PUBLIC SPACE INVENTORY & ASSESSMENT

NAIROBI CITY COUNTY | KENYA **RECLAIMING THE GREEN CITY IN THE SUN**

DRAFT











UN®HABI FOR A BETTER URBAN FUTURE

Copyright © United Nations Human Settlements Programme (UN-Habitat) 2020

All rights reserved United Nations Human Settlements Programme (UN-Habitat) P.O. Box 30030 00100 Nairobi GPO KENYA Tel: 254-020-7623120 (Central Office) www.unhabitat.org

DISCLAIMER

The designations employed and the presentation of the material in this report 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 or its Governing Council.

Reference in this publication 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.

The methodology used in this report is based on the UN-Habitat's Global Public Space Programme City-wide public space inventory and assessment. UN-Habitat's City Prosperity Initiative uses the City Prosperity Index which is a sampling methodology and there is a difference in the data reported. The data is also based on time and day of the survey and may vary due to weather condition and user perception.

ACKNOWLEDGMENTS

The enthusiastic contribution of the data collectors, community mobilisers and the Nairobi City County Staff at both City Hall and the Sub-County levels in the gathering of data presented in this report. Special thanks to the Nairobi City County Administration for the support towards the public space programme and to SIDA for the generous financial support that made this project possible.

Programme Managers: Contributors UN-Habitat: Contributors NCCG & SNI: Analysis and GIS Support : Report Design and Layout: Cecilia Andersson, Patrick Analo Joy Mutai, Sofia Samur, Mitiku Woldesenbet & Mark Ojal Rose Muema, Elijah Agevi, Patrick Analo, Humphrey Otieno Joy Mutai, Wallace Mochu, Esther Njiru & Mark Ojal Mark Ojal

NAIROBI PUBLIC SPACE INVENTORY AND ASSESSMENT

Reclaiming the Green City in the Sun











FOREWORD



The past few months have seen Nairobi City County make great strides in becoming a pioneer for safe, inclusive and accessible green and public spaces among African cities. Public spaces are one of the chief priorities for the city, and it is not difficult to fathom why. They provide myriad social, economic, environmental, and public health benefits. Additionally, safe public spaces make for safer cities. Public spaces are crucial to the wellbeing of a city's residents, and therefore to the city's success. They are the lungs of the city. They help us breath, and scientifically, green environments make our built environment amenable and healthy. Green spaces help improve air quality and expunge toxins emitted by our environment. This is partly the reason why we are targeting at least 10 percent forest cover across the entire country by the year 2022. Within Nairobi, the restoration of Michuki Park, Uhuru Park, Jeevanjee Gardens, City Park, Central Park, Uhuru Gardens, Ngong' road Forest, Kamukunji Grounds, Jamhuri Park and the Arboretum is the first attempt at pushing this 'green renaissance'. By creating this park, we have started the process of re-birthing the soul of our great city of Nairobi.

Urban green spaces have never been appreciated by the public as they are now in this period of the COVID-19 pandemic. In fact, Kenya Forest Service continues to register a huge influx of people visiting urban forests and green spaces, mainly for recreation and reconnecting with nature. However, their value can only be fully realised if they are widely available, adequately distributed and accessible to the general population. As expressed by Enrique Peñalosa, the former Mayor of Bogota, the provision of high-quality public spaces for the city's poor and most vulnerable signals true democracy at work.

As we lead the green renaissance, we will shift focus to neighbourhood level green, and public spaces to connect neighbourhoods and open up informal settlements, taking the co-benefits of green and public spaces where they are needed the most. The presence of neighbourhood green, and public spaces including neighbourhood parks, forests and sports fields are important, especially in high-density neighbourhoods. They are places where community comes alive, where children learn to ride bicycles and engage in active play, where bonds among neighbours are strengthened and where a sense of belonging is fostered. In informal settlements, they serve as critical risk-reducing infrastructure – reducing the risk of flooding and spread of fires. They provide opportunities for informal vending, growing food and for play, enabling children to access the sun and engage in active play, in turn reducing the risk of vitamin D deficiency and child obesity.

Today, climate crisis and its effect on global water cycles is becoming a defining factor of the 21st century and will significantly impact not only the natural environment but human civilization as we know it. Cities and communities in fragile environments such as arid areas face complex challenges such as water scarcity, inadequate infrastructure, rapidly growing populations, and impacts on public health from the effects of urban heat islands. The imperative to invest in green infrastructure and nature-based solutions in these environments is clear. The initiative to reclaim and restore green, and public spaces across the city, and the country is part of a multi-agency effort to conserve green, and public spaces including nature reserves and forests, and make them accessible for use by the general public, both for recreation, ecological and livelihood opportunities.

This inventory is the first of its kind for Nairobi City County. It addresses the deficiency of information regarding the exact number of green and public spaces, and the state they are in. With the results detailed in this report, the city county can now proceed to develop an evidence-based strategy and policy for the protection, revitalization, creation, management and enjoyment of public spaces, and restoration of the city image as the 'Green City in the Sun'. Together with the Nairobi Integrated Urban Development Master Plan (NIUPLAN), this strategy will chart a way forward for Nairobi's green, and public spaces. Emphasis will be made on the equal distribution of high-quality green, and public open spaces. The Ministry of Environment and Forestry's commitment to improve green, and public spaces parallels the long overdue urban reform that Nairobi is currently undergoing.

As we grapple with old and new challenges in a rapidly urbanizing world, this timely report can help inform research, policy dialogue and action towards the restoration of green, and public spaces in Nairobi city county for years to come. I recommend its findings to all who are working to create the just, green and dynamic environments that Nairobi residents need to thrive.

Hon. Keriako Tobiko, CBS SC

Cabinet Secretary, Ministry of Environment and Forestry

Global agreements including the Sustainable Development Goals and the New Urban Agenda and emphasize the strategic role of green, and public spaces as a connective matrix on which sustainable cities and communities must grow, embracing the essential requirements of being welcoming, vibrant, diverse, safe and accessible for everyone, and especially the most vulnerable members of the society. Goal 11.7 specifically calls on governments to provide universal access to safe, inclusive and accessible, green and public spaces, in particular, for women and children, older persons and persons with disabilities by 2030.

Public space is a critical infrastructure in cities and human settlements, especially in the age of unprecedented crises, concentrated urban poverty, rising burden of disease, high inequalities and increasing civil unrests. Investing in green, and public spaces can help mitigate climate risks. The multiple benefits of public space in cities are well documented. They include improved mobility and access to basic services, safer and crime-free environment, stimulation of economic activity including urban tourism, and acting as catalysts of urban regeneration and social inclusion. By supporting walking and cycling, public space has a direct impact on the general health and wellbeing of the population. In low income communities and informal settlements, green and public spaces are shared living spaces - where civic programs for residents are hosted, livelihoods are conducted, young people showcase their skills and talents, women and youth sell household products, families grow their food, and children and young people engage in play, and active and healthy recreation. They are also an important symbol of identity, community and dignity, inspiring a sense of belonging and pride. All over the world, and in Nairobi in particular, we see more and more communities coming together to reclaim, upgrade and protect public spaces as a shared community asset.

Their multiple co-benefits notwithstanding, the value of green, and public spaces is often overlooked or underestimated, especially in fast-growing cities like Nairobi. This is could be due in part to a lack of understanding of the value of public spaces and the absence of capacity to conduct city-wide public space assessments. Of course, these factors are compounded by competing policy priorities and shrinking public resources.

The COVID-19 pandemic has been a timely reminder that public space is a basic risk-reducing infrastructure, an essential urban service, and an important 'third place', especially in times of crisis. These neutral venues are largely free from the domestic pressures of the home (first place) and the economic pressures of the office (second place). Overtime, they have served as essential building

blocks of community. The pandemic has exposed critical gaps in the accessibility, flexibility, design, management and maintenance, connectivity and equitable distribution of green and public spaces in Nairobi. The influx of people into such public spaces as Karura Forest, Michuki Memorial Park, and Arboretum is a manifestation of the demand for green, and public spaces and is also a wakeup call to improve the accessibility and distribution across the urban divide. These elements need to be addressed incrementally in order to improve health equity across the city, help the city build back better and future-proof itself and its citizens.

UN-Habitat works to support the recognition and enhancement of public space as critical urban asset since 2012. This landmark report on the state of public open spaces in Nairobi City County has been developed by our Global Public Space Programme as a first inventory to provide residents and decision maker with essential documentation. It provides a starting point to develop an evidence-based strategy and policy for the protection, revitalization, creation, management and enjoyment of public spaces, and restoration of the city image as the 'Green City in the Sun'. The report calls for strategic and targeted actions including protecting and revitalizing existing green, and public spaces especially at the neighbourhood level as they are most at risk of illegal misappropriation, embracing innovative Public, Private and People Partnerships, enhancing institutional capacity and building competency on green and public spaces not only provide citizens with respite from the pressures of urban living, they can be opportunities for city managers to make the city more attractive to investments and talent. I strongly urge the involvement of citizens in the development of public spaces to promote the 4Ps - public, private and people partnerships! Only then can these initiatives be sustainable and be truly inclusive.

I encourage practitioners, policy makers, civil society and community leaders across the city county to adopt and use the findings and recommendations contained in the report, to make Nairobi a destination of choice to work, play and invest.

Ms. Maimunah Mohd Sharif,

Under-Secretary-General of the United Nations and Executive Director, UN-Habitat



CONTENTS

BACKGROUND	
BACKGROUND	
WHY PUBLIC SPACES: A CASE FOR PUBLIC SPACE IN NAIROBI10	
CLASSIFICATION OF PUBLIC SPACES	
UN-HABITAT'S GLOBAL PUBLIC SPACE PROGRAMME15	
UN-HABITAT AND NAIROBI16	
THE CHALLENGE	
OBJECTIVES AND APPROACH	
NAIROBI IN SPACE AND TIME	
NAIROBI CITY IN CONTEXT	
A HISTORICAL PERSPECTIVE OF PUBLIC SPACES IN NAIROBI	
POLICY, LEGAL AND REGULATORY FRAMEWORK ON PUBLIC SPACES	
STATE OF PUBLIC OPEN SPACES	
TYPOLOGIES OF PUBLIC OPEN SPACES	
QUANTITY AND DISTRIBUTION	
ACCESSIBILITY AND INCLUSIVENESS	
DIVERSITY OF USERS	
CUSTODIANSHIP AND MANAGEMENT	
COMFORT IN PUBLIC SPACES	
ACTIVITIES AND USES	
LANDSCAPE FURNITURE AND AMENITIES 54	

ENVISIONING PUBLIC SPACE IN NAIROBI

RECOMMENDATIONS	
WAY FORWARD	
ANNEXES AND REFERENCES	•
LIST OF PUBLIC SPACES	
REFERENCES	

60

OPERATIONAL DEFINITIONS

Amenity Green Space

Most commonly found in residential areas and as part of urban infrastructure such as arterial interchanges, amenity green spaces are open spaces, often landscaped, that make a positive contribution to the appearance of an area or improves the quality of the lives of people living or working within a locality. It often provides opportunities for informal recreation and can serve other purposes such as landscaping and reducing the noise from a busy road or providing shelter from prevailing winds.

Built up area

This is the contiguous part of a city occupied by buildings and other impervious surfaces. However, built up area as used in the indicator denominator means the same thing as the functional city area.

Amenity zone

A non-statutory land use zone for areas of incidental green space which are landscaped for amenity, visual or buffer purposes, but have no potential for recreation use.

Mono-functional spaces

Spaces that are limited to only one activity.

Multi-functional spaces

Spaces that are used for different types of activities at different times of the day.

Perception of safety

A generalized judgment about the chance of crime. Different times of day, and physical location may affect perceptions of safety.

Pluri-funtional spaces

Spaces with different kinds of activities at the same time.

Public space

All places publicly owned or of public use, accessible and enjoyable by all for free and without a profit motive. UN-Habitat categorizes public spaces into streets, public open spaces, and public facilities.

Semi-private open spaces

Urban open spaces where accessibility and use are limited to a few people, and the general public is generally unwelcome. Classic examples include courtyards to house or flats, communal spaces and playgrounds in residential estates.

Semi-public open spaces

Urban open spaces that the general public have generally limited access, and might be expressly accessible to particular groups in society, and when open to the general public, the opening time may be limited. These include school playgrounds, golf courses, and membership sports clubs among others.

Potential public space

An open space that is used by the public or that can be used by the public for enjoyment but is not designated as such as at the time of the survey.

Public open space

Urban open spaces that all citizens regardless of socio-economic status, religion and gender have access to enjoy. This includes squares, playgrounds, parks, nature reserves, historically-significant cemeteries and urban forests.

Riparian reserve

A vegetated strip of land adjoining a water body.



GLOSSARY

ArcGIS:	Arc Geographic Information System
BRT:	Bus Rapid Transit
CABE:	Commission for Architecture and Built Environment
CBO:	Community Based Organisation
CSO:	Civil Society Organisation
CPTED:	Crime Prevention Through Environmental Design
ETH Basel:	Swiss Federal Institute of Technology in Basel
FBO:	Faith Based Organisation
GIS:	Geographic Information System
G.o.K:	Government of Kenya
GPS:	Global Positioning System
INGO:	International Non-Governmental Organisation
KDI:	Kounkuey Design Initiative
KFS:	Kenya Forest Service
KUR:	Kenya Uganda Railway
NCCG:	Nairobi City County Government
NGO:	Non-Governmental Organisation
NIUPLAN:	Nairobi Integrated Urban Development Masterplan
NMC:	Nairobi Municipal Community
NMR:	Nairobi Metropolitan Region
NMS:	Nairobi Metropolitan Services
NMT:	Non-Motorised Transport
NRBP:	Nairobi River Basin Program
PGS:	Public Green Spaces
ROW:	Right of Way
SDG:	Sustainable Development Goal
SNI	Safer Nairobi Initiative
UN-Habitat:	United Nations Human Settlements Program

- 1. RESTORE NAIROBI'S PLACE AS THE GREEN CITY IN THE SUN. Well-designed public spaces raise the visual landscape value and contribute to the overall environmental aesthetics, in turn positively impacting on the overall image of the city. Besides being an element of beauty in a crowded scene, public space gives users a pleasant break and a chance to escape from the pressures of the city. Use public spaces as a tool for urban transformation.
- 2. LEVERAGE QUALITY PUBLIC SPACES AS A BRANDING AND MARKETING TOOL FOR THE CITY, As Nairobi seeks to establish itself as world-class African metropolis and position itself as the best business destination and attract investment, the presence of high quality public spaces become a critical marketing tool. Experience shows that corporates are attracted to locations offering well designed and well managed public spaces.
- 3. TRANSFORM POTENTIAL PUBLIC SPACES INTO WELCOMING PEOPLE-PLACES. Using a mix of good design, social programming interventions, and a well-functioning management framework, transform public spaces like Ngong Forest, disused quarries and landfills, and infrastructure Rights of Way to promote their use and enjoyment as public spaces.
- 4. ANCHOR PUBLIC SPACE IN NORMATIVE PROGRAMS OF THE CITY. In order to systematically and sustainably finance, manage and monitor the creation, protection and upgrading of public spaces, it is imperative that the idea of public space is anchored at the core of urban planning, air quality and wider climate action, urban regeneration, slum upgrading and regeneration of Nairobi river.
- 5. ENHANCE CAPACITY AND KNOWLEDGE ON URBAN DESIGN AND PUBLIC SPACE. Strengthen the capacity of the directorate of urban design and open space management both financially and human resource-wise and consolidate all public space related programs, initiatives, projects and activities spanning different sectors. In addition, widen the scope of the directorate to include research on new innovations, design, implementation of public space reclamation and revitalisation interventions, and maintenance.
- 6. FACILITATE ACCESSIBILITY, INCLUSIVENESS AND SAFETY OF PUBLIC SPACES. Through an elaborate legal framework, policies and partnerships with various actors, legislate and promote governance and management models that foster social inclusivity, accessibility and safety of public spaces while maintaining the quality of the services therein.
- 7. EXPLORE AND CULTIVATE INNOVATIVE PARTNERSHIPS AROUND PUBLIC SPACE. Strengthen partnerships and collaborations with the academia, professional bodies, research institutions and the private sector among others to provide design, management and programming solutions for the city's public spaces by incorporating the public space agenda in their curricula.

8. EXPLORE AND CULTIVATE INNOVATIVE PARTNERSHIPS AROUND PUBLIC SPACE. Strengthen partnerships and collaborations with the academia, professional bodies, research institutions and the private sector among others to provide design, management and programming solutions for the city's public spaces by incorporating the public space agenda in their curricula.

- amount of urban land used and experienced as public spaces currently standing at 3030 Ha, the NMS in collaboration with other national government agencies such as the National Lands Commission should urgently initiate an in-depth audit of all lands in the city county to establish the ownership of public spaces.
- and negotiations, heighten the awareness of the political leadership and policy makers on the need and importance of public, and green spaces hence facilitate creation, protection and management of public spaces.

11. REVIEW REGULATIONS AND GUIDELINES FOR PUBLIC SPACES. Ensure that laid down rules and regulations governing the design, implementation, management and maintenance of public spaces facilitate the participation of non-state actors, and that they do not create unnecessary barriers to the participation of potential partners.

KEY MESSAGES

9. RECLAIM AND RECOVER LAND ORIGINALLY DESIGNATED AS PUBLIC OPEN SPACE. With the

10. BUILD AND CULTIVATE POLITICAL WILL TOWARDS PUBLIC SPACE. Through evidence-based research



BACKGROUND

- Why Public spaces: A case for public space in Nairobi
- UN-Habitat's Public Space Programme
- UN-Habitat and Nairobi
- Scope and Focus
- Objectives and Approach

Page **11**

BACKGROUND

Quality of urban life is essential for cities to prosper. Cities that improve quality of life for its citizens experience higher levels of prosperity and are likely to find themselves more advanced in terms of sustainability. Such cities strive towards social equity by generalizing access to urban commons and public goods, preventing private appropriation and expanding the scope for improved quality of life for all. Cities that re-evaluate their notion of the 'public' and provide green areas, parks, recreation facilities and other public spaces demonstrate a commitment to improved quality of life. The liveliness and continuous use of public space as a public good leads to urban environment that is well-maintained and safe, making the city an attractive place to live, work and play.

Quality of life in both urban and rural areas depends on the availability of, and accessibility to social amenities. As such, high quality public spaces represent an indicator of improved standards of urban life for all citizens, and springboards for revitalizing communities. Globally, scholars, practitioners, policy makers and civil society actors are increasingly recognising and appreciating the fact that pleasant, vibrant and well-functioning public spaces can spur economic growth - from a small rural town to a big city. Public space provides a common platform through which city authorities, diverse groups including NGOs, CBOs, the business community, academia and various government and intergovernmental agencies can collaborate and critically engage through a democratic process for sustainable development (Ministry of Housing, 2012).

Quality public spaces are an entry point to improve the standards of urban life for all citizens. There is a need for public space to be created, protected and managed as well as re-constructed, re-used and re-understood in the context of sustainable urban development. This process in turn requires that systems of planning, management and governance become highly integrated, addressing the city as a whole, allowing the needs of different groups and actors in the city to participate in the decision-making processes related to the planning, management and governance of public spaces.

Public spaces are all places that are publicly owned or of public use, accessible and enjoyable for all for free and without a profit motive (Charter of Public Spaces).

Kenya on the other hand does not have an agreed national definition for public space. There are however a variety of national laws that attempt to provide working definitions that define their scope of work. The National Museums and Heritage Act Cap 216, for example, defines Open Space as "an open space not built upon in any urban or peri-urban area whether in a municipality or not to which the public has access and which may be used for parks, gardens, recreation grounds or any other use whatsoever (GoK, 2009).

Internationally, a milestone was achieved in 2015 with the adoption of public space as an indicator for SDG 11.7: "By 2030, provide universal access to safe, inclusive and accessible, green and public spaces, in particular for women and children, older persons and persons with disabilities".

"Public spaces are all places publicly owned or of public use, accessible and enjoyable by all for free and without a profit motive." (Charter of Public Spaces)

This is a call to action for cities, local and national governments to invest in green and public spaces. The New Urban Agenda on the other hand provides an opportunity to reflect and learn from past mistakes in urban planning, redirect the urban development trajectory, and integrate not only health and wellbeing, but also environment, social inclusion, and human development in the planning, design and management of cities and human settlements. It provides guidelines for sustainable urban development and sets out the role of urban planning and design in achieving broader health outcomes. In the spirit of the new urban agenda, cities and local governments are encouraged to take trans-disciplinary and multi-pronged approaches, and work in partnership with diverse stakeholders and organizations to ensure adequate provision of inclusive, safe and accessible public spaces for all.



Uhuru Park © UN-Habitat/Mark Oja

"By 2030, provide universal access to safe, inclusive and accessible, green and public spaces, in particular for women and children, older persons and persons with disabilities" (Sustainable Development Goal 11.7)

WHY PUBLIC SPACES: A CASE FOR INVESTING IN PUBLIC SPACE IN NAIROBI

PUBLIC SPACES ARE AN INSTRUMENT OF URBAN PUBLIC SPACES ARE AN ENTRY POINT FOR HOLISTIC URBAN (RE)DEVELOPMENT **TRANSFORMATION**

Globally, there are classic examples of how public spaces have catalyzed citywide urban revitalization programs. In Lahore for example, improving public spaces as part of the restoration of the old city has seen families enjoy a higher quality of life, businesses get higher turnovers and the city experience a renaissance in civic participation and pride. Experience from Lahore is evidence that when deployed with intelligence, care and courage, public spaces can turn around cities and human settlements (Sangmoo, 2015). In Singapore, capitalizing on the Singapore River's historical significance and potential for redevelopment, the government launched a transformational program that preserved cultural heritage, improved the environment, and opened the area for recreational and pedestrian use (World bank, 2016). This has had a ripple effect in the entire city and revived the river system as the new commercial lifeline of the city.

PUBLIC SPACES RAISE THE COMPETITIVENESS AND LIVEABILITY OF CITIES AND TOWNS

In an increasingly competitive global economy, cities globally are branding themselves as the most competitive and livable destinations. Research and experience show that a city's wealth of urban amenities are a key determinant of its growth and competitiveness. London and Vancouver for example, continue to attract new talent and skilled personnel despite their comparatively low incomes and high housing prices. This is largely attributed to the quality of life they offer their residents, and especially the quality of their built environment.

According to the Vancouver Economic Development Commission for the Business Council of BC's "Outlook 2020", successfully retaining talent is dependent on providing an exciting, safe and welcoming environment. It further emphasizes that this can only be achieved by continuous innovation in public spaces, moving to a less car-dominated mobility system, prioritizing urban safety and security, introducing greater wireless capacity and other technological advances, and finding more ways to reflect the region's unique historical heritage.

Public space is the essence of the 'urban advantage'. It is crucial for sustaining the productivity of cities, their social cohesion and inclusion, their civic identity, and their quality of life. It offers a holistic view of the city, including social inclusion, governance, legislation, health, safety, education, climate change, transport and the urban economy. It is an infrastructure of opportunity that can help address nearly every critical urban need, from health to urban regeneration, environmental justice, managing sprawl and fostering social inclusion, and preventing crime and violence. A case in point is Medellin, Colombia. Marred by high rates of homicide and gang violence, Medellin, the second largest city in Colombia, implemented

the design of public spaces and mobility infrastructure among other urban basic services interventions to address the issue of crime, gang violence and inequality and connect the more marginalized areas to the city. Collectively, these have propelled the city to become one of the most attractive business destinations in Latin America. The city is currently implementing a new greenbelt project that integrates housing, urban agriculture, recreation opportunities, provision of basic services like mobility through the cable car and sanitation services. Once complete, the 74 KM project along the mountain ridges is expected to raise the per capita public space from 4 square metres in 2014 to 15 square metres in 2030.



CLASSIFICATION OF PUBLIC SPACES

Public spaces can be categorized variously. For the purposes of this study, they were classified from a user's point of view, based on the proximity of home, and it suggests three social levels: familiarity, sociability and anonymity as discussed by (Woolley, 2003). They were classified into city, neighbourhood and block level public spaces.

LINEAR PUBLIC SPACE

Linear public spaces span different neighbourhoods and in some cases, could double up as both neighbourhood and city level public spaces. They have a great visual impact on individuals and can reduce stress levels especially when walking, cycling, jogging or even when using public transport. According to (Parsons, et al., 1998) nature-dominated views increase the ability to recover from stress and increase the ability to cope with stress. They observe that people are less stressed by the experience of a more natural view than by the view of the urban landscape. When designing new transportation infrastructure (walking and cycling corridors), riverfronts, dams and water treatment ponds, both functional and visual demands of the infrastructure need to be considered. They can act as a sustainable drainage system, temperature moderators, cooling corridors and wind breakers. Linear public spaces can also significantly support biodiversity conservation (Spellerberg & Gaywood, 1993) and mental and physical health.





CITY LEVEL PUBLIC SPACES

City level public spaces are spaces which are located at strategic places within the city. Socially, they are places where one is likely to meet people from different parts of the city, and from different social, economic and political backgrounds.

More often than not, these spaces are located far from where the majority of the daily users live. As such, using and experiencing them requires a deliberate effort. Popular typologies include urban forests, nature reserves, city parks, town squares, historically significant cemeteries and riverfronts.

NEIGHBOURHOOD PUBLIC SPACES

Neighbourhood public spaces are spaces which are physically not directly related to the home but are used by the whole neighbourhood or community. Socially, neighbourhood open public spaces are used and experienced by people who live and work within the vicinity of the space.

Popular typologies include: sports fields, sports grounds, parks, community gardens, riverfronts, waterfalls, and playgrounds among others. Opportunities for children to play and engage in both active and passive recreation should be plentiful in neighbourhood public spaces.

BLOCK LEVEL PUBLIC SPACES

Block level spaces are public spaces physically most associated with the home, and are mainly used and experienced by family, friends and neighbours. Popular typologies of local/domestic open public spaces (or community spaces) include court yards, basketball courts, community gardens. They may be associated with a group of family houses or blocks of residential units.

Given that access to the block level public spaces is limited to local residents, they are considered to be semi-public spaces. For the purposes of the inventory however, these spaces were mapped and analyzed as they provide play opportunities for children.







Block level public spaces

Neighbourhood public spaces

City level public spaces

UN-HABITAT'S GLOBAL PUBLIC SPACE PROGRAMME

Launched in 2012 and currently active in around 40 countries, UN-Habitat's Global Public Space Programme aims to improve the quality of public spaces worldwide. Despite a recent tendency to overlook and undervalue them, public spaces are again being recognised by cities as a key element of inclusion and sustainability. UN-Habitat adopts a definition of public spaces as sites that are accessible and enjoyable by all without a profit motive and take on various spatial forms, including parks, streets, sidewalks, markets and playgrounds.

Good public spaces enhance community cohesion and promote health, happiness and well-being for all citizens. The Programme helps cities become more sustainable by providing policy advice, capacity building, knowledge sharing and support for public space regeneration and improvement. More concretely, it maps public spaces and works with cities to develop city-wide public space strategies and urban development frameworks. Good policies and practices are shared through its global network of around 100 partner organizations.

CITY-WIDE PUBLIC SPACE INVENTORY AND ASSESSMENT





THE PUBLIC SPACE ASSESSMENT

UN-Habitat supports cities to carry out comprehensive city-wide inventory and assessment of public spaces to enable city leaders know where they are. This enables them to understand the gaps and allocate funding towards creating more pubic space in communities that have no access and to the management of the spaces that exist, set goals and develop strategies to meet the demand for safe, inclusive and accessible public spaces.



CAPACITY BUILDING & TRAINING

UN-Habitat works towards institutionalizing public space in the normative work of partner organizations and cities, promoting a policy approach, developing tools and indicators, and carrying out capacity building to enhance the capacity of partner cities to create, protect and manage public spaces.

PUBLIC SPACE UPGRADING

Each year, UN-Habitat supports a number of public spaces upgrading projects through an annual call for expression of interest. The spaces are geographically distributed all over the world, but with a main focus on countries in the global south. The upgrading of the public spaces is done in a participatory manner engaging the community and the users.

TECHNOLOGY

UN-Habitat recognizes the role of ICT and the opportunities that it can offer for citizens, particularly children and youth, to take part in urban planning and design processes. The Programme uses technologies such as Kobo Toolbox for mapping spaces and the Minecraft video game as a participatory tool for upgrading public spaces.

16

POLICIES

UN-Habitat supports national governments to mainstream public space in National Urban Policies as well as local governments in developing local public space frameworks, and strategies. This is to enable cities harness the benefits of city level public space policies & to deepen their understanding of their roles and responsibilities in the provision, protection & enjoyment of public spaces.



UN-Habitat has developed an integrated approach to public space that covers cities, neighbourhoods and individual sites and applies a targeted approach to each scale. The iterative process includes tools, methodologies and practices to support local governments and community and civil society organizations to make public spaces safer, more inclusive, accessible and sustainable. The tools include city-wide and site-specific assessments, design principles, strategies and policies, digital participation and action planning and monitoring.

The city-wide public space assessment is a digital tool that uses a structured questionnaire that can be modified to fit any context as well as assess the priorities for any city. It utilises the free open source App. called Kobo Collect. It is a fast and effective tool for data collection as it minimises enumeration errors and is a holistic tool for data collection process from data collection, to analysis and design. This assessment helps in identifying needs or substantive areas to address in the city, but also how the process can align with other ongoing or planned processes. This is to identify areas of possible synergies and the identification of institutions, organizations, agencies and other municipal departments as potential stakeholders or collaborating partners. In addition to identifying key blueprints and documents, initiatives and potential partners, key issues of the existing planning frameworks should be mapped and analysed. The tool helps to answer the question "where are we?" in the realm of public space. The baseline survey provides recommendations on public space interventions in the city.

UN-HABITAT AND NAIROBI

Since 2001, UN-Habitat has been working closely with Nairobi City to improve the quality of life, urban governance and urban safety in the city. The Safer Nairobi Initiative has supported the city in developing a city-wide crime prevention strategy which was adopted in 2005. Progressively, the city safety strategy has shifted its main concern from reducing measurements of crime and violence to improving the quality of life where a holistic approach to "urban safety" is advanced. One of the four pillars of the city-wide crime prevention strategy focuses on the design and management of public space.

Building on the Safer Nairobi Initiative, UN-Habitat has been working with City County of Nairobi on the issue of public space, place making and quality of life. In 2012, the agency signed an agreement of cooperation with the then Nairobi City Council to develop a city-wide strategy on public space, to build the capacity of both City Council staff and civil society partners, and to work on at least two pilot projects in order to demonstrate participatory and integrated public space development approaches.

UN-Habitat has also supported the Nairobi City County and a network of civil society partners to organise Placemaking Week Nairobi, a week-long event held annually to celebrate Nairobi's public spaces and the community-led activities that are revolutionising the use and experience of public spaces, streets and the city at large. This is essentially to raise the profile of public spaces and the status of people who use them. The event seeks:

- To activate public spaces and streets through a variety of low cost high impact interventions, including coordinated pop-up activities;
- To celebrate Nairobi's public spaces and streets, raise their profile & create awareness about their importance;
- To promote cross-sector dialogue about quality of life in the city, and foster partnerships and collaborations for our public spaces; and
- To advocate for a healthier, safer, and more inclusive and vibrant city through safe, walk-able and pedestrian-oriented streets, with a focus on downtown Nairobi.



People sit at Jeevanjee Gardens during lunch break © Mark Ojal

COMPONENTS OF THE NAIROBI PUBLIC SPACE PROJECT IMPLEMENTATION

Public space pilot initiatives – a safety audit identified Jeevanjee Gardens as one of the most unsafe places in the central business district where the crime prevention assessment showed that areas like Korogocho, Dandora and Kayole among others were considered to be the most unsafe and was therefore selected as one of the pilot sites. The second site is a street block at Dandora, also a neighbourhood infamous for its high crime rates. The Dandora site, a model street was completed in 2017 while on Jeevanjee Gardens, two phases remain to fully realize the vision of the revitalization vision and masterplan.

Capacity building of the City County staff and partners on the design, implementation and management of safe, inclusive and accessible public spaces. Through participatory processes such as minecraft and continuous engagement on placemaking and public space upgrading competitions, UN-Habitat has supported the enhancement of the City County's competency to co-create public spaces with people at the centre of the process.

Development of a citywide strategy on public space, based on the results of the city-wide assessment of open public space in the city. UN-Habitat seeks to advance the gains and momentum generated through previous engagements with both the county government and civil society partners to support the city in developing a citywide strategy for public space and an overarching policy that can guide creation, protection, revitalisation and enjoyment of public spaces in Nairobi.

TOWARDS SAFE, INCLUSIVE AND ACCESSIBLE PUBLIC SPACES IN NAIROBI



Development of citywide public space strategy, policy and bill to mainstream public space in normative programs of the city



THE CHALLENGE



City Hall, Nairobi © Ting Chen/Wikipedia

High quality and pleasant public spaces are central to the realization of a world class working, living and business environment. They provide a high quality of life for residents and visitors alike, attracting investments and highly skilled personnel. Nairobi was for a long time affectionately referred to as the 'Green City in the Sun'. It prided itself as a city with a vast network of green and public spaces, where nature and concrete blended seamlessly.

Despite the invaluable and often unparalleled role that public spaces play in a city, particularly in city centers and residential neighbourhoods, they are often threatened by urban development pressures, and as land continues to become scarcer, public spaces become soft targets for infill development. Moreover, the dramatic growth of the city in size, numbers and complexities has had major impacts on existing public spaces. The impacts are manifested variously in the form of overcrowding in major recreational areas like Uhuru Park, the Sunken Car Park and other neighbourhood parks, and the conversion of existing public spaces to other development purposes often assumed to be more economically viable (Obudho, 1997). Moreover, both the Nairobi City County Government and the Nairobi Metropolitan Service do not have an up-to-date database of public open spaces within their respective jurisdictions. In addition, the COVID-19 pandemic has drastically impacted public life and how we live in cities, the impacts continue to be felt in different sectors and especially in congested residential areas.

Public space has emerged as a critical lifeline for cities and their residents. It has proven to be a timeless risk-reducing infrastructure, an essential urban service and an infrastructure of opportunity especially in times of crisis, in this case, the COVID-19 pandemic. In the same context however, the pandemic has exposed critical gaps insofar as accessibility, flexibility, design, management and maintenance, connectivity and equitable distribution of public space in cities is concerned. These need to be addressed incrementally in order to improve health equity and future the city. Without adequate knowledge of the public space ecosystem and their current state, the city may not be able to adequately address the multiplicity of risks and challenges it is facing. As a result, the inner city neighbourhoods will degenerate even more and many people will desert the city for the suburbs in search for better quality of life. Therefore, the city county and the Nairobi Metropolitan Service in collaboration with line ministries need to carry out a comprehensive inventory and assessment of all public spaces in the city and the metropolitan area in order to take stock of existing assets and understand gaps.

The study was confined to the officially defined boundaries of Nairobi City County with the exemption of the Nairobi National Park. Though an important urban open space, the National Park is largely considered to be a special planning area and not a public space that one can freely access, use and experience at any time. Moreover, access to the National Park generally costs 150 shillings per person for the Safari walk and 300 shillings to get into the park, excluding the vehicle entry fees. As (Ikawa, 2015) observes, this makes the National Park become a preserve for tourists and a few privileged citizens.

With the understanding that public space is a wide and dynamic topic with various definitions and classifications: public facilities, public open spaces, and streets, the survey focused on public open spaces. This was primarily to allow a more focused study and understanding of Nairobi's public space system. The analysis was conducted on two scales: at an overall city scale where spatial location and distribution, and accessibility were analysed. At this scale, the total supply of both public open spaces and public green spaces in Nairobi City County were calculated. The other scale involved individual public spaces where variables of accessibility, activities and uses, comfort, physical attributes and vegetation at the site scale were studied. The questions of custodianship and management, safety and inclusivity issues were also explored.

"The measure of any great civilisation is its cities and a measure of a city's greatness is to be found in the quality of its public spaces, its parks and squares."

~ John Ruskin

OBJECTIVES AND APPROACH

OBJECTIVES OF THE PUBLIC SPACE ASSESSMENT IN NAIROBI

PRE-FIELDWORK PREPARATION

The inventory and assessment of public spaces in Nairobi was carried out with an aim to:



Investigate the Accessibility of the public spaces in the city county.

Understand the Distribution of public spaces in the city county.

Understand the Network of the public spaces in the city county.

Assess the Quality of the public spaces in the city county (Access, Use, Comfort, Facilities, Safety and sensory elements).

Establish the Quantity of public spaces in the city county

LITERATURE REVIEW

The survey team carried out critical review of literature before embarking on data collection. This included a critical analysis of policy documents, academic reports and conference papers among other literature that contributed to better understanding of the policy and historical context of Public Open Spaces in Nairobi City.



Reporting forms were also prepared to help validate the ownership of the spaces. These were counter signed by Sub-County data collectors, verified by ward administrators and approved by the Sub-County administrators respectively.

PREPARATION OF SURVEY TOOLS

Structured questionnaires were formulated to guide the classification and analysis of public spaces. These were modeled into a collection of 170 questions all together. The questionnaire was then uploaded into the Kobo toolbox application where they were made accessible to surveyors.

In addition to the questionnaires, maps were developed to aid the definition the boundaries of the spaces on the ground. These were prepared with a key map, and to a scale that enabled the surveyors to navigate the local landscape and draw the boundary of the space as it was at the time of the survey.

MOBILIZING THE SURVEY TEAM

Different categories of people were mobilized to carry out the survey. These included:

University students: A multidisciplinary team of (25+) university students drawn from the Technical University of Kenya, the University of Nairobi and Jomo Kenyatta University of Agriculture and Technology was put together to carry out the exercise. The team was made up of individuals drawn from diverse academic backgrounds including Architecture, Landscape Architecture, Urban design and Urban Planning. Preference was made to the above academic backgrounds because of their knowledge of the built environment, and public spaces.

Sub-County staff: These were led by Sub-County administrators and ward administrators who provided data collectors to accompany the surveyors to the field. This was aimed at building their capacity in identifying public spaces.

The community people: Locals included diverse groups of people including youth, women and the elderly. These were individuals who were perceived to command a certain degree of influence in their neighbourhood and were conversant with the local terrain and security situation. Their main purpose was to provide local knowledge regarding safety and security particularly for the surveyors.

These three different categories of people were teamed up to form a survey team.

TRAINING SESSIONS

A total of thirteen (13) workshops and training sessions were held to give a better understanding of the task ahead. These were held both at the Sub-County offices and at City Hall. The training was administered to 75 data collectors, 83 ward administrators, 97 community people, and 52 students and 15 Sub-County administrators.

The trainings were divided into two main parts and were aimed at accomplishing two main tasks: Practical training on the assessment of a site, and the use of the data collection tools. The training on data collection tools focused on the Kobo toolbox, how it works, and how to respond to every question. This included tricks on how to minimize the time taken to fill one questionnaire.

There were also practical trainings on how to configure and set up Kobo toolbox on the surveyors' cellphones. These were followed by practical discussions of the questions, and were supported by a practical test of the application often carried out in adjacent open spaces.







DATA COLLECTION QUALITY CHECK AND DATA CLEANING



DATA COLLECTION

The data collectors (mainly university students) were paired with community members to reduce insecurity and support with local knowledge. The questionnaire included different methods to harness data required for reliable assessment of public spaces:

A) Observations: This was the main method for data collection. It involved unobtrusive observation of the activities, the physical attributes and presence of anything that stood out;

B) Photos: minimum of three photos were mandatory to finalize the form;

C) Sound Measurement: the surveyors were able to reflect the noise levels through voice recording tab that is an indication of comfort level of the public space;

D) Semi-Structured Interviews: to assess the safety from the users' perspectives, the surveyors interviewed users of the spaces.

To facilitate the fieldwork and make sure that the exercise was fool-proof, each data collector received assigned field log/form and a printed aerial imagery of the targeted neighborhoods.



In addition, some data collectors were harassed in some certain neighbourhoods. This challenge was immediately communicated to the Safer Nairobi Initiative, who did immediate coordination with all community representative committees and mobilized community leaders to accompany students to the field. The task worked very smoothly afterwards.

$\mathbf{\hat{}}$

CHALLENGES AND MITIGATION MEASURES

During first the data collection, some data collectors were denied entry into some institutions for lack of proper identification. As a result, the City County Government wrote letters of introduction and while UN-Habitat provided temporary badges for the student data collectors.

DATA CLEANING

As would be expected of any research, the collected data was cleaned before the database could be updated, and data analysis done. The cleaning was done in various stages and involved deleting multiple entries made for the same public space, deleting the semi-private open spaces, and deleting open spaces which were perceived to be private properties. Out of the total 4597 data entries, 2598 of them were found to be either repeated entries, streets, schools, churches and other government premises, and incidental open spaces (spaces between buildings or front yards in residential estates); and 1167 of them were found to be semi-private open spaces.





UPDATING GIS MAP

GIS updating was done before any spatial analysis could be done. This involved tracing the shapes of the surveyed public spaces and coding them to merge them with the data entries done through Kobo toolbox. Drawing of polygons was done using Google maps platform then imported into ArcMap. The process was guided by the shapes sketched on the hard copy maps as per the situation found on the ground.





NAIROBI IN SPACE AND TIME

- Nairobi city in context
- A historical perspective of public space in Nairobi
- Policy, Institutional, Legal and Regulatory frameworks



NAIROBI CITY IN CONTEXT



The name "Nairobi" comes from the Maasai phrase "Enkare Nyirobi", which translates to "the place of cool waters", due to the streams and richness in water at the margins of an arid region. Affectionately referred to as the green city in the sun, Nairobi is today one of the region's leading financial, business, tourism, communications and diplomatic hubs, and a gateway to East and Central Africa. The city enjoys strategic geographic advantages including a distinctively beautiful landscape with an interesting mix of forests and savanna grasslands sloping south-eastwards with three rivers running through it – Ngong river, Mathare river and Nairobi river. However, like many other fast-growing cities, the city currently turns its back to its rivers.

The city is home to headquarters of two United Nations Agencies – UN Environment and United Nations Human Settlements Programme (UN-Habitat). It also hosts several other UN agencies' missions and regional offices. It accounts for 50% of formal employment in Kenya and generates over 50% of

the gross domestic product (GDP). The current population of the city, according to the 2019 National Population and Housing Census is estimated to be 4.397 million. This is projected to rise to 7.14 million by 2030 (UN DESA, 2016). The population growth rate stands at 4.1 per cent per annum.

The city has a national park, two urban forests and two nature reserves within its boundary. Sitting at an elevation of 1795 metres above the sea level, the city has a beautiful subtropical highland climate.

Conversely, the city is facing complex and interconnected challenges attributed to uncontrolled urbanization and its associated impacts: vibrant street life is often choked by traffic congestion; economic opportunities are rife but local resources and capacities are not always enough; and informal and private sector activities outpace planned development.







 $\begin{array}{l} \begin{array}{l} \text{POPULATION:} \\ \textbf{4.397M} \end{array} (2019) \end{array}$

696 Km²

NAIROBI POPULATION DENSITY: 4,850 Persons/Km² (2020)





A HISTORICAL PERSPECTIVE OF PUBLIC SPACES IN NAIROBI

PRE-WORLD WAR 1

The birth of Nairobi can be traced back to 1898 when it was selected by the Kenya Uganda Railway for the construction of a railway depot. The preference for the site was because of both its strategic and geographical advantages – almost halfway between Mombasa and Kisumu, adequate water supply from both the Nairobi and Mbagathi rivers, comparatively flat terrain suitable for railway tracks and sidings, good topography viz elevated cooler grounds to the west suitable for residential purposes and an apparently deserted land offering freedom for appropriation of land. The primary advantage was its freedom from tropical diseases, especially Malaria.

In 1900, Nairobi Municipal Community (NMC), which was provided for under an order-in-council of 1897, published its first regulations. The regulations defined the township as the area within a radius of 1.5 miles from the present office of H.M Commissioner in Ukamba province. This defined the first official boundary of Nairobi (Halliman & Morgan, 1967). Nairobi's first spatial plan, 'the plan for a railway town' of 1906, was drawn by Arthur Frederick Church. From the plan, there is an attempt to cater for the recreational needs of the young town's residents', particularly the settlers. This is by establishing the Railways Club, The Royal Nairobi Golf Course, and the Race Course to the North of Nairobi River. However, in as far as the provision of social welfare services for Africans was concerned, not much was heard of in the prewar days.

POST-WORLD WAR 1

This was a period of economic boom for Nairobi. This era ushered in a period of Pro-African social welfare. The need to provide community, and public spaces for Africans was increasingly being appreciated. In the early 1920s, public spaces for Africans were viewed majorly from the public facilities viewpoint. The documented gathering spaces for Africans were the African Community Centres, which hosted concerts, parties, cinema shows and dances, public meetings, and debates; and the stadium which mainly hosted matches. The new developments helped showcase the African culture of community.

Referring to the thriving social life displayed in the African Community Centres and the Stadium, (White, et al., 1948) note that "it is indeed amazing to see how much money can be raised by Afro-football match or a dance among Africans." This pointed to the recognition of the importance of public spaces in the social life of the Africans. From this point forward, the centres became part of the new Africans' housing schemes. Underscoring this, the report further affirmed that the pleasure of making life more agreeable will be an important part of all urban welfare work. This placed public spaces at the centre of urban development and most especially, new housing developments in the town.

The picture below shows ample block level public spaces as part of the Ofafa Jerusalem housing development for natives.

While documenting the history of Nairobi's Urban Planning, and with special reference to the years preceding 1927, (White, et al., 1948) observed that Nairobi's urban development was based on market-driven subdivision of land which was propelled principally by the desire to maximize profits. This is pretty much a trend that has remained to date. It records, "One by one, estates were subdivided and slowly covered with buildings. Engineering services were inadequate and expensive because of the untidy and sprawling development. Most serious of all, there was overcrowding as estate owners tried to increase the value of the undeveloped land." In order to avert further deterioration, F.J. Walton was called in to prepare a plan for the city. This resulted into the 1927 Plan – 'Plan for a Settler Capital.' The plan extended the municipal boundaries yet again to cover 32.4 square miles.

"it is indeed amazing to see how much money can be raised by Afro-football match or a dance among Africans." (White el at., 1948)



The 1906 plan - A plan for a railway town



Domestic level public sapces as part of Ofafa Jerusalem housing



The 1927 Masterplan - A plan for a settler capital

POST-WORLD WAR II

Post WWII period ushered in the era of grand and interconnected public open spaces thinking in Nairobi. Public open spaces were thought of from a neighbourhood, linear and city levels. This thinking was advanced by one of the most progressive spatial plans in the history Nairobi – 'Masterplan for a Colonial Capital', 1948.

Based on the garden city concept, the masterplan envisioned Nairobi to be a green city, affectionately referred to as the 'green city in the sun', with broad boulevards, roundabouts and large areas of parkland and forest reserves. Moreover, as seen in the artistic impression below riparian areas were planned as public spaces. This was in view of malaria control and drainage during the rainy seasons. Between 1948 and 1963, many of the ideas laid down in the plan were realized, particularly where it concerned the provision of public open spaces (Freeman, 1991).

Public spaces featured prominently in the Masterplan. They represented 29.25% of the total land within the planning boundary. (White, et al., 1948) This is also partly be attributed to the civic twilight of the 19th century which considered green spaces as places to meet and discuss (ETH Studio Basel, 2008). Emphasis was placed

on a citywide network of open spaces. These were anchored on the neighbourhood unit and the Kenya Centre. In the map below, public spaces are depicted as the skeleton of the city – the glue that connected different neighbourhoods and the city at large together. The masterplan emphasized that as far as practicable, there should be an 'open space' at the centre of each neighbourhood unit, to be used partly as a recreational space and partly as a reserve of sites for public or semipublic buildings like nursery or junior schools, clinics, libraries, clubs, e.t.c.



The Masterplan for for a colonial capital, 1948

Top: Government square and sailors at the Nairobi Dam in the 1950s respectively



THE INDEPENDENCE ERA

This era has been coupled with illegal misappropriation of public spaces, inadequate management, inadequate budgetary allocations and rapid expansion of informal settlements. It brought with it a lot of shrinking of Nairobi's public space system. In his thesis, (Kiruma, 2014) argues that shortage of public spaces in the city started in the post-independence era. He attributes this to the policy changes which favoured a growth in the city population. This was never accompanied with an increase in the provision of affordable housing. As a result, squatters and politicians took the original breathing spaces and put up settlements.



Top: The supreme court in the 1960s and above is Uhuru Park in the 1970s

THE MILLENIAL ERA

The millennial era saw the death of the urban commons in Nairobi. From the 1980s right up to the year 2000, city governance neglected public space and the commons was largely assumed by crime and violence which had a negative impact on investment choices, livable spaces and livelihood opportunities. Besides its impact on social and economic exclusion, it also resulted in growing crime and violence in the city. The increase in crime and violence is well explained in the city-wide crime victimization survey conducted by UN-HABITAT which underscored the intricate link between the use of public spaces and perception of urban safety.

The emergence of 'ghost cities' is a key phenomenon in violence prone cities and towns, where business is only done during the day and at night the city or town is 'closed' or 'dead' due to insecurity and lack of safety. This reduces the general output from the economy, which would have otherwise been more if the city would be active at night too. Other consequences of crime on public space include the development of the "architecture of fear", escalation of gated communities, stigmatization and segregation, creation of ghettos and areas controlled by gangs, and the neglect, decay and desertion of the inner city (Ministry of Housing, 2012).

Recognizing this challenge, in 2000, the then Mayor of the city sought technical support from UN-Habitat to help build the city's capacity to address crime and safety. A crime victimization survey was conducted, and this resulted in the adoption of the City-wide Crime Prevention Strategy with four main pillars: Social prevention, Urban Design and physical improvement, law enforcement, and community empowerment and good governance.

Anchored on the Safer Nairobi Initiative, Nairobi's Public Space Revitalization program has evolved. Through the initiative, a wide range of interventions to revitalise the Central Business District and public spaces in particular have been undertaken, transforming the use and experience of public space and collectively triggered a spin-off effect across the city, with community-led public space initiatives transforming neighbourhoods, slums, informal settlements, consequently transforming the city image.



Integration of street vending as part of CBD regeneration, 2015 © Mark Ojal



Young people using the revitalised Jeevanjee Gardens at night, 2014 © Richard Irungu

Page 32

POLICY FRAMEWORK

Environmental stewardship and conservation have become of importance in the quest to achieve sustainable development both globally and locally. In cities today, harsh realities of climate change, crime and urban safety, diseases and pandemics and deteriorating quality of life has pushed the agenda of public and green spaces into popular consciousness.

At the turn of the 20th century, rivers were the lifeline of Nairobi. As such, the settlement was referred to by the local communities as 'Enkare Nyrobi' "place of cool waters." This was primarily because of its rivers flowing with clean, fresh water and lined with magnificent indigenous trees and wild riparian vegetation (NRBP, 1999). Today, the riparian zones which were once rich in biodiversity in the early period of urban settlements in Nairobi are today marred by filth, insecurity and noxious solid and liquid waste.

The desire to push Nairobi to become a global environmental capital has challenged the city, and the country at large to rethink its environmental policies. This is underscored by the country's supreme law which is committed to the ideals of sustainable development. The law states in part that the Kenyan state shall work to achieve and maintain a tree cover of at least ten percent of the land area in the country. Protecting, conserving and rehabilitating public spaces contributes to the maintenance of indigenous flora and fauna found within the city hence partially fulfilling this constitutional requirement. This notwithstanding, the realm of is marred by a disjointed policy, legal and regulatory framework with multiple enforcing agencies, inadequate and scattered resources, conflicting laws and overlapping mandates.



Uhuru Park with the CBD in the background © Mark Ojal

Physical Planning Handbook, 2002

The physical planning handbook provides guidelines for the preparation and implementation of physical development plans. It guides the work of county governments, relevant personnel and institutions responsible for guiding and controlling the use and development of land. Overall, the handbook recommends the allocation of recreation space as follows:

- High density residential areas 21-29%
- Medium density residential areas 7-16%
- Low density residential areas No provision for this
- Industrial area: 10-15%

The handbook categorises recreational space based on different spatial contexts, proximity and accessibility. At the regional scale, the spaces include areas of natural scenic beauty, tree-lined ridges, riparian reserves and their water courses, forests and nature reserves. It recommends that the above be identified in an urban region, gazetted and developed or conserved as nature conservation and/or recreational areas. At the urban scale, the handbook recommends a range of public spaces including public facilities such as sports complexes, stadia, swimming pools, galleries, libraries and community centres, cinemas and theatres among others, and open spaces. It further gives an insight into the different themes that various recreational spaces could adopt and activities that they could support. It recommends the following:

- Spaces for sitting in quietly with scented gardens, colour gardens, flower and shrub displays and small enclosures
- Spaces for walking through such as quiet paths and tree-shaded avenues.
- Spaces for botanical collections and exhibitions.
- Spaces for open air exhibitions of sculpture, paintings and photography among others.
- Large open spaces which encourage ball games, running about and exercising in addition to providing space for displays, fairs, shows.
- Spaces for organized sports such as cricket, and tennis courts among others.
- Arenas for open air display of traditional dancing, plays, concerts, shows, mass meeting.
- Spaces with artificial lakes and ornamental pools, and encourage boating, fishing, collection of water plants and water fowls, and also promote children play groups.

Furthermore, it recommends the use of buffer zones as recreational open spaces. Buffer zones include 10-30 metres green belts on either side of urban roads and by-passes and green belts created to prevent pollution between conflicting and non-compatible land uses. The handbook recommends landscaping of these open spaces and their design for use for some of the recreational opportunities listed above. It goes ahead to discuss neighbourhood public spaces. It recommends the siting of the public spaces within walking distance of home. It however fails to explicitly state what a walking distance is in this case. This subjects it to various interpretations. The handbook further recommends that a neighbourhood with a population of 10000 people should have a minimum open space of between 1-2ha. In regards to physical planning of a town, the handbook recommends the allocation of at least 13.2% of the urban land to recreational open space.

Draft Nairobi Development Control Policy

The draft development control policy identifies privatization of public open spaces as a major threat to perpetuity of public spaces in Nairobi. It attributes the lack of adequate public spaces in the city to missappropriation.

Noting that well designed public spaces not only contribute to the overall visual character but also invigorate economic activities and enhance the overall liveability of the city, the policy recommends as follows:

- maintenance of public spaces;
- spaces;

- and utilized public spaces.

Well designed public spaces not only contribute to the overall visual character but also invigorate economic activities and enhance the overall liveability of the city.

POLICY, LEGAL & **REGULATORY FRAMEWORK ON PUBLIC SPACES**

- Increasing budgetary allocations to finance revitalisation interventions and

- Establishment of partnerships and collaborations with local communities among other stakeholders to reclaim, transform and maintain public open

- Integration of public art and well-designed street furniture into the design of public spaces to give them a sense of identity and character;

- Reclamation of land initially allocated to public open spaces;

- Promotion of public awareness on the benefits of well-designed, maintained

Nairobi Integrated Urban Development Masterplan (NIUPLAN), 2014 - 2030

The NIUPLAN envisions an iconic and globally attractive city aimed at regional integration and sustainability. Under its economic pillar, the blueprint envisions sufficient job opportunities, and creating a balance between economy and the environment. Under its environmental pillar, the plan aims to create a globally attractive city. It goes ahead to unpack the elements of a livable city by envisioning vast green spaces, good air quality, efficient land uses, and well planned urban structure. It further seeks to strike a balance between the city and the region by creating not only a coordinated urban growth but also developing a network of metropolitan greenbelts.

NIUPLAN seeks to strike a balance between the city and the region by creating not only a coordinated urban growth but also developing a network of metropolitan greenbelts

The principal policy for Nairobi land use plan, 2030 cements the place of preservation and restoration of green and water environment (blue-green infrastructure), giving a clear direction towards planning for green and public spaces as an ecological and functional infrastructure network. With regard to this, the policy encourages the preservation of existing forests and woodlands. It further emphasizes the restoration of riparian reserves into recreational open space (Nairobi City County, 2014). The principal policy further discusses the beautification of the city for the pride of Kenya. It advocates for the establishment of urban landscape regulation to preserve and bring out the historical civic beauty.

In addition to the above, the NIUPLAN identifies the Nairobi Station Square as a potential public open space that will be developed to provide multi-modal function as well as serve as an urban amenity for enhancing livable environment for residents and visitors alike. The blueprint further proposes public spaces and enhanced green corridor to improve urban amenity. In line with planning public spaces as an interconnected network, the Nairobi Station Square development, other public spaces and green corridors are expected to create a livable and green environment and to attempt to relive the green city in the sun. In addition, plan recognizes the richness and diversity of the city's forests, woods, extensive national park, and river network, and emphasizes the need create an ecological network to promote movement of wildlife and enhancement of biodiversity.

Nairobi Non-Motorised Transport Policy

The NMT policy recognizes the need for treatment of street space. The policy encourages the Nairobi City County Government to design attractive and comfortable, walkable and bicycle-friendly streets by including such treatments as street trees, landscaping, seating, convenience facilities, and street lighting to create "dignified spaces." The policy further calls upon the city county government to prioritize space allocation to non-motorised transport and public transport within the City County. It recommends that the city government progressively reduce on-street parking and create more space for cyclists and pedestrians. Through such innovative designs as parklets, the reclaimed street space can be transformed into attractive people-places that promote outdoor eateries especially in the Central Business district where pedestrian space is congested, pollutted and contested between matatus, private cars, street vendors, pedestrians and boda boda riders.

The policy further calls for the promotion of cycling for health, sports and tourism. It goes ahead to call upon the Nairobi City County Government to develop a masterplan for pedestrians, cyclists and human drawn carts. Through this interconnected green infrastructure system including a network of public spaces and a network of walkways and cycling paths would be of added value and would not only help achieving better health outcomes but would also contribute to reducing congestion on arterial roads, improving air quality, and urban safety and security.

Nairobi Metro 2030

Nairobi Metro 2030 blueprint aims to transform Nairobi into a World Class African metropolis that is safe, secure and prosperous. The strategy appreciates that in order to achieve the above, Nairobi must curve a niche for itself. It further appreciates that in doing so, the city must deal with three elements of sustainability, one among them being the liveability of places.

Underscoring the central place of public spaces and civic amenities in improving quality of life in the city, the strategy aims to provide a clean, pleasant and safe living environment and foster access to high quality community and cultural facilities. It further proposes to every local government to work towards raising the forest cover within the metro region to 30% by 2030 (G.o.K, 2008). Protecting, creating and enhancing public spaces would be a major impetus to achieving this target. The strategy proposes that 20% of the land area in the Nairobi Metropolitan Region be allocated to open spaces. This takes various forms including: Playgrounds/ stadia / sports complex, parks and gardens - public open spaces, special recreational – restricted open spaces and multi-purpose open space.







LEGAL AND REGULATORY FRAMEWORK

A look at the legal, policy and regulatory framework governing public spaces and urban planning in Nairobi suggests that none of the existing legal and regulatory instruments explicitly defines public space. The National Museums and Heritage Act of 2009 is the only law that attempts to define public space but does not go beyond the general definition. The Forests Act on the other hand strongly promotes neighbourhood public open spaces and sets a minimum requirement in proportion to developable land. Again, it fails to define public space. Planning standards should explicitly define public space and outline its various categories. It should further elaborate critical issues including their management, land ownership and conversion to other competing land uses.

Nairobi's public realm has been characterized by a disjointed governance structure, with multiple centres of power. This is also exhibited in the management of public space. Whilst the management of public spaces is largely within the mandate of Nairobi City County Government, and now the Metropolitan Services, other state and non-state entities are also involved in the management of public spaces. These include include private citizenry, corporate bodies, the Kenya Forestry Service, National Museums of Kenya, Civil Society Organizations, Community Based Organisations and Faith Based Organisations (Ikawa, 2015).

The National Museums and Heritage Act, 2009

The National Museums and Heritage Act of 2009 defines public space as an open space not built upon in any urban or peri-urban area whether in a municipality or not to which the public has access and which may be used for parks, gardens, recreation grounds or any other use whatsoever.

County Government act, 2012

The Act recognizes the importance of a viable system of green and open spaces for a functioning ecosystem, and puts the responsibility of the same in the county government. It further compels the county government to work towards attaining and maintaining tree cover of at least 10% of the land area of Kenya as provided for in article 69 of the constitution of Kenya.

The Act also requires the county governments to establish an updated GIS-based database system. The database includes an inventory of public spaces. Developing a GIS-based mapping of public spaces helps to update the system, and is a step forward for the city county to start bench-marking from. Beyond this, the Act requires every county government to put in place a spatial plan which among other uses, indicate the areas designated for conservation and recreation.

Forests Act, 2005

The Forests Act of Kenya talks explicitly about public spaces. This includes the creation and management of the spaces, and more importantly, the need to involve the beneficiaries of the spaces in making decisions that would significantly affect the use and enjoyment of the spaces. It is by far the only law in Kenya that provides for the creation and maintenance of neighbourhood public spaces. Article 30 of the Act requires local authorities to establish and maintain arboreta, recreational parks and mini-forests for the experience and use by people living within their areas of jurisdictions. For the purposes of the above, the Act further requires local authorities to cause developers of housing estates to allocate at least 5% of their total land area for the establishment of mini-forests. As far as creation of neighbourhood parks is concerned, the Act requires every local authority to establish and maintain a recreational park in every market centre within its area of jurisdiction. The market centre in this case means a neighbourhood shopping centre. The Act further requires the Kenya Forests Service to facilitate and provide technical support to local authorities in the establishment and maintenance of mini-forests, recreational parks and arboretums.

In order to protect the conversion of public open spaces to other land uses, the Act explicitly states that no arboretum, mini forest or recreational park shall be converted to any other use unless the local authority consults the residents of the area in the jurisdiction within which such arboretum, mini forest or recreational park is situated. This reaffirms the need for public participation whenever a public space needs to be converted into another land use. In addition, where a gazetted nature reserve falls under private land ownership, the Act provides for compulsory acquisition of the land, and for compensation for the same.

"No arboretum, mini forest or recreational park shall be converted to any other use unless the local authority consults the residents of the area in the jurisdiction within which such arboretum, mini forest or recreational park is situated."

~ The Forests Act of Kenya, 2005


PUBLIC OPEN SPACES

- Typologies of public spaces
- Quantity and distribution of public spaces
- Accessibility and inclusiveness
- Diversity of users
- Custodianship and management
- Comfort in public spaces
- Activities and uses
- Landscape furniture and amenities



TYPOLOGIES OF PUBLIC OPEN SPACES

Nairobi city's public space system is made up of diverse typologies taking various spatial forms including urban forests, parks, nature reserves, gardens, playgrounds, sports fields, courtyards, squares, infrastructure rights of way such as electricity and railway way leaves and historically significant cemeteries among others.

URBAN FORESTS AND NATURE RESERVES

Urban forests in Nairobi are Ngong' and Karurua forests. The two measure a combined area of 1930.3 Ha, accounting for 61.91 percent of Nairobi's public space ecosystem. Ngong forest remains a potential public space that can enrich the experience and enjoyment of residents and visitors. Karura forest on the other hand is an example of an urban forest which is used and experienced as a public space in a sustainable way. Nonetheless, its accessibility remains limited given the entry fees that inhibit its use by the low income and the urban poor.

The city also has two nature reserves, the Nairobi Arboretum and City Park. The two are home to more than three hundred species of flora and fauna and are a favourite destination for nature-lovers. Both the two urban forests and the two nature reserves continue to diminish in area and face constant threats of development, territorial encroachment and continued land alienation by public authorities for purposes of construction of urban infrastructure and commercial development.



A photo of the Lily Lake at Kaura Forest © Ninaras



SQUARES AND COURTYARDS

Even though officially not called squares, there are 14 squares and 413 courtyards in the city. Squares are found both at the city and at the neighbourhood levels. If well designed and reclaimed from cars, they can offer refuge from the hustle and bustle of the city streets and add to the vitality of the city. City level squares are exemplified by KICC square, Nairobi Station square and Tom Mboya square.

Courtyards on the other hand are public spaces that are surrounded by buildings and are thus the focal point of the immediate community. They serve as parking lots by night and spaces for children to play in the day. The spaces are found in planned residential estates and are used largely by residents and their visitors. These spaces are also under threat of misappropriation. Communities need to be empowered to transform and take care of them.

PARKS AND GARDENS

Parks and Gardens are the most used and most prominent public spaces in the city. The city has 15 parks and 19 gardens. They include both neighbourhood parks and gardens and city level parks and gardens. Neighbourhood parks are meant to be used and experienced by people who live, work, and play in a neighbourhood. These are exemplified by Kahawa West Community Park in the Kahawa west, Kamukunji grounds, Westlands botanical garden and Jacaranda grounds. There are not many such spaces in Nairobi.

City level parks and gardens are some of the most visible public spaces in the city. They include Uhuru Park, Central Park, John Michuki Park, Jeevanjee gardens and Uhuru gardens. Parks and gardens account for five percent of the public space system.

PLAYGROUNDS AND SPORTS FIELDS

Playgrounds and sports fields are important for physical activity of people. Children and youth use playgrounds and sports fields especially for sports-related activities. As such, these typologies foster nurturing sports-related talents. In the city, publicly owned playgrounds are eighteen (JICA, 2013).

From the assessment, it was found that Nairobi has 99 playgrounds and 51 sports fields. While sports fields are mainly used for football by local youth, playgrounds are mainly found in residential estates closer home. They are frequented by children. Majority of these playgrounds are under threat of misappropriation by unscrupulous developers. As the city continues to grow, these spaces need to be reclaimed and upgraded for enjoyment and play.

NUMBER OF PUBLIC OPEN SPACES PER TYPOLOGY					
#	TYPOLOGY	NUMBER	AREA (HA)		
1.	Urban Forests	2	1930.3		
2.	Nature reserves	2	94.1		
3.	Parks and Gardens	34	129.6		
4.	Playgrounds	99	90		
5.	Cemeteries	6	10.2		
6.	Squares	14	11.6		
7.	Sports fields	51	65.5		
8.	Courtyards	413	56.6		
9.	Infrastrcuture Rights of Way	5	319.6		
10.	Others	206	398.9		
#	TOTAL	826	3106.6		

Table showing the number of public spaces per typology



People from all walks of life enjoy at Uhuru Park © Sayyid Azim/AP





Top: KICC square and bottom is Jacaranda grounds © UN-Habitat



HISTORICALLY-SIGNIFICANT CEMETERIES

In many cities, cemeteries are an integral part of the green and public space system. In the U.K for example, they were originally envisaged as public spaces, and were professionally designed to be attractive places to visit in their own right (CABE, 2007). Today, they continue to be seen as important places for grieving and sentimentalizing (Hanauer & Ayers, 2011), shifting imagination and allowing people to transit from one world to the other, traveling in one's own biography and meditating upon one's own finitude.

In Nairobi, the city's six historically-significant cemeteries are little-known to the general public. Their beauty is unknown to the majority of Nairobians. Their idyllic natural landscape, ornamental plantings, monuments, fountains and picturesque layout create a calming rural feeling, albeit a man-made one. They include Nairobi War cemetery on Ngong road, Nairobi South War cemetery on Uhuru Highway, Forest road cemetery, and City Park cemetery.



Nairobi War Memorial cemetary along Ngong road © CWGC

OTHER TYPOLOGIES

Other typologies of public spaces in Nairobi include amenity green spaces, public parking lots, street corners and other non-defined spaces which include disused quarries. Public parking lots for instance are used as parking spaces during the week and either as public markets on Saturdays and during public holidays, and as skating rinks on Sundays. This social program and multi-functional use of public space needs to be scaled up, especially in the wake of COVID-19 necessitating a need to decongest public markets, facilitate physical distancing and provide public spaces to support both physical activity and mental health and wellbeing.

Amenity green spaces along transport corridors have a strong impact on the overall city image. While these may not be primarily used and enjoyed as recreational spaces, they have a huge visual impact on city residents who use the routes on a daily basis and offer informal opportunities for recreation in neighbourhoods with that have limited or no public spaces. They include arterial interchanges like Globe cinema roundabout, Museum Hill roundabout, Roysambu roundabout and the ILRI roundabout among others. While the ILRI roundabout is used as a playground an family recreation space in the weekends, these mainly represent potential public spaces as they are either in a state of disrepair, are unsafe to access or they are subject to development anytime.



A graph illustrating typologies by numbers

Page **40**

Courtyards

400

500

CLASSIFICATION OF PUBLIC SPACES BASED ON SCALE

The inventory revealed that the city has 526 block level public spaces. These spaces are closest to home and are comparatively small in size. Majority of them are courtyards, playgrounds and gardens. At the neighbourhood level, there are 203 public spaces. These include neighbourhood squares gardens, neighbourhood parks and sports fields. The city also has 46 city level public spaces. These include the large and strategic public spaces around the city.

The city has 53 linear public spaces. Majority of these are potential public spaces. They include road medians, infrastructure-rights-of-way like electricity way leave, railway reserve and road reserves. Currently, a large proportion of the linear public spaces are marred by territorial encroachment. Over 75 percent of the riparian reserve along Nairobi river basin has been encroached on. Electricity way leaves and railway reserves represent a low hanging fruit as the level of encroachment on them is low. These can be greened and designed to be used and experienced as public spaces.



Linear Park along the railway line © Mark Ojal



Above: Classification of public spaces by scale

Classification of public spaces based on quantity



QUANTITY AND DISTRIBUTION

The character of a city is defined by its streets and public spaces. Equitable distribution of public spaces across the city is an important element for creating a cohesive city, balancing growth and revitalizing impoverished communities and inner city neighbourhoods. The connective matrix of streets and public spaces forms the skeleton of the city upon which all else rest (United Nations Task Team on Habitat III, 2015).

Overall, there are 826 public spaces in Nairobi City County. They occupy a combined area of 3106.4Ha. This is equivalent to 5.32 percent of the built up area and translates to 6.56 square metres per capita public open space. Studies have shown that successful cities have a minimum percentage of 15-20 percent of urban land allocated to public open spaces. There is a clear need for Nairobi to work towards improving the amount of urban land designated, used and experienced as public space. This is particularly important to future-proof the city from stress and such shocks climate and health disaster risks.

The spaces are distributed variously across the city. The urban core is ringed by meso-scale public spaces. Northern and western parts of the city on the other hand have the largest spaces, Karura and Ngong forests. However, many of the public spaces on the western part of the city are small open spaces along the Nairobi river. Towards the northeast and eastern parts of the city, there is a comparatively fair distribution of public spaces. This is especially evident in planned inner city residential neighbourhoods where there are courtyards, playgrounds and sports field. These need to be protected as many of them are already threatened by development. Large public spaces to the east of the urban core include disused quarries and infrastructure ROWs. They exemplify potential public spaces and could be low-hanging fruits for creating public spaces in the high density and deprived neighbourhoods. The sprawling areas in the urban fringe on the other hand have acute shortage of public open spaces. This is in part attributed to the unplanned and unregulated nature of developments in the areas. There is a need to leverage urban planning to create adequate streets and public spaces in the fringes.



Proportion of built up area that is public space

Page 42



Combined area of public space in Nairobi



Proportion of built up area that is public space

DISPARITIES IN THE DISTRIBUTION OF PUBLIC SPACES

Studies from across the world show that the provision of public spaces in predominantly-low income neighbourhoods is poor. Many such neighbourhoods are either bereft of public open space or that which is available is of poor quality. The spaces that are provided are typically non-green spaces, thereby depriving such communities of more natural public spaces and their benefits. Moreover, the maintenance of existing public spaces in these neighbourhoods is typically poor, rendering them unattractive. As such, they become undesirable places. Consequently, the spaces become no-go-zones as they turn into incubators of crime. In effect, a lack of provision of public space or the poor state of the spaces provided, combined with poor management and maintenance further impoverish low-income and urban poor communities (Institute of Sustainable Systems and Technologies, 2009).

Within the boundaries of the city's one hundred and thirty-one informal settlements, there are a total of forty-six public spaces (5.57 percent of the city's public space). They measure a combined area of 9.1 Hectares. This is equivalent to 1.17 percent of the slum area. Compared to the city's average of 5.32 percent, this is way too low. The estimated combined area of informal settlements in Nairobi is 778 Hectares.



Kibera multi-purpose playground © Kounkuey Design Initiative



Proportion of public spaces that are in informal settlements



Combined area of public space in Nairobi's informal settlements



Proportion of slum land is public open space



#	SUB-COUNTY NAME	NO. OF PUBLIC OPEN SPACES	AREA OF PUBLIC SPACE (SQM)	PROPORTION OF URBAN LAND (%)
1.	Dagoretti North	43	1,772,406.2	6.03
2.	Dagoretti South	30	214,639.8	0.88
3.	Embakasi Central	107	1,594,885.5	19.4
4.	Embakasi East	36	1,213,933.3	1.41
5.	Embakasi North	44	335,968.0	6.19
6.	Embakasi South	6	604,870.0	3.44
7.	Embakasi West	45	498,594.2	5.11
8.	Kamukunji	21	189,869.3	2.15
9.	Kasarani	42	398,905.0	0.29
10.	Kibra	56	647,943.6	5.25
11.	Lang'ata	31	11,101,103.6	11.38
12.	Makadara	171	699,847.3	5.83
13.	Mathare	35	132,665.8	4.57
14.	Roysambu	28	449,334.2	0.93
15.	Ruaraka	48	474,442.8	6.59
16.	Starehe	60	664,766.9	3.94
17.	Westlands	19	10,123,844.6	13.91
	TOTAL	826	31,118,020.1	

DISTRIBUTION OF PUBLIC SPACES IN THE SUB-COUNTIES





The study indicates that distribution of public open spaces across subcounties varies. Sub-Counties with some of the lowest proportion of urban land allocated to public space include Kasarani, Dagoretti South and Roysambu with 0.29, 0.88 and 0.93 percent respectively. These sub-counties are in the urban fringe with the predominant land use being Agriculture. Spatial development in these areas is taking place at a fast pace, in an unplanned manner and led by land subdivisions. On the other hand, sub counties with the highest amounts of urban land used as public space include Embakasi Central, Westlands and Lang'ata with 19.41, 13.91 and 11.38 percent respectively. While Westlands and Lang'ata sub-counties are endowed with urban forests and a vast nature reserve which raises their combined area is public space, distribution of public space in the sub-counties remains poor. Embakasi Central on the other hand exemplifies an adequate distribution of public spaces within the sub-county. The Sub-County is largely planned with neighbourhoods such as Komarock, Greenspan and Kayole. Moreover, it has a long power way leave that traverses the sub-county. If reclaimed and designed as an amenity green space, it can further supplement the existing public spaces.

Large public green spaces are located mainly in the south and north of the city. The south's public green spaces are mainly of natural beauty and are part of the natural landscape. The largest part of the south's green space is occupied by the National park, which is associated with wildlife and Ngong forest to the south west. According to the working definition however, the national park is not considered to be a public open space.

The government and partners should work together to protect existing public spaces, upgrade them, especially the spaces under threat. In order to improve the distribution of public space, consider re-purposing discussed quarries, power way leaves, railway reserves and spaces along the Nairobi's river system to create a network of water parks, neighbourhood forests, playgrounds and neighbourhood parks and gardens.





Number of public open spaces in Nairobi City County



as public open space

e **45**

ACCESSIBILITY AND **INCLUSIVENESS**

The principle of liveliness and social inclusivity of public space is greatly affected by management models. This can either reinforce social exclusions or foster inclusion in public spaces. For instance, entrance fees can be a barrier to access and inclusion. It reinforces economic and social inequalities and takes away the right to the city. Public space should not be a privilege of the wealthy but a basic human right accessible to and enjoyable by all regardless of their political and religious beliefs and economic ability. Of the 826 documented public spaces, 651 are explicit public spaces. This is because their access is unrestricted - anyone can use them. The spaces are generally characterized by public ownership, and in many cases, they

are either managed by the city county government or have no management at all. While this makes them true public spaces, the lack of control and enforcement of security, particularly at night make them prone to crime and vandalism.

On the other hand, access to 16 of public spaces is controlled by opening hours. While this might always be

seen to be a barrier to universal access, it does not necessarily mean that the spaces are not true public spaces. In some cases, closing of public space during the night can help in the maintenance and especially whenever vegetation needs watering. They are exemplified by Uhuru gardens which opens its gates daily from 8.00am - 6.00pm. There are also public

open spaces whose accessibility and use are limited to people who live within their proximity and their guests. In these spaces, outsiders are generally unwelcome. They include pocket spaces such as courtyards and playgrounds within residential estates. In the city, they are 162 in number.

Across the city, public spaces are increasingly charging entrance fees.



The map above shows the accessibility of public spaces in Nairobi



The study found that 3 public spaces: Karura forest, Arboretum and August 7 Memorial park charge entrance fees. While these spaces are well maintained and have higher quality compared to the ones that are free, it is important to balance sustainability of public spaces and quality therein on one hand and accessibility and inclusivity on the other.

Infrastructure differential can be a crucial enabler or barrier to accessibility and inclusivity in public spaces. Universal design, for instance, design of walkways, entrances and amenities such as toilets can promote access to and inclusivity in public spaces. In Nairobi however, public spaces are not friendly to persons living with disability. Only 19.8 per cent of the public open spaces have inclusive infrastructure – pedestrian infrastructure that suit all users.

In the city, public spaces are not friendly to persons living with disability. Only one public space is PWDfriendly. In order to sustainability and meaningfully promote perpetual and universal use of public spaces in the city, it is important to promote universal design, and especially public spaces for ease of access by persons living with disabilities; enhance connectivity of public spaces to public transport (matatu) stops and create a network of dedicated and protected bike lanes. Currently, only five public spaces are connected to bike lanes and only 24 are connected to a matatu stop.





A dedicated and protected sidewalk adjacent to Uhuru Park along Kenyatta Avenue © Mark Ojal

Accessibility infrastructure for public spaces in Nairobi



DIVERSITY OF USERS

Public spaces are places where people go to see and be seen, and where people from all walks of life interact as equals. Successful public spaces are welcoming and accessible to everyone regardless of their age, race, religion, ethnicity, socio-economic status and sexual orientation.

A good public space is one that reflects diversity and encourages people to live together effortlessly, creating necessary conditions for permanence, consequently encouraging public life, active living and social cohesion. These spaces offer lots of things to do and see, and a multiplicity of activities to engage in. In addition, they are accommodating and welcoming to both men and women, children, teenagers, the elderly and persons with disabilities. For the elderly for example, some of the most important considerations include social and physical activities, community life facilities and services, social networks, and pleasant and safe environments. For families with children, public spaces need to provide adequate opportunities to children to play safely under the watch of their parents or guardians, parents need to be able to push strollers and walk comfortably with their children, and teenagers need to be able to have something to engage their energy.

The assessment revealed that public open spaces in Nairobi are not diverse. Persons with disabilities were found in just 26 of the public spaces. This suggests that public spaces in the city may not be welcoming for persons living with disabilities. Women and girls were found in 322 and 102 public spaces respectively, while children's presence was observed in 233 public spaces. It is noteworthy that the assessment was taken on a weekday. Inadequate diversity across the city's public spaces depicts inadequate social opportunities, and lack of amenities and facilities that would make the spaces more pleasant and attractive. The Nairobi Metropolitan Services, the Kenya Forest Services and the Nairobi City County Government among other partners need to explore opportunities for social programming and upgrading of the available public spaces to enable them to provide better opportunities for higher quality of stay.



The above map shows the diversity of public spaces in Nairobi

USERS OF PUBLIC SPACE BY GENDER

NUMBER OF PUBLIC SPACES SHOWING HOW USERS GROUP THERMSELVES





A diversity of users resting at Jeevanjee Gardens on a sunny day © Mark Ojal





Of public spaces are deserted, making them vulnerable to both crime and misappropriation



Page **49**

CUSTODIANSHIP AND MANAGEMENT

Great public spaces are places where one can't wait to return to. Central to this is progressive management that understands and promotes ways of maintaining and enhancing a clean, safe and lively place. Good management understands the needs and desires of existing and potential users of a public space and strives to ameliorate their experiences. Moreover, it acts swiftly to empty waste receptacles, maintain and fix furniture and amenities, thereby giving people a feeling of comfort and safety in the spaces.

Out of the 826 documented public spaces in the city, 47.6 percent are under the custodianship of the government. Among the spaces under the custodianship of the government, 357 are under the custodianship of the Nairobi City County Government while 39 are under the National government. These include various state parastatals like the National Youth Service, the National Museums of Kenya and Kenya Forest Services. On the other hand, 33.8 percent are under the custodianship and management of non-state entities. These include Co-operative societies, NGOs, Faith Based Organisations, CBOs and private citizenry. 1.6 per cent of the public spaces have a joint management arrangement. Joint management is a form of management exercised by multiple parties such as beneficiaries and NGOs or FBOs or the government and Civil Society organisations. One example is the management of Karura Forest. In addition, 30.51 per cent of all public spaces are under the custodianship of private citizens. These spaces are largely undeveloped land which is being enjoyed by the public. Moreover, 11.2 percent of all public spaces do not have any form of management nor custodianship, exposing them to misappropriation. This points to a need in the society, and a gap that can be explored by unscrupulous private developers.



The above map shows the management and custodianship of public spaces in Nairobi

A large proportion of public spaces, particularly the ones under the custodianship of the county government, lack adequate management. Majority of them show no form of management nor maintenance. As such, several of the spaces, especially at the neighbourhood level and within residential estates, are facing various threats including territorial encroachment, decline and misappropriation. This acute shortage of management is attributed to inadequate budgetary allocation by the city county administration. This has far-reaching effects in as far as the provision, management and maintenance of public spaces, and provision of services therein is concerned. Public open spaces under the custodianship of community based organisations and other community groups are generally perceived to be safe. This is largely attributed to the strong social fabric and the principle of communitybased management. Classic examples are in Dandora and Korogocho which had for a long time been infamous for high levels of organized crime, rape, and gang violence among other forms of crime. Today, locals and visitors alike perceive public spaces in these communities as safe oases. This is attributed to the local youth rising

Custodianship & Management of public spaces by Government



Public open spaces under the custodianship of community based organisationss and other community groups are generally perceived to be safe.



A well-maintained courtyard at Mustard Seed Court in Dandora Phase 2 © Mark Ojal

to reclaim, clean-up and beautify the spaces. This underscores the central role of community-led co-production of public space and communitybased management of public spaces in creating safer cities and communities.

COMFORT IN PUBLIC SPACES

The level of comfort and imageability of a public space is key to its success. Comfort is a function of perception of safety, cleanliness and the environmental quality. Think about a public space with no shade from the sun, another with all amenities but full of garbage and bad odour, and another with adequate amenities, clean environment but has too much noise. All the three spaces have one thing in common - lack of comfort. For a city that seeks to turn the experience of its public spaces around and build its image, working towards providing high quality and pleasant public spaces is imperative. Lessons from across the world show that cities that strive to keep their public spaces cleaner are generally perceived to be cleaner, safer and more pleasant than cities that have rundown public spaces.

NEMA regulations on ambient noise level recommend a maximum of 55db during the day in areas perceived to be predominantly residential, institutional, and educational while in areas perceived to be predominantly industrial, and commercial, the maximum allowable noise level during the day is 70 db. The survey found that 245 public open spaces in the city have a noise level measuring between above 70db. In addition, it found that 350 of public spaces in Nairobi have uncollected garbage and environmental quality in 111 public open spaces are in a bad situation and is a health hazard. Furthermore, the survey found that bad odour was present in 49 of the public spaces. Uncollected garbage not only gives a negative image about the city but also discomfort and poses various forms of health-related risks to city dwellers.

30.8 percent of public spaces in Nairobi are uncomfortable to be in with only 10.8 percent being comfortable for enjoyment.



Fairly comfortable public spaces

Comfortable public spaces

Uncomfortable public spaces

The above map shows the level of comfort of public spaces in Nairobi



FACTORS AFFECTING COMFORT IN PUBLIC SPACES



For a city that seeks to turn the experience of its public spaces around and build its image, working towards providing high quality and pleasant public spaces is imperative.

Uncollected garbage also significantly impacts the city. It not only gives a negative image about the city but also discomfort and poses various forms of health-related risks to city dwellers. Experiences from across the world show that public spaces with uncollected garbage are generally perceived to be dangerous places and crime hot-spots. As such, the public tend to avoid such spaces. Trees are another important contributor to the comfort and safety in public spaces and the city at large. Aside from enhancing the landscape and ameliorating the city image, they abate noise through various natural mechanisms including transferring sound to other objects, altering the direction of sound, bouncing the

sound back to its source, bending sound waves around an object, and blending irritating sound with more pleasant sound. According to (FAO, 1998), trees, other vegetation and landforms can reduce highway noise by 6-15 decibels. Moreover, public open spaces with trees tend to be used much more than the ones without trees. This is largely attributed to



City residents enjoying themselves at Uhuru Park © Mark Ojal



A group of men resting under shade along the Ngong' road reserve © Mark Ojal

the micro-climate created by shade from tree canopies (Warwick District Council, 2003). With trees and vegetation, temperature reduces with between 2 to 6 degrees centigrade, reducing heat island effect and making the spaces pleasant to linger in. In Nairobi however, only 48.4 percent of the public open spaces have trees and vegetation.



ACTIVITIES AND USES

Great places are attractive, not just by design but also the diversity of activities and uses therein. They are places where celebrations are held, social and economic exchanges occur, where strangers meet other strangers, where friends run into one another, and where people from different walks of life meet as civic equals - where ethnic, social and economic tensions are overlooked and disparate sectors of society blend harmoniously.

Diverse activities and uses that take place in public spaces contribute to advancing and developing the culture and norms of host communities. Urban agriculture for example strengthens the city's food security and promotes a stronger social fabric. Outdoor sports activities such as roller skating, football, basketball and jogging not only contribute to creating a healthy and physically fit citizenry but also create a platform for education, bonding and engaging with young people. As such, it goes a long way in building a safer and cohesive community and city at large. Vending on the one hand contributes to livelihood opportunities while art and culture related activities contribute to the preservation of cultures, showcasing of various traditions and heritage. On the other hand, anti-social activities have the effect of repelling people from using and experiencing public open spaces. As such, fostering a polarized city and reinforcing inequalities, crime and violence.

Outdoor sports activities such as roller skating, football, basketball and jogging not only contribute to creating a healthy and physically fit citizenry but also create a platform for education, bonding and engaging with young people. As such, it goes a long way in building a safer and cohesive community and city at large







Public spaces in the city were categorized based on the nature of their functionality. As such, the spaces were categorized as either monofunctional, pluri-functional or multifunctional. The survey found that 25.2 percent of the public spaces are mono-functional. This means that the spaces are used for singular activities. An example is a sports field which is used only as a football pitch and nothing else or even a basketball court whose use is limited to basketball only. In addition, the study revealed that 36.7 percent of the public spaces are pluri-functional. Pluri-functional public spaces are public spaces which are used for multiple activities at the same time Nairobi. This category is exemplified by Uhuru Park, which is used for preaching, resting, canoing, informal meetings, food vending, and taking a walk; and City Park which is used for bird watching, jogging, resting, and nature walks among other uses. All these happening simultaneously. On the other hand, 45 percent of the public spaces are multi-functional. Multi-functional public spaces are public spaces that are used for different functions at different times of day and week. An example is the Sunken Car Park which is used for



Young people skate at the Sunken Car Park © Placemakers/Mwaura Kimani



Non-organised activities

different activities on different days of the week. During the week, the space is used as a public parking lot while on Sundays, it is used as a skating rink.

From the study, public spaces with comparatively strict management tend to attract organized activities while those without a strict management tend to attract non-organised activities.



LANDSCAPE FURNITURE AND AMENITIES

Studies show that physical attributes of public spaces may affect social interactions, comfort and perception of safety and security therein, either positively or negatively. Moreover, they are key to the liveliness and vitality of the spaces. Similarly, landscape furniture and amenities create excellent settings for resting, sitting, eating, waiting, people-watching and social encounters. They add a sense of comfort and pleasure to public spaces, inviting people to stay and linger. When appropriately designed and well-integrated into the space, furniture and amenities can draw people to public spaces, adding to the experience of using the spaces and making people feel relaxed, welcome and involved. Key landscape furniture and amenities in successful public spaces include enough lighting, flexible seating, signage, water features, washrooms, drinking water points and adequately distributed and functional waste receptacles among others.

When appropriately designed and well-integrated into the space, furniture and amenities can draw people to public spaces, adding to the experience of using the spaces and making people feel relaxed, welcome and involved.

The study found that 316 public spaces have lighting, of which only 108 spaces have their lamps in good condition. Public spaces with adequate lighting are more likely to remain vibrant even during the night as they tend to feel safer and welcoming. An example is Jeevanjee Gardens at the heart of the CBD. As a result of improvement of lighting within the Garden, the space attracts diverse users including young women during the night. In some instances, one may find university students holding parties in the Garden and catching up with friends after school.

LEGEND

Public spaces without lighting

Public spaces with lighting

Nairobi National Park



Great public spaces provide people with diverse choices in as far as seating is concerned. These could be in form of ledges, steps, benches and movable chairs. Further, seating that is accessible, comfortable, movable, well-maintained and well-positioned is critical to creating great peopleplaces. The assessment revealed that only thirty-six public spaces have seating. Of the thirty six public spaces, the condition of seating is only good in nine public spaces. This is indeed a major impediment to the use and experience of public open spaces as it is intricately linked to the comfort and image of individual public open spaces. In addition, signage is available in seventy-eight public spaces. Further, such basic amenities as washrooms are only available in fifty-four public spaces, of which the ones in good condition are in just thirteen public spaces.

It is also worth noting that in the entire city, water points are in just five public spaces, and that no public space has a bicycle parking rack.



Band stand at City Park © Mark Ojal





Children Corner at Mlango Kubwa in Mathare © Kirsten Milhahn





ENVISIONING PUBLIC SPACE IN NAIROBI

• The vision

• Recommendations and way forward



THE VISION

The Initial Nairobi public realm vision was prepared based on various engagements with actors on public spaces in the city and includes six strategic directions for Nairobi city, which form a baseline for the vision:

A place that is easy to get around; A vibrant mix of activities and uses; A distinctive city image and diverse character; A great place for families; A high quality public realm; A healthy place for everyone; Smart environmental solutions.



Existing public open spaces

Proposed public open spaces

Nairobi National Park

A possible public space system in Nairobi





RECOMMENDATIONS & WAY FORWARD

REC: 1 PROTECT AND REVITALISE PUBLIC SPACES

- The government should adopt a multi-pronged approach such as enforcement of laws, partnerships and collaborations with civil society groups, residents associations and state departments to ensure that public spaces are protected from illegal allocation to private entities, change of use, and destruction by mega infrastructure projects and conserved for future generations to use and enjoy.
- Embrace social programing and innovative design solutions to transform inactive public spaces into inclusive, welcoming and safe destinations. When public spaces are vibrant and welcoming, they not only build civic pride and cultivate a sense of ownership amongst the general public but they also protect them from misappropriation.
- Embrace and support low-cost placemaking interventions to revitalize and improve the quality of public spaces. This would not only ensure sustainability and perpetuity of the public spaces but will also help create ownership and place-attachment among city residents.



- Through an elaborate legal framework, policies and partnerships with various actors, promote governance and management models that foster social inclusion, universal accessibility and safety of public spaces while maintaining sustainability of the guality of the services therein.
- Explore innovative funding mechanisms including developing themed spaces within public spaces, ring fencing, events, tax assessments of properties in close proximity, rents, value sharing with motorists, corporate sponsorships, and charging for particular uses like parking and weddings in order to raise money for maintenance and management of public spaces.
- Integrate Crime Prevention through Environmental Design (CPTED) principles in the improvement of comfort levels by improving the general environmental guality particularly solid waste management.



- Anchor public space in the urban planning of the city in order to create more public spaces in a sustainable and systematic way. Leverage urban planning tools such as land readjustment, urban renewal and land value sharing to create more public spaces.
- Expand the public space system by creating and promoting incentives and programs to encourage private open spaces like schools, sports clubs, golf courses and public institutions to open their open spaces for public use and enjoyment on days of the week.
- Create and or strengthen and enforce regulations that compel property developers to surrender a portion of their developable land to the city for use and experience as public open space.
- The Nairobi Metropolitan Services and relevant state departments should allocate resources for the creation of new public spaces, the protection and management and maintenance of existing ones.



 In collaboration with the national government agencies such as the National Lands Commission, urgently initiate an in-depth audit of all public land within the city county and the wider Nairobi Metropolitan Area to establish the ownership and use of all public land and public spaces. Initiate and speed up recovery of all land that was initially set aside as public open space but has since been transferred to private entities.

RECLAIM AND RECOVER ALL LAND THAT WAS

REC: 5 HEIGHTEN PUBLIC AWARENESS ON THE CO-**BENEFITS OF PUBLIC SPACES**

- Ensure that public space is an integral part of the city's normative programs, implementation of the NIUPLAN, urban regeneration and any other future road-map.
- Popularize public spaces among Nairobians. Some policy directions could include:
 - Creation and publicity of incentive schemes and programs inviting and encouraging the private sector and community groups to invest in upgrading and maintaining public spaces.
 - Promotion of outdoor programs or physical activities in public spaces.
 - Requiring television broadcasters to provide as much airtime time for promoting the use and benefits of public space as they give to promoting their programs and commercial advertisements.
 - Promotion of public space activation events like street festivals, Placemaking Week Nairobi, open air concerts and marathon for public spaces among others.



- Strengthen the capacity of the directorate of urban design and open space management both financially and institutionally in order to break silos and consolidate all public space related programs, initiatives, projects and activities. As such, widen the scope of the directorate to include research on new innovations, design and implementation of public space reclamation and revitalisation interventions, monitoring and reporting on the state of public spaces, and management of public open spaces.
- Develop a policy to facilitate partnerships with stakeholders to participate in the city's public space agenda. This would be important in encouraging and inviting diverse stakeholders to participate in the planning, design, implementation, protection and management of public spaces.



REC: 6 **PROMOTE PARTNERSHIPS AND** COLLABORATIONS AROUND PUBLIC SPACE

- Explore and cultivate innovative partnerships with the academia, professional bodies, research institutions and the private sector among others to provide design, management and programming solutions for the city's public spaces by incorporating the public space agenda in their curricula. This could be modelled into innovative competitions and internship opportunities such as the Public Space Network that not only promote knowledge management and capacity building but would also reduce costs for the implementation.
- Review procurement and Public Private People Partnership guidelines to ensure that they do not create unnecessary barriers to the participation of potential partners. It should further ensure that the laid down procedures and regulations are part of the solution and not the problem.



- Through targeted and strategic approaches, plan, design and implement public space interventions as a system. Connect public spaces and other destinations through such elements as green belts, riparian reserves, infrastructure Rights of Ways, pedestrian-priority streets, sidewalks and bike lanes to form a citywide network.
- In collaboration with key stakeholders like the Kenya Railways, KPLC, and Kenya Pipeline Company, design and implement non-traditional public spaces such as electricity way leaves, railway reserves and arterial interchanges among others as amenity green spaces. This could be an innovation for protecting infrastructure rights-of-way, flight paths and the dangerous open fields like electricity and pipeline way leaves from territorial encroachment.

RESTORE AND STRENGTHEN THE CITYWIDE NETWORK OF GREEN, AND PUBLIC SPACES



RECLAIM AND UPGRADE BLOCK & NEIGHBOURHOOD LEVEL PUBLIC SPACES

In collaboration with community groups working at the grassroots level and the relevant state agencies, reclaim and upgrade playgrounds, sports fields and courtyards and transform them into timeless 'oases' for enjoyment of the residents. Children in particular would enjoy safe play opportunities closer home. In many neighbourhoods, these spaces are filled with stationary vehicles, garbage, and in some instances, extensions of housing.

EMBRACE SOCIAL PROGRAMMING TO CREATE MORE PUBLIC SPACES

As part of revitalizing public spaces and heightening awareness, embrace social programming activities such as Placemaking Weeks, Car Free Days, Open Streets and Live Love Nairobi Festival to encourage Nairobians to get out and enjoy walking, shopping, display of arts and performances, and cycling for health and life. This will not only create place-attachment but will also encourage urban tourism and environmental stewardship.





EMBRACE AND SUPPORT INNOVATIVE AND CREATIVE DESIGNS

Embrace low-cost high-impact up-cycling design ideas from the community to transform block-level and neighbourhood public spaces. This would not only create unique identities but will also encourage children and youth to take part in the transformation of public space



MAINSTREAM COMMUNITY-LEVEL PLACEMAKING TRANSFORMATIONS

Through the Kazi Mtaani Initiative and others, support and institutionalize the Changing Faces Competition to support the work of the Nairobi Metropolitan Services to transform block-level and neighbourhood public spaces into people-places.









CREATE MORE PUBLIC SPACES TO MEET THE EVER INCREASING NEED

REGENERATE NAIROBI RIVER AND INFRASTRUCTURE ROW AS A CONNECTIVE MATRIX

Increasing the overall supply of public space in Nairobi can be achieved by transforming Nairobi River system into a network of public spaces interlinking neighbourhoods and the city with walking trails and cycling networks. In addition, reclaim electricity way leaves and railway reserves and convert them into linear parks to protect them from encroachment.



CREATE A NETWORK OF NEIGHBOURHOOD FORESTS, PARKS AND GARDENS AROUND THE CITY

As part of Nairobi regeneration and urban renewal initiatives, create a network of neighbourhood forests, parks and gardens to create an ecological network in the city. This will not only encourage physical activity but will also ensure adequate distribution of public spaces across all sub-counties and the wider Nairobi Metropolitan Area, promoting biodiversity, reducing CO₂ emissions and abating heat island effect.





REPURPOSE DISUSED QUARRIES INTO MULTI-PURPOSE PUBLIC SPACES

In order to promote urban tourism, diversify the economy and create more local jobs, transform disused quarries and illegal dumpsites into multi-purpose adventure parks with diverse features including cliff-jumping, rock climbing, swimming, kayaking, scuba diving, climbing and rappelling, wake-boarding, rope-swings, zip-lining and water slide. This will not only encourage water sports but the quarries can also act as water reservoirs for the city as well as places for fish farming to promote local livelihoods.



DESIGN STREEETS AS PUBLIC SPACES

Design streets in the city centre, the east of Tom Mboya street, Ngara area, Eastleigh, Westlands and South C as public spaces, integrating opportunities for lingering and stay, walking and cycling, and enjoyment. This will not only transform the image of the city but will also help reduce air pollution, raise property values and the visual appeal of these places. Streets are a strategic entry-point for urban regeneration.









CREATE PUBLIC SPACES THAT OFFER SOMETHING FOR EVERYONE

Revitalize public spaces by introducing diverse activities that offer opportunities for everyone including children, the elderly, teenagers, young adults, and women and girls. In addition, develop flexible social programs that activate public spaces all-year round.



ENSURE CLEAR SIGHTLINES IN AND THROUGH PUBLIC SPACES

Integrate Crime prevention through environmental design principles by designing public spaces without low foliage that would otherwise provide concealment opportunities and encourage crime. Provide opportunities for parents to watch over their children as they play.



ENSURE ADEQUATE LIGHTING IN PUBLIC SPACES

Integrate Crime Prevention Through Environmental Design (CPTED) principles by designing public spaces without low foliage that would otherwise provide concealment opportunities and encourage crime. Provide opportunities for parents to watch over their children as they play. In addition, improve public lighting in public spaces.



INTRODUCE PAID THEMED SPACES AND CORPORATE SPONSORSHIPS

Create themed spaces that offer different experiences within public spaces. For example, build a museum within City Park to celebrate natural history of Kenya. Such spaces can then be charged to support maintaining the park. In addition, encourage corporate events that can be paid for and revenues ring-fenced to support the spaces where they take place.







RESTORE THE CITY-WIDE NETWORK OF GREEN, AND PUBLIC SPACES



SUPPORT ACQUISITION OF LAND FOR PUBLIC SPACE

To increase the quantity of public space available throughout the city, land can be acquired through urban planning tools such as land readjustment, urban renewal and compulsory acquisition of strategic land.



PUBLIC SPACE

finalized and ratified.



ENSURE PUBLIC AND PRIVATE SECTOR PARTICIPATION IN THE DESIGN, IMPLEMENTATION AND MAINTENANCE OF PUBLIC SPACES

Including both public and private sector participation in the design, implementation and maintenance of public spaces will engender a sense of ownership of these spaces, increasing the likelihood the spaces are well utilized and remain free from vandalism. This can be achieved through encouraging public participation during the design phase and and engaging communities in the management and maintenance of the neighbourhood and block level spaces.



70



DEVELOP STANDARDS AND GUIDELINES AROUND

A wide range of universal guidelines and standards for public space already exist, including the Physical Planning Handbook and the draft Urban Design and Development Control Guidelines. The development control guidelines need to be





PROVIDE RULES AND REGULATIONS THAT GUIDE THE USE AND ENJOYMENT OF PUBLIC SPACES

Due to the high levels of littering and illegal dumping of garbage in public spaces and illegal discharge of raw sewer into rivers, harmonize environmental laws and by-laws that prohibit environmental crimes while also providing for standards of acceptable behaviour, which can then be enforced both by the city authority in partnership with community groups managing public spaces.



Neighborhood public space planning

Block-level creation or upgrading

DEVELOP ACTION PLANS THAT ARE SYNCHRONIZED WITH THE NIUPLAN.

The Nairobi Metropolitan Services and other state departments should adopt strategies and prepare action plans that are practical, implementable and are in line with the aspirations of the Nairobi Integrated Urban Development Masterplan. As part of the urban regeneration initiatives, identify at least ten flagship projects along the Nairobi river which can kick-start the transformation of Nairobi River Regeneration.



PUBLIC SPACES.

In order to ensure the longevity of public spaces, institutionalization of public space in normative programs of state departments, the Nairobi City County and the Nairobi Metropolitan Services, develop a public space policy that brings all actors together to implement a common vision and strategy.



FORMULATE STRATEGIES, POLICIES AND LAWS FOR



WAY FORWARD

CARRY OUT VALIDATION WORKSHOPS AT THE SUB-COUNTY LEVEL

In the spirit of devolution, the study team recommends carrying out validation workshops in all the seventeen (17) sub counties in the City County. The validation workshops would be useful for gathering views, perspectives, opinions and feedback from community members, and the Nairobi Metropolitan Services and Nairobi City County Staff at all levels. The exercise should also incorporate an element of needs assessment to establish priority areas from through then of the community. Of interest would be the voices of children, youth, women, the elderly and persons with disabilities.

DEVELOP A CITY-WIDE STRATEGY FOR PUBLIC SPACE

The findings of the survey should be used as the basis for the development of a citywide strategy for public space. The strategy should not only outline special areas for intervention but should also give directions on the strategic and targeted policy areas for the protection and upgrading of existing public spaces and provide ideas for community involvement in the revitalization, management and protection of public spaces. Furthermore, the strategy should identify milestones and action points towards achieving vision 2030, the Sustainable Development Goals and the Africa Agenda 2063. It should give clear guidelines on how to protect, create, design, implement and manage public spaces in a sustainable way. This should feed into the Detailed Area Plans that the city is embarking on to implement the aspirations of the Nairobi Integrated Urban Development Masterplan (NIUPLAN).


12310

so h.





- Annex
- References



	PUBLIC SPACES IN NAIROBI								
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)				
1	Ngong Forest	Urban forest	City_level	Ngong road	2475.35				
2	Karura Forest	Urban forest	City_level	Limuru road	2294.70				
3	n/a	Street corner	City_level	Next to easy coach	0.40				
4	No name	Street corner	Pocket Park	Juja road	0.14				
5	Moi Av - Haile sellasie Av corner	Street corner	Pocket Park	Moi Avenue, next to St. Pauls university	0.24				
6	Point zero space	Street corner	Pocket Park	Nairobi Gallery	0.32				
7	Baba dogo Street corner	Street corner	Pocket Park	Outtering_Baba dogo junction	0.72				
8	KICC Square	Square	City_level	Kenyatta Avenue /Uhuru Highway	12.58				
9	Railways Bus Station	Square	City_level	Haile Selassie Avenue	4.30				
10	Tom Mboya Square	Square	City_level	National Archives	1.22				
11	AP Kibera Chief's Camp Square	Square	Neighborhood	Kibera Drive	0.59				
12	Moi drive space	Square	Neighborhood	Moi drive	0.55				
13	Jerusalem 1	Square	Block level	Jerusalem shopping centre	1.00				
14	Umoja Square 2	Square	Neighborhood	umoja assistant chief	1.03				
15	Umoja Square 1	Square	Neighborhood	umoja	0.93				
16	Tena Square	Square	Neighborhood	Saints Celebration Family Church	1.24				
17	Open air market space	Square	Neighborhood	Market next to Ndwaru house	0.28				
18	No name	Square	Neighborhood	Kahawa West Market	1.39				
19	Pioneer phase 1 Square	Square	Neighborhood	Mumias road_Ottering	1.05				
20	Uhuru estate shopping centre Square	Square	Neighborhood	Buruburu road	1.88				
21	Kariobangi south Square	Square	Neighborhood	Mutarakwa road	0.59				
22	KNH Estate Playground	Sports field	Neighborhood	Ngong road	7.94				
23	Undugu Grounds Silanga	Sports field	Neighborhood	Kibera	3.05				
24	Makadara football grounds	Sports field	Neighborhood	Jogoo road/Hamza	4.19				
25	Jericho Playground	Sports field	Neighborhood	shule road	5.52				
26	Uhuru Estate Playground	Sports field	Neighborhood	Buruburu road	1.58				
27	Shauri Moyo community field	Sports field	Neighborhood	Kamukunji road	6.44				
28	Goan Sports field	Sports field	Neighborhood	Juja Road/ Galberobe road	6.33				
29	Dandora dunia grounds	Sports field	Neighborhood	Dandora police station	3.37				
30	Kaloleni Playground	Sports field	Neighborhood	Kaloleni social hall	0.66				
31	Laini saba sportsfield	Sports field	Neighbourhood	Amref	1.20				
32	Joseph Kangethe Grounds	Sports field	Neighborhood	Joseph Kangethe	7.19				
33	Makongeni grounds	Sports field	Neighborhood	Makongeni	4.23				
34	Mix kiwanja	Sports field	Neighborhood	Makongeni	2.90				
35	City inspectorate Playground	Sports field	Neighborhood	Ngong Rd	3.33				
36	Huruma flats playing field	Sports field	Neighborhood	n/a	0.87				
37	Police LINE	Sports field	Neighbourhood	Zanzibar Road	6.78				
38	Child survival Playground	Sports field	Neighborhood	Next to Nairobi River	1.80				
39	Kinyago United Soccer Field	Sports field	Neighborhood	First Avenue Eastleigh	0.66				
40	Umeme Playground - Ziwani	Sports field	Neighborhood	Kinyanjui street	2.28				

PUBLIC SPACES IN NAIROBI								
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)			
41	Kia miako stadium	Sports field	Neighborhood	Archbishop manasses kuria road	3.21			
12	Unnamed playfield	Sports field	Neighborhood	Kibiku Road	7.45			
3	Karagita stadium	Sports field	Neighborhood	Kigwathi Road	5.44			
4	Mihangoi playfield	Sports field	Neighborhood	Mihango SDA chrich	9.90			
5	Apostolic Carmel Sisters Playing Ground	Sports field	Neighborhood	"Donholm Road 285-00515,Buruburu"	2.02			
6	Maringo estate playfield	Sports field	Neighborhood	Ruiruaka crescent	2.62			
7	Tassia playfield	Sports field	Neighborhood	Opposite Tassia police patrol base	0.84			
8	Nyayo estate playfield	Sports field	Neighbourhood	Nyayo estate	0.50			
9	Greenfields Playground	Sports field	Neighborhood	Behind greenfields shopping centre	1.05			
)	bumbani court b.ball court	Sports field	Block level	buchuma crescent	0.32			
	Calvary Playground	Sports field	Neighborhood	Komarock sector one rd	3.14			
)	Hope Centre soccer grounds	Sports field	Neighborhood	Serenity Lane	1.90			
3	Kirima grounds Kariobangi	Sports field	Neighborhood	ACK St. Michaels and All Angels parish	3.26			
4	Bahati sports ground	Sports field	Neighborhood	Heshima road	1.34			
5	Tena grounds	Sports field	Neighborhood	Off Manyanja Rd	7.64			
6	Tena Soccer field	Sports field	Neighborhood	MOther Teressa Catholic Church	1.15			
7	Umama Playground	Sports field	Neighborhood	Kangundo rd	5.49			
8	Hope centre soccer grounds 2	Sports field	Neighborhood	Serenity Lane	0.91			
9	Ngara railways estate field	Sports field	Neighborhood	Ngara Railways Estate	2.19			
0	No name	Sports field	Neighborhood	Mathioya Rd	0.48			
1	Donholm phase 5 playfield	Sports field	Neighborhood	30075	0.60			
2	Un-named field	Sports field	Neighborhood	Kamuthi	1.78			
3	Buruburu phase 2 Playground	Sports field	Neighborhood	Behind Oilibya	0.50			
4	Muhuri Muchiri Stadium	Sports field	Neighborhood	n/a	15.46			
5	Buruburu sports ground	Sports field	Neighborhood	ACK St. James Church Mumias road	4.03			
6	Old race course estate phase 3 Sports field	Sports field	Neighborhood	Behind Starehe Boys centre	0.54			
7	St. John community Playground Korogocho	Sports field	Neighborhood	St. John Korogocho	0.57			
8	Dandora phase 5 Sports field	Sports field	Neighborhood	Joy Villa school	0.44			
9	Ayiera initiative Sports field	Sports field	Neighborhood	Korogocho	0.38			
0	Lucky Summer Playground	Sports field	Neighborhood	n/a	0.64			
1	Vet Lab community field	Sports field	Neighborhood	Loresho Ridge	3.11			
2	Mbotela playfield	Sports field	Neighborhood	Njiwa road	2.51			
3	Supreme Court Parking	Public Parking lot	City_level	Lt. Tumbo road	1.61			
4	Pangani Shopping centre Parking lot	Public Parking lot	Neighborhood	Juja Road	0.86			
5	Laico car Park B	Public Parking lot	City_level	Kenyatta Avenue	3.69			
6	Otiende Shopping centre Parking lot	Public Parking lot	Neighborhood	Kungu karuma rd	0.51			
7	Nairobi Chapel Parking	Public Parking lot	City_level	Jamhuri Park Rd	5.99			
8	Uchumi Buruburu Parking lot	Public Parking lot	Neighborhood	mumias road	0.68			
'9	Buruburu shopping centre Parking	Public Parking lot	Neighborhood	sonko road	1.06			
80	Utalii street Parking lot	Public Parking lot	City_level	Utalii Street	0.71			

			PUBLIC SPACES IN NAIROBI		Naliobi, the Green city in the
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)
81	Karen shopping centre Parking	Public Parking lot	Neighborhood	Behind crossroads mall	0.42
82	No name	Public Parking lot	Block level	Moi drive	0.11
83	Hamza car Park	Public Parking lot	Neighborhood	Hamza road	0.62
84	Makadara shopping centre Parking lot	Public Parking lot	Neighborhood	Maendeleo road	0.75
85	Cassanova Parking	Public Parking lot	Neighborhood	n/a	0.21
86	Stady	Public Parking lot	City_level	Lusaka road	2.29
87	Kenyatta Market Parking	Public Parking lot	City_level	Mtongwe road	0.48
88	Kenyatta Market Parking	Public Parking lot	City_level	Mtongwe Rd	0.53
89	Maringo shopping centre Public Parking lot	Public Parking lot	Neighborhood	Jericho Health Centre	2.02
90	Ofafa Jericho shopping centre carPark	Public Parking lot	Neighborhood	n/a	0.65
91	Beverly	Public Parking lot	Neighborhood	Juja road	0.66
92	Buruburu phase 1 Parking lot	Public Parking lot	Neighborhood	Wang'ombe road	0.50
93	Telecom Grounds	Playground	City_level	Ngong road	68.42
94	PCEA grounds	Playground	Neighborhood	n/a	0.37
95	Jesus Souls Care Centre	Playground	Block level	Mowlem Baraka	0.18
96	Desa Ground	Playground	Neighborhood	Marimbi Street	0.41
97	Eastleigh community centre field	Playground	Neighborhood	Presbyterian church	5.44
98	Ngara. Civil servants estate Playground	Playground	Block level	Desai Road	0.49
99	Huruma flats playing ground	Playground	Block level	n/a	0.72
100	Huruma flats playing field	Playground	Block level	n/a	0.69
101	Huruma flats playing field	Playground	Block level	n/a	0.77
102	Huruma flats playing field	Playground	Block level	n/a	0.95
103	Undugu society Playground	Playground	Neighborhood	Off juja road	0.55
104	Ngara Estate Playground	Playground	Block level	Ngara Road	1.05
105	Buruburu Phase 5 Playground	Playground	Neighborhood	Katulo road	0.98
106	Nyayo estate Playground	Playground	Block level	Nyayo estate - Eb05-035	0.37
107	Pipeline estate Playground	Playground	Block level	Pipeline estate	0.34
108	Avenue Park estate Playground	Playground	Block level	Outerring road	1.23
109	Komarock Playground	Playground	Neighborhood	Off Malewa rd	1.34
110	plaground (Block P11)	Playground	Block level	shule road	1.79
111	Phase 3A hatha court	Playground	Block level	Malewa Rd	0.66
112	Komarock Phase III Playground	Playground	Block level	Malewa rd	0.51
113	Komarock Phase 5	Playground	Block level	Komarock Phase 5	0.24
114	PAA crescent Playground	Playground	Block level	PAA crescent	0.33
115	Huruma flats playing field	Playground	Block level	n/a	0.78
116	MCEDO Playground	Playground	Neighborhood	Cosovo road	3.11
117	Ojimbo ground	Playground	Neighborhood	Jogoo road	3.18
118	High rise Playgrounds	Playground	Neighborhood	Off Digo Road	1.17
119	Jerusalem 2	Playground	Block level	Jerusalem	0.38
120	Buruburu phase 4 Playground	Playground	Block level	Buruburu phase 4	0.24

PUBLIC SPACES IN NAIROBI							
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)		
121	Jamhuri Phase I Playground	Playground	Neighborhood	Kibera Station Rd	1.30		
22	Hazina estates	Playground	Block level	Sore road	2.63		
23	Austins field	Playground	Neighborhood	Juja road	0.36		
24	-	Playground	Neighborhood	Mau mau road	0.35		
25	Santiago field	Playground	Neighborhood	Hamza road	0.89		
26	Open space	Playground	Neighborhood	Friends church Makadara	0.81		
27	Nyayo estate Playground	Playground	Neighborhood	Nyayo Estate	2.69		
28	Fedha estate Playground	Playground	Block level	Fedha Estate	4.82		
29	Mbotela posta	Playground	Block level	Ngiri road	2.40		
30	Nyayo estate	Playground	Block level	Nyayo estate	0.44		
31	Nyayo estate Playground	Playground	Block level	Nyayo estate	0.70		
32	Kimathi 4	Playground	Block level	Kimathi	0.41		
33	Jericho Courtyard	Playground	Block level	charles new road	0.31		
34	Jericho Courtyard	Playground	Block level	Gura close	0.77		
35	No name	Playground	Neighborhood	Salim Rd	0.15		
36	St. John field	Playground	Neighborhood	n/a	4.52		
37	No name Playground	Playground	Block level	Ngong road	0.29		
38	Unnamed estate along ngong road	Playground	Block level	Opp. telecoms ground	0.24		
39	Golden gate estate Playground	Playground	Block level	Karuku road	0.63		
40	Golden gate Playground	Playground	Block level	Golden gate road	0.40		
41	Riverbank phase 1 Playground	Playground	Block level	Plainsview road	0.35		
42	Rubi estate south C Playground	Playground	Block level	Muhoho road	0.84		
43	Mbugani estate Playground	Playground	Block level	K.L.B road	1.20		
44	DG Oasis estate soutch CCourtyard	Playground	Block level	South C	0.19		
45	Mugoya estate south C Playground	Playground	Block level	Mugoya estate	0.24		
46	Five star phase 2 Playground south C	Playground	Block level	south C	0.30		
47	Mugoya estate south C Courtyard	Playground	Block level	Mugoya shopping centre	0.26		
48	Nairobi west estate Playground	Playground	Neighborhood	Sumba road	1.66		
49	Swara crescent Playground	Playground	Block level	Niamey lane	0.97		
50	Punda milia crescent	Playground	Neighborhood	Near Darajani	0.61		
51	Swara Playground	Playground	Block level	Swara crescent	0.35		
52	Kifaru Playground	Playground	Block level	Kifaru crescent	0.36		
53	Kifaru crescent Playground	Playground	Block level	Kifaru crescent	0.32		
54	Swara crescent Playground	Playground	Block level	Swara crescent	0.28		
55	PAA crescent Playground	Playground	Block level	PAA crescent	0.35		
56	Rubia estate Playground	Playground	Block level	Rubia estate	0.37		
57	Rubia estate Playground	Playground	Block level	Rubia estate	0.29		
58	Rubia estate Courtyard	Playground	Block level	Rubia estate	0.37		
59	Rubia estate Courtyard	Playground	Block level	Rubia estate	0.25		
60	Uhuru Gardens estate Phase 2 Playground	Playground	Neighborhood	Uhuru Gardens phase 2	0.24		

			PUBLIC SPACES IN NAIROBI		Naliobi, the Green city in the Su
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)
161	Akiba Bellevue estate Playground	Playground	Block level	Red cross road	0.60
162	KMA estate Playground	Playground	Block level	Muhoho Avenue	0.42
163	Donholm phase Playground	Playground	Neighborhood	Kayole spine road	0.44
164	Deliverance Church Umoja Kangundo Road	Playground	Neighborhood	Kangundo Road	1.99
165	southlands estate Playground	Playground	Block level	Southlands estate	0.26
166	Park 2 estate Playground	Playground	Block level	ClayCity Rd	0.77
167	Brescia Playground	Playground	Neighborhood	City Chicken Rd	8.95
168	Haco Industries	Playground	Neighborhood	Kasarani Rd	4.05
169	Ngei phase 4 Playground	Playground	Neighborhood	Maboko crescent	1.43
170	Obama estate offices	Playground	Neighborhood	Extension way	0.91
171	Akiba estate Lang'ata Courtyard	Playground	Block level	off Kitengela road	0.31
172	Njathaini play ground	Playground	Neighborhood	Chief's road	1.26
173	Buruburu phase 5 Playground	Playground	Block level	Wang'ombe road	0.24
174	Buruburu phase 5 Playground	Playground	Block level	Wang'ombe road	0.24
175	Buruburu phase 5 Playground	Playground	Block level	Wang'ombe road	0.15
176	Buruburu phase 5 Playground	Playground	Block level	Wang'ombe road	0.18
177	Buruburu phase 1 Courtyard	Playground	Block level	St. James Medicall centre	0.18
178	Githurai Playgrounddemy	Playground	Neighborhood	Ngumba road	2.17
179	ClayWorks Playground	Playground	Neighborhood	Thika Rd	36.46
180	Kiwanja playing ground	Playground	Neighborhood	Kiwanja	2.92
181	Kiwanja playing field	Playground	Neighborhood	PEFA church kiwanja	6.08
182	Buruburu phase 1 Playground	Playground	Block level	Ol Debi rd	0.18
183	Nazing crescent Playground	Playground	Block level	Nazing crescent	0.20
184	NYC	Playground	Neighborhood	29-30	3.28
185	Old race course estate phase 3 Playground	Playground	Block level	Behind Starehe Boys centre	0.12
186	Old racecourse estate phase 3 Playground	Playground	Block level	Behind Starehe Boys centre	0.33
187	mathare north social hall backyard	Playground	Block level	n/a	0.12
188	Baba dogo sports ground	Playground	Neighborhood	Off baba dogo road	15.39
189	Harambee estate Playground	Playground	Neighborhood	Harambee police post	0.45
190	Magunga B court Playground	Playground	Block level	Bombani road	0.31
191	Buruburu phase 5 Mchwa court Playground	Playground	Block level	Nziu road	0.20
192	Uhuru Park	Park	City_level	Uhuru highway	58.16
193	Hilton Park	Park	City_level	City Hall Way	0.71
194	Central Park	Park	City_level	Kenyatta Avenue /Uhuru Highway	23.75
195	Snake Park	Park	Block level	Kipande road	12.69
196	John Michuki Park	Park	City_level	Kipande road	27.51
197	Jeevanje Gardens	Park	City_level	Moi Avenue	4.01
198	Uhuru Gardens	Park	City_level	Langata road, southern bypass	76.48
199	Kamukunji grounds	Park	Neighborhood	Kamukunji road	7.27
200	Westlands Botanical Garden	Park	Neighborhood	Mwanzi road	10.21

	PUBLIC SPACES IN NAIROBI								
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)				
201	Jacaranda grounds	Park	Neighborhood	Jacaranda estate	31.73				
202	KNH Park	Park	City_level	Mbagathi	40.32				
203	River Mathare	Park	linear	Cosovo	1.14				
204	Nyayo highrise estate	Park	Neighborhood	Nyayo highrise	1.63				
205	Kahawa West community Park	Park	Neighborhood	Marion School	4.47				
206	River Gathamo	Park	Neighborhood	Thika Road	1.31				
207	Nairobi dam	Other	City_level	Kibera	106.94				
208	Depot traffic	Other	Neighborhood	Cosovo road	3.02				
209	No name	Other	Neighborhood	Naivasha Road	14.75				
210	Otiende quarry	Other	Neighborhood	Kungu rd	9.61				
211	Texas cancer centre	Other	Neighborhood	Mbagathi way	7.29				
212	Kibera uprising youth group	Other	Block level	n/a	0.06				
213	No name	Other	Block level	Kibera Drive	0.24				
214	No name	Other	Block level	First Avenue	0.19				
215	No name	Other	Block level	Melawa road	0.18				
216	No name	Other	Neighborhood	Mau mau road	0.53				
217	No name	Other	Neighborhood	n/a	0.92				
218	Old Olympic Bus Terminus	Other	Neighborhood	Kibera drive	0.60				
219	Unique estate open space	Other	Neighborhood	unique estate	37.97				
220	No name	Other	Neighborhood	Next to New Hope Church Tena estate	0.30				
221	No name	Other	Neighborhood	Fagilia utawala	1.32				
222	Quarry along Ngong River	Other	Neighborhood	Outering Road	36.55				
223	No name	Other	Neighborhood	Jogoo Road	5.76				
224	Bahati open space	Other	Neighborhood	unnamed road	0.14				
225	Vacant plot	Other	Neighborhood	Hamza rd	0.11				
226	No name	Other	Neighborhood	Eldoret Road	0.12				
227	Community yard	Other	Block level	Kayole road	0.13				
228	Slaughterhouse fields	Other	Neighborhood	Mathare road	5.58				
229	No name	Other	Block level	Along mathare river	0.19				
230	No name	Other	Block level	n/a	0.06				
231	No name	Other	Block level	First Avenue Eastleigh	0.19				
232	No name	Other	Neighborhood	First Lane	0.12				
233	No name	Other	Neighborhood	n/a	2.06				
234	Huruma flats community Parking	Other	Neighborhood	Huruma Road	0.49				
235	No name	Other	Block level	n/a	0.14				
236	No name	Other	Neighborhood	n/a	0.27				
237	No name	Other	Neighborhood	Jogoo Road	21.76				
238	Juja road open space	Other	Block level	Juja road	0.32				
239	Mix	Other	linear	Jogoo road	2.18				
240	Proposed community market	Other	Neighborhood	Donholm Road	0.26				

			PUBLIC SPACES IN NAIROBI		Narobi, the Green city in the Sun
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)
241	No name	Other	Block level	Likoni road	0.20
242	No name	Other	Neighborhood	n/a	2.38
243	3c open field	Other	City_level	Kosovo road	0.45
244	No name	Other	Neighborhood	Along Nairobi River	4.29
245	No name	Other	linear	Highridge	0.60
246	Quarry along Ngong river	Other	Neighborhood	n/a	148.28
247	Open space at Pangani	Other	Neighborhood	Opposite Muthaiga Square	2.31
248	Riparian reserve	Other	Neighborhood	30075-00100	11.77
249	Riparian reserve	Other	Neighborhood	Vuli Lane	0.82
250	Nairobi river reserve	Other	Neighborhood	Off Komarock	0.43
251	Korogocho - Dandora Phase 1 open space	Other	Neighborhood	Karenge Road	5.04
252	Church	Other	Neighborhood	Kangundo road	1.69
253	Riparian reserve	Other	linear	n/a	2.28
254	Wanware	Other	Block level	Komarock Road	0.39
255	No name	Other	Neighborhood	n/a	1.78
256	BAT	Other	Neighborhood	Ngiya Road	1.73
257	Proposed community market	Other	Neighborhood	Donholm Road	12.17
258	Oyster village	Other	Neighborhood	Donholm Road	2.43
259	Tena car wash	Other	Block level	Manyanja road	0.33
260	No name	Other	Neighborhood	n/a	0.17
261	No name	Other	Neighborhood	Chalbi Drive	0.48
262	No name	Other	Neighborhood	Chalbi Drive	0.67
263	Electicital power way leave	Other	linear	Moi drive	3.16
264	No name	Other	Neighborhood	biashara street	0.40
265	No name	Other	Block level	Mugi road	0.23
266	No name	Other	Neighborhood	Gatura Rd	0.28
267	No name	Other	Neighborhood	Serenity Lane	0.86
268	No name	Other	Neighborhood	Chalbi Drive	3.72
269	No name	Other	Block level	Chalbi Drive	0.41
270	No name	Other	Block level	Chalbi Drive	0.86
271	No name	Other	Block level	Serenity Lane	0.20
272	No name	Other	Neighborhood	n/a	0.27
273	No name	Other	Block level	Raila road	0.21
274	No name	Other	Neighborhood	raila road	0.59
275	No name	Other	Neighborhood	muthiora road	0.38
276	Glory Childrens centre	Other	Neighborhood	Salim Rd	0.30
277	No name	Other	Neighborhood	Salim Rd	4.01
278	No name	Other	Block level	Salim Rd	3.10
279	No name	Other	Block level	Salim Rd	0.47
280	No name	Other	linear	Salim Rd	0.57

PUBLIC SPACES IN NAIROBI								
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)			
81	Kambi Moto	Other	linear	Muratha Rd	61.52			
82	Kenya Meteorological Station	Other	Neighborhood	Road C	62.38			
83	Kiambio community grounds	Other	Neighborhood	30075-00100	3.48			
84	Maji Mazuri	Other	Neighborhood	n/a	4.50			
85	River Jordan	Other	linear	n/a	14.95			
86	Health center	Other	Block level	n/a	0.87			
37	Mathare river reserve	Other	linear	n/a	97.65			
38	unamed open space	Other	Block level	Kongo	0.33			
39	Vacant space along bypass	Other	linear	Northern bypass	12.06			
0	Social hall-T area	Other	Neighborhood	29-30	0.70			
)1	Gateway	Other	Neighborhood	29-30	3.51			
2	No name	Other	Neighborhood	Soft road	1.73			
3	Membley river reserve	Other	linear	Northern bypass Kiwanja	33.73			
4	No name	Other	linear	n/a	9.08			
95	mathare north market frontage	Other	Block level	n/a	0.24			
96	Acref grounds	Other	Neighborhood	n/a	0.30			
7	Open space along Nairobi river	Other	linear	Chokaa	5.49			
8	Kangemi Dam	Other	Neighborhood	Waiyaki Way	15.79			
9	Open space behind Korogocho market	Other	Neighborhood	Behind Korogocho market	1.64			
00	Nairobi River	Other	linear	n/a	43.13			
)1	Nairobi river	Other	linear	Chieko	5.47			
)2	Dandora Phase 1 Quarry	Other	Neighborhood	Dandora - Korogocho bridge	3.14			
)3	Dandora phase 4 space	Other	linear	Kinyago Dandora school	2.11			
)4	Nairobi Arboretum	Nature reserve	City_level	Arboretum Drive	73.83			
)5	City Park	Nature reserve	City_level	Limuru road	158.75			
6	Electricty way leave	Infrastructure ROW	linear	Donholm Road	3.97			
7	Electricity way leave	Infrastructure ROW	linear	Donholm road	2.04			
8(Electricity way leave	Infrastructure ROW	linear	Moi drive	1.94			
)9	Electricity way leave	Infrastructure ROW	linear	Moi drive	16.77			
0	Outter ring roag railway reserve	Infrastructure ROW	linear	Tumaini estate	0.22			
1	Outter ring roag railway reserve	Infrastructure ROW	linear	Outer Ring Road	4.26			
2	Mumias road road reserve	Infrastructure ROW	linear	Mumias road	1.68			
3	Kangundo road road reserve	Infrastructure ROW	linear	Kangundo road	6.57			
4	Railway reserve	Infrastructure ROW	linear	Outter ring road	65.37			
5	No name	Infrastructure ROW	linear	Kabasiran avenue	1.22			
16	Railway line reserve - Kibera	Infrastructure ROW	linear	Mashimoni School	6.08			
17	No name	Infrastructure ROW	linear	Kangundo Road	5.88			
8	Nairobi River reserve (Grogan)	Infrastructure ROW	linear	Grogan	12.01			
9	Nairobi River	Infrastructure ROW	linear	The Marter Hosppital	4.49			
20	Ngong' River Riparian Reserve	Infrastructure ROW	Neighborhood	Masimba Road	219.56			

	PUBLIC SPACES IN NAIROBI								
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)				
321	Ngong river riparian reserve	Infrastructure ROW	linear	Kayole	42.12				
322	Power Wayleave	Infrastructure ROW	linear	Kangundo rd	34.37				
323	Railway right of way	Infrastructure ROW	linear	Outer Ring road	40.13				
324	machakoa road-road reserve	Infrastructure ROW	linear	machakos road	1.28				
325	electriciy way leave	Infrastructure ROW	linear	n/a	105.98				
326	Ngong road reserve	Infrastructure ROW	linear	Ngong Road	17.21				
327	Kabarnet road road reserve	Infrastructure ROW	linear	Kabarnet Rd	1.42				
328	Southern by-pass road reserve	Infrastructure ROW	linear	Behind Highway estate	10.17				
329	Kungu Karumba road reserve	Infrastructure ROW	linear	Kungu Karumba road	2.82				
330	Miotoni Road Reserve	Infrastructure ROW	linear	Miotoni road	1.57				
331	Koitobos Road Reserve	Infrastructure ROW	linear	Koitobos Road	0.70				
332	Mbagathi Ridge road reserve	Infrastructure ROW	linear	Mbagathi ridge	1.95				
333	Northern bypass reserve	Infrastructure ROW	linear	Northern bypass	14.01				
334	Railway reserve	Infrastructure ROW	linear	Roysambu	72.88				
335	Electricity way leave	Infrastructure ROW	linear	Lucky summer	24.62				
336	Waiyaki Way - ILRI road reserve	Infrastructure ROW	linear	Waiyaki Way - ILRI road	2.50				
337	Waiyaki way road median	Infrastructure ROW	City_level	n/a	0.25				
338	Major powerline reserve	Infrastructure ROW	linear	Muigai kenyatta road	24.27				
339	Railway reserve	Infrastructure ROW	linear	Dandora	39.44				
340	Kawangware Park	Garden	Neighborhood	Sacred heart Ngando	1.86				
341	Nyayo estate Playground	Garden	Block level	Nyayo estate	1.08				
342	Pipeline estate open space	Garden	Block level	Pipeline estate bar	0.69				
343	Komb Green Youth Park	Garden	Neighborhood	Korogocho-Dandora bridge	1.07				
344	Rabbai road Garden	Garden	Neighborhood	Charles new road	2.45				
345	Mugoya estate pocket space	Garden	Block level	Mugoya estate	0.16				
346	Akiba estate south C Courtyard	Garden	Block level	uchumi road	0.41				
347	Akiba estate south C Courtyard	Garden	Block level	Akiba estate	0.36				
348	Akiba estate south C Courtyard	Garden	Block level	Akiba estate	0.25				
349	Kibera Social Grounds	Garden	Neighborhood	Kibera drive	1.60				
350	Ngei 1 estate Courtyard	Garden	Block level	Seasons Rd	1.55				
351	Ngei 1 estate Garden	Garden	Block level	n/a	0.78				
352	Otiende estate Garden	Garden	Block level	n/a	0.57				
353	Kiringa close Lang'ata Garden	Garden	Block level	Kiringa close	1.22				
354	Komarcok phase 5B Garden	Garden	Block level	Kangaru road	0.23				
355	Buruburu phase 2 Garden	Garden	Block level	Buruburu phase 2	0.39				
356	Ole musalala court 1 Garden	Garden	Block level	ol Musalala road	0.08				
357	Plainsview estate Garden	Garden	linear	Behind Wami High School	3.81				
358	Bahati 13	Garden	Block level	Bahati	0.40				
359	Magiwa Estate	Courtyard	Neighborhood	n/a	0.55				
360	No name	Courtyard	Neighborhood	Further Close	0.78				

		PU	IBLIC SPACES IN NAIROBI		
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)
361	Magiwa Estate	Courtyard	Neighborhood	Mtongwe Rd	0.40
362	Magiwa estate	Courtyard	Neighborhood	Mtongwe road	0.28
363	Highview Phase 1	Courtyard	Neighborhood	n/a	0.54
364	Golf course phase I	Courtyard	Neighborhood	Ngobi street	1.31
365	Sunview Estate	Courtyard	Neighborhood	Sunview	0.52
366	Nyayo highrise Courtyard	Courtyard	Neighborhood	n/a	4.17
367	Bombeya court Basket ball court	Courtyard	Block level	bombani road	0.31
368	Ngumo Central Playground	Courtyard	Block level	Mtongwe street	0.40
369	Ngumo Newa	Courtyard	Block level	n/a	0.22
370	Ngumo Central	Courtyard	Block level	n/a	0.19
371	Ngumo Nera	Courtyard	Block level	n/a	0.19
372	Ngumo Nera	Courtyard	Block level	n/a	0.15
373	Ngumo West	Courtyard	Block level	n/a	0.13
374	Ngumo Newa	Courtyard	Block level	n/a	0.26
375	Ngumo Nera	Courtyard	Block level	n/a	0.61
376	Kangethe Green	Courtyard	Block level	Kangethe Green	2.86
377	Plainsview estate Courtyard	Courtyard	Block level	n/a	0.51
378	Plainsview estate Courtyard B	Courtyard	Block level	Sore Drive	0.43
379	Plainsview estate Courtyard C	Courtyard	Block level	Sore Lane	0.47
380	Plainsview estate	Courtyard	Block level	Guthera Crescent	0.31
381	Kauku road court 2	Courtyard	Block level	Karuku Court	0.66
382	Karuku road court 2	Courtyard	Block level	Karuku Court	0.73
383	Kimathi estate court	Courtyard	Block level	Eldoret Road	1.35
384	Ngutu court Playground	Courtyard	Block level	Mumias road	0.67
385	Chala crescent	Courtyard	Block level	Mumias road	0.19
386	Chala grove	Courtyard	Block level	Mumias road	0.31
387	Rajeta court Playground	Courtyard	Block level	Mumias road	0.17
388	Amasya grove	Courtyard	Block level	Amasya crescent	0.16
389	Jibisa Courtyard	Courtyard	Block level	Amasia crescent	0.27
390	Ijara Courtyard	Courtyard	Block level	Amasia crescent	0.12
391	No name	Courtyard	Block level	Plainsview Estate	0.50
392	kens metal	Courtyard	Neighborhood	kayaba road	1.79
393	Mariakani estate Courtyard	Courtyard	Block level	Mariakani Estate	0.92
394	Mariakani Gardens open space	Courtyard	Block level	Mariakani Estate	2.10
395	No name	Courtyard	Block level	Kapiti Crescent	0.60
396	South C childrens Playground	Courtyard	Block level	ole shapara avenue	0.57
397	Deliverance church grounds	Courtyard	Neighborhood	n/a	0.19
398	Blessings court Courtyard	Courtyard	Block level	Blessings court	0.17
399	Kariokor Courtyard	Courtyard	Block level	Meru road	1.28
400	California Residents Association	Courtyard	Neighborhood	Marimbi Street	0.21

	Narrobi, the Green city in the S				
#	PUBLIC SPACE NAME	TYPOLOGY	PUBLIC SPACES IN NAIROBI SCALE OF USE	ADDRESS	SIZE (ACRES)
401	No name	Courtyard	Pocket Park	biashara street	0.18
402	Huruma flats Courtyard	Courtyard	Pocket Park	Huruma flats	0.96
403	Soweto Social Hall	Courtyard	Neighborhood	Soweto community social hall	0.45
404	Kariokor estate	Courtyard	Block level	n/a	0.69
405	Kariokor estate	Courtyard	Block level	n/a	0.33
406	Kariokor estate	Courtyard	Block level	n/a	0.48
407	Kariokor estate	Courtyard	Block level	n/a	0.58
408	Pocket Park	Courtyard	Block level	Kibera drive	0.07
409	Nyayo highrise estate	Courtyard	Block level	Nyaho Highrise	0.58
410	KPLC Houses Courtyard	Courtyard	Block level	Njiwa road	0.27
411	KPLC Houses Courtyard	Courtyard	Block level	Njiwa road	0.36
412	KPLC Houses Courtyard	Courtyard	Block level	Krapft road	0.36
413	Golf course estate Pocket Park	Courtyard	Block level	Golf course estate	0.34
414	Pocket Park	Courtyard	Block level	Golf course estate	0.11
415	Maisha estate Courtyard	Courtyard	Block level	Likoni road	0.54
416	Maisha estate Courtyard	Courtyard	Block level	Likoni road	0.25
417	EASA college quarters Courtyard	Courtyard	Block level	EASA College	0.68
418	Court 565	Courtyard	Block level	Nyayo estate	0.14
419	Nyayo estate Playground	Courtyard	Block level	Nyayo estate - Court571	0.31
420	Taj village apartments Courtyard	Courtyard	Block level	Taj village apartments	0.62
421	Unnamed Courtyard	Courtyard	Block level	Opposite PEFA church Donholm	0.47
422	Unnamed open space	Courtyard	Block level	Opposite Donholm shopping centre	0.20
423	Springfield Park estate pocket space	Courtyard	Block level	Greenfields estate	0.49
424	Umoja 2 basketball court	Courtyard	Neighbourhood	30075 00100	0.23
425	Blessings court Courtyard	Courtyard	Block level	Komarock phase 5A	0.17
426	Kyamwatu close	Courtyard	Block level	Mumias road	0.23
427	Kyamwatu close	Courtyard	Block level	Mumias road	0.27
428	No name	Courtyard	Block level	Mumias road	0.24
429	Kanga court Left wing Parking	Courtyard	Block level	Nziu road	0.31
430	Nziu court	Courtyard	Block level	Citam road	0.10
431	Chuko close	Courtyard	Block level	Churo road	0.14
432	Churo court Playground	Courtyard	Block level	Churo road	0.24
433	Kanga court	Courtyard	Block level	Nziu road	0.47
434	Taturi court	Courtyard	Block level	Katulo road	0.18
435	Gatamaiyo court	Courtyard	Block level	mtanda road	0.33
436	Kiongwe court	Courtyard	Block level	mtanda street	0.30
437	Bombeya court	Courtyard	Block level	bombani road	0.34
438	Endau court	Courtyard	Block level	bombani road	0.33
439	Bombeya court	Courtyard	Block level	bombani road	0.24
440	Dulima court	Courtyard	Block level	mtanda street	0.36

	PUBLIC SPACES IN NAIROBI							
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)			
441	Unnamed court Courtyard	Courtyard	Block level	mtanda street	0.24			
442	Unnamed Courtyard	Courtyard	Block level	mtanda street	0.24			
443	chepanda court	Courtyard	Block level	mtanda street	0.37			
444	Makadara estate Courtyard	Courtyard	Block level	Hamza road	0.25			
445	County council houses 3	Courtyard	Block level	Hamza road	0.17			
446	City council houses 1	Courtyard	Block level	Hamza road	0.17			
447	Limilio court	Courtyard	Block level	Ol Donyo lengai Road	0.80			
448	Lishode court	Courtyard	Block level	Ol Donyo lengai Road	0.32			
449	Lesatima court	Courtyard	Block level	Ol Donyo lengai Road	0.50			
450	Lutere court	Courtyard	Block level	Ol Donyo Lengai Road	0.22			
451	Kibaoni court	Courtyard	Block level	Ol Donyo Lengai Road	0.51			
452	Kapsiliat court	Courtyard	Block level	Ol Donyo Lengai road	0.40			
453	Elgon court	Courtyard	Block level	Ol Donyo Lengai Road	0.23			
454	Kalimapus court	Courtyard	Block level	Ol Donyo Lengai Road	0.20			
455	Opposite Kiptimin Court	Courtyard	Block level	Ol Donyo lengai Road	0.43			
456	Kiptimin court	Courtyard	Block level	Ol Donyo lengai Road	0.45			
457	Uhuru estate Courtyard	Courtyard	Block level	Abuoga Road	0.33			
458	No name	Courtyard	Block level	Abuoga Road	0.27			
459	No name	Courtyard	Block level	Abuoga Road	0.18			
460	No name	Courtyard	Block level	Abuoga road	0.21			
461	Phase 4 Acacia Court	Courtyard	Block level	Kangaru Rd	0.14			
462	Open space and Parking(Block Q2)	Courtyard	Block level	Shule road	0.40			
463	Githa court	Courtyard	Block level	Komarock phase 4	0.13			
464	Between Nile road and shule road	Courtyard	Block level	Nile road	0.42			
465	Komarock Phase 5A Courtyard	Courtyard	Block level	Komarock phase 5A	0.23			
466	Mukoma court Courtyard	Courtyard	Block level	Kangaru Rd	0.17			
467	Phase 3B	Courtyard	Block level	Malewa Rd	0.13			
468	Phase 3B	Courtyard	Block level	Malewa Rd	0.24			
469	Phase 3B Parking	Courtyard	Block level	Malewa Rd	0.21			
470	Phase 3B Parking	Courtyard	Block level	Malewa Rd	0.09			
471	Zone 5 Parking	Courtyard	Block level	30075	0.31			
472	No name	Courtyard	Block level	30075	0.27			
473	Simba nursery- street	Courtyard	Block level	Off moi drive	0.28			
474	Pamoja Courtyard	Courtyard	Block level	30075	0.33			
475	In front block P5	Courtyard	Block level	Shule Road	0.77			
476	vacant space (block R2)	Courtyard	Block level	Hono crescent road	0.16			
477	vacant space(block U24)	Courtyard	Neighbourhood	Hono crescent road	0.89			
478	Vacant space(block S10)	Courtyard	Block level	Nile road	0.21			
479	Kunguni 41	Courtyard	Block level	Usao road	0.35			
480	Fredom Flats Courtyard	Courtyard	Block level	Nyando	0.11			

PUBLIC SPACES IN NAIROBI						
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)	
481	No name	Courtyard	Block level	Kwa D.O	0.19	
482	Ricenafe seminars church ground	Courtyard	Block level	Masimba Road	0.16	
483	No name	Courtyard	Block level	Kayole Road	0.14	
484	Community yard	Courtyard	Block level	Kayole road	0.19	
485	No name	Courtyard	Block level	Masimba Road	0.15	
486	No name	Courtyard	Block level	Spine Road	0.22	
487	No name	Courtyard	Block level	Kwa D.O	0.13	
488	No name	Courtyard	Block level	n/a	0.22	
489	No name	Courtyard	Block level	30075-00100	0.20	
490	No name	Courtyard	Block level	Tushauriane Rd	0.19	
491	No name	Courtyard	Block level	Opposite posta Stage	0.18	
492	No name	Courtyard	Block level	Nyando Road	0.08	
493	No name	Courtyard	Block level	Spine Road	0.21	
494	Kayole 2 Community Centre	Courtyard	Block level	Spine Road	0.21	
495	Playground at immaculate bar and lodging	Courtyard	Block level	30075-00100	0.15	
496	No name	Courtyard	Block level	n/a	0.14	
497	No name	Courtyard	Block level	n/a	0.08	
498	No name	Courtyard	Block level	n/a	0.12	
499	No name	Courtyard	Block level	n/a	0.13	
500	No name	Courtyard	Block level	First Avenue Eastleigh	0.19	
501	No name	Courtyard	Block level	Off Kayole Spine Rd	0.34	
502	No name	Courtyard	Block level	Off Kayole Spine Rd	0.11	
503	No name	Courtyard	Block level	Near Mihango stage	0.19	
504	No name	Courtyard	Block level	Off Police line Rd	0.14	
505	No name	Courtyard	Block level	Off police line Rd	0.15	
506	No name	Courtyard	Block level	Off Kayole 1 Rd	0.15	
507	No name	Courtyard	Block level	Off Kayole 1 Rd	0.14	
508	No name	Courtyard	Block level	Kayole 1 Rd	0.12	
509	No name	Courtyard	Block level	Kayole 1 Rd	0.15	
510	No name	Courtyard	Block level	Kangundo rd	0.38	
511	Mkanju court	Courtyard	Block level	Malewa Rd	0.42	
512	Msaponi Court	Courtyard	Block level	Malewa Rd	0.33	
513	Msaponi court	Courtyard	Block level	Malewa Rd	0.24	
514	Msaponi court	Courtyard	Block level	Malewa Rd	0.12	
515	Komarock phase 2 Courtyard	Courtyard	Block level	Mwangaza Rd	0.37	
516	Sector 3B	Courtyard	Block level	Mwangaza Rd	0.41	
517	Sector 3B basketball court	Courtyard	Block level	Mwangaza Rd	0.39	
518	Sector 3B	Courtyard	Block level	Mwangaza Rd	0.37	
519	Phase II zone VII	Courtyard	Block level	Off Spine Rd	0.20	
520	Kunguni 4	Courtyard	Neighborhood	Ruiruaka crescent	0.60	

	PUBLIC SPACES IN NAIROBI							
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)			
521	Maringo 12	Courtyard	Block level	Maringo	0.34			
522	Maparasha court	Courtyard	Block level	n/a	0.35			
523	Nguruman court	Courtyard	Block level	Oldonyo Sabuk Road	0.38			
524	No name	Courtyard	Block level	n/a	0.08			
525	No name	Courtyard	Block level	n/a	0.08			
526	Misisi court	Courtyard	Block level	Malewa Rd	0.25			
527	2nd Munga Court	Courtyard	Block level	Sector one	0.26			
528	Mvinje Court	Courtyard	Neighborhood	Sector One Rd	0.26			
529	Mvinje court	Courtyard	Block level	Sector One rd	0.12			
530	Mkokoa Court	Courtyard	Block level	Sector One	0.29			
531	Mbuyu court	Courtyard	Block level	Malewa Rd	0.25			
532	Phase 3A	Courtyard	Block level	Malewa Rd	0.38			
533	Phase 3A Courtyard	Courtyard	Block level	Mwangaza Rd	0.31			
534	Phase 3A Courtyard	Courtyard	Block level	Mwangaza Rd	0.47			
535	Kaloleni estate Courtyard	Courtyard	Block level	Stadium road	0.63			
536	Ngara railways estate Courtyard	Courtyard	Block level	Ngara Railways Estate	1.05			
537	Highrise Parking	Courtyard	Block level	Off muinami street	0.47			
538	Gorofani	Courtyard	Block level	Likoni road	0.42			
539	Sector two Parking three	Courtyard	Block level	Off Spine Rd	0.27			
540	No name	Courtyard	Block level	Masimba Road	0.10			
541	No name	Courtyard	Block level	Off Spine Road	0.10			
542	No name	Courtyard	Block level	Off Spine Road	0.19			
543	No name	Courtyard	Block level	n/a	0.23			
544	Jamhuri phase 1 space	Courtyard	Block level	Ngong Rd	0.45			
545	No name	Courtyard	Block level	First Avenue Eastleigh	0.14			
546	No name	Courtyard	Block level	Within high rise phase II	0.15			
547	No name	Courtyard	Block level	Canaan	0.09			
548	Hazina estate Courtyard	Courtyard	Block level	Hazina estate	0.30			
549	Magunga B Courtyard	Courtyard	Block level	Bombani road	0.14			
550	magunga Courtyard	Courtyard	Block level	Bombani road	0.28			
551	Tinganga Courtyard	Courtyard	Block level	Amasia crescent	0.19			
552	Ukunda Courtyard	Courtyard	Block level	Amasia crescent	0.25			
553	Kikambuoni court	Courtyard	Block level	Ol Donyo lengai Road	0.43			
554	Mustard seed Courtyard	Courtyard	Block level	Councillor opundo road	0.19			
555	Kadam court	Courtyard	Block level	Ol Donyo Lengai Road	0.27			
556	Elementaita court	Courtyard	Block level	Ol Donyo lengai Road	0.34			
557	Kamutile court	Courtyard	Block level	Ol Donyo Lengai Road	0.36			
558	Ena court	Courtyard	Block level	Mumias road	0.28			
559	Mchwa court	Courtyard	Block level	Nziu road	0.20			
560	Dandora phase 3 Courtyard	Courtyard	Block level	n/a	0.15			

	PUBLIC SPACES IN NAIROBI						
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)		
561	No name	Courtyard	Block level	Spine Road	0.06		
562	Maisha estate Courtyard	Courtyard	Block level	Likoni road	0.57		
563	Maisha estate Courtyard	Courtyard	Block level	Likoni road	0.58		
564	Maisha estate Courtyard	Courtyard	Block level	Likoni road	0.29		
565	Maisha estate Courtyard	Courtyard	Block level	Likoni road	0.53		
566	Jericho Courtyards	Courtyard	Block level	Shule road	1.39		
567	vacant space (AIC Jericho)	Courtyard	Block level	Shule road	0.79		
568	Nyambene court	Courtyard	Block level	OI Donyo Sabuk Road	0.55		
569	Government quaters	Courtyard	Block level	Likoni road	0.54		
570	Government quarters	Courtyard	Block level	Likoni road	0.43		
571	Kanga court Parking east wing	Courtyard	Block level	Nziu	0.21		
572	Mai mahiu court	Courtyard	Block level	Mumias road	0.56		
573	Mai mahiu court	Courtyard	Block level	Mumias road	0.21		
574	Mai mahiu court	Courtyard	Block level	Mumias road	0.25		
575	Boma west courts	Courtyard	Block level	Katulo road	0.39		
576	Phase 3A	Courtyard	Block level	Mwangaza Rd	0.31		
577	Phase 3A	Courtyard	Block level	Mwangaza Rd	0.36		
578	Sector 3B	Courtyard	Block level	Mwangaza Rd	0.42		
579	Sector 3B	Courtyard	Block level	Mwangaza Rd	0.30		
580	Phase II zone V	Courtyard	Block level	Off Spine Rd	0.33		
581	No name	Courtyard	Block level	Hamza Road	0.05		
582	Phase III A	Courtyard	Block level	Mwangaza Rd	0.44		
583	Phase II zone 3 space	Courtyard	Block level	Off Spine Rd	0.40		
584	Sector two Parking five	Courtyard	Block level	Off Spine Rd	0.39		
585	Sector two Parking five	Courtyard	Block level	Off Spine Rd	0.35		
586	Phase II zone IV space	Courtyard	Block level	Off Spine Rd	0.25		
587	Sector Two zone one	Courtyard	Block level	Off Spine Rd	0.35		
588	Sector two Parking	Courtyard	Block level	Off Kayole Spine rd	0.33		
589	No name	Courtyard	Block level	Kayole Road	0.11		
590	No name	Courtyard	Block level	Off Tushauriane Rd	0.15		
591	Playground at immaculate bar and lodging	Courtyard	Block level	30075-00100	0.28		
592	Infill estate Parking and vacant space	Courtyard	Block level	Kangaru Rd	0.17		
593	Infill estate Parking	Courtyard	Block level	Kangaru Rd	0.13		
594	Playground/Vacant space	Courtyard	Block level	Kayole Road	0.08		
595	Kunguni 15	Courtyard	Block level	Nyasa road	0.80		
596	Kunguni 19	Courtyard	Block level	Ruiruaka crescent	0.50		
597	Mugendi	Courtyard	Block level	n/a	0.17		
598	Pamoja	Courtyard	Block level	30075	0.51		
599	Kunguni 40	Courtyard	Block level	Ruiruaka	0.16		
600	Kunguni 38	Courtyard	Block level	Ruiruaka crescent	0.37		

		Р	UBLIC SPACES IN NAIROBI		
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)
601	Kunguni 34	Courtyard	Block level	Ruiruaka crescent	0.18
602	Infill court space	Courtyard	Block level	Kangaru Rd	1.00
603	Phase II zone V	Courtyard	Block level	Off Spine Rd	0.22
604	Mvinje court	Courtyard	Block level	Sector One rd	0.37
605	Phase3B	Courtyard	Block level	Malewa Rd	0.19
606	Mvinje court	Courtyard	Block level	Sector One	0.17
607	Mkokoa court	Courtyard	Block level	Sector One Rd	0.53
608	Mkokoa court	Courtyard	Block level	Sector one Rd	0.30
609	Misisi Court	Courtyard	Block level	Sector one Rd	0.24
610	1st mbuyu court	Courtyard	Block level	Malewa Rd	0.22
611	Gorofani	Courtyard	Block level	Likoni road	0.68
612	CMF	Courtyard	Block level	Quarry Rd	0.30
613	No name	Courtyard	Block level	Mihango Stage	0.17
614	Ngara railways estate Courtyard	Courtyard	Block level	Ngara railways estate	1.18
615	Mix	Courtyard	Block level	Krape road	0.34
616	Mbotela	Courtyard	Block level	Jogoo road	0.56
617	n/a	Courtyard	Block level	Jogoo Rd	0.17
618	ops (block X7 and Block W11)	Courtyard	Block level	charles new road	1.40
619	ops near Marabucha space	Courtyard	Block level	charles new road	0.43
620	Daka Buko Courtyard	Courtyard	Block level	Eregero cresent road	0.40
621	UKanda groove Courtyard	Courtyard	Block level	Eregero crescent road	0.47
622	Ops in Bisika court	Courtyard	Block level	Mutonga grove road	0.50
623	ops Bisika court	Courtyard	Block level	Eregero crescent	0.34
624	Thura court	Courtyard	Block level	Amasia crescent	0.61
625	Ops Eregero cresent	Courtyard	Block level	Eregero crescent road	0.48
626	Raila estate Courtyard	Courtyard	Block level	raila road	0.13
627	Precious Gardens estate Riruta estate	Courtyard	Block level	Riruta catholic mission	0.97
628	Plainsview estate Courtyard	Courtyard	Block level	Sore road	0.54
629	Riverbank phase 2 Playground	Courtyard	Block level	Plainsview road	0.21
630	Hazina estate Courtyard	Courtyard	Block level	Plainsview road	0.53
631	Akiba estate south B Courtyard	Courtyard	Block level	Akiba estate	0.40
632	Akiba estate south B Courtyard	Courtyard	Block level	Akiba estate	0.32
633	Balozi court Courtyard	Courtyard	Block level	Balozi court	0.32
634	South C rangers court	Courtyard	Block level	Rangers mini supermarket	0.27
635	Mugoya estate south C	Courtyard	Block level	Mugoya estate	0.40
636	Mugoya estate	Courtyard	Block level	Mugoya estate	0.27
637	Akiba estate south C Courtyard	Courtyard	Block level	Akiba estate	0.37
638	Akiba united court	Courtyard	Block level	Akiba 28	0.26
639	Miller estate Courtyard	Courtyard	Block level	Mai Mahiu road	0.27
640	Nyumba kumi court	Courtyard	Neighbourhood	Nyando Road	0.19

	PUBLIC SPACES IN NAIROBI						
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)		
641	Ayany Parking	Courtyard	Neighbourhood	Kibera Drive	0.15		
642	Rubia estate Playground	Courtyard	Block level	Rubia estate	0.31		
643	Rubia estate Courtyard	Courtyard	Block level	Rubia estate	0.26		
644	Nyayo highrise Courtyard	Courtyard	Block level	Nyayo highrise	0.45		
645	Highway estate Courtyard	Courtyard	Block level	Highway estate soutch C	0.46		
646	Highway estate Courtyard	Courtyard	Block level	Behind Highway estate	0.40		
647	Greenspan estate phase 2 Courtyard	Courtyard	Block level	Greenspan estate	0.72		
648	Greenspan estate phase 2 Courtyard	Courtyard	Block level	Greenspan estate	1.06		
649	Donholm phase 5 Courtyard	Courtyard	Block level	close to Donholm phase 5 mosque	0.36		
650	Basket ball Parking	Courtyard	Block level	30075	0.12		
651	Unnamed Courtyard	Courtyard	Block level	30075	0.31		
652	Courtyard	Courtyard	Block level	30075	0.12		
653	Training grounds kings favor	Courtyard	Block level	30075 Nairobi	0.37		
654	Unnamed Courtyard	Courtyard	Block level	30075 Nairobi	0.16		
655	Unamed Courtyard	Courtyard	Block level	Moi drive	0.13		
656	Bball Parking lot	Courtyard	Neighbourhood	30075	0.51		
657	Kingston court	Courtyard	Block level	30075	0.33		
658	Kingstone	Courtyard	Block level	30075	0.12		
659	unnamed Courtyard	Courtyard	Block level	n/a	0.12		
660	Komarock phase 3 A Courtyard	Courtyard	Block level	Tendercare Junior main school	0.39		
661	Highrise estate Courtyard	Courtyard	Block level	Within highrise phase II,	0.13		
662	Komarcok Courtyard	Courtyard	Block level	n/a	0.12		
663	Komarcok Courtyard	Courtyard	Block level	n/a	0.16		
664	Dandora phase 3 Courtyard	Courtyard	Block level	n/a	0.06		
665	Komarock phase 5 Mulawa court Courtyard	Courtyard	Block level	Komarock phase 5	0.48		
666	Komarock phase 4 Courtyard	Courtyard	Block level	opposite Mukombe court	0.16		
667	Buruburu phase 2 Courtyard	Courtyard	Block level	Opposite National Library	0.46		
668	Buruburu phase 2 Courtyard	Courtyard	Block level	Ol Donyo Leangai rd	0.16		
669	Buruburu phase 2 Courtyard	Courtyard	Block level	Ol Donyo Leangai rd	0.30		
670	Buruburu phase 2 Courtyard	Courtyard	Block level	Ol Donyo Leangai rd	0.22		
671	Buruburu phase 5 Courtyard	Courtyard	Block level	Wang'ombe road	0.47		
672	Centre court Buruburu phase 5 extension	Courtyard	Block level	Behind Buruburu 1 primary	0.45		
673	Centre court Buruburu phase 5 extension	Courtyard	Block level	Behind Buruburu 1 primary	0.44		
674	Buruburu phase 5 Bamboo court Courtyard	Courtyard	Block level	Bamboo court	0.44		
675	Buruburu phase 5 Bamboo court Courtyard	Courtyard	Block level	Bamboo court	0.40		
676	Waihura court Courtyard	Courtyard	Block level	Buruburu phase 5 extension	0.37		
677	Ole Musalala court Courtyard	Courtyard	Block level	Ol Musalala road	0.29		
678	Buruburu phase 1 Courtyard	Courtyard	Block level	OI leleshwa road	0.17		
679	Council camp	Courtyard	Block level	n/a	0.43		
680	Bamboo crescent Courtyard	Courtyard	Block level	Lucina primary school	0.32		

PUBLIC SPACE ASSESSMENT

	PUBLIC SPACES IN NAIROBI							
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)			
681	Bamboo crescent Courtyard	Courtyard	Block level	Bamboo crescent	0.30			
682	Bamboo crescent Courtyard	Courtyard	Block level	Vine place primary school	0.19			
683	Bamboo crescent Courtyard	Courtyard	Block level	Buruburu phase 1	0.26			
684	Buruburu phase 1 Courtyard	Courtyard	Block level	Oldeani road	0.27			
685	Mathare north corps	Courtyard	Neighborhood	29-30	0.87			
686	Old racecourse estate phase 3 Courtyard	Courtyard	Block level	Behind Starehe Boys centre	0.11			
687	Area 2 kwa councillor Parking lot	Courtyard	Block level	n/a	0.14			
688	Area 1 Parking lot	Courtyard	Block level	n/a	0.14			
689	Unnamed Courtyard	Courtyard	Block level	n/a	0.09			
690	Uhuru estate shopping centre Courtyard	Courtyard	Neighborhood	Buruburu road	0.42			
691	Uhuru estate Courtyard	Courtyard	Block level	Buruburu road	0.23			
692	Uhuru estate Courtyard	Courtyard	Block level	Buruburu road	0.28			
693	Uhuru estate Courtyard	Courtyard	Block level	Buruburu road	0.38			
694	Open space at Korogocho	Courtyard	Block level	Korogocho	0.21			
695	Jerusalem social hall grounds	Courtyard	Neighborhood	Opposite Uhuru Sports ground	1.45			
696	Jerusalem estate Courtyard	Courtyard	Block level	Next to Uhuru social hall	0.17			
697	Jerusalem estate Courtyard	Courtyard	Block level	Buruburu crescent	0.33			
698	Jamaa mission hospital Courtyard	Courtyard	Neighborhood	Jamaa Mission Hospital	0.37			
699	unamed Courtyard	Courtyard	Block level	n/a	0.12			
700	Jerusalem estate Courtyard	Courtyard	Block level	n/a	0.17			
701	Jerusalem estate Courtyard	Courtyard	Block level	n/a	0.22			
702	Uhuru estate Courtyard	Courtyard	Block level	n/a	0.26			
703	Uhuru estate Courtyard	Courtyard	Block level	n/a	0.14			
704	Uhuru estate Courtyard	Courtyard	Block level	n/a	0.12			
705	Mountain view market expansion land	Courtyard	Neighborhood	n/a	0.57			
706	Uhuru estate Courtyard	Courtyard	Block level	n/a	0.14			
707	Uhuru estate Courtyard	Courtyard	Block level	n/a	0.13			
708	Uhuru estate Courtyard	Courtyard	Block level	opposite Uhuru grounds	0.14			
709	Uhuru estate Courtyard	Courtyard	Block level	Marenga road	0.15			
710	ololosani court	Courtyard	Block level	Ngomeni road	0.33			
711	Ops near Gichi court	Courtyard	Block level	Ngomeni road	0.67			
712	Laset Courtyard	Courtyard	Block level	Bombani road	0.22			
713	Uhuru estate Courtyard	Courtyard	Block level	Ajuoga road	0.18			
714	chamara Courtyard	Courtyard	Block level	Bombani road	0.35			
715	Buruburu phase 5 Courtyard	Courtyard	Neighborhood	Behind Baraka primary school	0.25			
716	Ichamara Courtyard	Courtyard	Block level	mumias south road	0.24			
717	Jerusalem Courtyard	Courtyard	Block level	Next to Jerusalem social hall	0.24			
718	Unnamed Courtyard	Courtyard	Neighborhood	Next to Evangelical Lutheran church in Kenya	0.21			
719	Courtyard	Courtyard	Neighborhood	Opposite Jericho shopping centre	0.28			
720	Unnamed Courtyard	Courtyard	Block level	Buruburu phase 5	0.23			

	PUBLIC SPACES IN NAIROBI							
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)			
721	John osogo	Courtyard	Block level	Opposite Dandora stadium	0.25			
722	Olenguruoini court Courtyard	Courtyard	Block level	Buruburu phase 4	0.16			
723	Jerusalem 5	Courtyard	Block level	Jerusalem	0.73			
724	Kisiwa lane	Courtyard	Block level	Bahati	0.49			
725	KARAKUTA road	Courtyard	Block level	Bahati	0.42			
726	Bahati 09	Courtyard	Block level	Bahati	0.27			
727	No name	Courtyard	Block level	Shinyanga Ln	0.13			
728	Buruburu phase 4 Courtyard	Courtyard	Block level	Bumbani road	0.40			
729	Buruburu phase 4 Courtyard	Courtyard	Block level	n/a	0.21			
730	John osogo road	Courtyard	Block level	n/a	0.12			
731	Buruburu phase 4 Courtyard	Courtyard	Block level	Bumbani road	0.14			
732	County quarters	Courtyard	Block level	Kamunde road	0.16			
733	Unnamed Courtyard	Courtyard	Block level	Off Kayole 1 Rd	0.18			
734	Komarock phase 3 Courtyard	Courtyard	Block level	n/a	0.13			
735	Jirani mwema Courtyard	Courtyard	Block level	Muigai kenyatta road	0.10			
736	Counsellor opundo	Courtyard	Block level	Muigai Kenyatta road	0.12			
737	John Osogo road	Courtyard	Block level	n/a	0.11			
738	John osogo road	Courtyard	Block level	n/a	0.12			
739	Buruburu phase 4 Courtyard	Courtyard	Block level	n/a	0.26			
740	Dandora phase 4 Courtyard	Courtyard	Block level	n/a	0.11			
741	John osogo road	Courtyard	Block level	n/a	0.26			
742	Dandora phase 4 Courtyard	Courtyard	Block level	n/a	0.12			
743	John osogo	Courtyard	Block level	n/a	0.19			
744	Migingo court	Courtyard	Block level	n/a	0.12			
745	Open space 4A	Courtyard	Block level	John Osogo	0.05			
746	Dandora phase 4 Courtyard	Courtyard	Block level	n/a	0.20			
747	Dandora phase 4 Courtyard	Courtyard	Block level	n/a	0.12			
748	Dandora phase 4 Courtyard	Courtyard	Block level	n/a	0.12			
749	Dandora phase 4 Courtyard	Courtyard	Block level	n/a	0.12			
750	Dandora phase 3 Courtyard	Courtyard	Block level	n/a	0.08			
751	Dandora phase 3 Courtyard	Courtyard	Block level	n/a	0.22			
752	Dandora phase 3 Courtyard	Courtyard	Block level	near leave way	0.12			
753	Mundoro Courtyard	Courtyard	Block level	Muigai kenyatta	0.09			
754	Fig Courtyard	Courtyard	Block level	Councillor opundo road	0.17			
755	B-13 Courtyard	Courtyard	Block level	Muigai kenyatta	0.15			
756	Msamalia mwema Courtyard	Courtyard	Block level	Muigai kenyatta	0.13			
757	Marigo-ini Courtyard	Courtyard	Block level	Councillor opundo road	0.15			
758	Masai Courtyard	Courtyard	Block level	councillor opundo road	0.15			
759	Mzalendo Courtyard	Courtyard	Block level	Muigai kenyatta road	0.13			
760	Mutito Courtyard	Courtyard	Block level	Muigai kenyatta	0.13			

	PUBLIC SPACES IN NAIROBI						
#	PUBLIC SPACE NAME	TYPOLOGY	SCALE OF USE	ADDRESS	SIZE (ACRES)		
761	Courtyard	Courtyard	Block level	Dandora phase 2 mosque	0.15		
62	Dandora phase 2 Courtyard	Courtyard	Block level	n/a	0.13		
63	Maandamano court	Courtyard	Block level	Muigai kenyatta	0.15		
64	Muigai Kenyatta road	Courtyard	Block level	n/a	0.15		
65	Tonny Blair's court	Courtyard	Block level	Counsellor opundo	0.07		
66	Unnamed Courtyard	Courtyard	Block level	way leave	0.08		
67	Dandora phase 3 Courtyard	Courtyard	Block level	n/a	0.12		
68	Dandora phase 3 Courtyard	Courtyard	Block level	n/a	0.13		
69	Dandora phase 2 Courtyard	Courtyard	Block level	n/a	0.09		
70	Dandora phase 2 Courtyard	Courtyard	Block level	n/a	0.09		
71	Dandora phase 2 Courtyard	Courtyard	Block level	n/a	0.07		
/2	Commonwealth War memorial	cemetery	City_level	uhuru hwy	2.07		
73	Muslim cemetry	cemetery	City_level	Quarry road	6.15		
74	Aga Khan Shia Imami Khoja Ismaili cemetery	cemetery	City_level	Quarry road	2.87		
75	Muslim cemetry	cemetery	City_level	n/a	0.66		
76	Kariokor WW2 memorial cemetry	cemetery	City_level	Kinyanjui street	2.11		
7	Forest road cemetery	cemetery	City_level	Forest road	11.29		
78	Easy coach	bus terminus	City_level	Haille sellasie	4.88		
79	Country bus	bus terminus	City_level	Landhies Rd	4.13		
30	Bus station	bus terminus	City_level	n/a	3.23		
31	KNH Bus stop	bus terminus	City_level	Hospital road	0.69		
32	Muthurwa bus station	bus terminus	City_level	Muthurwa	3.20		
33	Machakos bus station b	bus terminus	City_level	Landhies rd	0.77		
34	Miraa Grounds	bus terminus	City_level	Off M'gweni	0.76		
35	Fig tree stage	bus terminus	City_level	Muranga Road & Kolobot Road junction	2.11		
36	Bus terminus	bus terminus	Neighborhood	kikuyu road	0.89		
37	Kibera Drive Bus Terminus(42)	bus terminus	City_level	Kibera Drive	0.26		
38	Globe Roundabout	Amenity green space	City_level	Muranga Road	5.57		
39	Haille Selassie/Moi Avenue roundabout	Amenity green space	City_level	n/a	0.28		
90	Museum Hill interchange	Amenity green space	City_level	n/a	3.76		
91	Ring road Langata road reserve	Amenity green space	linear	Kungu kalumba	5.71		
92	Southern by-pass reserve (Langata)	Amenity green space	Neighborhood	Kungu kalumba road	31.03		
93	Ole Sereni interchange	Amenity green space	City_level	Mombasa road	0.88		
94	City Stadium roundabout	Amenity green space	City_level	jogoo road	0.90		
95	Race Course Roundabout	Amenity green space	Block level	Race Course Road	0.67		
96	Nyayo estate	Amenity green space	Block level	Nyayo estate	0.22		
97	Dagoretti interchange	Amenity green space	Block level	Dagoretti Rd	5.31		
98	Jogoo rd/outerring road interchange	Amenity green space	Block level	Outter Ring road/Jogoo road interchange	4.35		
99	Pipeline estate open space	Amenity green space	Block level	pipeline estate	0.13		
00	Vacant space- road reserve	Amenity green space	Block level	Jogoo road	0.24		

802 Shep 803 Umo 804 open 805 Betw 806 Phase 807 St Jos 808 Kalol 809 Taj m 810 Jamh	pherd school porch oja One Junction n space at shule rd juction(block V28)	TYPOLOGY Amenity green space Amenity green space Amenity green space	JBLIC SPACES IN NAIROBI SCALE OF USE Block level Block level	ADDRESS Pipeline estate	SIZE (ACRES) 0.19
802 Shep 803 Umo 804 open 805 Betw 806 Phase 807 St Jos 808 Kalol 809 Taj m 810 Jamh	pherd school porch oja One Junction n space at shule rd juction(block V28)	Amenity green space Amenity green space		Pipeline estate	
803 Umoj 804 open 805 Betw 806 Phase 807 St Jos 808 Kalol 809 Taj m 810 Jamh	oja One Junction n space at shule rd juction(block V28)	Amenity green space	Block level		0.1.5
804 open 805 Betw 806 Phase 807 St Jos 808 Kalol 809 Taj m 810 Jamh	n space at shule rd juction(block V28)			Ol Donyo Lengai Road	0.53
805 Betw 806 Phase 807 St Jos 808 Kalol 809 Taj m 810 Jamh		Amonity groon space	Block level	Kangundo Road Umoja One	0.32
806 Phase 807 St Jos 808 Kalol 809 Taj m 810 Jamh	ween S3 and Rabai Road	Amenity green space	Block level	Nile road	1.11
807 St Jos 808 Kalol 809 Taj m 810 Jamh		Amenity green space	Block level	Rabai Road	0.37
808 Kalol 809 Taj m 810 Jamh	se 3 community yard	Amenity green space	Block level	Mwangaza Rd	0.20
809 Taj m 810 Jamh	oseph	Amenity green space	linear	Jogoo road	0.90
810 Jamh	oleni Social Hall	Amenity green space	Block level	Mukiranja Rd	0.58
	mall open space	Amenity green space	linear	Taj Mall	1.06
811 Mada	huri Phase I space	Amenity green space	Block level	Kibera Station Rd	0.94
	daraka estate Courtyard	Amenity green space	Block level	n/a	0.18
812 Kiam	nbu/thika road intersection	Amenity green space	Block level	Kiambu road	0.90
813 Land	dhies/Ring road roundabout	Amenity green space	Block level	Muthurwa market	0.26
814 Jerich	cho open space	Amenity green space	Block level	Tinda close	2.06
815 No n	name	Amenity green space	Block level	Nyayo estate	0.16
816 Taj N	Mall frontyard	Amenity green space	Neighborhood	Outer Ring Road	3.66
817 Oute	erring road railway reserve	Amenity green space	linear	Outer Ring Road	12.28
818 DT de	dobie round about	Amenity green space	Block level	enterprise road	0.56
819 No n	name	Amenity green space	Block level	Ngong road	0.27
820 Kape	enguria road - naivasha road junction and roundabout	Amenity green space	Block level	n/a	1.59
821 Dago	oretti interchange 2	Amenity green space	Block level	Dagoretti road	3.17
822 Sout	th B-Olesereni interchange space	Amenity green space	Block level	kikuyu road	1.23
823 Sasu	uma road corner	Amenity green space	Block level	opp. Langata health centre	0.26
824 Boga	ani langata south junction	Amenity green space	Block level	Jkuat Karen campus	0.61
825 No n	name	Amenity green space	Block level	Thika road	1.19
826 Buru	uburu phase 1 space	Amenity green space	Block level	Ol Pogoni road	0.51
827 Waiy	yaki way-uthiru road junction	Amenity green space	Block level	n/a	0.47
828 Rum	nbi road	Amenity green space	Block level	n/a	0.20



REFERENCES

- CABE, 2007. Briefing Cemeteries, churchyards and Brial grounds. [Online] Available at: http://webarchive. 1. nationalarchives.gov.uk/20110118095356/http://www.cabe.org.uk/files/cemeteries-churchyards-and-burial-grounds. pdf [Accessed 14 July 2016].
- Castillo, G. E., 2003. Livelihoods and the city: An overview of the emergence of agriculture in urban spaces. Progress 2. in Development Studies, Volume 3, pp. 339-344.
- 3. Economist Intelligence Unit, 2011. African Green City Index. [Online] Available at: http://www.siemens.co.za/ sustainable-development/pdf/African-Green-City-Index.pdf [Accessed 12 July 2016].
- ETH Studio Basel, 2008. Nairobi: Atlas and Student Work Draft, s.l.: s.n. 4.
- FAO, 1998. Urban forestry in the Asia-Pacific region: status and prospects.. [Online] Available at: http://www.fao.org/ 5. docrep/003/x1577e/X1577E12.htm [Accessed 18 July 2016].
- Freeman, D., 1991. A City of Farmers: Informal Urban Agriculture in the Open Spaces of Nairobi, Kenya. Montreal: 6. McGill-Queen's University Press.
- G.o.K, 2008. Nairobi Metro 2030, Nairobi: Government of Kenya. 7.
- 8. GoK, 2005. Forests Act Cap. 385. Nairobi: Kenya Law Reports.
- GoK, 2009. The National Museums and Heritage Act Cap 216. Nairobi: Kenya Law Reports. 9.
- Halliman, D. M. & Morgan, W. T. W., 1967. The City of Nairobi. In: W. Morgan, ed. Nairobi City and Region. 10. Nairobi: Oxford University Press, p. 102.
- 11. Hanauer, A. & Ayers, C., 2011. Great Green Public Spaces Right Under Our Noses. [Online] Available at: http:// www.onthecommons.org/magazine/great-green-public-spaces-right-under-our-noses [Accessed 14 July 2016].
- 12. Ikawa, J. O., 2015. The Impacts of Policies on the Development and Management of Recreational Spaces in Nairobi, Kenya. [Online] Available at: http://ir-library.ku.ac.ke/bitstream/handle/123456789/13288/The%20Impact%20 of%20Policies%20on%20the%20Development....pdf?sequence=1[Accessed 8 June 2016].
- 13. Institute of Sustainable Systems and Technologies, 2009. Creating Active Communities: How Can Open and Public Spaces in Urban and Suburban Environments Support Active Living?. [Online] Available at: https://www. healthybydesignsa.com.au/download/2012/05/Creating-Active-Communities-FULL-REPORT.pdf [Accessed 15 July 2016].
- 14. Kara, Nairobi City County, UNEP, 2015. Nairobi City County Non-Motorised Transport Policy. [Online] Available at: http://www.unep.org/Transport/sharetheroad/PDF/STR_PolicyBrief_final.pdf [Accessed 15 June 2016].
- 15. Karayannis, G., 2014. Dissecting ISO 37120: Why shady planning is good for smart cities. [Online] Available at: http://smartcitiescouncil.com/article/dissecting-iso-37120-why-shady-planning-good-smart-cities [Accessed 12 July 2016].
- 16. KDI, 2015. Land and Water Resolving the Tensions of Climate Change and Urbanisation in Nairobi's Largest Slum. [Online] Available at: Land and Water - Resolving the Tensions of Climate Change and Urbanisation in Nairobi's Largest Slum [Accessed 29 July 2016].
- 17. Kellett, J. & Rofe, M. W., 2009. Creating Active Communities: How Can Open and Public Spaces in Urban and

Suburban Environments Support Active Living?, Adelaide: Heart Foundation.

- 18. Kiruma, J. M., 2014. Quality of Urban Open Spaces in the CBD of Nairobi, Nairobi: University of Nairobi.
- 19. Kounkuey Design Initiative, 2016. Re-imagining the waterways of Nairobi, Kenya through learning, building and a network of flood resilience.. [Online] Available at: https://challenges.openideo.com/challenge/urban-resilience/ideas/ networking-public-space-for-basin-wide-resilience [Accessed 28 July 2016].
- 20. Machielse, W., 2015. Perceived Safety in Public Spaces. [Online] Available at: http://www.diva-portal.se/smash/get/ diva2:826168/FULLTEXT01.pdf [Accessed 16 July 2016].
- 21. Ministry of Housing, 2012. The Urban Future: An East African Perspective on the World Urban Forum 6, Nairobi: Government of Kenya.
- 22. Ministry of Lands and Settlement, 2002. Physical Planning Handbook. Nairobi: Government of Kenya.
- 23. Nairobi City County, 2014. The Project on Integrated Urban Development Masterplan for the City of Nairobi in the Republic of Kenya Final report, Part II: The Masterplan. [Online] Available at: http://www.nairobi.go.ke/assets/ Documents/EI-JR14112-Master-Plan-01-1-1.pdf [Accessed 7 July 2016].
- 24. Obudho, R. A., 1997. Nairobi: National Capital and Regional Hub. In: C. Rakodi, ed. The Urban Challenge of Africa: Growth and Management of its Large Cities. Tokyo: United Nations University Press.
- 25. Ojal, M. F., 2015. The Atrium: From a dull parking lot to the Soulf of the City, s.l.: Not published.
- 26. Opiyo, R., 2009. Metropolitan Planning and Climate Change in Naiorbi: How much room to manouvre?. [Online] Available at: http://siteresources.worldbank.org/INTURBANDEVELOPMENT/ Resources/336387-1256566800920/6505269-1268260567624/Opiyo.pdf [Accessed 16 May 2016].
- 27. Parsons, R. et al., 1998. The View from the Road: Implications for Stress Recovery and Immunization. Journal of Environmental Psychology, Issue 18, pp. 113-140.
- 28. Pinto, A. J., Nunes da Silva, F., Brandao, P. & Remeser, A., 2010. Planning public spaces networks towards urban cohesion. [Online] Available at: http://www.isocarp.net/data/case_studies/1798.pdf [Accessed 4 March 2016].
- 29. Project for Public Spaces, 2012. Placemaking and the Future of Cities. [Online] Available at: http://www.pps.org/wpcontent/uploads/2012/09/PPS-Placemaking-and-the-Future-of-Cities.pdf [Accessed 17 July 2016].
- 30. Sangmoo, Kim, 2015. Public spaces not a nice to have but a basic need for cities. [Online] Available at: https://blogs. worldbank.org/endpovertyinsouthasia/public-spaces-not-nice-have-basic-need-cities [Accessed 17 June 2016].
- 31. Spellerberg, I. & Gaywood, M., 1993. Linear Landscape Features. Landscape Design, pp. 19-21.
- 32. Stanley, W. B., Stark, L. B., Jonhson, L. K. & Smith E, M., 2012. Urban Open Spaces in Historical Perspective: A Transdiciplinary typology and analysis. Urban Geography, pp. 1089-1117.
- 33. The state of Queensland, 2003. Planning Principles and Implementation notes for Local Government. [Online] Available at: http://www.nprsr.qld.gov.au/recreation/pdf/open-space/open-space-planning-principles-implementation. pdf [Accessed 16 July 2016].
- 34. Tonnelat, S., 2010. The sociology of urban public spaces. In: H. Wang, M. Savy & G. Zhai, eds. Territorial Evolution

and Plannery Solution: Experiences from China and France. Paris: Atlantis Press.

- 35. UN OCHA, 2015. Humanitarian response. [Online] Available at: https://www.humanitarianresponse.info/en/applications/kobotoolbox [Accessed 14 June 2015].
- 36. UNES, 2016. Nairobi City County Development Control Policy (Draft Report), s.l.: s.n.
- 37. UN-Habitat, 2013. Streets as Public Spaces and Drivers of Urban Prosperity, Nairobi: UN-Habitat.
- 38. UN-Habitat, 2014. The Global Public Space Toolkit. Nairobi: s.n.
- 39. United Nations Task Team on Habitat III, 2015. Habitat III issue paper on public space. [Online] Available at: http://unhabitat.org/wp-content/uploads/2015/04/Habitat-III-Issue-Paper-11_Public-Space-2.0.compressed.pdf [Accessed 12 July 2016].
- Wachira, E. N., 2013. ENVIRONMENTAL IMPACT ASSESSMENT FULL STUDY FOR THE PROPOSED REHABILITATION OF NAIROBI CITY PARK, NAIROBI COUNTY. [Online] Available at: http://www.nema. go.ke/images/docs/EIA%20-%201060%20-%201069/EIA_1061%20Nairobi%20City%20Park%20report.pdf [Accessed 7 June 2016].
- 41. Warwick District Council, 2003. The Benefits of Urban Trees. [Online] Available at: http://www.naturewithin.info/ UF/TreeBenefitsUK.pdf [Accessed 19 July 2016].
- 42. White, T. L. W., Silberman, L. & Anderson, P. R., 1948. Masterplan for a Colonial Capital, London: His Majesty's Stationery Office.
- 43. Woolley, H., 2003. Urban Open Spaces. London and NewYork: Spon Press.
- 44. Worldbank, 2016. How eight cities succeeded in rejuvenating their urban land. Online] https://www.worldbank. org/en/news/press-release/2016/07/13/How-eight-cities-succeeded-in-rejuvenating-their-urban-land?cid=EAP_ TwitterWorldBankAsia_P_EXT [Accessed 1 July 2016].



FOR MORE INFORMATION, CONTACT:

Cecilia Andersson - Head, Global Public Space Programme, UN-Habitat Tel: +254 20 762 4570 Email: cecilia.andersson@un.org or unhabitat-publicspace@un.org UN-Habitat (United Nations Human Settlements Programme) Urban Practices Branch P.O. Box 30030, GPO Nairobi 00100, Kenya Website: www.unhabitat.org



UN@HABITAT