



UNIVERSITY OF DETROIT MERCY
GRADUATE SCHOOL
MASTER'S PROJECT

SUBMITTED IN PARTIAL FULFILLMENT OF THE REQUIREMENTS FOR
THE DEGREE OF MASTER OF ARCHITECTURE

TITLE: **Re-Connections: Home/Work/Environment**

PRESENTED BY: **Clifford Luke Finney**

ACCEPTED BY:

Paul Kevin Matelic
Assistant Professor, Masters Studio Instructor

05 MAY 2006

Date

Stephen J. LaGrassa
Assoc. Dean, Director Masters Program
School of Architecture

5/5/06

Date

APPROVAL:

Stephen Vogel
Dean, School of Architecture

05/05/06

Date

credit
AM
251F
227
2005

Table of Contents

Introduction	
Table of Contents	
Project Analysis	
The University Street	11
Lovers City Hall	14
John Ford Hall	17
Transfiguration	20
Mason Hall Annex	24
Fisher Office Building	25
Site Evaluation	
Northland Mall	26
Downtown City	28
Detroit	30
Site Analysis	
Detroit Riverfront	32
Project Program	
Program Statement	36
Quantitative Measurement	37
Space Detail	40
2-D Program Diagrams	52
Conceptual Design	53
Clifford Lucas Finney	64
Masters of Architecture	
The University of Detroit Mercy	
School of Architecture	71
AR 510 & AR 520	
Assistant Professor Paul Matelic	73
May 1, 2006	
Conclusion	94
Index	96
Bibliography	97
Acknowledgments	99

**Reconnections:
Home/Work/Environment**



Table of Contents:

Abstract	3
Thesis Paper	4
Precedent Analysis	
The Magney House	11
London City Hall	14
Main North Lofts	17
Transformations	20
Steven Holl Forms	24
Hooker Office Building	25
Site Examination	
Northland Mall	26
Downtown Ypsilanti	28
Detroit Riverfront	30
Site Analysis	
Detroit Riverfront	32
Project Program	
Program Statement	36
Quantitative Statement	37
Space Detail	40
3-D Program Diagrams	52
Conceptual Design	53
Schematic Design	64
Design Development	71
Final Presentation	78
Conclusion	94
Endnotes	96
Bibliography	97
Acknowledgements	99

Abstract:

“Today’s houses may even be well planned, easy to keep, attractively cheap, open to air, light and sun, but – do the houses in themselves hold any guarantee that dwelling occurs in them?” (Heidegger, 1971).

Heidegger’s concepts may be dated, but the question of dwelling, and what it is to dwell is an underlying question and a driving motive. People think of dwelling as something one does in ones home. But contrary to that idea of dwelling, it is something that people do in all settings, it is their home, their work, their environment, and the interactions between the three.

Society today has become one that has separated these aspects of life: home, work, and environment and has created a common link between these, the automobile. People no longer live in an area that all aspects of life are present, people have to commute between these aspects leaving life disconnected, and full of voids. This thesis intends to examine the voids that have been created by modern society and the disjunction that has occurred within it. What is it to connect home, work and environment? Is it just combining work and home in the same building or can they be removed somewhat from each other, but still be in the same context? At what extent can sustainability be ushered into the notion of home and work, yet not impede on progress of society or become a burden that interferes with the daily lives of the individual and allow people to live in the 21st century?

1. What is it to dwell?
2. How does building belong to dwelling?

When one raises the question of dwelling today, the most simple answer that will be received is that dwelling is something you do within your home and it has become the question is through within every of this notion. The simple answer is expect for a person is to dwell wherever they want and their home. The process of

Thesis Paper:

Reconnections:

Home/Work/Environment

Society today is one of disconnect. Instead of moving closer to the threads that hold society together, it continues to pull apart its fabric, creating tears and voids that have to be continuously patched together with a band-aid when the wound requires stitches. People are moving farther away from the cores of human life, spending more hours of their lives trying to reconnect these threads that once were centrally located around the life of people. "To dwell is to remain, stay in a place."¹ This is a fundamental of human action, but through the now disconnected society people have come to dwell in means that are not meant for human experience. Not only in a person's home, but in the work or office, within the environment, and now the automobile that has become the band-aid of society in which people now dwell. An examination must be taken up by society as to what it exactly means to dwell, as it has been applied here by Martin Heidegger, people dwell whenever they remain in a place, but how has this changed with the way in which society has developed? We must move from what it is to dwell to an examination into the status quo of society, into how pre-conceived thoughts of humans and what architecture has done to create this disconnected society. When one examines what is happening in society today, we can start to format opinions as to what can be done about the future, about how architecture and dwelling can be sewn back together like what once was, but not in a way that impedes on the continued growth of our culture. Finally, the examination can take a turn from what is wrong, to what can be done. We must move thoughts into motion in order to begin to stitch up the wound in society that has been held in place for so long by the band-aid. Karsten Harries implies that a man's place is arbitrary if we continue to destroy the boundaries in the name of freedom.² As society continues to create voids in the world with the notions that are currently within the brain trust, we are in fact leaving our selves with no sense as to what it means to be human or ourselves.

1. What is it to dwell?
2. How does building belong to dwelling?¹

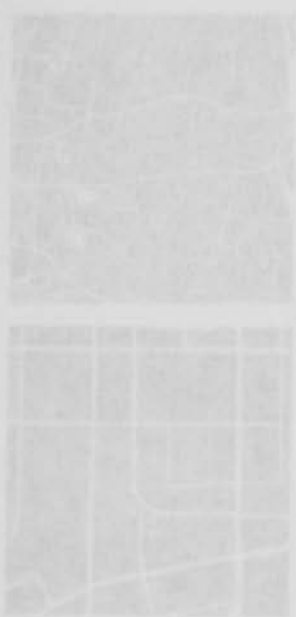
When one raises the question of dwelling today, the most simple answer that will be received is that dwelling is something you do within your home and it has become the common thought within society of this notion. The simple answer is correct for a person is to dwell whenever they enter into their home. The process of

Thesis Paper:

living, sleeping, cooking, relaxing, and all other necessities of life do form what is dwelling, meaning that dwelling is what you do within your home. Christian Norberg-Schulz illustrates that dwelling in a house means that you inhabit the world.³ With this thought on the meaning of dwelling, a person who lives in a house or performs actions that one would do within a house is an inhabitant of the world, so all actions that one would perform in a home, apply when performed outside a house. Therefore, the concept of dwelling is one that regulates all actions performed in the world. In answer to what it is to dwell, the answer can be concluded that dwelling is something that not only occurs within your home, it is what a person does throughout the entire world. Dwelling is your home, your work, the time spent at a restaurant, the banal activities of grocery shopping, or the commute between all building by means of the automobile. Finally, dwelling applies to human interaction with the environment.

The latter and most important question when it comes to dwelling must be engaged, in how does building affect and engage dwelling? To return to your basic response of residing within a home is to dwell, is where the status quo answer can be found. People look at their home as their corner of the world, it is their universe.⁴ It is this thought that the tear in the fabric of society has occurred. Most people have never considered what a home is, they have come to realize that in today's society that they must have one like their neighbors, family and friends have.⁵ People must own a home within society today, it doesn't matter at what cost to their economic budget, the economic budget of society or even to the economics of the environment. People are creating this separation between themselves and the fabric of the world in order to own this notion of the home. A separation of home, work and environment has occurred, which forces individuals to dwell in places that do not offer a genuine human experience. Instead of spending life within the built space a person now has to dwell within the connecting object of the built space, the automobile.

With the automobile moving to the forefront of the dwelling spectrum, it has pushed the environment out of the view of life, and has furthered the once inseparable connection of live / work. Where does this leave the built space? It has left building as a supplement to the automobile. Building occurs in that of homes, so that individuals may own that home that is perceived as a must and then building must occur wherever space is left available. It is in this train of thought of building as a supplement that has left society with a major wound in its fabric. Harris helps to redirect the attention of building in that to build is to help decide how man is dwelling on Earth or if man is to not dwell within areas of the



View of Urban Fabric
The map is an aerial view of a city, showing a grid of streets and several large, irregularly shaped blocks. The blocks are separated by wider streets, and there are some green spaces interspersed throughout the urban fabric. The overall appearance is that of a dense, planned urban environment.

the automobile, where the problem is a typical city based on the automobile. There is the same work, a major distinction can be seen in the connections that have occurred due to the work that the automobile requires.

Thesis Paper:

Tear in Urban Fabric

At top is an Indian Town created before the automobile, where the bottom is a typical city based on the automobile. Drawn at the same scale; a major difference can be seen as to the disconnection that has occurred due to the scale that the automobile requires.

Earth.² It can be seen that our current society is not using building to promote dwelling. Building is being dictated by the requirement of the need for individual residences, and then connecting the residences with other aspects of life, which is why the tear in society has been created, and what is the flaw with dwelling. The task of architecture and building is that of interpreting meaning, or creating places of dwelling, allowing the individual to have a place within the midst of nature and community at the same time.⁶ Building must be one to promote all aspects of dwelling; home, work and environment, and allow the person to experience and find a place within them all.

The tear in the fabric of society can be summed up through the term urban sprawl. More Americans are shedding city life and heading further and further into suburbia, in search of that home that is perceived as a necessity. This search for an individual home, one that cannot be found within urban living, is a major reason for a lack of density. If you take a section of 150 acres, which is approximately a mile or ten minute walk, the variations of density vary to extremes from the 2,000 inhabitants in America, to 20,000 within that same acreage in Paris, 40,000 in Dehli, and you have Hong Cong which will house 80,000 inhabitants within that same area.⁷ When you examine those numbers, you can see the staggering difference between America and other places around the world. One has to take into consideration what is the cause for this difference, and the answer is divided into two clear cut reasons, societies preconceived ideas, and the automobile. The preconceived ideas of society which stem from the thought that every individual or family needs to own their own home, is due to the misconception as to what it is to dwell. So, a direct byproduct of these preconceived thoughts is the American zoning laws and regulations. Zoning segregates different land uses into large, single-use monocultures, like all single-family homes, all office, all retail; this segregation is only able to become reconnected through the automobile, whose paths cut through these areas like rivers, making grid-lock for automobiles and impassable edges for the pedestrians.⁷ In order to have the single-family residence it has become evident that America must maintain this zoning that it has implemented. Zoning allows for the homes to exist in there own realm, and yet not be disturbed by an invading office building, retail, transportation center, or industrial building. It is through zoning that the first tears in the social fabric first occurred. By separating the uses, it became evident that a connection had to be made between these separations, which in America the answer easily became the

Thesis Paper:

automobile. The reason for the automobile instead of other forms of transportation is that gasoline taxes, vehicle-registration fees, driver's license fees, and automobile taxes are lower in the United States than anywhere in the developed world.⁷ Now, you have the dangerous mixing pot for American societies, preconceived ideas that are harmful to the fabric of life and the drug of the automobile.

The automobile has become the biggest wreaking ball to the fabric of society. Firmly engraved into society from American idea, zoning laws, and the inexpensive cost to consumers, this running away train is one that is not coming to a halt. What it has done is create a separation between home, work, and environment, and has become the main connection between the three. It is an interment of dwelling that is separating people further from each other. Rather than spending more time in a building of dwelling or nature, where people can do the things that they desire, and want, like eat food, sit down or talk with another person, they are spending more time dwelling by themselves in the metal hulk that does nothing but isolate a person from their desires.⁵ This world of automobile dependence causes a much larger living scale, in that it destroys all connections that can be made by a pedestrian. A pedestrian scale environment cannot exist in a world that depends on the car, the car must have more room to operate, it depends on larger open paths that destroy the environment, rather than the small paths that a pedestrian operates on. Finally, what you have in society is a culture that is dependent on an instrument that destroys the fabric of living that once was the connection to home, work, and environment that provides individuals with the wants or needs that they request.

As a society a move must be made in the thinking of culture, or you can say that a paradigm shift needs to occur within the values of modern culture. The disconnect between home, work, and environment can only last for so long before something snaps, and that something is the Earth. As society continues to stretch itself past its elastic limits, the tear will no longer be able to be concealed with a band-aid. There are many answers that have been presented as to the solution to this tear in the fabric of society. Some state that a total shift to sustainable design, others say that a return to urbanism or a new urbanism is the correct answer, yet others continue to think that architecture can continue on with the status quo and the Earth will bail society out again. Now each one of these systems of thought, and even other systems of thought all have valid bases, but the bare principles of each school of thought do not by themselves carry enough weight to resolve the issues

Thesis Paper:

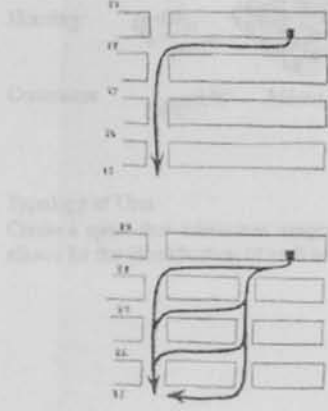
that society has placed in front of itself. What needs to occur is a mixture of schools of thought and ideas in order to reverse the path that society is headed down.

The first major relationship and most important one that needs to be repaired is the relationship between society and the environment. Society is not intended to oppose or control nature, but it is intended to draw nature into an intimate association in order to find a union with it.⁸ By combining the built with the environment it will help relieve the stress created within a person, because as a species we are meant to be connected with the outdoors.⁹ Secondly, it will give a person an important sense of emotional security.¹⁰ So, it can apply that there is a major need to reconnect to the environment and not just for the environments sake. There are more stats then a person could write about to show how important it is to design with sustainability in mind, that 60% of a city is paved, that this heat's up the earth and the most water pollution is caused through this run-off from the paved city.⁷ Or, that people of the US or Europe will use enough energy in their lives to account for 30 to 40 people in Asia, Africa, or Latin America.¹¹ These stats are staggering and very important indeed to consider for the sake of the Earth, but more important is the sense of the mental health of people within the built space, that a connection is needed between that of home, work, and the environment, but will allow growth.

"Growth is good. The question is, what are you growing? Stupidity or Intelligence? Sickness or Health? Poverty or Prosperity?"⁹ This is very important to consider when it comes to design and in solving the issue of the tear that has presented itself in society today, a set of rules and regulations must be created so as not to grow in the wrong direction but to grow in a positive and fruitful direction. Cliff Moughtin provides a strong list of what needs to be done with design in order to begin to repair the tear in social fabric, in a positive growth manor.

1. Organize growth on a regional level so it is compact and transit supportive.
2. Locate commercial, housing, jobs, parks and civic uses within walking distance of transit stops.
3. Design pedestrian-friendly street networks which directly connect local destinations.
4. Housing should be a mix of densities, tenure and cost.
5. Be sensitive to habitat, and high-quality open space should be preserved.
6. Public spaces should be the focus of building orientation and neighborhood activity.
7. Encourage infill and redevelopment.¹¹

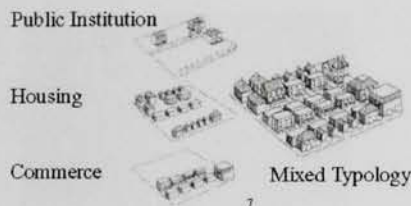
Figure Description:



Breaking of the Block

Illustrate the need to break up the monolithic block that has been created by the automobile into smaller blocks that allow more paths and access for pedestrians.

Thesis Paper:



Typology of Uses

Create a space that intermixes usages but still allows for the identification of each use.

Architecture needs to look to create places that are attractive to the individual but will help permit the recreating of society's ideas. Through these premises this notion of reshaping the ideas of society can begin to be realized. What can be said as one of the most important of these premises is that the development needs to become design originated. Currently, city blocks are designed on the large automobile scale, promoting only one use within a district or block. There must be a break down of the city block in order to allow the promotion of more paths for the pedestrian to navigate throughout. By readjusting the blocks themselves it will firmly help promote the growth of pedestrian movement. After recreating the scale that the city block is designed it can then occur a mixing of densities, as well as cultures and also the mixing of uses within a development. This is an aspect that needs to be asserted much more within development, the mixing of uses, most importantly live / work.

The mixture of live / work aspect of life can be a very delicate subject to consider. The Schumdition Architectural movement offers some inspiration as to how to design around this manner. The movement with a European origin looks to combine usages, while creating very unique, erotic, and distinct places. In Schumdition Architecture design looks to create spaces on the exterior that have interior feelings or qualities while on the interior it looks to create exterior feelings or qualities. This is accomplished on both an exterior and interior environment, in which the way light enters and moves through the space as well as the scale of the space. It is very important, in how the light and structure are manipulated to alter the light and scale, in that you can create many different and opposing feelings in one place allowing the space alter the experience of each individual.¹² Things like cantilevering, exposing the structure (like using tension cables), or creating uniform and un-uniform punctures in the structures. For this movement does not want one aspect of live / work to totally overshadow the other usage, or at the same time combine live and work to the point that they become inseparable from each other, but still at the same time creating a unique place of identification with this architecture. A design solution can be made where these aspects can exist within each other, allowing for an ease of identification of each region or each aspect of living, creating a typology that can be maintained during design, that a home, must still be a home and an office must maintain an office appeal. By locating the usages within the same region, allowing the architecture to be identifiable as a new and different form of dwelling, can shift the paradigm of thought to the reconnection of live / work. Through this location within the same region, and

Thesis Paper:

looking to the principles of Schumillion Architecture an achievement can be made in that density will be increased, diversity on many stratospheres will be accomplished, a level pedestrian movement can be restored, and finally the reconnection of dwelling can be made of home, work and environment.

As far as society is concerned there is a major tear within the fabric of life today. Society has lost the concept as to what it means to dwell, in that home, work and environment have to be connected in order to create positive experiences for individuals. People are spending their lives trying to reconnect these aspects that once were intertwined through inadequate means like the automobile. As society continues to move forth and evolve there must be a realization that dwelling is something that occurs in all forms of place in the world and that there has to be a re-investment into connecting with what once was. Society must loose concepts like mass zoning regulations that separate all usages, a dependence on the automobile, and the development of the built space that does not promote pedestrian activity. As social evaluation continues we must look to concepts like organizing growth so it is compact. Society must look to intermix usages, especially home and work, and develop space that is more pedestrian friendly. Architecture should design with sustainability in mind and preserve natural habitat by infilling and redeveloping within cities. It is through moves like these that society will be able to stitch up the wound in its fabric and reconnect; home, work and environment.

Precedent Analysis One:

Glenn Murcutt - Architect

Bingi Point, Muryua, Australia - Site

1982 - 1984 - Date



Analysis:

Located approximately four hours south of Sydney, Australia is an intriguing structure that breaks from the status quo of the typical "Home" design. The Magney Home is designed with ecological concerns taken into consideration. Designing with ecological considerations such as climate, solar conditions, site configuration, and views are his prime intentions. The most intriguing aspect that is viewed in Murcutt's design is the concave roof system. Designing with the feel of being under canvas, this roof forces rain water to flow towards the center of the home, upon reaching the center the water then flows down into a rainwater holding tank below the home, to be used later. The home is oriented due north on the site, situated on a slight slope, thus breathtaking views of the lake and coast are obtained. Besides the benefits of breathtaking views, this orientation allows the hot Australian sun to be kept out of the home during the summer months and allows the sun to shine in during the winter months, thanks in part to the roof overhang and adjustable Venetian blinds. Due to the cool winter nights in Southern Australia, Murcutt designed the house with an insulated slab on grade, along with making the southern wall brick. Both of these features act as thermal sinks, allowing heat to be radiated into the home during the cooler winter evenings.

After ecological considerations were taken into account Murcutt considers the basis of private and public space within his home. A common theme in Murcutt design, is that there is no "guest" aspect in the idea of home, private is private and public is public. When one enters into the home you enter up into a public court. This court is flanked on both sides by those spaces called family, kitchen, and dining room, which of course are all considered as public. These Public spaces are developed using an open floor plan and using glass to maintain a visual connection to the other public spaces. The home owner must cross the threshold of public and private through un-punctured brick walls. These private

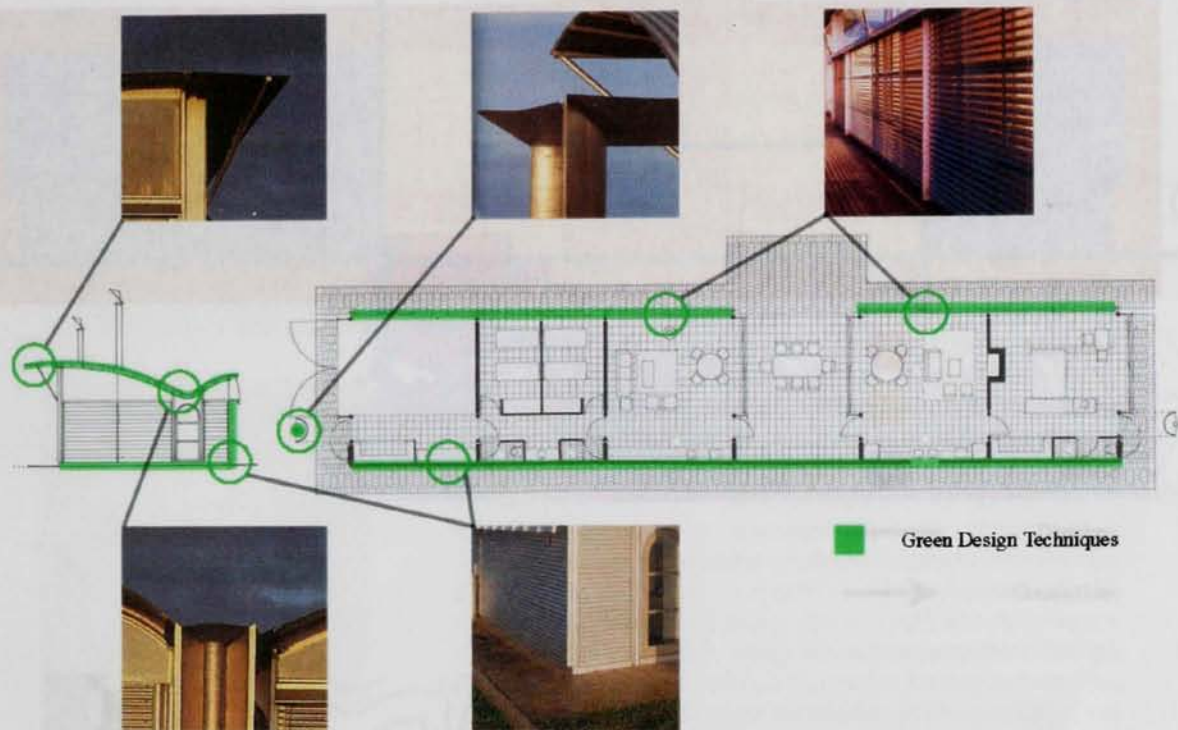


The Magney House:

spaces are created through maintaining a linear design. Murcutt flanked these public spaces with the bedrooms, utilitarian, and storage spaces on each side. Finally, in keeping with ecological considerations all utilitarian aspects of the home are located against the southern wall in order to allow the northern sunlight to shine directly into the home when the season permits.

Significance:

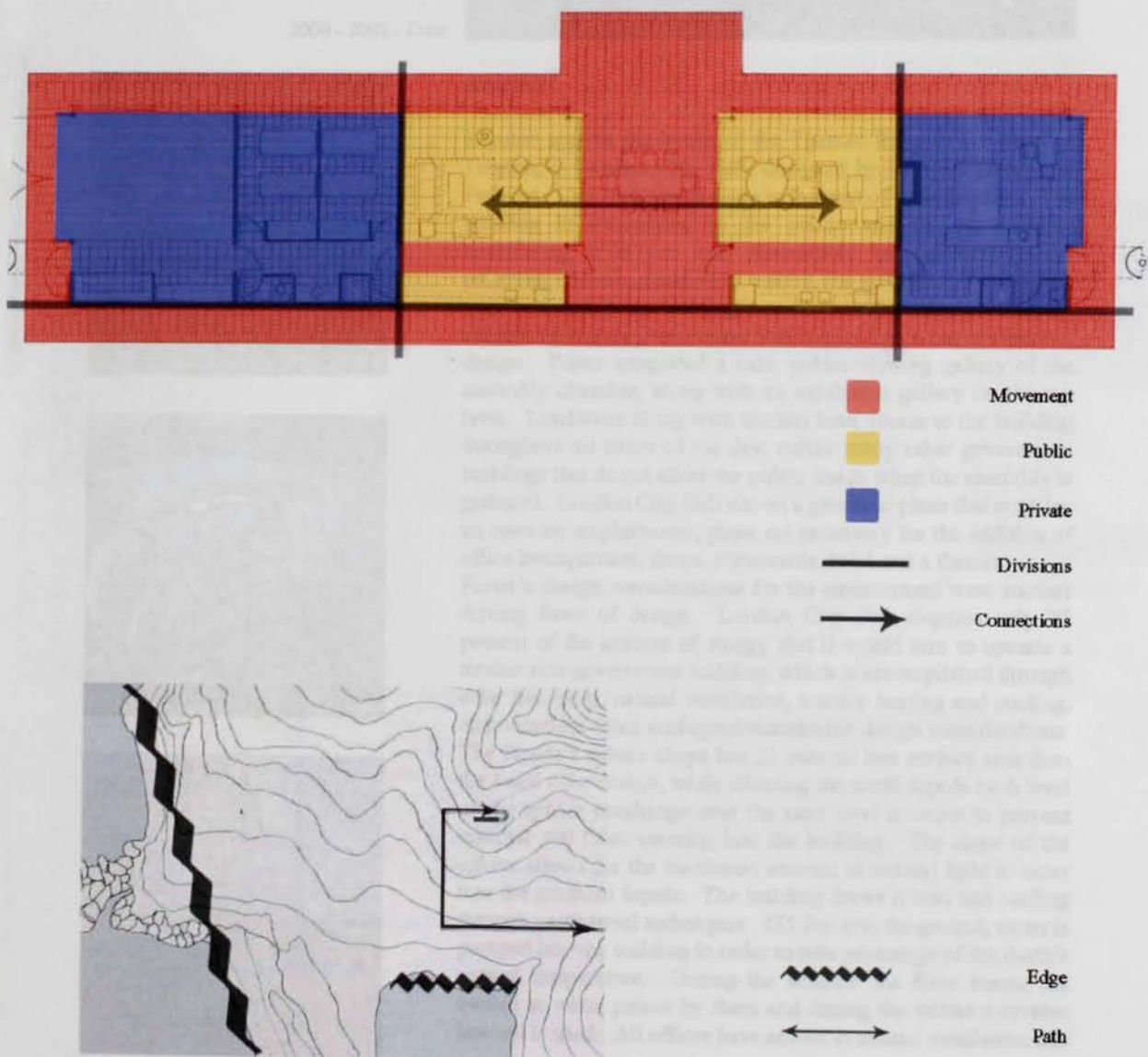
Glenn Murcutt's, Magney House provides valuable information for this thesis even though it is not exactly on par with the thesis



goals. He was able to develop a residence that allows the owner to dwell both in living and environment. Murcutt provides a strong example as to what can be done in using climate, site considerations, and solar considerations as well as the views created from the structure all while providing an aesthetically pleasing structure. The division of the private and public realm of the home also provides strong examples in the way that a home can be laid out. He intelligently created the home in a linear fashion in order to not only take full advantage of the ecological conditions, but also to divide the home into distinguishable public

The Magney House:

and private sectors. He was able to successfully able to connect the public spaces together and able to create a strong division, dividing the private space away. If one can superimpose Murcutt's considerations about home design into an urban environment the creation of a structure centered on living, work and the environment can be developed. The focus on ecological considerations and the concept of dwelling is what is gained from Glenn Murcutt's, Magney House for this thesis.



Precedent Analysis Two:

Norman Foster and Partners - Architect

London, England - Site

2000 - 2002 - Date



Analysis:

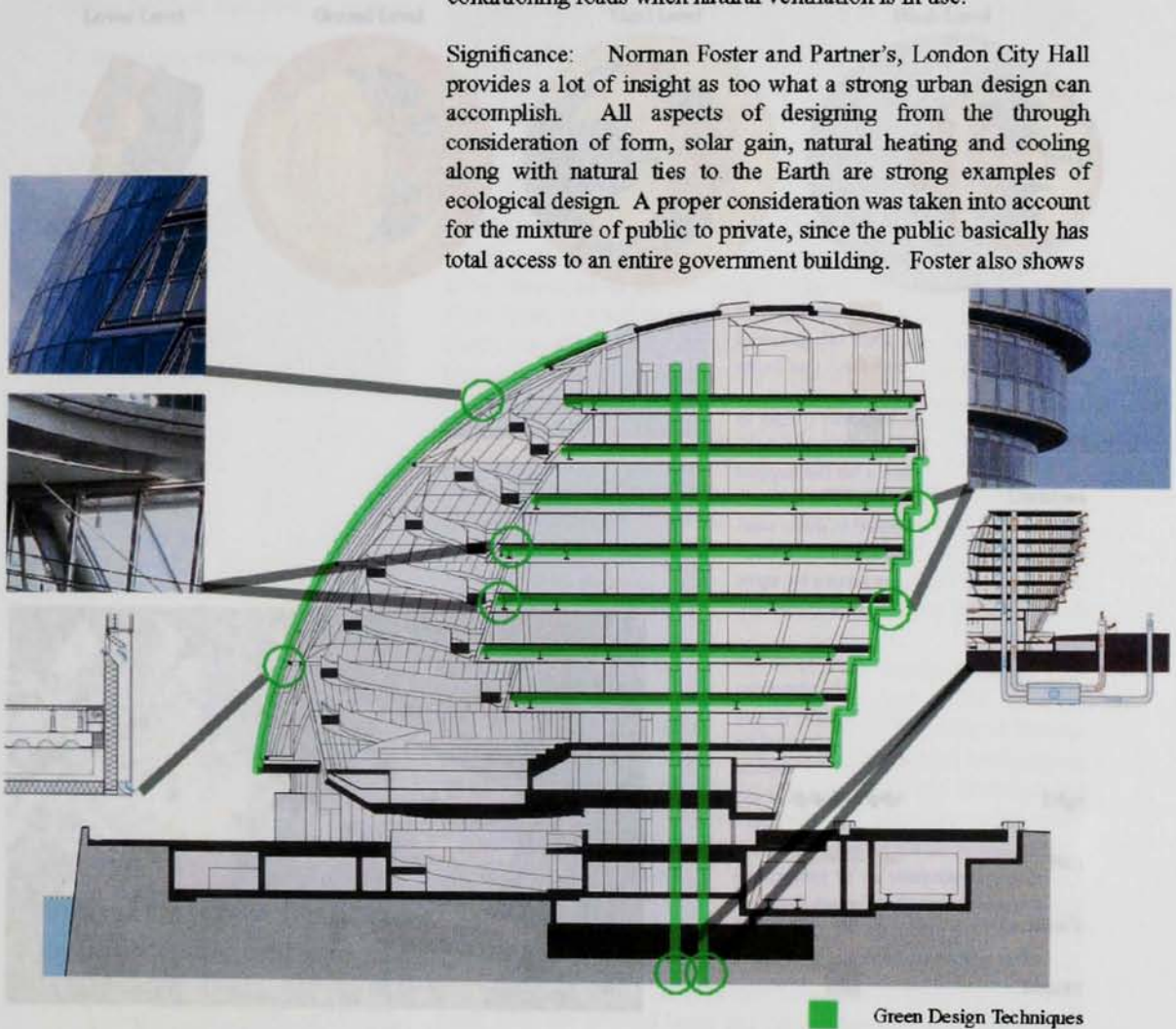
Located against the banks of the Thames River in the heart of London, is London City Hall, designed by Norman Foster and Partners. City Hall stands alone in the mist of a public plaza. The building is welcoming to the public and the environment considering it is not only sustainable but practically non-polluting. A concentration in making the government accessible and the making the building one that would usher in the next century of British Government was required as a major aspect of design. Foster integrated a café, public viewing gallery of the assembly chamber, along with an exhibition gallery on the top level. Londoners along with tourists have access to the building throughout all times of the day, unlike many other government buildings that do not allow the public inside when the assembly is gathered. London City Hall sits on a generous plaza that contains an open air amphitheatre, plans are underway for the addition of office headquarters, shops, restaurants, hotel and a theater.

Foster's design considerations for the environment were another driving force of design. London City Hall requires only 25 percent of the amount of energy that it would take to operate a similar size government building, which is accomplished through solar heat gain, natural ventilation, interior heating and cooling, and countless other ecological/sustainable design considerations. The façade's sphere shape has 25 percent less surface area than the basic cube design, while allowing the south façade each level of the sphere overhangs over the next level in order to prevent summer sun from entering into the building. The slope of the sphere allows for the maximum amount of natural light to enter into the northern façade. The building draws its heat and cooling through geothermal techniques. 475 feet into the ground, water is pumped into the building in order to take advantage of the Earth's natural temperature. During the summer the floor beams are cooled as water passes by them and during the winter a reverse process is used. All offices have access to natural ventilation due

London City Hall

to the double skin of the building and sometimes a triple skin. Maintenance of the building is the most important aspect in maintaining an ecological advantage. The building is ran by a "Building Management System" that controls the conditions of the building when rooms are not in use or aspects like lower air conditioning loads when natural ventilation is in use.

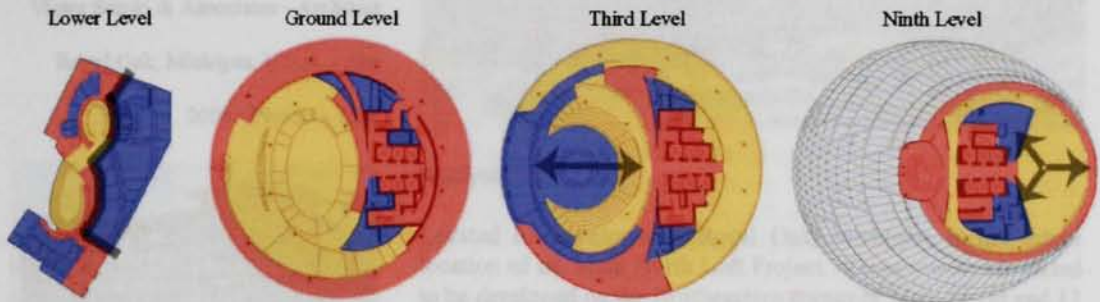
Significance: Norman Foster and Partner's, London City Hall provides a lot of insight as to what a strong urban design can accomplish. All aspects of designing from the through consideration of form, solar gain, natural heating and cooling along with natural ties to the Earth are strong examples of ecological design. A proper consideration was taken into account for the mixture of public to private, since the public basically has total access to an entire government building. Foster also shows



how to tie a building into the public realm, in the fact that the design creates a landmark for the people of London that people will flock to for years to come. Also the urban context is important the public has two transportation stops within a ten minute walk of the building. From London City Hall, the thesis

London City Hall

can grow from more strong points of designing of with work and environment in mind as well as how to consider structure in the context of the city.



- Movement
- Public
- Private
- Divisions
- Connections



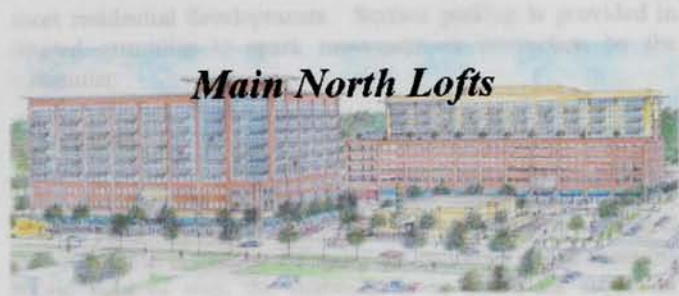
- ⚡ Edge
- ↔ Path
- ★ Landmark
- District

Precedent Analysis Three:

Victor Saroki & Associates - Architect

Royal Oak, Michigan, U.S.A. - Site

2004 - Present - Date



Main North Lofts

Analysis:

Located in downtown of Royal Oak, Michigan, is the future location of the Main North Loft Project. Three towers are slated to be developed on the Northeastern corner of Main Street and 11 Mile Road, in what is to become the threshold of entry from the North into this rapidly developing area. The city is that of any typical suburb, the downtown is a place of interest for non “big box” or “mom and pop” shopping, with the location of single family dwelling units located in the typical donut fashion around the downtown. A paradigm shift has occurred in this downtown region, with the intermixing of “mom and pop” shopping outlets with night life and entertainment. With this boom in Royal Oak you could say that it has become a ‘Node’ of the Detroit Metropolitan Region. The issue with this region remains the continued separation of housing against that of the necessities to sustain life.

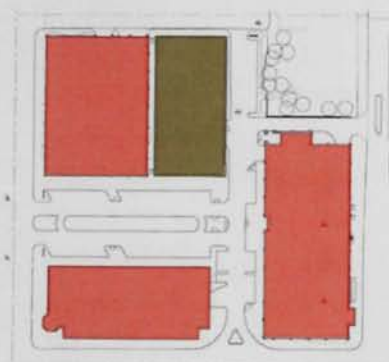
The Main North Loft project looks to break through this separation of housing and commerce and build on the development that has taken place Royal Oak. The lack of density and diversity within the downtown district is tackled by bringing in approximately 70,000 square feet of residential development which allows approximately 70 lofts per structure, with units ranging from 600 square feet up to 2,000 square feet. The lofts built on the mixed use idea by providing 30,000 square feet of first floor retail in order to continue the Royal Oak, downtown retail tradition, while also extending the downtown foot traffic for the first time past 11 mile, which had acted as an edge, by building the lofts directly on the lot lines instead of setting the building back. On the ground level not just shops, but more important functions that are a necessary to support life that were previously absent in the downtown district, such as a grocery store are being included. Finally, the lofts provide 60,000 square feet of parking within the building on the second and third floors in order to solve the issue of surface parking for residences which is a plague for

Main North Lofts:

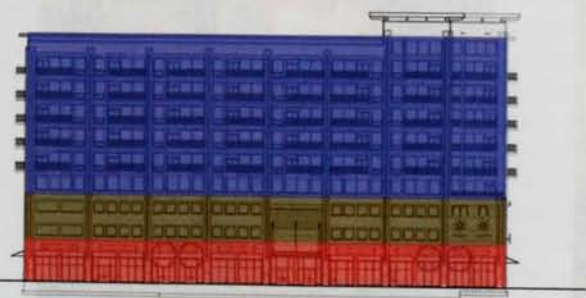
most residential developments. Surface parking is provided in limited quantities to spark movement or interaction by the commuter.

Significance:

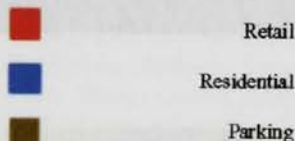
One main issue that the Main North Lofts handle is the edge of a town or place. Too often projects are designed against edges that do not address the edge. Bringing the buildings out to meet the public right of way, the sidewalk, is an important aspect in allowing people to continue walking without being disturbed by voids that usually promote the use of the automobile. Opening shops up, allowing café's to breach on the sidewalk, awning that help pull people closer to the architecture and to further explore the space. Another important aspect of this thesis exploration is the mixture of usages in such a tight area. The residential units which appeal to multiply demographics is important as well as making sure to have a mixture of shops, retail, life supporting elements like grocery stores, and finally the integration of the parking into the building instead of creating the sea of parking that is evident in most modern building. The program is what gives of itself the most to this thesis, I think that these lofts are very successful, in that they look for a diversity of economic levels and of commerce and also promote density in an area that traditionally has been low.



Site Plan



West Elevation



First Floor Plan

Main North Lofts:



Circulation before Main North Loft Completion

Brown - Automobile Traffic
Green - Public Transportation
White - Foot Traffic

Circulation after Main North Loft Completion



Mixture of Uses and Heights
Heights vary, red colors represents residential units, brown parking levels and blue denotes retail.



Addressing of the Edge
Extension of the Awnings, recess of the first floor retail, parking levels, and finally the extrusion of the residential units again.

Precedent Analysis Four:

City of St. Paul Planning Commission;

Dover, Kohl & Partners - Planners

St Paul, MN; Winter Village, FL;

Brainerd, TN - Sites

1998 - Ongoing - Date



Analysis:

Dead malls are becoming ever more present as the trend continues to move further and further out of the core of city centers and into their very own personal castles. As people move further and further out they leave the infrastructure and fabric that once was so important to life, left to ruin though neglect. The money that leaves with the people, leaves the infrastructure without the needed funds in order to repair itself and to continue to advance itself with a phantasmagorias society. The shopping mall is most vulnerable to this process, as these hulks must have the revenue in order to continue in existence, and if not they are left in ruin, since no developer is willing to take on the hulk of the shopping mall, if it has already proved that it cannot turn a profit. This leaves only one answer to this problem, transform the mall and its sea of parking to a dense area that will draw people back into the space. Winter Park Village in Winter Park, Florida; Eastgate Town Center in Brainerd, Tennessee; and Phalen Village Center, in St. Paul, Minnesota, were all malls that were on their downside, one could say that they were dieing or "Dead Malls." The 32 acre Winter Park Village built in 1963, Eastgate Town Center, 40 acres and completed in 1972, and the 27 acre completed in 1959 Phalen Village Center all were suffering the same fate by the late 1980's and by the early to mid 1990's they were in the grave. The same problems plagued all of these malls even though they were all located in different regions of the United States. Remote locations from urban centers, no direct link of public transportation with the mall and the fact that the malls were dependent on the automobile and moving consumers were causes for each downfall. Without a residential district adjacent to the mall to support the center each one was dependent on the commuting of their consumers, and each one suffered fatal blows when larger, more modern centers were built within 10 miles of the location of the mall. Consumers easily took their cars and dollars and traveled the distance to the modern malls, likewise the shops followed the money, leaving



Winter Park Village, Florida



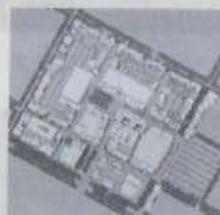
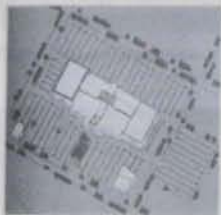
Eastgate Town Center, Tennessee



Phalen Village Center, Minnesota

Transformations:

society with three dead malls. A redevelopment was pushed on all of these malls, and the main idea was to reduce or eliminate the mall, replace the concrete sea of parking with residential development, office space, and retail or entertainment. Each mall looked to become an urban area and that focused around reconnecting the fabric that didn't exist when the mall was a district in and of itself. Winter Park Village developed 100,000 sq.ft. of office space, 400,000 sq.ft. of retail and 58 housing units. Eastgate Town Center developed 720,000 sq.ft. of office space, 180,000 sq.ft. of retail with the planning still ongoing for residential units, and the Phalen Village Center developed



Winter Village Re-Development Plan



Eastgate Town Center Re-Development Plan



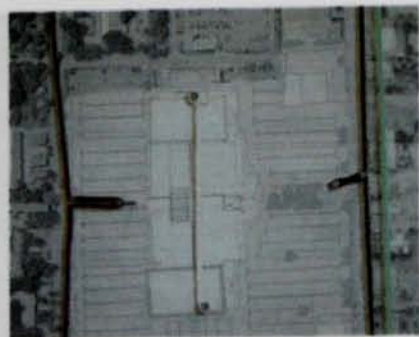
Phalen Village Center Re-Development Plan

170,000 sq.ft. of office space, 65,000 sq.ft. of retail and 30 residential units.

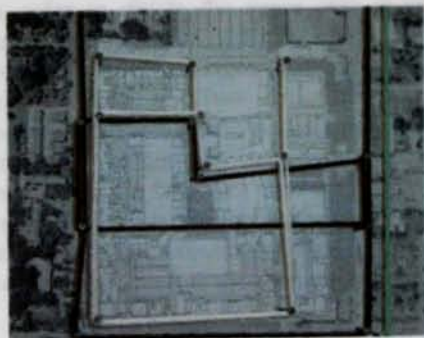
Significance:

The importance that can be drawn from these precedents is that

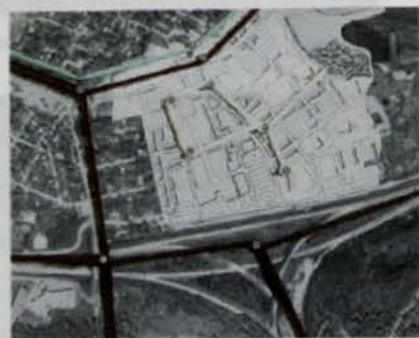
Transformations:



Circulation: Winter Village Before Completion



After Completion



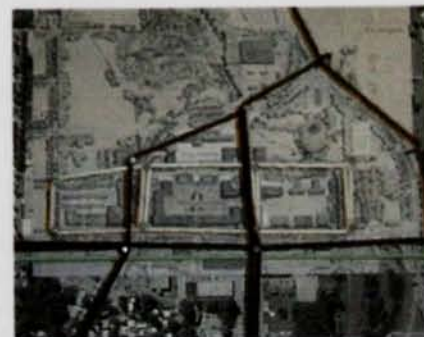
Circulation: Eastgate Town Center Before Completion



After Completion



Circulation: Phalen Village Center Before Completion

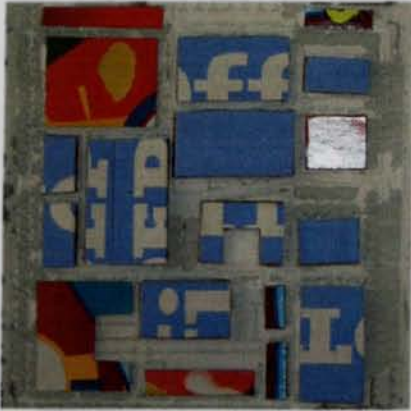


After Completion

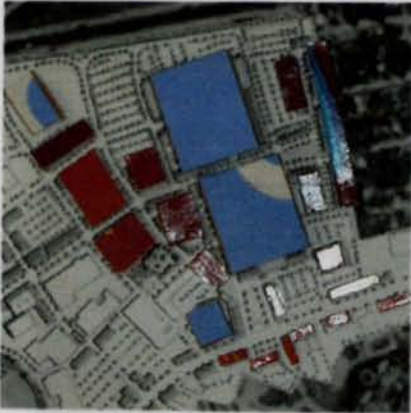
Brown - Automobile Traffic
Green - Public Transportation
White - Foot Traffic

these strategies can be applied to any site, not just to a "Dead Mall." You could use this to lay out a brownfield re-development or the development of an existing community that needs an economic boost. These developments also addressed the issue of

Transformations:



Winter Village: Hights and Useage



Eastgate Town Center: Hights and Useage



Phalen Village Center: Hights and Useage

circulation within the sites. They all looked to add roads through the sea of parking in order to divide the space into more manageable, and that can easily be navigated by the pedestrian. They looked to add movement to the area other than that of the automobile, in the form of creating an urban center in which dwelling can be achieved. Finally, these former malls looked to a development that returns nature or the re-investment of nature back into the site. Former heat sinks that were concrete parking lots were re-developed not only for structures or hardscape but, a form or public works project, park, lake or gardens were injected into the development creating a link back to the community.

Amalgamated Properties

The development of these sites along with the progressive features implemented are how these projects provide a strong voice in the development of the future. After conceptual design had commenced, it became evident for the need to step back and re-evaluate. The necessity to evaluate occurred when the program, the developed form and form that what form can be derived from the design nature of these sites had occurred. What is the program, is it only one and work units that are connected either directly or indirectly, or does the program need to branch out, leading the form to form.

The initial hybrid project is having to do the knowledge of a vast program of the apartment units, offices, the shopping, dining, and multi-level parking with levels to provide a "city within a city". Initial hybrid features 4 stories and 22 stories per tower, and levels to connect to the 10th floor within a grid that provides a walk and other services for occupants. The form creates a central green space at the point where to create views and a complete building area.

Finally, looking to the program, provides an idea of a program of 10 apartments, offices, as well as commercial, designed around the development. As it goes, the program becomes based around the main of the program as well as the materials of use. The building is also to provide a central garden, as well as a central area for the occupants, with being that to a design that is unique and one that can be used as a landmark building.

Amalgamated Hall on the campus of MIT, across the developed 300 feet diameter, an oval form, and dining hall, within 10 stories a 100' long. The building was raised around 3 large openings that

Mixture of Uses and Heights

At the same time allow light to spread Heights very, red colors represents residential units, brown parking levels and blue denotes retail.

The creation of 9 operable windows per residential unit creates a unique pattern of light or night, and provide a sustainable function as well.

Precedent Analysis Five:

Steven Holl & Associates - Architect

Beijing, China; Amsterdam, Netherlands;

Cambridge, Ma - Sites

2002 - Ongoing - Date



Linked Hybrid - Beijing, China



Zuidas Housing - Amsterdam, Netherlands



Simmons Hall - M.I.T., Cambridge, MA

Analysis / Significance:

The forms of Steven Holl's work along with the programs that are implemented into his forms provide a strong value to the development of this thesis. After conceptual design had commenced, it became evident for the need to step back and re-examine. The necessity to examine exactly what my program has developed into and from that what forms can be derived from the diving motive of Home/Work/Environment. What is the program, is it only live and work units that are connected either directly or indirectly, or does the program need to branch out, leading the thesis to Steven Holl.

The Link Hybrid project in Beijing lends its knowledge of a vast program of 750 apartment units, offices, kindergarden, cinema, and underground parking which looks to develop a "city within a city." Linked Hybrid features 8 towers and 22 floors per tower, each tower is connected on the 20th floor with a ring that provides a café and other services for occupants. The form creates an urban plaza while at the same looks to create views and a complete dwelling area.

Zuidas Housing in Amsterdam, provides an idea of a program of 89 apartments, offices as well as commerce designed around the live/work lofts. At 19 floors, the project becomes based around the scale of its opening as well as the materials of use. The building is able to provide elevated gardens, as well as shared terraces to its occupants, while being cast in a form that is unique and one that can be stated as a landmark building.

Simmons Hall on the campus of M.I.T. shows the developed 350 bed dormitories, an auditorium, and dining hall, within 10 floors at 382' long. The building was based around 5 large openings that create dynamic views and at the same time allow light to expand well into the core of the building. Most notably on this project are the 18" thick exterior wall depth and the created of 9 operable windows per dormitory, that create a unique pattern of light at night, and provide a sustainable function as well.

Precedent Analysis Five:

Cannon Design Inc. - Architect

Niagara Falls, NY - Sites

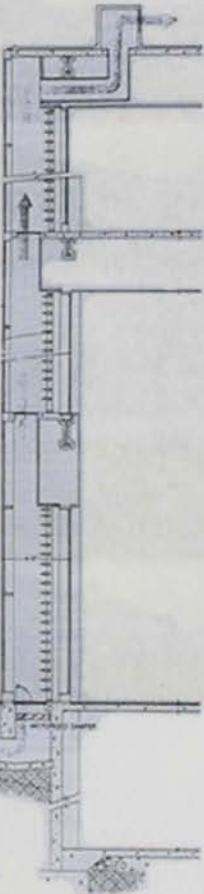
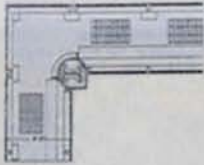
1978 - 1980 - Date



Analysis / Significance:

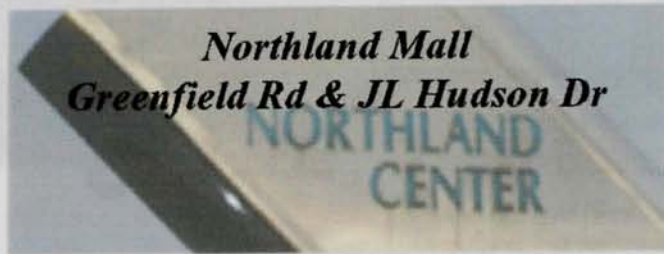
The Hooker Office Building is considered to be one of the first and a pioneer or prototype of a double skin building in North America. Designed in the late 70's and completed in the early 80's during the first oil crisis, this building was able to achieve its goal of reducing energy consumption, with this innovated design. A four foot wide cavity is created between the green-insulated glazing of the outer wall and the clear single glazing of the interior wall. This cavity allows the building to be operated at 2 percent for heating loads and 19 percent for cooling loads compared to that of a typical building of the same volume. While at the same time building maintains only a 10 degree temperature difference in the cavity between that of the Southern side and the Northern side of the façade this helps maintain lower energy loads on the Northern, compared to the higher differences that are seen without the moving of the air within the cavity.

The cavity allows air to enter at the base of the building and thru convection move up the side of the façade in the cavity, and be vented on the roof. The air heats within the cavity from the sun, which reduces the heating load necessary especially in cold weather climates. During the warm weather the air can be ventilated into the building, providing cool breezes that are normally not achievable with high rise buildings cannot allow open windows. During high sun, or evening hours louvers on the façade can be closed also helping to reduce energy loads.



Movement of natural ventilation thru the cavity.

Site Examination One:



Architect Victor Gruen reinvented the American city with his development of Northland Shopping Center in 1954. This cluster arrangement of retail stores surrounded by a parking lot became a main component of model urban sprawl featuring 110 stores encompassing over 1 million square feet. Today the mall is in a transition state, as the ever moving urban belt stretches further and further away causing the mall to loose popularity as density decreases and as more modern and larger malls are constructed to keep pace with the phantasmagorias population. The main issue is the sea of parking the now surrounds the mall but remains a heat soak as the spots are left to vacant.

Northland Mall offers wonderful opportunities as possible redevelopment site. An analysis based on land use, climate, Lynch's 5 points of architecture and of Moughtin's Compact City Models state that a brownfield development to the northern parking lot would be major economically benefit to the region. Instead of the mall being a district without connections, a mixed use development would allow for increase of density which in turn would lead to stronger economic revenues, also allowing the mall to reconnect back to other districts that are lost to the sheer size to the parking lot.

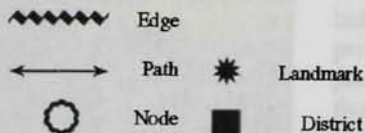
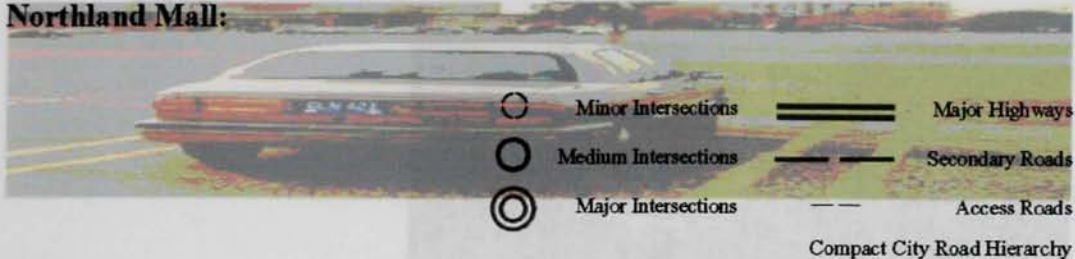


20 Acres

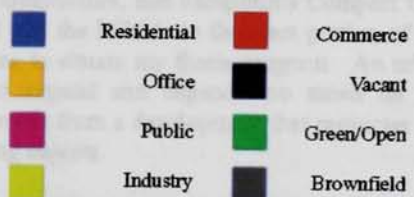
Site Size

Site Outline

Northland Mall:



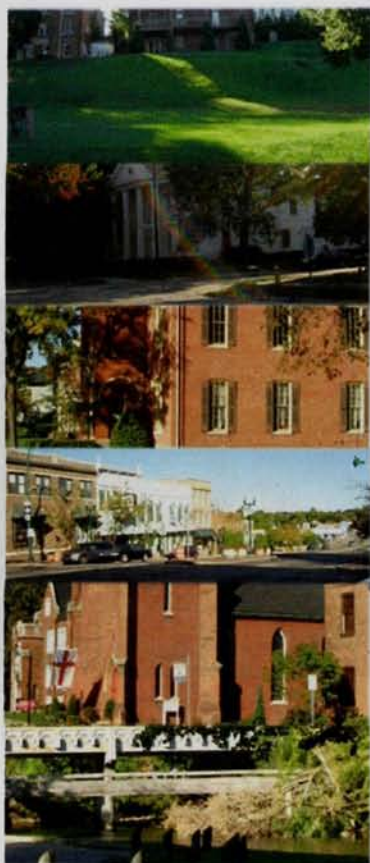
Kevin Lynch's 5 Points



Current Land Use



Site Examination Two:



Riverside Park is located in the cross hairs of what would be the historical roots of Ypsilanti. The park is a node tucked just outside of the downtown district, along the banks of the Huron River. This park traces with its heritage going back to the Huron Indians, was once the juncture of trails with the Huron River, the park acted as camping and burying goods for the Indians that passed through this area. As time progressed, Ypsilanti shifted from an Indian trading post to that of education, with the founding on EMU. Ypsilanti today remains a place of education, but it also took up a strong ties in industry and commerce

Riverside Park, with green hills and plateaus, along with the sounds of the Huron River trickling past, it really creates a place of refuge outside what can be considered the downtown district of Ypsilanti. Examining land usage, climate, environmental aspects, Lynch's 5 points of architecture, and Moughtin's Compact City Model, I determined that the hillside to the west portion of the park was the best area to situate my thesis program. An urban center that needs to expand and depends too much on the automobile would benefit from a development that promotes the connection of dwelling aspects.



5 Acres

Site Size



Site Outline

Downtown Ypsilanti:



Kevin Lynch's
points

- ◆◆◆◆ Edge
- Path
- Node
- ★ Landmark
- District

The park, which is located near the river with scattered and medium-sized plots, is a mix of residential and commercial uses. The area is also home to several parks, including the Ypsilanti Riverfront Park, which is a 100-acre park located along the river. The park is a mix of residential and commercial uses, and it is a key feature of the downtown area. The park is also a key feature of the downtown area, and it is a key feature of the downtown area.

- Current Land Use
- Residential
 - Office
 - Public
 - Commerce
 - Brownfield
 - Green/Open



Site Examination Three:



The Detroit Riverfront, it is where the city begins, it's where the city grew during the industrial revolution and where the city became an industrial powerhouse thru mid 1900's. Street names in this region are derived from the names of early French settlers of this region. As need for further development occurred, farms were ushered out and the river transformed to develop ground of the downtown district. When industry and shipping needs occurred the land parcels of river that were not devoted to the downtown district filled the need. In its current state, remnants of industry lay in ruin, while vacant lots are mixed with scattered green spaces, and redevelopment projects.

Rivard Street and Atwater Street, an area left to ruin by neglect. Overgrown vacant lots mix with neglected industrial behemoths, while the regenerated St. Aubin Park, Chene Park or 300 River Place are scattered throughout. Examining current land uses, climate, Lynch's 5 points of Urban Architecture, and Moughtin's Compact City models, states that this area is one primed for development. Adjacency to the Central Business District, narrow roads, the ability to break the blocks into a walkable section, along with the river and unblocked sun, can promote an urban sustainable development.



20 Acres

Site Size
Site Outline



Detroit Riverfront:



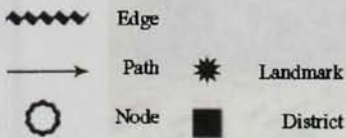
Compact City
Road Hierarchy



Current
Land Use



Owens Lynch's
Points



Site Analysis:



Site Location

Detroit Riverfront Orleans & Atwater St

The Detroit Riverfront will act as the vehicle that will propel my thesis based on the examination of the three possible site selections. I will move my site from Rivard Street and Atwater Street running northeast along the river, to Orleans Street and Atwater Street running southwest along the river. The Riverfront is a site that is engrossed in history and one that is currently undergoing a major renaissance, the erection of a riverfront boardwalk and the development of Tri-Centennial State Park. Considering history, I will be able to use the Historic Globe/Dry Dock Building as an anchor and a possible view corridor for the northeast area of my site and the former dry docks running through out the site can provide history and could become an anchor point in design.

The renaissance of the site is another selling point for the choice to design on this site. The site will provide a direct walking path with the downtown, the availability of ample space, the creation of park space, and untainted natural environment (i.e., sunlight). I have been provided with a movement of people, land for building and nature, as well as unrestricted access to the environment. This will be fuel for my thesis and provide the basics for a successful development of a complete dwelling space, where home, work and environment come together.

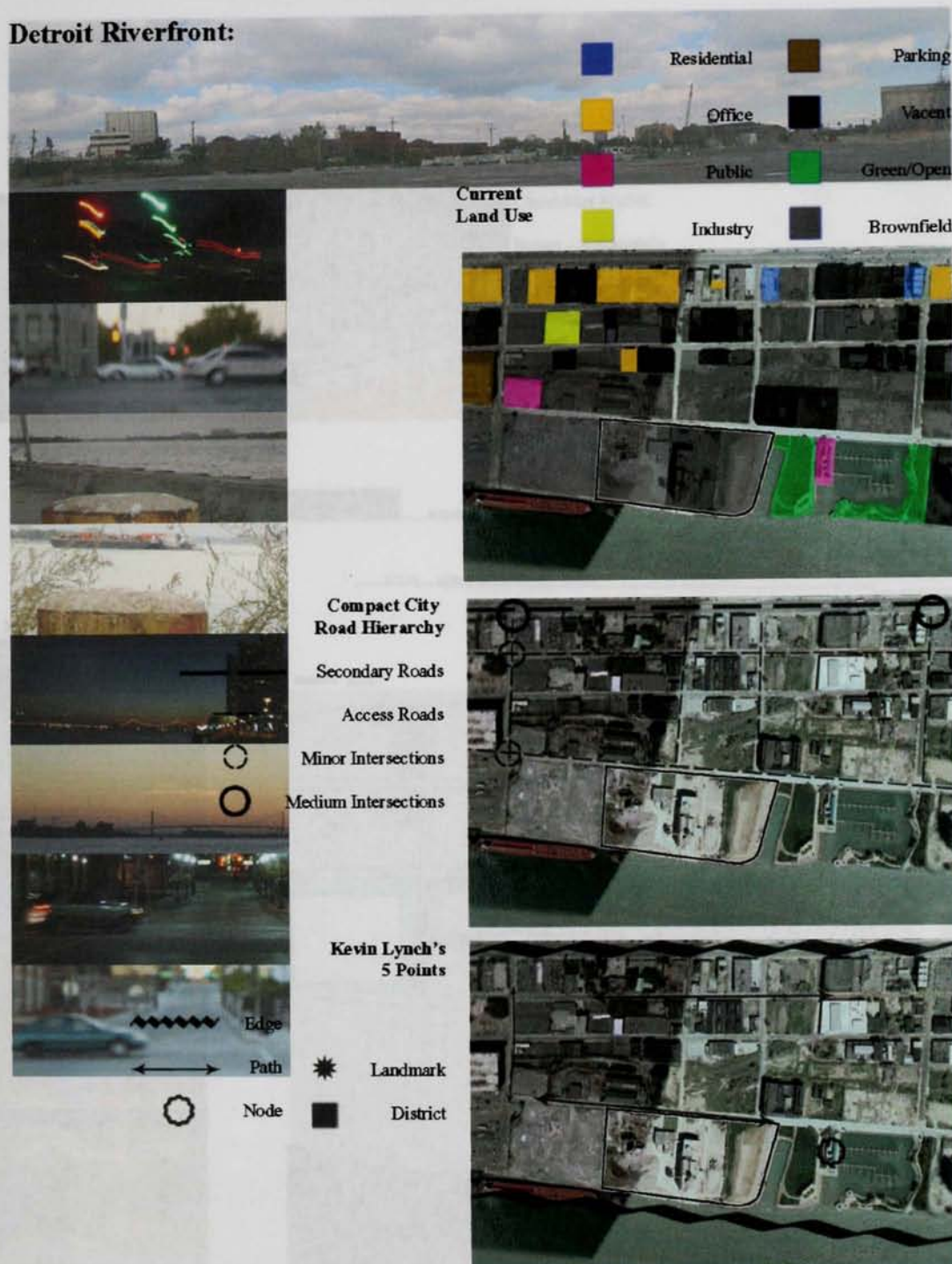
13 Acres

Site Size

Site Outline



Detroit Riverfront:



Detroit Riverfront:



Circulation Model:

- Brown - Automobile
- Green - Public Transportation
- White - Foot Traffic
- Blue - Sea Traffic



Site Model:



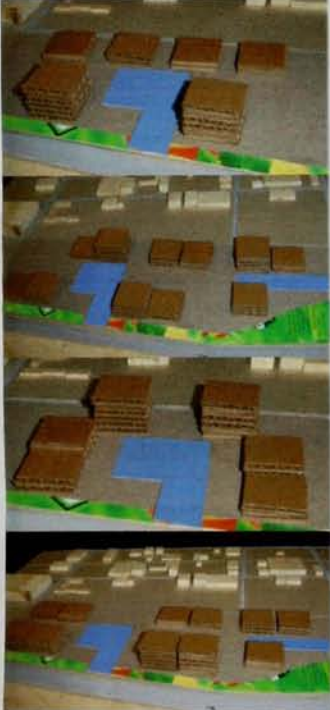
East West Section: 1:150



North South Section: 1:150



Site Potential Models:



Detroit Riverfront:



Site Location

Proposed City Riverfront Walkway Plan; This plan will be implimted over other proposed plans for the thesis.

Sanborn - 1763



Sanborn - 1860



Proposed City Riverfront Walkway Models

Proposed CityRiverfront Walkway Plan



Program Statement:

Main Objective:

Reconnect all aspects of life; home, work and environment, in a user friendly district.

Secondary Objective:

Integrate living and working, which addresses the hold that the automobile has on society.

Use the "Dead Space" the once was roofs in order to become connection spaces between residential units, connections between offices and residential units and the connection of the café to the office units and residential.

New Roof space is used as the connection between different aspects of the program. A direct connection between the exterior and public exists, but the connection between residential and office can be made through the roof spaces.

Integrate the Detroit Riverfront plan. Use the plan to promote walking and prompt the walking to move further then just the riverfront. Become a gateway building from "Tri-Centennial Park" and the riverfront boardwalk.

Design Considerations / Aspirations:

Development of a Master Plan that will support my individual thesis exploration. The plan should phase in individual residential units, commerce buildings, mixed use development, and must have needs like grocery store, hardware store, cleaners, and forms of evening entertainment.

Look to develop economic diversity – do not get overwhelmed in the "Yuppie" design of suburbs like Royal Oak, and Birmingham.

Do not cater to cutting out spaces that appeal to typical "Big Box" stores / retail.

Act as a place that will tie the riverfront, greenery / riverfront walkway into the daily functions of people. People must interact with nature and recognize nature, move nature into the site rather than staying on the edge of the site.

Look to develop a master plan that will promote walking, promote interaction. Blocks should allow multiple routes or paths to be taken to destinations. Streets should be narrow, and or in the boulevard fashion. River and greenery should impede into the site rather than creating an edge like the river and "Tri-Centennial Park" currently creates.

Connections should be made between the residential, commerce, and café, yet they should all stand separately.

Exterior Space will not be counted into the figures since I will look to impede on the Riverfront Boardwalk and that of the roof space created by the structure.

Quantitative Summary:

Residential	
Residential Units – 16 Units – 15' Ceiling Heights	
Master Bedroom	121 sq/ft
Cooking and Dining Areas	140 sq/ft
Living Room or Gathering Areas	144 sq/ft
Bathroom – Full	50 sq/ft
Closet/Storage	50 sq/ft
Utility Room	60 sq/ft
Net Total	565 sq/ft
Residential Units – 16 Units – 15' Ceiling Heights	
Master Bedroom	144 sq/ft
Flex Room or Second Bedroom	121 sq/ft
Cooking and Dining Areas	200 sq/ft
Living Room or Gathering Areas	150 sq/ft
Bathroom - Full	50 sq/ft
Bathroom - Half	25 sq/ft
Closet/Storage	75 sq/ft
Utility Room	70 sq/ft
Net Total	835 sq/ft
Residential Units – 12 Units – 15' Ceiling Heights	
Master Bedroom	144 sq/ft
Second Bedroom	121 sq/ft
Flex Room or Third Bedroom	121 sq/ft
Cooking and Dining Areas	220 sq/ft
Living Room or Gathering Areas	200 sq/ft
Bathroom – Full	50 sq/ft
Bathroom – Full	50 sq/ft
Closet/Storage	100 sq/ft
Utility Room	70 sq/ft
Net Total	1076 sq/ft
Residential Unit – 12 Units – 15' Ceiling Heights	
Master Bedroom	220 sq/ft
Second Bedroom	182 sq/ft
Third Bedroom	182 sq/ft
Cooking and Dining Areas	300 sq/ft
Living and Gathering Areas	300 sq/ft
Bathroom – Full	60 sq/ft
Bathroom – Full	60 sq/ft
Bathroom – Half	30 sq/ft
Closet/Storage	125 sq/ft
Utility Room	100 sq/ft
Net Total	1559 sq/ft

Quantitative Summary:

Residential Unit – 10 Units – 15' Ceiling Heights	
Master Bedroom	240 sq/ft
Second Bedroom	200 sq/ft
Third Bedroom	200 sq/ft
Flex Room or Forth Bedroom	182 sq/ft
Cooking and Dining Areas	300 sq/ft
Living and Gathering Areas	350 sq/ft
Bathroom – Full	100 sq/ft
Bathroom – Full	60 sq/ft
Bathroom – Full	60 sq/ft
Bathroom – Half	30 sq/ft
Closet/Storage	125 sq/ft
Utility Room	100 sq/ft
Net Total	1947 sq/ft
Commercial/Office	
Commercial/Office Space – 4 Units – 15' Ceiling Heights	
Office	300 sq/ft
Office	250 sq/ft
Conference Room	500 sq/ft
Conference Room	300 sq/ft
Open Floor Plan	13000 sq/ft
Kitchen/Break Room	400 sq/ft
Bathroom	30 sq/ft
Bathroom	30 sq/ft
Storage	190 sq/ft
Net Total	15000 sq/ft
Commerical/Office Space – 10 Units – 15' Ceiling Heights	
Office	300 sq/ft
Open Floor Plan	3350 sq/ft
Breakroom	200 sq/ft
Storage	150 sq/ft
Net Total	4000 sq/ft
Commerical/Office Space – 20 units – 15' Ceiling Heights	
Office	300 sq/ft
Open Floor Plan	2100 sq/ft
Storage	100 sq/ft
Net Total	2500 sq/ft
Commerical/Office Space – 20 units – 15' Ceiling Heights	
Office	200 sq/ft
Open Floor Plan	1200 sq/ft
Storage	100 sq/ft
Net Total	1500 sq/ft

Quantitative Summary:

Commerical/Office Space – 20 units – 15' Ceiling Heights	
Open Floor Plan	700 sq/ft
Storage	100 sq/ft
Net Total	800 sq/ft
Commerical/Office Space – 20 units – 15' Ceiling Heights	
Open Floor Plan	450 sq/ft
Storage	50 sq/ft
Net Total	500 sq/ft
Commerce – 6 units – 15' Ceiling Heights	
Office	200 sq/ft
Changing Rooms	150 sq/ft
Break Room	200 sq/ft
Storage	150 sq/ft
General Retail Area	2000 sq/ft
Net Total	2700 sq/ft
Total Residential	73490 sq/ft
Total Commerical/Office	206000 sq/ft
Total Commerce	16,200 sq/ft
Net Area of Mixed Dwelling Structure	295690 sq/ft
30% Circulation (Vertical and Horizontal)	88707 sq/ft
Gross Area of Mixed Dwelling Structure(s)	384397 sq/ft
Development to assist Dwelling Design	
Grocery Store	30000 sq/ft approx.
Hardware Store	25000 sq/ft approx.
Bank/Financial	15000 sq/ft approx.
Retail-Clothing (1000-3000 sq/ft per unit)	90000 sq/ft approx.
Office/Firms (2000-5000 sq/ft per firm)	70000 sq/ft approx.
Office (20000 sq/ft per institute)	50000 sq/ft approx.
Residential (800-2000 sq/ft per unit)	80000 sq/ft approx.

Space Detail:

Space Name:
Residential Unit

Quannity	Occupancy	Net Square Feet	Total Net Area
16	3	565 s.f.	9,040 s.f.

Prurpose/Function:

A living space that is intended to allow singles or couples the ability to own a home within the development. Creates economic diversity and age diversity on the lower income level.

Activities:

People will be able to live and perform all actions that are necessitated through daily life. Space can be occupied throughout all hours of the day.

Spatial Relationship:

Maximum amounts of natural light should be created. Where possible create a direct access with the exterior environment. Also look to create a relationship with the office spaces if possible.

Special Considerations:

Plan should be designed as open as possible, with the location of walls towards the center core of the unit to allow natural light, when possible.

Equipment/Furnishings:

Appliances and furniture that is necessary to support home life is required.

Behavioral Considerations:

A desire for openness and availability to the exterior is desired, but a total loss of privacy is not desired.

Space Detail:

Space Name:
Residential Unit

Quannity	Occupancy	Net Square Feet	Total Net Area
16	4	835 s.f.	13,360 s.f.

Propose/Function:

A living space that is intended to allow singles, couples or starter families the ability to own a home within the development. Creates economic diversity and age diversity on the lower income level.

Activities:

People will be able to live and perform all actions that are necessitated through daily life. Space can be occupied throughout all hours of the day.

Spatial Relationship:

Maximum amounts of natural light should be created. Where possible create a direct access with the exterior environment. Also look to create a relationship with the office spaces if possible.

Special Considerations:

Plan should be designed as open as possible, with the location of walls towards the center core of the unit to allow natural light, when possible.

Equipment/Furnishings:

Appliances and furniture that is necessary to support home life is required.

Behavioral Considerations:

A desire for openness and availability to the exterior is desired, but a total loss of privacy is not desired.

Space Detail:

Space Name:
Residential Unit

Quannity	Occupancy	Net Square Feet	Total Net Area
12	4	1,076 s.f.	12,912 s.f.

Propose/Function:

A living space that is intended to allow couples or small families the ability to own a home within the development. Creates economic diversity and age diversity on the medium income level.

Activities:

People will be able to live and perform all actions that are necessitated through daily life. Space can be occupied throughout all hours of the day.

Spatial Relationship:

Maximum amounts of natural light should be created. Where possible create a direct access with the exterior environment. Also look to create a relationship with the office spaces if possible.

Special Considerations:

Plan should be designed as open as possible, with the location of walls towards the center core of the unit to allow natural light, when possible.

Equipment/Furnishings:

Appliances and furniture that is necessary to support home life is required.

Behavioral Considerations:

A desire for openness and availability to the exterior is desired, but a total loss of privacy is not desired.

Space Detail:

Space Name:
Residential Unit

Quannity	Occupancy	Net Square Feet	Total Net Area
12	5	1,559 s.f.	18,708 s.f.

Propose/Function:

A living space that is intended to allow couples or families the ability to own a home within the development. Creates economic diversity and age diversity on the medium or upper income level.

Activities:

People will be able to live and perform all actions that are necessitated through daily life. Space can be occupied throughout all hours of the day.

Spatial Relationship:

Maximum amounts of natural light should be created. Where possible create a direct access with the exterior environment. Also look to create a relationship with the office spaces if possible.

Special Considerations:

Plan should be designed as open as possible, with the location of walls towards the center core of the unit to allow natural light, when possible.

Equipment/Furnishings:

Appliances and furniture that is necessary to support home life is required.

Behavioral Considerations:

A desire for openness and availability to the exterior is desired, but a total loss of privacy is not desired.

Space Detail:

Space Name:
Residential Unit

Quannity	Occupancy	Net Square Feet	Total Net Area
10	5	1,947 s.f.	19,470 s.f.

Propose/Function:

A living space that is intended to allow couples or families the ability to own a home within the development. Creates economic diversity and age diversity on the upper income level.

Activities:

People will be able to live and perform all actions that are necessitated through daily life. Space can be occupied throughout all hours of the day.

Spatial Relationship:

Maximum amounts of natural light should be created. Where possible create a direct access with the exterior environment. Also look to create a relationship with the office spaces if possible.

Special Considerations:

Plan should be designed as open as possible, with the location of walls towards the center core of the unit to allow natural light, when possible.

Equipment/Furnishings:

Appliances and furniture that is necessary to support home life is required.

Behavioral Considerations:

A desire for openness and availability to the exterior is desired, but a total loss of privacy is not desired.

Space Detail:

Space Name:
Commerical/Office Space

Quannity	Occupancy	Net Square Feet	Total Net Area
4	100	15,000 s.f.	60,000 s.f.

Prupose/Function:

A working space that is intended to create employment within the development for residents and commuters alike. Creates economic prosperity for individual or small firms for members of the development.

Activities:

People will be able to work and provide services that are necessitated through a work environment. Space will typically be occupied anywhere between morning and evening hours.

Spatial Relationship:

Natural light should be created where possible. Where possible look to create a direct relationship with the residential spaces if possible.

Special Considerations:

Plan should be designed as open as possible, and be able to become altered where desired. Spaces should typically be located above the ground level floor plane, and within as close contact with residential units as possible .

Equipment/Furnishings:

Furnishings will vary per unit of design. Some will necessitate computer as well as desk/office space for owner and any employees while others will need space for artistic equipment or exhibition space.

Behavioral Considerations:

A desire for openness and an ability to become alter desired. Offices can be designed with privacy in mind. Access to the exterior when possible is desired.

Space Detail:

Space Name:
Commerical/Office Space

Quannity	Occupancy	Net Square Feet	Total Net Area
10	30	4,000 s.f.	40,000 s.f.

Propose/Function:

A working space that is intended to create employment within the development for residents and commuters alike. Creates economic prosperity for individual or small firms for members of the development.

Activities:

People will be able to work and provide services that are necessitated through a work environment. Space will typically be occupied anywhere between morning and evening hours.

Spatial Relationship:

Natural light should be created where possible. Where possible look to create a direct relationship with the residential spaces if possible.

Special Considerations:

Plan should be designed as open as possible, and be able to become altered where desired. Spaces should typically be located above the ground level floor plane, and within as close contact with residential units as possible.

Equipment/Furnishings:

Furnishings will vary per unit of design. Some will necessitate computer as well as desk/office space for owner and any employees while others will need space for artistic equipment or exhibition space.

Behavioral Considerations:

A desire for openness and an ability to become alter desired. Offices can be designed with privacy in mind. Access to the exterior when possible is desired.

Space Detail:

Space Name:
Commerical/Office Space

Quannity	Occupancy	Net Square Feet	Total Net Area
20	20	2,500 s.f.	50,000 s.f.

Prupose/Function:

A working space that is intended to create employment within the development for residents and commuters alike. Creates economic prosperity for individual or small firms for members of the development.

Activities:

People will be able to work and provide services that are necessitated through a work environment. Space will typically be occupied anywhere between morning and evening hours.

Spatial Relationship:

Natural light should be created where possible. Where possible look to create a direct relationship with the residential spaces if possible.

Special Considerations:

Plan should be designed as open as possible, and be able to become altered where desired. Spaces should typically be located above the ground level floor plane, and within as close contact with residential units as possible .

Equipment/Furnishings:

Furnishings will vary per unit of design. Some will necessitate computer as well as desk/office space for owner and any employees while others will need space for artistic equipment or exhibition space.

Behavioral Considerations:

A desire for openness and an ability to become alter desired. Offices can be designed with privacy in mind. Access to the exterior when possible is desired.

Space Detail:

Space Name:
Commerical/Office Space

Quannity	Occupancy	Net Square Feet	Total Net Area
20	8	1,500 s.f.	30,000 s.f.

Prupose/Function:

A working space that is intended to create employment within the development for residents and commuters alike. Creates economic prosperity for individual or small firms for members of the development.

Activities:

People will be able to work and provide services that are necessitated through a work environment. Space will typically be occupied anywhere between morning and evening hours.

Spatial Relationship:

Natural light should be created where possible. Where possible look to create a direct relationship with the residential spaces if possible.

Special Considerations:

Plan should be designed as open as possible, and be able to become altered where desired. Spaces should typically be located above the ground level floor plane, and within as close contact with residential units as possible.

Equipment/Furnishings:

Furnishings will vary per unit of design. Some will necessitate computer as well as desk/office space for owner and any employees while others will need space for artistic equipment or exhibition space.

Behavioral Considerations:

A desire for openness and an ability to become alter desired. Offices can be designed with privacy in mind. Access to the exterior when possible is desired.

Space Detail:

Space Name:
Commerical/Office Space

Quannity	Occupancy	Net Square Feet	Total Net Area
20	4	800 s.f.	16,000 s.f.

Prupose/Function:

A working space that is intended to create employment within the development for residents and commuters alike. Creates economic prosperity for individual or small firms for members of the development.

Activities:

People will be able to work and provide services that are necessitated through a work environment. Space will typically be occupied anywhere between morning and evening hours.

Spatial Relationship:

Natural light should be created where possible. Where possible look to create a direct relationship with the residential spaces if possible.

Special Considerations:

Plan should be designed as open as possible, and be able to become altered where desired. Spaces should typically be located above the ground level floor plane, and within as close contact with residential units as possible .

Equipment/Furnishings:

Furnishings will vary per unit of design. Some will necessitate computer as well as desk/office space for owner and any employees while others will need space for artistic equipment or exhibition space.

Behavioral Considerations:

A desire for openness and an ability to become alter desired. Offices can be designed with privacy in mind. Access to the exterior when possible is desired.

Space Detail:

Space Name:
Commerical/Office Space

Quannity	Occupancy	Net Square Feet	Total Net Area
20	2	500 s.f.	10,000 s.f.

Prupose/Function:

A working space that is intended to create employment within the development for residents and commuters alike. Creates economic prosperity for individual or small firms for members of the development.

Activities:

People will be able to work and provide services that are necessitated through a work environment. Space will typically be occupied anywhere between morning and evening hours.

Spatial Relationship:

Natural light should be created where possible. Where possible look to create a direct relationship with the residential spaces if possible.

Special Considerations:

Plan should be designed as open as possible, and be able to become altered where desired. Spaces should typically be located above the ground level floor plane, and within as close contact with residential units as possible.

Equipment/Furnishings:

Furnishings will vary per unit of design. Some will necessitate computer as well as desk/office space for owner and any employees while others will need space for artistic equipment or exhibition space.

Behavioral Considerations:

A desire for openness and an ability to become alter desired. Offices can be designed with privacy in mind. Access to the exterior when possible is desired.

Space Detail:

Space Name:
Commerce

Quantity	Occupancy	Net Square Feet	Total Net Area
6	20	2,700 s.f.	16,200 s.f.

Propose/Function:

A working space that is intended to create employment within the development for residents and commuters alike. Creates economic prosperity and a place of destination for people to gather and interact.

Activities:

People will be able to work and provide goods for members of the community. Space will typically be occupied anywhere between morning and late evening hours, and will see heavy traffic volumes.

Spatial Relationship:

Natural light should be created where possible. Where possible look to create a direct relationship with the movement that occurs with streets and sidewalks.

Special Considerations:

Plan should be designed as open as possible, and be able to become altered where desired. Spaces should be located at the ground level floor plane.

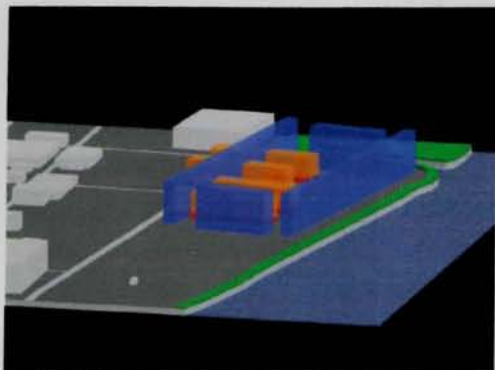
Equipment/Furnishings:

Furnishings will vary per unit of design. Some will necessitate computer as well as desk/office space for owner and any employees, while other units will only require space for cash registers.

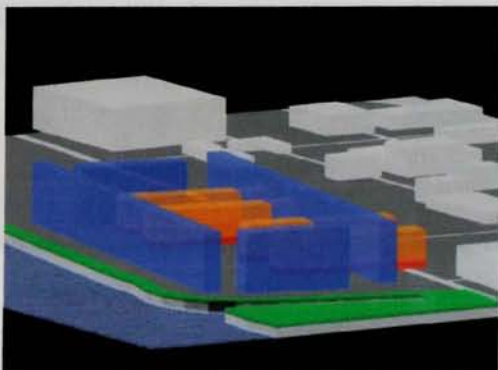
Behavioral Considerations:

A desire for openness and an ability to become alter desired. Should achieve as open feel as possible, with as much visual access at street level as possible.

3-D Program Diagrams:

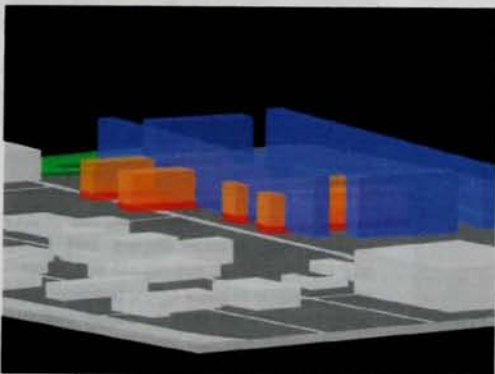


Southeast View

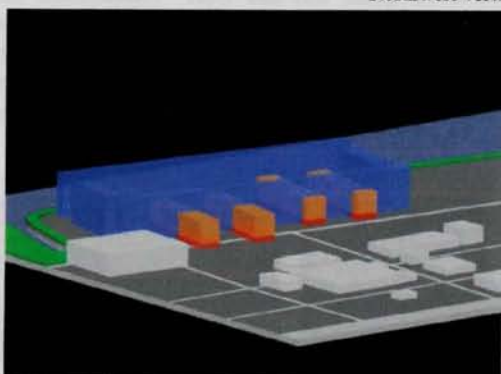


Northeast View

Southwest View



Northwest View



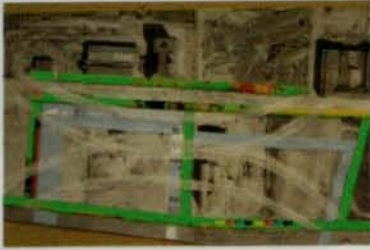
- Residential
- Retail
- Office
- Green Area

...the building space would...
...the environmental features and...
...the character of the development...
...the overall design goals...
...the building space would...
...the environmental features and...
...the character of the development...
...the overall design goals...

...the building space would...
...the environmental features and...
...the character of the development...
...the overall design goals...
...the building space would...
...the environmental features and...
...the character of the development...
...the overall design goals...

...the building space would...
...the environmental features and...
...the character of the development...
...the overall design goals...
...the building space would...
...the environmental features and...
...the character of the development...
...the overall design goals...

Conceptual Design:



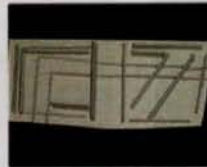
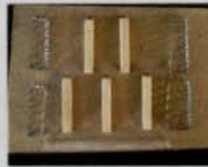
Conceptual Diagrams

These two images examine the possible concept that the project develop from. The top conceptual image looks at connecting the dwelling (white arcs) to the public / green space (green strips) and the water / boat channels (blue strips). A space is created that directly connects Atwater Street and the Riverfront. The built dwelling space would overshadow the environmental features and become the centerpiece of the development. The lower conceptual image looks more to intertwine all three concepts of built space, public / green space and water / boat channel. Neither would overshadow the other, and a well balanced development that concentrates on the built as well as on the environment and views that can be created. Connections would be made more through the visual than through direct built connections.



Beginning to Reconnect

What is it to realize the reconnecting of Home/Work/Environment? How does one incorporate living, working, and environment? How can you create a dwelling which is less dependent on the automobile, yet at the same time not expel the notion of the automobile? How can one break down the monolithic blocks that have been created the statue quo on Detroit's Riverfront, into smaller, manageable blocks for foot traffic that mixes- uses, economic backgrounds, living, working, and the environment into a Complete Dwelling?

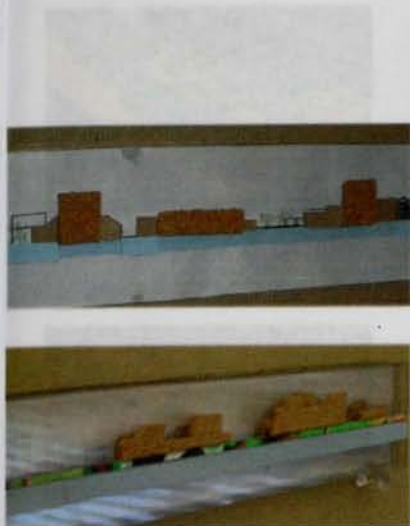


Conceptual Models

These three images illustrate what the realization of a complete dwelling can become in model form. The issue of how to connect the Detroit River (Situating to the bottom of each image), to Atwater Street (Situating to the top of each image) is of the utmost importance. Atwater always the last street south before the Detroit River (This is true for the study area, just northeast of the Downtown Region), due to this distinction, Atwater becomes the road that connects any traffic south of Jefferson Avenue to the Downtown District. Atwater, also acts as the only connection for pedestrians in an environmental / exercise use. The Riverfront's maintains a much greater importance from historical, view, economic value, and water transportation.

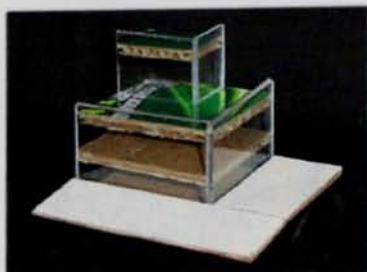
The model on the left is one that looked at situation of the development, that being perpendicular to the riverfront. Also an examination was taken into the opacity of the built environment in order to maintain an open feeling in the space. The center and left models look to determine situation, as well as a hierarchy of building and views that can be obtained from this hierarchy.

Springboard:



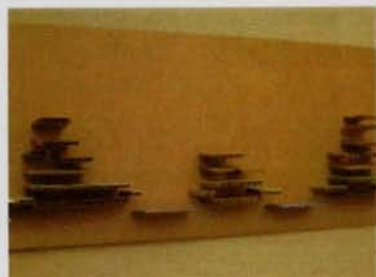
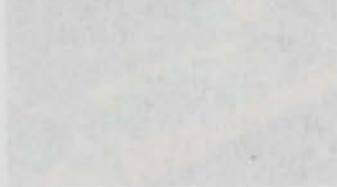
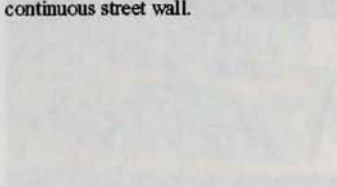
North - South Conceptual Sections

An examination was made into the depth that the section should develop into on the North-South axis. The cork, represents, possible residential units, while the chipboard represents work units. These sections helped to lead the into the development of boat / water channels, and the possible development of dwelling within the space in the North - South direction.



Riverfront Sectional Models

These three images illustrate what the possible height of built space on the riverfront can develop into. A examination was made into the height on the Detroit Riverfront Boardwalk plan should develop into three stories followed by a setback, or into a continuous four story or higher continuous street wall.



East - West Conceptual Sections

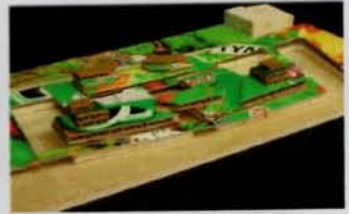
These three images illustrate the possible development of section from Atwater Street to the Detroit River. Possible heights of the built environment, along with the possible public gallery / green space, and the further development of the boat channel, within the study area.



Detail Section

The creation of this detail was to help illustrate the need to separate living and working dwelling units on visual, acoustical, and physical level, but still allow for a direct connection to occur.

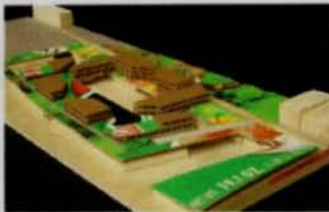
Springboard:



Potential Form Model One



Potential Form Model Two



Potential Form Model Three

Conceptual Drawings

The following drawings illustrate the site plan and the building footprint along the street.

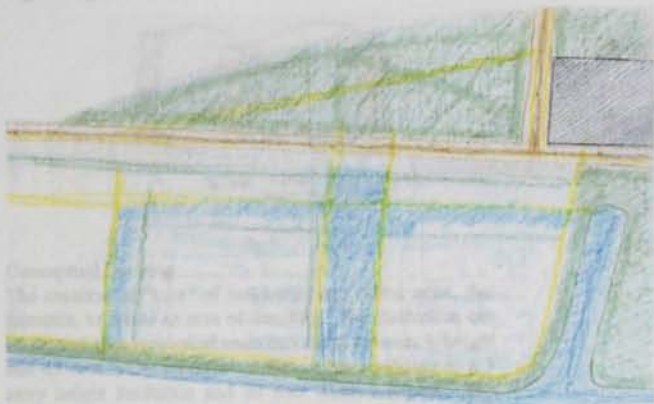
An illustration of the site plan and the building footprint along with the street layout and the building footprint.

Conceptual Drawings

The following drawings illustrate the site plan and the building footprint along the street.

An illustration of the site plan and the building footprint along with the street layout and the building footprint.

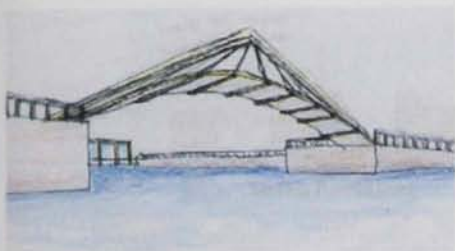
Springboard:



Conceptual Drawings

Top: Concept Diagram; Top, Far Right: Riverfront Section Perspective; Far Right: Boat Channel Perspective.

These Drawings were created in order to determine the the connections and scale that can be made between the built environment and the natural environment.



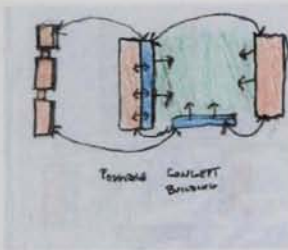
Conceptual Drawings

Top: Pedestrian Bridge Crossing; Bottom: Retail and View Corridors created along the riverwalk
An Examination was made as to how the Riverwalk could feel along with the immediate built environment that it encounters.

Conceptual Drawings

Top: Globe Building and State Park; Middle: Steps leading up to the Public Gallery; Bottom: Connection between work units
An Examination as to the main green space proposed on in the development weighted against the built environment that divides the green spaces.

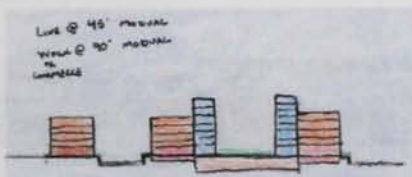
Springboard:



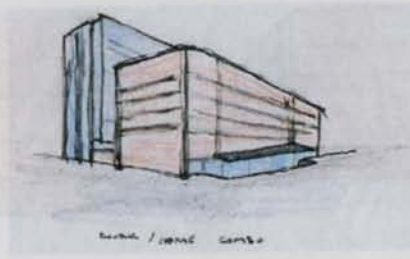
Conceptual Drawing

The creation of "bars" of residential and office units, that intermix, to create an area of dwelling. The distinction can be formed with residential units becoming 8 stories in height and 45 foot width modules. Office units confiding to a 5 story height limitation and 90 foot width modules. The development looks to form a boat channel and a private garden in which residents can use as their "typical" backyard. The public has access to the site and the ability to transverse throughout the space by way of public walkways that divide the development.

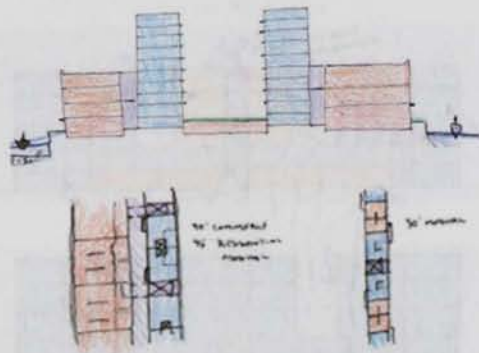
The form of development for a small neighborhood is a small neighborhood private garden. The development looks to form a small large public garden.



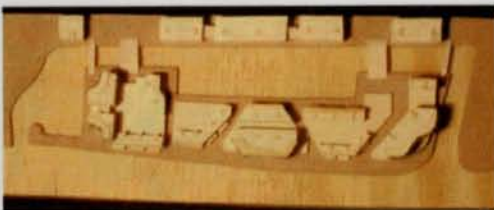
Section Possibilities



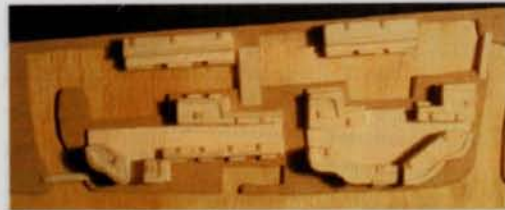
Form Possibilities



Section and Plan Possibilities

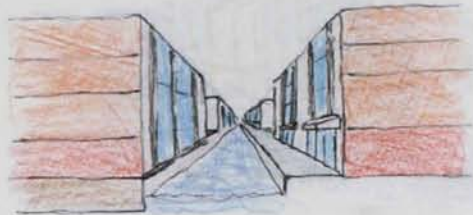
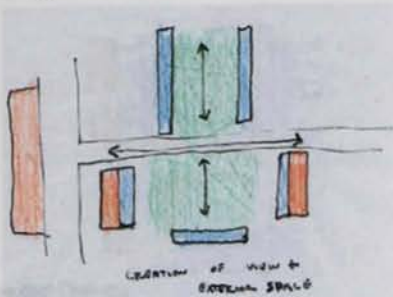


Model Proposal 1



Model Proposal 2

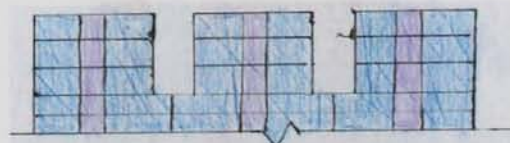
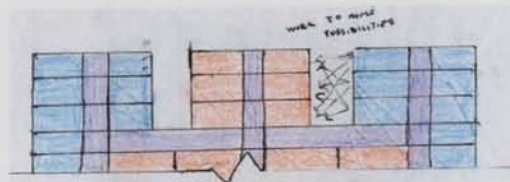
Springboard:



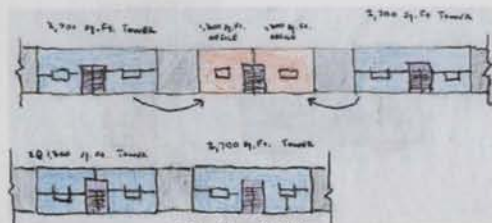
Possible Section Perspective of Boat Channel

Conceptual Drawings

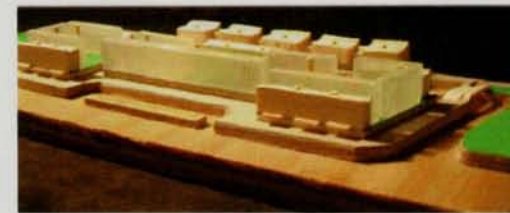
This conceptual design looked to further the possibilities of the view corridors created by the development and to continue to develop the private garden that can be created through the development of the residential (plexiglas) and office units (wood) or "bars." The development continued with the idea of intermixing the bars of development but instead of creating a small A-symmetrical private gardens, the development looked to frame a much larger public garden.



Section Possibilities

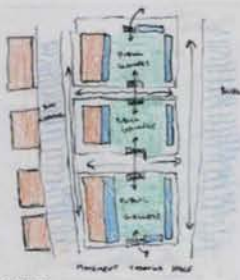


Plan Possibilities



Model Proposal 3

Springboard:



Conceptual Drawing

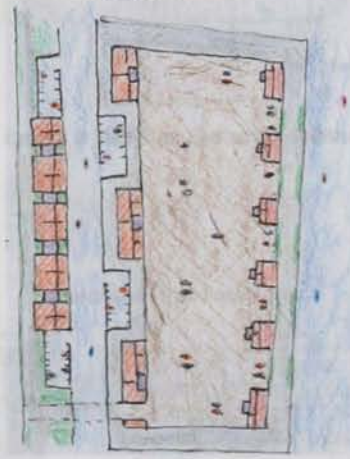
This conceptual design looked at an overhaul of what the residential and office units "bars" should become as well as the possibility of opening up the private garden into one that has public access. The development was divided parallel to the river, which allowed for the creation of a residential unit directly on the river, a mix-development of residential and office at the boat channel, and finally an office development on Atwater Street. The large, open garden was maintained, but now access points for the public were designed into the development.



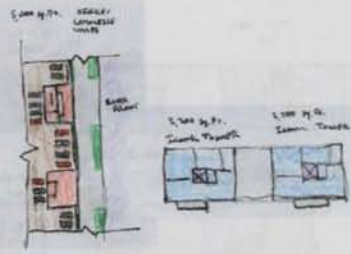
Form Possibilities



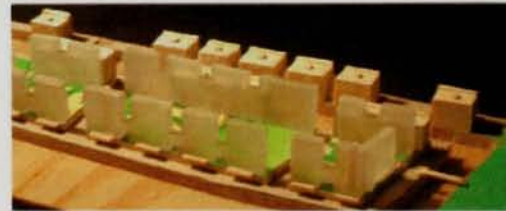
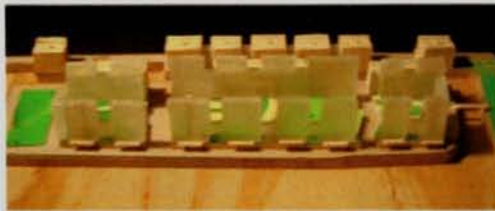
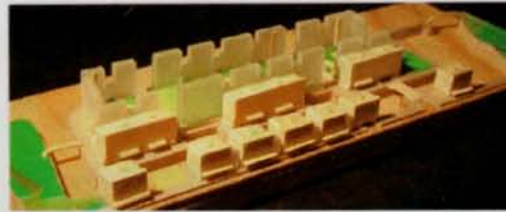
Section Possibilities



Ground Floor Plan Possibility

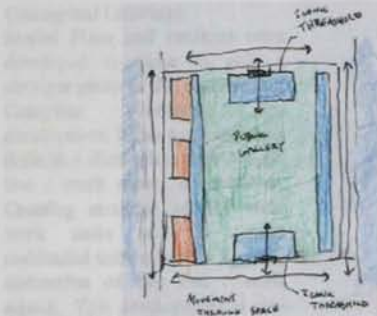


Plan Possibilities



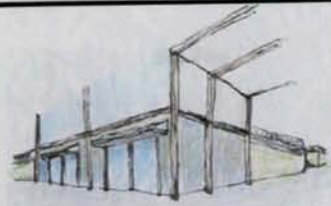
Model Proposal 4

Springboard:



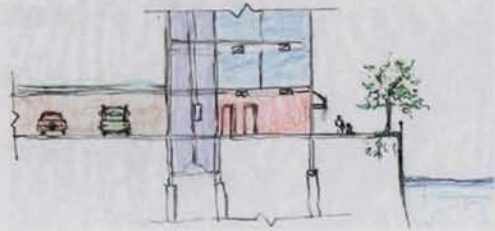
Conceptual Drawing

This development looked at the elimination of the access paths that created view corridors, and making the residential blocks that encompass the entire development. Through this design, the form of the residential development would frame the view corridors desired. Furthermore, the public / private garden would connect across the entire development and become a node for the area around the development instead of being intended for the development itself.

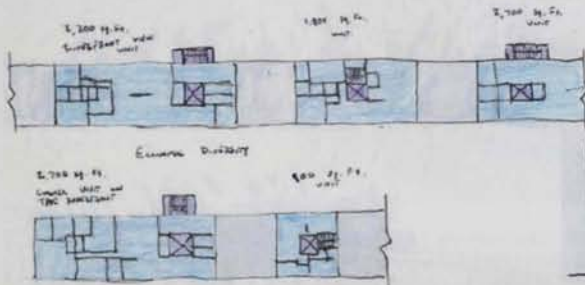


CONNECTION TO THE PLUGPOINT
ROAD AND PUBLIC SPACE AHEAD THERE

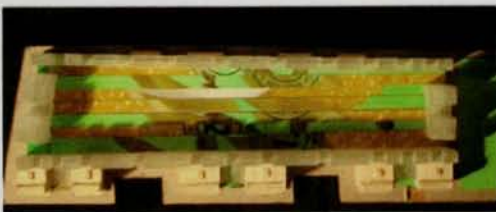
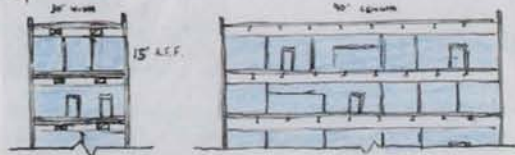
Form Possibilities



Ground & First Floor Section Possibilities



Section and Plan Possibilities

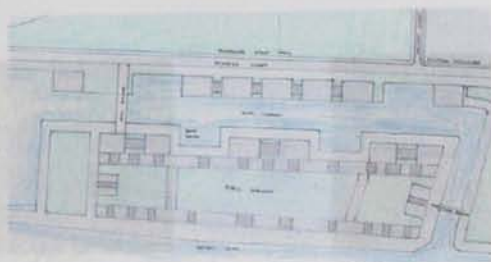


Model Proposal 5

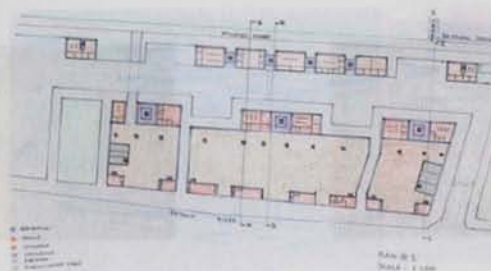
Springboard:

Conceptual Drawings

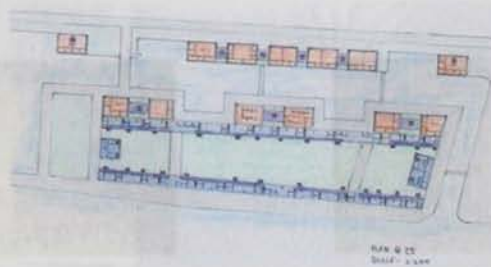
Scaled Plans and Sections were developed in order to gain a stronger grasp of the concept of a Complete Dwelling. The development focuses on creating a definitive distinction between the live / work aspect of dwelling. Creating modules of 90' wide work units and 35' wide residential units allow for a visual distinction of this live / work aspect. This development is also driven by the necessity to spawn a strong environmental relationship. A public gallery above the parking region is created, while a public garden at street level is designed into the development. Furthermore, an environmental tie is made through the creation of the boat channel, and the view / light corridors that are created through the form of the residential towers.



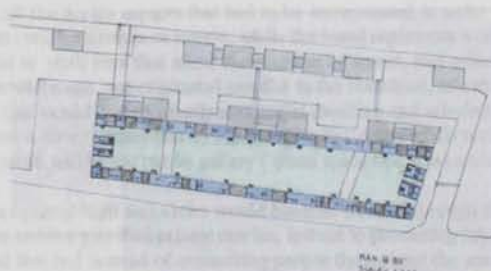
Site Plan



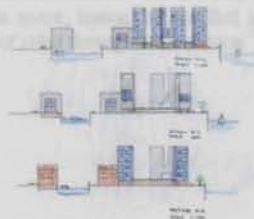
Plan at 5'



Plan at 25'

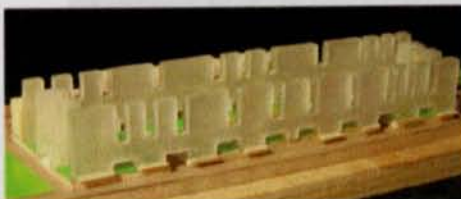
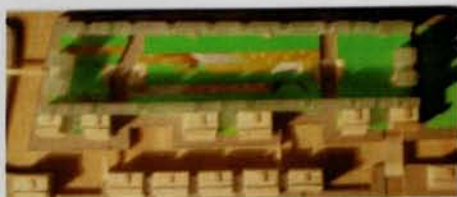


Sections



0 100 200 600
Scale in feet

Springboard:



Final Conceptual Model

This model looked to incorporate all the design aspects that had to be incorporated in order to achieve the notion of a Complete Dwelling. The Plexiglas represents residential units or towers, while the wood represents working units. The driving force behind the design was for these residential or work bars that allow the creation of layers, and selected views as one moves through the space and away from the river. Development was originated parallel to the riverfront, allowing water / boat channel to move into the space creating a smaller block that would feature mostly residential dwelling and selected retail to be located on the riverfront, along with some work units to have a direct connection to the living units. Automobile traffic would park at grade and become masked by the retail or residential units, and by the public gallery / green space that was created above the parking for the residents of the space.

The critique on this model was the optimal light and views would become blocked through this parallel development and that the water / boat channel would become another glorified private marina, instead of promoting interaction and diversity. It was also felt that the channel creates an isolated feel and instead of connecting people throughout the space it instead cuts people off. Also it was felt that the creation of bars and layering lacks the mixed use that can help promote interaction in a space. Finally it was felt that people would look at the space as a private space, instead of one that is connecting the area, through views, pedestrian pathways, public park, and even though the mix of retail throughout the space.

© 2013 Ryan Yarn

© 2013 Ryan Yarn

These images were created to assist in presenting the design process and are not intended to be used for any other purpose.

These images were created to assist in presenting the design process and are not intended to be used for any other purpose.

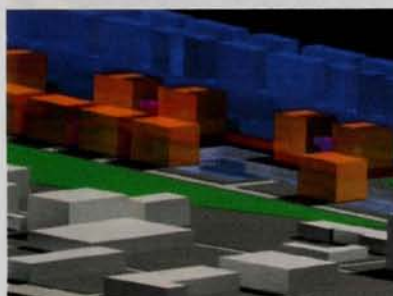
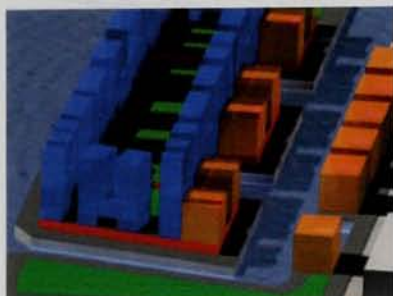
These images were created to assist in presenting the design process and are not intended to be used for any other purpose.

© 2013 Ryan Yarn

© 2013 Ryan Yarn

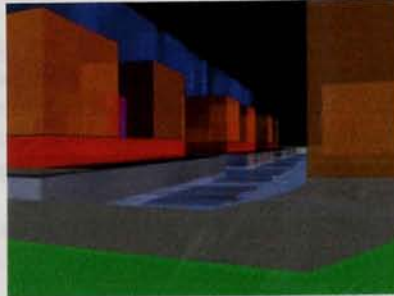
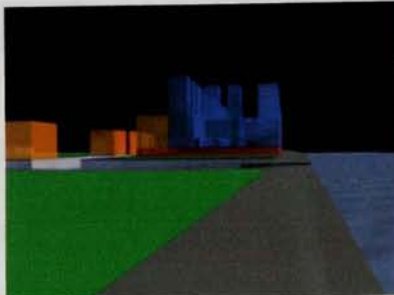
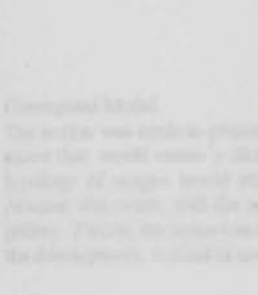
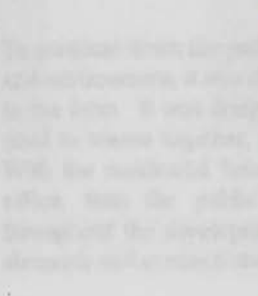
© 2013 Ryan Yarn

Springboard:



Bird's Eye View

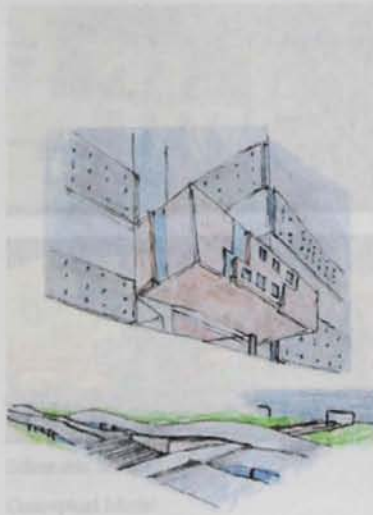
These images were created in order to examine the Schumdition Architectural principles on the form of the space. The virtual model looks to determine the spacial qualities and the light qualities that are created through the form.



Human's Eye View

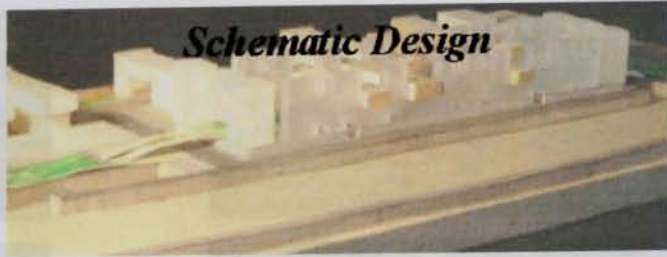
- Residential
- Office
- Retail
- Green Area

Schematic Design:



Conceptual Diagrams

These two conceptual models look to examine two major factors of the design that went under revision after the conceptual design. The top image looks to see what can happen if the residential units are pierced by the office units. The lower image looks at the creation of a public path that changes elevation as it moves throughout the public gallery. The paths would create extremely unique pedestrian movement while maintaining a functionality to them.



Continuing to Reconnect

To continue down the path of how one reconnects home, work and environment, it was decided to continue with major overhauls to the form. It was designed that the office and residential units need to weave together, and create a hierarchy, of connections. With the residential being in the upper level, followed by the office, then the public gallery and riverfront was weaved throughout the development to creating a continual crossing of elements and connections.

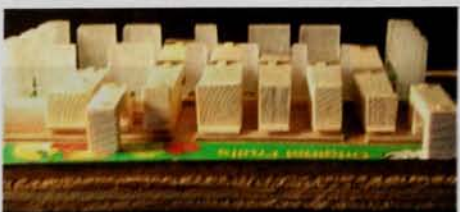
Conceptual Model

The notion was made to pierce the the residential units with the office units in a move that would create a direct connection, yet by maintaining there axis, a typology of usages would still be maintained. A strong street presence on Atwater was create, with the notion creating a direct vertical axis into the public gallery. Finally, the move was made to weave the pedestrian pathway throughout the development, instead of maintaining its position on the edges of the site.



Schematic Model 1

Schematic Design:



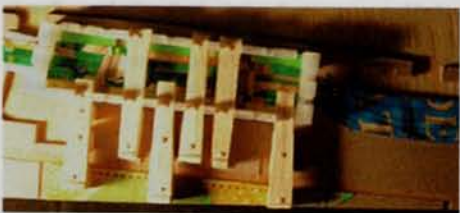
Schematic Model 2

Conceptual Model

The need to develop the way in which the offices pierce thru the residential units was created, maintaining an enclosed public gallery, instead of allowing the space to evaporate out of an opening in the space. The need to bridge over Atwater street was conceived in order to help reduce the edge, and at the same time reduce the isolation of the site that has been created in previous designs.

Conceptual Model

The development to bridge Atwater in order to reduce the edge was continued, as well as looking at continuing a street wall, and more importantly thresholds of entry into and out of the development. Also, the rhythm of how the offices pierce thru the residential units was created, so that a balance on the site could be maintained.



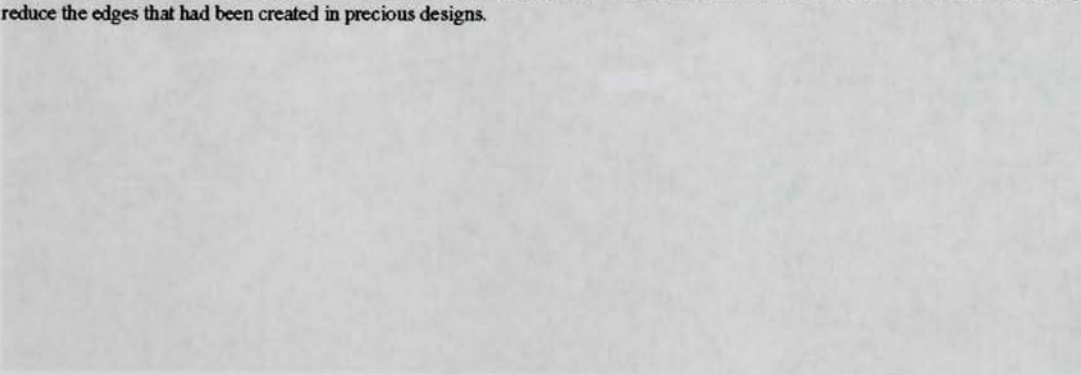
Schematic Model 3

Schematic Design:

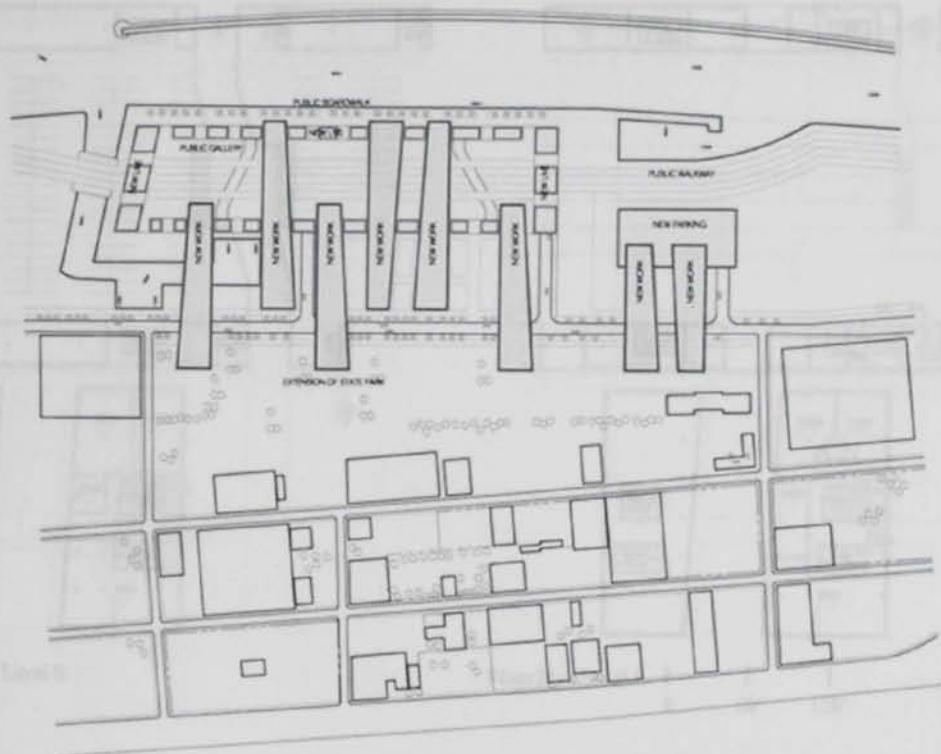


Final Schematic Model

This model looked to build off to notion of weaving all aspects of design together in creating a hierarchy that reconnects home, work and environment. Most major aspects of this design had been previously developed, but with this model, the development concentrated mostly on the environmental factor of design. First, a harbor was created so that a connection can be visually made as well as reducing the isolation that was created between the site and neighboring land usages. Also, a need for another level of pedestrian traffic was conceived to all for the movement back along the riverfront, in the form of a boardwalk, while maintaining the path the pierces thru the development. Finally, the extension of the site towards the downtown district was created, also, to help reduce the edges that had been created in previous designs.



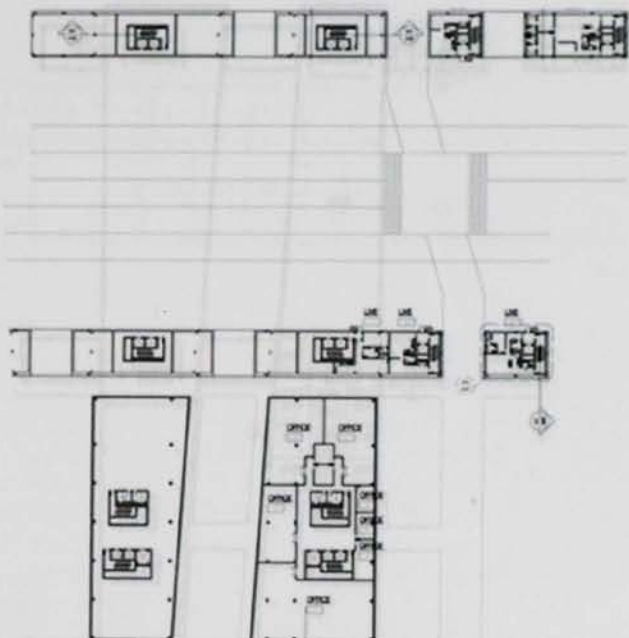
Schematic Design:



Site Plan: | 0 | 150' | 300' | 450'

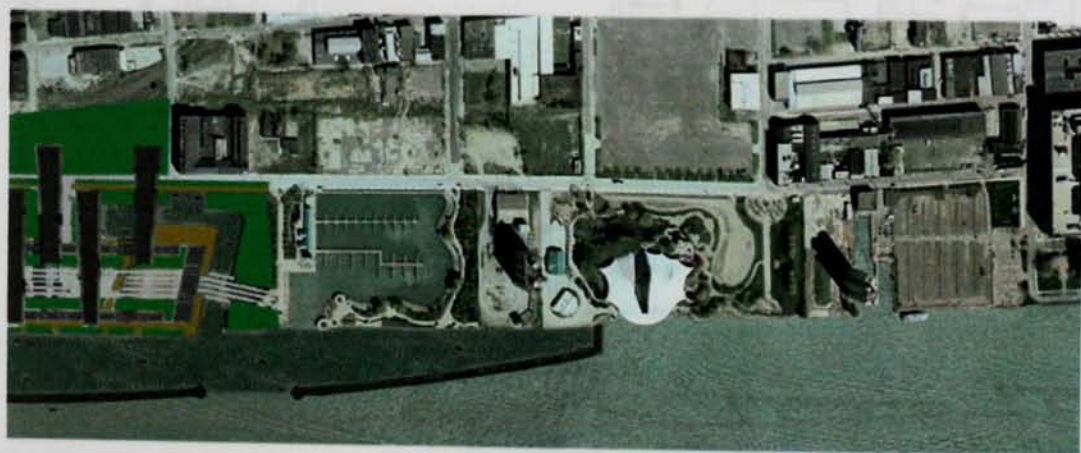


Schematic Design:

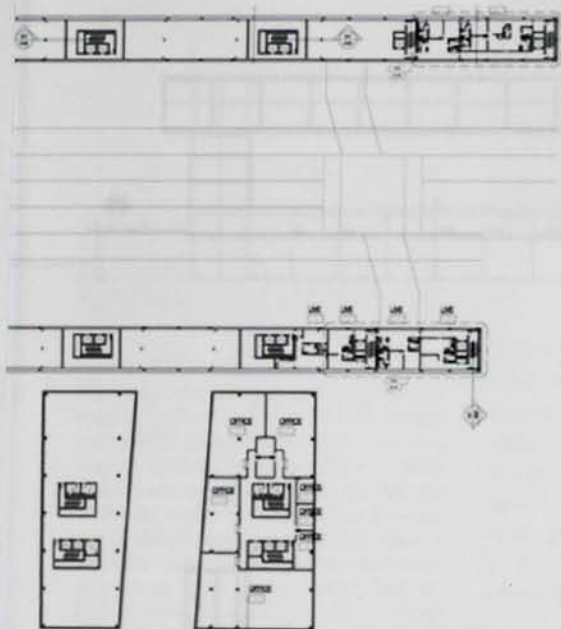


Floor Plan Level 0:

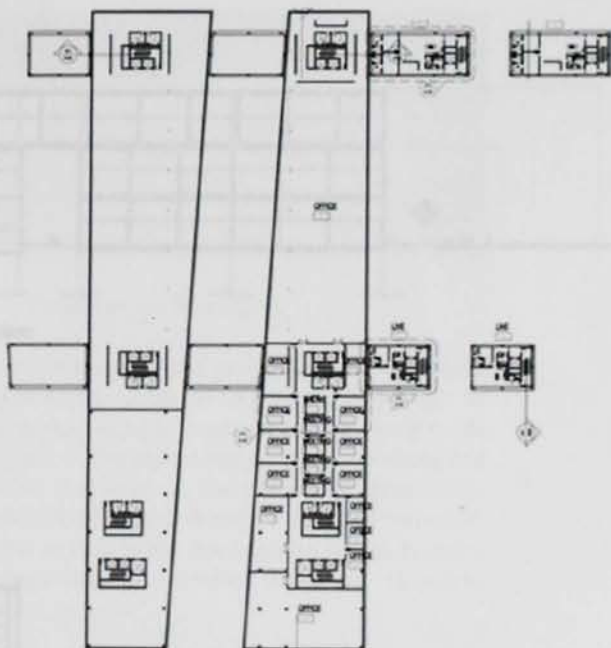
Floor Plan Level 1: | 0 | 60' | 120' | 240'



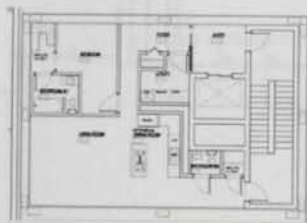
Schematic Design:



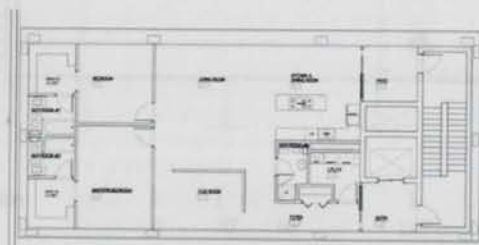
Floor Plan Level 2-3:



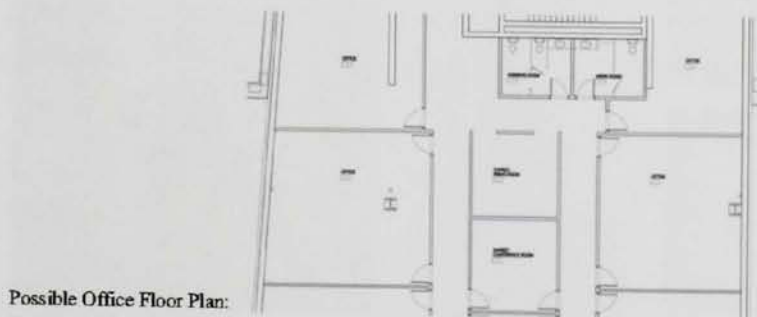
Floor Plan Level 4-5: | 0 | 60' | 120' | 240'



Possible Residential Floor Plan:



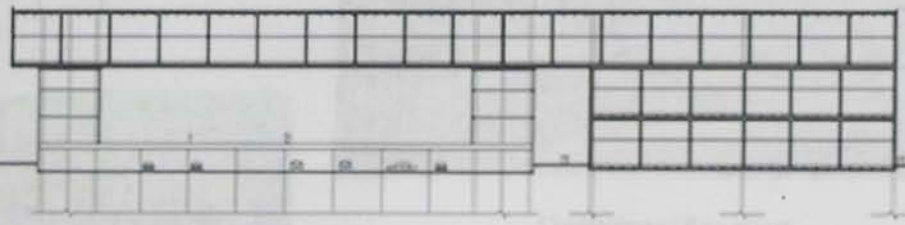
Possible Residential Floor Plan:



Possible Office Floor Plan:

| 0 | 15' | 30'

Schematic Design:

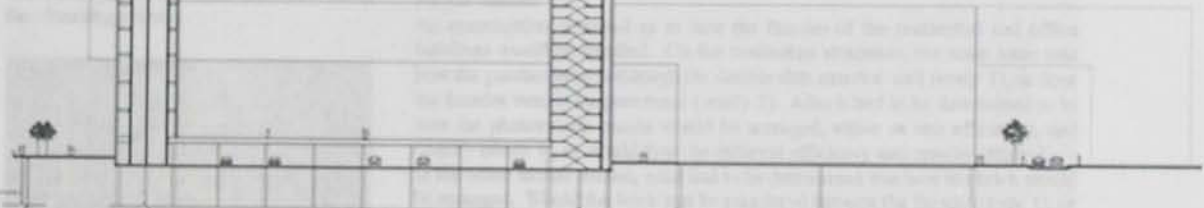


Section:

Conceptual Diagram:

This conceptual site plan was developed as a response to the challenge that the team believed would build up from within the site, and to a lack of support by local firms. A fully chartered firm designed the entire structure, the main idea is to provide a structure, and the rest was particularly designed as a long narrow structure to be built on the site. The main idea was to provide a structure, and the rest was particularly designed as a long narrow structure to be built on the site.

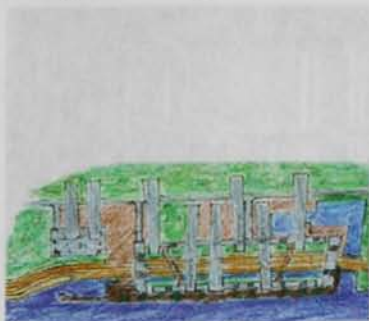
At this point in the project, the form of the structure was pretty much set, a few changes were made to the form (the width height) to the structural structure, it was to be a long narrow structure. The main support of the structure was to be a long narrow structure, the main support of the structure was to be a long narrow structure, the main support of the structure was to be a long narrow structure.



Section:

0 30' 60' 120'

Design Development:

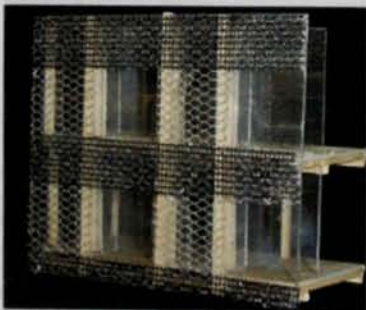


Conceptual Diagram

This conceptual site plan was designed as a response to the critique that the boat channel would build up black/soiled water, due to a lack of turnover by fresh water. A water channel was designed to move through the entire site to provide turnover, and the what was previously designated as a boat channel would become a wet land to filter black water into brown water before filtering into the Detroit River through a series of small waterfalls that would usher the water along the cleansing process.



Residential Facade Study 1



Residential Facade Study 2



Continuing to Reconnect

At this point in the project, the form of the design was pretty much intact, a few changes were made to the form like adding height to the residential structures in order to create a mezzanine level in the units. The main aspect of this phases was looking into elevations where it was decided that brick on the office and photovoltaic panels on the residential structures would be the main materials. Also, going in-depth as to how the development would function in section and beginning to examine details of structural connections continued to occur.

Facade Studies

An examination occurred as to how the facades of the residential and office buildings would be handled. On the residential structures, the main issue was how the porches breach through the double skin exterior wall (study 1), or does the facades remain un-punctured (study 2). Also it had to be determined as to how the photovoltaic panels would be arranged, either as one efficiency, and opacity (study 1), or would there be different efficiency and opacity (study 2). In the office facade studies, what had to be determined was how the brick would be arranged. Would the brick just be punctured through the facade (study 1), or would the brick be extruded away from the main facade to allow light in, and through this you would have your openings (study 2).

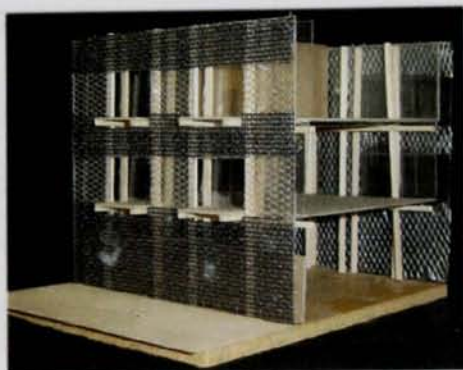
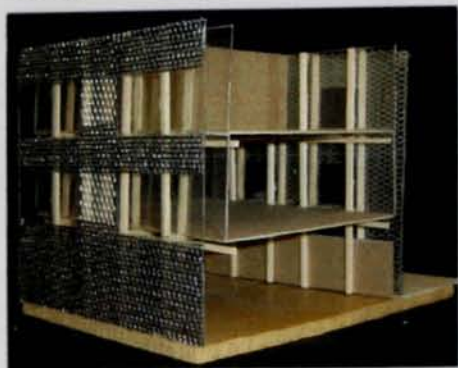


Office Facade Study 1



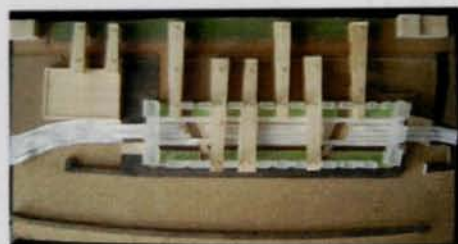
Office Facade Study 2

Design Development:



Residential Facade Study 3

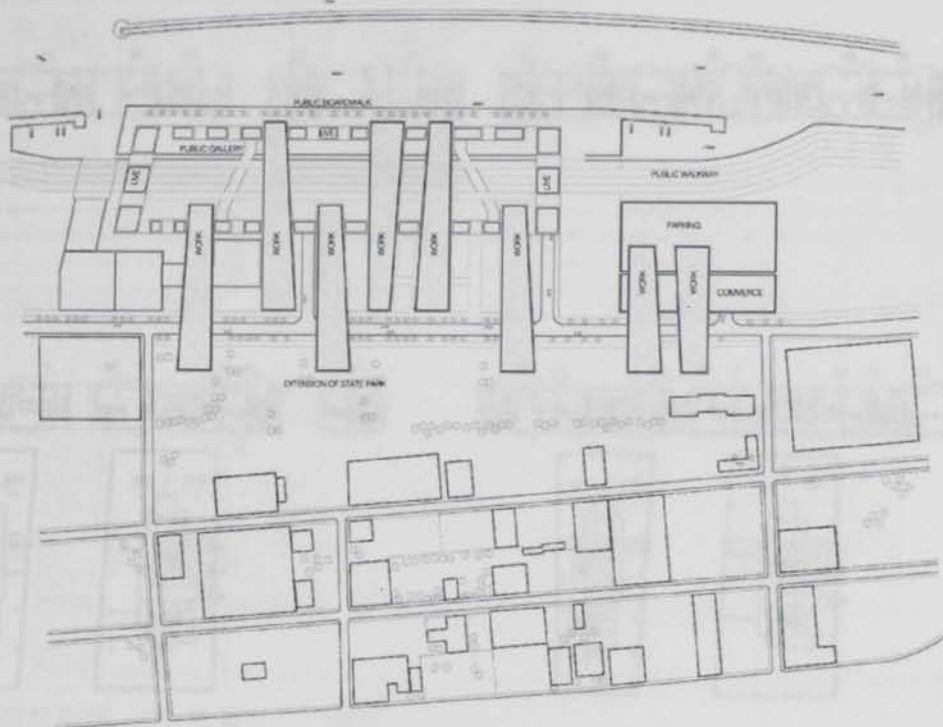
This model looked at maintaining the porches which would extrude through the exterior skin. A double wall system would continue to be used for all exterior walls. Also it was determined that in areas where floor slabs or mechanical equipment would meet the exterior wall or where views were not a high priority, that the photovoltaic panels would be more efficient, and less opaque, as indicated by the black mesh. Contrary to that, areas that require views and natural sunlight, a lower efficiency, more opaque panels would be used, as indicated by the silver mesh.



Design Development Model 1

This model looked to examine how the path that pierces through the residential would operate, how the residential units that are directly on the water would meet the ground and finally how the park would work around the the Northern portion of the development. The path was determined to be one that would allow for a difference for people walking, jogging, biking, and even two paths for vegetation. Also the paths would allow light into the parking garage below when the path would oscillate. It was also decided that the residential on the river front would not be raised up on a plinth, but that it will directly meet the ground and that the boardwalk will allow individuals to not be restricted by the plinth of the underground parking. Finally, it was designed that the office buildings would straddle the park and street creating a street wall a interaction with the park.

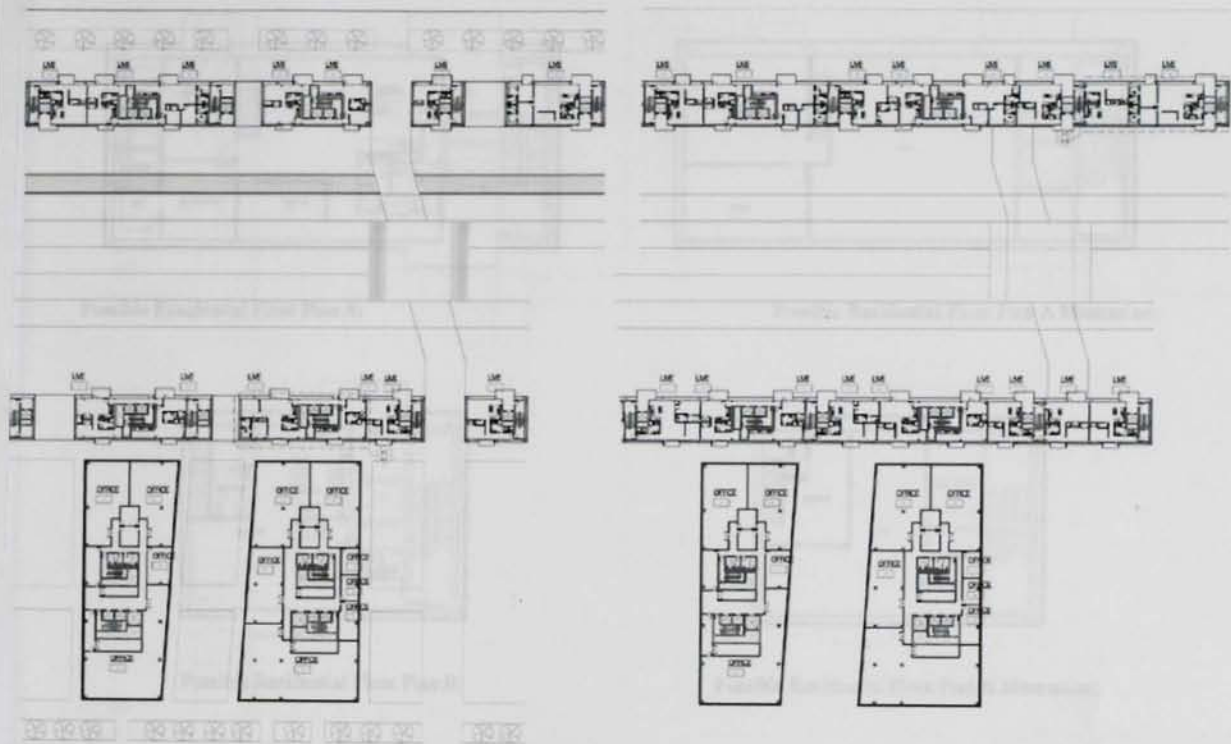
Design Development:



Site Plan: | | | |
0 150' 300' 450'

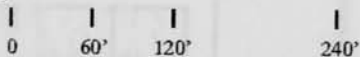


Design Development:

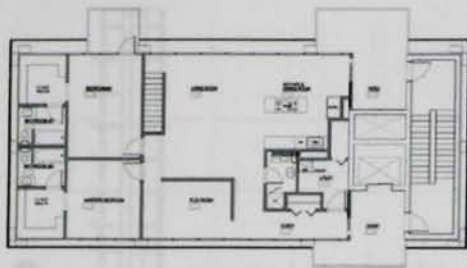


Floor Plan Level 1:

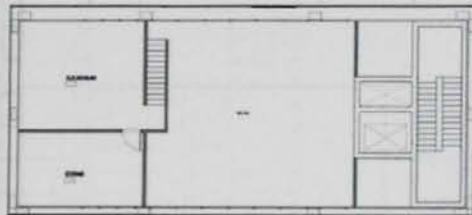
Floor Plan Level 2-3:



Design Development:



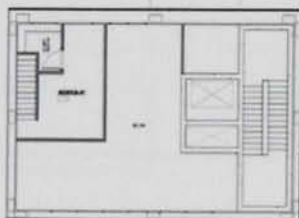
Possible Residential Floor Plan A:



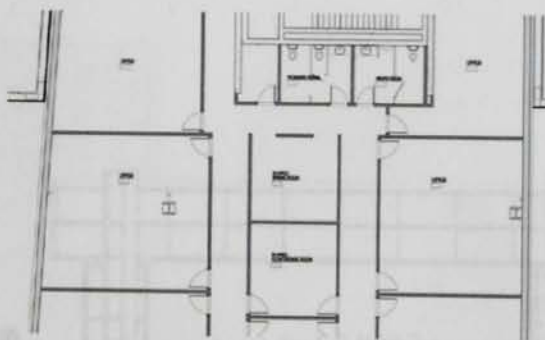
Possible Residential Floor Plan A Mezzanine:



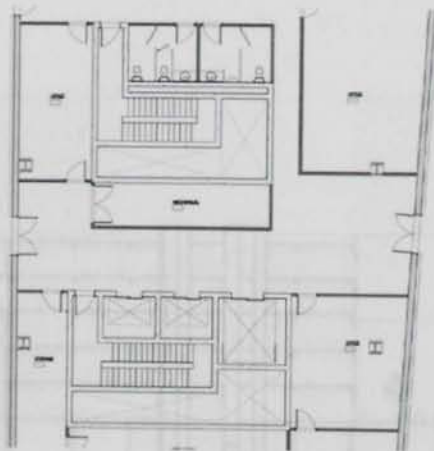
Possible Residential Floor Plan B:



Possible Residential Floor Plan B Mezzanine:



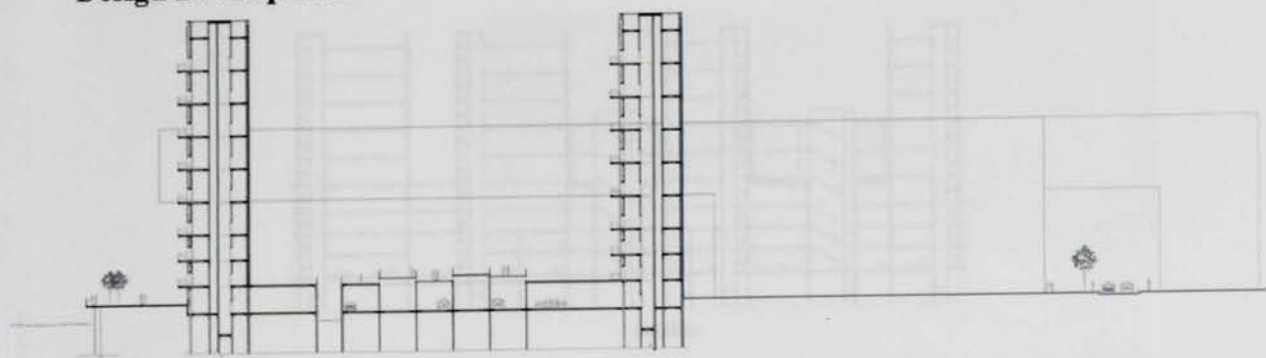
Possible Office Floor Plan A:



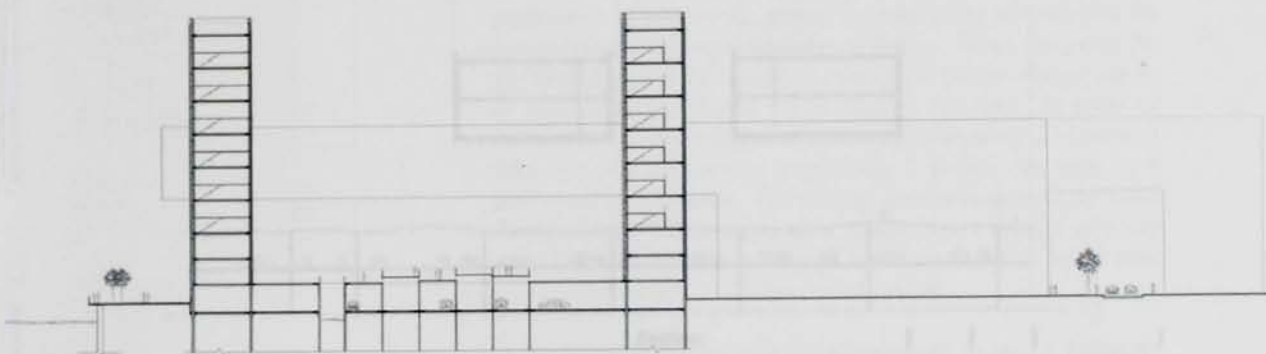
Possible Office Floor Plan B:

0 15' 30'

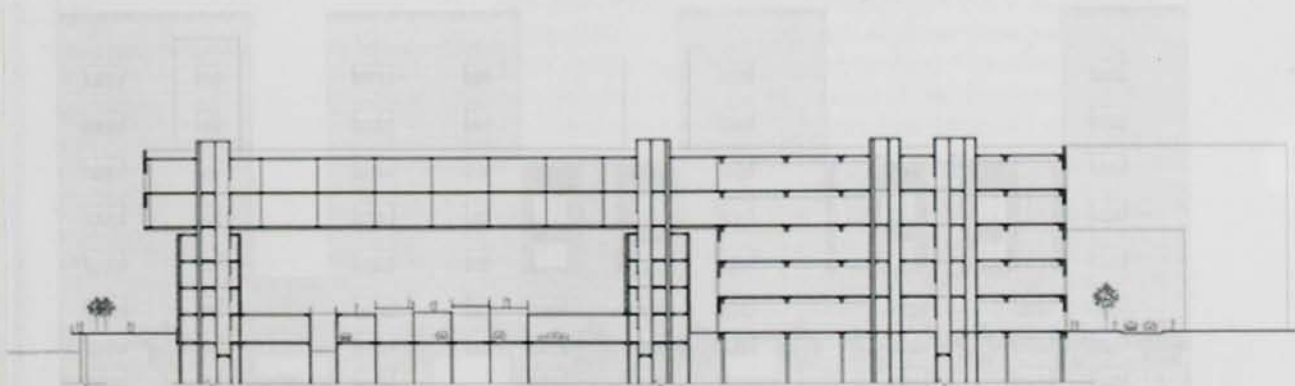
Design Development:



Section:



Section:

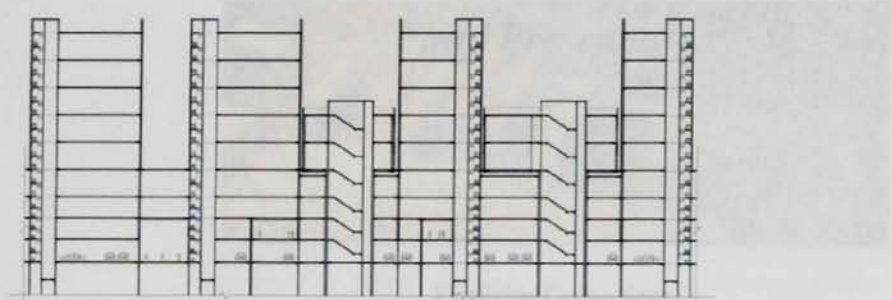


Section:

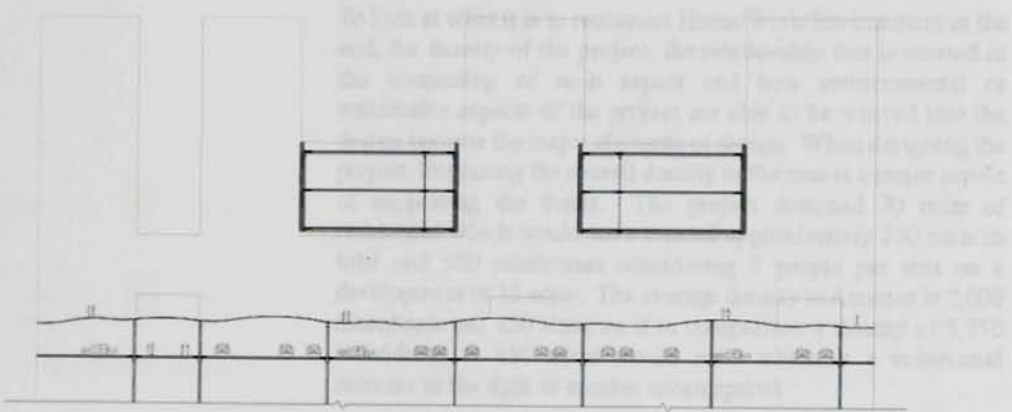
0 30' 60' 120'



Design Development:



Section:



Section:

0 30' 60' 120'



Elevation:

0 30' 60' 120'

Final Presentation:



Finalizing Connections

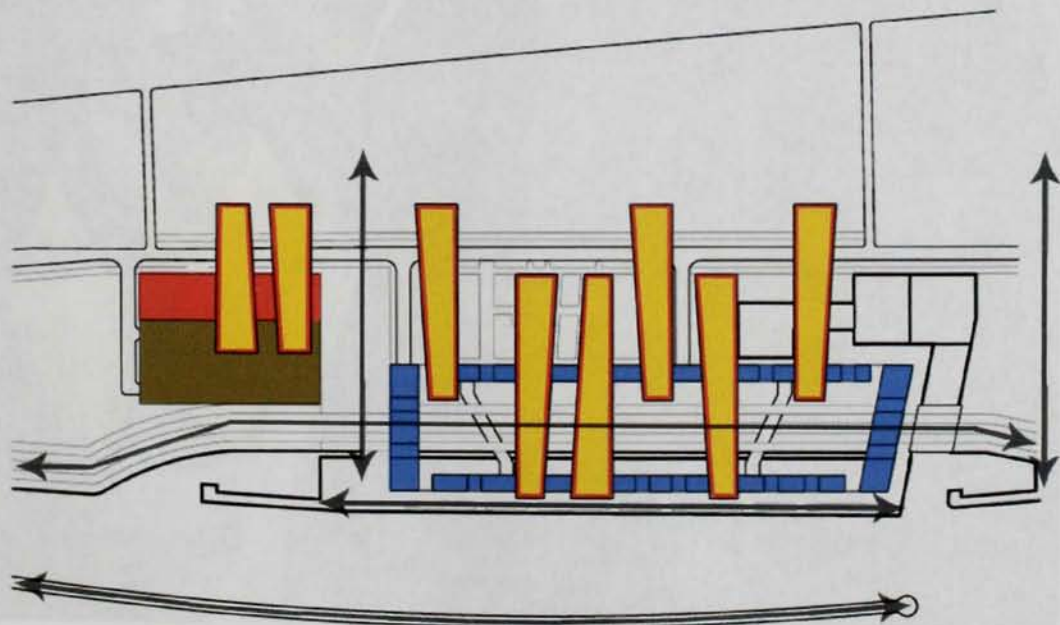
To look at what it is to reconnect Home/Work/Environment in the end, the density of the project, the relationship that is created in the connecting of each aspect and how environmental or sustainable aspects of the project are able to be weaved into the design became the major elements of design. When designing the project, increasing the overall density or the area is a major aspect of supporting the thesis. The project designed 70 units of residential which would have created approximately 250 units in total and 500 inhabitants considering 2 people per unit on a development of 13 acres. The average density in America is 2,000 inhabitants per 150 acres so if in comparison a density of 5,750 individuals at 150 acres would exist which is a substantial increase in the fight to combat urban sprawl.

In the connections between the elements of design, a hierarchy was designed in order to give a sense of place as well as creating a distinct identify for each element. The residential structures were given the upper stratum at roughly 150' tall, 8 stories and at widths of 30' or 60' wide, and made of photovoltaic panels which would create a light feeling against the river. The office structures were designed as the second stratum of the development at 90' tall, 5 stories and at widths that vary from 90' to 60' wide, while being composed of brick which creates a sense of weight. The environment occupied the lower stratum, the design of walking paths that flank the residential structures, act as the axis of the North/South directions. Along the East/West directions 5 paths for walking, jogging, running, and vegetation, oscillate as they pierce directly through the residential development. In turn a boardwalk and pier act as paths of movement for citizens along the riverfront. With the use of material and scale along the river, a sense of place within the city is created. The opposing use of materials and the hierarchy created through the elements create this sense of place. Interaction with the city is promoted through

Final Presentation:

movement in the fact that residents must access all structures by entering into the exterior rather than through interior corridors.

The sustainable element of the project is yet another vital aspect of design. In order to reduce heating and cooling loads, the development was designed with a double skin on the residential units. The double skin wall would allow for natural ventilation in the summer time for the units that otherwise would have to have inoperable windows, in winter time the cavity would create a film of warm air around the inner skin, providing a decrease in heat loss. Also green roofs were designed on all building which would reduce the heat intake during the summer and heat loss during the winter through its insulating properties, yet at the same time provide aesthetic value for residents overlooking the lower office structures. The photovoltaic panels would encompass the southern facades of the residential structures and provide ample energy production, yet at the same time they would not prohibit views from the residential units, in that at strategic locations the efficiency of the panels would be reduced in order to allow for more opacity. Finally, the development created a wetland for water purification. Enlarging the size of the existing dry dock and creating a waterfall effect, black water would be able to be filtered into brown water and eventually into the Detroit River, therefore reducing the stress on the city's mainframe of utilities.

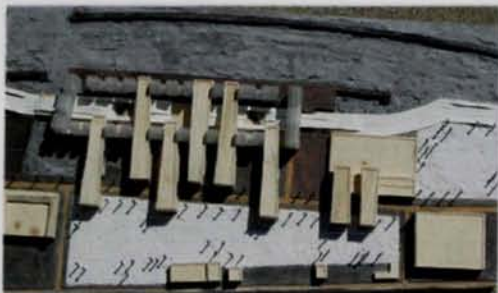


Final Presentation:



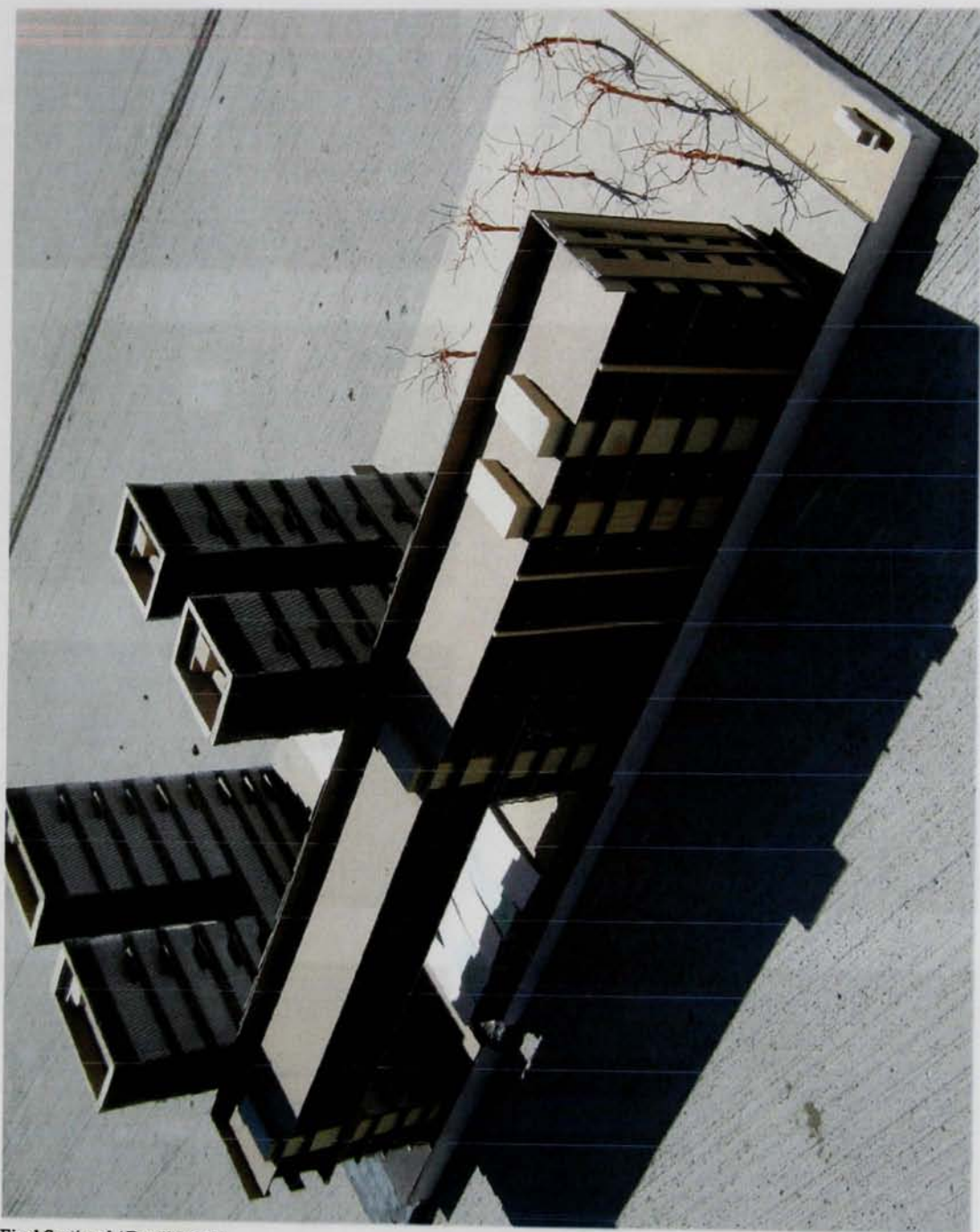
Final Site Model

Final Presentation:



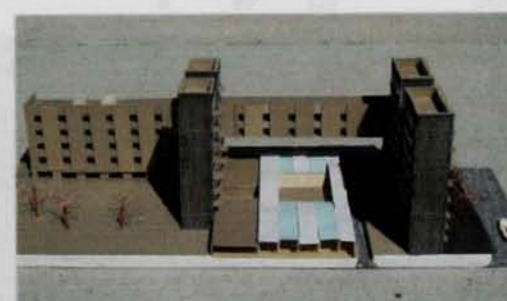
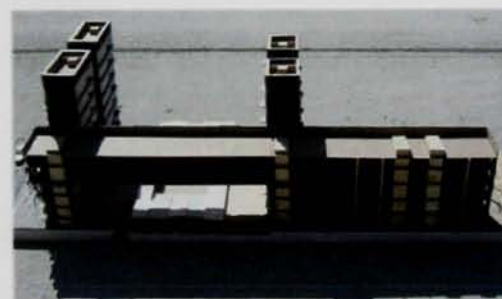
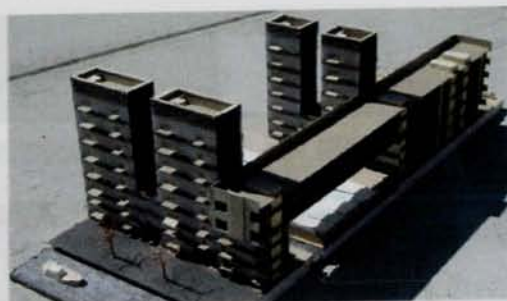
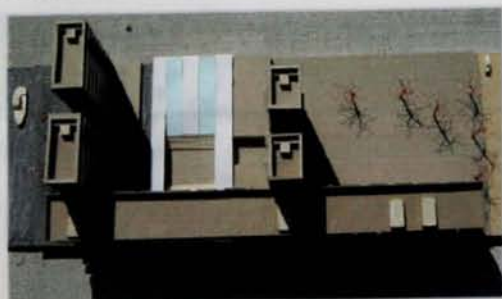
Final Site Model

Final Presentation:



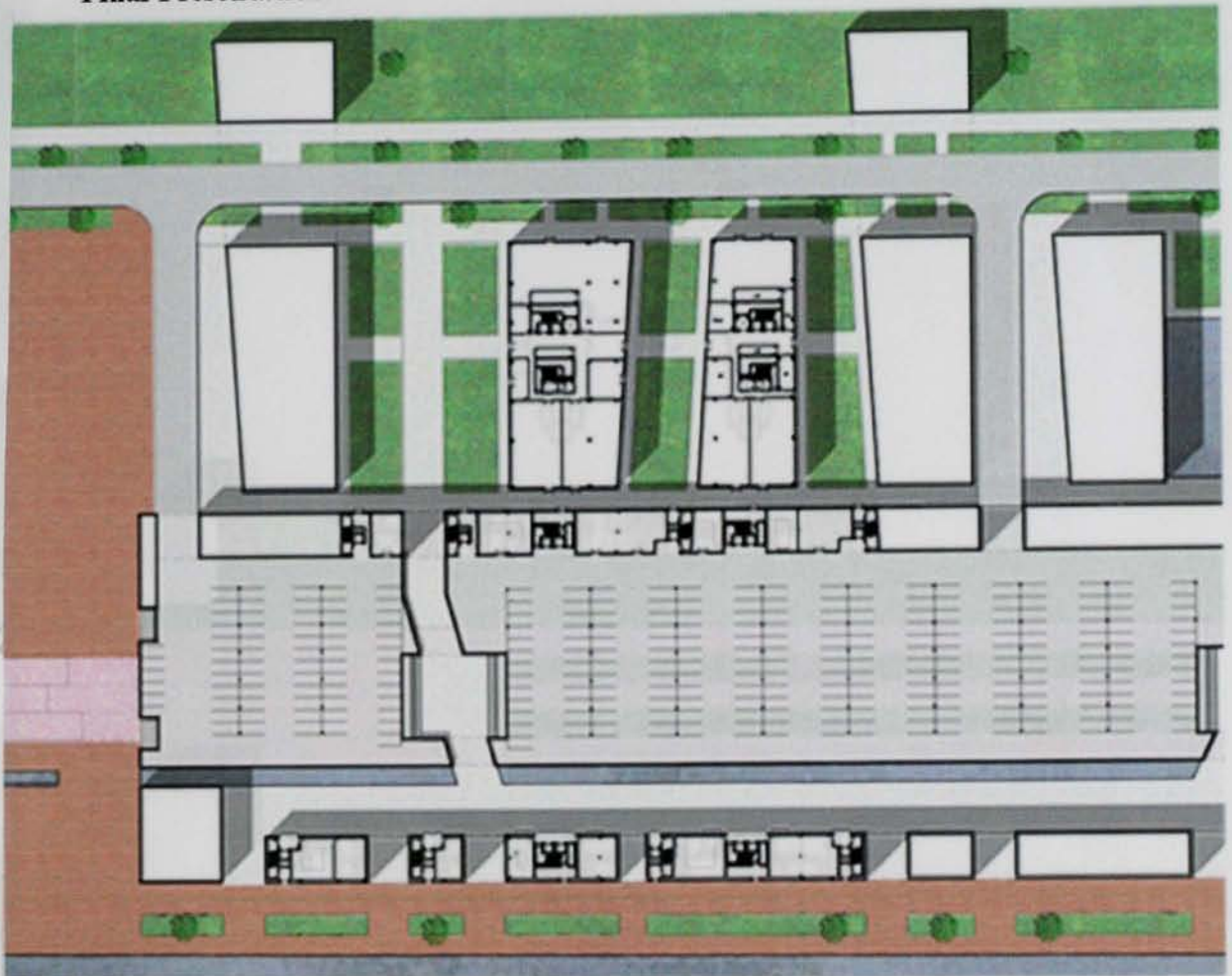
Final Sectional / Detail Model

Final Presentation:

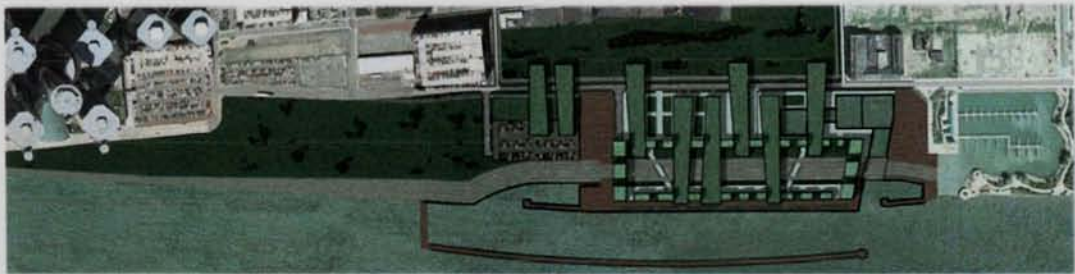
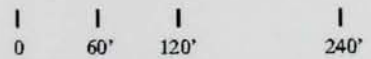


Final Sectional / Detail Model

Final Presentation:

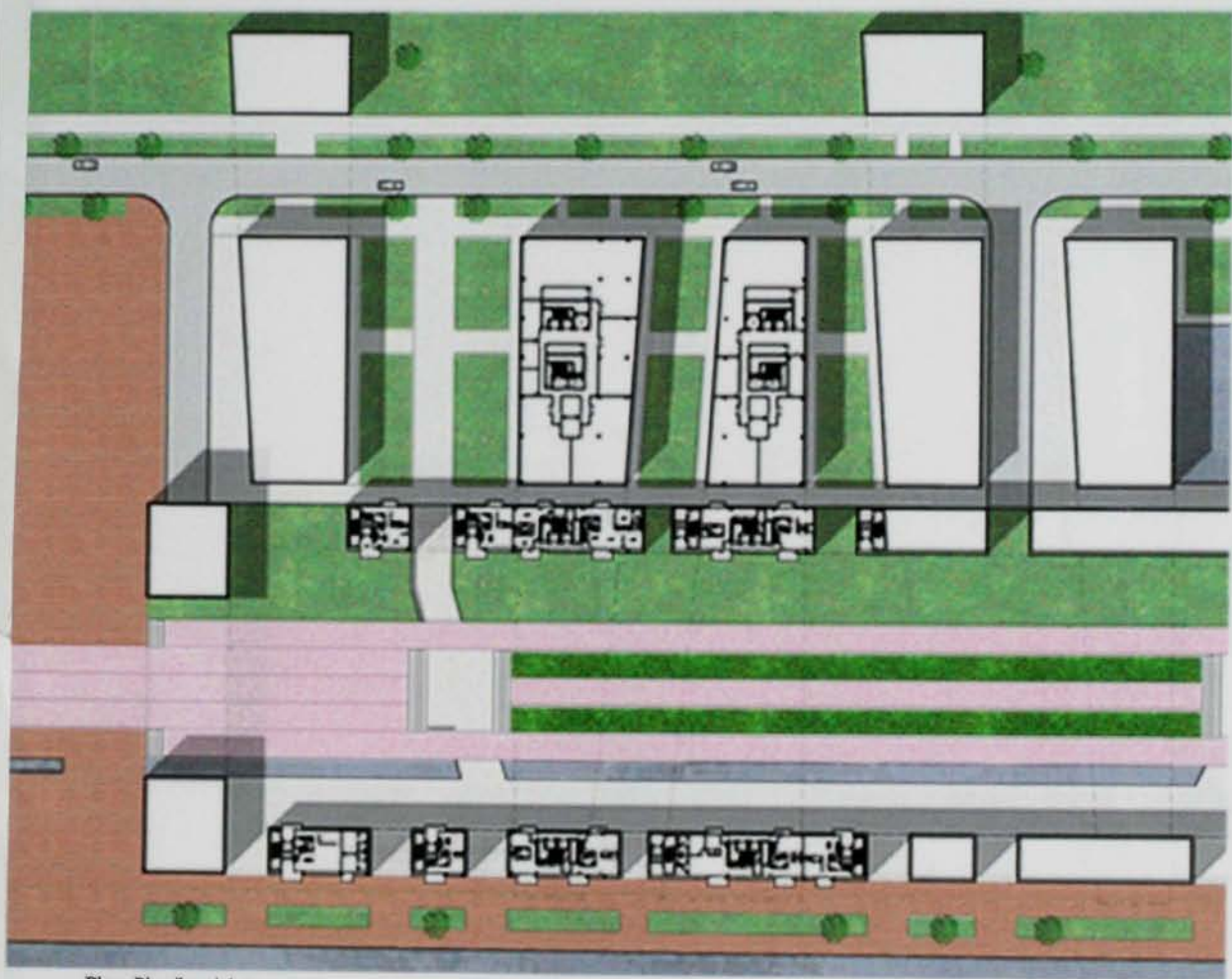


Floor Plan Level 0:



Site Plan

Final Presentation:



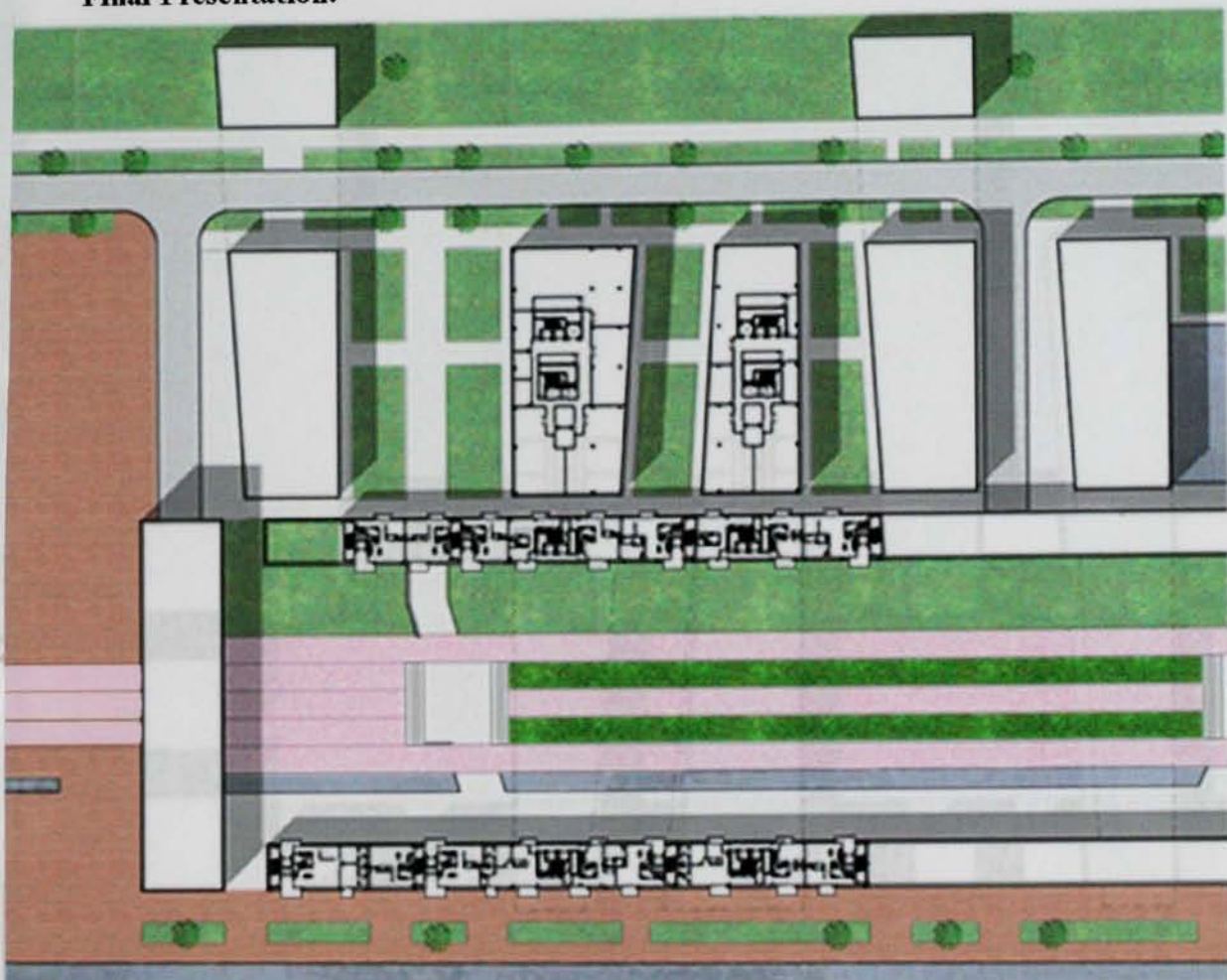
Floor Plan Level 1:

0 60' 120' 240'



Riverfront Elevation Perspectives

Final Presentation:



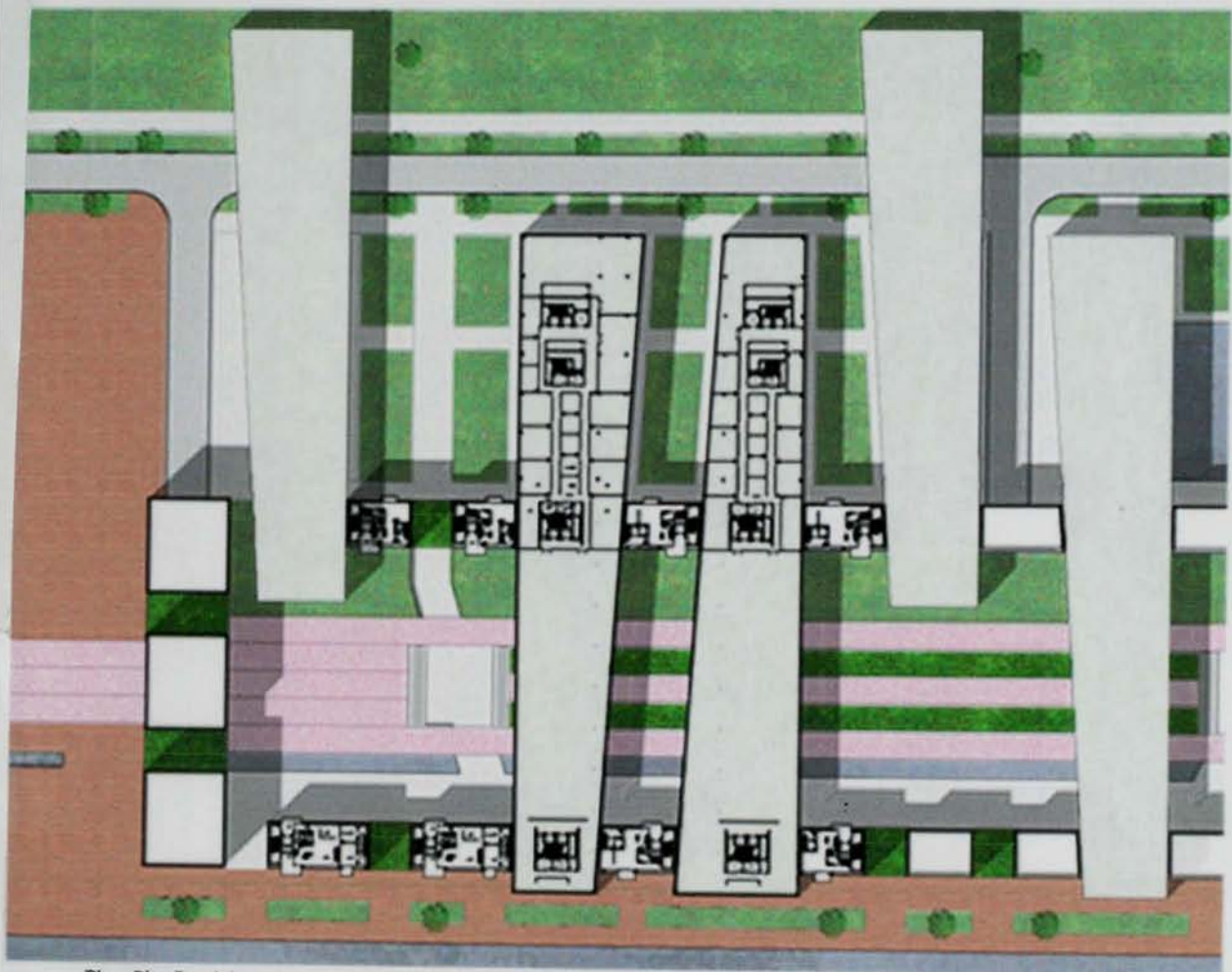
Floor Plan Level 2-3:

0 60' 120' 240'



Atwater Street Elevation Perspectives

Final Presentation:



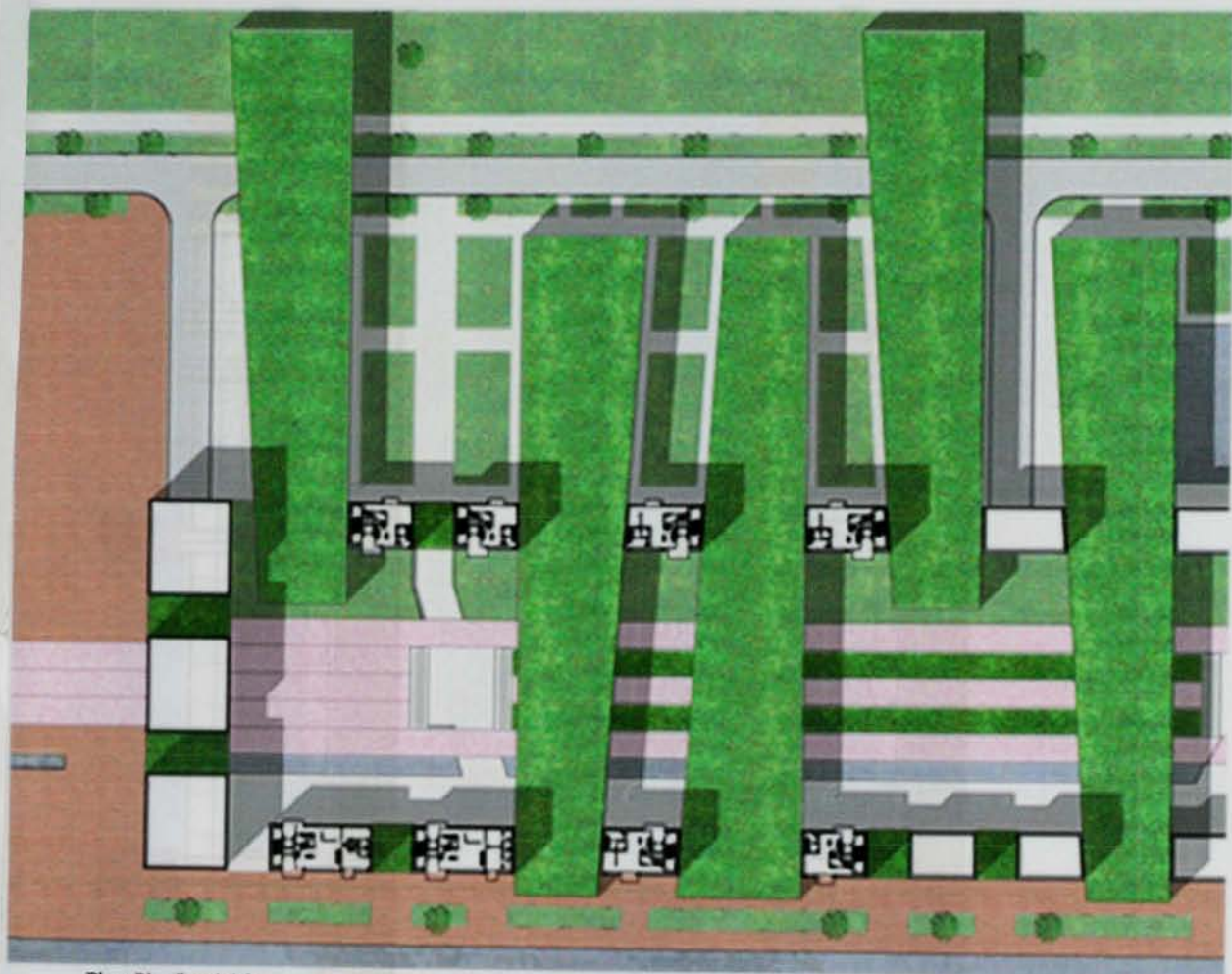
Floor Plan Level 4-5:

0 60' 120' 240'



Oscillating Paths Perspectives

Final Presentation:



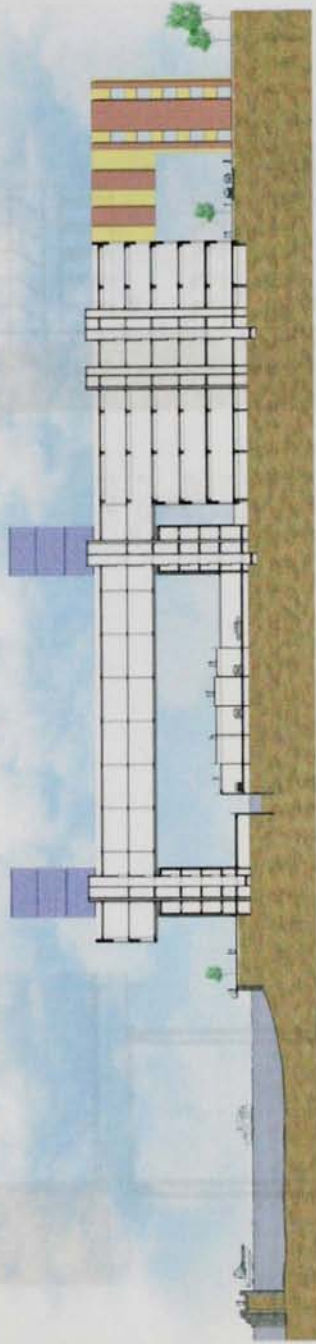
Floor Plan Level 6-8:

0 60' 120' 240'

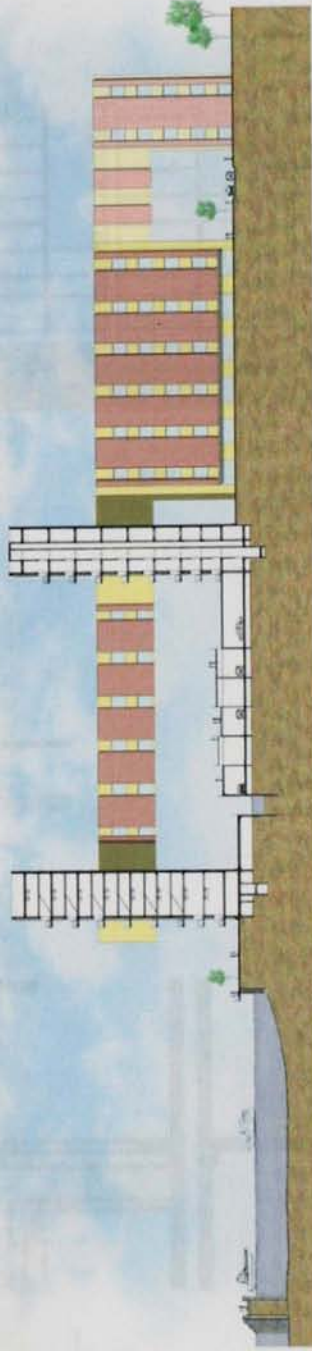


Oscillating Paths Perspectives

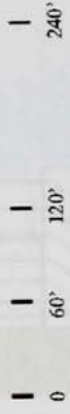
Final Presentation:



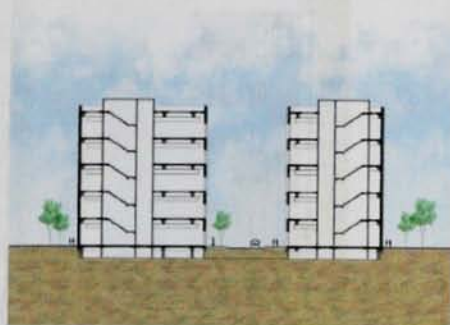
Section A



Section B



Final Presentation:



Section C

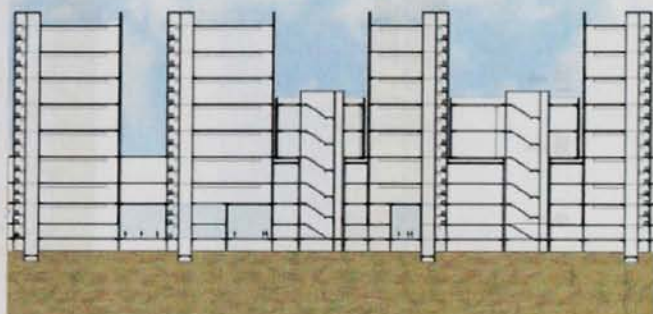


0

60'

120'

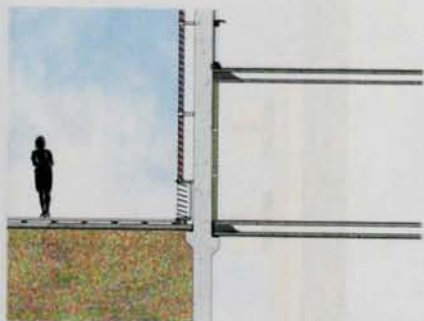
240'



Section D



Section Oscillating Walkway



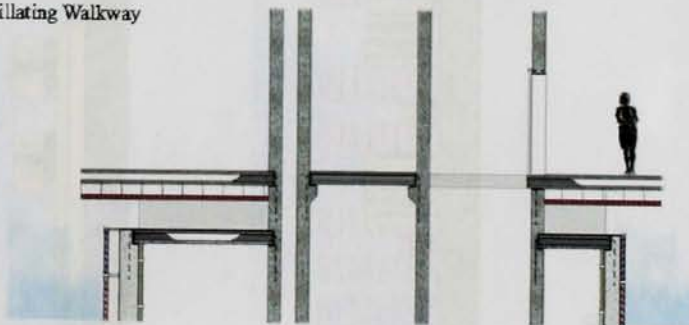
Section Double Skin Wall

0

4'

8'

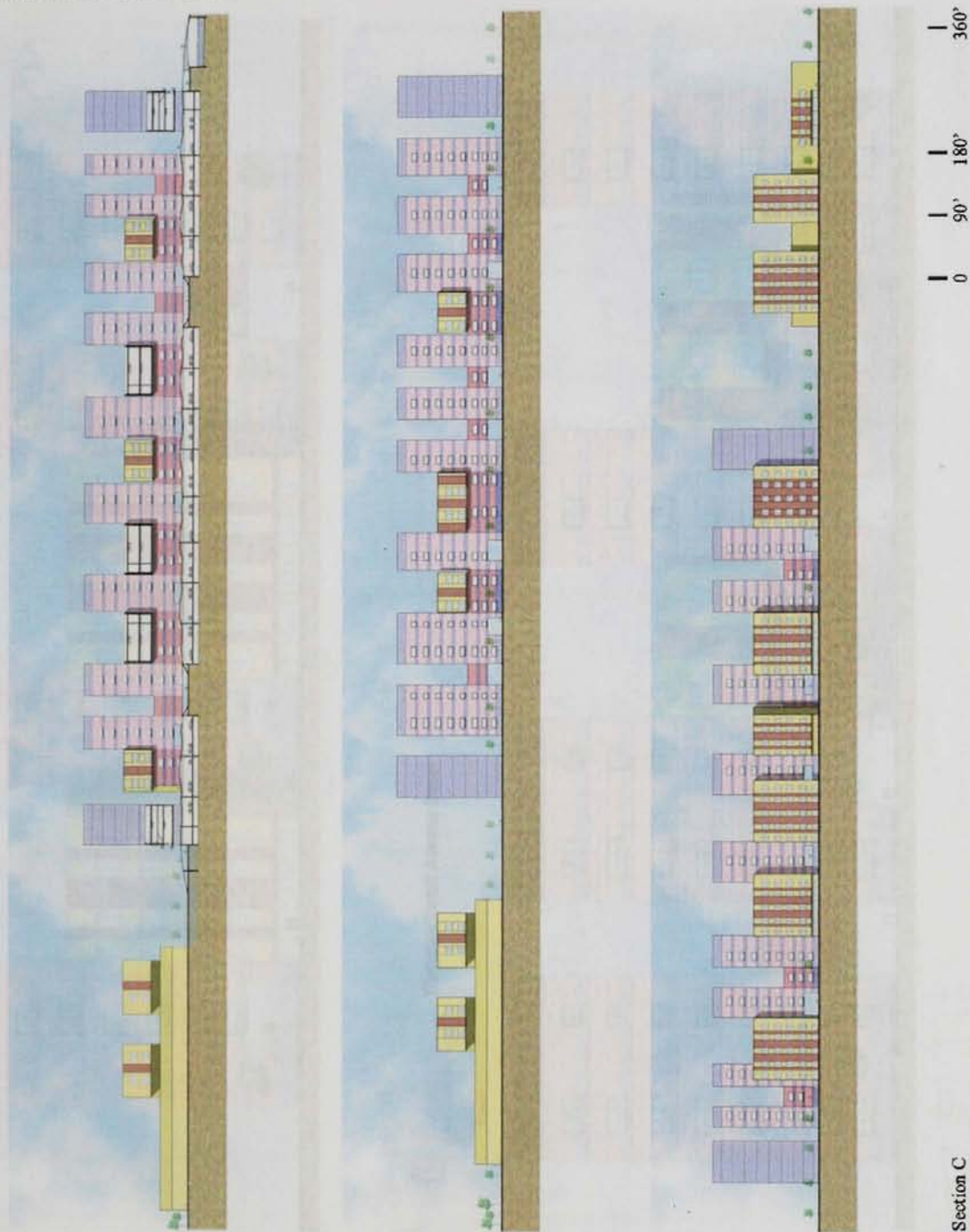
12'



Section Home/Live at 5th Level

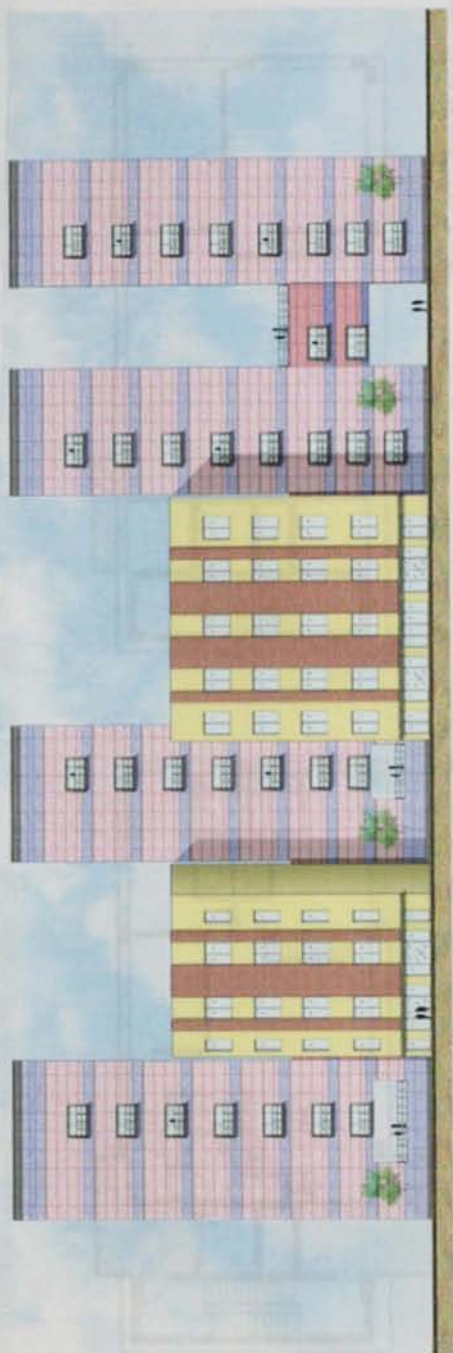


Final Presentation:



Section C

Final Presentation:



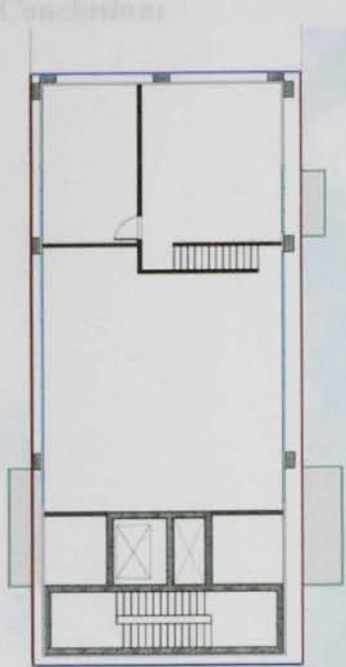
Elevation Detail Atwater Street



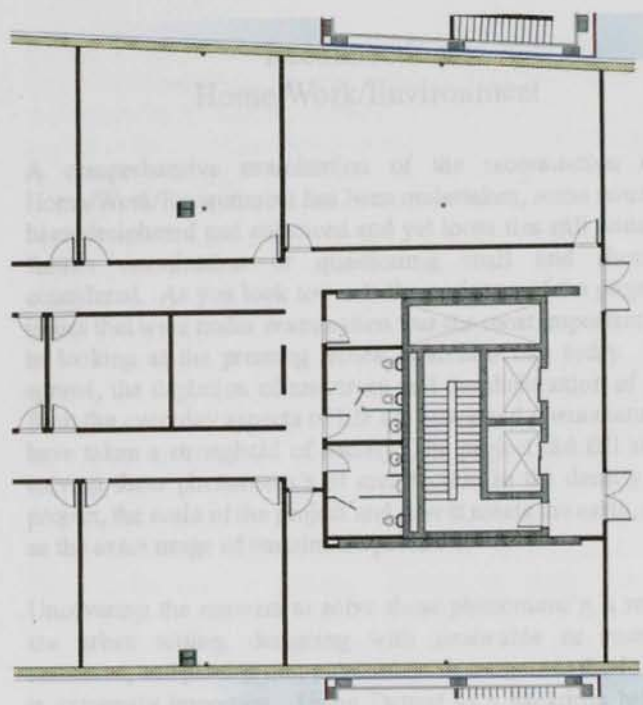
Elevation Detail Riverfront

0 30' 60' 120'

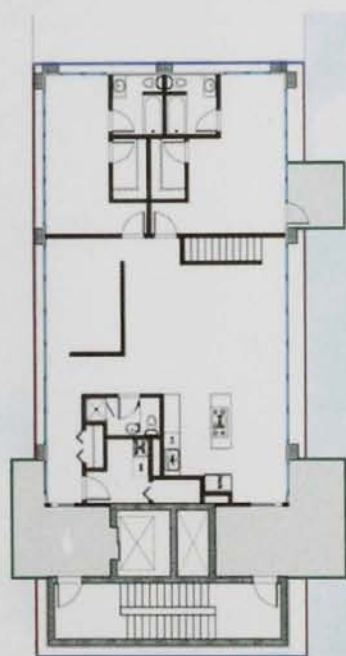
Final Presentation:



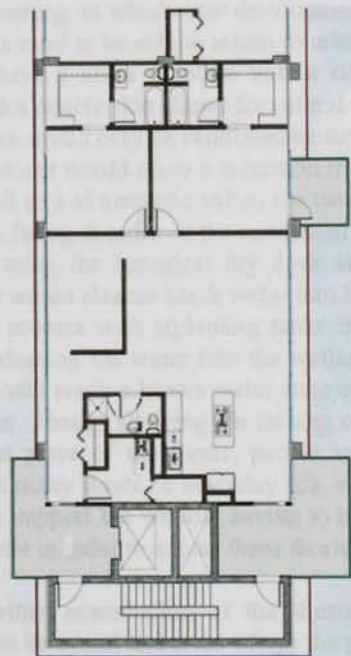
Detailed Live Unit #1 Mezzanine



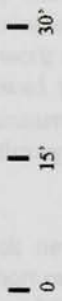
Detailed Work Unit



Detailed Live Unit #1



Detailed Live Unit #2



Conclusion:

Reconnections:
Home/Work/Environment

A comprehensive examination of the reconnection of the Home/Work/Environment has been undertaken, some issues have been deciphered and enhanced and yet loose ties still remain and further examination or questioning shall and should be considered. As you look towards the positives of the project, the issues that were under examination was the most important aspect in looking at the pressing issues in architecture today. Urban sprawl, the depletion of resources and the disjunction of people from the everyday aspects of life are unwanted phenomena's that have taken a stronghold of society. The project did fall short on solving these phenomena's of architecture in the density of the project, the scale of the project and how it meets the earth, as well as the exact usage of sustainable practices.

Uncovering the answers to solve these phenomena's, a return to the urban setting, designing with renewable or sustainable resources, and placing non-automobile movement at the forefront, is extremely important. Using Detroit as a backdrop helped to provide the setting in which new development and density must occur, people need to be able to return to urban settings but at the same time have a sense of place within cities. Developing a building with a double skin allows for natural ventilation on floors that otherwise would only be ventilated by air conditioning, green roof development would allow a reduction in heating and cooling loads, as well as add aesthetic value, the use photovoltaic panels on the south facing facades of the residential units create energy, and finally using the historical dry dock and turning it into a wetland that would cleanse black water into brown water, by first starting the process with siphoning tanks under the residential units then releasing the water into the wetland and finally when the water would reach a brown water state or better, be released into the river. Finally allowing the mixing of home and work is an important piece of the thesis, people would be allowed to interact with many facets of everyday life, stores, entertainment, and needs to support life without having to be connected through the automobile in order to access these facets.

When a further examination of the thesis is undertook new questions can be raised and areas where the project fell short can be perceived. When you look at the densities of the region of the project compared to other regions, that being the 2,000 inhabitants

Conclusion:

per 150 acres for America to 20,000 in Paris, 40,000 in Delhi, and 80,000 in Hong Cong, the project fell short in being able to raise the density to the numbers desired in order to reduce to make an impact in the American urban sprawl. The developed area of the site featured roughly 70 units, giving the project a total of about 250 units, which is a substantial increase in density compared to the norms of America but not to the norms of the rest of the world. It leaves much to be desired as to what scale could this project reach in order to satisfy a density that would not leave people living in urban sprawl McMansions, but not living in shoe boxes? The project aesthetically could have met the sky and ground with a much stronger relationship. The project could have reacted to the 20' drop from Jefferson Ave. to the Detroit River in adjusting the heights of the towers, or when examining the ground level, the way in which the parking was handled could have been manipulated in order to create a place that would promote more movement and development on the ground plane instead of using the area for covered parking. Finally, the method in which sustainable development was intertwined into the development was another aspect that left more to be desired, that being what other techniques could have been introduced. This leaves the question as to how much or how many sustainable aspects can be imposed upon the every day life of a person without interfering with day to day activity?

In closing, it is felt this project was one that was needed to open the architectural discussion as to how the disconnection in Home/Work/Environment can be overcome. By opening the doors to the architecture phenomena that is taking society down a negative path, individuals can further discuss the issues and make strides to reconnect this disjunction that has occurred in society today.

Endnotes:

1. Heidegger, Martin, "Building, Dwelling Thinking," "In Poetry, Language, Thought, Albert Hofstadter, trans." New York: Harper & Row Press, 1971.
2. Harries, Karsten. "Building and the Terror of Time," *Perspecta: The Yale Architecture Journal* 19 (1982): 59-69.
3. Frampton, Kenneth, ed., "Tadao Ando: Building, Projects, Writings, Writing," New York: Rizzol Press, 1984.
4. Bachelard, Gaston, "Poetics of Space," trans. Maria Jolas, Boston: Beacon Press, 1969.
5. Farrelly, E.M., "Three Houses: Glenn Murcutt," London: Phaidone Press, 1993.
6. Seamon, David, "Dwelling, Seeing and Designing - Toward a Phenomenological Ecology." Albany: State University of New York Press, 1993.
7. Kelbaugh, Douglas S., "Repairing the American Metropolis." Seattle: University of Washington Press, 2002.
8. Frampton, Kenneth, ed., "Tadao Ando: Building, Projects, Writings, Writing," New York: Rizzol Press, 1984.
9. McDonough, William & Braungart, Michael, "Cradle to Cradle." New York: North Point Press, 2003.
10. Lynch, Kevin, "The Image of the City." Cambridge: The MIT Press, 1960.
11. Moughtin, C., Shirley, P., "Urban Design Green Dimensions." Burlington, MA: Architectural Press, 2005.
12. Bratislava, Conference "A Precursor to Fame, Schumdition Architecture." Bratislava, Slovakia, 2004.

Bibliography:

- Bachelard, Gaston, "Poetics of Space," trans. Maria Jolas, Boston: Beacon Press, 1969.
- Bratislava, Conference "A Precursor to Fame, Schumidillion Architecture." Bratislava, Slovakia, 2004.
- Dixon, John M., "Glass under Glass," *Progressive Architecture* 04 (1983).
- Dutton, John A., "New American Urbanism," Italy: Skira editore A.p. A., 2000.
- Farrelly, E.M., "Three Houses: Glenn Murcutt," London: Phaidone Press, 1993.
- Frampton, Kenneth, ed., "Tadao Ando: Building, Projects, Writings, Writing," New York: Rizzol Press, 1984.
- Harries, Karsten, "Building and the Terror of Time," *Perspecta: The Yale Architecture Journal* 19 (1982): 59-69.
- Hart, Sara, "Projects London City Hall," *Architectural Record* 02 (2003).
- Heidegger, Martin, "Building, Dwelling Thinking," "In Poetry, Language, Thought, Albert Hofstadter, trans." New York: Harper & Row Press, 1971.
- Katz, Peter, "The New Urbanism." Portland: Print Vision, 1994.
- Kelbaugh, Douglas S., "Repairing the American Metropolis." Seattle: University of Washington Press, 2002.
- Lynch, Kevin, "The Image of the City." Cambridge: The MIT Press, 1960.
- McDonough, William & Braungart, Michael, "Cradle to Cradle." New York: North Point Press, 2003.
- Moughtin, C., Shirley, P., "Urban Design Green Dimensions." Burlington, MA: Architectural Press, 2005.
- Norberg-Schulz, Christian, "Architecture: Meaning & Place." New York: Rizzoli, 1988.
- Olson, R., Rejeski, D., "Environmentalism & The Technologies of Tomorrow," Washington D.C.: Island Press, 2005.

Bibliography:

Papadakis, Andreas, "Architectural Monographs NO 20 Foster Associates Recent Work," Great Britain: Academy Editions, 1992.

Roberts, Jennifer, "Good Green Homes," Layton, Utah: Gibbs Smith Publishing, 2003.

Russell, James, "The New Berlin," Architectural Record 03 (2002).

Scully, Vincent, "American Architecture and Urbanism," New York: Henry Holt and Company, Inc.: 1988.

Seamon, David, "Dwelling, Seeing and Designing - Toward a Phenomenological Ecology." Albany: State University of New York Press, 1993.

Sobel, L.S., Greenberg, E., Bodzin, S., "Greyfields into Goldfields." Pittsburgh: Geyer Printing Company, 2002.

Sorkin, Michael, "When Good Architects Design Bad Buildings," Architectural Record 08 (2004).

Walter. D., Brown, L.L., "Design First Design-Based Planning for Communities." Burlington, MA: Architectural Press, 2004.

April 8, 2005

Clifford G. Downey

Paula Henry

Narcissa Henry

Mr. & Mrs. J. Williams

Mr. F. Downey

Virginia Williams (Daughter of Henry)

Mr. G. Williams

Mr. & Mrs. J. Williams & Family

William Henry

James Henry

Mr. & Mrs. J. Williams & Family

Mr. & Mrs. G. Williams & Family

Mr. & Mrs. C. Williams & Family

Henry & William Williams

Arthur Williams

Anna Williams

Samuel Williams

St. Mary's Catholic Church & Staff

Home Service Association Architects & Staff

All Personal Files

To All Who Part In Throughout My Journey

Acknowledgements:



Over the course of completing this past year of graduate school, and the previous four years of undergraduate education, I have racked up a great deal of debt that can never be paid back. The resources that people have donated to me be it their time, personal resources, assistance on projects, thoughts or ideas to complement or propel my projects or even words of encouragement. These are things that I will never be able to pay back, all I can hope to do is to return the favor to everyone for their efforts. So, at this time I would like to say THANK YOU to these individuals.

God - Even though I would lose faith, I was never abandoned

Moja Zona Paulina Anna Finney

April R. Finney

Clifford D. Finney

Rosie Finney

Samantha Finney

Mr. S Beltowski Sr.

Mrs. F Swayers

Szajna Rodzina (Dziekuje Bardzo)

Ms. W Beltowski

Mr. & Mrs. S Beltowski & Family

McNally Family

Farlow Family

Mr. & Mrs. E Beltowski & Family

Mr. & Mrs. B Beltowski & Family

Mr. & Mrs. C Beltowski & Family

Finney & Williams Families

Acheson Family

Reyes Family

Stewart Family

St. Mary's Catholic Church & Staff

Victor Saroki Associates Architects & Staff

All Personal Friends

To All Who Past On Throughout My Journey