# gsub–.R

Student

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```r
names<-c("Alex","Shu","Tanya")
ages<-c(28,17,35)
users<-c("alp@syr.edu","sh67@syr.edu","tans@syr.edu")
students<-data.frame(names,ages,users)
students$usernames<-gsub("@syr.edu","",students$users)
gsub("Good","","Goodbye")
```

```
## [1] "bye"
```

```r
gsub("Good","","goodbye")
```

```
## [1] "goodbye"
```

```r
sentence<-"I am 29 years old, and weigh 130 lbs"
gsub("29","X",sentence)
```

```
## [1] "I am X years old, and weigh 130 lbs"
```

```r
gsub("\\d+","X",sentence)
```

```
## [1] "I am X years old, and weigh X lbs"
```

```r
#\\d+ will go for every number and stands for digit
gsub("\\w+","X",sentence)
```

```
## [1] "X X X X X, X X X X"
```

```r
#\\w+ will go for everything and I assume it stands for word
gsub("\\s","X",sentence)
```

```
## [1] "IXamX29XyearsXold,XandXweighX130Xlbs"
```

```r
#\\s will go for spaces and I assume it stands for space
students$gpa<-c("gpa_4.3","gpa_3.6","gpa_2.9")
students
```

```
##    names ages        users usernames      gpa
## 1   Alex   28  alp@syr.edu       alp  gpa_4.3
## 2    Shu   17 sh67@syr.edu      sh67  gpa_3.6
## 3  Tanya   35 tans@syr.edu      tans  gpa_2.9
```

```r
students$gpa<-gsub("gpa_","",students$gpa)
students$gpa
```

```
## [1] "4.3" "3.6" "2.9"
```

```r
#mean(as.numeric(students$gpa))
#I know that I am probably skipping a step, or there might be a different way to do this but it said to just put
 mean but GPA is still a string so it will only work if I do this
#I did skip a step and it's saying to make student$GPA as numeric so I'm just going to tag out the original code
 and do it the way it says
mean(students$gpa)
```

```
## Warning in mean.default(students$gpa): argument is not numeric or logical:
## returning NA
```

```
## [1] NA
```

```r
students$gpa<-as.numeric(students$gpa)
mean(students$gpa)
```

```
## [1] 3.6
```

```r
averageGPAcalculator<-function(input){
  step1<-"do something here"
  step2<-"do something else"
  step3<-"maybe even some more"
  return(step3)
}
averageGPAcalculator("what can I do with this?")
```

```
## [1] "maybe even some more"
```

```r
averageGPAcalculator<-function(input){
  step1<-gsub("gpa_","",input$gpa)
  step2<-as.numeric(step1)
  step3<-mean(step2)
  return(step3)
}
averageGPAcalculator(students)
```

```
## [1] 3.6
```

```r
name<-c("Bree","Grace","Akshat","Penny","Leon")
gpa<-c(2.3,4.0,3.9,3.5,2.8)
anotherGroupOfStudents<-data.frame(name,gpa)
averageGPAcalculator(anotherGroupOfStudents)
```

```
## [1] 3.3
```