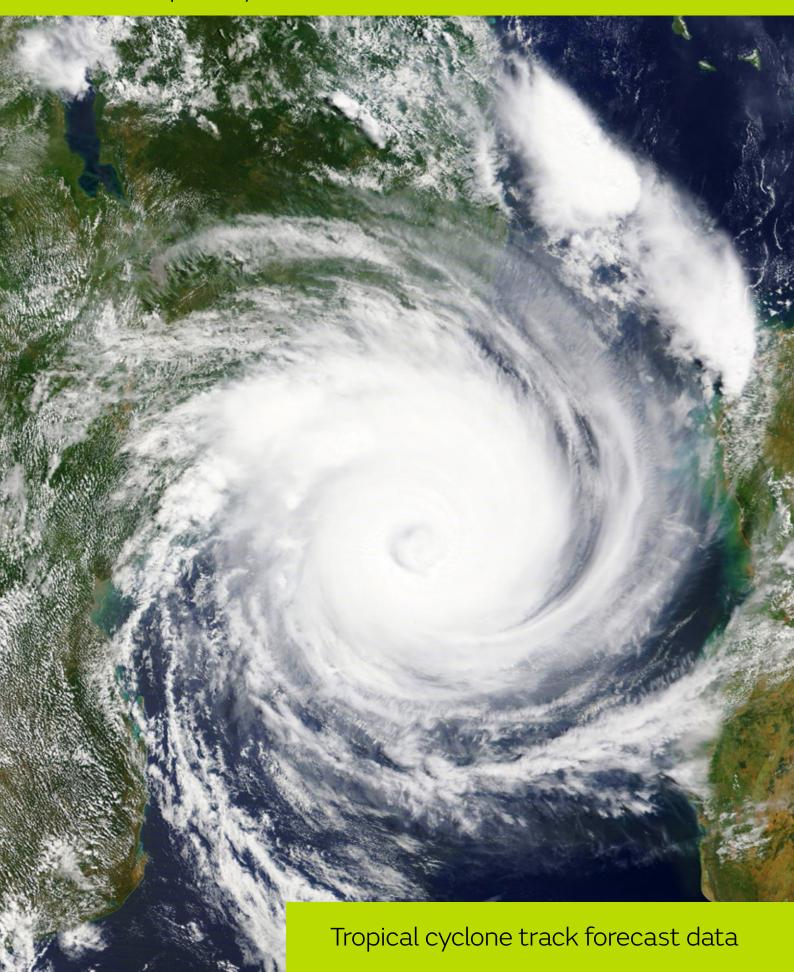
Met Office



Global tropical cyclone tracks



Tropical cyclones are amongst the most powerful and destructive meteorological systems on earth. Globally, 80 to 100 develop over tropical oceans each year. Many of these make landfall and can cause considerable damage to property as well as loss of life.

Met Office tropical cyclone tracks

The guidance messages are issued four times per day, showing forecast positions and intensities taken directly from the Met Office Global Model. These guidance messages are not official tropical cyclone forecasts and therefore should not be used exclusively to make decisions which will affect life or property. Refer to forecasts issued by one of the WMO designated tropical cyclone Regional Specialised Meteorological Centres (RSMCs) for official forecast information.

See https://www.metoffice.gov.uk/research/weather/tropical-cyclones/warnings for details.

Tropical cyclone tracking technique

The method used to track tropical cyclones and verify forecasts in Met Office models is available in this publication:

Heming, J.T., 2017. <u>Tropical cyclone tracking and verification techniques for Met Office numerical weather prediction models.</u> Meteorological Applications, 24, No.1, 1-8.

Available bulletins

The tropical cyclone tracks are delivered as 2 bulletins:

- Deterministic tracks from the Global Model and
- Ensemble forecast from MOGREPS-G.

Both of these bulletins are combined as one service.



Cost

€500 handling fee for both bulletins

Deterministic track

Model: Met Office Global Model



Run length

Up to T+168 (if the storm can be tracked for that long)



Model run times

00UTC & 12UTC

Probabilistic track

Model: MOGREPS-G

Runs 4 times a day with 18 members. The most recent two runs are time-lagged to create a 36-member ensemble 4 times a day.

At the end of the MOGREPS-G ADECK file is the ensemble mean track, labelled as UEMN.



Run length

Up to T+192 (if a storm can be tracked that long)



Model run times

00UTC, 06UTC, 12UTC & 18UTC

Common features



Resolution

N/A (as native model)



Format

ADECK (aka ATCF) bulletins [as used by NHC]



Domain

Global - Met office bulletins cover all basins



Delivery

File Transfer Protocol (FTP) or email

FitzRoy Road, Exeter Devon, EX1 3PB United Kingdom