

Script-tarea.R

Usuario

2020-02-20

```
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# 20-02-2020
```

```
# Ejercicio 1 -----
```

```
library(plyr)  
accidentes <- c(0,1,0,2,2,1,4,3,0,1,5,1,2,3,4,0,1,1,3,4)  
acc <- count(accidentes)  
acc
```

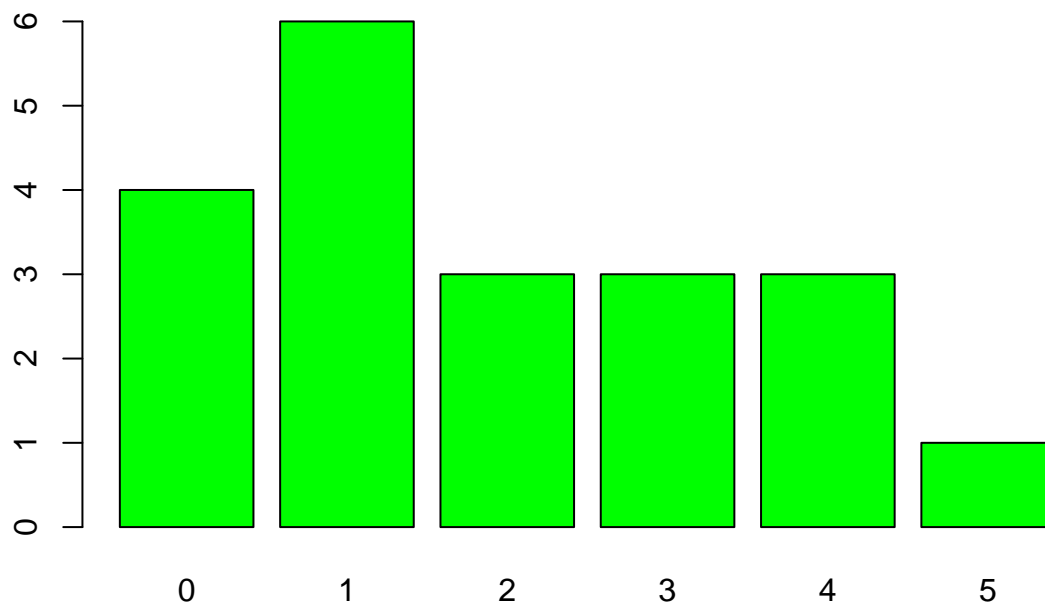
```
##   x freq  
## 1 0    4  
## 2 1    6  
## 3 2    3  
## 4 3    3  
## 5 4    3  
## 6 5    1
```

```
(acc$freq/sum(acc$freq)*100)
```

```
## [1] 20 30 15 15 15  5
```

```
acc$rf <- acc$freq/sum(acc$freq)*100  
barplot(acc$freq, names.arg = acc$x, main = " Accidentes en el aserradero", col= "green")
```

Accidentes en el aserradero



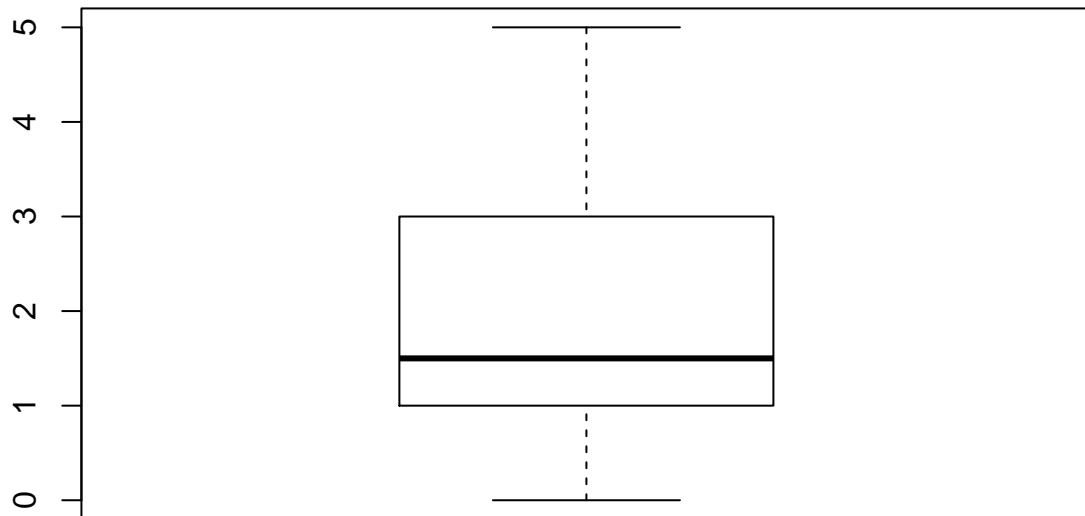
```
mean(accidentes)
```

```
## [1] 1.9
```

```
sum(accidentes)
```

```
## [1] 38
```

```
boxplot(accidentes)
```



```
#¿ Cual es el numero de accidentes al mes?
mean(accidentes)
```

```
## [1] 1.9
```

```
#¿ Que numero de accidentes reporta la mayor proporcion?
# El 1 con el 30%
```

```
# Ejercicio 2 -----
especies <- c("F", "H", "F", "C", "F", "A", "H", "F",
             "H", "C", "A", "C", "F", "H", "H", "H",
             "F", "H", "A", "C", "F", "H", "H", "F")
```

```
esp <- count(especies)
```

```
esp
```

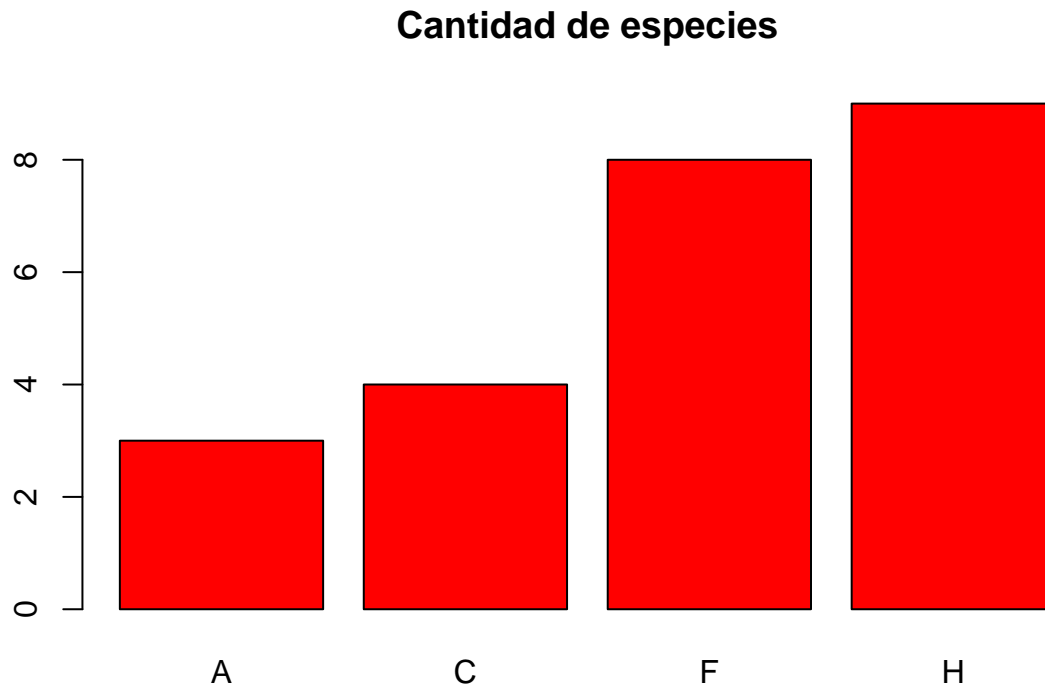
```
##   x freq
## 1 A    3
## 2 C    4
## 3 F    8
## 4 H    9
```

```
esp$rf <- esp$freq/sum(esp$freq)*100
esp
```

```
##   x freq      rf
## 1 A    3 12.5000
```

```
## 2 C    4 16.66667
## 3 F    8 33.33333
## 4 H    9 37.50000
```

```
barplot(esp$freq, names.arg = esp$x, main = "Cantidad de especies", col = "red")
```



#Ejercicio 3-----

```
library(repmis)
conjunto <- source_data("https://www.dropbox.com/s/hmsf07bbayxv6m3/cuadro1.csv?dl=1")
```

```
## Downloading data from: https://www.dropbox.com/s/hmsf07bbayxv6m3/cuadro1.csv?dl=1
```

```
## SHA-1 hash of the downloaded data file is:
```

```
## 2bdde4663f51aa4198b04a248715d0d93498e7ba
```

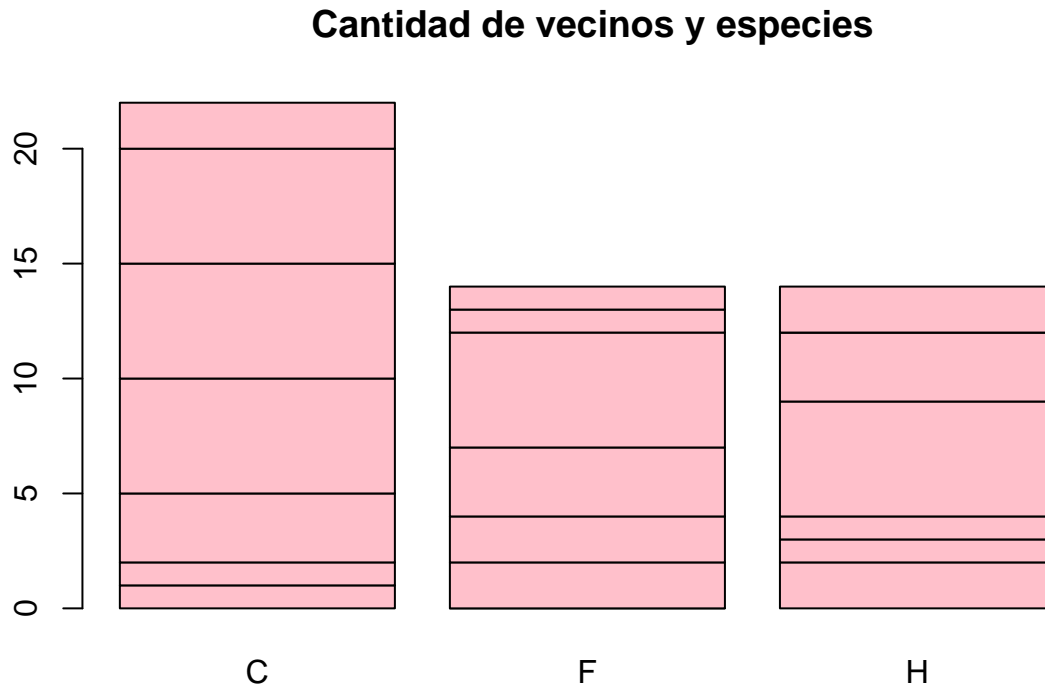
#Encontrar la frecuencia de las variables vecinos y especies

```
.vc <- table(conjunto$Vecinos, conjunto$Especie)
addmargins(as.table(.vc))
```

```
##
##      C  F  H Sum
## 0    1  0  2   3
## 1    1  2  1   4
## 2    3  2  1   6
## 3    5  3  5  13
## 4    5  5  3  13
## 5    5  1  0   6
```

```
##      6      2      1      2      5
##    Sum 22 14 14 50
```

```
barplot(table(conjunto$Vecinos, conjunto$Especie), main = " Cantidad de vecinos y especies", col = "pink")
```



#Ejercicio 4-----

```
h <- conjunto$Altura
range(h)
```

```
## [1]  8.47 21.46
```

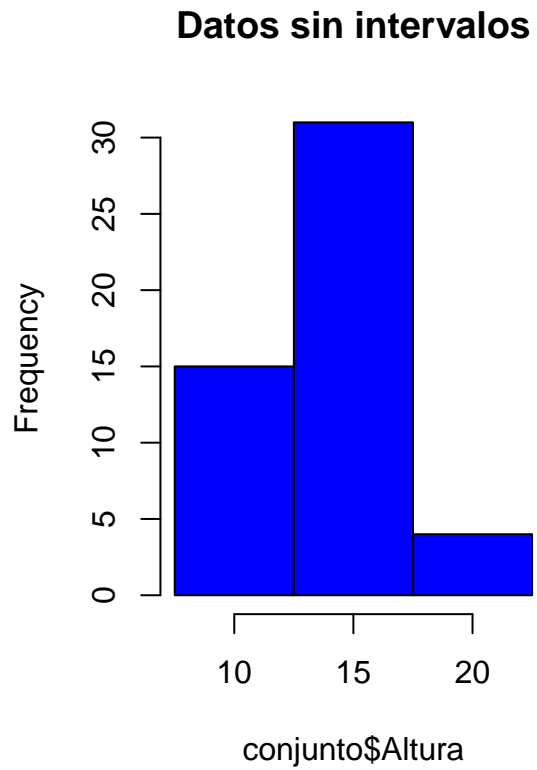
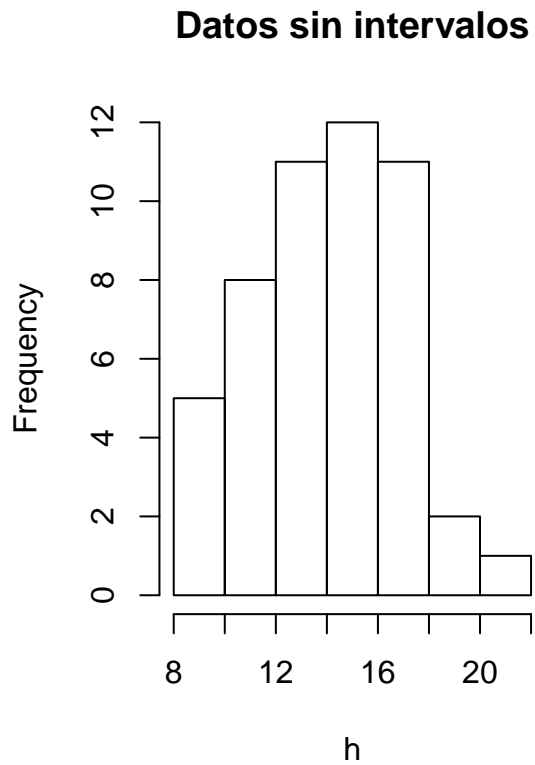
```
intervalo <- seq(7.5, 22.5, by= 5)
intervalo
```

```
## [1]  7.5 12.5 17.5 22.5
```

```
h.table <- cut(h, intervalo)
table(h.table)
```

```
## h.table
## (7.5,12.5] (12.5,17.5] (17.5,22.5]
##           15           31           4
```

```
par(mfrow=c(1,2))
hist(h, main = "Datos sin intervalos")
hist(conjunto$Altura, breaks = intervalo, main = "Datos sin intervalos", col = "blue")
```



```
par(mfrow= c(1,1))

# Ejercicio 5
diametro <- conjunto$Diametro
range(diametro)

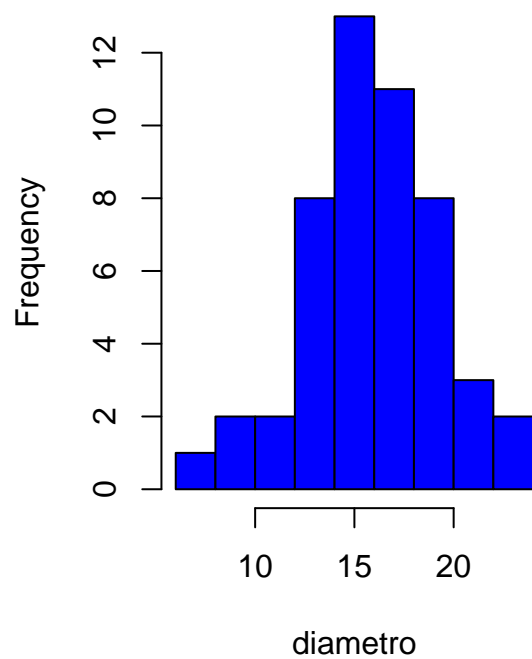
## [1] 7.7 22.7

intervalo <- seq(7.5, 27.5, by=5)
intervalo

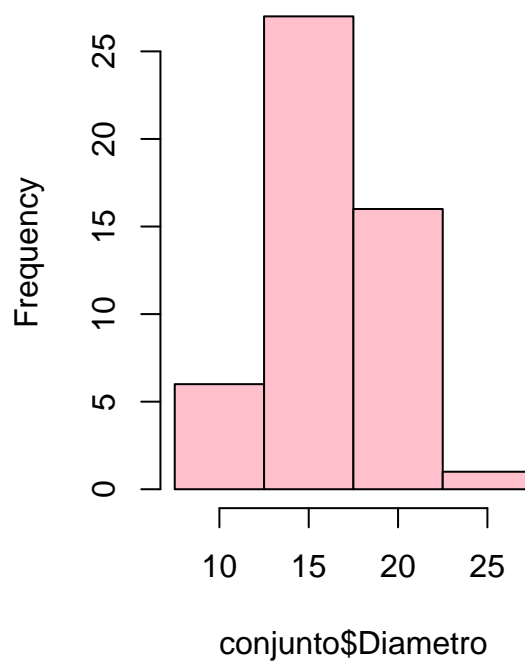
## [1] 7.5 12.5 17.5 22.5 27.5

par(mfrow=c(1,2))
hist(conjunto$Diametro, col= "blue" , main = "sin modificar", xlab = "diametro")
hist(conjunto$Diametro, breaks = intervalo, col= "pink", main = "Datos intervalos")
```

sin modificar



Datos intervalos



```
par(mfrow=c(1,1))
```