

Academic Knowledge on Quality of Life in Urban Africa: What Do We Know?

Niké Susan Jacobs¹ · Selna Cornelius¹ · Carike Claassen² · Christi Niesing³ · Juaneé Elizelle Cilliers⁴ · Roelof Petrus Burger¹

Accepted: 25 January 2024 © The Author(s) 2024

Abstract

Even though vague and contested, the construct of the quality of life can play an important role in gauging the success of spatial governance. It is present in most spatial policy objectives and many scholars describe it as the ultimate goal of spatial governance. The question remains, however, whether the construct of the quality of life is explored in sufficient depth to understand its practical relevance within widely divergent African contexts. Africa is notorious for its low levels of life quality and many scholars argue that research on its difficulties is not focalized and conclusions are too often drawn without truly considering the unique African context. To discover the extent of the current knowledge base on African life quality, African-specific case study research was identified and analyzed. A systematic literature review was conducted following the textual narrative synthesis approach. The analysis revealed a geographically sparsely distributed knowledge base of urban African quality of life. Further to this, a wide variety of research themes were identified, ranging from socio-economic, physical, and environmental characteristics to strategic planning and sustainable development. This sparsely distributed knowledge base, along with the wide variety of research themes and the undefined nature of the quality of life, makes it difficult to compare the case studies. The paper, subsequently, calls for further case study research to enable a true understanding of the association and meaning of quality of life within the African context that would ultimately support appropriate development of measurements in urban Africa.

Keywords Quality of life \cdot Urban planning \cdot Spatial planning \cdot Africa \cdot Case study research

Extended author information available on the last page of the article

Introduction

The idea of improving quality of life is present in most objectives for urban and development policies (Nakanishi, 2015, p. 71; Paprzyca, 2019) and is described as the ultimate goal of spatial governance (Bardhan et al., 2015, p. 56; Moroke et al., 2020, p. 107; Omar, 2006, p. 84; Rosenberg, 1965, p. 3). Even though quality of life is a noble normative construct, it has been suggested that it lamentably became a buzzword (Khalifa, 2019, p. 5300), often used to secure academic funding and societal influence (Cornwall, 2007, p. 471) diminishing it to a trite and meaningless phrase (Murgaš & Klobučník, 2016, p. 554). This may be attributed to its multifaceted nature and the subsequent complexity of practical implementation (Lo Piccolo & Thomas, 2009, p. 45).

The study of quality of life is primarily concerned with how social, economic, infrastructure, and environmental conditions affect human life (Kazemzadeh-Zow et al., 2018, p. 6096). Raphael et al., (1996, p. 367) explain this with three constructs: *being, belonging*, and *becoming*—individuals with certain physical, psychological, and spiritual components (*being*) interact with their physical, social, and communal environments (*belonging*) during the course of their daily activities (*becoming*) (Alvarez & Müller-Eie, 2017, p. 259; Raphael et al., 1996, p. 367). The combination of these constructs influences people's "feelings of contentment" with their "experience of the world" (Andereck et al., 2007, p. 484), or their quality of life.

As may be inferred from the holistic nature of this description, the multidimensionality lends itself to different interpretations and applications within the quality of life discourse, depending on the research focus and discipline (Haslauer et al., 2015, p. 912; Moroke et al., 2018, p. 146). Thus, it is only appropriate to disclose the *focus* and *discipline* of the authors themselves. In accordance with the theme of multidimensionality, the authors of this paper represent a multidisciplinary team comprising the disciplines of human geography, urban planning, economic development, human health, and applied climatology. It is believed that the *belonging* tier, i.e., the spatial organization of people's living environments, affects the *being* and *becoming* tiers by influencing people's agency and control of resources (Bhattacharyya, 2004, p. 14; Onyx et al., 1992, p. 172; Qiao et al., 2019, p. 18). Since people's living environments "shape the way they are able to live their lives" (Sapena et al., 2021), the focus of this paper lies primarily within the *belonging* tier.

The challenge, however, is to identify and understand the different types of communities living their lives within this *belonging* tier (O'Brien et al., 1989, p. 61), since the experience of the quality of life differs in association and meaning, depending on place and society (Nanor et al., 2018, p. 836). Marujo (2021, p. 198), therefore, advocates for "an ongoing commitment to the qualitative study of [...] quality of life" to ultimately deepen "the understanding of the local context." It is argued that this would require a multidisciplinary team who understand something of the different parts of the complex urban system, i.e., human capital, natural capital, social capital, and economic capital (Li et al., 2009, p. 134). Such

a holistic understanding of the local context may enable different actors within this system (e.g., urban planners, economists, healthcare practitioners, and environmentalists) to utilize the knowledge to enhance quality of life.

In view of the context-specific nature of life quality research, this paper aims to investigate whether the association and meaning of African quality of life have been thoroughly described, as this continent is notorious for its low quality of life (Cash, 2014, p. 126; De Neve & Krekel, 2020, p. 50). In view of Africa's rapid urbanization rates (OECD, 2020), the research is further focalized on urban Africa. It is argued that before the "quality of life in urban Africa" knowledge frontier may be further pushed, it is essential to understand where this frontier lies (Xiao & Watson, 2019, p. 93). To this end, a systematic literature review was conducted to determine the facets of quality of life considered as part of the research agenda in academic literature. The subsequent section provides a brief overview of the current views on life quality in urban Africa, followed by how quality of life is understood in the public and academic discourse, the research methodology, and research results.

Quality of Life in Urban Africa

In recent years, a large portion of scholarship has been focused on the quandary of low life quality in Africa, with many reasons provided for this, including inequality (Rigon et al., 2018, p. 419), unprecedented urbanization rates (Lynch et al., 2020, p. 1), informality, poverty (Lategan, 2017, pp. 252–253), and a failure to manage necessary structural transformation (Ebikemefa, 2020). The assumption of low levels of life quality in Africa is further strengthened by the primarily low quality of life scores for African countries included in the indexes, ranking life quality, for example, the Happy Planet Index (HPI) (HPI, 2022). In the 2020 HPI, the highest-ranked African country¹ was Mauritius in 24th place and the lowest-ranked was Zimbabwe in 88th place out of 88 countries. It is, therefore, evident that African life quality differs significantly at country level. However, the calculated average score of the African countries included in the 2020 HPI is 44.3, corresponding with the HPI score for the country ranked in 61st place (i.e., Montenegro) out of 88 countries. This indicates a relatively low average for life quality in Africa.

Eloff (2020, p. 450), however, criticizes the current academic and public discourse about African quality of life as one-sided and advocates for a more balanced focus. She explains that lives that may be "regarded as privileged by some indicators" may well "be disadvantaged in many other ways" and likewise, "lives that may be regarded as disadvantaged, may also have embedded rewards" (Eloff, 2020). Further to this, numerous scholars (APA & UN-Habitat, 2013; Binns & Nel, 1999, p. 391; Nhemachena et al., 2011; Watson, 2016) have pointed out that research on the quality of life difficulties in Africa is not contextually focalized and conclusions

¹ African countries included in the 2020 HPI are Benin, Cameroon, Cote d'Ivoire, Ethiopia, Ghana, Kenya, Mauritius, Nigeria, South Africa, Tanzania, Zambia, and Zimbabwe.

are too often drawn from a Western viewpoint, without truly considering the unique African context.

African cities are considered "more unique than most" (Munzhedzi et al., 2016, p. 30), resulting from distinctive indigenous settlement traditions varying between the different regions (Pacione, 2009, p. 468). This was further diversified by the different histories and time-periods of international trade and colonization (Green, 2014). As a result of these diverse histories and the vastness of the continent, African countries have significant socio-economic, socio-cultural, and socio-political differences within and between the countries (Jacobs, 2019). The multifaceted nature of both the construct (quality of life) and the context (the diverse and heterogeneous nature of the African continent) combined with the researcher's lens (their *focus* and *discipline*) may, moreover, easily forge a narrow and potentially biased perspective, producing one-sided research (focusing only on certain facets of the construct and context).

In view of this, researchers have called for a unique African planning philosophy, based on the unique and highly divergent African context (Corburn, 2003, p. 420; Cornelius et al., 2017, pp. 422,424). This paper argues that a thorough description of life quality in urban Africa may reveal these disadvantages and embedded rewards. It is, however, necessary to firstly understand the description already created by quality of life research in Africa, to enable researchers to build on existing research. The subsequent section, therefore, provides a concise overview of how the quality of life is measured in the public and academic discourse, followed by the methodology of this research and the research results.

Measuring Quality of Life

In keeping with the complex nature of the quality of life and the African context, a wide variety of measures to understand the quality of life exists (Fahy & Cinnéide, 2008, p. 284; Shekhar et al., 2019, p. 70). The approach to measuring the quality of life depends on the purpose of the enquiry and the philosophical paradigm from which the enquiry is made. Two main paradigms have been identified, namely the Hedonistic paradigm equating well-being and pleasure (Tiberius, 2014, pp. 7110–7112) and the Socratic paradigm considering a quality life as a mixture of different conditions and components (Michalos, 2014a, p. 226; 2014b, p. 4830). The idea of equating well-being and pleasure (Hedonistic paradigm) seems to omit an essential component of the quality of life, namely belonging that often stands independent of individual experiences such as pleasure (Tiberius, 2014, pp. 7110-7112). Conversely, the Socratic paradigm provides scope to explore the multifaceted components of the being, belonging, and becoming tiers of the quality of life. This paper, subsequently, aligns itself with the Socratic paradigm, since the belonging tier (the focus of this paper) refers, as previously noted, to the space where people live and is made up of various components influencing the quality of human life.

No consensus has been reached as to what these components influencing life quality explicitly entails. Amartya Sen proposed that a good life consists of resources, functionings, and capabilities (Binder & Coad, 2014). This approach, however, does

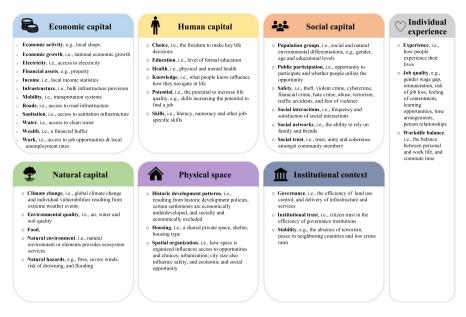


Fig.1 A framework unpacking the quality of life indicators, developed through a thematic analysis of quality of life index reports, South African legislation guiding spatial decision-making, and case study research conducted in South Africa. Source: Created from Jacobs (2022)

not provide a precise list of components (Robeyns, 2005, pp. 192, 195), but has inspired various measurement approaches, e.g., Alkire (2008); Blaauw and Pretorius (2013); Robeyns (2005); and Verkerk et al. (2001). Currently, the most commonly used measurement for the quality of life is social indicators (Papageorgiou, 1976, p. 178; Stanca, 2018, p. 66; Wong, 2014, p. 1790). Social indicators are general indicators used as a starting point to explore social phenomena. Proponents of this measurement tool argue that it measures, simplifies, and communicates values and challenges of the local context (Beukes & Van Der Colff, 1997, p. 229; Darkey & Visagie, 2013, p. 303; Nakanishi, 2015, pp. 2,4). It has, however, also been criticized for oversimplifying the quality of life construct (Fahy & Cinnéide, 2006, p. 695), omitting important facets of the quality of life (Fahy & Cinnéide, 2008, p. 371), and excluding citizen priorities, since it is developed mainly by policy-makers (Nakanishi, 2015, p. 73).

Holistic social indicators, incorporating the ideas of both policy-makers and local citizens, may be found in Jacobs' (2022) framework as presented in Fig. 1. The framework was created from a comprehensive doctoral study that firstly reviewed quality of life index reports, and then expanded the framework by analyzing legislation guiding spatial decision-making, and case study research conducted in South Africa. The framework may, therefore, serve the purpose of evaluating facets of the quality of life (social phenomena) included in the research agenda of academic literature. In view of this African lens, the framework is deemed appropriate for the purposes of this paper. To explore the currently available description of African life quality, this paper presents a systematic literature review of research (with a case

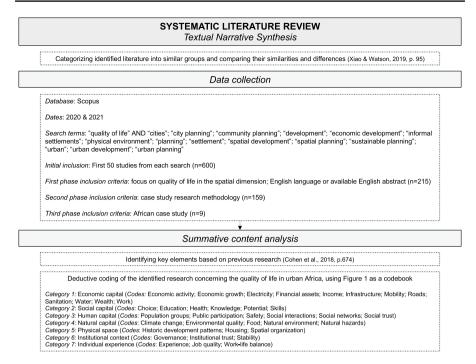


Fig. 2 A flow diagram outlining the systematic steps of conducting the literature review

study research methodology) that describes quality of life in urban Africa. The framework, presented in Fig. 1, will be used as a point of reference for data analysis.

Methodology of This Research

To investigate the extent to which case study research has described the quality of life in urban Africa, a systematic literature review was conducted following a textual narrative synthesis approach (Xiao & Watson, 2019, p. 95), as is depicted in Fig. 2. It allows characteristics within each piece of literature to be extracted, compared, and critiqued to ultimately depict the state of the current literature (Xiao & Watson, 2019, p. 95).

Textual Narrative Synthesis

The textual narrative synthesis involved systematically extracting the facets of the quality of life (Fig. 1) that was studied within each of the identified literature (refer to sections below for more detailed methods). Xiao and Watson (2019, p.95) explain that this approach is more rigorous than a standard narrative review, since it requires categorizing the identified literature into similar groups (the quality of life facets in this case) and then comparing their similarities and differences based on

the extracted data. The synthesis also included quantifying the number of studies conducted within the African continent and providing commentary on the strength of the available quality of life knowledge in literature (Xiao & Watson, 2019, p. 95).

Literature Collection Methods

Peer-reviewed publications in academic journals were systematically gathered during 2020 and 2021 using the Scopus database. Even though there is a considerable body of knowledge available in gray literature on this topic, this paper focuses specifically on the current academic discourse. The keywords used for the search were as follows: *quality of life* combined respectively with, *cities, city planning, community planning, development, economic development, informal settlements, physical environment, planning, settlement, spatial development, spatial planning, sustainable planning, urban, urban development,* and *urban planning.* The first 50 papers from each keyword search, amounting to a total number of 600 papers, were filtered for inclusion. All literature was included, regardless of publication date. The gathered literature was further filtered, in three phases, through inductive coding in ATLAS.ti (Friese, 2012, p. 2).

First Phase Literature Inclusion Criteria: Quality of Life in the Spatial Dimension

The identified literature was filtered by *title*, *abstract*, and *keywords*, to identify those inquiring specifically about quality of life in the spatial dimension. The literature was limited to papers written in English and available English abstracts of papers written in another language. The gathered literature was, subsequently, reduced to a number of 215 papers.

Second Phase Literature Inclusion Criteria: Case Study Research Methodology

The literature was then filtered to only include those following a case study research methodology. It is argued that case study research may well disclose the associations and meanings of life quality within different places and societies. Its detailed examination of phenomena connected to a particular context (Farthing, 2016, p. 116; MacCallum et al., 2019, p. 46) affords access to the multiple wealth of details and nuances within the complex reality (Flyvbjerg, 2006, pp. 2–6,21). It furthermore offers, the opportunity to critically engage with, and generate, theories explaining this complex reality (Duminy et al., 2014, p. 1; Yin, 2018). It is, therefore, argued that the normative conclusions, "rooted in the details of a 'place'" (De Satgé & Watson, 2018, p. 24) from various case studies may ultimately create a thorough description of case study research and restore meaning to the construct of life quality.

To determine whether case study research was used, the research question and/or objective was firstly reviewed to discover if the quality of life (or a facet thereof) was explored within an individual case(s). In some of the identified literature, the methods section explicitly outlined it as case study research and in others the authors conveyed their purpose as understanding the particular case. Lastly, the sampling

strategy was reviewed to determine the reasoning behind how and why the specific case(s) were chosen.

The gathered literature was, subsequently, reduced to a number of 159 papers.

Third Phase Inclusion Criteria: African Cases

Those papers using a case study research methodology were further coded according to the location of the researched cases. Subsequently, the literature was reduced to a number of 9 papers considering an African case(s).

Literature Analysis

A summative content analysis (Cohen et al., 2018, p. 674) was then employed to explore the current understanding within the sampled texts of life quality in urban Africa. The research themes and findings of identified papers studying cases in Africa were identified, narratively summarized and tabulated. Furthermore, these were correlated with Jacobs's (2022) framework, as presented in Fig. 1.

Iterations

After the coding process was concluded, the codes attributed to the literature were reviewed in order to ensure rigorous research results.

Results and Discussion

African Quality of Life: Where Do We Know?

The majority of the analyzed papers used case study research for their inquiry, as illustrated in Fig. 3. It is argued that this use of case study research makes sense, since, as previously noted, life quality is highly dependent on the context, and case study research may allow for a better understanding of the complex nuances regarding life quality in the real world. However, as presented in Fig. 3, from the analyzed sample only 12 African cases in 4 African countries were explored in 9 papers.

It may, therefore, be argued that this limited number of case study research strengthens the case for critics of the current African life quality discourse, averring that research in this region is often one-sided and not contextually focused. As argued in Sect. 2, research is usually done from a specific perspective (the researcher's *focus* and *discipline*) and even though the construct (quality of life) and context (the diverse and heterogeneous African continent) are multifaceted, a single study usually focuses only on specific facets of the construct and context.

Case study research may well produce a greater understanding of the association and meaning of the quality of life within the highly diverse urban Africa from which well-grounded claims may be made. An extensive description of life quality in Africa may enable informed decisions regarding the spatial organization of African

Research designs of the anal	lyzed papers	Cases analyzed
Case study research	159 Afric	a 12
Evaluation research	Asi	a 57
Modelling research 🚦 4	Australi	a 📕 4
ew paper/ Textual research 🛛 🗾 20	Europ	e 69
Survey Research 🧧 8	North Americ	a 27
Unknown (abstract) 🧧 7	South Americ	a 27
	Identified African cases	
Cases	Country	Paper
 Cairo (AlShahoda City) Cairo (Badr City) 	Egypt	Khalil (2012)
3. Addis Ababa (Kirkos)	Ethiopia	Tesfazghi et al. (2010)
4. Kumasi	Ghana	Nanor et al. (2018, p. 838)
Johannesburg (Alexandra)	South Africa	Richards et al. (2007)
5. Durban		
7. East London		
Bloemfontein	South Africa	Beukes and Van Der Colff (1997)
 Durban metropole 	South Africa	Møller (2001)
10. Klerksdorp (City of Matlosana)	South Africa	Moroke et al. (2020)
11. Pretoria (Mamelodi)	South Africa	Darkey and Visagie (2013)
12. Johannesburg (Soweto)	South Africa	Westaway (2006)

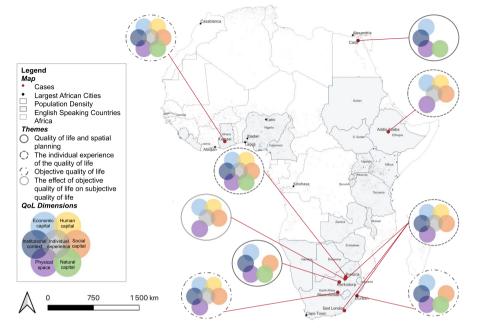
Fig. 3 A summary of the papers identified during the literature review, including the only 12 case studies that focus on the African continent

societies. This is especially regarded as necessary, since the construct of life quality is, unsurprisingly, present in most urban and development policies, frameworks, and guidelines. The question remains though, whether the association and meaning of life quality in the African context have been sufficiently described to warrant a true understanding thereof.

Figure 4 illustrates the locations where the identified African case study research was conducted, along with where the ten largest African cities are situated, the population density within Africa, and the African countries where English is an official language, since the study was limited to research conducted in English. Further to this, Fig. 4 visually presents the research themes and the quality of life dimensions included in the analyzed sample.

The case study research may produce a broad overview of the meaning and association of the quality of life, but a quite sparsely distributed description from the analyzed sample of literature is evident in Fig. 4. This sporadic nature may not disclose the nuances within the different places and societies of urban Africa and may, furthermore, indicate that the *belonging* tier of life quality for a large part of Africa has not thoroughly been described. Most of the largest African cities were not included in the sample of case study research, i.e., Ibadan, Lagos, and Kano in Nigeria, and Cape Town in South Africa. Figure 4 also indicates that large parts of English-speaking Africa with high population density are not included in the identified sample of case study research. These include parts of Nigeria, Cameroon, Zimbabwe, Zambia, Malawi, Tanzania, Burundi, Rwanda, Uganda, and Kenya.

It is, furthermore, evident that the research themes are also sparsely spread across English-speaking South Africa. Even though some themes repeat, it may be argued



Quality of life case study research in Africa

Fig. 4 The location and focus of quality of life case study research in Africa identified during the systematic literature review

that the variety of themes further disperse what we do know of the quality of life within urban Africa. Additionally, not all the dimensions of the quality of life are considered in all the cases. *Economic capital* and the *physical space* are considered in all cases; *social capital* is considered in all cases except in Cairo; the *institutional context* is considered in all cases except in Addis Ababa; human capital is not considered in the cases of Cairo and Klerksdorp; the *individual experience* is not considered in the cases of Cairo and Klerksdorp; and natural capital is not considered in the cases of Addis Ababa, Johannesburg, and Bloemfontein. The cases of Johannesburg and Durban were included in two separate studies. This allowed for more of the quality of life dimensions to be considered. In the cases of Johannesburg, for example, one study did not include natural capital, but this was captured by the other study.

The following section explores the contribution to knowledge about African quality of life made by the identified case study research.

African Quality of Life: What Do We Know?

Since Africa is a vast, exceedingly diverse and heterogeneous continent, with many socio-economic, socio-cultural, and socio-physical variations, it is argued that an extensive description of life quality in this region is necessary to truly understand the

association and meaning of urban life quality in Africa. To further explore the research agenda from the analyzed sample, their research themes, the quality of life indicators considered in the research agendas and their context-specific conclusions are presented in Table 1. This may serve to elucidate some facets of the quality of life that have been described regarding urban Africa.

To understand the extent of what we do know of African life quality, Table 1 indicates which of the social indicators from Jacobs' framework (refer to Fig. 1) have been considered as part of the research agenda of the identified papers. Most of the indicators are to a more or lesser extent included in the studies-the only absent indicators are wealth, knowledge, social trust, climate change, historic development patterns, and stability. Four of the indicators, namely income, mobility, housing, and spatial organization were included in some cases within all four countries. We suggest that the indicators proposed by the Jacobs framework may serve to strengthen cohesiveness within the research agenda on quality of life. For instance, in Table 1 it is evident from the context-specific findings highlighted by Darkey and Visagie (2013) that, although not explicitly mentioned as such, stability, social trust, and knowledge are important aspects influencing quality of life in Mamelodi. Violent protests and corruption, highlighted as problems by the community, point to larger issues relating to a lack of stability and social and institutional trust. These indicators may provide a common language for researchers working in this field to explicitly name and identify that which is at present only implied in the context-specific conclusions discussed.

As discussed earlier, the multifaceted nature of the quality of life lends itself to different focuses within the broader quality of life discourse, depending on the research purpose and discipline. Therefore, the identified papers also explore different research themes, and focus their conclusions and recommendations on various facets of the *belonging* tier. These themes include (1) quality of life and spatial planning in Cairo and Klerksdorp; (2) understanding the individual experience of the quality of life in Addis Ababa, Pretoria, Johannesburg, East London, and Durban; (3) understanding objective quality of life in Kumasi, Bloemfontein, and Durban; and (4) understanding the effect of *objective quality of life* on *subjective quality of life* in Johannesburg.

In many cases, especially the South African ones, the studies were demarcated specifically to informal settlements or explicitly focused on the black communities. In view of the highly heterogeneous nature of urban Africa, it is argued that such specific demarcations during case study research may enable a more in-depth representation of a certain facet of urban life quality in Africa. When numerous similar studies are conducted that focus on different demarcations, it may provide a more nuanced representation of life quality in urban Africa. It may, however, be noted that the papers mainly either provide recommendations for decision-making or provide a discussion of the quality of life status quo within the *given* area.

Conclusion

The quality of life is a highly context-driven and multifaceted construct, making it exceedingly complex and difficult to define. For spatial governance, concerned with organizing space, the focus is usually on the influence of the physical environment

field during the literature review	ida, the quarity of the indicators considered	as part of the research agenda and the conte	able 1 A summary of the research agenda, the quarry of hite indicators considered as part of the research agenda and the context-specific conclusions of each case identi- fied during the literature review
Case(s)	Research agenda of the paper	Quality of life indicators considered in the research agenda	Context-specific conclusions
AlShahoda City & Badr City (Cairo), Egypt (Khalil, 2012)	Reviewing models that quantify quality of life to enhance quality life through strategic planning	 Economic capital: economic activity; income; mobility; roads; sanitation; water; infrastructure Natural capital: environmental quality; natural environment Physical space: housing; spatial organization Institutional context; governance 	The paper identified needs and priorities in small-sized Egyptian cities, including (1) public "housing for low-income households", (2) quality infrastructure, e.g., water and sanitation systems; (3) quality services, e.g., skills, education, and health: (4) quality natural environment, e.g., energy-efficient systems; (5) restructuring governance and building capacities; and (5) local economic development
Kirkos (Addis Ababa), Ethiopia (Tesfazghi et al., 2010)	Determining the small-scale spatial variability of individuals' quality of life	 Economic capital: financial assets; income; mobility; work Human capital: education; health Social capital: Safety Physical space: housing; spatial organization Individual experience: experience 	The paper concluded that the residents of Kirkos are dissatisfied with their quality of life, and that the life satisfaction within Kirkos varies between different neighborhoods
Kumasi, Ghana (Nanor et al., 2018, p. 838)	Investigating the socio-economic characteris- tics of a fast-growing and poorly serviced city and exploring its influence on the quality of life	 Economic capital: electricity; financial assets; income; mobility; sanitation; water; work Human capital: choice; education; health Social capital: public participation; safety; social network Natural capital: environmental quality; natural environment; natural hazards Physical space: housing; spatial organization Institutional context: governance Individual experience: experience; job qual- ity; work-life balance 	The paper concluded that the residents of Kumasi experience a low objective quality of life

 $\underline{\textcircled{O}}$ Springer

Table 1 (continued)			
Case(s)	Research agenda of the paper	Quality of life indicators considered in the research agenda	Context-specific conclusions
Alexandra (Johannesburg), Durban, and East London, South Africa (Richards et al., 2007)	Understanding "how informal-settlement residents view their living conditions and what they consider to be the most appropriate interventions to meet their needs"	 Economic capital: electricity; mobility; sanitation; water; work; infrastructure Human capital: education; health Social capital: safety; social interactions; occial network Physical space: housing; spatial organization Individual experience: experience; work-life balance 	The informal settlement residents have identi- fied the following as important influences on their life satisfaction: (1) material living standards, (2) housing, (3) basic services, (4) social connectivity, (5) personal health, (6) public amenities, and (7) effective govern- ance, including policing, and noted that further studies on this topic are required
Bloemfontein, South Africa (Beukes & Van Der Colff, 1997)	Investigating urban attributes contributing to the quality of life for the black community of Bloemfontein	 Economic capital: electricity infrastructure; income; sanitation; water; work Human capital: education; health; potential Social capital: poulation groups; social interactions; social network Physical space: housing Institutional context: governance Individual experience: experience 	The study found that many respondents strongly feel that they carry the responsibility for improving their life quality, rather than the government or ouside actors, but do believe they are entitled to better service provi- sion. The paper closes with a call to South African policymakers and authorities to assist "ordinary poor South Africans [to] realize more of their inherent potential to do more for themselves by providing those kinds of services and assistance that can be afforded and sustained in the foreseeable future and which do not create or recreate the depend- ency and helplessness which characterize so many urban situations in Africa."

Table 1 (continued)			
Case(s)	Research agenda of the paper	Quality of life indicators considered in the research agenda	Context-specific conclusions
Durban metropole, South Africa (Møller, 2001)	Investigating urban attributes contributing to the quality of life	 ⁶ Economic capital: economic activity; electricity; financial assets; income; sanitation; water; work ⁶ Human capital: education ⁶ Physical space: spatial organization ⁶ Institutional context: governance ⁶ Individual experience: experience 	It is suggested that, even though polarization based on race is no longer implemented in South Africa, a polarization based on economic considerations was forming in the Durban metropole during the time of the study. Furthermore, it was observed that the aspirations of the Durban metropole residents matched "the new South African govern- ment's promises of improved infrastructure and services," and that the perceived life satisfaction of what might be called "middle- class" back communities has relatively been enhanced. However, suburbanites, "although by and large satisfied with neighborhood life, give the Metropolitan Council a poorer rating on performance in delivering services and promoting Durban." A large difference in life satisfaction has, however, been observed between rich and poor residents of the Durban metropole. Nev- ertheless, the informal settlement residents increase in future. The paper closes with a call to the Durban metropoliens increase in future. The paper closes with a call to the Durban metropoliens increase in future. The paper closes with a call to the Durban metropoliens the pesting of those with settlement the pessimism of those who see prosperity and a privileged lifestyle slipping away"

Case(s) R			
	Research agenda of the paper	Quality of life indicators considered in the research agenda	Context-specific conclusions
Klerksdorp, South Africa (Moroke et al., 2020)	Exploring the linkage between Planning and sustainable development	 Economic capital: economic growth; electricity; infrastructure; mobility; roads; sanitation; water Social capital: social networks Natural capital: food Physical space: spatial organization Institutional context: governance 	No context-specific conclusions were drawn from the case study research
Mamelodi (Pretoria), South Africa In (Darkey & Visagie, 2013)	Investigating the subjective feelings of infor- mal settlement residents regarding the South African government's housing policy	 Economic capital: economic growth; electricity; sanitation; water; work Human capital: education; beatth; skills Social capital: public participation; safety; social taptwork Natural capital: environmental quality; food Physical space: housing; spatial organization Institutional context: governance; institutional trust Individual experience: experience 	Many of the respondents believe that corrup- tion and nepotism in resource allocation hinders their socioeconomic conditions which 'translate into needlessly violent protests' and the importance of politicians and community leaders operating justly and fairly was empha- sized as a measure to improve institutional trust and promote cooperation. Further- more, it 'is suggested that the following is required to truly create quality lives for the informal settlement residents of Manelodii. (1) 'functional rural and township schools'' to forge 'higher levels of development and employment rates'' and thereby stopping 'the stream of unemployable youth to the'' periphery of the cities, (2) rural develop- ment to "keep people content with the rural areas" and thereby countering large scale urbanization rates. (3) 'political stability and economic pogress in neighboring countries'' to 'stop the flow of illegal immigrants'. (4) that the needs of the poor be placed as highest priority, (5) less corruption

Ŧ	
nue	
onti	
ğ	
ς	
e	
q	
-	

Table 1 (continued)			
Case(s)	Research agenda of the paper	Quality of life indicators considered in the research agenda	Context-specific conclusions
Soweto, (Johannesburg), South Africa (Westaway, 2006)	Exploring the effect that objective quality of • Economic capital: roads; mobility life has on subjective quality of life within • Human capital: education the black community • Social capital: health: safety • Physical space: housing • Individual experience: experience	 Economic capital: roads; mobility Human capital: education Social capital: health; safety Physical space: housing Individual experience: experience 	The paper concluded that it appears if "reloca- tion to the new housing estate has had a positive impact on personal and environmen- tal quality of life," and that it "is now time to address the very real needs of squatter camp residents to improve their personal and environmental quality of life."

on people's quality of life. This is used as a directive in most urban and development policies but is also criticized as being used as a buzzword, curtailing it to a generic rather than an uplifting and empowering measure. In view of the quality of life's differentiation in association and meaning, depending on the context, this paper focused on the current academic discourse about African urban quality of life. Africa is notorious for its low levels of life quality and many scholars have offered possible causes for this, but there is also criticism from various quarters that the African context is not thoroughly understood and that the continent is evaluated from a narrow perspective. It is also argued that these evaluations are further complicated by the highly divergent and heterogeneous nature of the continent. To evaluate this claim, case study research with a spatial focus in Africa was investigated according to location, research theme, and context-specific conclusions.

Based on this process, we formulate the answer to our research question, namely what we know about quality of life in urban Africa. What we know is that quality of life research is limited and that there is not an overarching consensus or focus to quality of life studies in urban Africa. Only 9 relevant studies were identified from the systematic literature review. The geographic spread of this research is exceedingly restricted, with case studies omitting most of Africa's largest and densely populated cities. Evaluating these studies according to the Jacobs framework (2022), we find that important social indicators of quality of life, such as wealth, knowledge, social trust, historic development patterns and stability, are often omitted from the research. Therefore, the nuance of the reality of the investigated cities is missed, making the outcome too simplistic in its review. Furthermore, 9 case studies over a 25-year period fail to appreciate the fluidity of changing landscapes, since environment exposures are not static. In practice, such meager focus may exclude important and relevant context-specific policy insights.

Therefore, even though the identified African case study research provides exceedingly important contributions towards creating a fair and balanced representation of the quality of life in urban Africa, it is argued that an urgent need exists for a more widespread and in-depth investigation. The results revealed limited cases, in a restricted number of regions, with clusters of research themes and quality of life indicators; different spatial demarcations; and mostly *context-specific* recommendations. It is suggested that this sparsely distributed knowledge base may produce a limited perspective on the quality of life in urban Africa. Additionally, the undefined nature of the quality of life makes it challenging to compare case studies with each other, resulting in a further dispersion of the knowledge base of African quality of life.

It is emphasized that the multifaceted and undefined nature of the quality of life renders quality of life research exceedingly complex and diverse. Creating a fair and balanced representation of the life quality in urban Africa is, therefore, no small feat. Considering the directive role the quality of life holds in spatial governance, it is proposed that more quality of life case study research be conducted throughout the African continent in different settlement typologies, amongst different population groups, with different research themes, and a focus on various quality of life indicators. This may enable a thorough and realistic understanding of the unique challenges and complexities of African urban quality of life and may also create a broader accepted definition of the quality of life in urban Africa. It is argued that this will allow for a comparison of African case study research and, subsequently, enable spatial decision-makers to offer appropriate and African-specific urban and developmental measurements to ultimately improve the quality of life in urban Africa.

In conclusion, this paper highlights the limited nature of the academic discourse about the association and meaning of quality of life in urban Africa. Further to this, the paper underscores the multifaceted nature of quality of life acknowledging the interplay of economic development, socio-economic factors, environmental conditions, strategic planning, and sustainable development. Recognizing the gaps in understanding and appreciating the diverse African context and quality of life indicators, future research may guide policymakers in creating more effective and context-specific policies. Additionally, future research may expand on this paper to explore the linkages and contrasts between the academic quality of life discourse, gray literature, and the existing policy environment.

Funding Open access funding provided by North-West University. The authors acknowledge the financial support of the National Research Foundation (NRF) of South Africa through the Germany–South Africa bilateral program (WATNET – Grant No. 1085825).

Declaration

Conflict of Interest The authors declare no competing interests.

Open Access This article is licensed under a Creative Commons Attribution 4.0 International License, which permits use, sharing, adaptation, distribution and reproduction in any medium or format, as long as you give appropriate credit to the original author(s) and the source, provide a link to the Creative Commons licence, and indicate if changes were made. The images or other third party material in this article are included in the article's Creative Commons licence, unless indicated otherwise in a credit line to the material. If material is not included in the article's Creative Commons licence and your intended use is not permitted by statutory regulation or exceeds the permitted use, you will need to obtain permission directly from the copyright holder. To view a copy of this licence, visit http://creativecommons.org/ licenses/by/4.0/.

References

- Alkire, S. (2008). The capability approach to the quality of life. Retrieved 18 Nov. 2021 from https://ora. ox.ac.uk/objects/uuid:daa69468-daa9-4c47-b8b5-028ebae0e319/download_file?file_format=pdf& safe_filename=The%2Bcapability%2Bapproach%2Bto%2Bthe%2Bquality%2Bof%2Blife%2Bmea sures%2B2a.pdf&type_of_work=Research+paper
- Alvarez, A. L., & Müller-Eie, D. (2017). Quality of Urban life and its relationship to spatial conditions. WIT Transactions on Ecology and the Environment, 223, 285–296.
- Andereck, K. L., Valentine, K. M., Vogt, C. A., & Knopf, R. C. (2007). A cross-cultural analysis of tourism and quality of life perceptions. *Journal of Sustainable Tourism*, 15(5), 483–502.
- Africa Planning Association (APA), & UN-HABITAT. (2013). *The state of planning in Africa*. Retrieved 18 April 2017 https://unhabitat.org/books/the-state-of-planning-in-africa-an-overview/
- Bardhan, R., Kurisu, K., & Hanaki, K. (2015). Does compact urban forms relate to good quality of life in high density cities of India? Case of Kolkata. *Cities*, 48, 55–65.
- Beukes, E., & Van Der Colff, A. (1997). Aspects of the quality of life in black townships in a South African city: Implications for human development. *Quality of Life in South Africa*, 41(1/3), 229–250.

Bhattacharyya, J. (2004). Theorizing community development. Community Development, 34(2), 5-34.

- Binder, M., & Coad, A. (2014). Capability, functioning, and resources. In A. C. Michalos (Ed.), Encyclopedia of Quality of Life and Well-Being Research (pp. 524–529). Netherlands: Springer.
- Binns, T., & Nel, E. (1999). Beyond the development impasse: The role of local economic development and community self-reliance in rural South Africa. *The Journal of Modern African Studies*, 37(3), 389.
- Blaauw, D., & Pretorius, A. (2013). The determinants of subjective well-being in South Africa An exploratory enquiry. *Journal of Economic and Financial Sciences*, 6(1), 179–194.
- Cash, C. (2014). Towards achieving resilience at the rural-urban fringe: The case of Jamestown, South Africa. *Urban Forum*, 25(1), 125–141.
- Cohen, L., Manion, L., & Morrison, K. (2018). Research methods in education (8th ed.). Routledge.
- Corburn, J. (2003). Bringing local knowledge into environmental decision making: Improving urban planning for communities at risk. *Journal of Planning Education and Research*, 22(4), 420–433.
- Cornelius, S., Viviers, J., Cilliers, J., & Niesing, C. (2017). Considering complexities in unique african planning approaches: Abstracting the role of african urban residents. WIT Transactions on Ecology and the Environment, 223, 415–426.
- Cornwall, A. (2007). Buzzwords and fuzzwords: Deconstructing development discourse. Development in Practice, 17(4/5), 471–484.
- Darkey, D., & Visagie, J. (2013). The more things change the more they remain the same: A study on the quality of life in an informal township in Tshwane. *Habitat International*, *39*, 302–309.
- Duminy, J., Andreasen, J., Lerise, F., Odendaal, N., & Watson, V. (2014). Planning and the case study method in Africa: the planner in dirty shoes. New Your: Palgrave Macmillan.
- Ebikemefa, C. (2020). 24 June. Re: Urban governance in Freetown [Unpublished lecture comments]. Retrieved 6 July 2020 from https://www.futurelearn.com/
- Eloff, I. (2020). Narratives of quality of life in Africa: A kaleidoscope of hope. In I. Elof (Ed.), *Handbook of Quality of Life in African Societies* (pp. 449–458). Springer.
- Fahy, F., & Cinnéide, M. Ó. (2006). Community-based quality of life indicators for urban areas as derived in Galway City, Ireland. WIT Transactions on Ecology and the Environment, 93, 601–702.
- Fahy, F., & Cinnéide, M. Ó. (2008). Developing and testing an operational framework for assessing quality of life. *Environmental Impact Assessment Review*, 28(6), 366–379.
- Farthing, S. M. (2016). Research design in urban planning: A student's guide. SAGE.
- Flyvbjerg, B. (2006). Five misunderstandings about case-study research. *Qualitative Inquiry*, 12(2), 219–245.
- Friese, S. (2012). Qualitative data analysis with ATLAS.ti. SAGE.
- Green, J. (2014). Crash course world history [Youtube video]. CrashCourse. Retrieved 15 Jul. 2021 from https://youtube.com/playlist?list=PLBDA2E52FB1EF80C9
- Haslauer, E., Delmelle, E. C., Keul, A., Blaschke, T., & Prinz, T. (2015). Comparing subjective and objective quality of life criteria: A case study of green space and public transport in Vienna. *Austria. Social Indicators Research*, 124(3), 911–927.
- HPI (Happy Planet Index). (2022). Download the data. Retrieved 17 Feb. 2022 from https://happyplane tindex.org/wp-content/themes/hpi/public/downloads/happy-planet-index-2006-2020-public-dataset.xlsx
- Jacobs, N. S. (2019). Planning sustainable cities through nature-based solutions: Perspectives from the Global South [Dissertation, NWU]. Potchefstroom.
- Jacobs, N. S. (2022). Conflicting quality of life rationalities between spatial decision-makers and the South African poor [Thesis, North-West University]. Potchefstroom.
- Kazemzadeh-Zow, A., DarvishiBoloorani, A., Samany, N. N., Toomanian, A., & Pourahmad, A. (2018). Spatiotemporal modelling of urban quality of life (UQoL) using satellite images and GIS. *International Journal of Remote Sensing*, 39(19), 6095–6116.
- Khalifa, H. A. M. (2019). Quality of life and its relation to creative thinking among a sample of female adolescents in Jeddah. *The International Journal of Social Sciences and Humanities Invention*, 6, 5297–5311.
- Khalil, H. A. E. E. (2012). Enhancing quality of life through strategic urban planning. Sustainable Cities and Society, 5, 77–86.
- Lategan, L. G. (2017). Informality and sustainability: Reflecting on South Africa's informal backyard rental sector from a planning perspective [Theses, NWU]. Potchefstroom.
- Li, F., Liu, X., Hu, D., Wang, R., Yang, W., Li, D., & Zhao, D. (2009). Measurement indicators and an evaluation approach for assessing urban sustainable development: A case study for China's Jining City. *Landscape and Urban Planning*, 90(3), 134–142.

Lo Piccolo, F., & Thomas, H. (2009). Ethics and planning research. Ashgate.

- Lynch, K., Nel, E., & Binns, T. (2020). 'Transforming Freetown': Dilemmas of planning and development in a West African City. *Cities*, 101, 1–14.
- MacCallum, D., Babb, C., & Curtis, C. (2019). Doing research in urban and regional planning: Lessons in practical methods. Routledge.
- Marujo, H. Á. (2021). Enhancing a culture of peace: The prominence of local community engagements and the role of Public Hearings on quality of life. *Local Development & Society*, 1–14.
- Michalos, A. C. (2014a). Aristotle. In A. C. Michalos (Ed.), Encyclopedia of Quality of Life and Well-Being Research (pp. 225–229). Netherlands: Springer.
- Michalos, A. C. (2014b). Plato. In A. C. Michalos (Ed.), Encyclopedia of Quality of Life and Well-Being Research (pp. 4826–4833). Netherlands: Springer.
- Møller, V. (2001). Monitoring quality of life in cities: The Durban case. Development Southern Africa, 18(2), 217–238.
- Moroke, T., Schoeman, C., & Schoeman, I. (2018). Integrative and modeling approach to sustainability modes of living and neighbourhood development. WIT Transactions on the Built Environment, 179, 145–157.
- Moroke, T., Schoeman, C., & Schoeman, I. (2020). Neighbourhood sustainability assessment model for developing countries: A comprehensive approach to urban quality of life. *International Journal of Sustainable Development and Planning*, 15(1), 107–123.
- Munzhedzi, S. M., Khavhagali, V. P., Midgley, G. M., De Abreu, P., Braun, M., Abdul, Z., Gylard, M., Harber, J., Olivier, J. C., Schulze, R., Pegram, G., & Cullis, J. (2016). Climate change adaptation perspective on urban, rural and coastal human settlements in South Africa. Retrieved 25 Jan. 2019, from https://www.environment.gov.za/sites/default/files/reports/ltasbook4of7_perspectivesonurbanruralandcoastalhuman_settlementsinSA.pdf
- Murgaš, F., & Klobučník, M. (2016). Municipalities and regions as good places to live: Index of quality of life in the Czech Republic. *Applied Research in Quality of Life*, 11(2), 553–570.
- Nakanishi, H. (2015). How does urban policy influence quality of life? The case of Canberra, Australia. *Policy Studies*, 36(1), 72–91.
- Nanor, M. A., Poku-Boansi, M., & Adarkwa, K. K. (2018). An objective analysis of the relationship between quality of life and socio-economic characteristics in Kumasi, Ghana [Original Paper]. Geo-Journal: Spatially Integrated Social Sciences and Humanities, 83(4), 835-851
- De Neve, J.-E., & Krekel, C. (2020). Cities and happiness: A global ranking and analysis. In R. L. John, F. Helliwell, J. D. Sachs, and J-E De Neve, L. B. Aknin, H. Huang, and S. Wang (Eds.), World Happiness Report 2020. Sustainable Development Solutions Network. Retrieved 15 Aug. 2020 from https://happiness-report.s3.amazonaws.com/2020/WHR20.pdf
- Nhemachena, C., Chakwizira, J., Dube, S., Maponya, G., Rashopola, R., & Mayindi, D. (2011). Integrating indigenous knowledge systems (IKS) in improving rural accessibility and mobility (in support of the comprehensive rural development programme in South Africa). 30th Southern African Transport Conference. Retrieved 27 Nov. 2021 from https://repository.up.ac.za/bitstream/handle/2263/ 17301/Nhemachena_Integrating%20%282011%29.pdf?sequence=1
- O'Brien, D. J., McClendon, M. J., & Ahmed, A. (1989). Neighborhood community and quality of life. Community Development, 20(2), 59–71.
- OECD. (2020). Africa's urbanisation dynamics 2020: africapolis, mapping a new urban geography. OECD Publishing.
- Omar, D. B. (2006). Urban planning and the quality of life in Putrajaya, Malaysia. WIT Transactions on the Built Environment, 86, 83–90.
- Onyx, J., Benton, P., & Bradfield, J. (1992). Community development and government response. Community Development Journal, 27(2), 166–174.
- Pacione, M. (2009). Urban Geography: A global perspective (3rd ed.). Routledge.
- Papageorgiou, J. C. (1976). Quality of life indicators. International Journal of Environmental Studies, 9(3), 177–186.
- Paprzyca, K. (2019). Sustainable development of the medium-sized city on the example of Oswiecim. IOP Conference Series: Materials Science and Engineering
- Qiao, M., Wong, C., & Zheng, W. (2019). Sustainable urbanisation and community well-being in suburban neighbourhoods in Beijing. *China. International Journal of Community Well-Being*, 2(1), 15–39.
- Raphael, D., Rukholm, E., Brown, I., & Hill-Bailey, P. (1996). The quality of life profile—adolescent version: Background, description, and initial validation. *Journal of Adolescent Health*, 19(5), 366–375.

- Richards, R., O'Leary, B., & Mutsonziwa, K. (2007). Measuring quality of life in informal settlements in South Africa. Social Indicators Research, 81(2), 375–388.
- Rigon, A., Macarthy, J. M., Koroma, B., & Frediani, A. A. (2018). The politics of urban management and planning in African cities. In T. Binns, K. Lynch, & E. Nel (Eds.), *The Routledge Handbook of African Development*. Routledge.
- Robeyns, I. (2005). Selecting capabilities for quality of life measurement. *Social Indicators Research*, 74(1), 191–215.
- Rosenberg, G. (1965). City planning theory and the quality of life. *American Behavioral Scientist*, 9(4–5), 3–7.
- Sapena, M., Wurm, M., Taubenböck, H., Tuia, D., & Ruiz, L. A. (2021). Estimating quality of life dimensions from urban spatial pattern metrics. *Computers, Environment and Urban Systems*, 85.
- De Satgé, R., & Watson, V. (2018). Urban planning in the global south: conflicting rationalities in contested urban space. Palgrave Macmillan.
- Shekhar, H., Schmidt, A. J., & Wehling, H.-W. (2019). Exploring wellbeing in human settlements-A spatial planning perspective. *Habitat International*, 87, 66–74.
- Stanca, I. (2018). Measuring urban quality of life: A life satisfaction approach. In A. Michelangeli (Ed.), Quality of life in cities: Equity, sustainable development and happiness from a policy perspective. Routledge.
- Tesfazghi, E. S., Martinez, J., & Verplanke, J. (2010). Variability of quality of life at small scales: Addis Ababa. Kirkos Sub-City. Social Indicators Research, 98(1), 73–88.
- Tiberius, V. (2014). Well-being, philosophical theories of. In A. C. Michalos (Ed.), *Encyclopedia of Quality of Life and Well-Being Research* (pp. 7110–7113). Springer.
- Verkerk, M., Busschbach, J., & Karssing, E. (2001). Health-related quality of life research and the capability approach of Amartya Sen. Quality of Life Research, 10(1), 49–55.
- Watson, V. (2016). Shifting approaches to planning theory: Global north and south. Urban Planning, *1*(4), 32–41.
- Westaway, M. S. (2006). A longitudinal investigation of satisfaction with personal and environmental quality of life in an informal South African housing settlement, Doornkop, Soweto. *Habitat International*, 30(1), 175–189.
- Wong, C. (2014). Economic and social indicators. In A. C. Michalos (Ed.), *Encyclopedia of Quality of Life and Well-Being Research* (pp. 1789–1791). Netherlands: Springer.
- Xiao, Y., & Watson, M. (2019). Guidance on conducting a systematic literature review. Journal of Planning Education & Research, 39(1), 93–112.
- Yin, R. (2018). Case study research and applications: design and methods (6th ed.). California: SAGE.

Publisher's Note Springer Nature remains neutral with regard to jurisdictional claims in published maps and institutional affiliations.

Authors and Affiliations

Niké Susan Jacobs¹ · Selna Cornelius¹ · Carike Claassen² · Christi Niesing³ · Juaneé Elizelle Cilliers⁴ · Roelof Petrus Burger¹

- Niké Susan Jacobs nike.jacobs@nwu.ac.za
- ¹ Unit for Environmental Sciences and Management, Faculty of Natural and Agricultural Sciences, North-West University, Potchefstroom, South Africa
- ² Economic Sciences, North-West University, Potchefstroom, South Africa
- ³ The Africa Unit for Transdisciplinary Health Research (AUTHeR), Faculty of Health Sciences, North-West University, Potchefstroom, South Africa
- ⁴ School of Built Environment, University of Technology Sydney, Ultimo, NSW 2007, Australia