

Global Tropics Hazards And Benefits Outlook

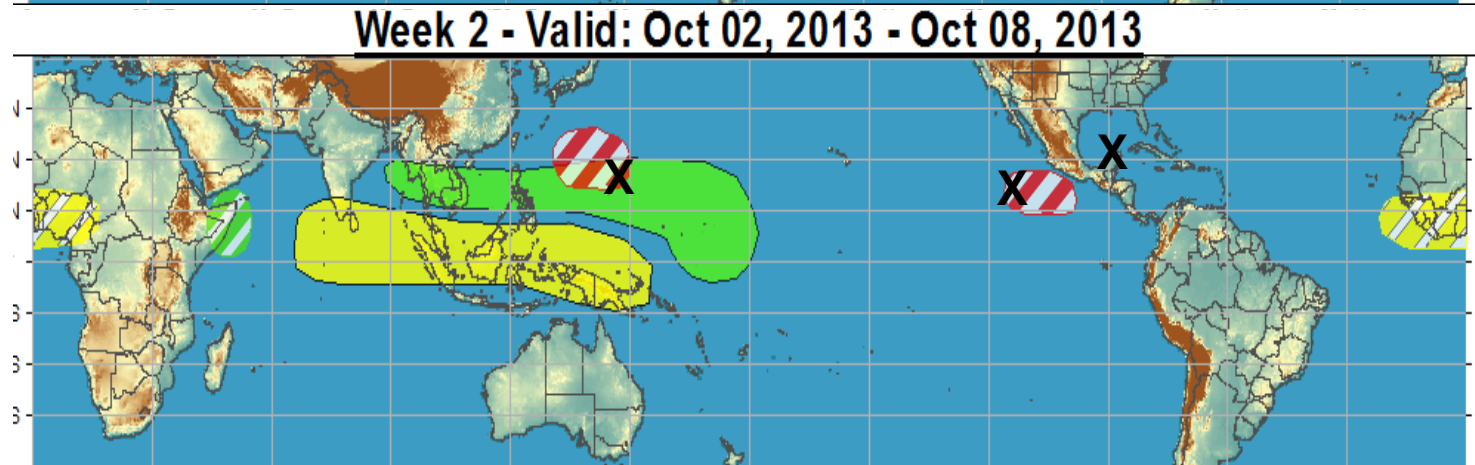
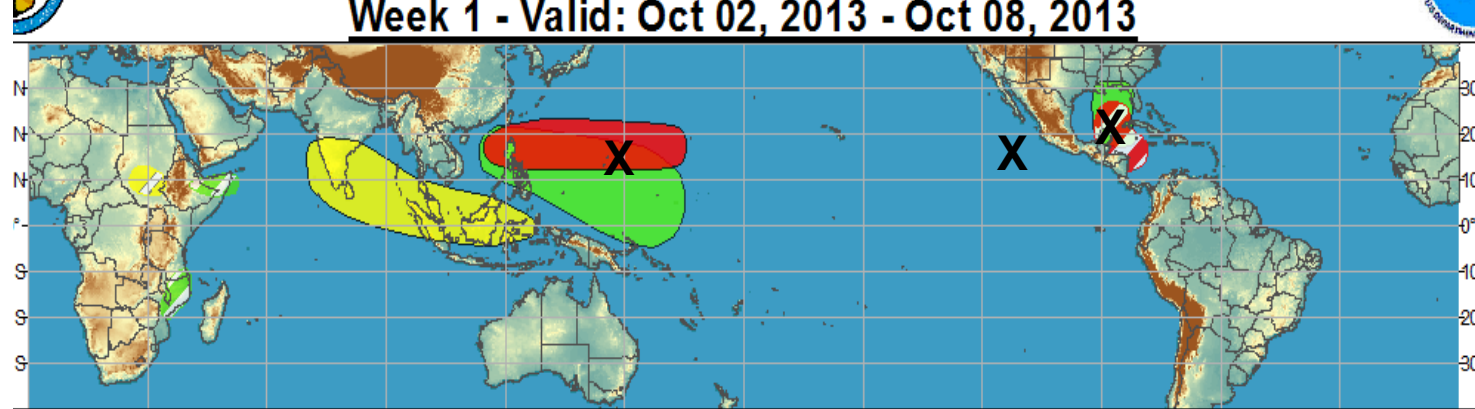
October 8, 2013

Matthew Rosencrans

Outline

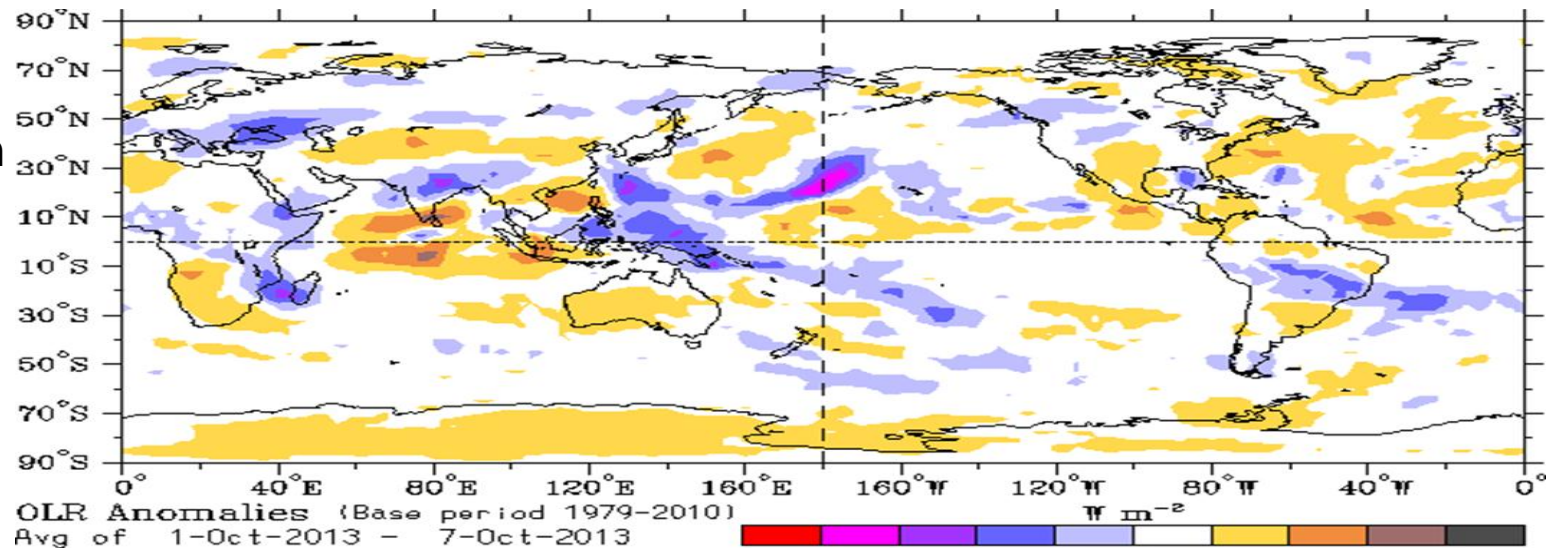
1. Review of Recent Conditions
2. Synopsis of Climate Modes
3. GTH Outlook and Forecast Discussion
4. Connections to U.S. Impacts

Outlook Review



Cool shading
More clouds/rain

Warm shading
Less clouds/rain



Synopsis of Climate Modes

ENSO:

- ENSO-neutral is favored through the Northern Hemisphere winter 2013-14.

MJO and other subseasonal tropical variability:

- The MJO remained active over the past week, although some observational indicators are less coherent than in previous weeks as other subseasonal variability are playing a large role in the pattern of anomalous tropical convection. The MJO enhanced phase is centered over the western Pacific
- Dynamical model MJO index forecasts generally support continued eastward propagation, though at the slower end of the spectrum. The statistical tools also support continued MJO activity, although those reflect a weaker signal and faster propagation.

Extratropics:

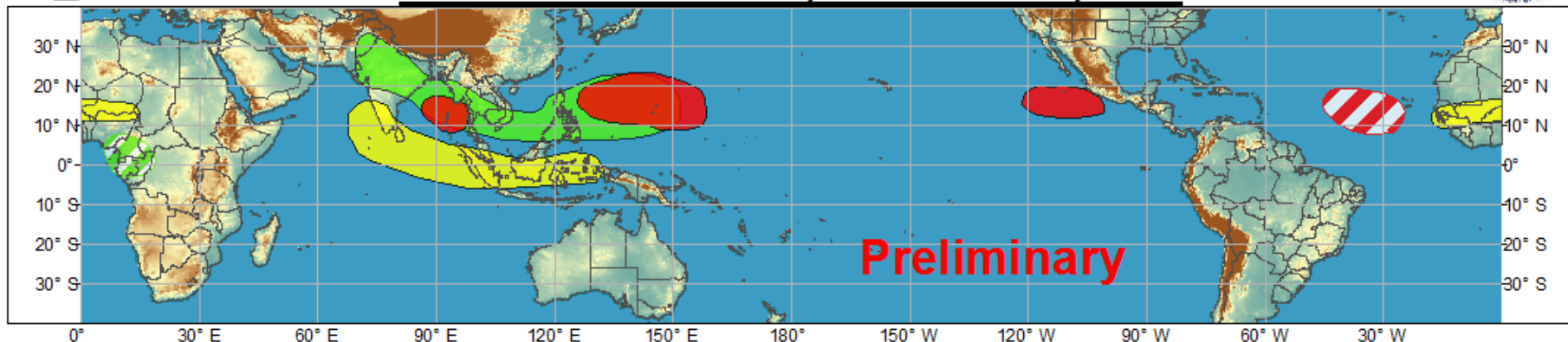
- The extended range forecast for temperatures aligns somewhat with the projected phases of the MJO. Connections to precipitation patterns are less robust during this time of year.



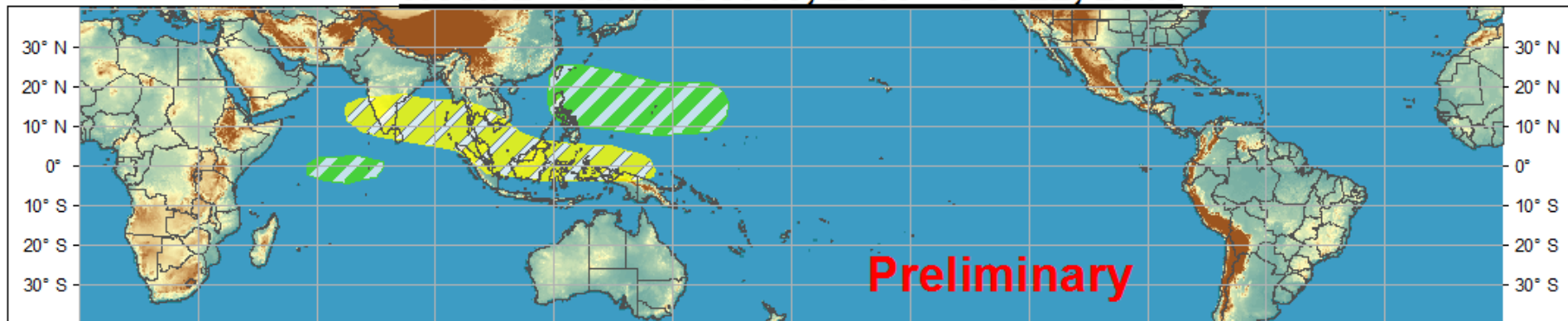
Global Tropics Hazards and Benefits Outlook - Climate Prediction Center













Week 1 - Valid: Oct 09, 2013 - Oct 15, 2013



Week 2 - Valid: Oct 16, 2013 - Oct 22, 2013



Confidence
High Moderate

- | | | |
|-----------------------------------|---|--|
| Tropical Cyclone Formation |   | Development of a tropical cyclone that eventually reaches tropical storm/cyclone strength. |
| 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. |
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Produced: 10/08/2013

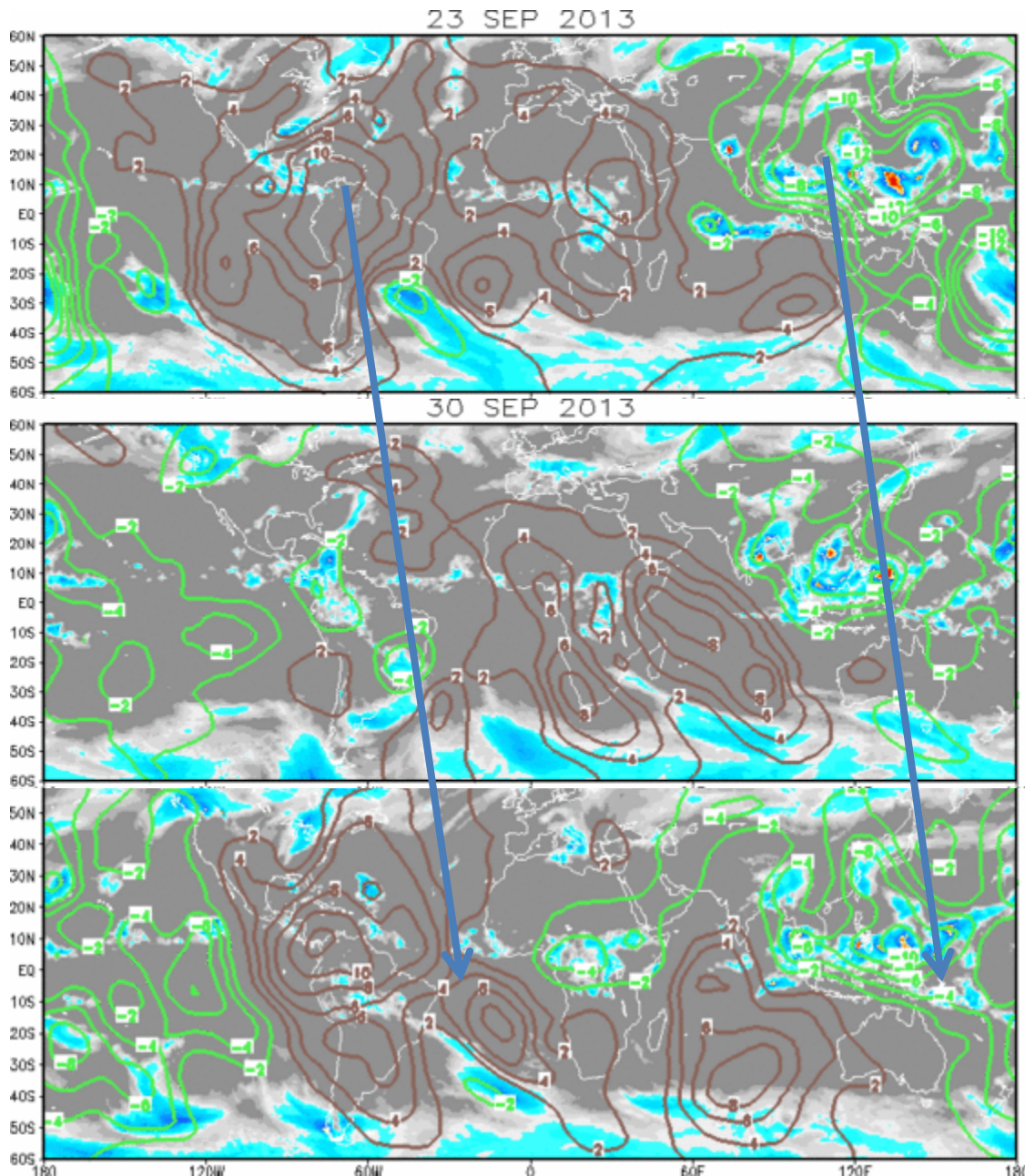
Forecaster: Rosencrans

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.



IR Satellite & 200-hpa Velocity Potential Anomalies

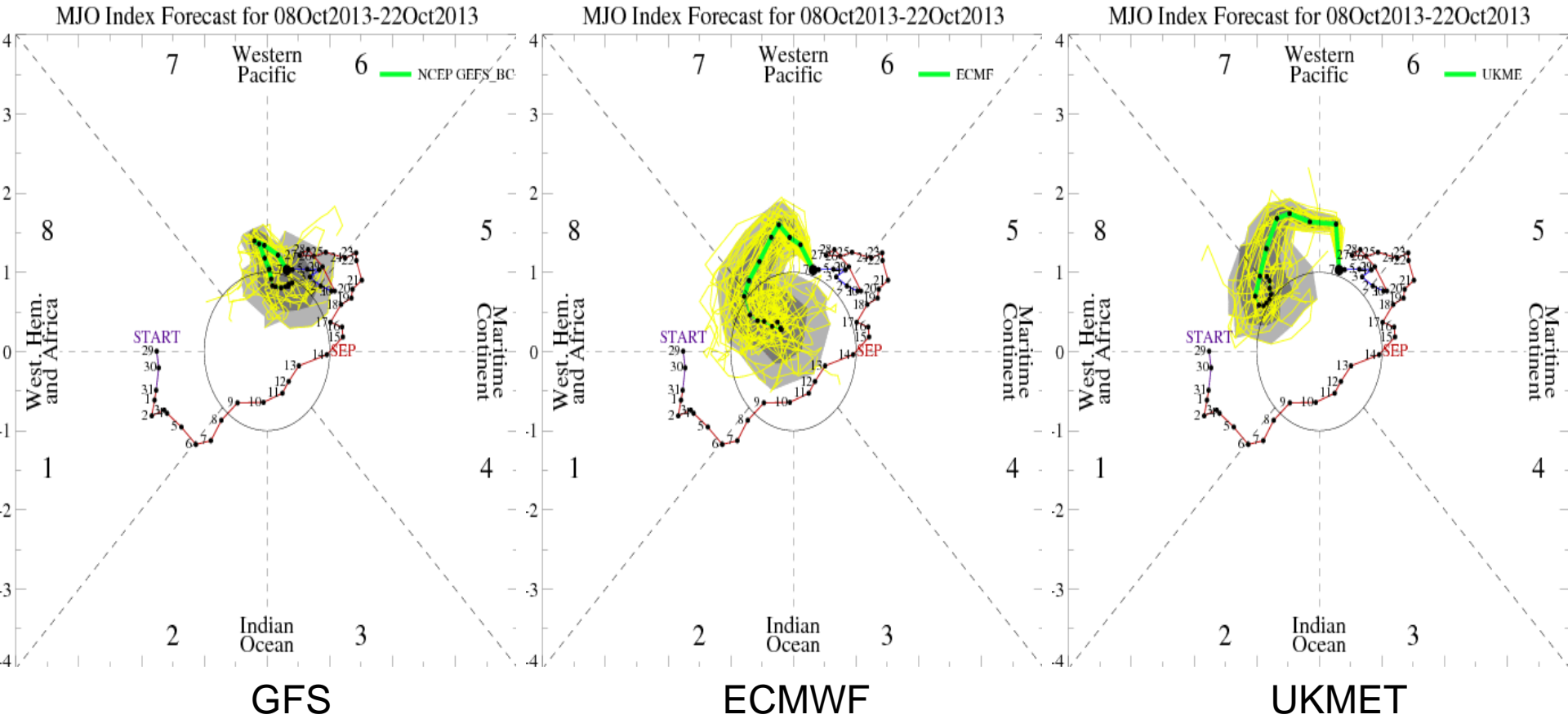
Green: Enhanced Divergence Brown: Enhanced Convergence



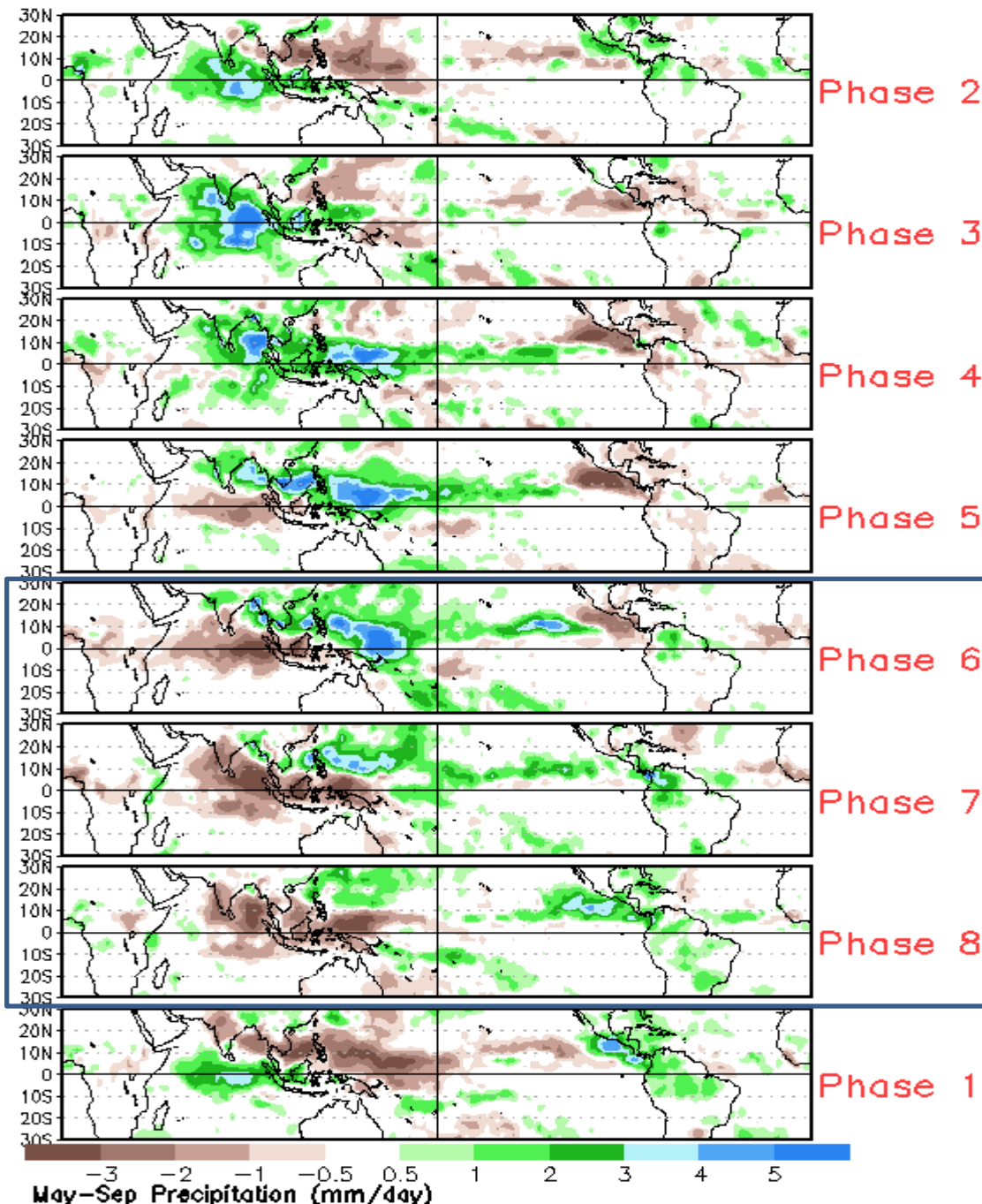
Nearly vertical
arrows = Slow
propagation.

Evidence of
other modes

MJO Observation/Forecast



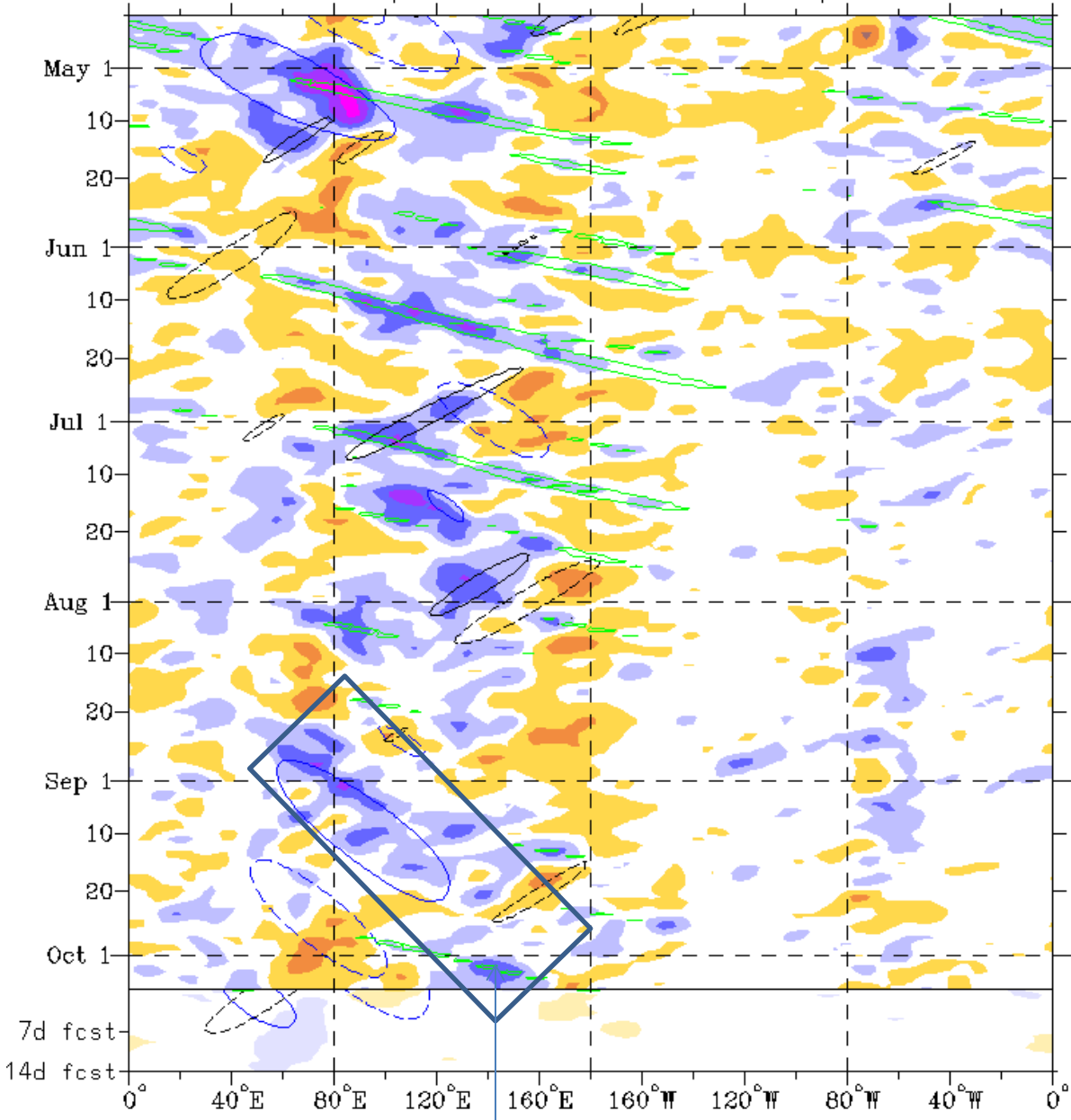
Average Conditions when the MJO is present (May-Sep)



CAVEAT:

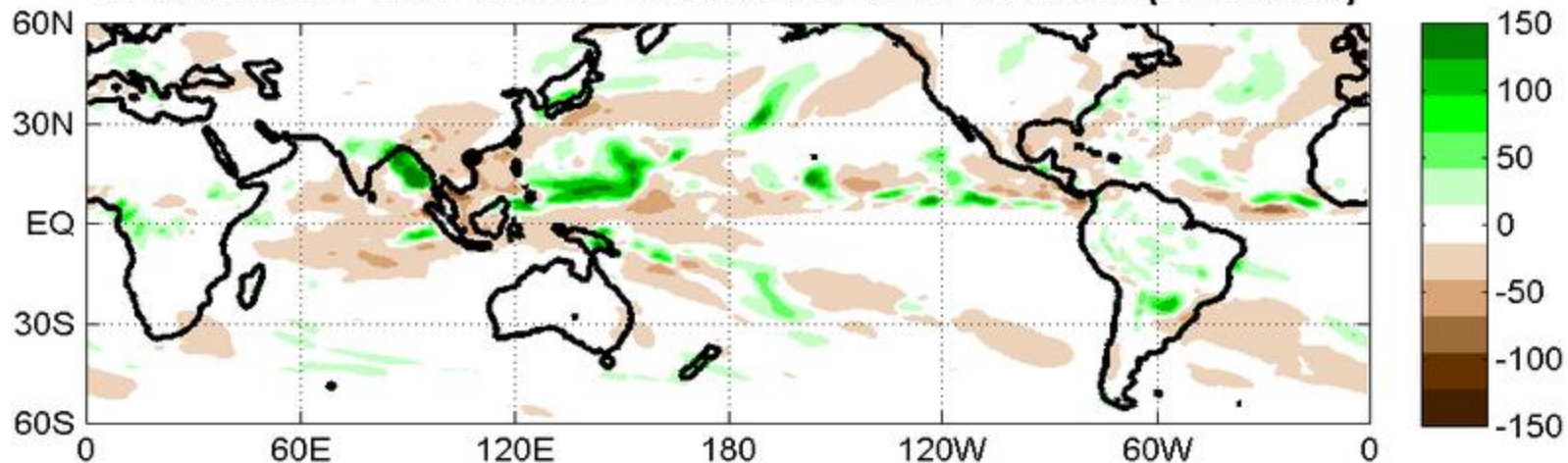


Active phase of the MJO
forecast to impact western North
Pacific.

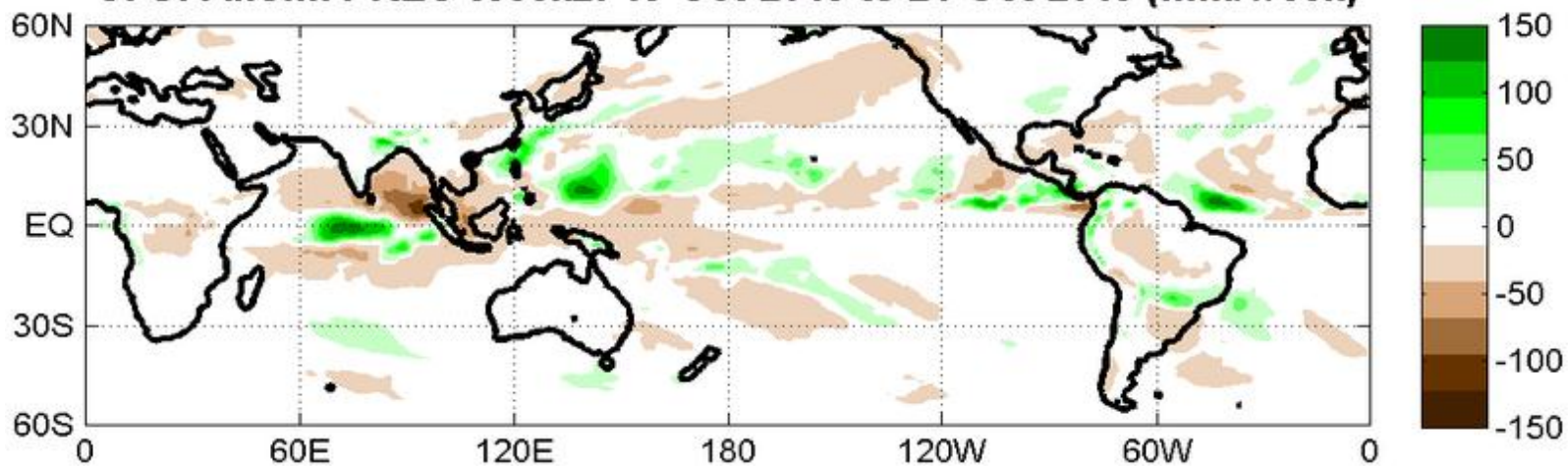


Indications of other modes of
variability, including mid-latitude
influence near the Date Line.

CFS: Anom. PREC Week1: 08-Oct-2013 to 14-Oct-2013 (mm/week)



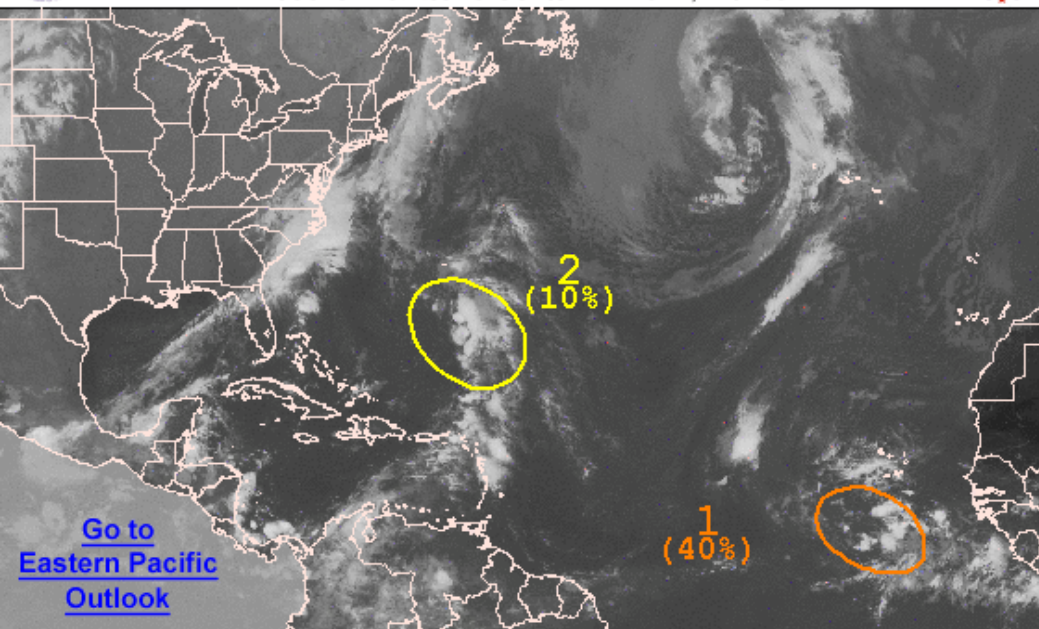
CFS: Anom. PREC Week2: 15-Oct-2013 to 21-Oct-2013 (mm/week)





Graphical Tropical Weather Outlook

National Hurricane Center Miami, Florida




[Go to Eastern Pacific Outlook](#)

800 AM EDT TUE OCT 8 2013

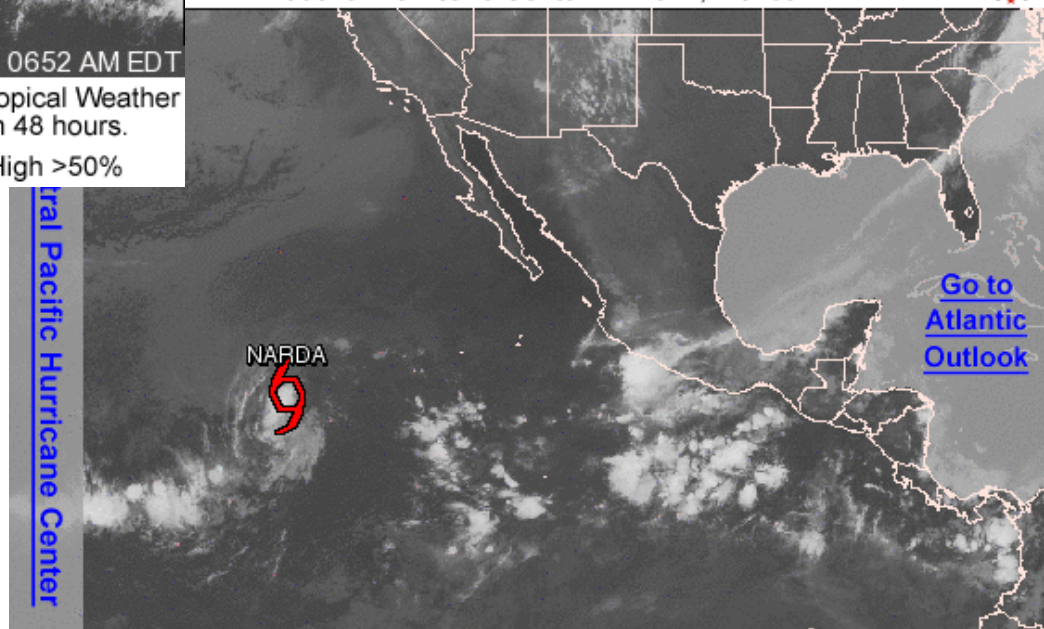
Satellite Image: 0652 AM EDT

Outlined areas denote current position of systems discussed in the Tropical Weather Outlook. Color indicates probability of tropical cyclone formation within 48 hours.

 Low <30%	 Medium 30-50%	 High >50%
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Graphical Tropical Weather Outlook

National Hurricane Center Miami, Florida



[Go to Atlantic Outlook](#)

500 AM PDT TUE OCT 8 2013

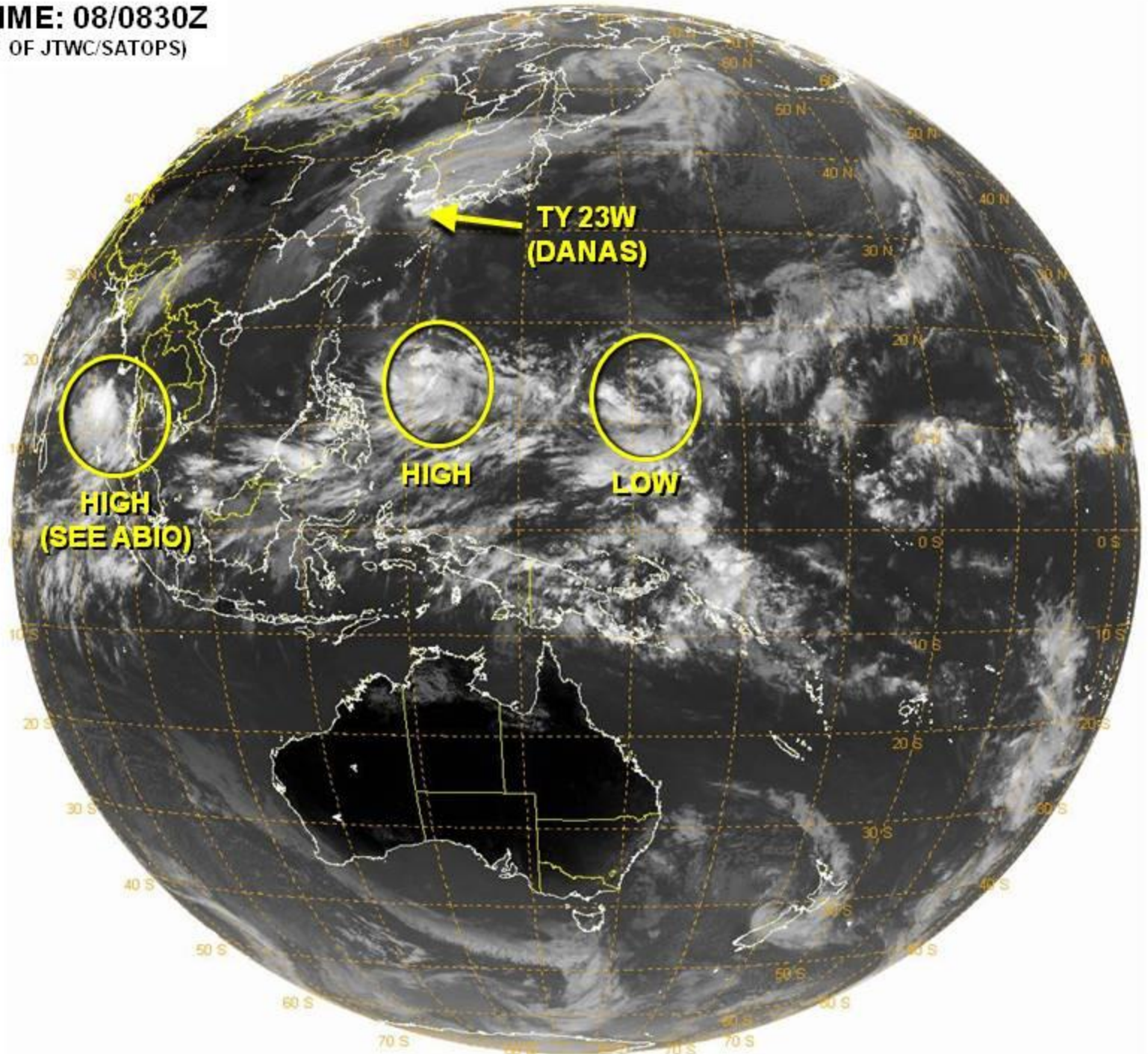
Satellite Image: 0652 AM PDT

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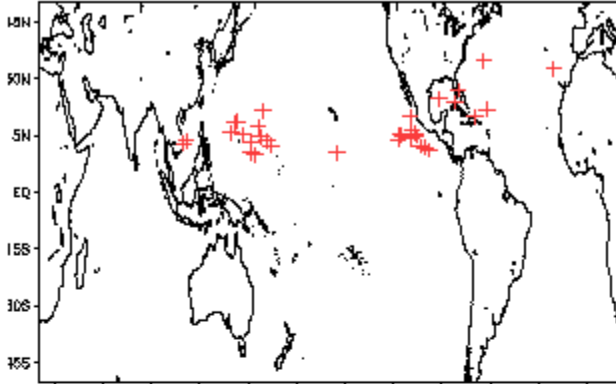
Central Pacific Hurricane Center

VALID TIME: 08/0830Z
(PRODUCT OF JTWC/SATOPS)

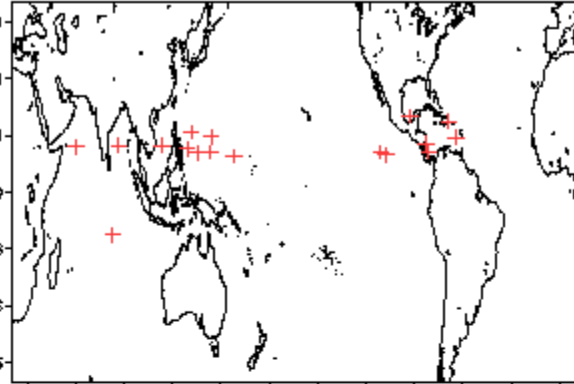


October Tropical Storm Formation by MJO phase

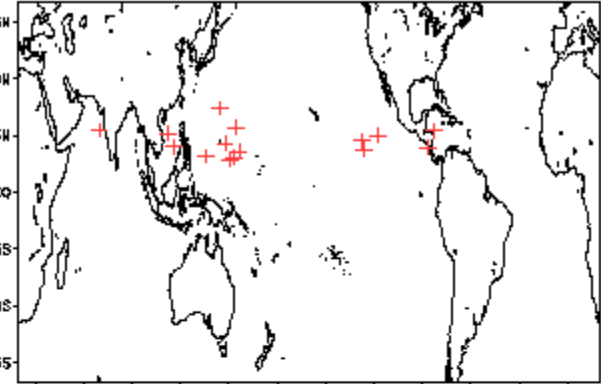
Phase 1 (94 days) 34 storms



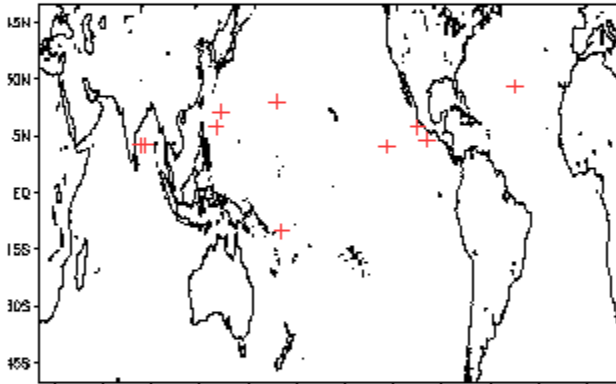
Phase 4 (85 days) 18 storms



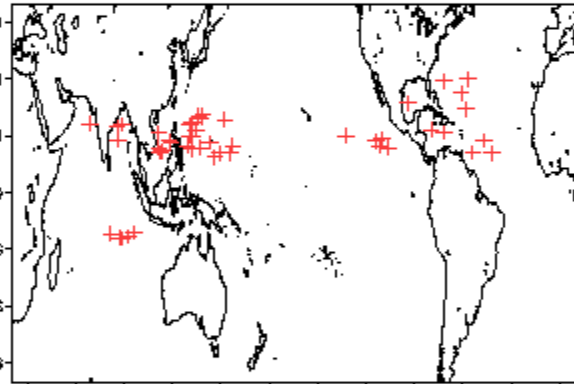
Phase 7 (48 days) 16 storms



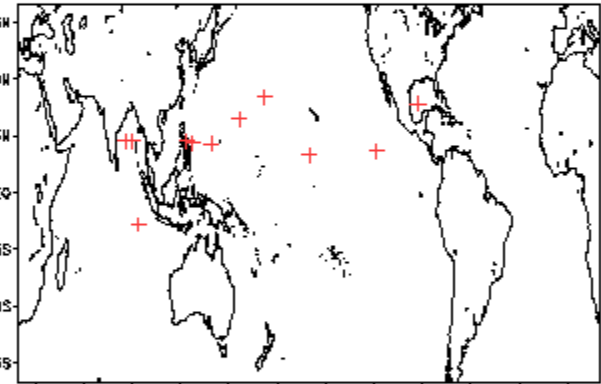
Phase 2 (75 days) 11 storms



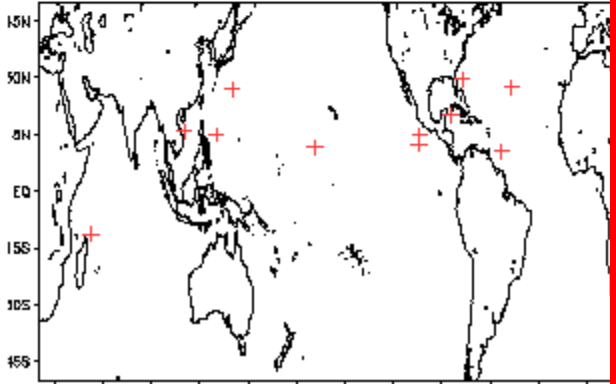
Phase 5 (133 days) 48 storms



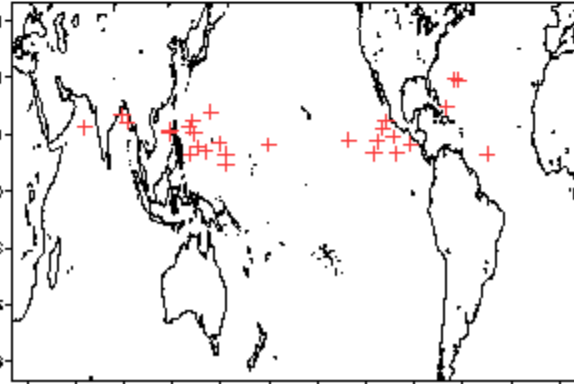
Phase 8 (66 days) 12 storms



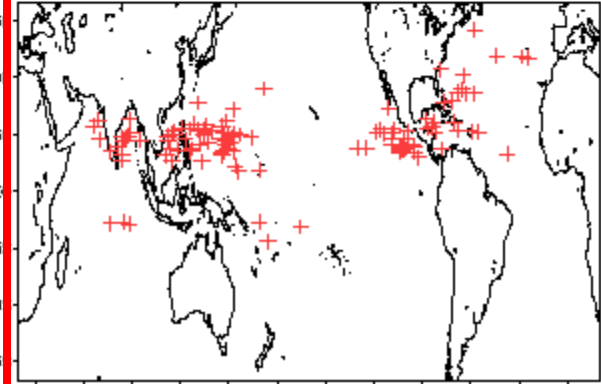
Phase 3 (41 days) 12 storms



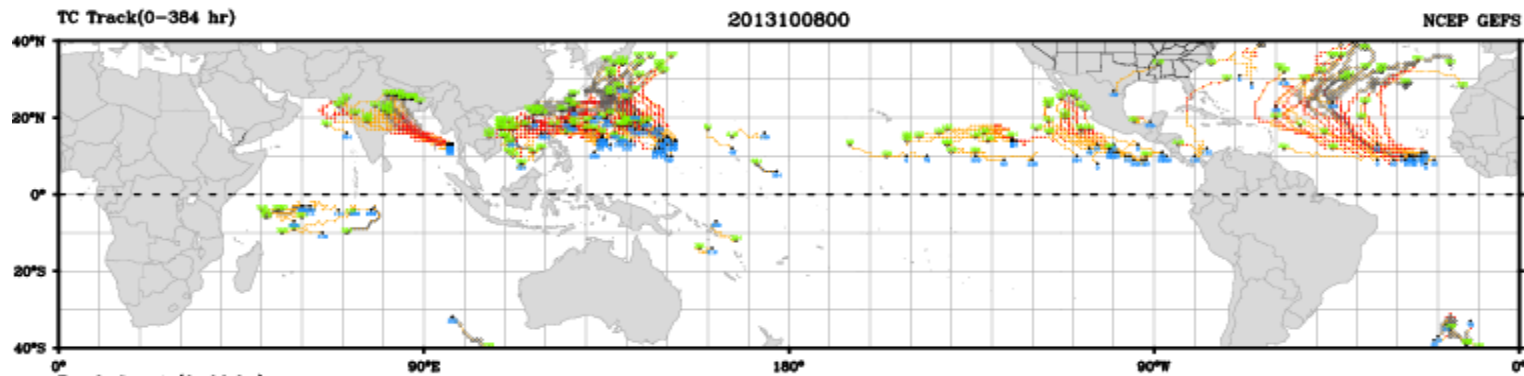
Phase 6 (78 days) 30 storms



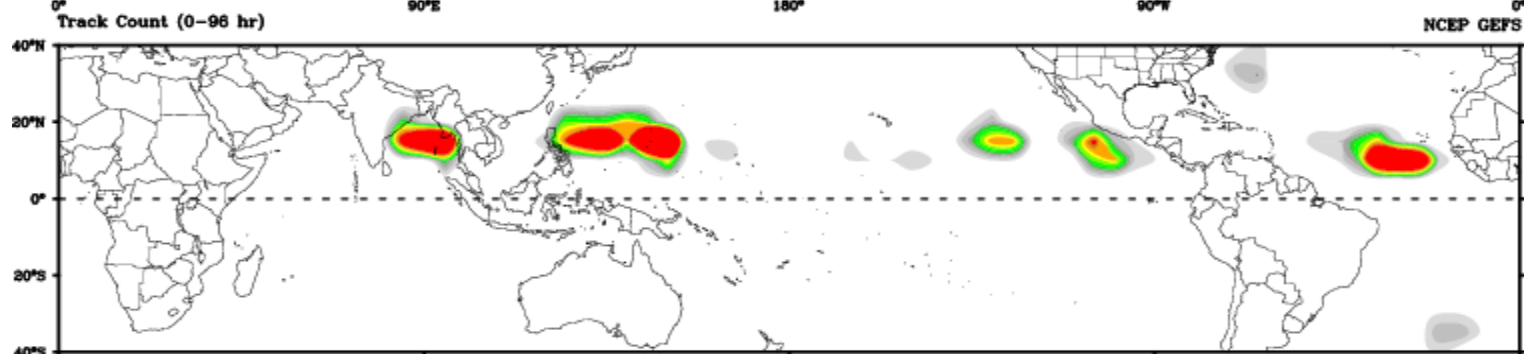
Null (422 days) 119 storms



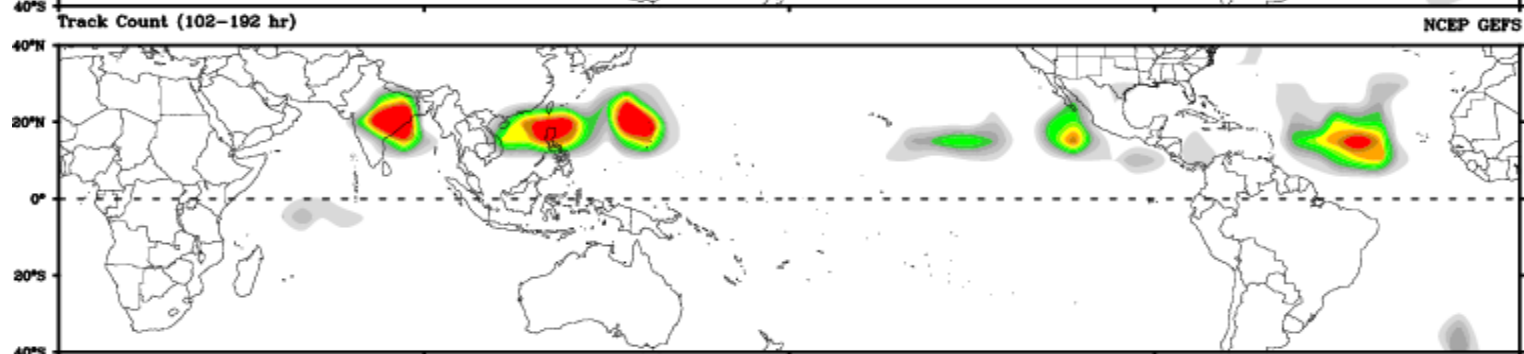
CWB TC Tracker for NCEP GEFS (Fuzzy_AllCriteria)



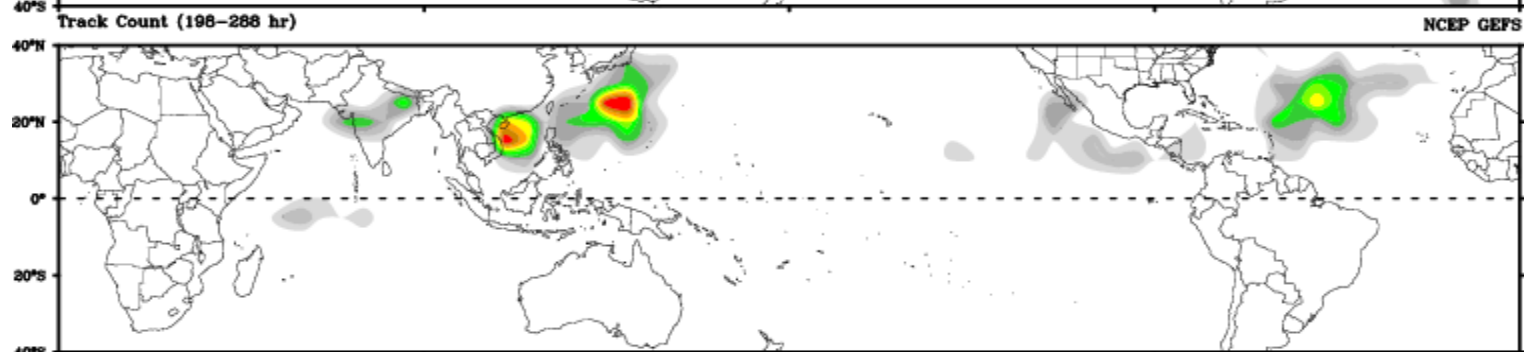
Days 1-4

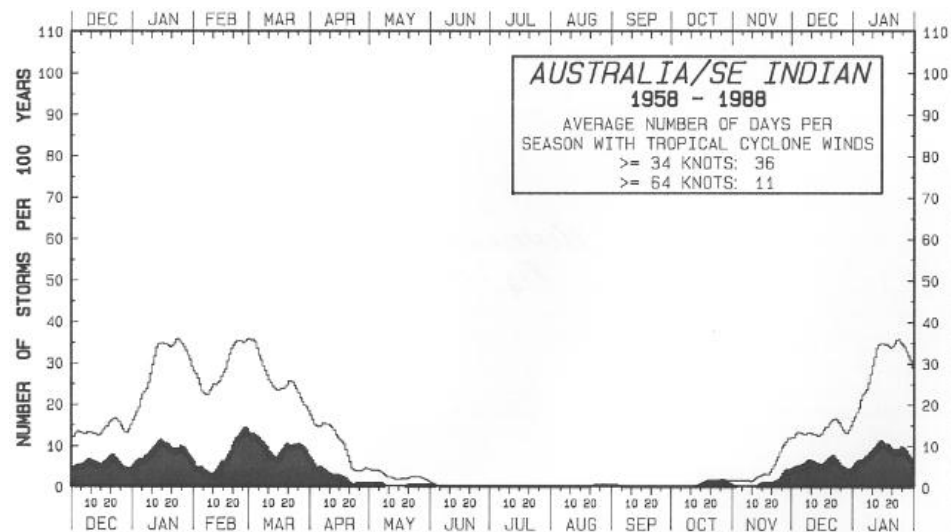
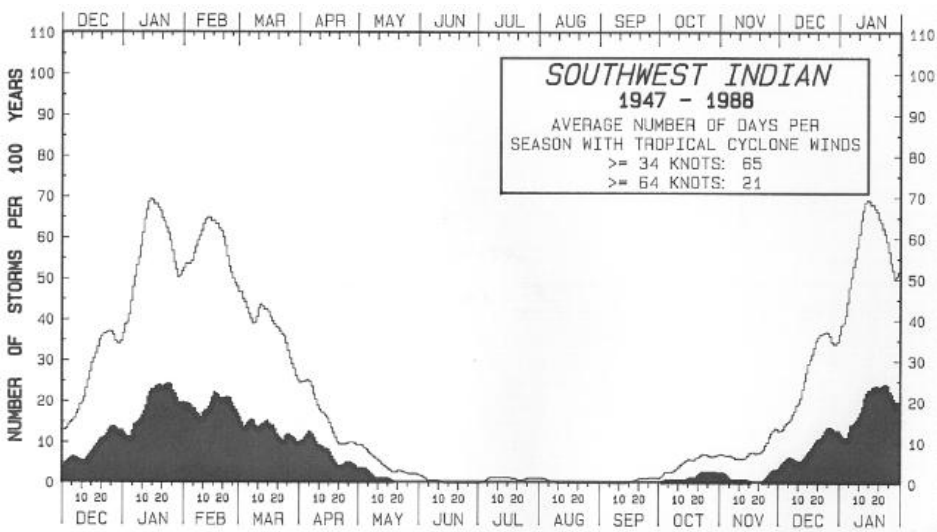
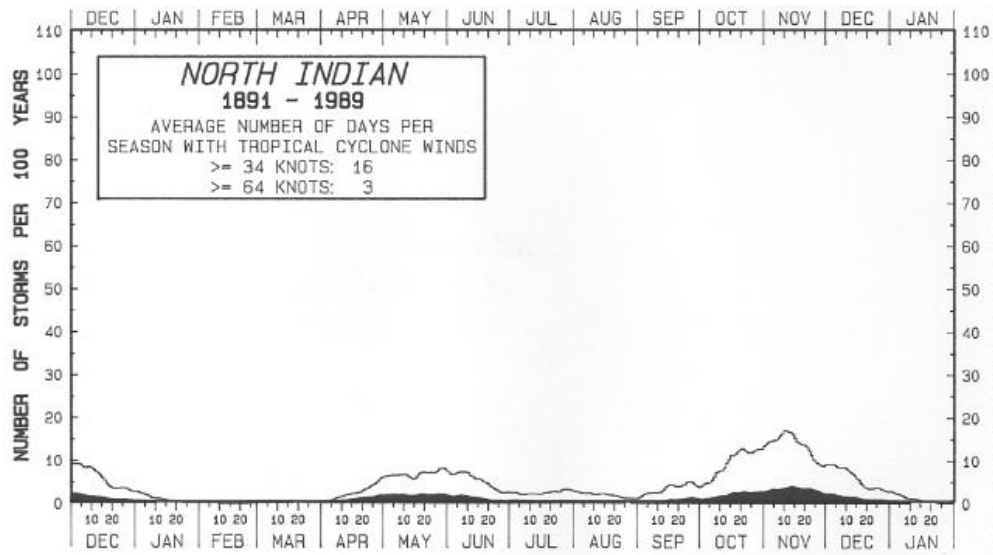


Day 5-8



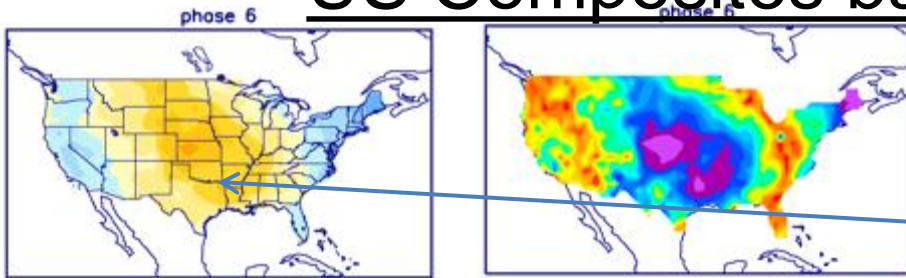
Day 9-12



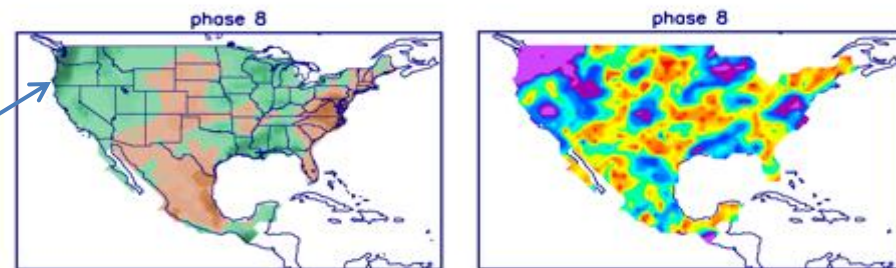
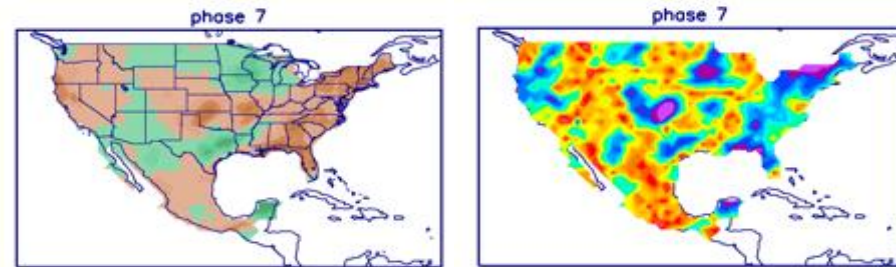
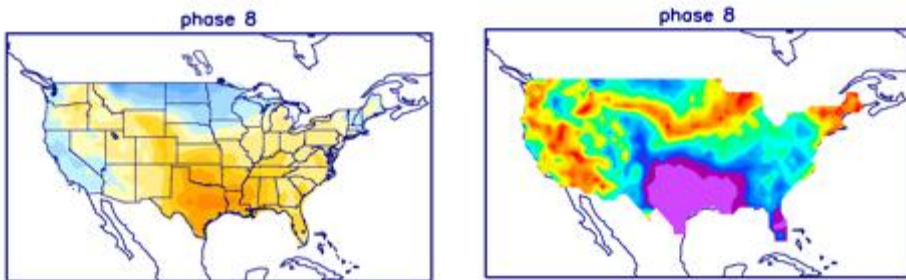
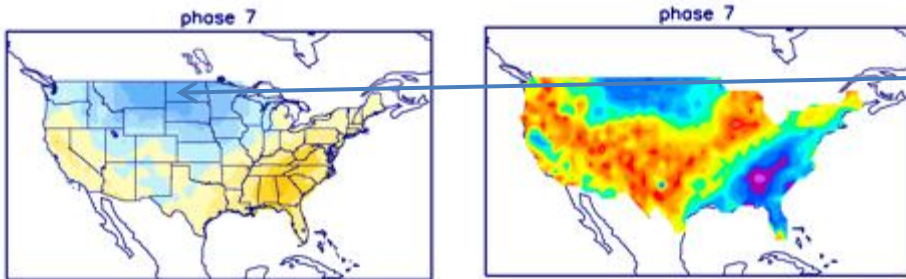


Connections to U.S. Impacts

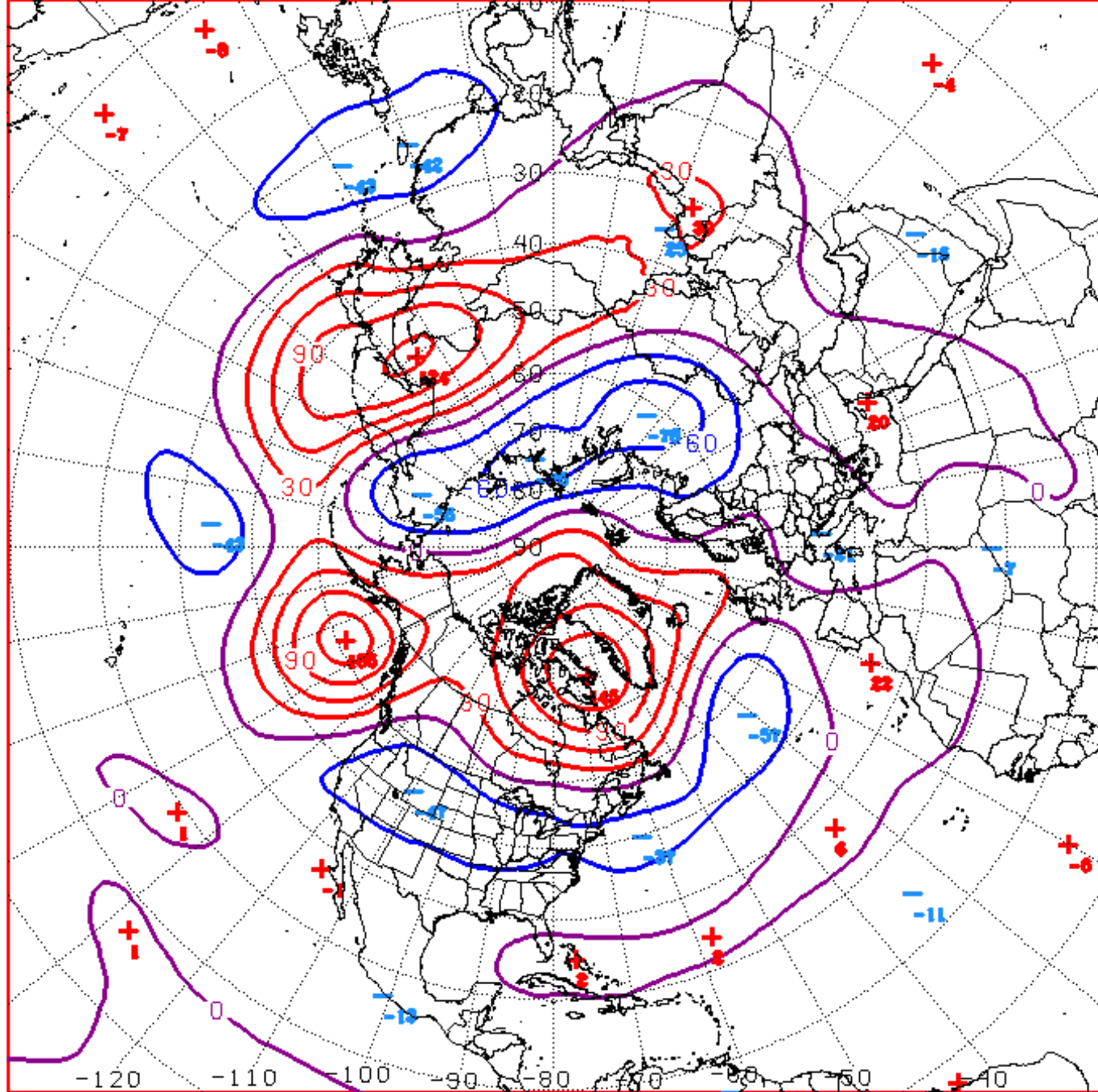
US Composites based on MJO Phase



Indicated warmer conditions shifting across the CONUS, to the southeast and potentially cooler across northern Great Plains.

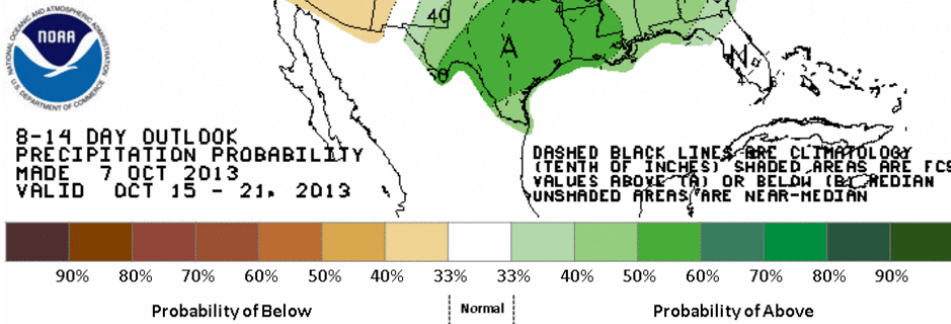
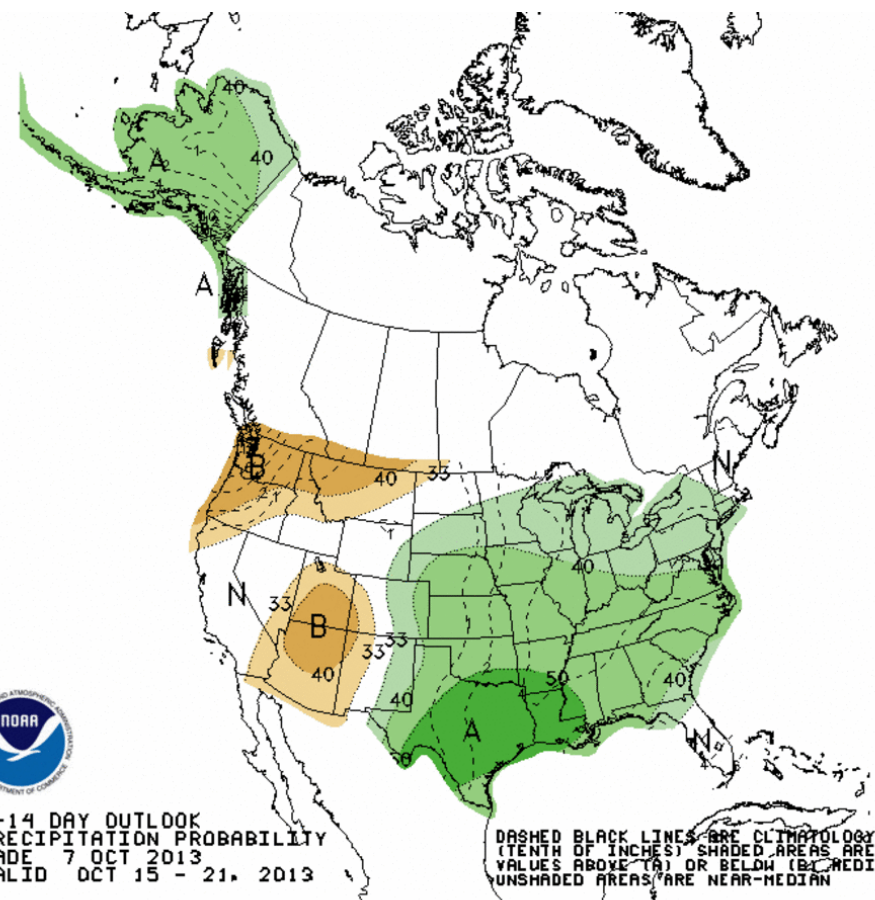
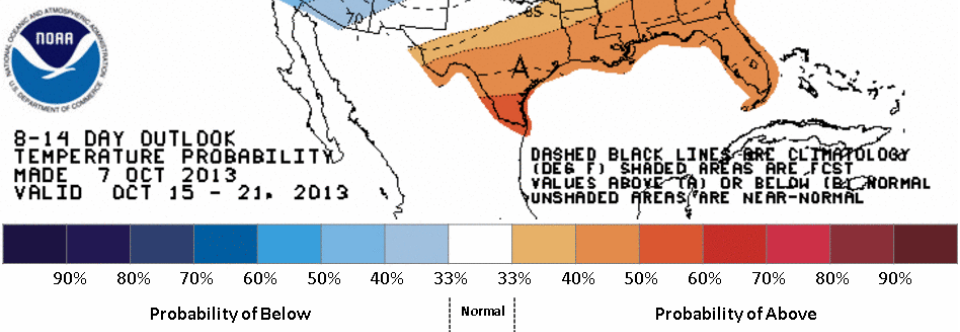
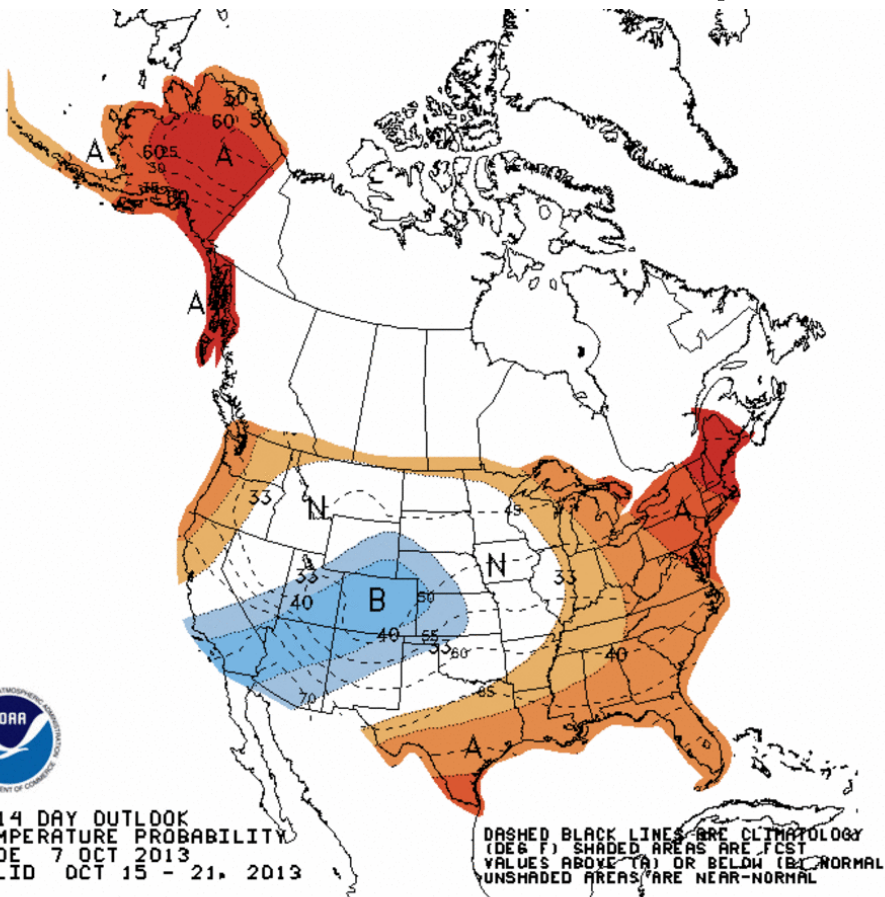


Precipitation signal is less robust, although some indications for week 3 for wetness into the PacNorWest.



D+11 500 MB ANOMALIES FROM 00Z ECMM
CPC MAP MADE OCT 08 2013 1123 UTC CNTD OCT 19 2013

Week 2 – Temperature and Precipitation

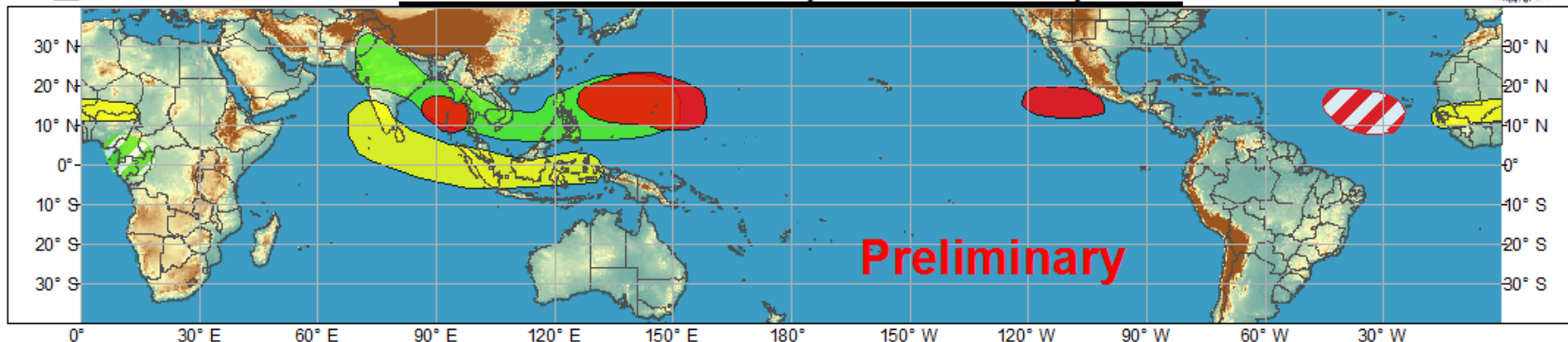




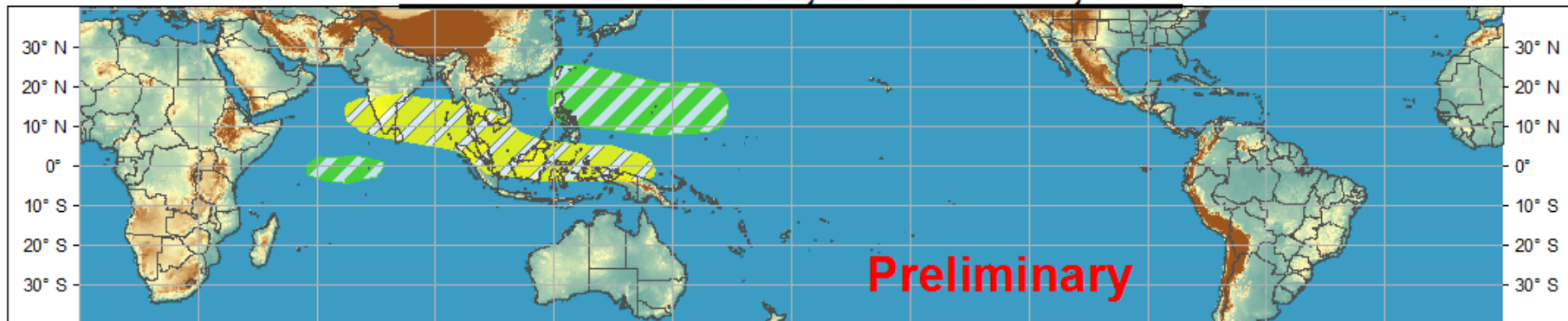
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