

WTIO30 FMEE 180719

RSMC / TROPICAL CYCLONE CENTER / LA REUNION
TROPICAL CYCLONE FORECAST WARNING (SOUTH-WEST INDIAN OCEAN)

0.A WARNING NUMBER: 1/5/20182019

1.A TROPICAL DISTURBANCE 5

2.A POSITION 2018/12/18 AT 0600 UTC:

WITHIN 30 NM RADIUS OF POINT 10.2 S / 61.3 E

(TEN DECIMAL TWO DEGREES SOUTH AND SIXTY ONE DECIMAL THREE DEGREES EAST)

MOVEMENT : QUASI-STATIONARY

3.A DVORAK ANALYSIS: 1.5/1.5/D 1.0/24 H

4.A CENTRAL PRESSURE: 1005 HPA

5.A MAX AVERAGE WIND SPEED (10 MN): 25 KT

RADIUS OF MAXIMUM WINDS (RMW) :NIL

6.A EXTENSION OF WIND BY QUADRANTS (KM):

7.A FIRST CLOSED ISOBAR (PRESSURE / AVERAGE DIAM): 1009 HPA / 500 KM

8.A VERTICAL EXTENSION OF CYCLONE CIRCULATION : MEDIUM

1.B FORECASTS:

12H: 2018/12/18 18 UTC: 10.7 S / 60.9 E, MAX WIND=030 KT, TROPICAL DEPRESSION

24H: 2018/12/19 06 UTC: 11.3 S / 60.5 E, MAX WIND=035 KT, MODERATE TROPICAL STORM

36H: 2018/12/19 18 UTC: 11.9 S / 60.0 E, MAX WIND=045 KT, MODERATE TROPICAL STORM

48H: 2018/12/20 06 UTC: 12.7 S / 59.3 E, MAX WIND=055 KT, SEVERE TROPICAL STORM

60H: 2018/12/20 18 UTC: 13.5 S / 58.4 E, MAX WIND=070 KT, TROPICAL CYCLONE

72H: 2018/12/21 06 UTC: 14.3 S / 57.8 E, MAX WIND=085 KT, TROPICAL CYCLONE

2.B LONGER-RANGE OUTLOOK :

96H: 2018/12/22 06 UTC: 15.9 S / 58.0 E, MAX WIND=095 KT, INTENSE TROPICAL CYCLONE

120H: 2018/12/23 06 UTC: 20.2 S / 59.7 E, MAX WIND=085 KT, TROPICAL CYCLONE

2.C ADDITIONAL INFORMATION:

FT=CI=1.5

THE LOW PRESSURE AREA PREVIOUSLY FORMED DURING THE WEEK-END NORTH-EAST OF AGALEGA HAS NOW ENOUGH ORGANISED CONVECTION TO START ADVISORIES. COMPARED TO YESTERDAY, THE THUNDERSTORM ACTIVITY HAS INCREASED AND SHOW SIGNS OF BANDING FEATURES. SINCE YESTERDAY EVENING, THE CENTER HAS APPEARED GRADUALLY BETTER DEFINED ON MW IMAGERY AND SCAT DATA. THE ASCAT PASS OF THIS MORNING THAT SHOW 20/25 KT WINDS IS THE BASIS FOR THE INITIAL INTENSITY.

AFTER A SLOW EAST-SOUTH-EASTWARDS DRIFT SINCE FORMATION, THE LOW HAS MOVED LITTLE SINCE YESTERDAY NIGHT, EVEN IF SOME RECENT FIX SUGGEST A WESTWARDS DRIFT. OVER THE NORTHWESTERN EDGE OF A BUILDING MID LEVEL SUBTROPICAL RIDGE, THE SYSTEM IS EXPECTED TO RESUME A GENERAL SOUTHWESTWARDS TRACK OVER THE NEXT THREE DAYS. LATER IN THE WEEK A DEEP UPPER TO MID-LEVEL RIDGE IS EXPECTED TO MOVE SOUTH OF THE MASCAREIGNES ISLANDS, RESULTING IN A SIGNIFICANT AND PERSISTENT BREAK IN THE SUBTROPICAL RIDGE. THEREFORE, THE TRACK IS EXPECTED TO SLOW DOWN AT DAY 3 BEFORE GRADUALLY ACCELERATING SOUTH-SOUTH-EASTWARDS AT DAY 4 AND DAY 5. MOST OF THE VALUABLE GUIDANCE ARE IN GOOD AGREEMENT WITH THIS SCENARIO, BUT SHOW SIGNIFICANT DISCREPANCIES IN FORWARD MOTION AT DAY 4 AND DAY 5.

CURRENTLY THE SYSTEM IS STILL UNDER A MODERATE EASTERLY CONSTRAINT, BUT AS THE SYSTEM WILL GAIN LATITUDES, IT IS EXPECTED TO MOVE UNDER THE UPPER LEVEL RIDGE WITHIN FAVORABLE TO VERY FAVORABLE ENVIRONMENT UP TO DAY 3 TO DAY 4. DURING THAT TIME A FASTER THAN USUAL DEVELOPMENT SEEMS POSSIBLE AND IS REFLECTED IN THE FORECAST. DURING DAY 4, INCREASING WEST-NORTH-WESTERLY SHEAR ALONG WITH A DRYER MID LEVEL ENVIRONMENT (MAINLY WITHIN THE WESTERN SEMI-CIRCLE) SHOULD START TO WEAKEN THE SYSTEM.