

SAFE OPERATING PROCEDURES FOR ALTERNATIVE FUEL BUSES

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ABSTRACT

Alternative fuels are used by transit agencies across the United States, and will become part of the operations of many more transit agencies in coming years. Driven by considerations such as air quality and energy diversification, various mandates and incentives have been created that will lead to the use of alternative fuels for transit applications. The Clean Air Act Amendments of 1990, for example, provide for aggressive improvements in transit bus emissions beginning in 1994. Many state and local agencies are enacting or considering various measures that will either require or provide incentives for the use of alternative fuels in vehicles, including transit buses.

Unlike conventional diesel and gasoline fuel, some aspects of alternative fuel handling and use are not yet covered by regulations, standards, or even accepted practice. While alternative fuels such as compressed natural gas (CNG), liquefied natural gas (LNG), liquefied petroleum gases (LPG), methanol, and ethanol have been demonstrated at the prototype level at several transit locations nationwide in recent years, most transit operations remain unfamiliar with the specific techniques and practices needed for safe vehicle operation, maintenance, and refueling. Education and training of transit managers and operations staff are vital to ensure that the appropriate practices are identified, understood, adopted, and executed.

The complete report on topic is presented in Transit Cooperative Research Program Synthesis 1, "Safe Operating Procedures for Alternative Fuel Buses," 1993, Transportation Research Board, Washington, D.C.