Lab 1: Calculate PI using mclapply

1. Calculate PI using **mclapply**
2. Try with different number of cores
3. Run your code on your **laptop** and on the **cluster**
4. Calculate *speedup* with increasing number of cores

Example on how to calculate PI from 100 values

```
y <- runif(100)
x <- runif(100)
z <- sqrt(x^2+y^2)
res <- length(which(z<=1))*4/length(z)
```

Lab 2: Calculate PI using parallel parlapply

1. Calculate PI using **parlapply**
2. Try with different number of cores
3. Run your code on your **laptop** and on the **cluster**
4. Calculate *speedup* with increasing number of cores

Lab 3: Calculate PI using parallel foreach

1. Calculate PI using **foreach**
2. Try with different number of cores
3. Run your code on your **laptop** and on the **cluster**
4. Calculate *speedup* with increasing number of cores