

January 20, 2011

## Freedom & Transportation: Defending Real Choice for Travelers

Since the rapid rise of the automobile culture in America, passenger rail has been the subject of an ongoing argument over its continued role in the U.S. transportation network. Are trains a vital transportation choice in maintaining healthy connections between cities and communities, or an obsolete people-moving technology? Passenger trains have managed to survive the fluctuations in public support created by this debate, and entered the  $21^{\rm st}$  century as a significant travel choice that tens of millions of Americans choose every year.

Recent attacks on passenger rail investment in the U.S.—and, indeed, large infrastructure investments in general—have taken a disturbing tone, however. Many attacks on proposed service have not focused so much on the cost versus the benefits of a route, or the underlying strength of the proposal (ridership projections, access to feeder-networks, or ticket revenue forecasts). Rather, these critics have asserted that any new train service is a bad investment.

The idea that any new transportation project that requires ongoing public support is a misuse of government funds seems to be predicated on a few key fallacies: about how roads are planned and paid for, how the benefits of transportation investment should be measured, and the government's decision making process (both past and present).

By correcting these mistaken premises about transportation investment, advocates of smart development can create an environment where discussion takes place over the proper direction and levels of investment for a balanced, multi-modal transportation system—not if such a thing is even possible.

## Allocating costs: direct and external

The biggest fallacy touted by anti-transit, anti-passenger rail forces is that roads pay for themselves. Groups like the Cato Institute have caught the attention of some legislators by promoting the idea that hard transportation spending decisions can be side-stepped by building more highways and roads—relying on existing user fees to pay for this construction.

This blind spot about the true cost of roads has developed, in large part, through a failure to recognize when a state accepts federal capital funds for roads, they are agreeing to the annual cost of on-going maintenance to an expanded road network. The most recent

Federal Highway Administration (FHWA) data from 2008 shows that only 51% of highway costs are covered by user-fees<sup>1</sup> (which include gas taxes, road tolls, and vehicle registration fees). In fact, the Highway Trust Fund—the recipient fund for highway user fees—has been in serious financial trouble for the last decade. Since 2008, the Highway Trust Fund has needed \$34.5 billion in transfers from the Treasury to stay solvent. This deficit is due to a combination of declining vehicle miles traveled, decreased fuel tax revenues as consumers move to more fuel-efficient vehicles that use less gasoline, and a lack of sufficient political will to raise the gasoline tax (unchanged since 1991).

Compare that to Amtrak, which recovers around 75% of its operating costs from generated revenues<sup>2</sup>. Or U.S. commuter rail, which—on average, nationwide–covers 53% of it's operating costs through the fare box, according to data from the Federal Transit Administration. The relative<sup>3</sup> outlays are in fact equivalent for roads, transit, and passenger rail.

And the picture comes into sharper focus when the external costs of overreliance on roads are taken into account. Congestion is clogging U.S. roadways, costing American drivers and businesses more than \$78 billion annually. Each year, accidents and traffic delays cost Americans more than \$365 billion a year; \$1,200 for every single person in the U.S. Without public transportation, that number would increase by \$13.7 billion every year<sup>4</sup>.

Greater than the financial cost, there is the toll in human life. 42,500 Americans are killed every year in automobile accidents, and almost 2.5 million people injured<sup>5</sup>. Compare that to passenger rail (Amtrak and commuter rail), which the over the last 10 years has averaged only 8.1 deaths per year.<sup>6</sup>

Harder to precisely calculate—though significant, nonetheless—are the energy and environmental costs of U.S. overreliance on automobiles and airlines. Amtrak is 30.2% more energy efficient than cars, and 19.9% more efficient than air travel (BTU expended per passenger piles)<sup>7</sup>. Commuter rail is 22.7% more energy efficient than cars, and 11.3% more efficient than air travel<sup>8</sup>. By failing to invest in energy efficient transportation, the U.S. has allowed itself to become enthralled to foreign sources of oil. America sends over \$700 billion in U.S. currency abroad every single year to import the foreign oil needed to support this road dependency. That \$700 billion represents approximately 80% of our nation's trade deficit—and it is a balance that is rising.

\_

<sup>&</sup>lt;sup>1</sup> Lind, William S. "Conservatives should like rail". Milwaukee Journal Sentinel; Nov. 10, 2010.

<sup>&</sup>lt;sup>2</sup> National Passenger Rail Corporation. Strategic Guidance: October 2009.

<sup>&</sup>lt;sup>3</sup> Relative, as in opposition to absolute, since the amount spent on highways is much greater than passenger rail and transit

<sup>&</sup>lt;sup>4</sup> Lomax, Tim & Schrank, David; Texas Transportation Institute. 2007 Urban Mobility Report. Texas A&M, 2007.

<sup>&</sup>lt;sup>5</sup> US Department of Transportation, Bureau of Transportation Statistics. "Injured Persons by Transportation Mode: 1990–2006."

<sup>&</sup>lt;sup>6</sup> US Department of Transportation, Bureau of Transportation Statistics. "Injured Persons by Transportation Mode: 1990–2006."

Oakridge National Laboratory. Transportation Energy Data Book: Edition 29—2010.

<sup>&</sup>lt;sup>8</sup>Oakridge National Laboratory. *Transportation Energy Data Book: Edition 29*—2010.

Public transportation saves 4.2 billion gallons of gasoline every year—more than three times the amount that the U.S. imports from Kuwait<sup>9</sup>. Burning all this oil erodes air and water quality, harming the environmental legacy Americans look to pass on to their children.

These costs are all inputs that should be accounted for when totaling up what, precisely, the taxpayer gets for their money. Investing in passenger trains and public transit is comparable to highways strictly in terms of the ratio of government outlay to revenue. More than that, however, a diverse transportation system helps ameliorate these other associated costs, to create a safer, cleaner, and more efficient national network.

## Measuring Benefits: Direct, Secondary, and Tertiary

The second mistake critics of passenger rail and public usually make is using too narrow a scope to measure the benefits created by investing in transportation infrastructure. Measuring only how much additional passenger or freight capacity a new project will create ignores that we build transportation to enhance people's lives and support businesses, not conform our lives and businesses to fit transportation projects. By expanding the benefit metrics to include the impact of projects on peoples' lives, it becomes clear how necessary trains and public transit are to keep Americans and American business moving.

The biggest indirect benefit (that is, the gain separate from the transportation alternative it would provide to travelers) to implementing a national high- and higher-speed intercity passenger rail program would be the jobs it creates. Passenger and freight rail currently accounts for more than 300,000 jobs in America, and public transportation employs more than 380,000 people—good-paying, trained jobs that cannot be sent overseas <sup>10</sup>. And a study done by the U.S. Department of Commerce estimates that for every \$1 billion invested in rail, 20,000 jobs are directly created. A similar study showed that every \$1 billion invested in public transportation creates and supports 36,000 jobs <sup>11</sup>.

A true modernization, moreover, could revive the domestic passenger train industry—most significantly, through adding demand for passenger rail cars and locomotive manufacturing. Economic analysts predict that the FRA's vision for high-speed rail could create as many as 1.6 million construction and manufacturing jobs in total<sup>12</sup>.

-

<sup>&</sup>lt;sup>9</sup> American Public Transportation Association. Benefits of Public Transportation. American Public Transportation Association, 2010. Available:

<sup>&</sup>lt;a href="http://www.apta.com/mediacenter/ptbenefits/Pages/default.aspx">http://www.apta.com/mediacenter/ptbenefits/Pages/default.aspx</a>

<sup>&</sup>lt;sup>10</sup> OneRail. *OneRail Brochure*. OneRail, 2009. Available:

<sup>&</sup>lt;a href="http://onerail.org/sites/onerail.org/files/collatera/documents/onerail-brochure-web.pdf">http://onerail.org/sites/onerail.org/files/collatera/documents/onerail-brochure-web.pdf</a>.

<sup>&</sup>lt;sup>11</sup> American Public Transportation Association. Benefits of Public Transportation. American Public Transportation Association, 2010. Available:

<sup>&</sup>lt;a href="http://www.apta.com/mediacenter/ptbenefits/Pages/default.aspx">http://www.apta.com/mediacenter/ptbenefits/Pages/default.aspx</a>

<sup>&</sup>lt;sup>12</sup> OneRail. *OneRail Brochure*. OneRail, 2009. Available:

<sup>&</sup>lt;a href="http://onerail.org/sites/onerail.org/files/collatera/documents/onerail-brochure-web.pdf">http://onerail.org/sites/onerail.org/files/collatera/documents/onerail-brochure-web.pdf</a>.

Another argument that supporters of road-only transportation policies tend to rely on is pointing to the high cost of trains and transit, versus the low ridership. The evidence for the equivalency of the subsidy ratios between highways and passenger rail has already been presented. There is, however, another aspect to this story—the individual savings that passenger trains and public transit provide.

The average U.S. household spends 18% of their collective income on transportation. Of that money, 94% on average is expended buying, maintaining, and operating cars—the single largest financial obligation after housing. Public transit, by allowing people to drive 4,400 fewer miles on average, saves families that are likely to use it on a given day \$9,000 annually<sup>13</sup>. Compare that \$9,000 savings to the yearly operating cost of \$7.5 million that the Wisconsin Department of Transportation had projected for the planned Chicago-Madison-Milwaukee train—the reason that Wisconsin Governor-Elect Scott Walker gave for killing the project. That operating fee would have broken down to about \$1.33 for each Wisconsin resident, per year.

There is, additionally, the economic growth and development that naturally occurs around transportation nodes. People want to have access to transportation options; train stations and intermodal transportation hubs allow real-estate developers to invest in new residences, confident that there will be a market. Businesses are created and expanded to serve the communities that align around these transportation hubs. While the Federal Transit Administration has done a number of studies on the benefits of public transportation (to both urban and rural communities), the measurement of this economic impact is complex. That doesn't mean that the economic and quality-of-life benefits should not be part of the debate. Livability, though hard to explain to the public in the planning stages, will be what the public most tangibly experiences upon the completion of any transportation project.

Finally, restoring a measure of balance would also provide much needed flexibility in the U.S. transportation grid. Trains help the U.S. better prepare for disasters; the only way in and out of New York City immediately after 9/11 were the train tunnels under the Hudson River. Transportation choice gives the public protection from ever-increasing gas prices, which can be driven suddenly higher by international forces over which Americans have little control.

## The planning principle

Perhaps the most insidious argument put forth by the roads-only group is the idea that a high- and higher-speed intercity passenger rail network should not be developed because government is incapable of *any* sound planning on a large scale. It is this thinking that attaches the label "boondoggle" to every project of any significant cost.

<sup>&</sup>lt;sup>13</sup> American Public Transportation Association. Benefits of Public Transportation. American Public Transportation Association, 2010. Available:

<sup>&</sup>lt;a href="http://www.apta.com/mediacenter/ptbenefits/Pages/default.aspx">http://www.apta.com/mediacenter/ptbenefits/Pages/default.aspx</a>

Ironically, it is the very long-term ambition by policy makers derided by road-only advocates which created the interstate highway system in the first place. Though it is sometimes touted as a product of the free market, the modern highway system as we know it was shaped largely by President Dwight Eisenhower's Federal-Aid Highway Act of 1956. And this massive network began humbly enough, with a stretch of road outside of Topeka in St. Charles County, Missouri. It is easy to speculate how this modest start to the grandiosely titled "National Interstate and Defense Highways Program" would have been attacked by current anti-rail commentators as another instance of government pork gone awry. It was only after decades of hard work to bring the plan to fruition that it became obvious how vital the highway system could be for the country and the economy.

This is one challenge that advocates of developing a modern passenger rail network in the U.S. have yet to solve: how to express the eventual form the high- and higher-speed system will take to the public, without raising expectations so high that the intermediary steps, necessary to achieve that system, seem like a failure.

The environmental and livability benefits have, for the most part, swayed American liberals on the desirability of passenger trains. So the answer to the above problem may lie in making a case that appeals to conservatives: trains and public transit are about providing travelers choice. Only when real choices exist is it possible to let consumer activity in the transportation market help direct future investment. And there is a growing body of evidence that Americans are choosing trains and public transit in ever greater numbers. According to the Bureau of Transportation Statistics, between 1995 and 2009, when the U.S. population increased by 15%:

- Amtrak ridership grew 32%;
- Commuter rail ridership grew 28%;
- Public transportation ridership increased by 31%
- Use of the nation's highways grew by 21%.

Train and transit advocates must point to the fact that Americans will choose trains and public transit, even in the absence of European-style high-speed service. Travelers want a reliable, easy way to get around. All that requires is frequent service with good on-time performance—not necessarily 200 mph top speeds.

So while effective policy making is about enabling people access to choice, it seems that American policy makers have gotten myopic the role they play in enabling these choices. The boom in automobile use necessarily led to more roads and highways; but at some point legislators forgot that this growth didn't occur in a vacuum, and their road legislation played a key role part in encouraging it.

Returning balance to the U.S. transportation network means investing in the modes we've neglected, like passenger trains and transit. Not just for the benefits specific to passenger trains. By balancing investment in infrastructure, we can develop a clearer understanding of the role government plays in directing the movement of people and goods, and move away from a view of roads and highways as a natural extension of the free market. By

restoring public trust in the effectiveness of long-term planning and investment, the U.S. can again engage in the kind of public works that will last for generations, and stop merely living off what our grandfathers built. The costs of turning away from ambitious, long-term infrastructure investment are real, and they are high. And they are real for all facets of the U.S.'s transportation network, highways as well as trains and transit.