

Department of Veterans Affairs

Fleet Alternative Fuel Vehicles Program Report for Fiscal Year 2002

This Department of Veterans Affairs (VA) Fleet Alternative Fuel Vehicles (AFVs) Program Report for Fiscal Year (FY) 2002 presents the Department's data on the number of alternative fuel vehicles acquired in FY 2002, and its planned acquisitions and projections for FY 2003 and FY 2004. The report has been developed in accordance with the Energy Policy Act of 1992 (EPAAct) (42 U.S.C. 13211-13219) as amended by the Energy Conservation Reauthorization Act of 1998 (ECRA) (Public Law 105-388), and Executive Order (E.O.) 13149 (signed by the President in April 2000). Detailed vehicle acquisition tables are shown in the appendices to this report.

Legislative Requirements

The EPAAct requires that 75 percent of all covered light-duty vehicles acquired for Federal fleets in FY 1999 and beyond must be AFVs (where the fleets have 20 or more vehicles, are capable of being centrally fueled, and are operated in a Metropolitan Statistical Area (MSA) with a population of more than 250,000 based on the 1980 census). Certain emergency, law enforcement, and national defense vehicles are exempt from these requirements. The EPAAct also sets a goal of using replacement fuels to displace at least 30 percent of the projected consumption of motor fuel in the United States annually by the year 2010. The ECRA of 1998 amended the EPAAct to allow one alternative fuel vehicle acquisition credit for every 450 gallons of pure biodiesel fuel consumed in vehicles over 8,500 pounds gross vehicle weight rating. "Biodiesel credits" may fulfill up to 50 percent of an agency's EPAAct requirements. The head of each Federal agency must also prepare and submit a report to Congress outlining the agency's AFV acquisitions and future plans by November 13th each year. Executive Order 13149 directs Federal agencies operating a fleet of 20 or more vehicles within the United States to reduce their annual petroleum consumption by at least 20 percent by the end of FY 2005 (compared to FY 1999 levels) by using alternative fuels in AFVs more than 50 percent of the time, improving the average fuel economy of new light-duty petroleum-fueled vehicle (LDV) acquisitions by 1 mile per gallon (mpg) by FY 2002 and 3 mpg by FY 2005, and using other fleet efficiency measures.

The Department of Energy and the General Service Administration (GSA) designed and recently updated the electronic database used in this data collection.

VA's Approach to Compliance with EPAct and E.O. 13149

To achieve compliance with the legislative mandates of EPAct and E.O. 13149, VA will endeavor to replace light-duty vehicles with AFVs and use alternative fuel in these vehicles a majority of the time. In addition, VA will consider taking advantage of a new surcharge program that will add approximately \$5 monthly to the cost of every vehicle leased through the GSA to help cover the higher incremental cost of many AFV models (compared to conventional vehicles). It will also acquire light-duty vehicles with a higher fuel economy of 1 mpg by FY 2003 and total of 3 mpg by FY 2005, and further reduce petroleum consumption by using biodiesel fuel in all diesel vehicles. By utilizing this strategy, VA anticipates exceeding the statutory AFV acquisition requirements by 2004.

VA's Fleet Compliance for FY 2002

Figure 1 is a graphical depiction of AFV acquisitions by VA's fleet in FY 2002 and projections for FY 2003 and FY 2004. Because 10 percent of VA field entities did not report vehicle data, all information will not be revealed in the charts below. Reports were not submitted because of personnel changes, caused by downsizing, retirements, etc., which required that additional training be done in the use of the new electronic data base features). The following charts depict VA's efforts to comply with the directives of EPAct, ECRA and E.O. 13149. VA acquired 988 covered light-duty vehicles in FY 2002, of which 272 were AFVs, and received AFV acquisition credits for a total of 280. Appendix A provides detailed information on the number and types of light-duty vehicles leased or purchased by VA's fleets in FY 2002.

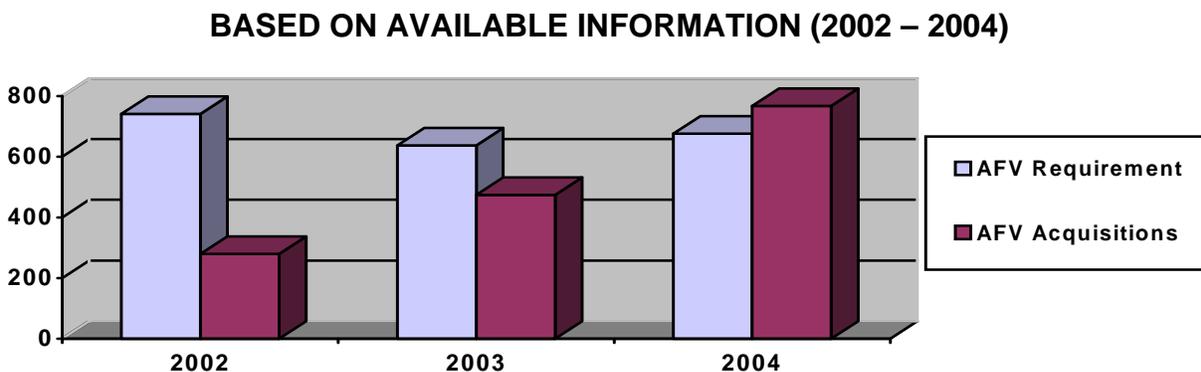


Figure 1. Summary of VA FY 2002 AFV Acquisitions

VA leased and purchased additional vehicles in FY 2002 that were not “covered” vehicles. Of the total of 1,497 light-duty vehicles acquired, 509 of these vehicles were not counted for compliance due to the following reasons:

- 47 fleet size
- 364 geographic
- 8 exempt as law enforcement vehicles
- 90 were used in non-MSA operations

Alternative Fuel Use by VA's Fleets in FY 2002

Table 1 presents alternative fuel use data for VA's fleets in FY 2002. The majority of vehicles acquired by VA and other Federal fleets are leased from GSA, and the leasing contract includes the maintenance and fuel costs for the vehicles. This is accomplished by the use of a GSA credit card that the fleets use to purchase alternative fuel.

However, since product code standards are not uniform among suppliers of alternative fuels (e.g., ethanol or E-85), it is not possible for credit vendors to accurately track the purchase of alternative fuels with this credit card, at the present time. The exception may be natural gas, which is usually purchased at a local utility refueling site, allowing the fleets to contact the utility for an accurate accounting of purchased fuel.

Table 1. VA Fuel Use in FY 2002

Fuel Type	Quantity	Unit
Biodiesel – B100	0	Gallons
CNG (Compress natural gas)	6,910	Gallons @ 2,400 psi, 70°F
CNG	0	Hundred cu. ft.
Diesel	1,040,837	Gallons
E-85	117,169	Gallons*
Gasoline	4,233,383	Gallons
Methanol	0	Gallons
Propane	0	Gallons

*(Estimate based on 15 percent of 781,128 gallons, which is the estimated total fuel use in AFVs.)

VA's Fleet AFV Acquisitions for FY 2003 and FY 2004

Appendices B and C provide detailed information on projected vehicle acquisitions and inventory for VA's fleets for FY 2003 and FY 2004. In FY 2003, VA's fleets plan to acquire a cumulative total of 849 (minus exemptions) light-duty vehicles, of which 474 (including 156 AFV credits) will be AFVs. Projected light-duty acquisitions in FY 2004 total 901 (minus exemptions). Of this amount, 767 (including credits) are anticipated to be AFVs.

In reference to the above 'planned' FY 2003 and 'projected' FY 2004 AFV numbers (474 and 767, respectively), VA meets and exceeds the requirements of E.O. 13149 by FY 2004 (75 percent of new acquisitions must be AFVs).

Petroleum Savings (Appendix D)

Since it is difficult, if not impossible, to project petroleum savings for FY 2003 and FY 2004 based upon the estimated AFV acquisitions, improvements in fuel economy, and fleet efficiency, petroleum savings are reported for only FY 2002 based on actual data on hand for FY 1999 and FY 2002.

In FY 1999, VA's baseline petroleum consumption was 6,277,134-gasoline gallon equivalent (GGE) and FY 2002 petroleum consumption was 5,274,712 gallons. A positive difference (reduction) of 1,002,422 GGE is reflected in FY 2002 as compared to FY 1999 baseline numbers.

Summary

The lack of infrastructure to support AFVs continues to be a constant concern throughout the Department, especially when patients are being transported. This, along with the lack of funds to acquire the number of vehicles required in meeting the mandates of EPOA and the E.O., has caused slow progress in this area.

As detailed in this report, its appendices, and information currently available, VA shows an increase in AFV acquisitions for FYs 2003 and meeting the requirements in 2004. Participation in the GSA Surcharge Lease Program will reflect a marked increase in AFV acquisitions in future fiscal years. VA will continue to implement its strategy for complying with the requirements of E.O. 13149, which is projected to result in at least a 20 percent reduction in the fleet's annual petroleum consumption in FY 2005.

Office of the Deputy Under Secretary for Health
for Operations and Management (10N)

**Department of Veterans Affairs
Complex-Wide AFV Report 2002 - Actuals**

Actuals Department of Veterans Affairs FY 2002 Vehicle Acquisitions					
Actuals FY 2002 Light-Duty Vehicle Acquisitions					Total Vehicle Inventory
	Leased	Purchased	Total		
Total number of Light-Duty (8,500 GVWR ¹) - Vehicle Acquisitions		1,340	157	1,497	7,091
Exemptions	Fleet Size	40	7	47	349
	Geographic	360	4	364	1,499
	Law Enforcement	8	0	8	56
	Non-MSA Operation (fleet)	49	31	80	300
	Non-MSA Operation (vehicles)			10 ²	
EPAct Covered Acquisitions		883	115	988	4,887
Actuals FY 2002 AFV Acquisitions					Total Vehicle Inventory
Vehicle		Leased	Purchased	Total	
Sedan	CNG ³ Bi-Fuel Subcompact	6	0	6	24
Sedan	CNG Bi-Fuel Compact	10	0	10	49
Sedan	E-85 Flex-Fuel Compact	12	0	12	12
Sedan	E-85 Flex-Fuel Midsize	62	0	62	243
Sedan	Electric Dedicated Midsize	0	0	0	4
Sedan	CNG Dedicated Large (law enf.)	0	0	0	3
St. Wagon	E-85 Flex-Fuel Midsize	23	0	23	65
Pickup 4x2	E-85 Flex-Fuel Compact	5	0	5	7
Pickup 4x2	E-85 Flex-Fuel Compact Ext Cab	2	0	2	15

¹ Gross Vehicle Weight Rating

² Characteristic of the database – vehicles ordered but not yet received

³ Compressed Natural Gas

Pickup 4x2	E-85 Flex-Fuel Compact Reg Cab	0	0	0	40
Pickup 4x2	CNG Bi-Fuel Full-size Ext Cab	0	0	0	3
Pickup 4x2	CNG Dedicated Full-size Ext Cab	0	0	0	1
Pickup 4x2	E-85 Flex-Fuel Full-size Ext Cab	2	0	2	2
Pickup 4x2	LPG Bi-Fuel Full-size Ext Cab	1	0	1	1
Pickup 4x2	CNG Bi-Fuel Full-size Reg Cab	0	0	0	11
Pickup 4x2	CNG Dedicated Full-size Reg Cab	3	0	3	44
Pickup 4x2	E-85 Flex-Fuel Full-size Reg Cab	6	0	6	6
Pickup 4x2	LPG Bi-Fuel Full-size Reg Cab	0	0	0	2
Pickup 4x4	E-85 Flex-Fuel Compact Ext Cab	1	0	1	1
Pickup 4x4	E-85 Flex-Fuel Full-size Reg Cab	1	0	1	1
SUV 4x2 4dr	E-85 Flex-Fuel Midsize	1	0	1	1
SUV 4x4 4dr	E-85 Flex-Fuel Midsize	8	0	8	8
Van 4x2	E-85 Flex-Fuel Compact	125	0	125	731
Van 4x2	Electric Dedicated Compact	0	1	1	1
Van 4x2	CNG Dedicated Large	0	0	0	6
Van 4x2	CNG Dedicated Large	0	0	0	1
Bus	Electric Dedicated	0	0	0	2
Emergency & Special Purpose MD 8,501-16,000 GVWR	CNG Dedicated	0	0	0	3
Emergency & Special Purpose MD 8,501-16,000 GVWR	LPG Dedicated	0	1	1	1
MD AFV Other 8,501-16,000 GVWR	CNG Bi-Fuel	1	0	1	1
Van 4x2	CNG Bi-Fuel Large	0	0	0	6
Van 4x2	CNG Dedicated Large	0	1	1	1
Total Number of AFV Acquisitions		269	3	272	1,279
Zero Emission Vehicle Credits		0	1	1	
Dedicated Light-Duty AFV Credits		3	0	3	
Dedicated Medium-Duty AFV Credits		0	4	4	

Dedicated Heavy-Duty AFV Credits	0	0	0	
Biodiesel Fuel Usage Credits – Actuals			0	
Total AFV Acquisitions with Credits	272	8	280	
AFV Percentage of Covered Light-Duty Vehicle Acquisitions			28 %	

**Department of Veterans Affairs
Complex-Wide AFV Report 2003 - Planned**

Planned Department of Veterans Affairs FY 2003 Vehicle Acquisitions				
Planned FY 2003 Light-Duty Vehicle Acquisitions				
		Leased	Purchased	Total
Total number of Light-Duty (8,500 GVWR) - Vehicle Acquisitions		1,233	61	1,294
Exemptions	Fleet Size	38	0	38
	Geographic	357	4	361
	Law Enforcement	3	2	5
	Non-MSA Operation (fleet)	23	8	31
	Non-MSA Operation (vehicles)			10
EPAct Covered Acquisitions		812	47	849
Planned FY 2003 AFV Acquisitions				
Vehicle		Leased	Purchased	Total
Sedan (SIN 8, 8C)	CNG Bi-Fuel Subcompact	6	0	6
Sedan (SIN 9, 9C)	CNG Bi-Fuel Compact	2	0	2
Sedan (SIN 9, 9C)	E-85 Flex-Fuel Compact	27	0	27
Sedan (SIN 10, 10B)	E-85 Flex-Fuel Midsize	78	0	78
St. Wagon (SIN 14, 14C)	E-85 Flex-Fuel Midsize	23	0	23
Pickup 4x2 (SIN 60)	E-85 Flex-Fuel Compact	5	0	5
Pickup 4x2 (SIN 61C)	E-85 Flex-Fuel Compact Ext Cab	3	0	3
Pickup 4x2 (SIN 41C)	E-85 Flex-Fuel Full-size Ext Cab	2	0	2
Pickup 4x2 (SIN 41, 42)	CNG Bi-Fuel Full-size Reg Cab	1	0	1
Pickup 4x2 (SIN 41)	E-85 Flex-Fuel Full-size Reg Cab	6	0	6
Pickup 4x4 (SIN 46)	E-85 Flex-Fuel Full-size Reg Cab	1	0	1
SUV 4x2 4dr (SIN 100B)	E-85 Flex-Fuel Midsize	2	0	2
SUV 4x4 4dr (SIN 105B)	E-85 Flex-Fuel Midsize	5	0	5
Van 4x2 (SIN 20, 30)	E-85 Flex-Fuel Compact	129	0	129
MD AFV Other 8,501-16,000 GVWR (SIN)	CNG Bi-Fuel	1	0	1

MD AFV Other 8,501-16,000 GVWR (SIN)	Electric Dedicated	0	50	50
Van 4x2 (SIN 22, 24, 32, 34)	CNG Bi-Fuel Large	2	0	2
Van 4x2 (SIN 22, 24, 32, 34)	CNG Dedicated Large	0	2	2
Total Number of AFV Acquisitions		293	52	345
Zero Emission Vehicle Credits		0	0	0
Dedicated Light-Duty AFV Credits		0	0	0
Dedicated Medium-Duty AFV Credits		0	104	104
Dedicated Heavy-Duty AFV Credits		0	0	0
Biodiesel Fuel Usage Credits - Planned				25
Total AFV Acquisitions with Credits		293	156	474
AFV Percentage of Covered Light-Duty Vehicle Acquisitions				56 %

**Department of Veterans Affairs
Complex-Wide AFV Report 2004 - Projected**

Projected Department of Veterans Affairs FY 2004 Vehicle Acquisitions				
Projected FY 2004 Light-Duty Vehicle Acquisitions				
	Leased	Purchased	Total	
Total number of Light-Duty (8,500 GVWR) - Vehicle Acquisitions	1,304	28	1,332	
Exemptions	Fleet Size	36	0	36
	Geographic	357	4	361
	Law Enforcement	0	0	0
	Non-MSA Operation (fleet)	19	6	25
	Non-MSA Operation (vehicles)			9
EPAct Covered Acquisitions	892	18	901	
Projected FY 2004 AFV Acquisitions				
Vehicle	Leased	Purchased	Total	
Sedan (SIN 8, 8C)	6	0	6	
Sedan (SIN 9, 9C)	478	0	478	
Sedan (SIN 9, 9C)	1	0	1	
Sedan (SIN 10, 10B)	74	0	74	
St. Wagon (SIN 14, 14C)	22	0	22	
Pickup 4x2 (SIN 60)	5	0	5	
Pickup 4x2 (SIN 61C)	3	0	3	
Pickup 4x2 (SIN 41C)	2	0	2	
Pickup 4x2 (SIN 41)	6	0	6	
Pickup 4x4 (SIN 46)	1	0	1	
SUV 4x2 4dr (SIN 100B)	2	0	2	
SUV 4x4 4dr (SIN 105B)	5	0	5	
Van 4x2 (SIN 20, 30)	128	0	128	
MD AFV Other 8,501-16,000 GVWR (SIN)	1	0	1	
Van 4x2 (SIN 22, 24, 32, 34)	2	0	2	
Van 4x2 (SIN 22, 24, 32, 34)	0	2	2	
Total Number of AFV Acquisitions	736	2	738	
Zero Emission Vehicle Credits	0	0	0	
Dedicated Light-Duty AFV Credits	0	0	0	
Dedicated Medium-Duty AFV Credits	0	4	4	

Dedicated Heavy-Duty AFV Credits	0	0	0
Biodiesel Fuel Usage Credits - Projected			25
Total AFV Acquisitions with Credits	736	6	767
AFV Percentage of Covered Light-Duty Vehicle Acquisitions			85 %

Department of Veterans Affairs
Petroleum Consumption Report

EO 13149 Covered Petroleum Consumption in GGE							
	FY 1999 Baseline	FY2000	FY2001	FY2002	FY2003	FY2004	FY2005
Gasoline	5,023,247	4,392,778	4,527,902	4,233,383			
Diesel	1,253,887	2,238,811	1,010,548	1,040,837			
Diesel component from biodiesel		0	0	492			
TOTAL	6,277,134	6,631,589	5,538,450	5,274,712			
Reduction*	N/A	-5.6 %	11.8 %	16.0 %			

* Reduction is the % reduction compared to the FY 1999 Baseline Total

Alternative Fuel Consumption (in GGE)							
	FY2000	FY2001	FY2002	FY2003	FY2004	FY2005	
CNG	2,864	20,561	6,910				
LNG	0	0	0				
LPG	0	423	794				
E-85	80,452	70,886	117,169				
Electric	0	0	0				
M-85	0	0	0				
Biodiesel (B100)*	0	0	123				
TOTAL	83,316	91,870	124,873				
Estimated Total Fuel Used in AFVs	536,348	459,858	781,128				
% of Alt Fuel Use in AFVs w/o biodiesel	15.533	19.977	15.986				

*Biodiesel is calculated at 20% of the reported B20 and 100% of the reported B100 fuel used in the Section III Actual Fuel Cost/Consumption by Fuel Type data input screen. Biodiesel is **not** included in the calculation of total fuels used in AFVs because biodiesel itself is not burned in *Alternatively Fueled Vehicles*.

Average Fuel Economy of non-AFV Light Duty Vehicle Acquisitions (in mpg)							
	FY 1999 Baseline	FY2000	FY2001	FY2002	FY2003	FY2004	FY2005
Fuel Economy	18.0	21	22	24			
Change Compared to Baseline		3.0	4.0	6.0			