## **Lab Sheet 3**

# **String Operations -**

- 1) tolower(), toupper()
- 2) strsplit()
- 3) sub()
- 4) gsub()
- 5) grep(),grepl()
- 6) nchar()
- 7) substr()
- 8) paste()
- 9) str\_trim()

# **Regular Expressions -**

- 1) My name is Obama.
- 2) Obama is a good president
- 3) Obama loves to eat sandwiches
- 4) Obama was the only black president

# <u>Literals -</u>

Simple words that match exactly in a sentence .for e.g.

```
^ ( Start of a line) -

$ (End of the Line) -

.(Any Character) -

!(or) -

?(optional) -

*(any number of characters including none) -

+(any number of characters not including none)-
```

#### **WORKING WITH DATES**

date() - Returns a string with the present time

But since its a string only string operations apply and not numerical which we normally need

**Sys.Date()** - Return today's date in a date object

#### Format - format(date, "format")

%d - day(0-31)

%a - weekday(abbreviated)

%A - weekday(unabbreviated)

%m - month(0-12)

%b - abbreviated month

%B - unabbreviated month

%y - 2 digit year

%Y - four digit year

### as.Date()

Creates a date object from a string.

#### as.Date(string,format)

## Functions -

weekdays() months() julian()

## **Lubridate Package**

ymd() mdy() dmy() ymd\_hms()

## **PRACTICE QUESTIONS**

- Q1) Find the weekday with the most number of rebounds?
- Q2) Which athlete took the most number of rebounds
- Q3) Which year were the most number of fowls made
- Q4) Number of free throws made on 2008 December
- Q5) Which player had the most turnover