

Experimental Climate Monitoring and Prediction

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Highlights

- The NCEP rainfall forecast predicts total rainfall up to 35 mm in Kandy and Nuwara Eliya districts during 30th Aug – 5th Sep.
- Between 21 – 27 Aug: up to 50 mm of daily rainfall was recorded in Anuradhapura district on the 23rd.
- From 19 - 25 Aug: minimum temperature of 15 °C was recorded from Nuwara Eliya district while northern regions and eastern coastal regions of the island recorded a maximum temperature between 35-40 °C.
- From 21 - 27 Aug: up to 36 km/h, westerly winds were experienced by the entire island.
- 0.5 °C below average sea surface temperature was observed in the seas around Sri Lanka.

Monitoring

Rainfall

Weekly Monitoring: No significant rainfalls were recorded in any part of the island on August 21st and 22nd. On the 23rd, Anuradhapura district received up to 50 mm of rainfall; Nuwara Eliya district up to 30 mm; and Polonnaruwa, Badulla and Monaragala districts received up to 20 mm. On the 24th, Vavuniya, Anuradhapura, Trincomalee and Polonnaruwa districts received up to 30 mm of rainfall; and Mullaitivu, Mannar, Puttalam, Kurunegala, Matale, Badulla, Ampara and Batticaloa districts received up to 20 mm of rainfall. On the 25th, Jaffna, Kilinochchi, Puttalam, Mannar, Vavuniya, Anuradhapura and Trincomalee districts received up to 5 mm of rainfall. On the 26th, Jaffna and Kilinochchi districts received up to 10 mm of rainfall. On the 27th, several regions of Badulla, Monaragala and Ampara districts received up to 20 mm of rainfall.

Total Rainfall for the Past Week: The RFE 2.0 tool shows total rainfall 50-75 mm of total rainfall in Badulla, Monaragala and Ampara districts; and up to 25-50 mm in Vavuniya, Anuradhapura, Polonnaruwa, Trincomalee, Batticaloa, Matale, Kandy and Nuwara Eliya districts. Above average rainfall up to 50-100 mm is shown for Ampara district; and up to 25-50 mm in Anuradhapura, Polonnaruwa, Badulla, Monaragala and Batticaloa districts. Below average rainfall up to 25-50 mm is shown for Galle, Matara and Ratnapura districts; and up to 10-25 mm in Gampaha, Colombo, Kalutara, Kegalla, Nuwara Eliya and Hambantota districts.

Monthly Monitoring: During July - above average rainfall conditions up to 60 mm were experienced by Nuwara Eliya, Monaragala and northern regions of Ampara districts; and rest of the island experienced up to 60 mm of below average rainfall. The CPC Unified Precipitation Analysis tool shows up to 150 mm of total rainfall in Kegalla, Ratnapura, Colombo, Nuwara Eliya and Kaluatra districts; and up to 100 mm in Badulla, Monaragala, and Gampaha districts.

Ocean State (Text Courtesy IRI)

Pacific sea state: August 20, 2018

In mid-August 2018, the east-central tropical Pacific waters reflected ENSO-neutral conditions, with near-average SST, slightly lower than a month ago. The key atmospheric variables also suggested neutral conditions, although westerly low-level wind anomalies have recently developed. The subsurface water temperature continued to be above-average. The official CPC/IRI outlook calls for neutral conditions through the rest of northern summer, with a 60% chance of El Niño development during fall, rising to 70% for winter 2018-19. An El Niño watch is in effect. The latest forecasts of statistical and dynamical models collectively favor weak El Niño development by early fall, growing to weak or possibly moderate strength during late fall and winter; most forecasters agree with this scenario.

Indian Ocean State

0.5 °C below average sea surface temperature was observed in the western and southeastern seas of Sri Lanka.

Predictions

Rainfall

14-day prediction:

NOAA NCEP models:

From 30th Aug – 5 Sep: Total rainfall between 25-35 mm in Kandy and Nuwara Eliya districts; between 15-25 mm in Jaffna, Kilinochchi, Mannar, Vavuniya, Mullaitivu, Anuradhapura, Trincomalee, Batticaloa, Ampara, Matale, Polonnaruwa, Badulla, Ratnapura and Kegalla districts; and up to 15 mm for the rest of the island.

From 6th - 12th Sep: Total rainfall between 15-25 mm in Kandy, Nuwara Eliya, Kegalla, Ratnapura and Colombo districts; and up to 15 mm in Gampaha, Kurunegala, Matale, Badulla, Galle and Matara districts.

IMD NCMWRF Forecast:

31st Aug: Up to 20 mm of rainfall in Trincomalee and Vavuniya districts.

1st Sep: Up to 10 mm of rainfall in Ampara district.

IRI Model Forecast:

From 29th Aug – 3 Sep: Total rainfall up to 75 mm expected in Jaffna, Kilinochchi, Mullaitivu, Vavuniya, Anuradhapura, Trincomalee, Badulla, Nuwara Eliya, Monaragala and Ampara districts; and up to 50 mm in the rest of the island.

MJO based OLR predictions

For the next 15 days:

MJO shall not have an impact on the rainfall in Sri Lanka.

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Official hydro-meteorological statements are provided by the Sri Lanka Department of Meteorology and Department of Irrigation.

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