

Recent observations and MJO indices including the RMM Index and CPC velocity potential based index indicate that the MJO remains active, with the enhanced phase now propagating across the Western Hemisphere. A slowly evolving low-frequency base state favoring enhanced (suppressed) convection over the west-central Pacific (Maritime Continent) also continues to strongly influence the pattern of global tropical convection. There is considerable spread among the dynamical model MJO forecasts as they try to reconcile interference between the MJO activity and the tropical base state, while statistical models support a continued MJO signal during the forecast period. This outlook is based on an active MJO signal that is anticipated to weaken due to increasingly destructive interference with the base state over the next two weeks.

Although recent observations of upper-level velocity potential indicate that the suppressed phase of the MJO is propagating over the western Pacific, influence from the low-frequency state is supporting the persistence of enhanced convection over much of the southwestern Pacific. Tropical Storm Lusi formed near Vanuatu on 9 March, and Tropical Storm Hadi formed over the Coral Sea on 10 March. Tropical Storm Gillian formed briefly over the Gulf of Carpentaria on 8 March before weakening. The Joint Typhoon Warning Center forecasts Hadi to weaken early in the period, while Tropical Storm Lusi is

anticipated to strengthen into a typhoon. During Week-1, a continuation of enhanced convection over the west-central Pacific favors a moderate chance of additional tropical cyclogenesis to the east of the existing tropical cyclones. Additionally, a disturbance over the West Pacific east of the Philippines also has a moderate potential to develop into a tropical cyclone late in the Week-1 period or early in the Week-2 period.

During Week-1, suppressed convection is favored over the far eastern Indian Ocean and Maritime Continent due to constructive interference between the suppressed phase of the MJO and large scale suppression due to the slowly evolving base state. Enhanced convection is forecast over the western Indian Ocean, consistent with the MJO, while enhanced convection is anticipated to continue over the west-central Pacific, which out of phase with the current MJO state. Forecasts of suppressed convection over parts of southern Africa, Madagascar, and eastern Brazil are based on dynamical model guidance for more regional features.

Suppressed convection is anticipated to continue over the Maritime Continent during the Week-2 period, although with reduced confidence across the far eastern Indian Ocean and western Maritime Continent due to destructive interference between the base state and the eastward propagating MJO signal. Enhanced convection is favored to persist over the western equatorial Indian Ocean and southwestern Pacific. Dynamical models favor a continuation of suppressed convection over eastern Brazil, which would result in an intensification of ongoing drought, while above-average precipitation is possible over parts of southern Africa.