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GTransit: Proposal

Problem Statement:

Atlanta's primary public transportation provider, MARTA (Metro Atlanta Rapid Transit Authority) is responsible for the local rail system and the majority of the bus services that are intended to serve approximately 5.5 million people. This system is generally ineffective when compared to those of other metropolitan areas with similar populations, such as Boston (4.6 million people), Washington D.C (5.9 million people), and San Francisco (4.5 million people)[1]. Each of these three comparable cities, including the two that have smaller populations, have much higher average public transit ridership. Average daily ridership in Atlanta is only 52% of San Francisco's, 41% of Boston's, and 24% of Washington D.C.'s[1]. Even though each aforementioned city has a significantly higher ridership, their average commute time is somehow much faster than Atlanta's, thereby highlighting MARTA's inefficiency. For example, the average time spent commuting in Boston is around 35 minutes, while in Atlanta it is just under an hour[2]. A study was done a few years ago to examine the correlation between the availability of public transit and commuting time/traffic on roads/traveling delays. While the employees of the L.A. public transit system were on strike in 2003 statistics were gathered and data was collected about its effect on traffic. During the 35 day strike, the average delay on freeways that paralleled the train system tracks increased by 90 percent while freeways that did not parallel increased by 29 percent. An increase of traffic by 123 percent occurred during peak morning hours and there was a general increase of 50 percent of the original traffic due to inability to access local public transit[3]. Quantitatively, as these ridership statistics show, public transit systems are crucial to the flow of traffic in big cities. This data also confirms that ridership numbers in Atlanta are low in comparison to other metropolitan areas, which puts "The Capital of the South" at a huge disadvantage with respect to its growth. At the same time, qualitatively, the public image of MARTA is one of distrust, disdain, and disgust which is why ridership is so low. Aspects that riders are concerned about include the cleanliness, customer service, and safety of the system as a whole[4]. However, safety is a factor which the public consistently misperceives.

Compared to other transportation systems, MARTA is notorious for being unsafe. However, Washington DC has a similar system of heavy rail and buses and actually has a crime rate higher than MARTA's; 4.14 crimes per million rides compared to MARTA's 3.09 crimes per million rides[5]. This is evidence of the public's poor perception of the true safety of MARTA and is one of the reasons why MARTA has failed to improve efficiency and expand further throughout Georgia. Furthermore, MARTA has had a campaign recently to improve its safety. They have added cameras to all of the trains as a deterrent and investigative tool[6]. However, lack of accessible and visible safety personnel

and positive and appropriate publicity has hindered customer willingness to utilize these services.

Recent polls have discovered that people who ride MARTA may have a more closely related connection to the city of Atlanta than non-riders. "The poll found that 51 percent of MARTA riders said they had a strong connection to the Atlanta region, versus 23 percent of nonriders." According to the poll, many people who rode MARTA frequently felt like they were more closely connected to the city life and atmosphere of downtown. Citizens of the city having a more personalized and deeper connection with the city and it's other members is extremely important to the growth of the city and the future development and improvement of the city. The stakeholders of this problem area are not only citizens of the area but the companies in the city, the commuters, tourists[11].

"MARTA is more than "just" a transit system; it provides economic benefits to every corner of the state. In a study conducted by the University of Georgia's Carl Vinson Institute, it is estimated that MARTA is responsible for about $2.6 billion in economic activity every year and supports roughly 24,000 jobs in the metro Atlanta region that it serves and across Georgia play no small part in the future[12]!"

Originally, in 1965, the Georgia General Assembly voted to create MARTA in five different counties, Clayton, Cobb DeKalb, Fulton, and Gwinnett. Voters in Cobb County, initially voted it down and then eventually, members of Clayton and Gwinnett counties voted it down due to their lack of enthusiasm to fund the project through property taxes[13].

Since then, several proposals have been tried and attempted in order to improve the system and make it have a greater impact. For example, Mayor Sam Massell tried to create a continuous subsidy through a sales tax implemented in Fulton and DeKalb counties, along with the city of Atlanta. Due to political reasons and tension the plan did not work out completely. A huge factor of many of the failed plans was the issue of race and the segregation that was present in the city during these crucial years of development of the transportation system. To this day the race issue seems to still be an underlying, yet crucial, factor that contributes to to the lack of success and expansion of the system. Recently, MARTA has tried a few things to improve what they have by trying to create a better police/security presence, producing radio ads telling passengers and target audience members about what changes they are making, and trying to adjust prices to the right level. All of these recent changes have made a difference but could be utilized much more efficiently and effectively than they currently are.

Literature also supports the theory that architecture affects mood, perception of businesses, and even how safe people feel. Beauty alters our mood, and beautiful architecture will affect the moods of onlookers[14]. The dank and oppressive structures of MARTA may be doing a lot to depress rider because as beauty improves moods, so does ugly buildings hurt perceptions[14]. Some aspects of architecture that helps to improve perception especially the perception of safety include the presence of natural light for

natural surveillance [15]. Changing some architecture of stations by adding natural light may improve mood and perception of safety.

As evidenced, there are several factors that lead to MARTA not being successful at the polls, so it cannot get the monetary support or political support it needs to extend farther. Extending MARTA farther would increase ridership and increase revenues for MARTA. Georgia's legislative system regulates the expansion of MARTA on a per-county basis. In order to get all desired counties on the same page, MARTA must improve its image. The heart of the problem is the issue of Atlanta citizens mistrusting the safety and reason to use the public transportation that is available. Without a good public appeal, no expansion is possible and without expansion, the potential of MARTA will never be fulfilled. If used correctly, MARTA could benefit the city in several ways: shorter commute times for downtown workers, increased revenue, easier tourist navigation, better promotion for major events, overall improved image of city, and decreased environmental impact of commuters[7].

Goal Statement:

The scope is the Metropolitan Atlanta Rapid Transit Authority (MARTA) and its ridership, and our goal is to increase the ridership by improving the overall image through station improvement by private companies. The rationale for the approach is that while MARTA has lower crime rates than other, more successful transit systems, the targeted ridership views it as "unsafe" due to the overall conditions of the station.have much higher average public transit ridership. Average daily ridership in Atlanta is only 52% of San Francisco's, 41% of Boston's, and 24% of Washington D.C.'s [1]. MARTA is notorious for being unsafe. Washington DC has a similar system of heavy rail and buses and actually has a crime rate higher than MARTA's; 4.14 crimes per million rides compared to MARTA's 3.09 crimes per million rides [5]. This lack of efficiency and ill utilization of resources shows us an area that hurts MARTA and should be a long term goal to fix [9]. By cleaning up the stations and improving the image, we expect that ridership will increase, potentially leading to reduced prices and an expanded system.

Objectives:

Adopt a Station:Tech edition

- Once MARTA is behind the idea of Adopt a Station, we hope to encourage Tech to become one of the first sponsors. A Tech station would allow great publicity for MARTA as well as helping thousands of students and faculty at Tech get to school/work on a daily basis. Price is a deterrent for riding MARTA for many Tech students and faculty who are strapped for cash because it does not work well enough to be worth the money. Giving subsidized prices to Tech would follow with a huge influx of support from the campus because it would be worth the cost [10]. Using Tech as a hypothetical model would allow MARTA and other companies to see potential.
- Steps.

        - Look at making a model of Midtown MARTA station. See what changes could be made by Tech
        - Midtown is the best fit for Tech, so we would need to look at what should be changed, what should stay the same, and lay the framework for how station adoption will work.
        - Make a model of what the station would look like. (either digital or physical)
        - Do a mock up of any pricing, costs, benefits, timelines for process. maybe do possible models of stages of the process
        - Put together a presentation of what the process would look like, using model and hypothetical figures.
    - potential problems:
        - How real can we make a model?
        - Do we know how to handle software/materials to make a substantial model.
        - Our mock-up may not be realistic at all, how do we cope with poor estimation? What is reasonable estimation?

MARTA/GTransit Merger:

- Our group will meet with marketing and potentially the board of directors at MARTA to present our "Adopt a Station" idea. Initial presentation will take place in face to face meetings where the outline of the overarching project may fill out with more exact details based on what MARTA really needs and what they can bring to the tables for potential investing companies. This objective is important because MARTA needs to be onboard, excited by, and invested in any changes that are going to made to help bring the company more support. Perception is the biggest thing working against MARTA today, and we want to combat this unneeded negative perception with a facelift of the stations themselves [4]. MARTA will hopefully see the potential of our idea to boost support of their company and will work with us to adapt the solution to the real world.
- steps:
    - outline idea: cement our idea enough to come to the company with a fully developed idea so no one's time is wasted.
    - Schedule Meeting: get in contact with MARTA's marketing team as well as other contacts to present our idea for improving MARTA's image.
    - Present Idea: come as a group to a meeting where we unveil our big idea.
    - Compromise, Edit, Confirm: Work with MARTA on the idea. Understanding what practical steps need to be taken to actually put this idea in place.
    - Present Idea at Board of Directors Meeting: Revised idea will be presented at the meeting. Approval should be obtain to move forward with the process
- potential problems:
    - What compromises need to be made?

        - Is this even a feasible solution?
        - Will MARTA meet with us?
        - what will change? what will be the same?
        - April 9: 1:30--Board of Directors meeting, present idea??
        - What if they don't like it? How much are we willing to change?

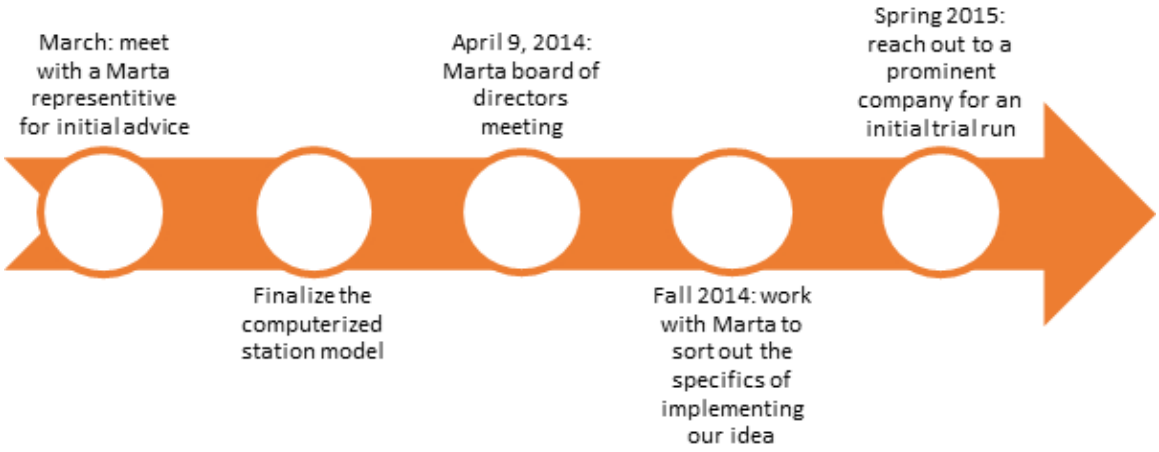
Implementation/Expansion:

- Businesses need to support MARTA for the public to perceive it in a better light. Looking for company sponsorship of stations allows a company to benefit from advertising as well as subsidized rides for its employees. Getting companies interested gets the public interested in MARTA as a viable and serious transportation option in Atlanta. More business people on trains makes the stations perceived as safer and will improve overall perception of MARTA for the public [9]. Businesses will invest in infrastructure because it is the foundation of the city they are based in and it is correlated with success in the city as a whole [10]. As an effort to improve infrastructure as well as advertise for themselves, companies will jump onboard to the "Adopt a Station" plan.
- steps:
    - Model: use GT station as a model for pitching to other companies
    - The Pitch: schedule meetings with major companies and interested parties to pitch our idea.
    - Gauge interest: See where interest lies, decide whether benefits fit costs
    - Make Deals: see what companies fit best with what stations. Sign companies to stations and start the adoption process.
    - Here is where we anticipate the most problems.
    - If MARTA turns down our offer or does not meet with us then we will initially work with other professionals to revise our plan and attempt to present it again. If the revision fails we will move on to our back-up solutions in order to try to carry out our goal.
- problems
    - What if they don't like it?
    - What kind of compromise are we willing to make with individual companies?
    - How do we keep MARTA from losing control?
    - How much control does each party need?

Research Team:

As far as our team goes, we are diverse in our skillsets and our majors all enable us to have a sense of expertise in one angle or another of our project in some way, shape, or form. Our handle on the financial and technological aspects of this project is cohesive with our group's talent in the industrial and logistical backgrounds. The additional help we would require would come from a few extra necessary positions that can effectively cater to the needs of the process that cannot be fulfilled by our original group. We would require the assistance of a data analyst of past and current company advertising so that we can see if their budgets and local prominence are at levels that are capable of supporting

the need of such a big step in advertising. We will require a survey coordinator who will gather data from different companies and MARTA customers to see what their ideas and concerns are about our idea. We would need a statistician to see how the data derived from our surveys and meetings would translate to numbers used during our implementation process. As individuals with different mindsets but similar backgrounds with regards to intelligence, our group will want to reduce friction by instating a project manager to oversee the ongoing operations and ensure that no unnecessary conflicts barricade us from our ultimate goals.



Budget:

As for as spending money our project goes, our group's objectives require us riding the trains to analyze the pros and cons that we can base our renovation off of. This observational portion of our research would require at least ten trips per group

member at a rate of 25 dollars per group member. Additional costs of 200 dollars will be put towards creating a visual model of what a potential station may appear like after completion. This money will also be allotted to any promotional pamphlets, signs, and posters that our team may wish to create in order to better carry our point across and look more professional in the eyes of sponsors and customers. The ideal budget for the implementation of our project after our proposal is complete is dependent more so on our research and development than any tangible asset or product purchase. We would need a team of researchers whose sole purpose is to determine the best stations to begin our revamping with. They would be looking into the most appealing station for each respective company and how much the cost of improvement would be based on station size and how much the adopting company would want to establish their presence in terms of new infrastructure. Staffing experts to tackle the economic, environmental, corporate, and governmental restrictions and repercussions to this project will utilize the majority of our budget. We would need to market ourselves to companies and organizations in a way that grasps their attention and makes them want to invest. They are probably inclined to stray away from poor pitching and lack of defined organizational skills. We would need one individual to take over the advertising wing of our idea, thereby lengthening our chances of striking sponsors as legitimate and appeal to their sense of customer satisfaction. This recruit would be responsible for adding the dimension of visually aesthetic elements such as presentations that stick, models that show our areas of focus, and most importantly, give them tangible evidence of why the station's transformation would not only benefit their company but would simultaneously improve ridership thereby benefiting society as a whole.

Expected Outcome:

In two years' time we would like to have several companies involved in our program, with more applications coming in. If this works well, the commercial powers of Atlanta will have a much greater stake in the success of Marta's system, and related businessmen will likely compose a greater percentage of ridership. The station improvements will start to bolster the overall image of the system, and Marta will be one step closer to expanding into the outlying counties. At this point, if we are confident that our idea will remain profitable for all involved parties, we will probably let Marta take control of running the program. However, the lessons we learn from the initial implementation of our project may be useful to other mass transit systems. If we wish to continue at this point, we would likely seek funding as a private company. In doing this, we would partner with other transportation companies and use our experiences in Atlanta to improve their systems.

However, It is also entirely possible that this idea, with its large scale and dependence on MARTA's cooperation, may fail at innumerable points along the way. Although we've outlined ways we will try to circumvent these problems before they arise, we understand that some issues are out of our control due to working with a private company. In such case, We have two alternative ideas that we would pursue. The first involves working with Midtown Alliance to bring in artists and community groups to come in and decorate stations in order to create a more welcoming and appealing environment. This MARTA art festival of sorts would provide a way for the community

to become invested and supportive of MARTA as well as allow for the beautification of the stations. An additional plan of action is one that would work more with fixing the efficiency of the MARTA system. We would focus more on the logistics side, trying to minimize the average wait time for both trains and buses and also making connections between trains and buses quicker. These are two additional ideas we believe to be entirely plausible and are ready to pursue if our first idea fails.

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