



VAM bulletin

# Monsoon floods rapid assessment

18 January 2011

## Highlights

- **One million** people have been affected by recent floods caused by late monsoon rainfalls
- 387,000 persons were reported as displaced to 611 welfare centers. Unregistered displacement to host communities is substantial.
- The districts of Batticaloa, Ampara, Trincomalee, Vavuniya, Anuradhapura and Polonnaruwa are worst affected.
- 3,500 houses were reported as fully damaged. 170,000 houses have been inundated by floods.
- The damage for paddy in Batticaloa and Ampara districts are 55,000 (93 percent) and 34,000 (45 percent) ha respectively.

## Background

North-east monsoon rains began in mid-November 2010 resulting in severe precipitations in Northern, Eastern, North Central, Central and North Western Provinces. The rainfall re-intensified in December and January caused heavy flooding, limited physical accessibility, severely damaged crops and major displacement. Lives and livelihoods of an estimated 1 million persons were affected. The 12 districts of Batticaloa, Anuradhapura, Monaragala, Nuwara Eliya, Kandy, Trincomalee, Ratnapura, Matara, Kilinochchi, Polonnaruwa, Mullaitivu and Ampara are flood affected at varying degrees.

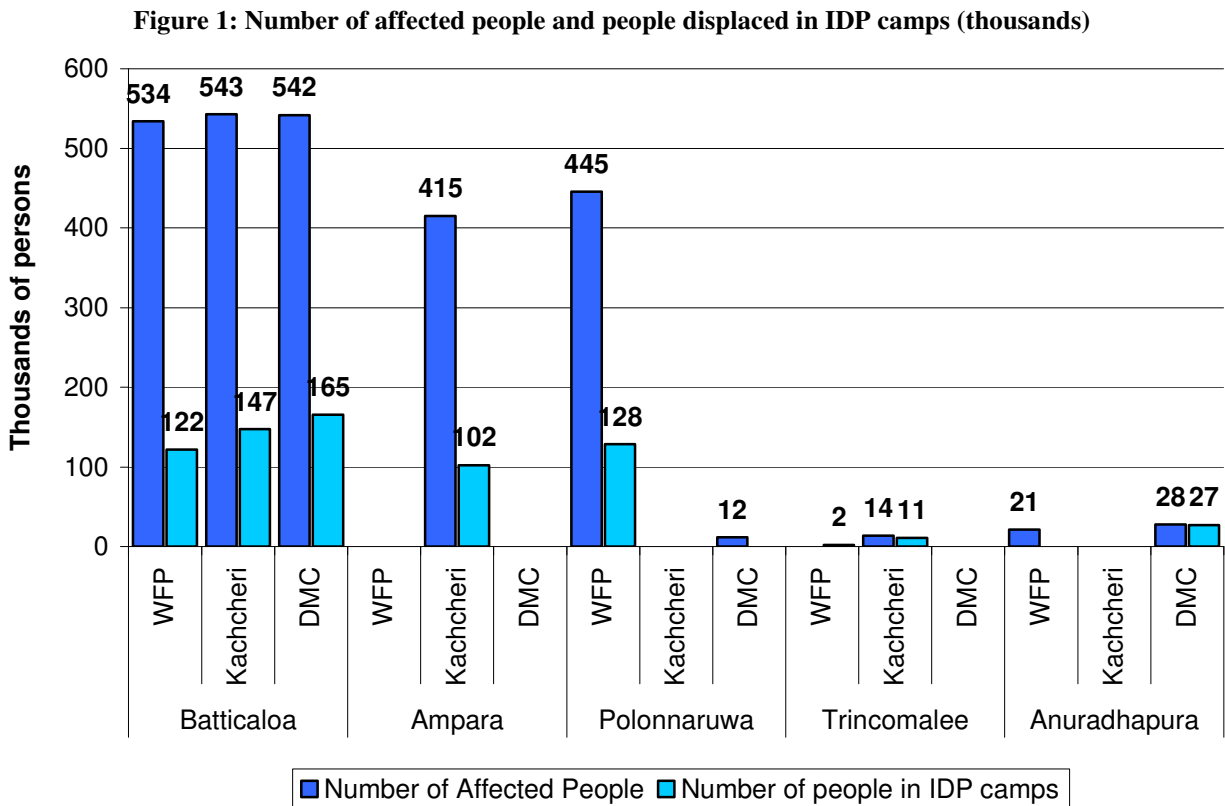
The impact was felt particularly hard in the East of the country, specifically in Ampara, Batticaloa, Trincomalee, Polonnaruwa and Anuradapura districts. Rainfall continued until 12<sup>th</sup> January in the two worst affected districts, Batticaloa and Ampara.

Returnees from the North, previously displaced by conflict and currently resettling in the eastern part of the country, are of particular food security concern. The fragility of their livelihoods makes them very vulnerable to the current floods.

Against this background, rapid inter-agency teams with representatives from OCHA, UNDP, WFP, and ILO conducted rapid assessments in the flood affected districts. Disaster Management Center (DMC) and District Secretariats and relevant line departments joined as government partners in the rapid assessment.

### Physical Damage and Displacement

The five worst flood-affected districts were Batticaloa, Ampara, Trincomalee, Auradharapura and Polonnaruwa where a total of 271,000 families (1,020,400 individuals)<sup>2</sup> have been affected. In this area, 86,000 families (387,000 individuals) were displaced to 611 welfare centers and an additional 98,000 families (441,000 individuals) were displaced to friends and relatives. Welfare centers were hosted in schools, temples and other public buildings.



<sup>2</sup>Source: Disaster Management Situation Reports and Rapid Flood Assessment Compiled data

Physical access to Batticaloa and Ampara was very difficult during the five peak days of flooding as most of the main roads (Colombo-Batticaloa, Colombo-Ampara and Polonnaruwa-Batticaloa) were not motorable. Moreover, the internal road networks of affected districts were severely affected.

More than 3,500 houses were reported as fully damaged. 169,693 houses have been inundated by floods. Damage was also sustained to agricultural crop land and infrastructure, explained below.

### Food Security and Nutrition

The displaced population is of most immediate food security concern. The government has provided cooked meals for IDPs in welfare centers, which are managed by Grama Niladharees (GNs) authorities. However, distribution of appropriate food for infants and young children was found to be insufficient. Persons displaced to host communities are more difficult to reach and will be top priority for further food assistance distributions.

Nutritional problems may arise in flood affected areas as a result of unclean water, waterborne diseases and a generally weakened health status of the population. Batticaloa is particularly vulnerable because of higher pre-flood malnutrition rates. 2009 malnutrition rates of young children (below the age of five years) are shown in table 1.

**Table 1: Pre-flood nutritional status of flood affected districts<sup>3</sup>**

District	Stunting		Wasting		Underweight	
	% < 3 SD	% <2 SD	% <3 SD	% <2 SD	% <3 SD	% <2 SD
Anuradhapura	3	14	1.8	11.9	5.7	18.4
Trincomalee	3	17.7	2.3	10.9	4.3	18.7
Batticaloa	3.8	23.3	3.8	17.6	5.4	30.4
Ampara	3.4	18.5	1.5	12	2.2	22.2
<b>Sri Lanka</b>	<b>3.4</b>	<b>18.5</b>	<b>1.5</b>	<b>12</b>	<b>2.2</b>	<b>22.2</b>

### Agriculture and Livestock

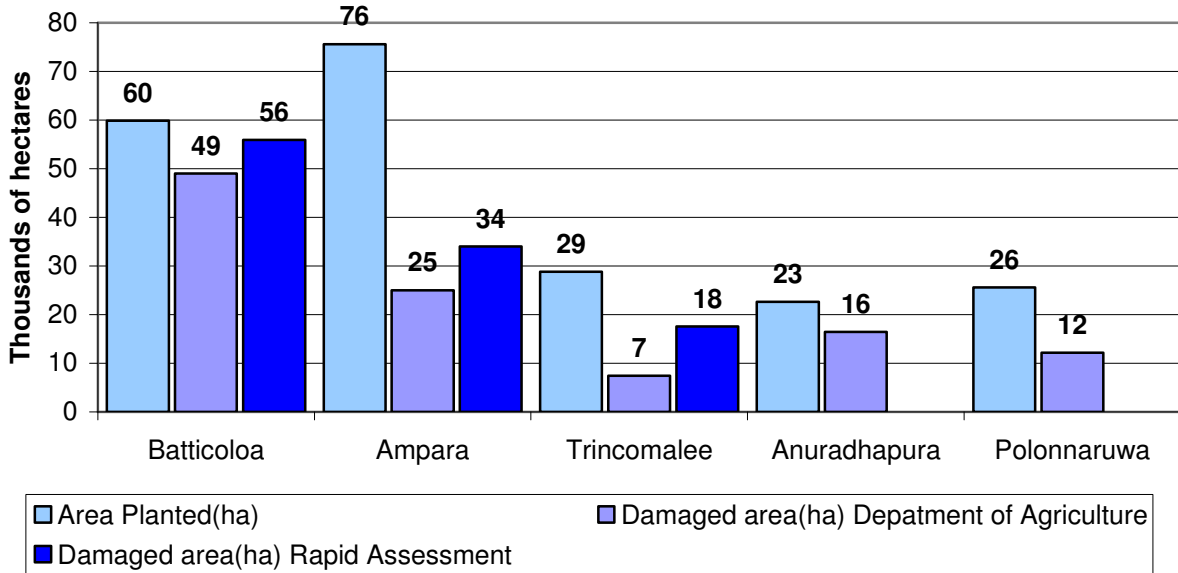
The vast majority of households in Batticaloa and Ampara have had their livelihoods affected by the floods. The rapid assessment found that 146,100 farmers, 154,000 fishermen, 211,300 daily wage laborers and 21,500 employees have been affected in Batticaloa.

Agriculture is the main income source for all five districts. Total number of agricultural holdings - small holdings, large scale holdings and estates - is 582,000.

<sup>3</sup> Source: Medical Research Institute, 2009

Figure 2 shows the damage for paddy cultivation by district level. Rapid assessment revealed damage for paddy in Batticaloa and Ampara districts are 49,000 (82 percent) and 25,300 (33 percent) hectares respectively.

**Figure 2: Agricultural situations after floods**



Most of the minor, major and medium irrigation tanks in these five districts spilled. In Batticaloa, 64 minor irrigation tanks were damaged by floods. In Ampara, number of damaged tanks has not been assessed, but two medium irrigation tanks have been damaged.

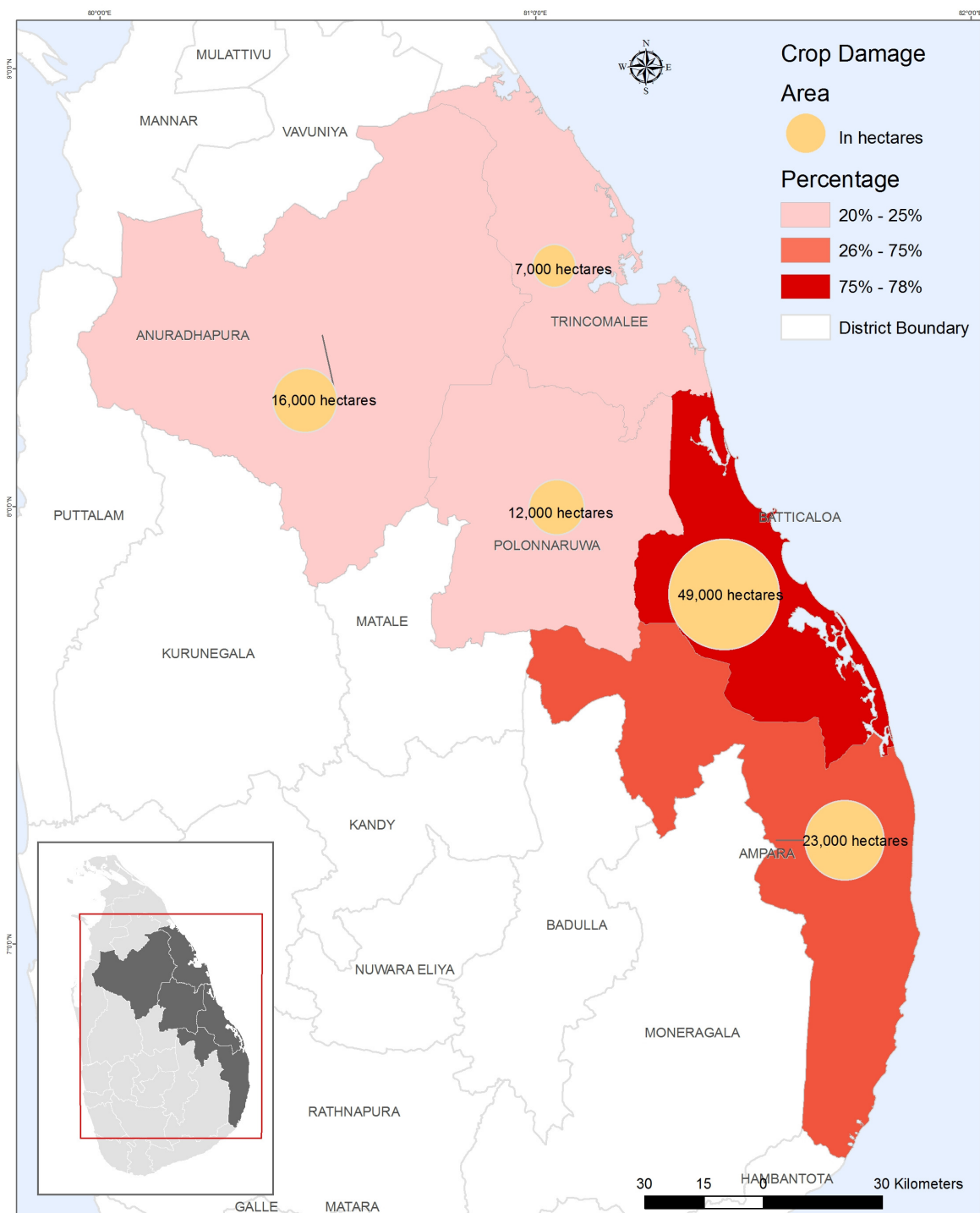
The livestock sector is affected in all districts, particularly cattle and poultry. The livestock in Batticaloa has been reported as worst impacted. Reliable estimate of damage and loss are not available.

**Water and Sanitation**

Within the assessed five districts, more than 65,000 wells for drinking water were contaminated by the floods. The number of contaminated drinking water sources in Batticaloa district itself is around 60,000. Drinking water supply is provided by the local authorities and government. Water purification kits and hygiene kits are essential. Diarrhea, conjunctivitis and viral fever were the mainly reported diseases in welfare centers. Mechanisms for post flood epidemic prevention are very essential.



# Flood affected crop areas Sri Lanka, 18 January, 2011



Sources: Affected crop area: Department of Agriculture  
Boundaries - Survey Department, Sri Lanka.  
The boundaries, names and the designations used on this map do not imply official endorsement or acceptance by the United Nations.

Map produced by: GIS Unit, WFP Sri Lanka.  
For updated mpa contact: thushara.keerthiratne@wfp.org  
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