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SYMPOSIUM ON MILEAGE-BASED USER FEES: TECHNOLOGY WORKSHOP

Session 2: Implementation Challenges

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"Challenges of Distance-Based Road User Charging"

The fuel tax is a dying source of revenue, as the vehicle fleet gets more fuel efficient. But there are many challenges facing MBUF development.

Public debate on MBUF has centered on technology, even though all of the pilot tests and demonstrations have shown that available technology works. The biggest issues are related to policy rather than technology. Legislators perceive that MBUF systems are too complicated, too expensive, inequitable for rural drivers, invade privacy, and that there is no business case for it. It therefore becomes important to dispel these myths and perceptions.

Myth 1: MBUF systems are expensive.

Recent work is showing that MBUF systems can be competitive with other fee systems in their administrative costs if they are designed efficiently and effectively. Following the most recent Oregon pilot program, it is now believed that with 1-4 million vehicles participating in the system, administrative costs could be lowered to about 6.7 percent. This is significantly lower than the 20-25 percent cost of administration seen in tolling systems.

Myth 2: MBUF systems penalize hybrid vehicle owners and rural drivers.

While road use fees for owners of hybrids and other high-mileage vehicles would increase significantly over the amount they pay in fuel tax, this is not the equity issue. Such vehicles impact the road system the same way as less fuel efficient vehicles, and thus it is equitable for all passenger vehicles to pay for their road use at the same rate.

With regard to inequity to rural drivers, studies show that rural residents do drive farther per trip than their urban counterparts, but they make fewer trips, and that the total of miles traveled is actually a little lower for rural drivers than for urban drivers.

Myth 3: MBUF systems invade privacy.

The Minnesota study showed that people prefer a low tech approach; primarily because they associated GPS with government monitoring. Three out of four participants in that study preferred to not have GPS included in the system at all. However, there are many ways to assess an MBUF and not all of them require GPS. The inclusion of location data is a policy decision. If traffic or congestion management is a policy goal, then location and time data is needed and GPS is among the best options. However, if the goal is to just charge for miles traveled, then there are a number of technology and non-technology options that can be utilized that would mitigate privacy concerns.

Myth 4: There is no business case for MBUF.

The decline in gasoline consumption will translate to a 37 percent drop in gas tax revenues by 2016 and a projected 60 percent decline in revenues by 2025. If MBUF were implemented in 2016, a 100 percent increase over the projected fuel tax revenue could be realized, with a 300 percent increase by 2025.