Rbootcamp

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Mike's Personal Introduction

- R programmer for the Department of Biostatistics

- Write and mantain R packages for faculty and students

- Consult faculty and students on writing R packages

Rbootcamp Introduction

Goals:

- Basics of R on the cluster (non-interactive R)
- R basics: syntax, common functions, etc., via Rstudio
- R functions and for loops (functions and advanced control structures)
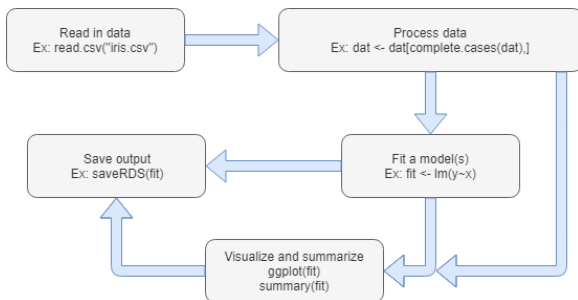- Simulation analysis with comment on efficiency

Materials

- All bootcamp materials online at
  https://github.com/umich-biostatistcs/Rbootcamp
- Handouts for each topic with examples to work through
- R scripts of our examples

R on cluster (non-interactive R)

- Why R on the cluster?

- Dan explains

- How to with example.

R workflow for statistical analysis

- Bootcamps throughout semester on each area

Slide with R Output

```
summary(cars)
```

```
##      speed           dist
##  Min.   : 4.0   Min.   :  2.00
##  1st Qu.:12.0   1st Qu.: 26.00
##  Median :15.0   Median : 36.00
##  Mean   :15.4   Mean   : 42.98
##  3rd Qu.:19.0   3rd Qu.: 56.00
##  Max.   :25.0   Max.   :120.00
```

Slide with Plot