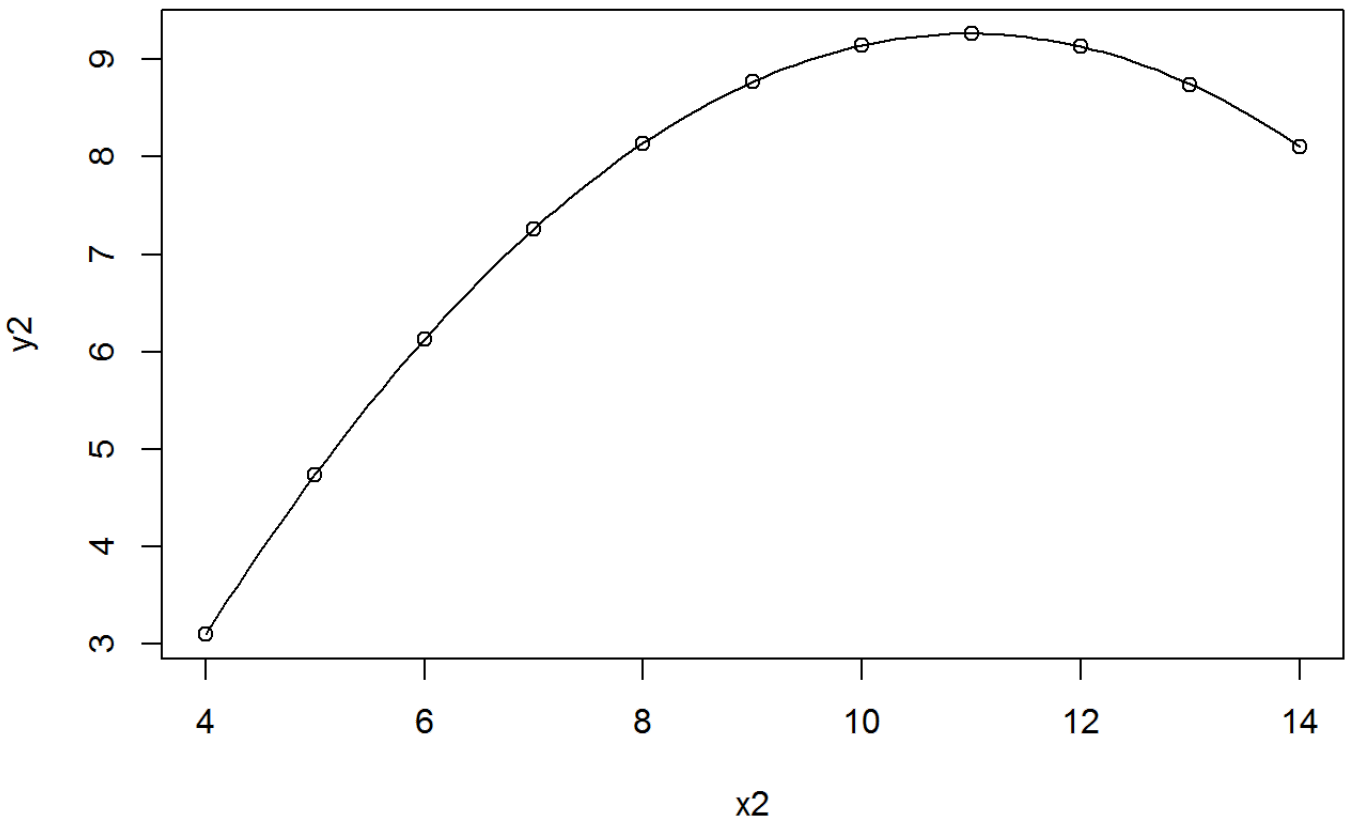
Week9_Dataset2

```
file_name <- "C:\\CUNY\\cuny9.csv"
cuny9 <- read.table(file=file_name, header=TRUE, sep=",")
x2 <- cuny9["x2"]
y2 <- cuny9["y2"]
plot(y2~x2)
p = lm(y2 ~ x2 + I(x2^2) + I(x2^3))
summary(p)
```

```
##
## Call:
## lm(formula = y2 ~ x2 + I(x2^2) + I(x2^3))
##
## Residuals:
##       Min        1Q    Median        3Q       Max
## -0.001329 -0.001189 -0.000629  0.000874  0.002378
##
## Coefficients:
##              Estimate Std. Error t value Pr(>|t|)
## (Intercept) -6.00e+00   1.37e-02    -436  < 2e-16 ***
## x2           2.78e+00   5.24e-03     530  < 2e-16 ***
## I(x2^2)     -1.27e-01   6.17e-04    -205  1.7e-14 ***
## I(x2^3)     -1.65e-17   2.27e-05       0        1
## ---
## Signif. codes:  0 '***' 0.001 '**' 0.01 '*' 0.05 '.' 0.1 ' ' 1
##
## Residual standard error: 0.00179 on 7 degrees of freedom
## Multiple R-squared:     1,   Adjusted R-squared:     1
## F-statistic: 4.3e+06 on 3 and 7 DF,  p-value: <2e-16
```

```
curve(-5.996+2.781*x-0.1267*x^2-1.648e-17*x^3,add=T)
```


y2
3
4
5
6
7
8
9
4
6
8
10
12
14
x2