



**NATIONAL ASSOCIATION OF
RAILROAD PASSENGERS**

TRAINS: A TRAVEL CHOICE AMERICANS WANT

Energy Efficiency: Rail travel is the most energy efficient transportation alternative

- Airlines consume 20 percent more energy per passenger mile than Amtrak; cars consume 27 percent more energy per passenger mile than Amtrak. Amtrak consumes 2,709 British Thermal Units (BTUs) per passenger-mile to airlines' 3,264, and automobiles' 3,445. The highway showing would be even worse if light trucks (two-axle four-tire), commonly used as personal vehicles, were included. (Source: Oak Ridge Laboratories, "Transportation Energy Data Book," edition 26, May 29, 2007.)
- In 2005, the 2.3 billion gallons of fuel wasted solely due to highway congestion in 85 urban areas across America were enough to fill 46 supertankers or 230,000 gasoline trucks. (Source: Texas Transportation Institute, "Urban Mobility Information: 2005 Annual Urban Mobility Report.")
- Improvements spurred by passenger rail demand have helped increase freight rail mobility. Freight rail has a fuel consumption rate 11.5 times more energy efficient than trucks, and a single intermodal freight train can take up to 280 trucks or 1,100 cars off of the highway. Without rail as an option, freight shippers would have to put 50 million additional trucks on the roadways. (Sources: U.S. Department of Energy, Energy Information Administration, "Issues in Focus", part of the Annual Energy Outlook 2007. Association of American Railroads, "Overview of U.S. Freight Railroads," January 2007.)
- Technological advances make new passenger and freight equipment more and more energy-efficient. Fuel efficiency on freight locomotives is 75% improved since 1980. At Amtrak, there is very little new equipment and none on order. Fixing this will let Amtrak further improve its fuel efficiency. But even today, thanks to improved operating practices and higher load factors, Amtrak energy efficiency is steadily improving. This enables Amtrak to exceed its commitment to reducing carbon dioxide emissions as a Chicago Climate Exchange member. The Chicago Climate Exchange is a global marketplace in which members who beat their emission reduction targets can sell credits to members who are not meeting targets. (Sources: Information on the fuel efficiency of locomotives comes from Association of American Railroads, "Overview of U.S. Freight Railroads," January 2007. Amtrak information from Energy Fact Sheet at www.amtrak.com)

- Federal officials have been calling for massive new aviation capacity in cities like New York and Chicago with intense, short-haul air traffic – by far the least energy efficient air services. These calls ignore great opportunities to develop modern rail corridors to handle that traffic more efficiently. (Sources: U.S. Department of Energy, Energy Information Administration, “Issues in Focus”, part of the Annual Energy Outlook 2007. U.S. Department of Transportation, Federal Aviation Administration, “FAA Aerospace Forecasts: Fiscal Years 2007-2020.”)