

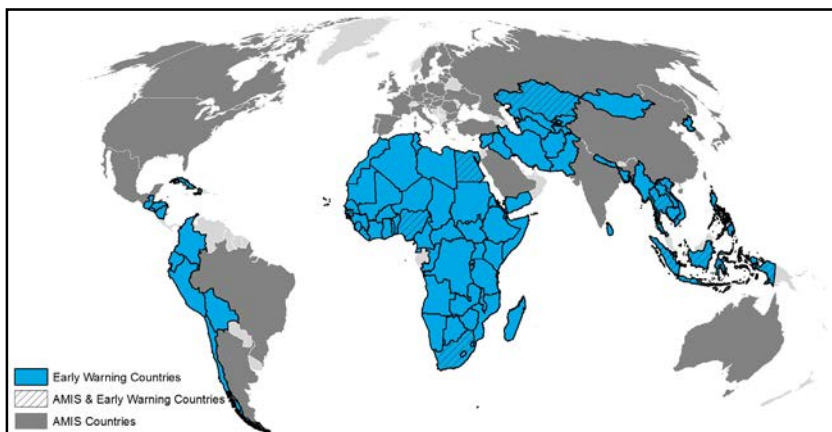


# Crop Monitor

## EARLY WARNING

### Overview:

In **West Africa**, harvest is complete for main season cereals and conditions are favourable and in some cases exceptional due to good rains throughout the season. In **East Africa**, main season cereals in the north of the subregion are under harvest and production prospects are mixed. In the south of the subregion second season crops are in vegetative stage and there is concern due to delay onset rains and dry conditions. In the **Middle East** and **North Africa** early planting of wheat crops has started and weather conditions are favourable. In **Southern Africa**, winter wheat harvest is complete and conditions are favourable due to sufficient rainfall. Main season maize planting has started and there is concern due to delay of onset rains and dry conditions. In **Central** and **South Asia**, planting of winter cereals is complete and conditions are favourable at the start of the season. In northern **Southeast Asia**, wet season rice harvest is nearing completion and there is concern across Laos and the Philippines which suffered flood damage due to heavy rains from several typhoons and tropical depressions. In **Central America** and the **Caribbean**, segunda season is in vegetative to reproductive stage and conditions have improved and are generally favourable.



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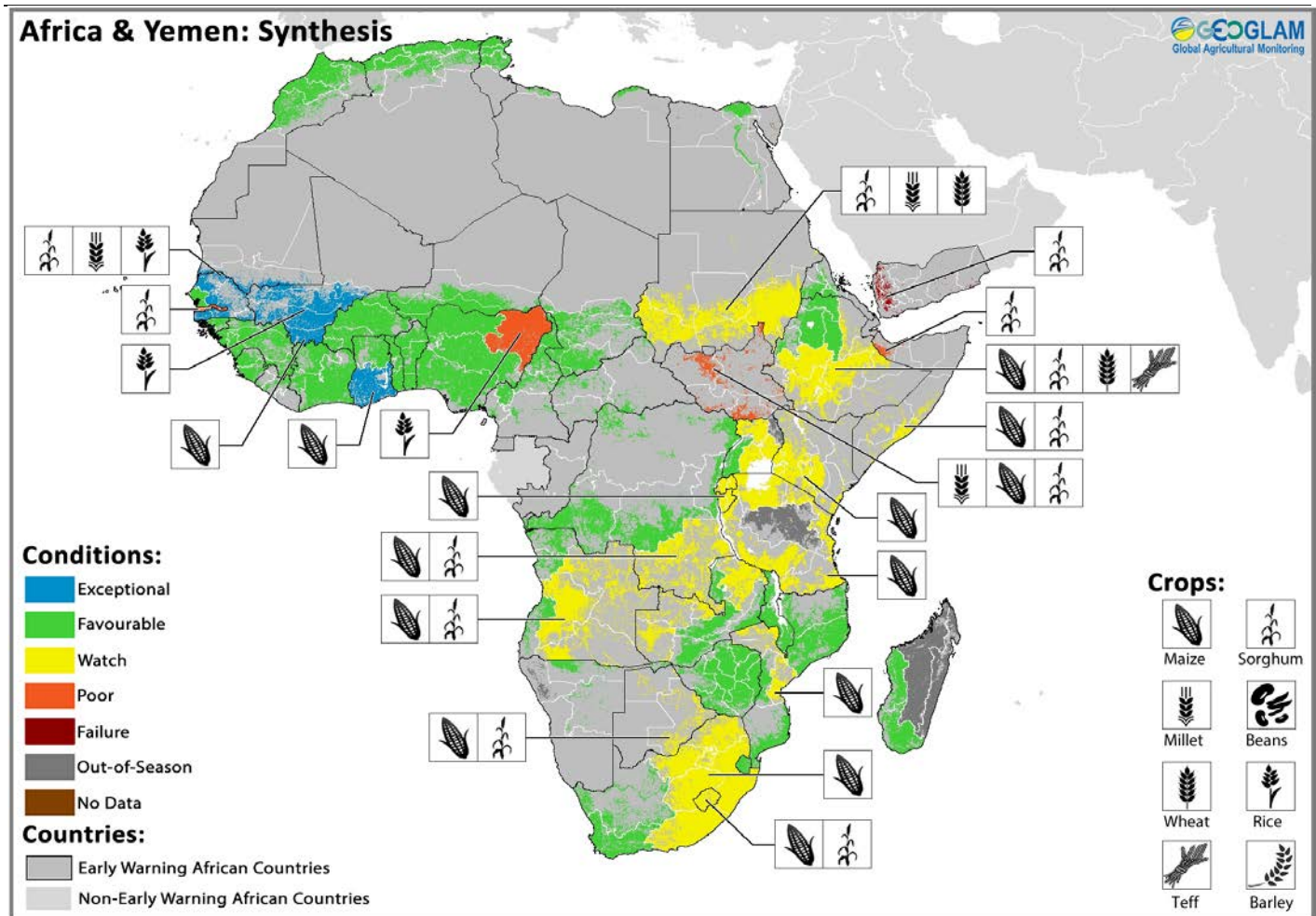
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# GEOGLAM Crop Monitor for Early Warning

## Crop Conditions at a glance

based on best available information as of November 28<sup>th</sup>



Crop condition map synthesizing information for all Crop Monitor for Early Warning crops as of November 28<sup>th</sup>. Crop conditions over the main growing areas are based on a combination of inputs including remotely sensed data, ground observations, field reports, national, and regional experts. **Regions that are in other than favourable conditions are labeled on the map with a symbol representing the crop(s) affected.**

**EAST AFRICA:** In the northern parts of the subregion main season cereals are at harvest stages and while rainfall was generally above average throughout the season, production prospects are mixed. In central and south of the subregion, second season crops are in vegetative to reproductive stage and there is concern due to delay of onset rains and dry conditions.

**WEST AFRICA:** Harvest is complete for the 2018-2019 agro pastoral cropping season and post harvest conditions are favourable and in some cases exceptional due to good rains since July across much of the region.

**MIDDLE EAST & NORTH AFRICA:** In the Middle East, planting continues for the 2018-2019 winter wheat season and weather conditions have been favourable. In North Africa, winter wheat sowing is underway and above average moisture conditions have been observed.

**SOUTHERN AFRICA:** Harvest of the 2018 winter wheat crop is complete across Southern Africa and production was favourable. Planting of main season maize is now underway

and there is concern due to delay onset rains and dry conditions at the start of the season.

**CENTRAL & SOUTH ASIA:** Across Central Asia, planting of the 2018-2019 winter wheat crop (to be harvested June-August 2019) is now finalized and conditions are favourable.

**SOUTHEAST ASIA:** In the northern side of Southeast Asia, harvest is nearing completion for wet season rice and concern persists in many areas which suffered flood damage from heavy rains due to the influence of several typhoons and tropical depressions. Below average yields are expected in Laos, northeast Thailand and Philippines due to severe flood damage throughout the season and severe impacts from tropical storm Mangkhut.

**CENTRAL AMERICA & CARIBBEAN:** The second season (*segunda*) is in vegetative to reproductive stage and conditions have improved and are favourable across the region. However, there is concern in Haiti due to dry conditions early in the season and below average yields are expected.

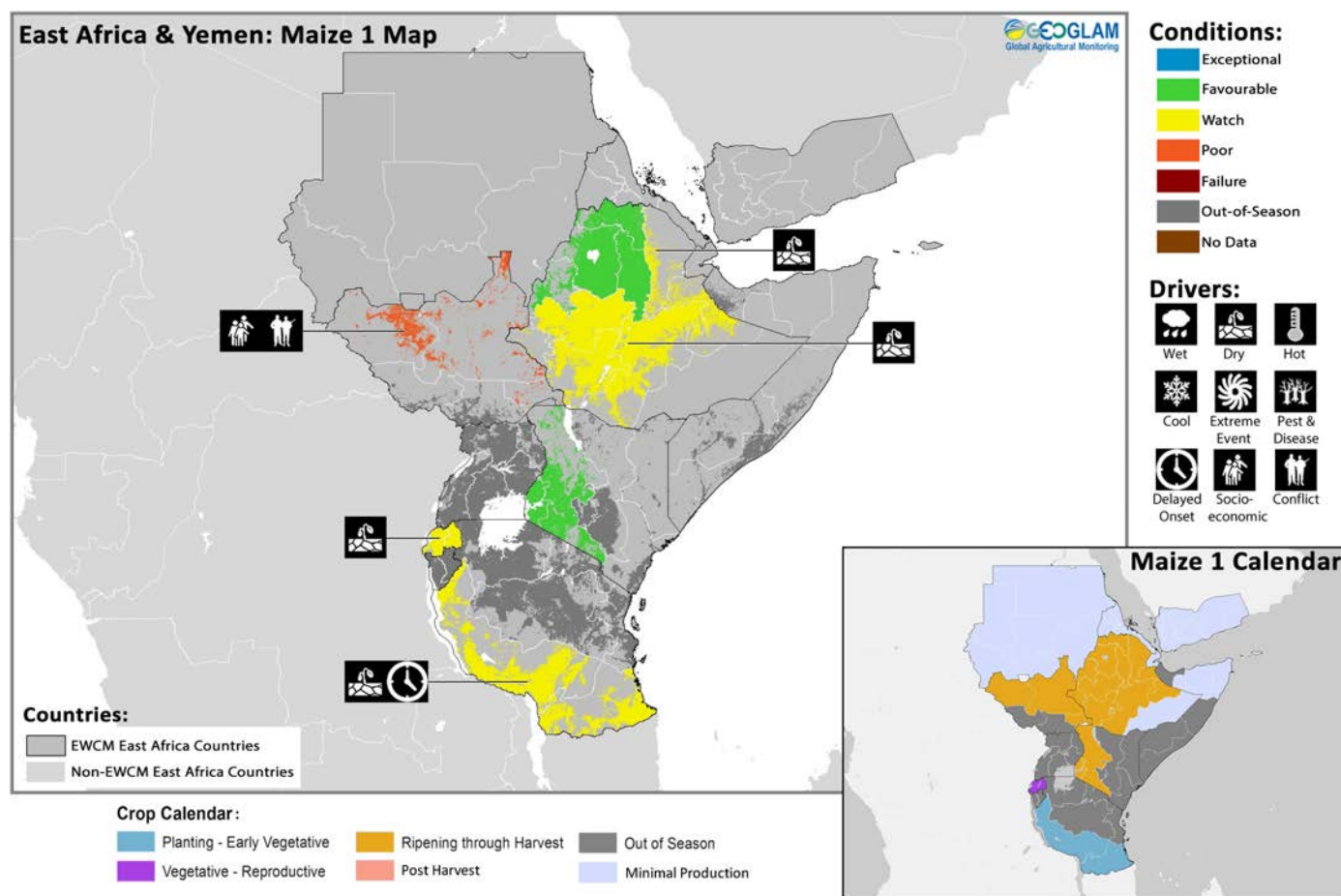
### Global Climate Outlook: Weak to moderate El Niño favored for winter 2018-19

A weak to moderate El Niño is expected to form and continue through Northern Hemisphere 2018-19 winter until spring (~80% chance through February; 55% chance through March-May). Coupling between the ocean and atmosphere is important for El Niño growth and global impacts. As of late November, warm western Pacific sea surface temperatures, a weak equatorial temperature gradient, and a lack of ocean-atmosphere coupling may be limiting El Niño teleconnections.

Associated with the potential development of this El Niño event between December and February are increased chances of above normal rainfall in parts of Tanzania, Central Asia, the southern U.S, Mexico, and southeastern South America. Drier than normal conditions are anticipated for the Indo-Pacific region, including parts of southeast Asia, Indonesia, and Australia, and for parts of Central America, the Caribbean, northern Brazil and Southern Africa.

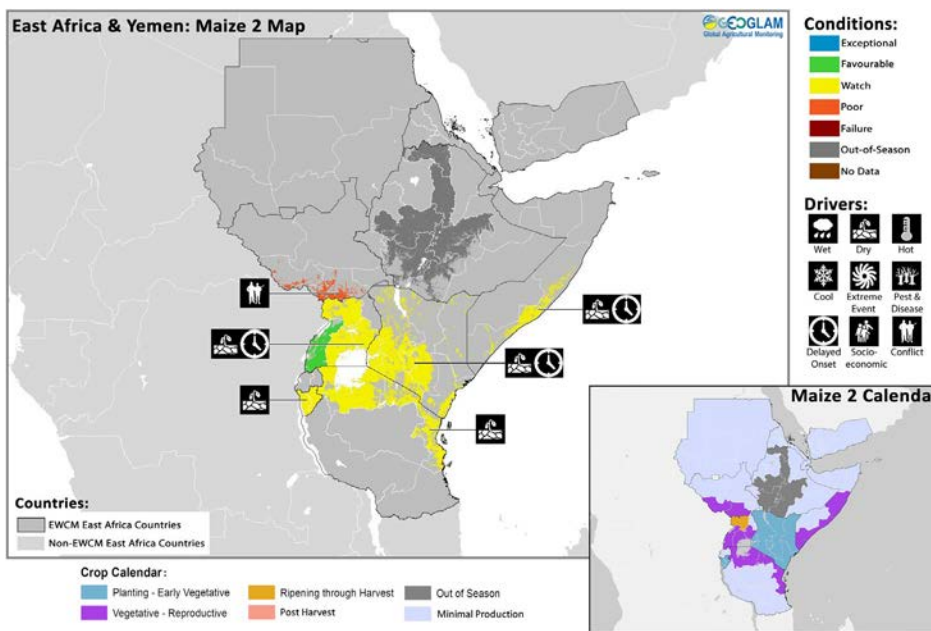
Source: UCSB Climate Hazards Group

## East Africa & Yemen



Crop condition map synthesizing conditions as of November 28<sup>th</sup>. Crop conditions over the main growing areas are based on a combination of inputs including remotely sensed data, ground observations, field reports, national, and regional experts. **Conditions that are other than favourable are labeled on the map with their driver.**

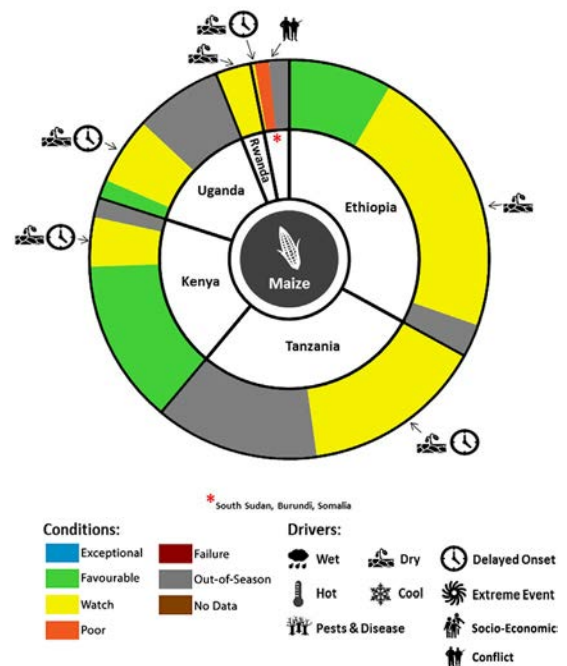
In northern parts of the subregion, including Ethiopia, Eritrea, the Sudan, and central and northern South Sudan, harvest for main season cereal crops is underway and while weather conditions were favourable throughout the season production prospects are mixed due to impacts from socioeconomic and conflict in Sudan and South Sudan respectively and dry conditions in Ethiopia affecting yields for the main *meher* season. In central and southern parts of the subregion, including Burundi, Rwanda, Kenya, Somalia, the United Republic of Tanzania, Uganda, and southern South Sudan, second season crops are in vegetative or reproductive stage with the bulk of the rains usually expected in November. In western and central main key-cropping areas of **Ethiopia**, the June-September *kiremt* rainy season was characterized by an early onset in mid-May and by average to above-average precipitations until mid-July, which benefited crop establishment and development. Subsequently, rains between mid-July and mid-August were below-average, but the rainfall deficits did not have a significant impact on vegetation conditions. Harvest is now underway for the major *meher* crop and production is generally favourable. However, in the SNNPR and some areas of East Oromia, Afar, North Somali, South Somali, adequate rains in June were followed by severe rainfall deficits in July through September, which affected crop



Crop condition map synthesizing information as of November 28<sup>th</sup>. Crop conditions over the main growing areas are based on a combination of inputs including remotely sensed data, ground observations, field reports, national, and regional experts. **Crops that are in other than favourable conditions are labeled on the map with their driver.**

localized crop production shortfalls unless replanting took place. In several northern and central uni-modal rainfall areas of **South Sudan**, seasonal rains were delayed, below average and characterized by recurrent and prolonged dry spells, which forced farmers to replant multiple times and had a negative impact on yields. Although insecurity still prevails in most areas and continues to constrain access to fields, it is reported that some refugees were able to return home and engage in farming activities. In addition, Fall Armyworm outbreaks are likely to further constrain the cereal output. In **Kenya**, harvest is complete over the key-growing areas of Rift Valley and Western provinces for “long-rains” crops and production is estimated at 10-15% above average due to exceptionally abundant seasonal rains despite some localized crop losses due to floods. In **Djibouti**, rainfall in September improved previously dry conditions and production prospects for main season crops are now borderline favourable. In **Eritrea**, the June-September *kiremti* rains had a timely onset, with abundant and well-distributed rains over most key cropping areas in central and western Anseba, Debub, Maekel and Gash Barka regions and production prospects are favourable. In **Yemen**, failure has resulted for main season crops due to ongoing and worsening conflict impacting agricultural operations and market functioning which hindered access to farm inputs and labour. In addition, western Yemen suffered from drought conditions further worsening yields for the main season.

In central and southern parts of the region including **Burundi, Rwanda, Kenya, Somalia, the United Republic of Tanzania, southern South Sudan and Uganda**, second season cereals are in vegetative to reproductive stage and there is increasing concern due to impacts from delay of onset rains and dry conditions across the region. In **Somalia**, despite relatively good rainfall in mid-November in parts of southern Somalia, seasonal cumulative rainfall in most of the South is still below average. As the peak rainfall for the *deyr* season normally happens in October/November, this means that total seasonal rainfall is likely to stay below average with peaks of 50% deficit as compared to average. The situation is slightly better in Bakool and Hiraan regions as compared to Bay (main rainfed sorghum producing area), and the Shabelles and the Juba regions. Pastoral areas in central and north-eastern Somalia are also affected by irregular and scarce rainfall. In the **United Republic of Tanzania**, main season sowing started in November in the main producing southern highlands and there is concern due to delay onset of *msimu* rains and dry conditions, rainfall in December and January will be critical to crop establishment. In the northwest, sowing of second season crops is delayed and initial crop performance is below average.



For detailed description of the pie chart please see box below.



### ***Regional Outlook: Deyr rains indicate poor performance over most of East Africa***

At the end of November, current rainfall performance assessments by CPC (Figure 1-left) and the CHC (Figure 1-right) indicate substantially below normal conditions across most of East Africa, with northern Tanzania, Southeast South Sudan, parts of Uganda, southern Ethiopia, and almost all of Kenya and Somalia associated with below normal October-November rainfall totals. From an agricultural and pastoral perspective, the wide-spread deficits across Kenya and Somali are very likely to lead to below-normal harvests and forage conditions. In key cropping areas, Somalia's October-November rains were among the driest five seasons on record, indicative of poor crop and pasture conditions similar to the 2016 *deyr* season (<http://blog.chg.ucsb.edu/?p=486>). In south-central Kenya extremely low rains, similar to 2005 low levels, likely presage substantial deficits in short rainy-season harvests. Forecasts indicate above normal rainfall in December for eastern East Africa, but benefits are expected to be minimal to moderate. Normal to above normal rains are also forecast for Tanzania.

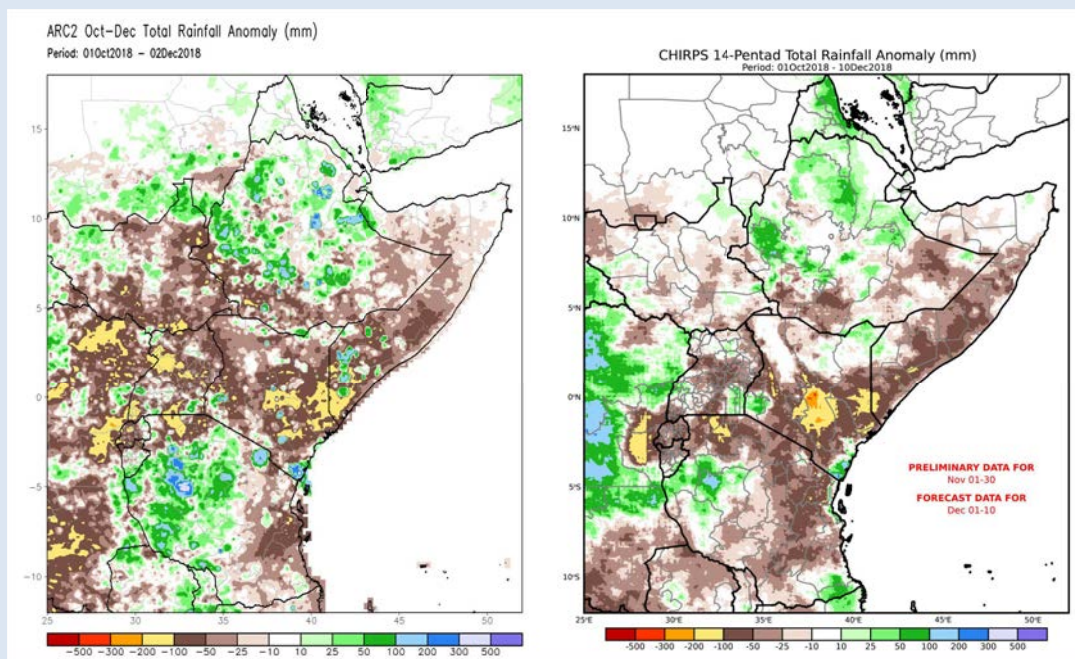
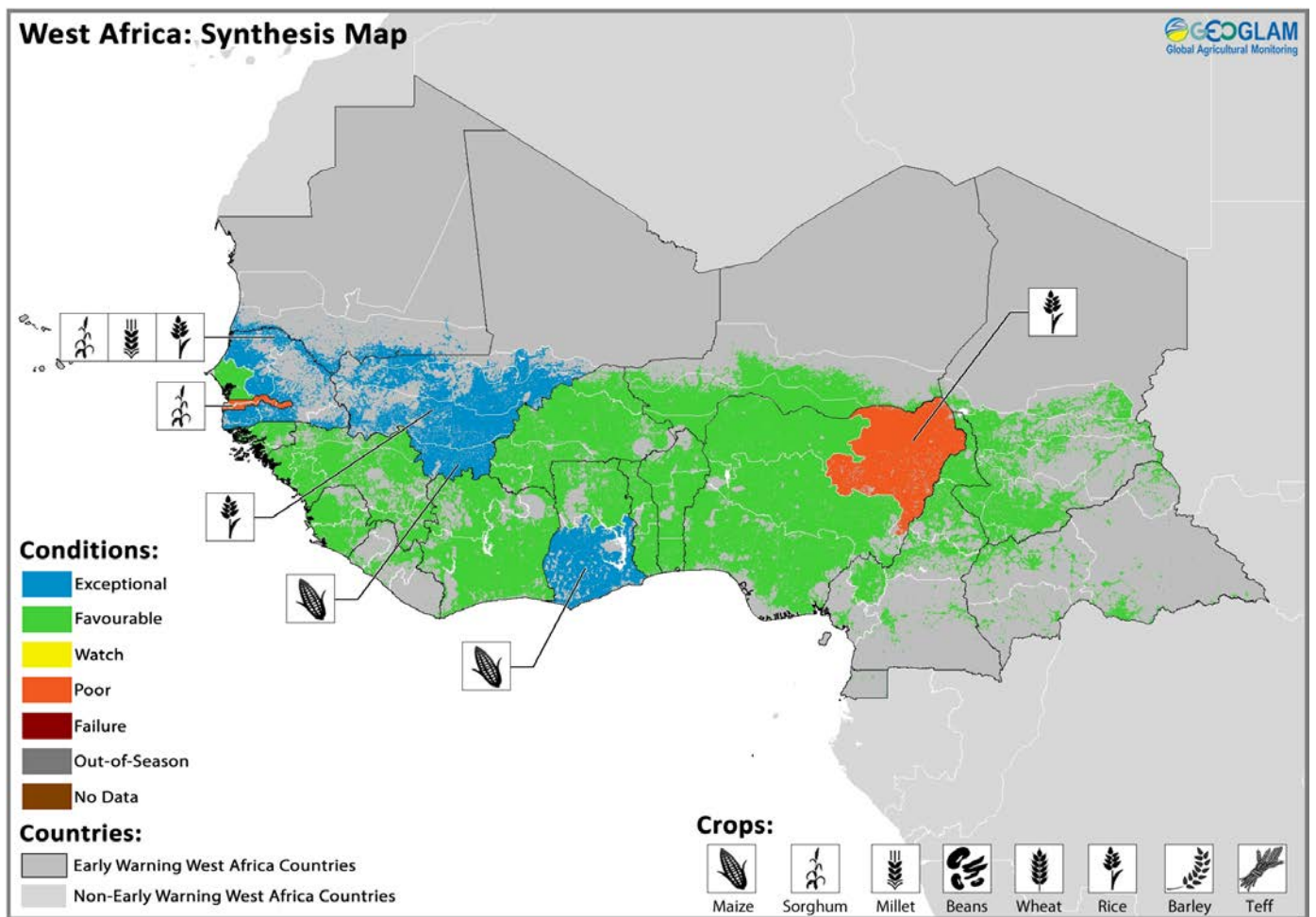


Figure 1. Difference from average rainfall for October to early December 2018 from two Famine Early Warning Systems Network (FEWS NET) monitoring products. On the left, NOAA ARC2. On the right, Climate Hazards Center Early Estimate. The Climate Hazards Center Early Estimate combines CHIRPS final and preliminary rainfall estimates with a compatible (unbiased) version of the 10-day GEFS ensemble mean forecast (<http://chg.geog.ucsb.edu/forecasts/gefs-chirps/>) for a preliminary look at sub-seasonal to seasonal rainfall outcomes.

Source: UCSB Climate Hazards Group

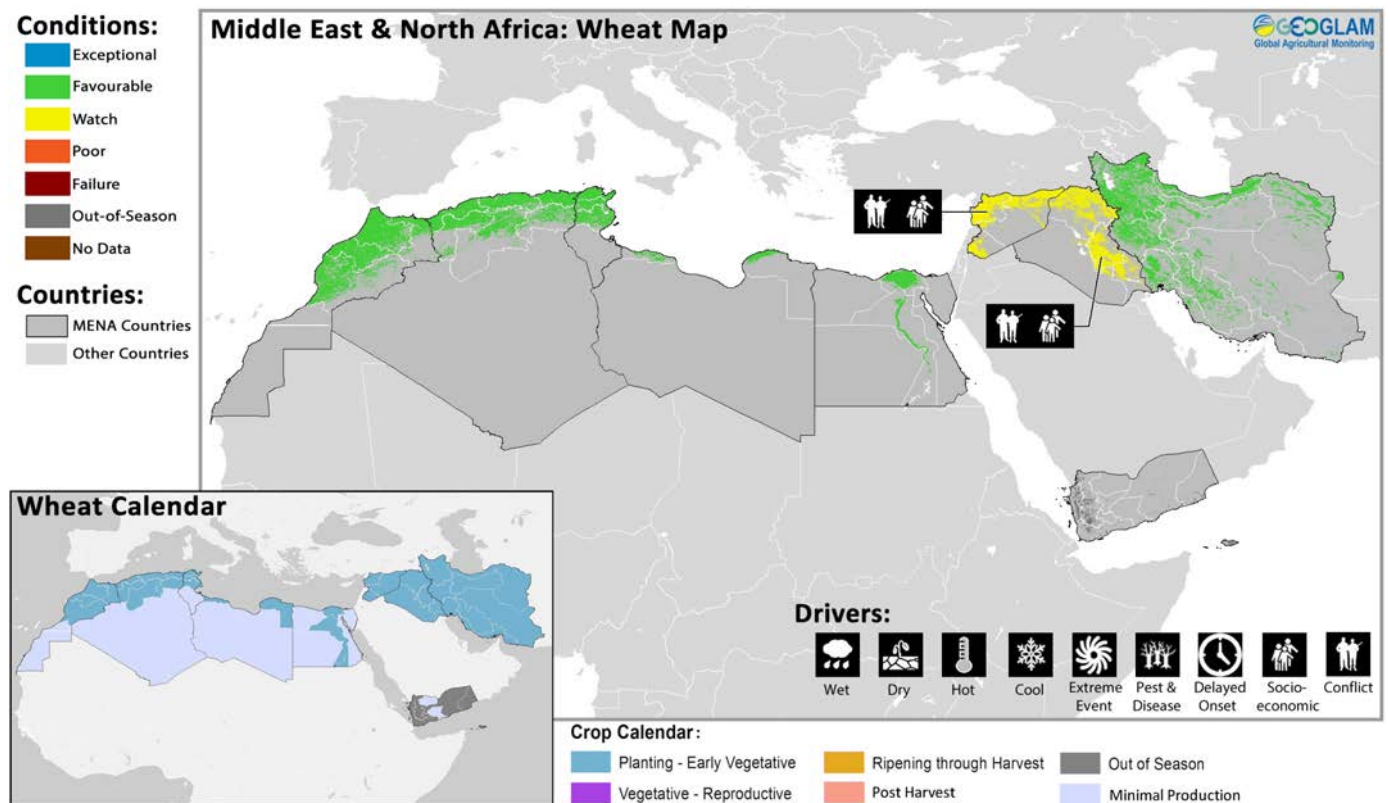
## West Africa



Crop condition map synthesizing information as of November 28<sup>th</sup>. Crop conditions over the main growing areas are based on a combination of inputs including remotely sensed data, ground observations, field reports, national, and regional experts. **Regions that are in other than favourable conditions are labeled on the map with a symbol representing the crop(s) affected.**

Harvests, which started in September, are complete for the 2018-2019 agro pastoral cropping season and production prospects are favourable and in some cases exceptional due to good rainfall throughout the season and at key growth stages. For the few early season dryness affected areas, improvement came on time with good rains received and production prospects are favourable. In **Mauritania**, despite dryness in the low producing southwest in recent months national production for sorghum and millet crops is exceptional with production expected to be 6 and 95 percent above the 5 year average. In **Senegal**, while poor distribution of precipitation was a concern early in the season, conditions improved due to sufficient rainfall in September and a slight extension of the season in early October that made up for water deficits early in the season. Main season millet maize and rice are exceptional with production expected to be 29, 63 and 47 percent above the 5-year average respectively. In **Mali**, maize and rice production is exceptional with expected increases of 67 and 40 percent higher than the 5 year average respectively. In **Ghana**, production is exceptional with expected increase of 26 percent higher than the 5 year average. In **Gambia**, poor conditions have resulted for main crops due to over a month delay of onset rains followed by heavy rainfall in September, resulting in flood damage and pest outbreaks. In **Nigeria**, conditions are favourable except in the northeast due to ongoing conflict throughout the season affecting agricultural activities.

## Middle East & North Africa



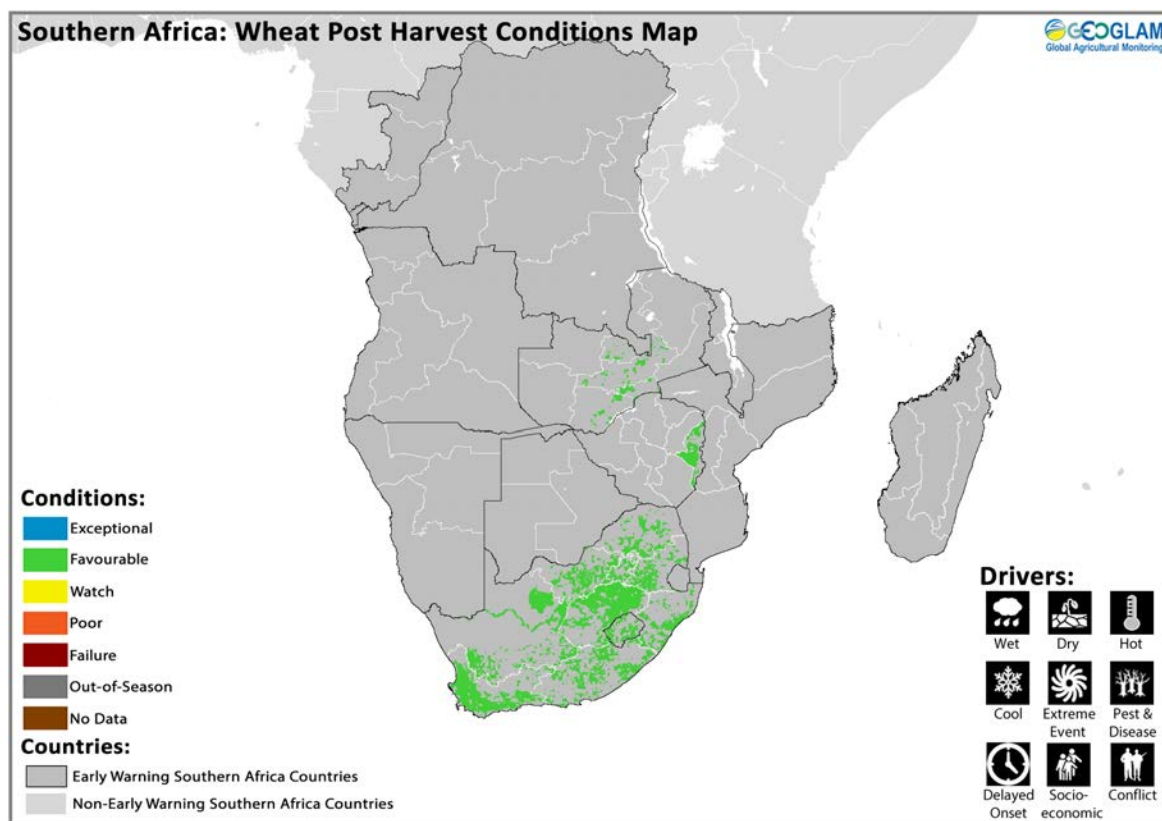
Crop condition map synthesizing information as of November 28<sup>th</sup>. Crop conditions over the main growing areas are based on a combination of inputs including remotely sensed data, ground observations, field reports, national, and regional experts. **Crops that are in other than favourable conditions are labeled on the map with their driver.**

In the Middle East, planting continues for the 2018-2019 winter wheat season in northern **Syria, Iraq and Iran** and while weather conditions are generally favourable, ongoing conflict in Syria and Iraq are expected to impact planting activities and production.

In North Africa winter wheat sowing continues under favourable conditions due to good rainfall at the start of the season. In **Morocco, Algeria and Tunisia** the sowing of winter wheat started within the normal window (early October), which for Morocco is significantly earlier than last years campaign. Crops are well established and favourable soil moisture conditions supported early emergence of wheat crops. In **Egypt**, harvest is complete for main season maize and rice. Rice production is estimated to be 25 percent lower than the 5-year average due in part to a decrease in planted area, while irrigated maize production also decreased due to water shortages compounded with high temperatures. Sowing is now underway for winter wheat, after a minor delay in winter season onset, crop conditions are now close to average in all regions and crop conditions are above average in the western part of the Nile delta.

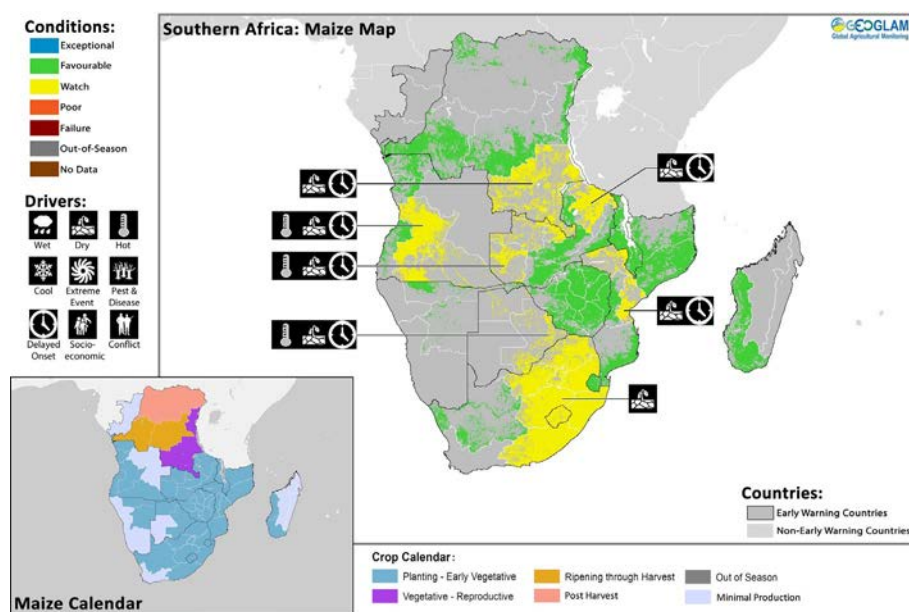


## Southern Africa



Crop condition map synthesizing information as of November 28<sup>th</sup>. Crop conditions over the main growing areas are based on a combination of inputs including remotely sensed data, ground observations, field reports, national, and regional experts. **Crops that are in other than favourable conditions are labeled on the map with their driver.**

Harvest of the 2018 winter wheat crop is complete across Southern Africa and production is favourable due to good weather conditions and water supply throughout the season supporting crop growth. In **Zimbabwe**, yields have been good with above average production expected. However, in **Zambia**, while weather has been favourable, production is expected to decrease by 41 percent from last year and about 50 percent of the average due to a decrease in planted area. In **South Africa**, winter wheat production was 20 percent higher than 2017 level due to widespread rain since early winter and more significant rain during the latter half of August and September over the main production region (the western winter rainfall area).

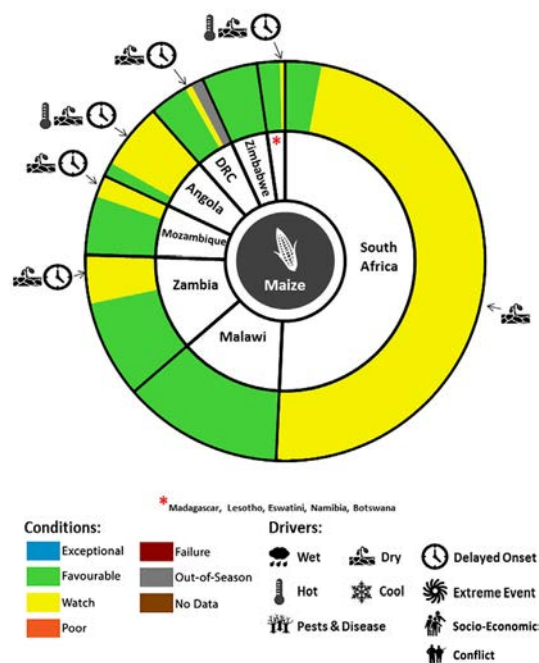


Crop condition map synthesizing information as of November 28<sup>th</sup>. Crop conditions over the main growing areas are based on a combination of inputs including remotely sensed data, ground observations, field reports, national, and regional experts. **Crops that are in other than favourable conditions are labeled on the map with their driver.**

Planting of the main season maize crop is now underway across much of the region and conditions are mixed due to a dry start of the season however, it is still early and December rainfall will be critical. In the **Democratic Republic of Congo**, conditions are generally favourable for main season maize and sorghum due to significant rainfall at the start of the season. However, rainfall has been below average for the past two decades which may impact planting activities. In Katanga, concern remains due to early season dryness and continuing dry conditions and above average temperatures. In **Angola**, rainfall has been erratic since the start of the season. The eastern areas have been most affected by dryness with a delayed onset of rains by 4 dekads in some areas in addition to high temperatures. In **Zambia**, there is concern in the north, copperbelt, and west due to a delay of



onset rains and for areas which have experienced onset, rainfall amounts have been poor. In northern **Malawi**, main season planting will commence in December and some rains have already been received in southern and central areas at the end of November. In **Zimbabwe**, while there has been a slight delay of onset rains and dry conditions, crops will depend on December rainfall for improvement. In **Madagascar**, conditions are borderline with most areas receiving timely rains however, areas in the north west and north central have experienced delay of onset rains and below average precipitation. In **Botswana**, there is some concern due to above average temperatures and below average rainfall in the past month with delayed planting activities however, conditions will depend on December rainfall to support crop development. In **Mozambique**, some areas have had a delay of onset rains and rains that have been received have been below average. In **Lesotho**, there is concern due to delay onset of rains and reports have noted that planting has not started in most areas and in the areas where planting has been possible, crop development is said to be poor. In **South Africa**, sowing conditions are mixed with only the far eastern areas receiving sufficient rainfall.



For detailed description of the pie chart please see box below.

### Regional Outlook: El Niño impacts on Southern Africa possible, but uncertain

There is a high probability for the development of a weak-to-moderate El Niño, which is typically associated with rainfall deficits in eastern and central parts of southern Africa. To date, much of southern Africa has experienced widespread rainfall deficits (Figure 2-left). Early December forecasts are showing below-normal to normal rainfall, except for areas in Mozambique and eastern Zambia. Seasonal climate forecasts indicate an increased probability of drought in Zimbabwe, central Zambia, southern and central Mozambique, southern Angola and Namibia. Composites of observed rainfall anomalies for weak-to-moderate El Niños are broadly similar (Figure 2-right). Note however, that El Niño conditions are not yet well developed.

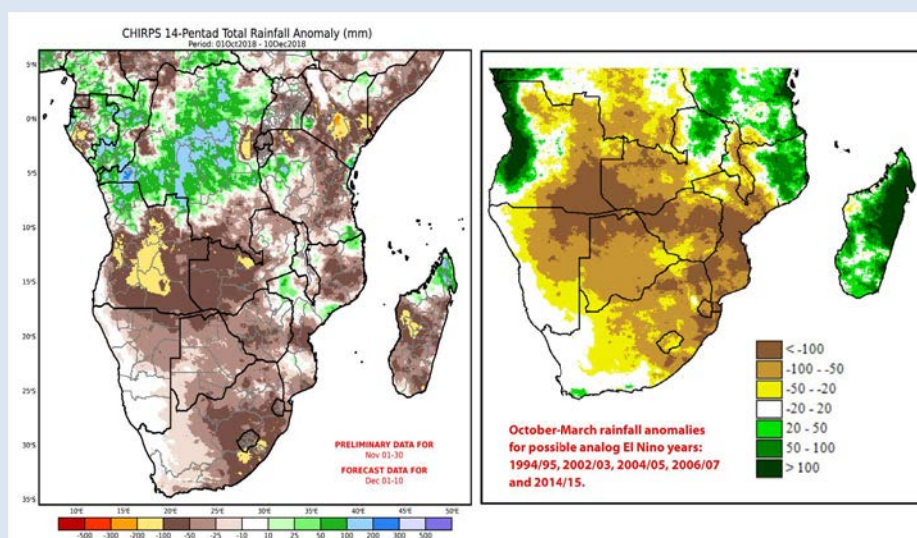
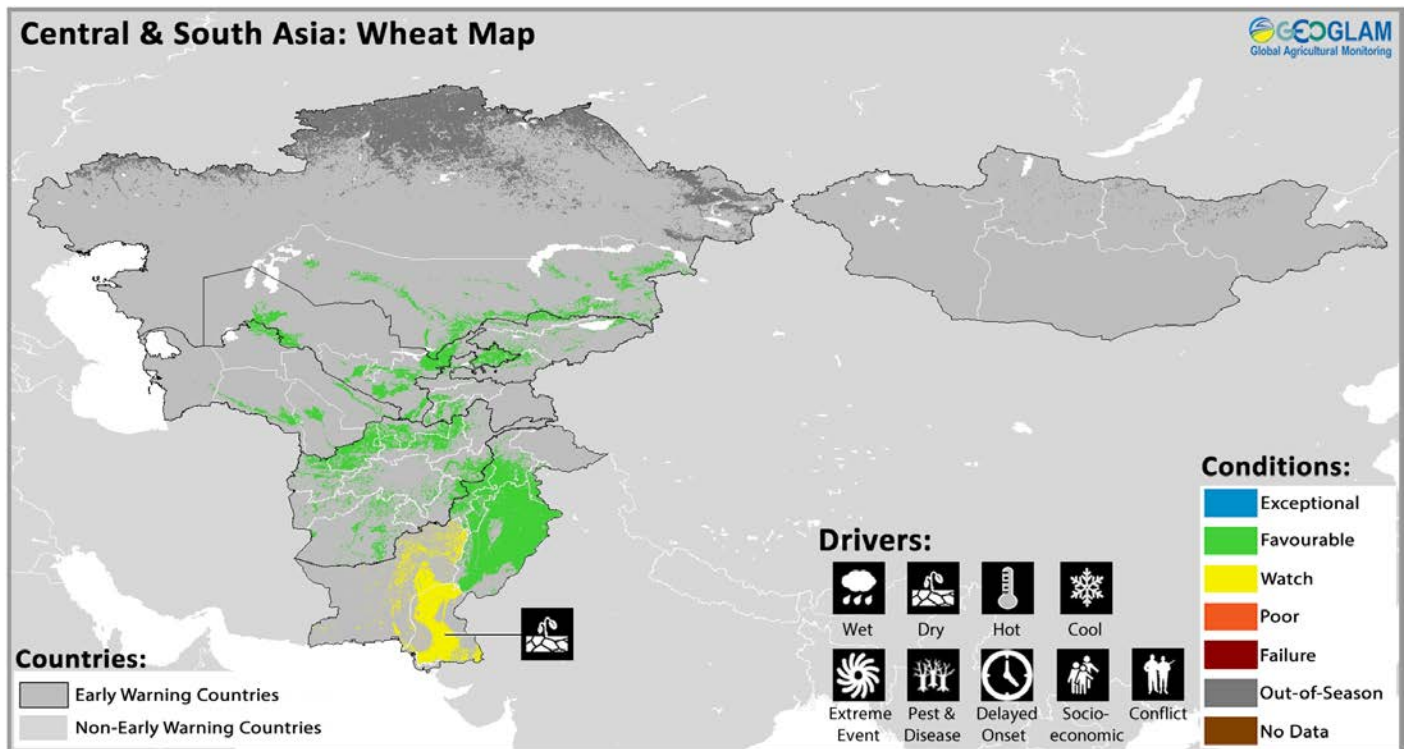


Figure 2. On the left, a preliminary estimate for difference from average rainfall for October 1<sup>st</sup> to December 10<sup>th</sup>, 2018 (Climate Hazards Center Early Estimate). On the right, difference from average October to March CHIRPS rainfall for previous weak-to-moderate El Niño years (1994/95, 2002/03, 2004/05, 2014/15). The Climate Hazards Center Early Estimate is a new monitoring resource for sub-seasonal to seasonal rainfall performance. The CHC Early Estimate combines CHIRPS final and preliminary rainfall estimates with a compatible (unbiased) version of the 10-day GEFS ensemble mean forecast (<http://chg.geog.ucsb.edu/forecasts/gefs-chirps/>).

Source: UCSB Climate Hazards Group

## Central &amp; South Asia

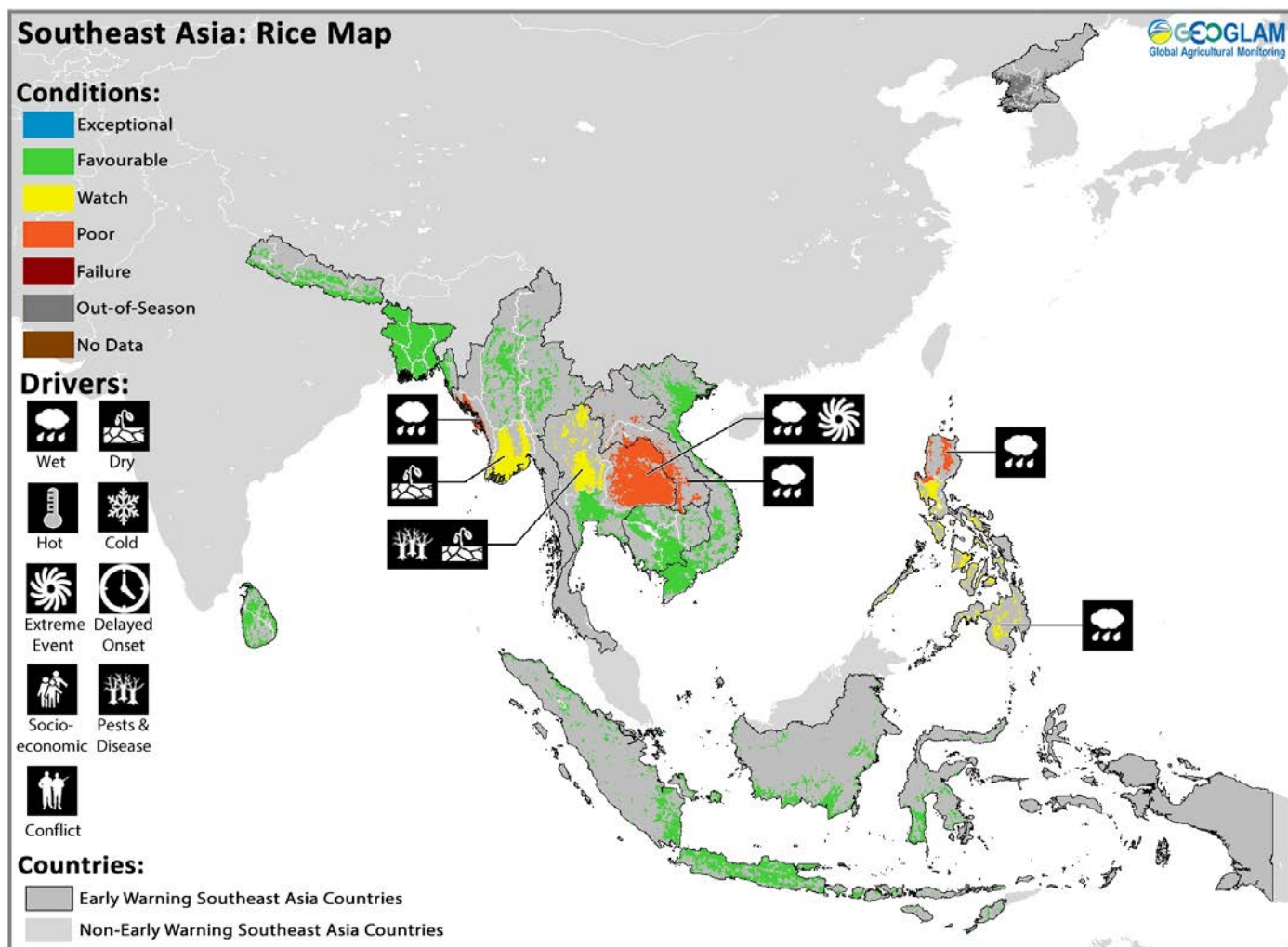


Crop condition map synthesizing information as of November 28<sup>th</sup>. Crop conditions over the main growing areas are based on a combination of inputs including remotely sensed data, ground observations, field reports, national, and regional experts. **Crops that are in other than favourable conditions are labeled on the map with their driver.**

Planting of winter wheat in the region, to be harvested between May and August 2019, finalized in mid-November, under favourable weather conditions and early winter wheat crops entered the germination phase. Although in the south and southeast of **Kazakhstan**, above-normal precipitations, low temperatures and night frosts were observed in October, which delayed pre-plant operations and planting of winter wheat, overall conditions of crops are reported to be adequate. In **Kyrgyzstan**, soil moisture is adequate, with exceptions for the Talas region, where rains levels were below average in November. In **Tajikistan**, precipitations were adequate in October but they were below average in Sogd in November. In **Uzbekistan**, rains are scarce in most of the country, with exception for Karakalpakstan, where they exceed the average levels. As for **Turkmenistan**, crop conditions and soil moisture are reported to be adequate. In **Afghanistan**, planting started in September for 2018/2019 winter wheat crop and conditions are favourable at the start of the season. In **Pakistan**, harvest will complete in December for the main *kharif* rice crop and there is concern in Balochistan and Sindh due to dry conditions during the season that may constraint yields. Winter wheat planting started in November and conditions are generally favourable.

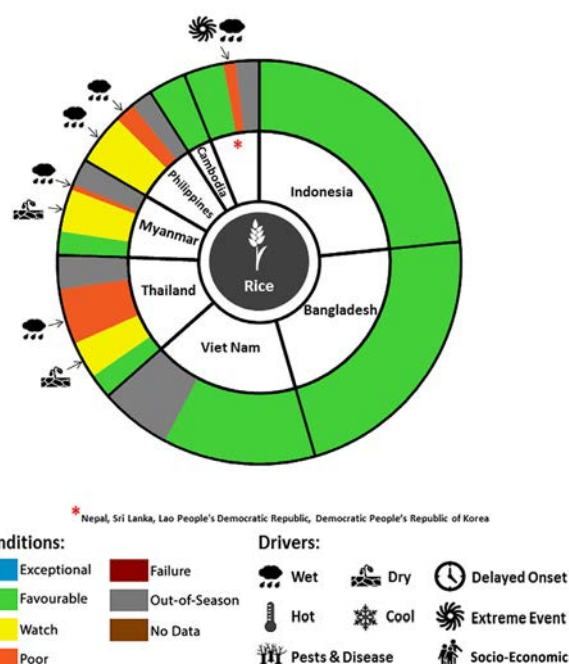


Southeast Asia



Crop condition map synthesizing information as of November 28<sup>th</sup>. Crop conditions over the main growing areas are based on a combination of inputs including remotely sensed data, ground observations, field reports, national, and regional experts. **Crops that are in other than favourable conditions are labeled on the map with their driver.**

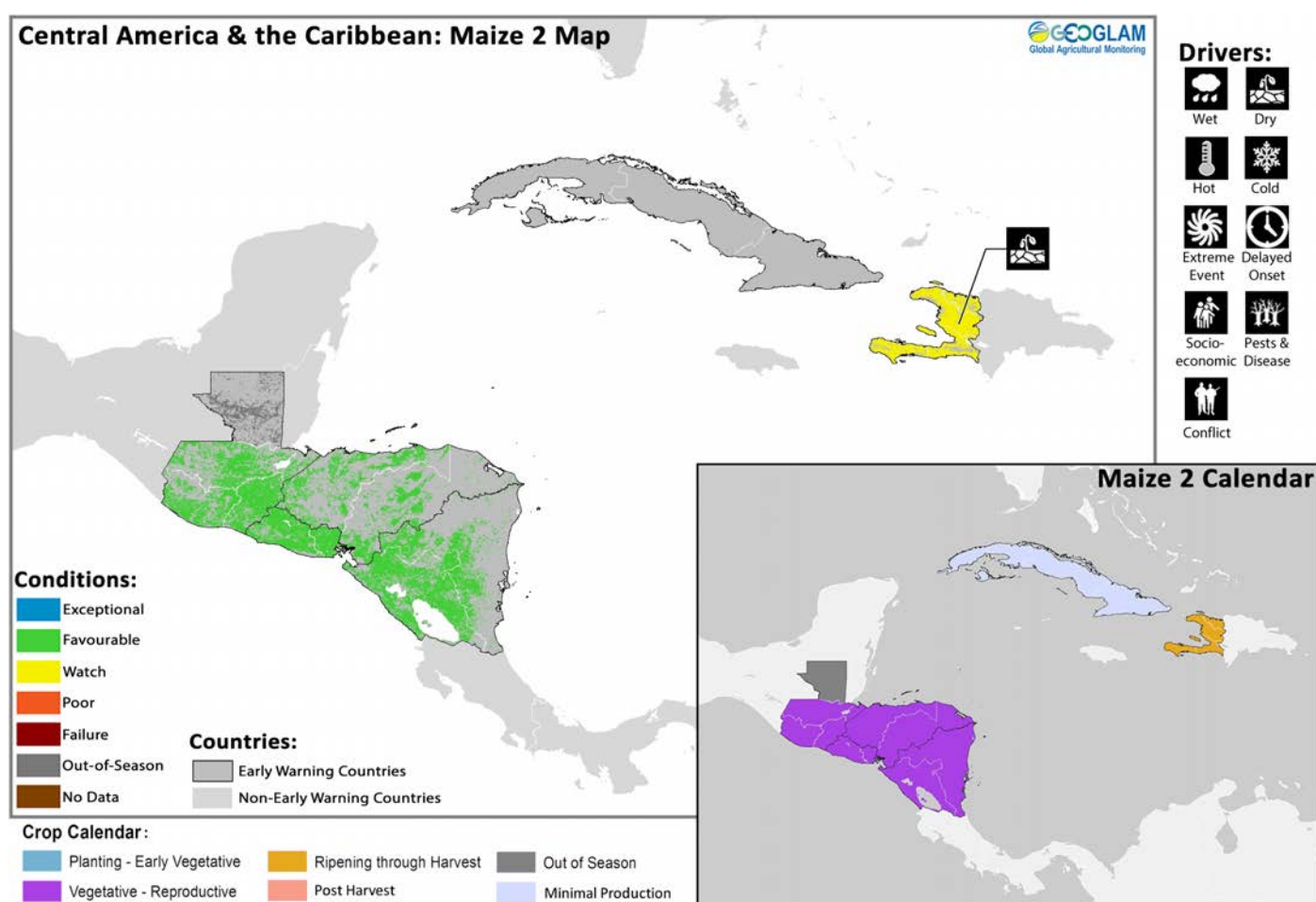
In the northern side of Southeast Asia, wet season rice harvest is in the high season and the yield condition is mixed. While production prospects in Cambodia and Vietnam are generally good, in Myanmar and Thailand production varies depending on region and in Laos and Philippines, conditions are poor due to heavy rainfall and flooding from several tropical cyclone and typhoons during growing season. In Indonesia, the harvesting of dry season rice is almost finished and the yield is expected to be higher than last year. This November is the second planting month of wet season rice and the progress of planting has been average. In **Viet Nam**, harvest of the summer-autumn rice (wet-season rice) is complete with yields slightly above last year's. In **Thailand**, conditions have deteriorated for wet-season rice in the northeast due to continued flooding. In the north, dry conditions during the grain filling stage have caused damage. In **Laos**, wet season rice harvest is in high season and production prospects are poor due to the serious flood situation that occurred from late July to August which caused damage across the entire country and notably the center. Subsequent pest outbreaks and landslides caused further damage to crops. Upland rice also suffered damage from heavy rain, landslides and pest outbreak and production prospects are poor. In **Cambodia**, harvest will complete in December and planted area is almost 10 percent above the national plan due to sufficient irrigation



*For detailed description of the pie chart please see box below.*

water and while some areas in the Mekong region suffered from flood damage, impact on production is minimal and prospects are favourable. November is the first sowing month of dry season rice and conditions are favourable at the start of the season. In **Myanmar**, wet season rice harvest continues and conditions are generally favourable with yields close to the 2017 levels excluding the Rakhine state, which suffered damage from tropical storm impacts during key growth stages in addition to ongoing conflict that has aggravated the shortage of agricultural labor force in the area. Central and southern Myanmar will start harvest this month. In the **Philippines**, harvest of wet-season rice, sown between July through August, is ongoing. Continued damage from multiple typhoons throughout the season have further downgraded rice conditions and production prospects are poor. In **Indonesia**, harvest of dry-season rice is almost complete with yields remaining above last year's. Sowing of wet-season rice advances under favourable conditions, with rainfall in late October and mid-November improving moisture conditions. In **Nepal** harvest started in December for the main season rice crop and conditions are favourable. In **Bangladesh**, harvest is underway for the main *aman* rice crop and production prospects are favourable due to good rainfall throughout the season. In **Sri Lanka**, planting of the main *maha* rice crop started in mid-October and conditions are favourable with sufficient rainfall at the start of the season.

## Central America & Caribbean

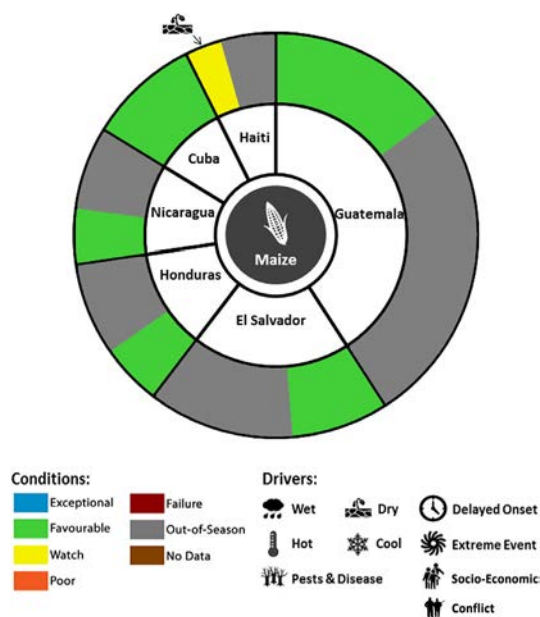


Crop condition map synthesizing information as of November 28<sup>th</sup>. Crop conditions over the main growing areas are based on a combination of inputs including remotely sensed data, ground observations, field reports, national, and regional experts. **Conditions that are other than favourable are labeled on the map with their driver.**

The second season (*segunda*) planted from August is now in vegetative stage and conditions are favourable and have improved from heavy rain and flooding in October along the Gulf of Fonseca. In **Guatemala**, conditions are favourable across many areas due to sufficient precipitation however, in central areas, rainfall has been slightly below average in November. In **El Salvador**, conditions are generally favourable and have recovered from localized heavy rainfall along the Gulf of Fonseca and resultant flooding in October. In **Honduras**, conditions are favourable and have generally improved in the South over main producing departments of Olancho and Paraiso. In **Nicaragua**, conditions have improved from heavy rain and flooding in October from Tropical cyclone Michael. Land preparation is underway for *apante* bean crops that will be planted in the first half of December. In **Haiti**, while consecutive weeks of rainfall in October improved the soil moisture deficits affecting second season planting, conditions remain below average,



particularly in the northern and southern regions. In **Cuba**, conditions have improved due to sufficient rainfall in November and are now favourable.



For detailed description of the pie chart please see box below.

**Pie Chart Description:** Each slice represents a country's share of total regional production. The proportion within each national slice is colored according to the crop conditions within a specific growing area; grey indicates that the respective area is out of season. Sections within each slice are weighted by the sub-national production statistics (5-year average) of the respective country. The section within each national slice also accounts for multiple cropping seasons (i.e. spring and winter wheat) and are a result of combining totals from multiple seasons to represent the total yearly national production. When conditions are other than favourable icons are added that provide information on the key climatic drivers affecting conditions.

**Information on crop conditions in the main production and export countries can be found in the AMIS Market Monitor, published December 6<sup>th</sup> 2018.**

#### **Sources and Disclaimers:**

The Crop Monitor assessment is conducted by GEOGLAM with inputs from the following partners FEWS NET, JRC, WFP, ARC, Asia RiCE, MESA, ICPAC, FAO GIEWS, Applied Geosolutions and UMD. The findings and conclusions in this joint multi-agency report are consensual statements from the GEOGLAM experts, and do not necessarily reflect those of the individual agencies represented by these experts. More detailed information on the GEOGLAM crop assessments is available at [www.cropmonitor.org](http://www.cropmonitor.org)

# Appendix

## Crop Conditions:

**Exceptional:** Conditions are much better than average\* at time of reporting. This label is only used during the grain-filling through harvest stages.

**Favourable:** Conditions range from slightly lower to slightly better than average\* at reporting time.

**Watch:** Conditions are not far from average\* but there is a potential risk to final production. The crop can still recover to average or near average conditions if the ground situation improves. This label is only used during the planting-early vegetative and the vegetative-reproductive stages.

**Poor:** Crop conditions are well below average. Crop yields are likely to be 10-25% below average. This is used when crops are stunted and are not likely to recover, and impact on production is likely.

**Failure:** Crop conditions are extremely poor. Crop yields are likely to be 25% or more below average.

**Out of Season:** Crops are not currently planted or in development during this time.

**No Data:** No reliable source of data is available at this time.

*"Average" refers to the average conditions over the past 5 years.*



## Drivers:

*These represent the key climatic drivers that are having an impact on crop condition status. They result in production impacts and can act as either positive or negative drivers of crop conditions.*

**Wet:** Higher than average wetness.

**Dry:** Drier than average.

**Hot:** Hotter than average.

**Cool:** Cooler than average or risk of frost damage.

**Extreme Events:** This is a catch-all for all other climate risks (i.e. hurricane, typhoon, frost, hail, winterkill, wind damage, etc.)

**Delayed-Onset:** Late start of the season.

**Pest & Disease:** Destructive insects, birds, animals, or plant disease.

**Socio-economic:** Social or economic factors that impact crop conditions (i.e. policy changes, agricultural subsidies, government intervention, etc.)

**Conflict:** Armed conflict or civil unrest that is preventing the planting, working, or harvesting of the fields by the farmers.



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**Crop Season Nomenclature:**

*In countries that contain multiple cropping seasons for the same crop, the following charts identifies the national season name associated with each crop season within the Crop Monitor for Early Warning.*

| MENA    |      |                |                          |               |
|---------|------|----------------|--------------------------|---------------|
| Country | Crop | Season 1 Name  | Season 2 Name            | Season 3 Name |
| Egypt   | Rice | Summer-planted | Nili season (Nile Flood) |               |

| East Africa                 |         |                           |                           |               |
|-----------------------------|---------|---------------------------|---------------------------|---------------|
| Country                     | Crop    | Season 1 Name             | Season 2 Name             | Season 3 Name |
| Burundi                     | Maize   | Season B                  | Season A                  |               |
| Ethiopia                    | Maize   | Meher Season (long rains) | Belg Season (short rains) |               |
| Kenya                       | Maize   | Long Rains                | Short Rains               |               |
| Somalia                     | Maize   | Gu Season                 | Deyr Season               |               |
| Somalia                     | Sorghum | Gu Season                 | Deyr Season               |               |
| Uganda                      | Maize   | First Season              | Second Season             |               |
| United Republic of Tanzania | Maize   | Long Rains                | Short Rains               |               |
| United Republic of Tanzania | Sorghum | Long Rains                | Short Rains               |               |

| West Africa   |       |               |               |               |
|---------------|-------|---------------|---------------|---------------|
| Country       | Crop  | Season 1 Name | Season 2 Name | Season 3 Name |
| Benin         | Maize | Main season   | Second season |               |
| Cameroon      | Maize | Main season   | Second season |               |
| Cote d'Ivoire | Maize | Main season   | Second season |               |
| Ghana         | Maize | Main season   | Second season |               |
| Mauritania    | Rice  | Main season   | Off-season    |               |
| Nigeria       | Maize | Main season   | Short-season  |               |
| Nigeria       | Rice  | Main season   | Off-season    |               |
| Togo          | Maize | Main season   | Second season |               |

| Southern Africa                  |       |               |               |               |
|----------------------------------|-------|---------------|---------------|---------------|
| Country                          | Crop  | Season 1 Name | Season 2 Name | Season 3 Name |
| Democratic Republic of the Congo | Maize | Main season   | Second season |               |
| Mozambique                       | Maize | Main season   | Second season |               |

| Southeast Asia                   |      |                     |                            |               |
|----------------------------------|------|---------------------|----------------------------|---------------|
| Country                          | Crop | Season 1 Name       | Season 2 Name              | Season 3 Name |
| Bangladesh                       | Rice | Boro                | Aman                       |               |
| Cambodia                         | Rice | Wet season          | Dry season                 |               |
| Indonesia                        | Rice | Main season         | Second season              |               |
| Lao People's Democratic Republic | Rice | Wet season          | Dry season                 |               |
| Myanmar                          | Rice | Wet season          | Dry season                 |               |
| Philippines                      | Rice | Wet season          | Dry season                 |               |
| Sri Lanka                        | Rice | Maha                | Yala                       |               |
| Thailand                         | Rice | Wet season          | Dry season                 |               |
| Viet Nam                         | Rice | Wet season (Autumn) | Dry season (Winter/Spring) |               |

| Central & South Asia |       |                |                |               |
|----------------------|-------|----------------|----------------|---------------|
| Country              | Crop  | Season 1 Name  | Season 2 Name  | Season 3 Name |
| Afghanistan          | Wheat | Winter-planted | Spring-planted |               |
| Kazakhstan           | Wheat | Winter-planted | Spring-planted |               |
| Kyrgyzstan           | Wheat | Winter-planted | Spring-planted |               |
| Tajikistan           | Wheat | Winter-planted | Spring-planted |               |

**i Sources and Disclaimers:**

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More detailed information on the GEOGLAM crop assessments is available at [www.cropmonitor.org](http://www.cropmonitor.org)

**Crop Season Nomenclature:**

*In countries that contain multiple cropping seasons for the same crop, the following charts identifies the national season name associated with each crop season within the Crop Monitor for Early Warning.*

| Central America & Caribbean |       |               |               |               |
|-----------------------------|-------|---------------|---------------|---------------|
| Country                     | Crop  | Season 1 Name | Season 2 Name | Season 3 Name |
| Cuba                        | Rice  | Main season   | Second season |               |
| El Salvador                 | Beans | Primera       | Postrera      |               |
| El Salvador                 | Maize | Primera       | Segunda       |               |
| Guatemala                   | Beans | Primera       | Postrera      | Apante        |
| Guatemala                   | Maize | Primera       | Segunda       |               |
| Haiti                       | Maize | Main season   | Second season |               |
| Honduras                    | Beans | Primera       | Postrera      |               |
| Honduras                    | Maize | Primera       | Segunda       |               |
| Nicaragua                   | Beans | Primera       | Postrera      | Apante        |


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### Early Warning partners



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