

## Attachment B.

### **VIUS Data Uses**

#### Section A. Registration Information

The questions in this section are needed to ensure that the registered owner answers only for the sampled vehicle and to define in-scope vehicles.

#### Section B. Disposal

The questions in this section are also needed to define in-scope vehicles. Any vehicle disposed of prior to January 1 of the survey year is not eligible to be in the survey. In addition, questions about disposal are needed for assessing changes in the industry and for analyzing truck activity in specific segments of the industry (motor carrier and independent owners). These questions are also necessary for developing scrappage rates and trade cycles for vehicles.

#### Section C. Acquisition

The questions in this section are needed for analyzing the age of equipment and purchasing trends in the truck industry. These questions are also required for cost analysis and depreciation modeling.

#### Section D. Leasing

The questions in this section are needed to analyze trends in truck ownership and the leased vehicle segment of the truck market. This information is needed to analyze truck fleet applications for leasing, sales forecasting, and fleet modeling.

#### Section E. Type of Vehicle

The questions in this section are needed for allocating and apportioning highway costs to various vehicle types. They are also used in truck size and weight studies. Information on the types of vehicles in use are required for pavement analyses and in forecasting freight traffic. Body type is also critical for analyzing the detailed segmentation of the truck fleet. Body type data are needed, in conjunction with data from other questions related to payload and commodity carried, for numerous economic studies and evaluations of federal regulations.

#### Section F. Physical Characteristics

The questions in this section are needed for multiple purposes. As a whole, they are used to determine vehicle configurations in use, to perform market studies, and for product planning. The data collected from these questions provide input to federal rulemakings on fuel efficiency and greenhouse gas emissions standards for medium and heavy duty trucks. New questions related to emerging technologies and safety features are necessary to understand how fleets adopt new technology over time and to determine market penetration rates of these technologies. Questions about number of axles and axle configuration, in conjunction with questions about weight, commodity, and payload, are required for weight studies and the impact of vehicles on highways. Data about cabin type, cabin height, and fuel economy features are required for assessing fuel consumption standards.

#### Section G. Time Operated

Questions in this section are needed to adjust mileage for trucks used for only part of the year. The data collected are also used to assess seasonal traffic patterns.

#### Section H. Home Base

The questions in this section are used to determine highway usage in and out of state for highway investment needs. These questions are also used for highway cost allocation studies and required for equitable distribution of highway taxes and fees. The data are also used to determine fleet size and how many trucks are based at a fixed location. Energy models use the data from these questions to estimate the nonresidential highway vehicle component of the transportation sector.

#### Section I. Miles

The questions in this section are needed for multiple purposes. These questions, in combination with vehicle and body type, are important for numerous studies. The data are used for determining type of travel by specific vehicles to establish policy between local and long-distance trucking and for determining the tax status of vehicles for estimates of future highway revenues. The data collected from these questions provide input to federal rulemakings on fuel efficiency and greenhouse gas emissions standards for medium and heavy duty trucks. The data collected on time spent idling is used to quantify the benefits of idle reduction technologies on emissions and to assess whether states are in compliance with air quality standards.

#### Section J. Fuel and Maintenance

The questions in this section are needed for multiple purposes. These questions are used to measure self-performed maintenance and purchased maintenance for economic models. They also are used to estimate the quantity of fuel consumed by type of fuel used. Data from these questions are critical for fuel economy, energy, and environmental studies and for analyzing related policies and standards.

#### Section K. Vehicle Configuration

The questions in this section are required for determining truck sizes and weights for congressionally mandated size, weight, and safety studies. They are also used in studies of the trucking industry to assess intermodal competition and for analyzing the impact of regulations on industry members. Data on vehicle configuration assist in setting highway size and length policies. These questions are also used to collect data required to forecast trailer equipment, freight, and intermodal freight flow modeling.

#### Section L. Weight

The questions in this section are needed for allocating and apportioning highways costs to various vehicle types. Questions about truck weight, in conjunction with the information collected about body type, are also required for truck size and weight studies and analyses of the impact on infrastructure. Information about vehicle weight is also required to estimate statistical distributions to validate weigh-in-motion data. Payload questions are critical for establishing truck size and weight data used in federal size and weight studies. These questions are necessary as inputs to the Freight Analysis Framework model which integrates data from a variety of sources to create a comprehensive picture of freight movement among states and major metropolitan areas by all modes of transportation.

#### Section M. Kind of Business

#### Section N. For-Hire

#### Section O. Products, Equipment, or Materials

The questions in these sections are needed to determine the structure of the truck industry and for determining the degree of regulation in the industry. Data on truck types and uses are needed to analyze energy usage by commercial and non-commercial activity. The combination of commercial use,

vehicle miles traveled, and product data are needed to build and validate urban truck models and develop commodity flow models. Data from these questions are also required for analyzing ownership trends and adoption of new technologies by different industries and fuel usage for private and for-hire transportation operations. The questions, in conjunction with other data on the survey, and are required for freight forecasting, highway policy analysis, and local and state planning studies. The data are needed for determining the distribution of fuel and ports to industries transporting goods by truck.

#### Section P. Hazardous Materials

The questions in this section are required for developing policies for vehicles transporting hazardous materials. The data are needed for the analysis of safety exposure to the movement of highway users and those in the vicinity of highways and for developing enforcement strategies for the regulation of the movement of hazardous materials. These questions are also used in conjunction with others on the survey to analyze vehicle miles traveled and fuel usage.