: <https://www.cyberscotland.com/wp-content/uploads/2022/08/Police-Scotland-Social-Media-Guidance.pdf> (Accessed: 14 December 2023).
- Riley, S. Hayward, E. (2004) 'Patterns, Trends, and Meanings of Drug Use by Dance-drug Users in Edinburgh', 11(3) [Online]. Available at: https://www.tandfonline.com/doi/abs/10.1080/09687630310001643111?casa_token=fvsMFokwGjEAAAAA:O7bf12LqRaa8fQo-IGKKbAdyha45_PQXluZPIYWW6Q_oopmthn-lhzWcFyjfRXUH3Je0dJ5AoLk (Accessed: 11 December 2023).
- Ro, C. (2019) 'Are India's Parks For Looking At Or Playing In?', *Forbes*, 17 October [Online]. Available at: <https://www.forbes.com/sites/christinero/2019/10/17/are-indias-parks-for-looking->

- [at-or-playing-in/](#) (Accessed: 02 July 2024).
- Safetipin (2019) 'Safetipin Case Study Delhi' [Online]. Available at: <https://safetipin.com/case-study-delhi/> (Accessed: 18 December 2023).
- Scottish Government (2017) 'Barriers to community engagement in planning: a research study'. Edinburgh: Planning and Architecture Division [Online]. Available at: <https://www.gov.scot/publications/barriers-to-community-engagement-in-planning-research/> (Accessed: 01 July 2024).
- Scottish Government (2018) 'Why are drug-related deaths among women increasing in Scotland?' Edinburgh: Health and Social Care [Online]. Available at: <https://www.gov.scot/publications/drug-related-deaths-women-increasing-scotland-9781787810129/pages/4/> (Accessed: 07 December 2023).
- Scottish Government (2020) 'Transforming Places Together', p.12. Edinburgh: Building, Planning and Design [Online]. Available at: <https://www.gov.scot/publications/transforming-places-together-scotlands-digital-strategy-planning/> (Accessed: 09 December 2023).
- Scottish Government (2022a) 'Information on the £60m Play Park Renewal Fund'. Edinburgh: Children and Families [Online]. Available at: <https://www.gov.scot/publications/foi-202200305397/> (Accessed: 08 December 2023).
- Scottish Government (2022b) 'Life at Age 14: Initial Findings from the Growing Up in Scotland Study'. Edinburgh: Children and Families [Online]. Available at: <https://www.gov.scot/publications/life-age-14-initial-findings-growing-up-scotland-study/pages/6/> (Accessed: 09 December 2023).
- Scottish Government (2023a) 'Scotland's Census 2022 - Rounded Population Estimates' [Online]. Available at: <https://www.scotlandscensus.gov.uk/2022-results/scotland-s-census-2022-rounded-population-estimates/#section10> (Accessed: 07 July 2024).
- Scottish Government (2023b) 'Scottish Budget:2024 to 2025'. Edinburgh: Economy Money and Tax [Online]. Available at: <https://www.gov.scot/publications/scottish-budget-2024-25/documents/> (Accessed: 03 July 2024).
- Singh, V. (2019) 'Impact of Social Media on Social Life of Teenagers in India' [Online]. Available at: <https://dergipark.org.tr/en/download/article-file/683176> (Accessed: 20 December 2023).
- UK Government (2023). 'How The Adoption Of Digital Tools Increased the Number of Responses to Planning Consultations'. London: Department for Levelling Up [Online]. Available at: <https://www.localdigital.gov.uk/case-studies/how-the-adoption-of-digital-tools-increased-the-number-of-responses-to-planning-consultations/> (Accessed: 04 December 2023).
- UNICEF (2017) 'Adolescent Development and Participation', UNICEF India [Online]. Available at: <https://www.unicef.org/india/what-we-do/adolescent-development-participation> (Accessed: 02 December 2023).
- UNICEF (1990) 'The United Nations Convention on the Rights of the Child' [Online]. Available at: <https://www.unicef.org.uk/wp-content/uploads/2016/08/unicef-convention-rights-child-uncrc.pdf> (Accessed: 02 December 2023).
- United Nations (2010) 'The Millennium Development Goals Report 2010', p.22 [Online]. Available at: <https://www.un.org/millenniumgoals/pdf/MDG%20Report%202010%20En%20r15%20-low%20res%2020100615%20-.pdf> (Accessed: 02 July 2024).
- United Nations (2012) 'United Nations Population Fund. Adolescent and Youth Demographics' [Online]. Available at: <https://www.unfpa.org/sites/default/files/resource-pdf/One%20pager%20on%20youth%20demographics%20GF.pdf> Accessed: 07 July 2024).
- United Nations (2013a) 'Charter of Public Space', p.2 [Online]. Available at: <https://habnet.unhabitat.org/sites/default/files/documents/Charter%20of%20Public%20Space.pdf> (Accessed: 29 June 2024).
- United Nations (2013b) 'Adolescent Girls' Views on Safety in Cities', UN Habitat [Online]. Available at: https://hercity.unhabitat.org/app/uploads/2022/10/New_Adolescent_Girls_Views_Safety_in_Cities_2013.pdf (Accessed: 02 December 2023).
- United Nations (2015) 'Using Minecraft for Youth Participation in Urban Design and Governance',

- UN Habitat [Online]. Available at: <https://unhabitat.org/using-minecraft-for-youth-participation-in-urban-design-and-governance> (Accessed: 29 December 2023).
- United Nations (2021) 'About Her City', UN Habitat [Online]. Available at: <https://hercity.unhabitat.org/about> (Accessed: 02 December 2023).
- University of Sheffield (2022) 'UK Games Industry Census 2022', 17 March [Online]. Available at: <https://www.sheffield.ac.uk/news/games-industry-census-2022-reveals-working-home-shift-increase-mental-health-struggles> (Accessed: 01 July 2024)
- Vermeulen, L. Van Looy, J. Courtois, C. and De Grove, F. (2011) 'Girls Will Be Girls: A Study into Differences in Game Design Preferences Across Gender and Player Types', University of Ghent [Online]. Available at: <https://core.ac.uk/download/pdf/55870539.pdf> (Accessed: 20 December 2023).
- Vijayakumar, L. Chandra, P. Kumar, M. Pathare, S. Banerjee, D., Goswami, T. and Dandona, R. (2022) Evidence-based Risk Factors for Suicide in India Across the Lifespan Infographic', *The Lancet Psychiatry*, 9(2) [Online]. Available at: <https://www.thelancet.com/infographics-do/suicide-risk-india> (Accessed: 06 December 2023).
- Viswanath, K. Mehrotra, S. (2007) 'Shall we go out? Women's Safety in Public Spaces in Delhi'. *Economic and Political Weekly* [Online]. Available at: <https://www.jstor.org/stable/4419521> (Accessed: 06 December 2023).
- Vogels, E. Gelles-Watnick, R. and Massarat, N. (2022) 'Teens, Social Media and Technology 2022', Pew Research Centre [Online]. Available at: <https://policycommons.net/artifacts/2644169/teens-social-media-and-technology-2022/3667002/> (Accessed: 01 December 2023).
- Wales, M. Martensson, F. Hoff, E. and Jansson, M. (2022) 'Elevating the Role of The Outdoor Environment for Adolescent Well-being in Everyday Life', *Frontiers in Psychology*, 13 [Online]. Available at: <https://www.frontiersin.org/articles/10.3389/fpsyg.2022.774592/full> (Accessed: 23 December 2023).
- World Health Organization (2023) 'Suicide - Face Sheets' [Online]. Available at: <https://www.who.int/news-room/fact-sheets/detail/suicide> (Accessed: 18 December 2023).

The Intangible Values of Placemaking in Engaging Youth for Activating and Shaping Places in Italy

Martina Borini

Politecnico di Milano, Italy
Department of Architecture and
Urban Studies (DAStU)
martina.borini@polimi.it

Stefania Campioli

Politecnico di Milano, Italy
Department of Architecture, Built Environment
and Construction Engineering (dABC)
stefania.campioli@polimi.it

Abstract

Placemaking represents a multifunctional approach to urban design that brings together communities around places to foster their sense of belonging and enhance the identity of urban spaces. These places represent the backbone of the city, not only for their physical dimension, but also for social and cultural interactions, where youth have an active role in envisioning a new future for cities by actively participating in placemaking processes, acquiring a strong sense of ownership, and creating youth-friendly places. In that vision, schools can boost this approach by starting to rethink public spaces around them together with students. This study addresses, firstly, the necessity to recognise the intangible values of urban projects by assessing the values of a placemaking process when no physical changes have yet been realised. Secondly, it delves into the benefits of engaging youth in the creation of inclusive and sustainable cities. It examines how youth engagement in these processes can be advantageous and how schools can play a crucial role in the development of public spaces by participating in placemaking activities.

To address these research questions and evaluate the intangible values, an “Impacts Assessment Framework” was developed. This tool helps reconsider challenges by expanding their scope and seeking solutions. The framework was also used to evaluate the “Carpi Campus” experience, assessing the impacts of intangible values from the initial phase, even before physical changes were implemented. The intangible values of placemaking in engaging youth include understanding and addressing complex issues pedagogically, training in active citizenship (including typically excluded individuals in urban planning), and fostering new design abilities for envisioning future scenarios.

Keywords: youth empowerment, youth-friendly places, innovative teaching methods, intangible values, Impacts Assessment Framework

To cite this article:

Borini, M. and Campioli, S. (2024) “The Intangible Values of Placemaking in Engaging Youth for Activating and Shaping Places”, *The Journal of Public Space*, 9(2), pp. 147–166. doi: 10.32891/jps.v9i2.1785.

This article has been double blind peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

I. Introduction

1.1 The role of Placemaking process into urban design

Discussing urban design means having a more layered and complex understanding of context, encompassing a place's history, people, functional aspects, form, and unique identity.

In this sense, placemaking emerges as a valuable approach that emphasises the essential connection between people and places. Centred around community-based participation, a successful placemaking process leverages assets, inspiration, and potential of a local community. This leads to the development of high-quality public spaces that enhance people's health, happiness, and overall well-being (PPS, 2007).

1.2 Placemaking influences physical spaces and communities in both tangible and intangible ways

While there is no singular, rigid definition or methodology for placemaking, its core principles can be summarised as follows: it is an open-ended process involving active community participation, aiming to create inclusive, safe, healthy, and attractive places while understanding and enhancing local identity. Placemaking considers physical, social, ecological, cultural, and spiritual qualities of places, combining top-down planning with bottom-up initiatives for a democratic and inclusive approach (PPS, 2007). It brings together diverse stakeholders, enriching urban projects with varied perspectives and creating intangible values that enhance vibrancy and liveability. Emphasising community engagement over measurable outcomes, placemaking includes youth to foster ownership and connection. Engaging young people through workshops and collaborative activities often results in high-quality research outcomes (Millard, 2015).

The primary question at the base of the research is how to effectively engage youth in designing public spaces. Listening to and involving users is essential for creating inclusive spaces (Campioli, 2020, p. 182). High school students have been pivotal in transforming anonymous spaces into vibrant campuses, emphasising sustainability and the Sustainable Development Goals (SDGs). Assessing the benefits of youth involvement through placemaking shows it fosters a sense of belonging to the community, crucial for individual and collective identity. Through co-design initiatives, it is possible to foster this feeling around places, extending not only among classmates but also involving all students and teachers about the project area. Diversity, community, and participation are three interconnected factors that shape the identity of places and communities (Peraboni, 2020, p. 8). The third theme explores the role of schools as catalysts for community and city development. Usually, schools have the potential to serve as a focal point for social activities for students, their families, and local citizens. The 2016 #Scuoleinnovative program of MIUR (Ministry of education) highlighted the importance of the relationship between schools and territory and it proposes schools as civic centres and multifunctional spaces to promote the socialisation, wealth, and well-being of students. As Nucci (2020, p. 10) states, "school areas can become identity-creating and aggregating locations open to local inhabitants, to expand opportunities and occasions for the use of public spaces at various times of the day and, therefore, increasing the level of safety for those living in the neighbourhood." After the forced lockdown of the initial phase of the pandemic, the importance of more active learning and outdoor teaching was realised (Franciosi et al., 2020). Now, schools have the chance to rethink their teaching methods and spaces to enhance students' interactions and socialisation.

In various cities, numerous initiatives with schools fostered the intangible values of

placemaking through labs, participatory workshops, and third mission activities. These experiences demonstrate how young people can significantly contribute to projects with their reflections, ideas, and opinions. The “Carpi Campus” case study exemplifies this by involving high school students in creating a unified educational area that links five high schools, leveraging public space, regeneration programs, and community co-design for an inclusive and sustainable urban environment.

1.3 Theoretical framework of knowledge

Placemaking in urban design is a multifunctional approach that unites communities to foster their sense of belonging and to enhance place identity. It reinterprets urban design issues in social and political terms by involving people and addressing relevant questions for their daily lives with special attention to the physical, cultural, and social identities that define a place (PPS, 2007). Placemaking inspires people to collectively rethink spaces and recognise their potential, fostering the connection between people and places to maximise shared values (PPS, 2007). It is a process of creation, co-design, and activation aimed at empowering the community for the re-appropriation, re-signification, construction, and care of community spaces (Chrysostomou, 2021, p. 16). This organic and conscious approach reflects community needs and desires, improving the quality of daily life. Such places become both signifier and signified containers and content of material and immaterial elements, and serve as the city’s backbone, promoting continuous social interactions and cultural development of a community (Colafranceschi and Nogué, 2021, p. 5). Placemaking can emphasise immaterial values derived from the community. Intangible values generate, build, and forge public space in its types, uses and forms of occupation (Colafranceschi and Nogué, 2021, p. 17). This approach transforms urban spaces into human-oriented places where people can recognise each other, produce personal memories, foster cultural and social histories, and enliven the sense of belonging through human and spatial relationships. Public space is not a common “void” within the urban settlement but a place of social access and existential exchange where everyone is welcome (Colafranceschi and Nogué, 2021, pp. 7, 8). It is a resource, a product, a social, political, and symbolic practice where people can express their opinion and are involved as protagonists (Almeida, Batista and Lourenço, 2020, p. 111). Effective engagement of people is a crucial characteristic of successful placemaking process; from the beginning citizens are involved as experts in setting the priorities and vision for the project and keep them engaged throughout implementation and beyond (Peinhardt and Storrington, 2019). In this discussion, the whole community is involved, even people that usually are not considered in urban politics or the city’s decision (i.e. youth). Youth can be resourceful in the decision-making process; as such, their inclusion must be recognised as an opportunity for the project of public spaces able to transform and shape communities and societies (Almeida, Batista and Lourenço, 2020, p. 111; Peinhardt and Storrington, 2019). While participating in the design and construction process, young people develop skills, such as creating quality outputs, developing strong communication skills, and learning how to take part in creative problem solving. In this way, youth grow up as active citizens and contribute to the success of their places while acquiring a sense of responsibility. The public engagement of youth should be considered the key of placemaking; it gives them the opportunity to invest in their community and develop a strong knowledge about their everyday space (Kapoor, 2017). Through the eyes of young people, it is possible to activate and shape places, bringing within the project their needs and narrating their feelings, sensations, and

perceptions. In the future, this approach could have an impact on their life and the young will be able to use, manage, and support their spaces with awareness. This is a crucial point: promoting practical and participatory activities will create a powerful and long-lasting impact in youth's lives, able to connect them with their environment. Within that process, placemaking activities increase young people's knowledge and experience of the territory, promoting the use of space as both a site for learning and for living (Smaniotto et al., 2021, p. 140). Schools play an important role in this vision because they can boost this approach by starting to rethink public spaces around them together with students. Youth appreciate observing and experiencing places where they usually spend their time, and the unique qualities of learning can increase student interest and provide them a better understanding of how difficult problems related to projects can be solved. There is a potentiality of non-formal and interactive education by taking the "classroom" into different locations, increasing the youth's awareness of the space (Almeida, Batista and Lourenço, 2020, p. 122). By participating in placemaking, students develop a strong feeling of ownership creating youth-friendly places, improving beauty and delight, community health and safety, environmental sustainability, and the intangible "sense of place". However, youth involvement does not always yield immediate results, as previously mentioned; indeed, this urban transformation must first occur in the minds of the participants and then in the physical space (Silberberg et al., 2013, p. 3).

1.4 Research questions and objectives of the project

Through the features of placemaking, it is possible to understand the importance of engaging young people to rethink public spaces and to find out hidden and intangible values of the overall project. The habits, behaviours, rituals, feelings, and emotions of a community that cross a space are the intangible values and the immaterial glue of a project. These values can affect and change an individual's perception of a place, turning it into a centre of meaning and symbols, expressing very different thoughts (Colafranceschi and Nogué, 2021, p. 16). The placemaking process could create a new identity for emerging city places; make them more attractive for people; engage and collaborate with citizens and institutions; increase their sense of belonging; trigger a transformation able to change the people's assessments passing on intangible values to future generations. All these intangible values are at the basis for the success of a placemaking project that needs the involvement of different stakeholders to create urban transformation and regeneration. This article aims to evaluate these values and address specific research questions:

1. How is it possible to assess the intangible values of a placemaking process if nothing material has yet been realised?
2. How is it possible to involve youth in design project to rethink public space and to create inclusive and sustainable cities?
3. What are the benefits and advantages to engage young people into these placemaking design?
4. How can schools play a crucial role in the involvement of young students for the transformation of public space?

What is interesting to understand is also how all these tangible elements can produce a series of intangible values during the placemaking process. This research article explores how to value these values into some practical experiences, particularly the Carpi Campus project, made in collaboration with university, municipal administration and high schools.

2. Methodology: how to interpret intangible values of placemaking through a framework

In the course of research activities, the main questions were: “Is it possible or not to evaluate the impacts of placemaking projects when the physical space is not changed, but the process is already started?” and “How to do that?”. To answer these questions, instead of evaluating the results of spatial changes, the process itself was reinterpreted and re-evaluated as a factor able to generate impacts on the community involved. To do this assessment, a helpful tool was created that considered the main intangible values that arises from research and placemaking projects experienced by the authors. This tool is the “Impacts Assessment Framework” and includes the intangible values recognised in the research activities and projects collected by the authors.

This framework was developed from insights gained through previous research and a review of literature on placemaking principles, urban design, and youth involvement. With the knowledge acquired in the initial phase, creating a framework to evaluate values in urban design projects became essential. This paper details the development and application of this framework, tested through various urban experiences, with a particular focus on the Carpi Campus case study. The final phase involves assessing urban projects to measure intangible values, even for those not yet implemented or realised.

The Impacts Assessment Framework represents a “beta version” to evaluate projects and case studies. It helps to look at the design challenge more broadly by asking, “What is the inner meaning of this placemaking process ?” or “Why is this challenge crucial for the community ?”. Other questions are “What have been done to move from ‘space’ to ‘place’ with the project?” so that it is possible to expand the scope of the project and focus on the intangible values that arise from it. To be more effective, the framework is divided into four sectors: Approach, Community, Places, and Communication. These sectors derived from a series of reflections developed during the initial research phase on placemaking and youth involvement. The insights were then put into practice within participatory initiatives where young people were the drivers of change.

Approach, Community, Places and Communication represent the most impactful sectors of a placemaking process, and even if they bring together different values, they should not be considered separate watertight compartments. They contaminate each other in a circular vision to create stronger and long-lasting impacts. It has been noted that there are some common values shared among the projects, but there also are some intangible values that could differ in every project because they are strictly connected to the specific goals, the environment, and the diverse needs and ambitions of communities. Since the surrounding conditions change, the intangible values will also be adapted, harmonised and reinterpreted in each specific case. Every placemaking process requires a deep understanding of context and lived experience; it is fundamental to recognise and respect the needs and values of people using the space the assets present in a place, engaging and cultivating trust among participants (Gardner, Marpillero-Colomina and Begault, 2018). Even if the intangible values represent only a part of the outcomes of the overall project, they have a great meaning because they have the power to build a “legacy” among the different participants. Those values reflect the cultural production of a community: their imagination, their perception, their feelings towards the landscape, places and their living spaces (Colafranceschi and Nogué, 2021, p. 16). Thus, attempting to comprehend those values means to seek how individuals relate to these identities and to places.

To apply the “Impacts Assessment Framework”, there is the need to rate all the intangible

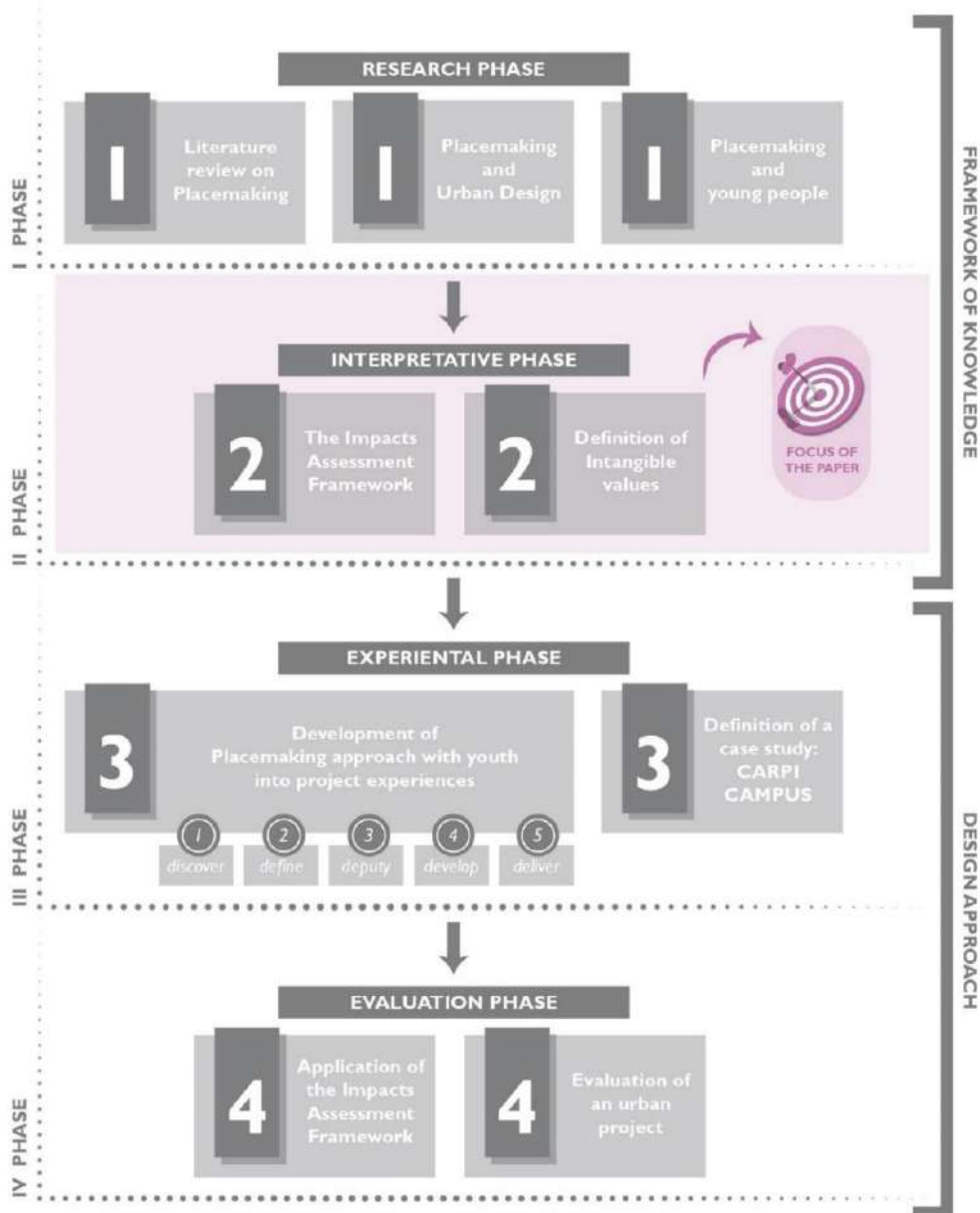


Figure 1. General methodological scheme of the placemaking approach (source: authors)

values, giving them a score from 0% to 100%. This percentage is given considering the importance of each value within the project. So, there is the need to pay attention at the way the process is formulated and to the engagement of people. Moreover, there is the need to look at the interactions among participants: do they change or remain the same? Is trust among participants growing? Are they happy to participate, or do they feel frustrated? Did they speak about the project to someone else? Do they manifest their pleasure to share what they are doing? All these questions recall the importance of asking for feedback at the end of activities so that it is easier to monitor the progress and the overall behaviour. The percentage of each intangible value is not based on numbers or scientific calculation, but it is an assessment based on considerations that the leading theme of a placemaking process makes about the process itself and people engagement.

Evaluating these intangible values, however, is not a straightforward task, as it involves a series of unstable variables that vary according to the urban context, the people involved, the objectives to be achieved, and the resources available. Each experience is subjective and can determine different intangible values that change and adapt to the needs. In this sense, even this framework cannot provide an objective answer for diverse urban situations but is assessed subjectively with values ranging from 0 to 100%, depending on the results achieved, which are always variable and give them a certain validity.

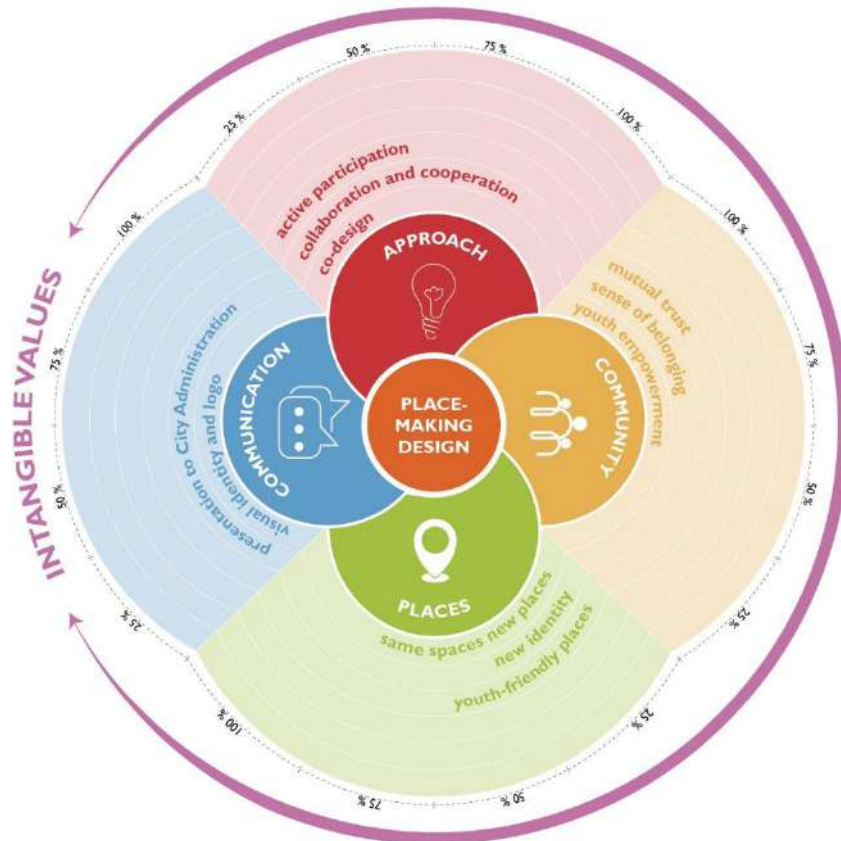


Figure 2. General "Impacts Assessment Framework" for the evaluation of intangible values (source: authors)

2.1 Approach

The sector "Approach" outlines methods and placemaking techniques that promote inclusion, sharing, and collaboration principles among different stakeholders, emphasising intangible values. In this way, a relation can be created over time, defining a strong community with shared visions, aims, and values and improving its everyday life. To obtain these results, it is necessary to define some placemaking approaches that bridge the gap between top-down planning and bottom-up initiatives. This involves promoting collective and active participatory initiatives in which citizens are engaged as protagonists from the first phase of the design process, the design thinking, to the final one, the co-design. The intangible values that have emerged from research and projects are co-design, collaboration and active participation.

2.2 Community

Thanks to the constant involvement and active participation of diverse people in placemaking process, a strong “Community” can be built over time. One of the most remarkable returns on investment from placemaking is the improvement in social cohesion and community well-being. When people feel a connection to their environment, they are more likely to engage with their community and form social bonds (Wheeler, 2023). Thanks to youth engagement, it has been possible to include the entire school’s community (composed of teachers, students, and their families) in different phases of the process. Regarding teachers and families, they were not directly involved in the definition of the design proposal of the campus, but students were encouraged to discuss needs and future perspectives of the area with them. For the community sector, the most important values that emerged are youth empowerment, sense of belonging and mutual trust.

2.3 Places

Public spaces are “Places” inside urban settlement of shared uses and activities where everyone feels welcome and where the greatest number of human interactions takes place. These great places can be created moving far from the simple definition of public spaces that considers only its physical and material dimension and starting to appreciate places that reflects the complexity of urban society; by means of this, social connections are cultivated and a sense of belonging between people is established. This sector represents the transition from ‘space’ to ‘place’ and includes all the activities designed to improve the quality of public spaces to make them more human-centred. For this sector, the most important values that emerged are youth-friendly places, the same spaces, new places, new identity.

2.4 Communication

“Storytelling is a powerful tool for contextualising interventions and weaving them into people’s mental map, and a strong visual identity helps to enhance the overall impact and reach of a project” (Marko and Lisa, 2022, p. 60).

Knowing how to communicate a project is fundamental because it can generate intangible values capable of creating a strong impact on communities and cities. Indeed, having a strategy and a plan on how to capture, promote and communicate the project is a key part of its success; on top of drawing an audience to the project, successful communication campaigns can also help to attract funding (Marko and Lisa, 2022, p. 60). It is not a matter of publicising the work done, but it is a telling of the whole experience, giving it value and making it appealing to people. For this sector, the most important values that emerged are visual identity and logo, and the presentation to City Administration.

3. Carpi Campus: The case study that best expresses the importance of youth engagements and the intangible values of placemaking

3.1 Introduction to the project

Carpi is a municipality of about 72.000 inhabitants in the province of Modena (north of Italy). The area of the Carpi Campus project extends in the west side of the city, close to the city centre, and it is set on an urban direction of primary importance, Via Peruzzi. The

area is surrounded by numerous parks and gardens for the elderly, a residential area with low density, public services, and sport facilities. Since there are five high schools alongside Via Peruzzi, this area presents itself as a natural campus devoted to education with a high density of students and teachers, but it does not have a clear identity, and its public spaces are not welcoming and attractive.

In 2022, the director of the scientific high school shared the idea of reshaping and giving a unique identity to that area engaging the authors as researchers of Politecnico di Milano. The idea to create a campus represented a great opportunity to develop the project with a placemaking approach involving students and asking for the collaboration of other associations connected to the active participation of the city. The Carpi Urban Centre (an association aiming to involve citizens in the improvement of the city), and Carpi2030 (a group of active citizens who looks at the Sustainable Development Goals of 2030 Agenda for a better environment) were engaged into the project to initiate a bottom-up process. The project aimed at creating a “campus” as a common stage for a wide and mixed community, well connected to existent activities, public services and open to its surroundings. The idea of the campus is also linked to the mindset of people who inhabit it to promote the idea to be part of a community and foster this attitude. A campus could also stimulate self-organised activities, networking, and cooperation among all the stakeholders included in its area.

3.2 The development of the Carpi Campus project

The Carpi Campus project was addressed with a creative mindset to inspire people to collectively reimagine and reinvent public spaces as the heart of every community (PPS, 2007).

From its very beginning, the cooperation with the different stakeholders provided different skills and contributed to knowledge sharing from different perspectives. The cooperation helped the group to expand its influence and to achieve its objectives sooner. The workflow of the project was based on a “Design Thinking” process, an approach to creative problem-solving which can be applied more broadly by people who are not designers (Schweitzer, Groeger and Sobel, 2016). To best describe this process, the “Double Diamond” helps because it represents a nonlinear scheme, and it consists of four phases beginning from an initial idea and ending with the delivery of a product or a service. The four phases are: discover, define, develop, and deliver.

The first phase, named “Discover” helps people understand the problem, and it involves speaking to and spending time with people who are affected by the issues (Design Council, 2015). This is a divergent phase which started with trainings and lectures and finished with an active workshop. The didactic lectures focused on Tactical Urbanism and strategies for a more sustainable city. The workshop aimed at reimagining the campus from a future perspective. This activity was organised by the Carpi2030 team. They asked students to reflect on their experience about schools’ area and to establish the main issues to be solved also looking at potential aspects. Then, they had to imagine how the campus would be like in the future, sketching their visions on paper as a baseline for a plenary discussion. During the debate, students were also encouraged to think about the variety of relations with the surrounding (looking for associations, activities, parks, and other schools) to make the schools more open to the city and create a network of mutual connections. The second phase is named “Define” and it is a more convergent step about the definition of a well-focused challenge. After collecting needs, desires, and the visions from students,



Figure 3. Pictures of the co-design phases with students (source: authors. Feb. 10th 2022)



Figure 4. Drawings of the students about how they imagine the new campus will be like (source: authors. Feb. 10th 2022)

the leading team analysed what emerged and elaborated a design proposal based on four overlapping layers to develop a progressive intervention strategy. The four layers are individually designed, and each of them performs a specific function; however, only with the union of all is it possible to establish strategic connections between schools and their surroundings. The principal layer is named “The ribbon”, and it is based on three elements placed at the cornerstones of the school area to mark the entrance. The second layer is named “Info-point”; it represents the schools, and it is placed near their entrances of each school as an intermediary between the building and the city. The info-points have the function to show the name of the institute and to promote the activities of the school. The third layer is a kind of “Booster” for sustainability, and it includes 17 elements spread within the area to raise awareness about the SDGs goals. The fourth layer acts as a “Deputy” for sustainable actions to promote a common behavioural change. These two last layers are conceived to promote a more sustainable lifestyle, as a kind of manifesto for a sustainable environment.

The third phase is named “Develop”, and it is a divergent step aiming at encouraging people to give different answers to the defined problem, seeking inspiration from elsewhere and co-designing with peers. Various proposals for each layer of the strategy were developed, asking students to draw and share their ideas for the strategies. In this phase, a master’s degree student of the Politecnico di Milano was engaged to develop a thesis on the overall project, with a specific focus on implementing the design strategy. That student was a former student of the scientific high school, so she had the opportunity to redesign the places she had once frequented to improve them.

The last phase is named “Deliver” and provides a selection of well-defined solutions for all the strategies. The graduating student collected the ideas from other students and checked their architectural feasibility, defining the most suitable in detail. These proposals were conceived as a short-term, low-cost, and scalable intervention and policies (Lydon and Garcia, 2015, p. 21). Lydon and Garcia (2015, p. 29) also state that Tactical Urbanism “is a way of making plans without the usual preponderance of planning, and it makes use of the creative potential unleashed by social interaction”. In fact, that method can bridge the gap between cities and developers and citizens in the urban development process. This approach also encourages local resiliency because it helps citizens explore a nimbler approach to city-making in a way that transformations could be adjusted if conditions change. Tactical Urbanism is a tool that proactively addresses tension between bottom-up and top-down initiatives by creating a better and more responsive environment for all (Lydon and Garcia, 2015, p. 26), as it is for the Carpi Campus project.

Considering all the methods adopted, the overall project demonstrated a good combination between theory and practice, and this helped students to improve their ability to understand a given task, discuss with others to create a common vision, share their ideas with different languages (written, spoken, graphical), and, finally, participate to the experience giving added value to the city making process.

4. Findings: Intangible values matter

Through the “Impacts Assessment Framework”, the research demonstrates how is possible to evaluate intangible values enhancing their importance. The Carpi Campus project has also demonstrated to youth how powerful their collective vision can be; it helped them to re-image everyday spaces, focusing on potentialities and giving a collective new identity. From the initial phase to the final one, the project has been developed as

a collaborative process able to engage different stakeholders, with a particular focus on students. Although the artworks of the project have not yet been implemented, several intangible values emerged. The biggest impact has been noted on young people and student community.

4.1 The intangible values of Placemaking in the Carpi Campus project

The placemaking process significantly contributed to the organisation of numerous cultural activities, which in turn galvanised the community to work together, creating more social values and greater awareness. From an educational perspective, participants gained valuable benefits, such as the opportunity to experiment with innovative teaching methods and to learn new skills (both soft and hard) that will impact participants for life. Giving value to places was the core of the Carpi Campus project, and this evidence also emerges if considering the main direction of this urban design: the reclamation of a street for sociability (with respect to Via B. Peruzzi, in which schools are located).

“The street was losing its social value and turned into a functional tool for rapid travel. [...] Pedestrian movement would allow the urban population to linger and repose, and as such to be able to develop spaces of interaction and sociability, rather than mere functionality” (Madanipour, 2020, p. 11).



Figure 5. Concept of the project with the four strategy layers (source: layout from Faglioni, 2022)



Figure 6. Drawings of students about the elements of the four strategy layers
(source: authors. Mar. 22nd 2022)

“The value of such appropriations lies in their interruptive characteristics and transformative power of expression towards more equality and inclusion in public spaces” (Karimnia and Haas, 2020, p. 41).

4.2 Approach

Design thinking in Carpi Campus was treated as a systematic and explorative approach to addressing complex, wicked problems. This method adopted agile and innovative mindsets, enabling participants to think outside their imaginary. This creates a framework in which dynamic interactions between youth and other people are produced and where common ideas and solutions grow. The aim was not only to generate proposals but also to cultivate results that enhance the value and quality of the urban space surrounding the schools. This constructive approach also included principles of co-design and participatory design (Engholm, 2021, p. 55). Co-design, as defined by McKercher (2020), is “an approach to design with, not for, people” which fosters new ways of being and doing for people, encouraging learning from others and active involvement in the design process (McKercher, 2020, p. 14). In co-design, everyone could both teach and learn, as happens with the school’s community in Carpi Campus experience. This participatory approach was necessary for developing a flexible response to the environment needs through the imagination of short-term, sustainable, and small-scale actions. By fostering this shared approach, the project addressed complex issues progressively, engaging people step by step, trying to trigger design abilities of them in imagining new future scenarios, functions, and activities. For this sector, the case study has revealed new intangible values such as thinking potential, design thinking, and cooperation.

4.3 Community

In Carpi Campus project, teenagers were the main protagonists challenging themselves in a new inclusive process, building a shared vision for the future, and relationships, and creating a new inter-generational community. Schools played a complementary role in this process, acting as promoters of active citizenship and sustainability. They encouraged innovative teaching methods that educated a young community to perceive and transform a space starting from their desires. Feedback from the youth indicated that being understood, valued, appreciated, and listened to made them feel like an active participant in the radical changes occurring in their places. Daily, they acquired and matured a mutual



Figure 7. "Impacts Assessment Framework" for the evaluation of intangible values of the Carpi Campus project (source: authors)

trust, not only among themselves but also with the other people and institutions involved. This trust-building, combined with the role of schools as active facilitators rather than passive listeners, fostered a sense of responsibility and agency among the youth regarding their future places. Through the experience, they became passionate and appreciative of the small things, recognising other's needs, experiencing new feelings and emotions shared with the community, and developing a sense of belonging. This is an important intangible value of the project that must be continually cultivated to be long-lasting. In this context, placemaking could also serve as an antidote to the general sense of hopelessness that youth often feel in Italian society and its political establishment, as outlined in the annual report made by Centro Studi Investimenti Sociali (CENSIS, 2023). For this sector, the case study has revealed the following values: inclusion, social cohesion and community well-being.

4.4 Places

This change of perception, from public spaces to places, is at the base of the placemaking process and it represents the starting point of Carpi Campus initiative. Through the engagement of all the school's community, it became possible to rethink the urban spaces around high schools, transforming them into new attractive places where students are at the centre of the design and various opportunities are boosted. Initially, the relationships between students were forced by a series of collaborative activities that were thought to involve them, and improve their linkage with environment. Over time, students gradually began to recognise themselves in these spaces and started to see them as places of interactions, able to consolidate and spontaneously generate occasions. This relationship infuses people with a sense of identity, belonging, and attachment to places, defining youth-friendly places where their sensations and memories flourish. "Youth-friendly places" are described as multifunctional public realms that are flexible to adapt to different needs and desires of youth, even if everyone is included. They are places where young people can have fun, feel safe, make new friends, and where their rights are respected because the place is "made" by them. Youth are aware of their lived experiences, and by participating in the placemaking process, they could bring hope and a sense of joyful to the realisation of their place (McKoy, Eppley and Buss, 2022, p. 9). As youth begin to develop a feeling of belonging to the place, the place itself gains value and is enriched with a new identity. This place-identity contributes to create a meaningful space within the city, where people can recognise their values and pass them on to future generations. The case study reveals the following values: new perception, and enhanced quality of life.

4.5 Communication

The value of a project does not only lie in its realisation, but also in its communication. Through communication the participants of Carpi Campus established a link between various stakeholders, the Municipality and citizens. For this project, conferences were organised to present the activities to both citizens and the City Administration. A series of interviews with reporters were then published in newspapers. This strategy established a new forum for dialogue and discussion. Citizens gained new perspectives about the area and its issues. These activities drew the attention to youth engagement, and the City Administration began to support the realisation of the Carpi Campus project, allocating a specific budget in the coming years. Additionally, to give more value to this project, it was promoted within the "Festival dello Sviluppo Sostenibile 2022" because the design drew attention to the SDGs and sustainability principles. To promote and make it even more attractive, a logotype was developed to transmit the objectives that guided the realisation of the project and allow them to be communicated effectively to all possible interlocutors. This logo was designed to establish a consistent visual identity of the project, encapsulating the ideals and references assumed for the definition of the process and, at the same time, of transmitting the intangible values identified by the project. In this sector, the case study demonstrated the following values: promotion between citizens and interviews with local newspapers.

5. Final discussion

The various experiences of placemaking, including the Carpi Campus project, have shown positive impacts on the communities involved and diverse results in the cities. Students were enthusiastic participants, sharing their passion and showing their commitment. By combining a bottom-up and top-down approach, it was possible to merge the everyday experience of students with the expertise of professionals in urban design. In the Carpi Campus experience, the direct engagement of youth to discover and understand their needs was crucial to making the design successful and aligned with the requirements of its users. Indeed, young people can envision a new urban strategy for cities by participating in placemaking processes, creating youth-friendly places where they are the main protagonists. This addresses two of the initial research questions: through youth involvement, “Is it possible to activate and shape places by integrating their needs and narrating their feelings and sensations?” This approach creates a powerful and long-lasting impact on the relationship between youth’s lives and the places they inhabit.

This project also demonstrated that schools can easily become benchmarks for social activities for students, their families, and all citizens, due to their location within neighbourhoods and the fact that they relate to many stakeholders and group of people. Schools play a fundamental role in involving young people, who will be the primary users of the city in the future and are key actors to be engaged in these transformation processes. This addresses another research question that initially prompted the exploration of this topic.

However, it is on the “Impacts Assessment Framework” that it is necessary to focus the attention. This tool proved to help assess the intangible values of the placemaking project and allow to reflect on the goals achieved in the initial phases. The “Impact Assessment Framework” highlights the fact that values can be generated throughout the process, not



Figure 8. Examples of the communication about the project (A local newspaper article; the poster for the “Festival dello Sviluppo Sostenibile”; the visual identity and the logo; the presentation of the project to the city) (source: authors. Oct 11th 2022)

only at its conclusions. This tool gives importance to the inclusive process and how it is managed. Especially worth mentioning is the proposal of a common template that can interpret all placemaking designs, regardless of their different outcomes. As it is known, every project is unique and differs from another because the surrounding conditions change. What these projects share is the desire to trigger a transformation of places to produce more value than they already possess. This value is not just a matter of material and tangible elements, but also includes a variety of fundamental intangible values that change in response to the situation. This is the answer to the last research questions. For this reason, the “Impacts Assessment Framework” is thought to be flexible and customisable. Considering the cultural and physical environment and the specific goals of a project, the process itself could differ. Consequently the intangible values that stem from each step will be different. With the chance to tailor the framework, it is possible to evaluate different experiences to understand the strengths and weaknesses of many placemaking processes. This approach aims to improve these processes and make them more effective.

In conclusion, the version of the “Impacts Assessment Framework” that is presented here could be considered a “beta” version. It can be improved through its application to different projects and urban situations.

6. Conclusion

Although the importance of placemaking and engaging people in urban designs is recognised, the significant intangible values often go unacknowledged because they do not result in physical changes to urban spaces. These intangible values, however, are crucial for transforming urban area into meaningful places for the community. The “Impacts Assessment Framework” aims to measure these intangible impacts requiring ongoing stakeholder engagement. This flexible tool evolves and adapts to different contexts and participants, helping to identify and evaluate the added value of youth-focused placemaking efforts.

With the Carpi Campus project there was the opportunity to reflect on these intangible values that a placemaking process reveals from its first steps, even before the realisation of physical changes. By involving high schools’ students in reshaping and activating the public spaces around schools, it was possible to image a campus with a stronger identity not only due to the material changes of the design proposal, but mostly for the youth protagonists within the overall process. In engaging students, they have shown passion and desire to participate actively in the challenge.

However, the Carpi Campus experience is not the only one analysed; a series of other activities and research have led to a progressive approach to placemaking with the involvement of young people which made it possible to assess the effectiveness of the “Impacts Assessment Framework”. What has been achieved is many-fold: firstly, a clear awareness of the added values of a placemaking project when youth are engaged, and, secondly, how to assess the impacts of this process, with a frame of references applicable in such cases.

At its core, placemaking means coming together to create quality places where people want to live, work, play, and learn. The quality of place stems from a plethora of values affected by the places, the sense of community, the approach to urban change, and the communication about the project itself. The proposed frame of references that are

proposed considers these four sectors to evaluate a placemaking process focusing on the intangible values that arise from it. Through this framework, it is possible to evaluate other projects, understand the strengths and weaknesses of the placemaking process, and improve its effectiveness.

Acknowledgment

It is necessary to thank all the collaborators who have contributed to this project, starting with Carlo Peraboni (Associate Professor of Politecnico di Milano), who led the project with us; Alda Barbi (Director of M. Fanti school); Isabella Colarusso and Maurizio Marinelli (President and member of Carpi Urban Centre); Alessandro Cattini e Federico Ferrari (members of Carpi2030); Riccardo Righi (Deputy mayor of the city of Carpi); Caterina Faglioni (Architect and former student of M. Fanti school who made the thesis); all the students who took part at the project actively and all the directors of other schools who have contributed to the experience.

References

- Almeida, I. Batista, J. S. and Lourenco, F. (2020) 'Placemaking with teenagers. Experiences driven from thematic workshops on urban planning' in Smaniotto Costa, et al. (eds.) Co-creation of public open places. Practice, Reflection, Learning. C3Places Project. Lisbon: Lusófona University Press, pp. 109-123.
- Campioli, S. and Peraboni, C. (2019) 'How can we plan better cities for all?' Proceedings of the International Conference on Changing Cities IV, Spatial, Design, Landscape & Socio-economic Dimensions, Chania (Creta - Grecia), University of Thessaly, Editor Professor Aspa Gospodini.
- Campioli, S. (2020) *Città inclusiva e senza limiti. Progettare luoghi per le persone nella società contemporanea*. Santarcangelo di Romagna: Maggioli Editore.
- CENSIS (Centro Studi Investimenti Sociali) (2023) 'I sonnambuli. A chapter dedicated to the Italian Society', Annual Report on the social situation of the Italian country [Online]. Available at: <https://www.censis.it/rapporto-annuale/i-sonnambuli> [Accessed: 23 January 2024].
- Chrysostomou, K. (2021) 'Comparative national report of "Placemaking for inclusion" framework' in Research Report of Place Make it, D2.1 [Online]. Available from: <https://placemaking4learning.eu/outputs/> [Accessed: 10 January 2024].
- Colafranceschi, D. and Nogué, J. (2021) 'Abitare l'intangibile: paesaggio e spazio pubblico', (Editorial) *Ri-Vista. Research for landscape architecture*, 19(2) [Online]. Available from: <https://doi.org/10.36253/rv-12447> [Accessed: 10 January 2024].
- Design Council (2015) *Design Methods Step 1: Discover*, [Online]. Available from: <https://www.designcouncil.org.uk/our-resources/archive/articles/design-methods-step-1-discover/> [Accessed: 23 January 2024].
- Engholm, I. (2021) *Quick guide to design thinking*. Copenhagen: Strandberg publishing
- Franciosi S., et al. (2020) *Com'è cambiata la scuola italiana dopo il Covid?* [Online]. Available from: <https://www.erickson.it/it/mondo-erickson/articoli/cambiata-la-scuola-italiana-dopo-il-covid/> [Accessed: 15 January 2024].
- Faglioni, C. (2022) *Carpi campus. Un processo di co-progettazione per la riqualificazione degli spazi esterni degli istituti di scuola superiore*. Master Degree Thesis of the School of Architecture Urban Planning Construction Engineering, Politecnico di Milano.
- Gardner, J., et al. (2018) *Inclusive healthy places. A Guide to Inclusion & Health in Public Space*:

- Learning Globally to Transform Locally' Research Report of Gehl Institute, [Online]. Available from: https://gehl.institute.org/wp-content/uploads/2018/07/Inclusive-Healthy-Places_Gehl-Institute.pdf [Accessed: 21 January 2024].
- Granata, E. (2021) 'Placemakers'. Gli inventori dei luoghi che abiteremo, Giulio Einaudi.
- Kapoor, R. (2017) Youth for Public Spaces: (Place) Making Our Future [Online]. Available from: <https://www.pps.org/article/youth-public-spaces-place-making-future> [Accessed: 20 January 2024].
- Karimnia, E. and Haas, T. (2020) 'Appropriation of public space. A dialectical approach in designin publicness' in Mehta, V. and Palazzo, D. (eds.) (2020). Companion to Public Space. 1st edn. London: Routledge
- Lydon M. and Garcia, A. (2015) Tactical Urbanism: short-term action for long-term change. Washington: Island Press
- Madanipour, A. (2020) 'A critique of public space. Between interaction and attraction' in Mehta, V. and Palazzo, D. (eds.) (2020). Companion to Public Space. 1st edition. London: Routledge
- Malhotra, A., Dobriyal, R. (2021) 'Fostering Interactions at Public Open Spaces. The Role of Physical Interface in Facilitating User Interactions in the UAE', *The Journal of Public Space*, 6(1), [Online]. Available from: <https://www.journalpublicspace.org/index.php/jps/issue/view/78> [Accessed: 20 January 2024].
- Marko, P. and Lisa, R. (2022) *Meanwhile city: How temporary interventions create welcoming places with a strong identity*. 1st edition. Auckland: Milk.
- McKercher, K. A. (2020) *Beyond sticky notes. Doing co-design for Real: Mindsets, Methods, and Movements*. 1st edition. Australia: Thorpe-Bowker.
- McKoy, D. L., et al. (2021) *Planning cities with Young people and schools: Forging Justice, Generating Joy*. London: Routledge.
- Mehta, V. and Palazzo, D. (eds.) (2020) *Companion to Public Space*. 1st edition. London: Routledge
- MIUR (Italian Ministry of education) (2016) '#ScuoleInnovative. Progettiamo le scuole del futuro'. International call for application for innovative design on schools. Available from: <https://www.professionearchitetto.it/news/notizie/17364/La-scuola-del-futuro-le-linee-guida-del-MIUR-per-la-progettazione> [Accessed: 29 January 2024].
- Nucci, L. and Galimberti, L. (2020). 'Towards a new school's role in the Italian contemporary city' *City Territory and Architecture*, 7(1), [Online] Available from: <https://doi.org/10.1186/s40410-019-0110-3> [Accessed: 15 January 2024].
- Peraboni, C. (2020) 'Inclusione Urbana e progetto della città', *S. Città inclusiva e senza limiti. Progettare luoghi per le persone nella società contemporanea*. POLITECNICA 02. I Available from: <https://re.public.polimi.it/handle/11311/1165272>
- Santarcangelo di Romagna: Peinhardt, K. and Storrington, N. (2019) *A Playbook for Inclusive Placemaking: Community Process* [Online]. Available from: <https://www.pps.org/article/a-playbook-for-inclusive-placemaking-community-process> [Accessed: 20 January 2024].
- Project for Public Spaces (PPS) (2007) *What Is Placemaking?* [Online]. Available from: <https://www.pps.org/article/what-is-placemaking> [Accessed: 10 January 2024].
- Schweitzer, J., Groeger, L. and Sobel, L. (2016) 'The Design Thinking Mindset: An assessment of what we know and what we see in practice', *Journal of Design Business & Society*, 2, pp. 71-94 [Online]. Available from: https://www.researchgate.net/publication/343756780_Developing_a_Design_Thinking_Mindset_Encouraging_Designerly_Ways_in_Postgraduate_Business_Education [Accessed: 14 January 2024].
- Silberberg S., et al., (2013) 'Places in the making: how placemaking builds places and communities' [Online]. Massachusetts Institute of Technology. Available from: <https://issuu.com/mit-dusp/docs/mit-dusp-places-in-the-making> [Accessed: 14 January 2024].
- Smaniotto Costa, C., et al. (2021) 'What happens when teenagers reason about public open spaces?', *Cidades Comunitades e Territórios*, 43 (December), pp. 139-155.
- UN - United Nations General Assembly (2015) 'Transforming our world: the 2030 Agenda for Sustainable Development', United Nations General Assembly, 70(1), New York. Available from:

<https://www.un.org/sustainabledevelopment/> [Accessed: 23 January 2024].

Wheeler, J. (2023) The ROI of Placemaking, [Online]. Available from: <https://www.fourtheconomy.com/post/the-roi-of-placemaking> [Accessed: 18 January 2024].

Whyte, W. H., (1980) *The social life of small urban spaces*. Washington, D.C., Conservation Foundation, ISBN 0891640576

The Roots and Vaccine of the City. African Youth as Catalysts for Urban Vitality and Well-being

Annabel Nyole

Erasmus University Rotterdam, Netherlands

annabelle.nyole@gmail.com

Daphne Randall

University of Cape Town, South Africa

daphnerandall305@gmail.com

Naserian Saruni

Women in Real Estate, Kenya

fifisaruni@gmail.com

Abstract

As cities in Africa confront a constellation of systemic vulnerabilities, the narrative is often one of despair and decay. Yet, this overlooks a vital lifeline: the city's youth, who serve both as the roots that nourish and the vaccine that heals. Like roots nourishing trees, African youth serve as transformative agents, shaping the future of urban living across economic, social, mental, physical, digital, and educational spheres. Through active engagement in public spaces, they unlock and administer the antidote to systemic urban challenges.

This study uses empirical data to highlight youth-led public space initiatives in Nairobi, Kenya, Kampala, Uganda, Freetown, Sierra Leone and Harare, Zimbabwe, revitalising local economies via urban farming and income diversification. As stewards of green spaces, they enhance urban vitality, social connections, and well-being. Notably, the youth expand their influence into the digital sphere, advocating for internet access in public spaces as a fundamental socio-economic right. This stance aligns with Reglitz's (2020) view on online access as essential for human rights. Within this narrative lies the principle of adaptive governance, transitioning from merely including youth as beneficiaries to youth-led decision-making.

This photo essay elucidates these dual roles, highlighting how African youth are both the roots that sustain and nourish and the vaccine that heals and rejuvenates the cities. It serves as a clarion call for a paradigm shift in how we approach planning for public spaces and governance. The message is clear: the solutions to our most pressing urban challenges reside within our cities, activated, and administered through the untapped potential of youth in public spaces.

Keywords: urban youth, public spaces, health and well-being, urban vitality

To cite this article:

Nyole, A., Randall, D. and Saruni, N. (2024) "The Roots and Vaccine of the City: African Youth as Catalysts for Urban Vitality and Well-being", *The Journal of Public Space*, 9(2), pp. 167–184. doi: 10.32891/jps.v9i2.1723.

This article has been peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>



Figure 1. Youth cleaning up the Nairobi River in Korogocho supported by Public Space Network.
Credit: Sticker, 2023

I. Ailing Cities: Background and context

I.1 Nairobi City, Kenya

Nairobi's rapid urbanisation, marked by a growth rate of about 4% annually (World Population Review, 2024), brings a host of challenges: strained infrastructure, pressure on essential services, and the proliferation of informal settlements under harsh conditions, affecting the quality of life for many Nairobi residents. Environmental issues like air pollution and waste management are becoming increasingly pronounced. Amidst these urban struggles, the city's public spaces suffer significantly. Originally designed to cater to a population of 250,000 as per the 1948 Master Plan (Makworo and Mireri, 2011), these spaces, now serving over 5 million people (World Population Review, 2024), face severe congestion and degradation, impacting the well-being of the city's inhabitants, especially those in informal settlements where about 60% of the residents live (KNBS, 2019; Mutisya & Yarime, 2011).

With limited access to green areas, the urban populace faces heightened mental stress,



Figure 2. Aerial View of Korogocho Peoples' Park along the Nairobi River in Korogocho Community, Nairobi, Credit: Sticker, 2023

reduced opportunities for social interaction, and diminished avenues for physical activities, contributing to an overall decline in urban health and well-being. Mental stress among youths in Nairobi is driven by socio-economic challenges, high unemployment, and inadequate access to mental health services. The pressure to meet societal expectations and the lack of job opportunities create hopelessness and anxiety. Rapid urbanisation and lifestyle changes further increase stress levels, while peer pressure and family expectations worsen the issue. Despite these challenges, there is a significant gap in mental health support, leaving many youths without necessary resources (Ndetei et al., 2009; Patel et al., 2010). The environmental degradation exacerbates the city's vulnerability to climate change impacts, such as increased heatwaves and flooding. These environmental vulnerabilities not only pose immediate health risks but also perpetuate a cycle of poverty and marginalisation, disproportionately impacting Nairobi residents.

1.2 Freetown, Sierra Leone

The Freetown landscape is marked by uneven and unplanned urban expansion, leading to severe challenges in urban planning, basic service provision, food insecurity, waste management and public space maintenance. The lack of effective waste disposal and recycling systems has led to widespread illegal dumping, contributing to environmental degradation and public health risks. In Freetown, as of 2004, over 742 tons of MSW are generated daily with an average of 0.45 kg per person per day, with 84% being

biodegradable organic waste (Sood, 2004). In 2020, the estimated MSW generation per capita per day in Freetown was 0.5 kg, indicating a significant increase that could pose threats to the environment and public health if not addressed. The MSW generation per capita per day is projected to increase to 0.6 kg with 436, 175 metric tons annually by 2027 (Ngegba and Bertin, 2020). Despite this high volume, only about 30% to 35% of the waste is effectively collected and disposed of in approved dump sites (Komba, 2022). The remainder often clogs drainage systems, contributing to flooding and other environmental hazards.

Furthermore, haphazard urbanisation has led to a significant loss of green spaces and recreational areas. This deterioration of public spaces significantly impacts the health and well-being of residents, who lack safe and healthy environments for recreation and socialisation. These worsening conditions in Freetown have a profound impact on the economic activities of its residents, and youth in particular, introducing a vital concept of economic well-being into our essay's narrative.

The inefficiencies in waste disposal and the deterioration of public spaces not only pose



Figure 3. Kissy Dumpsite in Freetown, Sierra Leone, Credit: Sticker, 2023

environmental and health risks but also significantly hinder the economic potential of the city. These challenges affect local businesses, impede the ability of entrepreneurs to thrive, and limit the opportunities for youth engagement in economic activities. By finding innovative ways to address these issues, there's an opportunity to enhance not just the environmental and health aspects of urban living in Freetown, but also to uplift the economic well-being of its citizens.

1.3 Kampala, Uganda

The urbanisation of Kampala is a complex process marked by rapid growth and numerous challenges, closely tied to the broader urbanisation trends in Uganda. The country's urbanisation rate is growing at a remarkable pace of 3.3% per annum, with projections indicating that the urban population could nearly double between 2010 and 2030 (UN-Habitat, 2023). Currently, about 24.36% of the total Uganda population lives in cities and urban areas, with Kampala constituting about 25% of the country's total urban population (Kwiringira et al., 2021). This rapid urban growth is slowly turning Kampala into an ailing city, where challenges such as inadequate housing, environmental degradation, and insufficient public amenities undermine the overall well-being of the populace.

Enormous pressure has been placed on urban infrastructure and public spaces, ultimately affecting the quality of life, public health, and overall well-being of its youth. This is crucial considering Kampala is experiencing a youth bulge, with the country having the second youngest population in the world after Niger (UN-Habitat, 2023). More than three-



Figure 4. A glimpse into the daily life of urban vendors along the railway line Kampala, Uganda.
Credit: Sticker, 2023

quarters (78%) of its residents are under the age of 35, and this youthful population is expected to double in the next 25 years (UNICEF Uganda, 2024). While this presents the potential for a significant youth dividend, the current trajectory of development raises questions about the sustainability of urbanisation and the ability to harness this demographic advantage for sustainable development. Kampala's challenges point to the need for revitalising public spaces to improve the health and well-being of youth, ultimately improving the quality of life.

1.4 Harare, Zimbabwe

Urban sprawl in Harare has led to the increase in informal settlements. As of 2018, the World Bank estimated that 33.5% of Harare's urban population resides in informal areas, with 63 neighbourhoods classified as 'slums' under the Harare 'slum upgrading project' (Masimba, 2021). These informal settlements, often excluded from the formal services grid, highlight the city's struggle with providing basic amenities to its residents. These challenges are deeply intertwined with the socio-economic context of the city and directly impact the well-being of its people. The youth, as a significant portion of Harare's demographic, are particularly affected by these urban challenges. They experience barriers to accessing quality education, health services, and other opportunities for personal and professional development. One of the major challenges in Harare remains its high unemployment rate, especially among the youth.



Figure 5. Community Sports Event by House of Arts in Harare, Zimbabwe, Credit: Sticker, 2023

Amidst the backdrop of rapid urbanisation and the proliferation of informal settlements, public spaces have increasingly become a haven for the city's youth. These spaces offer a respite from the dense and often challenging living conditions in informal areas. Public spaces in Harare provide essential venues for social interaction, economic activities, and community engagement, particularly for young people navigating the difficulties of urban poverty and limited access to services.

2. The African Urban Youth Bulge - How urban vaccinators are rooting for change through public spaces

With ailing cities being a wicked problem, the population in African countries is increasing astronomically. By 2050, two-thirds of the world's population will live in cities, and the greatest growth in urban populations will be in the least developed countries. (Udal & Hoelsher, 2013). Urban governance becomes considerably difficult especially in the provision of services and opportunities to a burgeoning urban population. Among the concerns is that large youth bulges in urban centres could be a source of political instability and violence. The high rate of urbanisation, a growing middle class, and high urban-to-rural migration have led to a massive youth bulge all over Sub-Saharan Africa. The urban youth bulge indicates potential social disorder stemming from economic challenges, housing deficits, increased crime rates due to reduced opportunities for income generation and insufficient sewer systems to serve the rising population.

Despite this, most African youth are using the roots they have developed by residing in urban neighbourhoods, especially those in low-income settlements to improve their quality of life. They choose to be urban vaccinators who mould better cities with the little resources their roots can take up to ensure the cities still flourish. They anchor their neighbourhoods in innovation and take ownership to change the narrative. They reduce the chances of the neighbourhood children from being struck down by climate-related outbreaks. They inoculate their mothers by providing urban farms to feed their families. Most importantly, they reach other young people by giving them nutrients through rehabilitating public spaces and delivering the nutrients of health and well-being in its various facets. This innovative brand of vaccination is being delivered through movement, togetherness, and empowerment; the movement of urban vaccinators.

3. Thematic solutions for Ailing Cities: Public spaces as urban pharmacies

As the roots and vaccinators, the youth utilise public spaces as pharmacies to nourish physical, mental, social, educational and economic well-being. Beyond medical hospitals and clinics, public spaces are transformed into lively pharmacies supplying doses of movement, information, interaction, and opportunity. Young Africans are injecting life back into dilapidated areas and underserved communities in urban areas while redefining the power of agency and connectedness.

Movement as Medicine

“Movement is a medicine for creating change in a person’s physical, emotional, and mental states.”

- Carol Welch

Young people crave spaces for play, movement, self-expression, and interaction with others. As mentioned earlier, Harare's informal settlements lack adequate spaces for play, yet, physical activity is still an essential part of human life, as it promotes growth and development and has multiple benefits for physical, mental, and psychosocial health (World Health Organization, 2022).

In Harare, Mbare hosts a vibrant youth movement by the House of Arts Association (HAA) cultivating art-centric culture through festivals and activities. Movement through



Figure 6. Young urban farmers in Kampala, Uganda, part of the Ghetto Go Green project by Network for Active Citizens and Dreamtown, Credit: Sticker, 2023

dance and performance is a tool for advocacy in the community (Kronsted, 2020). Mental health issues in Zimbabwe disproportionately burden youth, yet these conditions remain underreported due to stigmatisation (UNICEF, 2023). To raise awareness surrounding mental health issues, HAA is empowering youth in the community to develop sports and arts-based mental health initiatives.

In Kroo Bay, Sierra Leone, a dynamic soccer team for girls thrives, and nurtures their passion for the game. Globally 81 per cent of teens are insufficiently physically active and girls fall behind the most. This highlights the urgent need for spaces where young females can participate in sports and physical activities. This brings to light the significance of support structures such as 'Football for a New Tomorrow' (FANT)¹ in promoting active and healthy lifestyles among youthful female footballers in Sierra Leone and other parts (World Health Organization, 2022).



Figure 7. Community activation sports and arts event in Mbare, Harare, Zimbabwe, Credit: Sticker, 2023

3.1 *Together we Thrive, Inclusive Communities*

Public spaces are a cornerstone of social cohesion; well-planned public spaces can amplify social interactions, enhance social capital, and foster trust, and cross-cultural understanding, ultimately contributing to the cultivation of strong communities (Love & Kok, 2021).

Inclusivity is a crucial aspect of social cohesion. In Kampala, Holistic Action for Development and Environment (HADE) is taking the lead in creating inclusively-designed public places to promote social harmony. The initiative, based on the HerCity toolkit by UN-Habitat, puts women at the forefront and tackles uneven access to resources by redesigning and constructing new green areas exclusively for women and girls in Kamwanyi's informal settlement. This creative method not only empowers women and girls, but also helps the overall well-being and unity of the local people (Kronsted, 2023).

3.2 *Empowered Minds and Digital Futures*

Non-formal education, especially when incorporated with information technology such as the internet, is becoming more effective in enhancing skill acquisition for the youths. This form of education is more flexible and based on competency rather than formal structures which can be valuable for training and developing practical expertise and life skills. The focus on internet access as a basic socio-economic right has prompted developments like internet provision and digital skills training in public spaces to close the digital gap and allow better learning opportunities and information resources (UNESCO, 2021). Today, free internet access is one of the most crucial resources among young people to learn new skills while exploring and staying connected with their community.



Figure 8. Girls team training in Freetown, Sierra Leone. Supported by 'Football for a New Tomorrow (FANT)', Credit: Sticker, 2023.

Public places and facilities are increasingly vital in closing the digital and education gap in Africa. The youth use these spaces to obtain practical skills, access crucial information, and connect not only with the local, but also the global village.

Financial constraints and distance challenges make traditional formal education less accessible to many young people in Sierra Leone. To close this gap, non-formal education programs are now seen as important alternatives that offer basic education and skills development for marginalised youth. Since the inception of this movement, non-profit organisation named the Youth Dream Centre has played a key role for more than ten years. They provide a complete programs that involve academic studies, vocational training, and computer and media skills as well. To further increase the scope and influence, Youth Dream Centre has collaborated with Dreamtown to open community centres functioning as education centres for those in the community who are unable to pursue formal education to develop skills such as cooking, tailoring, beadwork, etc., which they can utilise to create income generation opportunities. These centres offer secure and accommodating platforms for learning that are placed at strategic points within communities where the need is greatest in terms of education (Dreamtown NGO, 2021). *'I have a passion for tailoring, this is what motivated me to take this course at the Youth Dream Centre. Sometimes I did not have money for transport but I would walk all the way to the centre to empower myself. Now, other people can enjoy the work of my hands and I earn money for transportation and basic needs.'*



Figure 9. HerCity workshop by HADE at Kamwanyi, Kampala, Uganda, Credit: Sticker, 2023.

3.3 Enrooted Potential, Healed Livelihoods

“I have always loved nature and working in the garden but what would pull me away was the question of where would I get money if I sacrificed all my time in the garden. But through this initiative, I was able to secure a space for the garden and use it as a source of income to finance my studies.”- A young man from Kampala

The youth employment crisis in Africa is complex and involves such issues as the absence of decent work, underemployment, and restricted access to productive resources. However, entrepreneurship is considered a possible way of addressing the youth unemployment problem in Africa, providing opportunities for sustainable job creation and poverty reduction (Carreras et al., 2020).

Youth in Africa are exploring their enrooted potential to create diverse opportunities for livelihoods within cities. Komb Green Solutions is a youth group formed by reformed youth who were formerly involved crime within Korogocho community in Nairobi, Kenya. The group is committed to restoring the Nairobi River and riparian land along it. As part of the Changing Faces Competition run by Public Space Network in Kenya, the group transformed a dumpsite along the river into the current Korogocho people’s park offering access to green space to the local residents (Tehlova, 2019). The organisation carries out income-generating projects such as urban farming to employ the youth and improve food security for the local population. They have utilised innovative solutions such as mechanical waste collection equipment, hydroponic urban agriculture, and recycling plastic waste into construction bricks. The collective effort of creating the space has given the youth a



Figure 10. A girl writing at the non-formal classes at Youth Dream Centre, Freetown, Sierra Leone.
Credit: Sticker, 2023

sense of empowerment and revitalised the livelihoods of the youth in the area. In Kampala, the Ghetto Green project is a similar initiative by Network for Active Citizens that has promoted the creation of green spaces known as K-zones. The youth are empowered to utilise these spaces for urban farming and gardening as an income-generating activity giving them not only a source of livelihood but also a new sense of purpose.

3.4 The urban vaccinators

‘What motivates me? I personally lost my brother through criminal activities. So, these initiatives we are doing is to give back to the community and to save more lives and to help more youth who are still in crime to get out of the life of crime and to concentrate on conserving the environment’.

- A young man who spearheads the regeneration of Korogocho Peoples’ Park

‘I have seen children as young as 10 years hanging out in drug dens, I wanted to create an after-school program - a place where they could be safe and remain kids.’

- A passionate young female teacher and placemaker leading children’s program at Sister Brother Love Initiative, Dandora in Nairobi, Kenya



Figure 11. Young woman practising tailoring at Youth Dream Centre, Freetown, Sierra Leone.
Credit: Sticker, 2023

4. Conclusion

The role of African youth in reinvigorating urban spaces and promoting youth health and well-being is critical. They are the foundational pillars and dynamic change agents in the city, essential in shaping resilient, vibrant, and adaptive urban communities for the future. This photo essay illustrates how youth embody the roles of both roots and vaccines, crucial in revitalising and healing ailing urban environments, and the transformative impact of their initiatives in public spaces across African cities such as Nairobi in Kenya, Kampala in Uganda, Freetown in Sierra Leone, and Harare in Zimbabwe. These initiatives include urban farming, advocating for internet access as a fundamental socio-economic right, environmental stewardship, such as community-led green space development and recycling programs, cultural preservation efforts through local arts and heritage projects, health-related initiatives like community health awareness campaigns, and educational programs focusing on skill development and literacy.

The narrative goes beyond mere participation, calling for a shift towards empowering youth to assume leadership in urban decision-making. This transition articulates the urgent need for adaptive governance that deeply incorporates and elevates the role of youth in urban development processes. Young people, with their unique perspectives and innovative capacities, are indispensable catalysts in driving sustainable initiatives that bolster economic, social, mental, physical, digital, and educational aspects of health and well-being in urban settings. Their active engagement in designing, implementing, and maintaining public spaces is not just beneficial, but also imperative for the long-term sustainability of



Figure 12. Young man works in his urban garden. As part of the Ghetto o Green project, in Kampala, Uganda, Credit: Sticker, 2023



Figure 13. Youth in an urban garden in Korogocho, Nairobi, Credit: Sticker, 2023



Figure 14. A young man who spearheads the regeneration of Korogocho Peoples' Park Credit: Sticker, 2023



Figure 15. A passionate young female teacher and place maker leading children's program at Sister Brother Love Initiative, Dandora in Nairobi, Kenya. Credit: Sticker, 2023

urban development. This narrative calls for a decisive paradigm shift in urban planning and governance methodologies. It demands an approach where youths are not just participants but active leaders. Providing these young leaders with adequate support, resources, and platforms to express and implement their ideas is crucial for ensuring the vitality and resilience of urban landscapes.

Acknowledgement

It is a privilege to extend heartfelt gratitude and recognition to those who have played pivotal roles in shaping and enlivening this narrative. Immense appreciation is due to DreamTown and the Public Space Network (PSN). DreamTown, a Copenhagen-based NGO, supports the dreams of young people living in cities across Africa by focusing on the development of youth-friendly urban spaces within slums and informal settlements in Sierra Leone, Uganda, Kenya, and Zimbabwe. PSN, a Kenya-based NGO, is focused on revitalising Nairobi's public spaces and currently works exclusively in Kenya.

Equally deserving of recognition are the vibrant youth groups and CBOs in these cities, including the House of Arts Association, Football for a New Tomorrow (FANT), Holistic Action for Development and Environment (HADE), Youth Dream Centre in Sierra Leone, Ghetto Go Green in Kampala, Network for Active Citizens, and Komb Green Solutions. These groups embody the spirit of resilience, innovation, and community. Through their active involvement, they have turned challenges into opportunities, creating inclusive, safe, and dynamic spaces that cater to the diverse needs of their communities.

A special shoutout is reserved for Simon Sticker. His lens has captured more than just images – it has narrated stories, encapsulated emotions, and depicted the raw beauty and complexity of urban life in these cities. Each photograph in this essay is a testament to his skill, artistry, and keen eye for detail. Through his work with DreamTown, he has been able to capture the images presented in this essay.

References

- Anadolu Agency (2021) Uganda faces rising tide of urbanization [Online]. Available from: <https://www.aa.com.tr/en/africa/uganda-faces-rising-tide-of-urbanization/2414711> [Accessed: 27 January 2024].
- Big Bold Cities. (No date), Nairobi: Placemaking and Public Space Networking [Online]. Available from: <https://bigboldcities.org/en/innovation/nairobi-placemaking-and-public-space-networking.html> [Accessed: 27 January 2024].
- Biriwasha, K.M. (2018) Towards a New Urban Agenda for Harare [Online]. Available at: <https://www.linkedin.com/pulse/towards-new-urban-agenda-harare-chief-k-masimba-biriwasha/> [Accessed: 27 January 2024].
- Carreras, M., Sumberg, J. and Saha, A. (2020) Work and Rural Livelihoods: The Micro Dynamics of Africa's "Youth Employment Crisis. *The European Journal of Development Research*, 33(6), pp. 1666–1694. Available from: doi: 10.1057/s41287-020-00310-y.
- Chipenda, C. (2017) Livelihood Resilience and Diversity in the Face of Socio-Economic Challenges: Exploring the Experiences of Urban Youth in Harare (Zimbabwe). *International Journal of Urban Studies*, 15(2), pp. 112-134.
- Cities Alliance (2021) No Time to Lose: How Youth are Enabling Climate Adaptation [Online]. Available from: <https://www.citiesalliance.org/newsroom/news/results/no-time-lose-how->

- [youth-are-enabling-climate-adaptation](#) [Accessed: 27 January 2024].
- Dreamtown NGO (2021) Safe space to learn [Online]. Available from: <https://www.dreamtown.ngo/newsandstories/2021/10/22/building-skills-changing-lives> [Accessed: 24 January 2024].
- Ivy Njambi Maina. (2021) Safe and Beautiful Public Spaces: A Necessity, Not a Luxury [Online]. Available from: <https://www.urbanet.info/safe-and-beautiful-public-spaces-necessity-not-luxury/> [Accessed: 27 January 2024].
- Kenya National Bureau of Statistics (KNBS) (2019) Kenya 2019 Population and Housing Census. KIPPRA. (2022). Accelerating Green Urban Growth in Nairobi [Online]. Available from: <https://kippra.or.ke/accelerating-green-urban-growth-in-nairobi/> [Accessed: 10 July 2024].
- Komba, T. (2022) Environmental Effectiveness and Community Participation in Sustainable Solid Waste Management Practices in Freetown City, Sierra Leone. *American Journal of Environmental Protection*, 11(4), pp.82-96.
- Kronsted, S. (2020) Mbare Festival [Online]. Available from: <https://www.dreamtown.ngo/newsandstories/2020/3/24/mbare-festival> [Accessed: 24 January 2024].
- Kronsted, S. (2023) Female-led urban design in Kampala [Online]. Available from: <https://www.dreamtown.ngo/newsandstories/2023/12/5/designing-spaces-for-women-and-girls-in-kampala-her-city-is-taking-form> [Accessed: 31 January 2024].
- Kwiringira, J.N., Kabumbuli, R., Zakumumpa, H., et al. (2021) Re-conceptualizing sustainable urban sanitation in Uganda: why the roots of 'Slumification' must be dealt with. *BMC Public Health*, 21, p.992. Available from: doi: 10.1186/s12889-021-11029-8.
- Love, H. and Kok, C. (2021) Exploring the often fraught relationship between public spaces and social divides [Online]. Available from: <https://www.brookings.edu/articles/exploring-the-often-fraught-relationship-between-public-spaces-and-social-divides/> [Accessed: 27 January 2024].
- Madeleine, G. and Maassen, A. (2021) Nairobi's Public Spaces Help Build Flood Resilience [Online]. Available from: <https://www.wri.org/nairobi-public-spaces-build-flood-resilience> [Accessed: 27 January 2024].
- Makworo, M. and Mireri, C. (2011) Public open spaces in Nairobi City, Kenya, under threat. *Journal of Environmental Planning and Management*, 54(8), pp.1107–1123. Available from: doi: 10.1080/09640568.2010.549631.
- Masimba, G. (2021). Harare: City Scoping Study. Dialogue on Shelter, Harare.
- Matamanda, A.R. and Mphambukeli, T.N. (2022) Urban (in)security in an emerging human settlement: Perspectives from Hopley Farm Settlement, Harare, Zimbabwe. *Frontiers in Sustainable Cities*, 4, p.933869 Available from. doi: 10.3389/frsc.2022.933869.
- Meredith, T., MacDonald, M., Kwach, H., Waikuru, E. and Alabaster, G. (2021) Partnerships for Successes in Slum Upgrading: Local Governance and Social Change in Kibera, Nairobi. In Home, R. (ed.) *Land Issues for Urban Governance in Sub-Saharan Africa*. Local and Urban Governance. Springer, Cham. Available from: doi: 10.1007/978-3-030-52504-0_15.
- Muchiri, C.N. and Opiyo, R.O. (2022) Community adaptation strategies in Nairobi's informal settlements: Lessons from Korogocho, Nairobi-Kenya. *Frontiers in Sustainable Cities*, 4, p.932046. Available from: doi: 10.3389/frsc.2022.932046.
- Mutisya, E. and Yarime, M. (2011) Understanding the grassroots dynamics of slums in Nairobi: the dilemma of Kibera informal settlement. *International Transactions on Engineering, Management, and Applied Sciences and Technologies*, 2(2), pp.197-213.
- National Council for Population and Development (2020) The State of Kenya Population 2020 [Online]. Available from: https://kenya.unfpa.org/sites/default/files/pub-pdf/state_of_kenya_population_report_2020.pdf [Accessed: 31 January 2024].
- Ndetei, D.M., Khasakhala, L. and Omolo, J.O. (2008) Incentives for health worker retention in Kenya: An assessment of current practice. *EQUINET*, 62, p.29.
- Ngegba, A.O.A. and Bertin, A.J. (2020) Assessment of the Energy Potential of Municipal Solid Waste (MSW) in Freetown, Sierra Leone. *Open Access Library Journal*, 7, p.e5902. Available from: doi: 10.4236/oalib.1105902.
- Ottosen, N. and Mews, G. (2019) Exploring new horizons for youth well-being and Public Space in

- Sierra Leone. ISOCARP Review 15: Planning for Metropolitan areas, pp.332-349.
- Patel, V., Flisher, A.J., Hetrick, S. and McGorry, P. (2007) Mental health of young people: a global public-health challenge. *The Lancet*, 369(9569), pp. 1302-1313.
- Project for Public Spaces (2020) Communities in Nairobi Compete to Contribute to Public Space [Online]. Available from: <https://www.pps.org/article/communities-in-nairobi-compete-to-contribute-to-public-space> [Accessed: 27 January 2024].
- Reglitz, M. (2020) The human right to free internet access. *Journal of Applied Philosophy*, 37(2), pp.314-331.
- Rigon, A. (2014) Building Local Governance: Participation and Elite Capture in Slum-upgrading in Kenya. *Development and Change*, 45(2), pp.257-283. Available from: ResearchGate [Accessed: 27 January 2024].
- Sood, D.S. (2004) Waste Management Study for Freetown, Sierra Leone. World Bank.
- Tehlova, A. (2019) "Changing Faces Competition. Mobilizing Citizens to Reclaim Public Spaces in Nairobi", *The Journal of Public Space*, 4(3), pp. 61–86. doi: 10.32891/jps.v4i3.1221.
- Udal, H. and Hoelsher, K. (2009) Urban Youth Bulges And Social Disorder: An Empirical Study Of Asian And Sub-Saharan African Cities. World Bank E-Library. Available from: <https://doi.org/10.1596/1813-9450-5110> [Accessed: 22 June 2013].
- UNESCO (2021) The digital learning turn in Africa: the role of local ecosystems [Online]. Available from: <https://unesdoc.unesco.org/ark:/48223/pf0000377725> [Accessed: 10 July 2024].
- UN-Habitat (2023) Uganda Country Brief [Online]. Available from: https://unhabitat.org/sites/default/files/2023/07/uganda_country_brief_final_en_1.pdf [Accessed: 10 July 2024].
- UNICEF (2023) A case for mental health of children and adolescents in Zimbabwe [Online]. Available from: <https://www.unicef.org/zimbabwe/reports/case-mental-health-children-and-adolescents-zimbabwe> [Accessed: 24 January 2024].
- UNICEF Uganda (2024) U-Report [Online]. Available from: <https://www.unicef.org/uganda/what-we-do/u-report> [Accessed: 10 July 2024].
- United Nations Population Fund Zimbabwe (No date) Young People [Online]. Available from: <https://zimbabwe.unfpa.org/en/topics/young-people-2> [Accessed: 27 January 2024].
- WHO, World Health Organization (2022) Physical Activity [Online]. Available from: <https://www.who.int/news-room/fact-sheets/detail/physical-activity>.
- WHO, World Health Organization (2022) Global status report on physical activity 2022 [Online]. Available from: <https://iris.who.int/bitstream/handle/10665/363607/9789240059153-eng.pdf?sequence=1>.
- World Bank (2021) Population living in slums (percentage of urban population) – Zimbabwe [Online]. Available from: <https://indexmundi.com/facts/zimbabwe/indicator/EN.POPSLUM.UR.ZS> [Accessed: 12 July 2024].

Hands Together. Nature-Based Placemaking in an Urban Poor Resettlement Colony

Dulari Parmar

Youth for Unity and Voluntary Action (YUVA), India

dulari.p@yuvaindia.org

Abstract

Urbanisation practices in the Global South typically push the urban poor to the margins, making way for built infrastructure. In India, this involves relocating informal settlements to Rehabilitation and Resettlement (R&R) colonies, which often suffer from poor design and unjust resettlement processes (Burte and Kamath, 2023). These ‘formal’ habitat solutions have paradoxically been shown to compromise liveability, and engender worsening physical and mental health, particularly amongst children and young people (Doctors For You, 2018; Parmar et al., 2022; YUVA, 2019). A notable example is the Lallubhai Compound in the M-East ward, Mumbai, an R&R colony where heat islands are experienced due to poor design and ventilation (YUVA, 2023).

In this context, public spaces are important for respite, coping and recovery. The designated public spaces within Lallubhai Compound were concretised; however, this led to waterlogging, with use ranging from informal waste disposal to *addas* (hindi slang for common gathering points) for drugs and alcohol. This paper discusses how a non-profit, Youth for Unity and Voluntary Action (YUVA), collaborated on reclaiming an abandoned public space in Lallubhai Compound through a climate justice lens. The approach adopted cut across existing power imbalances, and included the municipality, youth and children’s collectives, women’s groups, experts and donors, resulting in a nature-based solution that firmly intersects with community placemaking.

Children and young people worked with adults to spread awareness, co-design the public space and adopted scientific greening to successfully create a safe, green haven, enabling social cohesion amongst residents. The community-led initiative demonstrates a nature-based micro transformation toward climate-just adaptations in urban poor communities that can be upscaled. Amid growing scholarship on sustainable adaptations in informal settlements and with the urban poor, this paper frames possibilities for overcoming social and climate vulnerabilities (Garschagen et al., 2024) while offering pathways for systemic change toward climate-just cities.

Keywords: rehabilitation and resettlement colony, nature-based solutions, urban poor climate adaptation, community-led action, climate justice

To cite this article:

Parmar, D. (2024) “Hands Together: Nature-based Placemaking in an Urban Poor Resettlement Colony”, *The Journal of Public Space*, 9(2), pp. 185–198. doi: 10.32891/jps.v9i2.1792.

This article has been peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

I. Introduction

Infrastructure projects in urban South Asia are accompanied by violence and displacement of urban poor populations to the margins of cities (Burte and Kamath, 2023). Project-affected people are often rehoused in Rehabilitation and Resettlement (R&R) colonies, located far away from their original residences with an altered housing typology (ibid.). The housing typologies are designed to maximise housing units and accommodate high densities, leading to significant gaps in basic standards of liveability (Ghosh, Hazra and Samling, 2015). In the context of Indian cities like Mumbai, there are a separate set of building by-laws for R&R housing, which compromises in every aspect of liveability compared to those for general 'residential buildings'¹. This discrepancy, particularly evident in the separate design guidelines for Mumbai's R&R colonies, leads to tall buildings with insufficient buffers, limited public open spaces, and smaller housing units for larger families (Doctors For You, 2018). The study by 'Doctors For You' further highlights the absence of an upper limit for building density and height, as well as a 50 percent reduction in setbacks from plot edges (ibid.).

Multiple R&R colonies have been built over the years under different projects by authorities in the city of Mumbai, India. The majority of these are concentrated in the 'M-East' ward. Situated along the eastern edge, among Greater Mumbai's 24 administrative wards, M-East ward consistently ranks lowest across various socio-economic, infrastructure, and physical access parameters, making it socially vulnerable (Municipal Corporation of Greater Mumbai, 2010; Climate & Air Pollution Risks and Vulnerability Assessment, 2022). M-East ward is inhabited by some of the most marginalised populations in the city, with least access to basic amenities, water supply, education, sanitation and transportation amongst others (Climate & Air Pollution Risks and Vulnerability Assessment, 2022).

An injustice of the climate crisis is that the socioeconomically marginalised contribute minimally to emissions, yet are forced to bear the brunt of climate change impacts (Islam and Winkel, 2017). In addition to being the most socially vulnerable ward, M-East ward stands out as the most climate-vulnerable ward, with 40,08 percent of its population affected by urban heat risks (MCAP, 2022). For instance, through YUVA's Climate Hazard Mapping initiative, high Land Surface Temperatures of 38.3°C in March 2022 were documented in the neighbourhoods of R&R settlements using GIS (YUVA, 2023). The Air Quality Index was observed to be in the range of 'unhealthy', i.e. 151 to 200 during November 2021 (ibid.).

In this paper, the Lallubhai Compound case study illustrates the social and climate vulnerabilities of R&R colonies, focusing on the role of people's participation in climate adaptations. It details YUVA's participatory approach, including highlighting key priorities and decision-making to address community needs. The study combines qualitative methods with quantitative assessments of social and climatic parameters to support Nature-Based Solutions (NBS) and placemaking strategies. The paper further explores the broader implications for governance, urban planning, and climate justice while critiquing existing policies and advocating for more inclusive approaches. It proposes scaling up successful micro-level interventions to influence macro-level climate strategies, emphasising the dire need of amplifying marginalised voices for climate just cities.

1. Residential building means a building in which sleeping accommodation is provided for normal residential purposes, with or without cooking or dining facilities, and includes one or more family dwellings, lodging or rooming houses, hostels, dormitories, apartment houses, flats, and private garages of such buildings (DCPR-2034, 2018). Note: This does not include R&R housing in the definition.

2. Social and climate vulnerabilities in Lallubhai Compound R&R colony

'Lallubhai Compound' located in M-East ward of Mumbai, is an R&R colony comprising 65 buildings, colloquially referred to as 'vertical slums', accommodating over 100,000 residents (Jadhav, 2015). These residents were relocated from various parts of the city, such as P. D' Mello Road, Sion, Koliwada, Matunga, Parel, among others, due to development projects, notably the Mumbai Urban Transport Project 2002 (YUVA, 2019). Since its establishment, poor design has engendered social vulnerabilities. For instance, the lack of operational lifts in five to seven-storey buildings presents difficulties for the elderly, disabled individuals, the sick, and children. Densely-packed structures with a mere three metre distance between buildings not only ignore fire and safety regulations, but poor ventilation and lack of natural light add to health concerns. Dimly-lit corridors further pose safety risks especially for children. Water scarcity and insufficient formal waste management exacerbate hygiene and sanitation issues. Author Shantha, in a critical analysis, noted an exceptionally high incidence of tuberculosis in the area and described the buildings as "designed for death" (Pardeshi et al., 2020; Parekh, 2023; Shantha, 2018).



Figure 1. Lallubhai Compound R&R colony, Image credits:Yuva

Houses in Lallubhai Compound measure 225 sq. ft. and comprise essential rooms but offer little space for the families, which range in size from 5 to 15 members. Consequently, children and young people have no area for play, study, or privacy. They are vulnerable to abuse and often unable to express themselves fully. Cramped living conditions contribute to early exposure of children to drugs and alcohol at home. Scarcity of space both at home and within the community creates emotional and psychological challenges for children, exacerbating existing socio-economic vulnerabilities.

Existing public open areas within the colony are almost entirely concretised and devoid of greenery, exacerbating climate vulnerabilities stemming from high temperatures and poor

cooling. The heat in outdoor open spaces discourages residents from using these spaces. On the other hand, they become *addas*² for drug and alcohol users, further compromising the safety of children and young people. In a young resident's words, "All the drug users congregate around here and don't let us play. It's especially unsafe for girls. If this ground becomes cleaner, it'll be really good for us." Furthermore, the lack of adequate waste collection systems and disposal infrastructure results in residents dumping waste in open spaces. Accumulating garbage in open spaces poses significant health and safety hazards to children, young people, and the larger community. Residents are clear on the need for local government intervention to address the critical issue of waste management, stressing that children bear the brunt of this unsafe environment (YUVA, 2018b).

24 percent of children in Lallubhai Compound reported that they do not play, due to lack of play spaces and because they are not allowed to play for various reasons (YUVA, 2019). Those who play do so at home or in the corridors of buildings (YUVA, 2019; Parekh, 2023). When children articulated their ideal spaces for recreation in the colony, 26.1 per cent mentioned that they aspire for a garden (park) in the current R&R colony, followed by a 25.2 per cent who aspire for a ground for games (ibid.). To address these pressing issues, the next section will explore the initiative facilitated by YUVA and a broad range of stakeholders.

3. Hands Together: A collaborative approach

This section will outline the strategies and insights derived from an initiative led by YUVA, in partnership with various stakeholders, focusing on nature-based placemaking in Lallubhai Compound.

3.1 About YUVA and the children's collective BASS

Youth for Unity and Voluntary Action (YUVA) is a non-profit based in India that works with the marginalised to empower them and enable their access to rights. The organisation's work integrates a climate justice lens. YUVA attempts to understand the impacts, losses, and coping strategies related to climate change from the perspective of the urban poor. By leveraging their experiences, YUVA facilitates the development of local adaptations, enhances people's participation, and calls for inclusive policy and practice. In the early 2000s, YUVA played a crucial role in enabling and supporting the Bal Adhikar Sangharsh Sangathan (BASS)³, a collective focused on upholding children's rights in Lallubhai Compound and other areas of Mumbai city (Officialyuva, 2023b). Since then, BASS has evolved into a child-led platform for marginalised young urban leaders to gain knowledge, express themselves and seek change. Participation in this collective helps children develop a stronger voice and agency in fighting for their rights and transforming their lives (Nuggehalli et al., 2024). Currently the BASS collective is active within several urban poor communities across Mumbai, focusing on children's development and protection through initiatives led by children as protagonists and agents of change (YUVA, 2018a).

For instance, in Lallubhai Compound, BASS has conducted numerous campaigns on child protection, development and the reclaiming of public spaces (Officialyuva, 2019). Through street plays, BASS groups have raised awareness and built networks with cooperative

2. Hindi slang for common gathering points

3. The Hindi words 'Bal Adhikar Sangharsh Sangathan' loosely translate into 'a collective on the struggle for children's rights'

society members, advocating for mobile resource centres for children unable to attend existing schooling facilities, as well as the establishment of libraries and recreational spaces within buildings (Officialyuva, 2022). They have also engaged with the police and civic authorities to advance dialogue on housing and demand improvements in living conditions. Their advocacy for clean and safe child-friendly communities has been crucial; similarly their involvement has been vital in advocating for ward-level Child Protection Committees (CPCs) (Yuvaonline, 2021). The next section outlines the methodology, which leveraged YUVA's and BASS collectives' previous experience and engagement in Lallubhai Compound to bring the community together.

3.2 Methodology

As an action initiative, the nature-based placemaking case detailed in this paper proceeded through a combination of methods—research, stakeholder dialogue and decision making, collaboration with multiple agencies, and direct action. YUVA interfaced directly with resident communities as well as with several agencies including the World Resources Institute (WRI)⁴the Mumbai Metropolitan Region Development Authority (MMRDA)⁵, and the Brihanmumbai Municipal Corporation (BMC)⁶. Hence, the process grew as a close partnership between community residents and a broader network of committed stakeholders.

First, YUVA adopted qualitative methods involving participatory co-design workshops with stakeholders including BASS, youth, women groups, and residents groups to identify community needs and priorities. Through teamwork, songs, and play, active participation was encouraged, and critical local issues were identified through deliberative dialogues. Workshops with women enabled a safe space to discuss neighbourhood biodiversity and climate, and their design ideas emphasised the need for effective placemaking. Sessions on housing society bylaws and the City Land-Use Plans facilitated discussions on needs and gaps in spaces for participatory decision making about their houses and neighbourhoods. These processes were driven by the principle of mainstreaming power and justice into conversations about the climate, the environment and into decision making on solutions and plans. A positive output was participation from most impacted groups beyond traditional power brokers and leaders in the community. These processes took nearly 12 months, and hence lent relevance to the entire initiative, seeding ownership among participants that lasted well beyond the workshops and discussions.

Alongside community engagement, quantitative methods were underway. These included pre- and post-plantation assessments to monitor environmental parameters like soil health, tree health, waste management, water management and biodiversity survey. Specifically, ecological specialists conducted site assessments and scientifically documented local flora and fauna, providing guidance on selecting and planting native species through direct sessions with the community members. Additionally, a Biodiversity Survey, conducted with the assistance of experts⁷, collected data to support the implementation of greening solutions. Waste management and water management surveys were facilitated

4. This initiative is a part of the 'Regreening vulnerable neighbourhoods' project in collaboration with Yuva, WRI, BMC and MMRDA. It undertakes the transformation of neglected community spaces in Mumbai's ward to augment green cover and enhance accessibility for women and children.

5. MMRDA is a parastatal agency of the government of Maharashtra designated as the special planning authority for the Mumbai Urban Transport Project (MUTP) 2002. The MUTP Project included the R&R of affected communities, including the establishment of Lallubhai compound as one such R&R colony.

6. The Brihanmumbai Municipal Corporation (BMC) is the governing civic body of Mumbai.

7. The experts from Ladybird environmental consulting LLP conducted the survey

by YUVA and engaged residents to assess existing gaps in these areas. A detailed water survey involved 1,776 people from eight buildings, gathering extensive information on water usage, availability, and timing. Findings from the surveys reinforced the decision to prioritise Nature-Based Solutions (NBS) by providing crucial data that highlighted the community's needs and climatic conditions. Additionally, the diverse interactions were novel for the residents, and the multi-stakeholder dialogues effectively secured ongoing community investment and collaboration throughout the action phase.

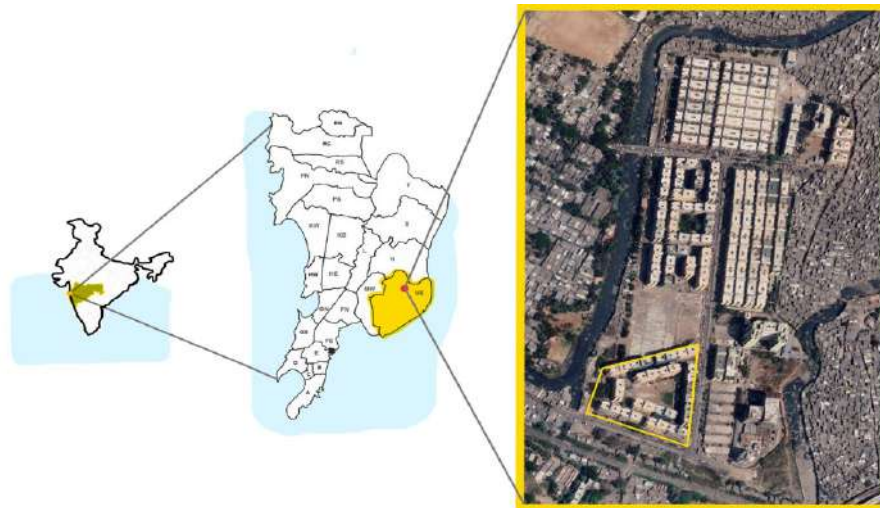


Figure 2. Location map of intervention sites, Image credits: Yuva

A key shared outcome of the ecological assessments and co-design processes was the decision to enhance the existing public open space located at the buffer zone of the Hiranandani Building R&R colony in Lallubhai Compound. Once site selection was done in collaboration and with agreement and excitement of all stakeholders, a detailed action plan was developed together. The two interlinked strategies that were taken up as next steps in the action intervention were (i) Nature-Based Solutions (NBS) for ecologically sound greening and (ii) Placemaking for encouraging social cohesion and sustaining stewardship. The complementarity and interplay between both strategies and impacts of investing in the process is outlined in the following section.

4. Unfolding Nature-Based placemaking

IPCC's report on 'Cities, Settlement and Key Infrastructure' argues for Nature-Based Solutions as important ecological infrastructure toward climate change adaptation in cities (Dodman et al, 2022). NBS encompass strategies aimed at safeguarding, sustainably managing, and restoring natural or altered ecosystems, effectively addressing societal challenges while providing benefits for human well-being and biodiversity simultaneously (ibid.).

In the public space site in Lallubhai Compound a scientific plantation plan was devised for NBS, accompanied by community engagement, especially with children and young people. A naturalist expert worked with the young people to identify suitable species for plantation, considering factors such as distance, clustering, and tree behaviour. In

collaboration with the community members, soil health parameters such as pH levels, temperature and humidity were monitored. YUVA anchored cross learning between the community and relevant experts on the environment, biodiversity, and waste management. The residents appreciated sessions on tree plantation, post-plantation care, post-monsoon care, and workshops on understanding trees and their ecosystems. Local knowledge revealed the presence of large numbers of rats and rat burrows in the area, and hence discussions were held on how to reduce damage from their digging to the young roots. This collaborative ecosystem-based approach aimed to understand greening beyond trees alone and focused on understanding interdependent fauna, such as birds and insects.



Figure 3. Plantation of native tree saplings by youth and children at Lallubhai Compound, Image credits: Yuva

Plantation activities were carried out by children, young people, and adults from the R&R colony. Young people planned for and took leadership in overseeing plant care, watering, weeding and cleaning. Upon completion of the plantation, placemaking strategies were devised to enable stewardship of the newly greened space. Children and young people decided to paint the walls surrounding the space with themes on environmental conservation and education. One wall was entirely reserved for paintings from the youngest residents—‘Pokemons’ and ‘Doraemons’ dominate this wall—lending the entire space a special kind of belonging. Since initial discussions revealed a lack of space for children to study in their homes, young people decided to use the space for children to gather and study together. YUVA helped to facilitate this as an open-air mobile Child Resource Centre, and ensured it developed as an inclusive and generative space (Latagajanan, 2019). The ownership and stewardship displayed by young people and local residents was instrumental in ensuring the placemaking strategies found root and sustained.

After several months elapsed, semi-structured surveys and interviews were conducted to assess waste management, tree health along with behavioural changes and community

perceptions towards the newly developed green space. These provided insights into the social, environmental, and health impacts of the nature-based placemaking intervention. Detailed documentation conducted post-intervention indicated improvements in plant health. The space has become a micro habitat for various bird and insect species too, attracting several local species. A significant shift in the use of the area was noted, with a higher presence of children during the mornings and evenings, and adults and elderly individuals resting in the open space during evenings and late afternoons. The improved social cohesion has over time, resulted in a decrease in the utilisation of the space for drug abuse, vandalism and informal waste disposal.

The Lallubhai Compound model of localised, collaborative nature-based placemaking gained wider public attention, indicating scalable strategies for urban resilience through a climate justice lens in other similar contexts (Arora-Desai, 2023; Talpade and Maliwar, 2023).



Figure 4. Study session on the site conducted via Mobile Child Resource Centre Initiative. Image credits: Yuva

5. Implications for further city-level planning and placemaking

This section briefly highlights two key insights that the Lallubhai Compound case offers for other climate-justice informed resilience work in cities of India and beyond. The first is that urban planning is weak in adequately addressing needs of the urban poor—whether through traditional instruments like land-use plans or the newer city climate plans. Unpacking these gaps and finding entry points for ensuring a climate justice lens is an important area of future research, policy and action. A second insight is the effective strategy of impacting both social and climate vulnerabilities that play out in a public space, towards ensuring change that is nature-positive and stewarded by local communities.

6. Urban planning instruments and the missing urban poor narrative

For many cities in the Global South, a carefully planned relocation of settlements can serve as both a method of disaster risk reduction and a means of climate change adaptation (Ghosh, Hazra and Samling, 2015). Planners have long recognised the connection between a city's layout and public health. However, the presence of separate design policies for public versus private housing highlight the gaps in provision for the cities' most marginalised (YUVA, 2019; Doctors For You, 2018). The case of Lallubhai



Figure 5. The before and after of site conditions in Lallubhai Compound, Image credits: Yuva

Compound and other R&R colonies from Mumbai showcase how vulnerabilities of residents are further exacerbated through resettlement due to weak planning norms and poor design of the resettlement colony. If, as envisioned, vulnerabilities are to be reduced through resettlement of at-risk housing settlements, uniform regulations are needed for public housing along the lines of those for private housing (YUVA, 2019). Extending this argument, the crucial entry point for ensuring adaptation to climate change in R&R colonies is to improve the current planning norms and provide housing and colony design that does not further exacerbate, but rather alleviates the vulnerabilities of marginalised, urban poor communities (Joseph, 2024).

Compounding design challenges, relocation often involves bypassing the provision of basic and essential services by local government authorities to the urban poor communities. This is evident in the context of R&R colonies, where challenges concerning waste management, water supply, sanitation, and building services persist. This also applies to urban planning, particularly regarding the provision of adequate and appropriate recreational public spaces. To evidence this, several locally-led groups with the support of YUVA mapped vulnerable and unsafe spaces in Lallubhai Compound, while young people from other R&R colonies in Mumbai identified that officially recognised open spaces on the City Development Plan lie unused, vandalised and often unsafe for use (YUVA, 2019). Most of these public open spaces have been converted into informal dumping grounds due to the absence of formal waste management in the colonies (Parekh, 2023). This presents significant health hazards to children who frequent such open areas, leading to the prevalence of diseases like malaria, typhoid, and tuberculosis (ibid.).

To advocate for improvement in public spaces, residents' groups, along with YUVA, have participated in consultations with the BMC's Garden Department. Facilitated by YUVA, BASS groups from various areas of the city, along with other children's collectives, had previously submitted suggestions and objections to the Proposed Draft Development Plan for Mumbai 2014–2034 (YUVA, 2018b). Specifically, in M-East ward, the recommendations have focused on the provision of public open spaces to accommodate the growing population and the development of these spaces using Nature-Based Solutions (NBS) strategies. Further, the recommendations argued that allocation of new open spaces should adhere to the norms outlined in the National Building Code, India 2016, which mandates the provision of public services based on population. Overall, at the Mumbai city level, there is widespread recognition and discourse that planning norms should prioritise

the provision of open spaces and ensure inclusive access to these spaces throughout the city.

In March 2021, the Mumbai Climate Action Plan was released by the Municipal Corporation. While one of the first of its kind in India, the plan evidenced a weak understanding of and representation of the urban poor in proposed strategies and actions (Indorewala and Wagh, 2022). This lack of representation has led to gaps in addressing the specific needs, vulnerabilities, and aspirations of these communities and may further entrench inequitable distributions of the benefits and burdens of climate action. The plan is not equipped to address the unique challenges and needs of the urban poor, especially those who live in climate vulnerable locations like the R&R colonies. Authors Indorewala and Wagh highlight the fundamental limitations of the plan, which operates within an advocacy and project consultancy framework rather than being integrated into statutory planning; thus, lacking legal binding and do not hold the involved agencies accountable to the public (ibid.). Ongoing discussions on climate planning underscore the need for mainstreaming climate justice, which integrates the principles of social justice into all aspects of climate action, including city level plans and actions. These principles entail including the most marginalised voices, particularly children, young people, women and socially marginalised groups.

7. Contributing to a framework for sustainable urban adaptations

Globally, examples of climate adaptation in urban settings are limited, with those focused on climate-just adaptation for the urban poor being even rarer (Garschagen et al., 2024). Most adaptation strategies come from the Global North, which has distinct contexts and climate conditions compared to the Global South (Strazzante et al., 2021). Consequently, when these Northern adaptations are applied to cities in the Global South, they often fail to effectively address the region's specific climate challenges and socio-economic-cultural realities (ibid.). The complex, multi-layered issues prevalent in cities of the Global South include challenging and often precarious political, economic, and social conditions, severe poverty, inadequate basic services, and intensified climate impacts (United Nations Environment Programme, 2023).

Within urban areas, systemic challenges exist for marginalised urban poor communities, which are not homogenous. Located in ecologically vulnerable and socially least-served areas, these communities face compounded impacts from climate hazards, inadequate services, and environmental degradation, exacerbating socio-economic inequalities (Dodman et al., 2022). Further, intensifying climate impacts exacerbate these challenges and socio-economic marginalisation further isolates disadvantaged people, restricting their access to essential services (Glavovic et al, 2022). Many climate actions, particularly ostensibly pro-climate infrastructure further entrench these vulnerabilities (Dick et al., 2024).

Growing scholarship indicates that participatory planning initiatives at the micro level can synergise for scaling climate and social vulnerability adaptation at the city level (Mehta et al., 2021). The TAPESTRY project, which examines potential 'transformations' at the local level, also advocates for this collaborative approach amongst communities, non-governmental organisations (NGOs), scientists, and supportive state agencies. Reclaiming and transforming public spaces is increasingly recognised as a crucial strategy for urban climate adaptation, particularly in the context of marginalised communities (Mohan and

Muraleedharan, 2022). The research highlighted by Mohan and Muraleedharan (2022) underscores the potential of community commons to serve as adaptive spaces for urban poor settlements and that “community commons” or shared spaces can provide vital environmental, social, and economic support (ibid).

Further the COVID-19 pandemic reinstated that the transformation of public spaces has emerged as a vital adaptation strategy for urban areas, particularly for marginalised communities (Chattopadhyay and Roy, 2022). The authors highlight that there is a growing emphasis on making them more inclusive, multifunctional, and equitable, addressing historical exclusions and better supporting vulnerable populations (ibid.). Within this context, the case of Lallubhai Compound serves as an important demonstration of how addressing both social and climate issues head on, with a climate-justice lens, enables actions that address climate and social vulnerabilities, while also affording sustained change.

8. Conclusion

Community-led nature-based placemaking initiatives like the case from Lallubhai Compound foreground the powerful impact of micro transformations at the grassroots level⁸. Collaborative efforts involving multiple stakeholders and innovative approaches to integrate NBS and placemaking have revitalised community public spaces, creating safer, cohesive and nature-positive open spaces. Young people from the community draw strength from localised forms of climate intervention that enable their collective action further while also inspiring a few to pursue their interests through careers in the climate space (Officialyuva, 2023a). The youth highlight the need to upscale these initiatives at the city level, through Development Plans and Climate Action Plans, where authorised municipal gardens and formal open spaces can adopt nature-based placemaking strategies to enable climate resilience and community stewardship.

The paper indicates systemic gaps and policy loopholes that exist for urban poor communities to participate in and ensure sustainable climate resilience and adaptation in cities (Glavovic et al., 2022). Expanding climate-justice informed urban adaptations requires increased financing, pro-poor policy reforms, and multi-stakeholder collaborations to prioritise the needs of marginalised communities (ibid.). Promoting processes that prioritise community voices, particularly those of children and young people, in decision making is essential for addressing the fundamental causes of social and climate vulnerabilities.

In Lallubhai Compound, micro-level transformation action is growing through similar NBS placemaking in other sites, as well as in educational institutions across different locations in Mumbai, facilitated by YUVA. These micro transformations are closely linked to macro level advocacy, where different stakeholders involved in the process engage with the state to push the needle on larger climate justice concerns. Children and young people have played a central role in these initiatives, ensuring adequate representation of issues, leading implementation efforts, and ensuring lasting impacts. With young people leading the charge in climate action, micro-to-macro-scale transformation can pave the way for climate just cities (Mehta et al., 2021).

In conclusion, integrating principles of justice into climate actions and amplifying

8. Yuva's initiatives in Lallubhai Compound have been supported by various organisations, including UNICEF, WRI India, and individual donors, among others. We acknowledge their technical and strategic contributions and value these long-term partnerships.

marginalised voices are essential steps toward creating more equitable and climate-resilient cities. The transformed public space in Lallubhai Compound illustrates the potential for scalable models of climate adaptation that enable communities to advocate for systemic change, offering a pathway toward climate just cities.

References

- Arora-Desai, P. (2023) 5 open spaces in Mankhurd, Trombay get a green facelift. Hindustan Times, [online]. Available from: <https://www.hindustantimes.com/cities/mumbai-news/5-open-spaces-in-mankhurd-trombay-get-a-green-facelift-101686685215520.html> [Accessed: 15 January 2024].
- Burte, H. and Kamath, L. (2023) The structural violence of spatial transformation: urban development and the more-than-neoliberal state in the Global South, *City* [online], 27(3–4), pp. 448–463. Available from: <https://doi.org/10.1080/13604813.2023.2219549>.
- Chattopadhyay, B. and Roy, S. (2022) Reimagining public spaces for the urban poor post COVID-19. *The Bastion* [online]. Available from: <https://thebastion.co.in/politics-and/environment/urban-ecology/reimagining-public-spaces-for-the-urban-poor-post-covid-19/> [Accessed: 18 July 2024]
- Mumbai Climate Action Plan Brihanmumbai Municipal Corporation March 2022. Climate&Air Pollution Risks and Vulnerability Assessment. C40, MyBMC [online]. Available from: <https://drive.google.com/file/d/1ftAQZ3qPsNEFe4bsq24orbWqRHPP6d3/view> [Accessed: 03 January 2024].
- Municipal Corporation Of Greater Mumbai (MCGM) (2018) Development Control & Promotion Regulation 2034 [online]. Available from: <https://www.mcgm.gov.in/irj/go/km/docs/documents/EODB/Construction%20Permit/Related%20Circulars/DCPR-%202034%20and%20Notification.pdf> [Accessed: 19 July 2024].
- Dick E., Klause K., Schaubert A. and Weichelt C. L. (2024) 'Position paper - Cities as levers for socio-ecological transformation' Bischöfliches Hilfswerk Misereor e.V. (Unpublished).
- Doctors For You. (2018). Studying the association between structural factors and tuberculosis in the resettlement colonies in M-East ward, Mumbai, Mumbai Metropolitan Region Environment Society [online]. Available from: <https://www.mmreis.org.in/projects/implementation/119-studying-the-association-between-structural-factors-and-tuberculosis-in-the-resettlement-colonies-in-m-east-ward-mumbai> [Accessed: 15 January 2024].
- Dodman, D. et al. (2022) Cities, Settlements and Key Infrastructure, In: H.-O. Pörtner et al. eds. *Climate Change 2022: Impacts, Adaptation and Vulnerability. Contribution of Working Group II to the Sixth Assessment Report of the Intergovernmental Panel on Climate Change*. Cambridge University Press, Cambridge, UK and New York, NY, USA, pp. 907–1040, [online]. Available from doi:10.1017/9781009325844.008 [Accessed: 28 December 2023].
- Ghosh, A.K., Hazra, S. and Samling, C.L. (2015) Resettlement and rehabilitation : Indian scenario. DECCMA Working Paper, Deltas, Vulnerability and Climate Change: Migration and Adaptation, IDRC Project Number 107642. [online]. Available at: <https://idl-bnc-idrc.dspacedirect.org/items/53e8c68a-96e4-4c6f-b0c5-dc08dfa4d8d8> [Accessed: 13 January 2024].
- Garschagen, M. & W. et al. (2024) Progress and gaps in climate change adaptation in coastal cities across the globe. *Research Square Publications* [online]. Available from: <https://doi.org/10.21203/rs.3.rs-3640385/v1>
- Glavovic, B.C. et al. (2022) Cross-Chapter Paper 2: Cities and Settlements by the Sea. In: H.O. Pörtner et al. eds. *Climate Change 2022: Impacts, Adaptation and Vulnerability, Contribution of Working Group II to the Sixth Assessment Report of the Intergovernmental Panel on Climate Change*. Cambridge University Press, Cambridge, UK and New York, NY, USA, pp. 2163–2194, Available from: doi:10.1017/9781009325844.019.
- Indorewala Hussian and Wagh Shweta (2022) The dangerous optimism of Mumbai's climate action plan, *Scroll.in*, [online]. 1 April. Available from: <https://scroll.in/article/1020471/the-dangerous->

- [optimism-of-mumbais-climate-action-plan](#)[Accessed: 21 July 2024].
- Jadhav Rajendra. (2015) The Nightmare that is Lallubhai Compound. Footnotes [online], 13 October. Available from: <https://smcsfootnotes2015.wordpress.com/2015/10/13/the-nightmare-that-is-lallubhai-compound/>[Accessed: 18 July 2024].
- Joseph, Marina. (2024) The Question of Accountability in Resettlement and Rehabilitation Housing. [no publisher] (Unpublished).
- Latagajanan, N. (2019) How children are fighting eve-teasing and drug abuse in Mumbai's Mankhurd. Citizen Matters, 20 March [online]. Available from: <https://citizenmatters.in/mumbai-lallubhai-compound-children-initiative-bal-adhikar-sangharsh-sangathan-yuva/> [Accessed: 19 July 2024].
- MyBMC. (2022) Mumbai Climate Action Plan Brihanmumbai Municipal Corporation. C40, [online]. Available from: https://drive.google.com/file/d/1gU3Bnhk3UJ_wCFaMClognZBdsdDkQBY1/view?usp=sharing [Accessed: 10 January 2024].
- Mehta, L., et al. (2021) Transformation as praxis: responding to climate change uncertainties in marginal environments in South Asia. Current Opinion in Environmental Sustainability, [online], 49, pp. 110–117. Available from: <https://doi.org/10.1016/j.cosust.2021.04.002>
- Municipal Corporation of Greater Mumbai, (2010) Mumbai Human Development Report 2009. Oxford University Press [online]. Available from: <http://14.139.60.1handle/123456789/5088> [Accessed: 10 January 2024].
- Nuggehalli Roshni, K. J. Siddharth, and Bhaware Prakash. (2024) Migrant Children and Substantive Citizenship: How a Children's Collective in Mumbai, India, Is Working to Bridge the Gap, The Childhood, Law & Policy Network (CLPN), Queen Mary-University of London [online]. Available from: <https://www.qmul.ac.uk/clpn/news-views/blog/items/migrant-children-and-substantive-citizenship-how-a-childrens-collective-in-mumbai-india-is-working-to-bridge-the-gap.html> [Accessed: 19 July 2024].
- Officialyuva. (2019) BASS Reports- Safe Spaces [video online]. Available from: <https://www.youtube.com/watch?v=5uthMC4km7Y> [Accessed: 15 January 2024].
- Officialyuva. (2022) CPC Kya hai [video online]. Available from: <https://www.youtube.com/watch?v=h8Nzdo4O3vI> [Accessed: 03 January 2024].
- Officialyuva (2023a) Chalo Basti Badlein: Part 3 [video online]. Available from: <https://www.youtube.com/watch?v=1At6rp2j3hw> [Accessed: 03 January 2024].
- Officialyuva. (2023b) 'बदलाव के लिए, बाल अधिकार संघर्ष संघटन का सफर [video online]. Available from: <https://www.youtube.com/watch?v=9e3nJY5IrcK> [Accessed: 03 January 2024].
- Pardeshi, P. et al. (2020) Association between architectural parameters and burden of tuberculosis in three resettlement colonies of M-East Ward, Mumbai, India, Cities & Health, [online], 4(3), pp. 303–320. Available from: <https://doi.org/10.1080/23748834.2020.1731919>
- Parekh, K. (2023) Glimpses from a Long (and Continuing) Journey Towards Child Rights - YUVA. Youth for Unity and Voluntary Action (YUVA), [online]. Available from: <https://yuvaindia.org/glimpses-from-a-long-and-continuing-journey-towards-child-rights/> [Accessed: 28 December 2023].
- Parmar D. et al. (2022) Environmental health and care require environmental justice. Mariwala Health Initiative Journal [online]- ReFrame pp. 78–81. Available from: <https://reframe2022.mhi.org.in/engage/environmental-health-and-care-require-environmental-justice/> [Accessed: 21 December 2023].
- Shantha S. (2018) Mumbai's "Designed for death" buildings are incubating TB. The Wire [online]. Available from: <https://thewire.in/health/how-mumbais-designed-for-death-buildings-are-manufacturing-tb-hotspots> [Accessed: 03 January 2024].
- Strazzante E., Rycken S., Winkler V. (2022) Global North and Global South: How Climate Change uncovers global inequalities - Generation Climate Europe, Generation Climate Europe [online]. Available from: <https://gceurope.org/global-north-and-global-south-how-climate-change-uncovers-global-inequalities/> [Accessed: 17 July 2024].
- Talpade Deepti and Maliwar Shruti. (2023) Can Greening be Prioritised in Vulnerable Neighbourhoods? WRI India [online]. Available from: <https://wri-india.org/blog/can-greening->

- [be-prioritized-vulnerable- neighbourhoods](#) [Accessed: 10 January 2024].
- United Nations Environment Programme (2023) Adaptation Gap Report 2023: Underfinanced. Underprepared. Inadequate investment and planning on climate adaptation leaves world exposed. Nairobi. 2023 United Nations Environment Programme, [online]. Available from: <https://doi.org/10.59117/20.500.11822/43796>
- Yuvaonline. (2021) My Ward my CPC: demanding efficient child protection systems across Mumbai, Medium [online], 22 December. Available from: <https://medium.com/@yuvaonline/my-ward-my-cpc-demanding-efficient-child-protection-systems-across-mumbai-1912a3885783>. [Accessed: 29 December 2023].
- Youth for Unity and Voluntary Action (YUVA)(2018a) Facilitating Children's Participation in the Urban: A Toolkit for Practitioners, [online]. Available from: <https://yuvaindia.org/wp-content/uploads/2023/05/Toolkit-webversion.pdf> [Accessed: 10 January 2024].
- Youth for Unity and Voluntary Action (YUVA)2018b) #UprootedChildhoods - Speaking up -YUVA, 'YUVA - Youth for Unity and Voluntary Action [online]. Available from: <https://yuvaindia.org/uprootedchildhoods-speaking-up/> [Accessed: 10 January 2024].
- Youth for Unity and Voluntary Action (YUVA)(2019) My Home, My Hopes: Impact of Resettlement and Rehabilitation on Lives of Children in Mumbai - City Se. [online]. Available from: <https://yuvaindia.org/wp-content/uploads/2023/03/My-Home-My-Hopes.pdf> [Accessed: 03 January 2024].
- Youth for Unity and Voluntary Action (YUVA) (2023). Climate Justice, [online]. Available from: <https://yuvaindia.org/climate-justice/> [Accessed: 29 December 2023].

Exploring the Digital Practices of Youth. A Case Study of Saigon Zoo and Botanical Garden

Thien Nguyen, Shoshana Goldstein

Trinity Colleg, United States of America

thien.nguyen@trincoll.edu | shoshana.goldstein@trincoll.edu

Abstract

This paper focuses on the evolving dynamics of digital youth engagement in revitalising public spaces, presenting a compelling case study of the Saigon Zoo-Botanical Garden in Ho Chi Minh City, Vietnam. The Saigon Zoo and Botanical Garden (also known as Saigon Zoo) was once a popular entertainment hub. However, during the 2000s, there was a gradual decline in interest among young visitors, attributed to negative narratives in the public media. This decline almost led to closure amid the global COVID-19 pandemic. Aware of the situation, the youth began to embrace a proactive role in promoting the site through social media. They shared delightful moments of the zoo's animals, setting a trend for taking portraits against the backdrop of its picturesque botanical scenery. Through both physical and digital involvement, the youth breathed fresh life into this historical destination, engaging in acts of photo-taking and photo-sharing when visiting the Saigon Zoo. This study explores the case of the Saigon Zoo, examining how digital involvement influences the youth's perception and engagement with space. Given the nature of this study, the interview process and Photovoice method were employed to understand the digital-related behaviours of the youth. The findings underscore the positive impact of digital engagement on well-being while emphasising the need for a balanced approach to foster optimal engagement.

Keywords: youth, photo, Saigon Zoo-Botanical Garden, digital media, COVID-19 pandemic

To cite this article:

Nguyen, T. and Goldstein, S. (no date) "Exploring the Digital Practices of the Youth: A Case Study of Saigon Zoo and Botanical Garden", *The Journal of Public Space*, 9(2), pp. 199–208. doi: 10.32891/jps.v9i2.1796.

This article has been peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

I. Introduction

In recent years, the well-being of young individuals has emerged as a paramount concern, particularly for those living in metropolises like Ho Chi Minh. This demographic faces an elevated risk of experiencing depression, attributed to factors such as air quality (Ali and Khoja, 2019), disconnecting with nature (Jimenez et al., 2021). Consequently, the zoo has emerged as an ideal retreat for youth seeking to enhance their well-being (Rose, P., & Riley, L, 2023). In today's tech-dominated era, youth's leisure choices go beyond a space's potential for well-being. The younger generation is motivated not only by physical experiences but also by a desire to engage in the digital realm, where presenting identity online plays a crucial role in social lives. This shift highlights the significance of visual aspects and experiences worthy of sharing within a physical space. This paper explores the Saigon Zoo and Botanical Garden as a case study, illustrating how digital involvement can shape people's perceptions and experiences of space.



Figure 1. A corner of Saigon Zoo and Botanical Gardens Credit: photo taken by the author

Established in 1864, the Saigon Zoo and Botanical Garden (also known as Saigon Zoo), one of the oldest zoos in the world, is home to more than 125 animal species and 900 plant varieties. Recognised as the city's lung due to its numerous trees, Saigon Zoo serves as the green oasis in the heart of Ho Chi Minh City, where the urban vegetation is now diminishing. Despite the wealth of its natural resources, the Zoo has grappled with challenges in effective communication with its audience. Throughout the 2000s, negative narratives circulated in public newspapers, portraying the zoo as in decline, with concerns about the well-being of the animals and the lack of infrastructure management. The onset of the COVID-19 pandemic exacerbated financial difficulties, pushing the zoo to the brink of closure¹. In response, the Zoo administration launched a plea for donations

¹ Linh, T. (2020), 156-year-old zoo 'crying for help,' vnexpress.net. Available at: <https://vnexpress.net/so-thu-156-tuoi-keu-cuu-4142556.html> (Accessed: 31 January 2024).

across various social media platforms, capturing the attention of youth, who constitute the primary audience on these platforms. The youth started to engage in promoting the Saigon Zoo's activities as many young photographers visited the destination and started taking photos, presenting a unique perspective through vibrant, human-like characteristics of animals, and showcasing the botanical landscape as an ideal check-in site. This digital involvement redefined Saigon Zoo as not just for family entertainment but as the prime destination for youth to create meaningful physical experiences while benefiting their online engagement.

Following the resolution of the COVID-19 pandemic, there has been a noteworthy increase in young visitors to Saigon Zoo and Botanical Garden. One of the primary activities by youth during their visits is the widespread practice of photo-taking. While some argue that digital devices may divert attention from real-life experiences (Ayeh, 2018), others contend that digital involvement enhances engagement (Dieh et al., 2016) and increases visitors' level of satisfaction when sharing their experiences with others (Lee et al., 2022). Considering the widespread practice of photo-taking among young visitors, understanding the impact of photo-taking and subsequent sharing is essential to understanding how these digital activities contribute to the overall enjoyment of their experiences. Despite the prevalence of digital-related behaviors among the youth, no significant study relating to the Saigon Zoo has been done on this matter. Therefore, in this study, I investigate how the digital practices of photo-taking and sharing by Vietnamese youth impact their engagement with the surrounding space, thereby influencing the youth's experiences at Saigon Zoo and Botanical Garden.

2. Observation and interview process

To understand how young visitors experience the Zoo, I visited Saigon Zoo every day for a week (15-21 January 2024) and conducted interviews in Vietnamese with 52 young visitors (aged 18-25 years old) in total. To gain an overall perspective, I also conducted interviews with Zoo workers, adults (aged 30 and above), and foreigners. The study employed a combination of semi-structured and open-ended interviews and the Photovoice method. Photovoice is the practice of utilising photographs taken by participants, allowing them to reflect upon and share their personal experiences (Anderson et al., 2023). The Photovoice method was also used to facilitate the social media activities of the youth. This was crucial as, despite the variety of social media activities related to the zoo, young visitors often didn't tag their social posts with the location where the photos were taken, making it difficult to collect data.

Firstly, participants were asked about their motivations for visiting the Zoo, and the overall assessment of experiences, encompassing aspects such as the engagement with animals, and the landscape. Subsequently, following the Photovoice method, we asked the participants to select and share their most meaningful or favorite photo. We had follow-up questions such as: What inspired you to take this photo? What does the photo mean to you? What are the main platforms for sharing photos? This dual approach aimed to provide a comprehensive understanding of the relationship between the digital and physical experiences of the youth when visiting the Zoo.

3. The results

A total of 44 photos from 52 visitors are shared with permission from the owner. These photos fell into two distinct categories: animal photography and portraits of visitors captured by their friends. Within the portraits of the visitor’s category, 8 out of 18 images showcase individuals against the backdrop of the natural landscape, while the remaining 10 are positioned at iconic check-in sites within the Zoo. Among the 40 photos dedicated to animal subjects, 19 photos are about animals. Of these, 15 highlight cute reactions or funny behaviors displayed by the animals. Four photos feature animals not traditionally associated with zoos, such as stray cats, which also garnered significant attention from the youth.

Category	No of images	Themes
Animal Photography	15	Funny/cute moments of the Zoo animals
	4	Squirrels, cats
Portrait of the visitors	8	In front of the natural landscape
	10	Iconic check-in sites of the Zoo
Others	7	Botanical garden, art photography, selfies, group photos

Table 1. Overview of photos taken by youth from January 15th to January 21st, 2024

4. Findings & Discussions

When asked about their main motivation for visiting the Zoo, 40 out of 52 respondents indicated a desire to capture photographs. Influenced by the widespread social media activities about the Saigon Zoo, many young visitors are encouraged to visit the place and enjoy novel experiences, such as observing the animals, or connecting with nature, and subsequently capture these experiences to share them online. Hence, taking photos emerges as a central and integral activity for Vietnamese youth during their visits to the Saigon Zoo and Botanical Garden.

5. Photo-taking as a way to enhance the experience

According to a comprehensive study (Gillet et al., 2016), photo-taking has been identified as a means to enhance engagement with positive experiences. This finding supports the positive experiences the youth are having with the “green spaces” in the Zoo. The natural landscape is cherished not only for providing a tranquil space but also as a photogenic backdrop for photo-taking. In a conversation with a young volunteer at the Zoo, she explained, “I think many young people would like to take pictures in the Zoo because the green background makes them look better in photos” (Binh, 2024).

Taking photos requires attention to be directed toward the experience one wants to



Figure 2. The youth taking photos in the Saigon Zoo and Botanical Garden.
Credit: photo taken by the author

capture. Kaplan (1995) states that maintaining focused attention on natural aspects has been found to result in better engagement with space and an enhanced effect of stress relief. To have nice-looking photographs, the youth are encouraged to explore the surrounding space of the zoo, seeking ideal green spots for their pictures. Through the pictures shown by the youth, the youth inevitably enjoyed taking pictures in front of the greenery or natural scenery (see Fig 3). In the assessment of their experiences, most of the respondents expressed a positive attitude towards the Zoo landscape, using descriptors such as “chill,” “refreshing,” and “a different world in Saigon,” reflecting the restorative effect of nature on the youth.

Another common subject in photo-taking is the zoo’s animals. Renowned for their funny characteristics, the Saigon Zoo’s animals serve as a significant draw for the youth on various social media platforms. Observing the animals could provide many opportunities for young visitors to learn about the animal’s habitat, which can also



Figure 3. Some of the portraits taken by the youth Credit: images used with permission

lead to greater enjoyment of experiences (Rose, P., & Riley, L, 2023). Nevertheless, the capacity for engaging in animal-watching is constrained at the Saigon Zoo due to infrastructure limitations. Other visitors, including foreigners and older-aged groups, expressed disappointment with the living conditions of the animals and the lack of on-site educational information at the Saigon Zoo.

While other visitors engaged in observing both animal behavior and the surrounding conditions, the youth exhibited a different approach. Their focus is primarily on observing



Figure 4. The langur, raised in semi-natural habitats, often received food from the visitors. Credit: photo taken by author

and capturing photos of the animals, accompanied by jokes or humorous comments shared with friends. Even when capturing moments of animals in seemingly dull or inactive states, the youth refrain from negative comments, often interpreting sleeping behaviors as normal and looking funny. A psychological study (Diehl et al., 2016) supports this phenomenon, demonstrating that observing and taking photos significantly heightens active participation. The act of capturing enjoyable moments through photography involves the youth in the experience, and it can even prompt them to formulate their narratives about the animals. For example, in the photos of the giraffe sitting on the grassland (see Fig 5.1), one young visitor posted with her caption, “*The short neck giraffe.*” Another took a photo of the tiger sleeping (see Fig 5.2). When asked why they liked this photo, the young visitor commented: “*Because it looks so funny. The tiger looks like I am on the weekend when I am too tired to care about everything else.*” (Anonymous, 2024)

6. Social media engagement: The public eyes

Forty-five individuals shared photos of their zoo trip on various social media platforms.



Figure 5.1. (left): The photos of a giraffe sitting on the ground. Credit: images used with permission
Figure 5.2. (right): The photos of the tiger sleeping. Credit: images used with permission

Commonly-used platforms included mainstream social media channels such as Instagram and TikTok, as well as instant photo-sharing applications like Facebook Stories and Instagram Stories. Some visitors also utilise more private channels, such as Locket, the widget that shares live photos within the circle of close friends. Despite the diversity in social media activities, a recurring concern among respondents was how online audiences would perceive and engage with their posts. For instance, one respondent explained why she avoided sharing her experience on Facebook.

“I am afraid to post photos on Facebook because it often attracts less engagement than other platforms, such as Instagram. Moreover, the audience on Facebook includes not only friends but also teachers, and family, so I usually post more formal content there.” (Anonymous, 2024)

Previously, digital media involvement was studied as a tool for individuals to maintain or connect with social relationships (Ozkul, 2010; Firth, 2012). However, social networks also serve as a space for youth to present their idealised selves, seeking validation from their social circles (Boyd, 2009). Drawing from Goffman’s works on the representation of

identity, Papacharissi (2012) explained how the enhanced digital involvement of the youth has transformed travel experiences into 'performative' tourism. They no longer travel to 'discover' themselves but now think about an experience in terms of how they will share it with others. During interviews and through the photos shared by visitors, a prevalent pattern emerged where many expressed a strong inclination towards capturing images of animals that allow them to present their self-identity on social media platforms. One visitor showed a photo of stray cats in the Zoo (see Fig 6) and explained that she chose this photo simply because she is a cat-lover.

The intrusion of social media activities in the youth's travel experience is noteworthy as it contradicts their common motivation to visit the zoo as an escape from city life, seeking a worry-free environment. The pressure to actively participate in social media activities, through photo-taking and photo-sharing, may hinder youth from appreciating their own travel experiences. Instead, they may find themselves preoccupied with how their experiences are being received by others and how to capture the moments that may attract high levels of engagement. However, photo-sharing nowadays is deemed



Figure 6. The photo of the stray cat living in the Zoo Credit: image used with permission

imperative to travel experiences, and the inability to share is linked to a reduced sense of completion and negative emotions (Lee et al., 2023). Therefore, numerous young visitors expressed a shift in their social media activities, choosing to refrain from sharing their photos on mainstream social media platforms, such as Facebook or Instagram. Instead, they opt to share them discreetly through "stories" or in private spaces like their Locket. This approach allows them to share their pleasures and the novelty of visiting the Zoo and animals while not getting concerned about others.

7. Conclusion

This study aimed to examine young visitors' experience in the Saigon Zoo and Botanical Garden, which predominantly focused on engagement with destination elements in the physical space. We explored the present-day on-site experience of the young visitors with attention paid to the online photo-taking and photo-sharing endeavors of the visitors.

Young tourists both valued the on-site experience and images produced and shared during the trip, which many perceived to be key motivations for their experiences. We observed that the act of capturing photos had a positive impact on the well-being of visitor visits. However, while acknowledging the positive effects of photo-taking and photo-sharing, it is essential to recognise the potential role of digital involvement in distracting from the overall experience. Striking a balance between physical engagement and digital usage becomes crucial for young visitors, as it enables them to derive optimised benefits from both social media activities and real-life experiences.

The Saigon Zoo and Botanical Garden case underscores the significance of social media in connecting with a broader audience. Young visitors use these platforms to visually share and discuss their experiences with physically absent individuals. This intention is to include and, to some extent, attract other “online audiences” to visit and experience the Zoo. The active engagement of the youth in various social media activities has played a pivotal role in reshaping the perception of the Zoo that they are no longer just a place for families and children, broadening its appeal to a more diverse demographic.

It is noteworthy that the lack of activities offered by the Zoo has heightened the prevalence of photo-taking behaviors among youth. However, the lack of adequate information about the nature and habitats of the animals at the Saigon Zoo increases the likelihood that the youth may inaccurately capture and share photos on social media. For instance, many social media posts depict visitors feeding inappropriate foods to captive animals, a prohibited act that can introduce diseases to the animals (see Fig 6). Interviews with young workers at the Saigon Zoo reveal the impact of inaccuracies in social media posts. These workers proposed creative ideas for transforming the Saigon Zoo into an educational space for young audiences. One such idea includes integrating audio technology into exhibit signs to help young audiences better understand the stories of the animals at the Zoo. However, they expressed concerns about the rigid structure of the Saigon Zoo, as it is still under the management of the city, making it uncertain whether innovations will be implemented soon.

References

- Ali, N.A., & Khoja, A. (2019) Growing Evidence for the Impact of Air Pollution on Depression. *The Ochsner journal* [Online], 19 (1), 4–4.
- Ayeh, J. K. (2018) Distracted gaze: Problematic use of mobile technologies in vacation contexts. *Tourism management perspectives* [Online], 26, 31–38.
- Boyd, D. (2007) Why Youth (Heart) Social Network Sites: The Role of Networked Publics in Teenage Social Life In *MacArthur Foundation Series on Digital Learning – Youth, Identity, and Digital Media Volume*. Cambridge, MA: MIT Press.
- Diehl, K. et al. (2016) How Taking Photos Increases Enjoyment of Experiences. *Journal of personality and social psychology* [Online], 111 (2), 119–140.
- Frith, J. & Kalin, J. (2016) Here, I Used to Be: Mobile Media and Practices of Place-Based Digital Memory. *Space and culture* [Online], 19 (1), 43–55.
- Gillet, S. et al. (2016) The Snap-Happy Tourist: The Effects of Photographing Behavior on Tourists’ Happiness. *Journal of hospitality & tourism research* [Online], 40 (1), 37–57.
- Jimenez, M. P. et al. (2021) Associations between Nature Exposure and Health: A Review of the Evidence. *International journal of environmental research and public health*, [Online], 18 (9), 4790–.
- Lee, C. et al. (2023) From the tourist gaze to a shared gaze: Exploring motivations for online photo-sharing in present-day tourism experience. *Tourism management perspectives*, [Online],

46, 101099-.

Ozkul, D. (2013) 'You're virtually there': Mobile communication practices, locational information sharing and place attachment. *First Monday*, [Online], 18 (11).

Papacharissi, Z. (2012) Without you, I'm nothing: performances of the self on Twitter. *International journal of communication*, [Online], 1989-.

Rose, P. et al. (2023) Five ways to well-being at the zoo: improving human health and connection to nature. *Frontiers in psychology*, [Online], 14.

Case Study in Girl-led Placemaking. Mya Malar Community Park (Yangon, Myanmar)

Swan Yee Tun Lwin

Glasgow Caledonian University, United Kingdom

swan.yee97@gmail.com

Abstract

The Mya Malar community park in Yangon, Myanmar, is an innovative, girl-led placemaking project that stands as a noteworthy case study demonstrating the impact of youth engagement and participatory design on their health and well-being. Completed in 2018 as part of the SPRING Accelerator Program, the project was spearheaded by 15 local girls aged 13 to 18 in collaboration with the community under the guidance of Doh Eain, a local multidisciplinary participatory design practice. Like many societies, girls in Myanmar face significant challenges in accessing and utilising public spaces, often grappling with concerns for their safety and a sense of exclusion from the communal environments. Rather than resorting to the default solution of restricting them to their homes, the Mya Malar project deliberately positioned the girls at the helm of the initiative enabling them to be a key part of the entire process from brainstorming to implementation. The project's significance is further underscored by its contribution to altering the prevailing dynamics of community representation in Yangon. Traditionally dominated by affluent Bamar Buddhist males, the Mya Malar park represented a crucial departure, offering a unique platform for young girls to shape their surroundings by actively navigating the complexities of city systems and participating in urban governance in a city characterised by limited opportunities for youth involvement. The positive outcomes of the project encompassed improvements in the health and well-being of the local youth. By creating a gender-equitable environment, the space promoted an active lifestyle and nurtured social cohesion within the community for a wider demographic, while fostering the soft skills and interpersonal competencies of the participating girls. Its successful amalgamation of social inclusivity, youth civic engagement, and participatory design serves as a testament to the transformative potential of collaborating with youths to shape sustainable and empowering urban environments.

Keywords: girl-led placemaking, youth community management, inclusive gender-equitable public space, youth health and well-being

To cite this article:

Tun Lwin, S.Y. (2024) "Case Study in Girl-led Placemaking: Mya Malar Community Park (Yangon, Myanmar)", *The Journal of Public Space*, 9(2), pp. 209–222. doi: 10.32891/jps.v9i2.1798.

This article has been peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

1. Introduction

The Mya Malar Park (MMP), a pioneering girl-led placemaking endeavor in Yangon, Myanmar, offers a compelling case study on the profound impact of youth engagement and participatory design on urban health and well-being. Spearheaded by 15 local girls aged 13 to 18 through the SPRING Accelerator Program in 2018, in collaboration with the community and guided by Doh Eain, the project challenges prevalent societal norms. Empowering girls to actively shape their environment, not only fosters inclusivity but also cultivates vital skills and enhances community cohesion, epitomising the potential for youth-driven urban transformations.

2. Methodology

A literature review was first conducted to gain better understanding of the issues of youth, urban health and well-being, and gender in the local context. A baseline conceptual framework for well-being was also explored to inform the evaluation in this study. The study primarily relied on information and materials collected by Doh Eain (DE), including project notes and reports, images, and survey data from various stages of the project. This was complemented by direct personal interviews with a key project team member, Ms. Cho Cho Shwe, the current Head of Community Engagement at DE and the lead designer of MMP. The author's first-hand experiences and observations of the site and the project as a DE member during this period further enriched the discussions and conclusions drawn in this study.

3. Literature review

3.1 *Urban Health and Well-being*

The concept of urban health and well-being is often discussed in tandem. Health can be defined as “a state of complete physical, mental, and social well-being and not merely the absence of disease or infirmity” (WHO, 2024). This paper adopts the framework outlined in the Asia Foundation City Life Survey (CLS) 2018 for Myanmar, aligning with the OECD Better Life Initiative framework (2019) due to its high relevance for the subject matter. Thus, well-being is defined as ‘Personal Well-being’, which pertains to individuals’ perceptions of their experiences in life, focusing on subjective evaluations such as satisfaction or anxiety levels. Three other determinants are (1) Economic well-being; (2) Interpersonal well-being; and (3) Physical well-being (Asia Foundation, 2019). These dimensions delve into tangible factors such as income or exercise frequency, shedding light on the reasons behind certain feelings experienced by individuals. Crucially, these aspects are influenced by the conditions of urban governance.

3.2 *Girls in the Urban Environment*

The intersection of girls and their built environment is not a well-researched area in Myanmar, but by analysing research on gender and youth of urban residents in Myanmar, insights can be gained to understand the unique experience of girls at these intersections. Youth Opportunities. The majority of migrating youth settle in urban areas across Myanmar, with Yangon being the key destination, attracting nearly half of all inter-State/Region movers (DoP, 2017), underscoring the need for tailored urban spaces for youth in

Yangon. However, youths in Myanmar perceive limited opportunities for involvement in decision-making within the strong hierarchical culture, with their influence being more impactful in community initiatives but restricted in high-level political spheres (Grizelj, 2018). The top three responses by youths on what they want adults to understand highlighted the importance of recognising youth aspirations, abilities, and the need for flexibility in traditional practices (Grizelj, 2018). To gain recognition, youth – including girls – must showcase credibility and community-focused actions (Grizelj, 2018), emphasising the importance of such opportunities for youth to demonstrate these qualities.

Limited access to public spaces. In urban settings, girls aged 10-19 reported constrained freedom due to real and perceived safety concerns around male presence, leading them to be strongly restricted to their homes, with “verbal harassment and groping” being common risks in public spaces (Bartholomew & Calder, 2018). Additionally, Yangon has one of the lowest ratios of public space per capita in the world of only about 0.4 m² of park space per person (Another Development, 2019).

Restrictive social norms. Social norms impose strict roles, expecting girls to be modest and domestic, limiting their time for study or leisure (Bartholomew and Calder, 2018). These norms, reinforced by mothers, perpetuate gender disparities. Expression of issues is hindered by stigma, with topics like menstruation and violence facing silence and shame (Bartholomew & Calder, 2018). Such constraints perpetuate disenfranchisement among women and girls, compounding their challenges in navigating societal expectations and safety concerns.

Low physical health levels. Among students aged 13 to 15 in Myanmar, 31.5 per cent reported that they “were not physically active for at least 60 min per day for any day of the week” (WHO, 2018). High levels of sedentary activity of three or more hours a day have also increased from 10.5 per cent in 2007 to 16.4 per cent in 2016 (WHO, 2018). The trend has only worsened as figures from 2022 report that 84 per cent of males and 90 percent of females between 11 and 17 years old are physically inactive (WHO, 2022).

3.3 *Girls in Yankin Township*

The Mya Malar Park is located in Yankin, a dense urban township in Yangon, close to the city centre. It has one football field under the *Tatmadaw*¹ Secretary Office and 3 public parks (GAD, 2019). The demographic and school attendance rates of the township provide a glimpse into the state of gender in the area.

Demographics. According to the 2014 census, female youths aged 10 to 19 years old make up 9 per cent of the township’s total population which has a slightly higher total number of females. The township is mostly comprised of working-class families (DoP, 2017). School attendance. School attendance in Yankin township drops after age 12 but remains above the national average, with significant declines observed in post-high school years when 85 per cent of girls and 81 per cent of boys do not attend school (DoP, 2017). Gender disparities persist, with girls consistently exhibiting lower attendance rates than boys.

¹. Military

4. Project materials and interview

4.1 Project initialisation

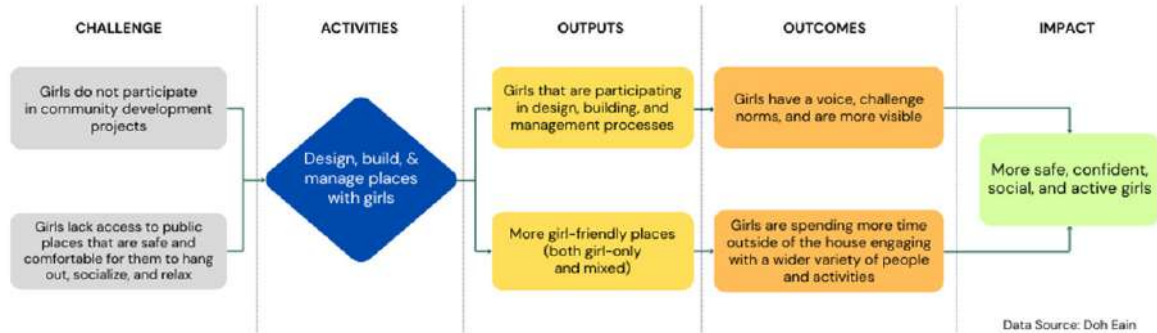


Figure 1. Doh Eain's Theory of Change Conceptual Framework for Impacting Girls (Data: Doh Eain)

The project began in early 2019 by Doh Eain² (DE) as part of the SPRING Accelerator³ program to deliver positive impacts for girls in the public urban realm in Myanmar. As such, a conceptual framework identifying key outputs, outcomes, and impacts was developed to guide their overall approach (Figure 1). To identify a site, the project team reached out to various elected Members of the House of People's Representatives⁴ (MP), prioritising female MPs. Nine potential sites were identified and a set of criteria was developed for site selection. After evaluation by the team, the Mya Malar site in Yankin township which had a female MP was ultimately selected (Table 1).

Selection Criteria	Initial evaluation of Mya Malar
MP / Local Committee Support	High - site suggested by MP & MP is actively supportive of the project.
Safety and Environment of Surroundings	The environment is quiet and calm. There are shops, schools, residential buildings, and a police station near the site.
Availability	Currently undeveloped but open to the public, owned by the DUHD ⁵ .
Accessibility	High – in the central area.
Usage of Site, particularly by girls	No usage as it is an undeveloped, vacant lot. Some use it as a shortcut (Fig. 2).
Size of site	Fair - appropriate for project scope
Threat of privatization	Possible depending on DUHD, but MP will engage with them. No informal settlements.
Team's opinion	Good.

Table 1. Selection Criteria and Final Site's Evaluation (Data: Doh Eain)

² Doh Eain is an interdisciplinary participatory design firm focused on heritage, public spaces and community engagement using design, restoration, research, and education and outreach based in Yangon, Myanmar.

³ SPRING Accelerator is a public-private partnership business accelerator between USAID, the UK DFID, and the Nike Foundation that aims to make a positive impact on the lives of girls in South Asia and East Africa.

⁴ Also known as the House of People's Representatives.

⁵ Department of Urban and Housing Development

The support from the then-MP was critical to the selection and success of the park, as public spaces typically require collaboration with various government bodies. This can often be difficult in the absence of proper political support. In this case, the MP was crucial to convincing DUHD to allow the site to be used for the project (Figure 5).



Figure 2. (left) Project Site Area (Credit: Doh Eain)
Figure 3. (right) Initial Site Image showing shortcut (Credit: Doh Eain)



Figure 4. Project Site Initial Image showing interior (Credit: Doh Eain)

4.2 Project process

Following the selection, the project team engaged with township and ward-level leaders, namely the General Administration Department (GAD) and Ward Officers (WO), in February 2024 for necessary permissions and support regarding community engagement and recruitment of local girls aged 10 – 19. Specifically, the WO of Ward 4 and a passionate community member who was a local English teacher arranged the recruitment. On 2nd March 2019, fifteen girls between 12 and 17 at the time of recruitment formed the core placemaking team with eleven remaining by the end⁶. The girls were all attending school of various levels, and all except one were of the majority Burmese race and Buddhist religion. An official committee was also formed, including one Ward Officer, one ‘Hundred Household Head’ officer, and 3 passionate women from the community, to

⁶. A few girls dropped out due to personal reasons, mainly regarding availability of time.

supervise and maintain the site post-completion.

The '5 D' placemaking process (Figure 6) developed by DE was used to systematically explore and co-design the site with the girls' and occasionally the committee. This involved 9 key events (Figure 7) over two months including workshops, on-site activities, and a Pop-Up Exhibition primarily organised and facilitated by the participating girls. The exhibition enabled them to showcase their accumulated skills and knowledge while sharing their ideas with the community and the public. For instance, the tree-house design (Figure 5) came up as a point of contention as some were concerned about the maintenance. However, the girls were able to clearly communicate how it aligns with the existing large trees and provides a unique landmark for the space, which ultimately convinced the community. Activities engaging with the larger community and public such as 'community build days' to make elements of the park together were also organised to foster greater community interaction.

The site was officially opened on 22nd June 2019.

7. The process initially started with 15 girls, and had 11 girls by the launch day 3.



Figure 5. Launch Day of Mya Malar Park (Credit: Doh Eain)



Figure 6. 5Ds of the Girl-led Placemaking Process (Credit: Doh Eain)



Figure 7. Timeline of the Girl-led Placemaking Process (adapted from Doh Eain)

5. Monitoring & Evaluation surveys

5.1 Initial Public Space Mobility Mapping: the Most Visited Public Spaces in Free Time

A public space mobility mapping exercise was conducted with 15 girls at the start of the project to understand their existing interactions with the urban environment. Results reveal primarily home-based activities such as reading and listening to music as the top activities. When they do go out, shopping malls came out as the most frequented place for shopping and dining, and outdoor activities were reported to be limited due to weather, exposure to cars, and lack of facilities.

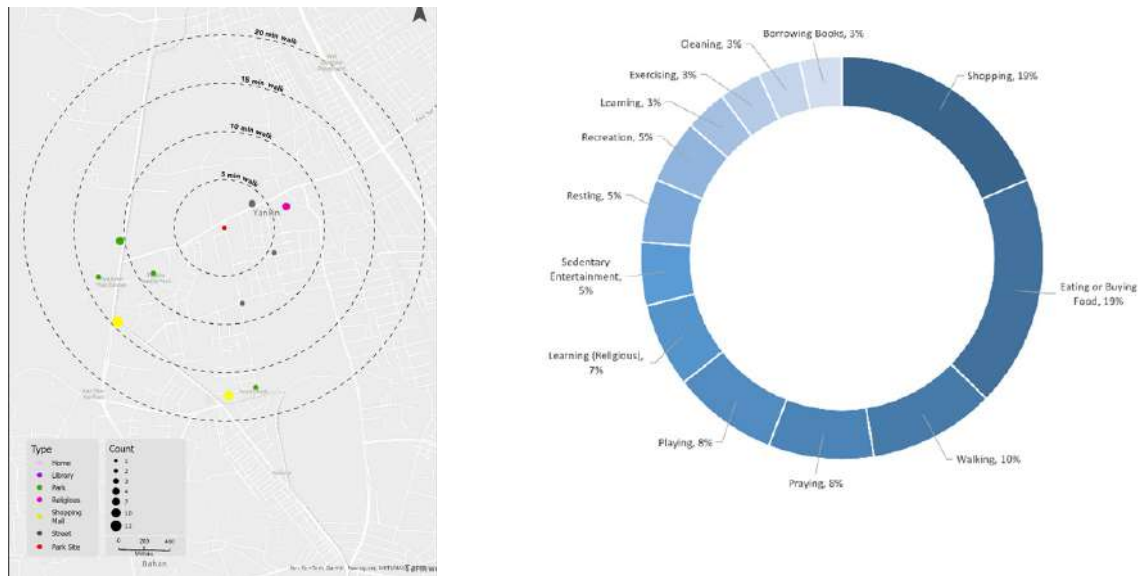


Figure 8. Typical Relaxation Places and Activities of Participating Girls (Data: Doh Eain)

5.2 Participating Girls' Post-Workshops Survey

The survey, conducted on 30th March 2019, with 11 of the girls after the Pop-Up Exhibition, focused on interpersonal relationships and soft skills such as critical thinking. Self-reported perceptions indicated most girls ranked themselves moderate to high in personal capacity and valued diversity and positive intergenerational relationships the highest.

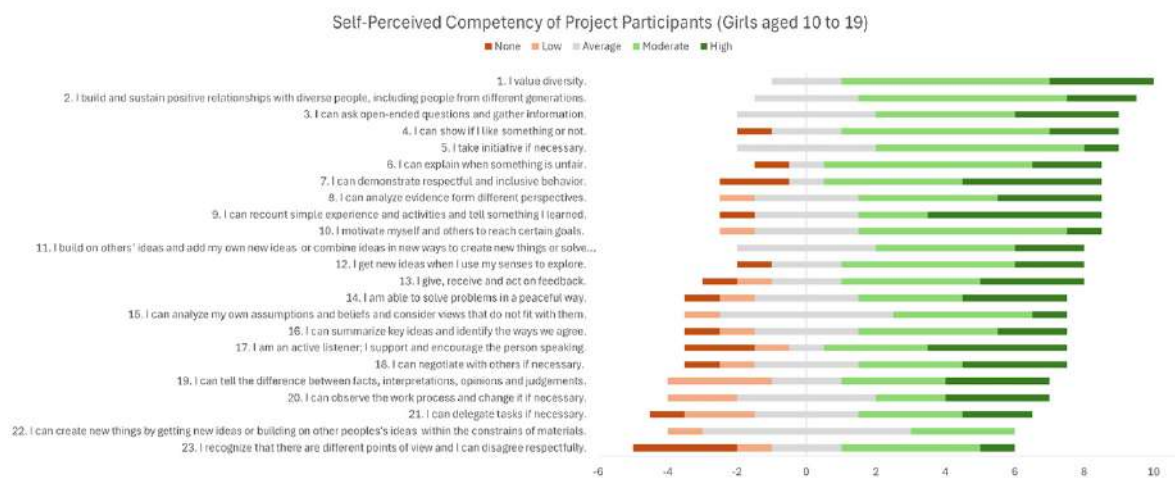


Figure 9. Self-Perceived Perceptions of Participating Girls (Data: Doh Eain)

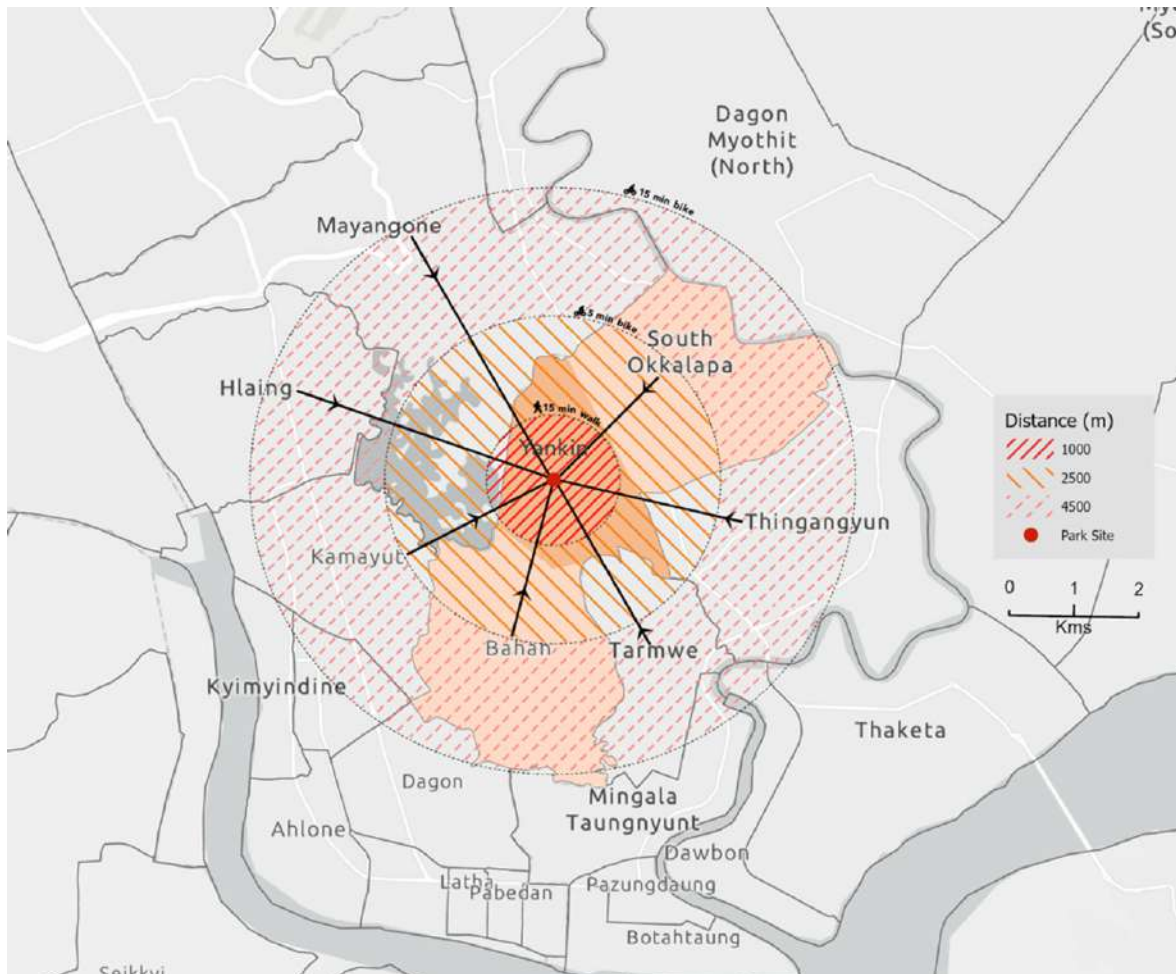


Figure 10. Service Catchment Area of Project Site (Data: Doh Eain)

5.3 Post-Project Occupancy Survey

An occupancy survey was conducted with 29 respondents on 18th October 2019, about four months after completion of the project. Results show that the site served a radius of approximately 4.5 km, roughly an hour's walk, encompassing seven nearby townships. Specifically, 40 percent of respondents came from South Okkalapa and Bahan townships, confirming its reach. Most of Yankin township, where 60 percent of the respondents reside, can reach the site within a 15-minute walk.

The survey also showed that a 55 per cent female and 45 per cent male visitor split, with the 10 per cent difference being among youths aged 13 to 21. There was also a relatively balanced representation across demographics, except for seniors above 60. Notably, all male adults and seniors reported that the park was not attractive to people their age despite their own presence, perceiving it as primarily for children. However, one female adult noted that despite this, those in their age group would still come to accompany their children.

5.4 Quality of Services Provided

Visitors rated mobility as being the highest quality service provided by the park, followed by its welcoming environment, and opportunities to be active with shelter from the

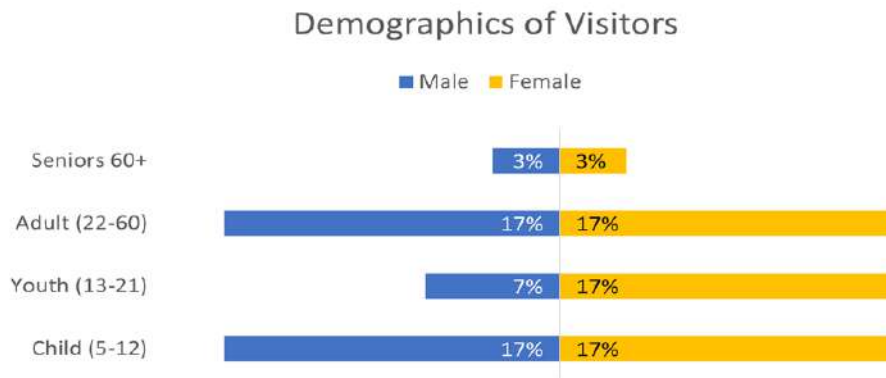


Figure 11. Demographic Pyramid of Visitors

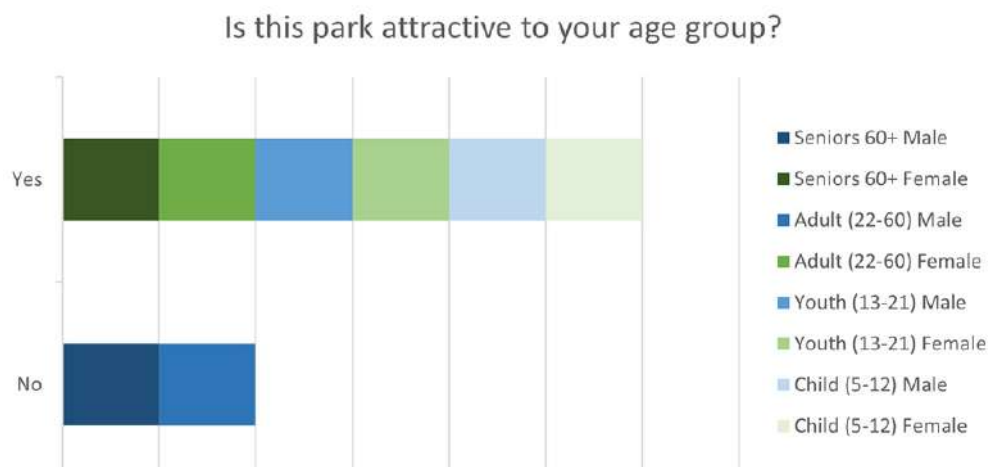


Figure 12. Reported Attractiveness by Age Group and Gender (Data: Doh Eain)

weather. Notably, they rated opportunities for social interaction as the lowest. However, the project team noted that the space was often used for community events, such as holding the first joint Ward 1 and 4 Nibban Market – translated as ‘nirvana’ market where free food and gifts are distributed – in November 2019. Notably, a diverse group of visitors spanning a wide range of ages and ethnic groups was observed (Figs.13 and 14). The project team also noted that in April and May of 2020, around the time of the first wave of COVID-19 in Myanmar, the space became a haven for food delivery drivers who were one of the main workers during the pandemic. The drivers could be observed using the space for rest, to have lunch, or to complete their accounting at the end of the workday (Figure 15). Following the global pandemic, Myanmar faced yet another challenge in February 2021 due to a military coup. As of 2024, in its third year of conflict, most of its political and public institutions continue to be in disarray, with social, economic, and political insecurity surmounting day by day. Despite this, Mya Malar Park continues to operate as noted by the project team, most recently holding a children and youth event to maintain the park with a local school facilitated by Doh Eain in January 2024 (Figure 16 and 17).



Figure 13. (left) People Lining Up for the Nibban Market in Nov 2019 (Credit: Cho Cho Shwe, DE)
Figure 14. (right) Diverse Demographics of Visitors at Nibban Market in Nov 2019 (Credit: Cho Cho Shwe, DE)



Figure 15. Food Delivery Workers utilising the Park during COVID-19 (Source: Cho Cho Shwe, DE)



Figure 16. (left) Local Students Maintaining Plants in MMP (Source: Doh Eain)
Figure 17. (right) Outdoor Painting Activity in MMP (Source: Doh Eain)

6. Discussion

The Mya Malar Park (MMP) project, guided by the CLS framework, significantly enhanced personal, interpersonal, and physical well-being, as evidenced by surveys conducted by DE. Empowering girls to challenge norms, MMP increased their visibility and engagement in diverse activities, marking a departure from predominantly home-based leisure. These benefits extended to the larger community as evidenced by the post-occupancy survey, showing that while the park effectively attracts its primary audience of young females, it also maintains a gender-inclusive environment. It is crucial to maintain this by continuing to support the local community especially through the polycrisis of Myanmar.

However, recruitment processes are primarily reliant on existing networks, limited diversity in race, religion, and possibly socio-economic background. Economic well-being, a key aspect of CLS, remained unexplored both due to privacy concerns regarding data collection, and the lower relevance given the participating members' lack of economic independence.

Setbacks from COVID-19 in 2020 and the military coup in 2021 had significant impacts on the evaluation capacity of the project team, as well as the functioning of the site under 'normal' circumstances. On the other hand, it provided a glimpse into the resilience of community-led efforts in such times of extreme challenges as MMP stands as a beacon within the community, continuously maintained by the local committee and used by communities to this day amid ongoing challenges in Myanmar's governance.

Myanmar's exploration of subjective well-being in youth experiences, especially concerning their built environment, remains limited. However, with the increasing importance of youth participation, pilot projects like MMP are steering the country towards a more comprehensive understanding and consideration of youth perspectives and needs.

7. Conclusion

So, what does a girl-led placemaking look like? When done right, it can look like any well-designed place, but the difference truly shines in how it functions. The purpose of any minority-led efforts in the pursuit of inclusion in public spaces is not to carve out an exclusive area meant solely for the marginalised group in question; rather, it is to ensure that the needs and wants of the underrepresented group are equitably represented to

ensure that they have a space alongside everyone else in the public realm. In the case of Mya Malar Park, this is evident.

In Yankin, a setting where placemaking is crucial, Mya Malar Park exemplifies how it empowers youth and girls, bridging gender disparities and fostering community cohesion. The process also contributes greatly to the success of the space, giving girls greater confidence and motivation to occupy these spaces. Simultaneously, the overall resilience of the space is strengthened by the participatory process, as seen from its continued functionality despite the difficult circumstances. It underscores the importance of participatory processes in creating inclusive environments that empower marginalised communities to actively engage in shaping their surroundings, not only for themselves but for the benefit of the community as a whole.

Acknowledgement

Thank you to the Doh Eain team for their contributions to this research that made this paper possible. Particular thanks are to Cho Cho Shwe and Pyae Phyo Zaw from Doh Eain for their time. I would also like to thank Ankur Negi for his technical guidance and support.

References

- Another Development (2019) Green Spaces in Yangon: Towards a Greener City for All [online]. Available from: https://www.researchgate.net/publication/333895289_Green_Spaces_in_Yangon_Towards_a_Greener_City_for_All_-_Another_Development [Accessed: 06 January 2024].
- Asia Foundation (2019) Insight into Urban Well-being in Myanmar: The 2018 City Life Survey, Myanmar City Life Survey [online] Available from: https://asiafoundation.org/wp-content/uploads/2019/02/City-Life-Survey-2018_Myanmar.pdf [Accessed: 05 January 2024].
- Bartholomew, K. and Calder, R. (2018) Myanmar Landscaping Report [online]. rep. Kantar Public Myanmar and SPRING Accelerator. Available from: https://pdf.usaid.gov/pdf_docs/PA00TWNH.pdf [Accessed: 09 January 2024].
- Department of Population Myanmar (2017) The 2014 Myanmar Population and Housing Census: Thematic Report on Children and Youth [online]. Available from: https://myanmar.unfpa.org/sites/default/files/pub-pdf/4M_Children%20and%20Youth.pdf [Accessed: 07 January 2024].
- Department of Population 2017. Yangon Region, Eastern District Yankin Township Report [online]. Available from: https://www.dop.gov.mm/sites/dop.gov.mm/files/publication_docs/yankin_update.pdf [Accessed: 20 January 2024].
- Yankin Township General Administration Department (2019) Yankin Township Facts and Figures [online]. Available from: <https://data.opendevlopmentmekong.net/en/dataset/fec08433-8f5f-46ea-9d32-64eb4494bcb7/resource/9a21e12f-d772-40c3-a7b3-7efab58ec0c6/download/yankin-township.pdf> [Accessed: 20 January 2024].
- Grizelj, I. (2018) Youth-Led Participatory Research on Social Cohesion in Urban Areas [online]. Available from: <https://equalitymyanmar.org/?p=4386> [Accessed: 20 January 2024].
- Shwe, C. C. (2024) Interviewed remotely by Swan Yee Tun Lwin. 27 January, 2024.
- World Health Organisation, Regional Office for South-East Asia and Ministry of Health and Sports, Republic of the Union of Myanmar 2018. Report of the second Global School-based Student Health Survey 2016 [online]. Available from: https://cdn.who.int/media/docs/default-source/ncds/ncd-surveillance/data-reporting/myanmar/gshs/gshs-2016-myanmar-report.pdf?sfvrsn=d4b7816a_2&download=true [Accessed: July 2024].

World Health Organisation (2022) Physical Activity Profile 2022 Myanmar [online]. Available from: https://cdn.who.int/media/docs/default-source/country-profiles/physical-activity/physical-activity-mmr-2022.pdf?sfvrsn=fcd7aa5_7&download=true [Accessed: July 2024].

World Health Organisation (2024) Constitution of the World Health Organisation [online]. Available from: <https://www.who.int/about/accountability/governance/constitution> [Accessed: 05 January 2024].

Youth Empowerment in Urban Kampung Neighbourhood through Placemaking. A Case Study of Bandung and Jakarta, Indonesia

Dheamyra Aysha Ihsanti, Widiyani

Bandung Institute of Technology, Indonesia

dheamyraa@gmail.com | Widi.yani@itb.ac.id

Abstract

The concept of placemaking entails the necessity for practical implementation rather than being solely theoretical or based on planning considerations. Placemaking practices focus on human activities and public spaces. Therefore, the process of placemaking necessitates active involvement and engagement with the community, as it is essential to understand and incorporate the unique needs, values, and aspirations of the residents to create a sense of belonging and identity towards a public space. A unique example is community in “urban kampung” in Indonesia, a prevalent urban neighbourhood archetype characterised by distinct attributes and a conservative community. The urban kampung, with its dense population, poses many issues, one of which is the need for additional public places. The current study focuses on employing the placemaking strategy, specifically targeting children and youth as the primary users, to enhance the provision of activities inside two urban kampungs in Bandung and Jakarta where youth predominate.

Through engagement in projects, this article demonstrates the application of two distinct methodologies between the cities. The strategy in Bandung involved revitalising a previously-neglected area under a highway bridge and transforming it into a suitable football facility. While the strategy in Jakarta concentrated on experimenting with how to organise activities with the children at the urban kampung, both cities have projects aimed at promoting community engagement in public places via the use of placemaking. It is important to acknowledge that children have distinct values, understandings, and needs that should be accommodated in public spaces. This study posits that the placemaking strategy may be effectively implemented in small-scale projects, such as creating specific activities or establishing dedicated spaces. Findings indicate that physical attributes are insufficient for a location to be considered excellent; rather, the presence of engaging activities is necessary to enhance its quality.

Keywords: placemaking, community engagement, urban kampung, youth empowerment, children

To cite this article:

Ihsanti, D. and Widiyani (2024) “Youth Empowerment in Urban Kampung Neighborhood Through Placemaking: A Case Study of Bandung and Jakarta, Indonesia”, *The Journal of Public Space*, 9(2), pp. 223–232. doi: 10.32891/jps.v9i2.1790.

This article has been peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

I. Introduction

Placemaking shifts urban planning focus from buildings to public spaces and human activities (Courage et al., 2021, p.3). Placemaking is a community-driven process that is used to shape a place's image and function (Schneekloth & Shibley, 1995). Placemaking encompasses a broad range of activities, from constructing and taking over buildings and may sometimes take the shape of sporadic events or an invisible daily activity. (Schneekloth and Shibley, 1995).

The Project for Public Places (PPS) developed a concept of placemaking following community engagement protocols, which inspired people or groups to work together to reinvent and revitalise public places as the core of the community. Community engagement, a fundamental process worldwide, involves stakeholders, communities, and people who use the place (Nursery-Bay, 2020). Engaging local communities is crucial because they possess invaluable knowledge about their place. The concept of engagement provides an opportunity to articulate a dialogue between the place itself and the community that uses it (Reddel & Woolcock, 2004). Nursery-Bay (2020) highlights key aspects of community engagement in placemaking: community knowledge, diverse engagement tools, digital engagement, and cultural competence.

1.1 Placemaking framework

While Mateo-Babiano and Lee (2018, pp. 22–29) outline five components, known as placemaking frameworks, that are applicable in most place-shaping events and acts: people, process, product, program, and place evaluation. These placemaking frameworks aim to assist placemakers in designing strategies. Since placemaking is community-driven, “people” are the primary factor. To that extent, people encompass place leadership, actively participate in place and placemaking, and serve as sources for identifying individual and collective needs.

Placemaking entails the continuous transformation of places, originating from the grassroots level, also known as bottom-up, or stemming from asset-based strategies like maximising the resources of an existing community or from purpose-driven methods guided by a particular objective. Placemaking results can range from large-scale interventions to pop-ups on the street and they can be either social (intangible) or physical (tangible). However, the converging results between physical and social factors could enhance social environments that foster people-place relationships. Places and people cannot function without the integration of programming that establishes a connection between them. Interventions might have a long-term or short-term goal. Programming could ensure the place's sustainability and enhance users' experiences. Placemaking, as a process, requires evaluation to ensure community recognition and preservation of the place's value. An evaluation of the effort's outcomes may indicate the need for a new, fresh placemaking method or iteration. Examining initiatives to improve social and physical outcomes is a critical component of site assessment. In the evaluation, we can take lessons from both successful and unsuccessful placemaking experiences.

1.2 Study context: Urban Kampung

An urban kampung refers to a city community that lacks infrastructure and economic planning (Wirjomartono, B., 1995, p. 171). Most discussion on urban kampung in Indonesia focuses on its negative characteristics, including its illegality, inadequate infrastructure, and lower socioeconomic status of individuals due to illegal living and urbanisation (UN-

HABITAT, 2003; p. 211; Funo et al., 2002, p.193; Yudohusodo, 1991, p. 311). The lack of infrastructure encompasses not only the physical state of dwellings, but also the absence of open spaces, sanitation, and utilities (Yudohusodo, 1991, p.311). Nevertheless, urban kampung offers advantages; the residents possess a communal social connection similar to that of a family (Funo, et al., 2002; p.1993; Jellinek, L., 2017, p.273). Children in urban kampung, particularly vulnerable to technology addiction due to limited access to outdoor spaces, require public areas dedicated to physical activity and social interaction to foster holistic development. Public spaces dedicated to children's activities are vital. The placemaking method entails establishing a tangible space that promotes user engagement through its programming (Mateo-Babiano and Lee, 2018). This research investigates the need for a placemaking strategy in urban kampung in Indonesia, concentrating on two short case studies in Bandung and Jakarta.

2. Methodology

This study used descriptive analysis to determine the patterns of implementing the placemaking strategy in dense urban kampungs in Bandung and Jakarta. Building on the 5P Placemaking Framework (Mateo-Babiano and Lee, 2018), we examined each case in terms of people, process, product, program, and place evaluation. In both cases, the placemaking approach aimed to improve the environment, particularly for the children, and to increase their sense of belonging to their local community.

Based on our experiences, the challenge project in Bandung aims to revitalise an abandoned area of 2600 square metres, located under the highway bridge. Ruang Ketiga, a student youth community, received funding from Global Infrastructure Basel (GIB) to undertake this project in collaboration with the World Resource Institute (WRI) Indonesia. The team, led by four senior students, collaborated with 29 students on the project for a duration for approximately five months. The initiative in Jakarta aimed to promote social interaction among children by encouraging them to disengage from electronic gadgets and play with their peers at the kampung. A cohort of 23 young students participating in a summer school program under the Architecture Program of Institut Teknologi Bandung dedicated their efforts to create a pop-up event. The funding was supported by Paragon, a factory next to the kampung, which has been actively collaborating with the local kampung community. The flow of this research is shown in Figure 1.

3. Case studies

a. Case 1: Taman Futsal in Tamansari urban Kampung, Bandung City

Taman Futsal is located in Tamansari Urban Kampung, at the centre of Bandung. This area has the highest poverty rate in the entire Bandung Wetan District, reaching 94% (BPS, 2019). Due to the high poverty rate, individuals are unable to afford to live in the city centre, forcing them to reside in high-density population areas. According to Kim (2015), low-income communities living in densely populated settlements struggle to find space for movement. This also happens at Tamansari, where people have limited opportunities for social interaction, economic activities, and other productive endeavors.

Taman Futsal is situated in a convenient location on government-owned land. However, its position is under a flyover, which limits its visibility. Local communities and children's

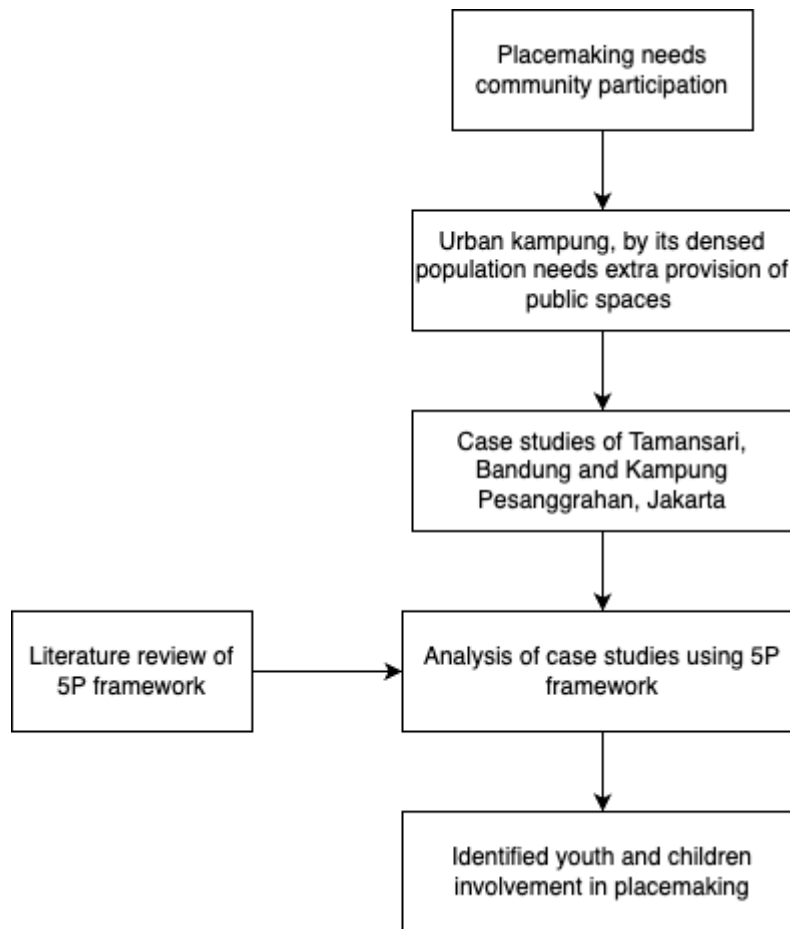


Figure 1. Methodology structure. Credits: Author

football teams have previously used Taman Futsal, as part of a company's Corporate Social Responsibility (CSR) initiative. This field also served as the venue for the 'Homeless World Cup.' Unfortunately, the pandemic has left Taman Futsal abandoned, transforming it into a neglected area. Some local elites have exploited the area, illegally leasing it to nearby residents for parking purposes. The area's frequent users, primarily children and youth, lack the authority to keep it as a public space.

To that extent, the project aims to return this place to the local community as a public space. We observed from January to March 2023, between 2 and 4 days per week. Based on our observations, we were able to locate some of Futsal's instruments, specifically nets and poles. However, we discovered that Taman Futsal had become not only an informal parking area but also a place for people, especially the drivers, to throw their garbage and urinate in the field. In this situation, children who used to play futsal had to move to the park located next to Taman Futsal, which has terraces and might not be safe for playing futsal.

Following the observation, we separated the strategy into three phases: aspiration gathering, design, and execution. The first phase was to gather the aspirations from the local community stakeholders. We collected the data via informal offline interviews and Focus Group Discussions (FGD). We identified five local community stakeholders: head of district, head of urban kampung, local youth community (Karang Taruna), head of all Rukun Warga in Tamansari Urban Kampung (smaller citizen association under urban kampung),

and the current land-power who rented the Taman Futsal. We invited the heads of all Rukun Warga and local elites to an informal interview to understand their aspirations regarding Taman Futsal. We invited the five local community stakeholders and government officials who were in charge in that area to participate in a FGD to discuss and address their worries and wishes regarding the future use of Taman Futsal. During the design phase, we analysed the data from the interview and FGD. After collecting the necessary data, we developed the Taman Futsal design to create a public place at Taman Futsal. After we had finished the design, we invited the stakeholders, including community leaders and public officials, to review and give feedback on the design. Once the design received approval, we initiated the construction process.

However, an obstacle arose before construction could commence. The elite locals who illegally rented the area for parking, refused the idea of turning it into a public place. As a result, we worked with them to gain a more comprehensive understanding of the plan and specify its benefits. A consensus was reached in which we allocated one-third of the space for parking purposes with an agreement that work would commence after the rental time for the parking lot concluded at the end of the month, causing a further delay in construction.

During the execution phase, our primary emphasis was on the field's construction and activation. We completed the building in roughly one month, and required an additional month for event activation. Upon completion, we reached out to the surrounding community and educated them on the need to maintain cleanliness in the field. We encouraged them to participate by collecting litter if they were to use the space for recreational purposes. Over time, youngsters began to frequently participate in recreational activities in Taman Futsal, utilising not only futsal as well as rollerblades and kites.

This project has shown the need to meet the expectations of all stakeholders when adopting placemaking. This includes considering the significance of each stakeholder and their role in the process. User involvement in the design of a place, known as participation engagement, is crucial since people own the most extensive information about their region and everyday activities. It is important to actively listen to the local community in order to ensure that the project effectively addresses their needs. As such, placemakers must establish a strong connection with the local community to gain their confidence and to communicate the importance of their active participation in establishing a communal space that will provide them with advantages.

b. Case 2: Kampung Pesanggrahan - Jakarta

Kampung Pesanggrahan is located in the southern part of Jakarta and has a population of 246900 inhabitants. Most of the inhabitants are engaged in kampung. Despite the fact that children constitute less than 50% of the population, the kampung has a limited amount of open space for them to play in. The Paragon factory, which is next to the kampung, has actively collaborated with the local community. This factory provided us with funds to support our program, and its employees, known as Paragonian, assisted us in establishing contact with the kampung residents.

The event preparation lasted for one week and involved various activities. We collaborated with the Paragonian to perform an online observation of the kampung due to the pandemic in the following manner: while we were in Bandung, the Paragonian took a field trip around the kampung synchronously using the Zoom platform. The investigation revealed that the kampung lacked public areas designated for children to play. There was



Figure 2. Taman Futsal condition before placemaking project. Credit: author



Figure 3. Taman Futsal condition after placemaking project. Credit: author



Figure 4. (left) The game challenge at the pop-up event, Credit: author
Figure 5. (right) The pop-up ends with the presentation of the group's dream park. Credit: author

only one public area: a badminton court next to the head of the kampung's residence. The kampung is prone to flooding during the rainy season because of the irrigation system that runs through it.

We had an online interview with residents/ parents which revealed that children often spend their leisure time in the alleyways near their homes or in the alley next to the irrigation system. Parents emphasised that children are consistently engaged with their gadgets. Given the scarcity of public space and the growing dependence of children on gadgets, the project aimed to demonstrate to the local community how to engage children in leisure activities within the limits of public space. We coordinated a pop-up event which drew approximately 30 children, aged 9 to 12. The social experiment project took place in June 2022, following Paragonian's agreement to the proposal and budget. Our social experiment, a three-hour pop-up event, focused on familiarising children with their environment and deepening their comprehension of waste management. The pop-up event used a game to incorporate physical activity, teamwork, and creativity. The game taught lessons for children to collect trash and categorise it by examining trash from their surroundings. They explored the kampung in three distinct locations, each of which presented unique challenges. Once they finished, their task was to develop their dream park.

The suggested game required teamwork, and it worked. The activity helped children make new friends. We were surprised to draw in parents and siblings who were not part of our intended audience during the location presentation. The event was well-received by parents, as their children actively participated and refrained from using gadgets. We found that the pop-up event met our target, as children engaged in activities without their gadgets in a limited space.

4. Results and discussions

This section will analyse the two scenarios using the 5P framework to enhance our understanding of how different factors interrelate in the creation of placemaking strategies. As placemakers, we spearheaded all cases at Taman Futsal with Ruang Ketiga and Kampung Pesanggrahan, collaborating with a group of students.

	Taman Futsal, Bandung	Kampung Pesanggrahan, Jakarta
People	Local champions with a powerful communal vision. Local community stakeholders involvement Children as the major users at Taman Futsal	Paragonian representative from the factory who gave funding assisted in contact with locals Several adult residents Children as participants in the pop-up event
	All group discussion excluded children.	
Process	A mix of bottom-up and top-down process The community's assets to create a sense of belonging	A bottom-up approach with the agreement from the Paragonian who provided the funding
Products	Medium-scale physical intervention (tangible) Social intervention (intangible)	A-3 hour of pop-up event Social intervention (intangible)
Program	Creating an event and collaborating with youth community Introduced the returned Taman Futsal to several communities.	Promoting physical activity and social interaction among children Redirecting children from gadgets to activity
Place evaluation (lesson to learn)	It's challenging to educate urban kampung residents about public space maintenance.	Children are a good intermediary for increasing adults' awareness of creating public spaces.

Table 1. Summary 5P's from Two Cases

Although children were the intended recipients in both scenarios, they did not actively engage in the process. The scale differences between Bandung and Jakarta revealed that larger-scale projects attract more stakeholders. Both studies found that local champions and stakeholders play a crucial role in the placemaking approach. This study suggests that in a placemaking process, stakeholders can alter the approach of either a bottom-up or top-down strategy. Practices necessitated a combination of bottom-up and top-down placemaking processes, as placemaking approaches require collaboration. The range of placemaking products can vary from tangible to intangible; however, the intangible or

social intervention is the core of placemaking, as it will activate the place. The utilisation of the placemaking process is extremely important. Placemaking programs can establish connections between communities and the place itself, and those communities will have different experiences with the place. Assessing the place will require more effort, as the placemaking process necessitates users' awareness and stewardship as well. It's encouraging to know that the entire family can participate. This indicates that children may be suitable candidates for placemaking initiatives.

5. Conclusions

This study demonstrated the implementation of placemaking strategies that specifically targeted children and youth as the predominant user cohort. Our study revealed that parents' dominant influence often disregards the existence of children and youth despite their primary role as public space users. Thus, it is crucial to observe children and youth's behaviour in order to determine their needs in future placemaking projects.

The placemaking approach necessitates the presence of local champions who can assist locals in assuming responsibility for the program's sustainability. A suitable solution could first change the mindset of the local community. Children could be potential mediators in raising adults' awareness, although in some countries this action should be integrated with the culture and regulations.

Acknowledgements

The authors acknowledge the S2Cities Program and Kami Ruang Ketiga community, especially Irfan Taufikkurrahman Baskoro, Donidarmawan Putra Gemilang, and Kenjiro Amadeus Phan, for implementing the placemaking project at Taman Futsal, Bandung. We thank the Placemaking and Creative Branding Summer School SAPPK ITB 2022 participants and Paragon Corp. for setting up the program in Kampung Pesanggrahan, Jakarta.

References

- Courage, C., (2021). *Routledge Handbook of Placemaking*. New York, New York: Routledge.
- Hes, D., & Hernandez-Santin, C. (Eds.). (2020). *Placemaking fundamentals for the built environment*. Singapore: Palgrave Macmillan.
- Funo, S., Yamamoto, N. and Silas, J. (2002). 'Typology of Kampung Houses and Their Transformation Process A Study on Urban Tissues of an Indonesian City', *Journal of Asian architecture and building engineering*, 1(2), pp.2_193-200.
- Jellinek, L., (2017). Jakarta, Indonesia: Kampung culture or consumer culture. In *Consuming cities* New York: Routledge, pp. 271-286.
- Mateo-Babiano, I. and Lee, G., (2020). People in place: Placemaking fundamentals. In *Placemaking fundamentals for the built environment*. Springer, pp.15-38.
- Panelli R, Nairn K, McCormack J. (2022). "We make our own fun": reading the politics of youth with(in) community. *Sociologia Ruralis*, 42(2):106–30.
- Reddel, T. and Woolcock, G. (2004). From consultation to participatory governance? A critical review of citizen engagement strategies in Queensland. *Australian Journal of Public Administration* [online], 63(3), pp. 75–87. Available from: doi:10.1111/j.1467-8500.2004.00392.x.

- Schneekloth, L. and Shibley, R. (1995). *Placemaking: The art and practice of building communities*. New York etc., New York: John Wiley & Sons.
- UN-Habitat (2003). *The Challenge of slums: Global report on human settlements 2003*. 1st ed. UK: Earthscan Publications Ltd.
- Wibowo, A., Cholis, F. N. N., & Kusumadewi, T. (2012). *Urban Public Space for Kids: The Comparison between Urban kampung and Housing neighbourhood in Malang*. Proceedings ICIAP 1st Biennale, 9-11 July 2012, pp.296-304.
- Widjaja, P. (2013). *Kampung-Kota Bandung*. 1st ed. Yogyakarta: Graha Ilmu.
- Wirjomartono, B. (1995). *Seni bangunan dan seni bina kota di Indonesia: Kajian mengenai konsep struktur dan elemen fisik kota sejak peradaban Hindu-Budha, Islam hingga sekarang*. 1st ed. Jakarta: Gramedia
- Yudohusodo, S. (1991). *Rumah untuk seluruh rakyat*. 1st ed. Jakarta: Inkoppel

Towards Hope as Practice. Young Residents Reclaiming a Neighbourhood's Identity through Arts and Placemaking

Natasha Sharma, Sandra Alexander

Community Design Agency

natasha@communitydesignagency.com | sandra@communitydesignagency.com

Abstract

Low-income neighbourhoods in our cities are often poorly-planned spaces that exacerbate socioeconomic disparities their residents face. These inequities also impact their health, especially communities in the Global South who are vulnerable to the impacts of climate change. One such example of an inadequately planned rehabilitation neighbourhood is Natwar Parekh in Mumbai's Govandi. Over 25,000 former slum dwellers - the population of a tier 3¹ city - have been crammed into 61 seven-storey buildings, with 80% homes having little to no access to sunlight or ventilation. The area is flanked by Asia's largest landfill and polluting industries, creating an unhealthy environment with poor air quality and contamination. Tuberculosis and other diseases are on the rise here, and the average life expectancy² is just 39 years, almost half the national average. Govandi is ghettoised and neglected by the rest of Mumbai. Children who grew up here hesitate to mention their address because of the stigma attached to living here. Burdened by this shame and loss, Govandi's youth came together seven years ago to work with a group of artists and urban practitioners from Community Design Agency (CDA), a social design organisation, to reimagine their neighbourhood. Together, they have redesigned garbage-filled alleyways into accessible streets, painted vibrant murals, and held the first-ever Govandi Arts Festival that allowed them to redefine their narratives of the place they call home. These initiatives have brought the community closer, made them more resilient, and even prompted spatial improvements by city authorities who were forced to turn their gaze here. This essay explores the interlinkages between spatial improvements via arts and placemaking initiatives and their effects on the physical and emotional well-being of Govandi's youth. Urban practitioners Natasha Sharma and Sandra Alexander from CDA explore methodologies for regenerative place-making in this vulnerable neighbourhood.

Keywords: art and activism, youth engagement, civic participation, regenerative placemaking, community-driven art practise

¹ Tier 2 and tier 3 cities are the growing urban cities in India and are classified based on the population limit. The population of a tier 2 city ranges between 20,000 to 49,999 while that of a tier 3 city ranges between 50,000 to 99,999.

² Life Expectancy refers to the number of years a person can expect to live. It is an estimate of the average age that people belonging to a particular population demographic will be at the time of death.

To cite this article:

Sharma, N. and Alexander, S. (2024) "Towards Hope As Practice: Young Residents reclaiming a Neighbourhood's identity through Arts and Placemaking", *The Journal of Public Space*, 9(2), pp. 233–244. doi: 10.32891/jps.v9i2.1788.

This article has been peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>



Figure 1. Projection on building facades of a film made by Jerry Anthony (Artist Resident for Govandi Arts Festival) in collaboration with the residents of Natwar Parekh in Govandi, Mumbai.
Credit: Tejinder Singh Khamkha. 2023.

“Even though I have a house now, I sometimes still miss the slums. Back in the slum, we would do things together face similar experiences and problems together. But ever since we came here into our new houses, no one looks after each other or takes care of the space they have been allotted”, says Parveen ji, one of the dwellers and a social worker living in the Natwar Parekh neighbourhood in Mumbai’s Govandi.³

Residents of this neighbourhood have been grappling with questions of what ‘home’ means to them ever since they were shifted to a Resettlement and Rehabilitation (R&R) neighbourhood in 2008, built as part of the Mumbai city authorities’ efforts to house the urban poor and homeless populations for infrastructural developments. More than 25,000 people live in this neighbourhood in Govandi now but still reminisce how closely-knit they were when they lived in the slums. The City of Mumbai provided housing, but this housing came at the cost of community members’ emotional and physical well-being.

Located in the eastern suburbs of Mumbai, Govandi is a stone’s throw away from Asia’s largest dumping ground. Here, what could possibly be the population of an entire tier 2 city in India, has been crammed into merely 61 buildings. Large families with up to 8 or 10 members live in small, 226 square foot apartments (Sharma, 2023). The closely-packed houses barely have any access to sunlight and air, and thus Natwar Parekh has become a breeding ground for chronic diseases. Every one in ten people suffers from Tuberculosis, and the average life expectancy here is just 39 years old, almost half the national average (Bharucha and Iyer, 2018).

³All residents of Natwar Parekh mentioned in this essay have consented to the usage of their names and statements made by them. Quotes have been cross-checked with them and we have tried to maintain utmost accuracy while translating it from Hindi to English.

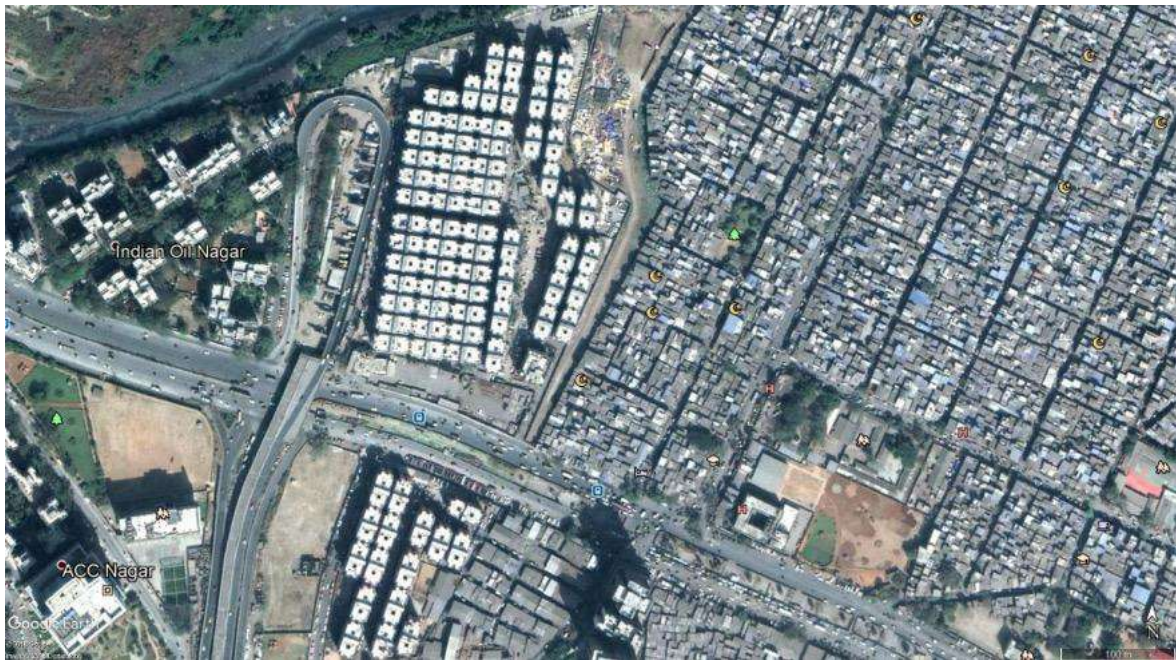


Figure 2. Satellite image of the tightly laid out grid of 61 buildings of Natwar Parekh and the area surrounding it. Credit: author

Mumbai, also known as the “city of dreams,” has numerous resettlement neighbourhoods. However, the lack of educational and professional opportunities in these communities significantly impacts the dreams and aspirations of thousands of children and young people. This is partly due to the stigma associated with their living environment. Additionally, the design of their homes severely impacts on their health, and there are limited opportunities for them to gather and socialise due to the absence of usable public spaces nearby.

Fran Tonkiss writes in *Space, City and Social Theory* (Tonkiss, 2005) that urban forms are not only made out of things and materials, but also out of “meanings, language and symbols”. Tonkiss elaborates that a building can be easily knocked down, but not the memories, imaginations and experiences composed in the space. In the process of formalising housing and laying emphasis on how it should be planned, the memories that people have of a place often get demolished and newer meanings get reinstated. In doing so, less attention is paid to making residents feel a sense of belonging in their new neighbourhood because the focus is on providing basic resources to survive, not thrive.

I. Regenerating belongingness

As artists and urban practitioners, we, the authors of this essay, have been dwelling on these questions along with the residents of Govandi over the past seven years. As part of the team at Community Design Agency (CDA), a design and architecture studio based in Mumbai, we have been working on regenerating the Natwar Parekh neighbourhood. Five years ago, the questions we started off with when we entered the neighbourhood included:

- How do we learn to see the built environment through the eyes of children and youth growing up in this vulnerable neighbourhood?

- How can arts be used to develop sustainable, non-intrusive, expressive and creative methods of working that can build a sense of safety, agency and community for them?
- What does it take to include children and the youth in this approach to shaping their built environment, when they have previously had no say in it?



Figure 3. (left) The dilapidated condition of a street in the neighbourhood with drains overflowing and garbage piled up. 2023. Credit: Community Design Agency.

Figure 4. (right) A family occupying the common space outside their apartment as space for rest, play and utility. 2023. Credit: Community Design Agency.

In a neighbourhood riddled with issues that economically-burdened adults find difficult to solve, we started out by going to the youth and children. While our work began with the intent to improve the hard infrastructure such as sewage, drainage and waste issues, it was supported by softer art-led interventions that brought the community together to bring about change in their physical surroundings. What emerged beautifully was how this approach garnered a lot more interest with the youth of the neighbourhood as they felt a sense of agency within their own spaces, one that otherwise always got blanketed by large infrastructural issues that weren't in their control. We believe that these art-based engagements should not be pursued as add ons but as non-negotiables to community building and strengthening.

We began with the formation of the youth group when boys and girls in the neighbourhood sat together to share their ideas and reimagine their spaces, to working together to make it happen, to cleaning the streets and redesigning them, painting murals, to co-building a library, and initiating an arts festival. These initiatives evolved into so many more possibilities. These interventions have been supported by philanthropic funding and collaborations with the city authorities like the Brihanmumbai Municipal Corporation. In our practice, we see art as the input through which multiple tangible and intangible, big



Figure 5 and 6. (both) Tactical interventions are done through community skills and resources to clean up the street and turn it into a mini park for play and leisure. Image Courtesy: Community Design Agency, 2020



Figure 7. (left) Kids playing with cement and bricks in a common space with rudimentary construction. Figure 8. (right) A mural with text that translates to “This is our home” highlights the vibrancy in their neighbourhood and its people. Image Courtesy- Community Design Agency, 2021

or small transformations begin to emerge. It takes us back to Nick Obolensky’s words in *Emergent Strategy* (Brown, 2019), where he explains emergence as ‘the way in which complex systems and patterns arise out of relatively simple interaction.’ Our everyday observations from the community at Natwar Parekh expose us to the symptoms of much larger systemic issues that they are facing.

We are building a neighbourhood pedagogy for youth-led transformation through creative and democratic engagement. Our process is iterative, has evolved through the years, and has surpassed our early imaginations. Art-based interventions have led the youth to express and explore their creative sides, while they worked on improving their neighbourhood. When a group of young people from the community were asked about their rights in the process of city-making, Nijab, a sixteen year old, mentioned that she had gained the right to her identity through being part of these interventions.

2. Reclaiming identities, reforming gaze

Govandi has a rich mix of culture and incredible talent - which we began to see while engaging with the youth and implementing various spatial interventions. Through drawings



Figure 9. Youth from Govandi put up a local exhibition of photographs they took of their neighbourhood. Credit:Tejinder Singh Khamkha. 2023

and rap songs, they captured the essence of their lived experiences in a way that dominant narratives of the city did not allow.

Govandi, a ghettoised neighbourhood, is far removed from the larger narrative of Mumbai, but it has its own stories to tell. Moin Khan, a young rapper and filmmaker who grew up in Govandi, challenges the multiple reductionary ideas of Govandi that the outside world has through 'Haq se Govandi', translated loosely to 'Govandi my Pride'. The rap number has garnered more than sixty thousand views on YouTube and is a favourite amongst the neighbourhood children. Moin worked as a delivery boy for Swiggy⁴ for a few months to save for the production cost of the video. When asked what prompted him to write and produce 'Haq se Govandi', he says, 'I wanted to give Govandi another identity, which is not linked to crime or garbage.'

Together with the children and youth of Govandi, we set up the Govandi Arts Festival, supported by the British Council's India-UK Together Season of Culture, in 2023. At the heart of the festival was the mentorship program where we invited creative professionals from five disciplines - Theatre, Film, Photography, Public Art and Rap - to engage, nurture and mentor children and young adults from different neighbourhoods of Govandi for six months. This was followed by a four month long artist residency program to create a safe space for emerging and established artists to collaborate with the residents to create site and community specific exhibits. The final five-day festival welcomed crowds from across the city who gathered to listen and watch the artworks that were created by the youth as

⁴ A food delivery platform founded in India



Figure 10. A young boy from Govandi putting out his wishlist of how he reimagines the streets of this neighbourhood during a public space design workshop. Credit: Community Design Agency. 2022

forms of self-expression.

The festival reinstated people’s identities in myriad ways. Sumaiya, a young woman who participated in the theatre mentorship workshops, said, “Even today (2 months post the festival), people recognise me and call me an ‘artist’ when I walk down the lanes of the neighbourhood. Performing in front of so many people felt empowering and gave me a sense of achievement. I was deeply moved by looking at the pride in my father’s eyes. He never posts anything on social media, but that day, I was all over his accounts, he was so proud of me and he even recorded my entire performance!”

Ifra, a film making mentee, said, “At the beginning of my filmmaking journey, I used to avoid shooting in public places because people would approach me and question my intentions. Sometimes, people made fun of me for using a tripod to shoot. Seeing my fellow mentees create videos in public places without any fear motivated me to do the same. Our assignments gradually involved shooting in busier places like markets, and I didn’t want to miss out on the opportunity to learn. As I started filming outdoors more frequently, my confidence grew, and I could proudly tell others about my passion for filmmaking without feeling hassled by their questions.”

For the first time in the 15 years of relocating to Natwar Parekh, the residents, including girls, boys, senior citizens, and women across all religions and caste, came together to carve out a space to express their voices, aspirations and talents which often get buried due to various forms of social and spatial marginalisation. In an increasingly polarised world, sharing moments of joy became a form of resilience – and art had the strength to facilitate this. It was interesting to note that some women who came for the festival from within the

community were hesitant to get the festival stamp on their wrists, because it would expose to their families that they had attended it. Silently being part of the festival was their way of rebelling against norms in their daily life. Sana, a young girl from Govandi, now chooses whether she wants to cover her head with an abaya while in public. She says that the six-month long process of making a film about herself and her years of growing up gave her a newfound agency to make individual decisions in other aspects of her life. Sana's film itself has been screened at multiple national and international film festivals. Ajaz, an aspiring dancer, was once refused health insurance when he revealed his address



Figure 11. An exhibition with portraits of people of Govandi taken by the youth on display at the Govandi Arts Festival. Credit: Tejinder Singh Khamkha. 2023



Figure 12. (left) An image of the ground before the festival took place. Credit: Moin Khan 2022.
Figure 13. (right) An image of the ground after the festival took place. Credit: Moin Khan 2023.



Figure 14. An aerial view of Govandi Arts Festival on a ground in Natwar Parekh.
Credit:Tejinder Singh Khamkha. 2023.

to his employer. Bushra, a henna artist, refused to walk her neighbourhood because she felt it was unsafe. The festival changed how people saw Govandi – and it reinstated a sense of pride in the residents themselves. They now want to work on making this place better because they have realised that their collective potential create a transformational impact.

3. Relearning Govandi through local perspectives

Every step of the process, the community's needs are kept front and centre. The climate crisis has been deeply affecting the people of Govandi and has exacerbated in the past few years. As heat waves tend to lash across India and irregular rainfall sweeps the city, residents have been paying high electricity bills and buying second-hand and third-hand air conditioners. Their improperly-designed homes lead to high indoor temperatures. Residents find it difficult to go downstairs to take a walk because of the garbage-filled streets. In 2023, we received the Art4Resilience Award⁵ by Global Resilience Partnership⁶, which focussed on developing creative pathways to work with children on climate resilience. Through the award, we have been capturing stories of crises and resilience to create a grassroots vocabulary of climate with the children - one that is otherwise lost in the complex scientific terminologies that are prevalent today. In these workshops, children have laid out the impact of the climate crisis – drawing grey skies and polluted drains and telling stories of picking out fish growing in sewers that they want to take home to make a local aquarium and a lot more.

⁵ <https://www.globalresiliencepartnership.org/in-which-language-does-the-rain-fall/>

⁶ Global Resilience Partnership is an organisation based in South Africa and Sweden which identifies and helps scale on-ground innovation around social causes, and advances advocacy around them.



Figure 15. Collage made by a 12 year-old girl during the Climate Vocabulary Workshop, indicating challenges of waste in and around the neighbourhood. Credit: Mansi Bhalerao. 2023

This process of art-based research and enquiry into the nuances of their everyday life brought out stories that shifted our perspective on the climate discourse.

4. Conclusion

Women in the neighbourhood want more public spaces to be activated around their buildings so that their daughters can come out more often. Mothers felt at peace knowing that they could sit and watch over their children as they played outside. Over the past seven years, we've been part of a movement in Natwar Parekh, Govandi, spearheaded by the residents, which explores how hope can become a tool to change one's surroundings – and life itself. Through small daily acts of resistance, this community has achieved incredible transformations, has become more tightly knit, and continues to grow to be more resilient.

City authorities have taken note of this, too. The Govandi Arts Festival was also a way for the residents to urge the city to shift its gaze on them - to look again and note the conditions that this hope can be born out of and take accountability for the city's inaction towards providing a better quality of life for all. The residents cleared the largest open ground in Natwar Parekh to host the festival, which was earlier used as a spot for parking old abandoned cars for the past 15 years. Post-festival, the residents have not allowed it to go into its previous state of decline; children now play here, and the elderly host celebrations and religious gatherings here. Seeing the motivation of the residents, city authorities have sanctioned a multi-million dollar deal to upgrade the infrastructure in this neighbourhood, a project that is currently underway.

Continuously reimagining their present and futures, the residents have created a sense of belonging in these unique ways. They came together and asked - What if we could resist creatively? What if this breathed the vision of transformation that we collectively come up with? The systemic issues we address today might not be solved in our lifetimes, but we become part of smaller movements that lead to the common cause of freedom, joy and equity. The human race often forgets that we are all mutually reliant, and that there is power in the collective. Our practice supports this thriving ecosystem in Govandi, where we hope together, create brave spaces and move towards liberated futures, one voice at a time.

References

- Bhalerao, M., and Sharma, N. (2024) In Which Language Does the Rain Fall?. Global Resilience Partnership [online]. Available from: <https://www.globalresiliencepartnership.org/in-which-language-does-the-rain-fall/>.
- Bharucha, N. and Iyer, M. (2018) 1 in 10 Living in Slum Rehab Colony Has TB; Lack of Air and Light Seen as Cause. Times of India, 7 April 2018.
- Bhide, A. (2015) Social economic conditions and vulnerabilities: a report of the baseline survey of M (East) Ward, Mumbai.
- Brown, A.M. (2019) Emergent Strategy: Shaping Change, Changing Worlds. AK Press.
- Dubash, N., and Ghosh, S. (2023) We Need to Change How We Talk about Climate. In India Development Review. Available at: <https://idronline.org/article/climate-emergency/we-need-to-change-how-we-talk-about-climate/>
- Jaimini, B. and Sharma, N. (2020) Can Waste Bring Communities Living in High Density Vertical

Slums Together?. ArchitectureLive, [online]. Available from: <https://architecture.live/vertical-slums-bhawna-jaimini-natasha-sharma/>

Jaimini, B. (2023) Can an Arts Festival Highlight Spatial Inequalities While Celebrating the Resistance of Marginalised Communities? *FestivalsfromIndia*.

M. S. Eeshanpriya (2022) Matunga, Wadala Most Vulnerable to Flooding; Chembur, Govandi Prone to Urban Heat: MCAP. *Hindustan Times*. Available at: <https://www.hindustantimes.com/cities/mumbai-news/matunga-wadala-most-vulnerable-to-flooding-chembur-govandi-prone-to-urban-heat-mcap-101647363795250.html>

Pardeshi, P., et al. (2020) Association between architectural parameters and burden of tuberculosis in three resettlement colonies of M-East Ward, Mumbai, India. *Cities & Health* 4(3): 303-320.

Shantha, S. (2018) Mumbai's Designed for Death Buildings Are Incubating TB. *The Wire* [online], 10 April 2018.

Sharma, S. (2023) This Design agency is Improving Living Conditions in Slums. *Yourstory*.

Tonkiss, F. (2005) *Space, the city and social theory: Social relations and urban forms*. Polity.

Digital Public Spaces for Youth Engagement in Informal Settlements. Case Examples from Mathare in Kenya

Stephen Ochieng Nyagaya, Diana Mwau

Nuvoni Centre for Innovation Research, Kenya

snyagaya@nuvoniresearch.org

Abstract

Public participation in all its forms is continually limited amongst the marginalised, especially those living in informal settlements. While the right to participate in decision-making on policy and development projects is enshrined in state laws, the urban poor continue to be excluded from such activities, thereby limiting their democratic rights. Inadequate public spaces are one factor that minimises the urban community's participation in citywide proposals. Forms of participation, such as digital engagement, do not reach the urban poor due to the limited digital infrastructure in low-income areas of the city. Attempts to conduct participation in informal settlements see only a few people engaged, worsening existing inequalities in cities. This case recommends the implementation of digital hubs as vital and vibrant public spaces for youth engagement in informal settlements. It looks beyond the hubs as places for merely enhancing digital connection but as spaces that integrate interactive and collaborative activities, thus bringing community members to participate in government decision-making processes and engagement with the community agenda. Taking the case of the Mathare informal settlement, this article draws inspiration from the government of Kenya's plan to establish 1450 digital hubs across all wards in the country. The article proposes a hybridity of activities in the proposed hubs to have both physical and digital engagement methods. Besides participation, the hubs would also be used to promote social health and well-being programs through digital literacy training, enterprise development, activism, empowerment, and engagement in remote/online tasks.

Keywords: public participation, digital hubs, informal settlements, public spaces, inequalities

To cite this article:

Nyagaya, S. and Mwau, D. (2024) "Digital Public Spaces for Youth Engagement in Informal Settlements: Case Examples from Mathare in Kenya", *The Journal of Public Space*, 9(2), pp. 245–258. doi: 10.32891/jps.v9i2.1781.

This article has been peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

I. Introduction: Background to public participation

Public participation is a principle of democratic governance that aids inclusive planning and decision-making. The term can sometimes be used interchangeably with ‘community participation,’ ‘community engagement,’ ‘stakeholder engagement,’ or ‘civic engagement’. Public participation encompasses the dynamic involvement of individuals, community collectives, and civic entities in the formulation and execution of plans and decision-making procedures that impact the community (Head, 2007). It involves extending invitations to the general public and stakeholders to actively participate in formulating policies, planning programs, or implementing them (Enwereji & Uwizeyimana, 2020). The Constitution of Kenya (CoK) 2010 and other laws mandate local and national governments to conduct public participation to facilitate any legislative or policy process and other businesses (Kenya, 2022). Devolution in Kenya is anchored on democracy, inclusivity, and decentralisation of services (Kenya, 2022). As a result, public participation serves as one of the principles of democratic governance in Kenya.

Citizens have the right to participate in development and policy formulation processes. Participation enhances decision-making by the local governments and authorities (Enwereji & Uwizeyimana, 2020). However, the existing inequalities in cities continually limit the urban poor’s right to participate in development and policy formulation processes, as poverty and informality are constant threats to their access to information (Wamuyu, 2017). This information-access divide exacerbates social inequalities, thereby influencing a range of issues including security, housing, health, and education, amongst others.

In Kenya, for example, 60% of the population lives in informal settlements. This population does not have equal access to infrastructure and basic services compared to those living in formal areas (Wamuyu, 2017). Participation of these populations in development initiatives is equally minimalised by their meagre access to public infrastructure (Kim, 2015). Their right to access all forms of participation (digital or physical) is continually constrained, making them passive decision-makers in development processes. Informal dwellers have limited public places to conduct such co-creation processes. Furthermore, there is limited access to digital participation due to the limited access to the internet and digital platforms (Fransen et al., 2024). When formal participation processes occur, only a few people get involved for the sake of the policy being passed. This is what Arnstein (1969), in her ladder of participation, calls ‘manipulation,’ where signatures of the public are collected for proof of discussion in a non-existent or limited involvement.

Therefore, this article recommends developing a hybrid form of youth participation by integrating both physical and digital methods in co-creating the processes of planning and policy formulation in informal settlements. Using case examples from the Mathare informal settlement, this article draws inspiration from the proposed digital village hubs by the government of Kenya to serve as vibrant public spaces for youth participation. Amongst other functions, the hubs could be used for building digital literacy skills, youth empowerment, and social well-being. In the following sections, we discuss the methods used in this study, literature on informality, digitalisation and public participation, and provide a recommendations for establishing digital hubs as hybrid public spaces for youth engagement.

2. Methods

The research is approached as a case study. It forms part of a large study conducted in Mathare on the ‘co-creation of digital community learning centres,’ which aimed to

discuss how communities could design digital hubs as centres for learning and knowledge empowerment. We first undertook a GIS mapping of the digital facilities and social amenities in Mathare to identify their conditions, number, location, and access by the community. We later conducted two co-creation workshops where the community designed what they would perceive as a digital learning centre. The social design process involved identifying the services and activities, in addition to how the centres would be managed. The findings were related to the literature on informality and public participation and the government's proposal to establish digital village hubs across the country. The article finally recommends how the digital hubs and internet connection in informal settlements could be used as hybrid spaces for public participation for the youth.

3. Benefits of public participation

There are various benefits of participation to the community. Enwereji & Uwiseyimana (2020) note that participation fosters the relationship between the community and the government. Democratic Decision-making Theory shows that society should actively participate in decision-making. In Kenya, the government conducts public participation to allow for democratic decision-making by the public (Moallemi et al., 2020). These processes also ensure the legitimacy of the decisions made by the public and address the actual concerns.

According to Hendry (2022), community participation allows transparency and openness in decision-making. It enables the community to benefit from the resources by discouraging corruption and embezzlement of resources (Rijal, 2023). Transparency and accountability increase trust and acceptance of policies formulated by the government. Civic participation inspires creativity and innovation (Anthony Jr, 2023). Sourcing opinions and views from a diverse background can give rise to novel ideas with capacities to solve existing challenges. In addition, the community could feel more empowered and mobilise local resources to build local capacities for their problems. It also hastens the decision-making process, thereby improving the efficiency of governance systems.

Participation creates job opportunities. The community could mobilise external resources to train the youth in social enterprise development (Mathebula, 2016). Community participation also increases the knowledge of how public institutions work and gives the public greater access to the resources they need (Watt, Higgins, and Kendrick, 2000). For example, in Mathare, Kenya, community-based organisations (CBOs) and local collectives participate in dialogues to discuss the local governance structures and how resources are channelled to the public.

Lastly, community engagement reduces conflicts that could emerge from different groups (Sanggoro, Alisjahbana, and Mohamad, 2022). Various interest groups provide services in urban communities (including the government). Conflicts can arise from these groups when their interests collide. Participation is deemed to harmonise diverse opinions to prevent conflicts and increase public satisfaction (Rijal, 2023). As Newig et al. (2018) argue, participation accelerates consensus between the different groups, thus promoting cooperation.

4. Participation and informality

Although cities currently implement participation as a democratic decision-making tool,

scholarly articles argue that it could reinforce inequalities in areas with existing forms of marginalisation (Wamuyu, 2017). Fredericks (2020) mentions that the current formal public participation methods fail to reach wider groups of the population, including poor people, younger people, immigrants, refugees, and people living with disabilities. This is true with informal settlements in Kenya, which are socially and spatially marginalised. Formal participation fails to reach informal areas due to the inadequate public infrastructure, such as places to conduct the activities. The urban poor living in these informal settlements thus become passive participants as their voices are not actively integrated into the formal city decision-making processes. Moreover, youth in these informal settlements need more incentives to follow up and engage in these participation processes. They describe the processes as boring and lacking modern interactive methods that could attract a wider audience.

Public participation in informal settlements takes different forms. Approaches such as focus group discussions, public hearings, city hall meetings, citizen juries, surveys, and the use of digital tools have been widely used and are being adopted by local communities to facilitate participation (Rowe and Frewer, 2004).

Physical participation requires a venue where participants converge to co-create and provide feedback or inputs to the physical activities (Fredericks, 2020). Tools for conducting physical participation include focus group discussions, physical surveys, open forums, workshops, community dialogues, and public hearings, amongst many more (Fredericks, 2020). These physical spaces provide a medium where communities converge to become part of the city's decision-making. These types of participation use physical tools and methods such as charts, whiteboards, presentations, etc. In cases where digital platforms are fused with these physical activities, they are usually minimal. For instance, a workshop could include graphical computer presentations or feedback sessions on *Google Forms*.

Physical participation is constantly faced with space constraints in informal settlements. Getting a physical space that can host public participation forums is difficult. Public land where such forums take place is often grabbed by those in power, leaving the community with few options (Makworo and Mireri, 2011). In cases where private entities are available in these places, they control the activities, thus interfering with the principle of open access. As Bourdieu (2018) argues, people in power over places are simultaneously in power over those who access the places. In this sense, it becomes difficult for the community to participate actively in such processes. Meagre development initiatives by the government are also fairly to blame for the lack of public places in informal settlements. While formal participation processes continue in other areas of the city, the opinions of the informal dwellers are not fully captured during policy formulation, thereby further reinforcing exclusion. In the Mathare informal settlement, for example, the community attends public participation forums organised by the county governments in other areas such as Huruma, Pangani, or Mlango Kubwa. This means that only a few people attend the public meetings as venues are located outside the settlement.

Unequal demographics in informal settlements also limit participation (Heaton & Parkilad, 2019; Paskaleva et al., 2021). It is argued that physical approaches capture certain population groups, excluding others from such processes. There is a tendency to associate community participation in informal settlements with specific groups—for instance, a biased selection of those who can read and write to attend community workshops. In Mathare, the youth and younger people are often excluded from public participation processes. They are considered rowdy and unruly and associated with creating chaos and violence (Van Stapele, 2016). Besides, youth in Mathare distrust government-motivated

initiatives as they perceive the government as a failed institution. Other groups with social challenges, like people living with disabilities, find it hard to access these meetings because of the lack of aiding infrastructure.

Digital forms of participation comprise online platforms where society can input their opinions and feedback (Karadimitriou et al., 2022). Digitalisation has been considered a powerful tool for collecting citizen feedback. While digitalisation is increasingly used in the participation process, it has been argued that it fosters exclusion amongst the marginalised groups in cities, such as informal settlements where a good proportion do not access the internet. In the Mathare informal settlement, the apathy for using the internet is associated with various factors. These factors include the following;

- Limited access to digital devices such as smartphones or laptops.
- Low digital literacy levels
- The high cost of internet. Digital participation requires the installation of high-speed internet, such as Wi-Fi or an optic fibre connection.
- There is low awareness and capacity for digitalisation.

Therefore, it becomes a challenge to engage in digital participation as only a fraction of the population would be connected.

A mapping survey of (public) places in Mathare identified the following facilities.

4.1 Cybercafes

The study revealed 17 cybercafes across the settlement. All the facilities had internet except one. The facilities are privately owned, and the community accesses them by paying. However, it was realised that some villages, such as Kosovo and Mathare 3B, did not have internet access due to the lack of electricity. This describes how inadequate access to infrastructure and services limits access to digital information (see Fig. 1).

4.2 Social halls

The study identified eight social halls across the settlement. They were observed to be owned by community-based organisations (CBOs). The halls are used by the CBO members and occasionally hired out to the public. The facilities are not connected to the internet. While the facilities are accessed by the community, they do not have access to digital information.

Name of Facility	Village	Facility Type	Service category	Owner/ operator of the facility	Internet Access (Wi-Fi)
Greenpark community social hall	Village I	Social Hall	Public	CBO	No
Mathare environmental	Village I	Social Hall	Communal service	Community	No
Homeboy socail hall	Village I	Social Hall	Communal service	CBO	No

Kinatco Social Hall	Mathare 3A	Social Hall	Public	CBO	No
Slum Children Social Hall	Mashimoni	Social Hall	Communal service	CBO	No
Twaweza Youth Group Social Hall	Mashimoni	Social Hall	Communal service	CBO	No
Bagdad Social Hall	Mathare 4A	Social Hall	Communal service	Community	No
Myda Hall	Mathare 4A	Social Hall	Communal service	CBO	No

Table I. Social halls

4.3 Libraries

The study identified four libraries that are owned by CBOs. Likewise, the facilities are not connected to the internet.

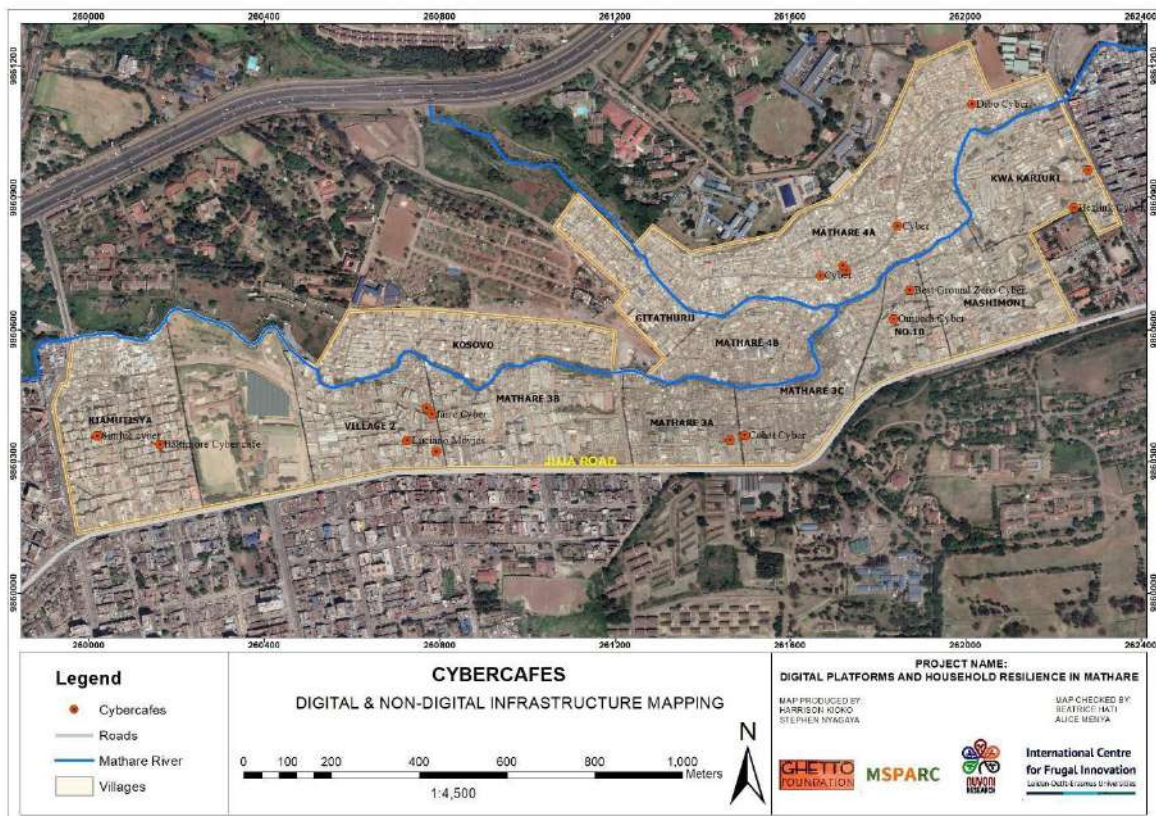


Figure 1. Map showing cybercafes in Mathare Credit: Authors, 2024

Name of Facility	Village	Facility Type	Service category	Owner/ operator of the facility	Internet Access (Wi-Fi)
Mysa Mathare Library	Village 2	Library	Communal service	Community	No
Billian Music Family	Mathare 3B	Library	Communal service	CBO	No
School Hope Muungano	Mashimoni	Library	Communal service	CBO	No
Slin Library	Mathare 4A	Library	Communal service	CBO	No

Table 2. Libraries

4.4 Informal places - bases

The study identified seven informal spaces (bases) across the settlement. Bases are informal places where the youth engage in informal dialogues. These places usually host organic discussions on communal issues. They are sometimes hosted in open spaces, makeshift structures, or at the frontage of buildings. Out of the seven bases, only one of them, which is owned by a private entity, had internet.

Name of Facility	Village	Facility Type	Service category	Owner/ operator of the facility	Internet Access (Wi-Fi)
Spark city	Village 2	Base	Communal service	Community	No
Wanavietnam Area 3B	Mathare 3B	Bas	Communal service	Community	No
Blaqeye Base	Mathare 3A	Bas	Public	CBO	No
Twaweza Youth Group	Mashimoni	Base	Communal service	CBO	No
Smart Base Group	Mathare 4B	Base	Communal service	Community	No
Kun Fire Base	Mathare 4A	Base	Communal service	Community	No
Imperial Base	Mathare 4A	Base	Communal service	Private	No

Table 3. Bases

The findings above show limited public places in Mathare. While the community has libraries, social halls, and cybercafes, the study found that they are privately owned or managed by community-based organisations (CBOs). The community pays to access the places. The facilities have small spaces, limiting public access. Further, these facilities are few and do not meet the needs of the target population. Most of these facilities do not

have internet, making it difficult for the public to access digital information. We, therefore, position that these privately owned facilities limit free participation by the youth. Despite internet inaccessibility, participation in the bases was free as no access fee was required. The youth create these bases to engage in informal dialogues within their villages. This paper presents how such places can be modelled for hybrid participation. Hybrid participation refers to integrating digital activities in a controlled physical space within a city (Anthony Jr, 2023).

Figure 2 summarises the challenges of public participation and how they inform poverty, inequality, and informality. The blue ring represents informality, poverty, and inequality as the major underlying issues in informal settlements. The green ring represents challenges experienced when implementing public participation in informal settlements. The grey and light blue semi-rings state the forms of participation. In summary, the circle states that community participation (physical or digital) is affected by various challenges that inform informality, poverty, and inequalities in informal settlements.

5. Digital Village Hubs

The Kenya National Digital Master Plan 2022 – 2032 recognises the role of ICT in creating opportunities and boosting economic growth. Amongst other functions, the plan establishes a nationwide digital infrastructure, connecting every citizen to the e-government platform. This



Figure 2. An informal space (base) in Mathare 4B. Credit: Authors, 2024

will be done by establishing 1450 digital village hubs in every ward in Kenya (Government of Kenya, 2022). In addition, the plan sets to establish 25,000 public Wi-Fi hotspots in public places across the country. The hubs are intended to serve as ICT training and film production centres and enhance access to government services while improving public Wi-Fi (Government of Kenya, 2022). The plan is set to be implemented by the ICT Authority (ICTA) of Kenya.

The role of the ICT Authority in the establishment of the hubs is to facilitate the connection of high-speed internet and provide digital technologies. This allows other entities and communities to design and manage the hubs based on their needs. This provides an opportunity for communities to create hubs as vital and vibrant spaces where youth can participate in planning and decision-making processes for the betterment of their settlements.

Digital hubs as vital and vibrant public spaces

In terms of public participation, the ICTA plan does not provide a strategy for engaging the urban poor in the design and implementation of the proposed digital hubs. The informal settlement communities could leverage their ingenuity to design digital hubs

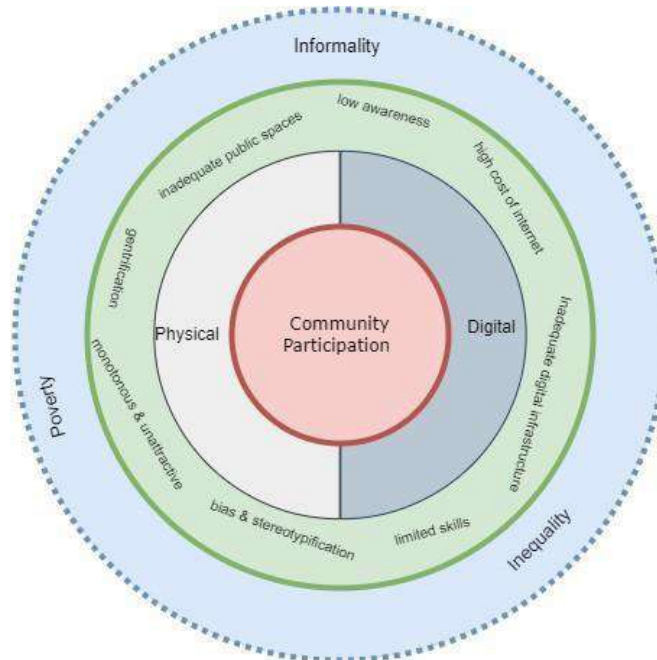


Figure 3. Participation and informality concept, Credit: Author 2024

that are fit for youth participation. This section presents a strategy for how the hubs could serve as hybrid public spaces where youth living in informal settlements carry out physical and digital participation. The communities could capitalise on high-speed internet connectivity provided in the hubs and other public places to conduct online engagement activities.

Mathare is one of Kenya’s most populated informal settlements in Kenya, with a population density of 68,000 people per square kilometre. The settlement has four wards: Mlango Kubwa, Mabatini, Hospital, and Utalii (KNBS, 2019). Based on the ICTA plan to establish digital hubs in every ward, Mathare should host at least four digital hubs. From the findings above, it is evident that Mathare has no facilities owned by the government. Therefore, the government should connect the internet to other facilities or places that are accessed by the community. In Mathare, these places include libraries, social halls, and bases.

Rather than implementing the pervasive city-wide digital proposal, the Mathare digital hubs should be designed to remove the existing inhibitors to participation and information access. They should be designed as public digital and physical spaces, which the authors call hybrid public spaces. They should feature physical and digital participation methods while integrating other forms of community engagement. The table below summarises the activities to be considered in the hybrid public space.

Physical activities	Digital activities
Community workshops & dialogues to discuss issues that need urgent attention	Hybrid workshops and dialogues to discuss urgent issues
Civic education	Digital literacy training
Youth mentorship and counselling programs	Access to government information
Indoor games e.g. snooker, Poker etc	Planning and city development gamification e.g. using Minecraft or Augmented/Virtual realities to plan and design neighbourhoods
Training on health and well-being	Digital studios for young upcoming artists
Exhibitions and concerts	Sharing information/news such as early warning information
Advocacy and activism through artistry (speaking walls, wood carvings etc).	Capacity building on remote/online working

Table 4. Physical and digital methods of participation

Hybrid spaces would include the following elements;

- Physical participation
- Digital engagement
- Hybrid and middle-out engagement

6. Physical engagement

According to Fredericks (2020), physical spaces are places where people can be seen and heard. They provide the opportunity for the community to congregate and speak their opinions. The physical engagement methods should be diverse. They should include formal participation processes and playful and collaborative activities within the space. Workshops and dialogues should be conducted at two levels, i.e., the community level, where only community members participate, and fused levels, where other stakeholders can be invited. Dialogues and workshops should include computer use and simple graphics to make them more interactive. These activities should be participatory and not be one-sided communication by the presenters only.

Other participatory activities should include games. The space should integrate reactive games that involve many participants, such as Snooker (pool game) or poker (card game). These would draw the attention of others to associate with the activities of the space. The space could also be used to consolidate community activism through artistry. This will reinforce the collective activism conducted by other CBOs in the community. Exhibitions and concerts can also be used to speak about eradicating social vices and maintaining health and well-being.

7. Digital engagement

The space should also have digital engagement activities. Workshops and dialogues should be digitalised to include other community members who would not be physically present but wish to join the conversations. City county officials and stakeholders from the relevant authorities are also invited to join the physical or online meetings.

To engage with the ongoing citywide participation in policy and legislation, the digital space should have a *feedback portal* where the community members can send their feedback

to the relevant authorities. Other city and community development initiatives, such as planning and development proposals, can be engaged through digital games. The Minecraft game has been successfully piloted in Mathare through the Block by Block project in partnership with UN-Habitat and Microsoft (N’Nuel, 2020). The youth used the video game to design and visualise their public spaces in Mathare.

Another possible digital tool is augmented or virtual reality, where the participants interact with virtual videos of the city. Other activities that should be included in the space include training on digital literacy, capacity building on remote jobs, sharing early warning information, and studios for recording music or videos for young upcoming artists. The community must have technical knowledge to participate actively in digital engagements. Further, digital media tools can extend engagement beyond the community.

8. Hybridity and middle-out engagement

Hybridity is the integration of both physical and digital forms of engagement (Fredericks, 2020). The hybrid participation form integrates physical and online methods in public spaces. It helps integrate emerging technologies of involvement. This dynamic approach allows for temporarily installing digital techniques in existing public spaces (Hofstad et al., 2022; Karadimitriou et al., 2022). It improves community engagement by promoting playful collaboration and providing interactive and engaging methods to connect with the public. The hybrid public space also allows the youth to upskill themselves in using and operating tools through digital literacy training (Rutten, 2018). Further, it would inspire innovation amongst the participants by exploring the different ideas for solving challenges within the community.

The digital hubs would be modelled to become hybrid public spaces that integrate various activities and allow other community members to access information and participate in the activities remotely. The government should install public Wi-Fi in informal public places such as bases for the youth, informal roadside markets and other open places to allow community members access to the internet for participation. Also, CBO-owned places that are accessed by the public (i.e. social halls and libraries) should be connected to the internet to encourage hybrid participation of the youth.

The conceptual diagram below shows how internet connectivity can enhance hybrid community engagement between the four digital hubs and other informal spaces within the community. The idea would foster the integration of engagement activities between the hubs and the informal spaces. This is what Rivera-Vargas and Miño-Puigcercós (2018) refer to as ‘virtual communities’.

Figure 5 shows a youth dialogue in a space that has been reclaimed from Mathare river. Middle-out engagement supports integrating objectives from the top-down decision makers with objectives from the bottom-up decision makers. These objectives strike somewhere in the middle. Knowledge from the higher order authorities, i.e., government, and lower information channels, i.e., the community, come together to meet in the middle. In this case, the government’s proposal would be discussed with the community to identify the people’s needs, wants, and aspirations before integrating the former to forge relationships and begin a co-design process. In Mathare, discussions would be conducted at ward levels before converging with the government to co-create the process. This would allow the government to appreciate how their proposals fit in the community. It would also increase confidence in government initiatives to encourage participation within the community.

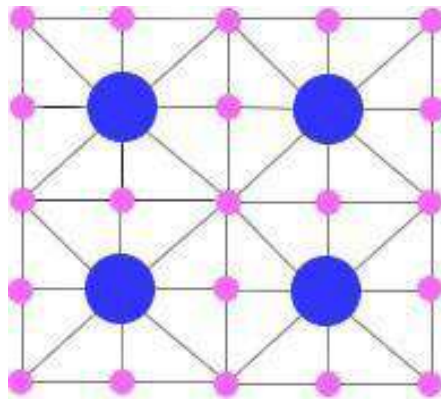


Figure 4. Hybrid Public Space Structure, Credit:Authors, 2024



Figure 5. Youth dialogue in Mathare Park, Credit:Authors, 2024

9. Conclusion

Various factors, including inadequate public spaces, inadequate public infrastructure, limited internet connectivity, and biased selection of specific population groups, limit public participation in informal settlements. Government proposals are not only pervasive but also fail to address the needs of the community. The proposed digital hubs by the government of Kenya can be remodelled to serve as spaces for public participation for youth in informal settlements. Hybrid participation can be promoted by connecting community facilities to the internet to ensure inclusivity. These spaces would be redesigned to include collaborative physical and digital activities, thus breaking the monotony of the normal public participation forums. The spaces would use hybrid activities such as hybrid workshops, dialogues, and virtual reality games to bring the community to par with the government's policy proposals. These spaces would see the youth engaged in various activities within their localities, including upskilling them in business development models, formulating community outreach programs, participating in health awareness programs, and working remotely. As a result, the spaces would strive to eliminate the social vices in the settlement strongly linked to unemployment, idleness, and low awareness.

The proposed middle-out engagement strategy allows the community to autonomously manage their own participation and engagement activities while discussing the policy

and development proposals by the government. This strategy prevents dictation by the government. Thus, the digital space strategies ensure cooperation with the government and the acceptability of the government projects to the community. It will inspire creativity and innovation amongst the youth through the training and empowerment programs. As a result, avenues for job creation and employment will widen. Lastly, the digital space will reduce tension between different groups through enhanced cooperation.

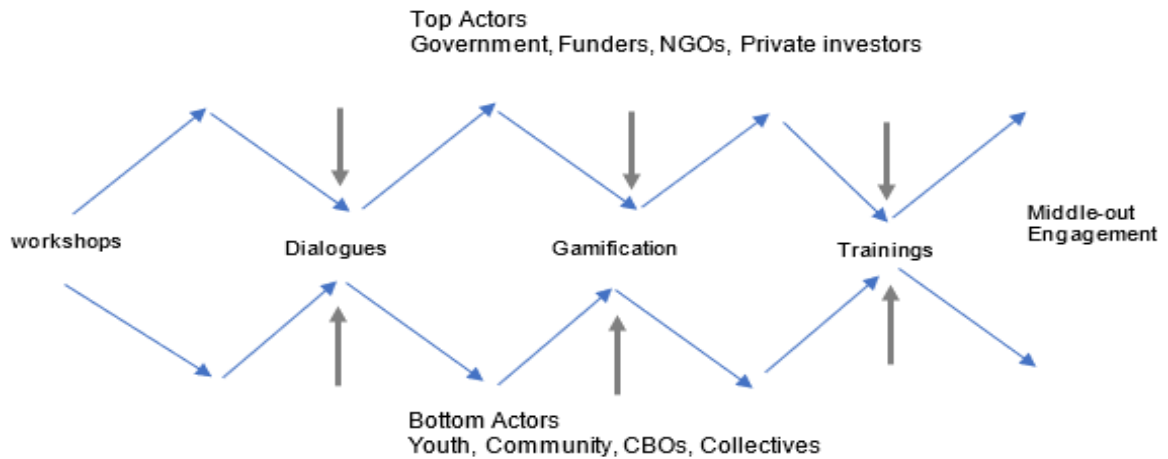


Figure 6. Middle-out engagement, Credit: author

Acknowledgement

The findings discussed in this article are derived from the broader Digitalisation study in Mathare, conducted by the Urban Programme of Nuvoni Centre for Innovation Research. We acknowledge the Mathare community for taking part in the study. Special gratitude goes to the Nuvoni team including Jan Fransen, Alice Menya, and Bosibori Barake, for taking part in the wider digitalisation study. We also thank Samuel Kiriro from Ghetto Foundation for mobilising the Mathare community to participate in the co-creation exercises.

References

Anthony Jnr, B. (2023) Sustainable mobility governance in smart cities for urban policy development—a scoping review and conceptual model. *Smart and Sustainable Built Environment*.

Arnstein, S.R. (1969) A ladder of citizen participation', *Journal of the American Institute of planners*, [online], 35(4), pp.216-224. Available from: <https://www.tandfonline.com/doi/bs/10.1080/01944366908977225>.

Enwereji, P.C. and Uwizeyimana, D.E. (2020) Enhancing democracy through public participation process during Covid-19 pandemic: A review. *Gender & Behaviour*, [online], 18(4), pp.16873-16888.

Fransen, J., van Tuijl, E., Harrison Kioko, S., Nyagaya, S.O. and Kiriro, S. (2024) When Digitalisation Hits Informality and it Hits Back. *Digital Resilience Strategies in Mathare, Nairobi*. SSRN [online]. Available from: <https://dx.doi.org/10.2139/ssrn.4828880>

Fredericks, J. (2020) From smart city to smart engagement: Exploring digital and physical interactions for playful city-making. In *Making Smart Cities More Playable: Exploring Playable Cities* Singapore: Springer, pp. 107-128.

- Government of Kenya. (2022). The Constitution of Kenya. Available from: <https://kenyalaw.org/kl/index.php?id=398>
- Government of Kenya. (2022) The Kenya National Digital Master Plan 2022-2032. Available from: <https://cms.icta.go.ke/sites/default/files/2022-04/Kenya%20Digital%20Masterplan%202022-2032%20Online%20Version.pdf>
- Head, B.W. (2007) Community engagement: participation on whose terms?. *Australian Journal of Political Science*, 42(3), pp.441-454.
- Heaton, J. and Parlikad, A.K. (2019) A conceptual framework for the alignment of infrastructure assets to citizen requirements within a Smart Cities framework. *Cities*, 90, pp.32-41.
- Hendry, D. (2022) Forecasting two aspects of climate change (part of Forecasting: theory and practice). *International Journal of Forecasting*, 38(3).
- Hofstad, H., Sørensen, E., Torfing, J. and Vedeld, T. (2022) Designing and leading collaborative urban climate governance: Comparative experiences of co-creation from Copenhagen and Oslo. *Environmental Policy and Governance*, 32(3), pp.203-216.
- Karadimitriou, N., Magnani, G., Timmerman, R., Marshall, S. and Hudson-Smith, A. (2022) Designing an incubator of public spaces platform: Applying cybernetic principles to the co-creation of spaces. *Land Use Policy*, 119, pp.106-187.
- Kim, J. (2015) Basic infrastructure services are essential for urbanization—but who will pay?
- Makworo, M. and Mireri, C. (2011) Public open spaces in Nairobi City, Kenya, under threat. *Journal of Environmental Planning and Management*, 54(8), pp.1107-1123.
- Mamokhere, J. and Meyer, D.F. (2023) Towards an exploration of the significance of community participation in the integrated development planning process in South Africa. *Social Sciences*, 12(5), p.256.
- Moallemi, E.A., Malekpour, S., Hadjidakou, M., Raven, R., Szetey, K., Ningrum, D., Dhialuhaq, A. and Bryan, B.A. (2020) Achieving the sustainable development goals requires transdisciplinary innovation at the local scale. *One Earth*, 3(3), pp.300-313.
- Nijholt, A. (2020) Playful Introduction on “Making Smart Cities More Playable”. *Making Smart Cities More Playable: Exploring Playable Cities*. Singapore: Springer, pp.1-22.
- N’Nuel. (2021) Youth must be engaged in decision making about their communities and cities’ [Online]. Available from: <https://mathareonestop.org/2021/07/04/youth-must-be-engaged-in-decision-making-about-their-communities-and-cities/>
- Paskaleva, K., Evans, J. and Watson, K. (2021) Co-producing smart cities: A Quadruple Helix approach to assessment. *European Urban and Regional Studies*, 28(4), pp.395-412.
- Rijal, S. (2023) The importance of community involvement in public management planning and decision-making processes. *Journal of Contemporary Administration and Management (ADMAN)*, 1(2), pp.84-92.
- Rivera-Vargas, P. and Miño-Puigcercós, R. (2018) Young people and virtual communities. New ways of learning and of social participation in the digital society. *Páginas de Educación*, 11(1), pp.67-82.
- Rowe, G. and Frewer, L.J. (2004) Evaluating public-participation exercises: a research agenda. *Science, technology, & human values*, 29(4), pp.512-556.
- Rutten, K. (2018) Participation, art and digital culture. *Critical Arts*, 32(3), pp.1-8.
- Sanggoro, H.B., Alisjahbana, S.W. and Mohamad, D. (2022). Influence of project and affected local community interests level on social conflicts in Indonesian infrastructure projects. *International Journal of Engineering*, 35(7), pp.1217-1226.
- Van Staple, N. (2016) ‘We are not Kenyans’: extra-judicial killings, manhood and citizenship in Mathare, a Nairobi ghetto. *Conflict, security & development*, 16(4), pp.301-325.
- Wamuyu, P.K. (2017) Closing the digital divide in low-income urban communities: A domestication approach. Available from: <https://doi.org/10.28945/3885>
- Watt, S., Higgins, C. and Kendrick, A. (2000) Community participation in the development of services: a move towards community empowerment. *Community Development Journal*, 35(2), pp.120-132.

The Story of Makanuna

Malak Alaa Eldeen Abbas, Henry Spencer, Hadeer Saeed Dahab

Makanuna initiative, Egypt

malkalaa035@gmail.com | henryspencer1@gmail.com | hadeersaeeddahb@gmail.com

Abstract

“Welcome to ‘Makanuna’, our place ... home of our inner spirit
**A trove of things crafted by our hands ... is waiting for you to find
inside this space.**” Malak Alaa Eldeen, 2023

Makanuna Al-Khalifa was a participatory placemaking project empowering adolescents in al-Khalifa neighbourhood in historic Cairo to redesign their local public spaces. Through 2021-2022 workshops, around 20 youth aged 13-18, including Malak Alaa Aldeen, upcycled solid and organic waste into outdoor furniture, games, and compost for al-Khalifa Park. A key output was Malak’s poem “The Story of Makanuna” with illustrations by her sister Fatma Alaa Eldeen, also a workshop participant. In vivid verses, the 17-year-old welcomes readers to “Makanuna” - Arabic for “Our Space” - home to their creativity and handcrafted items. She describes making a gazebo “formed from three triangles” of repurposed plastic bottles and rope, illuminated to resemble “a rainbow”, delighting all who see it. Inspired, they crafted five more lighting units “with bold colours and innocent hands.”

The poem conveys their determined spirit driving this unique space’s creation through hard work “from our plans.” Malak radiates pride in resourceful designs like a recycling bin filled with bottles containing natural materials from the park. Her closing words capture their ownership: “Here is our place and our story. So, what do you think of our idea in all its glory?”

Empowering youth to transform underutilized areas fostered creativity, environmental stewardship and belonging. Building on this, Malak, Fatma and other core team members launched “Makanuna Initiative” to pursue placemaking further. Malak now voices this youth-led initiative’s junior team, aiming to inspire wider involvement.

Malak’s poem and Fatma’s illustrations powerfully capture their sustainable accomplishments. This highlights the initiative’s origins in the Al-Khalifa workshops through adolescent participants who helped catalyse Makanuna’s growth from a local project into a youth-led movement.

Keywords: Historic Cairo, Makanuna, urban regeneration, waste upcycling, youth-led movement

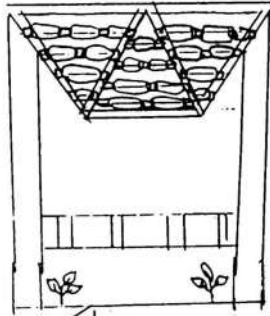
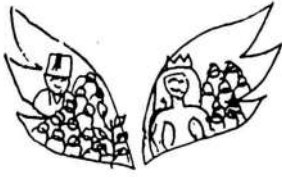
To cite this article:

Abbas, M. A. E., Spencer, H. and Dahab, H. S. (2024) “The Story of Makanuna’ Poem”, The Journal of Public Space, 9(2), pp. 259–264. doi: 10.32891/jps.v9i2.1825.

This article has been peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>



أهلا بيكم في مكاننا
الساكين وجداننا
جوه مكاننا العالي علينا
حجات كتير من صنع ايدينا

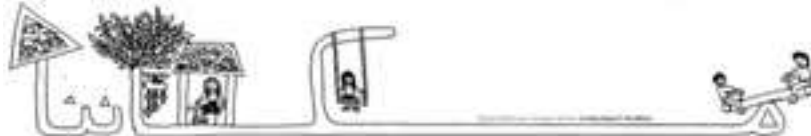
زمان قتلتمكم -
أزازتتين وحبال
نعمل برجولة ملهائش مثال
آدي برجولة ولا قوس قزح
هتتشوقها هتطيرم الفرخ
متكونة من تلت مثلثات

أزايها منورة كلها ألوانات
بصى هناك . شايغ النور
دي مثلثاتنا لعيت دور
ألوان بريئة بأيدين جريئة. أنكوت
وحجات اضاعة . متصممه و مثلثات
ومتثلثنا التقى شغال
عملنا سلة مريوطه بأحبال

جوا أزايين حصلنا
جزد كبير من جنيننا
ورق شجر رمل وظلت

وهي دي فكرتنا
والكومبوست وتدفي الارض
كبر زرعا بالطول والعرض
آدي مكاننا و آدي حياتنا
ايه رأيكويق ف فكرتنا

قصية ملك علاء
رسومات فاطمة علاء



The Story of Makanuna

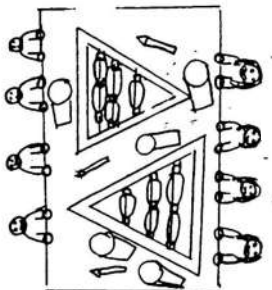


Welcome to 'Makanuna', our place -
home of our inner spirit
A trove of things crafted by our hands
is waiting for you to find inside this space.

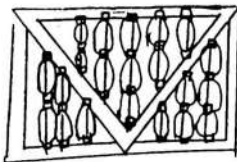
Once I told you,
Make a gazebo unlike any other
with two bottles and a rope passing through:
Here is gazebo - or is it a rainbow?

When you see it, you'll jump for happiness,
Formed from three triangles,
Its coloured bottles are illuminated in excess.

Look there! Do you see the light?
These are our triangles shinning with all their might.



With bold colours and innocent hands,
lighting units came together from triangles.
We worked hard from our plans:
We made a chain tied with rope.
Inside our bottles,
a big part of our garden:
tree leaves, sand, and pebbles,



This is our idea,
And compost in the ground,
Our planting covering all the land.
Here is our place and here is our story:
So what do you think of our idea in all its glory?



Figure 1. Malak & Fatima checking compost resulted from their organic waste.
Credits: 2022 Makanuna al-Khalifa



Figure 2. Mekanuna team with some of the 1st workshop prototypes. Credits: 2021 Mekanuna al-Khalifa



Figure 3. Malak with her colleague Menna on the bottles for design for one of the light units. Credits: 2022 Mekanuna al-Khalifa



Figure 4. Makanuna participants, implementation workshop final day.
Credits: 2022 Makanuna al-Khalifa



Acknowledgement

This content was written by Malak Alaa Eldeen Abbas, illustrated by Fatma Alaa Eldeen Abbas, translated by Henry Spencer, digitally edited by Hadeer Saeed Dahab.

Thank You for Allowing Us to Speak

Nitya Jaiswal

Epsom Girls Grammar School, New Zealand

bhawanap07vit@gmail.com

Radha Patel

Western Springs College, New Zealand

patelr@wsc.school.nz

Boopsie Maran

Place for Good, New Zealand

placesforgood@gmail.com

Abstract

In *Thank You for Allowing Us To Speak*, youth pedestrian activists Nitya Jaiswal (13) and Radha Patel (18) - supported by Auckland-based urban strategist, Boopsie Maran - describe images from their parallel traffic safety campaigns.

Across Auckland, families feel the streets students must use between their home and the school gate are growing to be more hostile than ever before. Particularly, in the city centre, their environment lacks shade and safe separation from car traffic, and often includes crossing the entrance to a motorway. While the kids themselves understand that walking and using active modes is a sustainable route, they just wish their streets were made safer by adult drivers, often the ones speeding to work.

This photo essay highlights the inherent challenges faced by students on and off the streets—whether at a traffic circle or at local board offices sitting opposite elected members. Through captions and selected images, Jaiswal and Patel speak frankly to their intended adult audience and detail in their own words the “consequences, for [those] of you who are wondering.”

Keywords: public open space, inclusive transportation, child-centred design, walkability, urban planning engagement

To cite this article:

Jaiswal, N., Patel, R. and Maran, B. (2024) “Thank You for Allowing Us To Speak”, *The Journal of Public Space*, 9(2), pp. 265–280. doi: 10.32891/jps.v9i2.1823.

This article has been peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

New Zealand ratified the 1989 United Nations Convention on the Rights of the Child in 1993. This commitment included the child's right to speak out and be heard on matters affecting their right to play and move safely through their public realm. In 2023, in a context where infrastructure improvement timelines stretch from as little as a few months to decades, the city of Tāmaki Makaurau / Auckland still finds itself excluding young voices from the co-design process of streets and public open spaces. Responding to this problem, two young women challenged the status quo through direct and purposeful advocacy. This photo essay, a mix of still-frame images from public comment and a safety campaign documentary, provides a lens into the advocacy spaces of two youth pedestrian activists, Nitya Jaiswal (13) and Radha Patel (18).

In 2021, Nitya Jaiswal (then aged 10) paired with the urban strategy collective, Places for Good, to lead walking tours, bringing attention to the traffic dangers on her daily walk to Freemans Bay School. Explains Jaiswal, "When the engineers walked with me to school, it didn't take them long to realise that my vision needed to turn to reality. It was only a matter of creating/changing a few signs, crossings, and roads. Unfortunately, these poorly planned roads and crossings are situated all over the country, and the government's slowness isn't helping at all. They may think they are saving money for bigger 'more important' projects, but they have jarred the next generation's lives."

Radha Patel (18) never imagined that she would become one of the youngest transportation activists in New Zealand. What started as a student petition for a pedestrian crossing to her local board in 2019 resulted in a lengthy pedestrian advocacy campaign presented across multiple government agencies in public input from December 2022 to March 2023. Altogether, Radha presented to her school board, Waitemata Local Board, the Auckland Council Transportation and Infrastructure Committee, and the Auckland Transport Board. Patel reflects, "If these systems were more inviting, we could create space for more young people to have their ideas heard and needs met. Youth participation is essential to ensure that we have a society fit for serving the health and well-being needs of this group, which has been left out of this decision-making process for far too long."

References

- Auckland Council Live (2022) Minutes of of Transport and Infrastructure Committee meeting - Item 5, 01.12.2022. Available at: https://youtu.be/eJJGz_cePhA?si=-ZAev7uOsPWl tkkl
- Barwig-Uin, J. (2022) Is it safe for kids to walk to school in New Zealand? Available at: <https://www.youtube.com/watch?v=mqEgPNJqOEK>
- Maran, B. (2021) Come Walk with Me: Year 5 School Student Brings Us Along on Her Daily Journey to School Available at: https://www.youtube.com/watch?v=-0s_AOu3GI8



Figure 1. "Cars whooshing centimeters away from me - this is what my unsafe city life is like."
- Nitya, age 13. Credit: Pippa Coom, 2017



Figure 2. "The team is calling for safety on school roads. These wonderful people are trying to make the vision come true." - Nitya, age 13. Credit: Boopsie Maran, 2023



Figure 3. "Before: A car casually parked on the pathway. It's not like these things happen everyday..." - Nitya, age 13. Credit: Boopsie Maran, 2018



Figure 4. "After my walking tour: Plants protect the pathway from any potential parkers who may decide to break the NZ road code. There are consequences, for [those] of you who are wondering..." - Nitya, age 13
Credit: Boopsie Maran, 2019



Figure 5. "Adventurers/students going through dangerous hurdles to school (like this one!)" - Nitya, age 13
Credit: Boopsie Maran, 2019



Figure 6. "I was a year nine student when my secondary (high) school students went to our local board to present this petition. I would like to know that the future generations of students can cross this road safely before I graduate year 13 at the end of this year:" - Radha, age 18. Credit: Boopsie Maran, date unknown



Figure 7. “The way society is set up, it’s hard for young people to participate in these conversations and be talked down to. We have to prove ourselves to have a voice first, and even then, our ideas are minimised, watered down, and go unheard!” - Radha, age 18. Credit: Boopsie Maran, 2020



Figure 8. “Here we see MP for Auckland Central Chlöe Swarbrick listening to the ideas of high school-aged students instead of making decisions for us without consultation.” - Radha, age 18
Credit: Luke McKeown, with permission



Figure 9. "I feel proud to see what my school's student-led sustainability group has achieved; however, we could not have done it without the support of our community and decision-makers who guided us along this challenging and unfamiliar journey." - Radha, age 18. Credit: Boopsie Maran, 2024



01.12.2022 - Komiti mō ngā Tūnuku me ngā Rawa Tūāhanga/Transport and Infrastructure Committee-Item 5

Figure 10. "While these systems aren't designed for young people we must have a seat at the table and feel empowered to participate and not just exist in them as young people deserve to grow up feeling safe in public spaces." - Radha, age 18. Credit:Auckland Council Transport Committee



254 PONSONBY RD

A COMMUNITY-LED DESIGN PROJECT (CLD)

Figure 11. The Official Public Open Space Opening Early 2025 - LANDLAB - Local Board



Figure 12. Parking Spot to Parklet exploring public Open Space - Sep 21
(Pippa Coom, 2017)



Figure 13. PARK(ing) Day - Auckland - September 21, 2018 - Women in Urbanism Aotearoa Taking over car parks and making them into beautiful fun and lively spaces. Credit Boopsie Maran.



Figure 14. September 20, 2019 World PARK(ing) Day - Kowhai Intermediate School Students Build Parklet to address speeds around school. Credit: Boopsie Maran.



Figure 15. October 11, 2020 Palmerston North PARK(ing) Day addressing bike vs. car.
Credit: Boopsie Maran.



Figure 16. artspace vs. carspace. Credit: Boopsie Maran.



Figure 17. Parklets to Petition Sep 18, 2020. Credit: Boopsie Maran.



Figure 18. Rose Road Sep 22 2020. Credit: Luke McKeown.



Figure 19. Dec 5, 2020, Hula Hoop Parklet Party. Credit: author.



Figure 20. Road Closure and Petition Promotion Event. Credit: author.

Where it Should Always Be

Carlos Andres Olivera Caballero

Bookcubers, Bolivia

col62804@gmail.com

Abstract

“Where It Should Always Be,” is a powerful poem written by Carlos Andres Olivera Caballero. The poem delved into the complex interplay between urban spaces and social movements. It illustrates how public spaces, often overlooked, became crucial arenas for the expression of communal identity, resistance, and aspirations for a just society. Set against the backdrop of a city undergoing turmoil, the poem is narrated through the experiences of a young individual witnessing the transformation of everyday urban landscapes into sites of collective action and contestation. It captures the essence of public space as a platform for civic engagement, where the community’s fight for equality, dignity, and freedom is articulated and enacted. Through vivid imagery and emotive storytelling, the poem reflects on the role of public spaces in shaping social dynamics, highlighting their potential to foster solidarity, empower marginalized voices, and challenge structures of power. It emphasizes the solidarity of resonates the reader’s interest in urban movements underlining the poem’s message of community empowerment.

Keywords: Bolivia, indigenous rights, cultural division, urban resistance, postcolonial society

To cite this article:

Olivera Caballero, C.A. (2024) “Where It Should Always Be”, *The Journal of Public Space*, 9(2), pp. 281–286. doi: 10.32891/jps.v9i2.1819.

This article has been peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>

A Subjective Interpretation and Introduction

My poem, inspired by the heart-wrenching narrative of Sacaba, Bolivia, in 2019, serves as a testament to the indomitable spirit of a community that stood at the crossroads of violence and hope. This piece weaves together the threads of resilience, mourning, and an unwavering demand for justice, encapsulating a moment in history where the public square became both a battleground and a sacred space for collective memory and resistance. In November 2019, Sacaba became the epicentre of a profound human rights crisis, marked by the violent repression of peaceful protests. The demonstrators, who were primarily indigenous people, sought to voice their dissent against the interim government's policies and actions. This tragic confrontation resulted in numerous fatalities and injuries, a somber reminder of the cost of political upheaval.

The government's response to the protests, characterized by an excessive use of force, has been widely criticized by international human rights organizations. Reports indicate that the violence was not just a clash but a calculated act of repression, with evidence pointing towards the use of military-grade weaponry against unarmed civilians. This stark discrepancy between the official narrative and eyewitness accounts underlines the deep-seated issues of accountability and transparency within the state apparatus.

Moreover, the aftermath of the Sacaba incident has been a journey towards seeking justice and recognition for the victims and their families. Despite various challenges, including attempts to silence dissent and obfuscate the truth, the resilience of the affected communities shines through. Their refusal to accept silence in exchange for compensation and their continued advocacy for a comprehensive investigation into the events speak volumes about their commitment to justice and the principles of democracy.

The poem reflects on the transformative power of public spaces. It underscores how public squares and streets can simultaneously embody the potential for peace and the peril of violence, serving as platforms for both oppression and liberation.

The narrative woven through the poem resonates with a universal theme: the struggle for the right to public space is inherently tied to broader contests over dignity, rights, and democracy. By capturing the essence of Sacaba's ordeal, the poem contributes to a deeper understanding of how public spaces can be catalysts for change, embodying the hopes, fears, and aspirations of a community yearning for a more just and equitable society.

Where it should always be

The day breaks with ominous sounds, and an atmosphere of foreboding fills the air. My dad talks about the earth sweating—an indication that the sun has deserted it. The suffocating atmosphere adds weight to his words as if it were preparing itself for what is about to happen. My dreams were haunted by a woman dressed in red, wearing a green blindfold and pursued by a fox. Her picture remains in my mind, an emblem of the fight we are going to have. Wake up my mother tells me; there is movement everywhere in town. I see a sign like “chilijchi” from my window, feeling like a chick sheltered but aware of dangers out there. The sky appears dangerous and birds are restless, signs that they will lose their freedom soon. Seeing Sacaba uplifts me; it is indeed hope amidst tension. I swear today I would fight for freedom, something that my family will always stand for regardless of what the day presents us with.

My family is sad; my mother combs my sister’s hair while my father says there won’t be any food today. The chuño is scarce, and his pockets are empty. The sheep are gone, and the children’s hunger is loud. The town suffers from shortages as trucks are blocked, so supplies can’t reach us. My father gives me a staff to carry, which symbolises our burdens. We will stand all day, waiting for the scorched earth beneath our feet to burn in testament to our resilience.

The dust-filled morning of that day. It feels like the atmosphere weighs down on us with the anticipation we have collectively built up in our hearts. Men with jaguar voices join us as families march behind them, together with others whose voices resemble those of ‘peccaries’ and ‘jucumaris’. Their presence both reassures and intimidates me as it reminds me of our collective strength. In this air hangs a fierce unity – that shared determination which keeps us bound together in one purpose: moving forward. Millions were mentioned by an old man but I see thousands of reasons to go ahead because every face in the crowd tells a story, represents some kind of struggle or embodies hope for a better future.

We are heading towards Huayllani bridge and its name grows louder inside me showing how important this journey really is. That is when I notice a baby's face peeking out from an aguayo, understanding for the first time that this fight is about everybody's family not just mine.

As we approach our destination, the streets are becoming wider. On Huayllani Bridge, a symbolic and literal place of crossing where we will congregate in our fight. Sacaba families and others from nearby communities wait for us. At the bridge, people begin to move slower before finally stopping there as a line of men blocks it off. These people stand in our way, making it impossible to enter into the town as stipulated by law. They stay silent while deafening their shields against begging. Our leaders hoped for a peaceful entrance that comes only with rumble of steel beasts.

The pressure builds up, and the crowd's noise gets louder. The foundation of this wall is laid by someone above who says we cannot pass through here. I hear whispers about "dangerous", and there can be seen guns that can take away our breaths. Tear gas rains down like seeds thrown from poison tree, causing disorder everywhere. The choking smell envelops the air with coughing voices filling it too; it is filled with acrid fumes that make people cough and scream in pain I catch sight of my father and mother among those present; my father's head is bleeding I pick him up and carry him towards safety just as an ambulance arrives at the scene. Sounds of sirens mixes with the noise around reminding us how dangerous this life has become.

My mother is relieved inside the ambulance, but it is an exhausting journey. She has tired and relieved signs on her face as she wars within herself about her emotions. My sister is scared but safe. Her wide eyes reflected the chaos and fear all around us, and I took refuge in a nearby building. The windows showed us what was happening outside. Hell is breaking loose out there. People are running, stumbling over the fallen. Stones and burning tyres fill the air. Crowd members counter white tear gas with black smoke. The scene outside depicts utter chaos that resembles a battlefield where hope clashed with despair.

I see my father's bloody skull amid all this noise and my mother crying helplessly, usually so strong, now with desperation in her voice. I raise my father up, telling mum that we will take him to hospital. The van takes him away while I stay and assist other people. There is so much smoke, violence but in the Whipala, our unity and hope lies. A new chant of courage fills the air as if reminding us how fearless we should be.

I go around offering assistance to anyone I can within the large crowd. To see such an evil: many were exhausted and fell or had their upper body wounded. Every face is narrating the story of a sufferer that speaks volumes of the barbarity of the day. I chance upon individuals jogging with despair and panic in their eyes. The green-uniformed men approach and rush further, contributing to the confusion and panic. Their presence is a constant and vivid threat that keeps reminding us of the power we are dealing with. Last night, I was able to follow the rest and seek comfort within a structure which is also home to the others. Cruelty and seeing people being beaten up and shot is shocking. In this role, I see police forces violently dealing with people who have no weapons in their hands. The sight evokes rather complex feelings of anger and helplessness within me.

Hernán, a man living with courage that I have met, suffers an injury. He looks like he is in turmoil, but the gleam in his eyes leave the door to hope wide open. I pick him up and go to the bushes, and his blood is all over my hands. It is as if the dress transforms into something warm and sticky, eliciting the brute force that was used in the day's work. He expresses himself with the use of 'whipala' and the significance of its symbolism.

These words are bitter-sweet to remind us the purpose of our being, or so the mashed potato man. The medical practitioners try their best to bring him back to life, as we move to the hospital, and I hope that he wakes up from that final disaster.

The hospital finally depicts a number of weak and agonising persons. The feelings that permeate the script are those of sadness and fury, sensations that seem to become an almost organic attachment to the characters.

My father is bandaged, and my mother shows care to him. The way she remains concerned for his welfare and cook for him when she is already weak, provokes feelings of compassion and motivation. A sense of sad and bitter emotion hovers in the air. After sunset, the pains and hardships we went through as we compete in our fight start to be felt. Tensions between the authorities and the population have escalated, people across the country are killed and injured. This is also evidenced by the presence of the Whipala, as we continue to struggle for our rights. The colors bring out the light against the dull gray of the day, reminding us that there is always hope and strength amid the struggle.

Steering Through Negotiations on the Self and the Surround. The Youth's Attempt at Navigating the Duality of the Urban and The Digital

Arryan Siingh

Balwantsheeth School of Architecture, India

siingharryan@gmail.com

Abstract

In 2021, youth in India amounted to 371.4 million, representing a 22.7% population share (Youth in India-2022 Ministry of Statistics and Implementation). The haphazard urbanisation occurring in a city like Mumbai has resulted in the creation and further development of slums. The Western outlook of urban development for a culturally rich and homogenous city like Mumbai has resulted in the “othering” of Youth. Spaces that are meant for the community are used to create commercial properties. The community is, in turn, squeezed into slum rehabilitation homes. One witnesses a slash and burn of various communities- the youth being a common target among these. The city has created an increase in voids with the absence of any human interaction, and hyperactive spaces have germinated with vehicular obstructions restricting pedestrian movement. With its dichotomies, the city has created a platform where physical conglomerations are considered loitering, while digital platforms have become virtual playgrounds for the transference of thoughts and ideas. For each member of the city's youth that lacks access to open space, there exist dozens who gather in these digital centres. We, therefore, notice an interesting dynamic in the city where digital evolution and accessibility surpasses one's physical existence in the urban fabric. There have been attempts at making spaces within this fabric that are accessible for play, education, and gathering. The digital connection grows stronger than the physical-spatial one. The youth still triumphantly evolve through these disconnected connections. It is either this or non-existence. This photo essay attempts to bring forward this tumultuous relationship between youth and the urban domain, of the privatised open spaces and the global digital stage. The youth in the city, and by extension, the country, attempt to navigate this duality.

Keywords: youth, public space, duality, self, surround, dichotomy, India

To cite this article:

Siingh, A. (2024) “Steering Through Negotiations of the Self and the Surround: The Youth's Attempt at Navigating the Duality of the Urban and The Digital”, *The Journal of Public Space*, 9(2), pp. 287–292. doi: 10.32891/jps.v9i2.1822.

This article has been peer reviewed and accepted for publication in *The Journal of Public Space*.



This work is licensed under a Creative Commons Attribution - Non Commercial 4.0 International License <https://creativecommons.org/licenses/by-nc/4.0/>



Figure 1. Gated open spaces. Credit: Siingh, 2024



Figure 2. Streets become community driven economic spillovers. Credit: Singh, 2024



Figure 3. Stark breaking of development between urban areas and the local community area.
Credit: Siingh, 2024



Figure 4. Streets are dynamic hubs but most often lack essential pause points. Credit: Siingh, 2024



Figure 5. One Green Mile- an urban public space intervention that allows education, play and interaction. Credits: Suleiman Merchant, 2024, with permission.

Thank you for reading!

The Journal of Public Space

ISSN 2206-9658

Diamond Open Access Journal

Founder and Editor in Chief

Dr Luisa Bravo

City Space Architecture

ITALY

<https://www.journalpublicspace.org>

Founder



Partner

