

size and weight reduction as a compliance strategy for the largest vehicles. For the smallest vehicles, this standard would be constrained by the constant-value standard for passenger automobiles.

C. Fixed Attribute System

A variant of the functional attribute system described above is a "fixed" attribute system.¹⁵ The key difference is that, under a fixed attribute system, the relevant vehicle attribute(s) are "fixed" for each manufacturer at the levels reflecting that manufacturer's fleet mix in some prior ("reference") model year. For example, each manufacturer's vehicle weight mix might be "fixed" for as long as the standard remains in place.¹⁶ The manufacturer would, of course, be free to vary the attribute levels in subsequent years, but its CAFE target in any future year would continue to be based on its vehicle attribute level in the reference year. A fixed attribute system would, in essence, "lock in" a corporate fleet's reference-year attribute (e.g., weight or size) for the purpose of regulation. This approach was devised to address the potential for upsizing/weight-creep that could occur in a functional weight-based system.

Under a fixed attribute system, each manufacturer's overall effective CAFE for any given model year is determined by the CAFE standard and the mix of vehicles it produced in some prior ("reference") model year. For any given model year subject to a fixed-attribute standard, each manufacturer's effective CAFE target is independent of the mix of vehicles it produces. If, for example, manufacturer A produced a lighter vehicle mix than manufacturer B in the reference year, it would be subject to a more stringent effective CAFE than manufacturer B, even if manufacturer B chose a lighter vehicle mix than manufacturer A in a subsequent model year. Thus, compared to a functional attribute system, a fixed attribute system provides a somewhat different set of incentives. If, for example, weight is the relevant attribute, a fixed attribute system provides a relatively greater disincentive to increase (and relatively greater incentive to decrease) weight and than under a functional attribute system.

Given the relationship between weight and fuel economy, a fixed-attribute weight-based system such as that described above would, like the current system, provide an incentive to reduce vehicle weight throughout the range of light trucks. As discussed previously, the risk of adverse safety impacts caused by the current CAFE system could be mitigated by focusing weight reduction on some comparatively heavy vehicles, and discouraging weight reduction on some comparatively light vehicles. One possible means of focusing this incentive on the vehicle weight range in which weight reduction is the most compatible with safety considerations would be to apply a safety-based adjustment when calculating the CAFE level that would be required under a fixed-attribute system. For example, if weight reduction is expected to compromise overall safety when applied to vehicles below 5,000 pounds, but not when applied to vehicles above 5,000 pounds, the fixed-attribute CAFE level required of a given manufacturer could be adjusted using a "safety adjustment factor" that is based on that manufacturer's distribution of vehicle weights (e.g., the fraction and average weight of that manufacturer's light trucks having curb weights above 5,000 pounds). The implications of such an adjustment would depend on each manufacturer's product mix. The Agency invites comment on how a practical fixed-attribute system should be designed and implemented, including both advantages and disadvantages.

VI. Definitional Changes to the Current Vehicle Classification System

In the EPCA, Congress created the basic distinction between passenger automobiles and non-passenger automobiles. Section 32901(16) defines a "passenger automobile" as an "automobile that is manufactured primarily for transporting not more than 10 individuals, but does not include an automobile capable of off-highway operation that the Secretary decides by regulation—(A) has a significant feature (except 4 wheel drive) designed for off-highway operation; and (B) is a 4-wheel drive automobile or is rated at more than 6,000 pounds gross vehicle weight." This definition effectively divides the class of automobiles subject to CAFE into passenger and non-passenger automobiles (light trucks).

In December 1976, the agency promulgated a Notice of Proposed Rulemaking to further define the distinction between passenger and non-passenger automobiles for purposes of

the CAFE program.¹⁷ The agency reviewed the legislative history and concluded that Congress intended that passenger automobiles be defined as those used primarily for the transport of individuals and that all other vehicles would fall within the category of non-passenger automobiles. The agency pointed to the relevant text in the EPCA conference reports (H. Rept. 94–700):

The passenger automobile category would exclude vehicles not manufactured primarily for transportation of individuals—such as light duty trucks, mobile homes, and multipurpose vehicles not manufactured primarily for transportation of individuals.

The agency then determined that, based on the nature of the vehicle fleet in the mid-1970s, it could best differentiate between vehicles built primarily to transport people from those built primarily for utilitarian purposes by focusing on whether the vehicle was built on a passenger car chassis versus a truck chassis. The agency also acknowledged, however, that this approach would not always achieve the distinction it was trying to create.

The agency issued regulations creating a specific classification scheme, which has served to distinguish between passenger car fleets and light truck fleets throughout the lifespan of the CAFE program. In 49 CFR 523.3, the agency defined what constitutes an "automobile" subject to the CAFE program. That provision includes automobiles weighing 6,000 lbs. GVWR or less and vehicles having a GVWR between 6,000–10,000 lbs. that the NHTSA Administrator has determined may feasibly be subject to the CAFE program. Feasibility is determined with regard to whether the vehicles are used substantially in the same way as other vehicles subject to the CAFE program and whether including those vehicles will result in significant energy conservation.

As part of that regulation, the NHTSA Administrator determined that vehicles satisfying the criteria for passenger automobiles set forth in 49 CFR 523.4 and certain vehicles satisfying the criteria for light trucks set forth in 49 CFR 523.5, except for their GVWR, would be considered automobiles for purposes of CAFE. The Administrator further determined that light trucks should be subject to the CAFE program if they have a basic frontal area of 45 square feet or less, have a curb weight

¹⁵ DeCicco, John. "Use a Vehicle-Based Approach, but Lock-In Each Company's Target." American Council for an Energy-Efficient Economy. 1992. This paper uses the example of a uniform percentage increase (UPI) to implement this approach. UPI is not an essential feature of this approach. NHTSA welcomes comments on alternative ways to implement this approach.

¹⁶ The reference year could be modified periodically to reflect changing trends in the vehicle fleet.

¹⁷ We note that the NPRM makes clear that one of the purposes of the classification scheme adopted was to encourage manufacturers to reduce the weight of their larger passenger cars. As the NAS report found, this weight reduction has had a negative impact on motor vehicle safety.