Arcades revisited as urban interiors in a transformed city context

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ABSTRACT

Pretoria is the administrative capital of South Africa and is located within the City of Tshwane in the Gauteng Province. The city's Central Business District (CBD) is characterised by a network of arcades and walkways that cut through the long and deep city blocks. In this article, we discuss arcades as urban interiors and the potential of these spaces to become points of social interaction within a transformed city context. We reflect on the original purpose of the arcade and based on criteria derived from a literature review, we critically assess the current use of three arcades and describe challenges experienced in the functioning of these spaces. The design of the building edges that link the interiors to the adjacent arcade space are revisited as a design element that has the potential to reactivate the arcades as urban interiors. Guidelines for improving the city dwellers and daily commuters' experience and use of these spaces as urban interiors are formulated and discussed. These guidelines, although formulated within a South African context, are relative to any urban interior within a city that has lost its sense of place and that needs to be reactivated through the treatment of its surrounding buildings' edges.

Keywords: Arcade; urban interior; social public space; building edges; staying zones; linger.

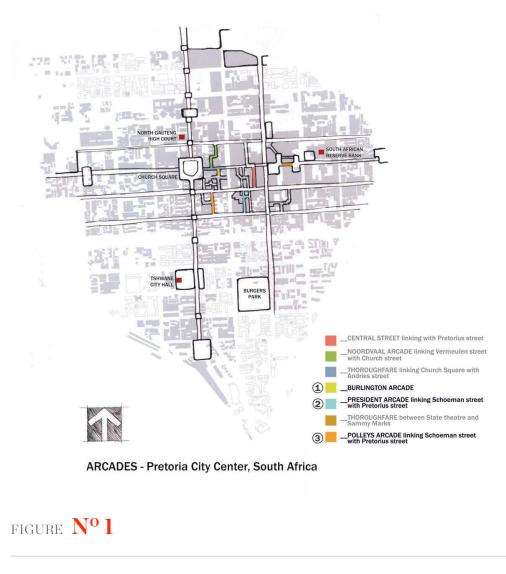
Introduction

Until the early 1990s, the Pretoria Central Business District (CBD) was the heartbeat of the city's economic activities, but owing to the sprawling city edges many of the commercial activities have been relocated in the rapidly expanding suburban areas. The city centre has undergone many changes over the past 30 years as a result to this decentralisation of commercial activities. The CBD area houses a number of governmental departments, small commercial educational colleges and smaller scale, informal commercial ventures. People living on the periphery of Pretoria continue to travel to the old CBD for work, education, shopping or to visit public services. Thus, Pretoria's CBD has not lost any of its usual routines; rather one kind of activity has been replaced by another.

The Central Business District (CBD) is characterised by a network of arcades and walkways that cut through the long and deep city blocks. In comparison to the city centre of Johannesburg (located 68km south-west of Pretoria), the city blocks in Pretoria are twice as long and pedestrians need to traverse longer distances along north and south connecting routes (see Figure 1). This movement is facilitated by the network of arcades and walkways, which form mid-block pathways, thereby increasing the permeability of the inner city (Bothma 2003:14).

In this article we are concerned with the potential that arcades offer Pretoria's old CBD and the dialogue that needs to occur between the arcade's interior and the surrounding building edges that link it to the public urban space. The arcades have the potential to become urban interiors where people can shop, eat, interact or simply pause and linger. Having lost much of their original former sense of place, these arcades are largely desolate and are used merely as thoroughfares. The arcades are no longer destinations in which citizens can stroll, escape from the busy sidewalks and socially interact. The judicious re-design of the building edges could reactivate these urban interiors and contribute to the improvement of inner city connectivity.

An urban interior that satisfies the city dweller socially can engender a sense of place (Johnson, Glover & Stewart 2014:31; Carr, Francis, Rivlin & Stone 1992:187). Herein lies the potential for creating and increasing commercial activity and public pause areas in city centres. Leani van der Westhuizen (2005:18) argues, '[p]ublic spaces are increasingly being seen simply as opportunities for consumerism'. While consumerism alone is not enough to satisfy our basic needs, if commercial activity within a space is absent and no other significant activity occurs in the adjacent urban interior, the sense of place is lost. The objective is to suggest which design



Arcades, Pretoria, 2015 (diagram by Anneke Allers).

features are required to reactivate the building's edge and the adjacent urban interior, thereby increasing both the social and commercial activity and re-establishing a sense of place. At the same time, the reactivation of these arcades as urban interiors has the potential to improve pedestrian connectivity and support elements within the non-motorised transport network in Pretoria's CBD.

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Background to Pretoria and city development

The city centre has a rich history, which was established in the 1880s. Dieter Holm (1998:57) explains that Pretoria's first transformation took place over a very short period from the 1880s to the 1900s. During this period, the town developed from an agrarian community to the capital of the South African Union in 1910. The town's transformation was visible within the urban design that was developed under the guidance of the Dutch architect Sytze Wopkes Wierda. An orthogonal urban grid was introduced that was ordered around the church and the central space of the *Kerkplaats* (Church Square) (Holm 1998:57-58). This central space remained the focus point in the city centre for many years. Since the end of the nineteenth century, government buildings such as the Raadsaal (Parliament building) and the Palace of Justice were erected around Church Square (Holm 1998:64; Van der Klasthorst 2013:34).

The city has remained the administrative capital since the formation of the South African Union in 1910 and is, under the current governance, one of the three capital cities of South Africa. The national executive function of this capital city continues to operate from the CBD area and houses governmental departments, educational colleges, commercial activities, as well as the Pretoria High Court (North Gauteng High Court), the Reserve Bank of South Africa and the State Theatre (see Figure 1). Originally, properties in the CBD were mostly orientated longitudinally; however, insufficient shop frontages resulted, which led to the formation of arcades to increase the ratio of shop front to sidewalk. An additional important function of these enclosed urban spaces was to provide convenient pedestrian connectivity within the inner city. This function can contribute positively to the proposed future development and transformation of the inner city transport plan.

In 2013, the Gauteng Provincial Government, Department of Roads and Transport released a draft report that communicated a 25-year, comprehensive, integrated transport master plan for Gauteng. The proposed plan focuses on the development and upgrading of a non-motorised transport network system within Gauteng's inner cities. Studies and surveys that were conducted as part of the transport master plan show that a large majority of the work force and more than 70 per cent of scholars within the urban areas either walk to their final destination, or walk as part of their commuting trip to public transport facilities (Gauteng Provincial Government 2013:2-7). The spatial development plan for the City of Tshwane was developed since 2007 and strategic goals included in the Gauteng draft report, indicates that this city's main goal is to promote a greater use of public transport across the municipal area (Gauteng Provincial Government 2013:12). Part of the

strategy to achieve this goal is the inclusion of better pedestrian connectivity between transport points (Gauteng Provincial Government 2013:12). The Joburg Inner City Urban Design Implementation Plan, formulated by the Johannesburg Development Agency, states that pedestrians are the most important element within the inner city network as all city dwellers are at some point of their journey on foot (Gauteng Provincial Government 2013:18).

Statistics show that within the current status quo of the non-motorised transport network of Pretoria, there are a high proportion of walking trips included in all travelling trips within the city (29 per cent), and that 51 per cent of scholars and students in Pretoria mainly walk to their final destination (City of Tshwane 2015, Chapter 11:2-3). Despite the above observations and statistics that show that the inner city facilitates a high percentage of pedestrians, the current pedestrian networks within the central business district have received the least attention (Gauteng Provincial Government 2013:18). The majority of sidewalks and thoroughfares are physically difficult to negotiate and are unsafe. The sidewalks offer limited protection from the weather and lack spaces for social interaction.

Arcades as urban interiors

When referring to a place or space as urban – urban fabric, urban public space, urban area – it is immediately positioned within the context of a city. Cities consist of buildings, streets and in-between open spaces. These open spaces include arcades, thoroughfares, pedestrian streets and public squares and are considered to be exterior public spaces. Urban interiors are associated with enclosed and controlled spaces within the city. Researcher and lecturer in Interior Architecture at the University of Wellington, Christine McCarthy (2005:112-125) states that '... to control space is to limit it and to restrain it: to interiorize it'. Therefore, to recognise and define a space as an interior is to assign it the abstract quality of 'interiority' which further contributes to understanding this term as confined, contained, enclosed, private, secure, protected, or sheltered space.

Arcades are confined, contained, and enclosed by the edges of the surrounding buildings and provide a level of privacy, protection, and shelter to city dwellers and daily commuters. Christopher Alexander, Sara Ishikawa and Murray Silverstein (1977:582) explain that, '[a]rcades run along the building, where it meets the public world; they are open to the public'. Although arcades function externally from the building interiors, the quality of interiority is present within these spaces and they can therefore be referred to as urban interiors rather than as exterior public spaces.

Original purpose and function of arcades as urban interiors

The arcade's historical typological development and significance as public space is discussed in German architect Johann Geist's book Arcades, which is considered to be a seminal reference on arcades, passages, and galleries. Geist (1983:3) identifies that various terms can be used for arcades, for example 'passages', 'the corridor', 'galleria', 'boulevard', but all of these terms generally designate the same building typology. A definition for the term arcade is constructed by Geist (1983:4) and Walter Benjamin (1999:31) and indicates a passageway that is lined with retail outlets on both sides linking two busy streets, offering a public space that eases pedestrian traffic flow and provides a short cut and protection from the weather. Geist (1983:4) elaborates further on the space under discussion where he says that '... the illusory element of the arcade is the space within its confines: an intended exterior is made interior; the façade with exterior architecture is drawn into the enclosed space'. Tracey Davis (1991:7) defines the function of the arcade as a space where shopping and socialising are merged.

The arcade had its origin in the Palais Royal located in Paris (France). In the late eighteenth century, during the French Revolution, there was a need for public space that was removed from the streets. The street still existed in its medieval state where there was no sidewalk, thus promenading and social interaction was an unsafe leisure activity (Geist 1983:59-62; Benjamin 1999:32). The Palais Royal provided such a public space removed from traffic where the public created centres of activity with secret societies, literary and political clubs in the salons and cafes that lined the arcade's building edges (Geist 1983:59; Hanssen 2006:2). At the same time, society was in an era of cultural and industrial development and there was a need for a new means to market and display the products of an exploding commercial industry (Geist 1983:12; Benjamin 1999:3). The arcade came into existence as it addressed the need for undisturbed public spaces allowing the opportunity to display merchandise in a setting where the bourgeoisie could promenade, take shelter, enjoy socialisation and engage in luxury marketplace activities away from the dangerous streets lacking sidewalks.

Lingering and the need for social public space

Arcades as promenades are characterised by the integration of commercial activity into a pedestrian orientated urban interior, injecting the city with an element of surprise and discovery; providing places of escape from the busy city streets. Here the city dweller and commuter are able to pause, re-orientate, and take shelter. Architect and professor of Architecture at the University of Berkeley, Christopher Alexander *et al.* (1977:169) define the promenade as a place where people go 'to stroll up and down, to meet friends, and to stare at others and let others stare at them'.

Sociologist and academic John Bruhn (1991:325) argues that anthropologists, sociologists and psychologists concur that humans are social beings who require interaction with each other. In order for individuals to understand their experiences within the world, they need to have a sense of social awareness that can only be established through taking part in social interaction and observing other people engaged in social activity (Mehta 2007:167; Marris 2004:78; Jacobs 1961:67; Carr, Francis, Rivlin & Stone 1992:27). Amanda Johnson, Troy Glover and William Stewart (2014:22) establish that many people regard public spaces where they can socially interact as important. Where public life is absent or disappearing within a community a sense of isolation and disconnection from the world becomes evident (Carr, Francis, Rivlin & Stone 1992:25).

Restaurants or coffee shops contribute to creating welcoming and meaningful community gathering spaces and places where people can socialise (Mehta 2007:181-183; Johnson *et al.* 2014:34). Jan Gehl (1987:71-74), an architect and urban design consultant, observed that people need time to linger in their surroundings to fully experience the environment. All meaningful social activities, intense experiences, and conversations need to take place in spaces where people can walk, sit, lie, or stand (Gehl 1987:71-74; Jacobs 1993:271-272). Therefore urban interiors must be designed to stimulate social interaction by allowing for the opportunity to linger. Gehl (1987:149) explains that '[i]t is important ... to be able to stand in public spaces, but the key word is staying'.

Building edges and staying zones

Arcades provide a type of urban street environment where the urban dweller is able to both promenade and observe while being undisturbed by the movement of other pedestrians (Fyfe 1998:83-87; Whyte 2009:21). Sociologist Derk de Jonge (cited by Gehl 1987:151) explains the phenomenon, of what he terms the edge effect, in a study he undertook of recreational areas. The study indicates that the preferred areas for staying and observing people are along the building edges of spaces. People have a need to survey their surroundings, without feeling exposed, through pausing along the edges of public spaces (Gehl 1987:151; Whyte 2009:108). A sense of place imbued with meaning is established when there is an opportunity to socially interact (Alexander et al. 1977:497; Johnson et al. 2014:39). The careful design and consideration of an urban interior's building edge can therefore allow for points of pause and interaction. The activation of spaces on both the interior and the exterior of the building edge can contribute to developing a sense of place. The Galleria Vittorio Emanuele II in Milan (see Figures 2-4) is an example of a typical historic arcade (Geist 1983:74) and an urban interior that provides staying zones along its building edges. A staying zone refers to a point along the building edge where the dweller can stay, as Jan Gehl and Birgitte Svarre (2013:84) define 'good places for standing' as the points along an edge of a space where people pause and stay. The Galleria Vittorio Emanuele II has a symmetrical plan with a repetitive column grid layout and glass shop fronts in-between the columns. These shallow recesses, in-between the columns, present ample space for people to stay and observe window displays and further form a backdrop and possibility for staying zones (see Figures 2-4).

A research study conducted by architectural students from the University of Melbourne in 1978, showed that a direct link can be established between open space quality and street life. By increasing the amount of public seating by 100 per cent on a pedestrian street in Melbourne, there was an 88 per cent increase in seated activities (Gehl 1987:36). Vikas Mehta (2007:183) also found that where a gathering place has seating that spills into the adjacent street, people are drawn to that spot and thus more people are drawn in. Favourable conditions for lingering are required in order for interaction to take place in public spaces. Building edges need to be lined with seats, staying zones and points for watching, displaying, exhibiting and interacting. To achieve this, building edges need to be opened up, moving into the exterior space extending the interior out, and thus inviting people into the interior.

Planning building edges and staying zones do, however, identify a dilemma in the design and consideration of urban interiors, since different designers take separate responsibility for the execution of the exterior and interior spaces. The architect punctures walls with large windows that define the shop fronts. The layout and shop fitting of the buildings' interiors are designed by the interior designer/architect,



FIGURES **Nº 2, 3, 4**

Galleria Vittorio Emanuele II, Milan, 2015 (photographs by Anneke Allers).

whilst the adjacent urban interior is the responsibility of the urban designer. As a result, little consideration is often given to the potential dialogue and connection between the interior, the building's edge and the adjacent arcade space. Lingering and social interaction are negatively impacted in urban spaces where store fronts are vacant or visually disconnected by blinds or obstructions (Mehta 2007:183; Johnson et al. 2014:35; Jacobs 1961:47; Gehl & Svarre 2013:104; Carmona, Tiesdell, Heath & Oc 2010:134; Jacobs 1993:287; Whyte 2009:225). In contrast, large expanses of transparent windows create the possibility for new staying zones. It is to these points that the city dweller is attracted (Alexander et al. 1977:581; Jacobs 1993:286; Whyte 2009:100-101). Thus, the arcade's building edge becomes a pause space between two realms, activating dialogue between the interior spaces and the arcade.

Arcades as urban interiors within a transformed city context: conditions and elements contributing to the function and success of arcades

In his book *Arcades*, Geist (1983:76) discusses the history and development of arcades around the world. In the nineteenth century, some cities like Liverpool, Manchester, Birmingham, Sydney, and Melbourne exemplified the social conditions of the time through revealing stark contrast between the hierarchies of social orders. Geist (1983:76) describes these cities as 'cities of the railway and tramway age, of the age of steam and of gas, of a society sometimes restless, sometimes complacent, moving, often fumblingly and falteringly, toward greater democracy'. Geist (1983:76) further indicates that arcades in these cities, in contrast to the original purpose of the eighteenth century arcades, were built to serve purely commercial functions and address the daily needs of consumers who flowed into the crowded and developed downtown areas.

Geist (1983:110-114) argues that throughout the lifespan of an arcade the conditions surrounding it and the immediate environment can change, and the composition of the arcade's users can affect its functionality to a great extent. He formulates conditions that need to be addressed and elements that need to be present in order for an arcade to remain functional and successful even with user and environmental changes. These are:

- location the arcade needs to be situated in the centre of the city where there is a constant flow of people who meet to socialise, linger and shop
- position an arcade must connect two busy streets and facilitate pedestrian traffic
- internal organisation the arcade must have its own attractions, 'architects must not only accommodate as many shops as possible within the space of the arcade but also make the traversal of the arcade as pleasant and entertaining as possible ... making it a preferred place for an undisturbed promenade' (Geist 1983:112)
- the public the arcade should address the needs of the particular sector of the public that it attracts.

Up to this point of the research, the literature review identified the seminal authors and publications, presented an historic overview as well as design conditions that can contribute to long term success and function of arcades as urban interiors. Using Geist's conditions and through the critical literature review, the following three criteria and research questions were formulated and used as a reference point to critically analyse, map and document the current functioning of arcades as urban interiors in Pretoria's CBD:

Criterion 1: Address the need for social public spaces, staying zones and creating opportunities to pause and linger. Do the building edges of the arcade address this need?

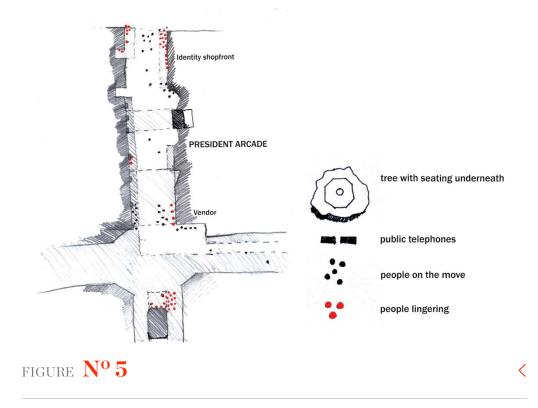
Criterion 2: Address the need to escape and orientate users. Does the arcade interior provide a space to escape into and allow city dwellers to orientate themselves in the space through a visual connection to the urban context?

Criterion 3: Address the need to attract the public through retail functions and social events. Does the current functioning of these retail space's edges address the retail and social needs of the particular public that it attracts?

In 2009, three arcades in Pretoria's CBD – President Arcade, Polley's Arcade and Burlington Arcade (see Figure 1) – were studied. The study included informal interviews with commuters and city dwellers, mapping of pedestrian movement, and observations made on the functions and activities within the arcades. The visual observations and mapping of pedestrian movement indicated that these arcades have a constant flow of pedestrians. All three arcades link either busy traffic streets or thoroughfares with heavy pedestrian traffic. Although these urban interiors have a constant flow of pedestrians, the urban interiors have become largely deserted and under-utilised. In 2009, the pedestrian movement, preferred points for lingering, and existing possible staying zones along the building edges were mapped and analysed (see Figures 5 and 6). The three mentioned arcades were revisited in 2015 and a comparison of the current situation was made with findings documented in 2009. This information, within the framework of the criteria formulated above, is henceforward used to discuss the current functioning of these arcades as urban interiors in Pretoria's CBD.

Overview of the visual and built environment of the three arcades in Pretoria

President Arcade (see Figures 7-10) is surrounded by tall buildings and is for the most part open to the sky. The arcade incorporates a play between covered and open roof areas along the building edges that cater for seasonal changes. People feel the warmth of the sun during winter and still have shelter when it rains. There is a high level of pedestrian movement along Pretorius Street, one of the linking streets and people are able to wait for their buses within this urban interior rather than on the sidewalks. There are a number of colleges and schools in and around the arcade and many of the students and children socially interact in the arcade during their lunch breaks and free time. During this time the space comes alive; school children play soccer and gather around the street vendors to socialise. The majority of the people linger at the visually blocked shop front of the Identity store, located at the arcade's entrance (Figure 7). This staying zone faces an occupied shop front, allowing dwellers to observe the activity of the opposite shop while at the same time observing the movement along Pretorius Street. Where the building edges are closed up with no visual connection to the interiors, people quicken their pace as they move through the arcade. Most of the food outlets and shops do not open up into the arcade space, resulting in disconnected spaces.



Mapping diagrams indicating points where people linger, President Arcade, 2009 (diagram by Anneke Allers).

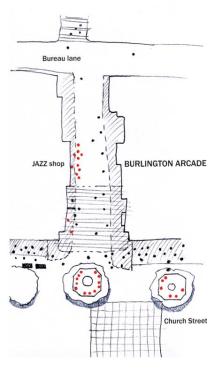


FIGURE $N^{0}6$

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Mapping diagrams indicating points where people linger, Burlington Arcade, 2009 (diagram by Anneke Allers).



FIGURE $N^{0}7$

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Identity – visually concealed shop front, President Arcade, Pretoria, 2009 (photographs by Anneke Allers).



FIGURES **Nº 8, 9, 10**

President Arcade, Pretoria, 2015 (photographs by Anneke Allers).

Burlington Arcade (see Figures 11-13) has an historical feel to it with its Art Deco shop fronts that have been built at alternating levels, creating an active and enticing building edge. The arcade is frequented continuously by pedestrians, as it links with a main pedestrian route from Church Square. The original shop front display areas have been adjusted to suit a South African context where street vendors are currently accommodated in the narrow shop front spaces (see Figure 13). People linger in the arcade while they are shopping and this allows the retail and food outlet activities to extend into the urban interior, in turn attracting more people from the pedestrian street. Midway in the arcade is a jazz shop that opens up into the arcade where the owner has provided seating, creating an active social spot. The arcade has intermittently covered and open roof areas, which provide random visual connections to the surrounding environment.



FIGURES Nº 11, 12, 13

Burlington Arcade, Pretoria, 2015 (photographs by Anneke Allers).

Polley's Arcade (see Figures 14-16) was designed and project managed by the architect Norman Eaton between 1955 and 1960 (Polley's Arcade 2010). This arcade provides an important link between two heavily frequented streets and is mostly used as a thoroughfare through which people can move quickly. The surrounding buildings house the South African Police Service Headquarters and all the shop fronts have been closed up, resulting in a visually blocked connection to the interiors. This creates a feeling of isolation discouraging people from lingering in this urban interior, with its wide empty corridors. The outstanding qualities of this arcade are the intricately laid hand-cut marble mosaic patterns with a staircase located midway in the arcade. This staircase raises the arcade floor space to a first floor which is connected to Schoeman Street. Daylight enters the arcade through the entrances to the street; additional skylight openings have been closed up. The strong visual link between the two streets ensures that pedestrians remain orientated within the space, even though they are isolated from the surrounding building edges and urban environment.

Critical review of the three arcades

The review criteria and research questions are employed hereafter to present a critical discussion of the function and utilisation, as well as to determine design features that need to be present in order to facilitate improvements to the urban interior.



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FIGURES **Nº 14, 15, 16**

Polley's Arcade, Pretoria, 2009 and 2015 (photographs by Anneke Allers).

Criterion 1: Address the need for social public space, staying zones and opportunity to linger

Industrialisation, suburbanisation and the segregation of various functions create the risk that city centres may suffer loss of activity and become redundant (Gehl 1987:19-24; Johnson *et al.* 2014:28). Pretoria's CBD has experienced, to varying degrees, aspects of this phenomenon in all three arcades. President Arcade has been renovated since 2009 and although there are new planter boxes, floor tiles, and overhead grids and lighting within the arcade, the building edges still remain without formal seating and have limited opportunity for the creation of staying zones (see Figures 8 and 9).

The Department of Education together with some small educational colleges and schools are housed in President Arcade. As previously mentioned, school children and employees tend to stay and socially interact at points where there are already established activities and congregate around street vendors who station themselves within the arcade (see Figure 10).

Polley's Arcade and President Arcade both have shop fronts that are closed up, blocking any visual connection to the interiors of the surrounding spaces (see Figures 8, 9 and 14). Polley's Arcade has lost the opportunity to function as an urban interior for city dwellers, because all the shop fronts are closed up. In President Arcade the clothing outlet 'Identity's' shop front has been closed up. A discussion with the shop owner in 2009 indicates that he did not want his customers to be distracted by the school children and employees of the education institutions who lean against the shop front. This lingering and staying zone at the entrance to the arcade identifies

the need that people have to interact in public spaces during their breaks. In 2015, we noticed that people still linger in this area and lean against the visually blocked shop front. This staying zone is directly opposite an active shop front, which allows people to look onto activity while their backs are turned towards the blocked 'Identity' shop front. This pattern repeats itself throughout the arcade and supports the notion that the sight of action is an incentive for interaction (Alexander *et al.* 1977:774; Mehta 2007:183; Johnson *et al.* 2014:33; Jacobs1961:47; Gehl & Svarre 2013:90). The design of Burlington Arcade has been more successful in allowing for possible staying zones and opportunities to linger. In Burlington Arcade, the Art Deco shop fronts are built on alternating levels, creating niches that the passers-by can lean against and from which they can observe their surroundings (see Figure 12). The Arcade was undergoing renovations in April 2015 during our visits and the installation of new floor tiles hindered any opportunities for lingering along the buildings edges, but lingering and interaction with shop interiors were evident at the service windows located in the narrow shop front spaces.

Criterion 2: Address the need to escape and orientate users

When an arcade is lined with blank walls people tend to move faster through the space, losing their sense of place and becoming disconnected from activity inside the building edge. When an opening in a blank wall is created, it establishes a visual link and an integration of interior and exterior. At this point, according to architect and phenomenologist Christian Norberg-Schulz (1980:5 & 58), true dwelling occurs, because it allows for orientation within the setting, thus providing a meaningful personal experience.

Instead of waiting on the busy narrow sidewalk in Pretorius Street, school children tend to "escape" into President Arcade, leaning against the shop front edge, socialising, and playing while waiting for transport. Even though the shop fronts at some points are closed up and the city dwellers are visually disconnected from the surroundings, there is a clear visual connection between the two ends of the arcade and pedestrians are able to orientate themselves within the city context. This is also true for Polley's Arcade. Although the latter arcade is disconnected from its surrounding building edges, people still use it as a thoroughfare because it links two busy streets in the city, and allows for pedestrians to escape to a quiet corridor that links Pretorius and Schoeman Street.

Criterion 3: Address the need to attract the public through retail functions and social events

Architect and avant-garde theorist Bernard Tschumi (1983:7, 148) argues that architecture is not neutral: it cannot be reduced simply to a language of form and style, and one cannot dissociate the language of walls and space from the actions and events that take place in and around them. The building edge "speaks" to the city dweller and the city dweller "responds", yet if the building edge is blank, then no dialogue can take place and the space becomes derelict.

In President Arcade the activities taking place inside the shops are disconnected from events in the exterior space of the arcade. Passers-by cannot see into the shops and food outlets. None of the shops have store fronts that can open up allowing merchandise to be displayed in the arcade space in order to tempt people to enter. Nor do the food outlets open up into the arcade, thus the patrons inside are unable to watch activity outside, while the passers-by cannot be enticed by sights and smells of food, or be tempted by people inside enjoying their food. The informal interviews that were conducted revealed that city dwellers are often mugged within this arcade. Dwellers are of the opinion that the disconnection between interior and exterior enables criminal behaviour and leads to a lack of a sense of safety in the arcade.

In Burlington Arcade many of the shop fronts are built at a higher level than the ground and open up with sliding glass panels. When people sit at these points, it appears as though they are sitting inside the shop; the shop's function and arcade activity thus overlaps and integrates. A popular social spot has been created in front of the jazz music retail shop, which opens into the arcade and blurs the boundaries between the two spaces. Music from the shop draws people into the arcade and creates a point where one can relax and linger, thereby establishing the character for the whole arcade. The pedestrians stop to sit on the chairs set up outside the store and listen to CD's on earphones.

In Burlington Arcade the conversion of the narrow shop fronts to small vending outlets, allow for the opportunity for smaller retail points to be integrated into the city's retail fabric. These shops accommodate vendors who only require a small retail space, and thus create the opportunity for activities inside the shops to extend into the surrounding arcade. The small retail spaces now open up directly into the arcade and the customer shops while standing within the arcade space. The adjustment to the original design of an arcade has led to the successful commercial functioning within a South African transformed city context.

Design guidelines to reactivate arcades as urban interiors

Through reflecting on the original purpose and functioning of arcades as urban interiors and assessing the current functioning of the arcades within Pretoria's CBD, guidelines have been established in order to improve the use of arcades as urban interiors. The following guidelines are not only relevant for Pretoria's urban interiors, but have a wider application. These guidelines can be used to improve any enclosed urban interior within a city that have the potential for commercial integration with possible staying zones for social interaction.

- i. Create a network of permanent social points to act as staying zones to draw the city dweller into the urban interior, for example restaurants with outdoor seating located between retail outlets.
- ii. Create a pattern of active and less active building edges opposite each other to provide pedestrians and city dwellers with a view into/onto activities.
- iii. Incorporate niches and seating within the building's edge, so that people can establish staying zones as informal social points.
- iv. Establish staying zones that overlook retail activity so that city dwellers can observe these activities while lingering and socialising in the urban interior.
- v. Create opportunities for informal vendors within the urban interior.
- vi. Create visual links between the connecting routes of an urban interior as well as between the shop interiors and the arcade's urban interior to orientate and visually connect the users.
- vii. Create building edges that can open-up completely, thereby blurring the boundary between inside and outside and establishing a strong connection between the urban interior and surrounding building edges.

Conclusion

In this article, we discussed arcades as urban interiors and investigated the potential of three arcades in Pretoria's CBD to be reactivated as public social spaces in order to attract city dwellers, commuters, and small scale and retail businesses. The literature review and investigation into the three arcades indicates that an urban interior should address city dwellers' need for social public spaces by providing staying zones that provide an opportunity to pause, linger, and allow for social interaction with other city dwellers. An urban interior should be a place that we can escape into and not just pass through, providing us with shelter from the weather as well as safety and privacy from heavy pedestrian traffic. The urban interior's building edges should link the retail or shop interiors to the adjacent arcade space through introducing large transparent or retractable shop fronts that can visually link the retail activities, merchandise and food outlets to the urban interior.

The assessment of the three arcades in Pretoria's CBD, based on the criteria derived from the literature review, indicates that there are very few opportunities currently to linger and stay in these urban interior spaces. This is detrimental to social interaction and also causes these urban interiors to lose their sense of place. Guidelines for improving the city dwellers and daily commuters' experience and use of these spaces as urban interiors were formulated and discussed. The guidelines indicate that the interior designers/architects, architects, and urban designers need to consider points for social interaction along the building edges of public spaces. Niches and seating as part of active and less active building edges opposite each other, should be designed as part of the building edge so that the city dweller can create staying zones. This will enable the city dwellers to stay and socially engage with other people, establishing a sense of place. The city dweller will also take note of the adjacent building interiors which then should increase commercial activity. Within such an urban interior the city dweller is able to create a sense of belonging and meaning and be encouraged to make use of the space on a daily basis.

The network of arcades in Pretoria indicates that an independent pedestrian network is created that provides a more intimate experience for the city commuters. The strong shift towards the development of a non-motorised transport network system in South African cities impacts directly on the position and utilisation of urban interiors since these spaces link public transport points, connect activities and contribute to providing safe, pleasant experiences to pedestrians. The reactivation of these urban interiors can therefore contribute to the improvement of pedestrian connectivity between transport points.

The proposed guidelines, although formulated within a South African context, are relevant to any urban interior within a city that has lost its sense of place and that needs to be reactivated through the treatment of its building edges. Further research can be done by using the criteria to observe other inner cities in South Africa in order to expand on the guidelines. The guidelines are suggestions to which design features need to be present along the building edges of these arcades to ensure a successful urban interior within a South African context, but are relevant to any urban interior that needs to regain its function as a social public space with a strong sense of place.

REFERENCES

- Alexander, C, Ishikawa, S & Silverstein, M. 1977. *A pattern language towns, buildings, construction*. New York: Oxford University Press.
- Benjamin, W. 1999. *The arcades project*. [O]. Translated by H Eiland and K McLaughlin. Cambridge: Harvard University Press.
- Bothma, C. 2003. Architectural intimacy an urban retreat. MArch (Prof) dissertation, University of Pretoria, Pretoria.
- Bruhn, JG. 1991. People need people. *Integrative Physiological and Behavioral Science* 26(4), Fall:325-329.
- Carmona, M, Tiesdell, S, Heath, T & Oc, T. 2010. *Public spaces urban spaces the dimensions of urban design*. Second Edition. Oxford: Architectural Press.
- Carr, S, Francis, M, Rivlin, LG & Stone, AM. 1992. *Public space*. Cambridge: Cambridge University Press.
- City of Tshwane. 2015. Comprehensive integrated transport plan. [O]. Available: http://www.tshwane.gov.za/sites/Departments/Transport-and-Roads/ Transport/Documents/CITP%20Draft%20front%20cover%20to%20ch13.pdf Accessed 18 July 2015.
- Davis, TC. 1991. Theatrical antecedents of the mall that ate downtown. *Journal of Popular Culture* 24(4):1-16.
- Fyfe, NR. 1998. *Images of the street planning, identity and control in public space*. London: Routledge.
- Gauteng Provincial Government. 2013. *Gauteng 25 year integrated transport master plan*. Draft report. [O]. Available: http://www.itmp25.gpg.gov.za/documents/ ITMP25-Main-Report-Final-Draft-1-13-Nov13.pdf Accessed 18 July 2015.
- Gehl, J. 1987. Life between buildings. New York: Van Nostrand Reinhold.
- Gehl, J & Svarre, B. 2013. *How to study public life*. Washington: Island Press.
- Geist, JF. 1983. Arcades the history of a building type. Cambridge, Mass.: MIT Press.
- Hanssen, B. 2006. Introduction, in *Walter Benjamin and the arcades project*, edited by B
 Hanssen. London: Continuum. [O]. Available: http://0-site.ebrary.com.ujlink.
 uj.ac.za/lib/ujlink/detail.action?docID=10224943
 Accessed 04 August 2015.

- Holm, D.1998. Kerkplaats and capitalists, in *Architecture of the Transvaal*, edited by RC Fisher, S Le Roux & E Maré. Pretoria: University of South Africa:55-77.
- Jacobs, J. 1961. *The death and life of great American cities the failure of town planning.* New York: Penguin.
- Jacobs, AB. 1993. Great streets. Cambridge, Mass.: MIT Press.
- Johnson, AJ, Glover, TD & Stewart, WP. 2014. Attracting locals downtown: everyday leisure as a place-making initiative. *Journal of Park and Recreation Administration* 32(2), Summer:28-42.
- Marris, P. 2004. The nature of attachment, in *Attachment across the life cycle*, edited by CM Parkes, J Stevenson-Hinde & P Marris. London: Routledge. [O]. Available: http://0-site.ebrary.com.ujlink.uj.ac.za/lib/ujlink/detail. action?docID=10099233 Accessed 21 August 2015.
- Mehta, V. 2007. Lively streets determining environmental characteristics to support social behavior. *Journal of Planning Education and Research* 27(2), December:165-187.
- McCarthy, C. 2005. Toward a definition of interiority. Space and Culture 8(2), May:112-125.
- Norberg-Schulz, C. 1980. *Genius loci towards a phenomenology of architecture*. London: Academy.
- Polley's Arcade. 2010. [O]. University of Pretoria: ABLEWiki Portal. [O]. Available: http://wiki.up.ac.za/index.php/ABLEWIKI:Polly's_Arcade Accessed 3 August 2015.
- Tschumi, B. 1983. The discourse of events. London: Spin Offset.
- Van der Westhuizen, L. 2005. '_ infill.' MArch (Prof) dissertation, University of Pretoria, Pretoria.
- Van der Klashorst, E. 2013. A reinterpretation of urban space in Pretoria. Master of Visual Arts dissertation, University of South Africa, Pretoria.
- Whyte, WH. 2009. City: Rediscovering the center. Philadelphia: University of Pennsylvania Press. [O]. Available: http://0-site.ebrary.com.ujlink.uj.ac.za/lib/ ujlink/detail.action?docID=10642125 Accessed 04 August 2015.