

# ACTIVATING MODERNIST PUBLIC SPACE

## Deconstructing the Urban Plaza

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# 1. Thesis Abstract

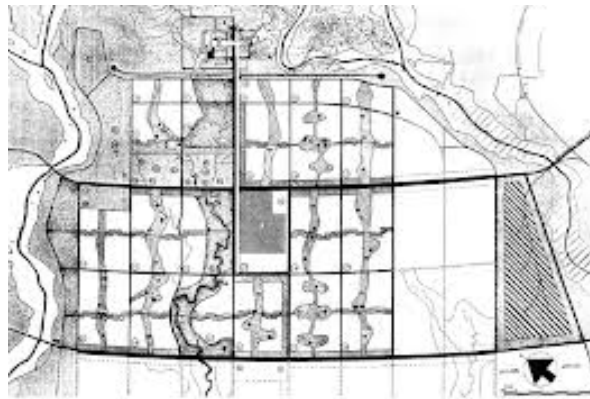
The city of Chandigarh is planned to human scale. It puts us in touch with the infinite cosmos and nature. It provides us with places and buildings for all human activities by which the citizens can live a full and harmonious life. Here the radiance of nature and heart are within our reach.<sup>1</sup>

“The Edict of Chandigarh” from The Establishment Statute of the Land, 1959

Chandigarh was first an emblem and then an urban center, meant to be filled with the values and meanings of a new democratic India. A city envisioned to have a modern character to compliment its tantalizing history.<sup>2</sup> More than fifty years since its construction, the city of Chandigarh designed by Le Corbusier remains a celebrated icon of early modern architecture and urbanism in Asia. But today the city that was planned to accommodate about 500,000 is already a home for more than double this population. This influx of population along with the lack of new housing to accommodate them has made the city stand neither complete in its envisioned form nor replete with the founding meanings.

As described in the Edict of Chandigarh, the city was envisioned by the government as the product of cosmos of nature, based on

a rectangular grid made up of sectors. The modern democratic city was conceived as a body with, a civic core in the Heart (Sector 17), an administrative core (The capitol complex) at the Head, the green zones (the soul) and the support core or the circulation road network (the arteries). Envisioned as the civic/commercial heart of the city, Sector 17 was laid out around three plazas, intended to define the activities of a broad spectrum of society.



**Figure 1.1-** Conceptual plan of Chandigarh by Le Corbusier from Chandigarh Archives

But in the grand visions of an ideal modernist city, the core cultural values of the local Indian society were neglected. Even after over 60 years of growth, the sprawling city still lacks an perceptible cultural center that defines the identity of the denizen.

This thesis examines the role of culture as a resource and means for the redevelopment of the city in response to current conditions. Identifying the many voices in the city, I will investigate, what will be the most appropriate intervention in the context of this city with a very strong cultural heritage, but lacks the architecture to define it. The project focuses on the revitalization of Sector 17 as the cultural heart of the city by examining the three plazas visually, programmatically and contextually to create a coherent space as a pedestrian, cultural and commercial center.

This effort resulted in the design of a cultural center that in its site and form integrate with the landscape and reactivate the plaza. The intent is to bring together the functions of theater, amphitheater and learning/support spaces in a built volume but also have these activities spill out into open, easily accessible spaces. And creating a pedestrian path into the city centre lined with a series of activities and landscaped features. Creating a dialogue between people and place, Sector 17 can be defined by more than just masses of consumerism, becoming a place where the civic heart and soul (green spaces) of the city are united.

<sup>1</sup> “The Edict of Chandigarh” from The Establishment Statute of the Land, 1959

<sup>2</sup> Kalia, Ravi. Oxford University Press, 1999

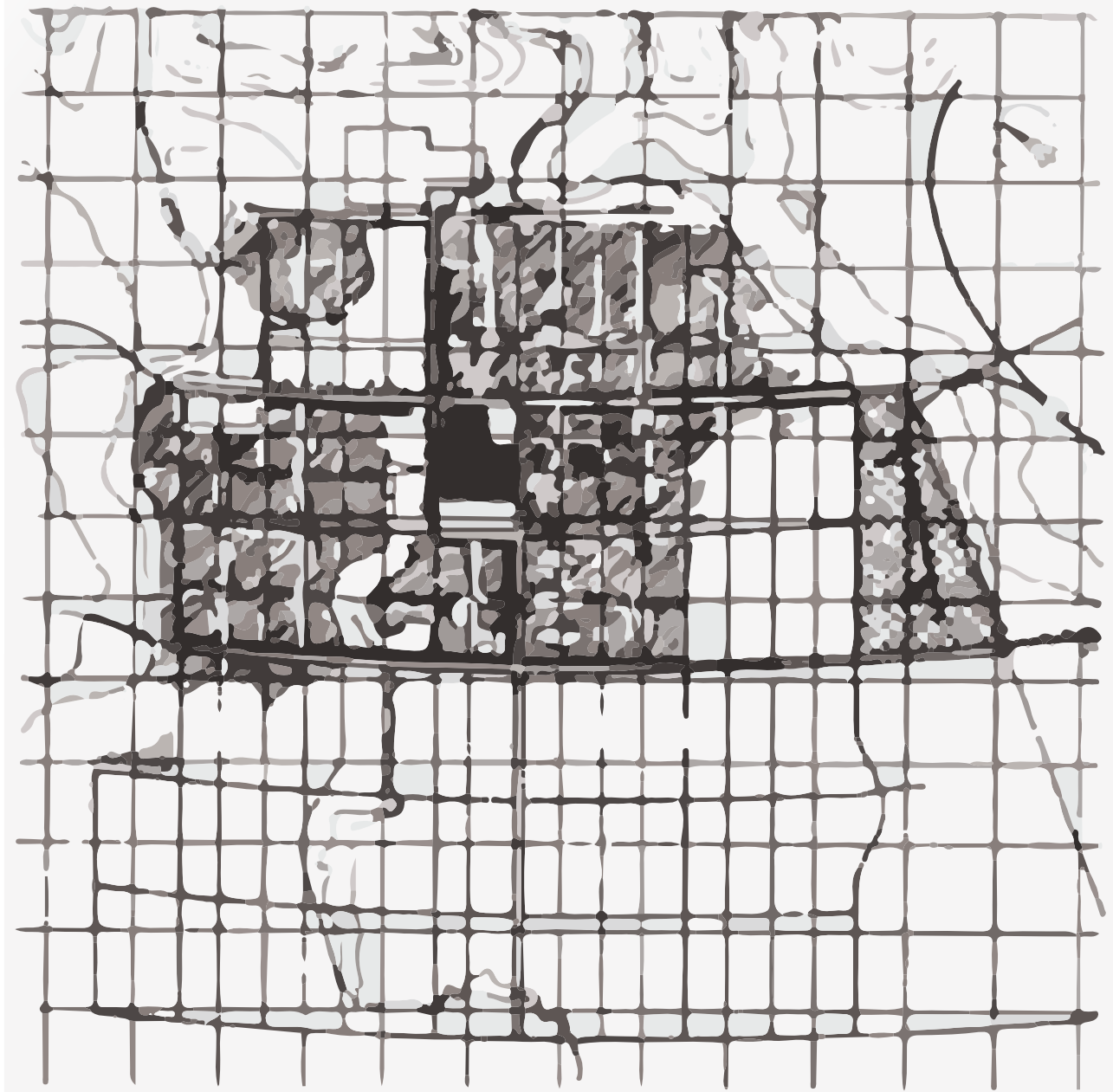


Figure 2.1- Conceptual plan of Chandigarh

## 2. Introduction

For any society to grow and prosper it is important that they stay honest to their roots. Every culture has some thing unique that inspires them and motivates them to create an identity that differentiates them from the rest. It is this thought process that channels people centric urban growth. India for example has always been known for its cultural integrity and diversity. It is this quality that has helped us create an identity for our selves. A unique and rich culture can be the source of inspiration for many urban planners and architects. Cities like Paris and Rome have been honest to their history and the people and have used their culture as a stimulus for urban development.

Chandigarh in the same context has a very tantalizing history, a city created as a foundation for the new democratic nation, A place where every one had a chance to develop to the best of their potential. For this vision to come to life, Le Corbusier designed a practical and flawless city with strong core fundamental. The northern most point in city limits was envisioned as the administrative head, the central zone as the civic commercial center, the impeccable circulation system as the arteries for the city and a strip of green running from the north to the southern end as the soul of the city.

After over 65 years since its conception it is not hard to come to the conclusion that the city is a certain success, which has to led it to grow to five times its anticipated size.

Chandigarh was a dream city for its people, as communities from all over northern India moved to this new land of opportunity. This in turn resulted in a very strong cultural diversity. Chandigarh is the home for one of the highest ranked art and architecture institutes in the country. But this city of almost 1.5 million residents lacks a cultural center, a place to promote culture and arts.

Designed as the civic commercial center the city, Sector 17 was planned as three plazas enclosed by retail and institutional buildings. But the plazas that were envisioned as public space have turned into parking lots, and all the human activity is concentrated around the building or under the trees. Adding to that, externally the civic center is in a disconnect with the green strip running parallel to it and internal disconnect is seen between the plazas, thereby by destroying the vision of connected open spaces meant to be used by public.

### 3.Theoretical Frame Work

#### 3.1 Chandigarh as a vision

##### Birth of a Nation-Birth of a City

Chandigarh was first an emblem and then an urban centre, meant to be filled with the values and meanings of a new democratic India, A city with a modern character and a tantalizing history.<sup>5</sup> After a nationalist struggle that lasted over three decades, India won its independence on August 15 1947. The end of British Imperial rule brought about the partitioning of the country, which included the division of the northwest province of Punjab between India and neighboring Pakistan. With the creation of Pakistan, Punjab was split into two parts. Lahore, the former seat of Punjab, was allocated to Pakistan, creating an urgent need to find a new capital for eastern Punjab. As Vikramaditya Prakash notes, this new urban center was seen as an important symbol of the newly independent India, while needing to serve as a replacement for Lahore, the new capital also needed to provide an actual home for over half a million refugees.<sup>6</sup>

This created an urgent need to find a new seat of governance for the Indian state of Eastern Punjab: to make up for the psychological and emotional loss of Lahore and for almost half a million refugees, the largest immigration population ever.

The question then was to either build a new capitol or develop an existing city into one. After almost a year of debate over whether to build a new city or reuse an existing one, the decision to build a new capitol was officially made on April 2,1952. The foundation stone laid by prime minister Jawaharlal Nehru, still rests in sector 9 Chandigarh. History repeated itself in 1966 when the state of Punjab was further subdivided on the basis of linguistic populations.



**Figure 3.1** - Historic photo of the refugees coming to India from Pakistan 1947, "The DiA Blog." 13 June 2013.



**Figure 3.2** - Historic photo of Approximately half a million Homeless Indians, 1947, From Legacy of Partition record office

<sup>5</sup> Kalia, Ravi. Oxford University Press, 1999

<sup>6</sup> Prakash,Vikramaditya, Chandigarh's Le Corbusier,2002

<sup>7</sup> Prakash,Vikramaditya, Chandigarh's Le Corbusier,2002

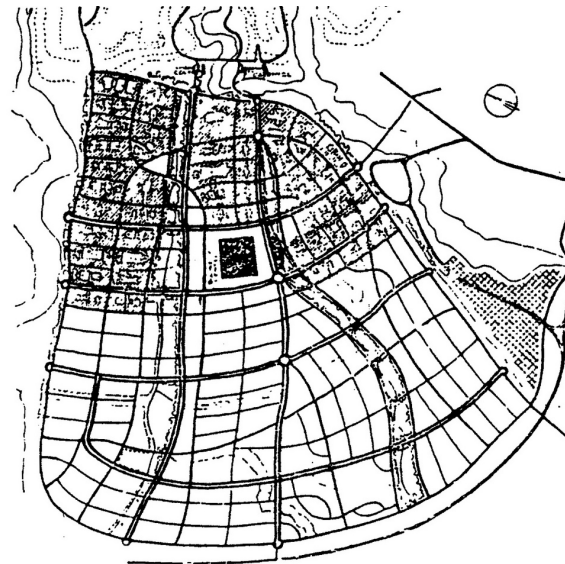
Both Punjab and the neighboring state of Haryana laid claim to the new capitol, which was an area of 114.5 sq.kms at the foothills of Shivalik (also known as the lower Himalayas). Chandigarh hence became the capitol of both Punjab and Haryana, as a union territory and under direct control of the central government.

### The Foundation

In 1953 prime minister Jawaharial Nehru described Chandigarh in relation to the newly acquired freedoms of the country as a new city of free India, totally fresh and wholly responsive to the aspirations of the future generations of this great country.<sup>8</sup>

Newly independent nations often look towards developing new capitol cities or portions within a city to reflect the notion of modernity and growth for example, Ankara (1928) in Turkey, Brasilia (1956) in Brazil. India followed the same path in 1948 with the decision to make a new capitol. Ironically, this country just freed from western colonization turned to the West again to build a model for her future growth. Edwin Lutyens's design for New Delhi and in

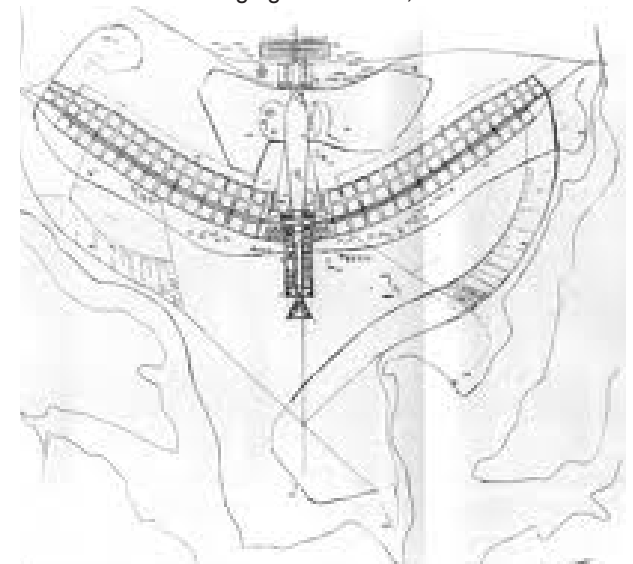
Otto Koenigsberger's work on Bhubaneswar, the new state capital of Orissa, served as strong precedents for this ideology<sup>9</sup>.



**Figure 3.3** - Plan of Chandigarh as formulated by Albert Mayer from Brasilia-Chandigarh,201



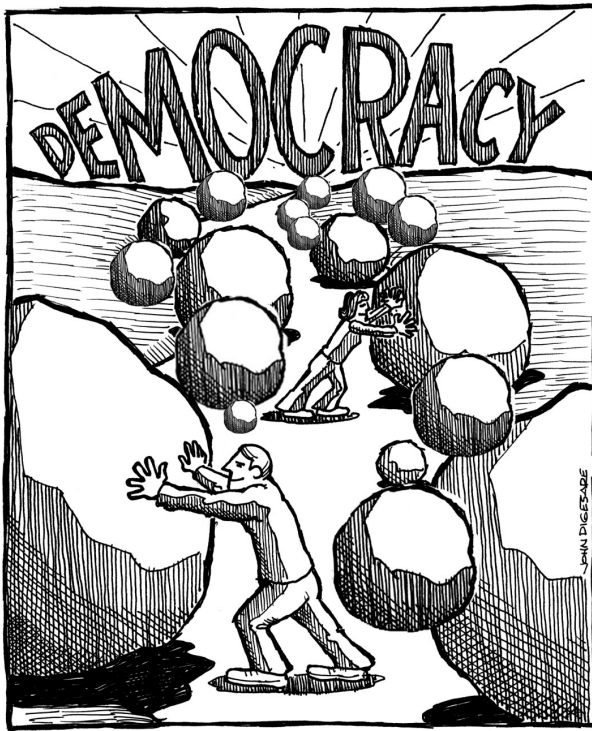
**Figure 3.4** - Plan of Ankara as planned in 1930 from Anatolian Ankara | Aging Modernism,2013



**Figure 3.5** - Plan of Brasilia as planned in 1956 from Brasilia's Super Quadra, 2005

8 Nehru, Jawahar Lal, New Delhi, 1953

9 Kalia, Ravi. Oxford University Press, 1999



**Figure 3.6** - The illusions of democracy in the Third World Nation



**Figure 3.7** - Open Hand Chandigarh, symbolizes 'Open to Give – Open to receive'.

past signs of colonial supremacy. The job of planning the new capitol was first handed to American Albert Mayer and the design of the buildings to Polish architect Matthew Novicki. But following Novicki's sudden death and Mayer's subsequent hesitation to take over the project, the project was reallocated to Le Corbusier and Pierre Jeanneret became responsible for planning both the city and the capitol complex in 1951.

Le Corbusier inspired by forms of modern industry, with "modern man" and industrial age aspiration envisioned Chandigarh as;

As a modern and efficient city with up to date services, sewerage and transport with clean, open spaces liberating Indians from the tyranny of overcrowded and filthy cities, as well as from the confines of agricultural village life<sup>9</sup>

His aim was to design an ideal city that was the embodiment of a new paradigm of democracy that had left behind the local building traditions of the past.

The vision was that of a newly independent India requiring a statement for an emerging modern nation state. To become symbolic of the new India, the city had to be modern in its ideology and architecture, moving away from

<sup>9</sup> Le Corbusier, 1951



**Figure 3.8** -Capitol Complex, The Secretariat Building,Chandigarh



**Figure 3.9** - Capitol Complex, The Secretariat Building,Chandigarh

The conceptual plan that Albert Mayer had formulated before his death served as the basis for Le Corbusier's design for Chandigarh. The architect also made subtle but significant alterations to the more organic plans of Albert Mayer that laid the foundation for the planned city.<sup>10</sup> "Le Corbusier's plan projected the new capitol as the ideal city of an omnipotent Western machine-age civilization promising a decongested city center, filled with sun, space and greenery."<sup>11</sup>



**Figure 3.9** - Capitol Complex, The Assembly Building, Chandigarh



**Figure 3.10** - Capitol Complex, The Assembly Building, Chandigarh

10 Kalia, Ravi. Oxford University Press, 1999

11 Prakash, Vikramaditya, Chandigarh's Le Corbusier, 2002

### 3.2 Chandigarh as a Reality

#### Conception

Le Corbusier conceptualized the city as an amalgamation of three zones, living, working and Mind body + spirit.<sup>12</sup> Each of these components had an assigned function. He identified the working places as the capital complex, sector 17, and the industrial area. The living areas consisted of the “urban villages” in the sectors which would cater to the housing need for the residents. The spaces for the body, which were fundamental in tying all the zones together were designated as the leisure areas and parks and other green spaces, while those of the mind were the educational institutions. All the education institutions were planned along the green strip to further integrate education with nature and giving an opportunity to have open spaces that could facilitate in a more holistic teaching curriculum. Chandigarh plan was designed as a homogenous plan. Where the grid divided the city into equal proportions. The sectors thus created had the same size but varying functions that fell into the above mentioned categories.

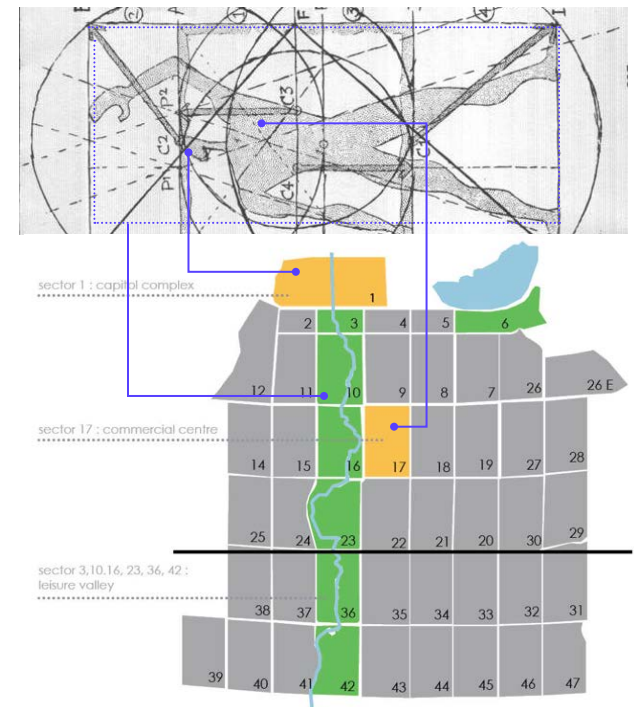


**Figure 3.11** - Overlays of Le Corbusier's master plan diagram and satellite image of Chandigarh in 2010  
Source Chandigarh Urban lab



**Figure 3.12** - Three major zones in Chandigarh's plane  
Source Mary Fialco

Sector 1, THE HEAD, that is located outside the prominent grid of the Chandigarh houses the Capitol complex, which is the home for the secretariat, high courts, open hand monument and assembly building. Sector 17, THE HEART, is located right in the centre of the city and is the civic core comprising of Retail, Town Hall, Libraries and Bank square. And the band of green strip, THE SPIRIT, comprised mainly of six sectors is a collection of parks and green zones running through the city.



**Figure 3.13**- The Sectors for working and Body + spirit  
Source Mary Fialco

<sup>12</sup> Prakash, Vikramaditya. Commercialization, Globalization and the Modernist City, 2011

The individual Residential sectors comprising the Living zone of the master plan of the city were designed as pedestrian friendly zones, where the residents could travel from one end of the sector to the other by foot in ten minutes. Each sector was envisioned to incorporate shops, schools, health centers, community, and recreational spaces to compliment the housing. Le Corbusier's idea was to create a family-friendly unit, where residents can easily and quickly fulfill their needs without leaving.

The V system is integral to understanding and experiencing the city. Major arteries that connect Chandigarh to the region are V1s. V2s are the biggest intra-city circulation cores. V3s are high speed traffic inter sector roads. V4s are the biggest roads in sectors, connecting the sectors to surrounding V2s and V3s. The V5s and V6s are smaller residential roads and V8s are the under utilized cycling and pedestrian paths.<sup>13</sup>



**Figure 3.14-** The individual residential sector  
Source Chd Urban Lab



**Figure 3.15-** Image of typical commercial zone on V4  
Source The Tribune, Chandigarh

13 Prakash, Vikramaditya. Commercialization, Globalization and the Modernist City, 2011



**Figure 3.15-** Image of traffic on semi major road network V3  
Source The Tribune, Chandigarh



**Figure 3.16-** Image of traffic on major road network V2/V1  
Source The Tribune, Chandigarh



**Figure 3.17-** Image of traffic on major road network V2/V1  
Source The Tribune, Chandigarh

Infrastructure is critical to circulation. Heterogeneous modes of transportation in the city are necessary to a high functioning city.<sup>14</sup>

Even though Chandigarh was envisioned as a pedestrian city, the V2s and V3s that separate one sector from the other are primarily designed for cars. With the growth of city and large influx of people, every sector's commercial space has lost its diversity but caters to a certain type of commodity. For example the internal market of sector 7 are predominantly automobile repair shops where as that of 23 are mainly textile.

With the city becomes increasingly urban, it is unrealistic for sectors to fill all the daily needs as market forces change the composition of the sector markets. It is common for the residents to leave the sector for a better super market, many travel across the city for work, or school."

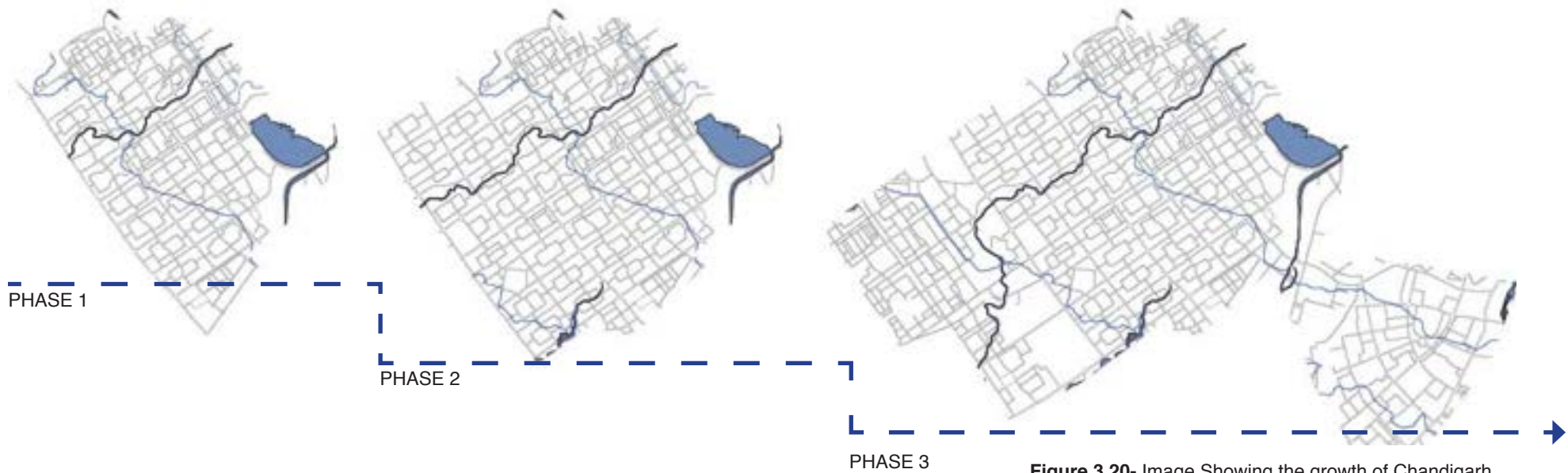


**Figure 3.18-** Image of bus transit during peakhours  
Source The Tribune, Chandigarh

While walking within the sector is easy, walking between them becomes more difficult. Crossing the V2s and V3s with their heavy traffic is dangerous, made more so by the lack of sidewalks and crosswalks. There is no formal pedestrian path that links the entire city or even more than one sector. And walking along the arterials is not an option as they are dictated by right angles making the distances longer and cumbersome. To add to that the public transport system in Chandigarh is opaque to the uninitiated user, due to lack of any bus time tables, marked buss stops, Formal bus routes and fixed bus times.



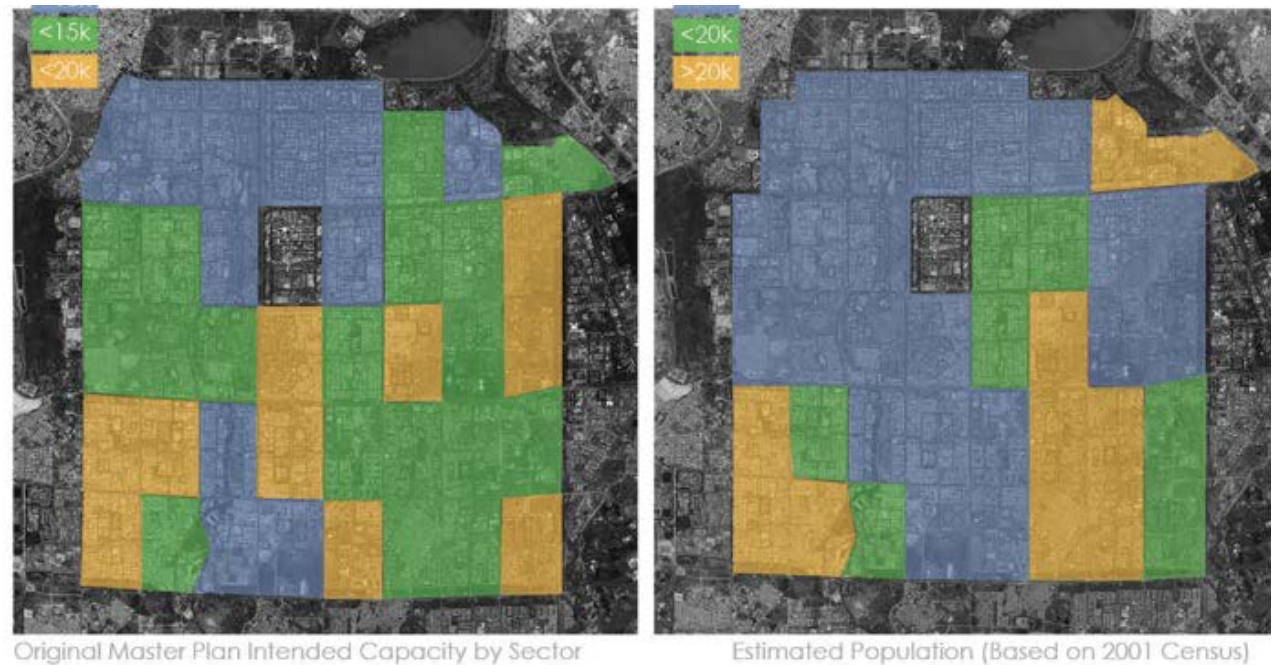
**Figure 3.19-** Image of Condition of bus stops, Chandigarh  
Source The Times of India  
14/15 Prakash, Vikramaditya. Commercialization, Globalization and the Modernist City, 2011



**Figure 3.20-** Image Showing the growth of Chandigarh  
Source Chd Urban Lab

Chandigarh has been a great success so far. The city that was designed for 500,00 inhabitants is now close to crossing its mark for over 1.2 million inhabitants. It has grown to over 3 times in its size and double in its density. Le Corbusier's original plan had a gradual increase in density as we move north to south in the city. The growth has loosely followed this pattern with the highest densities in the southern most, recent phases of development.

**Figure 3.21-** Image Showing increased density in phase 1 of Chandigarh, Source Chd Urban Lab

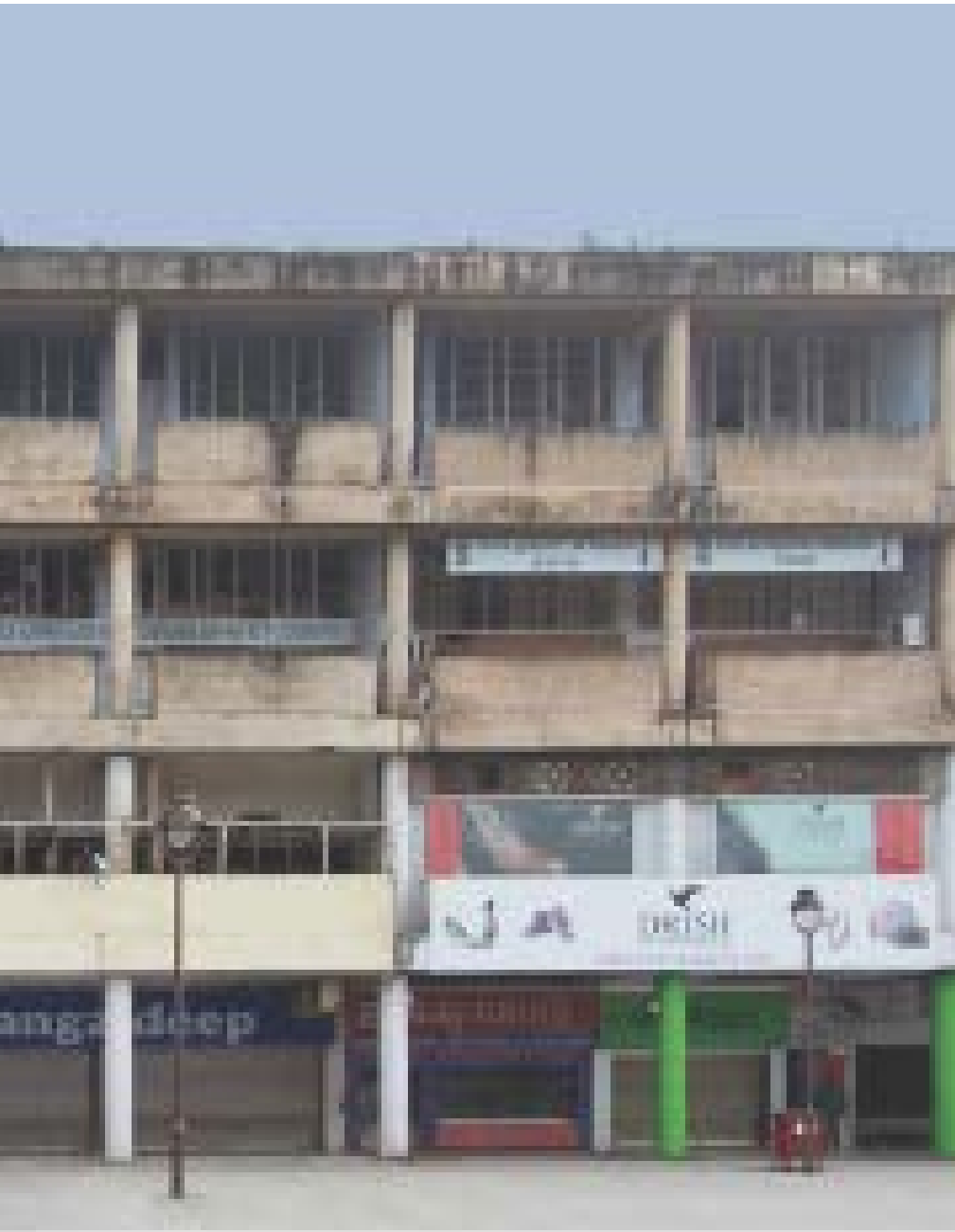


Original Master Plan Intended Capacity by Sector

Estimated Population (Based on 2001 Census)

3.3 Sector 17- Heart of Chandigarh



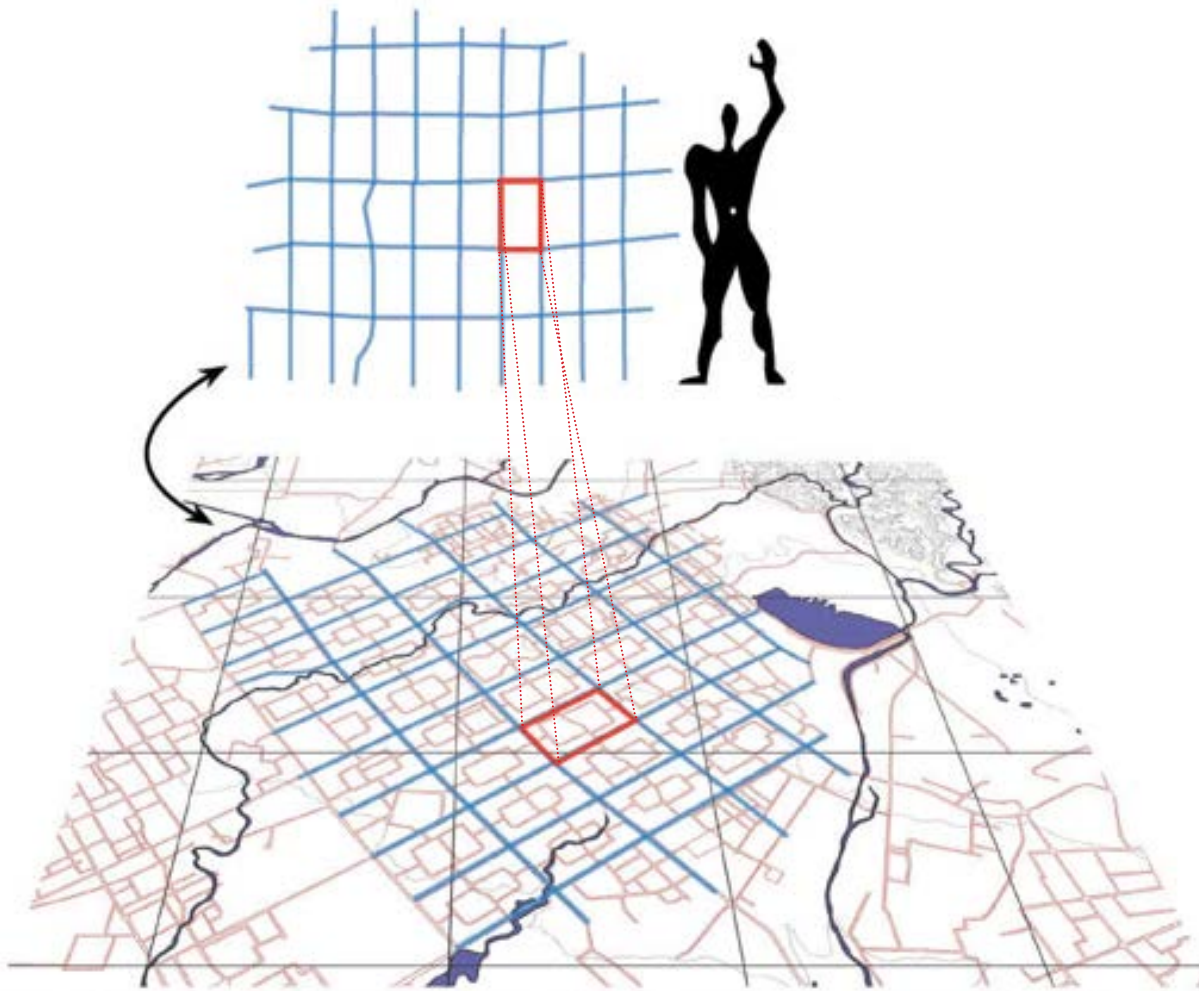


The most important organ of the town-the civic core, has always received special attention from the town-designers, manifesting the pride and valued position it holds in urban structure. The civic core of a city is primarily a composition of space and buildings that bring them together for various needs. It thus fulfills a social function of uniting people, facilitating direct contact and exchange of ideas and stimulating free discussion<sup>16</sup>

-AR Prabhawalkar, writer/reporter, 1954

**Figure 3.22-** Image Showing Sector 17 Chandigarh

16 - Prabhawalkar,AR, writer/reporter, 1954



**Figure 3.23-** Image Showing location of Sector 17, Chandigarh in context of the city.

The civic/commercial cone of Chandigarh measures about 240 acres and is divided into 2 zones; the northern zone hosts the civic administrations and the district administration is hosted in the southern zone catering for Chandigarh to become a district center. The two main arteries of Chandigarh are the Madhya Marg (V2 STATION) and the Jan path (V2 CAPITOL). The junction of these two arteries is the commercial /civic core. Two main arteries (the Jan path and Madhya Marg) play a vital role of connecting all the important institutes of the city, the government core, the educational and the industrial core. Even though the concept of a civic core is modern, its conception in Chandigarh has some traditional roots. It designed around a concept of a central Chowk. “A Chowk is often an open area found in the heart of a traditional town used for community gatherings.”<sup>17</sup> The central ‘chowk’ has wide pedestrian way crossing. The pedestrian paths run northeast to southwest and northwest to southeast respectively. Important buildings both civic and commercial surround the Chowk.

17 - Wikipedia, definition of a Chowk



**Figure 3.24-** Image Showing Sector 17, Chandigarh

The central nucleus/core has important public buildings like the Town Hall, the Central Library, and the post and telegraph head quarters, the Bank Square (chamber of commerce), cinema halls, commercial houses and insurance offices. The Chowk is encircled by a ring road, which takes the vehicular traffic. There are large areas along the ring road to accommodate car parking. The central Chowk is free from vehicular traffic and is the main meeting space. It also links the shopping area, the institutions, the bank square cinemas, etc. The pedestrian ways, also serve as fore court to the various complexes connected by them.

In 1953 when the decision to create a city center came into effect, the collection of finances and funds to do the same were started. Initially the government finances and funding were focussed towards the development of the city center but since development was slow their interest faded. The administration built the town hall and the central library, which were part of the central nucleus. The balance of the development was left to private parties. The PTT tower, Which was conceived as a 11 story building, the talent in Chandigarh apart from the capitol complex, conceived in the initial planning stage, could not be built due to lack of funds.

As the city center grew, the program for a PTT tower was accommodated successfully in other buildings with in the civic center, but the tower was never built. Every society needs a place that aids in uniting them, stimulating the idea of free discussion, direct contact and exchange of ideas. An ideal civic core is a way of making this ideology a reality, it is guided by the people, their habits and activity which, are very much, part of every society.



“Good Architecture works on the philosophy that all citizens are actors playing their roles in the larger drama.”<sup>18</sup>

Figure 3.25- Sector 17, Chandigarh



Figure 3.27- Water Fountain, Sector 17, Chandigarh



Figure 3.26- Water Fountain, Sector 17, Chandigarh



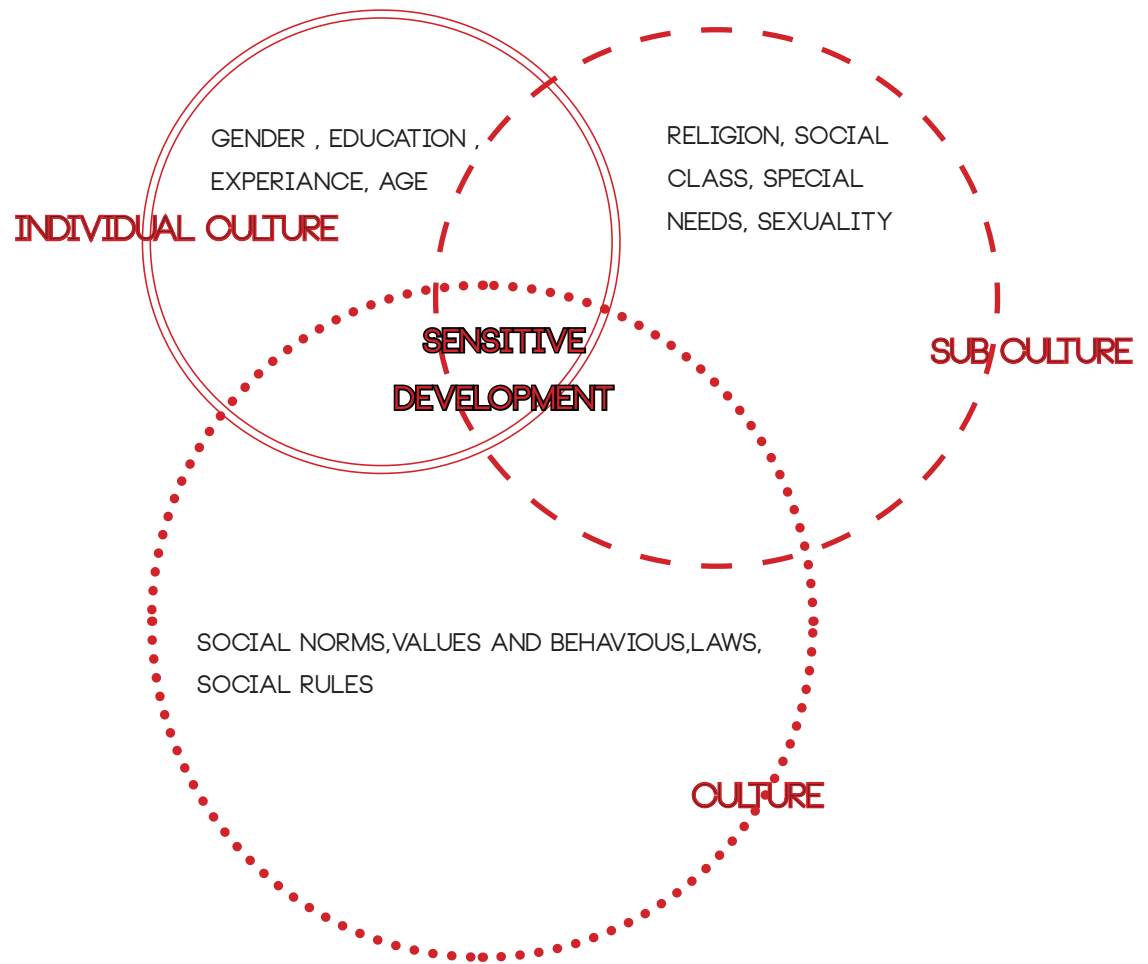
Figure 3.28- Neelam Theatre, Sector 17, Chandigarh



Figure 3.29- Sector 17, Chandigarh

### 3.4 Culture and Chandigarh

The understanding of the culture of a city can be used to create a more robust planning for the future. Culture can now be seen as a way to access the needs and demands of a society. It is the culture intangible or tangible that differentiates one place from the other. Understanding the culture of a place and the factors that affect it can provide us with a foundation for a more sensitive development.<sup>19</sup> The culture of Chandigarh definitely is a very fundamental part of the city; it reflects the blends of different cultures with in the country. It is a land with affluent past and houses people from different races and classes, which exist in perfect harmony with each other. The rich culture of the city stands as a testimonial of its multi-ethnic population. In fact, the diversity in the land only seeks to add to its profuse cultural heritage. It can be attributed to the fact that Chandigarh has attracted people from virtually all parts of the country. It houses several Central Government institutions, branches of almost every national bank and research institutes.



**Figure 3.30-** Factors affecting cultural diversity in a region  
Source Greg Young

19- Young, Greg. Reshaping Planning with Culture, 2008.

Also the large establishments of the air force and army add to Chandigarh's diversity. This explains the reason for Chandigarh being a land of multicultural people.

Chandigarh is a home to artists from all genres, from world-renowned photographers like Raghu Rai to local glass blowing artist like Japneeth Keith. Adding to that Chandigarh is internationally famous for being the roots to Music and dance groups like Red Baarat, international Bhangra Empire and many more. Even though Chandigarh harbors such a wide variety of activities and talent, there is not a space where these activities could take place in a public domain. The facilities that the city has are either dilapidating and outdated or so expensive that they are not affordable. Apart from that it seems like every museum in Chandigarh is about the city and no place for where the people can express themselves.

It is important to give the citizens the facility to express their culture for the city to maintain its character and continue growing. This is the next step for the growth of Chandigarh and will fundamentally play a crucial role in bringing all the parts of the city together.



**Figure 3.31-** Love for street food,Punjab  
Source- The Hindu



**Figure 3.32-** Dance group showing traditional dance form in USA.  
Source- The Chandigarh times



**Figure 3.33** (Bottom two) work of young artist from the Architecture College  
Source- The Indian Times





Figure 3.34- work of different artists in Chandigarh



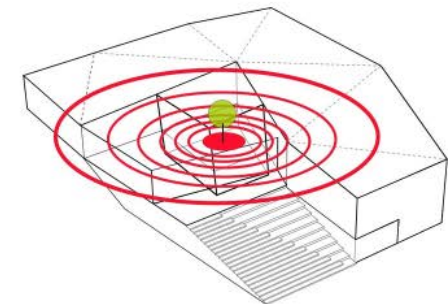
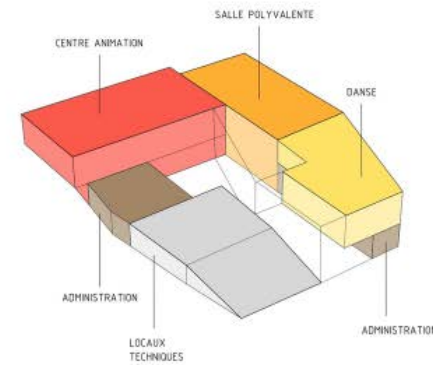
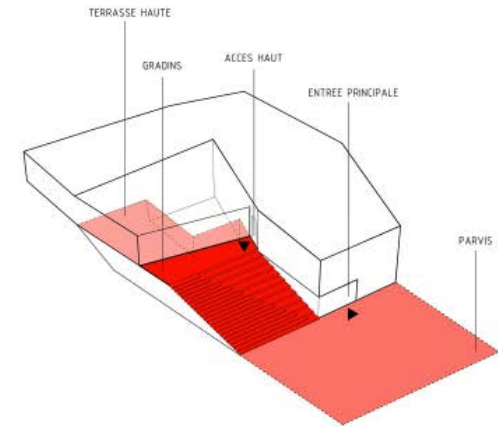
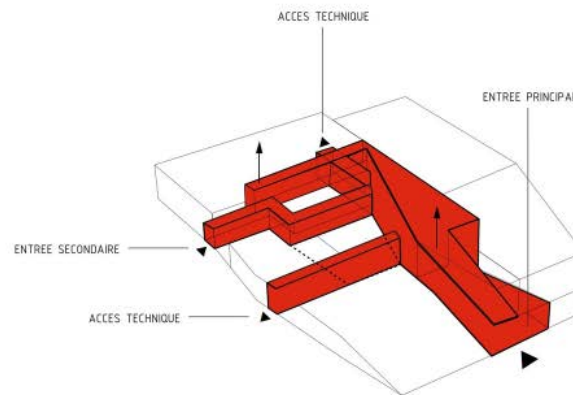
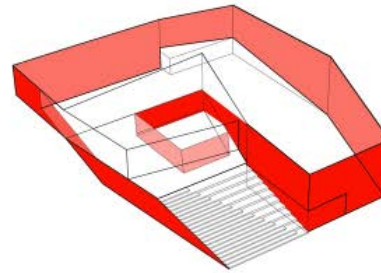
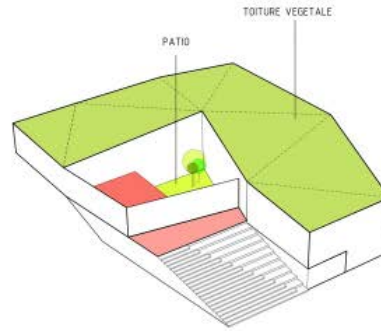
**3.5 Case Studies and Conclusions**  
**3.5 Cultural Center | Nevers France**  
**Ateliers O-S Architects | 2012**



The site is located in Nevers in France the location of the site for development into a cultural center was a very challenging task, as it was surrounded with all existing heritage buildings. The principles of density and generosity of the space were to be considered at the same time. With dealing with Nevers as a very cluttered city, with an interesting history of being a sports town, famous for formula one racing and wine yards. The idea behind was that the Cultural Center should be so designed that it uplifts and boosts the very identity of Never.

The location of the cultural center is such that to the west and south are renovated houses, to the east are newly constructed housing and to the north it is surrounded by the Avenue Lyautey ,thus influencing the configuration of the public space.

The concept of the cultural center has two main elements, the lighting and the cohesion. The internal patio concedes the light and the two level structure brings in the cohesion, which is the heart of the design. Broad and open staircase, wide and double height wall conveniently connect both the levels.



**Figure 3.36-** Cultural centre Nevers  
Source- Cecile Septet

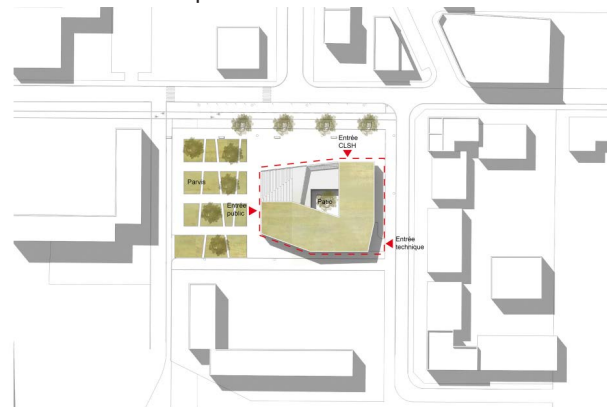
**Figure 3.37-** Cultural centre Nevers conceptual diagrams  
Source- Ateliers O-S Architects



**Figure 3.38-** Cultural centre Nevers  
Source- Cecile Septet



**Figure 3.39-** Cultural centre Nevers  
Source- Cecile Septet



**Figure 3.40-** Cultural centre Nevers site plan  
Source- Ateliers O-S Architects

The rooms on the ground floor are very well lit because of the openings on the façade. Circulation is organized around the central patio, activating the space from all sides. The wooden cladding hides and camouflages the concrete structure, giving an environment friendly appearance.<sup>21</sup>

### CONCLUSION

The design of this cultural center evolves from the existing surroundings, fits into the space available and enhances the identity of the city. Chandigarh has a somewhat a similar case study in sector 17. The open space where a cultural center could be planned is lined with concrete structure surrounding the space. The town does not have anything of this nature providing for halls, multipurpose rooms, dance halls, educational and childcare rooms. Sector 17 is the heart of the city. An organized pre designated space will utilized the otherwise dilapidating spaces and bring life to that part of sector 17 which becomes quiet during the day due to the heat and after working hours.



**Figure 3.41-** Cultural centre Nevers G.F plan  
Source- Ateliers O-S Architects



**Figure 3.42-** Cultural centre Nevers  
Source- Cecile Septet



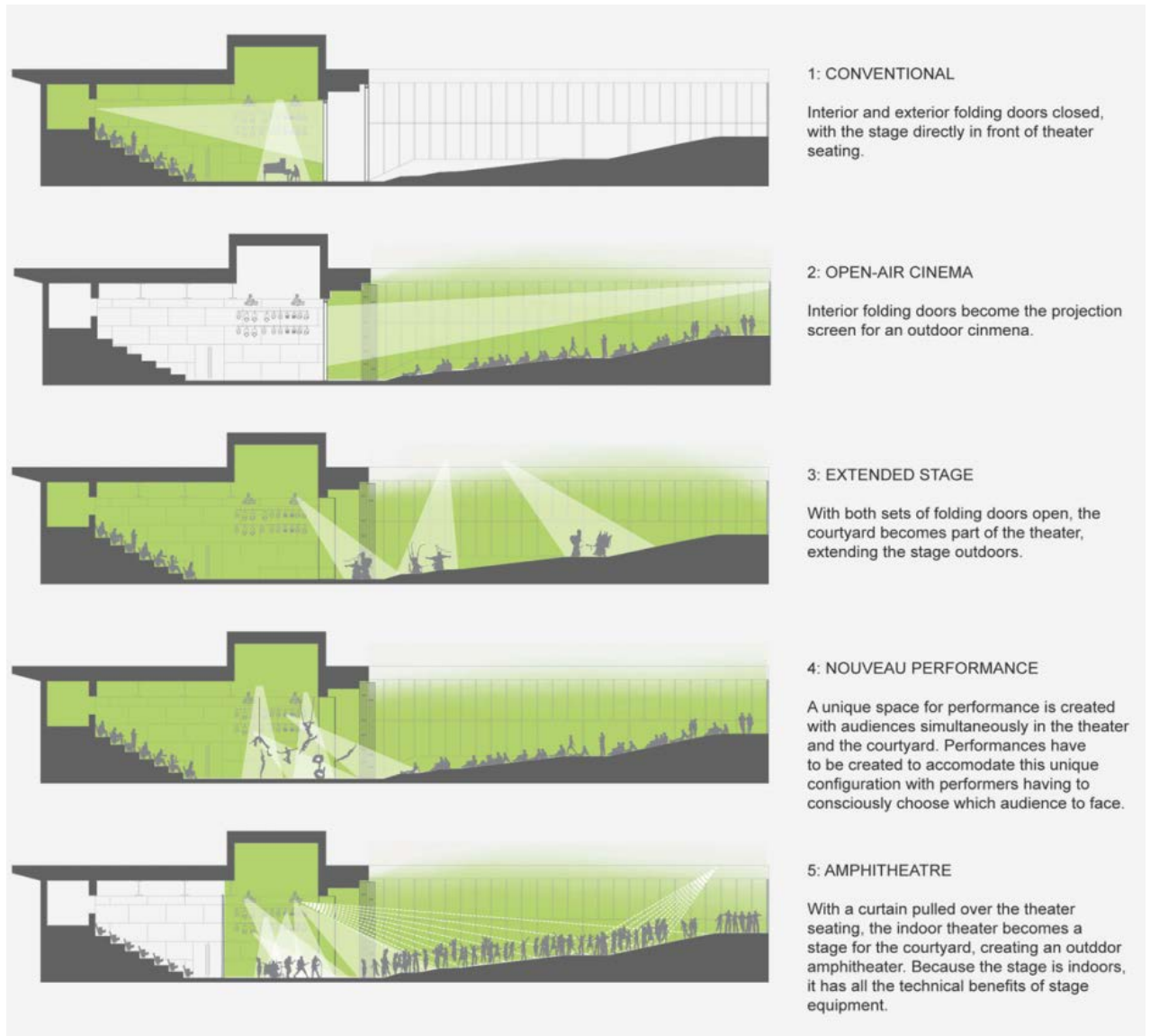
**Figure 3.43-** Cultural centre Nevers  
Source- Cecile Septet

3.5 b Gehua Youth and Cultural Center | Beijing, CN  
Open Architecture | 2010



This cultural center located in the seaside town of Beidaihe, China. In this example, the needs of the present day society have been taken into consideration and accordingly a connection between open spaces, preservation of nature and the building have been beautifully synchronized. The noisy madness of the town and the chaos of the city are kept at bay by the open design. The space has been worked on the requirements to include a theater, galleries, activity areas, DIY, café, a bookstore. The vision is to preserve the nature in connection with the building sinking into the folds of native landscape, keeping the diversity and spatial qualities alive. The spaces are created such that there is a constant dialogue between the indoor and outdoor spaces. The spaces are designed that they give flexibility to both indoor and outdoor activity thus utilizing space effectively. Large crowds are hosted in the central courtyard with an extension of the theatre as a part of the landscape with the roof of building covered with green spaces. The free flow relationship between the indoors and outdoors caters for the seasonal changes, which are very extreme in this climate.

**Figure 3.44-** Gehua youth and cultural centre  
Source- Xia Zhi  
24



**Figure 3.45-** Gehua youth and cultural centre program flexibility section  
Source- Open Architecture



**Figure 3.46-** Gehua youth and cultural centre  
Source- Xia Zhi



**Figure 3.47-** Gehua youth and cultural centre  
Source- Xia Zhi



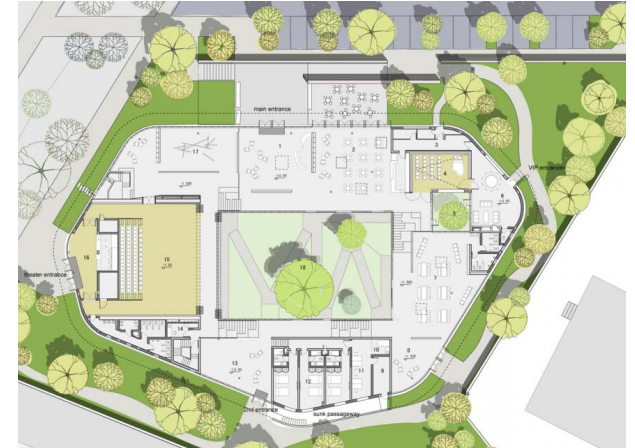
**Figure 3.48-** Gehua youth and cultural centre site plan  
Source- Open Architecture

The theatre's flexible design enables it to transform into a large arena. The structural intervention is very simple with small folding doors at the rear of the stage, when opened, merge into the courtyard converting the into a large performing arena. This flexibility in the design enables the performers to dance both inside and outside. The spectators enjoy the surprise and a unique experience. The occasion demanding, the courtyard along with the merging slopes can be converted into an open air cinema/auditorium.<sup>21</sup>

#### CONCLUSION

The main concept of preserving the nature and the free flowing character of space from indoors to outdoors creates a flexibility in design. This in turn caters for a variety of activities, typologies and scale of performances. The design also focuses on seasonal changes, which can be severe in China, by making it a usable space all year round. In the context of Chandigarh the preservation of nature theme could be like an oasis in the desert of concrete box like structures. Space, not really being a constraint in sector 17 could be utilized to maintain the free flow of space from the indoors to the outdoors linking the heart and soul of Chandigarh together by bringing the green spaces inside the city center.

21- ArchDaily, 2009



**Figure 3.49-** Gehua youth and cultural centre G.F plan  
Source- Open Architecture



**Figure 3.50-** Gehua youth and cultural centre  
Source- Xia Zhi



**Figure 3.51-** Gehua youth and cultural centre  
Source- Xia Zhi

3.5 c Elena Garro Cultural Center | Mexico City Mexico  
Architecture 911C | 2012



The center stage for the Elena Garro Cultural Center, Mexico City was an existing 20th century house. The challenge was to work on the existing structure and renovate the existing structure in order to maintain its historic integrity and at the same time make a modern statement. A bookstore was incorporated and space for cultural activity was created. The cultural center is located on Fernandezial Street, which suggested the extent of the mix of the past and the present. Though the original façade of the existing structure is maintained the structure has three distinct sections or parts. The boxed concrete extends towards the street, creation of a pathway which leads into a number of courtyards facilitates gatherings of variable sizes and the backyard of the house is converted into a rectangular, three storey box housing a multipurpose room, parking on the ground floor and storerooms in the three levels. The mix of concrete and glass gives the building the modern appearance, supported by the old existing structure around which the building has evolved, creating an interesting mix of the present and the past.<sup>22</sup>

**Figure 3.52-** Elena Garro Cultural Centre  
Source- Jaime Navarro

22- ArchDaily, 2013



**Figure 3.53-** Elena Garro Cultural Centre physical models  
Source- Architectura 911C



**Figure 3.54-** Elena Garro Cultural Centre  
Source- Jaime Navarro



**Figure 3.53-** Elena Garro Cultural Centre G.F plan  
Source- Architectura 911C  
28

## CONCLUSIONS

In most of the adaptive reuse projects the challenge is to save the old structure and develop a modern day architectural aesthetics, thus drawing a balance between the past and the present. In this cultural centre the century old structure has been the centre stage and the complete conversion to the modern day cultural centre evolves around. The rectangular box shapes, open pathways and courtyards for gathering of various sizes enables the preservation of the old architecture. The concrete boxes with glass bring the cultural centre abreast the modern times, preserve the environment and greenery around the 20th century house. In Chandigarh, rectangular box structures of concrete are the theme of sector 17 buildings. A similar structure with glasswork would elegantly fit into the open space for the cultural centre. The ground floor parking was essential to maintain the existing old structure. The bookstore lights up the premises and the activity at the centre, even when the shows are not on. A similar store could enhance the activity in that part of sector 17 and the cultural centre would boost the activity when it lies under utilized. In Chandigarh the parking could be planned in the basements, enhancing the space for cultural activity by activating the plaza.



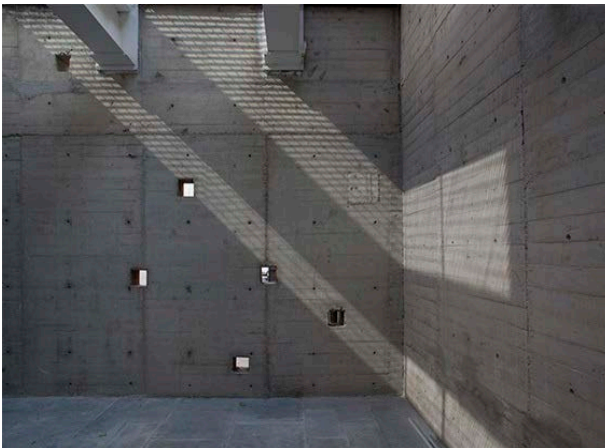
**Figure 3.56-** Elena Garro Cultural Centre  
Source- Jaime Navarro



**Figure 3.57-** Elena Garro Cultural Centre  
Source- Jaime Navarro



**Figure 3.58-** Elena Garro Cultural Centre  
Source- Jaime Navarro

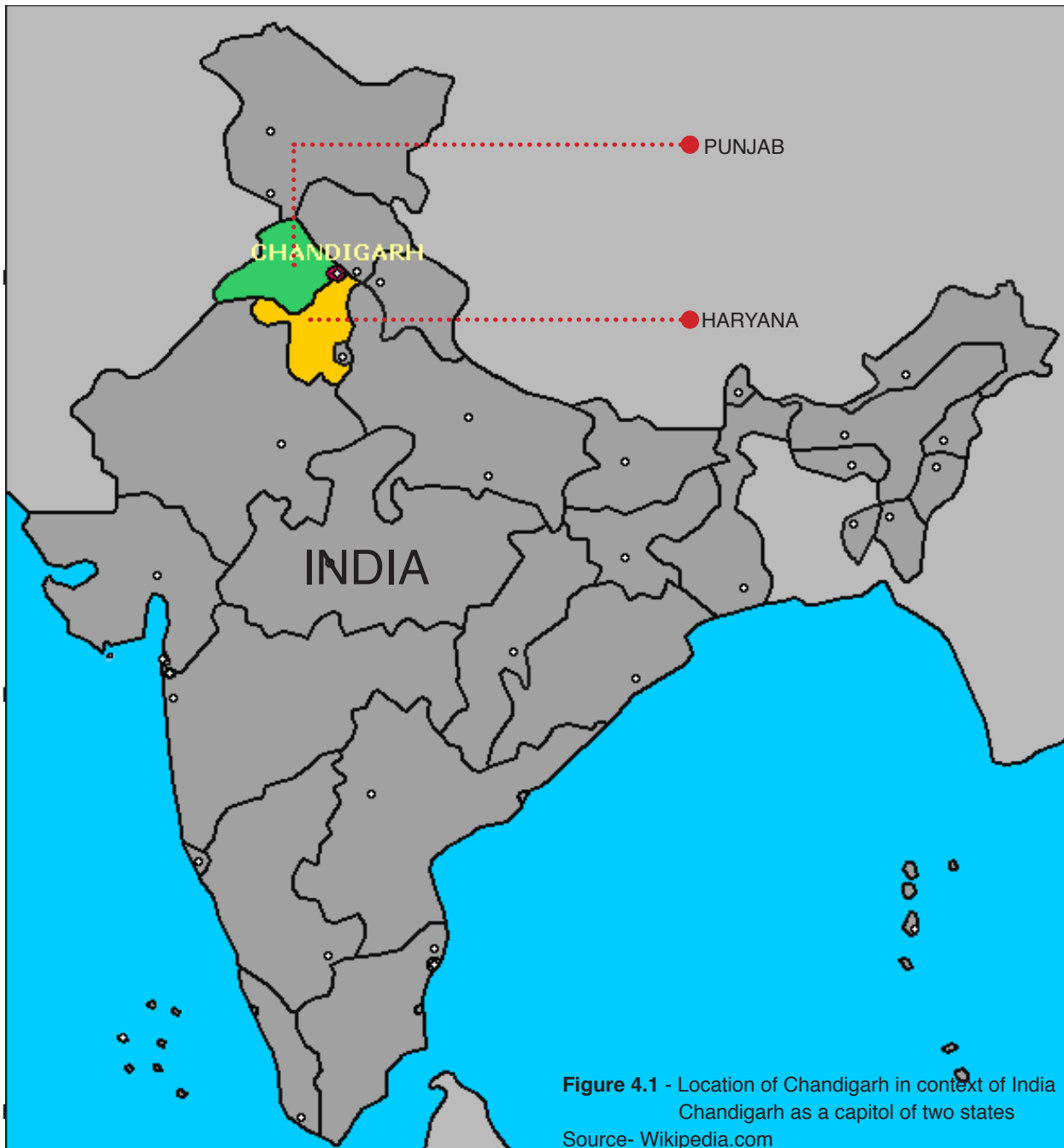


**Figure 3.59-** Elena Garro Cultural Centre  
Source- Jaime Navarro



**Figure 3.60-** Elena Garro Cultural Centre  
Source- Jaime Navarro

## 4. Methodology and Preliminary Findings



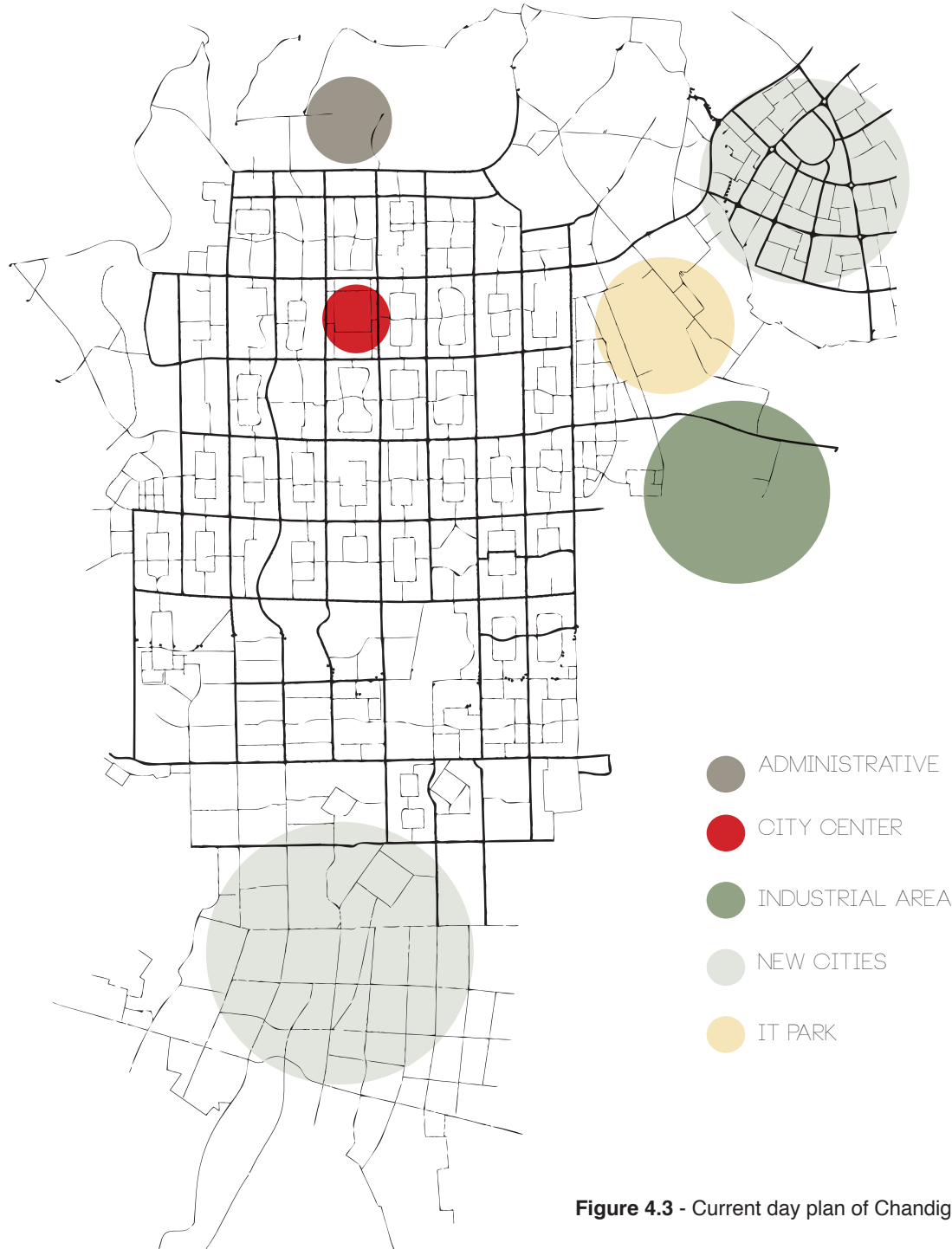
### PROBLEM STATEMENT

Despite its explicit design as a modern visionary city, Chandigarh still lacks a cultural centre for its people. It needs a place where the local as well as international artist, will have a opportunity to express themselves and connect with the masses. The presence of such a facility would inturn affect the identity and heritage of the region. Public space needs to be continuously reinvented, based on the way the society is growing . The new development should cater for the needs of the city. This need has created a possibility of creating such a space in Chandigarh. This investigation so far has looked at the design ideologies of Chandigarh, cultural heritage of the region, and some successful case studies. And will now focus on studying the city centre in terms of density, circulation, active and passive zones as well as needs of the users. The cumulative of this analysis will lead to an intervention that would add to the cultural expression in the city.

## 4.1 Site Analysis



Figure 4.2 -Map of Chandigarh showing its growth in 2012



**Figure 4.3** - Current day plan of Chandigarh

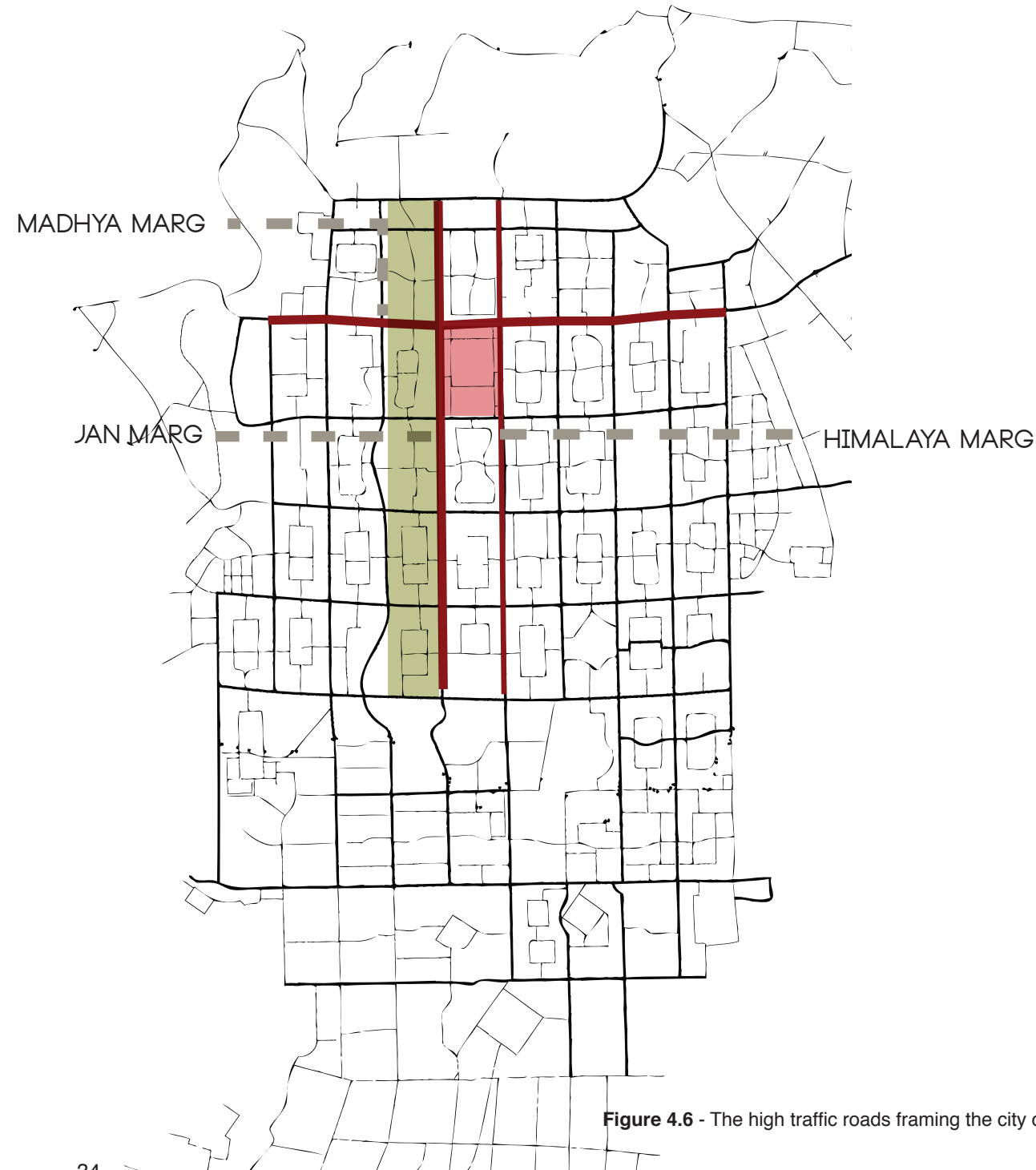
After over 60 years since its creation Chandigarh has boomed over the years. The city now caters to two satellite cities similar in population but higher in density. It also now has an IT park growing at its periphery every day and an industrial area creating more job opportunities. Amidst all of this the green strip in the city has been booming. The parks are getting greener providing a refuge from the concrete. These green pockets are the destination for all pedestrian activity, rather the only place for any pedestrian activity. Quite shocking for a pedestrian city that was designed to be the most walkable city in the world. Chandigarh has the maximum no of cars per household anywhere in the country, with an average of 3.25 cars in a family of four.



**Figure 4.4 - The green strip in Chandigarh**



**Figure 4.5 - Green pockets in Chandigarh**



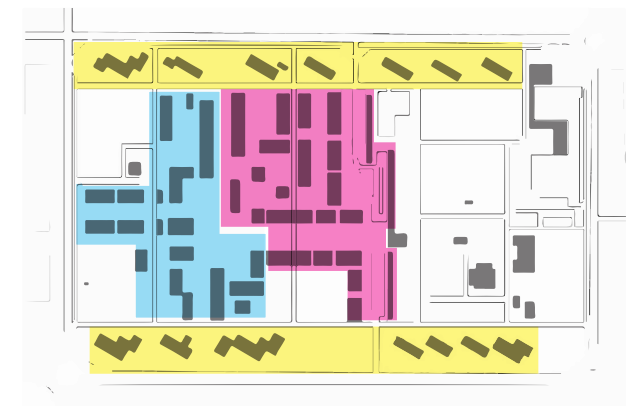
**Figure 4.6 - The high traffic roads framing the city centre**

Madhya marg , jan marg and himalya marg are one of the most hevily traficed roads in the city. And their interseptions creates highly populated car junctions. And this is what frames the heart of the city. Sector 17. Even though Sector 17 is adjacent to the biggest green strip in the city less than 5% people actually walk to the city centre. There is a very strong disconnect between the heart and the soul of the city. The strongest green node in the green strip is adjacent to the city centre creating a potential to link the heart and the soul of the city



Plaza 1 in sector seventeen is the acts as the northers area buss terminal hub and also as a parade ground for special events  
 Plaza 2 is surrounded by retail buildings and is the commercial plaza  
 Plaza 3 is the institutional plaza that currently lies abandoned with no to very little public activity. The plazas are hard landscaped with concrete, with trees placed as green nodes which act as a relief from the heat. The plaza 2 and 3 are disconnected from plaza 3 by a V3 road .

- Retail
- Institutional
- Commercial



**Figure 4.8-** Zoning in sector seventeen

**Figure 4.7-** Location of Green nodes and plazas in sector 17



Figure 4.9- Access into plazas

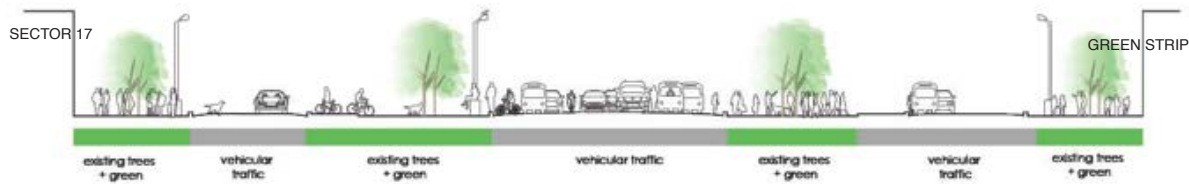


Figure 4.10- Main access road section  
Source- Chandigarh Urban Lab

The plazas 2 and 3 can be seen as one plaza, differentiated by type of activity happening in the plazas and around it. The red arrows mark the main entries into the plazas. The building framing the plaza also has covered slits between them allowing movement underneath it, marked in yellow. These transition spaces are now a home to a lot of small scale street side business from shoe shine, to food stalls to accessories. The condition for the two main road networks is a little similar in scale and density, Madhya Marg having higher vehicular traffic due to the access to the bus station in plaza 3 is from it.



Figure 4.11 Pedestrian connection between plaza 2 and 3

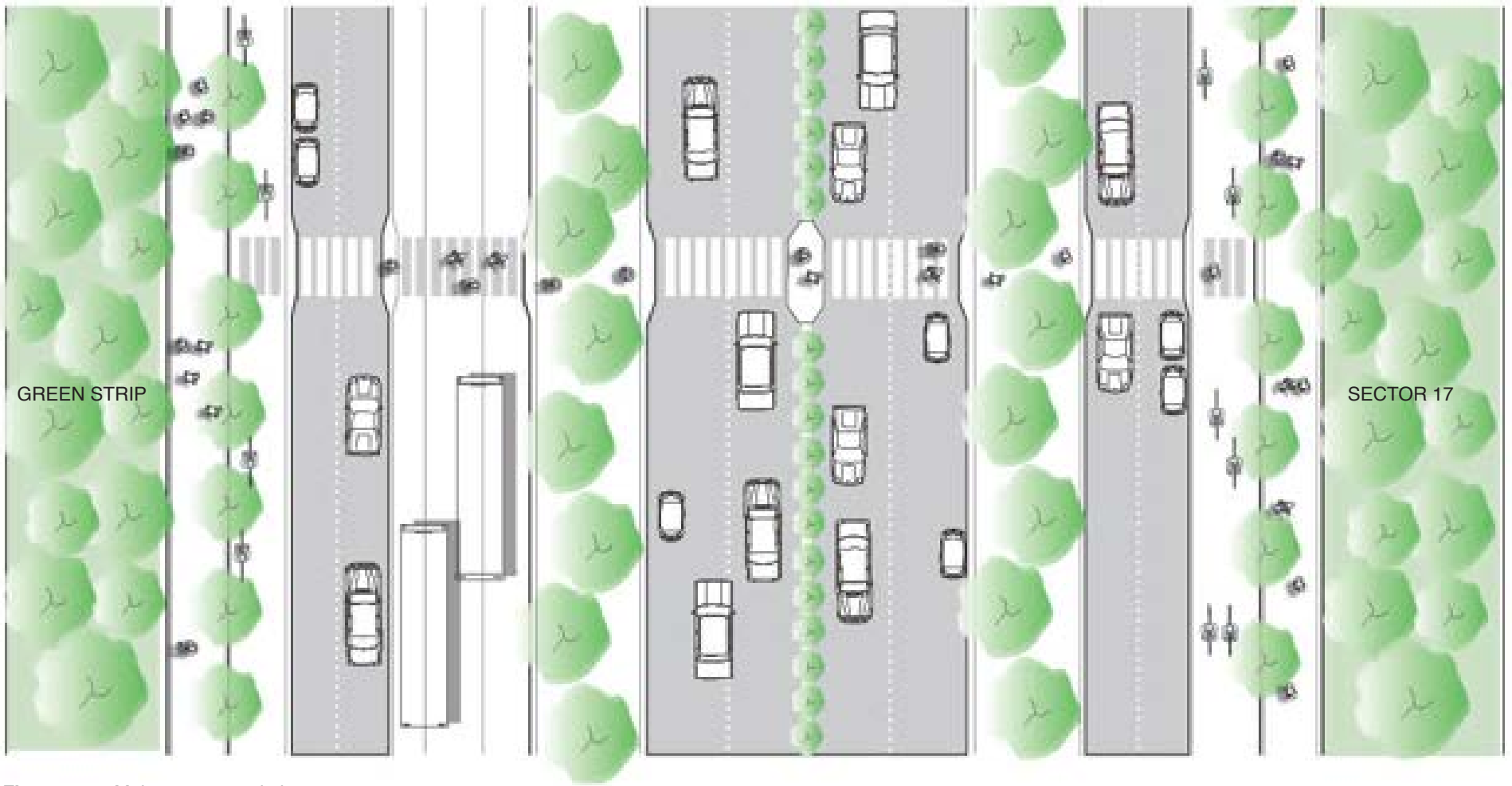
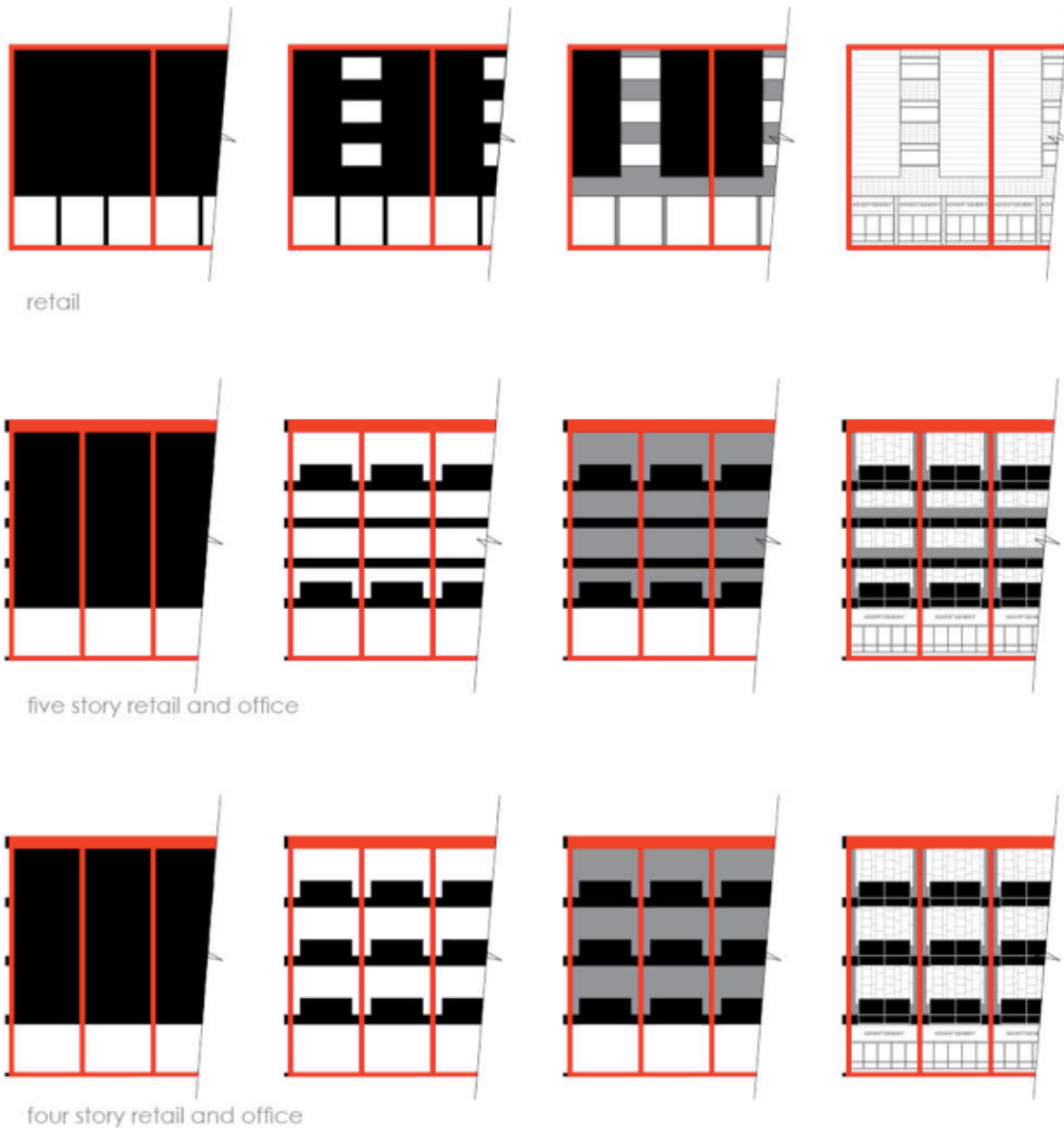


Figure 4.12 Main access road plan  
 Source- Chandigarh Urban Lab



The maximum height for the buildings surrounding the plaza is restricted to 57'-7". Sector seventeen follows a strict grid of 17'-3"X 104'-11", and each of these bays have a strict frame control as seen in the adjoining diagram. This in turn has created a controlled facade system throughout the sector. Over time the insides of the buildings have altered due to the different types of activities ranging from high end retail stores to restaurants to bars and night clubs.

**Figure 4.13** Frame Control in Sector 17  
Source- Chandigarh Urban Lab

## Retail



Figure 4.14- Retail Zone



The retail zone comprises of Retail outlets, Restaurant, Bars and clubs.

## Civic



**Figure 4.15-** Civic Zone, the notary



**Figure 4.16-** Civic Zone, the bank square

The Civic zone comprises of banks, Town hall, notary and PTT building

## Public/Entertainment



Figure 4.17- Public/Entertainment Zone, Neelam Theater



Figure 4.18- Public/Entertainment Zone, KC theater, now a cineplex



Figure 4.19- Public/Entertainment Zone, City Library

The Public/Entertainment zone comprises of theaters, the city library and cineplex.

## Plazas



Figure 4.20- Plazas



Figure 4.21- Activity bar

As one moves from plaza 2 towards plaza 3 there is a considerable decrease in activity. There is little to no activity by the time we get to the end of plaza three. Also the activity in plaza 2 is concentrated in either the green shaded areas or the circulation corridors for the retail zones. The maximum being in the retail corridors, and then some under the shade of the tress, the plazas is extremely under used during most of the day due to heat and lack of occupiable space.

Maximum Activity



Figure 4.22- Retail Plaza



Figure 4.23- Green nodes



Figure 4.24- Retail Corridor

## Issues



Figure 4.25- Retail Plaza

1. Non utilized basement parking
2. Plaza used for parking
3. Plaza devoid of human activity 70% of the time
4. All activity concentrated in plaza 2 and none in plaza 3



Figure 4.26- Plaza 3



Figure 4.27- Plaza 3



Figure 4.28- Retail Plaza

## Reasons

1. Non utilized basement parking due to poor condition
2. Plaza used for parking due to an absence of an alternate system
3. With a temperature range of 80 to 110 for 9 months a year the open concrete plaza lacks the required comfort zone.
4. There is an absence of activity in plaza 3 as it lacks any infrastructure that would encourage people to venture outside the realm of retail. It is only used for parking by the officials who work there



Figure 4.29- Abandoned Plaza

## 4.2 Program Derivation

When sector 17 was designed as a civic commercial centre there was a need to establish it as the destination in the city. For this a 11 storey high P.T.T tower was conceived in plaza 3 with a foot print of around 260,000 square feet. This building was envisioned to be the tallest building in the city limits with the Capitol complex buildings being an exception. Reason for this was to establish the hierarchy of spaces, the head (the Capitol complex) being the tallest and then the Civic Commercial following closely. Due to financial constrains the building never got built, but the program for a P.T.T centre was absorbed by other buildings framing the plaza 3. The foot print was designed strategically such that it would act as in destination for the path like plaza. The Neelam theatre would be framing the start of the plaza on one end and the P.T.T tower would be the guiding landmark encouraging movent throughout the plaza, activating it in its entirety. The site footprint is such that it is located at the intersection of the two most prominent zones, retail and institutional. Also it is at the intersection of all the different converging plazas and pedestrian streets. It also has a access to the green strip running right adjacent to the site.



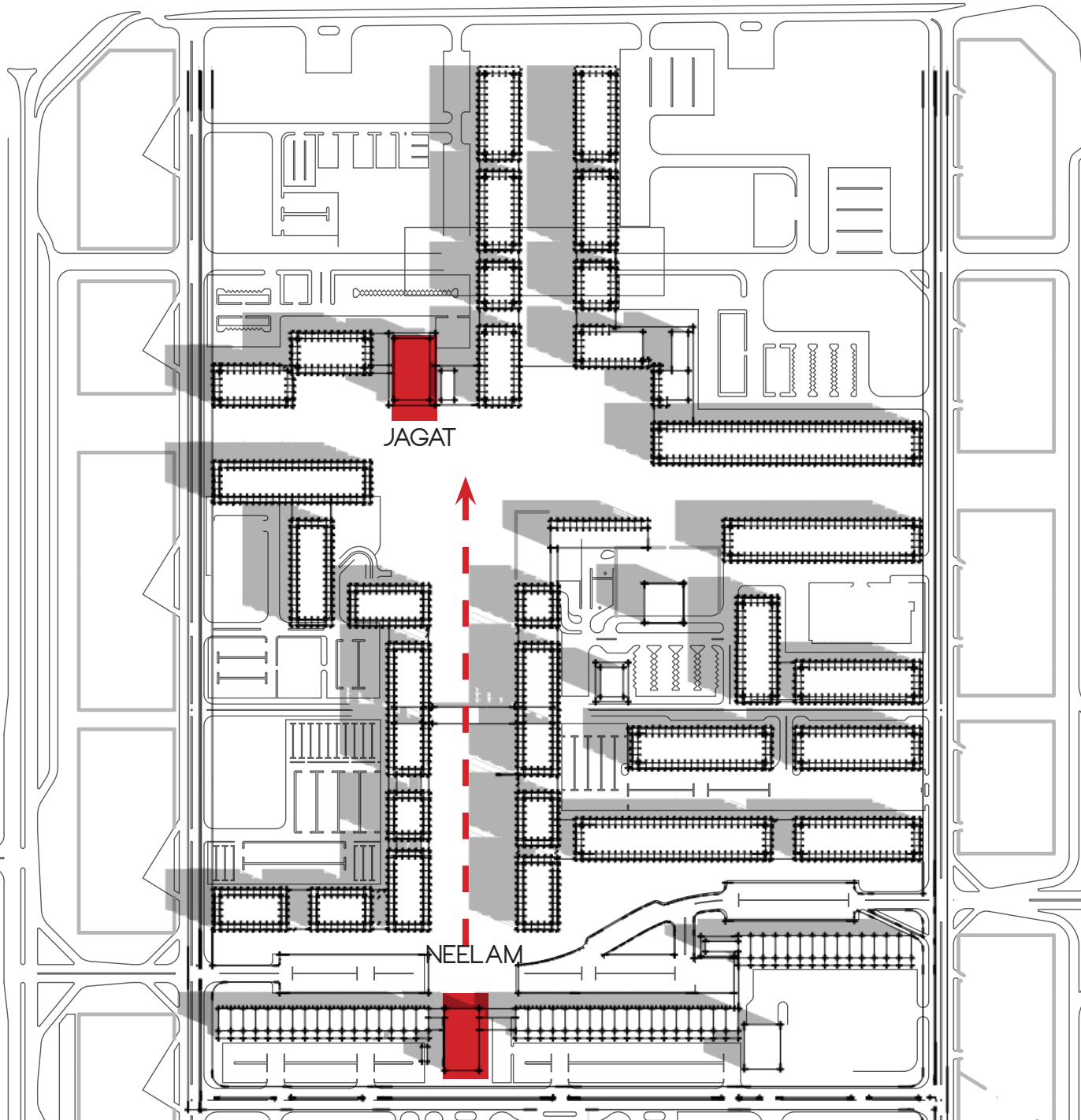
Figure 4.30- Site conditions



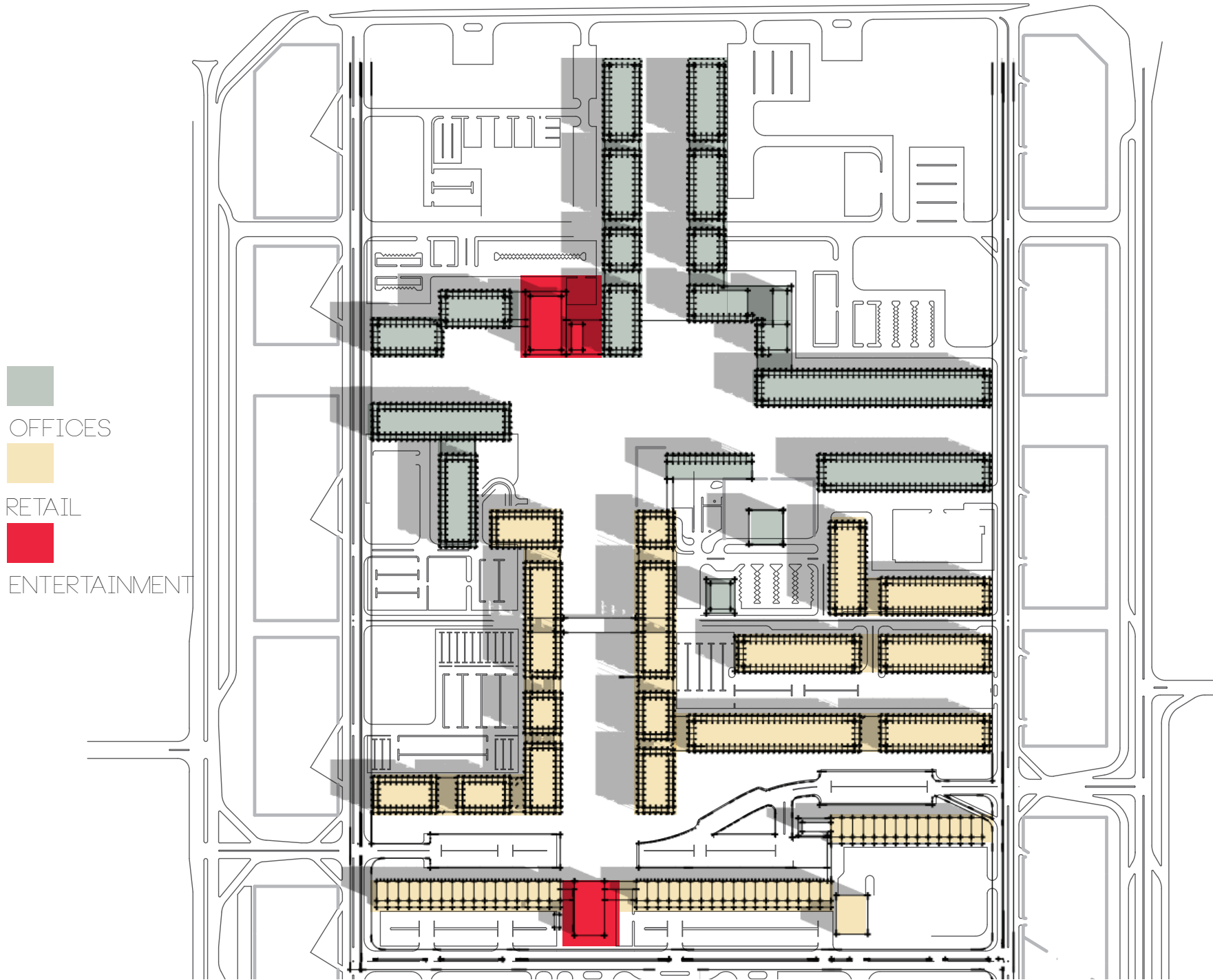
Figure 4.31- Pedestrian access to site from retail plaza



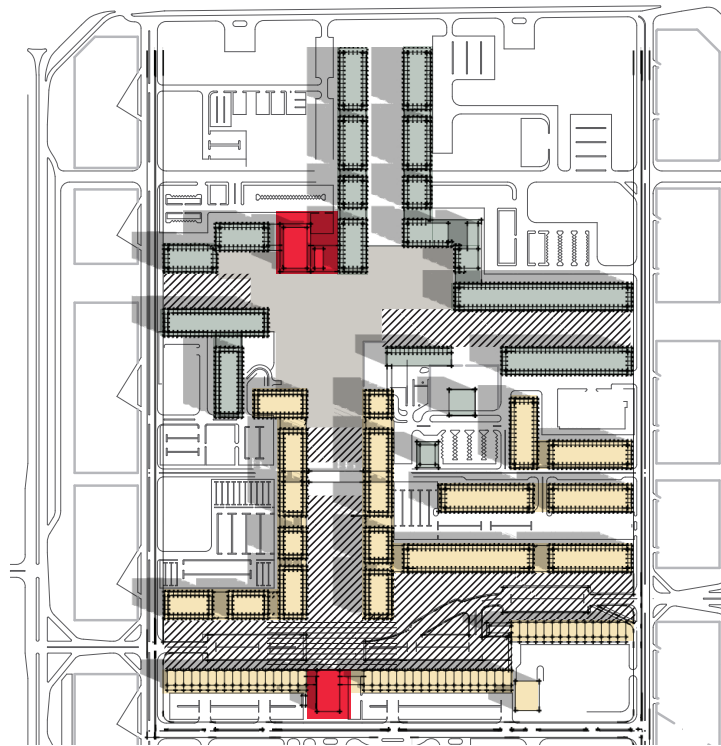
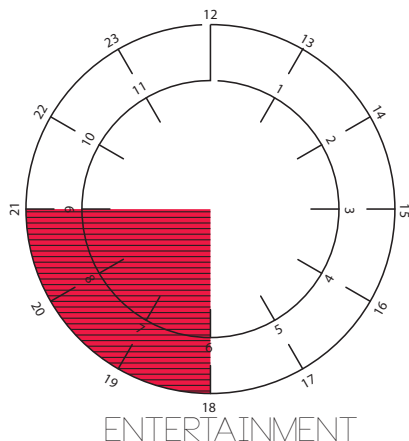
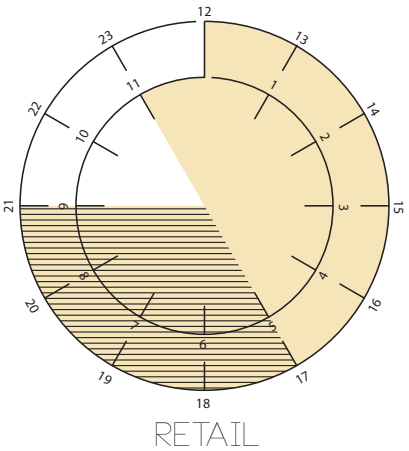
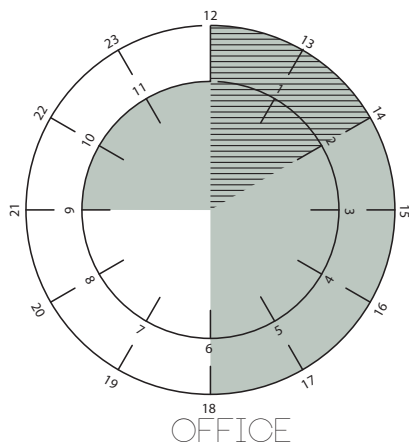
Figure 4.32- site conditions, Adjoining Buildings



The envisioned flow of people from Neelam to Jagat cinema was the big iconic move in the design of the people's plaza . Where these buildings act as the icons for the city centre. They were supposed to be the landmarks guiding and navigating people. With Jagat being turned into a retail building in the hope of drawing people in and Neelam Dilapidating every day. With a capacity of 800 people only gets around 25 to 30 per showing. It is clearly evident that the city centre needs a new destination a makeover.



48 **Figure 4.34-** The program division



**Figure 4.35 -** The dead zones not being activated by building activity

The envisioned flow of people from Neelam to Jagat cinem was the big iconic move in the design of the people's plaza . Where these buildings act as the icons for the city centre. They were supposed to be the landmarks guiding and navigating people. With Jagat being turned into a retail building in the hope of drawing people in and Neelam Dilapidating every day. With a capacity of 800 people only gets around 25 to 30 per showing. It is clearly evident that the city centre needs a new destination a makeover.

**Figure 4.35-** The plaza usage

**AFFORDABLE  
TREES**



**SHADE FROM THE HEAT**

**NO CARS**

**PEDESTRIAN**

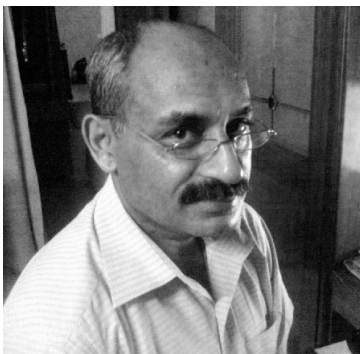
**AFTER 8 PM ACTIVITIES**



**GREEN CENTRE FOR  
THE GREEN CITY!!!**

**A RELIEF FROM CONCRETE**

**GALLERY/DISPLAY**



**PERFORMANCE**

**ACTIVATING THE PLAZA**

**ART**



**Figure 4.36-**voices of the locals

Based on the case study analysis and survey of the local people, the next step was to analyze the demographics of people not coming to the city centre and create an incentive for them as well as the whole city to come to the city centre.

**CURRENT DYNAMICS**



**POSSIBLE DYNAMICS**



**Figure 4.37-** Diagram highlighting the issues and possibilities for the plaza

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Figure 4.38- Mapping the Educational Facilities in the neighborhood

## 5. Design Responce

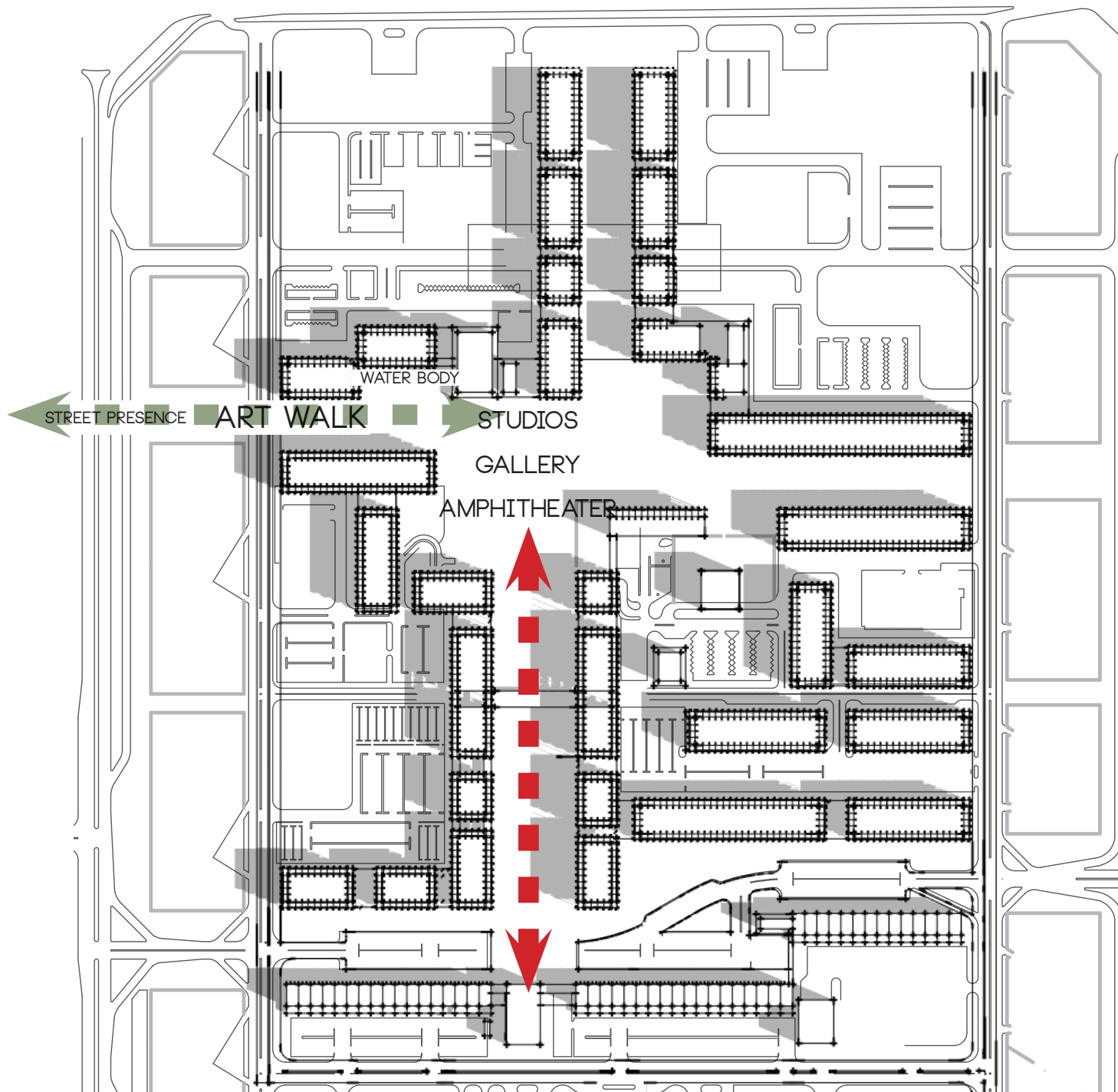
### 5.1 Program Breakdown



Figure 5.1- Program Break Down

The main motivation for this design intervention is twofold: first, giving the city whose backbone is culture a place to explore, experience and implement just that. And activating the plaza in a way that it intertwines with the building programming and is a relief from the other wise concrete setting.

Creating an Amphitheater that could be used to have performances, which would be open to the public, it could also be a place where people could sit and relax. An indoor auditorium for a more formal setting and feeding zones for these spaces being changing rooms, rehearsal rooms office etc. the other key feature will be to have a gallery where artist to show their work. This in another space that could spill out into the public realm and activate the zone further more. The locals have great affinity towards art and culture; all they need is a space to experience it. Which has been missing so far. A gallery Space that would be a combination of indoor out door space will give the artist a place to exhibit for the public. This would be the first gallery in Chandigarh that is not a part of a hotel lobby or a Le Corbusier Museum. Adding landscaping elements in one of the three plazas will create a different space that fits in with the concept of a green city. Climatically this area will be more useful during peak summers, as it will act as a buffer from the heat.



The design intervention takes place on two different axes. The first axis aims at creating a pedestrian access from the green strip bringing the green into the currently concrete plaza. This axis aims at creating a series of interventions along the way leading to the destination. The first intervention is a pavilion creating a street presence drawing people in. The second intervention is to create a boulevard which would create a shaded space for informal sale of art, called the art walk. The next was to create a water element to create a new node of activity unique for Chandigarh. The end for this path will be the destination the amphitheater surrounded by studios and gallery spaces.

The second axis coming from the direction of the Neelam plaza transitions into a green space after crossing the over head bridge facing the sunken amphitheater, acting as a destination to cross the invisible barrier.

**Figure 5.2-** Conceptual Intervention

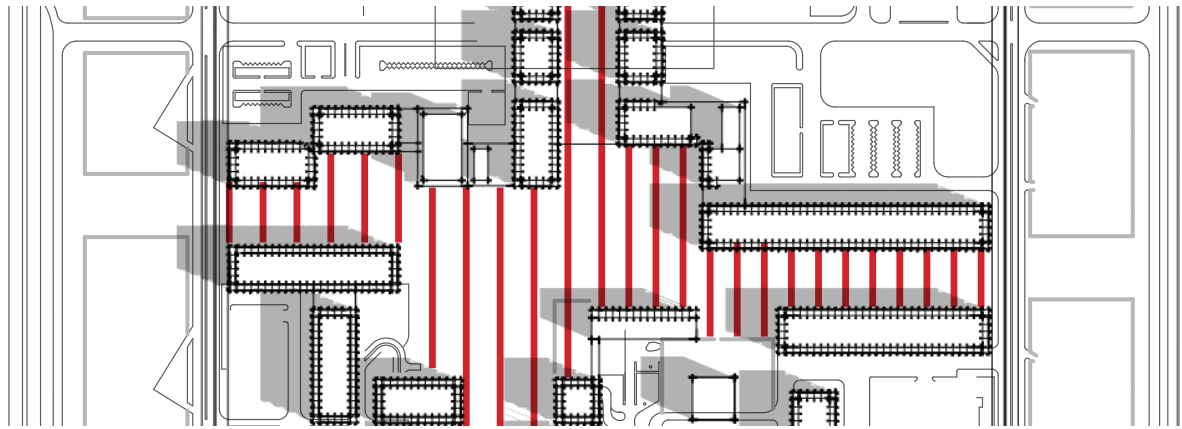


Figure 5.3 - Breaking the plan vertically

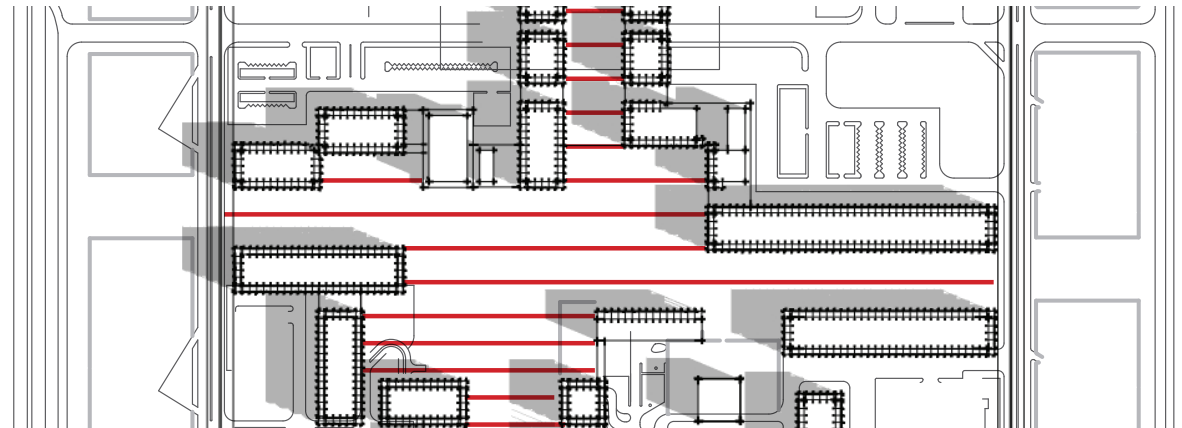


Figure 5.4 - Breaking the plan horizontally

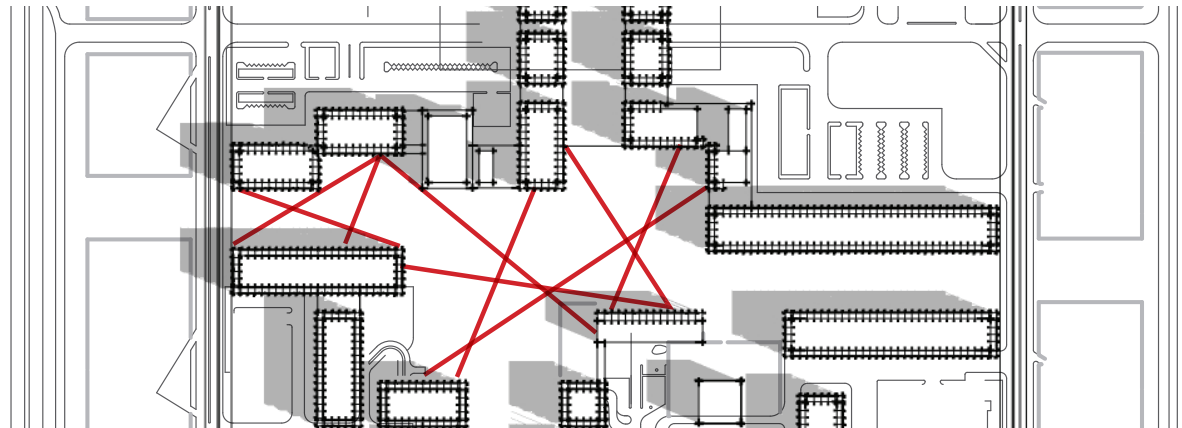
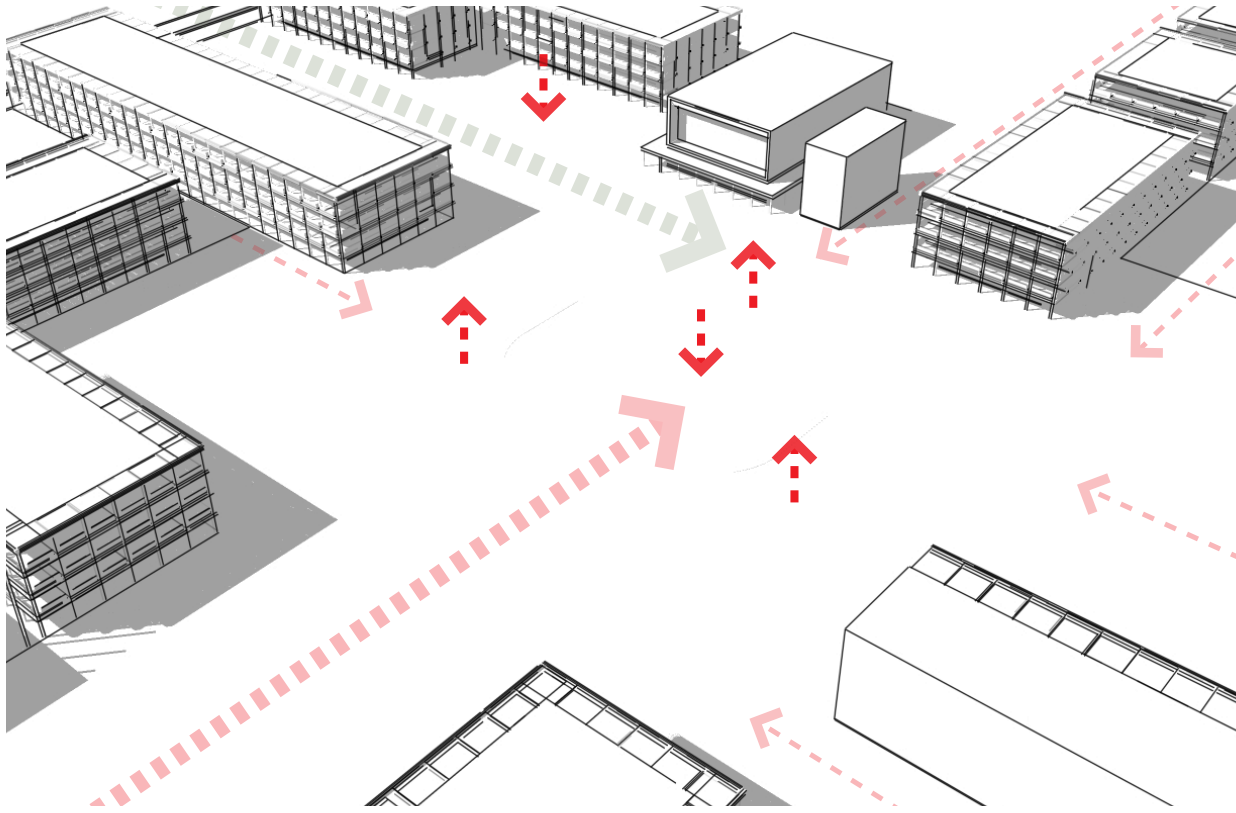


Figure 5.5- Mapping the existing pedestrian paths

The current scale of the plaza leaves a person disoriented and lacks the human scale. The idea is to break the plaza down to human scale by creating more pathways vertically and horizontally and mapping the existing pathways created by people using the space just to get from one block to the other. The result of creating more pathways is that it creates these smaller pocket spaces that give the opportunity to change the concrete nature of the plaza by creating a fusion of green pockets and paved areas.



**Figure 5.6** - Breaking the plaza in volume to create activity nodes

The plaza is also broken down in volume to alter the absolutely flat nature of the existing space. The idea is to create programmed activity nodes at these points of intervention. The first node is a depression along the pathway creating a water landscape breaking the flat ness of the art walk. The next intervention is concentrated around the amphitheater creating these studio spaces recessed into the ground linking them with the site circulation and creating visual connection between the building interventions.

5.2 Intervention

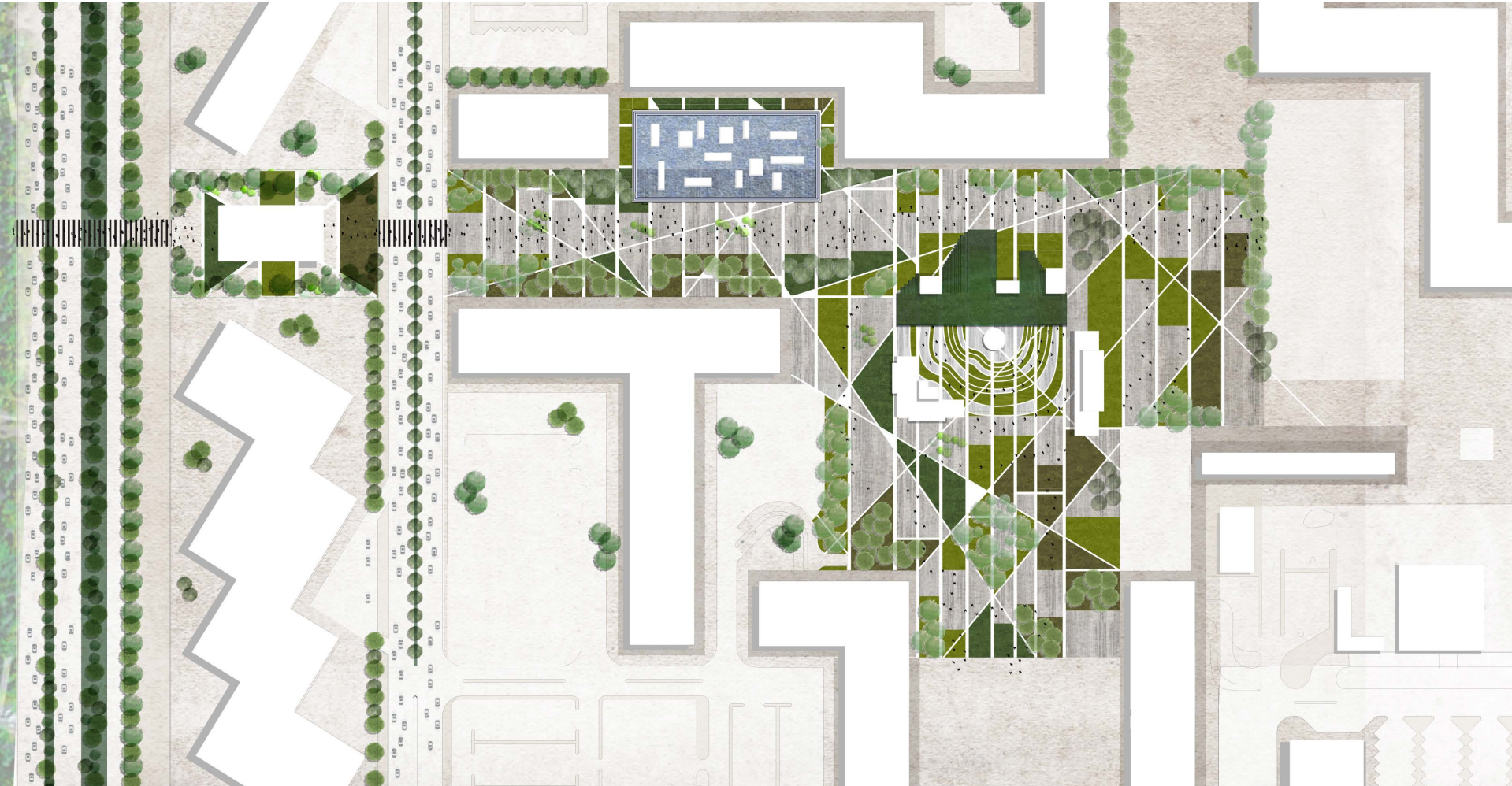


Figure 5.7 - Site Plan



Figure 5.8 - Site Section



Figure 5.9 - Procession 1



Figure 5.10 - Procession 2



Figure 5.11 - Procession 3



Figure 5.12 - Revision 4

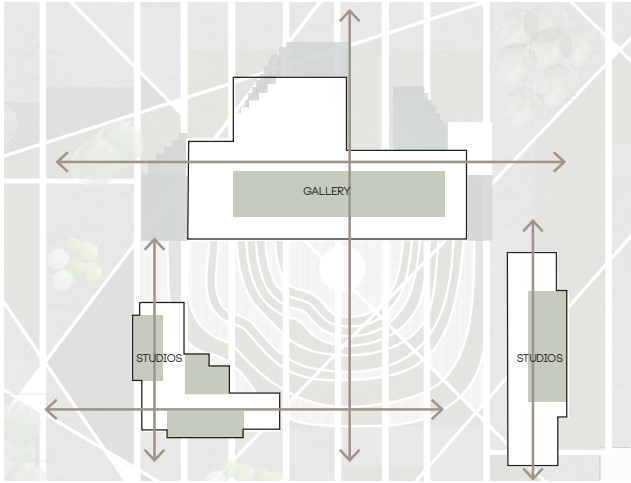


Figure 5.13 - Program Enclosed internally

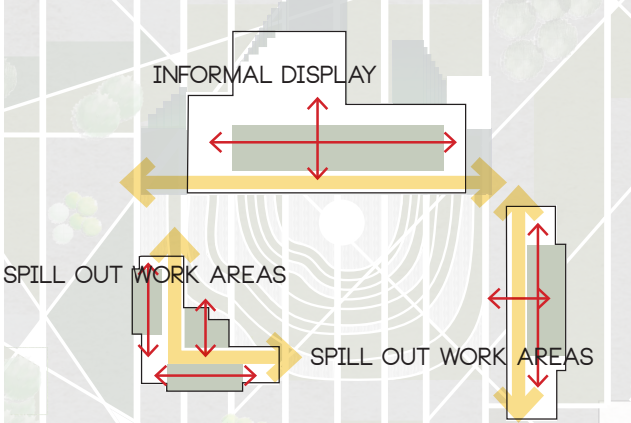


Figure 5.14 - Spill out opportunities lined with site circulation

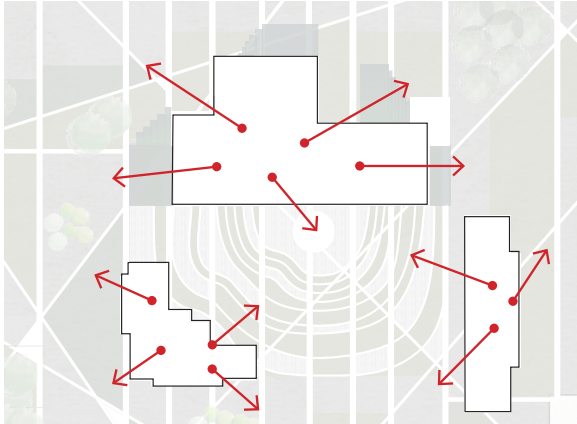


Figure 5.15 - Creating Activity Nodes

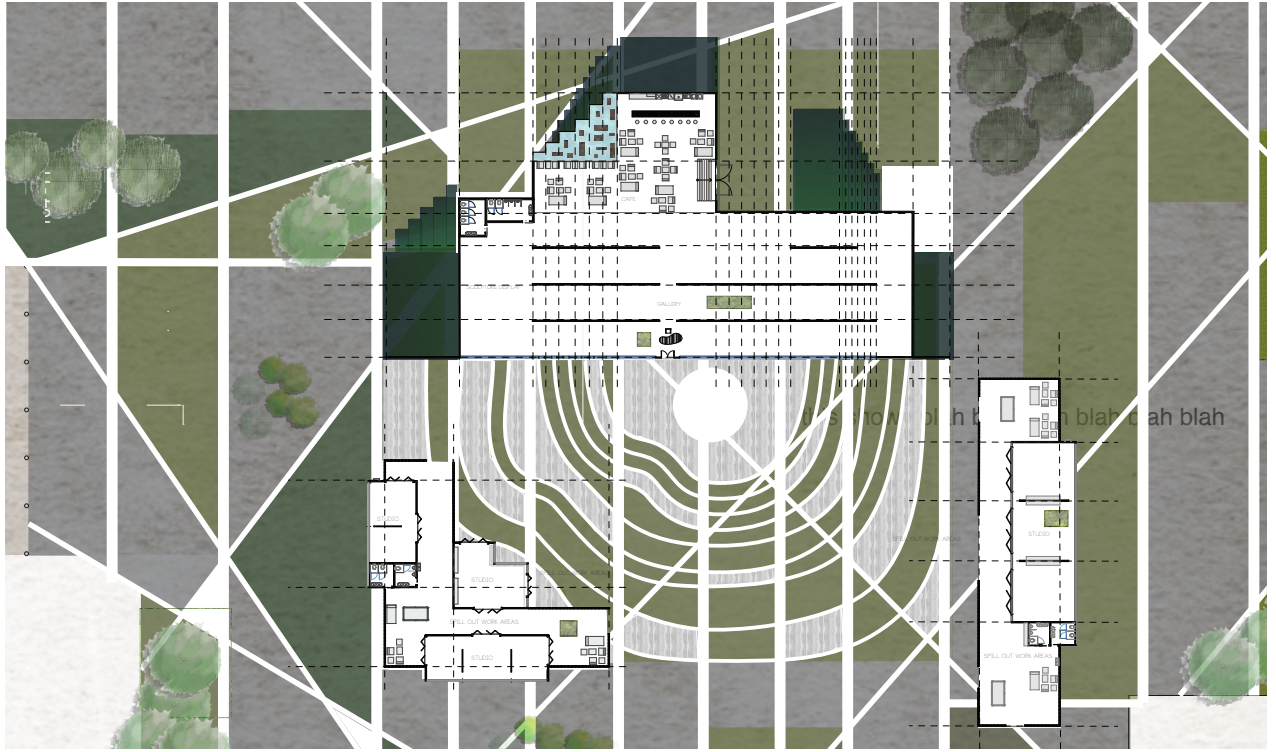
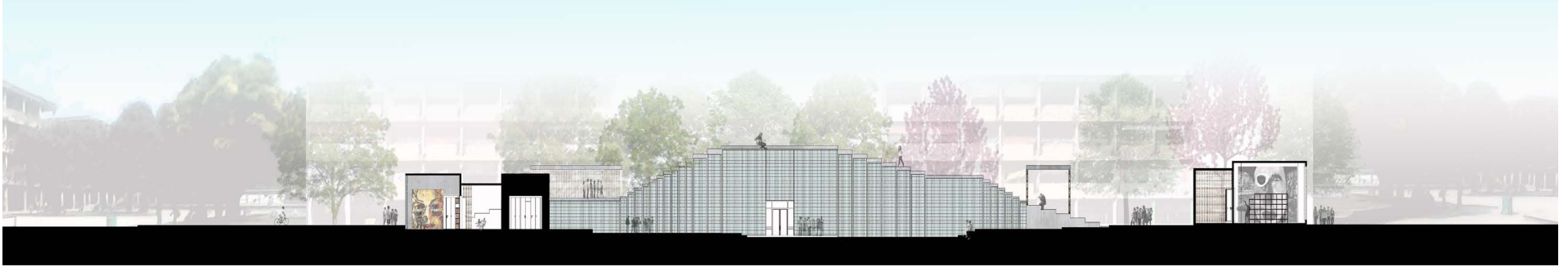


Figure 5.16 - Floor Plan



**Figure 5.17 - Building Section 1**



**Figure 5.18 - Building Section 2**



Figure 5.19 - Night Render Ampitheatre

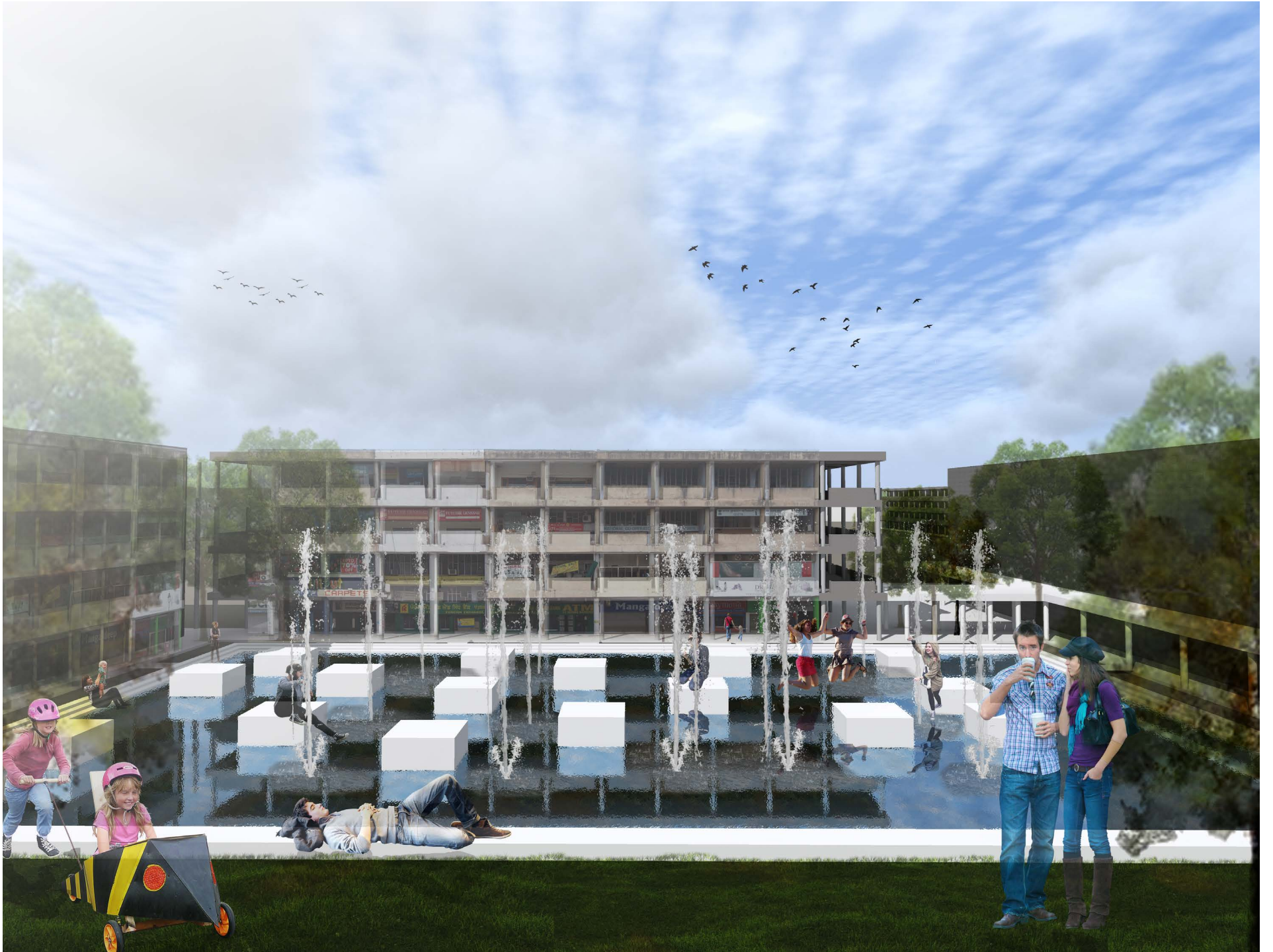




Figure 5.20 - Entry In Studio Space



Figure 5.21 - Walkover to the amphitheatre



Figure 5.22 - Interior Gallery reception Area



Figure 5.23 - Stusio Space



Figure 5.24 - Final Vision

## 6. Conclusions

The city that was envisioned as a pedestrian city, is the least walked and most driven city in India. The roads lined with trees create great shaded parking areas rather than shaded pedestrian walk ways. The streets that were designed to connect the city, in reality divide it into rigid sectors. The only place people walk is in the green strip in the city, and even to get to that, they drive.

This thesis intends to address these obstacles at an urban as well as an architectural scale,. The idea is to creating a pedestrian access into the city centre by linking it to the green strip running parallel to the city centre. The aim of this thesis is to tie the culture of Chandigarh that has evolved over a period of 65 years to the city centre. Making the heart of the city much more than a retail hub but a place where people have the opportunity to expresses their diverse heritage.

The landscape urbanism approach in an idolized modernist city can pose a challenge. The question is where do you draw the line, as it is important that the character of the place is not completely altered but the new interventions adds to it and highlights it at the same time. The key is to strike the right balance between new and old.

The question of where it starts and where it ends is difficult because this is such a fundamental change, will it consume the modernist aesthetic or will it compliment the existing modernist public space.

The intervention in sector seventeen the heart of city of Chandigarh focusses on activating the dead unused area and creating a threshold for this “ green “ plaza surrounded by concrete. The goal here was not to change the aesthetic of the modernist city centre but try and create a fusion between the heart and soul of the city by bringing the green into city centre creating a unique landscape space , that is surrounded by the modernist plaza on three sides. This green node is like an oasis in the concrete desert and is smaller, denser and inhabitable space.

The new cultural node in the other wise dominating retail - office sector aims at giving the culture and arts in the city a place to express them selves and engage others.

Such an intervention can easily take place in different parts of the city in different scales. From activating the capitol complex plaza to the hot paved pedestrian path and green pockets. The idea to turn the hard scape into a fusion of hard scape and soft scape which is more sustainable in an climate like that of Chandigarh, where any shaded cool area automatically turns into a node of activity.

Not only in Chandigarh but in other places like the suburbs of Russia, Berlin where the public spaces lie abandoned due to lack of relatable scale or architecture. These interventions are specific to the place and culture , but the core concept is to break the inhumane scale of massing unused spaces and create nodes of smaller human scale spaces that people can occupy. This in the end act as a juxtaposition to the ideal modernist public plaza , thereby generating more interest in both typologies by their contrasting nature.

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