### STATUS OF THE REGIONAL SUBPROJECT

**PERIOD:**6 November 2006 – 28 February 2007**NMS:Madagascar** 

#### 1. HIGHLIGHTS OVER THE PERIOD

During the periode November 2006 to 28 February 2007 heavy rains had been observed especially during January 2007 and the begining of February 2007.

However, telecommunications had been a major obstacle; the slow internet connection increased the download time for products. Then the forecasters couldn't download all the available guidances; however after the team management meeting in Maputo Mozambique(27 Feb - 2 March) we got the knowldge of the website of RSMC-Pretoria, where all the products from global centers, and from the regional center RSMC-Pretoria including the guidances and evaluation form are available. So we hope the next quartely report (30 june) will be more complete.

#### 2. OVERVIEW OF PRODUCTS

a. Usefulness of RSMC-Pretoria guidance :

Very useful and helpful but during the periode (November-February) we couldn't login Pretoria-guidances. It was possible only during INDLALA event (March 2007)

b.Usefulness of SWFDP NWP/EPS Products received EPS products received from each global centre and RSMC UM-SA12

-	UK met office	
-	NCEP	→ verv useful
-	ECMWF	

- RSMC-UM SA12

The ECMWF products are the most reliable.and as a result, the most used in the forecast process.

#### 3. PROJECT EVALUATION AGAINST SWFDP GOALS

SWFDP GOAL	IMPACT
To improve the ability of NMCs to forecast severe weather events	Improvenent is noted by NMHS'Madagascar in forecast heavy rains.
To improve the lead time of alerting these events	The lead time of alerting these events has been improved
To improve the interaction of NMCs with Disaster Management and Civil Protection authorities before, during and after severe weather events	NMHS Madagascar and the Department of Civil Protection are already working closely.during cyclone event.With SWFDP this relationship will be reinforced
To identify gaps and areas for improvements	A number of areas that need improvement should have been identified.
To improve the skill of products from Global Centres through feedback from NMCs	Feedback will be provided regularly through evaluation forms and by mails. However models should consider the orographic parameters

#### 4- EVALUATION OF WEATHER WARNINGS

#### A- Feedback from the public :

Warnings are relevant but too technical

# B- Feedback from the DMCPA to include comments of the timeliness and usefulness of the warnings :

Refering to the warnings when cyclone events happen the DMCPA is satisfied. They are used to receive the warnings by mails. The warnings are very useful and on time because they helpt them to follow up how people apply the prescriptions of the warnings and helpt them to lead the actions of rescue.

#### C- Feedbak from the media :

For the TV and radio, warnings are on time but not frequent.

They are useful because these two kinds of media reach directly the population.

For the presses it doesnt make sense because the news appear only the following day. The presses comment only the event and the after event : how people react and what are the damages

## ANNEX VI.1

#### **Evaluation Table**

DATE	SWFDP Evaluation Form Event Nr (If Applicable)	Weather Type	Location	Observed amount (rainfall or wind speed)	BSMC	Guidance	Which NWP/EPS forecast	product(s) used by NMC	Local Warnings issued	Impact
Dd/mm/yy November 2006 to March 2007		Mesoscale rainfall or synoptic scale rainfall or strong winds (covective or synoptic)		(mm/24h)	Amount predicted	Usefulness (1-4) 4 is best	(RSMC UM-SA 12, ECMWF, Met- Office, NCEP)	Usefulness from 1 to 4 1- Misleading 2- Not useful 3- Useful 4- Very useful		
11/11/06		Heavy precipitation	Fianarantsoa	57.3		1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
12/11/06		Heavy precipitation	Mahajanga	61.0		1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
20/11/06		Heavy precipitation	Ivato	54.5		1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
20/11/06		Heavy precipitation	Sainte Marie	63.9		1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
20/11/06		Heavy precipitation	Mananjary	67.4		1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
25/11/06		Heavy precipitation	Toamasina	101.7		1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
25/11/06		Heavy precipitation	Ivato	61.8		1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	

				1	1		4	-	
						RSMC UM-SA 12, ECMWF,	1		
26/11/06	Heavy precipitation	Antsiranana	85.0		1	Met-Office	4	Not issued	
						NCEP	3		
						RSMC UM-SA 12,	3		
							1		
26/11/06	Heavy precipitation	Vohémar	59.8		1	ECMWF, Met-Office	4	Not issued	
	riouvy procipitation	Vorioniai	0,10		•		-	10011000000	
				-		NCEP	3		
						RSMC UM-SA 12,	1		
27/11/06	Heavy precipitation	Vohémar	52.9		1	ECMWF,	4	Not issued	
	ricary precipitation	Vonomai	02.7		I I	Met-Office	3	10011050000	
						NCEP	3		
						RSMC UM-SA 12,	1		
27/11/06	Heavy precipitation	Maevatanana	89.8		1	ECMWF,	4	Not issued	Flooding
21/11/00	rieavy precipitation	Inacvatariaria	07.0		I	Met-Office	3	NULISSUEU	riccung
						NCEP	3		
						RSMC UM-SA 12,	1		
28/11/06	Lloover provinitation	Magyatanana	214.3		1	ECMWF,	4	Noticeued	Flooding
20/11/00	Heavy precipitation	Maevatanana	214.3		1	Met-Office	3	Not issued	rioounig
						NCEP	3		
						RSMC UM-SA 12,	1		
28/11/06		Decelement	(1.0		1	ECMWF,	4	Net la sur d	
20/11/00	Heavy precipitation	Besalampy	61.2		1	Met-Office	3	Not issued	
						NCEP	3		
						RSMC UM-SA 12,	1		
00/44/00						ECMWF,	4		
29/11/06	Heavy precipitation	Ranohira	54.2		1	Met-Office	3	Not issued	
						NCEP	3		
						RSMC UM-SA 12,	1		
						ECMWF,	4		
01/12/06	Heavy precipitation	Antsohihy	50.9		1	Met-Office	3	Not issued	
		-				NCEP	3		
						RSMC UM-SA 12,	1		
						ECMWF,	4		
05/12/06	Heavy precipitation	Besalampy	80.7		1	Met-Office	3	Not issued	
						NCEP	3		
<u> </u>				1	1	RSMC UM-SA 12,	1	1	
07/40/00						ECMWF,	4		
07/12/06	Heavy precipitation	Morondava	84.2		1	Met-Office	3	Not issued	
	51 1					NCEP	3		
<u>├</u> ──── <u>├</u> ────		Ivato	57.7	1		RSMC UM-SA 12,	1		
		Ivalu	57.7			ECMWF,	4		
08/12/06	Heavy precipitation				1	Met-Office	3	Not issued	
	51 1					NCEP	3		
<u> </u>				<u> </u>	+	RSMC UM-SA 12,	1		
						ECMWF,	1		
08/12/06	Heavy precipitation	Antananarivo	53.8		1	Met-Office	4	Not issued	
	24 6					NCEP	3		
<u>├</u> ────				<u> </u>	+	RSMC UM-SA 12,			
						ECMWF,	4		
10/12/06	Heavy precipitation	Maevatanana	99.8		1	Met-Office	4 3	Not issued	
						NCEP	3		
l						NUEP	3		

10/12/06	Heavy precipitation	Fianarantsoa	56.8	1	RSMC UM-SA 12, ECMWF, Met-Office	1 4 3	Not issued
11/12/06	Heavy precipitation	Ranohira	108.4	1	NCEP RSMC UM-SA 12, ECMWF, Met-Office NCEP	3 1 4 3 3	Not issued
12/12/06	Heavy precipitation	Toamasina	67.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
13/12/06	Heavy precipitation	Antsiranana	68.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
15/12/06	Heavy precipitation	Sambava	56.3	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
16/12/06	Heavy precipitation	Antalaha	87.3	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
08/12/06	Heavy precipitation	Antananarivo	53.8	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
10/12/06	Heavy precipitation	Maevatanana	99.8	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
10/12/06	Heavy precipitation	Fianarantsoa	56.8	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
11/12/06	Heavy precipitation	Ranohira	108.4	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
17/12/06	Heavy precipitation	Antalaha	74.8	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
17/12/06	Heavy precipitation	Antsiranana	63.1	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
29/12/06	Heavy precipitation	Antalaha	61.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued

30/12/06	Heavy precipitation	Antalaha	72.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not Issued
30/12/06	Heavy precipitation	Maintirano	65.6	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not Issued
03/01/07	Heavy precipitation	Maevatanana	64.9	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
03/01/07	Heavy precipitation	Besalampy	56.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
03/01/07	Heavy precipitation	Morondava	79.3	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
04/01/07	Heavy precipitation	Morondava	70.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Issued
04/01/07	Heavy precipitation	Maintirano	255.6	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Issued
04/01/07	Heavy precipitation	Besalampy	132.7	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Issued
05/01/07	Heavy precipitation	Besalampy	101.6	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Issued
05/01/07	Heavy precipitation	Maintirano	270.6	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Issued
06/01/07	Heavy precipitation	Besalampy	72.9	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
06/01/07	Heavy precipitation	Antalaha	61.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
06/01/07	Heavy precipitation	Antananarivo	54.3	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued

06/01/07	Heavy precipitation	Ivato	76.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
06/01/07	Heavy precipitation	Antsirabe	78.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
06/01/07	Heavy precipitation	Toamasina	106.4	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
07/01/07	Heavy precipitation	Maintirano	74.4	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
08/01/07	Heavy precipitation	Maintirano	157.7	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
10/01/07	Heavy precipitation	Ambatondrazaka	80.9	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
10/01/07	Heavy precipitation	Antananarivo	67.7	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
10/01/07	Heavy precipitation	Antsirabe	106.4	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
11/01/07	Heavy precipitation	Antsirabe	85.6	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
11/01/07	Heavy precipitation	Maevatanana	76.1	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
11/01/07	Heavy precipitation	Sainte-Marie	80.9	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
12/01/07	Heavy precipitation	Sainte-Marie	71.6	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	

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12/01/07	Heavy precipitation	Maevatanana	53.3	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
12/01/07	Heavy precipitation	lvato	64.3	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
12/01/07	Heavy precipitation	Antananarivo	55.4	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
13/01/07	Heavy precipitation	Toliara	54.8	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
13/01/07	Heavy precipitation	Farafangana	74.6	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
14/01/07	Heavy precipitation	Farafangana	76.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
14/01/07	Heavy precipitation	Mananjary	68.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
15/01/07	Heavy precipitation	Ambatondrazaka	59.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
15/01/07	Heavy precipitation	Mananjary	51.4	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
16/01/07	Heavy precipitation	Ranohira	72.3	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
17/01/07	Heavy precipitation	Antalaha	52.5	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
17/01/07	Heavy precipitation	Mananjary	62.4	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued
17/01/07	Heavy precipitation	Maevatanana	130.1	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued

19/01/07	Heavy precipitation	Morombe	170.7	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
20/01/07	Heavy precipitation	Morondava	63.7	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
21/01/07	Heavy precipitation	Maevatanana	70.8	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
21/01/07	Heavy precipitation	Toliara	79.8	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
22/01/07	Heavy precipitation	Taolagnaro	73.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
24/01/07	Heavy precipitation	Maevatanana	81.8	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
25/01/07	Heavy precipitation	Mananjary	107.5	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
26/01/07	Heavy precipitation	Mahajanga	50.8	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
26/01/07	Heavy precipitation	Toamasina	176.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
26/01/07	Heavy precipitation	Ambatondrazaka	73.3	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
28/01/07	Heavy precipitation	Toamasina	70.9	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
28/01/07	Heavy precipitation	Sainte-Marie	189.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding

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29/01/07	Heavy precipitation	Mananjary	51.5	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
29/01/07	Heavy precipitation	Besalampy	65.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
30/01/07	Heavy precipitation	Besalampy	62.8	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
30/01/07	Heavy precipitation	Maintirano	99.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
31/01/07	Heavy precipitation	Morondava	152.5	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
01/02/07	Heavy precipitation	Antananarivo	73.5	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
02/02/07	Heavy precipitation	Toamasina	111.7	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
03/02/07	Heavy precipitation	Fianarantsoa	58.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
04/02/07	Heavy precipitation	Ivato	50.1	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
06/02/07	Heavy precipitation	Ambatondrazaka	92.7	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
07/02/07	Heavy precipitation	Sainte-Marie	88.3	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
07/02/07	Heavy precipitation	Maevatanana	75.3	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
07/02/07	Heavy precipitation	Antsohihy	86.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding

08/02/07	Heavy precipitation	Antsohihy	72.7	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
09/02/07	Heavy precipitation	Nosy-Be	58.1	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
09/02/07	Heavy precipitation	Mahajanga	90.5	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
09/02/07	Heavy precipitation	Ivato	53.8	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
10/02/07	Heavy precipitation	Farafangana	114.5	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
10/02/07	Heavy precipitation	Maevatanana	131.6	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
11/02/07	Heavy precipitation	Mahajanga	50.3	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
12/02/07	Heavy precipitation	Maintirano	83.8	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
13/02/07	Heavy precipitation	Maintirano	146.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
13/02/07	Heavy precipitation	Morondava	101.6	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
14/02/07	Heavy precipitation	Taolagnaro	72.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
17/02/07	Heavy precipitation	Toliara	59.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	

17/02/07	Heavy precipitation	Antananarivo	81.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
22/02/07	Heavy precipitation	Ambatondrazaka	96.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
22/02/07	Heavy precipitation	Farafangana	59.6	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
22/02/07	Heavy precipitation	Taolagnaro	83.6	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
23/02/07	Heavy precipitation	Toamasina	151.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
23/02/07	Heavy precipitation	Nosy-Be	70.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
26/02/07	Heavy precipitation	Toamasina	73.7	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
27/02/07	Heavy precipitation	Antsohihy	116.9	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
08/03/07	Heavy precipitation	Mahajanga	61.4	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
14/03/07	Heavy precipitation	Antsiranana	56.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
14/03/07	Heavy precipitation	Nosy-Be	76.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
14/03/07	Heavy precipitation	Sambava	83.4	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	

15/03/07	Heavy precipitation	Nosy-Be	95.7	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
15/03/07	Heavy precipitation	Antsohihy	344.7	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
15/03/07	Heavy precipitation	Sainte-Marie	107.9	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
16/03/07	Heavy precipitation	Sainte-Marie	61.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	
16/03/07	Heavy precipitation	Toamasina	97.2	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
16/03/07	Heavy precipitation	Ambatondrazaka	84.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
16/03/07	Heavy precipitation	Antsohihy	240.7	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
16/03/07	Heavy precipitation	Mahajanga	221.3	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	Flooding
20/03/07	Heavy precipitation	Toamasina	65.0	1	RSMC UM-SA 12, ECMWF, Met-Office NCEP	1 4 3 3	Not issued	