TEAMS FOR THE 2019 NCBS ULTIMATE TOURNAMENT

Chintan Sheth

Sunday 20 January 2019

```r
library(dplyr)
```

```r
## read in the csv
play <- read.csv("IInd-2019-ultimate-ncbs-seeds-working.csv")

## subset data for use
playsub <- play %>% select(name, gender, total)

playsub
```

```
##                    name gender total
## 1          Aditya Iyer    male     0
## 2               Anurag    male     0
## 3       ARKA PRROVO DAS    male     0
## 4             ARYA NAIR female     0
## 5               Deepthi female     0
## 6           Komal Gupta female     0
## 7                Rohini female     0
## 8      Shivansh Singhal    male     0
## 9                thejus    male     0
## 10               Varsha female     0
## 11                 Alok    male     9
## 12               rachna female     9
## 13 Pankaj Kumar Chauhan    male    10
## 14    Sankarshan talluri    male    10
## 15               Maitri female    11
## 16          Simran Virdi female    12
## 17                Suhas    male    12
## 18               Rasika female    13
## 19          Umesh Mohan    male    13
## 20               mahesh    male    14
## 21          Sachin Rawat    male    14
## 22               Shubhra female    14
## 23                  sid    male    14
## 24    Rohit Nandakumar    male    15
## 25           Abin Ghosh    male    17
## 26                Pavan    male    17
## 27  Sarang Mishrikotkar    male    17
## 28         chintan sheth    male    18
## 29              nishant    male    18
## 30            Chaitanya    male    19
## 31           Mayukh Dey    male    20
## 32               Joshua    male    21
```

NOW WE SPLIT THE MALES AND FEMALES AS WELL AS ASSIGN EACH PLAYER A CATEGORY

```
##  group males and females separately
males <- playsub %>% filter(gender=="male")
females <- playsub %>% filter(gender=="female")

## type the players differently
males <- males %>%
    mutate(type = lapply(total, function(x) {
        if (x %in% c(0:9)) {
            'wildcards'
        } else if (x %in% c(10:16)) {
            'game-changers'
        } else if (x %in% c(16:25)) {
            'play-makers'
        }
    }))

males
```

```
##                     name gender total          type
## 1          Aditya Iyer   male     0      wildcards
## 2               Anurag   male     0      wildcards
## 3       ARKA PRROVO DAS   male     0      wildcards
## 4      Shivansh Singhal   male     0      wildcards
## 5               thejus   male     0      wildcards
## 6                 Alok   male     9      wildcards
## 7   Pankaj Kumar Chauhan   male    10 game-changers
## 8     Sankarshan talluri   male    10 game-changers
## 9                 Suhas   male    12 game-changers
## 10          Umesh Mohan   male    13 game-changers
## 11               mahesh   male    14 game-changers
## 12         Sachin Rawat   male    14 game-changers
## 13                  sid   male    14 game-changers
## 14     Rohit Nandakumar   male    15 game-changers
## 15           Abin Ghosh   male    17    play-makers
## 16                Pavan   male    17    play-makers
## 17   Sarang Mishrikotkar   male    17    play-makers
## 18        chintan sheth   male    18    play-makers
## 19              nishant   male    18    play-makers
## 20           Chaitanya   male    19    play-makers
## 21          Mayukh Dey   male    20    play-makers
## 22               Joshua   male    21    play-makers
```

```
## repeat for females
females <- females %>%
    mutate(type = lapply(total, function(x) {
        if (x %in% c(0:9)) {
            'wildcards'
        } else if (x %in% c(10:16)) {
            'game-changers'
        } else if (x %in% c(16:25)) {
            'play-makers'
        }
    }))
```

```
females
```

```
##             name gender total           type
## 1    ARYA NAIR female     0       wildcards
## 2       Deepthi female     0       wildcards
## 3   Komal Gupta female     0       wildcards
## 4        Rohini female     0       wildcards
## 5        Varsha female     0       wildcards
## 6        rachna female     9       wildcards
## 7        Maitri female    11 game-changers
## 8  Simran Virdi female    12 game-changers
## 9        Rasika female    13 game-changers
## 10      Shubhra female    14 game-changers
```

Note

```
## create dataframes for the 3 player types
df1 <- subset(males, type == "wildcards")

df2 <- subset(males, type == "game-changers")

df3 <- subset(males, type == "play-makers")

## females
dff1<- subset(females, type == "wildcards")

dff2<- subset(females, type == "game-changers")
```

THE CODE BELOW WILL GENERATE THE TEAM NUMBER RANDOMLY IN A LIST. HOWEVER, SINCE WE HAVE AN UEQUAL NUMBER OF PLAYERS IN THE WILDCARDS CATEGORY FOR MALES AND FEMALES WE HAVE TO SAMPLE 1:4, 6 TIMES WITH REPLACEMENT

```
set.seed(229)
## this will generate numbers 1 to 4 in a random order
teamnumber1 <-sample(1:4, 4, replace=F)
teamnumber1
```

```
## [1] 4 2 1 3
```

```
## this wil do the same as above, but in two sets since wildcards has 6 players
teamnumber3 <- sample(1:4, 4, replace=F)
teamnumber4 <- sample(1:4, 2, replace=F)

teamnumber2 <- c(teamnumber3, teamnumber4)
teamnumber2
```

```
## [1] 2 1 3 4 4 3
```

TEAMS FOR MALES

```
## add the groupnumber as a column to the dataframes
jnk1 <- cbind(df1[sample(nrow(df1)),],teamnumber2)
jnk2 <- cbind(df2[sample(nrow(df2)),],teamnumber1)
jnk3 <- cbind(df3[sample(nrow(df3)),],teamnumber1)

## rename the 5th column
names(jnk1)[5] <- "team"
names(jnk2)[5] <- "team"
names(jnk3)[5] <- "team"

finalmales <- rbind(jnk1,jnk2,jnk3)
```

TEAMS FOR FEMALES

```
fjnk1 <- cbind(dff1[sample(nrow(dff1)),],teamnumber2)
fjnk2 <- cbind(dff2[sample(nrow(dff2)),],teamnumber1)

names(fjnk1)[5] <- "team"
names(fjnk2)[5] <- "team"

finalfemales <- rbind(fjnk1,fjnk2)
```

ALL GENDERS COMBINED

```
allplayers <- rbind(finalmales, finalfemales)

team1 <- allplayers %>% filter(team==1)
team2 <- allplayers %>% filter(team==2)
team3 <- allplayers %>% filter(team==3)
team4 <- allplayers %>% filter(team==4)

team1
```

```
##                    name gender total          type team
## 1         Aditya Iyer   male     0     wildcards    1
## 2               Suhas   male    12 game-changers    1
## 3        Sachin Rawat   male    14 game-changers    1
## 4 Sarang Mishrikotkar   male    17   play-makers    1
## 5               Pavan   male    17   play-makers    1
## 6           ARYA NAIR female     0     wildcards    1
## 7              Maitri female    11 game-changers    1
```

```
team2
```

```
##                    name gender total          type team
## 1   Shivansh Singhal    male     0     wildcards    2
## 2 Sankarshan talluri    male    10 game-changers    2
## 3             mahesh    male    14 game-changers    2
## 4         Abin Ghosh    male    17   play-makers    2
## 5          Chaitanya    male    19   play-makers    2
## 6             Rohini  female     0     wildcards    2
## 7             Shubhra female    14 game-changers    2
```

team3

```
##           name gender total          type team
## 1      thejus   male     0     wildcards    3
## 2        Alok   male     9     wildcards    3
## 3         sid   male    14 game-changers    3
## 4 Umesh Mohan   male    13 game-changers    3
## 5  Mayukh Dey   male    20   play-makers    3
## 6     nishant   male    18   play-makers    3
## 7 Komal Gupta female     0     wildcards    3
## 8      rachna female     9     wildcards    3
## 9      Rasika female    13 game-changers    3
```

team4

```
##                 name gender total          type team
## 1     ARKA PRROVO DAS   male     0     wildcards    4
## 2             Anurag   male     0     wildcards    4
## 3 Pankaj Kumar Chauhan   male    10 game-changers    4
## 4    Rohit Nandakumar   male    15 game-changers    4
## 5             Joshua   male    21   play-makers    4
## 6       chintan sheth   male    18   play-makers    4
## 7             Varsha female     0     wildcards    4
## 8            Deepthi female     0     wildcards    4
## 9       Simran Virdi female    12 game-changers    4
```