

R Notebook

This is an [R Markdown](#) Notebook. When you execute code within the notebook, the results appear beneath the code.

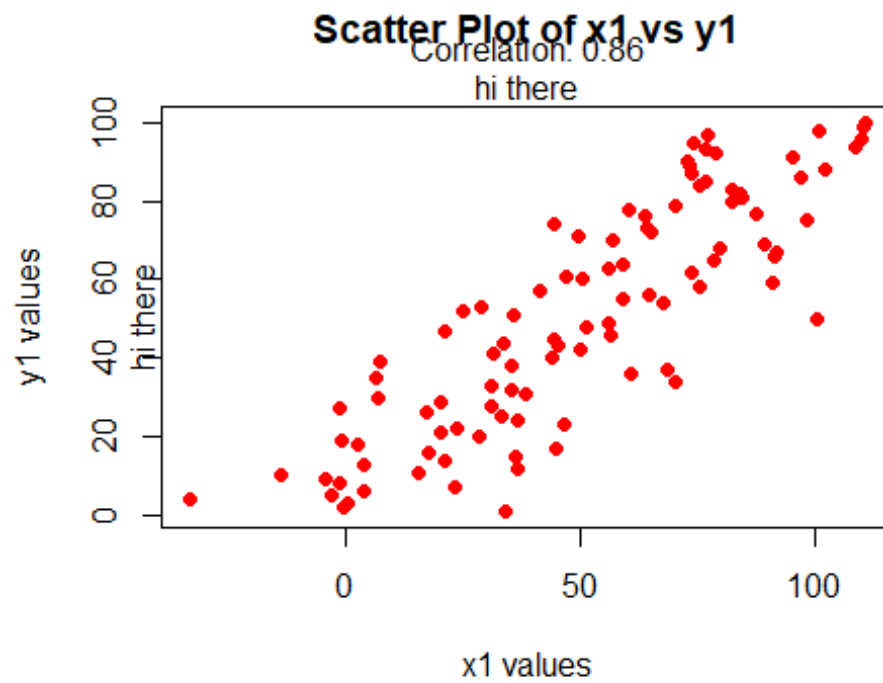
Try executing this chunk by clicking the *Run* button within the chunk or by placing your cursor inside it and pressing *Ctrl+Shift+Enter*.

```
set.seed(1001)
x1 = 1:100 + rnorm(100, mean=0, sd=15)
y1 = 1:100
pdf("all_plots.pdf", width = 8, height = 10)
```

When you save the notebook, an HTML file containing the code and output will be saved alongside it (click the *Preview* button or press *Ctrl+Shift+K* to preview the HTML file).

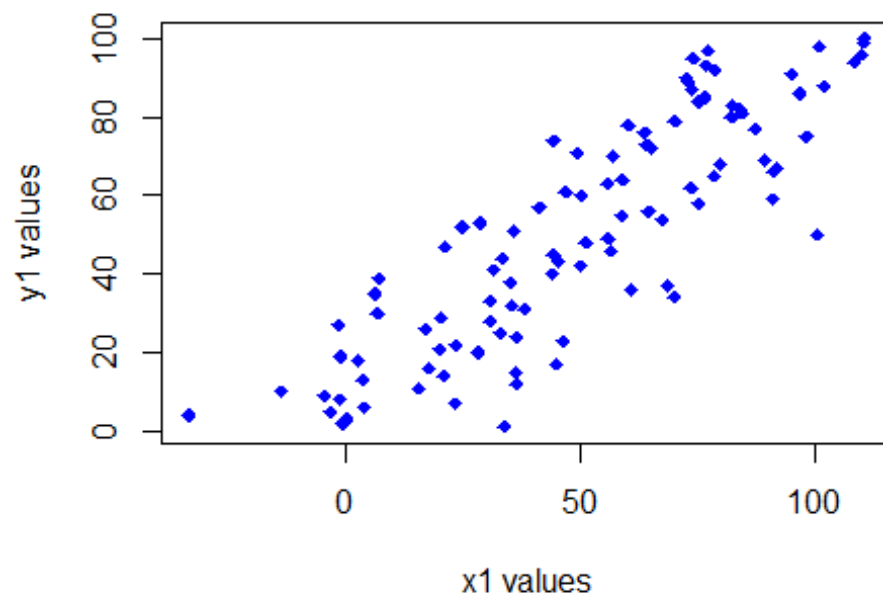
The preview shows you a rendered HTML copy of the contents of the editor. Consequently, unlike *Knit*, *Preview* does not run any R code chunks. Instead, the output of the chunk when it was last run in the editor is displayed.

```
plot(x1, y1,
     main = "Scatter Plot of x1 vs y1",
     xlab = "x1 values",
     ylab = "y1 values",
     col = "red",
     pch = 19)
mtext(side = 3, text = "hi there")
mtext(side = 2, text = "hi there")
cor_value <- cor(x1, y1)
mtext(side = 3, text = paste("Correlation:", round(cor_value, 2)), line = 1)
```

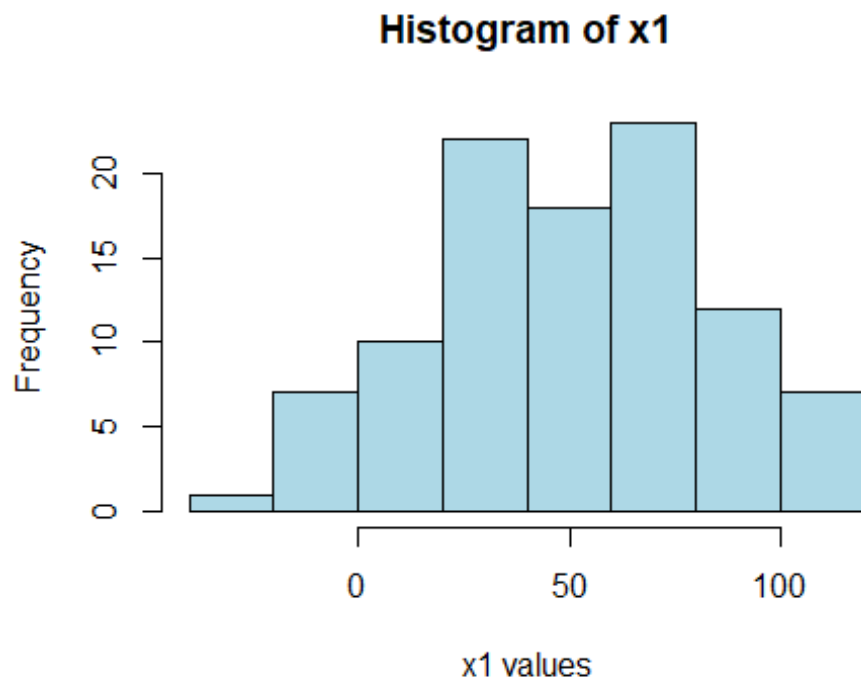


```
plot(x1, y1,  
     main = "Scatter Plot with pch=18",  
     xlab = "x1 values",  
     ylab = "y1 values",  
     col = "blue",  
     pch = 18)
```

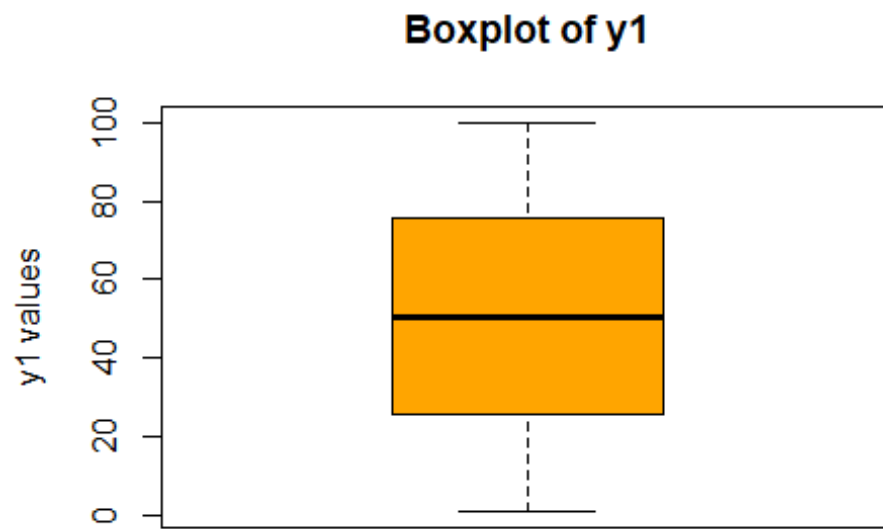
Scatter Plot with pch=18



```
hist(x1,  
     main = "Histogram of x1",  
     xlab = "x1 values",  
     col = "lightblue",  
     border = "black")
```

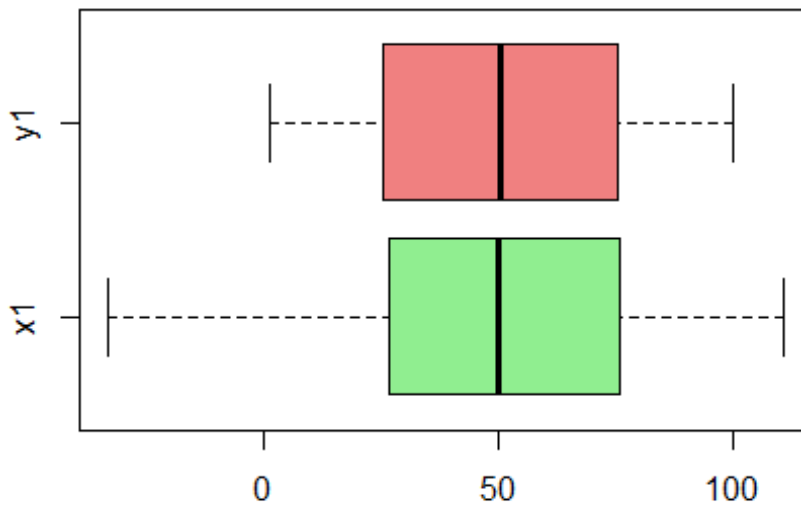


```
boxplot(y1,  
        main = "Boxplot of y1",  
        ylab = "y1 values",  
        col = "orange")
```



```
boxplot(x1, y1,  
        names = c("x1", "y1"),  
        main = "Boxplots of x1 and y1",  
        col = c("lightgreen", "lightcoral"),  
        horizontal = TRUE)
```

Boxplots of x1 and y1



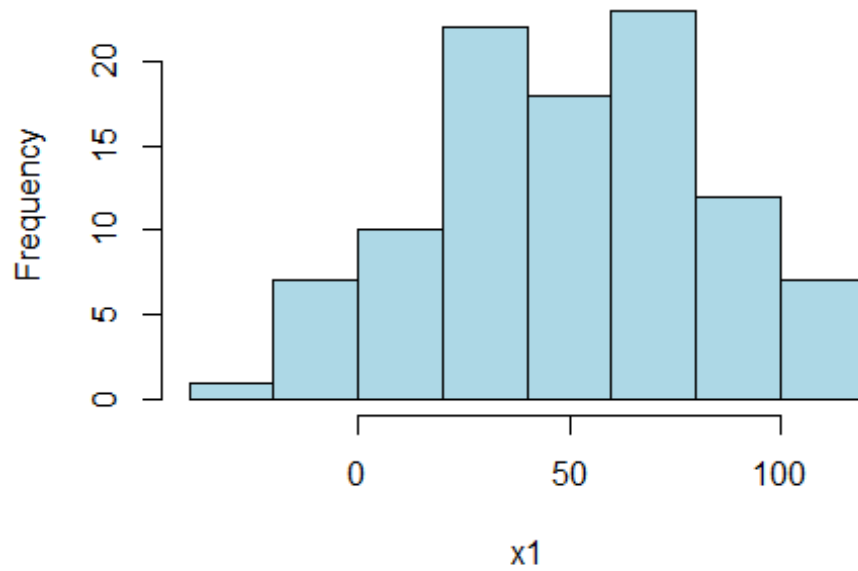
```
par(mfrow = c(2, 1))
boxplot(x1,
        main = "Boxplot of x1 (2,1 layout)",
        col = "lightgreen")
```

Boxplot of x1 (2,1 layout)



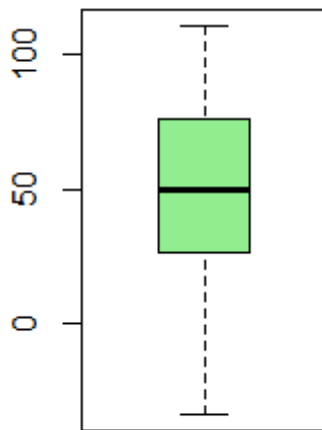
```
hist(x1,  
     main = "Histogram of x1 (2,1 layout)",  
     col = "lightblue",  
     border = "black")
```

Histogram of x1 (2,1 layout)



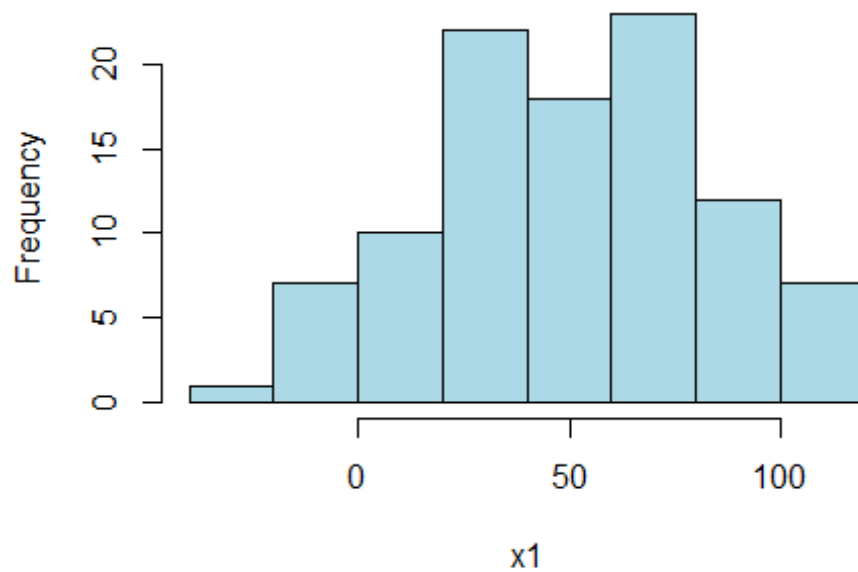
```
par(mfrow = c(1, 2))  
# Premier graphique : boxplot de x1  
boxplot(x1,  
        main = "Boxplot of x1 (1,2 layout)",  
        col = "lightgreen")
```


Boxplot of x1 (1,2 layou



```
hist(x1,  
     main = "Histogram of x1 (1,2 layout)",  
     col = "lightblue",  
     border = "black")
```

Histogram of x1 (1,2 layout)



```
pdf("my_plots.pdf")
par(mfrow=c(2,2))
plot(x1, y1, main="Scatter Plot", xlab="x1", ylab="y1", col="blue", pch=19)
hist(x1, main="Histogram of x1", col="lightblue")
boxplot(y1, main="Boxplot of y1", col="orange")
boxplot(x1, y1, names=c("x1", "y1"), main="Boxplots", col=c("lightgreen",
"lightcoral"))

dev.off()

## png
## 2

# Ouvrir un fichier PDF pour sauvegarder les graphiques
pdf("mes_graphiques.pdf")
```