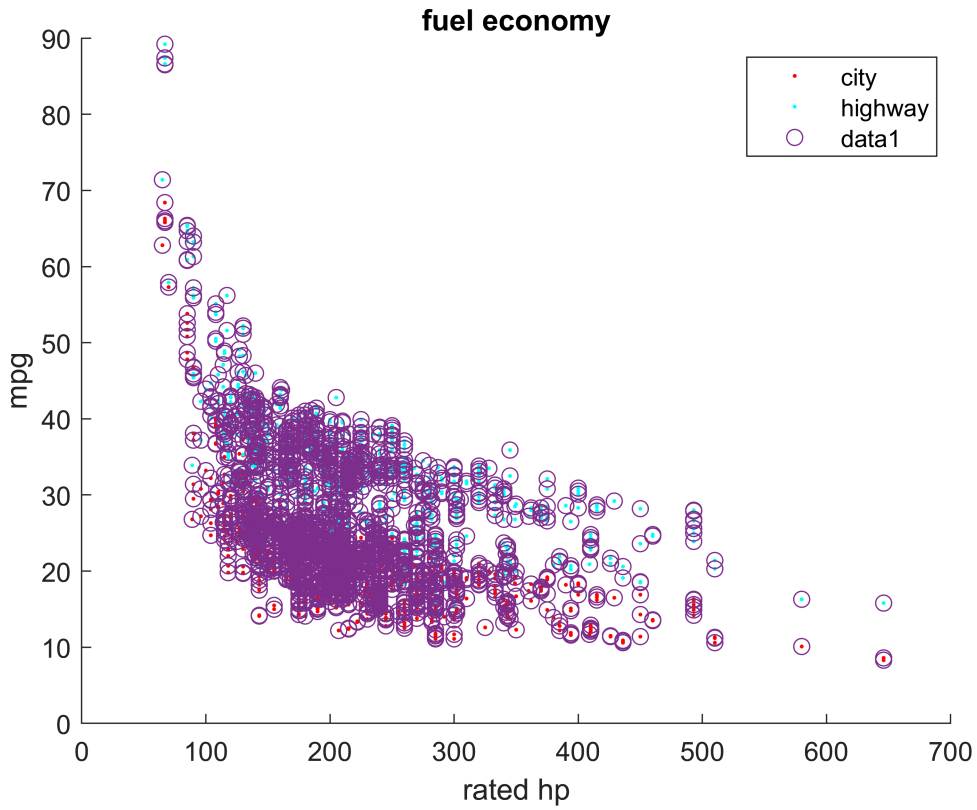
Fuel economy

Importing data

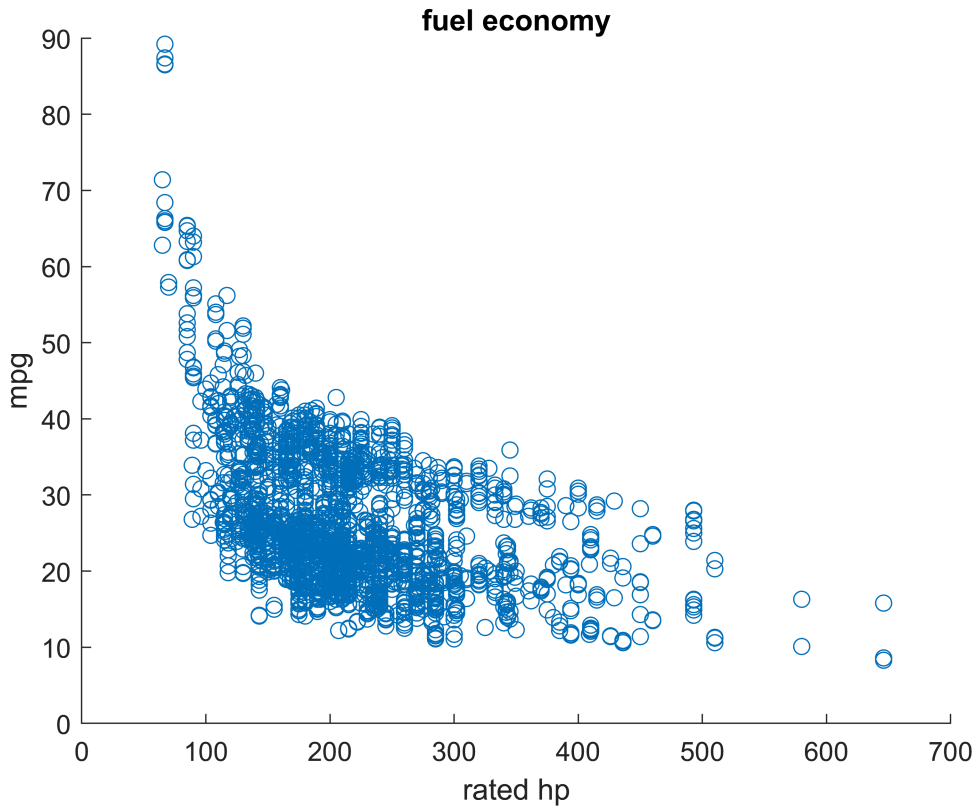
```
carData=importfile('2003dat.xlsx');
```

$\sqrt{42}$

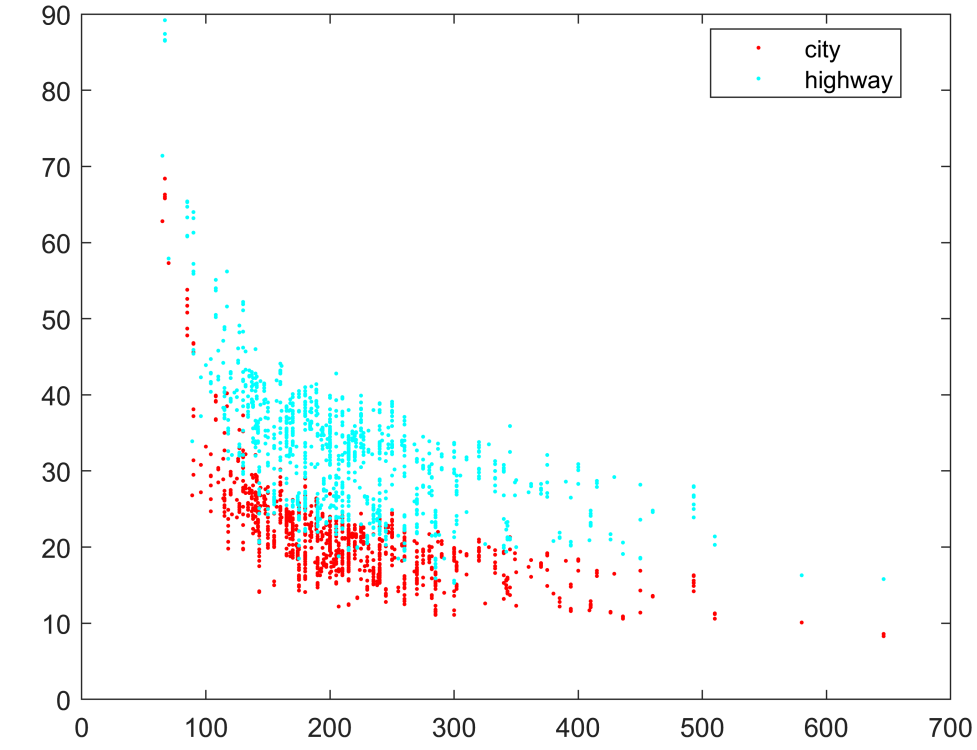
```
%plot(carData.MPG)
%plot(carData.RatedHP,carData.MPG)
scatter(carData.RatedHP,carData.MPG)
```




```
createfigure(carData.RatedHP,carData.MPG)
```



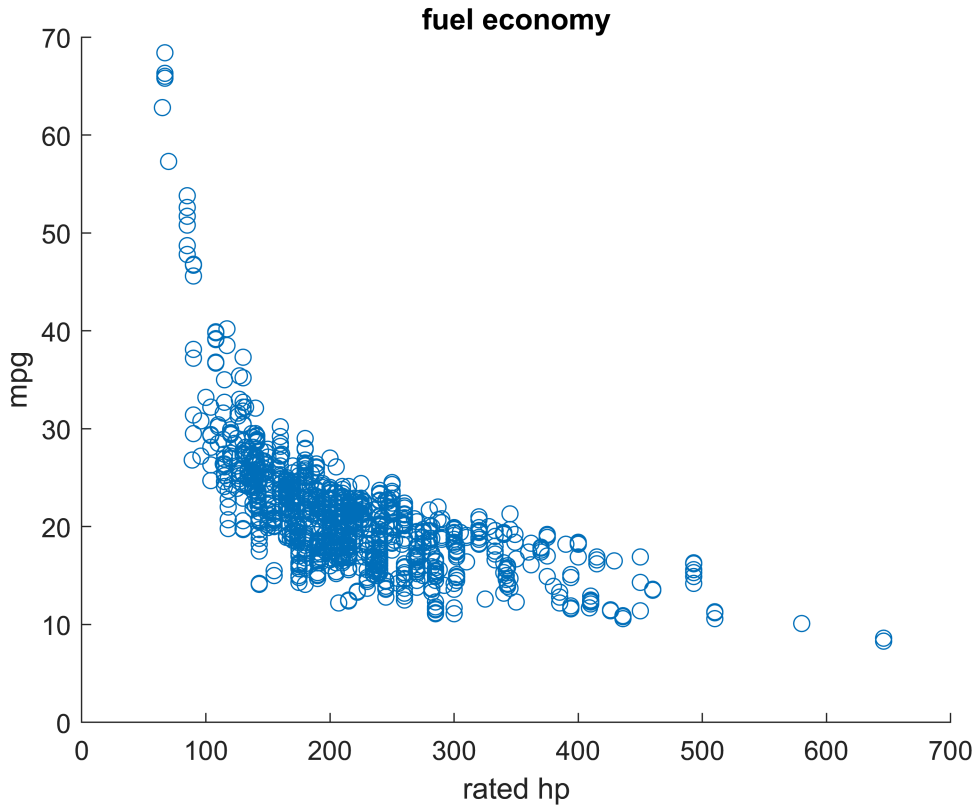

```
figure
gscatter(carData.RatedHP,carData.MPG,carData.City_Highway)
```



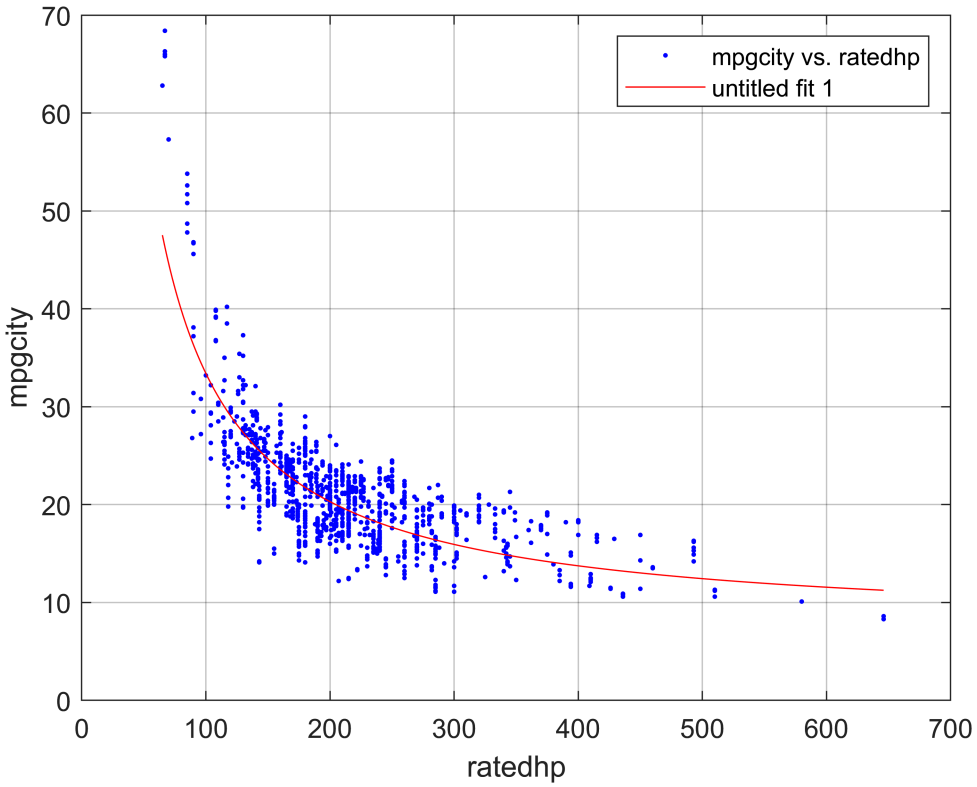
```
citydriving=carData.City_Highway=='city'
```

```
citydriving = 2497×1 logical array
   0
   1
   0
   1
   0
   1
   0
   0
   1
   0
     ⋮
```

```
mpgcity=carData.MPG(citydriving);
ratedhp=carData.RatedHP(citydriving);
%plot(ratedhp,mpgcity)
createfigure(ratedhp,mpgcity)
```




```
model=createFit(ratedhp,mpgcity)
```




```
model =
     General model:
     model(x) = b1+b2/x
     Coefficients (with 95% confidence bounds):
       b1 =       7.194  (6.595, 7.793)
       b2 =        2622  (2515, 2728)
```

```
model(600)
```

```
ans = 11.5633
```