

Attaining Urban Health and Well Being: Options for a Variegated Megapolis



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Lagos Liveable City Conference 2.0

- “Responding to the Mental and Social Health Needs of the Lagos Megacity”.



Mental & Social Health

- The whole purpose of responding to mental and social health needs of a people is to ensure their wellbeing
- This informed my choice of Topic:
“Attaining Urban Health and Well Being: Options for a Variegated Megapolis”.



“Variegated”

- Lagos is a megacity of ‘gates’
- Variety in gates
 - gates controlled electronically, with uniformed guards and traffic lights, to let vehicles into and out of the community in an orderly fashion
 - gates manned by vigilantes
 - gates manned by local guards or hunters who rely heavily on “African indigenous science” to keep the neighbourhood safe.
- Lagos is a veritable kaleidoscope of shape and colour – truly a variegated megapolis



Objectives

- Explore how urbanisation has been advancing inexorably and how that has impacted the health of urban dwellers
- Mention stakeholders in urban health and wellbeing
- Provide a brief overview of the mental and social health of Lagosians
- Share some the findings from our studies in Disadvantaged Urban Neighbourhoods (DUNs)
- Offer options for policy and practice to improve urban health and wellbeing in the Lagos of the future



Urbanisation

- In 1900, only about 10% of the world's population lived in cities
- By 2007, that proportion crossed 50%
- By 2030, 60% of the world's population will dwell in cities [*UN Department of Economics & Social Affairs*]
- The industrial revolution set off rapid urbanisation in Europe and North America, leading to the creation of large slums.
- Urbanisation replicated in the developing world in the 2nd half of the Century.
- 90% of the world's urban population are now in low-income and lower-middle income countries



Factors Driving Urbanisation

- Rural-Urban Migration
- Natural Population Increase
- Formation of Conurbations



Main Driver of Urbanisation

- The Lagos metropolis is one giant conurbation of many previously separate settlements and there will yet be many more mergers
- In terms of numbers, population increase in urban areas is due largely to natural increase
- However, natural increase is intensified by rural-urban migration because the migrants tend to have a higher general fertility rate.



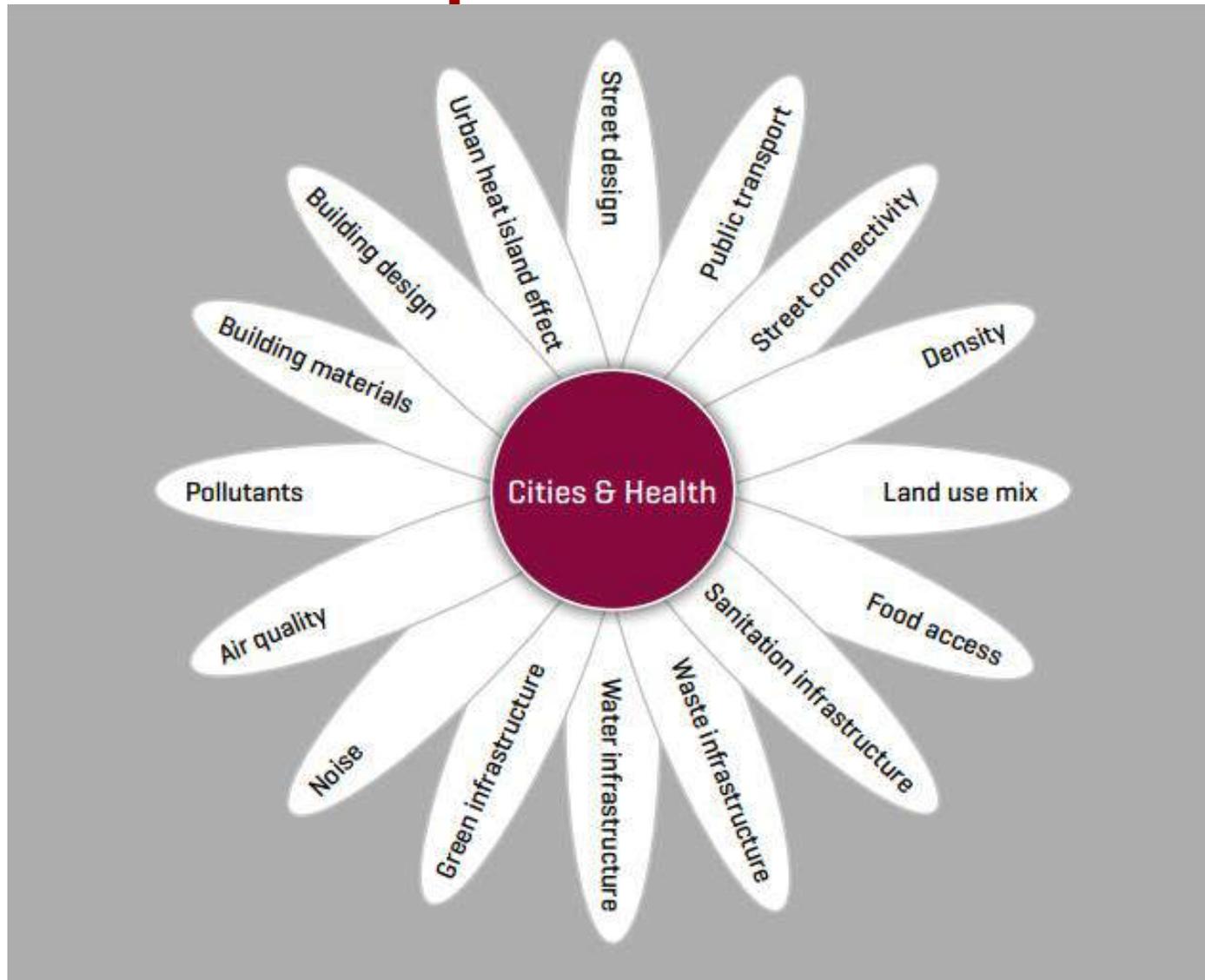
Criteria for Being Urban

Not universally agreed upon but include the following:

- minimum human population threshold,
- high population density,
- presence of infrastructure such as tarred roads and drainage,
- pipe-borne potable water,
- grid electricity,
- proportion employed in industries,
- presence of educational institutions,
- a good health system.



Factors with Impact on Health in Cities



Pineo & Rydin, 2018

Bane of Urban Health

“Triple Threat of Disease”

- chronic diseases,
- communicable diseases
- increased risk of violence and injury.

Unless this ‘troika’ is tackled, improving the health and wellbeing of urban dwellers will remain a mirage.



Stakeholders in Urban Health

- Government
- Organised Private Sector
- Healthcare Providers
- Communities & Neighbourhoods



Government & Urban Health

- Setting the right policies for neighbourhood layouts,
- Provision of infrastructure, especially roads, water, sanitation and hygiene (WASH) a catchall that includes sewage and solid waste disposal, as well as provision of potable water and
- Making the environment 'greener' and safe



OPS & Urban Health

- Provision of meaningful employment
- Measures that minimize contribution to air pollution
- Measure that protect against environmental degradation



HCP, Communities & Urban Health

- Health education
- Provision of care to those
 - who fall ill,
 - that are injured,
 - those that require specific care that prevents illness or avoidable complications, such as immunisation and maternity care.
- Get Community Buy-in



The Variegated Metropolis of Lagos

**Ikoyi-Lekki
Bridge**



**Lagos
Mainland
Bridge near
Bariga**



Banana Island



Mental Health & Wellbeing

- ***‘Mental Health is a state of well-being in which every individual realizes his or her own potential, can cope with the normal stresses of life, can work productively and fruitfully, and is able to make a contribution to her or his community.’ [WHO]***
- ***Wellbeing is the presence of positive emotions and moods (e.g., contentment, happiness), the absence of negative emotions (e.g., depression, anxiety), satisfaction with life, fulfilment and positive functioning’ [US CDC]***



Mental Health & Wellbeing

- ***Mental Health is a critical contributor to Wellbeing***



The Health of Lagosians

- In the report of Okubadejo *et al* in 2019, **55%** of adult Lagosians suffer from hypertension based on the American College of Cardiology/American Heart Association (ACC/AHA) 2017 guidelines. According to the older Joint National Committee on Hypertension 7 (JNC7) guidelines of 2003, the prevalence is a less alarming, but still sobering **27.5%**.
- Adewuya *et al*, in a study published in 2022, found major depression in **15%** of the people surveyed in Lagos. The high risk factors were being young (age 18 to 24), female, with poor social support, abusing alcohol or having functional disability.



The Health of Lagosians [2]

- Communicable diseases are an inevitable accompaniment of urban life. The dense social contact networks and high mobility of people in congested urban areas like Lagos facilitate the rapid transmission of infectious diseases.
- Violence and injuries are much commoner in urban than in rural areas. Lagos is not different. There is a high concentration of unemployed youth, many engaging in substance abuse and many joining gangs and cults for various reasons, creating a combustible mix for the production of violence and injury.



Social Determinants of Disease

- A lot of what people experience, health-wise, is traceable to genetic constitution, but there are numerous factors outside our genes that contribute to our health and well-being.
- Generally, the range of factors that influence health outside our genes are known as the 'social determinants of health'.
- The World Health Organization (WHO, 2012) describes these as 'the circumstances in which people are born, grow up, live, work and age, and the systems put in place to deal with illness.'



Disadvantaged Urban Neighbourhoods

- One important consequence of intense and rapid urbanisation is the development of slums or areas of deprivation within cities.
- People in slums have much worse health than those in non-slum urban areas.
- There is a so-called 'urban bias' in favour of urban areas when it comes to health indices and access to healthcare, but this does not necessarily extend to slums.
- In slums and with some dimensions of health (especially mental health), people who live in slums have worse health than the rural poor
- Special interventions are required in such neighbourhoods to improve health and wellbeing.



Table 1 Current definitions of slums

Source	Definition
UN-Habitat current definition—based on a household ²³	'Any specific place, whether a whole city, or a neighbourhood, is a slum area if half or more of all households lack improved water, improved sanitation, sufficient living area, durable housing, secure tenure, or combinations thereof'. ²⁰ The criteria (improved water, etc) are defined in more detail.
UN original definition—based on an urban space ²⁴	'A contiguous settlement where the inhabitants are characterised as having inadequate housing and basic services'.
India (2011 census) ²⁵	A compact area of at least 300 population or about 60–70 households of poorly built congested tenements, in unhygienic environment usually with inadequate infrastructure and lacking in proper sanitary and drinking water facilities.
Bangladesh (2014 slum census) ²⁶	A cluster of compact settlements of five or more households which generally grow very unsystematically and haphazardly in an unhealthy condition and atmosphere on government and private vacant land. Slums also exist on owner-based household premises.
Brazil (Brazilian Institute of Geography and Statistics definition) ²⁷	More than 50 contiguous households where most do not have their own property title of the land and live under one of the characteristics listed below: <ul style="list-style-type: none">▶ The absence of one or more services (energy supply, water supply, sewage system, garbage collection).▶ Unplanned urbanisation.

Lilford R *et al*, Because space matters: conceptual framework to help distinguish slum from non-slum urban areas. **BMJ Glob Health**. 2019 Apr 11; 4(2): e001267



Original UN Definition of 'Slum' (2002)

'A contiguous settlement where the inhabitants are characterised as having inadequate housing and basic services'.



UN Habitat Definition (2008)

‘Any specific place, whether a whole city, or a neighbourhood, is a slum area if half or more of all households lack improved water, improved sanitation, sufficient living area, durable housing, secure tenure, or combinations thereof’.



Other Definitions of 'Slum'

From **India, Brazil** and **Bangladesh**; all contain the following elements

- Poorly Built Structures
- Congested Tenements
- Unhygienic Environment
- Poor Water Supply (Lack of Potable Water)
- Poor Sanitation (Poor Sewage & Garbage Disposal)
- Poor Access to Health Facilities
- Specified minimum number of households in a compact contiguous area (**60-70** in **India**, **50** in **Brazil**, **5** in **Bangladesh**)
- Unplanned urbanisation



Alternative Terminology

- Because of the pejorative connotations attached to the word ‘slum’, some urban health experts are advocating the use of other terms to describe such spaces.
- One term that has been suggested is “Disadvantaged Urban Neighbourhoods” or DUNs – Another suggestion is “Deprived Urban Neighbourhoods”
- For the remainder of my presentation I will use the former and the acronym DUNs



Findings from a Study in Three Nigerian Disadvantaged Urban Neighbourhoods (DUNs)



Study Description

- Part of a study of 7 Disadvantaged Urban Neighbourhoods (DUNs) in four countries
- Two DUNs in Ibadan and one in Lagos were included
- The number of households included were 812 (Bàrígà), 844 (Ìdíkáń) and 1256 (Şáşá)
- Sampling took spatial distribution into account. Based on an openstreet mapping that was done in the first stage of the study
- 11,174 individuals were interviewed, including 3440 in Bàrígà. Not all responded to the same questions because the questionnaire for children was different from that of adults
- DUNs had peculiar attributes – *‘indigenous’*, *‘migrant’* & *‘cosmopolitan’*



Ibadan – Ìdíkáń



Ibadan – Şáşá



**Şáşá
Community**

**Şáşá
Market**



Lagos – Bàrìgà



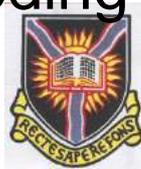
Lagos – Bàrígà

Research Assistants on Fieldwork



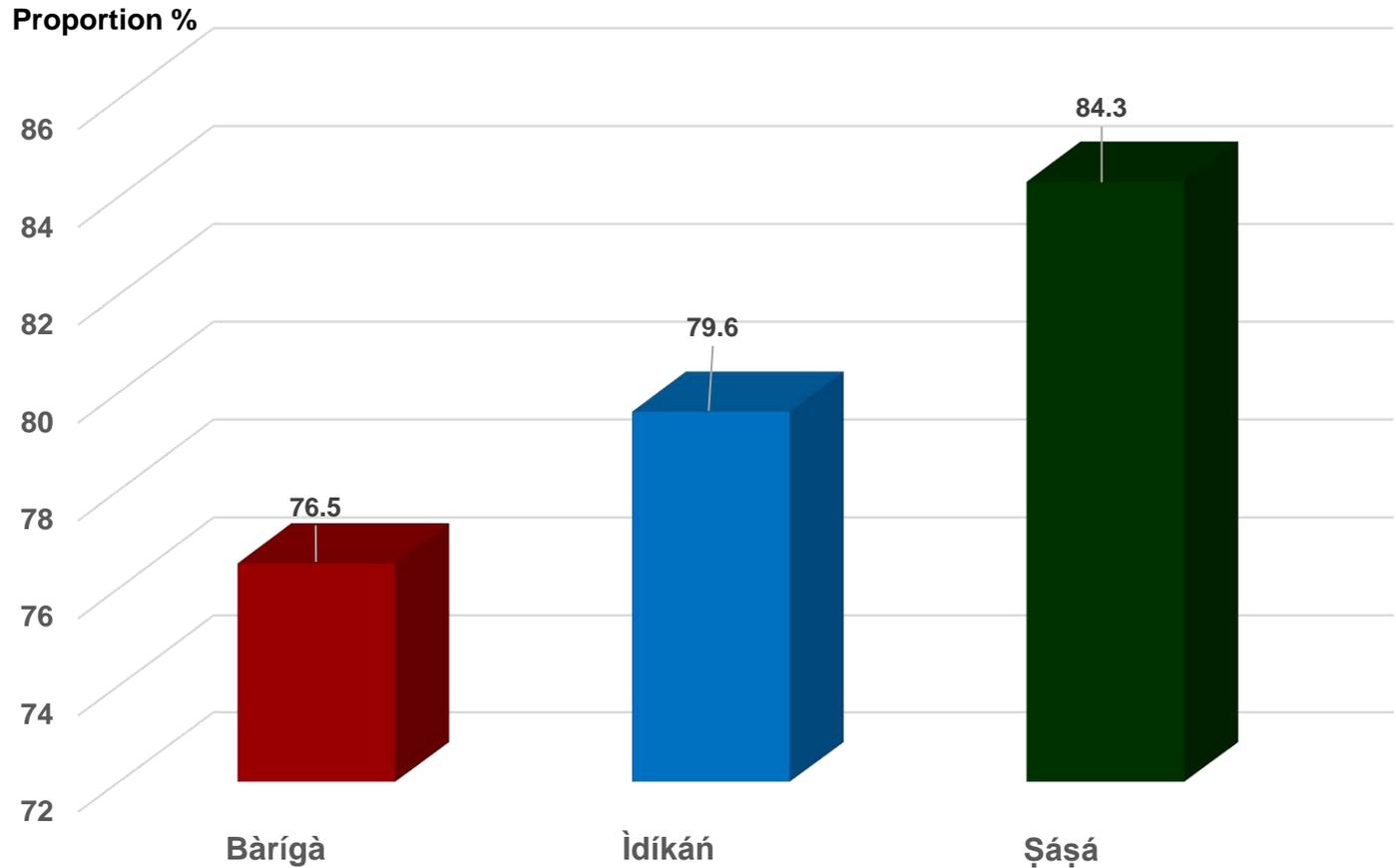
Study Participants

- The majority of the participants in all the three DUNs were female, married or cohabiting, educated to at least secondary level and had some form of employment.
- The 'migrant' and 'cosmopolitan' DUNs had more young adults less than 35 years than those in the other age categories. On the contrary, the 'indigenous' DUN had more middle-aged and older adults
- Household poverty (daily expenditure < N1000) was lower among residents in the 'cosmopolitan' DUN, where 82.8% of residents spent a daily aggregate higher than the threshold, compared to 48.4% and 50.1% in the 'migrant' and 'indigenous' DUNs, respectively.
- 83% of those in the DUN in Lagos attended formal facilities for healthcare in the preceding 12 months (vs 76% in Ibadan)



Feeling of Wellbeing in 3 Nigerian DUNs

Generally, My Health is Very Good/Excellent
(Proportion %)



N =
4140

Bàrígà

(1159)

Ìdíkáń

(1172)

Şáşá

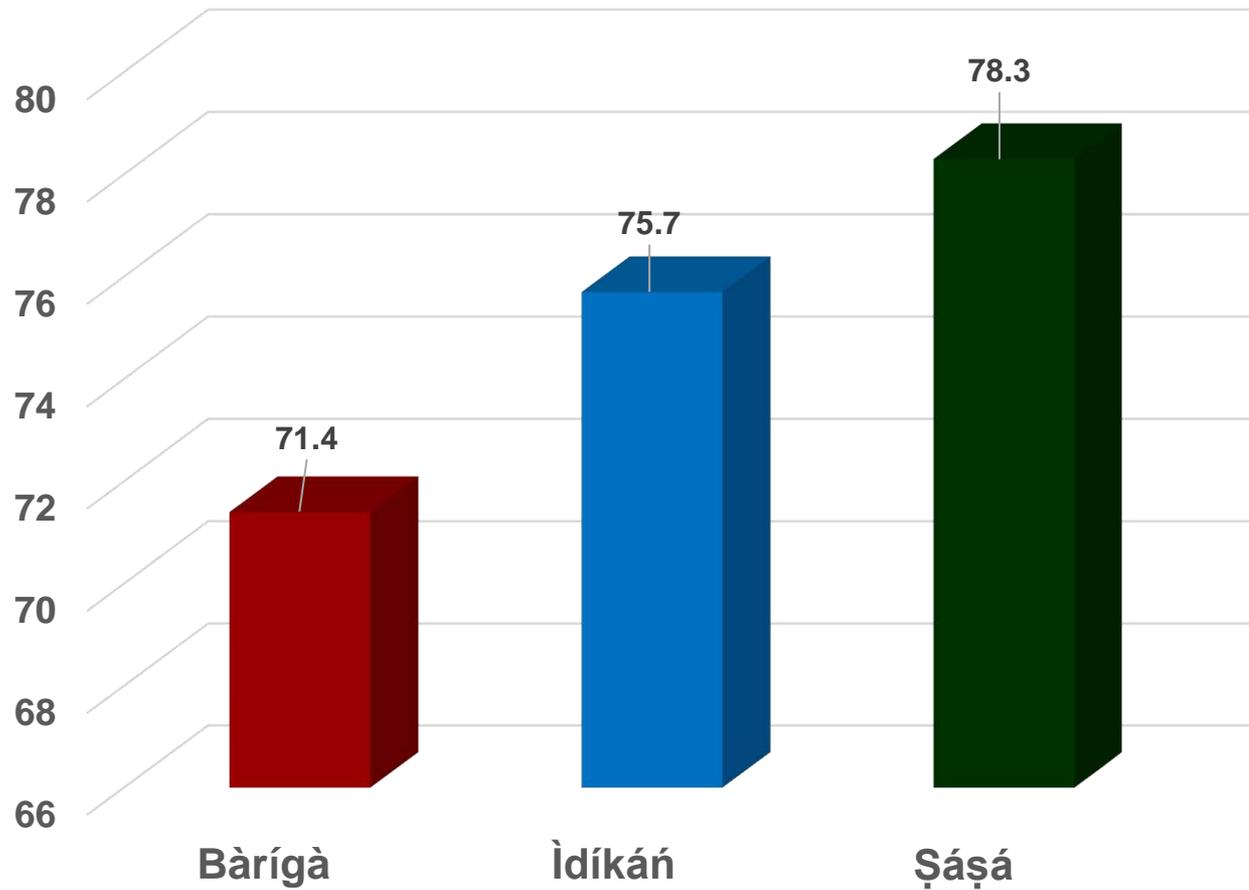
(1809)



Wellbeing Compared to Previous Year

Compared to One Year Ago, My Health is Better
(Proportions %)

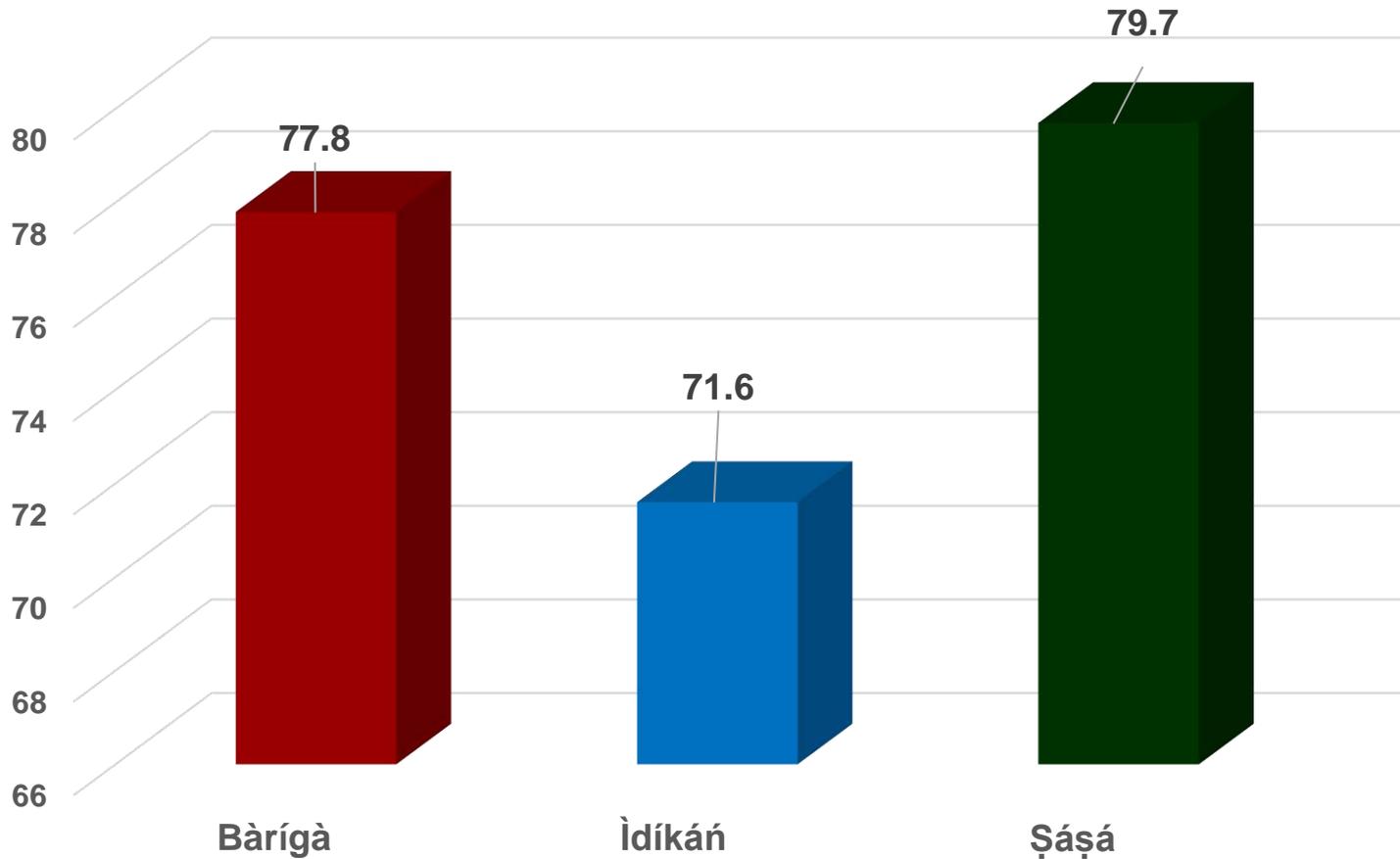
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Limitation to Physical Activity

My Health Does Not Limit Me in Vigorous Activity
(Proportions %)

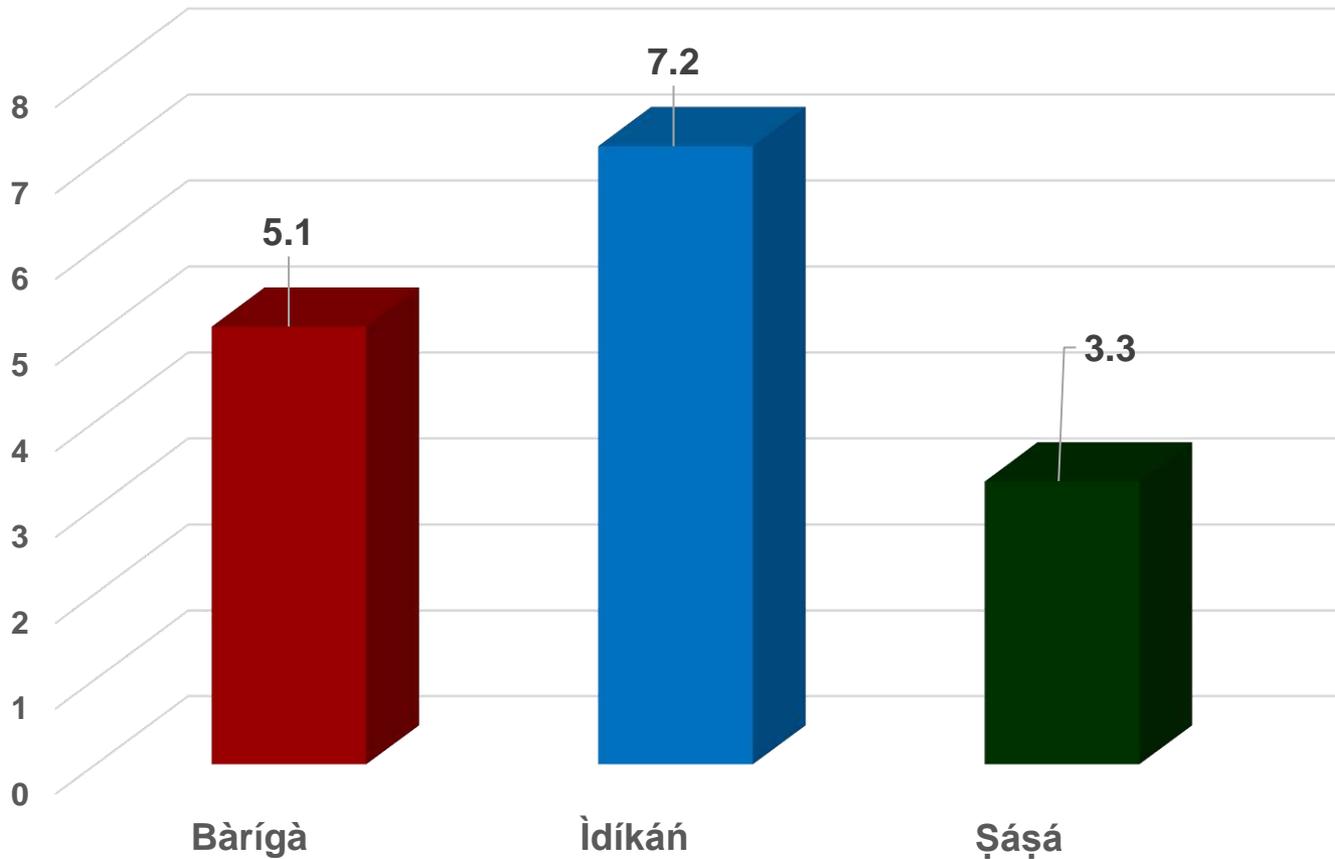
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Pain Interfering with Ability to Work

Suffering Pain that Interferes with Normal Work
(Proportions %)

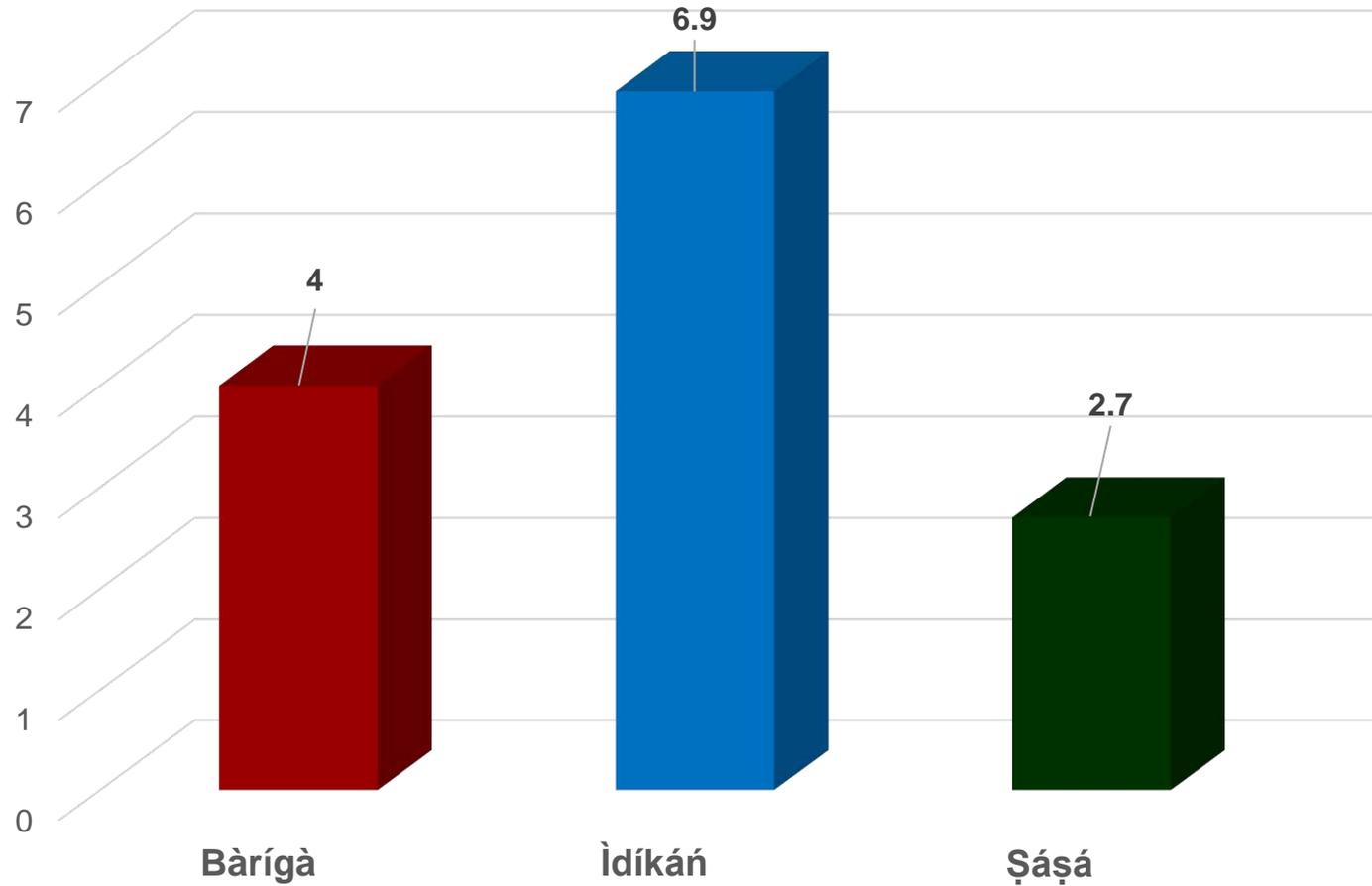
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Limitations to Social Interaction

Health Limits Social Interaction Most or All of the Time
(Proportions %)

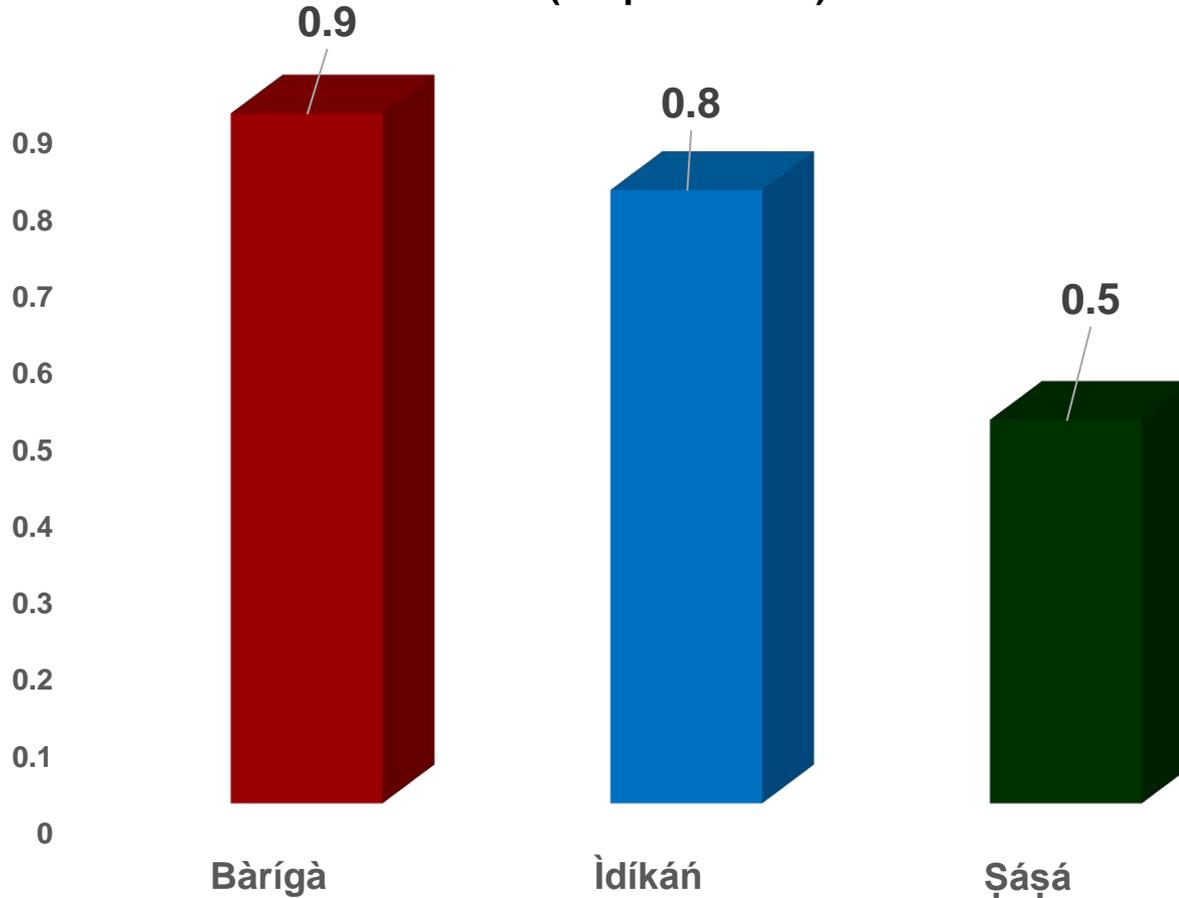
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Emotional Problems Limiting Achievements

I Achieve Less Because of Emotional Problems
(Proportions %)

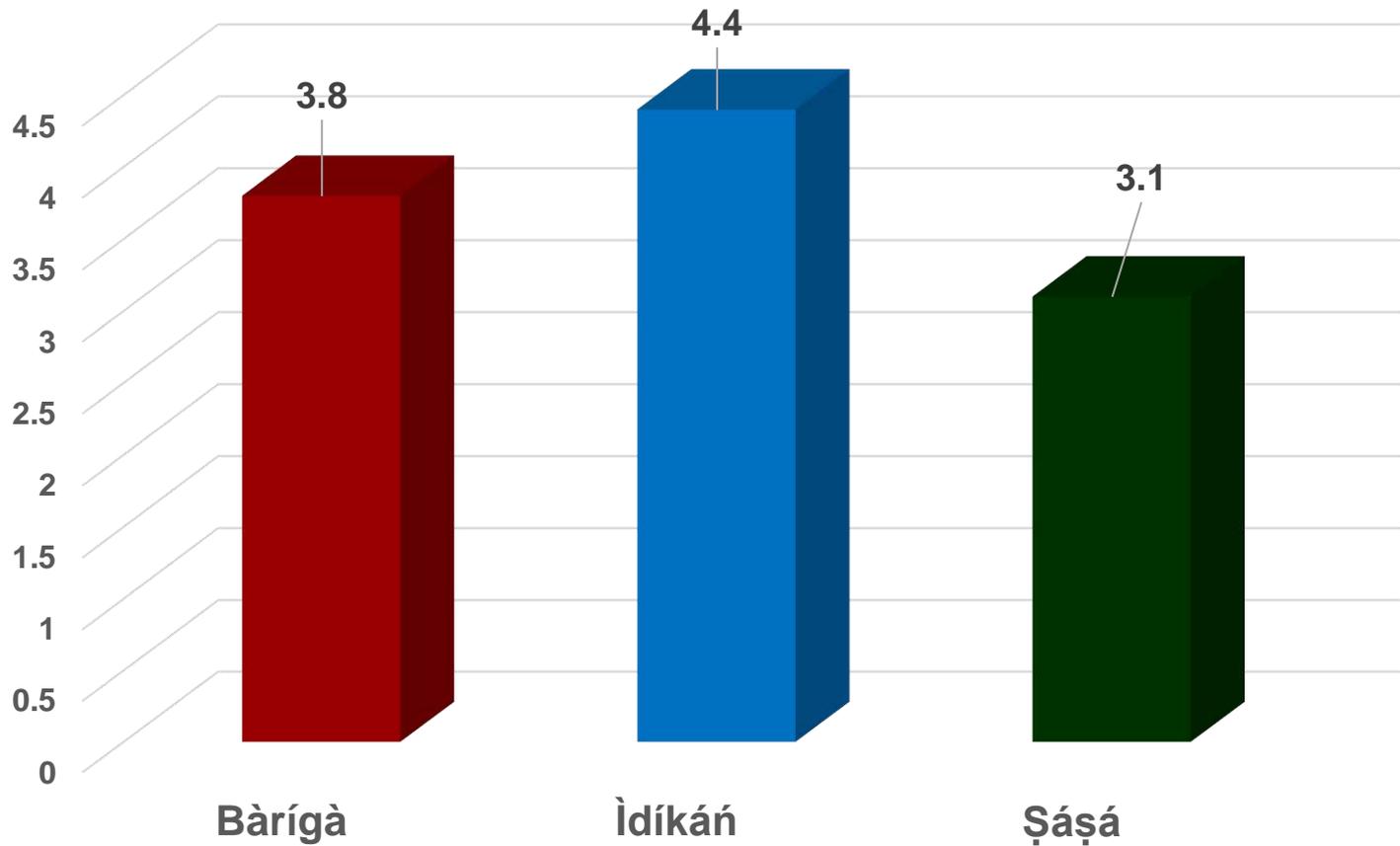
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Feeling Tense or Downhearted

Feel Tense or Downhearted and Low Most or All of the Time
(Proportion %)

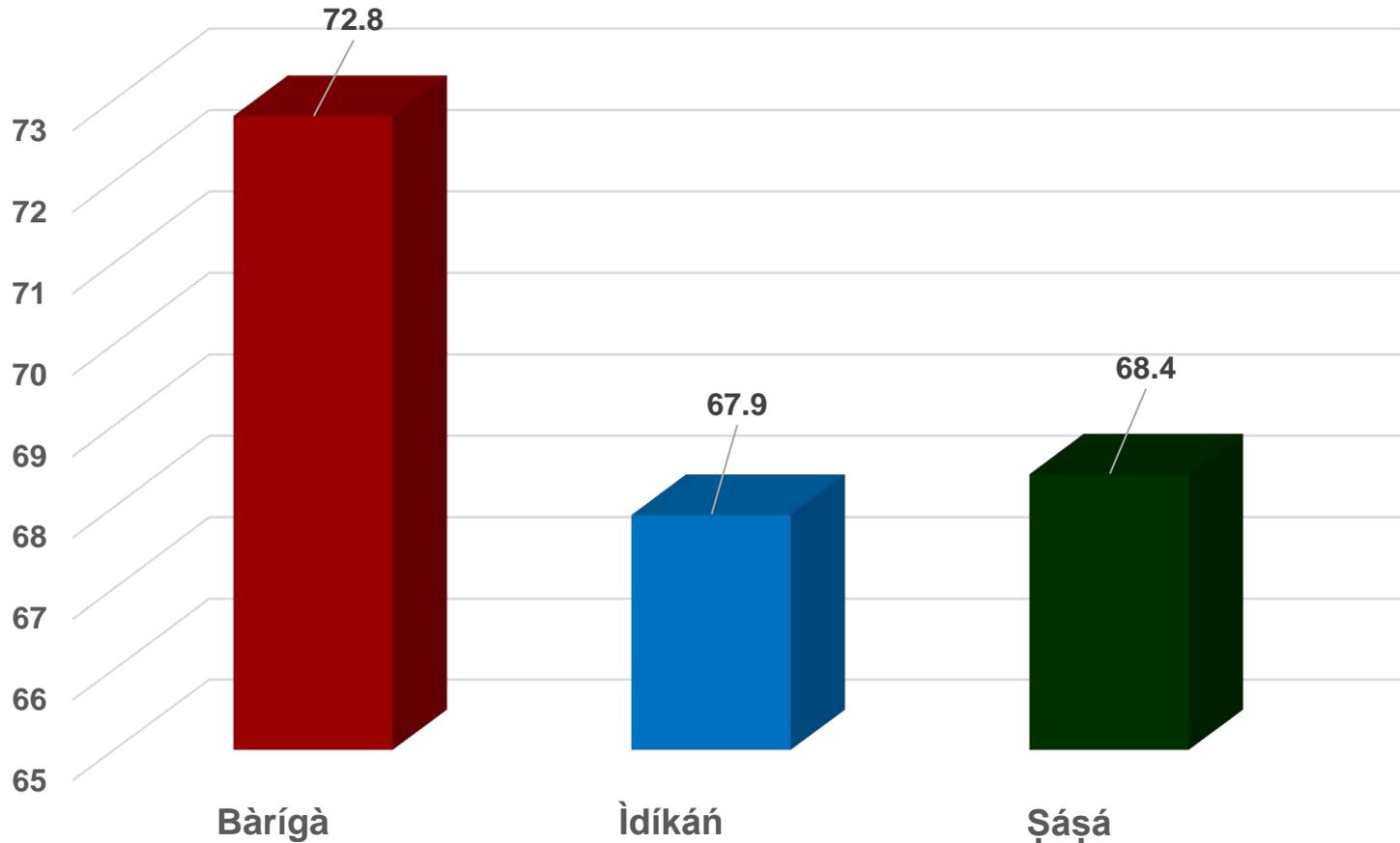
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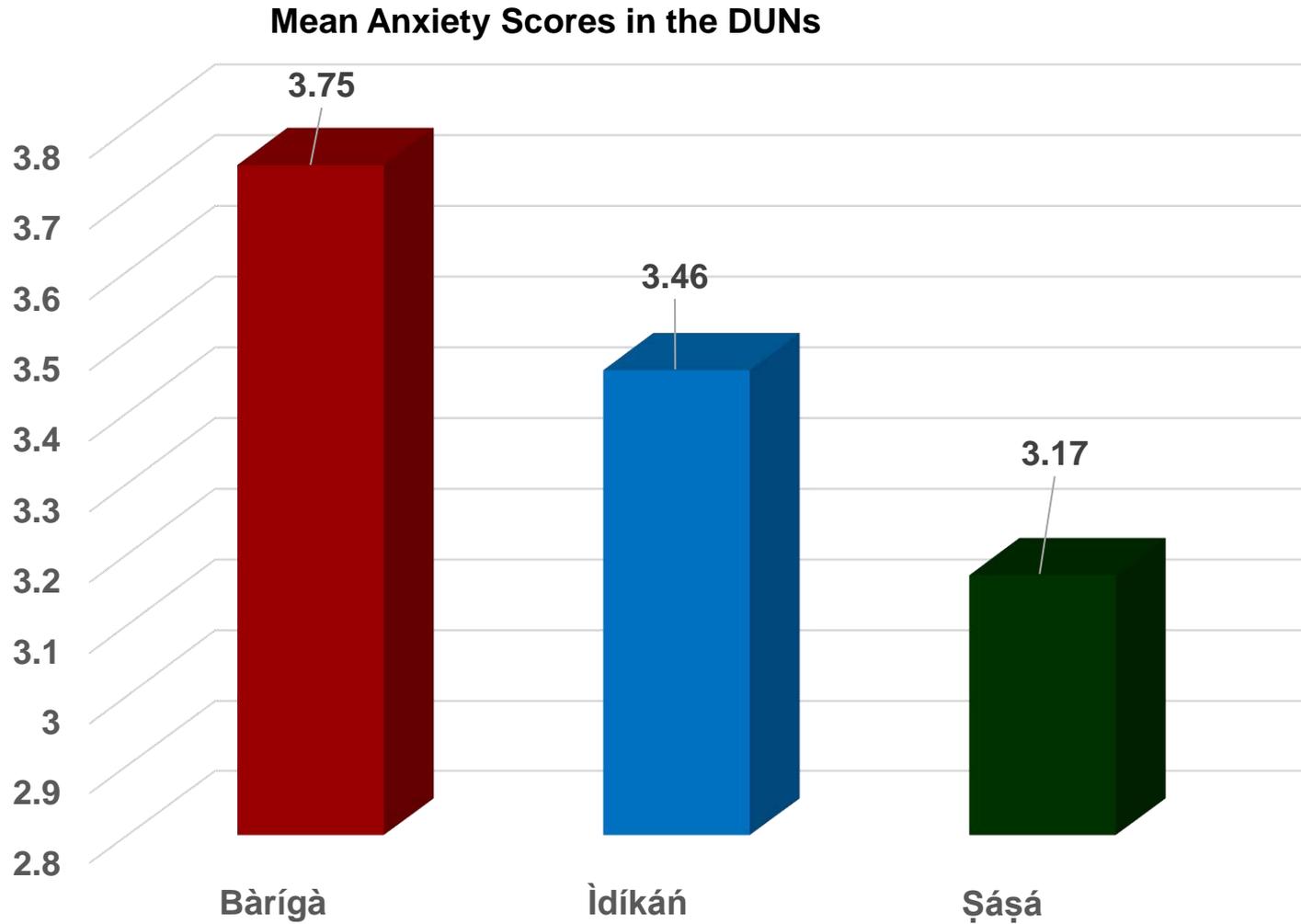
Feelings of Vitality

Vitality - I Have a lot of Energy Most or All of the Time
(Proportions %)

N =
2940



Mean Anxiety Scores Among Residents



Wellbeing in DUNs

- While it may be comforting to see more than 70% of these dwellers of these DUNs reporting feeling well and having energy for normal daily living, urgent interventions are needed for the remaining 30% who do not feel well.
- Various options for intervention must be explored.



Challenges with Urban Neighbourhoods in LMICs

- Poor access to and poor quality of water, sanitation and hygiene infrastructure
- Poor waste management
- Substandard building quality (structural safety and materials; thermal comfort & air quality)
- Access to affordable housing
- Deprived urban neighbourhoods
- Poor preparedness for, and ability to cope with, natural disasters



Challenges with Urban Neighbourhoods in LMICs [2]

- Noise and air pollution
- Access to greenspace
- Lack of opportunities for physical activity in daily life (e.g. home confinement in dangerous locations; long transportation commute to work/school)
- Designing neighbourhoods to meet the needs of children, an ageing population and disabled people
- Learning from communities about their perceptions of health and place
- Preparedness for the impacts of climate change



Response Requires a Systems Approach

- *“Despite the specific differences of cities in different regions of the world, current global urban trends and the increasing risks they pose to urban and planetary health require us to understand cities as complex living systems. In order to grasp the opportunities of increasing urban complexity, we need to address the emerging challenges for urban health and wellbeing by promoting a new urban systems science and the adoption of systems approaches for the co-creation of solutions for future healthy cities” (ICSU, 2021).*



Options for the Future

Three main categories which could be labelled as

- ‘macro’ (*larger systemic*)
- ‘meso’ (*intermediate level*)
- ‘micro’ (*direct action*)

(Lilford *et al*, 2017).



'Macro' Measures

- These are at the level of politics, economics and social justice,
- Includes such things as
 - an independent judiciary,
 - a free press
 - sound fiscal and monetary policies.
- These are mostly issues that are handled at the national and international levels



'Meso' Measures

Involves policies that are targeted at

- limiting urban population growth,
- better governance and planning of urban spaces,
- land-zoning and provision of tenure,
- slum clearance
- continuous community engagement.



‘Meso’ Measures [2]

- Slum clearance is a loaded term because it often leads to displacement of populations.
- In some places it is called “gentrification” because those who are displaced are replaced with wealthier people, a real dilemma from the viewpoint of social justice.
- Generally, *in-situ* slum upgrading is preferable to relocation of people.



'Micro' Measures [1]

- Targeted specifically at problems that have been identified in the community concerned and
- State and local governments have a major role to play



'Micro' Measures [2]

- Physical and Engineering Approaches
 - *Tarring of Roads*
 - *Construction of Drainage Channels*
 - *Water and Sanitation Measures in Neighbourhoods*
 - *Garbage Removal*
 - *Home Improvements*
 - *Better Lighting of Homes and Streets*



'Micro' Measures [3]

- Health Services Improvements
 - *Health Promotion*
 - *Prevention of Diseases*
 - *Improved Access to Clinical Services (overcome barriers to utilisation, such as distance and cost, for people who live in DUNs)*



‘Micro’ Measures [4]

- In terms of health promotion, we often do not place sufficient emphasis on mental health both for young and old, particularly as our population is ageing.
- Our urban spaces must be made safer for children and young adults by creating places to walk safely, venues for recreation and other activities that the youth can safely engage in.
- For the older population, numerous studies have shown that risk of cognitive decline and dementia can be reduced by being physically active, avoiding tobacco use, avoiding harmful use of alcohol and avoiding obesity. Community engagement can also help to reduce social isolation among the elderly.



Conclusion [1]

- Urban living has both positive and negative aspects
- Urbanisation can lead to an improvement in access to modern healthcare facilities, advanced medical technology and highly trained health care professionals
- The “economies of proximity” associated with population concentration can reduce the costs of delivering infrastructure such as those required for clean water and social services



Conclusion [2]

On the other hand,

- Urban living often leads to greater exposure to
 - overcrowding,
 - communicable diseases,
 - outdoor air pollution,
 - environmental degradation,
 - violence and crime,
 - stressful work,
 - social isolation,
 - risk factors for chronic disease, such as high-fat diets and inadequate physical exercise



Conclusion [3]

- While city living can grant access to better education and better income, it does not always translate to better health and wellbeing.
- Conscious measures of intervention are required to make cities truly liveable.



Acknowledgements

- ICSU. *Report of the ICSU Planning Group on Health and Wellbeing in the Changing Urban Environment: a Systems Analysis Approach*. International Council for Science, Paris. 2011
- Pineo H, Rydin Y. *Cities, Health and Well-Being*. London, Royal Institution of Chartered Surveyors (RICS) 2018.
- ICSU. *Urban Health and Wellbeing in the Anthropocene. An Interdisciplinary Science-Action Plan for Urban Health and Wellbeing in an Age of Complexity and Systemic Risks (2021 – 2025)*. International Science Council, UHWB Programme, Xiamen. 2021



Thank You!

