

#a. Is there any difference in fares by different class of tickets?

#Note - Show a boxplot displaying the distribution of fares by class

#use titanic dataset

```
library(readr)
```

```
titanic <- read_csv("G:/DATA ANALYTICS/DATA/titanic3.csv")
```

```
str(titanic)
```

```
View(titanic)
```

```
boxplot(fare~pclass,data= titanic,
```

```
      main="Fares Versus Pclass",xlab="Class",ylab="Fares",col=topo.colors(3))
```

Answer1.b. Is there any association with Passenger class and gender?

Note - Show a stacked bar chart

```
counts<-table(titanic$sex,titanic$pclass)
```

```
barplot(counts, main = "Distribution of Class by gender", xlab="Pclass", col=c("blue", "red"), legend =  
c("Female","Male"), names.arg = c("Pclass1st", "Pclass2nd","Pclass3rd"))
```

#another way --> chisq test for checking association

```
chisq.test(titanic$pclass ,titanic$sex)
```

#ho:there is no association

#since p value is 0.0002064<0.05

#we reject the null hypothesis and thus say there is association