



The Madden Julian Oscillation (MJO) index is currently in Phase 1 with amplitude less than 1. It is likely to move into Phase 2 during the early part of week 1 with amplitude less than 1 and continue in the same Phase during the rest of week 1. Then it is likely to move into Phase 5 cut-shortening Phases 3 & 4 with gradual increase in amplitude during week 2. Hence the MJO will support convection over the Indian Seas (Bay of Bengal & Arabian Sea) during weeks 1 & 2.

Most of the numerical models including IMD GFS, GEFS, NCUM & NEPS are not indicating any cyclogenesis during the forecast period. The Genesis Potential Parameter (GPP) based on IMD GFS is not indicating any potential zone for cyclogenesis over the north Indian Ocean during the forecast period. However, MMCGEPS indicates a low probability of 30-40% during week 1 & 20-30 % during week 2 in the near equatorial convergence zone over the equatorial Indian Ocean and adjoining south Bay of Bengal (BoB). ECMWF TC strike probability product indicates a low cyclogenesis probability of 20-30 % over southeast BoB & adjoining equatorial Indian Ocean in the first half of week 2. The deterministic model output from NCEP GFS indicates cyclogenesis over southeast BoB during the second half of week 2.

Considering all the above, it may be concluded that no cyclogenesis is predicted over the north Indian Ocean during week 1 and there is a low probability of cyclogenesis over south BoB during the latter half of week 2.

Verification of forecast issued during last two weeks:

The forecast issued on 04th March for week 2 and the forecast issued on 11th March for week 1 for the period (12.03.2021-18.03.2021) indicated no cyclogenesis over the north Indian Ocean during the period. No cyclogenesis occurred during the period which could be correctly predicted 2 weeks in advance.