**Mozambique: Floods**

**Need for international assistance**

<table>
<thead>
<tr>
<th>Not required</th>
<th>Low</th>
<th>Moderate</th>
<th>Significant</th>
<th>Urgent</th>
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<tbody>
<tr>
<td>Insignificant</td>
<td>Minor</td>
<td>Moderate</td>
<td>Significant</td>
<td>Major</td>
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**Expected impact**

<table>
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<tr>
<th>Insignificant</th>
<th>Minor</th>
<th>Moderate</th>
<th>Significant</th>
<th>Major</th>
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<td>Heavy rainfall since the beginning of January has caused significant flooding in northern and central parts of Mozambique, particularly in Zambezia, Niassa, Nampula, and Cabo Delgado provinces.</td>
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<td>As of 16 January, 20,000 people have been displaced and 100,000 people are estimated to be affected.</td>
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<td>Power cuts in northern and central provinces are affecting 300,000.</td>
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<td>Very little further information on the impact of the rains is available.</td>
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**Key Findings**

**Anticipated scope and scale**

The number of people affected and people displaced is expected to rise, as heavy rainfall is expected to continue in the coming days. Up to 300mm could fall in the coming week along the northern coast (Zambezia, Nampula, and Cabo Delgado provinces), and in Niassa and Tete provinces.

**Priorities for humanitarian intervention**

- Northern and central provinces.
- Search and rescue operations
- Food and non-food items and WASH

**Humanitarian constraints**

- Overland travel from the north to the centre and south has become impossible.
- Coordination systems need to be strengthened.
Crisis Impact

River levels have risen to over double flood thresholds. Many people are stranded and need rescuing from low-lying flood-prone areas (International Media 15/01/2015). 34 people have been confirmed dead; 18 people in Niassa and 16 in Zambezia (Local Media 15/01/2015). In Mocuba, group of schoolchildren was swept away on 12 January, and an additional 18 have gone missing (International Media 14/01/2015; Local Media 15/01/2015).

Access to Essential Services

**Food:** There is no information regarding the access to food by affected population. From previous floods, we can assume that they are in immediate need of food and with an economy primarily dependent on agriculture, fishing and livestock, the livelihood of the population is greatly affected by floods.

**Health:** There is no information regarding the health needs of the affected population. Given previous floods, the presence of poor sanitary conditions is present.

**WASH:** Flooding will increased breeding sites for mosquitos, and increase the risk of waterborne diseases. Although no information is available, wells and boreholes are likely contaminated by floods.

**Shelter:** Homes have been completely submerged (International Media 15/01/2015). National media has reported 3,000 houses destroyed in Nacala, and 6,500 in the rest of the country (Local Media 15/01/2015).

Critical Infrastructure

- The Mocuba Bridge and Namilate Bridge have collapsed on the EN1 Highway (BBC 14/01/2015). Queues of vehicles have built up at either end of the bridge, with passengers forced to sleep for three nights in their vehicles (Local Media 15/01/2015).
- Most parts of the northern and central region have no electricity as pylons on transmission lines carrying power from the Cahora Bassa dam have fallen (BBC 14/01/2015).
- Internet has also been knocked out, and citizens cannot access their banks or ATMs.
- The destruction of train tracks means trains are no longer circulating between Mozambique and neighbouring Malawi (Local Media 15/01/2015).

Vulnerable Groups Affected

Communities in low-lying flood-prone areas: some Mocuba residents refused to leave their homes (International Media 13/01/2015).

Humanitarian and Operational Constraints

Access to several provinces is restricted because roads and bridges have been washed out; travel from the north to the centre and south has become impossible due to collapsed bridges on the EN1 Highway (BBC 14/01/2015). Search and rescue operations by boat have been impossible because the Licungo River is flowing so rapidly. The Zambezi River has also risen beyond flood alert level, particularly on its middle and lower stretches, cutting access to roads in the Zambezi Basin (International Media 14/01/2015).

Information Gaps and Needs

There is very little information regarding the impact of floods on the population, particularly their immediate needs. There is no information regarding the health of the affected population or current location of the displaced population.

Aggravating Factors

**Date/Time – Weather/Altitude**

Mozambique broadly follows a southern African weather pattern, with rains falling largely between December and March (Expert Africa 2015). The National Meteorology Institute (INAM) has warned that up to 300mm could fall in the coming week along the northern coast (Zambezia, Nampula, and Cabo Delgado provinces), and in Niassa and Tete provinces.

**Location and Type of Housing/Infrastructure**

Most communities live close to the river banks, where they risk being affected by floods (CGIAR 2014). The Mozambique state owns all land, granting individuals the right to use the land via titles. The housing situation in Mozambique is changing, though 60% of the housing units were made of straw, 15% cane and wood sticks, and 10% bricks and concrete in the early 2000s (Global Housing Indicators).

**Proximity of Critical Infrastructure**

8,475 refugees and asylum seekers reside in Maratane refugee camp, Nampula province. It is the sole camp in Mozambique. In partnership with WFP, food distribution is facilitated by UNHCR and implemented by other partners.

**Other Factors of Vulnerability**

Mozambique ranks 43 out of 173 countries for disaster risk (TEERR 2013). Insufficient rains since the beginning of October have led to dryness and delayed planting throughout the north of the country, although conditions improved in late December.
Floods will have both short- and long-term effects on the food security of a household, especially if farmers do not access seeds and agricultural tools on time. Inundation of crop fields is of utmost concern, with 210,587 acres totally destroyed from the 2013 floods. Loss of livestock is equally affects households, as they constitute a primary investment in provision of basic household items. For those dependent on fishing, many lose nets and fishing boats necessary for the practice.

**Key Characteristics of Host Population and Area**

**Demographic profile:** The country’s total population is 26.47 million (World Bank); 3.89 million in Zambezia province; 1.21 million in Niassa province (National Statistics Institute); and 1.65 million in Cabo Delgado province. 31% of the population lives in urban areas and 69% in rural areas. 54% of the population live at the poverty level (ADRA). Density: 31.4 people per square kilometre (UN DATA 2012).

**Food security:** 255,300 people are food insecure (OCHA 2013).

**Nutrition:** 44% of children under five are stunted (UNICEF), GAM rate is 4% and the SAM rate 0.9% (UNHCR 2008).

**Health:** Life expectancy at birth is 50.2%; under-5 mortality rate: 142 per 1,000 live births; maternal mortality rate is 550 per 100,000 live births (OCHA 2013).

**WASH:** Access to improved sources of water stands at 47% (OCHA 2013). 19% have access to improved sanitation (Clean Cook Stoves).

**Light and cooking:** Urban population using solid fuels: 88.60%; rural population using solid fuels >95%; Population using wood for cooking: 84 %; Population using dung: 0.2%; Population using charcoal: 0.40%; Population using coal: 12.60%; Population using kerosene: 0.50%; Population using gas 1.4%; Population using electricity: 0.80%, Population using other fuels: 0.10% (Clean Cook Stoves).

**Literacy:** Adult literacy is 55.1% (OCHA 2013).

**Response Capacity**

**Local and National Response Capacity**

The National Institute of Disaster Management (INGC) is responding directly to this crisis (INGC 2015). The Government has raised the alert level to Red in central and northern provinces, and mobilised resources for search and rescue operations through the National Centre for Emergency Operations (CENOE) and the National Civil Protection Unit (UNAPROC). The National Directorate of Water has issued recommendations to communities living in at-risk floodplains (INAM). Authorities have reported that it will take at least a week to restore power to northern and central provinces (BBC 14/01/2015).

**International Response Capacity**

The Government has requested further support from the international community. The South African National Defence Force (SANDF) sent troops with helicopters, navy divers and medical personnel on 15 January (International Media 15/01/2015). Most UN agencies and several INGOs are currently working in country (UN Mozambique).

**Lessons Learned**

Based on previous floods, the Government developed a Master Plan in October 2006 providing a strategy for dealing with natural disasters in the country. The plan included a reduction of dependence on agriculture as the main source of livelihoods by improving the tourist industry. It also proposed re-forestation and development of a national irrigation system (ODI).

Floods can be difficult to evaluate in terms of impact. In the Zambezi River Basin, floods are a financial burden for Mozambique. Between 1981 and 2008, nine floods have struck Mozambique, affecting between 2,000 and 2 million people, the worst being in 2000 (FEWSNET 2011).