

Windowed Operations



Windowed Operations

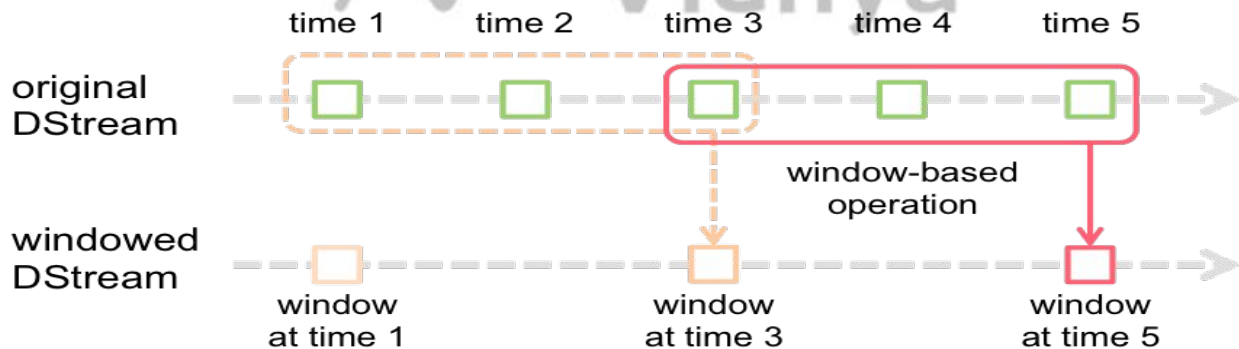
- Windowed Operations allow you to apply transformations over a sliding window of the data.
- Sliding window is the time interval between each transformation



Windowed Operations

Parameters of any Window Operation-

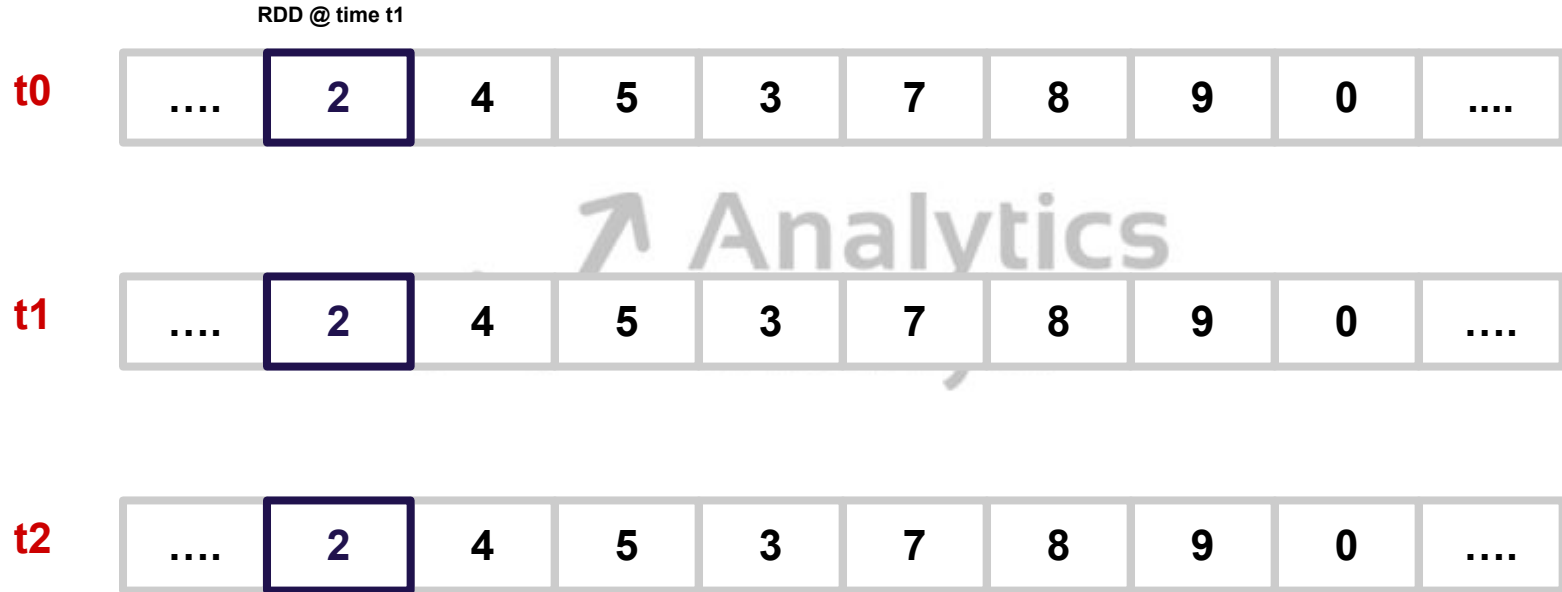
- **window length**
 - The duration of the window in secs
- **sliding interval**
 - The interval at which the window operation is performed in secs



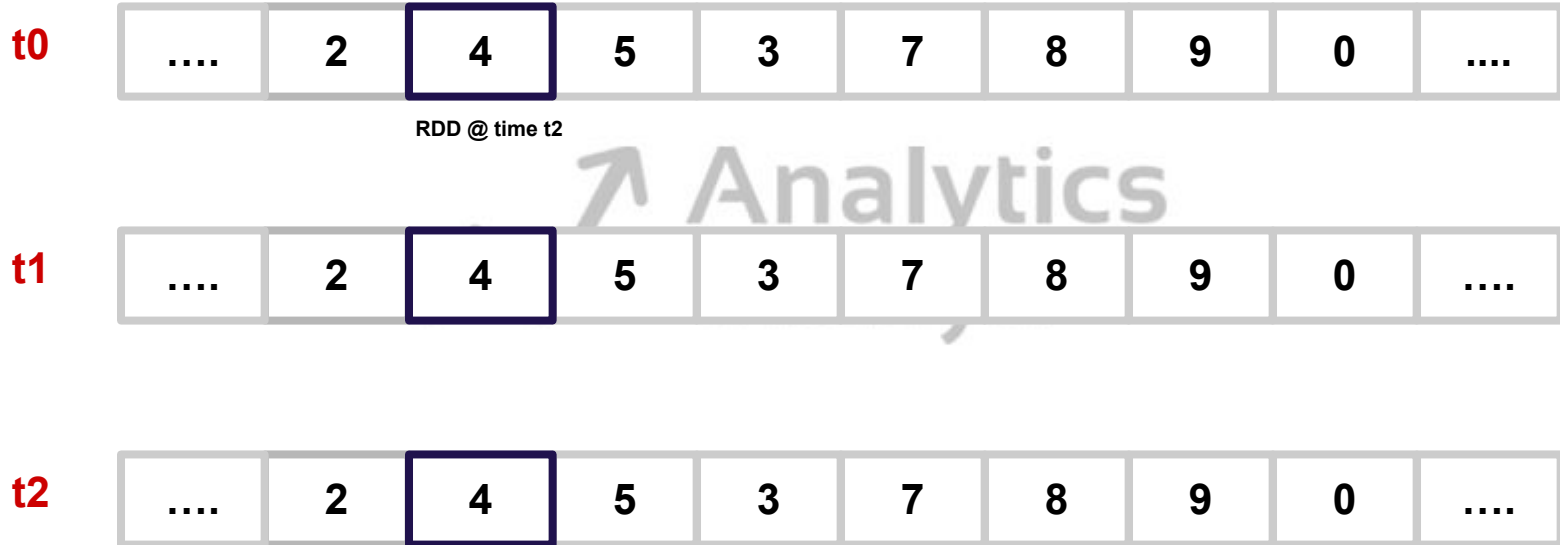
Spark Streaming: Window - Example

t0	....	2	4	5	3	7	8			....
t1	....	2	4	5	3	7	8	9		....
t2	....	2	4	5	3	7	8	9	0	....

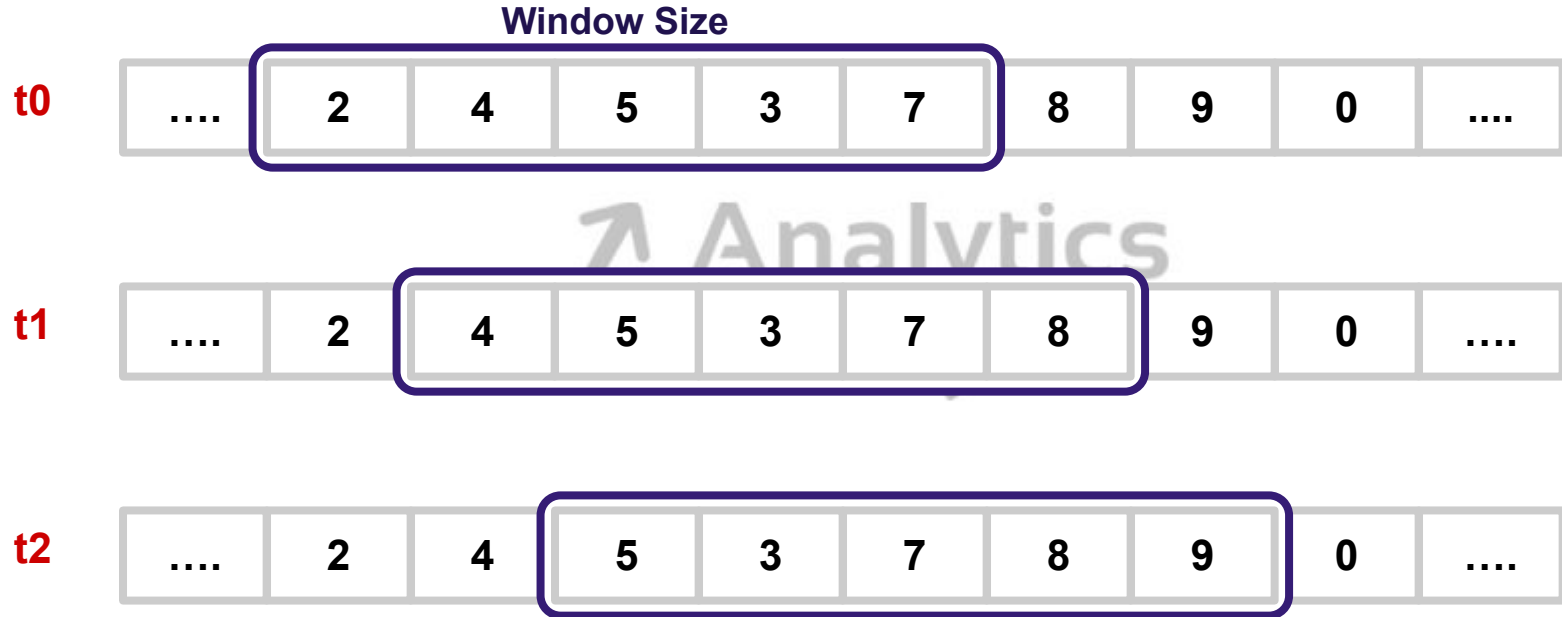
Spark Streaming: Window - Example



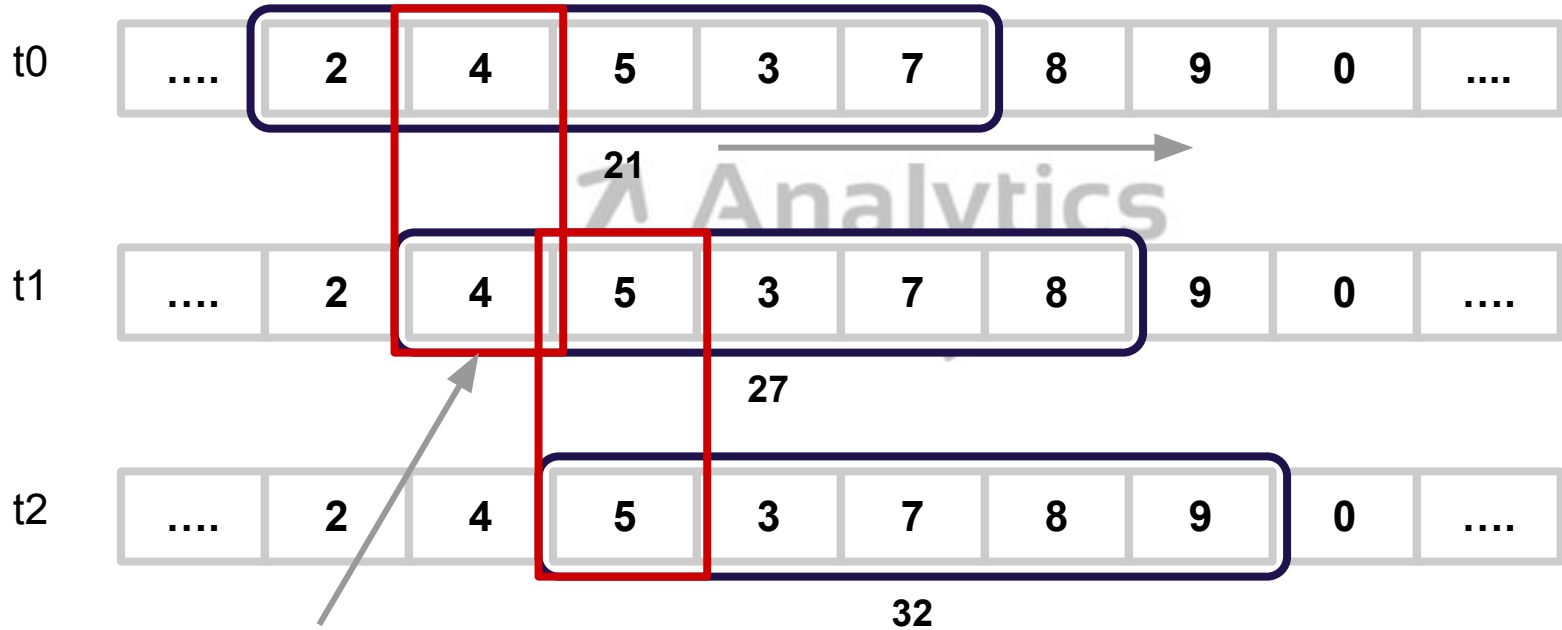
Spark Streaming: Window - Example



Spark Streaming: Window - Example



Spark Streaming: Window - Example



Sliding Window

Popular Windowed Operations

- Some of the common window operations are as follows:
 - **Window**
 - **countByWindow**
 - **reduceByWindow**
 - **reduceByKeyAndWindow**
 - **countByValueAndWindow**
- All of these operations take the said two parameters - **windowLength** and **slideInterval**

Thank You



Analytics
Vidhya