

Graphics for Qualitative/Categorical DATA (MOL4)

1. Make a Pie Graph using the file `imdb_before_color` for the variable `content_rating` which will include:
 - a. The title "Distribution of Ratings for 26 Movies Before Color" (1 pt)
 - b. Label to include the rating and percent (2 pt)
 - c. Copy and paste your code (0.5 pt) and the resultant Pie graph here (0.5 pt):

Results:

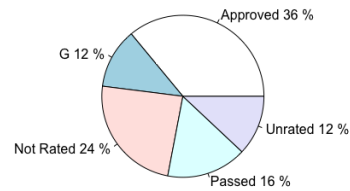
```
Console Terminal Background Jobs
R 4.2.3 - ~/Downloads/Working directory/
> library(readxl)
> imdb_before_color<-read_excel("imdb_before_color.xlsx")

> View(imdb_before_color)
> imdb_before_color$content_rating=as.factor(imdb_before_color$content_rating)
> pie(percent, label = lbl,main = "Distribution of Blood Type for Sample of 50 Patients")
> t = table(imdb_before_color$content_rating)
> t

  Approved      G Not Rated   Passed   Unrated
        9         3         6         4         3

> percent=100*t/sum(t)
> format_with_percent=format(percent,digits=3)
> lbl=paste(Cc("Approved","G","Not Rated","Passed","Unrated"), format_with_percent,"%",sep=" ")
> pie(percent, Label = lbl,main = "Distribution of Ratings for 26 Movies Before Color")
~ library(readxl)
```

Distribution of Ratings for 26 Movies Before Color



2. Make a Frequency Bar Graph using the file `imdb_before_color` for the variable `content_rating` which will include:
 - a. The title "Distribution of Ratings for 26 Movies Before Color" (0.5 pt)
 - b. X Label to include the rating (0.5 pt)
 - c. Y Label, "Number of Movies" (0.5 pt)
 - d. Make the color blue (0.5 pt)
 - e. Copy and paste your code (0.5 pt) and the resultant Frequency Bar graph here (0.5 pt):

pt):

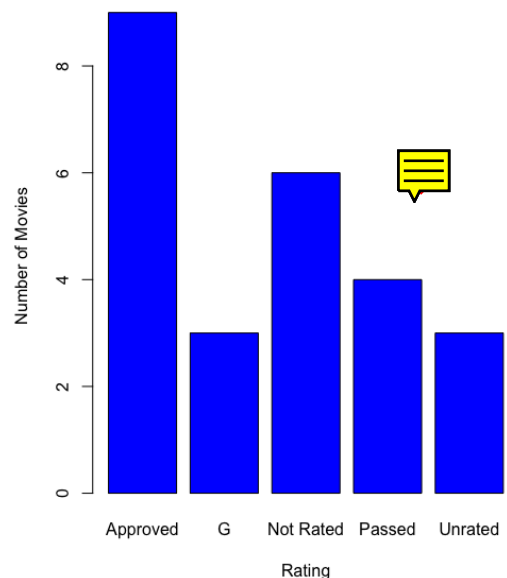
Results:

```
Console Terminal Background Jobs
R 4.2.3 - ~/Downloads/Working directory/
> imdb_before_color$content_rating=as.factor(imdb_before_color$content_rating)
> t = table(imdb_before_color$content_rating)
> t

  Approved      G Not Rated   Passed   Unrated
        9         3         6         4         3

> barplot(t,main="Distribution of Ratings for 26 Movies Before Color",xlab="Rating",ylab="Number of Movies",
  col="blues9")
Error in rect(y1, x1, y2, x2, ...) : invalid color name 'blues9'
> barplot(t,main="Distribution of Ratings for 26 Movies Before Color",xlab="Rating",ylab="Number of Movies",
  col="blue9")
Error in rect(y1, x1, y2, x2, ...) : invalid color name 'blue9'
> barplot(t,main="Distribution of Ratings for 26 Movies Before Color",xlab="Rating",ylab="Number of Movies",
  col="blue")
>
```

Distribution of Ratings for 26 Movies Before Color



3. Make a Relative Frequency Bar Graph using the file `imdb_before_color` for the variable `content_rating` which will include:
- The title "Distribution of Ratings for 26 Movies Before Color" (0.5 pt)
 - X Label to include the rating (0.5 pt)
 - Y Label, "Percent of Movies" (0.5 pt)
 - Make the color blue (0.5 pt)
 - Copy and paste your code (0.5 pt) and the resultant Relative Frequency Bar graph here (0.5 pt):

Results:

```
Console Terminal Background Jobs
R 4.2.3 · ~/Downloads/Working directory/
> t = table(imdb_before_color$content_rating)
> t

Approved      G Not Rated    Passed    Unrated
        9         3         6         4         3
> percent=100*t/sum(t)
> barplot(percent,main="Distribution of Ratings for 26 Movies Before Color",xlab="Rating",ylab="Percent of Movies",
col="blue")
> |
```

