program for MYs 2009–2011 to facilitate compliance by the automakers, and revising its program for MYs 2012–2016 such that compliance with the Federal GHG standards will be deemed to be compliance with California's GHG standards. This will allow the single national fleet produced by automakers to meet the two Federal requirements and to meet California requirements as well. California is proceeding with a rulemaking intended to revise its 2004 regulations to meet its commitments. Several automakers and their trade associations also announced their commitment to take several actions in support of the National Program, including not contesting the final GHG and CAFE standards for MYs 2012–2016, not contesting any grant of a waiver of preemption under the CAA for California's GHG standards for certain model years, and to stay and then dismiss all pending litigation challenging California's regulation of GHG emissions, including litigation concerning preemption under EPCA of California's and other states' GHG standards.

2. Public Participation

The agencies proposed their respective rules on September 28, 2009 (74 FR 49454), and received a large number of comments representing many perspectives on the proposed rule. The agencies received oral testimony at three public hearings in different parts of the country, and received written comments from more than 130 organizations, including auto manufacturers and suppliers, States, environmental and other non-governmental organizations (NGOs), and over 129,000 comments from private citizens.

The vast majority of commenters supported the central tenets of the proposed CAFE and GHG programs. That is, there was broad support from most organizations for a National Program that achieves a level of 250 gram/mile fleet average CO_2, which would be 35.5 miles per gallon if the automakers were to meet this CO_2 level solely through fuel economy improvements. The standards will be phased in over model years 2012 through 2016 which will allow manufacturers to build a common fleet of vehicles for the domestic market. In general, commenters from the automobile industry supported the proposed standards as well as the credit opportunities and other compliance provisions providing flexibility, while also making some recommendations for changes. Environmental and public interest non-governmental organizations (NGOs), as well as most States that commented, were also generally supportive of the National Program standards. Many of these organizations also expressed concern about the possible impact on program benefits, depending on how the credit provisions and flexibilities are designed. The agencies also received specific comments on many aspects of the proposal.

Throughout this notice, the agencies discuss many of the key issues arising from the public comments and the agencies' responses. In addition, the agencies have addressed all of the public comments in the Response to Comments document associated with this final rule.

B. Summary of the Joint Final Rule and Differences From the Proposal

In this joint rulemaking, EPA is establishing GHG emissions standards under the Clean Air Act (CAA), and NHTSA is establishing Corporate Average Fuel Economy (CAFE) standards under the Energy Policy and Conservation Action of 1975 (EPCA), as amended by the Energy Independence and Security Act of 2007 (EISA). The intention of this joint rulemaking is to set forth a carefully coordinated and harmonized approach to implementing these two statutes, in accordance with all substantive and procedural requirements imposed by law.

NHTSA and EPA have coordinated closely and worked jointly in developing their respective final rules. This is reflected in many aspects of this joint rule. For example, the agencies have developed a comprehensive Joint Technical Support Document (TSD) that provides a solid technical underpinning for each agency's modeling and analysis used to support their standards. Also, to the extent allowed by law, the agencies have harmonized many elements of program design, such as the form of the standard (the footprint-based attribute curves), and the definitions used for cars and trucks. They have developed the same or similar compliance flexibilities, to the extent allowed and appropriate under their respective statutes, such as averaging, banking, and trading of credits, and have harmonized the compliance testing and test protocols used for purposes of the fleet average standards each agency is finalizing. Finally, under their respective statutes, each agency is called upon to exercise its judgment and determine standards that are an appropriate balance of various relevant statutory factors. Given the common technical issues before each agency, the similarity of the factors each agency is to consider and balance, and the authority of each agency to take into consideration the standards of the other agency, both EPA and NHTSA are establishing standards that result in a harmonized National Program.

This joint final rule covers passenger cars, light-duty trucks, and medium-duty passenger vehicles built in model years 2012 through 2016. These vehicle categories are responsible for almost 60 percent of all U.S. transportation-related GHG emissions. EPA and NHTSA expect that automobile manufacturers will meet these standards by utilizing technologies that will reduce vehicle GHG emissions and improve fuel economy. Although many of these technologies are available today, the emissions reductions and fuel economy improvements finalized in this notice will involve more widespread use of these technologies across the light-duty vehicle fleet. These include improvements to engines, transmissions, and tires, increased use of start-stop technology, improvements in air conditioning systems, increased use of hybrid and other advanced technologies, and the initial commercialization of electric vehicles and plug-in hybrids. NHTSA's and EPA's assessments of likely vehicle technologies that manufacturers will employ to meet the standards are discussed in detail below and in the Joint TSD.

The National Program is estimated to result in approximately 960 million metric tons of total carbon dioxide equivalent emissions reductions and approximately 1.8 billion barrels of oil savings over the lifetime of vehicles sold in model years (MYs) 2012 through 2016. In total, the combined EPA and NHTSA 2012–2016 standards will reduce GHG emissions from the U.S. light-duty fleet by approximately 21 percent by 2030 over the level that would occur in the absence of the National Program. These actions also will provide important energy security benefits, as light-duty vehicles are about 95 percent dependent on oil-based fuels. The agencies project that the total benefits of the National Program will be more than $240 billion at a 3% discount rate, or more than $190 billion at a 7% discount rate. In the discussion that follows in Sections III and IV, each agency explains the related benefits for their individual standards.

Together, EPA and NHTSA estimate that the average cost increase for a model year 2016 vehicle due to the National Program will be less than $1,000. The average U.S. consumer who purchases a vehicle outright is estimated to save enough in lower fuel costs over the first three years to offset