

Module-8.R

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```
#Step 1
col_names= c('Name','Age','Sex','Grade')
Student_assignment6 <- read.table('Assignment 6 Dataset.txt', sep=',', header=TRUE, col.names = col_names)
Student_assignment6
```

```
##      Name Age  Sex Grade
## 1   Booker 18  Male   83
## 2    Lauri 21 Female   90
## 3   Leonie 21 Female   91
## 4  Sherlyn 22 Female   85
## 5  Mikaela 20 Female   69
## 6  Raphael 23  Male   91
## 7    Aiko 24 Female   97
## 8  Tiffaney 21 Female   78
## 9   Corina 23 Female   81
## 10 Petronila 23 Female   98
## 11  Alecia 20 Female   87
## 12 Shemika 23 Female   97
## 13  Fallon 22 Female   90
## 14 Deloris 21 Female   67
## 15  Randee 23 Female   91
## 16   Eboni 20 Female   84
## 17  Delfina 19 Female   93
## 18 Ernestina 19 Female   93
## 19    Milo 19  Male   67
```

```
#Step 2
install.packages("plyr")

## Installing package into '/cloud/lib/x86_64-pc-linux-gnu-library/4.2'
## (as 'lib' is unspecified)

library(plyr)
Student <- ddply(Student_assignment6,"Sex",transform, Grade.Average=mean(Grade))
Student
```

```
##      Name Age  Sex Grade Grade.Average
## 1    Lauri 21 Female   90      86.93750
## 2   Leonie 21 Female   91      86.93750
## 3  Sherlyn 22 Female   85      86.93750
## 4  Mikaela 20 Female   69      86.93750
## 5    Aiko 24 Female   97      86.93750
## 6  Tiffaney 21 Female   78      86.93750
## 7   Corina 23 Female   81      86.93750
```

```
## 8  Petronila  23 Female    98      86.93750
## 9   Alecia   20 Female    87      86.93750
## 10 Shemika  23 Female    97      86.93750
## 11  Fallon  22 Female    90      86.93750
## 12 Deloris  21 Female    67      86.93750
## 13  Randee  23 Female    91      86.93750
## 14   Eboni  20 Female    84      86.93750
## 15 Delfina  19 Female    93      86.93750
## 16 Ernestina 19 Female    93      86.93750
## 17  Booker  18  Male     83      80.33333
## 18 Raphael  23  Male     91      80.33333
## 19   Milo   19  Male     67      80.33333
```

#Step 3

```
write.table(Student,"Sorted_Average",sep=",")
```

#Step 4

```
Student_filter <- subset(Student_assignment6,grep1("[iI]",Student_assignment6$Name))
write.table(Student_filter,"DataSubset",sep=",")
```