



1 SCOPE

This specification supplements the series of specifications for: Automobiles, passenger, 4-door; Truck, pickup body, 4x2 and 4x4, less than 10,000-lb. GVWR; Sport Utility Vehicle, four wheel drive, less than 10,000-lb. GVWR.

This specification is intended only to describe the unique requirements of the fuel system and its related equipment and performance as they relate to hybrid-electric vehicles powered by a gasoline-fueled internal combustion engine with electric motor power assist. Please refer to the standard specifications for general requirements of the base vehicle.

2 SPECIFICATIONS AND STANDARDS

Areas where the hybrid-electric power systems impact the standard specifications (for gasoline/diesel fueled vehicles) may be waived for this contract. This includes such things as: gross vehicle weight rating, payload, engine displacement, cargo volume and others directly affected by the fuel system modifications. The bidder may be required to substantiate the reasons for downgrading the base requirement.

The base vehicle shall comply with all other specifications and be of the size and type indicated by each line item description in the Request for Proposal. If the manufacturer does not manufacture the vehicle model with the specified component, an alternative component may be acceptable (e.g. leather seats offered in lieu of cloth seats when vehicle not manufactured with cloth seats). The bidder may be required to substantiate the reason for the offer of an alternative component.

3 REQUIREMENTS

3.1 GENERAL REQUIREMENTS: All vehicles shall be approved and marketed by the original equipment (vehicle) manufacturer. Full factory literature, parts, service, technical support and warranties shall be available.

3.2 HYBRID-ELECTRIC VEHICLE (HEV): The vehicle shall be primarily propelled by an internal combustion engine and also convert energy normally wasted during coasting and braking into electricity, which is stored in a battery until needed by the electric motor. Hybrid-electric vehicles may be equipped with a high-voltage electrical system to operate the electric motor but shall revert to a standard 12-volt operating system for all other functions.

Unlike dedicated electric vehicles, the HEV shall not need to be plugged into an external source of electricity to be recharged. Conventional gasoline and regenerative braking shall provide all the energy the vehicle needs.

The HEV shall be capable of sustained freeway speeds

3.3 PLUG-IN HYBRID ELECTRIC VEHICLE (PHEV): The vehicle shall be propelled by battery alone or blended (battery/internal combustion engine) power source and also convert energy normally wasted during coasting and braking into electricity, which is stored in a battery until needed by the electric motor. Plug-In Hybrid-electric vehicles may be equipped with a high-voltage electrical system to operate the electric motor but shall revert to a standard 12-volt operating system for all other functions. The Plug-In Hybrid Electric Vehicle battery system shall be fully rechargeable from a standard 110 VAC electrical outlet.

The PHEV shall be capable of sustained freeway speeds.