sustainability

MDPI

Article

The Effects of Objective and Perceived Neighborhood Amenities on Youths' Wellbeing: The Case of the City of Al Ain, UAE

Marwan Elmubarak [1,*], Naeema AlHosani [1], Mohamed Yagoub [1] and Amar Khamis [2]

[1] Department of Geography & Urban Sustainability, United Arab Emirates University, Al Ain P.O. Box 15551, United Arab Emirates
[2] Hamdan Bin Mohammed College of Dental Medicine, Mohammed Bin Rashid University of Medicine and Health Sciences, Dubai P.O. Box 505055, United Arab Emirates
* Correspondence: marwan.elmubarak@uaeu.ac.ae

Abstract: The last 20 years have witnessed steady research originating in Western societies on the possible correlation between spatial qualities of places and individual wellbeing. Cultural and place-specific factors, however, may limit generalizability to different settings. This study explored whether the spatial qualities of neighborhoods in the city of Al Ain in the United Arab Emirates (UAE), influence the wellbeing of the city's youths. A questionnaire was developed based on a conceptual framework (CP) delineating wellbeing and its relationship to spatial qualities. The CP was drawn from the literature on wellbeing, positive psychology, and urban design. Results indicated that the city of Al Ain youths regard specific neighborhood amenities and a few neighborhood spatial qualities relatively highly but generally tend to respond neutrally to most other features. High use of individual cars may have given the youths other options to form communities of interest beyond their neighborhoods. Recommendations to enhance youths' engagement at the neighborhood level were discussed together with suggestions for future research. The study has implications for both policy and planning decisions, particularly as several government initiatives and programs continue to be oriented toward youth empowerment with the objective of enhancing their effectiveness and wellbeing.

Keywords: neighborhood; amenities; spatial characteristics; wellbeing; youths

Citation: Elmubarak, M.; AlHosani, N.; Yagoub, M.; Khamis, A. The Effects of Objective and Perceived Neighborhood Amenities on Youths' Wellbeing: The Case of the City of Al Ain, UAE. *Sustainability* **2023**, *15*, 3550. https://doi.org/10.3390/su15043550

Academic Editor: Salvador García-Ayllón Veintimilla

Received: 8 October 2022
Revised: 29 January 2023
Accepted: 1 February 2023
Published: 15 February 2023

1. Introduction

The UAE is increasingly dedicating resources and efforts to happiness-related research, programs, and policies in order to promote happiness and wellbeing among its citizens and residents. This is evident in many government initiatives. For instance, in February 2016, the UAE founded a ministry for Happiness, which launched the National Program for Happiness and Positivity [1]. In March 2017, UAE University (UAEU) in collaboration with the National Program for Happiness and Positivity established the Emirates Center for Happiness Research, the first of its kind in the UAE and the Middle East [1]. All of these efforts indicate the country's commitment to investing in the happiness and welfare of citizens, residents, and places. However, much of the happiness research in the UAE thus far has tended to focus on experiences in the work environment. Research on the effect of place and the environment on individual wellbeing is scarce. This contrasts with a growing body of research on the topic, mainly originating from Western societies, that often cautions against generalizability elsewhere. Hence, there is a need for place-specific studies to account for any cultural, geographical and environmental differences.

Assessing the built environment effects on individual wellbeing is of considerable interest both conceptually and practically. At the conceptual level, such an understanding will lead to increased awareness of the potential relationship between place qualities and

people's health and wellbeing. This, in turn, may lead to better policy and decision-making approaches, including forming partnerships with communities, promoting more people-centered planning practice, and ultimately, leading to improvement in the quality of life of residents.

This study sought to investigate how youths interact with Al Ain neighborhoods' spatial qualities and amenities and whether this interaction impacts their sense of wellbeing. For the purposes of this study the term "youths" is a broad term that also includes young adults. A questionnaire was developed to allow youths to self-report their experiences with their neighborhoods' spatial qualities and amenities. To prepare the questionnaire, we first conducted an expansive literature review to help us develop a conceptual framework (CP) to delineate the relationship between wellbeing and place. The CP was then used to inform the design of the study's questionnaire. We primarily looked at two main fields of studies: positive psychology and urban design. We examined how wellbeing is conceived and understood in the literature of positive psychology and explored how this understanding can be related to the built environment by identifying place qualities, often cited in urban design studies, that influence wellbeing. We then developed a conceptual framework that relates ingredients of wellbeing to the spatial qualities of places, particularly where there is a potential for correlation. This allowed us to frame questions asked of youths in the city of Al Ain that specifically explored their experience with the spatial qualities and amenities of their neighborhoods. The article is organized as follows: why the city of Al Ain and why youths are considered for this study are discussed in Section 1.1. In Section 2, we examine wellbeing as a concept, as well as its relationship to the built environment. This helped us to identify the main components of the research questionnaire, which are discussed further in Section 3, which concerns methodology. Section 4 presents the research results, while Section 5 presents the research discussion, conclusion, and the study's limitations.

1.1. Why Study Al Ain's City Neighborhoods and Why Youths?

Al Ain is the second largest city in the Emirate of Abu Dhabi and the fourth largest city in the United Arab Emirates (UAE). It is an inland city located approximately 130 km from the cities of Abu Dhabi and Dubai and borders the Sultanate of Oman. The city of Al Ain was selected as a case for this study because of its unique built form but also because it has a high concentration of UAE citizens (Emiratis). As such, it is generally viewed as having more Emirati representation and a relatively distinct, authentic character compared to other UAE cities. Another reason is convenience, as three of the four researchers conducting the study reside and work in Al Ain.

As with much else in the UAE, the city is generally newly developed, and its current built form mainly evolved over the last fifty years. Despite the rapid modernization that characterizes the region, Al Ain has managed to maintain a rather different built form that is primarily shaped by a land-use regulation restricting the maximum building height to five floors in the city center and only four floors in other parts of the city. Thus, the city's general spatial form has a low profile. While this height restriction may seem to relate to Pattern 21, (Four-Story Limit), which is talked about as a pattern that supports mental wellbeing in Alexander's book, "*A Pattern Language*" [2], it is not necessarily supported by the other key spatial qualities, concerning density and mixed used development, needed to yield the stated benefits associated with the pattern. In essence, this height restriction was not part of a coordinated planning approach. It is generally honored as a legacy of the country's founder, the late Sheikh Zayed, who desired for the city that witnessed his birth to maintain a low-profile built-form and lifestyle. Beyond the city center, most neighborhoods consist of single-family, detached residences that are typically fenced, with both front and backyards, a common house design in the region. These are characteristically of low density, with residences' lot size in some parts of the city measuring up to one acre.

Furthermore, many of the city's residential neighborhoods are slightly modified versions of the traditional neighborhood development (TND), with an active mixed-use center located within ten to fifteen minutes walking distance from residences. It is customary to

find in these centers a variety of commercial venues and amenities, including convenient stores, neighborhood grocery stores, pharmacies, bakery shops, cafes, restaurants, barber shops, and laundry services. A mosque is also a common fixture in all neighborhoods, with some having more than one mosque, often of different size and scale. Additionally, most of Al Ain neighborhoods have elementary schools located near the neighborhood center, often adjacent to an open space. The neighborhoods are generally safe and quiet. Roads are asphalt-paved defined by six-inch curbs and often sidewalks on each side. Tree planting inside the neighborhood is often the responsibility of residents and generally lacks consistency. Nonetheless, the city has a reputation for being the greenest in the UAE, as evidenced by a tree-planting program that capitalized on the particularly fertile land and based partly on the historical roots of the area as an oasis and a stopping place for travelling tribesmen. Most of the city's main streets outside neighborhoods, including arterial roads, are tree-lined, often with trees placed on each side of the road, often in multiple parallel rows. Moreover, the city has five large-scale parks that are considered major destinations for its residents. Other types of parks include family parks. These are distributed such that each serve a number of neighborhoods at a time. Due to cultural considerations, access to family parks is typically controlled and admission is limited only to families. Additionally, while some neighborhoods have green space or pocket parks, the provision and distribution of these is not consistent.

The study also focused on examining youths' experience for a number of reasons. Youths in the UAE are generally the active segment of the population. Furthermore, as is usually the case in the Middle East, they typically continue to live in the same family residence, and often in the same neighborhood, until they are ready to marry and form families. For some, even when their marital status changes, they are offered opportunities for housing within the same neighborhood, often in parts of their parents' large accommodations. Thus, they are likely to spend most of their active youth years in the same neighborhood. As many government programs are targeting youths with the objective of preparing them to play an active and more responsible role in the development of the country, such programs can be made more effective if informed by an understanding of the range of contributors to youths' health and wellbeing, including this aspect of their experience at the neighborhood level. More particularly, both policymakers and planners will benefit from understanding the degree to which neighborhoods feature in shaping youths' sense of wellbeing. This will lead to more focus on relevance and context in future plans, and, potentially, to inclusion of the voice of youths in any conversation about enhancing the spatial qualities of their neighborhoods.

2. Wellbeing and the Environment

Research on happiness and wellbeing is vast, spanning many disciplines. Variables typically considered include health, age, employment status, income, and social relationships, as these are often considered among the main contributors to positive wellbeing. A subset within this area of research considers the impact of the environment, geography, place, and built environment on happiness and wellbeing, e.g., [3]. The relationship of happiness to this subset, and in particular, the built environment, can be traced in the definition offered by Layard [3] where he states that happiness is about: "feeling good, enjoying life and wanting the feeling to be maintained" (p.12). Here, the importance of place is implied as many of the joys of life revolve around, and are shaped by, places of residence, work, and community, as well as by the overall conditions and quality of both the built environment and the amenities considered necessary to maintain a sense of wellbeing. As such, place is an important mediating variable [4]. The extent to which urban wellbeing is shaped by the built environment is increasingly becoming the focus of numerous studies, e.g., [5–8]. Moreover, its implications for policy and planning practice continue to gain currency as evident in many writings, e.g., [9–12]. This study contributes to this research area and seeks to provide an understanding of a different context outside the Western world. In the following sections, we considered the relationship between wellbeing and

the qualities of the built environment, starting first with a review of the ingredients of wellbeing, then exploring the relationship of wellbeing to urban design.

2.1. Ingredients of Wellbeing

One of the basic definitions of "Wellbeing" is that it is the experience of feeling good [13–15]. There are, of course, other definitions of wellbeing; however, most can be grouped under two main concepts [13]. The first is often referred to as the hedonic perspective, which regards wellbeing as the experience of joy, pleasure, and positive emotions. This definition, however, is limited since emotions alone are transient and do not capture the full meaning of the term [13]. The second idea captures other lasting experiences. This is called the eudemonic perspective and is often defined as the satisfaction one gains from the experience of functioning well [13,15]. Functioning well is more encompassing as it considers more sustainable life traits, such as having a sense of engagement and competence, being resilient in the face of setbacks, and having good relations with others, along with a sense of belonging and contributing to a community [13]. Many researchers now agree that a comprehensive definition is one that combines both the hedonic and eudemonic perspectives. Both of these perspectives can be assessed in the built environment indirectly through objective and subjective indicators. For objective indicators, one may consider the quality of the services and physical amenities that typically are provided by governments, such as education, health services, infrastructure, etc. [13]. These often are used as indirect indicators of wellbeing as their ultimate effect is the enhancement of dwellers' quality of life. In contrast, the subjective measures of wellbeing may examine how people experience their lives in the environment or built environment, and it is typically assessed in relation to the different qualities or ingredients that influence wellbeing. Assessment here is usually sought through self-reporting, allowing individuals to respond to carefully designed questionnaires or surveys. Such questionnaires are typically informed by a thorough understanding of the ingredients of wellbeing. There are numerous studies that have attempted to identify the ingredients of wellbeing [13]. We reviewed two important ones as they are the most cited and discussed in the literature. The first is offered by Seligman [16]. It identifies five key ingredients of wellbeing: positive emotions, engagement, relationships, meaning, and accomplishment. These are commonly labeled or known with the acronym PERMA [16]. Huppert [13] argued that PERMA did not account for other important qualities of wellbeing, especially qualities such as resilience and vitality. Thus, she proposed a set of ten ingredients as follows: competence, emotional stability, engagement, meaning, optimism, positive emotion, positive relationships, resilience, self-esteem, and vitality [13]. The list offered by Huppert [13] is appropriately broad, allowing for better identification of possible correlation with spatial qualities of places. Following her lead, we chose six of these ingredients for the purpose of developing a conceptual framework that relates wellbeing to the spatial qualities of neighborhoods. In the next section, we considered qualities of the built environment often discussed in the literature as having the potential to affect individual wellbeing. Then we define the term "amenities" as it is one of the key terms often cited in urban design research.

2.2. Urban Design and Wellbeing

Urban design literature is rich with studies that consider the effect of certain qualities of the built environment on individuals' social, physical, and mental wellbeing [17–21]. Two seminal works on the relationship between place and wellbeing are those by Jane Jacobs [22] and Christopher Alexander [2]. In her book, *The Death and Life of Great American Cities*, Jacobs argued that certain spatial qualities strengthen the perception of safety, enable socialization, and foster a sense of community [22]. More specifically, she noted that walkable neighborhoods consisting of short blocks with mixed-uses and buildings lined up close to the street with street-facing windows increase the perception of safety, induce active street life, foster social ties, and strengthen the sense of community [22]. Similarly, Christopher Alexander, in his book, *A Pattern Language*, contends that certain spatial

patterns are more conducive to healthy living, including social and mental wellbeing [2]. Pattern No. 21, for instance, specifically focuses on the correlation of a maximum building height of four stories to a positive sense of wellbeing [2]. Since the publication of these two books in the 1960s, the positive impact of such spatial qualities has been the focus of numerous studies. Many studies considered how the objective and perceived qualities of the built environment influence happiness and wellbeing [23–26]. Carmona [23], in a study that reviewed the literature on the spatial qualities of places that nurture human wellbeing, identified a vast number of studies focusing on the physical and perceptual attributes of places with their suggested benefits to human physical, social, and mental health. He noted that places possessing certain spatial qualities such as green, walkable, mixed-use places are often regarded more positively than their counterparts as they are more likely to foster the positive wellbeing of their residents. Amenities or the presence of "third places"—i.e., places other than work and residence—are also considered key wellbeing ingredients as they allow for chance encounters and help in fostering a sense of community [27,28]. Perceptual qualities such as safety, a sense of order, cleanliness, as well as the experience of coming upon green, aesthetically-pleasing environments, are also said to induce feelings of satisfaction and positive emotions of joy, safety, comfort, and relaxation, thus, positively affecting mental and physical wellbeing [29–32].

Such objective and perceived spatial attributes that support wellbeing are also identified in studies that specifically focused on neighborhoods, e.g., [33–35], as well as writings promoting good practice, e.g., [36–38]. Pfeiffer and Cloutier [38], for instance, upon conducting a cross-disciplinary review of the literature on the topic of drivers of happiness, sought to identify neighborhood-built environmental characteristics that directly correspond to residents' happiness. Three spatial qualities were considered key. These, they argued, are: (1) access to green and open space; (2) socialization-enabling design features; and (3) design features that improve the sense of safety and security [38]. Green space and the presence of parks that are in proximity to residences are also linked to improvement in physical activity, mental wellbeing, and boosting of confidence levels [38]. At the same time, they are believed to corelate with reduction in blood pressure, depression, anxiety, and stress [23,36–38]. Such positive effects are likely to increase optimism, socializing, and engagement among residents and neighbors.

The benefits of physical activity at the neighborhood level, and the potential of realizing them through the proper design of walkable environments, were also addressed in a number of studies [39–42]. Walkable neighborhoods not only invite physical activity but also enhance positive emotions and encourage socialization [43–46]. Moreover, proper street lighting in walkable neighborhoods enhances the perception of safety, lowers crime, and thus, helps promote urban vitality and optimism among residents [23,39,43]. "Third places" with mixed uses, and the presence of "everyday" public spaces that are accessible and within shorter distances from residences could also stimulate physical activity, as well as socializing, leading to enhanced engagement and positive relationships [35]. However, as described by Samavati and Ranjbar [43,47], the spatial linkages between amenities and residences will need to be based on an approach that emphasizes "*pedestrian-orientedness*": mixed-use, comfortable, and safe walkable environments. Otherwise, as pointed by Pfifer et al., there will be a disconnect between the objective, physical qualities, and how these qualities are perceived [47], thus, resulting in the unintended consequence of reduced utility. The consensus, then, is that certain objective and perceived qualities of a neighborhood's built-environment can stimulate physical activity, create opportunities for socialization, and thus, positively influence the physical and social wellbeing of residents.

2.3. Definition of Amenities

Urban design literature often refers to both the objective and perceptual features of the built environment with a single unifying label, "amenities". This was pointed out by Doak and Parker [48], who noted the tendency for urban designers and planners to use the label, "amenities", to denote different meanings, including sense of place, ambience,

and of course, the physical amenities a place may have, such as parks, schools, shops, etc. Thus, they define "amenities", "as a composite of objective, subjective, experienced, and mappable features and feelings about place—recognizing that some of these are related to the value individuals or communities put on their areas or features of their lived environment" (p. 226), [48]. For our study, we adopted this definition, and we have made the decision to examine both the objective and subjective indicators of wellbeing discussed in the previous section in relation to the built environment, since our aim is to examine how the youths in the city of Al Ain experience their neighborhood–built environment and whether their experiences affect their self-reported wellbeing. Furthermore, many of the wellbeing ingredients listed in the previous section are contextual, i.e., they play out in the environment. Hence, it is important to consider their potential correlation with neighborhoods' objective and perceptual characteristics.

2.4. Conceptual Framework

Based on the discussion of ingredients of wellbeing in Section 2.1, and the qualities of urban design in Sections 2.2 and 2.3, one can draw certain possible relationships. For instance, amenities in different forms can contribute to enhancing positive emotions and help residents form social relationships. Building on the discussion from the previous sections, we identified key features in the built environment of neighborhoods that can potentially contribute to enhanced wellbeing among residents. These were distilled from numerous urban design studies, documented in Carmona's study [3] and other studies [28–31], that can generally be grouped under four main components. The first concerns the physical amenities in neighborhoods in terms of their type, quality, usage, and relevance to the youth. Amenities such as parks, gardens, health clubs, sport facilities, mosques, schools, shops, restaurants, cafes, etc., can be thought of as "third places"—places with functions other than work and residence [28]. Other amenities include the overall layout of neighborhoods, including its walkability and the presence of greenness, lighting, etc. The second component concerns the perceptual qualities of neighborhoods, which include the sense of safety, the sense of comfort, aesthetic appeal, the sense of place and community [23–25]. The perceptual qualities collectively constitute the most essential component of the spatial qualities because a place perceived to be unsafe is not likely to encourage sociability or use of amenities [25]. The third component considers the socialization-enabling features of the neighborhood, such as the gathering spaces available in neighborhoods and their propensity to enable residents to form positive relations, as well as to develop a sense of belonging to the community. This component also accounts for activities that may take place at the neighborhood level and the possible ways or venues in which they take place. The fourth component considers modes of access and linkages to the different elements in neighborhoods. See Figure 1A.

We also examined the ingredients of wellbeing discussed in Huppert's [13] study in order to relate them to the four sets of spatial qualities identified above. We have identified at least six possible wellbeing ingredients that are likely influenced by the spatial qualities identified. These are: engagement, optimism, positive emotion, positive relationships, self-esteem, and vitality. The guiding assumption here is that a well-designed neighborhood, possessing the spatial qualities that influence wellbeing, is likely to positively boost the ingredients identified in Huppert's study [13]. For instance, an individual's optimism and positive self-esteem are likely to be improved if the neighborhoods' spatial qualities are pleasant, safe, quiet, green, and conducive to socialization. We show these relationships in the conceptual framework that we developed to inform the design of the study's questionnaire. See Figure 1B. The questionnaire explores the four main components: (1) amenities, their types and uses; (2) sociability-enabling characteristics of neighborhoods; (3) the linkages and means of access at the neighborhood level; and (4) the perceptual qualities of neighborhoods. Youths are asked to reflect on and assess their experiences with all of the four components. Positive experiences and engagement of the youths with these four components will likely, albeit indirectly, lead to positive outcomes in wellbeing

and, particularly, in these six ingredients. However, since this effect is only gauged by examining the youths' experiences with the built environment at the neighborhood level, it cannot be interpreted to suggest overall life satisfaction or wellbeing.

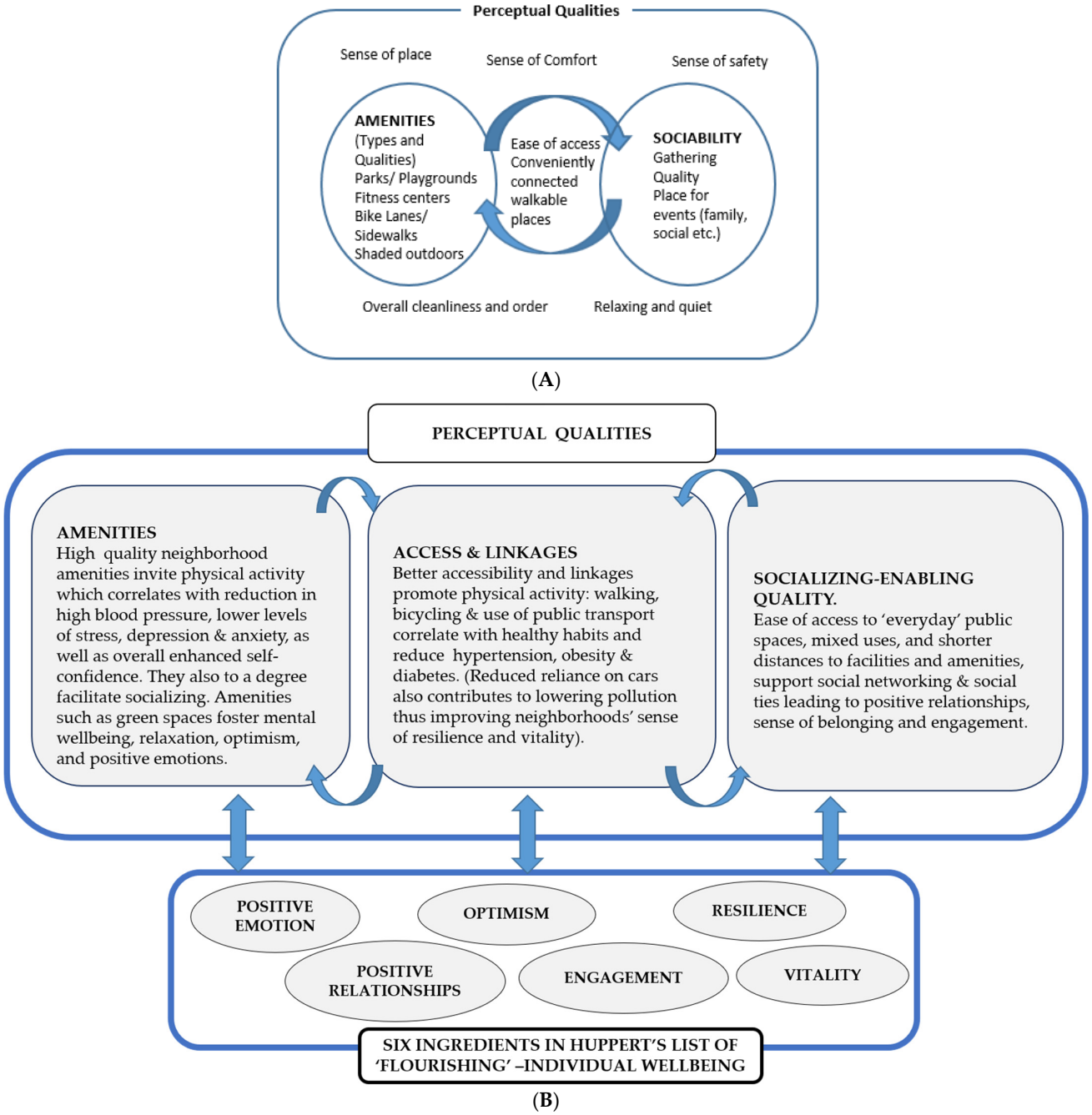

Figure 1. (**A**): Four main components of urban design. (**B**): Conceptual Framework.

3. Methodology

3.1. Data Collection

Research methods employed for this study included site visits, observation, and self-reporting and responding by the youths to the study's questionnaire. An online questionnaire was designed by the investigators from the Department of Geography and Urban Sustainability of UAE University (UAEU), located in the city of Al Ain, UAE. The decision to adopt this approach was dictated by the conditions created by COVID-19. A link to the questionnaire was sent to youth associations, three main universities, and two

technical colleges, all located and active in the city of Al Ain. Participants from these entities were then notified and invited to participate in the study. Before taking the survey, respondents were asked to read and agree to a consent form. Consent to participate in the questionnaire and responses was received from 378 youths residing in different neighborhoods in the city of Al Ain.

The questionnaire for this research addressed the four main components identified in the conceptual framework that collectively encompass the perceived and objective characteristics of neighborhoods. The first deals with the objective characteristics of neighborhoods in terms of the type and quality of available amenities (parks, mosques, schools, and other mixed-use facilities such as neighborhood level stores), as well as frequency of use by the youths. The second concerns the perceptual qualities of neighborhoods. Perceived aspects include both temporal and spatial qualities that inspire feelings of comfort, safety, quietness, and ambience. The third deals with any spatial patterns and attributes in the neighborhoods that may enable socializing. The investigation looked at the degree to which youths' level of socialization and kinship can be facilitated by neighborhood layout and configuration. The fourth category considered modes of access and linkages to neighborhood amenities (i.e., walking vs. driving). Each set can be clustered under an "umbrella" question. Hence, the four main questions could be stated as follows: (1) how do the youths rate the types and quality of amenities available in their neighborhoods? (2) How do they rate their neighborhood's overall physical and perceptual qualities? (3) How do they rate their neighborhood's overall spatial pattern with regard to enabling socializing and relationship-forming? (4) How do they rate the ease and means of connectivity and accessibility to such amenities?

The first part of the questionnaire sought data on the demographic characteristics of the participants such as gender, nationality, age, marital status, level of education, type of residence (villa/home or apartment), and the length of residing in their current neighborhood. The rest of the questionnaire was divided into four sections corresponding to the four main areas outlined above. A Likert scale of 5 points, with 5 = strongly agree and 1 = strongly disagree, was used for these questions. The first area or component consisted of 13 questions covering the types of amenities available, their quality, and their level of use. The second component, addressing the perceptual qualities of neighborhoods, consisted of nine questions. The third component, covering aspects in the spatial characteristics of neighborhoods that are likely to enable socialization and community life, consisted of six questions. The last set of questions, covering linkage and accessibility aspects (i.e., the ease with which amenities and places to go to in the neighborhood are accessed), consisted of eight questions. Exploratory factor analysis was used to test the validity of the questionnaire, and questionnaire reliability was determined by using Cronbach's alpha value [49].

3.2. Data Analysis

The statistical package, SPSS (V25, IBM Corp, New York, NY, USA) was used for the data analysis. Exploratory factor analysis (EFA) was employed to validate the questionnaire items for each one of the four sets of questions, thereby measuring each variable successfully. One of the important tasks in the analysis of data collected by a questionnaire using the Likert-scale is to test the internal consistency of the questionnaire's items and the unidimensional nature of each component. To achieve this, Cronbach's alpha analysis was used. Cronbach's alpha is a measure of internal consistency that measures how closely related a set of items are as a group. Reliability was determined by using Cronbach's alpha values, where a level of 60% or above was taken to denote strong split-half consistency [50]. In addition to measuring internal consistency, additional analysis was performed to provide evidence that each component was unidimensional. The calculation of Cronbach's alpha is as follows:

$$A = (N\overline{c})/(\overline{v}+(N-1)\overline{c})$$

Here, N is equal to the number of items, $\bar{c}$ is the average inter-item covariance among the items, and $\bar{v}$ equals the average variance.

Frequency tables, measure of percentage, and measure of tendency and dispersion were performed as descriptive. The scores of the four components were calculated by summing the selected items per component. The scores of different components in the questionnaire were calculated by summing up all items in the component. The Kolmogorov–Smirnov test was performed to test the normality of the scores created in the previous step. The Mann–Whitney test was used to compare the means of two groups, while Kruskal–Wallis was used to compare the means between three groups and more. A *p*-value of less than 0.05 was considered significant in all statistical analysis.

3.3. Socio-Demographic Characteristics of Respondents

The 378 respondents consisted of 92 (24.5%) males and 284 (75.5%) females. Of the 378 respondents, 284 (74.6%) respondents were single and 87 (42.3%) were married. Respondents' age ranges were grouped into two segments: 16–22 (47.7%) and 23–30 (52.3%). UAE nationals or Emirati participants represented the majority—338 out of 378—amounting to 89.9% of the sample. Expatriates or non-Emirati respondents were 38 in number, representing only 10.1% of the sample. Participants with undergraduate education represented 81.9%, while those with postgraduate education represented only 18.1%. Table 1 below presents detailed information on the participants' demographics.

Table 1. Demographic characteristics of participants.

Demographic Characteristics	No. of Participants (%)
Gender	
Male	92 (24.5%)
Female	284 (75.5%)
Age (Years)	
16–22	180 (47.7%)
23–30	197 (52.3%)
Nationality	
Emirati	338 (89.9%)
Expatriate	38 (10.1%)
Marital Status	
Single	282 (74.6%)
Married	87 (23.0%)
Divorced	9 (2.4%)
Education	
Graduate (Bachelors)	307 (81.9%)
Postgraduate (Masters)	68 (18.1%)

4. Results

4.1. Validity and Reliability Analysis

As shown in Table 2, the exploratory factor analysis confirmed the validity, reliability, and sample size of the questionnaire items. Validity was confirmed as factor loading values were greater than 0.5, indicating a positive correlation of each item to the respective items within the four principal components. Factor reliability was achieved since the Cronbach's Alpha per each item was greater than 80% [50]. Moreover, sample size was adequate for all factors as the minimum measure of sampling adequacy (MSA), Kaiser–Meyer–Olkin (KMO) was greater than 0.5, hence, statistically significant ($p < 0.0001$). Additionally, since Cronbach's Alpha per each item was greater than 60%, factor reliability was also achieved [51].

Table 2. Validity and Reliability of the questionnaire.

Results of Exploratory Factor Analysis and Reliability of an Instrument Measuring Satisfaction with Neighborhood and Urban Amenities			
Items in Each Category	**Factor Loading**	**KMO [b] and Bartlett**	**Cronbach's Alpha [c] (%)**
A. Rating Neighborhood's Amenities: *(% of cumulative variance-load 52.65)*			
Response effort by the GoB: (% of cumulative variance load 55.92)			
I am satisfied with the number and types of amenities in our neighborhood	0.761		
The presence of certain amenities in my neighborhood makes walking purposeful	0.570	0.863 [d]	0.85
My neighborhood has all the important amenities that I personally care about	0.820		
I use the amenities in my neighborhood more than once a week	0.750		
There may be suitable amenities to use in my neighborhood, but I hardly use them	0.561		
My neighborhood has a park	0.557		
The daily-use stores in my neighborhood are important, and I use them often	0.400		
My neighborhood has sport facilities, and I use them often	0.804		
My neighborhood has bike lanes	0.688		
I love biking, and I bike often	0.592		
B. Rating the Perceptual Qualities of Neighborhood			
My neighborhood is walkable because it is safe and has safe and comfortable sidewalks	0.635		
The quality of the park in my neighborhood is adequate, and I use it often	0.616		
I find my neighborhood attractive because it is green, well shaded, and comfortable	0.735		
My neighborhood is quiet and safe both during the day and at night	0.694	0.636 [b]	0.60
The presence of people in my neighborhood streets during the day is noticeable, and this brings a sense of liveliness and vitality	0.676		
My neighborhood is quiet, and its streets are walkable at night	0.717		
I like my neighborhood the way it is, and if I needed something else, I would use amenities available in my city	0.688		
I am satisfied with the distribution and quality of youth amenities in my city	0.647		
C. Neighborhoods' Amenities and Socialization			
My neighborhood is very social. I know most of my neighbors	0.801		
My neighborhood layout/design makes it easy for me to socialize with neighbors	0.771	0.824 [d]	0.76
I sometimes volunteer in social activities that promote innovation and neighborhood improvement	0.742		
The types of activities that I do in my neighborhood are mostly social	0.840		

Table 2. *Cont.*

Results of Exploratory Factor Analysis and Reliability of an Instrument Measuring Satisfaction with Neighborhood and Urban Amenities			
Items in Each Category	**Factor Loading**	**KMO [b] and Bartlett**	**Cronbach's Alpha [c] (%)**
D. Access to Neighborhood Amenities and Overall Quality of Linkages			
My neighborhood youths have access to the gym and the cultural amenities in one or all of the local schools in or near the neighborhood	0.624		
I prefer to walk to my neighborhood amenities	0.483	0.698 [d]	0.61
I have access to youth centers in my city, and I use them often	0.660		
If I use the mosque in my neighborhood, I often go there walking, especially when the weather is moderate	0.502		
If I need to use amenities in the city, I usually use public transportation to get there	0.594		
My satisfaction with my neighborhood is really related to how connected it is to other parts of the city, especially shopping centers and malls	0.384		
It does not matter to me really where my neighborhood is in relation to city amenities as long as it is safe, clean, and attractive. I can reach any other parts of the city using my own vehicle	0.528		

[b] KMO, Kaiser–Meyer–Olkin. [c] Shows the internal consistency. [d] p-value< 0.0001.

4.2. Rating Neighborhood Amenities (Table 3)

Youths' rating of amenity types and quality and their level of use were assessed through 13 items in the questionnaire. Due to lower than acceptable loading values, three items were removed. These were: ("*Parks are an important part of my satisfaction with my neighborhood*"; "*I like neighborhoods that have youth centers where the youth can gather and engage in useful and meaningful programs and activities*"; and "*the amenities in the city of Al Ain can be improved both in terms of quality and in terms of distribution*"). For this set of questions, factor loadings, as reported in Table 2, ranged from 0.40 to 0.81, indicating that the remaining items accurately capture the same construct. Thus, validity was confirmed as the majority of factor loading values were greater than 0.40. Factor reliability was achieved since the Cronbach's Alpha was 85%. Adequacy of sample size and correlation of items are approved by the value of Kaiser–Meyer–Olkin (KMO): 0.863 and p-value < 0.01.

4.3. Rating the Perceptual Qualities of Neighborhood (Table 3)

The youths' assessment of perceptual qualities considered 9 items. One item was removed due to insufficient variance load (*I currently do not bike but probably would bike if there were safe bike lanes*). The rest of the items exhibited variance loading between 0.60 and 0.80 confirming the validity. Cronbach's Alpha of 76.4% achieved the reliability.

Kaiser–Meyer–Olkin (KMO) was 0.82 and p-value < 0.01, which approved the adequacy of sample and correlation between items.

4.4. Rating the Socialization-Enabling Spatial Qualities (Table 3)

Youths' evaluation of the effect of their neighborhoods on socialization was assessed through 6 items. Due to lower than acceptable loading values, two items were removed *(I know only family and relatives who are in my neighborhood; and I only know a few people in my neighborhood).* The factor loadings, as reported in Table 2, ranging between 0.106 and 0.073, respectively, indicate that the remaining items accurately capture the same construct. Validity was confirmed as the majority of factor loading values were greater than 0.70.

Table 3. Youth self-reporting appraising their neighborhoods' amenities and perceptual and spatial qualities (City of Al Ain).

Individual Item	Mean (SD) [b]	% Mean	Categories
Amenities (10 Items)	**30.1 (8.3)**	**60.2**	**N**
Satisfied with the number and types of amenities in our neighborhood	*3.0 (1.3)*	*60.0*	*N*
The presence of certain amenities in my neighborhood makes walking purposeful	*3.5 (1.3)*	*69.6*	*N–Ag*
My neighborhood has all the important amenities that I personally care about	*2.8 (1.3)*	*56.6*	*Dis–N*
I use the amenities in my neighborhood more than once a week	*2.9 (1.2)*	*58.4*	*Dis–N*
There may be suitable amenities to use in my neighborhood, but I hardly use them	*3.5 (1.2)*	*63.0*	*N–Ag*
The daily-use stores in my neighborhood are important, and I use them often	*4.0 (1.1)*	*80.8*	*A*
My neighborhood has sport facilities, and I use them often	*2.5 (1.2)*	*54.4*	*Dis–N*
My neighborhood has bike lanes	*2.6 (1.3)*	*52.0*	*Dis–N*
I love biking, and I bike often	*2.7 (1.3)*	*53.0*	*Dis–N*
Perceptual (8 items)	**28.1 (6.0)**	**70.2**	**N–Ag**
My neighborhood is walkable because it is safe and has safe and comfortable sidewalks	*3.9 (1.2)*	*77.4*	*N–Ag*
The quality of the park in my neighborhood is adequate, and I use it often	*2.9 (1.4)*	*58.4*	*Dis–N*
I find my neighborhood attractive because it is green, well shaded, and comfortable	*3.1 (1.3)*	*62.0*	*N–Ag*
My neighborhood is quiet and safe both during the day and at night	*4.1 (1.0)*	*81.2*	*A*
The presence of people in my neighborhood streets during the day is noticeable, and this brings a sense of liveliness and vitality	*3.7 (1.1)*	*73.4*	*N–Ag*
My neighborhood is quiet, and its streets are walkable at night	*3.9 (1.1)*	*78*	*N–Ag*
I like my neighborhood the way it is, and if I needed something else, I would use amenities available in my city	*3.5 (1.3)*	*70.8*	*N–Ag*
I am satisfied with the distribution and quality of youth amenities in my city	*3.2 (1.3)*	*64.6*	*N–Ag*
Socialization (4 items)	**12.2 (3.9)**	**61.1**	**N–Ag**
My neighborhood is very social. I know most of my neighbours	*3.4 (1.3)*	*67.4*	*N–Ag*
My neighborhood layout/design makes it easy for me to socialize with neighbours	*3.3 (1.2)*	*66.6*	*N–Ag*
I sometimes volunteer in social activities that promote innovation and neighborhood improvement	*2.7 (1.2)*	*54.2*	*Dis–N*
The types of activities that I do in my neighborhood are mostly social	*2.9 (1.2)*	*58.8*	*Dis–N*
Accessibility and Linkages (7 items)	**23.8 (4.5)**	**67.9**	**N–Ag**
My neighborhood youths have access to the gym and the cultural amenities in one or all of the local schools in or near the neighborhood	*3.3 (1.2)*	*66.0*	*N–Ag*
I prefer to walk to my neighborhood amenities	*3.6 (1.2)*	*71.4*	*N–Ag*
I have access to youth centers in my city, and I use them often	*3.0 (1.2)*	*60.8*	*N*
If I use the mosque in my neighborhood, I often go there walking, especially when the weather is moderate	*3.8 (1.1)*	*75.8*	*N–Ag*
If I need to use amenities in the city, I usually use public transportation to get there	*2.7 (1.5)*	*53.2*	*Dis*
My satisfaction with my neighborhood is really related to how connected it is to other parts of the city, especially shopping centers, and malls	*3.9 (1.1)*	*77.4*	*N–Ag*
It does not matter to me really where my neighborhood is in relation to city amenities if it is safe clean and attractive. I can reach any other parts of the city using my own vehicle	*3.8 (1.1)*	*75.2*	*N–Ag*
Overall perception (items)	**94.1 (20.0))**	**64.9**	**N–Ag**

[b] Mean (standard deviation). N, neutral; Dis, disagree; Ag, agree.

4.5. Rating Access to Neighborhood Amenities and Overall Qualities of Linkages (Table 3)

The youths' assessment of neighborhood amenities and linkages were assessed through 8 items. One item showed lower loading *(If I need to use amenities in the city, I usually drive or (get driven) to get there)* and was excluded. The rest of the items reported factor loads are acceptable and confirm the validity of this dimension.

4.6. Demographical Factors and Their Impact on the Four Components (Amenities; Perceptual; Socialization-Enabling Qualities; Linkages) (Table 4)

As evaluated in Table 4 below, the mean score assessing neighborhood amenities (31.6), along with perception of amenities (28.7), socialization (12.9), and accessibility (24.3), was higher marginally among males compared to female respondents. The data show that both males and females have ranked equally the availability of amenities and their subsequent impact on perceived well-being, sociability, and accessibility. Considering the perceptual qualities of neighborhoods, the marital status was statistically significant with $p < 0.001$. Married participants ranked higher the perceived impact of neighborhood amenities on their well-being and yielded a score of 29.1 (5.6) compared to single participants—27.7 (6.1). The same was true for socializing-enabling environment ($p < 0.05$), with the married individuals' score of 13.3 against the single participants' score of 11.9. Another significant criterion ($p = 0.065$) to be noted is the "movement and ease of access" of the amenities with the male youths scoring 24.3 (5.1) and the female youth at 23.6 (4.4). It may be imperative to note that age has minimal effect on defining the neighborhood amenities ($p = 0.918$), with subjects in the age group of 16–22 scoring 30.8(8.4) and 23–30 at 29.5 (8.2), respectively. Furthermore, the responses concerning the socializing-enabling environment was minimally influenced by inhabitants' education background, with $p = 0.998$ and individuals with undergraduate and postgraduate results being 12.1 (3.9) and 12.7 (4.0), respectively. The marital status of the participants' impacts responses on all four criteria of the hypothesis (amenities $p = 0.11$, perceptual $p < 0.001$, socialization $p < 0.05$, and access $p = 0.111$). Based on the current study and data, the effect of the type of residence (villa or apartment) on the parameters of amenities cannot be correlated with certainty.

Table 4. Appraising the effect of gender, age, type of residence, marital status, and educational level among the different dimensions (below).

Variables	Categories	Amenities	Perceptual	Socialization	Access
Gender	Male	31.6 (8.3)	28.7 (6.6)	12.9 (4.1)	24.3 (5.1)
	Female	29.7 (8.2)	27.9 (8.2)	12.0 (3.8)	23.6 (4.4)
	p-value	0.167	0.102	0.133	0.065
Age	16–22	30.8 (8.4)	28.0 (6.1)	11.9 (4.1)	18.9 (2.5)
	23–30	29.5 (8.2)	28.2 (6.0)	12.5 (3.7)	18.9 (2.3)
	p-value	0.918	0.242	0.777	0.705
Type of Residence	Apartment	30.6 (9.0)	27.0 (7.2)	11.7 (4.0)	23.4 (4.0)
	Villa/Home	30.0 (8.2)	28.1 (5.9)	12.3 (4.0)	23.8 (4.7)
	p-value	0.491	0.586	0.587	0.799
Marital Status	Single	30.1 (8.4)	27.7 (6.1)	11.9 (3.9)	23.5 (4.8)
	Official married	30.1 (8.0)	29.1 (5.6)	13.3 (3.6)	24.6 (4.4)
	p-value	0.110	<0.001	0.048	0.111
Education	Graduate	30.0 (8.2)	27.9 (5.9)	12.1 (3.9)	23.7 (4.6)
	Postgraduate	30.5 (8.3)	28.6 (6.6)	12.7 (4.0)	23.8 (5.2)
	p-value	0.458	0.299	0.998	0.574

5. Discussion

The current research has studied the experience of youths of the city of Al Ain with the spatial qualities of their neighborhoods. The objective was to understand the effect of the objective and perceived spatial qualities on the youths' wellbeing. The study has conceptualized that the spatial qualities of neighborhoods can be grouped into four main components and has related these to the research on wellbeing from the fields of positive psychology and urban design. This conceptualization informed the design of the study's questionnaire. The results indicated that the availability of neighborhood amenities and their perceived effect on wellbeing was ranked moderately highly among young males and females despite their marital status, education level, and nationality. However, the influence of neighborhood amenities and perceptual qualities, such as sense of safety, on socialization was higher for married residents compared to singles. This contrasts with studies conducted in Western societies on the quality of socializing at the neighborhood level. For instance, a study of social capital at the neighborhood level in the Netherlands [52] suggested that socializing at the neighborhood level is highly correlated with residents who are divorced or widowed. This points to the significance of cultural differences in interpreting research on the value of places, as argued in Carmona's study [23]. Broadly, our results suggest that, especially in neighborhoods with a high percentage of married youths, enhancing neighborhood-based socializing can have a positive influence on residents' life satisfaction and wellbeing. Additionally, the two respondents' age-groups, as defined for the study, did not exhibit significant difference in the way they relate to their neighborhoods' spatial qualities. If this evidence is valid, then it contrasts with research in other parts of the world where a distinction is made between youths and young adults, e.g., [53]. However, this finding needs to be qualified. While we sought a heterogenous sample of two age-groups, we mainly received responses from the older age group. Youths of this age may not be representative of other ages.

Moreover, the results indicate that married youths rate the presence of parks and daily use amenities in their neighborhoods moderately higher than those who are single.

However, the overall results suggest that the youths are having fewer experiences at the neighborhood level, as evidenced by the seemingly neutral stance toward many of the questionnaire's questions. This perceived lack of engagement at the neighborhood level should not be taken as an indication of poor social life amongst the youths. It is likely that other factors including lifestyle and culture are involved. Youths in the region are typically part of large extended families, often with tribal ties and, thus, social connectedness beyond the confines of neighborhoods, which may compensate for the seemingly low social interaction at the neighborhood level. This evolving social relevance of neighborhoods was cited in other studies. Carmona [20], for instance, suggested that neighborhoods as units are no longer prerequisites of community interaction due to the choices made possible by the increased car-based and electronic mobility. This, however, does not undermine the importance of neighborhoods as they possess distinct qualities that can offer residents a sense of belonging [20]. Furthermore, the results indicated that neighborhoods generally lacked sport facilities, as well as amenities relevant to the youths. Policymakers and planners will need to address this issue. Group sports could be vital in increasing youths' activity and boosting vitality, as well as stimulating their propensity to form positive relationships at the neighborhood level, attributes that further reinforce a sense of belonging and community and, hence, contribute to enhancing their subjective wellbeing [13,23].

The youths' assessment of the perceptual qualities in their neighborhoods is also noteworthy. While neighborhood perceived qualities such as safety, comfort, and pleasant appeal were rated moderately high, they were either not strong enough to stimulate active lifestyle by the youths in their neighborhoods or were inconsistent with other objective qualities that make a place walkable. Such inconsistency was also observed by Pfifer et al. [47], and it needs to be addressed by planners. The walkability of Al

Ain neighborhoods could be further examined to make sure it meets the "pedestrian-orientedness" criteria, as suggested by Samavati et al. [43]

The research also indicated that two other modes of access represented by biking and public transportation were rated negatively. Currently, there are no bike lanes in Al Ain neighborhoods. Policymakers and urban planners will need to address this issue both in terms of providing safe bike lanes as well as encouraging cycling through public awareness campaigns. For instance, both walking and biking can be boosted by providing information and recommendations on best times of day they can be carried out. However, biking for females may not be socially acceptable, even if certain design and time-of-use considerations are implemented. The activity of female youths at the neighborhood level may require different approaches due to the generally conservative culture with regard to women. Nonetheless, designated venues in specific parts of the city could be planned and designed for this purpose where considerations of control and comfort can be put in place.

Also noteworthy, is he youths negative rating of public transportation.This suggests high reliance on use of individual cars. Use of public transportation is rather rare among Emiratis, perhaps due to the high level of prosperity in the society and the high rate of car ownership, particularly among Emiratis. While the hot climate is often cited as the main impediment, there may be other cultural issues that will need to be explored and addressed that are beyond the scope of this study. Nonetheless, planners and policymakers should consider alternative spatial patterns that foster a more active lifestyle, particularly at the neighborhood level. This may require urban design interventions that can be tailored to the contextual characteristics of each neighborhood. Examples of such strategies include the adoption of form-based codes and other design criteria that consider improving the "pedestrian-orientedness" of neighborhoods, such as those of planning for a walkable, short distance, mixed-use, and safe public realm [43].

While the findings of this study showed potentially significant results, they have some limitations that should be mentioned. First, our sample was relatively small and non-probabilistic, which means that it is not representative of the wider population. According to the 2016 government report issued by the Statistics Center of the Emirate of Abu Dhabi—the only reliable source available at the writing of the article— Al Ain population is listed at 766.9 thousand. Moreover, the study considered two specific age groups, and it happened that all respondents to the questionnaire were either college students or already graduates, some with postgraduate education. This was likely caused by the conditions of COVID-19, which dictated our decision to adopt an online questionnaire. College students typically have better access to technology and are naturally more prepared and comfortable in undertaking such tasks. Nonetheless, with the increasing importance assigned to education, if a similar study is conducted in the future, it is likely that its findings will not be significantly different from what is presented in the current study. Additionally, it is important to note that our sample did not include an even distribution of males and females, which may qualify the results. The limited scope of this investigation prevents generalization. Finally, although self-reporting questionnaires are useful tools to gauge personal experiences, results do not account for individual variations or unique experiences. Future studies would benefit from examining the augmenting of this method with other qualitative methods, such as ethnographic observations of smaller samples or focus groups. Worth noting is the fact that almost 90% of respondents were Emirati, which is a strength that can be expanded on. Thus, future research may consider conducting a similar study in other UAE cities to examine how the responses of UAE nationals (Emiratis) toward the four components of the spatial qualities identified in the current study compare to those offered in the present study. For this purpose, the conceptual framework developed in this study and a mixed-methods approach that involves both questionnaire and focus groups may be employed.

This need to answer the question of whether studies on links between happiness and neighborhood–built environment conducted in one city may apply to others with different characteristics, was also suggested by Pfifer et al. [47].

6. Conclusions

While the spatial characteristics of neighborhoods in the city of Al Ain are seemingly of good quality, the study indicated that the youths' general interaction and rating of them is rather neutral. Planners and policymakers should consider ways to engage the youth in the development of their neighborhoods, including the selection and design of relevant amenities, as this would give them a sense of ownership, boost their self-esteem, and would likely lead to more sustainable intervention strategies. In doing so, both planners and policymakers can benefit from certain approaches to creating partnerships with the youths and communities. *Shaping Neighborhoods for Local Health and Global Sustainability* is an example of a good practice guide book [36]. Another approach to engaging the youths that can be of particular benefit is the one discussed in Mehaffay [6,7], allowing community members and designers to engage in a process of defining a place that is both environmentally and culturally appropriate for the end users. Successful implementation of such strategies would, in turn, help improve youths' engagement, elevating their sense of belonging, leading to more relevant spatial design solutions, and thus, resulting in enhanced wellbeing. Other ingredients of wellbeing, as identified in the conceptual framework, could also be enhanced among the youths by investing in amenities that address youths' needs, as well as engaging youths in programs and activities of their preference. Neighborhoods' existing facilities such as school sport and school auditorium facilities can be put to use when school is out of session to accommodate such programs and activities.

Future research may consider investigating the usability of youth-relevant amenities at the city scale and whether they play a role in boosting youths' happiness and well-being. The building height restriction in the city of Al Ain, which resembles Pattern 21 suggested by Alexander Christopher [2], albeit in a simple way, is potentially a valuable urban design feature if envisaged with a people-centered mindset. Density, mixed-use amenities, "pedestrian-orientedness", and consistent distribution of green space are key spatial qualities that may further amplify and help realize the benefits of this pattern to wellbeing. However, this should be part of a holistic and coordinated approach, particularly if the positive impact on wellbeing of Pattern 21—*Four Story Limit* [2,5–7]—is to be realized.

Additionally, the conceptual framework used in this study can be utilized in future research to investigate and compare how certain ingredients of individual wellbeing for residents of different cities (for example, sense of engagement or self-esteem) correlate with these cities' spatial qualities.

Author Contributions: Conceptualization, M.E. and M.Y.; methodology, M.E.; software, A.K.; validation, A.K., M.E. and N.A.; formal analysis, M.E. and N.A.; investigation, M.Y.; resources, N.A.; data curation, A.K.; writing—original draft preparation, M.E.; writing—review and editing, M.E. and M.Y.; visualization, M.E.; supervision, M.E.; project administration, M.E.; funding acquisition, N.A. All authors have read and agreed to the published version of the manuscript.

Funding: This research was funded by UAEU—Emirates Center for Happiness Research, grant code—G00003299.

Institutional Review Board Statement: The study was conducted in accordance with the Declaration of Helsinki and approved by the Ethics Committee of UNITED ARAB EMIRATES UNIVERSITY (ERS 2020_6062, approved on 03-02-2020).

Informed Consent Statement: Informed consent was obtained from all subjects involved in the study.

Data Availability Statement: Data are available from the sources stated in the text.

Acknowledgments: The authors are grateful to the Emirates Center for Happiness Research and its director, Noof M. Aljenibi, for supporting this work. We are also thankful to faculty members who have given us advice in piecing together the manuscript and its conceptual development and to Archana Popat for her valuable help in editing and organizing the last versions of the article. Finally, we would like to thank the administrative team of UAEU for their approval and full support of this work.

Conflicts of Interest: The authors declare no conflict of interest.

References

1. UAE Government. National Program for Happiness and Wellbeing. Available online: https://u.ae/en/about-the-uae/the-uae-government/government-of-future/happiness/national-programme-for-happiness-and-wellbeing (accessed on 10 June 2022).
2. Alexander, C.; Ishikawa, S.; Silverstein, M. *A Pattern Language*; Oxford University Press: New York, NY, USA, 1977.
3. Layard, R. *Happiness: Lessons from a New Science*; Penguin Books: New York, NY, USA, 2005; ISBN 978-0-14-303701-9/978-1-59420-039-7.
4. Ellard, C. *Places of the Heart: The Psychogeography of Everyday Life*; Bellevue Literary Press: New York, NY, USA, 2015; ISBN 10: 1942658001.
5. Salingaros, N. Happiness and Biophilic Urban Geometry. *J. Biourbanism* **2021**, *9*, 21–28.
6. Mehaffy, M. Health and Happiness in New Urban Agenda: The Central Role of Public Space. *Sustainability* **2021**, *13*, 5891. [CrossRef]
7. Mehaffy, M.; Salingaros, N.A. *Design for a Living Planet: Settlement, Science, & the Human Future*; Sustasis Press: New York, NY, USA, 2015; ISBN 10: 0989346951.
8. Sanna Ala, M.; Jukka, H.; Seppo, J.; Perttu, S. Spatial nature of urban well-being. *Reg. Stud.* **2018**, *52*, 959–973.
9. Gehl, J. *Cities for People*; Island Press: Washington, DC, USA, 2010; ISBN 978-1-59726-573-7/978-1-59726-574-4.
10. Zumelzu, A.; Herrmann-Lunecke, M.G. Mental Well-Being and the Influence of Place: Conceptual Approaches for the Built Environment for Planning Healthy and Walkable Cities. *Sustainability* **2021**, *13*, 6395. [CrossRef]
11. Copenhagen Consensus of Mayors. Healthier and Happier Cities for all: A Transformative Approach for Safe, Inclusive, Sustainable and Resilient Societies 2018. Available online: www.euro.who.int/__data/assets/pdf_file/0003/361434/consensus-eng.pdf (accessed on 29 July 2022).
12. Jiménez-Delgad, A.; Lloret, J. *Health, Well-Being and Sustainability in the Mediterranean City: Interdisciplinary Perspectives*; Routledge: New York, NY, USA, 2020; ISBN 13: 978-0367662400.
13. Huppert, F.A. *The State of Wellbeing Science: Concepts, Measures, Interventions and Policies. Interventions and Policies to Enhance Well-Being: Wellbeing: A Complete Reference Guide*; Wiley Blackwell: Malden, MA, USA, 2014; Volume 6, ISBN 978-1-118-60835-7.
14. Bojanowska, A.; Zalewska, A.M. Lay Understanding of Happiness and the Experience of Well-Being: Are Some Conceptions of Happiness More Beneficial than Others? *J. Happiness Stud.* **2016**, *17*, 793–815. [CrossRef]
15. Ryff, C.D. Happiness is everything, or is it? Explorations on the meaning of psychological well-being. *J. Personal. Soc. Psychol.* **1989**, *57*, 1069–1081. [CrossRef]
16. Seligman, M.E.P. *Flourish: A Visionary New Understanding of Happiness and Well-Being*; Free Press: New York, NY, USA, 2012; ISBN 978-1-4391-9076-0/978-1-4391-9075-3.
17. Guillón, P.; Lovasi, G. Designing Healthier Built Environments. In *Neighborhoods and Health*, 2nd ed.; Duncan, D., Kawachi, I., Eds.; Oxford University Press: New York, NY, USA, 2018; pp. 219–246.
18. Barton, H.; Thompson, M.S.; Burgess, S.; Grant, M. *Handbook of Planning for Health and Well-Being: Shaping a Sustainable and Healthy Future*; Routledge: New York, NY, USA, 2015; ISBN 9781317542407.
19. Kent, L.J.; Thompson, S. The Three Domains of Urban Planning for Health and Well-being. *J. Plan. Lit.* **2014**, *29*, 239–256. [CrossRef]
20. Carmona, M. *Public Places, Urban Spaces: The Dimensions of Urban Design*; Architectural Press: Amsterdam, Netherlands, 2021; ISBN 978-1-85617-827-3.
21. Jackson, L.E. The Relationship of Urban Design to Human Health and Condition. *Landsc. Urban Plan.* **2003**, *64*, 191–200. [CrossRef]
22. Jacobs, J. *The Death and Life of Great American Cities*; Random House: New York, NY, USA, 1961; ISBN 0-679-74195-X.
23. Carmona, M. Place value: Place quality and its impact on health, social. economic and environmental outcomes. *J. Urban Des.* **2019**, *24*, 1–48. [CrossRef]
24. Kent, J.L.; Ma, L.; Mulley, C. The Objective and perceived built environment: What matters for happiness? *Cities Health* **2017**, *1*, 2374–8834. [CrossRef]
25. Mouratidis, K. Rethinking how built environments influence subjective well-being: A new conceptual framework. *J. Urban. Int. Res. Placemaking Urban Sustain.* **2018**, *11*, 24–40, 1754–9175. [CrossRef]
26. Ettema, D.; Schekkerman, M. How do spatial characteristics influence well-being and mental health? Comparing the effect of objective and subjective characteristics at different spatial scales. *Travel Behav. Soc.* **2016**, *5*, 56–67. [CrossRef]
27. Anderson, J.; Ruggeri, K.; Steemers, K.; Huppert, F. Lively Social Space, Well-Being Activity, and Urban Design Findings from a Low-Cost Community-Led Public Space Intervention. *Environ. Behav.* **2016**, *49*, 685–716. [CrossRef]
28. Oldenburg, R. *The Great Good Place: Cafes, Coffee Shops, Bookstores, Bars, Hair Salons, and Other Hangouts at the Heart of a Community*; Da Capo Press: New York, NY, USA, 1999; ISBN 13: 978-1569246818.
29. Croucher, K.; Myers, L.; Bretherton, J. *The Links between Greenspace and Health: A Critical Literature Review*; Greenspace Scotland: Stirling, UK, 2008.
30. Ruggles, D.H. *Beauty, Neuroscience, and Architecture: Timeless Patterns and Their Impact on Our Well-Being*; Fibonacci Press: Denver, CO, USA, 2018; ISBN 10: 0692928626.
31. Boys-Smith, N. *Heart in the Right Street: Beauty, Happiness and Health in Designing the Modern City*; Create Streets: London, UK, 2016; ISBN 0993569811.
32. Florida, R.; Mellander, C.; Stolarick, K. Beautiful Places: The Role of Perceived Aesthetic Beauty in Community Satisfaction. *Reg. Stud.* **2011**, *45*, 33–48. [CrossRef]

33. Mouratidis, K.; Yiannakou, A. What makes cities livable? Determinants of neighborhood satisfaction and neighborhood happiness in different contexts. *Land Use Policy* **2022**, *112*, 105855. [CrossRef]
34. Ruiz, C.; Hernandez-Fernaud, E.; Rolo-Gonzalez, G.; Hernandez, B. Neighborhood' Evaluation: Influence on Well-Being Variables. *Front. Psychol.* **2019**, *10*, 1736. [CrossRef]
35. Zumelzu, A.; Barrientos-Trinanes, M. Analysis of the effects of urban form on neighborhood vitality: Five cases in Valdivia, Southern Chile. *J. Hous. Built Environ.* **2019**, *34*, 897–925. [CrossRef]
36. Barton, H.; Grant, M.; Guise, R. *Shaping Neighborhoods: For Local Health and Global Sustainability*; Routledge: London, UK, 2021.
37. Forsyth, A.; Salomon, E.; Smead, L. *Creating Healthy Neighborhoods: Evidence-Based Planning and Design Strategies*; Routledge: Chicago, IL, USA, 2017.
38. Pfeiffer, D.; Cloutier, S. Planning for Happy Neighborhoods. *J. Am. Plan. Assoc.* **2016**, *82*, 267–279. [CrossRef]
39. Forsyth, A. What is a walkable place? The walkability debate in urban design. *J. Urban Des. Int.* **2015**, *20*, 274–292. [CrossRef]
40. Talen, E.; Koschinsky, J. The walkable neighborhood: A literature review. *Int. J. Sustain. Land Use Urban Plan.* **2013**, *1*, 42–63. [CrossRef]
41. Zhang, Y.; van Dijk, T.; Wagenaar, C. How the Built Environment Promotes Residents' Physical Activity: The Importance of a Holistic People-Centered Perspective. *Int. J. Environ. Res. Public Health* **2022**, *19*, 5595. [CrossRef] [PubMed]
42. Grasser, G.; Sylvia, T.; and Willibald, J.S. Are Residents of High-walkable Areas Satisfied with Their Neighborhood? *J. Public Health* **2016**, *24*, 469–476. [CrossRef]
43. Samavati, S.; Ranjbar, E. The Effect of Physical Stimuli on Citizens' Happiness in Urban Environments: The Case of the Pedestrian areas of the Historical part of Tehran. *J. Urban Des. Ment. Health* **2017**, *2*, 1–37.
44. Jun, H.J.; Hur, M. The relationship between walkability and neighborhood social environment: The importance of physical and perceived walkability. *Appl. Geogr.* **2015**, *62*, 115–124. [CrossRef]
45. Rogers, S.H.; Halstead, J.M.; Gardner, K.H.; Carlson, C.H. Examining walkability and social capital as indicators of quality of life at the municipal and neighborhood scales. *Appl. Res. Qual. Life* **2011**, *6*, 201–213. [CrossRef]
46. Leyden, K.M. Social Capital and the Built Environment: The Importance of Walkable Neighborhoods. *Am. J. Public Health* **2003**, *93*, 1546–1551. [CrossRef]
47. Pfeiffer, D.; Ehlenz, M.M.; Andrade, R.; Cloutier, S.; Larson, K.L. Do Neighborhood Walkability, Transit, and Parks Relate to Residents' Life Satisfaction? Insights from Phoenix. *J. Am. Plan. Assoc.* **2020**, *86*, 171–187. [CrossRef]
48. Parker, G.; Doak, J. *Key Concepts in Planning*; SAGE Publications Ltd.: London, UK, 2012; ISBN 978-1-84787-076-6/978-1-4739-1462-9.
49. Nunally, J.C. *Psychometric Theory*; McGraw-Hill: New York, NY, USA, 1967; ISBN 978-0-07-047849-7.
50. Tavakol, M.; Dennick, R. Making Sense of Cronbach's alpha. *Int. J. Med. Educ.* **2011**, *2*, 53–55. [CrossRef]
51. Ghasemi, A.; and Zahdiasi, S. Normality Tests for Statistical Analysis: A Guide for Non-Statisticians. *Int. J. Endocr. Metab.* **2012**, *10*, 486–489. [CrossRef]
52. Hoogerbrugge, M.M.; Burger, M.J. Neighborhood-Based social capital and life satisfaction: The case of Rotterdam, The Netherlands. *Urban Geogr.* **2018**, *39*, 1484–1509. [CrossRef]
53. Jamal, S.; Newbold, B.K.; Scott, M.D. A comparison of young and older adults' attitudes and preferences towards different travel modes and residential characteristics: A study in Hamilton, Ontario. *Can. Geogr./Géographe Can.* **2022**, *66*, 76–93. [CrossRef]