INTERNATIONAL CIVIL AVIATION ORGANIZATION



AFI REGIONAL SIGMET TESTS REPORT

November 2016

REPORT ON AFI SIGMET TESTS

NOVEMBER 2016

A - DATA EXCHANGE ANALYSIS

La reunion TCAC: The trigger advisory for WC was disseminated on 8 November 2016 at 09:23: UTC twenty (23) minutes later than the scheduled time.

Toulouse VAAC: VA advisory was disseminated on 22 November 2016 at 08:58: UTC, two minutes before scheduled time.

Pretoria RODB/GIB: WS advisory (graphical and text) was placed on Web prior to the WS test. In addition, the text version was disseminated through AFTN. Procedures for WS advisory, containing access link, was circulated through the ICAO Regional Office to MWOs. No MWO reported experiencing difficulties accessing the site.

Dakar RODB:

- ✓ Dakar RODB confirmed that it received neither WC test advisory nor test WC SIGMETs on 08 November 2016 issued by La Reunion TCAC.
- ✓ VA advisory received on 22 November 2016 at 08:57 UTC. .
- ✓ No time frame estimated for WS advisory.
- ✓ WS SIGMET tests issued by MWOs on their areas of responsibility.

Pretoria RODB:

- ✓ WC advisory received on 08 November 2016 at 09:23:46 UTC.
- ✓ WV advisory received on 22 November 2016 at 08:58:21 UTC, 59 seconds after the issuance time by Toulouse VAAC.
- ✓ No time frame estimated for WS advisory.
- ✓ WS SIGMET Tests issued by MWOs on their areas of responsibility.

1) Issuance and Dissemination of WC SIGMET

- No WC SIGMET was received at the Dakar RODB.
- SIGMETs were received from Six (6) MWOs at the Pretoria RODB
- Only three (3) WC SIGMETs were received within the 10 minute period following issuance of the advisory.
- Three (3) SIGMETs from FLKK were received at Pretoria RODB at different times.
- Two (2) SIGMETs from FBSK were received at Pretoria RODB at different times.

2) Issuance and Dissemination of WV SIGMET

• Twenty (21) out of 28 MWOs in the AFI region (75%) did not issue WV SIGMET during the Test period. Only eight (6) were received at Dakar RODB and Seven (7) at Pretoria. This was a deterioration compared with the 2014 results when similar test was last conducted.

- SIGMET from FBSK was received only at Pretoria.
- SIGMETs from FVHA, HKJK, FIMP, FBSK and GOOY were received late i.e. more than 10 minutes after the dissemination of the VAAC advisory.
- Two (2) SIGMETs from GOOY, two (2) from FMMI and two (2) from FIMP were received at Dakar RODB at different times.
- Five (5) SIGMETs from FIMP, two from GOOY, two from FMMI were received at Pretoria RODB at Different times.

3) Issuance and Dissemination of WS SIGMET

- 21 MWOs out of 28 in the AFI region (75 %) did not issue WS SIGMET during the Test period. This was a deterioration compared the 2014 results when similar test was last conducted.
- WS SIGMETs from FQMA and FVHA were received only at Pretoria.
- WS SIGMETs from FIMP, FVHA, HTDA and HKJK were received late i.e. more than 10 minutes after the dissemination of the WS advisory.
- Twelve (12) SIGMETs from FAOR, three (3) from FIMP and three (3) from FMMI were received at Pretoria at different times.
- Three (3) from FAOR, Two (2) from FMMI and two (2) from FIMP were received at Dakar at different times.

B - SIGMET FORMAT ANALYSIS

1) WC SIGMET

Antananarivo/Madagascar: (FMMI)

i) OK

Johannesburg/South Africa (FAOR)

i) The content of the advisory not included

Lusaka/Zambia (FLKK)

- i) The content of the advisory not included
- ii) The word 'Test' not repeated twelve times

Gaborone/Botswana (FBSK)

i) Ok

Harare/Zimbabwe (FVHA)

i) The content in the advisory not included

Mahe/Seychelles (FSIA)

- i) Meteorological content in the advisory not included.
- ii) The Word 'Test' not repeated twelve times.

2) WV SIGMET

Gaborone/Botswana (FBSK)

i) Meteorological content in the VAAC advisory not included.

Nairobi/Kenya (HKJK)

- i) Validity period of the SIGMET not correctly indicated. Both beginning and end not indicated.
- ii) Priority 'GG' used instead of 'FF'
- iii) Meteorological content in the VAAC advisory not included.
- iv) The word 'Test' not repeated 12 times.

Antananarivo/Madagascar (FMMI)

- i) Validity period of the SIGMET not correctly indicated. Beginning and end of the period not separated with a slash.
- ii) Meteorological content in the VAAC advisory not included.

Dakar/Senegal (GOOY)

i) Some elements of the VAAC advisory not included.

Johannesburg/South Africa (FAOR)

- i) The ICAO location indicator of the FIR given as 'FAOR' i.e. indicator for the MWO. Should be 'FAJA'.
- ii) Some elements of the VAAC advisory not included in the meteorological part.

Harare/Zimbabwe (FVHA)

- i) Meteorological content the VAAC advisory not included in the meteorological part.
- **WS SIGMET** (following weather phenomenon provided on a chart for respective area of responsibility)

Nairobi/Kenya (HKJK)

- i) Meteorological content in the advisory not used.
- ii) Priority 'GG' used instead of 'FF'.
- iii) The Word 'TEST' not repeated 12 Times.

Antananarivo/ Madagascar (FMMI)

i) Priority 'GG' used instead of 'FF'.

Johannesburg/South Africa (FAOR)

i) ICAO location indicator for FIR/CTA in the first line not correct. 'FAOR' was indicated instead of 'FAJA'.

Dar es Salaam/ Tanzania (HTDA)

i) Ok

Maputo/Mozambique (FQMA)

- i) Meteorological content in the advisory not included.
- ii) The word 'TEST' not repeated 12 times.

Mauritius/Seewoosagur (FIMP)

i) FIMP did not issue SIGMET since there was no weather phenomenon indicated within its area of responsibility.

Harare/Zimbabwe (FVHA)

i) Meteorological content in the advisory not included.

C – <u>SUMMARY OF OPERATIONAL SHORTCOMINGS AND DEFICIENCIES</u> <u>IDENTIFIED</u>

	OPERATIONAL SHORTCOMINGS AND DEFICIENCIES	VAAC, TCAC, RODBs or MWOs
1	15 MWOs out of 28 in the AFI region (54%) did not issue WV SIGMET during the test period	ESAF(11): Addis Ababa, Asmara, Bujumbura, Lilongwe, Mauritius, Windhoek, Seychelles, Mogadishu, Entebbe, Luanda, Lusaka WACAF(4): Accra, Brazzaville, Kinshasa, Monrovia
2	18 MWOs out of 28 in the AFI region (64 %) did not issue WS SIGMET during the test period	ESAF(12): Luanda, Lilongwe, Gaborone, Bujumbura, Mauritius, Windhoek, Kigali, Seychelles, Mogadishu, Entebbe, Dar-es- salaam, Harare WACAF(5): Kinshasa, Accra, Sal, Monrovia, Niamey
3	Six (6) MWOs out of 9 expected, did not issue WC SIGMET during the test period	Dar es Salaam, Nairobi, Harare, Lilongwe Maputo, Mauritius.
4	The listed 5 MWOs (18%) have never issued any SIGMET during AFI SIGMET Tests. This is an improvement compared to last year	ESAF: Luanda, Bujumbura, Addis Ababa, Windhoek, WACAF: Monrovia
5	Two (2) MWOs did not use FF priority to disseminate WV SIGMET	Dakar, Dar- es- Salaam,
6	Three (3) MWOs did not use FF priority to disseminate WS SIGMET	N'Djamena, Brazzaville, Dakar
7	One (1) MWOs issued a WC SIGMET while it was not required	Kano
8	WV SIGMETs from 6 MWOs were received late at the RODBs, more than 10 mn after the advisory was issued by LFPW	Niamey, Gaborone, Kano, Harare, Kigali, Dares -Salaam

	OPERATIONAL SHORTCOMINGS AND DEFICIENCIES	VAAC, TCAC, RODBs or MWOs
9	WS SIGMETs from 9 MWOs were	Kano, Niamey, Johannesburg, Antananarivo,
	received late at the RODBs more than	Dakar, Lusaka, Nairobi, Maputo, Addis Ababa
	10 mn after the advisory was issued by	
	FAOR,	
10	Nine (9) MWOs issued WV without	Gaborone, Sal, Nairobi, Antananarivo,
	including advisory content.	Maputo, Kano, Kigali, Dar-es-Salaam, Harare
11	Four (4) MWOs issued WS without	N'Djamena, Brazzaville, Kano, Lusaka
	including advisory content or incorrect	
	weather phenomenon	
12	Six (6) MWOs issued SIGMET test	Gaborone, Sal, Dar-es-salaam, Harare,
	messages without including a line of 12	N'Djamena, Asmara, Lusaka,
	"TEST" at the end of the SIGMET	
	message	
13	The trigger WC SIGMET advisory	La Reunion.
	transmitted more than five hours later	
	than schedule	

D - <u>RECOMMENDATIONS</u>

Recommendation 1: SIGMET Issuance and Dissemination

It is recommended that:

- a) The Meteorological Watch Offices (MWO) provider States listed in column 3 of the table above endeavor to address the identified deficiencies in the preparation, issuance and dissemination of SIGMET (APIRG/18, Conclusion 18/52).
- b) The ICAO Regional Offices concerned undertake measures to inform through email correspondence and, if necessary, visit the listed 5 MWO Provider States that have never issued any SIGMET during AFI SIGMET Tests (Luanda, Bujumbura, Addis Ababa, Windhoek and Monrovia MWOs).
- c) The ICAO regional Office to allocate weather phenomena for each and every FIR during SIGMET Tests.

Recommendation 2: Removing Operational Shortcomings

It is recommended that:

- a) Brazzaville, Dar es Salaam, Dakar and N'Djamena MWO issue priority indicator 'FF' in the dissemination of SIGMETs;
- b) Addis Ababa, Antananarivo, Niamey, Gaborone, Kano, Harare, Kigali, Dar-es-Salaam, Johannesburg, Dakar, Maputo, Lusaka and Nairobi Meteorological Watch Offices (MWOs) issue SIGMETs within the required time i.e. not more than 10 minutes after reception of advisories.
- c) Kano MWO does not issue WC SIGMET as the WMO is not inside the TC activity area.
- d) N'Djamena, Brazzaville and Kano MWOs use correct weather phenomenon during the Test.

- e) Gaborone, Sal, Nairobi, Antananarivo, Maputo, Kano, Kigali, Dar-es Salaam and Harare MWOs include meteorological part of WV advisory in their WV SIGMETs.
- f) Gaborone, Sal, Dar-es-Salaam, Harare, N'Djamena, Asmara and Lusaka MWOs include a line with the word "TEST" twelve (12) times at the end of the SIGMET test message.
- g) All MWOs use the correct SIGMET format when preparing the SIGMET message by including:
 - Correct validity period.
 - Correct weather phenomena description.
 - ICAO indicator of the corresponding FIR at the beginning of the main text of the SIGMET.
 - A hyphen at the end of the line containing the validity period.
 - MWO ICAO indicator just after the validity period.
 - The word "VALID" just before the validity period.