

INDIANAPOLICY



R E V I E W

Backgrounder: Dedicated Bus Lanes Are a Bust

Randal O'Toole

February 25, 2016

IndyGo's \$96-million Red Line rapid-transit line is supposed to improve mobility and provide more sustainable transportation. In fact, it will do the opposite of both.

The Indianapolis agency wants to turn street space now used by cars, trucks and buses into exclusive bus lanes that will be empty more than 90 percent of the time. The few people who ride the buses would go a little faster while far more people who continue to drive would face more congestion. This would reduce mobility, not increase it.

The exclusive bus lanes are supposed to increase speeds, but IndyGo calculates Red Line buses will average just 18.3 miles per hour. Since the average speed of cars in Indianapolis is nearly 34 miles per hour, an 18-mph bus is hardly going to make many people abandon their sedans and sports-utility vehicles.

In 2014, IndyGo buses carried an average of 5.7 passengers over the course of a day (that is, passenger miles divided by vehicle revenue miles was 5.7). Red Line planners optimistically predict Red Line buses will carry an average of about 15 passengers (two-thirds of whom would have been on a bus anyway).

There may be more during rush hour and fewer during off-peak hours, but even during the rush hour all the passengers should comfortably fit in a standard, 40-foot bus. Instead of using such buses, IndyGo wants to buy 120-passenger, 60-foot, battery-powered buses that cost four times as much. These buses weigh 65 percent more than a standard bus which means they take that much more energy to move.

IndyGo pretends electricity is more sustainable than diesel fuel or compressed natural gas. But Indianapolis Power & Light gets at least 90 percent of its energy from burning fossil fuels. What is more, two-thirds of the energy from fossil fuels is lost in generating and transmitting electricity.

As a result, electricity for the battery-powered buses will emit four times the greenhouse gases, per passenger mile, as standard diesel buses carrying the same number of riders. For anyone lured out of their SUV and onto a Red Line bus, IndyGo would produce twice the greenhouse gases as if that person had stayed in their single-occupancy vehicle.

The inherent problem with the Red Line plan is that it was designed more to be eligible for federal grants than to truly increase mobility and sustainable transportation. The federal grant application didn't even ask how many people IndyGo expected would ride the Red Line; instead, it was more interested in whether Indianapolis would subsidize the construction of high-density housing near Red Line stations.

Federal transit planners firmly believe such housing will lead people to drive less and ride transit more, yet this isn't likely to be true. Studies have shown that, after accounting for self-selection—that is, that people who prefer to ride transit tend to live near transit lines—people living in high-density developments are just about as likely to drive as people elsewhere.

As University of California (Irvine) economist David Brownstone concluded after reviewing numerous studies, the effect of high-density housing on people's transportation choices is "too small to be useful" in saving energy or reducing greenhouse gas emissions. If Indianapolis packs people into a travel corridor that has lost street space to dedicated bus lanes, the result will be more congestion than ever.

Indianapolis may benefit from running buses more frequently than current buses and stopping them less frequently, thus increasing their average speeds). But those buses can use lanes shared with other traffic and be powered by diesel or compressed natural gas rather than electricity. IndyGo should go back to the drawing board and write a new bus plan designed for Indianapolis residents and not for Washington, D.C. ideologues.

*Randal O'Toole is a senior fellow with the Cato Institute and author of *Gridlock: Why We're Stuck in Traffic and What to Do About It*. He wrote this for the Indiana Policy Review Foundation.*