

## Ford Escape Advanced Research Fleet

Number of vehicles: 21

Date range of data received: 11/01/2009 to 11/30/2009

Reporting period: November 2009

Number of vehicle days driven: 196

### All Trips Combined

Overall gasoline fuel economy (mpg)	36
Overall AC electrical energy consumption (AC Wh/mi) <sup>1</sup>	85
Overall DC electrical energy consumption (DC Wh/mi) <sup>2</sup>	54
Total number of trips	813
Total distance traveled (mi)	10,029

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

Gasoline fuel economy (mpg)	57
DC electrical energy consumption (DC Wh/mi) <sup>4</sup>	184
Number of trips	445
Percent of trips city   highway	79%   21%
Distance traveled (mi)	2,055
Percent of total distance traveled	20%

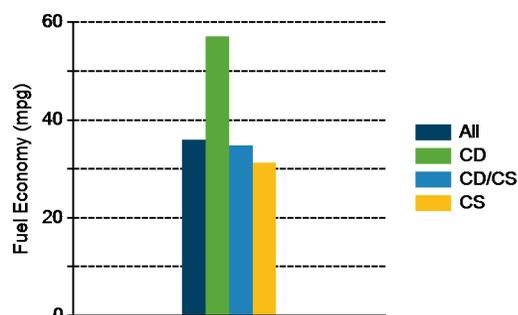
### Trips in both Charge Depleting & Charge Sustaining (CD/CS) modes<sup>5</sup>

Gasoline fuel economy (mpg)	35
DC electrical energy consumption (DC Wh/mi) <sup>6</sup>	45
Number of trips	150
Percent of trips city   highway	45%   55%
Distance traveled (mi)	3,953
Percent of total distance traveled	39%

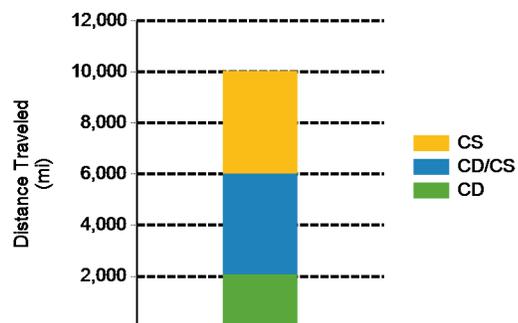
### Trips in Charge Sustaining (CS) mode<sup>7</sup>

Gasoline fuel economy (mpg)	31
Number of trips	218
Percent of trips city   highway	65%   35%
Distance traveled (mi)	4,020
Percent of total distance traveled	40%

Gasoline Fuel Economy By Trip Type



Distance Traveled By Trip Type



Notes: 1 - 7. Please see <http://avt.inel.gov/phev/fordreportnotes> 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)	56	61
DC electrical energy consumption (DC Wh/mi)	196	176
Percent of miles with internal combustion engine off	43%	11%
Average trip driving intensity (Wh/mi)	275	321
Average trip distance (mi)	2	13

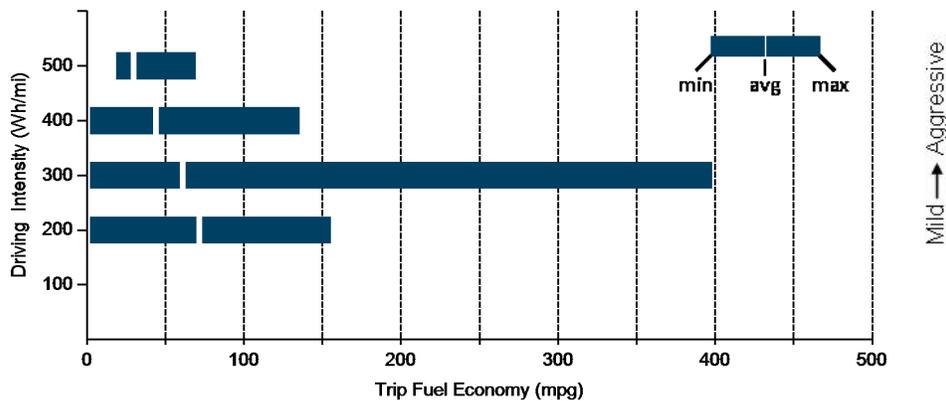
**Trips in Charge Depleting and Charge Sustaining (CD/CS) mode**

Gasoline fuel economy (mpg)	47	34
DC electrical energy consumption (DC Wh/mi)	80	40
Percent of miles with internal combustion engine off	34%	3%
Average trip driving intensity (Wh/mi)	276	339
Average trip distance (mi)	7	42

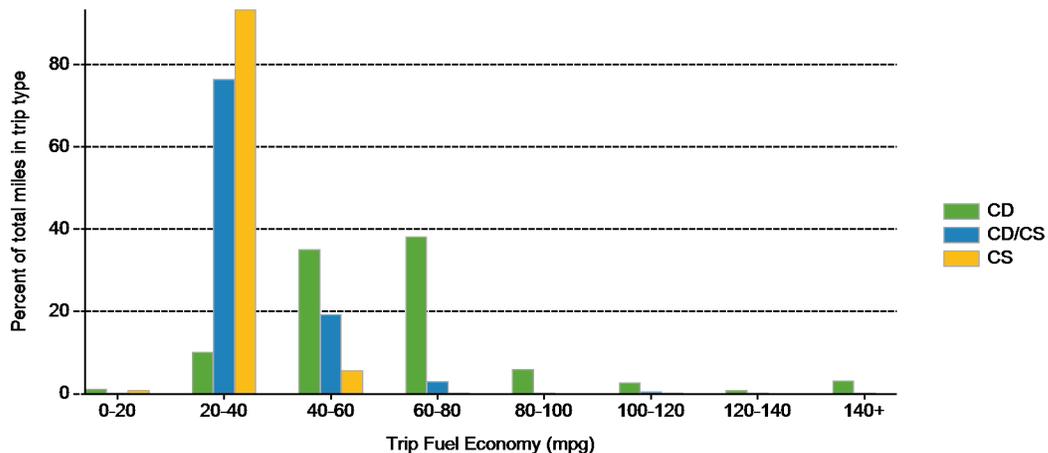
**Trips in Charge Sustaining (CS) mode**

Gasoline fuel economy (mpg)	34	31
Percent of miles with internal combustion engine off	25%	5%
Average trip driving intensity (Wh/mi)	266	324
Average trip distance (mi)	3	47

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



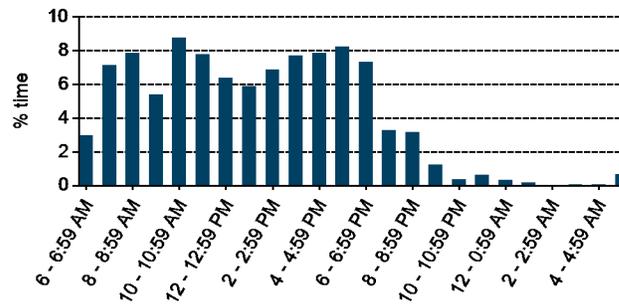
**Trip Fuel Economy Distribution By Trip Type**



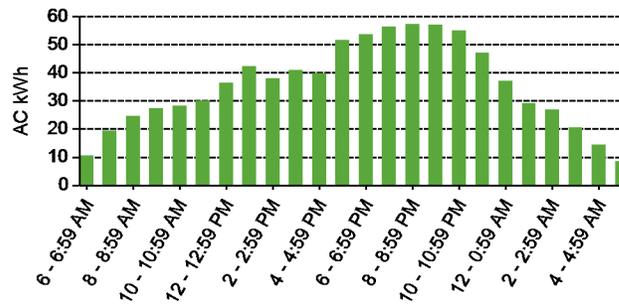
Plug-in charging

Average number of charging events per vehicle per month when driven	20
Average number of charging events per vehicle per day when driven	2.1
Average distance driven between charging events (mi)	24.9
Average number of trips between charging events	2.0
Average time plugged in per charging event (hr)	8.8
Average time charging per charging event (hr)	1.8
Average energy per charging event (AC kWh)	2.1
Average charging energy per vehicle per month (AC kWh)	42.6
Total number of charging events	402
Total charging energy (AC kWh)	852

Time of Day When Driving



Time of Day When Charging



Time of Day When Plugging In

