Apache Spark RDD Basics

What is RDD?

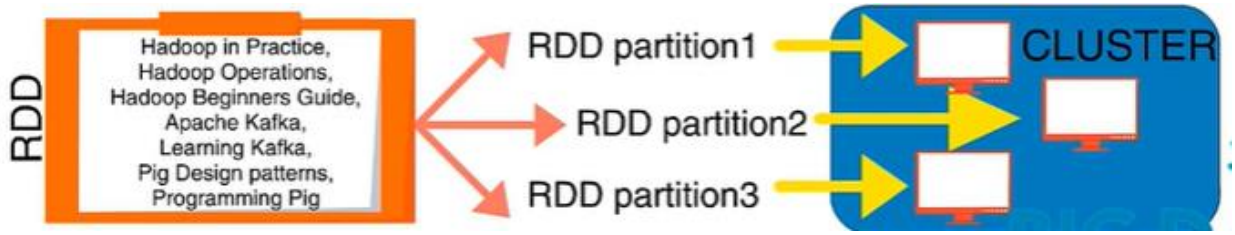
1. RDD is Spark's core abstraction, which is Resilient Distributed Dataset

   Resilient – Fault Tolerant, means ability to be re-computed from history

2. It is immutable distributed collection of objects

   Immutable – can't be modified.
   Distributed – loaded across various nodes of the cluster

3. Internally spark distributes the data in RDD, to different nodes across the cluster to achieve parallelization



RDD Creation

RDDs can be created

Example 1:

RDD creation by loading an external dataset

$ val booksRDD = sc.textFile("/home/hduser/example.txt")

$ booksRDD.collect()

Example 2:

RDD creation by distributing collection

```
$ val colorsRDD = sc.parallelize(List("Red", "Green"))

$ colorsRDD.collect()
```