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# Urban [BOXSCAPE]

Brad W. Bolte

Roger Williams University, [bbolte647@g.rwu.edu](mailto:bbolte647@g.rwu.edu)

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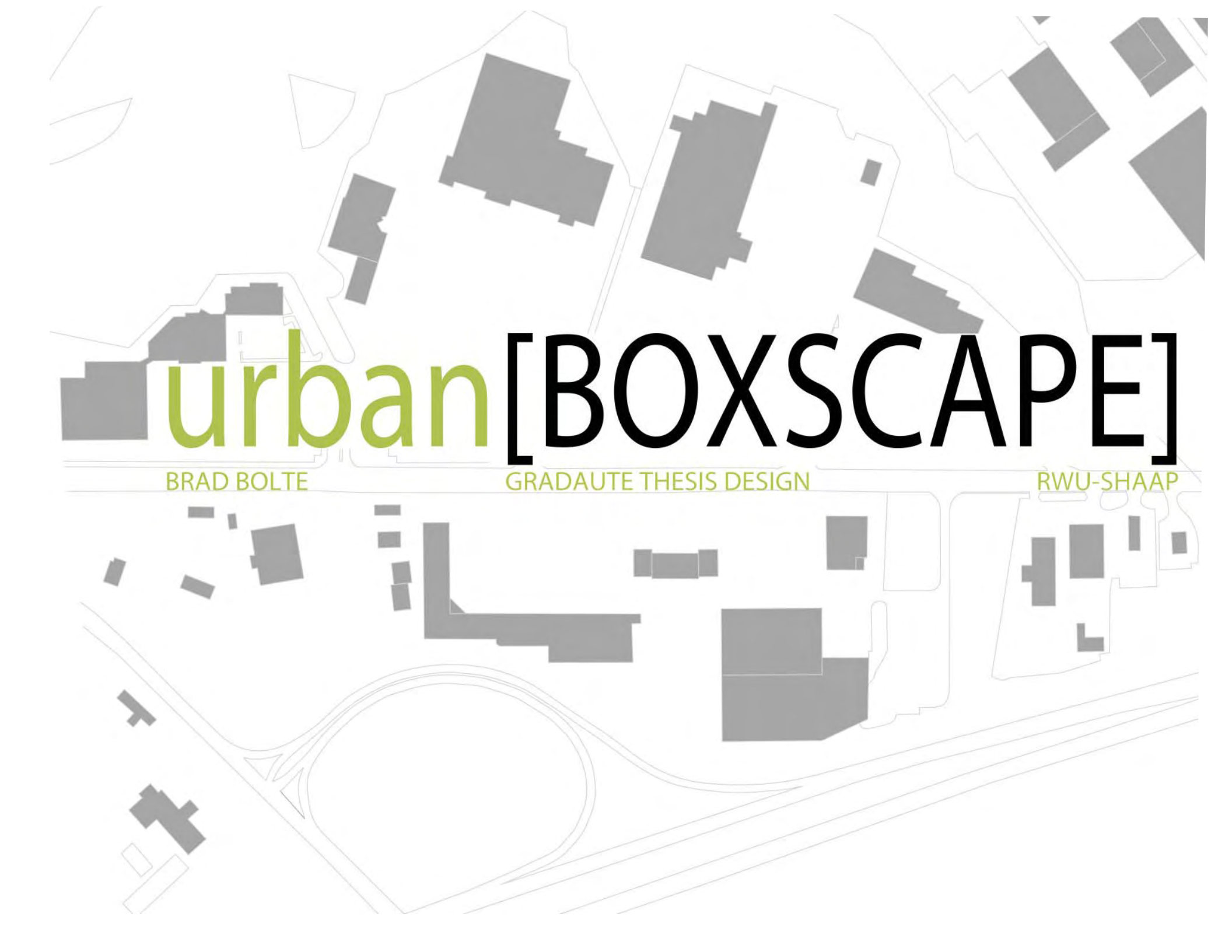
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# urban [BOXSCAPE]

BRAD BOLTE

GRADAUTE THESIS DESIGN

RWU-SHAAP

# urban [BOXSCAPE]

Graduate Thesis Project submitted to:

Roger Williams University, School of Architecture, Art, and Historic Preservation  
In fulfillment of the requirements for the BA.March Dual Degree  
In January of 2010

*Roger Williams University  
School of Architecture, Art, and Historic Preservation  
Bristol, Rhode Island*

Submitted by:

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Brad W. Bolte

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Stephen White  
Dean  
School of Architecture, Art,  
and Historic Preservation

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Julian Bonder  
Distinguished Professor  
School of Architecture, Art,  
and Historic Preservation





*Special Acknowledgement*

*To my parents and family for your support and encouragement through my college career*

*My studio colleagues and friends who kept me entertained and gave me moral and technical support through my long sleepless nights in studio*



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# **THESIS ABSTRACT**

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In the last few years, "Big Box" retailers have spread across the United States at exponential rates. Private development has superseded the public good, providing the minimum amenities without defining a collective identity of Urban Space. The result of this sprawl has scoured our American landscape with endless acres of impervious asphalt which has deteriorated not only our environment, but our social, physical, and community identity, as well. This sprawl as a major infrastructure which exists within our society must be recognized and intervened upon with a more sustainable solution.

Urban [BOXSCAPE] is a method of developing upon the existing Big Box Landscape in order to synthesize commercial, environmental, and social components of civic life into an integrated solution.

This urban concept is demonstrated through a design vision for a Big Box Center in Seekonk, Massachusetts. However, the guidelines and options used in this exercise are meant to exceed this site's immediate relevance and provide a model approach for similar sites across the nation.



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Since the end of World War II, the American Dream has been defined as a house in the suburbs and two cars in the driveway. Sparked by a series of federal and state government policies, including home buying subsidies provided by the GI Bill, massive road building projects and community planning designed around the car, Americans abandoned the cities for greener pastures in suburbia. It is clear that public spending can, and does, affect private decisions about where to live, where to work, and where to build.

The trend has been to rapidly develop farms and forests into housing developments or strip malls. The rate of development is accelerating. The American Farmland Trust reports that an astounding 70 percent of prime or unique farmland is now in the path of rapid development.

Now we are running out of greener pastures and many Americans consider **urban sprawl** to be the fastest growing threat to their local environment and quality of life. We are starting to question the wisdom of growing faster than infrastructures can support or service. We are starting to recognize that decades of road building have yet to, and may never alleviate traffic congestion. Some communities that once welcomed development with open arms now consider the cost of lost farm land not worth the benefits of a new strip mall.

Many cities in the United States are facing a vast spread of urban sprawl in the form of large scale commercial and retail businesses. As these businesses grow away from their city centers, they become disconnected from community and pedestrian access. Automobiles are essentially the only means of reaching these businesses resulting in traffic congestion, pollution, acres of paved lots, and lost sense of community. Physical and social activities are also diminished. With the population inevitably increasing, we must evaluate this extraordinary infrastructure which has shaped our society and figure out how we can alleviate the threat urban sprawl poses on our future.

# URBAN [SPRAWL]

Urban sprawl is the demand of an increasingly affluent population to live in the spacious countryside, and yet enjoy the same level of services as would be available in a city. It is the result of a faulty balancing of the “public’s competing demands for open space, wildlife, recreation, environmental quality, economic development, jobs, transportation, and housing.” (*Sprawl 2009*)

Sprawl is unregulated growth expressed as careless new use of land and other resources as well as abandonment of older built areas. Sprawl results in low-density, scattered, discontinuous, car-dependent construction, usually on the periphery of declining older suburbs and shrinking city centers. (*Frumkin 2004*)

These areas usually **lack the public space, transit, pedestrian amenities, and overall density** of a traditional downtown.

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## COMMUNITY [IMPACT]

- Higher rates of driving and vehicle ownership
- Depressed rates of walking and alternative transport use
- Loss of Rural Heritage and Open Space
- Less leisure time; traffic congestion and longer commuting times
- Higher costs of providing infrastructure
- Reduced worker productivity; ugly, monotonous suburban landscapes
- Ill-health due to air pollution generated by traffic
- Loss of a sense of place
- Marked spatial disparities in wealth between cities and suburbs
- Land development patterns making the establishment and use of mass transit systems difficult







## ENVIRONMENTAL [IMPACT]

### **Decrease in Water Quality**

Paved surfaces create runoff during rainstorms. This runoff picks up oil, chemicals, and gravel from the pavement and grass. These chemicals would usually be filtered out of the water through the ground, however, due to the increase in concrete, now run off into streams.

### **Decrease in Air Quality**

Commuting to work used to take people 10-15 minutes in the car. Today, people are spending 30 minutes or more commuting to work due to urban sprawl. The extra exhaust decreases the air quality.

### **Loss of Farmland**

Between 1992 and 1997 13.7 million acres of farmland were converted to housing developments and highways.

### **Loss of Wetlands**

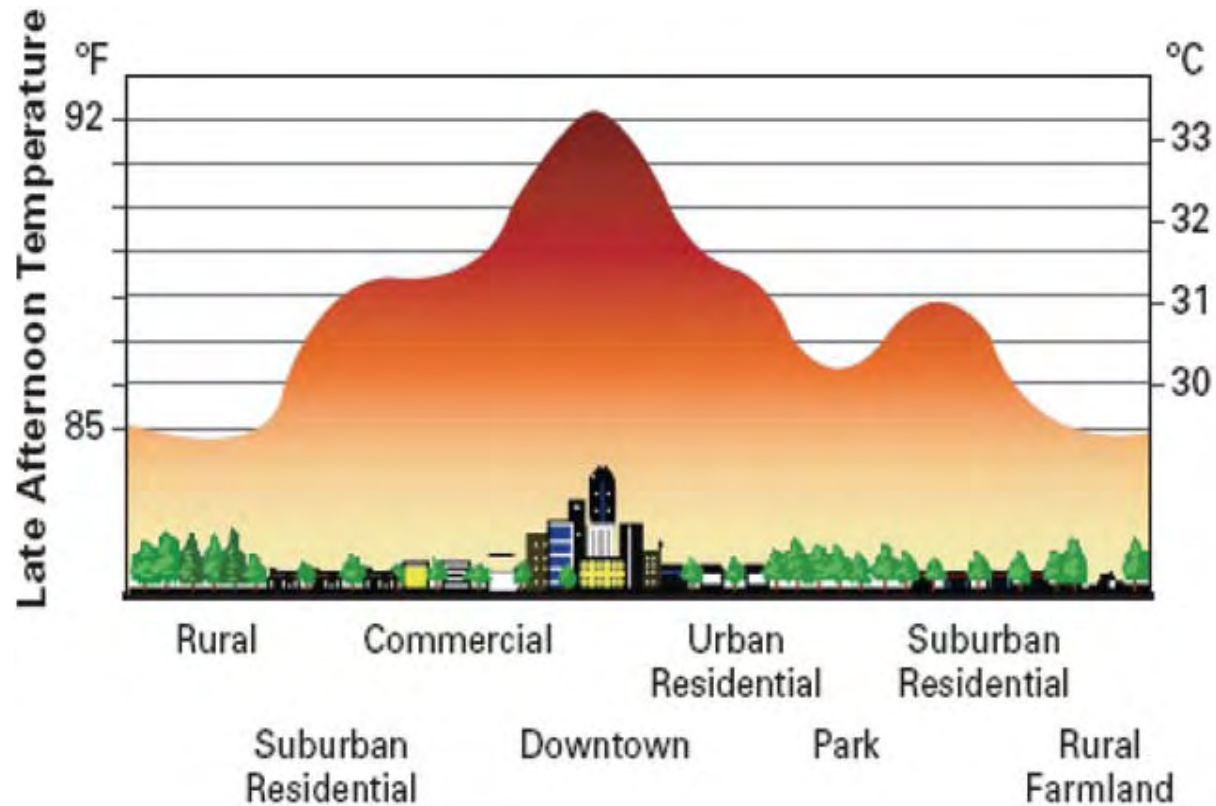
Wetlands surrounding streams help prevent flooding. In addition, wetlands slow down runoff entering a stream. Wetlands absorb chemicals in runoff. Without wetlands to act as buffer, the water supply becomes contaminated and more areas flood.

### **Loss of Wildlife**

According to a study done in Wisconsin, 50% of the wetlands in Wisconsin were lost to urban sprawl. Also only 500 acres of oak savannas exist in Wisconsin. This is down from the 5.5 million acres of oak savannas that originally existed there. (Fiore 2007)

## URBAN [HEAT ISLAND]

The buildings, concrete, asphalt, and the human and industrial activity of urban areas have caused cities to maintain higher temperatures than their surrounding countryside. This increased heat is known as an **urban heat island**. The air in an urban heat island can be as much as 20°F (11°C) higher than rural areas surrounding the city. The increased heat of our cities increases discomfort for everyone, requires an increase in the amount of energy used for cooling purposes, and increases pollution.

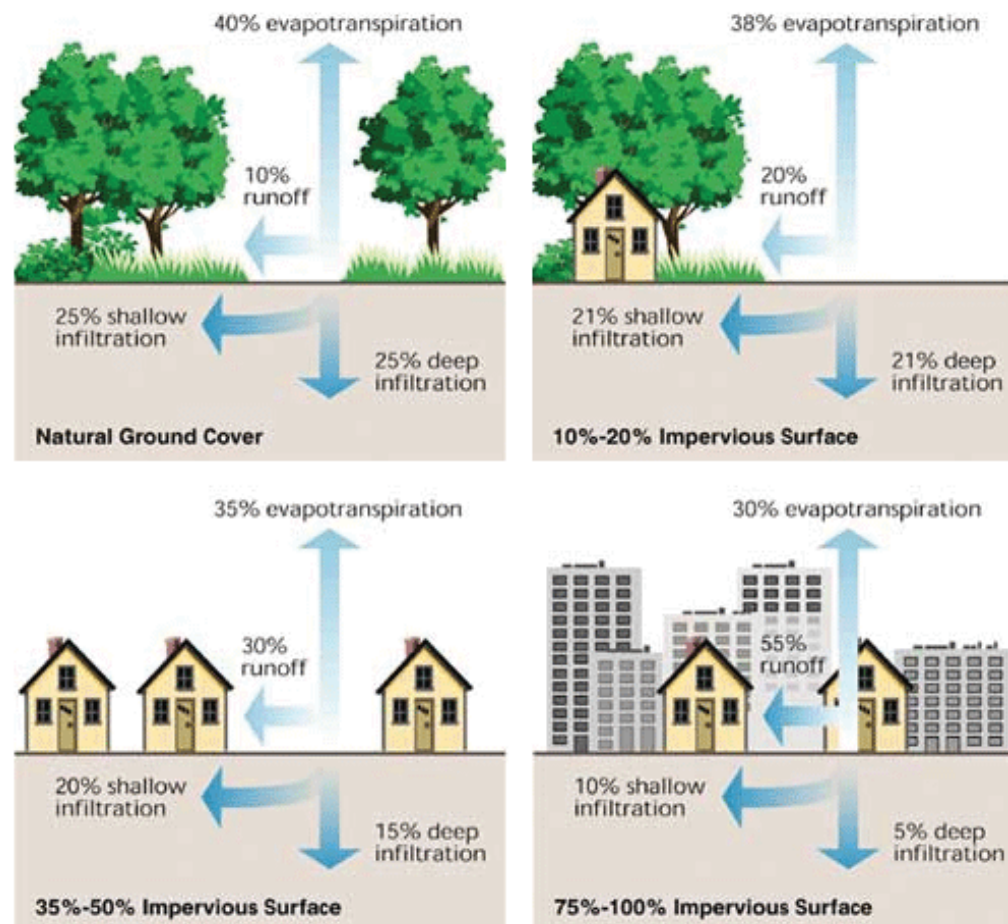


(Rosenberg 2009)

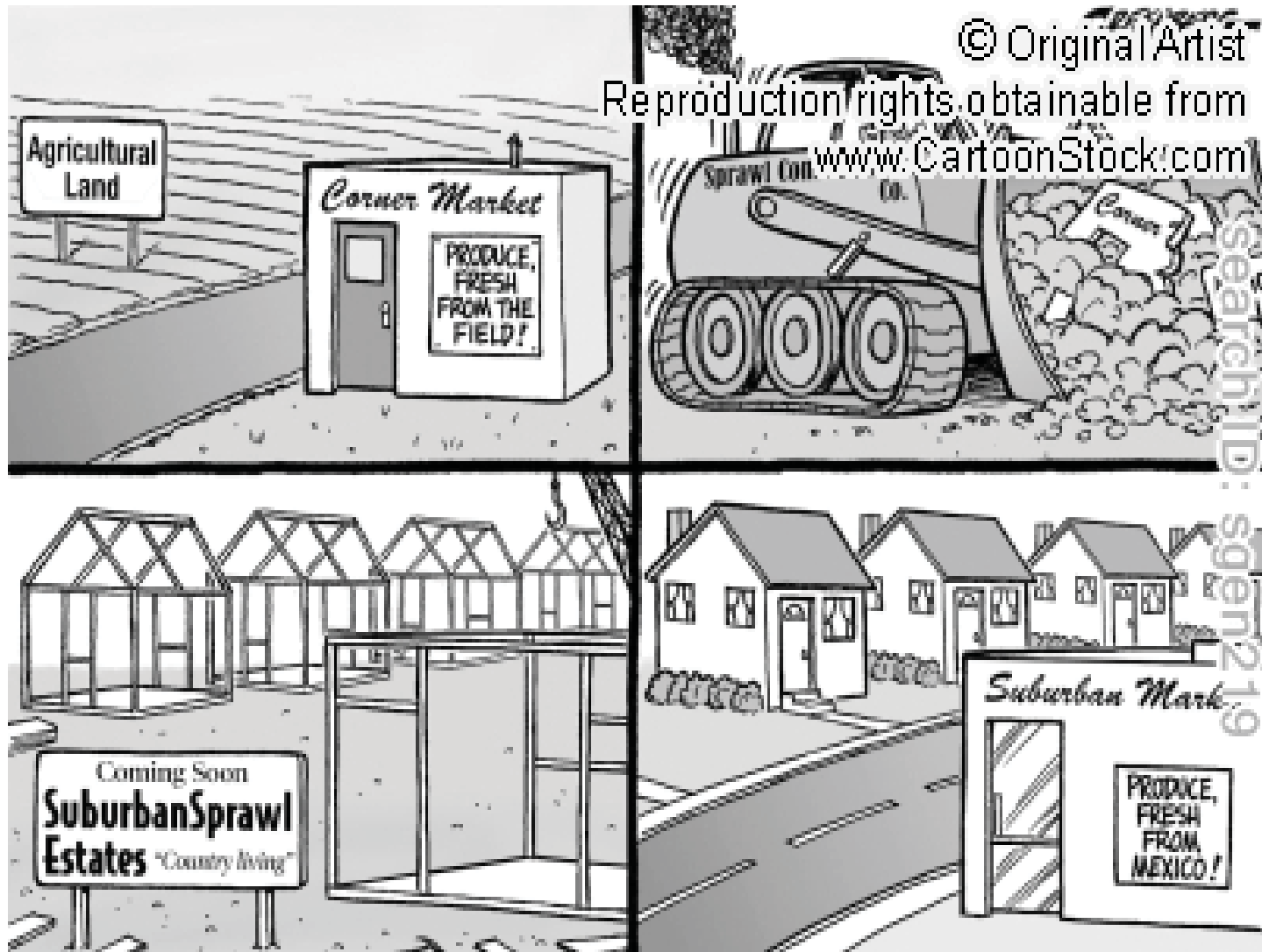
# STORMWATER [RUNOFF]

Built environments interfere with natural processes. An impervious surface — asphalt, concrete, or some other paving or roofing material that keeps storm water from penetrating the ground — causes heavy runoff that erodes the soil adjacent to the surface.

Ineffective local government zoning restrictions result in larger areas of paved surface than necessary to meet the parking demand. Many municipalities require a minimum number of parking spaces per development project, often forcing developers to build more spaces than needed to meet actual demand. For instance, commercial parking lots frequently have 60 to 70 percent vacancy rates.







## SMART [GROWTH]

Smart growth is an urban planning and transportation theory that concentrates growth in the center of a city to avoid urban sprawl. Smart growth values long-range, regional considerations of sustainability over a short-term focus. Its goals are to achieve a unique sense of community and place; expand the range of transportation, employment, and housing choices; equitably distribute the costs and benefits of development; preserve and enhance natural and cultural resources; and promote public health.

The features that distinguish smart growth in a community vary from place to place. In general, smart growth invests time, attention, and resources in restoring community and vitality to center cities and older suburbs. New smart growth is more town-centered, is transit and pedestrian oriented, and has a greater mix of housing, commercial and retail uses. It also preserves open space and many other environmental amenities.

---

### The basic principles of smart growth include:

- Mix Land Uses
- Take advantage of compact neighborhood design
- Create Housing opportunities and choices
- Create walk able communities
- Foster Distinctive, attractive communities with a strong sense of place
- Preserve open space, farmland, natural beauty, and critical environmental areas
- Strengthen and direct development toward existing communities
- Provide a variety of transportation choices
- Encourage community and stakeholder collaboration in development decisions

## AMERICANS SUPPORT SMART GROWTH

Polls show that Americans strongly support smart growth and the strategies necessary to implement it. Indeed, **78 percent of voters** believe that it is important for the U.S congress to help communities solve problems associated with urban growth, according to the Millennium Planning Survey, a comprehensive telephone survey conducted by the American Planning Association in October 2000. Another poll, conducted in September 2000 by Smart Growth America, a coalition of over 60 public interest groups, found a similarly high level of support: more than **3 quarters of those surveyed** said they favored “giving priority to improving services, such as schools, roads, affordable housing and public transportation in existing communities rather than encouraging new housing and new commercial development and new highways in the countryside.”

*(Benfield 2001)*

## AMERICAN RECOVERY AND REINVESTMENT ACT

**President Obama’s** urban policy agenda is grounded in the recognition that our nation’s cities and metropolitan areas are vital engines for economic growth, innovation, and opportunity. To maximize economic productivity and opportunity in a 21st Century economy, federal policy must reflect the new metropolitan reality that strong cities are the building blocks of strong regions, which in turn, are essential for a strong America.

*(American 2009)*

*Snapshot of some of the Act’s investments:*

Housing - **\$12.7 billion**    Energy - **\$61.3 billion**    Infrastructure Investment - **\$80.9 billion**

Core investments (roads, bridges, railways, sewers, other transportation) - **\$51.2 billion**

*(American 2009)*



# BIG BOX [LANDSCAPE]

Our society has rapidly become sucked into sprawl on a national level. This phenomenon is occurring on such a level which is establishing the most predominant landscape in our daily lives. The seas of parking, the grand scale of plain, masonry boxes, automobiles everywhere, minimal social interaction, and others have resulted in what I refer to as the **BOXSCAPE**.

---





Take a look across America. From Coast to Coast, massive changes have taken place on the landscape and in our society. A seasoned traveler, dropped onto a commercial street anywhere in America, could scarcely tell the location from the immediate vista. A jungle of “big box” retailers, discount stores, fast-food joints, and gaudy signs separated by congested roadways offers no clues to location. Every place seems like no place in particular. The line between city and country is blurred. Green spaces are fragmented. Only a remnant of natural spaces remains intact.











*(Berger 2006)*









*(Berger 2006)*









(Berger 2006)





CALIFORNIA

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MISSISSIPPI



TEXAS

Google



FLORIDA

Google



NEW MEXICO



N. DAKOTA

Google



MAINE

Google



WASHINGTON





Seen everywhere...unique to no place



Wal-Mart has more than **5,700 stores**

About **1,350** discount stores,

Nearly **2,000** combination discount and grocery stores

**550** warehouse stores (SAM'S CLUB).

**75%** of its stores are in the US (around 3400).

It owns **42%** of Japanese supermarket chain SEIYU.

Wal-Mart also has operations in Asia, Europe, and South America.

*(Real Facts 2009)*

1970



- New Stores
- Existing Stores

1980



- New Stores
- Existing Stores

1990



- New Stores
- Existing Stores

2001



- New Stores
- Existing Stores

A glance at the spread of Wal-Mart's in a 30 year time period. *(Real Facts 2009)*



SEEKONK , MA

TYPICAL **CHARACTERISTICS** OF  
BIG BOX LANDSCAPES



UNORGANIZED, SCATTERED BUILDINGS  
W/ NO RELATION TO ONE ANOTHER



MAJOR AUTOMOBILE ARTERIALS



SEA OF IMPERVIOUS PARKING SURFACE



# BIG BOX [RETAIL]

Big Box Retail is a machine devoted entirely to consumption, a single use monoculture surrounded by a sea of asphalt. Often masqueraded as a public realm, it is owned by private interests whose bottom line is not community but profits.

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## What **characterizes** “big box” retail?

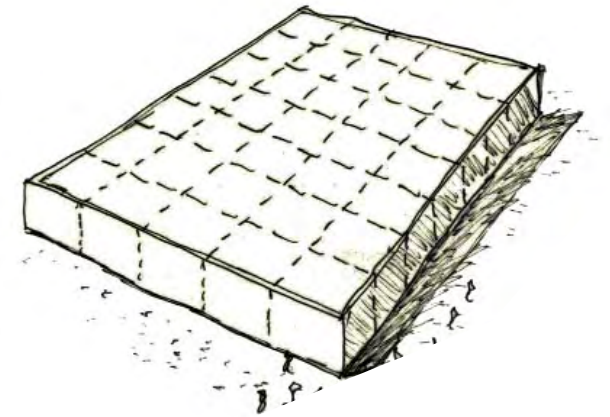
- Occupy more than 50,000 square feet, with typical ranges between 90,000-200,000 sq. ft.
- Derive their profits from high sales volumes rather than price mark up
- Large windowless, rectangular single-story buildings
- Standardized facades
- Reliance on auto-borne shoppers
- Acres of parking
- No-frills site development that eschews any community or pedestrian amenities.
- Profound planning impacts on the character of a community.

## What **benefits** are achieved by “big box” developments?

- Offer low prices and great convenience for an increasingly time-deprived society
- Localities economies from sales tax revenues to finance local services

## What are the relevant issues and **concerns** ?

- Big vs. small businesses, i.e. “category killers”
- Long Term development impacts
- Quality and Image - quality begets quality
- Future marketability - When/if the store is closed, will a standardized big-box shell and parking lot be a long-term eyesore in the neighborhood?



## What built aspects can we consider in **alternative planning approach** ?

- Architectural character of the building
- Color and material of the primary structure
- Relationship to the surrounding community, including civic amenities
- Using Big Box Retailers as Incubators for Small Businesses
- Pedestrian flows
- Green Parking
- Mixed Use

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Automobiles are still dominant in our society. However, fuel costs are rising, our environment is suffering, and our population is expanding. The automobile and the spread out living we are accustomed to will soon become obsolete. This may not occur today or tomorrow, but urban planning is a long process so we must take a proactive stance in this case.

Many Big Box centers are currently doing very well in terms of business. However, we have already begun to see an increase of these centers becoming abandoned and left as a paved scar on our once green landscape. Before this happens on an epidemic scale, we have the opportunity to begin transforming these places so they can accommodate a more sustainable future.

**Urban [BOXSCAPE]**, as a project, is to study methods for developing upon the existing the Big Box Landscape, or Urban Sprawl Centers, in order to synthesize commercial, environmental, and social components of civic life into an integrated solution. The concept is not to find a concrete solution to sprawl, but rather to test ways in which we can improve our failing, existing infrastructure. The methods and lessons, not necessarily the built forms, experimented can serve as a model for other planners and other sites. There are, after all, a predominant amount of similar site conditions nationally, as well as internationally.

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Great places need great planning. In order to promote the long-term use of a site, urban design is essential to success. With a planner's perspective, developers and designers see the bigger picture of a development - not only the buildings, but also the spaces between the buildings; not only the spaces, but also the hierarchy of those spaces; not only the neighborhood, but how the neighborhood expresses a unique identity.

Architecture doesn't have to be iconic, but in order to create a viable suburban center it must make a statement about its place as well as its environment. For too long, urban sprawl centers have looked very similar, lacking any distinguishing characteristics from one another. Tomorrow's suburbs will be infused with the local character that makes the world's best places stand out in people's minds.

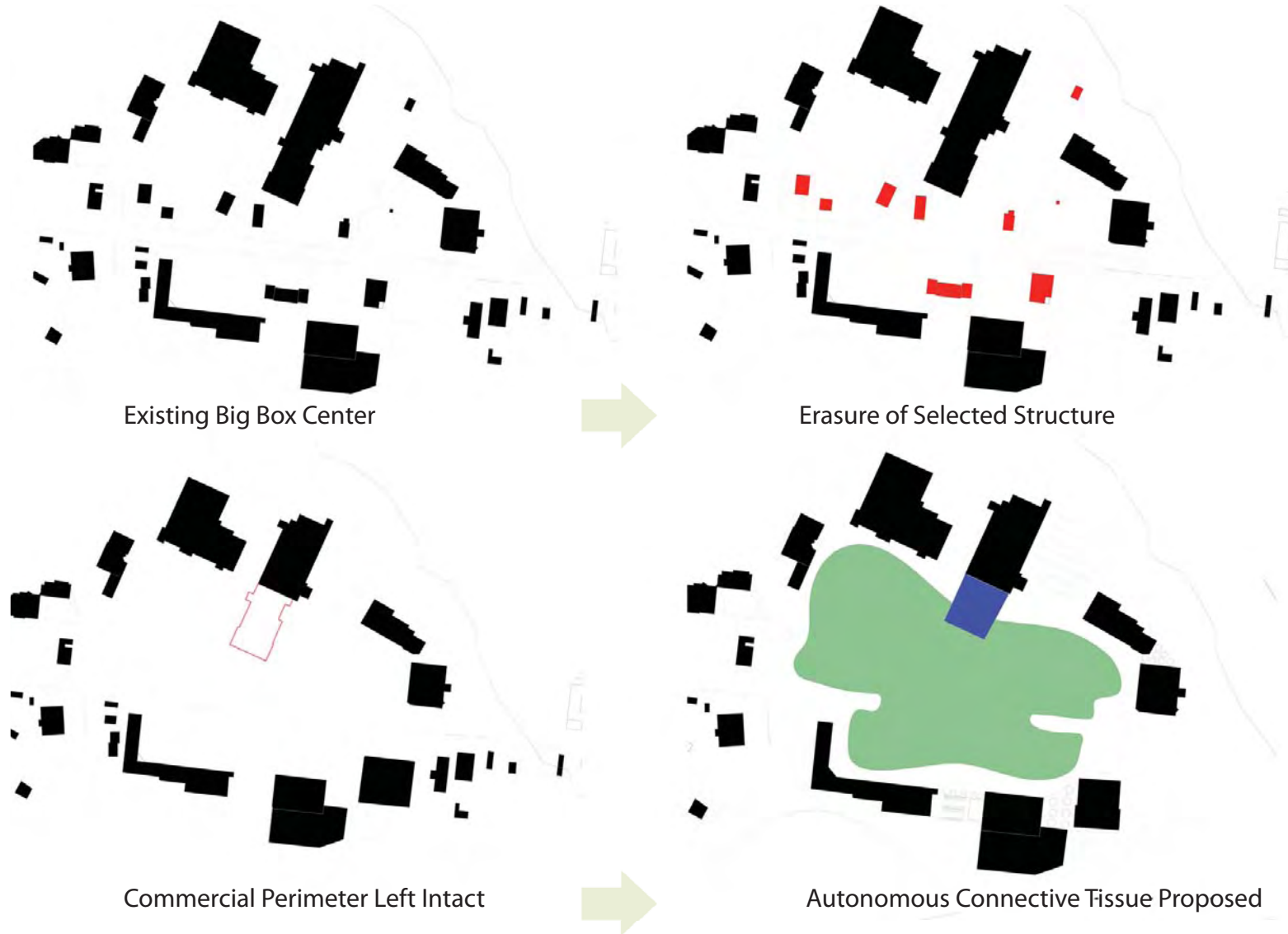
To capture the vitality and identity needed to promote a vibrant suburban center, well-scaled public spaces must accompany any development, providing the connective tissue among uses. Sidewalks and streets that engage passersby, public places that encourage social interaction and provide a showcase for events, and architectural and landscaping features that celebrate community all help to create a welcoming environment.

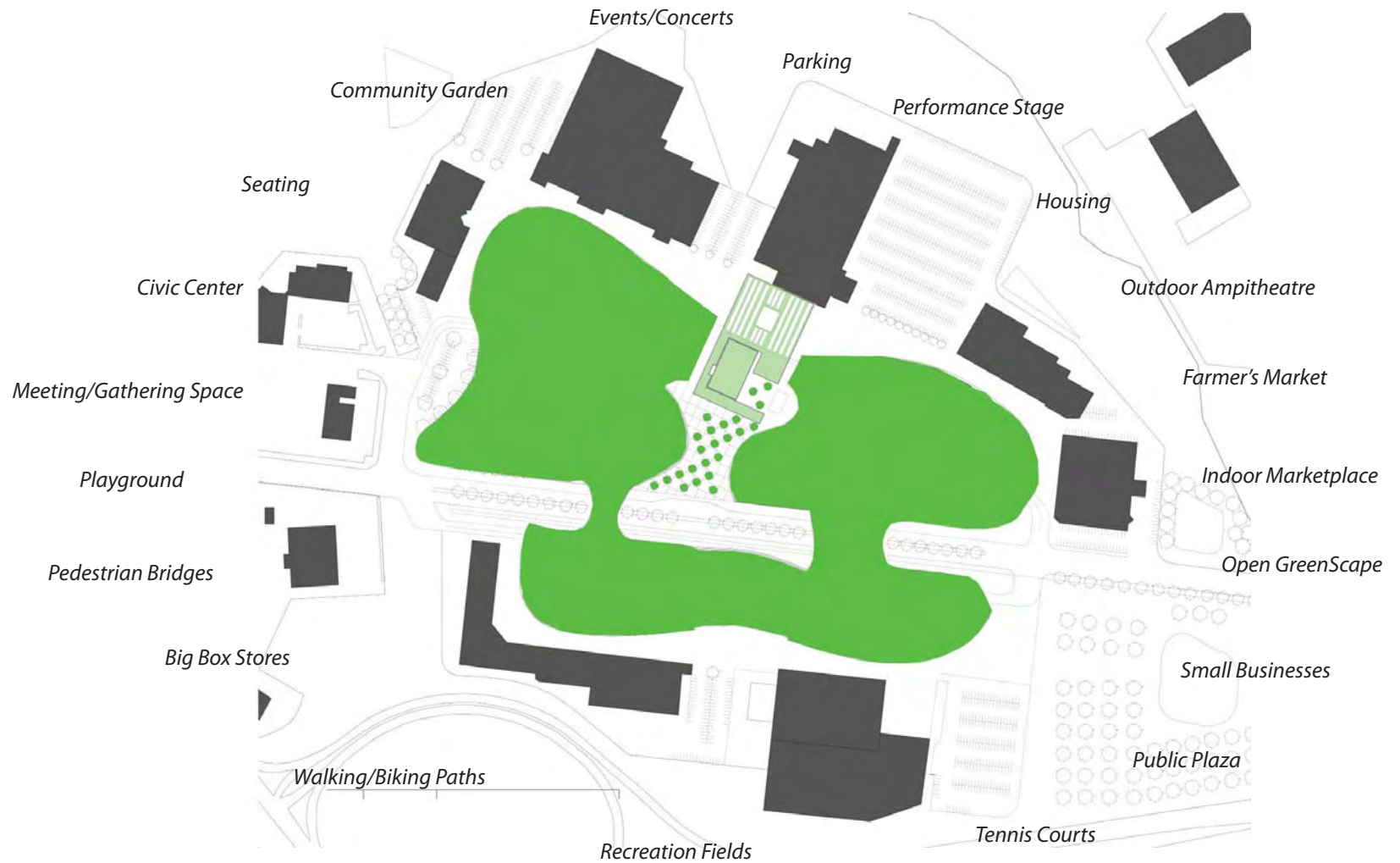
## PRIMARY [THEMES]

- Establish a Connective Infrastructure
- Micro Urban Development
- Center - Culture - Identity

# Establish a Connective Infrastructure

The proposal is centered on the development of an autonomous connective tissue which allows for a variety of buildings and activities (existing and new) to function in a cohesive environment.





It is a differentiated space, a landscape, a piece of land capable of holding together the build space and the void. It is no longer a single sheet of parking, but a fabric of mixed use. It is no longer homogeneous, but differentiated. It no longer contains indifferent voids, but structured voids. It is no longer a residue space, but is itself the subject of the project. It is a density in itself, with a density of connotations, uses, and thus meaning and identity.

# Micro Urban Development

The project aims to transform the (currently) single use area into a vibrant, mixed-use development. The place becomes not only just for shopping, but for a wide variety of different possible uses.

Outlined in this design example are two possibilities of transformations:

**harvest [BOXSCAPE]** Landscape as a means for gathering wind, produce, rainwater, and solar energy

**live [BOXSCAPE]** Integration of dense, sustainable living communities



Both work into the same overall connective infrastructure and contain many similar attributes.

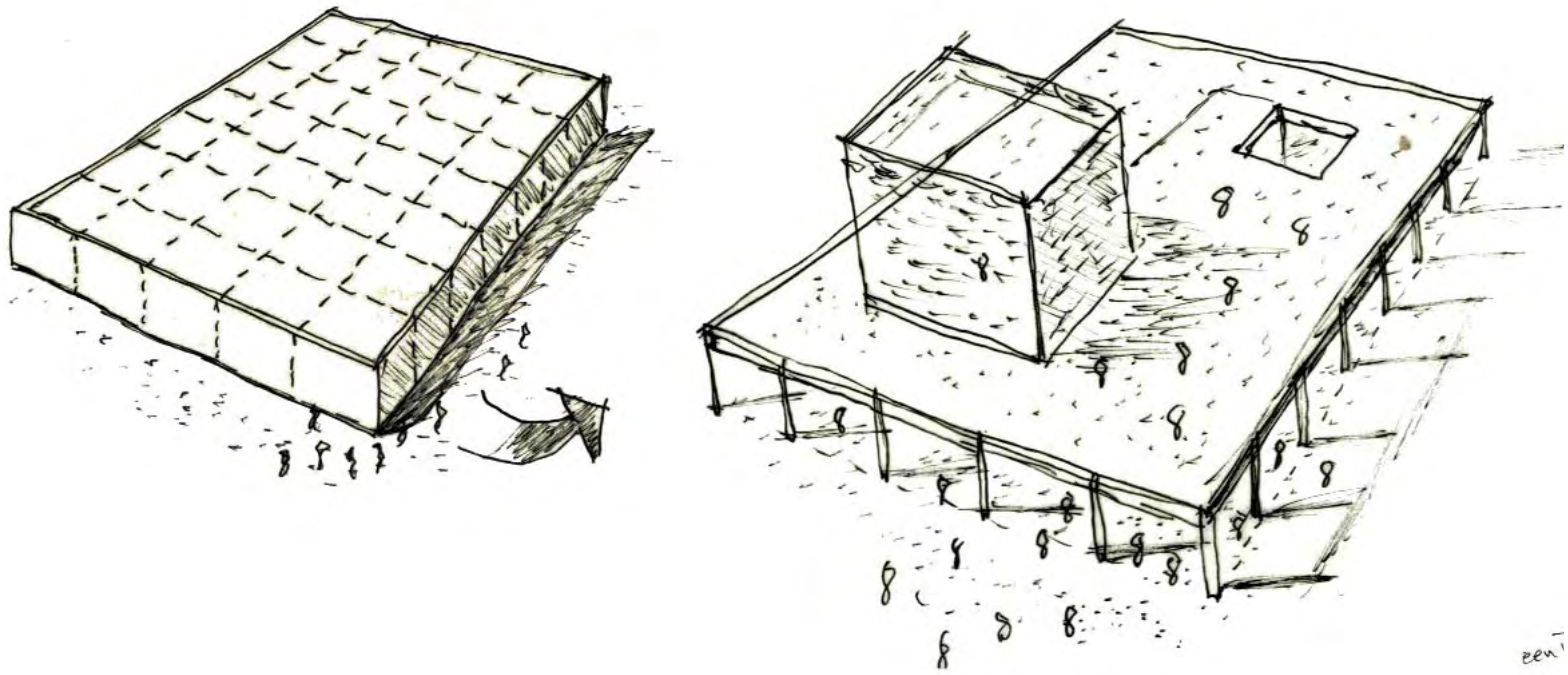


# Center - Culture - Identity

The transformation a strategic, existing "Big Box" within the framework of the larger connective tissue in order to generate **CENTER**

The integration of a market place, a civic/performing art center and public square under one structure provides a heavily populated and **CULTURAL PLACE**

It is a density in itself, with a density of connotations, uses, and thus meaning & **IDENTITY**.



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## PROGRAMMATIC [GUIDELINES AND OPTIONS]

A combination of the following programmatic priorities comprises a range of possible guidelines for redevelopment to be incorporated into the design proposal.

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- **Housing:** Often cited as the biggest barrier to economic growth.
- **Economic Development:** New economic activity is required to create jobs and commercial tax revenue, to support existing businesses and revitalize historic commercial areas, and to establish South Seekonk as a target area for new development and a regional destination.
- **Innovation & Creativity:** Seek to encourage and promote innovation and the creative economy, exploring fields such as art, architecture, design, multimedia, life sciences, information technology, alternative energies, and environmental industries.
- **Open Space:** New development has the potential to create and expand recreational opportunities—and open space networks—for existing and future residents.
- **Transportation and Infrastructure:** The City's transportation network is overburdened by local and regional automobile traffic. Lack of adequate public transit limits mobility and restrains access to economic opportunity for residents.
- **Smart Growth:** reflect densities and uses suitable for an urban location well served by infrastructure and transit. Development should also emphasize "green design" and environmental sustainability.
- **Environmental/Ecological issues:** Retail Supercenters have numerous environmental concerns including heat island effects and storm water runoff due mainly to the large amounts of paved surfaces and flat gravel roofs.
- **Identity:** The design strives to formulate a new identity for the area, helping to increase its visibility.
- **Urban Design Vision:** Develop an innovative scheme for the redevelopment of the area, inclusive of building typologies, massing, street grids and open space.
- **Land Use:** Initiate a vibrant mix of uses with commercial, residential and office spaces. Incorporate open space, open space connections and a pedestrian environment

## MASTER PLAN [PROGRAM]

An overall master plan is proposed in order to give a sense of what this place could be if this area was enriched with the densities and mixed uses of a properly functioning urban area. Achieving this actual program would take an extended amount of time and proper phasing. It is also important to note that every master plan is bound to change, adapt, and or transform according to a number of circumstances including economic stability, community interests, natural disasters, or other unforeseen reasons.

---

- Cafes
- Small Businesses
- Farmer's Market
- Performance Stage
- Art exhibits
- Comfortable seating
- Recreational/Sport Fields
- Public Walking/Bike Paths
- Parking Deck
- Pedestrian Bridge Across Route 6
- Public Plaza
- Civic Center \*

# CIVIC CENTER [PROGRAM]

Center is important in a community. It draws public life together, has the opportunity to provide numerous civic uses, and gives a sense of place and identity. In light of creating density and mixed use, the Civic Center proposed for this project transforms an existing Stop and Shop into a combined marketplace and civic gathering space. The aim is to blend shopping and cultural use together as a typical downtown in a city would.

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## CIVIC USES

- Lobby
- Community Room
- Community Hall
- Café
- Gallery
- Multi-purpose Auditorium
- Auditorium Storage
- Art/Classroom Studio (2)
- Branch Library
- Reading Lounge
- Computer/Tech Lab
- Special Function Room
- Outdoor Terrace
- Music Studios (2)
- Theatre/Lecture Hall

## SERVICES & ADMIN

- Administration Office
- Reception Desk
- Coat Storage
- Janitors Closet (3)
- Service Entrance
- Drop Off/Storage Area
- Service Elevator
- Men & Women Bathroom (4)
- Mechanical Room

## GREEN ATRIBUTES

- Green Roof
- Rooftop Solar Collection

## RELATED PROGRAM

- Outdoor Farmer's Market
- Outdoor Café & Public Seating
- Indoor Small Vendor Marketplace

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**[ADDISON CIRCLE]**

*RTKL ASSOCIATES - ADDISON, TX*

Sustainable, Walkable, Compact City Center

**[PIONEER SQUARE]**

*RTKL ASSOCIATES - PORTLAND, OR*

Public Square with mixed uses & vibrant activity

**[BIG BOX REUSE]**

*JULIA CHRISTENSEN*

Communities in America transforming empty Big Boxes

**[HIGH LINE]**

*FIELD OPERATIONS, WITH  
DILLER SCOFIDIO + RENFRO - NYC*

Providing a pedestrian park in an otherwise hardscape city

**[VOEST ALPINE CENTER]**

*DIETMAR FEICHTINGER ARCHITECTS - AUSTRIA*

1-Storey parking peck with a Pedestrian park above

These existing projects shown provide good indications of not only effective building and implementation strategies, but it also gives a sense of the direction of where architecture is progressing in terms of attenuating to community and the public welfare for a more sustainable future.

# [ADDISON CIRCLE]

RTKL ASSOCIATES - ADDISON, TX

(Paumier 2004)



An edge city refined with a **sustainable, walkable, compact city center**.

Focus on two mixed use development opportunities:  
**neighborhood and a town center**

Pedestrian friendly design

Successful public/private partnership

The town pursued a proactive implementation strategy aimed at attracting developers to construct this vision



## MASTERPLAN

(Paumier 2004)



### Land

124 acres  
71 acres Private  
53 acres Public

### Residential Entitlement

700,000 sq ft mixed residential  
4,800 units  
820 sq ft (min ave. unit size)

### Commercial Entitlement

6,000,000 sq ft mixed commercial

### Public Use

28 acres

## LAND USE PROGRAM

### Tollway Fronting Zone

Large tenant offices, hotels, service/retail/restaurants, health/fitness, business services, entry plazas, etc.

### DART Station Area

New transit facilities

### Addison Town Center

Public events corridor, small tenant office, urban residential units, street level shops and cafes, civic and cultural facilities, conference center, and a civic center.

### Urban Residential Neighborhoods

Housing, home offices, support services, pocket parks, etc.

## DEVELOPMENT AGREEMENT

The town committed **9 million dollars** from their general funds with **4.5 million** up front.

The town agreed to maintain the infrastructure.

The town allowed private utility systems throughout the public right of ways.

The town amended building and life safety codes to allow for more pedestrian streets standards

The total estimated private investments totaled **over 500 million dollars**



# [PIONEER SQUARE ]

PORTLAND, OR

(Paumier 2004)



Located in the heart of downtown, “Portland’s living room” has a prominent civic role as a place for public enjoyment.

Pioneer Courthouse Square has been called “Portland’s living room” in reference to its enhanced civic role as a place for the public to gather in and use. Its modern design includes public art, amenities, flowers, trees, walls and stairs designed for sitting on. It is the scene of frequent events, and includes a coffee shop, food vendors, and the information center for Tri-Met (regional Portland’s transit agency), which was the key agent of the square’s successful redevelopment.





*Public Square with mixed uses & vibrant activity*

*(Paumier 2004)*



## [BIG BOX REUSE ]

JULIA CHRISTENSEN

*(Christensen 2008)*



In her book *Big Box Reuse*, and accompanying photographic exhibition, Julia Christensen takes us on a road trip across America to look at what becomes of the spaces superstores leave behind when they move out.

Christensen focuses on empty Wal-Mart and Kmart stores to discuss 10 imaginative and successful projects converting boxes into a library, a Head Start center and a senior resource center, among others. Charter schools have moved into empty big boxes, as have churches, for whom, Christensen says, the big box may be the revival tent of the twenty-first century. Christensen's stories can become repetitive, but the themes she draws from her investigations carry conviction and a sense of urgency.





## Communities in America transforming empty Big Boxes

(Christensen 2008)

“By looking at how communities are using these structures, and by exploring design issues from the ground up, we can begin to steer the future design of our built environment with informed awareness, as cities and towns learn to regain control over the design decisions that shape the future of their communities.”

Julia Christensen



SPAM Museum  
*Renovated K-Mart*



Fellowship Church  
*Renovated Grocery store*



Medical Center  
*Renovated Wal-Mart*



Charter School  
*Renovated K-Mart*



Headstart K-12  
*Renovated K-Mart*



Medical Center  
*Renovated Warehouse*

# [HIGH LINE ]

FIELD OPERATIONS, WITH DILLER SCOFIDIO + RENFRO - NYC

(Highline 2009)



The High Line is a 1.45-mile New York City park built on a section of the former elevated freight railroad of the West Line, along the lower west side of Manhattan. It features an integrated landscape, designed by landscape architects James Corner Field Operations, with architects Diller Scofidio + Renfro, combining meandering concrete pathways with naturalistic plantings. Fixed and movable seating, lighting, and special features are also included in the park.





*Pedestrian Park in an otherwise Hardscape city*

*(Highline 2009)*





# [VOEST ALPINE OFFICE CENTER ]

DIETMAR FEICHTINGER ARCHITECTS - AUSTRIA

(Saieh 2009)

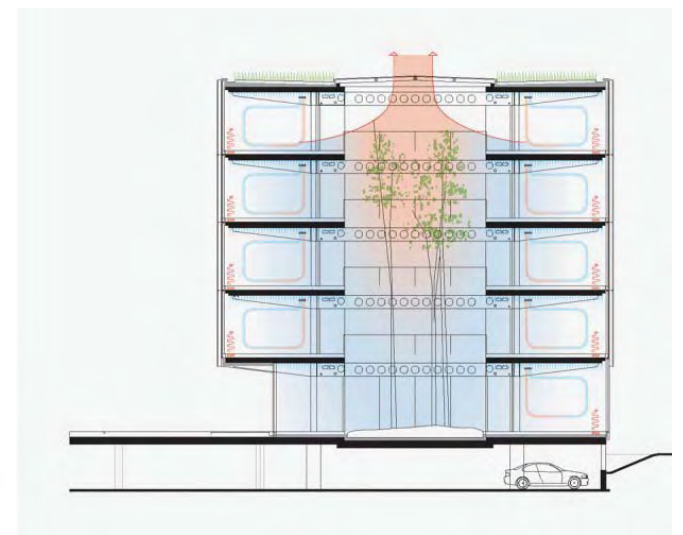


By its geometry the new sales and financial centre defines a generous open public space covering a one storey parking deck. The spacious garden creates a designed outdoor area for employees and visitors of the company: a sequence of green fields, wooden decks, paved and planted areas structured by patios.



# 1-Storey Parking Deck with a pedestrian park above

(Saieh2009)



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## DEMONSTRATION [SITE]

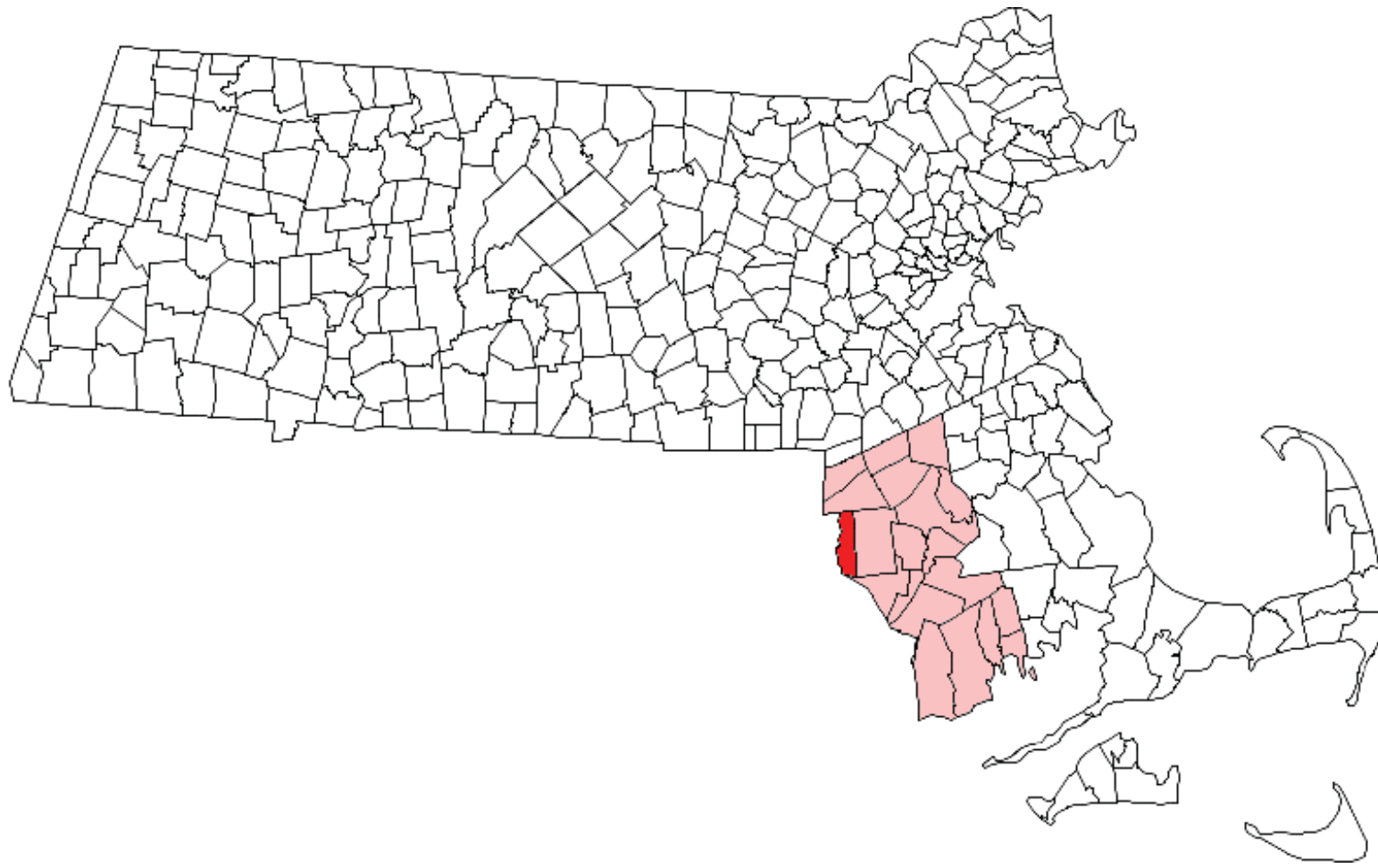
As stated earlier, I chose a demonstration site for purposes of explaining design methods. Big Box Centers all contain similar characteristics, but each site does pose unique differences such as climate, demographics, state and town regulations, built area, economic stability, etc. Here is an overview of the site in which this thesis is demonstrated.

Massachusetts is one of the fastest-sprawling areas in the United States. Among the data indicating that sprawl is an increasing problem in the Commonwealth, one fact stands out-between 1972 and 1996, the amount of developed land increased approximately fifty-nine percent, while the Commonwealth's population only increased roughly six percent. According to Robert Durand, former Secretary of Environmental Affairs, the last twenty years have produced a thirty-eight percent increase in the amount of developed land in Massachusetts; every day, the State loses forty-four acres to development. (*Krass 2010*)

Located at the intersection of major cultural links, with Providence to the west, New Bedford to the east, and Central Seekonk to the north, the Route 6 Retail District forms a potential new center in the midst of single use remnants of the "Big Box" supercenter sprawl. Given its location right at the State border to Rhode Island, the Route 6 Retail District has the potential to serve as a major gateway between Providence, Seekonk and New Bedford.







## Route 6 Corridor [South Seekonk]

Seekonk, MA USA

Elevation - 39' Area - 18.5 square miles

Seekonk is a town in Bristol County, in the southeastern region of Massachusetts

It is bordered by:

East Providence, RI; Pawtucket, RI; Attleboro, MA; Rehoboth, MA; and Swansea, MA. It is approximately 5 miles from Providence, RI; 13 miles from Fall River, MA; and 45 minutes south of Boston.

The construction of the roads linking Seekonk to other communities in the area has gradually transformed the town from an agricultural community to its current identification as an inner-ring suburb of Providence.

Good transportation networks, including I-195, Route 6, and Route 44, connect Seekonk to Providence to the west and to Fall River, New Bedford and Taunton to the East.

*"In order to bolster the quality of residential life in Seekonk therefore, the town will work to allow its quality of life to become more outwardly visible. The development of a town's aesthetic is a part of the vision for Seekonk."*

Seekonk Town Masterplan



## Residential zones

- R-1 – 12% Land Area
- R-2 – 24.2% Land Area
- R-3 – 10.6% Land Area
- R-4 – 38.9% Land Area

## Commercial zones

### **Local Business**

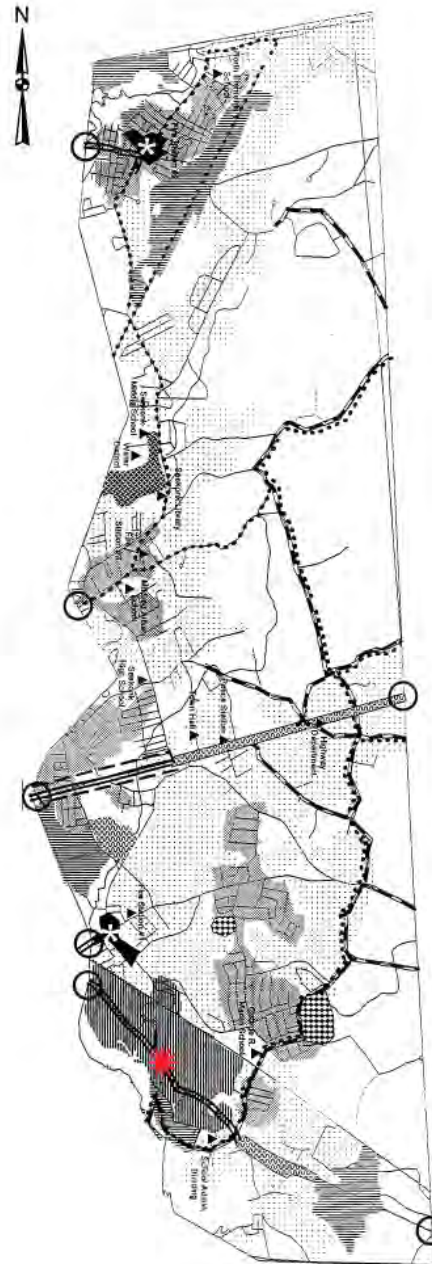
- 189 acres
- 1.6% Land Area


### **Highway Business**

- 494 acres
- 4.1% Land Area

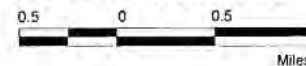
## Industrial zone

- 1,011 acres
- 8.5% Land Area



 Site Location

Town of Seekonk  
**Future Land Use Action Map**



## North Seekonk

- Low density residential development
- Scenic roadways
- Agricultural land use.
- Older residential developments
- Some light industrial uses
- Small businesses
- Wildlife Refuge
- Golf course
- Town Library
- Junior High School

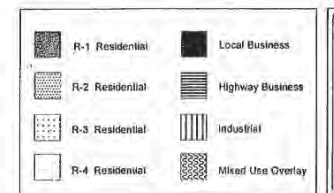
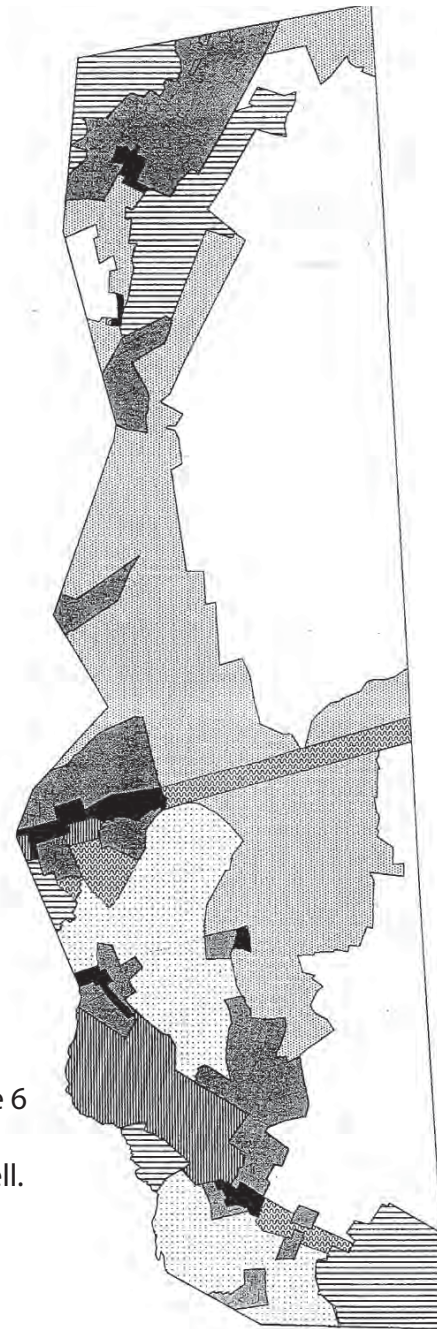
## Central Seekonk

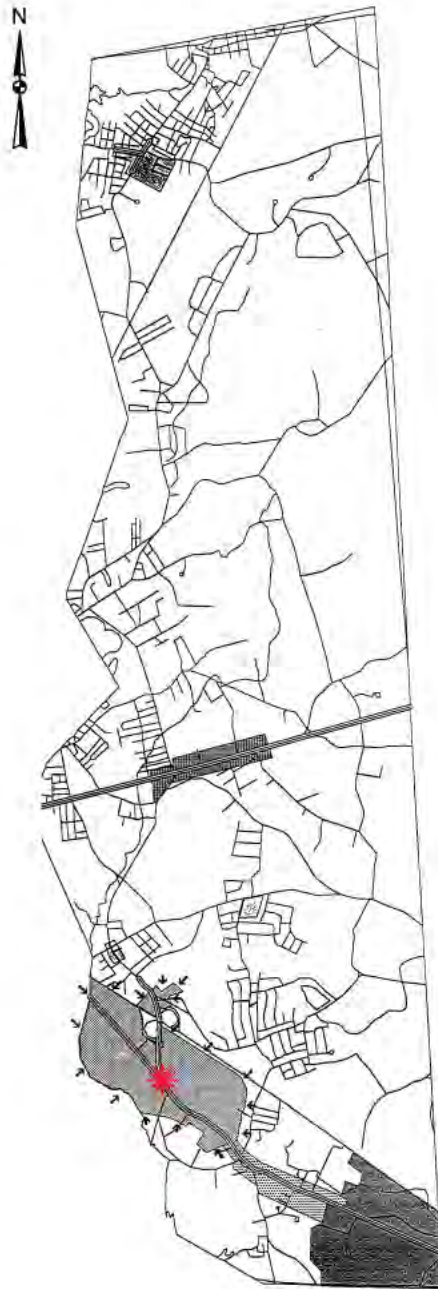
- Mixed use district, with a definitive rural/suburban character
- Direct connection to Providence.
- Town Hall
- Police Station
- YMCA
- Automotive Businesses
- Retail Complexes
- Residential Areas

## South Seekonk


Commercial and industrial development along Route 6 is the dominant feature of land use.

There are residential developments in the area, as well.

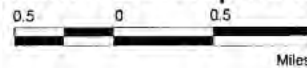




-  Industrial Infill and Refill Development
-  Neighborhood Commercial Center
-  Highway Business
-  Mixed Use/Residential District
-  Suitable Location for Institutional or Governmental Uses
-  Corridors to Target for Landscaping/Streetscaping
-  Indicates Uses to Contain, and Promote Infill and Refill Development

 Site Location

Town of Seekonk  
Economic Development Plan



## SEEKONK [MASTERPLAN]

### ***“Commercial Development Inconsistent with Community Character”***

### ***“Develop, Implement, and Enforce Strict Design Guidelines for New and Rehabilitated Structures”***

Seekonk wishes to avoid the traditional “Big Box” structures which do not reflect the character of the community.

### ***“Aid the Creation and Maintenance of Cohesive Neighborhoods”***

Encourage urban design that facilitates safe pedestrian travel, recreation areas, and community interaction

### ***“Create attractive gateways to Seekonk that reflect the town’s rural suburban image”***

### ***“Provide and Protect Open Spaces, Scenic Vistas, and Streetscapes”***

Engage in aggressive landscaping and greening efforts along roadways where development is not consistent with community character – especially Seekonk Gateways (i.e. Route 6)

Visually rejuvenate commercial developments.

### ***“Address the Active Recreation Needs of the Citizens of Seekonk”***





## ROUTE 6 [RETAIL CORRIDOR]

This four lane major road provides an alternate to the East-West movement of I-195. Along with many curb openings and traffic lights, the daily volume of approximately 20,000 vehicles creates a high traffic area.

The Route 6 commercial corridor serves regional retail shopping needs, provides employment within Seekonk, and contributes significantly to tax revenue. Seekonk envisions infill and refill development along Route 6, as well as proactive economic development measures that will help ensure continued prosperity for business along Route 6 into the future.





Activity along Route 6 remains vibrant, and lucrative for big box and smaller retailers, shopping centers, and movie theatres. There are more than 40 business commercial establishments. Despite the area's success, there is room for infill and refill development, as some stores are vacant. It is important to note that several of the largest business have moved their locations to be visible from I-195 limiting the attractiveness of Route 6 as a location for large scale businesses.



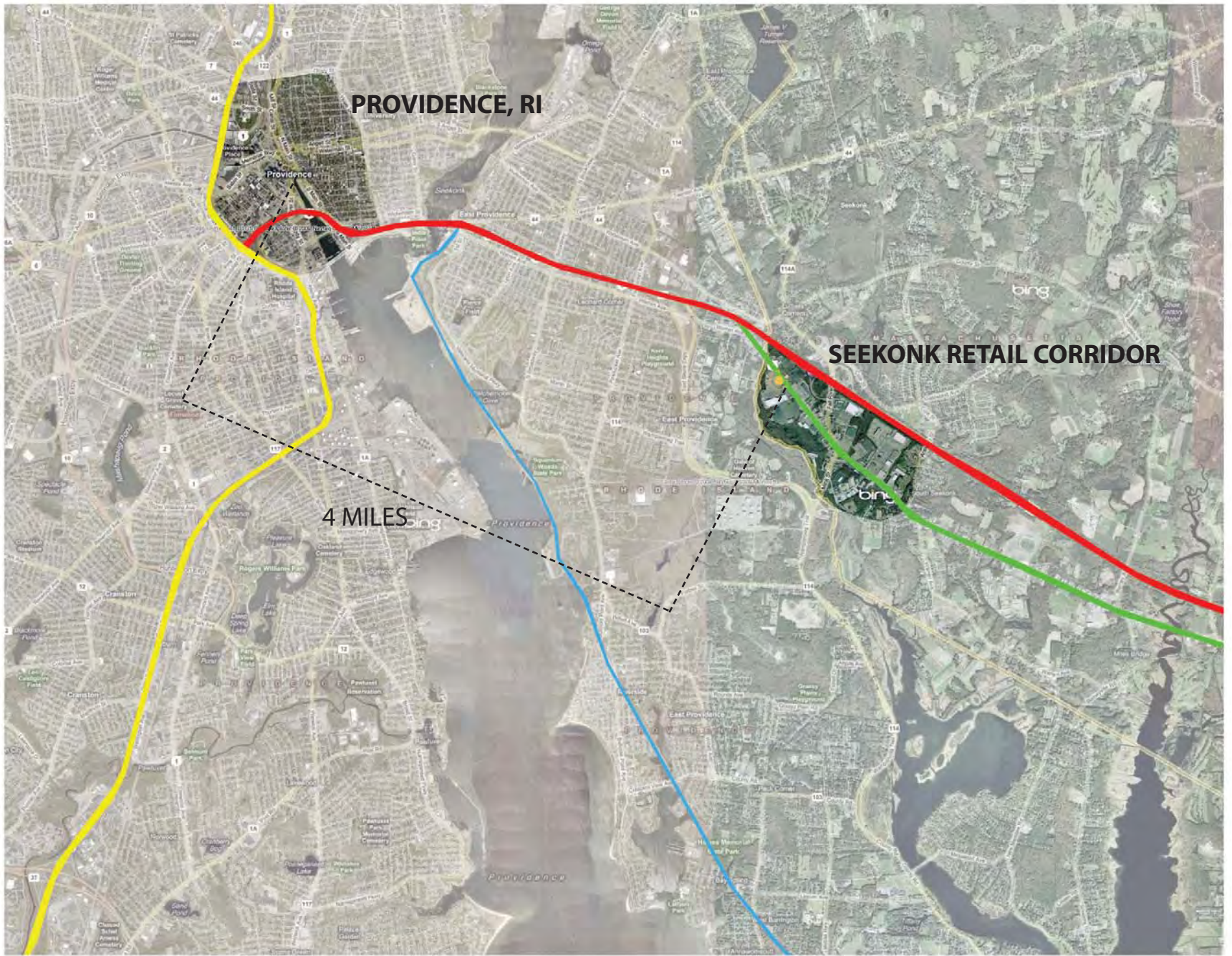






-  I-95
-  I-195
-  ROUTE 6
-  EAST BAY BIKE PATH





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[Demographics]

[Average Climate]

[Schools]

[Parking Space Requirements]

[Parking Dimensions]

[Trees]

# [Demographics]

---

Population in July 2007: **13,593**

Males: 6,598 (48.5%)

Females: 6,995 (51.5%)

Estimated median household income in 2007: **\$71,135**

*Seekonk:* \$71,135

*Massachusetts:* \$62,365

Estimated median house or condo value in 2007: **\$355,150**

Seekonk: \$355,150

Massachusetts: \$366,400

Races in Seekonk:

White Non-Hispanic (96.1%)

Two or more races (1.2%)

Hispanic (0.7%)

American Indian (0.7%)

Chinese (0.6%)

Black (0.5%)

Other race (0.5%)

Nearest city with pop. 50,000+:

Pawtucket, RI (4.2 miles pop. 72,958)

Nearest city with pop. 200,000+:

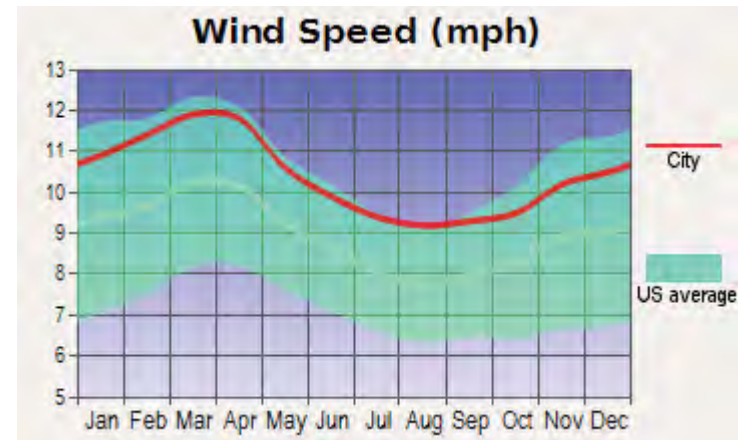
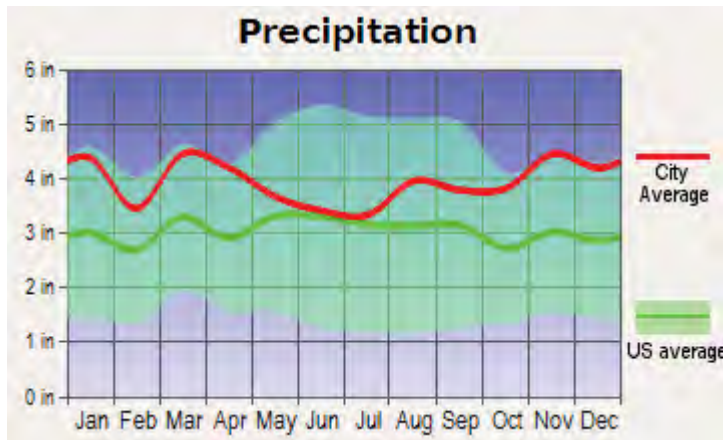
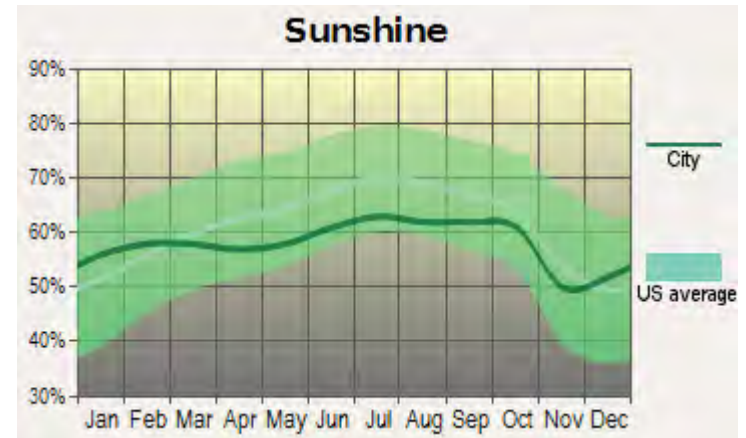
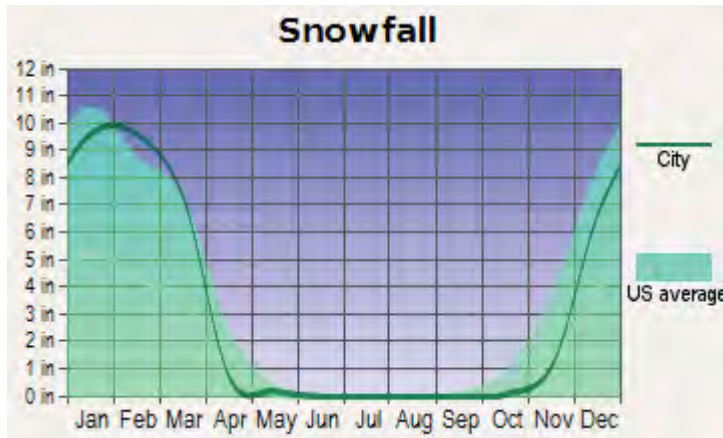
Boston, MA (36.8 miles, pop. 589,141)

Nearest city with pop. 1,000,000+:

Bronx, NY (188.3 miles, pop. 1,332,650)

# [Average climate in Seekonk, MA]

Based on data reported by over 4,000 weather stations



# [Schools]

---

## Colleges/universities with over 2000 students nearest to Seekonk:

BROWN UNIVERSITY  
JOHNSON & WALES UNIVERSITY  
RHODE ISLAND SCHOOL OF DESIGN  
RHODE ISLAND COLLEGE  
PROVIDENCE COLLEGE  
BRISTOL COMMUNITY COLLEGE  
ROGER WILLIAMS UNIVERSITY

## Public high school in Seekonk:

SEEKONK HIGH

## Public elementary/middle schools in Seekonk:

DR. KEVIN M. HURLEY MIDDLE SCHOOL  
GEORGE R MARTIN  
MILDRED AITKEN SCHOOL

## Private elementary/middle schools in Seekonk:

EAST BAY CORPORATE KIDS INC  
SEEKONK CHRISTIAN ACADEMY

# [Parking Space Requirements]

---

<u>Employees</u>	One per each employee in addition to other land uses and their required spaces
<u>Handicapped Spaces</u>	One per establishment and/or use, with a maximum of 10%, of total parking These spaces shall be a maximum distance of 50' from any accessible entrance, suitable displayed, with a safe means of access/egress.
<u>Restaurant, stadium, gymnasium</u>	One per each three seats of total seating auditorium, arena capacity.
<u>Commercial establishments</u>	One per each 200 square feet of gross floor area or fraction
<u>Swimming pool, skating rink</u>	One per four spectator capacity plus one per each 1,000 square feet of gross floor area.
<u>Sports field</u>	One per four spectator capacity.
<u>Public utility</u>	One for each 200 square feet of gross floor area.



# [Parking Dimensions]

---

Off-street parking space shall be a minimum of **nine (9) feet by twenty (20) feet**

Handicapped parking space shall be a minimum of **twelve (12) feet by twenty (20) feet.**

The minimum width of aisles and entrance drives providing access to more than two spaces shall be at least 24 feet wide. On lots where one entrance and exit driveway or access is constructed, the access shall not exceed fifty-four (54) feet in width. Where two or more driveways or accesses are constructed, the accesses shall each not exceed thirty (30) feet in width.

## Combined Facilities:

Parking required for two or more buildings or uses may be provided in combined facilities on the same or contiguous lots, where it is evident that such facilities will continue to be available for the several buildings or uses, regardless of ownership, with Planning Board approval.

## [Trees]

---

Existing trees shall be preserved or new shade trees shall be planted on the lots, a minimum of 5' and a maximum of 10', from the street line, so that a colonnade effect is achieved. Spacing between adjacent trees shall not exceed forty (40) feet. New trees shall be planted in at least one-half (1/2) cubic yard of loam, guyed and wrapped as necessary to ensure their survival.

The following species are acceptable. Others may be acceptable on the basis of the recommendation of the Tree Warden of the Town of Seekonk:

- Blackgum
- Moraine Locust
- Linden
- Ginkgo (male only)
- American Ash
- Hickory
- Thornless Honey Locust
- London Plane tree
- Japanese Zelkona

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MASTERPLAN [INSPIRATIONS]

SCHEMATIC [ONE]

SCHEMATIC [TWO]

FURTHER[DEVELOPMENT]

MID[REVIEW]

CIVIC CENTER [DEVELOPMENT]

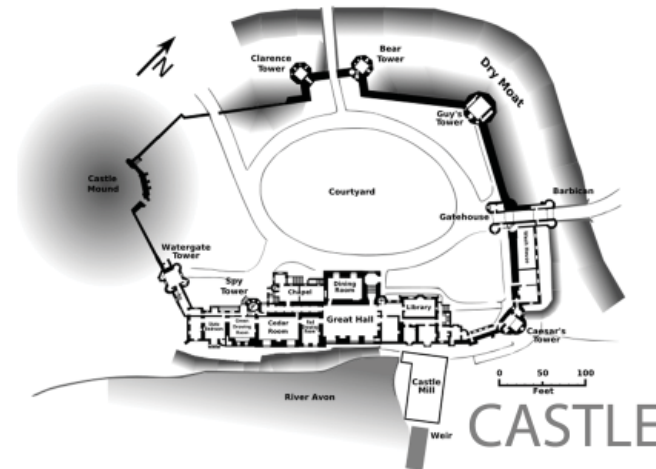
# MASTERPLAN [INSPIRATIONS]

Although abstract, it is very useful to understand how other structures and organisms function in order to give clues about how I may further understand the procedure the master planning in urban [BOXSCAPE].



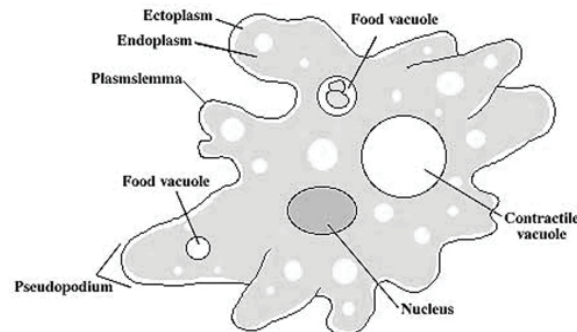
EGG

SIMPLE, ANALAGOUS ORGANISM  
 HOLDS FORM BUT CAN DISTORT TO CONTEXT  
 EASILY BLENDS WITH OTHERS OF ITS KIND



CASTLE

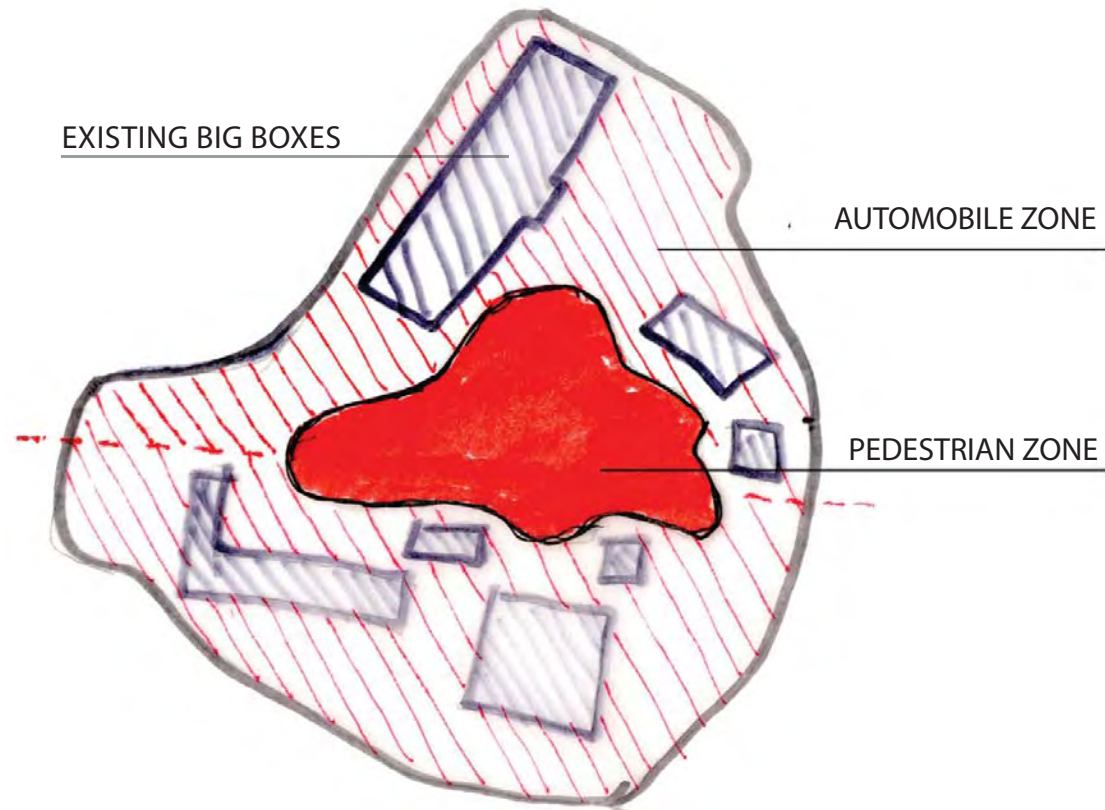
SELF-SUPPORTED  
 CLEAR PERIMETER CONTAINMENT  
 CENTRAL PUBLIC SPACE



AMOEBEA

OUTER MEMBRANE - Contain Big Boxes & Automobiles  
 INNER ORGANISM - Public/Civic Space, Shops, Walking  
 CENTRAL NUCLEUS - Civic Center





As New Urbanism is an urban design movement, which promotes walk able neighborhoods that contain a range of housing and job types. The principles and ideas of this movement have a lot of relevance to this thesis. However, the idea centers around recreating 20th century scale developments. In other words, New Urbanism looks to abolish the Big Box and its large scale all together.

Here is the reality, the large scale brought about by the Big Box retailers is so infused into our countries infrastructure that we cannot simply abolish it nor can we ignore it. Instead, we need to work with it and begin to transform the existing large scale, single use infrastructure into a city like development.

As many Big Boxes are still very active, my concept is to begin to develop the massive amounts of unorganized space which is left behind from these "Boxes". The existing stores can continue to function while civic life begins to accumulate. Once these Big Boxes reach their life expectancy, they can be transformed into many other uses as Julia Christensen has showed us and still work within the framework of the new development

## SCHEMATIC [ONE]

The pedestrian zone is developed by keeping all existing structures intact and molding to the open space in-between. Route 6 passes directly through the middle which has presented many issues including:

Why is the pedestrian zone surrounding a busy state highway?  
How will connections be made to each side without disturbing traffic?

---





## SCHEMATIC [TWO]

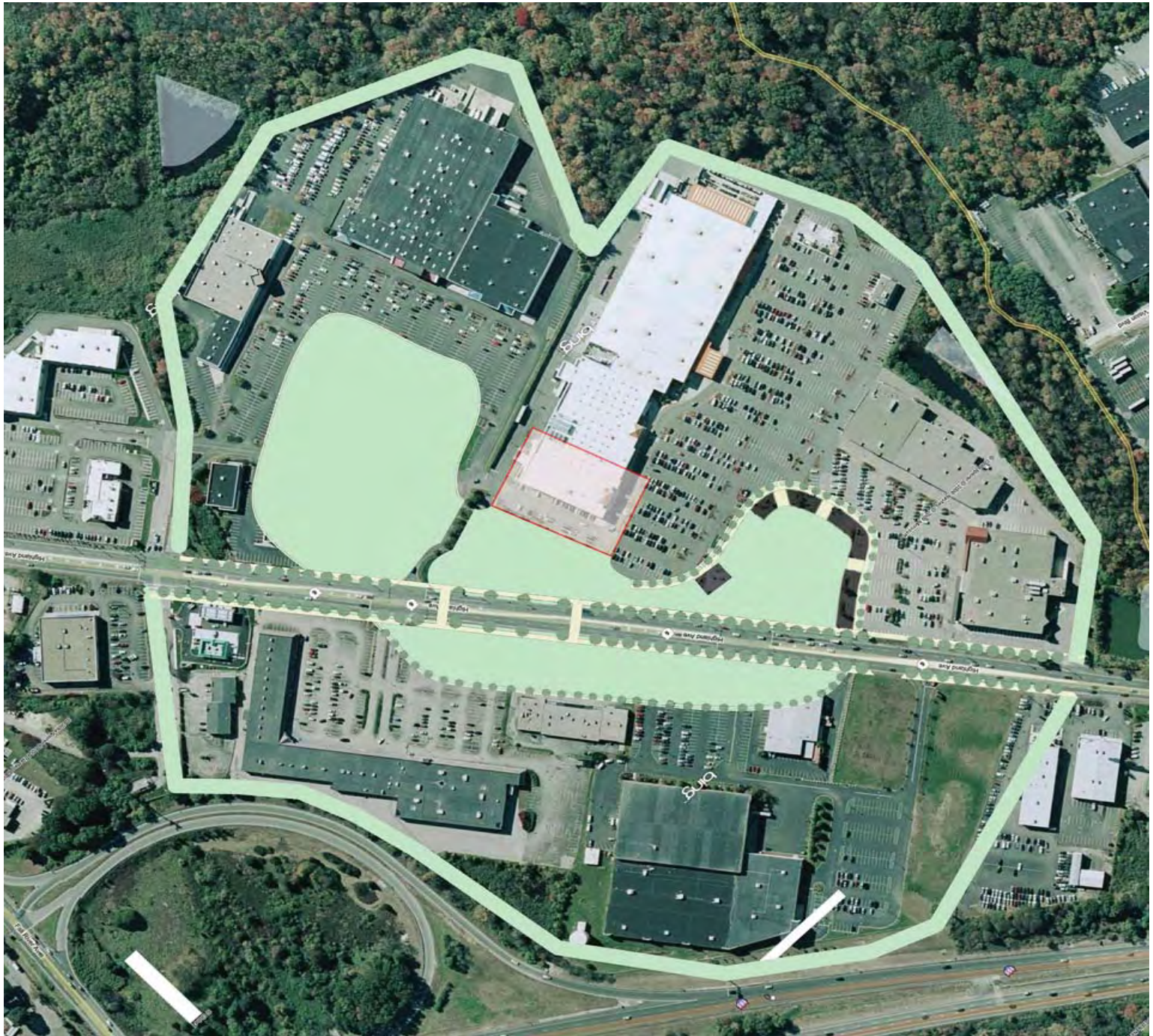
The pedestrian landscape begins to envelope a larger area. Some smaller, existing structures need to be removed while the Big Box stores form a one quarter mile radius (easy walking distance) around the central point. The Stop and Shop which is in the center of the area provides a good location for a civic center.

Even though a small pedestrian bridge is proposed in this scheme, the two sides of the Route 6 are still appearing to be severed.

---





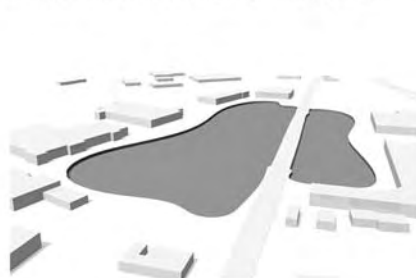




## FURTHER[DEVELOPMENT]

The excavation concept was to create a split level effect between the parking, the street-front, and the pedestrian park above. The reality of this concept did not make much sense. The thesis intentions were to build upon the existing infrastructure. This would be attempting to create a new one in a sense. It was also commented that there is still a flat plinth of parking with another flat plinth above it so how has it gotten better. The next step would be to blend the levels together and create a more connected fabric.

**excavation**  
ameoba conforms to existing infrastructure



**artificial landscape**  
continuous landscape connects area together



**housing/retail**  
built on and over artificial landscape

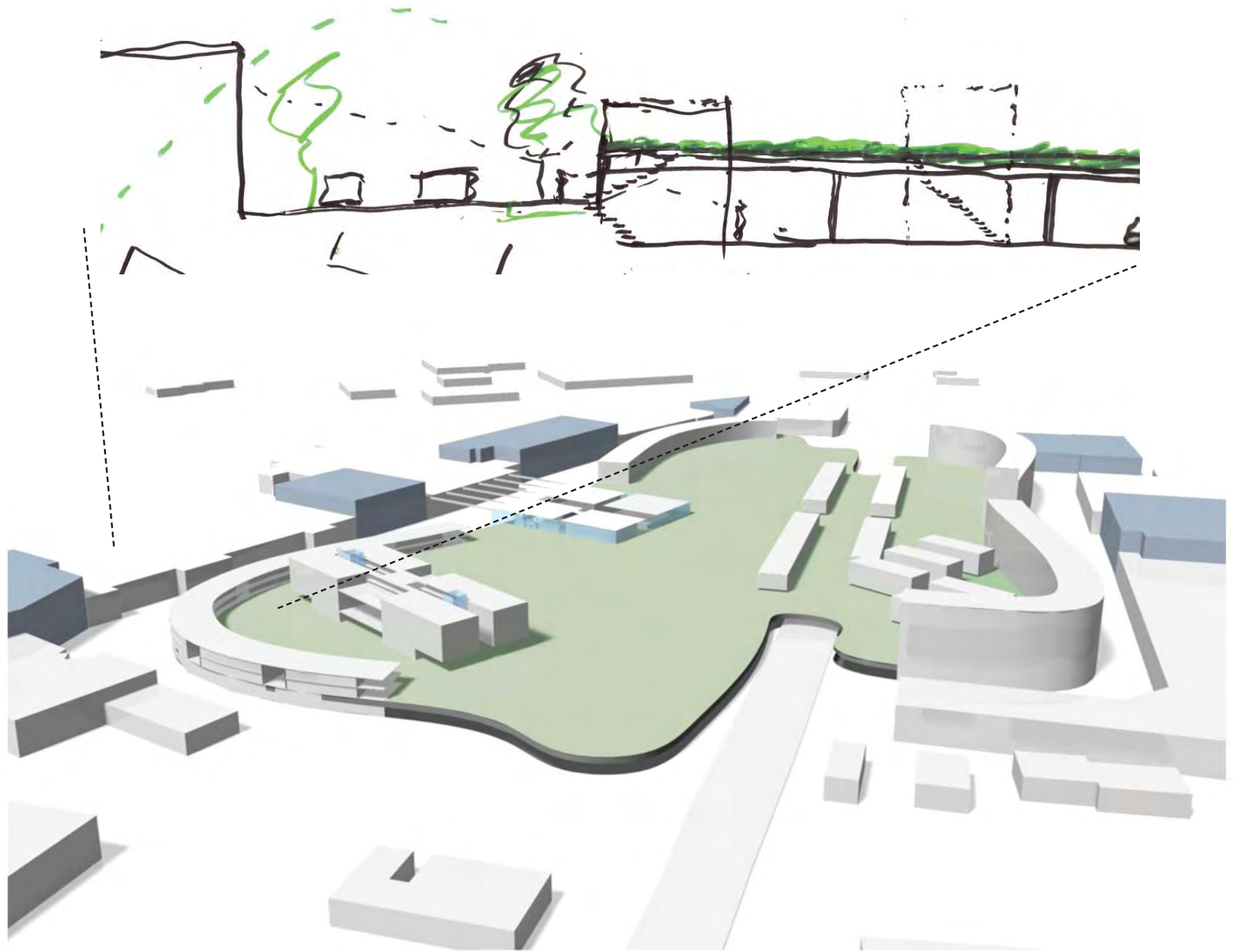


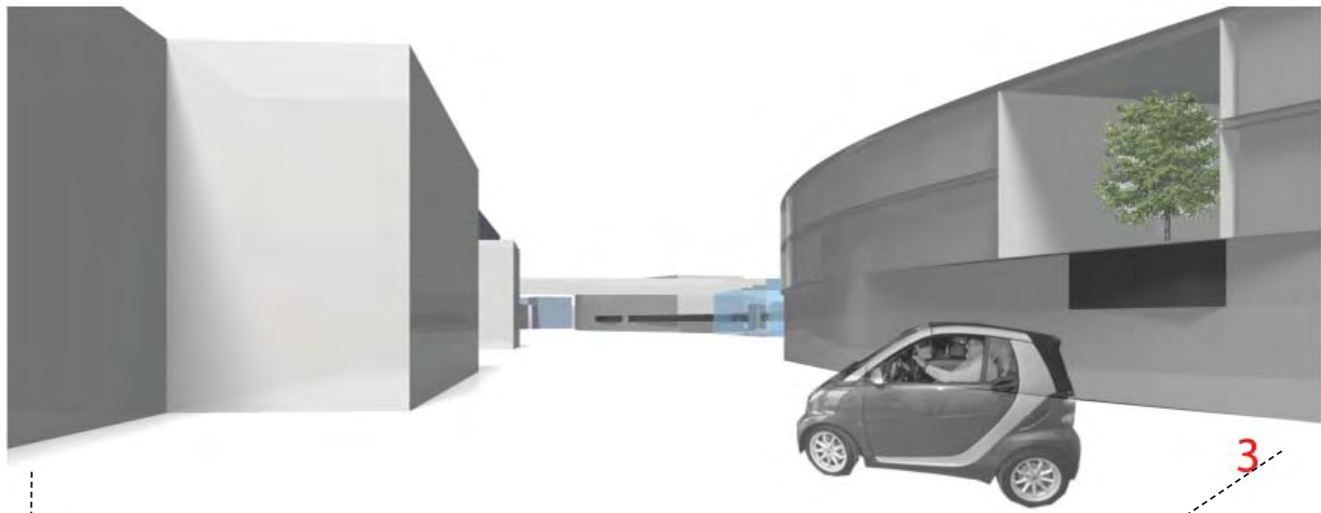
**housing/amenities**  
recreation and housing are constructed within the central pedestrian zone



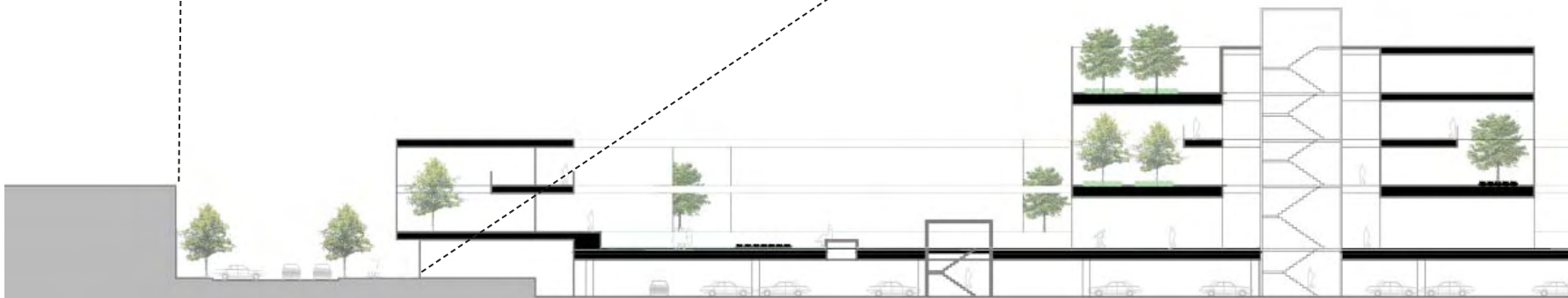
**infill**  
empty voids are infilled to maximize leftover space







3



Double Sided Streetfront





## MID[REVIEW]

The new landscape is now developed more as a fabric rather than an elevated, flat plinth. It begins to mold itself between the different levels and programs creating a continuous weave throughout the site.

The housing is still very diagrammatic and its current massing looks like it's from East Berlin. A more neighborhood structure is required. This needs to be a place people will really want to live in as currently no one in their in the right mind would live in a Big Box center.

---



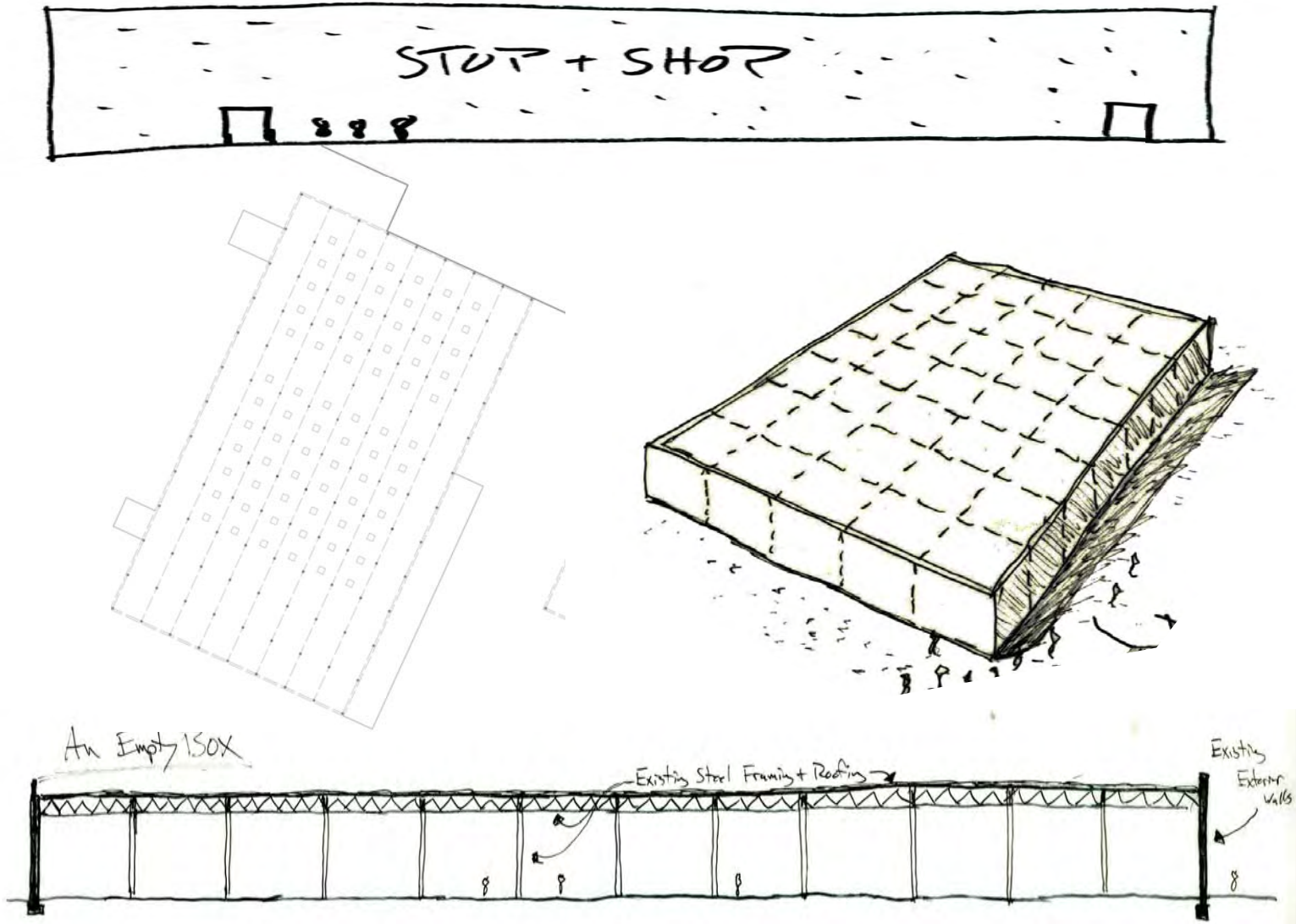


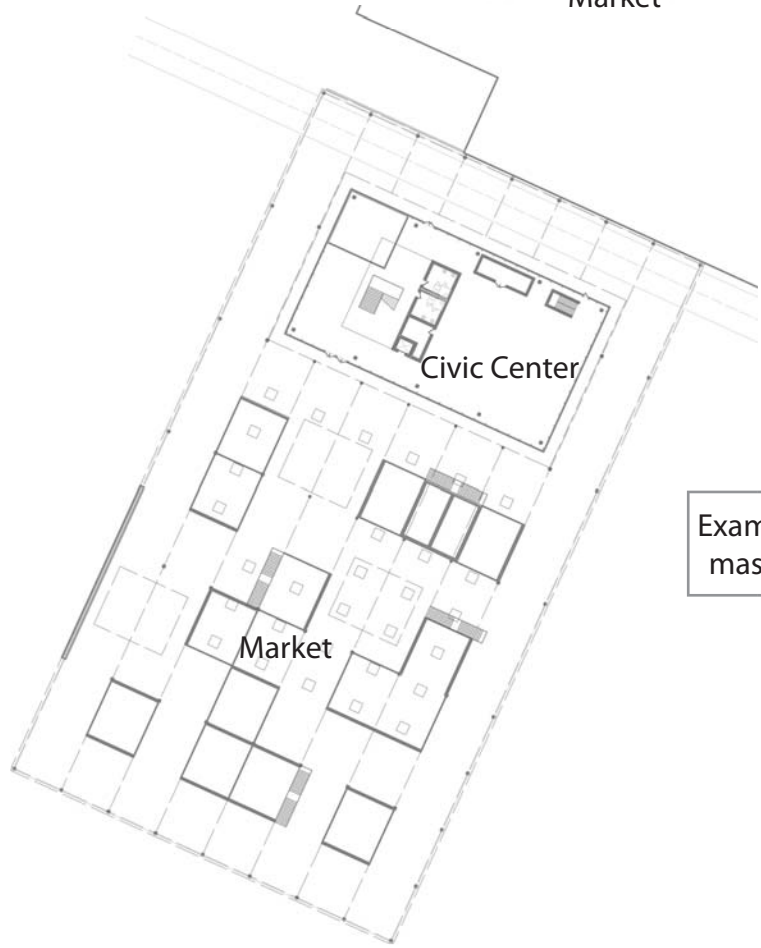
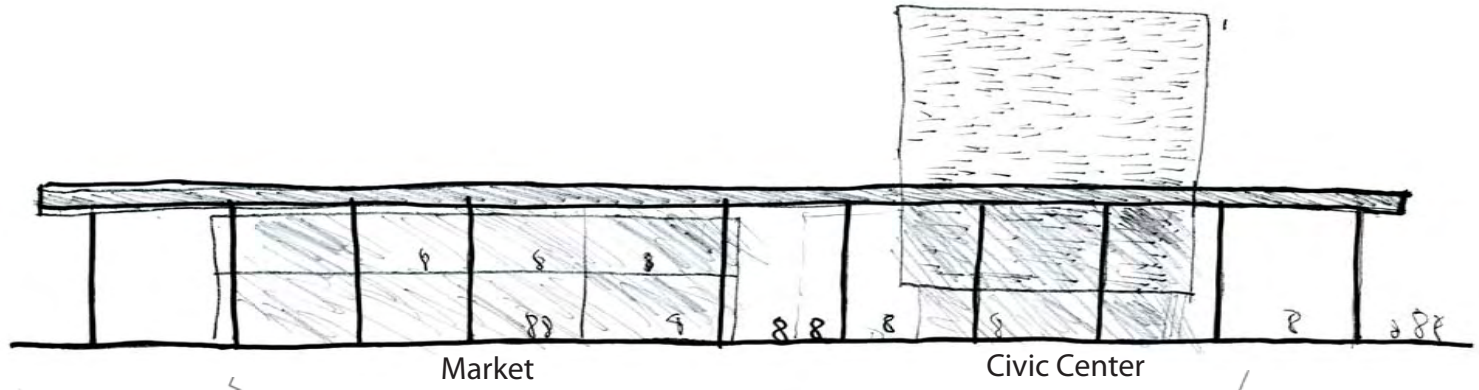


# CIVIC CENTER [DEVELOPMENT]

A typical Big Box contains a single use which is usually a large department store or retailer. The concept here is to combine Civic program with shopping functions within the framework of one structure.

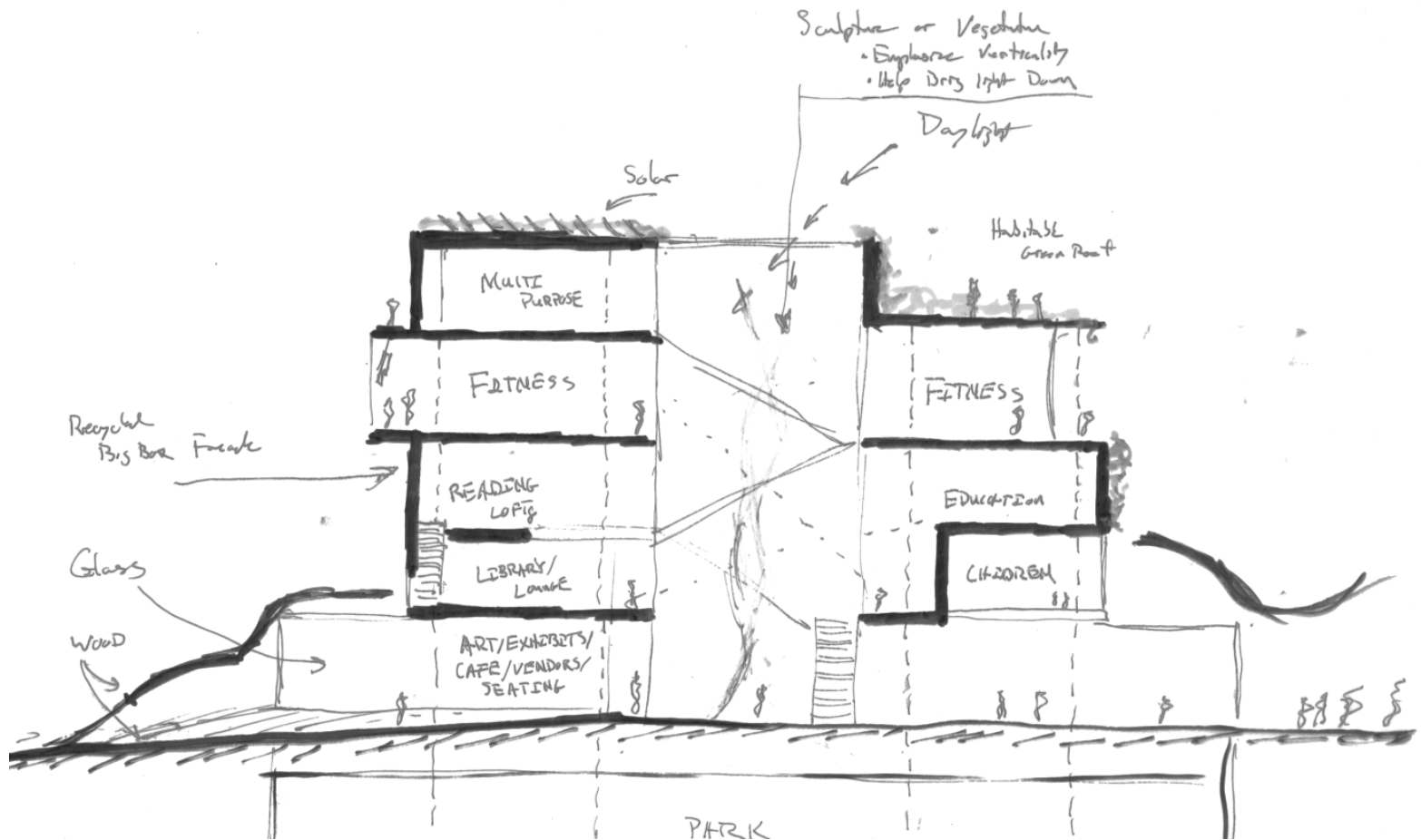
What if we can reuse a Big Box to accomplish this since the structure already exists?





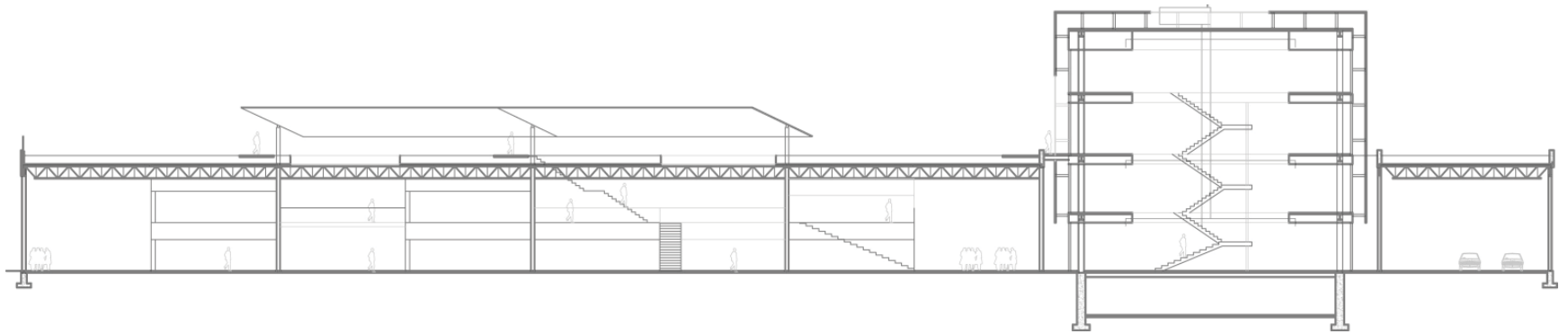
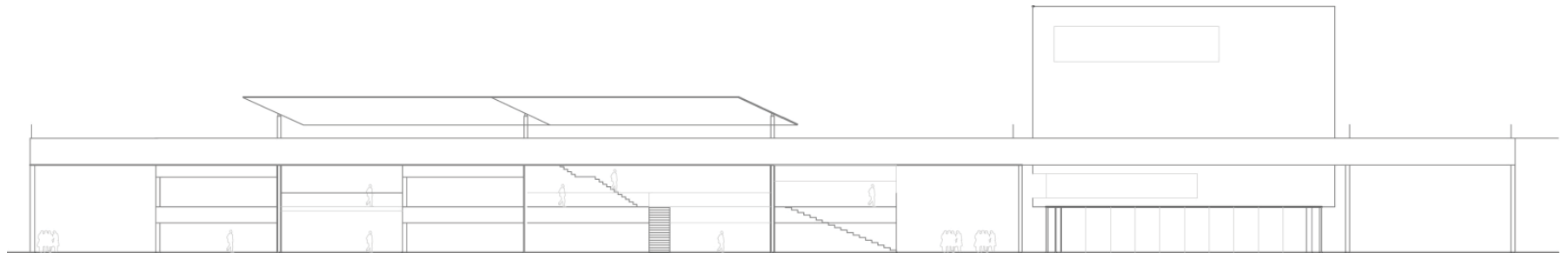
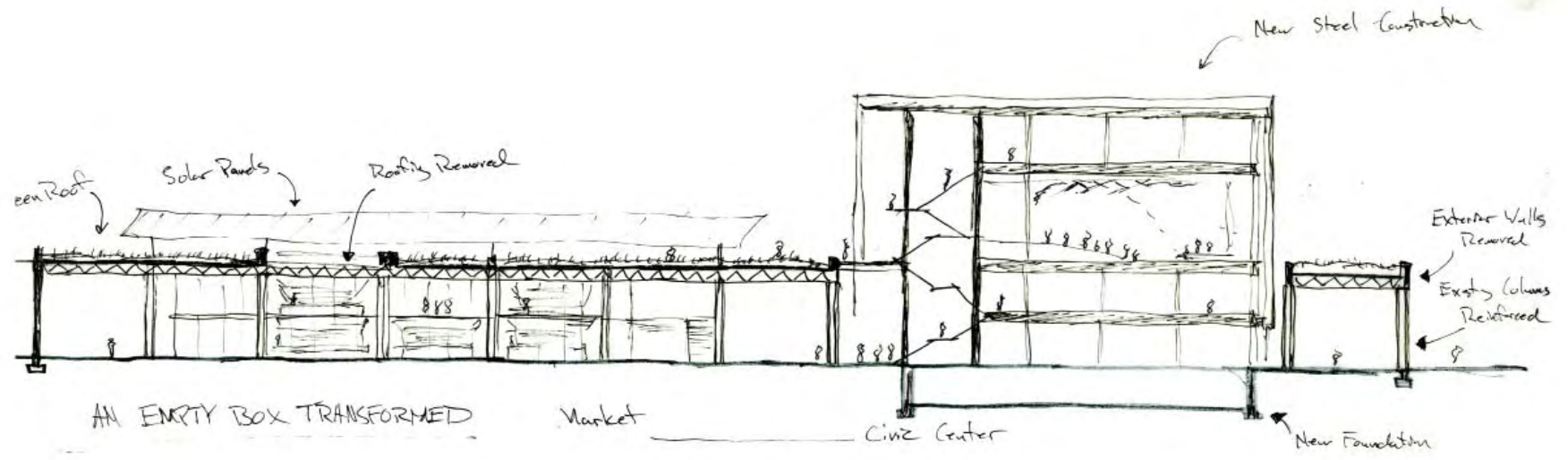
Example of a couple of the massing schemes tested.





This very early sketch reveals the process in which I developed the civic center. It is meant to build the program vertically in a more dense and communal environment as sprawl does the opposite.

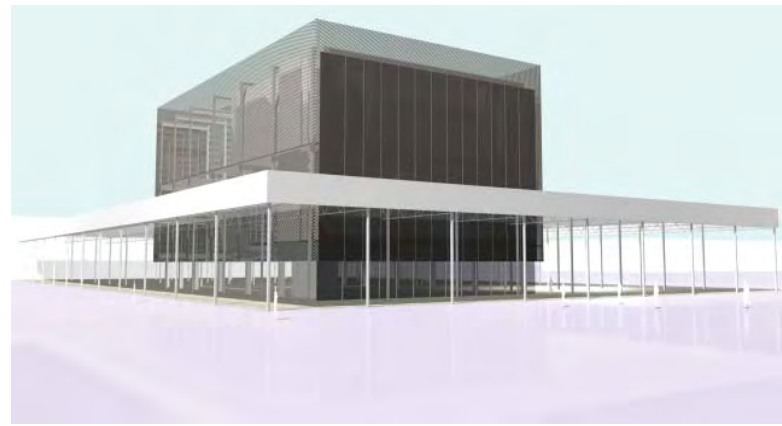




The Civic Center is switched with the market in order for the Civic Center to address the public plaza and create a more iconic view to the surrounding area and Route 6 drivers.

The parking lot accesses in between the two.







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URBAN [BOXSCAPE]

CENTER CULTURE IDENTITY

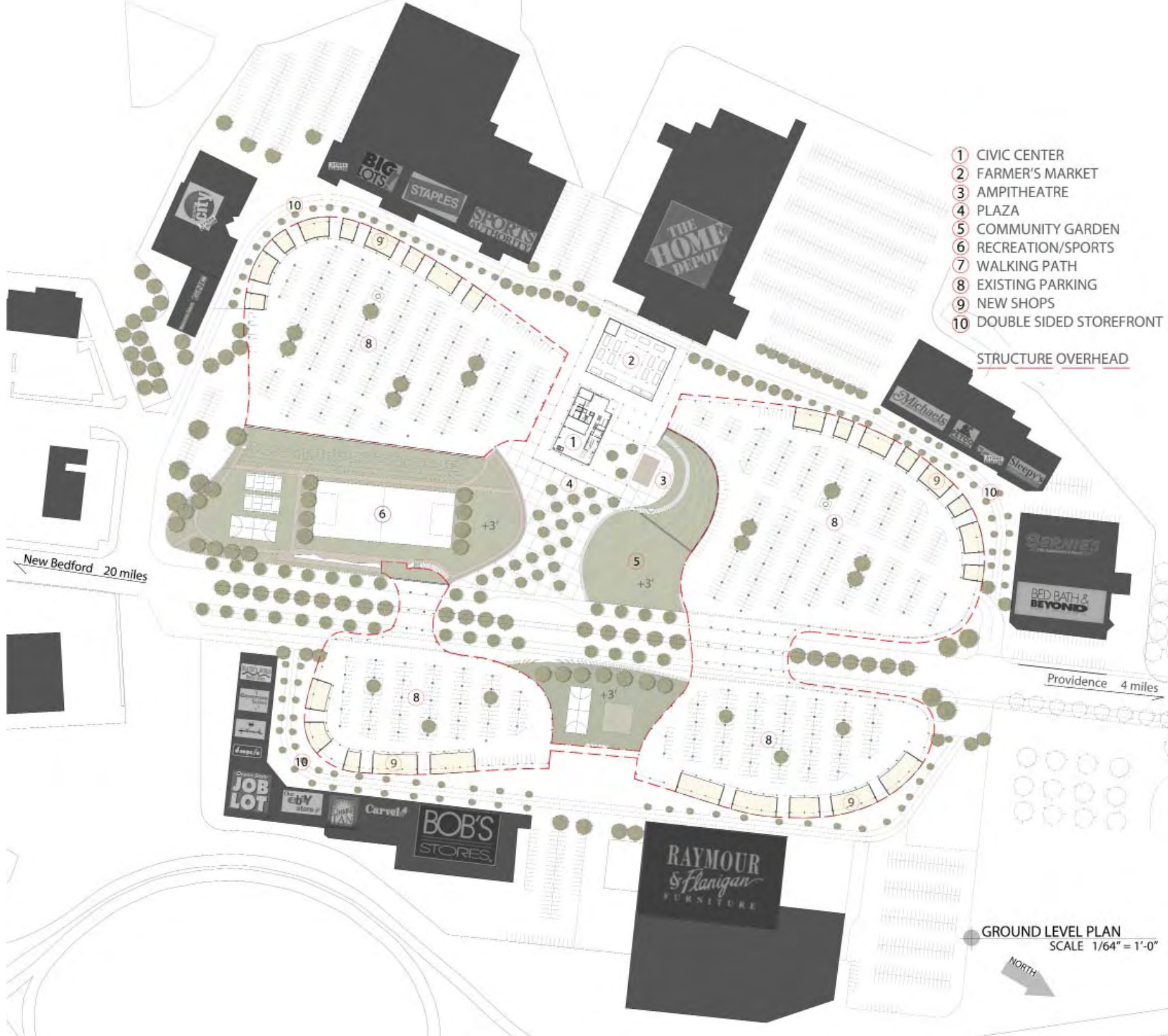
HARVEST [BOXSCAPE]

LIVE [BOXSCAPE]

URBAN [BOXSCAPE]







- ① CIVIC CENTER
- ② FARMER'S MARKET
- ③ AMPITHEATRE
- ④ PLAZA
- ⑤ COMMUNITY GARDEN
- ⑥ RECREATION/SPORTS
- ⑦ WALKING PATH
- ⑧ EXISTING PARKING
- ⑨ NEW SHOPS
- ⑩ DOUBLE SIDED STOREFRONT

STRUCTURE OVERHEAD

New Bedford 20 miles

Providence 4 miles

GROUND LEVEL PLAN  
SCALE 1/64" = 1'-0"

NORTH













Improved highway to give the essence of the once rural landscape

Pedestrian bridges connect severed shopping plaza







**27 New Shops**

Form a double sided shopfront w/  
the existing Big Boxes.

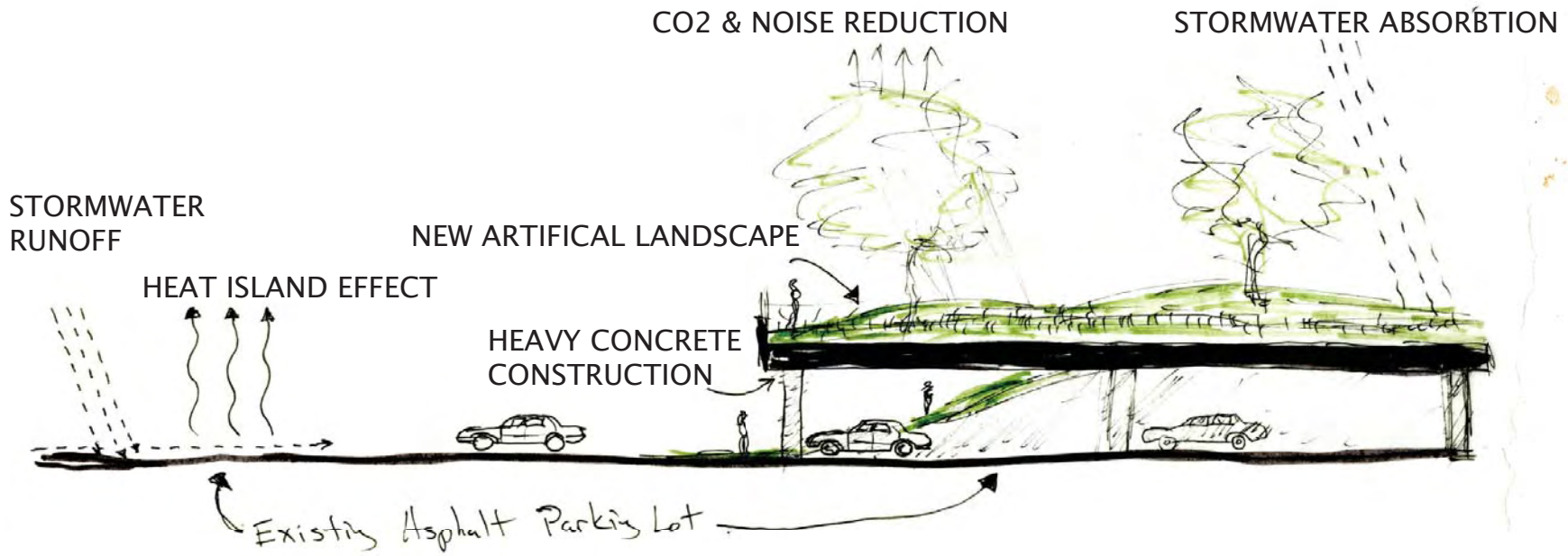
Serve as an incubator for urban streetlife

**Varied Shop Sizes include:**

1,800 sq ft

2,500 sq ft

3,200 sq ft



Asphalt



Evaporative pad



The parking spaces are located under this new platform. It is an open, naturally ventilated and naturally lit up space. Planted courts and natural soil connect the level to the outside.

Existing Uncovered Parking = **1317**  
Covered Parking = **1290**

Total Parking = **2610 parking spots**







A generous open public space covering a one storey parking deck is defined









View from pedestrian bridge over Route 6

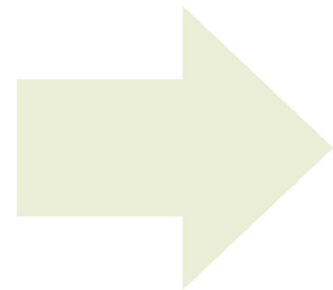
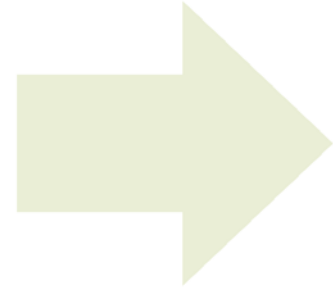


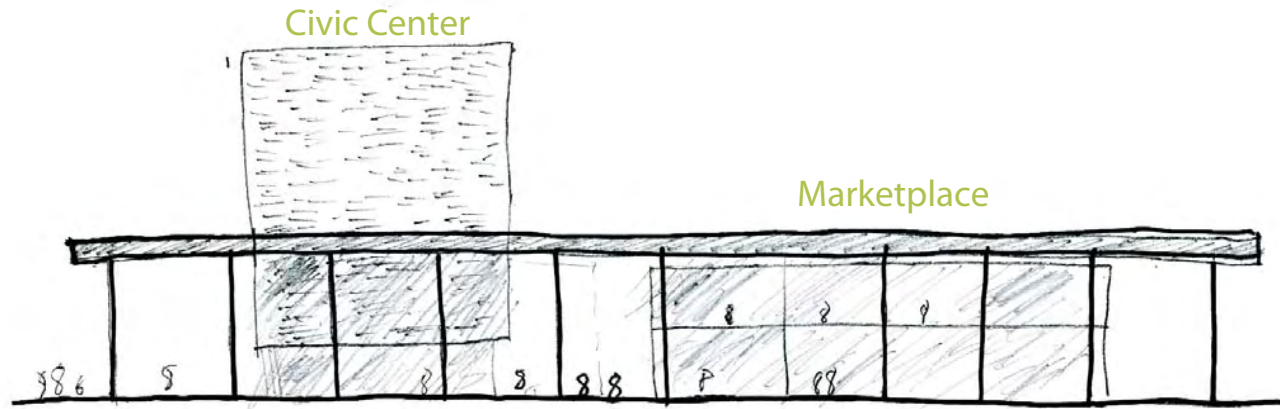
# CENTER CULTURE IDENTITY

In order to attract public interest as well as private investments and developers, it is important for a place to have an identity and a center. Without identity and center, this place would not even be a place at all. It would be just another single use, monotonous Big Box landscape.



STOP + SHOP

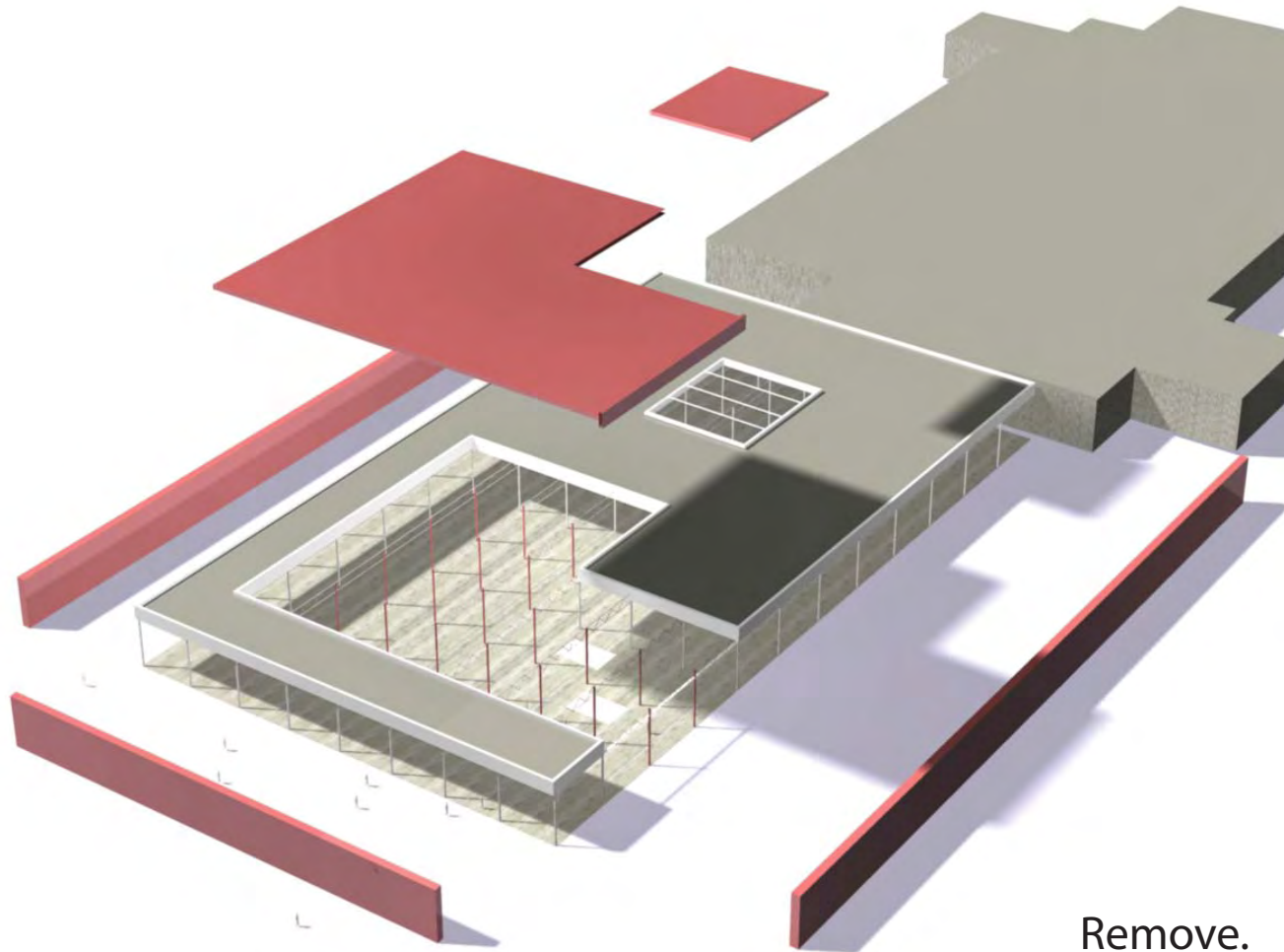




It's not about erasing the existing and creating the new. It is about transforming the existing to accommodate a more sustainable way of life.



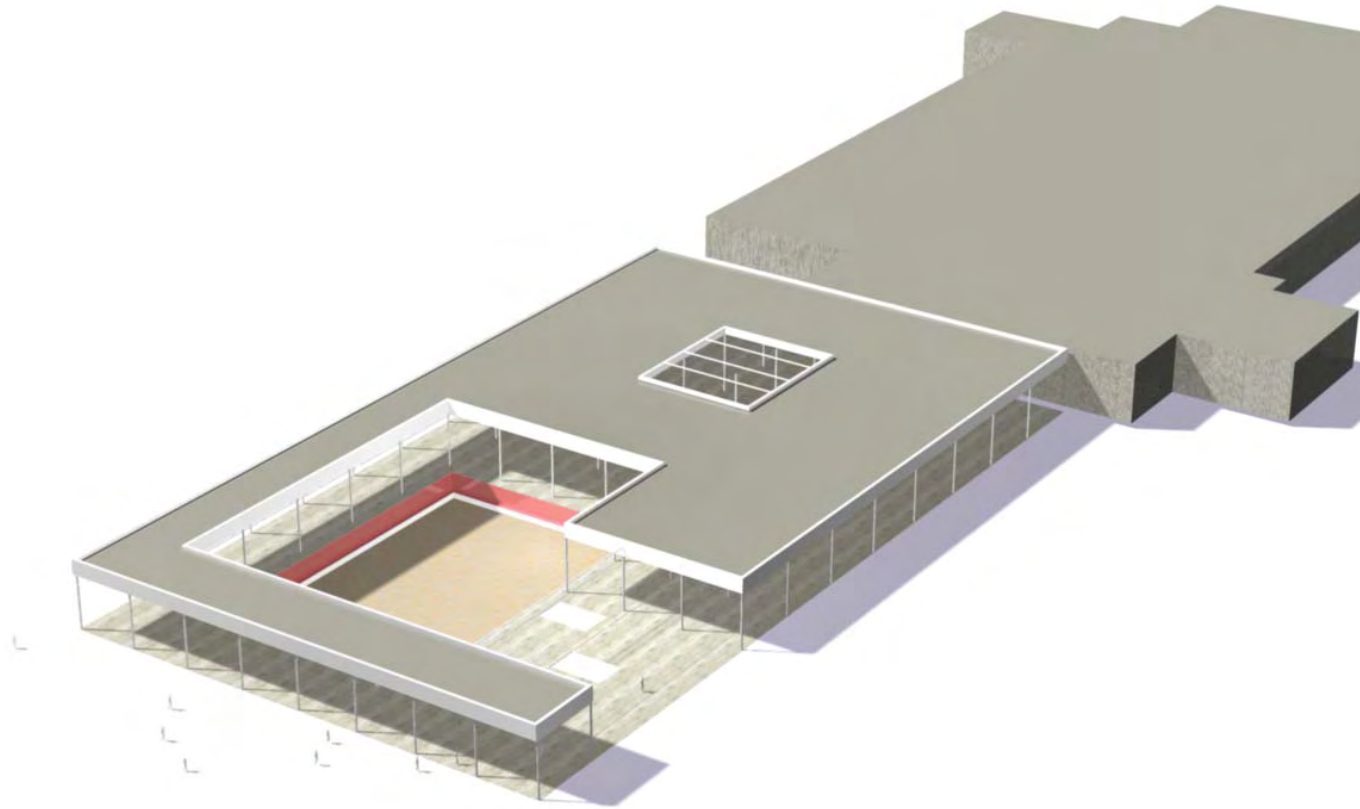
# TRANSFORMATION [PROCESS]



Remove.



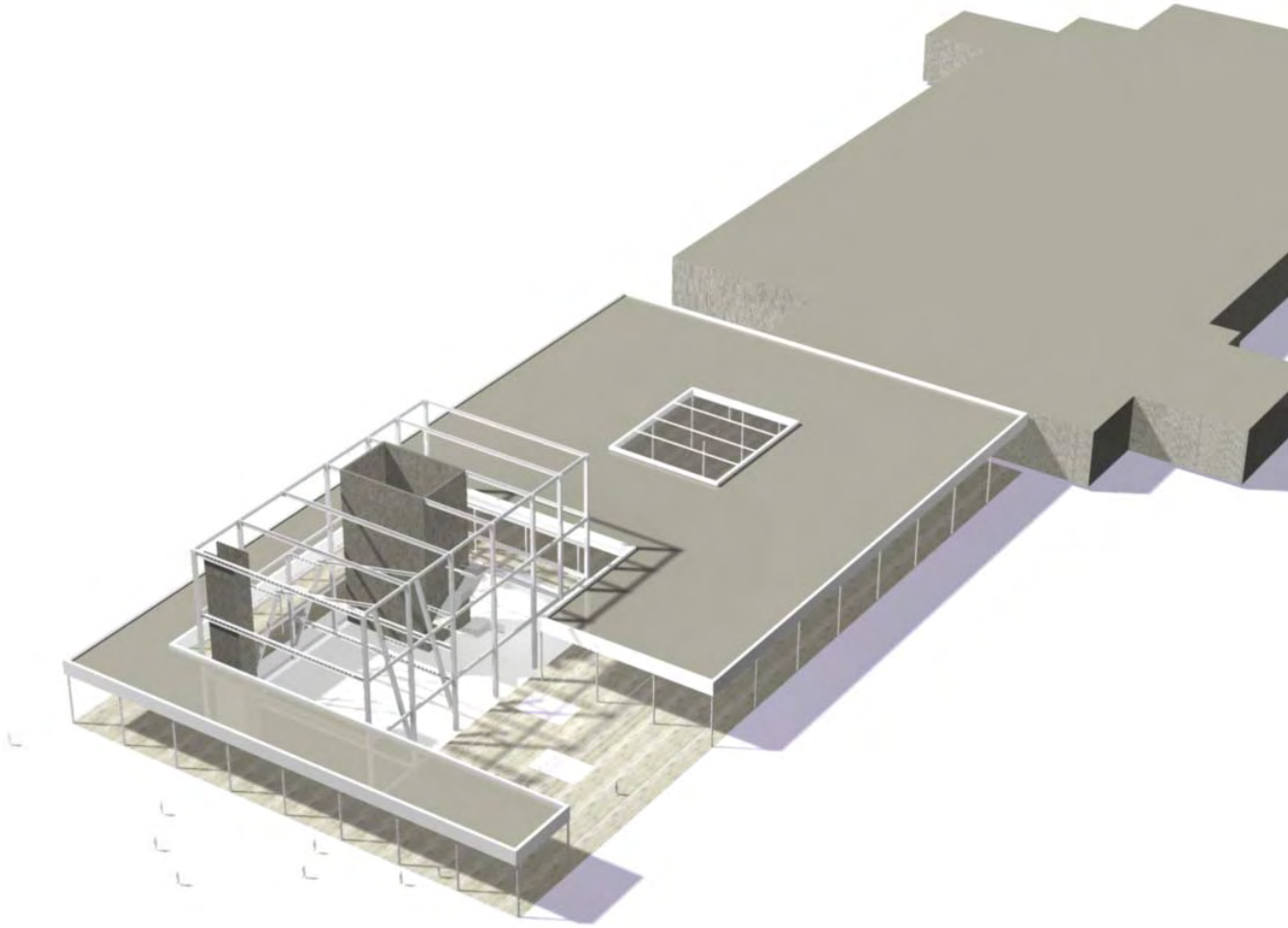
Typical Big Box construction consists of steel frame columns with a non load bearing masonry wall. The aim in this transformation is to maintain the existing steel frame structure (along with the supporting trusses) while removing the masonry walls. The result would establish physical and visual connection between the exterior and interior.



Excavate.

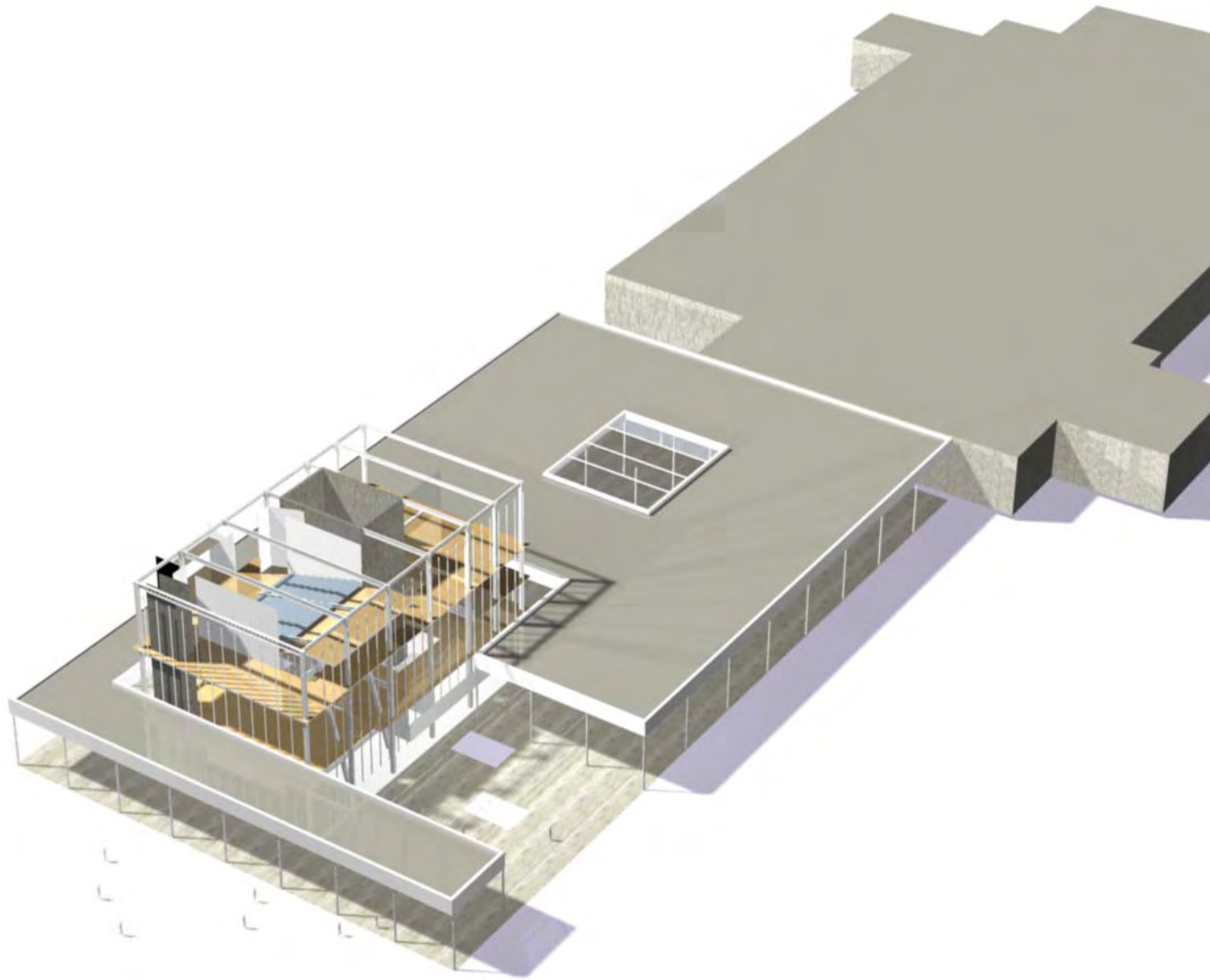
A portion of the roof is removed for 2 reasons. The first would allow construction machinery to physically get into the site. The second reason would be that this portion of the roof removed would later become a public plaza and an amphitheater backdrop. Excavation for a new foundation would be required.





Constuct.

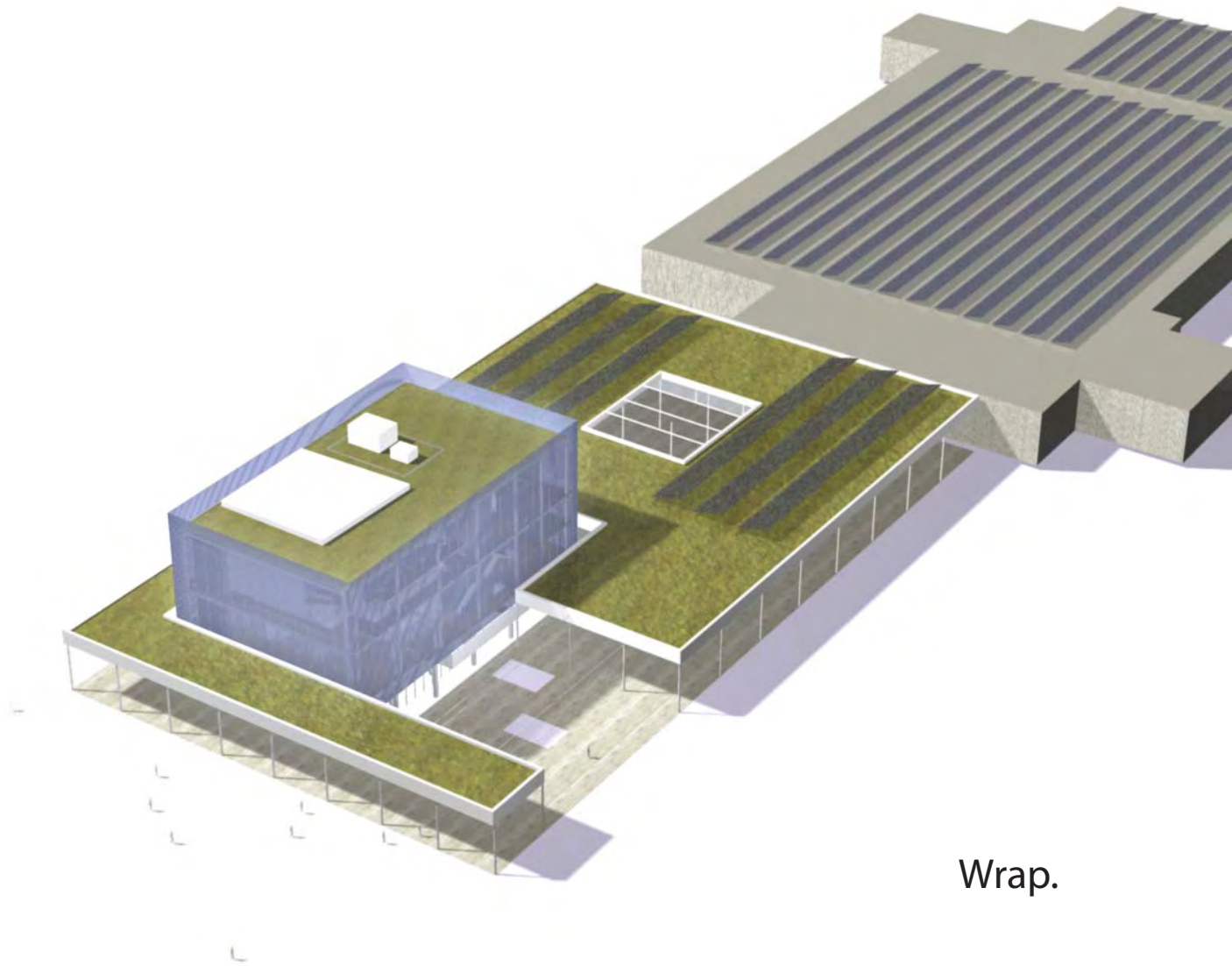
New steel frame construction extends the civic center “through” the roof. It possesses a verticality which is quite opposite from its surroundings yet maintains a Box like form. An off centered concrete core contains vertical circulation and mechanical and service spaces.



Program.



The program of the civic center is meant to be contained within this narrow vertical structure in order to promote a sense of density and closeness which again is opposite of the existing conditions of a Big Box store.



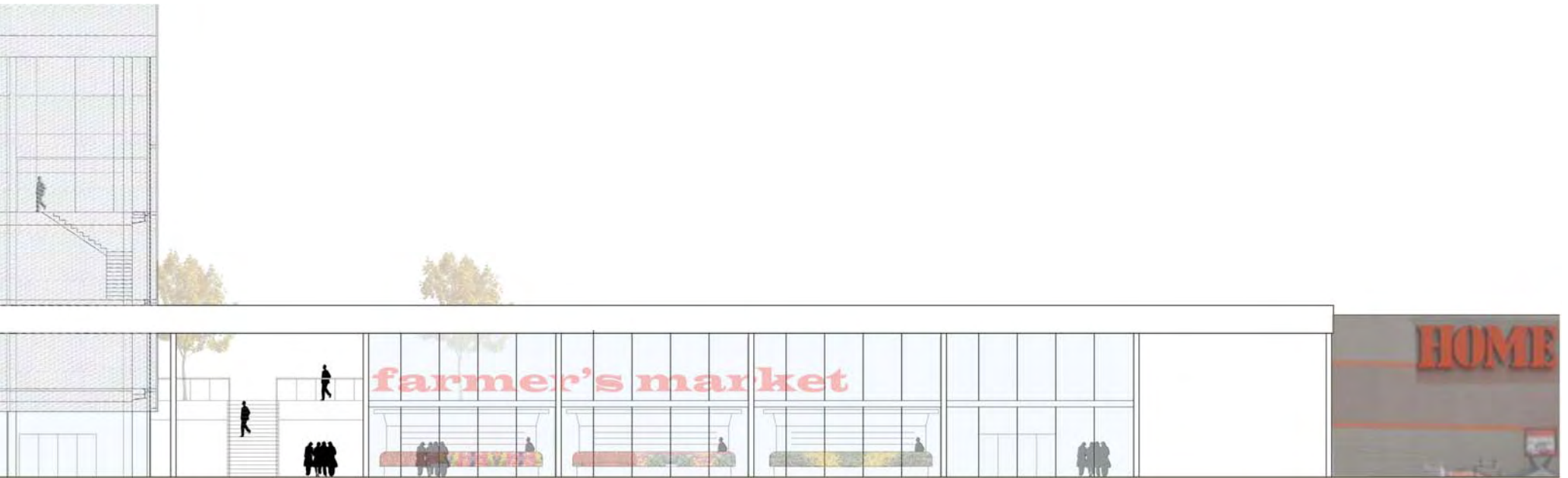
Wrap.



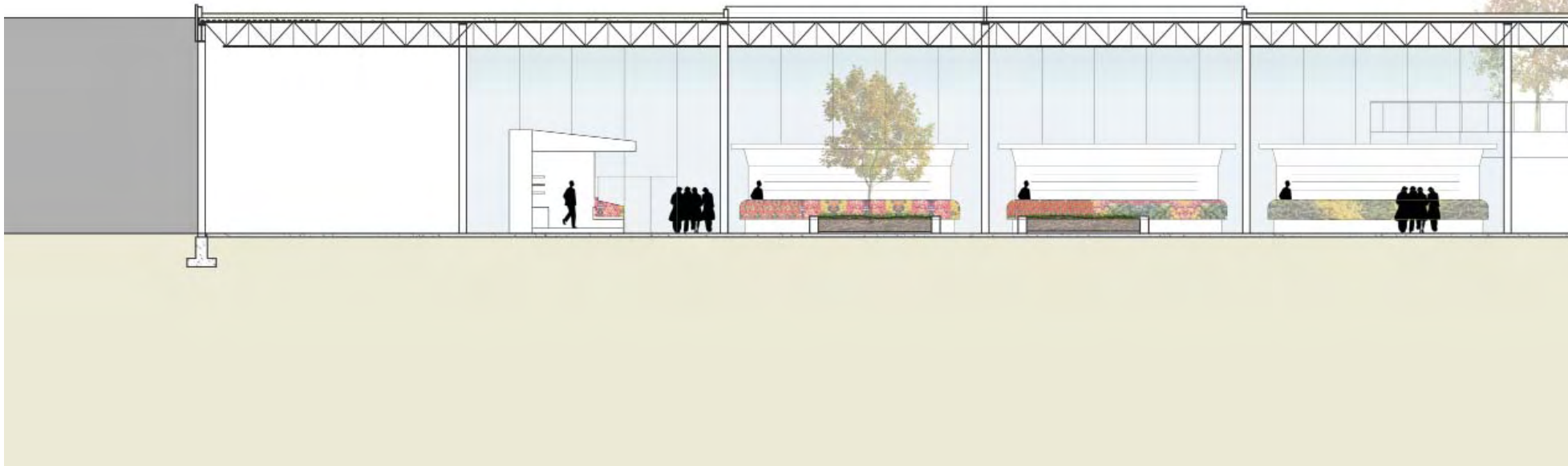
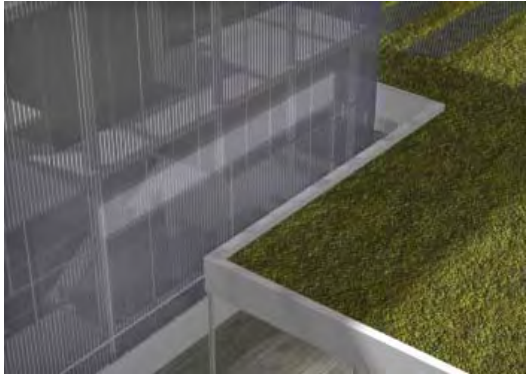
As a Big Box store would be wrapped in masonry, the Civic Center is to be wrapped with a wire mesh material which from afar looks like a solid box but moving closing, it reveals a level of transparency which lets light pass through in both directions. Using Illumesh, the façade can become an interactive screen which can create a strong identity and be used for a variety of occasions.



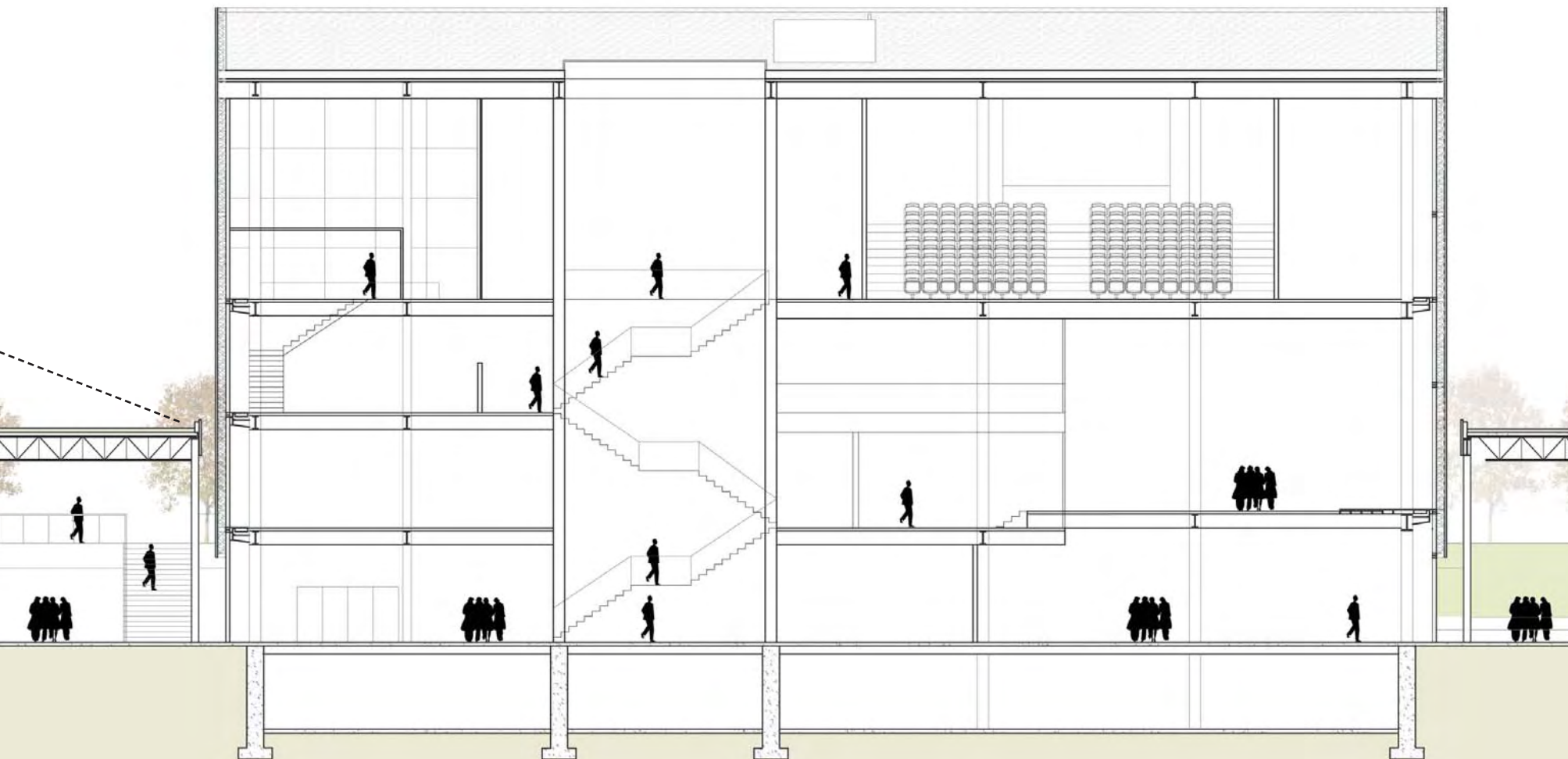




North Elevation







Longitudinal Section

## CONTEXT & DEMATERIALITY

Simple Geometric form derived from the sea of Big Boxes.

Vertical orientation condenses the typical horizontal layout and generates **density & proximity**

Metal mesh facade reads as a solid box from afar but its transparency begins to **reveal light, movement, and activities** within.

Mediamesh feature allows for a variety of projections, events, and an **iconic center**.



## MEDIAMESH

Mediamesh is a patented system used for the medialization of large facade surfaces.

The basic concept of Mediamesh is a stainless steel mesh fabric with interwoven LED profiles and with connected media controls installed behind it. The LEDs render the images onto the facade, providing the ability to display a wide spectrum of graphics, animated text and video.

This transparent system that does not completely close off the facade. The architecture of the building is thus not destroyed and, when turned off, the facade is also integrated as a harmonious element of the architectural design.



*T-Mobile headquarters in Bonn, Germany*

Installed 300 square meters of LED-based Mediamesh which was applied to the front of its building



The **plaza** works within a park-like framework, and calls for multiple functions. The plaza must be inviting to small numbers of users on a daily basis; yet, serve effectively for crowds of one to two thousand. It is envisioned as a daily gathering space for downtown workers and shoppers, including spontaneous performances.



*Political Rallies*

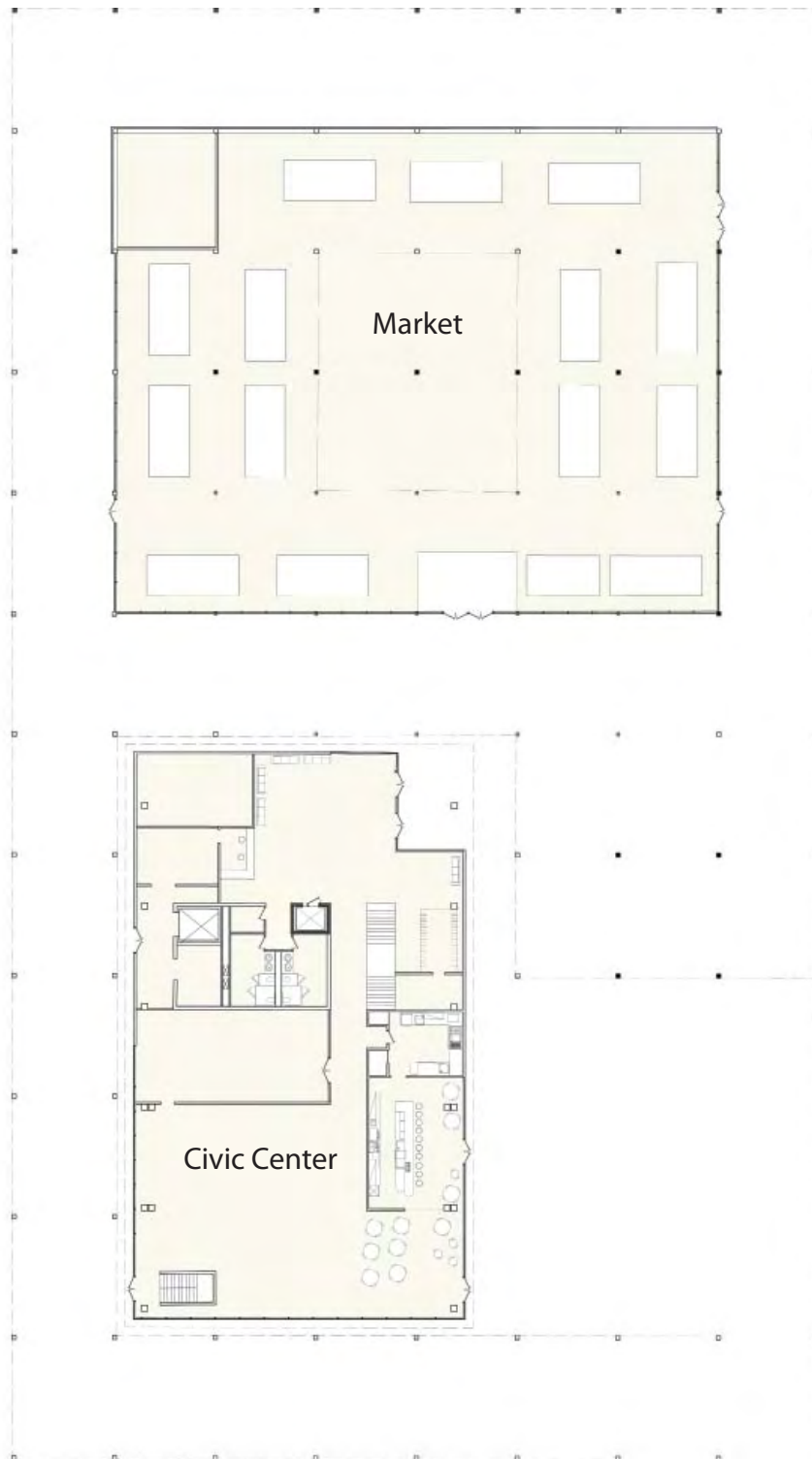
In the evenings programmed activities such as concerts and other performance events are anticipated.  
On weekends larger gatherings can be planned.





*Evening Concerts*





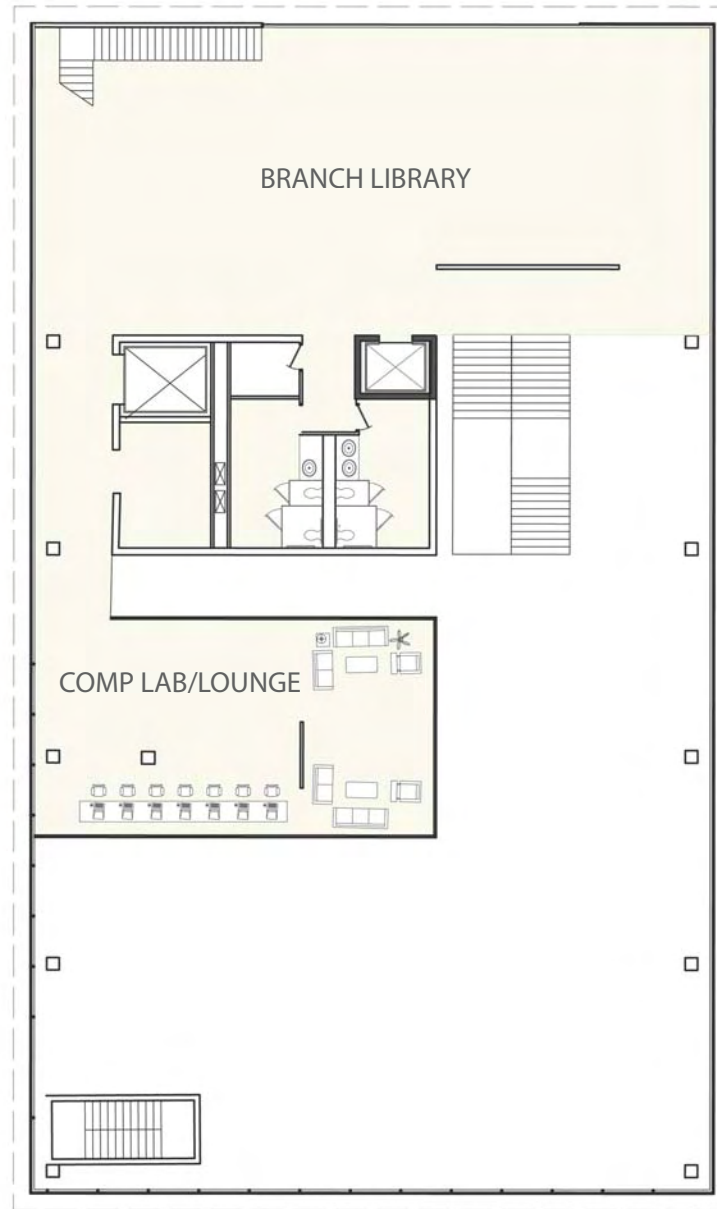




Ground Floor Plan

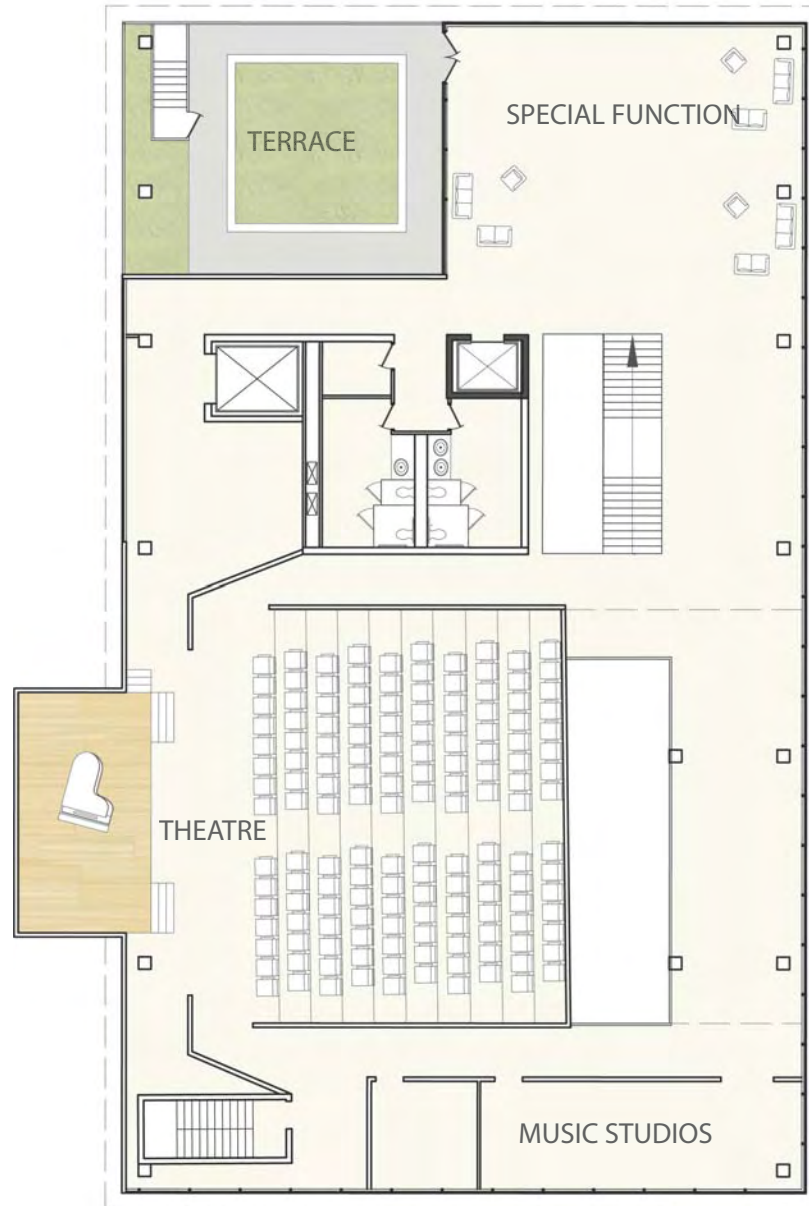


2nd Floor Plan

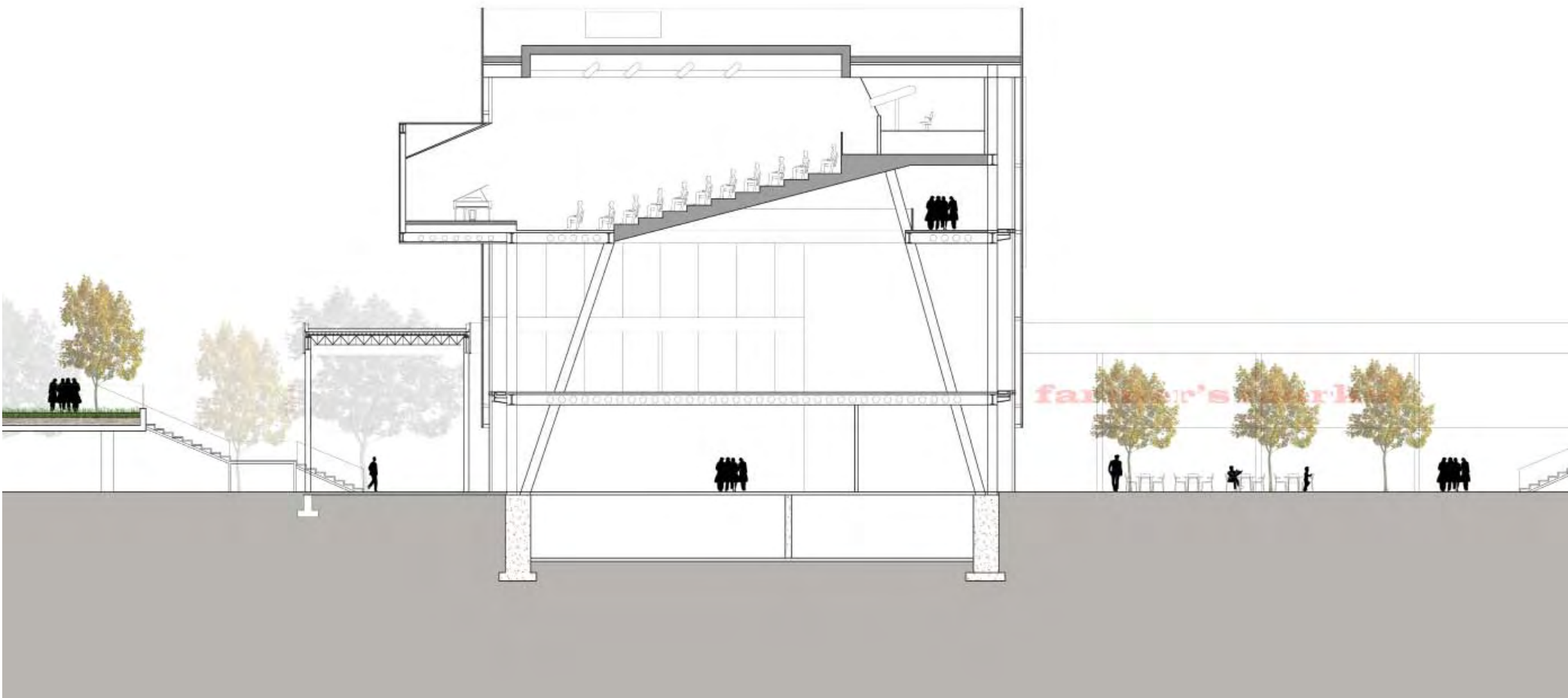


3rd Floor Plan





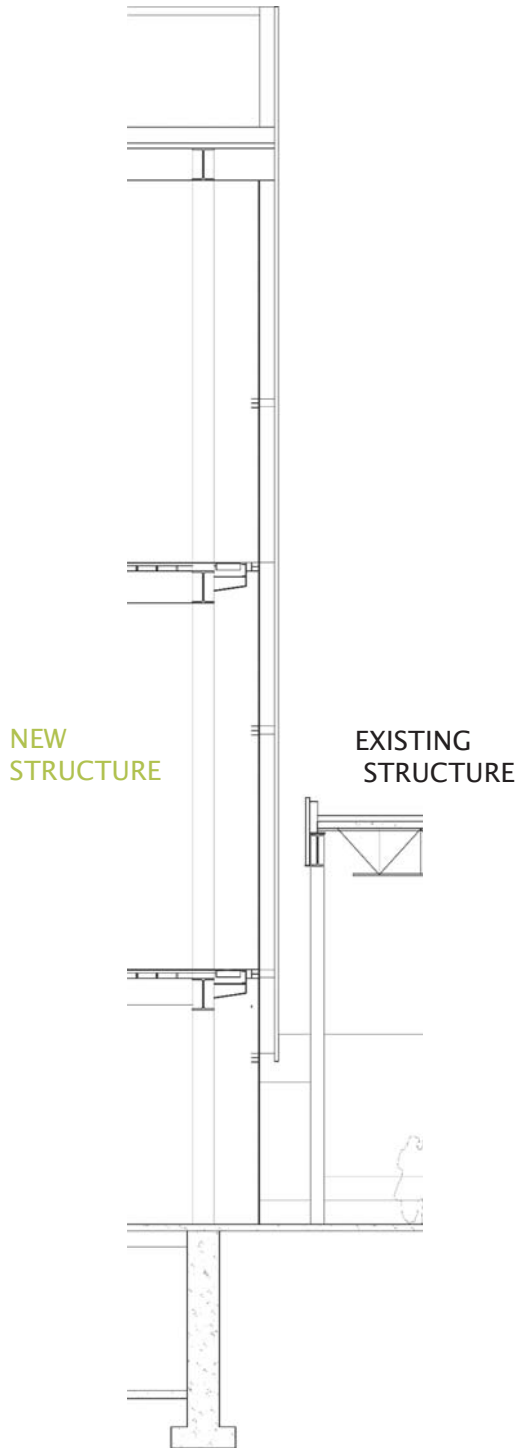
4th Floor Plan



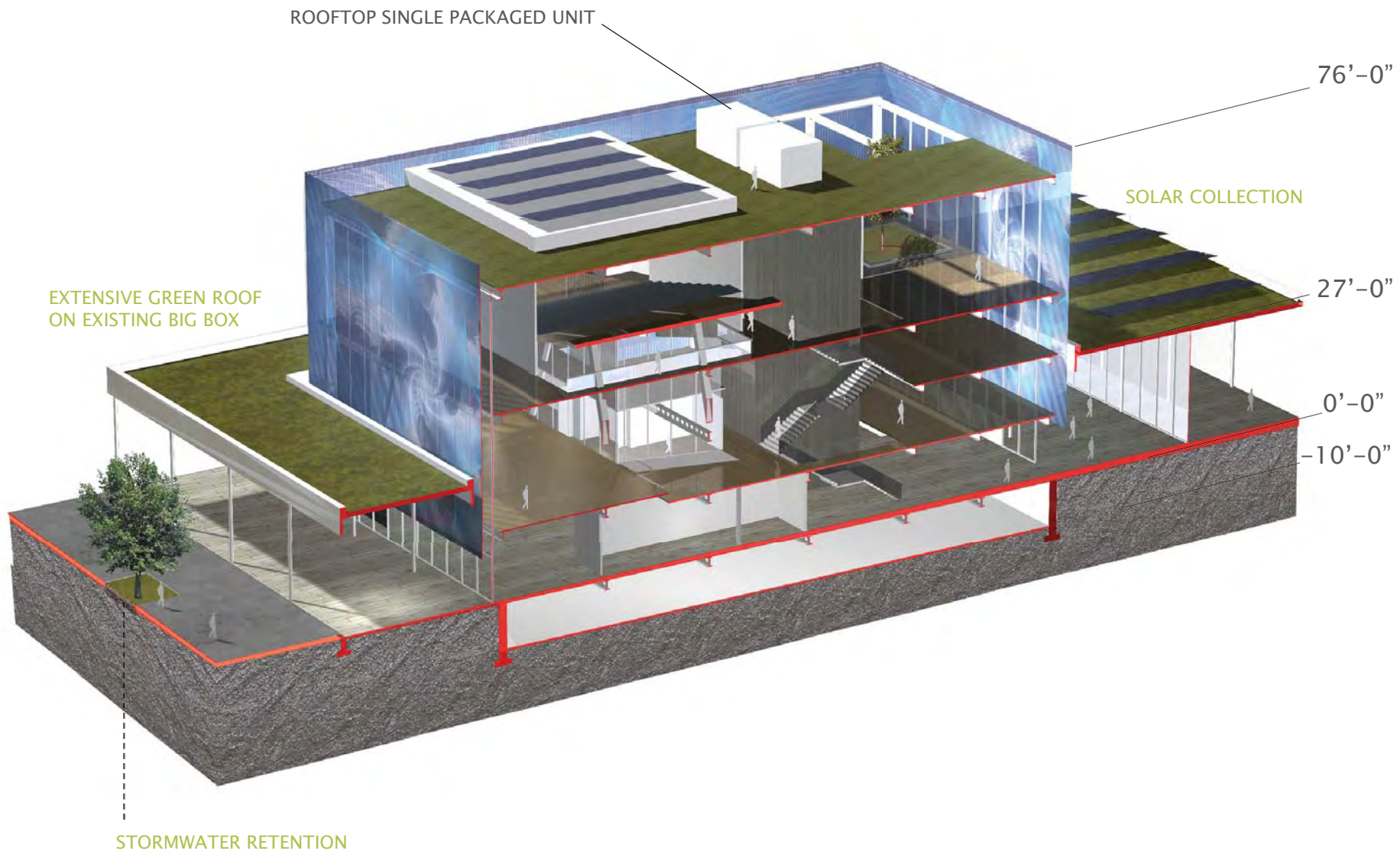


Cross Section





|Wall Section



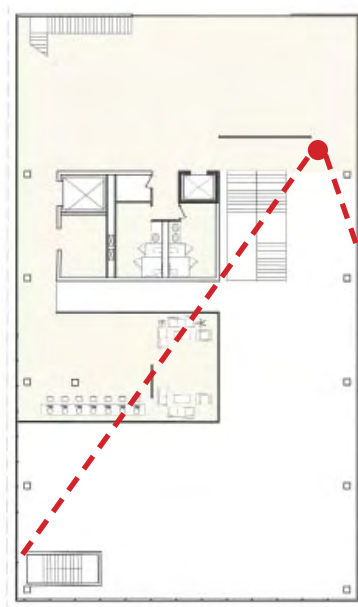
Section Axon







*Multi-Purpose Auditorium*









# harvest[BOXSCAPE]

From 2002 to 2007, 3.2 million acres of farmland in the United States were lost to development, with over 1,700 acres following them every day. The BOXSCAPE has an opportunity for a new kind of business and landscape: It's an opportunity to reclaim the productive pastoral atmosphere of the land before sprawl.

- 1 Farm Storage
- 2 Orchard
- 3 Public Path
- 4 Crop Field
- 5 Farmer's Market
- 6 Constructed Wetlands
- 7 Rooftop Solar Fields
- 8 Wind Turbine (Vestas 660kW)
- 9 Rooftop StormWater Collection





**518,000 sq ft** Crop Fields  
**101,000 sq ft** Orchard  
**35,000 sq ft** Flower Garden

Harvested Daily and Sold at on Site Market

## PRODUCE HARVEST

**4"** of Average Yearly Rainfall  
**245,000 sq ft** of rooftop collection  
 $4" \times 245,000 \text{ sq ft} \times 95\% = 295,000 \text{ Cubic Ft.} =$   
**2,207,750 gallons annually**

Used for Crops and Landscape Irrigation

## RAINWATER HARVEST



**PhotoVoltaic Panels**

425,000 sq ft on existing Big Box rooftops

Peak Output 10W per sq. ft

4.25 MW Output

1700 kW per day (winter) 2550 kW per day (summer)

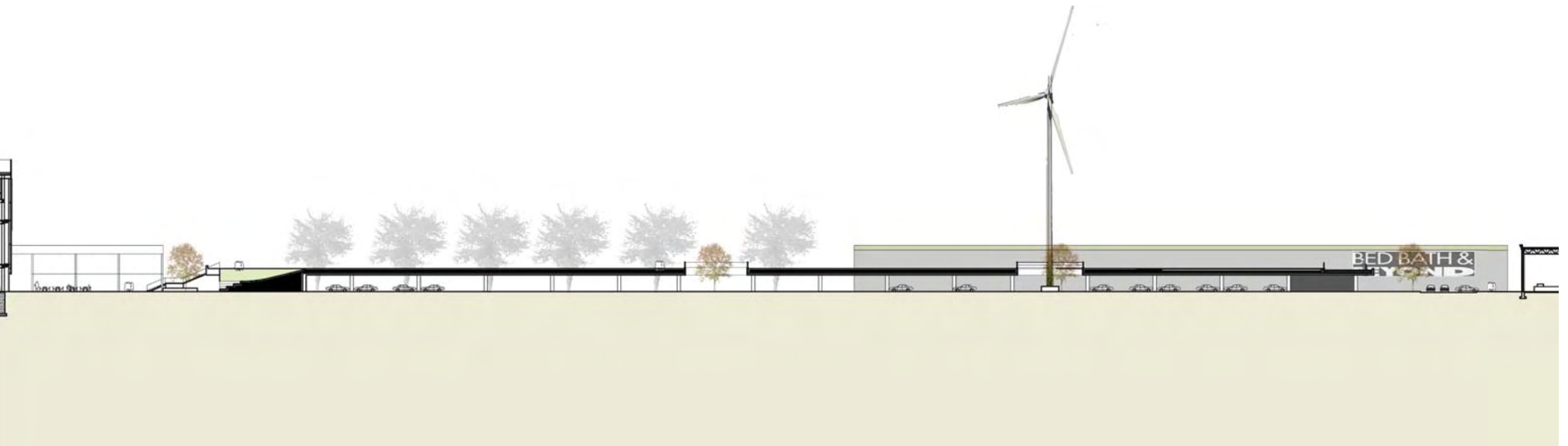
**[2] Wind Turbines** *Vestas 660kW wind turbine*

240 ft High

*Can supply approx*

2.5 million kW hours per year

ENERGY HARVEST



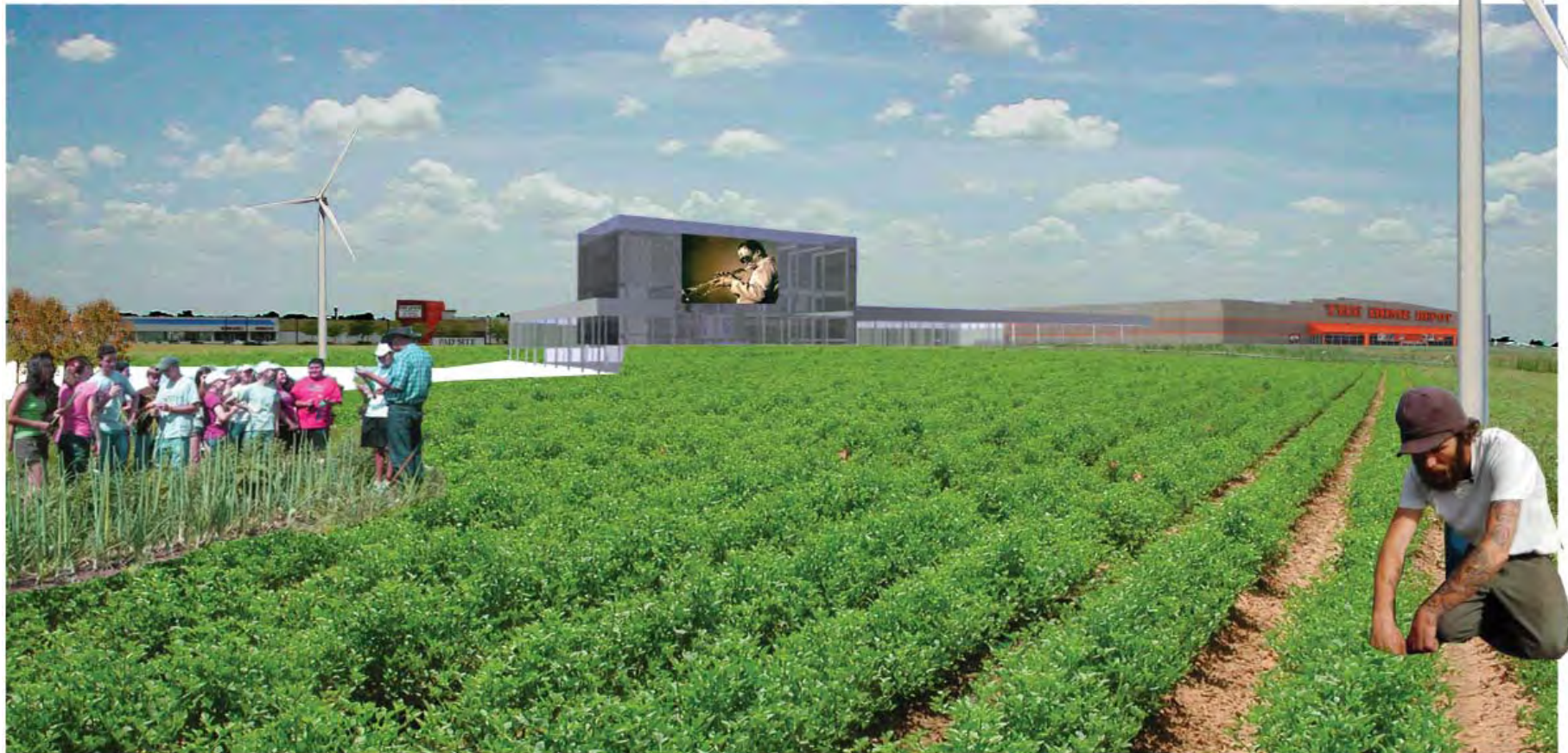












*Crop Fields*







*Community Gardens*

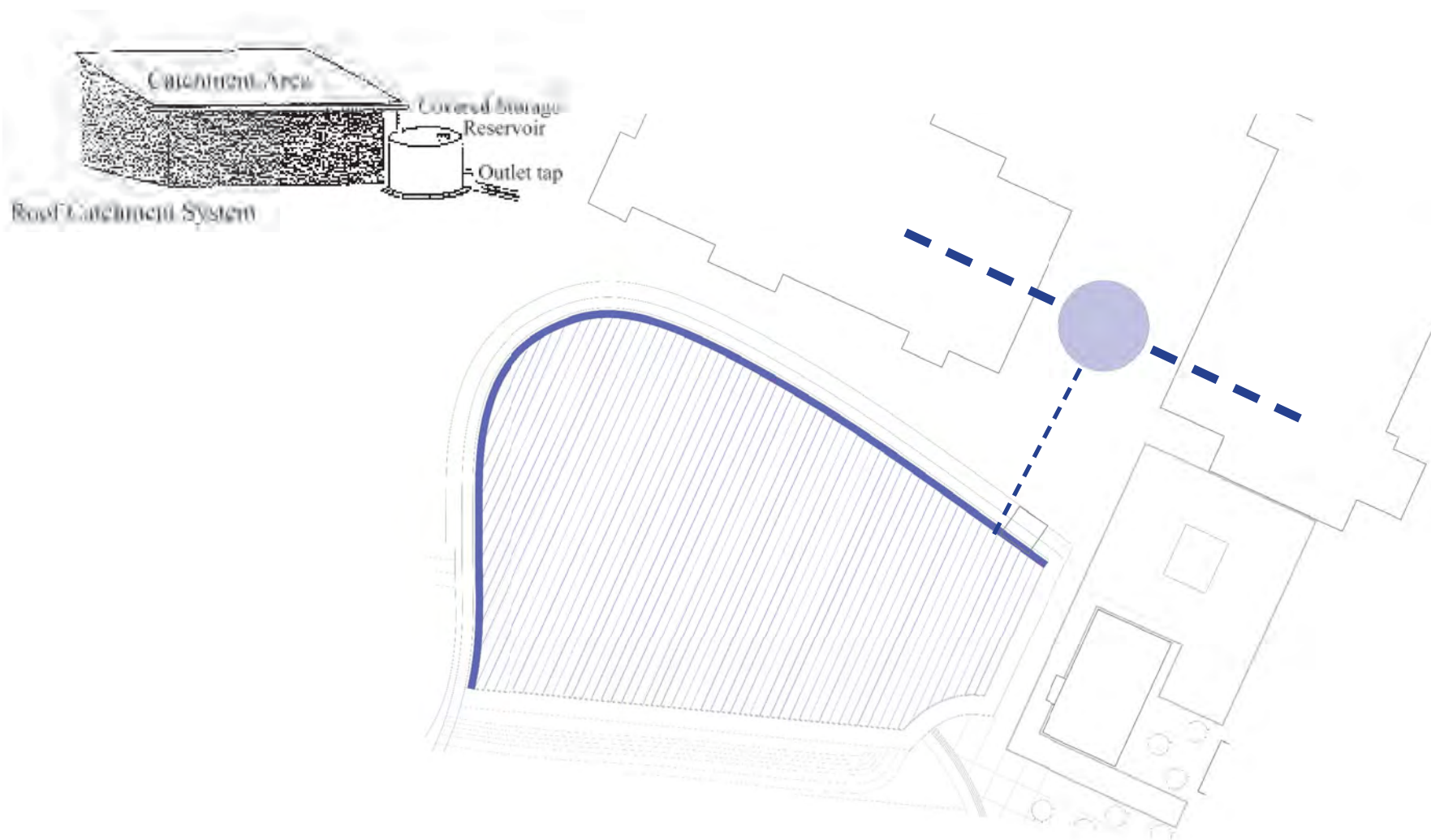






*Farmer's Market*



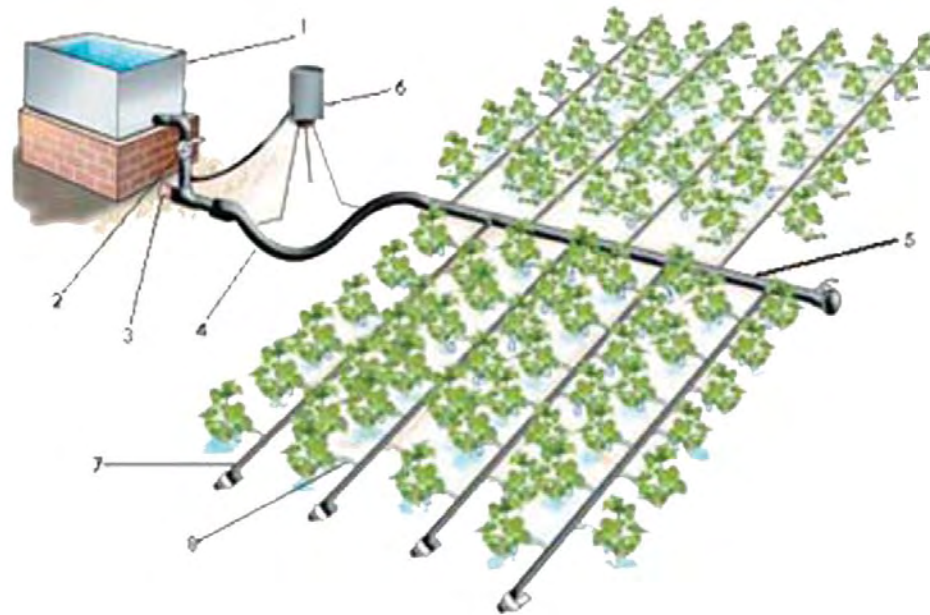


## ROOF TOP STORMWATER COLLECTION

Based on the 4 inches of yearly rainfall, if just two existing Big Box stores were set up to collect storm water they would be able to capture approximately 2.2 million gallons per year.

*(Srinivas 2009)*





## DRIP IRRIGATION

Using the storm water collected from the Big Box rooftops, the landscaping and crop fields could be best irrigated with this system. Its benefits include:

Ability to irrigate irregular shaped fields. Allows safe use of recycled water. Lower labor cost.  
Foliage remains dry. Low energy costs.

*(Drip 2009)*



## live[BOXSCAPE]

The key to sustainable living is density. The integration of community living in this project contains a certain level of density which suggests a sustainable, urban lifestyle; while retaining the residential character of open space and landscape



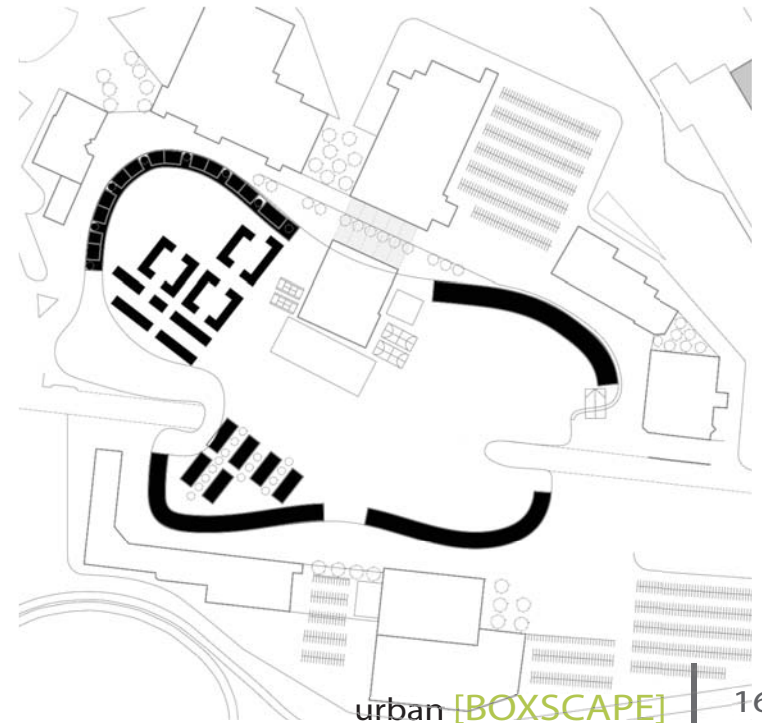
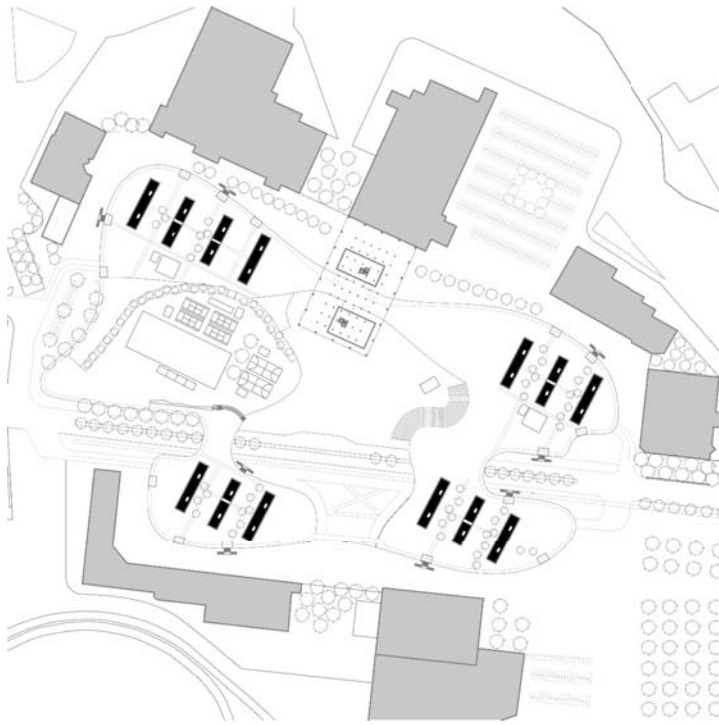
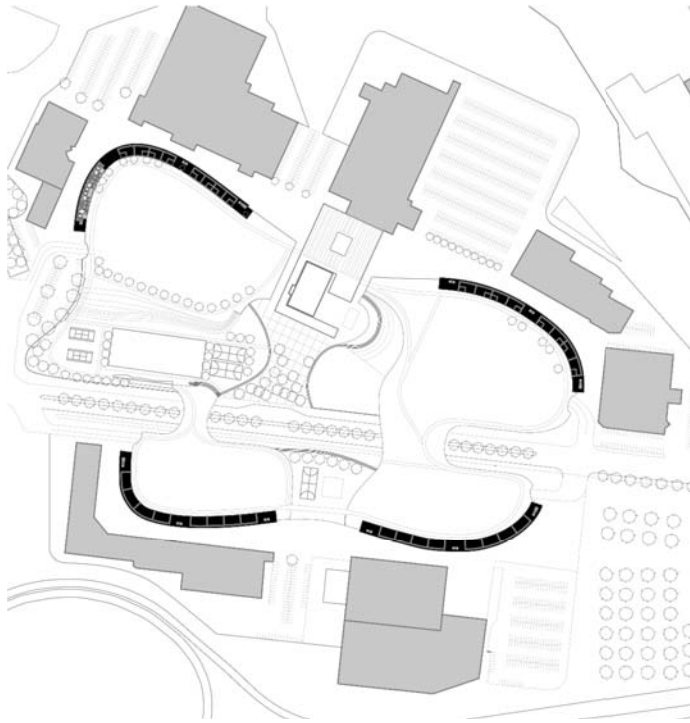
## HOUSING [VARIATIONS]

The options for types and arrangements of housing in this project can vary depending on site conditions, economic resources, and demographic demands. For demonstration purposes I have experimented with a few housing arrangements and densities for the South Seekonk site.

The perimeter of the new landscape can accommodate a curving, duplex housing structure. The lower level would still contain the small businesses maintaining the double-sided street front. The living units face inwards towards the pedestrian landscape. Inside the perimeter, another system of housing provides for larger, family sized units which stack or “pile” up together to maintain a certain level of urban density.

Outlined to are various massing arrangements. One in particular proposal is shown in further detail in order to get a vision of what this place could be.





This housing Master plan shows 4 smaller neighborhoods all connected by pedestrian pathways and all access to common public amenities as well as the Civic Center. Residents have the luxury of neighbor living with plenty of greens pace, amenities, shopping, and parking.

PILE UP HOUSING

**248 units**

- 62 @ 2800 sq ft
- 62 @ 2300 sq ft
- 62 @ 2100 sq ft
- 62 @ 1800 sq ft

PERIMETER HOUSING

**74 units**

- 37 - 2 Level Duplex
- 37 - 1 Level Duplex

TOTAL HOUSING

**322 UNITS**










URBAN DENSITY

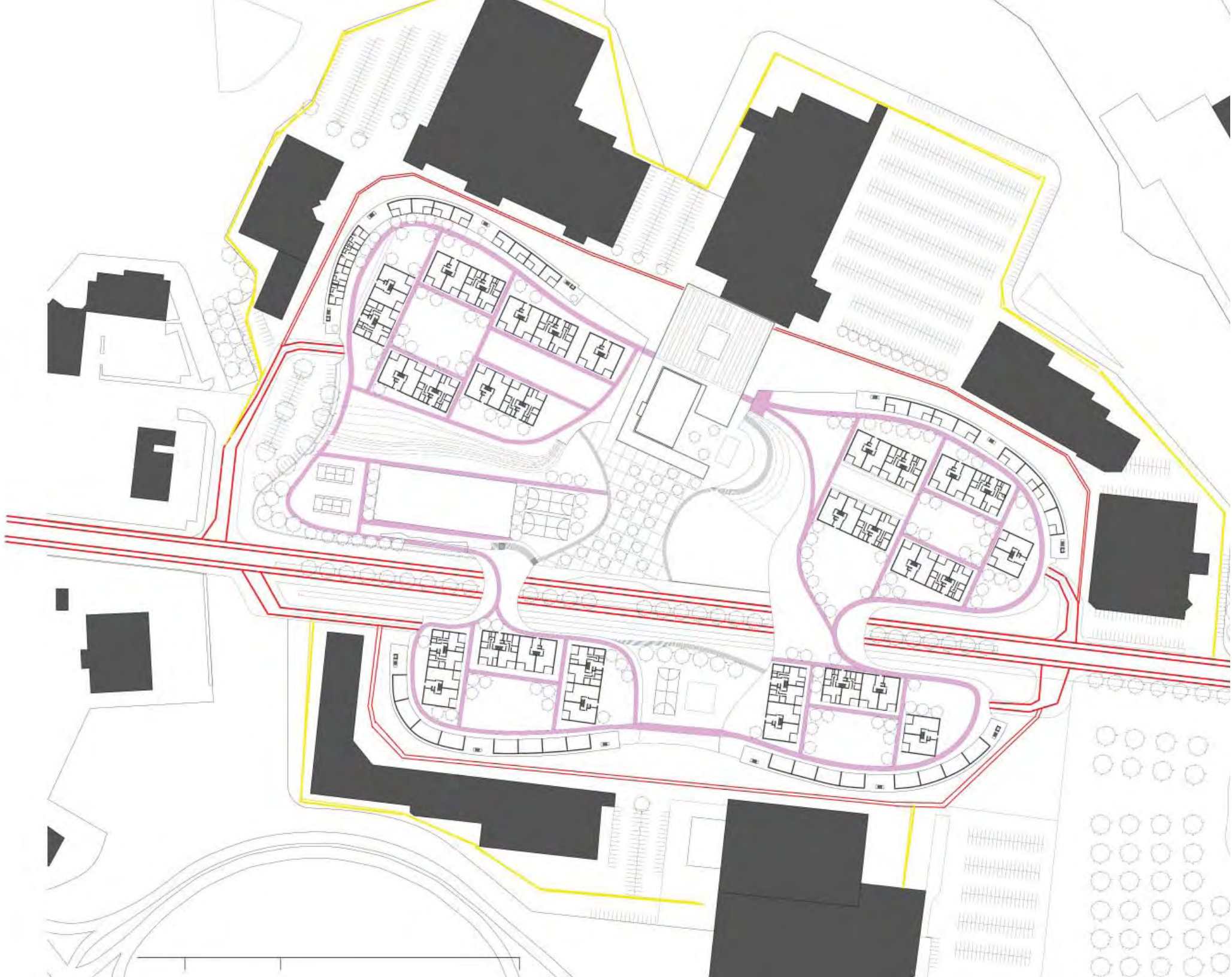






-  AUTOMOBILE
-  PEDESTRIAN
-  SERVICE ROAD

## CIRCULATION



- SHOPFRONT/NIGHTLIFE
- PUBLIC SPACE
- SEMI PUBLIC SPACE
- PRIVATE SPACE

## OPEN SPACE STRATEGY



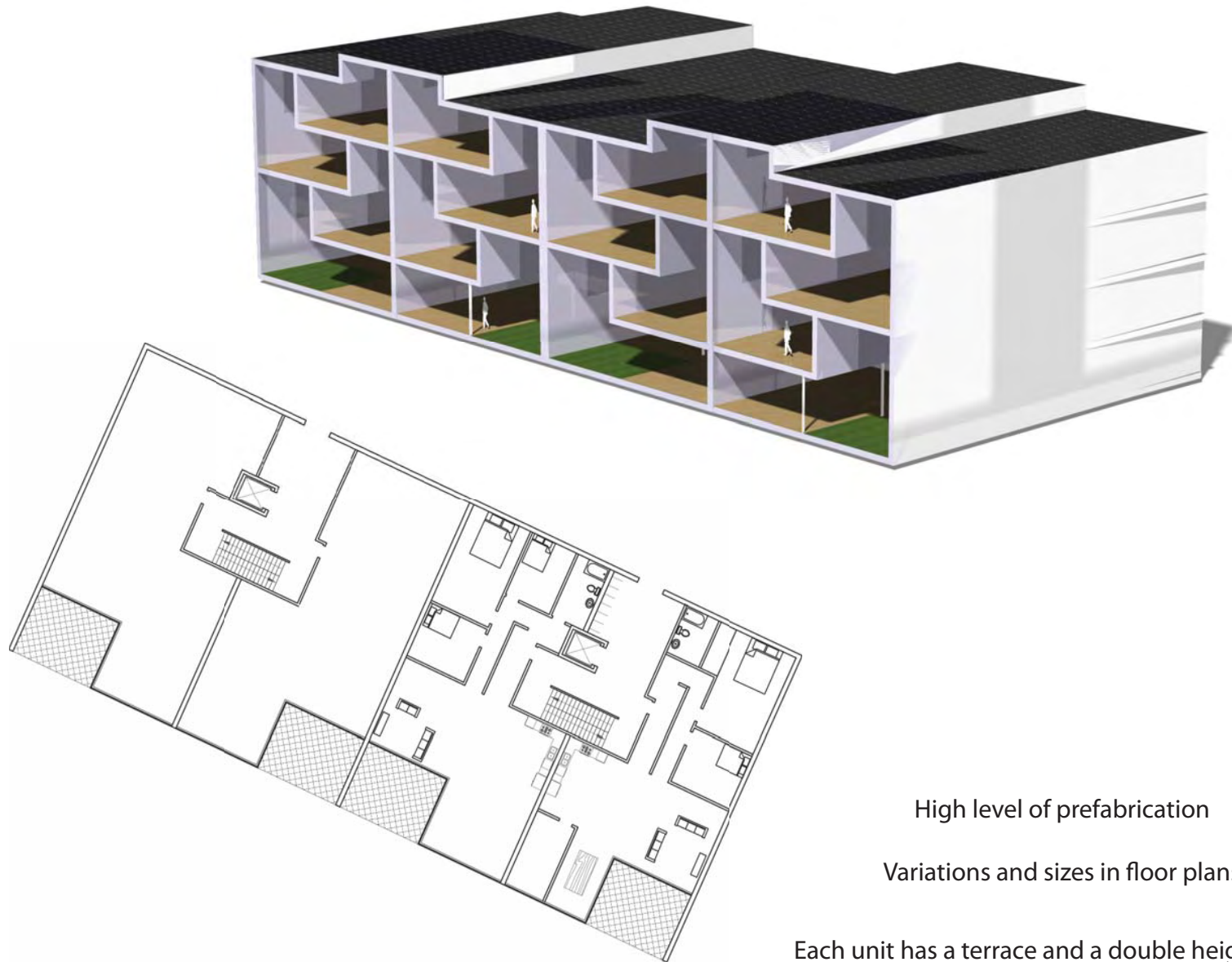


## PILE UP [HOUSING]

Swiss architect **Hans Zwimpfer** has patented his building design 'pile up' in Europe and the United States. While most buildings don't qualify for patent status, 'pile up' is more of a building system than an object. The concept takes the comfort and experience of a residential home and merges it with the density of urban living by piling homes together. The idea is essentially like the game 'tetris', stacking bricks together into a compact form. Each home has a part that touches the ground, providing access to outdoor space. The rest of the home is tucked in between others and features an open concept with plenty of windows and balconies. The interiors are kept open and without load-bearing walls to allow residents to customize their space to their needs over time. The idea is said to cost about the same as a standard apartment building and projects are already underway in Europe and Africa. (Alter 2008)





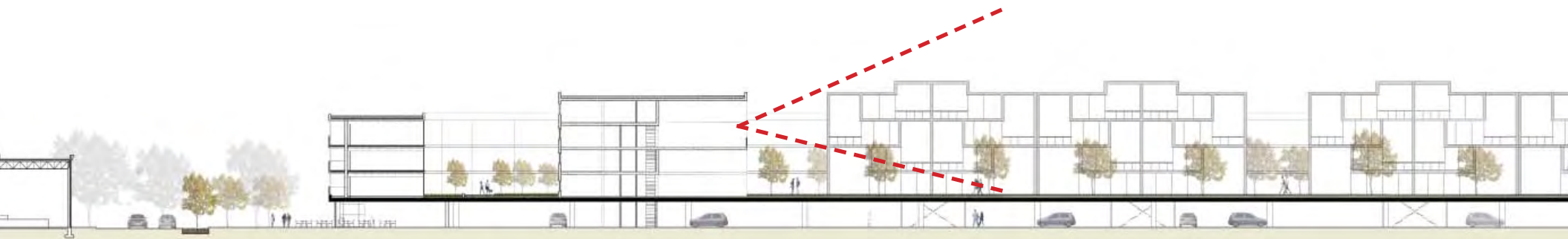


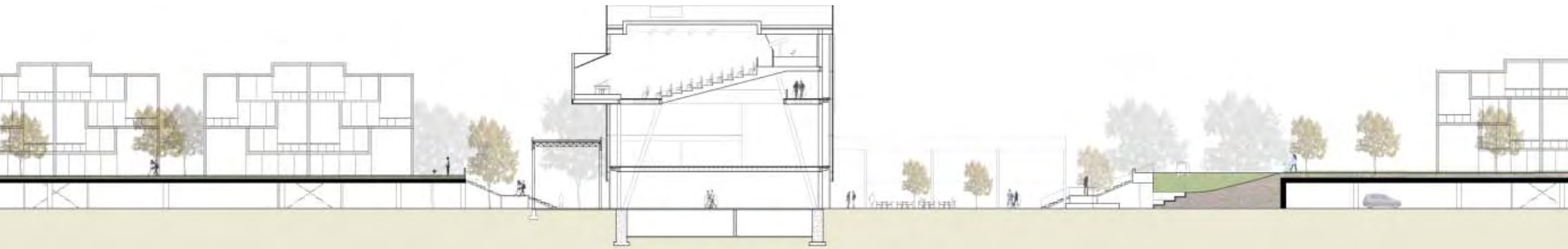
High level of prefabrication

Variations and sizes in floor plans

Each unit has a terrace and a double height space





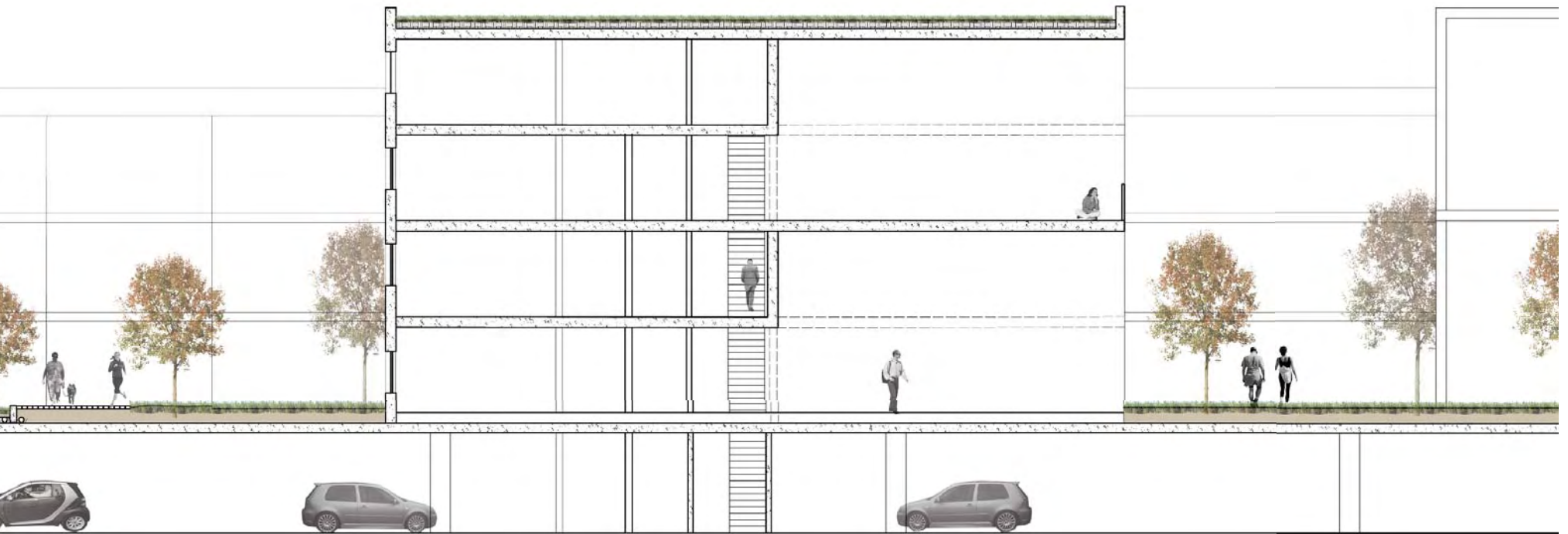




BIG BOX STORES

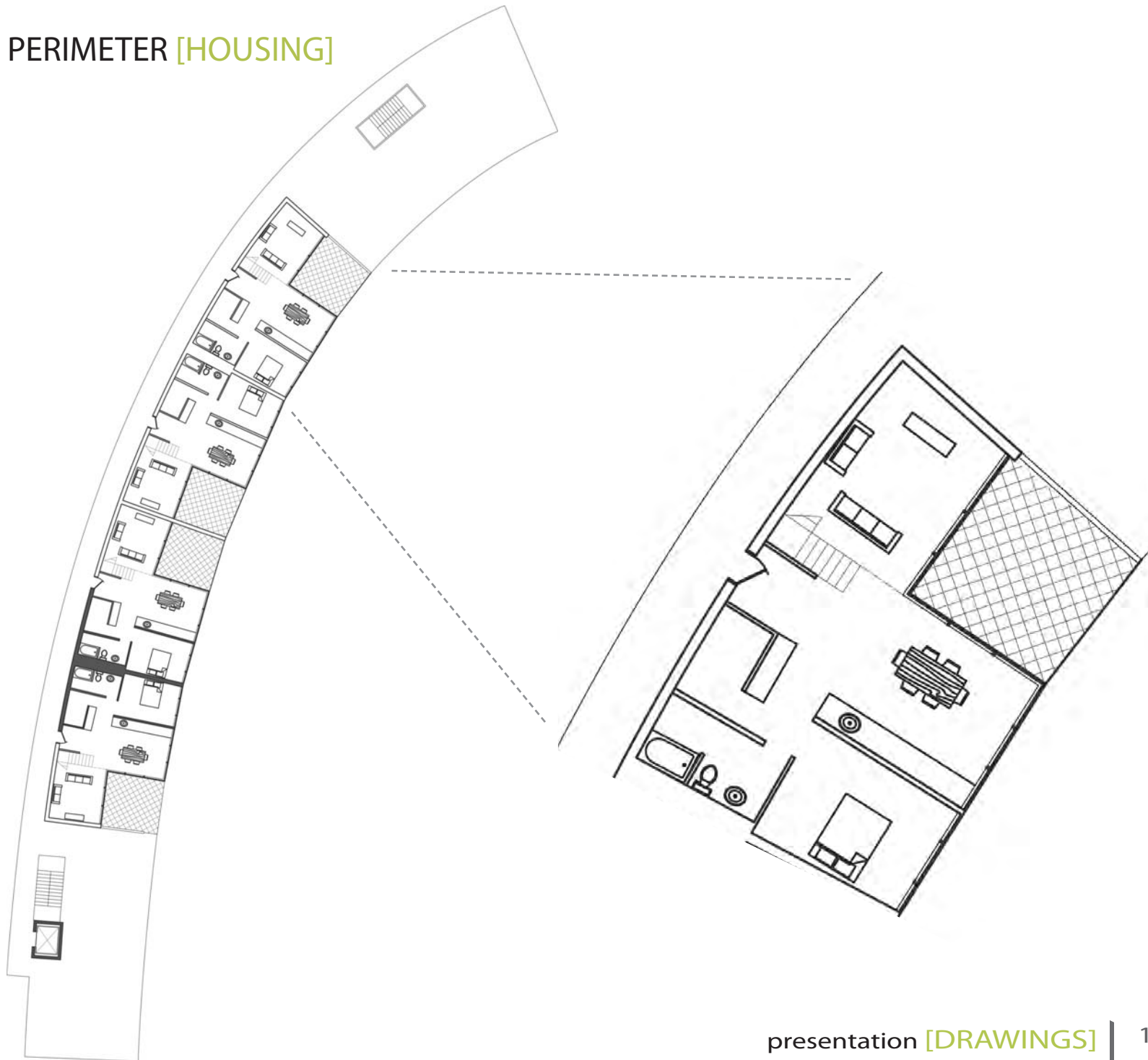
PERIMETER HOUSING/RETAIL





PILE UP HOUSING

# PERIMETER [HOUSING]







Thesis Abstract

Problem Statement

Project Statement

Themes and Principles

Program

Precedent Study

Site Analysis

Regulatory Information

Design Process

Presentation Drawings

**MOVING FORWARD**

Bibliography

Our dependence and acceptance of the Automobile is still cherished in the American society but indications are revealing that our current standard of living will not allow for a sustainable future. Europe and parts of America have already begun to accept the standard of a more densified and communal lifestyle. However, cul-de-sac developments and Big Box centers are still being constructed at steady rates. Due to the grand scale of this Sprawl infrastructure, we cannot simply “fix” it once it has completely deteriorated our society and our environment. A proactive approach is required in order to plan for smart future. It begins with education and as many Americans do not know of the severity of the situation. It follows with a vision. In order to spark interest, a vision is proposed of how our overall life can be bettered by making adjustments to our comfortable norm.

**Urban [BOXSCAPE]** has not been developed to propose a final product. It is developed as an argument towards generating a sustainable future. I have developed several design visions which I based off of principles and themes which will most likely become standard in our near future. The difficulty I struggled with was that developing Civic life into a Big Box retail center is relatively unheard of. Some communities have begun to transform abandoned Big Boxes; however, the unorganized space left behind from these Boxes is typically not dealt with. The solution to some is that we knock them down and construct something new. The only problem is that they are everywhere! It would not make sense to erase everything and start again. Look at almost any major city in the Western World, once a building has reached its life span for its intended use, it cleaned out and inhabited by someone else. The infrastructure already exists. It’s a part of who we are. If it begins to fail, we adapt and adjust it to our needs. We need to adapt and adjust our failing, or soon to be failing, Big Box Landscape. But how?

The major issue involved with this project has been dealing with the automobile and parking. After all, the automobile is the main contributor and primary access to a sprawled infrastructure. During the beginning of the design phase, I struggled with what direction I should go with parking. The way I ended up dealing with parking was to keep most of the existing, spread out parking surface and build over it to create civic life above. This allowed the Big Box center to still operate as a shopping plaza along with being able to support civic life. What I learned from this design approach was that the existing conditions aren’t be changed too much besides the new development. What could have really boosted this design vision was proposing some sort of vertical parking in order to densify the impact of the automobile and open up more space for either pedestrian activity or more mixed use development.

The research, the lessons, the strategies, and the arguments formulated in **Urban [BoxScape]** can serve as a valuable education tool for a wide range of audiences considering this topic affects us all. Public knowledge and interest is the key to a sustainable future. As an architect and a planner, this document has given me an invaluable insight into what I will be dealing with in my career and my everyday life.

Sprawl will not go away anytime soon so this documentation will be able to serve as an important learning tool for years to come.

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