



**Highlights:**

- **The cumulative rainfall** for September\_2018; we observe a below normal situation except the north-western part where the records are showing a normal situation in comparison with the Long Term Climatological Mean (LTM) at all stations with the northwest being more wet compared to the rest of the country
- **The satellite derived soil moisture shows low signal of moisture indices** because of dry days which were observed to be greater than rainy days throughout the month
- The month of October\_2018 is expected to be wet over the north and west in the first dates; and switching over to wet weather conditions country wide as we approach the mid-October

**I. Introduction**

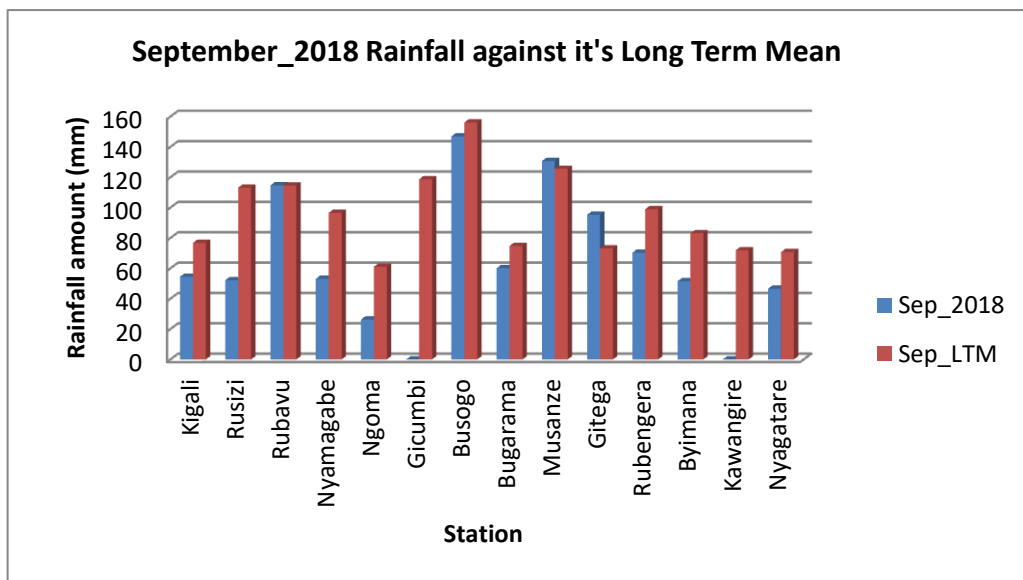
The rainfall during September\_2018 was in a below normal situation except the north-western part where the records are showing a normal situation in comparison with the LTM at all stations with the northwest being more wet compared to the rest of the country

a) The table and histogram below indicates the rainfall recorded during September\_2018 and its Long Term Mean (LTM):

**Cumulative rainfall (in mm) recorded at different stations**

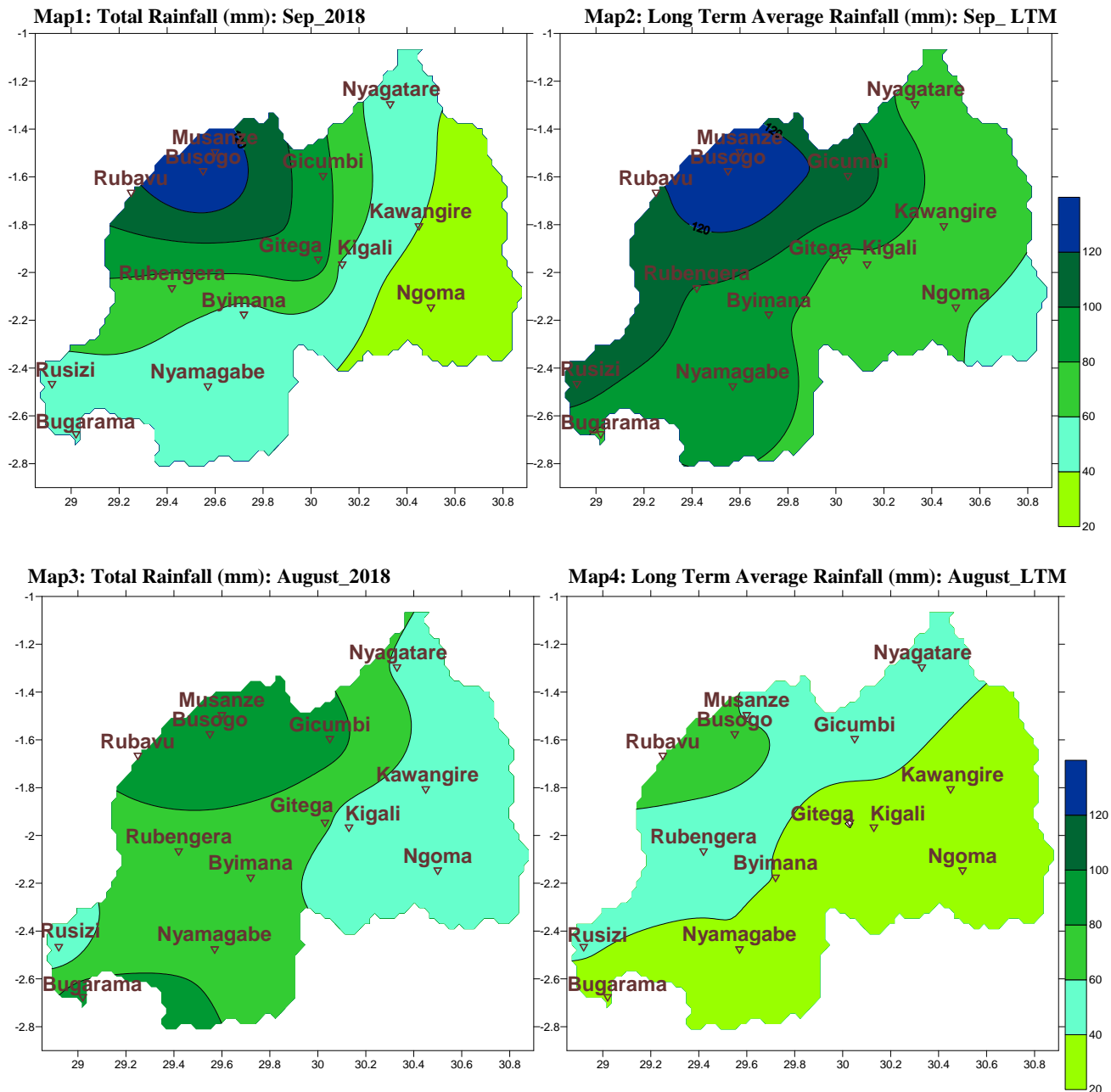
Station	Sep_2018	Sep_LTM
Kigali (Kanombe)	54.5	76.8
Rusizi (Kamembe)	52.2	113.2
Rubavu (Gisenyi)	114.7	114.6
Nyamagabe (Gikongoro)	53.1	96.6
Ngoma (Kibungo)	26.3	61.1
Gicumbi (Byumba)		118.7
Busogo	147.0	156.1
Bugarama	60.1	74.8
Musanze (Ruhengeri)	130.7	125.6
Gitega	95.3	73.2
Rubengera	70.3	99.0
Byimana	51.5	83.1
Kawangire		71.9
Nyagatare	46.6	70.7

*Table1*



*Plot1*

b) **Rainfall analysis:** The maps “Map 1 and 2” below show the cumulative rainfall recorded during September\_2018 and the long term mean (LTM) of cumulative rainfall for the same period  
 The maps “map 3 and 4” show the cumulative rainfall recorded during August\_2018 the long term mean (LTM) of cumulative rainfall for the same period

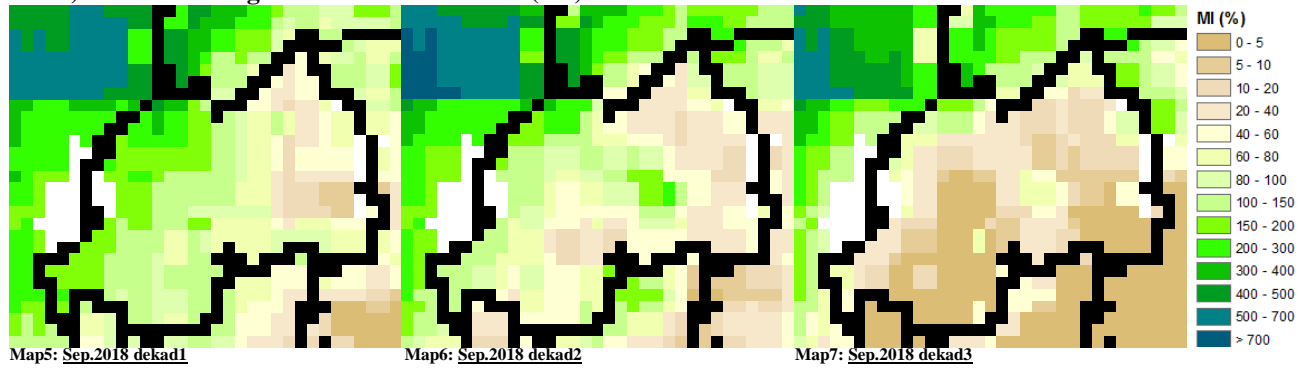


## II. Detailed observed rainfall during September\_2018

The rainfall during September\_2018 was in a below normal situation except the north-western part where the records are showing a normal situation in comparison with the LTM at all stations with the northwest being more wet compared to the rest of the country with Busogo as the highest having 147.0mm and Ngoma as the lowest with 26.3mm of rainfall (see **Map1&2** and **Table1**). For the cumulative rainfall for August 2018 was in the above normal range in comparison with the LTM especially the north and the southwestern tip of the country (see **Map3&4**)

### III. Agricultural impact.

#### a) Satellite images: Soil Moisture Index (MI)



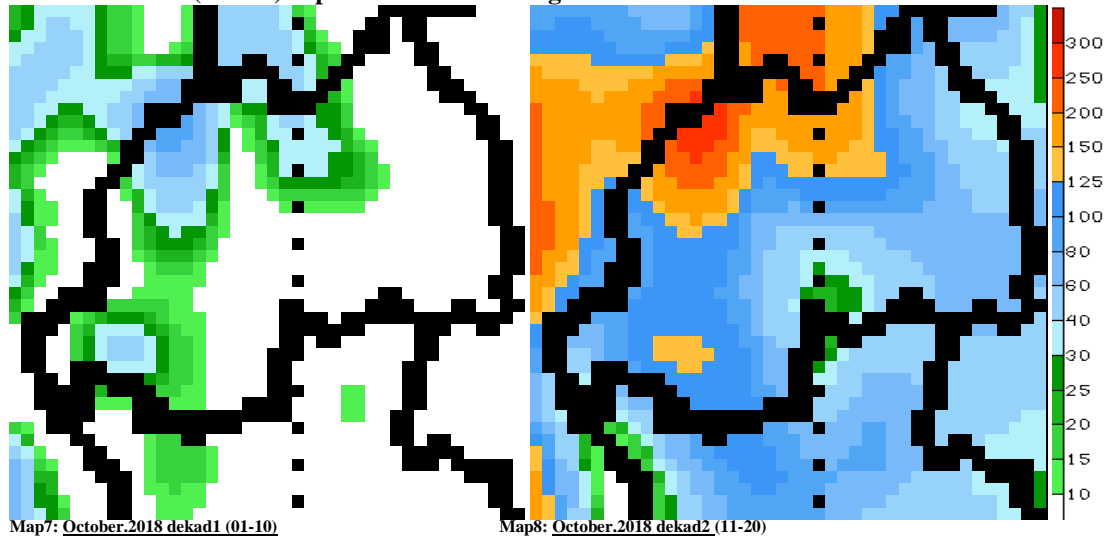
During September\_2018; the of rainfall was not widely distributed in such a way the satellite derived moisture index kept on showing in soil moisture indices with hotspots at scattered isolated cells over the central, west and north from dekad1 to dekad3 (Map 5, 6&7; indicate the first, second and third dekad respectively)

#### b) Rainfall forecast for October\_2018

The weather during October\_2018; is expected to be less wet in the beginning and highly wet as we embark in the mid-October:

- Kigali City; Eastern and Southern Province: we expect up to a 100mm of rainfall in the first 2 dekads of October (from 1<sup>st</sup> to 20<sup>th</sup> October)
- Western Province: we expect up to a 200mm of rainfall in the first 2 dekads of October (from 1<sup>st</sup> to 20<sup>th</sup> October)
- Northern Province: we expect rainfall amount ranging between 200mm and 300mm in the first 2 dekads of October (from 1<sup>st</sup> to 20<sup>th</sup> October)

#### Amount of rain (in mm) expected for the coming 2 dekads



**N.B:** This forecast should be used in conjunction with the daily (24-hour), Three (3), Five (5) and Seven (7) days forecasts issued by the Rwanda Meteorology Agency (Meteo Rwanda)