



**Approved Minutes**  
**Citizens League Transit Study Committee**  
Thursday November 3rd 7:30am-9:30am  
St. Mary's Greek Orthodox Church  
3450 Irving Ave S, Minneapolis, MN 55408

**Committee Members Present:** Chair Peter Bell, Vice Chair Ann Lenczewski, Mr. Bill Blazar, Mr. Patrick Born, Mr. James Erkel, Mr. Ethan Fawley, Ms. Elizabeth Glidden, Ms. Mary Liz Holberg, Mr. Scott McBride, Mr. Jim McDonough, Mr. Peter McLaughlin, Ms. Kenya McKnight Ahad, Mr. Andrew Richter, Mr. William Schreiber, Ms. Nancy Tyra-Lukens, Mr. Vayong Moua, Ms. Mary Giuliani Stephens, and Ms. Patty Thorsen

**Members not present:** Mr. Abou Amara and Mr. Michael Beard

**Staff & staff support present:** Pahoua Hoffman, Consultant Katie Hatt, Policy Fellow Matt Byrne, Intern Caroline da Silva Barbosa.

**Citizens League members:** Bill Dooley, Bob Carney, Peter Wagenius, Matt Burress, and Patty Nauman.

**Proposed outcomes for this meeting**

- State study committee charge and proposed goals.
- Approve minutes from previous meeting.
- Hear from presenter on autonomous vehicles and the future of transit
- Engage in discussion
- Agree on next steps

**Minutes**

Chair Bell called the meeting to order at 7:33am.

**Welcome**

Chair Bell reminded the committee of the charge.

- *Understand the current transit capital and operating funding systems.*
- *Review and consider different funding and governance models, including current models.*
- *Make recommendations based on these findings and conclusions.*

Chair Bell moved to approve minutes and asked for discussion. The minutes were moved by Nancy Tyra-Lukens and seconded by Jim McDonough. A motion to approve the minutes passed by a unanimous vote. No changes were made.

Chair Bell recalled previous presentation showing geography of current and future workforce and transit. He noted that the committee will discuss the process that is going to be used for the remainder of the meetings, and that an updated list of scenarios will be provided at the end of the meeting.

Chair Bell welcomed Dr. Fisher, Director of the Minnesota Design Center at the University of Minnesota, and thanked him for presenting.

### **Presentation on Autonomous Vehicles and the Future of Transit**

*[See corresponding PowerPoint, Attachment A]*

Dr. Fisher said that his expertise is on land use and urban design issues. He recalled that his first job was studying early auto industry and he found it interesting how quickly we went from horses to cars. Dr. Fisher noted that despite widespread belief in horses, in a very short timeframe they were banned in urban areas. Dr. Fisher argued that a similar transition is happening now with autonomous vehicles. Humans cause more than 90 percent of accidents, and technology will largely eliminate accidents. Cars were cheaper and cleaner than horses and the same is true again for cars and autonomous cars. Dr. Fisher described the vehicles as largely electric which eliminates fossil fuels, they will cost between 1/3 and 1/4 of the cost of your own vehicle. Dr. Fisher stressed that autonomous tech has existed in aerospace long time and in fact most of flight is autonomous.

Dr. Fisher described a wide range of vehicle types and dramatic changes in transit including new buses. He anticipates the autonomous economy focus will be on demand usage, and less dedicated routes.

Also intersection of drone technology for moving people around.

Dr. Fisher stressed that we need to be careful in infrastructure investments that we don't build based on past models.

Dr. Fisher showed a number slides (7-12) imagining impacts on streets.

Dr. Fisher commented that investments need to accommodate both current and future techs cost effectively. For example, lanes can be narrower. The vehicles monitor traffic to maximize efficient transport. The new space created from narrower lanes can be used for many different uses – for example environmental uses.

Dr. Fisher mentioned a few studies done in Europe showing the use of new available land. He commented that our current infrastructure is overbuilt and we cannot afford it.

Dr. Fisher showed a number of slides (14-20) illustrating potential impacts on parking. He noted that parking takes a huge percentage of land use and it could be repurposed to better uses.

Dr. Fisher explained that he anticipates phases of autonomous travel integration going from a hybrid of both personal vehicles and some personal autonomous vehicles, leading to a predominately shared autonomous vehicles via contracts with mobility services based on individual needs. This would look like an automated taxi service with little to no parking. He noted that one autonomous vehicle could replace nine personal vehicles because contracted services would know schedules and optimize for ready rides.

Dr. Fisher discussed parking ramps, emphasizing that we need to begin to design parking ramps with the understanding that they will have other uses in their lifetime. .

Dr. Fisher showed a few slides diagramming the impact on land use. Comparing the road use of a four way intersection before autonomous vehicles and after, you don't even need traffic signals because they communicate with one another.

Dr. Fisher commented that a quarter of the population lacks mobility and that autonomous vehicles has the potential to give mobility to everyone and reduces the cost.

Dr. Fisher discussed challenges he saw to automatizing travel, in particular the trend for people to pretend it is not happening or that it is too far off. Most car companies are on the timeframe of 2020 getting tech out.

Dr. Fisher discussed other economic changes that would come with the revolution, namely a change in revenue sources from parking and tickets. But also fewer traffic death resulting in lower health care costs, and lower police costs. Most accidents come from others hitting auto. Dr. Fisher noted that there are still some glitches in the autonomous technology but cars will learn.

Dr. Fisher discussed an article, No One at the Wheel from Wallstreet Journal. He reiterated the major concern of focusing too much on old technology. By 2028 this transition will already have occurred. Dr. Fisher emphasized we need to be thinking about how we plan and what the impact is for other transit. He noted that some see this technology change as an alternative to rail investments. Dr. Fisher disagreed with this assessment and argued that rail is a useful development and density tool which does a very good job of moving people. Dr. Fisher emphasized that it is important to recognize that these investments are not mutually exclusive.

Dr. Fisher commented that insurance rates will probably go up due to a lower number of people needing insurance. He anticipates that driver cars will eventually be banned. He added however that emergency vehicles will continue to need driver.

A committee member mentioned that their children's friends don't know how to drive. They argued that the price point is the important variable as Uber is already almost competing with mass transit. The member asked about the price point and the cost to maintaining roads. Dr. Fisher responded that Uber will be competitive without drivers because costs drop considerably. Dr. Fisher added that there will be changes to farming and trucking industry as well. There will likely be large job losses.

Dr. Fisher discussed road infrastructure noting we need fewer roads. He described Barcelona as an example of moving to super grids where vehicles can drop people off but take a lot of street infrastructure out. He stressed that the public sector needs to figure out job losses by investing in retraining for example.

A committee member asked why in the diagrams, there is only a need for one lane in either direction. They added that it seems you need more than one lane on residential streets still. Dr. Fisher replied that this is a good point. Additionally, there will be a point in the transition where there will be a point when there will be more cars in the road and we still need to maintain capacity as we make the transition.

A committee member asked about the implications for disabilities in the wintertime getting into vehicles. Dr. Fisher responded that a lot of the research has been in warmer climates though they are beginning to look at colder climates as well. Dr. Fisher added there will still be the need for mobility services and that google designed a vehicle that can accommodate wheelchairs easily, but snow and ice will always be an issue.

A committee member asked for references on decreasing health cost and also asked if one lane can accommodate emergency vehicles. Dr. Fisher responded that the sidewalk serves the need for emergency vehicles, and that emergency vehicles will in fact get smaller.

A committee member asked who owns and maintains the newly created space in the cities. Dr. Fisher responded that the Milwaukee Ave model has an association that maintains it. Dr. Fisher noted that we expect homeowners to mow boulevards for example, but that there will be changes. Responding to a previous question on lower health costs – showing savings due to reduced death and injury due to accidents. The committee member responded that you still end up paying for health care costs associated with aging. Dr. Fisher said that he can't speak to that issue in depth, only that autonomous driving will have dramatic reduction in death and injuries.

Chair Bell asked if the changes would cause unanticipated sprawl. Chair Bell also asked for Dr. Fisher's recommendation for the anticipated public investment in infrastructure. He emphasized getting the investment right will be huge because a lot of laws and safety standards need changing.

Dr. Fisher responded that in regards to sprawl – mobility service models for business have a distance penalty, the further out you go the less efficient the model goes so customers pay more. We are already overextended in terms of infrastructure. We can't afford our density now. If we have to put a lot of poles out to get electricity to your house you should pay more, we are currently subsidizing sprawl. The pushback will be fiscal.

Dr. Fisher added that in regards to infrastructure recommendations, he fears that we build a great 20<sup>th</sup> century system. Instead we need to incentivize local communities to be innovative and get ready for the revolution. Don't have a clear how, but we must.

Dr. Fisher responded that in regards to changes in laws a common issue is what is commonly called the trolley problem. The question is: do you risk the death of those in the trolley to avoid hitting a lower number of people on the tracks. Dr. Fisher argues that this question assumes there is agency. If you're an autonomous vehicle and kids get hit, those who get hit are at fault. Dr. Fisher agreed that there are open questions about who is at fault.

A committee member asked what the impact would be on the transit system as we know it. The member asked in particular for impacts on issues of race and poverty. Dr. Fisher responded that a recent presentation suggested that buses as we know it will disappear and will transition to an on demand system. For example, if you are willing to share with Uber – you pay much less. That same system will transition to autonomous and transit system. Mobility even may be free with advertising. Dr. Fisher added that in regards to equity issues, once it is almost free and can accommodate all kinds of abilities, the conversation changes to access. He emphasized this is truly an equity tool. The big issue as he sees it is with rural areas where density is lower and businesses won't invest as much.

A committee member commented that there has to be a desire for this technology. They asked what the supply and demand looks like. Dr. Fisher responded that there will be a few decades where there will be overlap between conventional transportation and autonomous but conventional modes will be more expensive due to insurance and other factors and will ultimately drive the economic demand.

Staff reiterated that in making recommendations it's important to keep in mind investing with flexibility for future modes of transportation. Dr. Fisher added that this was an important point. The hybrid models with private ownership and government regulation to mass transit is coming.

A committee member asked how the new system would deal with simultaneous mass transportation needs such as large sports events. Dr. Fisher responded that in that situation it would require a que of cars, and is another example of why you need rail investments.

A committee member commented that 15 years ago there were concerns that information technology would lead to sprawl when in fact, it actually lead to more collaboration. The member added that they agree that we should not build just for the sake of building. Furthermore studies show that maintenance is better for job creation than expansion. The member said that they are interested in the transition and in particular the automation of trucks. If you look at Olympic cities they helped eliminate trucks by forcing to show up at certain times. In terms of fiscal policy, you can think of travel taxes by time of day and vehicle.

Dr. Fisher commented that one strategy might be to help communities take infrastructure out. There is currently no incentive to take it out – but maybe you get the money to help transition to this new reality.

A committee member commented that the future will largely be private enterprise vehicles, but the public still has to pay for the infrastructure. The member asked what would private contribution look like in this

system. Dr. Fisher responded that a hybrid contribution model might work where private institutions may help pay for road to make sure their system works.

A committee member asked if the ultimate purpose of this system is moving people or economic development. Dr. Fisher responded that the goal is primarily density development. In other words, economic development and then moving people. The committee member replied that we've gone from moving people to abandoning that concept in favor of economic development. Dr. Fisher responded that while it is not its primary role, it will still move people for whatever purpose they have. The member asked what the definition of economic development was. Dr. Fisher responded that roughly it is densifying because people want to live and work and shop close to stations. Most of the communities are built out, and there needs to be away to increase the number of people paying taxes.

Staff clarified that while the primary purpose is economic development based on what was just said, it is unclear whether that includes getting workers to jobs.

A committee member commented that if the purpose of transit is not for getting people to their job then what is the primary strategy for getting people to their jobs.

A committee member argued that the investment is not mutually exclusive in its impact on economic development and moving people around. You have multiple impacts from the investment. A committee member responded that the most important of the two is going to draw the strategy and that it is either going to emphasize moving people or economic development. A committee member responded that do both by drawing jobs to communities that need jobs and connects those people to the jobs. A committee member responded that if you did that, for example, how many people are going to take the University Ave line to Egan Prairie to work.

A committee member commented that this point may be mostly semantics because the architect is saying the purpose is density, but density connects jobs. A committee member replied that if someone lives in south Minneapolis and has a job in Dakota County it's going to take two hours to get there and won't be worth it. If the goal is economic development we will build things like University Line which takes forever and doesn't decrease the travel to the job which is unacceptable.

A committee member responded that they believe it does decrease travel to the job, for example it only takes 31 minutes to get from the Government Center to the Capital.

A committee member added that to play this scenario out given future autonomous changes, a line like the University Ave Line actually gets more efficient.

Chair Bell asked if it's possible to get the same level of economic development at lower costs without building the line. He added that during his time as Chair of the Met Council the most controversial word was extensive. Chair Bell commented that in terms of political minefields, rural Minnesota will not like the cost additions to the, they will say they are being penalized for making a lifestyle choice and it is social engineering Political dynamics could impede this vision.

Dr. Fisher responded that it is an issue. Rural Minnesota can get angry at Ford and GM for not investing and we may end up subsidizing the services to make them available. We build limited access highways- which is essentially the same idea. You can only get off at certain places which ends up concentrating where economic development happens. Dr. Fisher emphasized that he doesn't think the economic development question is either or. It will attract jobs, increase density, increase affordability, and achieve other social goals like safe streets. The only way you achieve this is by growing the tax base.

A committee member commented that in regards to what we build in the meantime, if you look at our long range plan, there's not a lot of capacity building. The plan is really preservation based. Should a stimulus bill come out of Federal Government, or state government, MnDOT plan is that in metro area some capacity building could happen but would be dedicated to MnPASS lanes and small bottleneck

improvements. That plan is not well received at the legislature, and then the legislature asks for capacity building out state, and the bill comes back prescriptive, saying preservation is not enough. MnPASS investments transition well to this vision. The member added that the Orange Line would be a great spot for automated buses to develop as a pilot.

A committee member question asked whether or not there is an inaccurate assumption that we will need the trunk lines as a part of our system given the autonomous changes. Dr. Fisher responded the autonomous system will likely feed into trunk lines. We don't want every office workers coming in at the same time through autonomous vehicles. The system will prefer trunk lines.

A committee member commented that in regards to the economic development vs moving people question, when investing they can't pick between either of them, they look for both.

A committee member asked that if the system might be free, is there an integrated way for paying for both cars and other transit system, because it is important for access. The member also asked what the development of job markets look like because there will be a lot of loss of jobs. Dr. Fisher responded that it's possible that we will move to single payer mobility contract where you will have access to the whole integrated system. In regards to job markets, the private sector will make sure that happens. He also noted that the green economy creates more jobs.

A committee member responded that they are also thinking about skill development. Dr. Fisher agreed that this was important.

Chair Bell thanked presenter and reiterated how useful it is to be able to look into the future to make the best funding recommendations based on what is coming.

Chair Bell gave a brief update on where the committee was in the process. He noted that there have been options added, edited, and combined. He reiterated that it is still not too late for more options to be added. Chair Bell added that there was a helpful suggestion last meeting that we do a test vote immediately after the election. There was also an interest in a crude estimate of the political viability of some of these ideas. The political viability of options will be influenced by the election.

Chair Bell explained that on the day after the election the committee will use a survey monkey on the scenarios that we have. We are still planning giving members 10 votes, using a 6-2-2 format, requiring voting for three scenarios.

A committee member asked if we will get presentations on these options generally. The member expressed interest in property tax opportunities in particular. Chair Bell responded that after the initial vote, the committee will spend two sessions hearing from options. The presentations will be 5-10 minutes on viable options including a Q/A.

A committee member asked for clarification that the committee is dealing with finance first and then moving on to governance questions. Chair Bell responded that the committee isn't going to focus on governance. Given our timeframe, we have enough time to work towards a consensus on tiered funding structures that would be valuable input for legislature and the public. We may recommend that the Citizens League has a phase two to get into other questions such as governance. If we start going into governance questions we will get into issues we haven't had time to fully explore.

Staff commented that hybrid options may emerge from such a process. They added that framing questions for next processes are useful.

A committee member asked if there are condensed versions of the options.

Chair Bell responded that the survey monkey will list all of the options. It won't be a final list but hopefully there won't be any surprises either.

A committee member asked if options are grouped according to what each scenario funds. Chair Bell responded that this is a good point that needs further consideration. For example, if someone said we want to continue current funding but with a lower priority of funding for Met Council, you can't do both.

A committee member asked at what point we draw individual options into packages for votes.

Chair Bell commented that we may keep the list the same but increase the number of votes people have and maybe have 4-4-2 structure instead.

A committee member responded that they hope that if they have a strong opinion on an option they may be able to combine 4-4 into one option.

Vice Chair Lenczewski commented that due to the calendar and number of meetings left, we need to take a vote quickly that can frame our future process.

Chair Bell said that next week the committee will have the preliminary vote and start wrestling with the process questions.

A committee member commented that they agree with early vote but that a package needs to be put together.

A committee member asked when the survey monkey vote is. Chair Bell responded that it will be sent out after election. Chair Bell added that turnaround time will be quick, perhaps Tuesday before meeting Thursday.

Staff asked if we should wait until after the first vote for combining or adding. Chair Bell responded that his bias is to use the first vote to cull before combining and adding.

A committee member commented that they want to maximize the information that has been presented to us throughout the meetings and wondered if there's a way to show how each presentation lines up with recommendations. The presentations showed benefits and key principles and to see how they line up with options would be useful. Chair Bell responded that it wouldn't be possible for the initial vote, but close to that will be used before the second vote. Chair Bell added that he wants to bring the structure of the report which will have a summation of the presentations.

A committee member asked if they could see the format of the questions and scenarios before Tuesday.

Vice Chair Lenczewski took the evaluations as follows:

5, 5, 4, 4, 4.5, 4, 5, 4, 3, 4.5, 4.5, 4, 4, 4.5, 3.5, 4, 4.5, 4.5, and 4 for an average of 4.47.

