

## Ford Escape Advanced Research Fleet

Number of vehicles: 9

Date range of data received: 12/01/2012 to 12/31/2012

Reporting period: December 2012

Number of vehicle days driven: 99

### All Trips Combined

Overall gasoline fuel economy (mpg)	39
Overall AC electrical energy consumption (AC Wh/mi) <sup>1</sup>	126
Overall DC electrical energy consumption (DC Wh/mi) <sup>2</sup>	86
Total number of trips	470
Total distance traveled (mi)	4,017

### Trips in Charge Depleting (CD) mode<sup>3</sup>

Gasoline fuel economy (mpg)	45
DC electrical energy consumption (DC Wh/mi) <sup>4</sup>	152
Number of trips	284
Percent of trips city   highway	86%   14%
Distance traveled (mi)	1,302
Percent of total distance traveled	32%

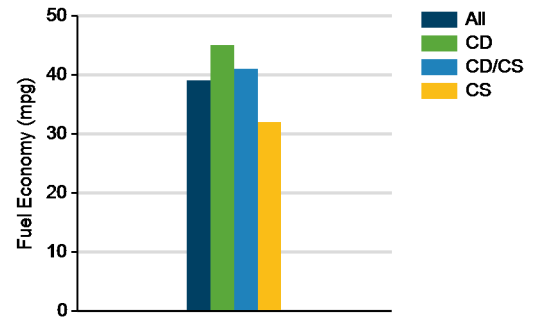
### Trips in both Charge Depleting & Charge Sustaining (CD/CS) modes<sup>5</sup>

Gasoline fuel economy (mpg)	41
DC electrical energy consumption (DC Wh/mi) <sup>6</sup>	90
Number of trips	85
Percent of trips city   highway	40%   60%
Distance traveled (mi)	1,736
Percent of total distance traveled	43%

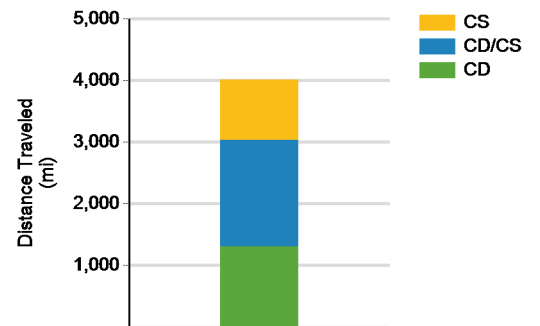
### Trips in Charge Sustaining (CS) mode<sup>7</sup>

Gasoline fuel economy (mpg)	32
Number of trips	101
Percent of trips city   highway	69%   31%
Distance traveled (mi)	979
Percent of total distance traveled	24%

Gasoline Fuel Economy By Trip Type



Distance Traveled By Trip Type



Notes: 1 - 7. Please see <http://avt.inl.gov/pdf/phev/fordreportnotes.pdf> for an explanation of all PHEV Fleet Testing Report notes.

Since these vehicles are flex-fuel capable, some driving events are conducted with E-85, which may decrease fuel economy results

"The Ford Escape Advanced Research Fleet was designed as a demonstration of customer duty cycles related to plug-in electric vehicles. The vehicles used in this demonstration have not been optimized to provide the maximum potential fuel economy."

**Trips in Charge Depleting (CD) mode**

	City	Highway
Gasoline fuel economy (mpg)	35	61
DC electrical energy consumption (DC Wh/mi)	145	158
Percent of miles with internal combustion engine off	29%	9%
Average trip driving intensity (Wh/mi)	304	327
Average trip distance (mi)	3	17

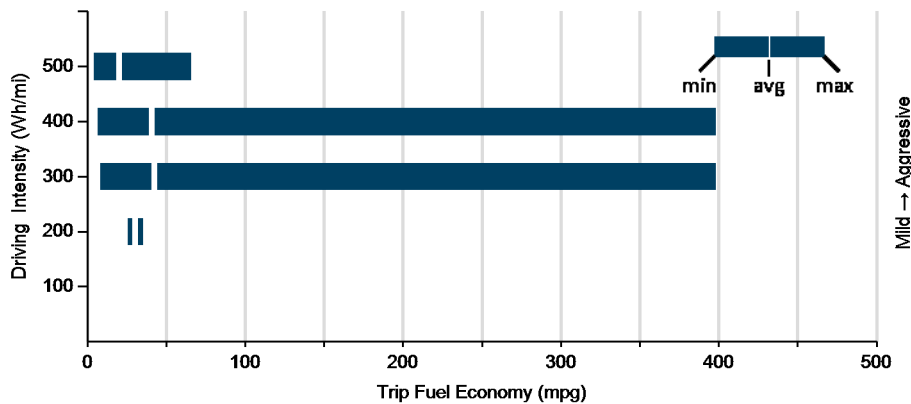
**Trips in Charge Depleting and Charge Sustaining (CD/CS) mode**

Gasoline fuel economy (mpg)	38	42
DC electrical energy consumption (DC Wh/mi)	57	94
Percent of miles with internal combustion engine off	26%	7%
Average trip driving intensity (Wh/mi)	295	334
Average trip distance (mi)	6	30

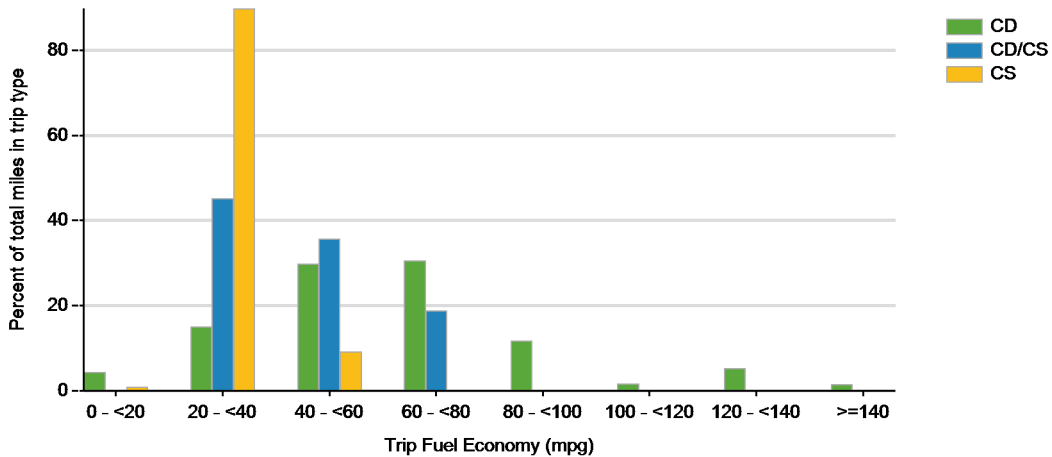
**Trips in Charge Sustaining (CS) mode**

Gasoline fuel economy (mpg)	28	33
Percent of miles with internal combustion engine off	28%	9%
Average trip driving intensity (Wh/mi)	286	321
Average trip distance (mi)	3	25

**Effect Of Driving Intensity (Wheel Energy) on Fuel Economy This Month**



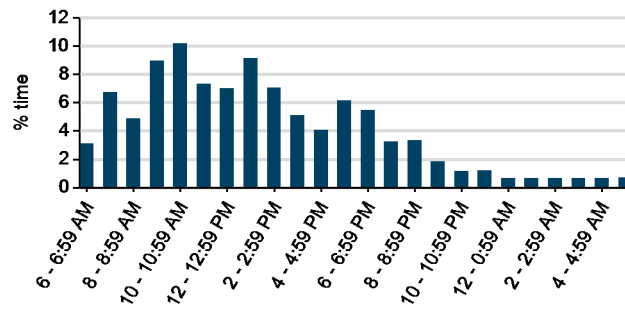
**Trip Fuel Economy Distribution By Trip Type**



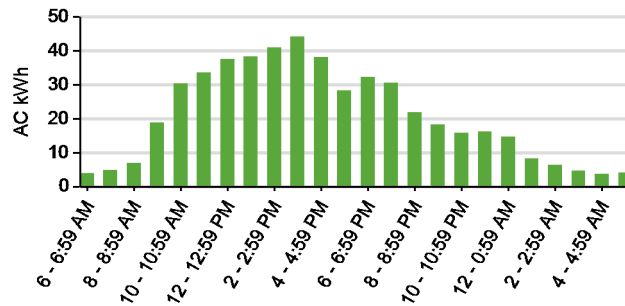
Plug-in charging

Average number of charging events per vehicle per month when driven	18
Average number of charging events per vehicle per day when driven	1.7
Average distance driven between charging events (mi)	24.2
Average number of trips between charging events	2.8
Average time plugged in per charging event (hr)	9.6
Average time charging per charging event (hr)	2.0
Average energy per charging event (AC kWh)	3.0
Average charging energy per vehicle per month (AC kWh)	56.2
Total number of charging events	166
Total charging energy (AC kWh)	505

Time of Day When Driving



Time of Day When Charging



Time of Day When Plugging In

