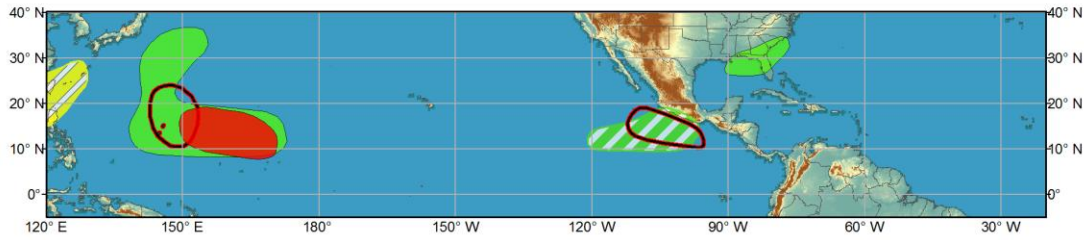




Global Tropics Hazards and Benefits Outlook - Climate Prediction Center



Week 1 - Valid: Sep 27 2014 - Sep 30 2014



Week 2 - Valid: Oct 01 2014 - Oct 07 2014



Confidence
High Moderate

Produced: 09/26/2014
Forecaster: Pugh

- Tropical Cyclone Formation** Development of a tropical cyclone (tropical depression - TD, or greater strength).
- Prior TC Formation Outlook** Tropical cyclone outlook from previous release.
- Above-average rainfall** Weekly total rainfall in the upper third of the historical range.
- Below-average rainfall** Weekly total rainfall in the lower third of the historical range.
- Above-normal temperatures** 7-day mean temperatures in the upper third of the historical range.
- Below-normal temperatures** 7-day mean temperatures in the lower third of the historical range.

Product is updated once per week. The product targets broad scale conditions integrated over a 7-day period for US interests only. Consult your local responsible forecast agency.



The MJO remained weak, with observed anomalous convection likely related to Kelvin waves and tropical cyclones. Dynamical model and statistical forecasts indicate a continued weak signal into the beginning of October. Therefore, the MJO is not expected to influence anomalous convection or modulate tropical cyclone activity.

Since the release on September 23, Tropical Storm Rachel formed in the east Pacific and is forecast to dissipate west of the Baja peninsula during the next 5 days. Meanwhile, Tropical Storm Kammuri developed to the northeast of Guam in the northwestern Pacific. Kammuri is forecast to strengthen and become a typhoon early in Week-1 and then accelerate northeast away from Japan.

As of September 26, satellite imagery indicates a disturbance over the northwestern Pacific (near 8N/170E). High confidence exists that this disturbance becomes a tropical cyclone (TC) during Week-1 due to excellent model agreement. In the wake of Tropical Storm Rachel, tropical cyclone development is not expected across the East Pacific through the end of September. Odds for tropical cyclone development across the East Pacific are expected to increase during the first week of October.

Confidence is tempered due to a slightly weaker signal in recent runs of the GFS model. Conditions continue to remain unfavorable for tropical cyclone development across the Atlantic basin at least through the next ten days.

The above-average rainfall areas from the previous outlook were modified from the previous release due to timing, current satellite imagery, and updated model guidance. Above-average rainfall is likely for the Northwest Pacific along the track of Kammuri and the expected TC. Model guidance remains consistent with above-average rainfall during the remainder of September across the East Pacific and northeast Gulf of Mexico. No changes were made to the wet and dry shapes for the October 1-7 period.

----- Previous discussion follows -----

The MJO remained weak during the past week with the CPC velocity potential index and the Wheeler-Hendon RMM-based index indicating the lack of a MJO signal. Dynamical model and statistical forecasts of the MJO indicate a continued weak signal during the next two weeks. Therefore, the MJO is not expected to influence convection or tropical cyclone activity during the next two weeks. Diagnostic tools reveal the presence of a Kelvin wave crossing the Indian Ocean currently and it is expected to influence convection across the Indian Ocean and west Pacific during the next week.

The remnants of Hurricane Odile brought flooding rainfall to the southwestern U.S. during the past week. Polo briefly reached hurricane strength over the East Pacific before weakening as it moved into cooler waters. No additional tropical cyclones developed across the Atlantic basin after Hurricane Edouard. Tropical Storm Fung Wong developed east of the Philippines on September 17 and it affected Luzon of the Philippines, Taiwan, eastern China, and South Korea. Cyclonic, onshore flow associated with Fung Wong brought locally more than 600mm (or 24 inches) of rainfall to western Luzon. At the beginning of Week-1, a tropical cyclone is likely to form near Guam in the Northwest Pacific . Environmental conditions, including warmer-than-normal SSTs between 150E and the Date Line, favor the development of another tropical cyclone across the Northwest Pacific at the end of Week-1 or early in Week-2. Similarly, across the East Pacific, tropical cyclogenesis is likely at the beginning of Week-1 with enhanced odds for tropical cyclone development continuing during Week-2. Meanwhile, tropical cyclone development is expected to remain below climatology across the Atlantic basin.

An entering Kelvin wave, tropical cyclone activity, and warm SSTs favor enhanced rainfall across the Northwest Pacific. The exiting Kelvin wave and ongoing convection are expected to enhance rainfall across the east-central Indian Ocean, between the equator and 10S, but this convection should wane later in Week-1. In the wake of Tropical Storm Fung Wong, below-average rainfall is expected across the South China Sea, Vietnam, Taiwan, and southeast China. Enhanced rainfall forecast for the East Pacific is based on tropical cyclone activity. A stationary front, related to the mid-latitude circulation pattern, is likely to enhance rainfall along parts of the Gulf and Southeast coasts of the U.S. during Week-1. After a delayed withdrawal of the Indian Monsoon, the eastward shift began during mid-September and is expected to continue its withdrawal during the remainder of September.

During Week-2, enhanced rainfall forecast for the Northwest Pacific and the Philippines is supported by predicted tropical cyclone activity and model guidance. The base state, along with model guidance, favors below-average rainfall across southwest parts of the Maritime Continent. Elsewhere, no wet or dry shapes are defined on the map due to the forecast of a weak MJO signal and lack of model agreement.