Northwestern University Transportation Center: Speaker Series Technology Adoption for Tractor Trailer Fuel Efficiency

The North American Council for Freight Efficiency (www.nacfe.org) is a non-profit dedicated to doubling the efficiency of North American goods movement. The council recently conducted a study with eight of the world's largest trucking fleets, representing 75,000 tractors and 130,000 trailers, arguably the largest-ever, fleet fuel efficiency benchmarking study. The report found that the fleets were saving on average \$4,400 per year, or \$22,000 over five years, in fuel

"Real Fleets. Real Experience."



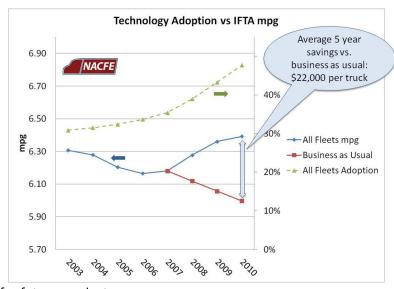
expense by employing new products and practices. It analyzed the adoption of 60 known technologies and practices available to fleets over the past eight years. Those technologies include such things as aerodynamic tractors, wide base tires, rather than doubled-up tires, automatic transmissions and anti-idling devices.

This work is important because efficiency in heavy trucks can, through a range of efficiency measures, according to RMI's *Reinventing Fire*

research, "save about a tenth of U.S. oil, help insulate the trucking industry and its customers from high oil prices, and keep the U.S. economy humming."

The NACFE study found that these fleets who adopted the efficiency tactics averaged 6.4 miles

per gallon for their trucks versus 6.0 mpg, had they done nothing. It also found that fleets continued adopting the efficiency measures even when diesel prices dropped. Participating fleets shared experience implementing the technologies and practices in managing their large fuel expenses. The study provides insights for others considering adoption of the products and practices, and gives feedback to manufacturers on customer



requirements and expectations for future products.

Mike Roeth, the organizations' Executive Director will share additional insights and ongoing work the Council is completing in this area.