

RWorksheet_Vicinte#4a

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#1. The table below shows the data about shoe size and height. Create a data frame.

```
Hhdata <- read.csv("/cloud/project/RWorksheet4a/Household Data.csv")
Hhdata
```

##	Shoe.size	Height	Gender
## 1	6.5	66.0	F
## 2	9.0	68.0	F
## 3	8.5	64.5	F
## 4	8.5	65.0	F
## 5	10.5	70.0	M
## 6	7.0	64.0	F
## 7	9.5	70.0	F
## 8	9.0	71.0	F
## 9	13.0	72.0	M
## 10	7.5	64.0	F
## 11	10.5	74.5	M
## 12	8.5	67.0	F
## 13	12.0	71.0	M
## 14	10.5	71.0	M
## 15	13.0	77.0	M
## 16	11.5	72.0	M
## 17	8.5	59.0	F
## 18	5.0	62.0	F
## 19	10.0	72.0	M
## 20	6.5	66.0	F
## 21	7.5	64.0	F
## 22	8.5	67.0	M
## 23	10.5	73.0	M
## 24	8.5	69.0	F
## 25	10.5	72.0	M
## 26	11.0	70.0	M
## 27	9.0	69.0	M
## 28	13.0	70.0	M

#a. Describe the data. #The data consist of Shoe size, Height and Gender.

#b. Create a subset by males and females with their corresponding shoe size and height. What its result? Show the R scripts.

```
MF <- subset(Hhdata, Gender == "M" & Shoe.size & Height)
MF
```

##	Shoe.size	Height	Gender
## 5	10.5	70.0	M

```
## 9      13.0    72.0     M
## 11     10.5    74.5     M
## 13     12.0    71.0     M
## 14     10.5    71.0     M
## 15     13.0    77.0     M
## 16     11.5    72.0     M
## 19     10.0    72.0     M
## 22      8.5    67.0     M
## 23     10.5    73.0     M
## 25     10.5    72.0     M
## 26     11.0    70.0     M
## 27      9.0    69.0     M
## 28     13.0    70.0     M
```

```
FM <- subset(Hhdata, Gender == "F" & Shoe.size & Height)
FM
```

```
##      Shoe.size Height Gender
## 1         6.5    66.0      F
## 2         9.0    68.0      F
## 3         8.5    64.5      F
## 4         8.5    65.0      F
## 6         7.0    64.0      F
## 7         9.5    70.0      F
## 8         9.0    71.0      F
## 10        7.5    64.0      F
## 12        8.5    67.0      F
## 17        8.5    59.0      F
## 18        5.0    62.0      F
## 20        6.5    66.0      F
## 21        7.5    64.0      F
## 24        8.5    69.0      F
```

#c. Find the mean of shoe size and height of the respondents. Write the R scripts and its result.

```
meanSs <- mean(Hhdata$Shoe.size)
meanH <- mean(Hhdata$Height)
meanSs
```

```
## [1] 9.410714
```

```
meanH
```

```
## [1] 68.57143
```

#d. Is there a relationship between shoe size and height? Why?

yes they have relationship. If the male have the same height there are times that they are not equal in shoe size same with female but when it comes to both gender have the same height it's noticable that male always have a larger shoe size than female.

#2.

```
months <- c("March", "April", "January", "November", "January",
"September", "October", "September", "November", "August",
```

```
"January", "November", "November", "February", "May", "August", "July", "December", "August", "August", "September"
months
```

```
## [1] "March"      "April"      "January"    "November"   "January"    "September"
## [7] "October"    "September"  "November"   "August"     "January"    "November"
## [13] "November"   "February"   "May"        "August"     "July"       "December"
## [19] "August"     "August"     "September"  "November"   "February"   "April"
```

```
factor_months_vector <- factor(months)
factor_months_vector
```

```
## [1] March      April      January    November   January    September  October
## [8] September  November   August     January    November   November   February
## [15] May        August     July       December   August     August     September
## [22] November   February   April
## 11 Levels: April August December February January July March May ... September
```

#3.

```
SummaryM <- summary(months)
SummaryM
```

```
##      Length      Class      Mode
##          24 character character
```

```
SummaryF <- summary(factor_months_vector)
SummaryF
```

```
##      April      August  December  February   January      July      March      May
##          2         4          1          2         3          1          1          1
## November   October September
##          5          1          3
```

#4.

```
direction <- c("East", "West", "North")
Frequency <- c(1,4,3)
factor_data <- data.frame(direction,Frequency)
factor_data
```

```
##      direction Frequency
## 1      East          1
## 2      West          4
## 3      North          3
```

```
new_order_data <- factor(factor_data, levels = c("East", "West", "North"))
new_order_data
```

```
## direction Frequency
##      <NA>      <NA>
## Levels: East West North
```

#5. #a. Import the excel file into the Environment Pane using read.table() function. Write the code.

```
readTable <- read.table("import_march.csv", header=TRUE, sep=",")
readTable
```

```
##      Students Strategy1 Strategy2 Strategy3
## 1      Male          8          10          8
## 2              4           8           6
```

```
## 3      0      6      4
## 4  Female 14      4     15
## 5      10     2     12
## 6      6      0      9
```

#b. View the dataset. Write the R scripts and its result.

```
print(readTable)
```

```
##  Students Strategy1 Strategy2 Strategy3
## 1    Male      8      10      8
## 2      4      8      6
## 3      0      6      4
## 4  Female 14      4     15
## 5      10     2     12
## 6      6      0      9
```