

Seasonal Climate Update



Food Security and Nutrition Analysis Unit - Somalia



Issued February 5, 2013

Deyr 2012 (Oct-Dec)

This seasonal climate update, a joint effort of FSNAU, MARS-JRC, FEWS NET and SWALIM, is produced after every seasonal assessment (*Cu* and *Deyr*), to provide an overall view of the seasonal performance. The data and analyses in this publication are based on remote sensing (RFE and NDVI) and complimented by rain gauge data collected by SWALIM

Highlights

Rainfall

Deyr 2012 rains started as early as in the third dekad of September in most of central and southern regions. The rains advanced to the rest of the areas in October. FSNAU field reports indicated average to above average rains in all livelihoods of Bari, Hiran, Middle Shabelle, Bay and Bakool. Nevertheless, depressed rains were reported in north of Gedo, coastal areas of Lower Shabelle and Lower Juba and parts of Guban, Sool plateau and Nugal valley livelihoods.

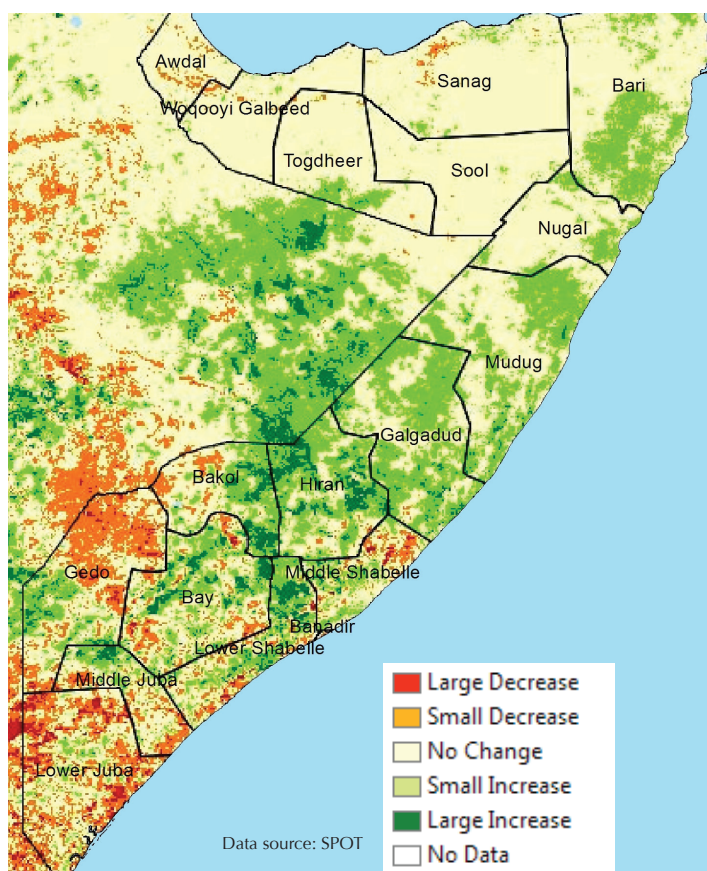
In October and November, river flooding mainly caused by deposition of alluvial soils and man-made diversion of water was reported in Beletwein (Hiran) and Kurtunwarey (Lower Shabelle). River levels increased steadily in October in the lower reaches of Shabelle attaining moderate flood risk levels, but stabilized in November and December. Flash floods occurred in October - November in small areas in Bay and Hiran. Flash flooding during the month of November hampered transportation from Mogadishu to Hiran region.

Satellite derived rainfall estimates (% of normal) from TAMSAT (Tropical Applications of Meteorology using Satellite) portray rainfall deficit in Awdal, most of W. Galbeed, North Mudug and most of Sanaag and small areas of Bay, Bakool and the Jubas.

Normalized Difference Vegetation Index (NDVI)

2012 *Deyr* rainfall impact on biomass according to the Normalized Difference Vegetation Index (SPOTVEGETATION-1Km resolution) for December, 2012 (Dekad-3) show generally normal to above normal vegetation conditions. Poor vegetation conditions are visible in north of Gedo, in large areas of Lower Juba and in small parts of Awdal, Sanaag, Bay and Bakool regions.

Map 1: Dec 2012 Dekad 3 NDVI Absolute Difference from Long Term Mean (1999-2011)



Data Sources

Maps and graphs in this bulletin are produced from three sources:

- Current Rainfall Estimates and NDVI data are derived from NOAA AVHRR and SPOT VEGETATION, while the rain gauge data is collected by FAO-SWALIM
- The seasonal profiles and long term trends on page 2 are produced in collaboration with MARS-JRC are utilise a combination of FAO-Africover and FAO-SWALIM land cover classes to derive RFE and NDVI summaries. For more information visit <http://mars.jrc.ec.europa.eu/mars/About-us/FOODSEC>

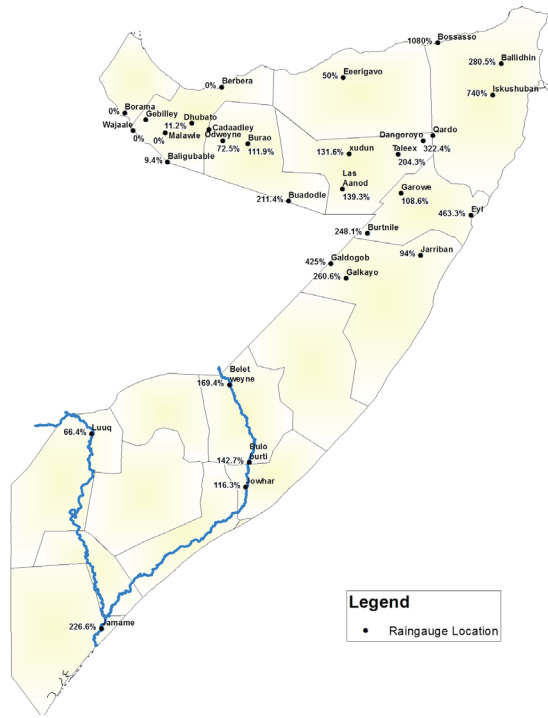
Technical and Managerial Support



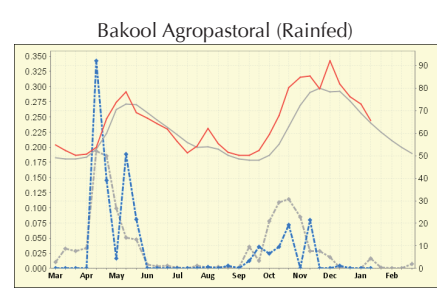
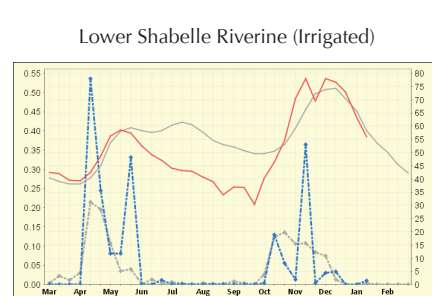
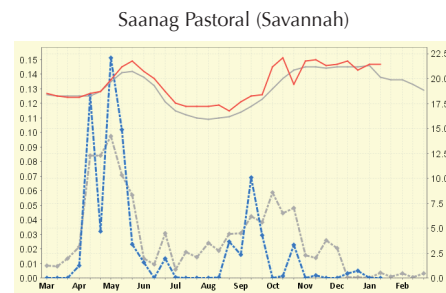
Funding Agencies



Map 3: *Deyr* 2012 Rainfall Raingauge Performance



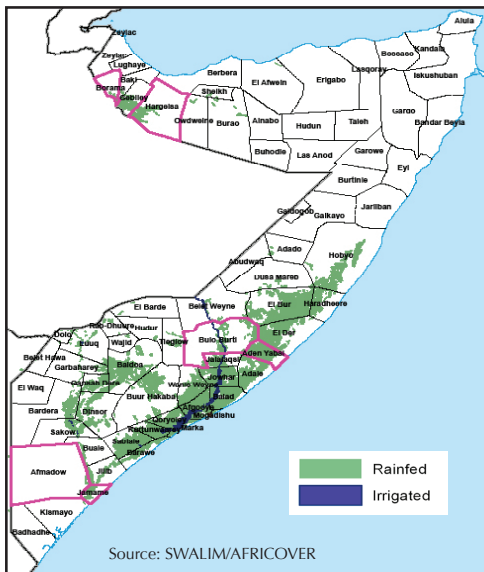
Data source: SWALIM



2

Long term rainfall and NDVI trends for selected districts

Map 4: Agricultural Areas

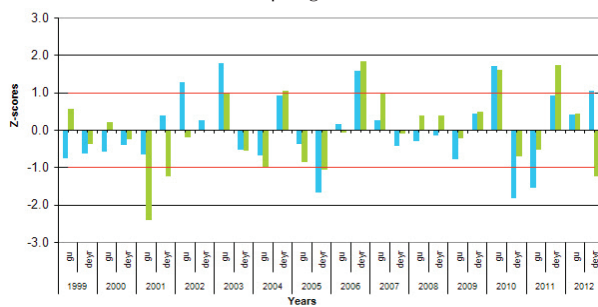


Agriculture

Based on FSNAU field assessment results, the *Deyr* 2012 crop production is above of the long-term average production (1995-2011). The field results conform with NDVI profiles and NDVI z-scores (page 3) for crop producing regions in Central and South. According to NDVI, the cereal producing areas of Central (Cowpea Belt) received good cowpea harvest when compared to the previous seasons. Due to poor rainfall performance poor crop production was received in Luuq, Belet Hawa and Dolow districts in Gedo region as well as in Jamame Agropastoral.

Selected districts with poor crop production

Luuq Irrigated



Jamame Agropastoral

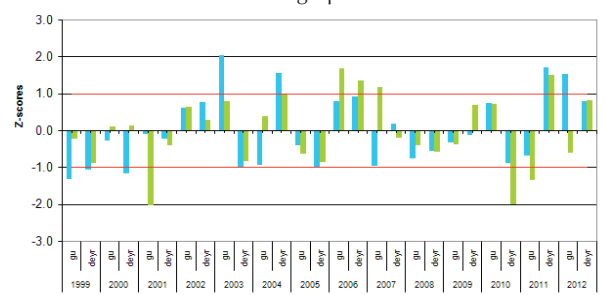


Selected districts with good crop production

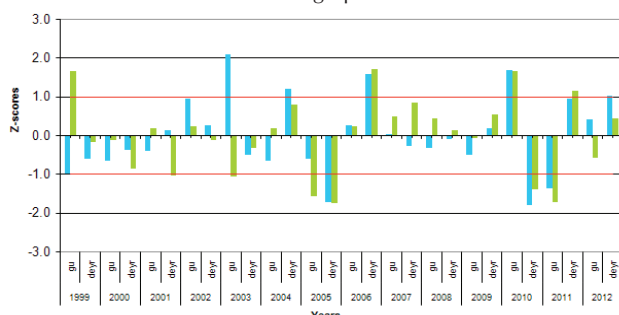
Qorioley Agropastoral



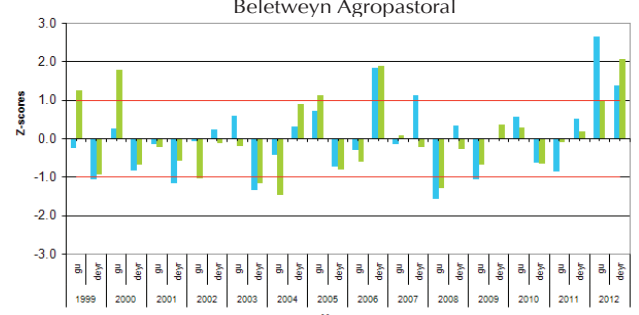
Baidoa Agropastoral



Berdera Agropastoral



Beletweyn Agropastoral



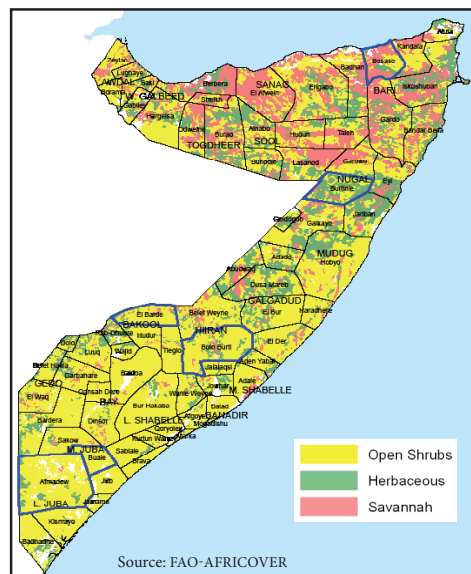
— RFE

— CNDVI

— 70% range

Long term rainfall and NDVI trends for selected districts

Map 5: Pastoral Areas



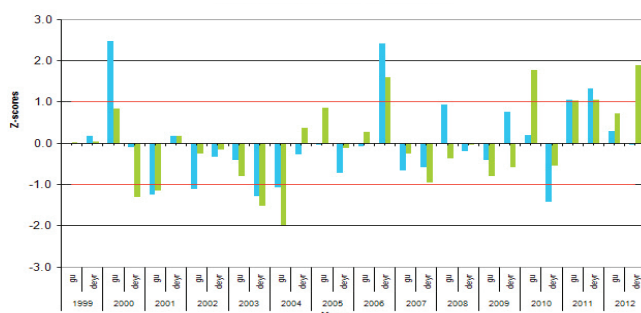
Pasture

Following favorable *Deyr* 2012 rainfall, pasture and water availability is normal in most parts of the country. However, in rainfall deficit areas of Zeylac district (Guban pastoral in Northwest), Sool (Nugal Valley) and Sanaag (Sool Plateau), north of Gedo and Coastal *Deeh* of Lower Shabelle and the Juba's, pasture and water conditions are still poor.

Most of natural water catchments and artificial berkads have been fully replenished. Livestock body conditions are generally normal in most areas apart from Guban livelihood in the Northwest, where the livestock body conditions are still poor. Livestock migration is largely within the livelihoods in most parts of the country. However, abnormal pastoral migration in search of better pasture and water in rainfall deficit areas of Sool Plateau and Lower Nugal valley was reported.

Selected districts with good pasture conditions

Adado Pastoral



Gebiley Pastoral



Selected districts with poor pasture conditions

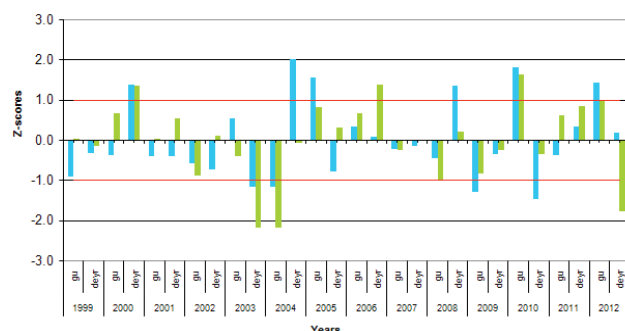
Afmadow Pastoral



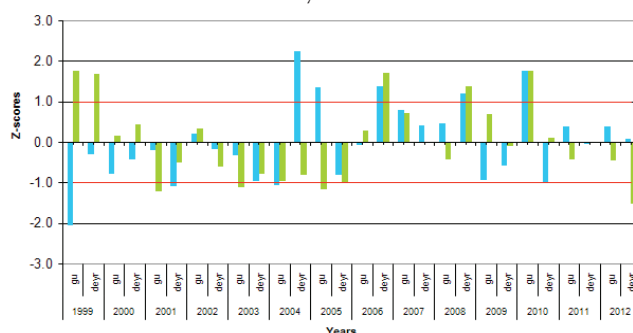
Eyl Pastoral



Burtinle Pastoral



Zeylac Pastoral



RFE

NDVI

70% range