



# Virginia Alternate Fuels Report

January 1

# 2013

A report of Virginia Clean Cities, reflective of Virginia production, fleet vehicles, and stations. Based on end of year 2012 survey data.  
\* Updated January 30, 2012 to include biofuel production numbers.

Fuels,  
Vehicles, and  
Stations

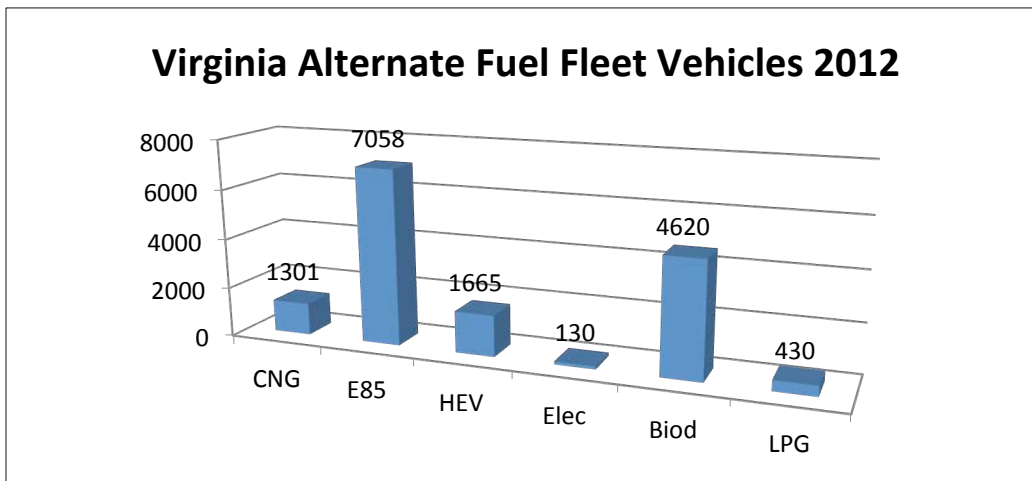
# Virginia Alternate Transportation Fuels Report

Jan 5, 2013

## Alternate Fuel Vehicles Fleet Summary

For the year ending December 31, 2012, the Commonwealth of Virginia saw an increase in the number of alternate fuel fleet vehicles by 2.2 percent. The current percentage of alternate fuels used in Virginia fleets is 26.1 percent with a two-year average of 24 percent and a five-year average of 22.7 percent. Usage for all types of alternate fuels increased, but particularly in CNG, flex-fuel E85, and hybrid electric vehicles. Biodiesel and flex-fuel E85 vehicles represent the largest number of tracked alternate fuel fleet vehicles. These vehicles are in service with private business as well as state and federal government agency fleets.

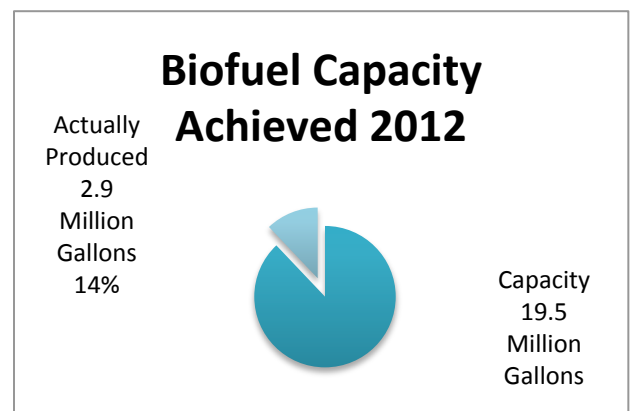
Alternate Fuel Vehicles showed an increase in several areas. There were significant additional CNG, E85 and LPG vehicles, and a doubling of hybrid electric vehicles. These inroads may have been a result of high transportation fuel prices for gasoline and diesel in 2012.



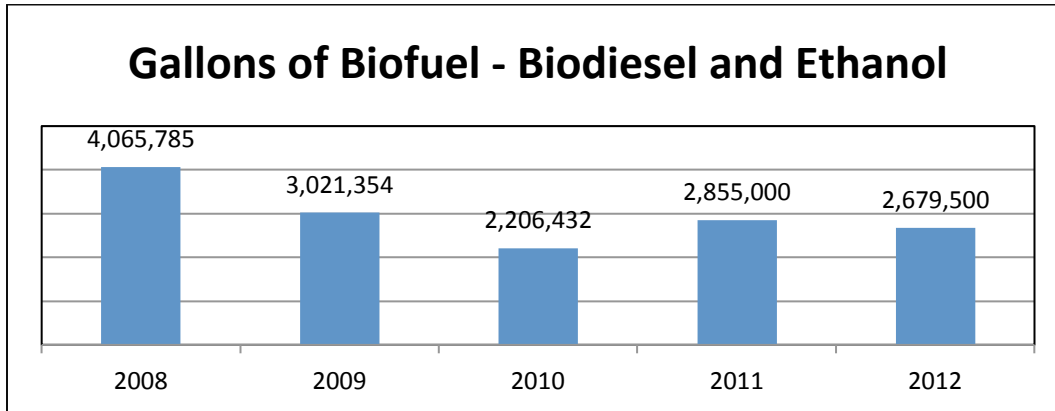
## Biofuel Fuel Production Update

Three small biodiesel facilities, and one ethanol facility are currently in operation within the Commonwealth of Virginia. These facilities have a production capacity of nearly 20 million gallons, but produced only 2.9 million gallons of fuel in 2012.

Virginia is a greater producer of biofuel than of traditional petroleum. In the same timeframe, approximately one million gallons of petroleum was produced in Virginia according to the Energy Information Administration.

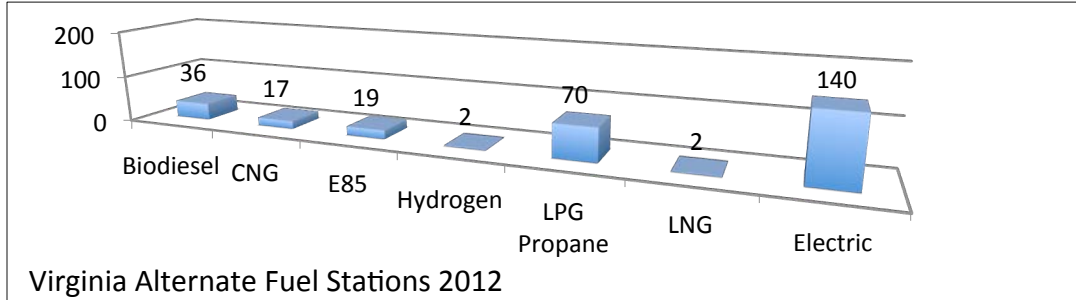


The chart below shows gallons of biofuel produced in Virginia in both ethanol and biodiesel facilities. While the majority of production is biodiesel, approximately 700,000 gallons this reporting period is ethanol.



## Alternate Fuel Station Update

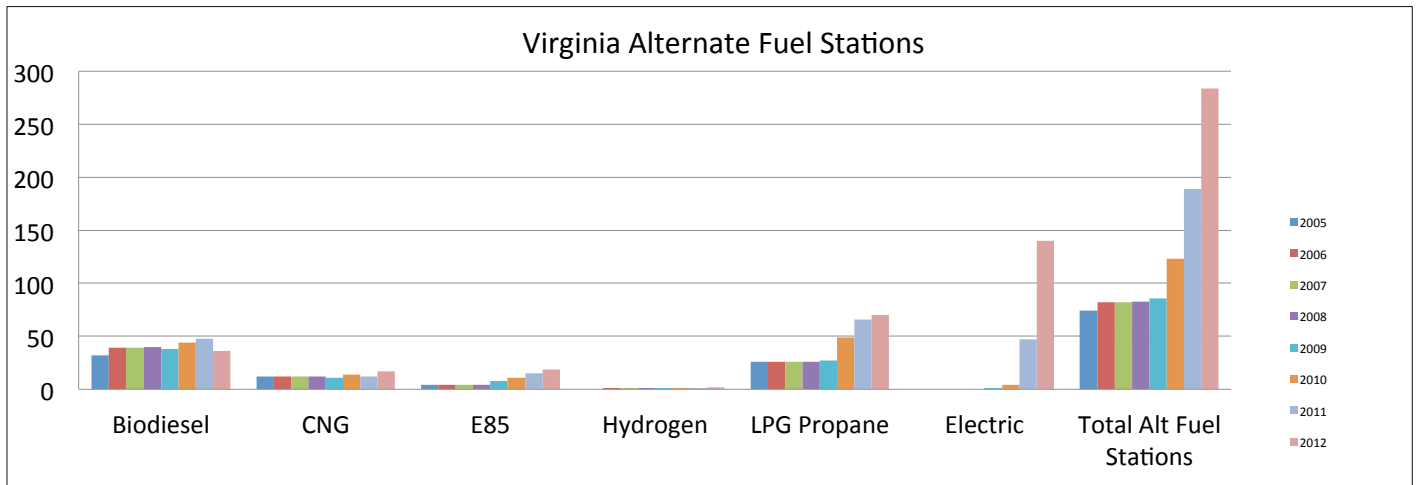
Inventory for the year 2012 included a total of 286 public and private alternate fuel stations throughout the Commonwealth. Together, with a recent boost in the number of new CNG, E85, and electric vehicle charging stations, Virginia gained 97 new stations in the current calendar year, including its first two liquefied natural gas stations, which are installed and will be operational in 2013. A vast majority of the electric stations are Level 2 J1772 standard charging stations that will rapidly recharge a vehicle. There was a decline in biodiesel stations seen in 2012.



Alternate Fuel Stations in Virginia by Type 2012

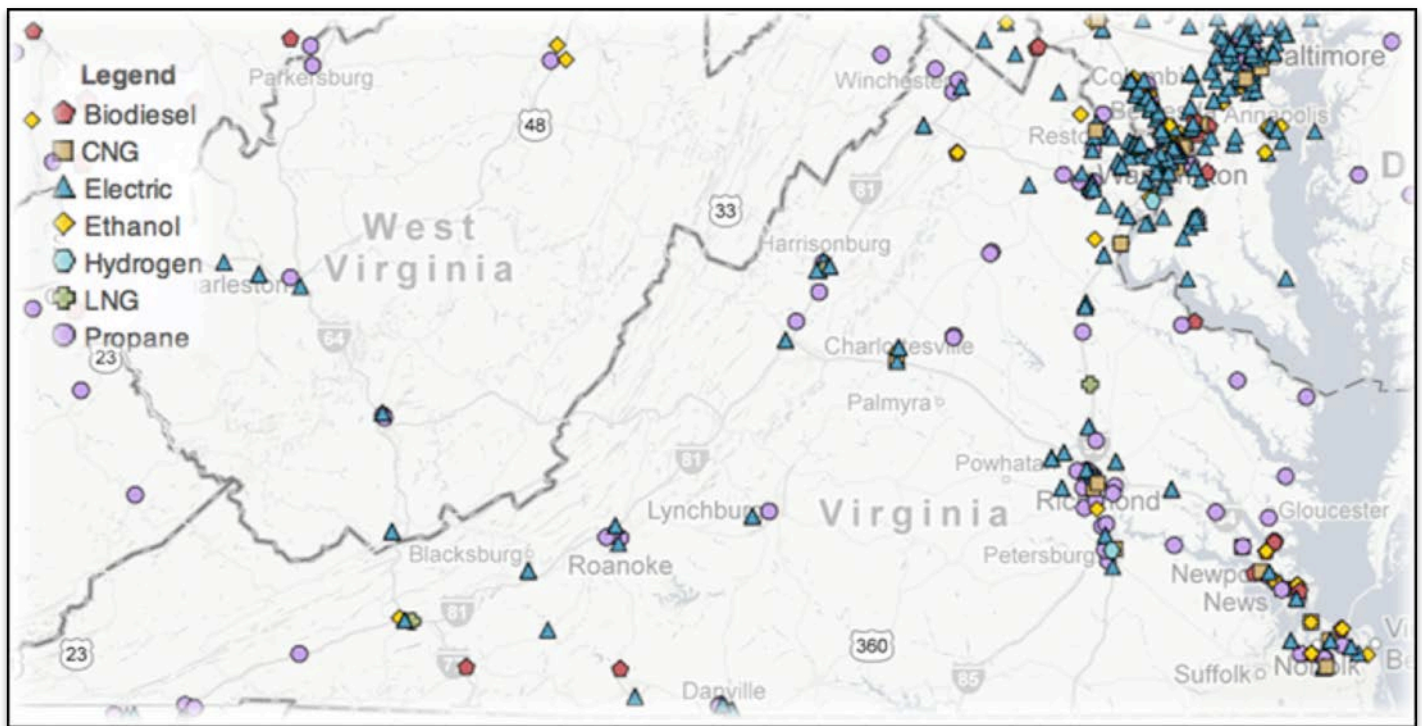
Year	Biodiesel	CNG	E85	Hydrogen	LPG Propane	LNG	Electric	Total Alt Fuel Stations
2005	32	12	4	0	26			74
2006	39	12	4	1	26			82
2007	39	12	4	1	26			82
2008	40	12	4	1	26			83
2009	38	11	8	1	27		1	86
2010	44	14	11	1	49		4	123
2011	48	12	15	1	66		47	189
2012	36	17	19	2	70	2	140	286
New Stations:	-12	5	4	1	4	2	93	97

## Number of Virginia Alternate Fuel Stations Over Time



The Department of Energy hosts an interactive public map service for alternate fuels stations online at:

<http://www.afdc.energy.gov/afdc/locator/stations/>



This federal map snapshot shows public, private, and planned alternate fuel stations and does not reflect biodiesel blends less than 20%. December 2012.

A listing of Virginia, DC, and Maryland E85 stations can be found online at:

<http://www.vacleancities.org/e85stationlocator.pdf>