ABSTRACT

Title of Thesis: Rocking the Suburbs: Suburban Renewal
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Many Americans prefer to live in the suburbs with their own house and yard. However, the inner suburbs are aging and deteriorating, effectively pushing those who wish to live in the suburbs further and further out from the metropolitan centers, which is not sustainable. This pattern provides an opportunity to rethink the existing inner suburb and single-family residence so that it might become more attractive and competitive compared to new suburban development.

The chosen location is the neighborhood of Harundale, which is a typical American suburb --a placeless development that could be located outside of any American city. Therefore, experimentation in this location is potentially applicable across the country. Developed in the late 1950’s, Harundale houses hold historical value as mass-produced postwar design and construction, while the Harundale mall was the first enclosed air-conditioned mall east of the Mississippi River. This was once the “happening place to be”, but over time the area has declined. This thesis proposes the use of existing infrastructure as a springboard for rethinking the function and image of the suburbs.
Rocking the Suburbs: Suburban Renewal

to affect deeply; move or sway powerfully, as with emotion and excitement

by
Sarah Bowley

Thesis Submitted to the Faculty of the Graduate School of the University of Maryland, College Park in partial fulfillment of the requirements for the degree of Master of Architecture 2010

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Parts [what it was and is]
Chapter 1: The Suburbs

The Suburbs are a uniquely American invention created to supply the middle class family with a home and yard of their own. The American Dream is the belief that success and wealth can be achieved through thrift and hard work. Historically, a home in the suburbs and a car in the driveway has become a measure of success in the United States.
Train and Street Car lines arrived in cities as early as 1820. With their arrival, those who had the means fled the noise and pollution of the city for the quiet and nature of the newly created suburbs that popped up along each stop. The suburbs were seen as a haven from the filth, crowds, and crime of the city: “an alternate environment where those forced to work in the city could maintain a home life attuned to the tranquility, beauty, and purity of nature where families could thrive safely removed from the urban ills threatening the health and morals of youth.”¹ The street car suburbs were pockets of development. Each pocket was walkable and discrete.

Riverside, Illinois is an early suburban example from the late 1860's. Located 11 miles outside of Chicago, Riverside was designed by Frederick Law Olmstead and was conceived as an ideal suburb with romantic planning, naturalistic landscaping, and curving streets.

Between 1910 and 1940 the automobile entered the scene and flourished. Government and society welcomed the new age of the automobile and Henry Ford vowed to make cars affordable for middle class America. This fueled the growth of suburban development across the country and accelerated the pace of outward migration from the city centers. Suburban planning responded to the freedom of the car and suburbs spread further and further out from the metropolitan center. The car was not restricted to the path of the rail lines and

highways appeared in the 1920’s making travel fast and easy. Development was no longer restricted to discrete pockets and no longer required to be walkable because everyone drove everywhere. America looked at the car as a new form of independence, and Americans love their independence. The automobile provided the freedom to live anywhere and visit everywhere else.

Some would argue that the automobile companies manipulated the system and destroyed the train and street car lines during this time. By buying the lines and closing them down, they controlled the market and eliminated choice: therefore, ensuring a demand for automobiles. The bus replaced the train as the main mode of public transportation. The irony of the situation is that the car was viewed as a new form of freedom; however, Americans living in the suburbs are now largely dependent on the car.

Fig. 1 [source: David Goldstein/ blog.aarp.org]
Time and Energy Wasted in Traffic: Americans are dependent on their cars and can go few places without them.

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2 (Teaford, 2008)
During this period, affluence and race were restrictive factors for living in the suburbs. Not everyone could afford this lifestyle, and not everyone was welcome to try.

With the close of WWII came a huge and urgent need for housing. The troops, flooding home from war, were ready to settle down, have a family and invest in a home. Developers saw a demand for single family homes and development went through the roof. Not only did families see themselves fitting into the suburban lifestyle, but the government sweetened the deal with incredible loans with little money down. The government handed out FHA loans like candy, but there were restrictions: applicants were required to be white, and they were required to buy new single family homes in the suburbs. With the

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combined utopian vision of the suburbs and the government incentive, there was an incredible demand and developers worked hard to supply as many homes as possible.\textsuperscript{5}

In order to meet demand, mass-produced, assembly line constructed development became the norm and developers like Levitt were able to pump out 40 homes per day. The homes were affordable and individual, but they were also criticized as monotonous. Negative physical characteristics of the suburbs entered the collective thinking of pop culture with the ballad “Little Boxes” by Malvina Reynolds.

“Little boxes made of ticky-tacky,
Little boxes, little boxes,
Little boxes, all the same.
There’s a green one and a pink one
And a blue one and a yellow one
And they’re all made out of ticky-tacky
And they all look just the same.”\textsuperscript{6}

\begin{figure}[h]
\centering
\includegraphics[width=0.5\textwidth]{levittown_boxes}
\caption{Fig. 4 [source: modified Joe Scherschel/LIFE]}
\label{fig:levittown_boxes}
\end{figure}

\begin{center}
Levittown Boxes
\end{center}

\textsuperscript{5} (Teaford, 2008)
Following WWII, shopping malls became the rage. Department stores began following the middle class out of the city. Instead of walking or taking public transportation to the department store in the heart of the city, shoppers would get in their car and drive to the nearest enclosed, air-conditioned shopping mall.

As years passed, more and more generations grew up in the suburbs. The suburbs were no longer a new ideal existence; they were the way to exist. Commuting and lawn maintenance were no longer an honor and a privilege, but a way of life. There is an expectation, by those who grew up in the suburbs, that this is the way Americans are supposed to live.\(^7\)

An excellent example of a community built around a mall can be found in Columbia, Maryland. This new pattern of development continues today at Arundel Mills in Hanover, Maryland.

Americans always look for the next new thing. In the past, bigger was seen as better, and that goes for everything from cars to homes. Between 2000 and 2005, the size of the best selling homes by luxury builder, Toll Brothers, increased by 150%.\(^8\) It seems that with every new development, there are more rooms, and larger spaces. While this trend has continued through the present, there is an emerging trend toward smaller footprint living with a focus on quality space rather than quantity of space.

\(^7\) Paul L. Knox, Metroburbia, USA (New Brunswick: Rutgers University Press, 2008)
The biggest investment an American will ever make is likely to be the home in which they live. Historically, homes have been seen as a sound investment. The government gives incentives for home ownership: incentives like tax write-offs and low interest financing. This has fueled the demand for new homes, sustaining construction jobs and the economy. Within the past couple of years, with the deflation of the housing bubble and the economic crash, it has become clear that incentive fueled suburban development is not a viable long-term economic strategy.
Problems

While the suburbs were conceived as an ideal balance between nature and society, there were cracks in the theory from the beginning. First of all, the immersion and connection to nature was often not realized in the large scale projects. Just because you own a patch of grass does not mean you are living in nature. Secondly, the exponential growth of suburban sprawl ultimately destroys the natural environment, the thing it is trying to connect with. Building homes in the center of a land parcel, with yards on all sides, infiltrates the land with development, and destroys large swaths of land impacting natural systems such as wildlife migration and water infiltration.

Fig. 4 [source: Yann Arthus-Bertrand/Earth from Above]
Suburban Isolation: the suburban cul-de-sac to the extreme. Sure there is a lot of lawn, does that qualify as living in nature?
The creation of the suburbs was substantially in response to the ills of the city. The city was seen as an unhealthy, dangerous place to live and raise a family. Those who could afford to leave the city, did so. Known as white flight, this left the lower class and minorities in the city and the city became even more unhealthy and crime ridden.

<table>
<thead>
<tr>
<th>YEAR</th>
<th>POPULATION living outside the city</th>
</tr>
</thead>
<tbody>
<tr>
<td>1910</td>
<td>24%</td>
</tr>
<tr>
<td>1940</td>
<td>37%</td>
</tr>
<tr>
<td>1950</td>
<td>41.5%</td>
</tr>
<tr>
<td>1960</td>
<td>48.6%</td>
</tr>
<tr>
<td>1970</td>
<td>54.2%</td>
</tr>
</tbody>
</table>

Without the density, there was less money for services: however, more services were needed to secure safety and promote a healthy future for the city. The widespread relocation to the suburbs almost killed the cities. To this day, urbanites and suburbanites hold unflattering opinions of one another. In his research in and around the city of Baltimore, Professor Sidney Brower discovered the schism in the perception of the two lifestyles. Through his interviews, he discovered that the suburbanite would say, “the city is too crowded and too dangerous, city people are rude” while the urbanite would respond,
“People who live in the suburbs are fake and boring: people who live in the city might not be perfect, but at least they are real.” ⁹

Living in today’s suburbs is not a sustainable way of life. The postwar suburbs were designed for automobile transportation. Residents cannot get anywhere without getting in their car. Even if the grocery store or post office is within a walkable distance, the design of the road often impedes pedestrian connectivity. The creation of cul-de-sac neighborhoods limits connectivity and produces longer travel distances. This produces a consuming lifestyle based on burning fossil fuels, a limited resource.

Many inner suburbs have faced deterioration and decline over time. Demographics change as those with the means continue to move further out into new development areas or return to the city, and amenities such as playgrounds and parks are left to deteriorate without funding. Upon conception, the suburbs were places of health and security. now, the line between city and suburb has become blurred and the inner-suburbs face many of the same crime and demographic constraints as the city.

Architects criticize the suburbs as placeless, sprawling developments. Not only do all the houses look the same, but also all the developments look the same. There is nothing to distinguish one place from another; the suburbs are as impersonal as a sea of parking lots.

Potential

There is potential in the inner suburbs. They are aging, and the houses are small by today's standards, however they still hold value in the infrastructure, the access to the city, and the availability of services. In many inner suburbs, the original reason for being has either disappeared, or changed so drastically that it is unrecognizable. Movement patterns and important connections have shifted over time and demographics have changed. With a critical look, and creative approach, the inner suburbs can be revisited, reused, and reinvented for economic gain and continual use well into the future.

With the sustainability movement in full force, there is a demand for small footprint living. The inner suburbs are the ideal location for this lifestyle. The small house is an asset for this market. These homes have lower energy use and the embodied energy of an existing home is much lower than that of a newly constructed home. The yards, while small, can support small “victory gardens” where families can grow their own vegetables.

Many inner suburbs were once on train or street car lines, therefore, they are often spaced according to station access. This organization allows for walkable suburbs and the potential reintroduction of public transportation rail lines. This would support the notion of sustainable living, giving residents freedom from their cars and the consumption of limited resources.
Chapter 2: The Site

Harundale, located on the south side of Baltimore, is a typical post-war assembly-line-fabricated, suburban, middle class neighborhood in the town of Glen Burnie, Maryland. The site holds a long history combined with contemporary problems and potential.
History

In the distant past, American Indians roamed the area now known as Harundale. The historically registered Magothy Quartzite Rock Quarry is located within three miles of the community.\(^\text{10}\) The rock outcrop, also known as Wishing Rock, is an unusual feature in the area. For the American Indians, the quarry was both a place for mining invaluable rock for tools and weapons and a sacred ceremonial location. Because of the proximity to the quarry and water, it can be inferred that the Indians would have used the land for hunting, gathering, and possibly settlement.\(^\text{11}\)

As early as 1649, the Westminster Parish acquired the site. The first recorded structure was erected in 1731: Marley Chapel. The building was a Chapel of Ease for St. Margaret’s Episcopal Church, which is still thriving in Annapolis. The Chapel of Ease was a church outpost for people who lived too far from Annapolis to visit regularly.\(^\text{12}\)

Following the Parish ownership, in 1780, the site passed through the hands of Sir Francis Cromwell, a cousin of the Monarch of England, and was then acquired by the Glenn family in the early 1800’s. The Glenn Family owned the Curtis Creek Mining, Furnace and Manufacturing Company, which smelt iron, 


among other industries.\textsuperscript{13} It is unclear whether the industry occurred in Harundale specifically; however, the company was the base for the town of Glen Burnie and thrived in the greater Glen Burnie area.

In 1880 the Baltimore Annapolis Railroad Charter was formed. The line ran from Baltimore to Annapolis and following its inception, the town of Glen Burnie was laid out in 1888. At its heyday, the railroad line carried 1,750,000 passengers per year plus goods. The line was electrified in 1908 and continued to transport goods and people until its final passenger run in 1950. The line suffered the same fate as many railroads of the time as the affordability and independence of the automobile made rail travel undesirable and uneconomical. The rail continued freight service until 1968.\textsuperscript{14} The then obsolete rail right of way was then converted into a bike path from Cromwell Station south to Annapolis and the Baltimore Light Rail line from Cromwell Station to the north.

\textsuperscript{13} F. Robby, “Harundale Mall,” The Historical Marker Database, www hmdb.org (accessed September 23, 2009)

During WWI, the site was home to a National Guard Rifle Range and Army Camp. The combined phenomena of the proximity to the spiritual Wishing Rock, and the storied Rifle Range has led to conjectures that the site is haunted.\textsuperscript{15}

As the automobile became the major mode of transportation, roads formed between Baltimore and Annapolis. The first road was Baltimore Annapolis Boulevard, constructed in 1908, and replaced in parts by present day Ritchie Highway in 1939. The original road, still in existence, skirts to the north of Harundale while Ritchie Highway equally bisects the site. In the early 60's, Maryland Route 10 was slated to become the new highway connector between Baltimore and Annapolis. The proposal was never fully completed and only

traverses from Baltimore to a point just south of the Wishing Rock on Ritchie Highway. It never reaches Annapolis. Until the late 90’s, with the completion of Interstate 97, Ritchie Highway continued as the major connector between Baltimore and Annapolis.\footnote{Steve Anderson, “Interstate 97 Maryland Historic Overview,” Eastern Roads, http://www.dcrroads.net/roads/I-97_MD (accessed December 4, 2009)}

In the late 1940’s John Byrne of the Byrne Company acquired and began planning the development of Harundale. Before his plan the land was still raw having previously been a shooting range and game preserve. The site was bound by the electric rail line on the west and the fingers of Marley Creek to the South and West. While the train line and the dividing road were considered transportation assets, providing access to the cities, they were also planning constraints. The through highway issue was addressed with flanking local streets fronted with homes and feeding the curving streets and cul-de-sacs.\footnote{“1200 Steel-Framed Houses,” Arch Forum 86 (1947): 82.}
Of the 299 acre parcel, sixty-four acres were dedicated as park land and another twenty one acres were dedicated for shopping and civic use. The park spaces were mostly along the creek, while one parcel was centrally located, but ultimately filled with a Public Library and Presbyterian Church. The shopping center was slated to include a large theater, a community center with clinic, 40 retail units and 20,000 square feet of office space.

Fig. 7 [source: Arch Forum]
Proposed 1946 retail and civic space.

Stipulated by FHA financing, asphalt streets were complete with concrete curbs, gutters, and sidewalks. The remaining land was divided into 1,200 sixty by one-hundred foot lots for single family homes. The development was not profitable for the Byrne Company and the commercial area was never completed as designed.
Mr. Byrne cited the scale of the project and labor problems as the source of his financial problems.  

Instead of the commercial development planned by Byrne, the proposed site was developed by James Rouse who also developed Baltimore’s Inner Harbor and the suburban new town, Columbia. Under Rouse’s care, the site became home to the first fully enclosed air-conditioned mall east of the Mississippi River, complete with a sea of asphalt parking. While stylish, state of the art, and extremely popular at its inauguration the mall was quickly dethroned by bigger and better malls.

Fig. 8 [source: Marion E. Warren/ Mall Hall of Fame Blogspot]
Mall Interior: now demolished mall designed by Baltimore firm RTKL and developed by James Rouse.

Due to changing demographics, the mall experienced rapid decline throughout the 90’s and was ultimately closed and subsequently demolished. The

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18 “8 ½ Million Bust,” Arch Forum 90 (1949).
commercial parcel has since been redeveloped as Harundale Plaza, a typical strip center with Grocery Store, Demi-Department Store, Post Office and other retail establishments. The development still sits in the requisite sea of parking.

Fig. 9 [source: author]

Existing Amenities: inside the extent of a ½ mile walkable radius.
Problems

Aside from the fact that Harundale was originally neither profitable nor successful, further decline and deterioration has occurred due to changing demographics, movement patterns, and disconnections. The deterioration is both physical and social.

Changes in traffic patterns through the addition of Route 10 have modified the flow of traffic through the neighborhood. The only local connection from Ritchie Highway to Route 10 is through one of the neighborhood streets. Residents have taken to parking in their yards, on the lawn, in order to remove their parked cars from the danger of traffic flow. The street was not designed as a through street, but that is exactly what it has become. The homes and yards on this street show the most deterioration and lack of pride of place. While this is merely one street in an otherwise mostly well kept neighborhood, it has become the representation of the place because so many people pass through the neighborhood along this street.
Fig. 10 [source: author]
Deterioration along through street.

Fig. 11 [source: author]
Street Hierarchy
Harundale also suffers from a lack of connectivity on many levels. While bounded by park land on two edges, the park is separate from the neighborhood. The single entry point is unclear, and there are very few residents that can see into the park because of the steep drop along the space. Because of its lack of connection and upkeep, the park has become a place of danger, and “home” for the homeless.

Fig. 12 [source: author]
Barriers to park access.
Fig. 13 [source: author]
Main park entrance.

Fig. 14 [source: author]
Overgrown playground: the swing seats are kept locked in a storage shed to prevent vandalism.
Another divider, as mentioned previously, is Ritchie Highway. The road cuts through the neighborhood dividing east from west and cutting off half the neighborhood from safe pedestrian access to the commercial area. Even though the whole area is walkable by distance, the form of the streets dissuade residents from walking, and most hop in the car when they need a gallon of milk, rather than walking.\footnote{(Kunstler, 1993)}

![Fig. 15](source: author)

Neighborhood Dividers: traffic on Route 2, the ghost of the railroad, and topography are major divisions through the site as well as the form of the built environment.

In some ways, Harundale has lost its reason for being. Conceived as an affordable development for housing returning soldiers after the war, the site held value for its easy access to Baltimore. The mall was a popular place and drew
visitors from a large radius also because of the accessible location. With the creation of new roads, the mall lost its reason for being and ultimately died.

Storm water management is also a problem in Harundale. Currently most rainwater falls on impervious surface, enters a storm drain and is transported by concrete culvert directly to Marley Creek. There is very little natural mitigation of the water; so, by the time it reaches the creek, the water is still full of trash, debris, and chemicals from roadways. The storm water provides continual contamination of the creek, which is categorized under a Limited Use Advisory which stipulates no human contact with the water. Marley Creek is also awarded the sub-par Marginal Trash Rating and considered a Partially Degraded Habitat. In a 1991 article from the Baltimore Sun, Staff Writer John A. Morris wrote, “Margaret Brown, president of the Marley Area Improvement Association, said Marley Creek’s woes began more than 25 years ago with construction of Harundale Mall and Route 10, long before authorities required developers to install storm-water controls.”

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21 John A. Morris, “State, County Aim To Halt Pollution In Marley Creek,” The Baltimore Sun, August 18, 1991.
Fig. 16 [source: author]
Proximity to the Chesapeake Bay

Fig. 17 [source: author]
Water Flows
Stormwater Collection: rainwater is collected along street gutters through storm drains. The water then flows swiftly along concrete culverts directly to Marley Creek and onward to the Patapsco River and Chesapeake Bay.
Potential

While the lack of connections can be considered problematic, reinforcing and strengthening those connections holds potential. As a south side suburb of Baltimore, residents have swift access to both Annapolis and Washington DC.

Fig. 19 [source: author]
Relative Location: Baltimore, Annapolis and Washington DC.

<table>
<thead>
<tr>
<th>CITY</th>
<th>DISTANCE</th>
<th>TIME</th>
</tr>
</thead>
<tbody>
<tr>
<td>Baltimore</td>
<td>13 miles</td>
<td>20 minutes</td>
</tr>
<tr>
<td>Annapolis</td>
<td>21 miles</td>
<td>30 minutes</td>
</tr>
<tr>
<td>Washington DC</td>
<td>35 miles</td>
<td>50 minutes</td>
</tr>
</tbody>
</table>
Because Harundale was originally along a train line, there exists the opportunity to reinstate a public transportation line through the corridor. The end of the existing line is within two miles and the Ritchie Highway median provides an optimal route for connection between Baltimore and Annapolis. There would be no property to buy, nor communities to disrupt by extending the Light Rail along the median. This proposal would add another level of division through the community of Harundale, but this is not without precedent. Shaker Square in Cleveland, Ohio is a successful example.

![Map of Harundale's proximity to Baltimore Light Rail](image)

**Fig. 20 [source: author]**

Proximity to Baltimore Light Rail: Harundale is merely two miles away from the last stop shown in blue.
Proximity to last stop on Light Rail Line: Cromwell Station is the current southernmost. The train could easily, efficiently, and economically connect to Harundale and continue on to Annapolis along the median of Ritchie Highway.

The extension of the Light Rail would allow an increased density over time. When implemented correctly, increased density can benefit a community by adding demographic diversity, supporting increased commercial and civic amenities, and strengthening the community’s economic base. Raising density could lead to the inclusion of a community center and senior living options.

The currently abandoned park is also an opportunity. Reconnecting the community to nature by taking advantage of the park, providing stronger entrances, and placing “eyes on the park” will benefit the neighborhood. There is also potential for re-establishing ecosystems and wetlands within the park.
The historic location of Harundale Mall is now little more than a series of parking lots. Only one portion of the original mall is still intact, and new buildings have been constructed. The arrangement of buildings does not create a space, but the buildings float in a sea of asphalt. Here lies an opportunity to add density and create spaces that people will want to visit and linger; a place that the residents of Harundale can be proud of. Development in this area would also be visible to through traffic on Ritchie Highway and would improve the overall impression of Harundale to visitors.
Fig. 23 [source: author]
Harundale Plaza: merely a series of parking lots and the remnant of the Historic Mall.

Fig. 24 [source: author]
Views from Ritchie Highway: Harundale Plaza looks alot like the rest of Ritchie Highway. There is nothing that says “you have arrived, you are here.” These images could have been taken almost anywhere.
Fig. 25 [source: Anne Arundel County Greenways Master Plan]
Anne Arundel County Greenway Network

Fig. 26 [source: Anne Arundel County Greenways Master Plan]
Proximity to Greenway Network
The park is part of the Anne Arundel County Greenway Masterplan. The Greenway network is a series of protected habitat corridors that connect throughout the county.\textsuperscript{22} The proximity of the Greenway provides the opportunity for stronger connections to nature, which tie back to the original suburban ideals of living in nature.

Chapter 3: The Houses

The Harundale homes were designed to provide affordable quality housing based on the use of cutting edge building technology and a streamlined assembly process.
History

The Byrne Organization had already completed 7,500 dwellings at other locations by the time Mr. Byrne purchased the Harundale property. His previous experience was in steel frame garden apartment construction and steel frame residential navy complexes. This set the stage for the Harundale project. The Byrne Organization followed a unique site fabrication process, which used steel construction techniques instead of the typical wood frame system.

Byrne set up a fabrication area on the site located in the area slated for shopping and civic use. A series of Quonset huts provided shelter for the assembly of walls, roofs, and systems, and the rest of the space was used for stockpiles of supplies and equipment. The major components of each house were constructed in the huts by a team of men, then loaded on a flat bed truck and assembled on the individual site where the slab was already poured. The four exterior walls were placed one by one with the help of a crane, and a team of men. After the walls were placed, the entire roof assembly, complete with shingles, chimney and louvers, was placed on top. The heating system was also pre-assembled before being installed in the house and connected to the radiant floor pipes already imbedded in the concrete slab. The exterior cladding and interior partitions and finishes were then applied to the complete shell. At the height of production, the process was able to pump out one house per hour.
Fig. 27 [source: Arch Forum]
Quonset huts and storage yards.

Fig. 28 [source: Arch Forum]
Component Assembly Process.
Byrne thought his process was state of the art and highly efficient. He thought that the process would allow him to sell homes at record low prices. He was wrong. The equipment required to transport the large components and worker inexperience drove up costs to the point where the homes were no longer super affordable, especially for their size. For this reason, the homes did not sell as well as expected, and a number of homes became rental units.

The assembly line process led to the monotony of the identical looking homes. The development tried to overcome this stigma by varying setbacks and angling homes on corners. The development also marketed a variety of exterior cladding ranging in color and material as well as accessories such as shutters, awnings, and car ports in and attempt to alleviate the repetition.

Also unique to the Harundale homes is the fact that they contain very little wood. The only wood in the shell is the plywood sheathing on the roof. The rest of the structure is composed of welded steel strips. This is not without precedent, but was not a common practice at the time.
Problems

Affordability however, came at a price; the homes are extremely small. Without any added additions, they are less than one thousand square feet and they have no basement and very little storage. Most homes have three bedrooms, while a few have only two bedrooms. Many of the homes have acquired additions, but in many cases the space was added ad hoc and leads to a messy street aesthetic.

The homes and yards vary in general upkeep and modernization. But overall have a sense of deterioration.

Since their creation, the homes have suffered from a bout of low self-esteem. In the “Harundale Binder” in the vertical file collection at the North County Library, one of the articles quips that Harundale has long suffered from an inferiority complex as wide as Ritchie Highway. The community has also suffered under bullying from surrounding neighborhoods, which refer to the homes as “dollhouses and cracker boxes” because of their size and repetition.23

The houses are all the same size and type. The homogeneity discourages diversity in demographics such as race, age, family structure and income level.

23 Stuart Low, “‘Slum in Making’ Holding it’s Own,” Arundel Living Sun, July 17, 1980.
Fig. 29 [source: Arch Forum]

Typical Harundale Home 1947: three-bedroom layout.
Potential

The relative affordability and single story layout present opportunities for small footprint living, aging in place, and young families. By adding layers of connection that promote walking and provide better access to work, errands, fun, and community events, a sustainable and engaging lifestyle can be achieved while living in a Harundale home. The creation of a public realm and place identity will make the homes more attractive to buyers and will instill a pride of place that will promote the upkeep and improvement of existing property.
The Glue [what holds it all together]
Chapter 4: Viability

It is not enough to propose a beautiful place and represent it as an improvement. Design must be integrated with reality to develop a viable place that can endure over time. To prevent further deterioration over time as Harundale has previously experienced, further development must be in balance with the community, the environment, and the economic condition.
Community

Some would argue that the suburbs have caused a breakdown of community. Neighbors do not know each other, and cannot support each other in times of need. In Harundale, there is very little community involvement. Very few residents attend the Civic Association meetings and volunteer their time in the upkeep of public space. An article from the *Arundel Living Sun* in 1980 explained one might think Harundale would be a “close knit community. But that assumption is too easy. ‘Harundale is a melting pot that didn’t melt,’ Mrs. Emge volunteered. ‘People here enjoy their privacy.’”²⁴

There is value in having different kinds of communities available to individuals as they choose where they want to live. Different people look for different kinds of lifestyle and different kinds of space to call their home.²⁵

While residents may enjoy their privacy, a community center where people could meet, volunteer and learn from one another would benefit Harundale. The mall was, itself, a community center. The mall featured a youth center with a clubroom and counseling services. Paradoxically, the mall was also a favored hangout for Harundale’s senior population. The demolition of the mall had a detrimental impact on the community. The community center should have meeting rooms, computer labs, and spaces for creative work.

²⁴ Stuart Low, “‘Slum in Making’ Holding it’s Own,” *Arundel Living Sun*, July 17, 1980.
Sustainability

The environment is suffering at the expense of the luxury of the suburbs and the modern tendency to create sprawling developments that clear cut the natural value of the land. While Harundale is compact and the homes quite small, the development is an early example of clear cutting relatively natural land for the sake of the individual. Harundale is here. It has already been created, so it makes sense to make improvements that would allow it to thrive well into the future. However, what has happened is that Harundale has been allowed to deteriorate while being replaced with new, bigger and more environmentally detrimental development.

If Harundale were more pedestrian oriented, better connected to the city, and better integrated with natural water collection it would be an ideal place to live a small footprint lifestyle. Distance wise, Harundale is walkable. However, 24,000 cars cut through along Ritchie Highway daily\(^\text{26}\), and they do not slow down. It is a daunting task to cross from one side to the other. The street network is curvy, disorienting, and indirect for walking. The Baltimore Annapolis Trail Bike Path also cuts through Harundale, but bike riders face many of the same issues as pedestrians. Better connectivity from one side of Harundale to the other would allow people to walk to errands, services, entertainment and the proposed light rail stop.

However, connectivity is only the first step to promote walking. The connections must be safe, vibrant spaces and streets that people will enjoy walking through, otherwise residents would easily resort to hopping in the car, even for a short trip.

A sustainable place is well integrated with the environment. The diligent designer harnesses natural sources of energy and employs natural processes for managing water and waste. Harundale is currently burdening the natural process of water management and would benefit by returning to a more natural system of rainwater collection and filtering. Well-integrated solutions such as rain gardens and bioswales can be beautiful in their own right, and can contribute to place identity.
Economy

Economics are complicated in the suburbs. Because homes are more spread out, tax revenue has to go further to pay for the maintenance of infrastructure like roads, water and sewer, and storm management. Harundale struggles with the upkeep of its infrastructure.

There are 2,600 existing dwelling units in Harundale. Residents are characterized as lower middle class. So the question is, how much additional dwelling units, retail, community space and jobs can Harundale support?

The following tables provide a place to start designing the program for a well-rounded and well-balanced Harundale.

Fig. 30 [source: Nelessen/ Visions for a New American Dream]
Based on the existing retail square footage and the typical anchors, Harundale is classified as a Community Center in this table.

Based on these tables, Harundale will be improved with added density, jobs, and community space. The retail square footage could decrease, however, the existing retail types should stay in place. Urban design is not merely scientific, but also about the quality of the place and whether people will like to be there. Because the proposal will ultimately create a mixed-use public realm, an exciting place to live and hang out, an increase in retail square footage is appropriate.
<table>
<thead>
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<th>PROGRAM</th>
<th>EXIST</th>
<th>ADD</th>
<th>GOAL</th>
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<tr>
<td>Dwelling Units</td>
<td>2,600</td>
<td>+800</td>
<td>+800</td>
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<tr>
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<td>+40,000</td>
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<tr>
<td></td>
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<td>Civic/Institutional</td>
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<td>+35,000</td>
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</tr>
<tr>
<td></td>
<td>sf</td>
<td>sf</td>
<td>sf</td>
</tr>
</tbody>
</table>

Fig. 32 [source: author]

Program Goals

The dwelling units should consist of town home and apartment typologies with the ratio to be determined by building density on amenities.
The Directions [what it could be]
Chapter 5: Precedent
The Market Common
Clarendon, Virginia
completed in 2001

Horseshoe shaped space anchored by book store and grocery store.

Mixed use combination of retail ground floor with office and residential above.

Parking in imbeded garage.
The Avenue
White Marsh, MD
completed in 1998

Retail arranges along an outdoor main-street space.

Not mixed use.

Parking removed form the main public space.

Retail includes larger "big box" stores as well as smaller boutiques and a movie theater.
Shaker Square
Cleveland, OH
founded in 1929, renovated in 2001

Bisected by through streets and light rail, the square is defined by four corners of retail including a theater and grocery store.

The train station is not located centrally in the space.

Parking is buried behind buildings and promotes foot traffic past retail.
Rectangular space perpendicular to the main through street.

Train station on center axis with space.

Additional parking behind retail promotes pedestrian traffic past retail.
Connecticut Ave
Cleveland Park,
Washington DC
founded in 1886

“Downtown” Cleveland Park formed around Connecticut Avenue a major through street which connects back to Washington DC.

Metro station access.

Uses local lanes to buffer from the traffic and provide additional parking and access.

Theater and Grocery Store anchors.
Kierland Commons
Arizona
Completed in 2000

Mixed use development around an outdoor mainstreet.

Residential units above ground floor retail.

Parking removed from main public space.
Tlaquepaque
Sedona, AZ
Began in 1967

Started as an artist community where artists would live and work.

Retail space arranged around a series of outdoor rooms and parking areas.

Outdoor rooms focus on the integration of nature and building to provide shade and places for interaction.
Palmer Square
Princeton, NJ
completed in 1939

Retail arranged around a series of overlapping landscaped open spaces.

Parking in garage and lots removed form the main public space.
Clarendon, Hunt Valley, and The Avenue Sections:

Double sided drive aisle and parking averages 150’ across

Single drive aisle and parking averages 75’ across

Building Heights vary from 1-5 stories

Second story setbacks vary
Shaker Square Sections: Shaker Square is over 600’ wide and building heights vary from 1-2 stories on the square and 7 stories along the through street.
Lake Forest and Cleveland Park Sections:

Lake Forest is 150’ across and two stories

Cleveland Park is 125’ across and varies from 1-3 stories
Fig. 68 [source: author]

Program
Landscape

Fig. 69 [source: author]

Nancy, France superimposed
Fig. 70 [source: author]

The Royal Crescent
Bath, England superimposed

Fig. 71 [source: author]

Washington Place,
Baltimore, Maryland superimposed
The Solution [what it should be]
Chapter 6: Method
This thesis proposes a layered solution to the deterioration due to the implications of suburban sprawl: disrepair and the lack of positive identity. The solution consists of a layered approach. The layers include the extension of nature, the connection to multiple transit modes, and the development of place identity.
Chapter 7: Intervention
Parti: extension of the existing greenway, extension of the Baltimore light rail, and the creation of a series of spaces that connect back to the community.
Fig. 74 [source: author]
Proposed Plan

Fig. 75 [source: author]
Existing Plan
The differences between the existing condition and the proposed are clear: better connectivity, build up of density where there used to be parking lots, and the extension of the existing Greenway. The existing condition is merely an expanse of parking and remnant of the first mall of the country. While the proposed is a series of public spaces which connect together and form a loop with nature. This creates a vibrant and lively series of spaces that are walkable, and inviting. The Spaces are the Community Park and Garden, the Retail Street, the Transit Crescent, and the Market Greenway. The series of spaces not only lings the people to the heart, but also links the existing public library and Presbyterian church on the west side of the highway to the new community center.
The Community Park and Garden:

The proposed community center building is located in the center of this area. The community center consists of a large auditorium for meetings and theater as well as smaller classrooms, computer labs and meeting rooms. Community members of all ages can find something exciting at the Community Center. The Center is surrounded by garden and park space. The park provides space for active leisure such as basketball, and field sports, while the garden provides space for passive leisure including strolling, and enjoying nature. The garden is a rain garden for the collection and mitigation of storm runoff from the development north of the site. This area is also a place of rest for bike riders that travel along the trail. An ice cream stand, public restrooms and bike shop are included for their benefit. The space is surrounded by apartment buildings, which enjoy park views while watching over the space and creating a safe environment.

The Retail Street:

The retail street is conceived as a vibrant mixed use space where people live, work, run errands, and enjoy themselves. The program of the existing retail has been retained and amplified. The proposed program includes a grocery store, department store, a pub with small pool hall and bowling alley, and an assortment of retail, restaurant, sidewalk café, and office spaces. The existing historic remnant of the mall is to be returned to a two story Department Store, as it was originally the mall's main anchor. Parking has been relegated to garages buried behind retail, office, and residential units.
The Transit Crescent:

The crescent form allows the building facades along Ritchie Highway to angle and acts like a calling card or billboard for attracting drivers and Light Rail Riders to explore the retail street. It also provides an ideal place for the location of a Storm Water Pond that both mitigates rainwater and gives imagability to Harundale along the road. Bioswales are also located between the medians of the local lanes and the through traffic. The transit crescent is essentially the front door to Harundale, whether one arrives from light rail or car. The light rail station is located in the center of the space and is bisected by the new center axis pedestrian and bike crossing. Special paving will be used in the entire area to slow traffic and pedestrianize the space.

The Market Greenway:

The Market Greenway is the extension of the existing greenway system to the heart of Harundale. This extension provides a beautiful path for walking to the Light Rail or to the grocery store. Along the path there are a series of playground follies that are both sculpturally beautiful, and provide a fun place for children to play. The greenway becomes the main pedestrian boulevard where people can meet and mingle and school children can more safely walk to school. A pavilion is proposed where the Greenway meets the Transit Crescent. This structure would regularly house a farmers market and would double duty as a space for the Library to run special events such as summer day camps.
Fig. 77 [source: author]
The Community Garden Aerial Perspective.

Fig. 78 [source: author]
The Community Garden Section
Fig. 79 [source: author]
The Community Garden Perspective: the building to the right is the ices cream stand and bike shop.

Fig. 80 [source: author]
Retail Street Aerial Perspective
Fig. 81 [source: author]

The Retail Street Section.

Fig. 82 [source: author]

The Retail Street Perspective.
Fig. 83 [source: www.southeasttennessee.com/www/docs/3]

The Retail Street Photo.
Fig. 85 [source: Dunhan-Jones/Retrofitting Suburbia]

Vertical Mixed Use.

Fig. 86 [source: author]

The Transit Crescent Aerial Perspective.
Fig. 87 [source: author]
The Transit Crescent Section.

Fig. 88 [source: author]
The Transit Crescent Perspective.
Fig. 89 [source: author]
Proposed Light Rail Stations.

Fig. 90 [source: author]
Light Rail Station Plan.
Fig. 91 [source: author]
The Market Greenway Aerial Perspective.

Fig. 92 [source: author]
The Market Greenway Section.
Fig. 93 [source: author]
The Market Greenway Perspective.

Fig. 94 [source: tinyfarmblog.com]
The Market Greenway Photo.
Fig. 95 [source: author]
Proposed Site Program: after completion residents will be able to walk from their home to shopping, work, community events and services, as well as access to the city.
Street Network Exist and Proposed:

the introduction of appropriate street types creates stronger connections, allows for less getting lost, and promotes walking. Before there were a lot of divisions that impeded walking while the proposed streets show better connectivity.
Outdoor Amenity Exist and Proposed:

One existing problem of connectivity is the difficult access to the park and bike trail. The extension of the greenway creates a loop that connects the neighborhood center to the bike path and the wildlife corridor and promotes walking.
Pervious Surface Exist and Proposed:

green roofs and water strategies turn the site from mostly impervious to mostly semi-pervious. This prevents a substantial amount of trash and chemicals from entering the Bay.
The focal point of each space is the connection to nature. This is possible through the integration of stormwater management. Currently, the large swaths of parking and pavement are problematic. Water currently collected in storm drains flows to concrete channels that move water, trash, and chemicals swiftly to Marley Creek. All of the water goes directly from the site to the river.

![Water Management Areas: bioswales and rain gardens for rainwater collection and infiltration are integrated into each of the spaces and respond to the natural water flow and existing storm drain locations.](image)

**Fig. 99 [source: author]**

Water Management Areas: bioswales and rain gardens for rainwater collection and infiltration are integrated into each of the spaces and respond to the natural water flow and existing storm drain locations.
Water Management Techniques:

Bioswales and Rain Gardens collect and store water while the plants help filter and remove debris. These systems take advantage of natural systems and afford the community a stronger connection to nature while building an image and identity for Harundale.
Chapter 8: Conclusion

In conclusion, this thesis proposes the repair of suburban damage caused by a detrimental history of suburban planning through the extension of nature, connection to transportation, and a focus on place identity.
Ideal vs. Circumstantial

This thesis proposes big ideas and bold moves for reshaping the suburbs and concedes that bold ideas do not always translate to actual circumstance. The extension of the Greenway is an example of this paradox. While the majority of this proposal is possible, the Greenway extension is a big idea that would be nearly impossible to achieve. In reality, if this proposal were to materialize as a project, it could progress without the Greenway extension. Instead, the main through streets that connect major open spaces would become more of the focus for connection to nature and treating storm water with bio swales.

Implications

Fig. 101 [source: www.nasa.gov/images]

United States Sprawl:

the magnitude of sprawl is visible in satellite imagery of the United States at night.
The United States is suffering from general lack of identity in its sprawling suburbs and the time and energy wasted on car dependency. Because Harundale is a typical American suburb, this proposal holds implications for communities across the country. The following concepts can and should be applied to other places as a template for rethinking existing suburban communities:

1. Extend and amplify the existing condition
2. Increase density around amenities
3. Consider existing parking lots as opportunities for development
4. Connect to existing public transportation networks
5. Promote walking by the creation of a connective street network
6. Use sustainable features to the benefit of the place
7. Bring nature into the heart of the place
8. Create spaces for the public that foster community and identity
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