

Lab 4

```
library(readr)
library(tidyverse)
```

```
## — Attaching packages ————— tid
yverse 1.2.1 —
```

```
## ✓ ggplot2 3.2.1      ✓ purrr  0.3.2
## ✓ tibble  2.1.3      ✓ dplyr  0.8.3
## ✓ tidyr   1.0.0      ✓ stringr 1.4.0
## ✓ ggplot2 3.2.1      ✓ forcats 0.4.0
```

```
## — Conflicts ————— tidyverse
_conflicts() —
## ✖ dplyr::filter() masks stats::filter()
## ✖ dplyr::lag()     masks stats::lag()
```

```
vgsales <- read_csv("vg-sales.csv")
```

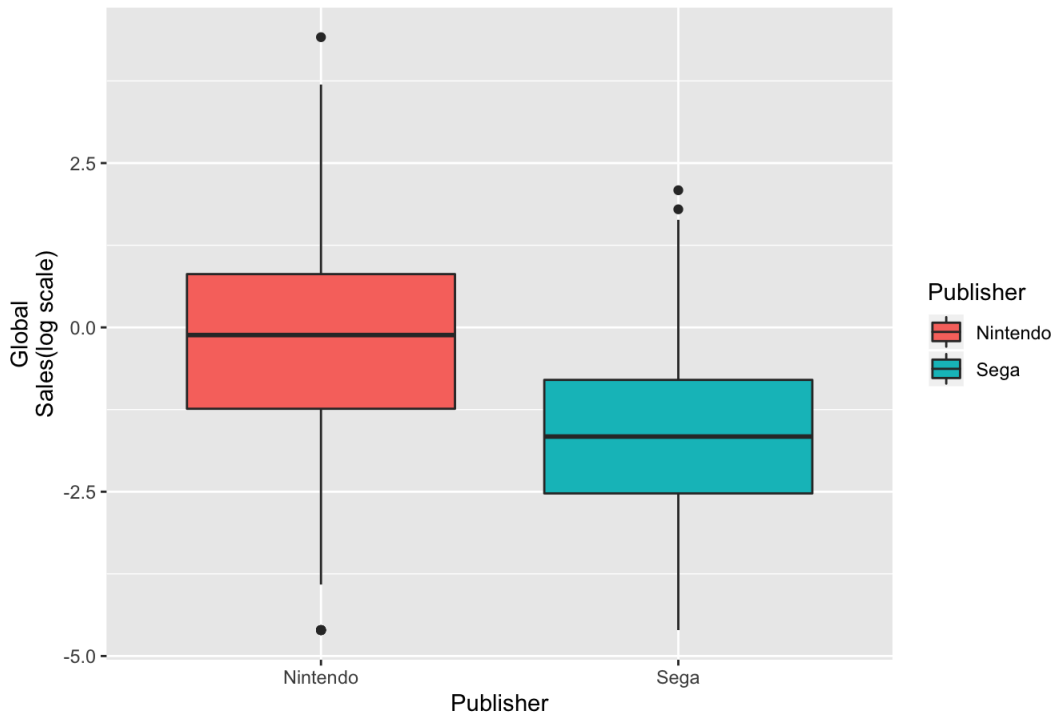
```
## Parsed with column specification:
## cols(
##   Rank = col_double(),
##   Name = col_character(),
##   Platform = col_character(),
##   Year = col_character(),
##   Genre = col_character(),
##   Publisher = col_character(),
##   NA_Sales = col_double(),
##   EU_Sales = col_double(),
##   JP_Sales = col_double(),
##   Other_Sales = col_double(),
##   Global_Sales = col_double()
## )
```

Replicate a plot

```
Nintendo_Sega <- filter(vgsales, Publisher=="Nintendo" | Publisher=="Sega")

ggplot(Nintendo_Sega, aes(x=Publisher, y=log(Global_Sales), fill = Publisher))+
  geom_boxplot() + ggtitle("Comparing Nintendo and Sega") + ylab("Global
Sales(log scale)")
```

Comparing Nintendo and Sega



Rise in Violent Video Games?

```
old <- 0
new <- 0

j <- nrow(vgsales)
for (i in 1:j){
  if(vgsales %>% slice(i) %>% pull(Genre) == "Shooter"){
    if(vgsales %>% slice(i) %>% pull(Year) < 2000){
      old = old + 1
    }
    if(vgsales %>% slice(i) %>% pull(Year) > 1999){
      new = new + 1
    }
  }
}
```

```
## [1] 167
```

```
new
```

```
## [1] 1143
```

Prior to the 2000s, only 167 of the video games in our dataset were categorized as shooters. After the 2000s, 1143 of the video games in our dataset were categorized as shooters. Because of this drastic increase, parents concern with the rise in violent video games are merited and reasonable.

Flex Points

```
vgsales %>%
  select(Name, Publisher, NA_Sales, EU_Sales, JP_Sales) %>%
  pivot_longer(cols = c(NA_Sales, EU_Sales, JP_Sales), names_to = "Location", values_to = "Num_Sales")
```

```
## # A tibble: 49,794 x 4
##   Name                Publisher Location Num_Sales
##   <chr>                <chr>      <chr>      <dbl>
## 1 Wii Sports          Nintendo  NA_Sales    41.5
## 2 Wii Sports          Nintendo  EU_Sales    29.0
## 3 Wii Sports          Nintendo  JP_Sales     3.77
## 4 Super Mario Bros. Nintendo  NA_Sales    29.1
## 5 Super Mario Bros. Nintendo  EU_Sales     3.58
## 6 Super Mario Bros. Nintendo  JP_Sales     6.81
## 7 Mario Kart Wii      Nintendo  NA_Sales    15.8
## 8 Mario Kart Wii      Nintendo  EU_Sales    12.9
## 9 Mario Kart Wii      Nintendo  JP_Sales     3.79
## 10 Wii Sports Resort Nintendo  NA_Sales    15.8
## # ... with 49,784 more rows
```