Question 1

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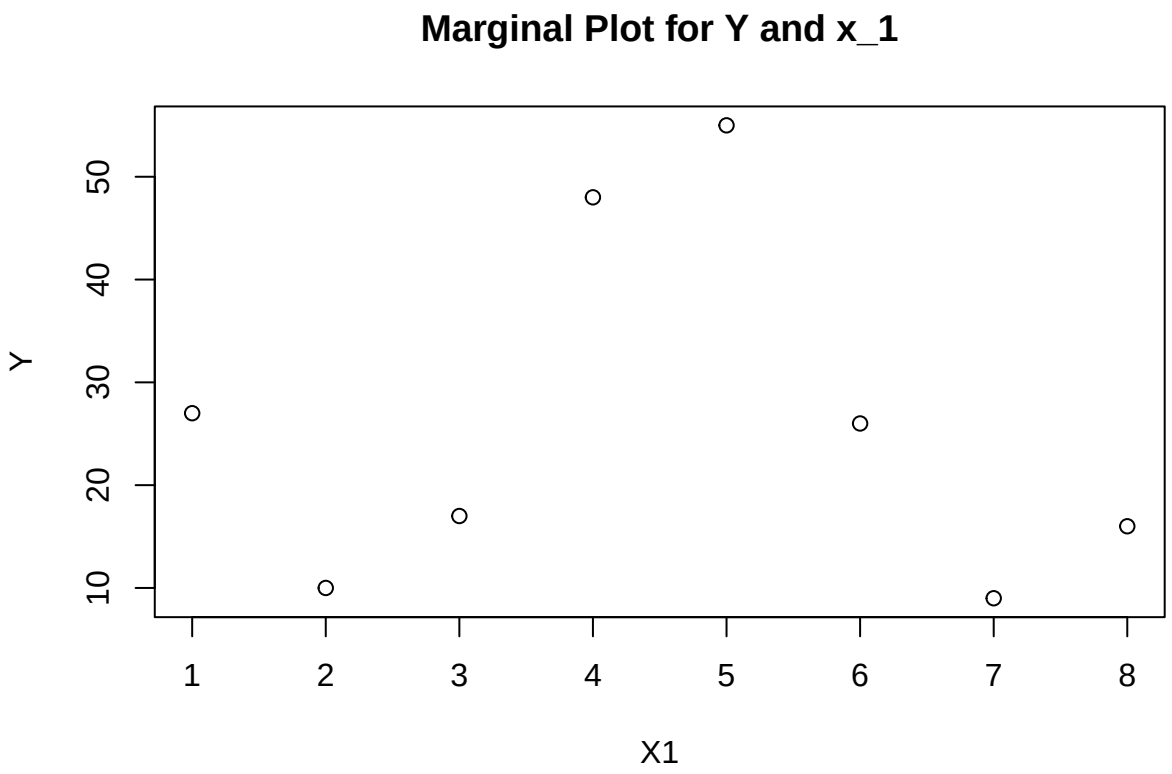
Marginal Plot

```
dat = data.frame(matrix(c(10, 2, 1,17, 3, 2,48, 4, 5,27, 1, 2,55, 5, 6,26, 6,
4, 9, 7, 3,16, 8, 4),ncol=3,byrow=T))
colnames(dat)=c("y","x1","x2")

pander:: pander(dat)
```

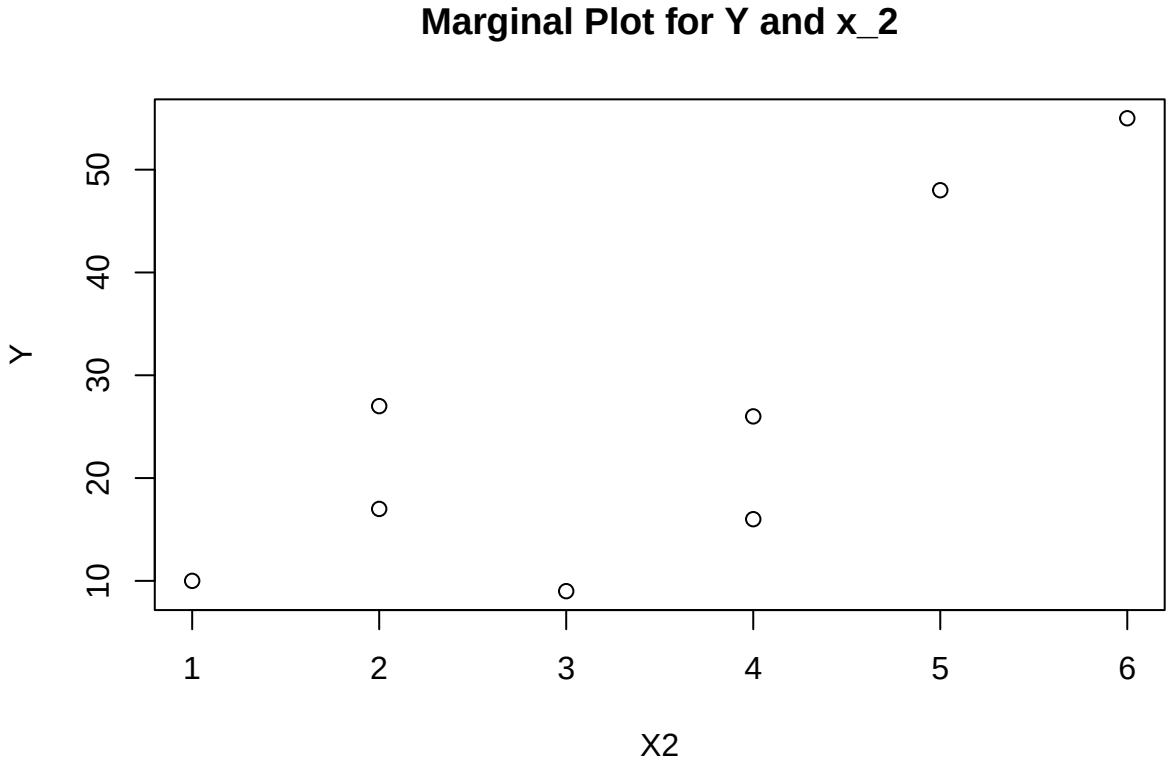
y	x1	x2
10	2	1
17	3	2
48	4	5
27	1	2
55	5	6
26	6	4
9	7	3
16	8	4

Observations from $y = 8 - 5x_1 + 12x_2$

```
## Marginal plot for x1

plot(y~x1,data=dat, main = "Marginal Plot for Y and x_1", xlab = "X1", ylab = "Y")
```




```
plot(y~x2,data=dat,main = "Marginal Plot for Y and x_2", xlab = "X2", ylab = "Y")
```



We can see from the marginal plots of $Y \sim X_1$ and $Y \sim X_2$ are not very clear on the relationship between the variables. The plot for $Y \sim X_1$ does not really show a clear relationship but we see a not so clear weak linear relationship between Y and X_2.