

Tropical Storm Ana makes +100 victims in S-E Africa

Sentinel-1 CSAR IW acquired on 14 January 2022 from 03:16:09 to 03:16:34 UTC

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Sentinel-3 SLSTR RBT acquired on 20 January 2022 from 05:38:10 to 07:19:09 UTC and from 18:10:04 to 20:33:33 UTC

Sentinel-1 CSAR IW acquired on 26 January 2022 from 03:16:09 to 03:16:34 UTC

Sentinel-3 SLSTR RBT acquired on 26 January 2022 from 07:02:32 to 08:07:01 UTC

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[3D Layerstack](#)

Fig. 1 - S3 SLSTR (20.01.2022 am) - View of tropical storm Ana at its beginning in the South-West Indian Ocean.

[3D view](#)

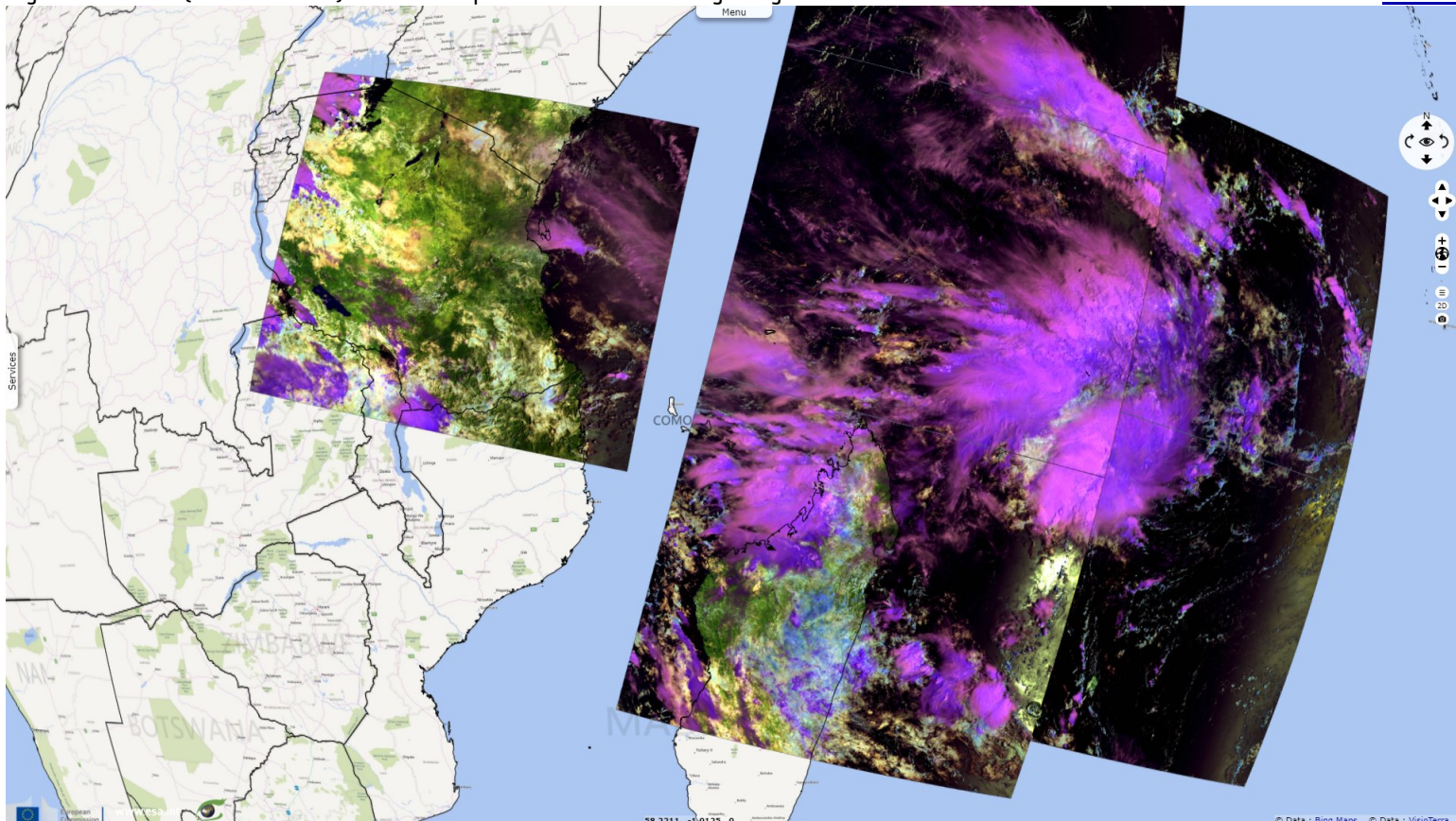


Fig. 2 - S3 SLSTR (22.01.2022 am) - It made landfall on Madagascar on 22 January 2022.

[3D view](#)

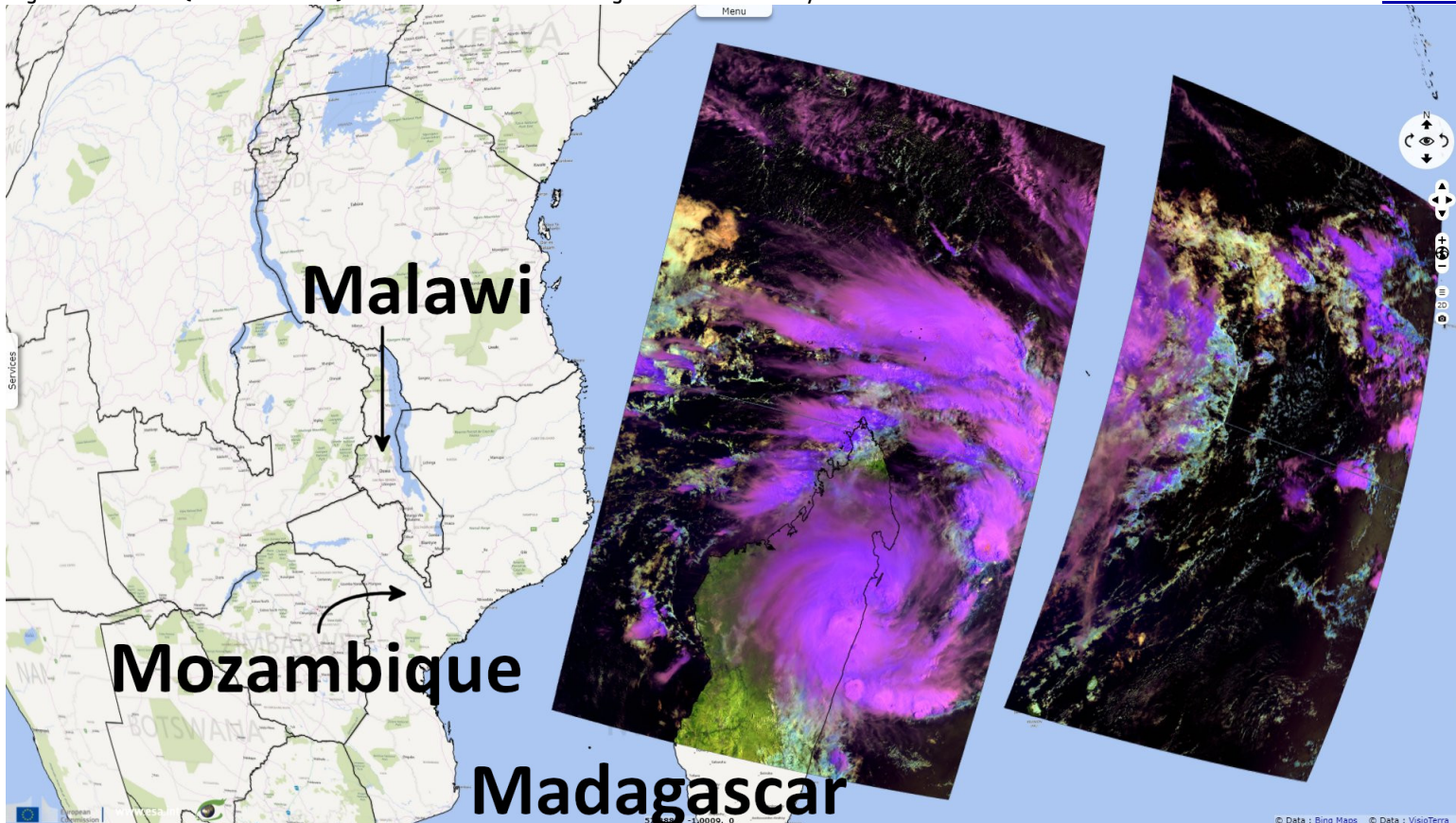
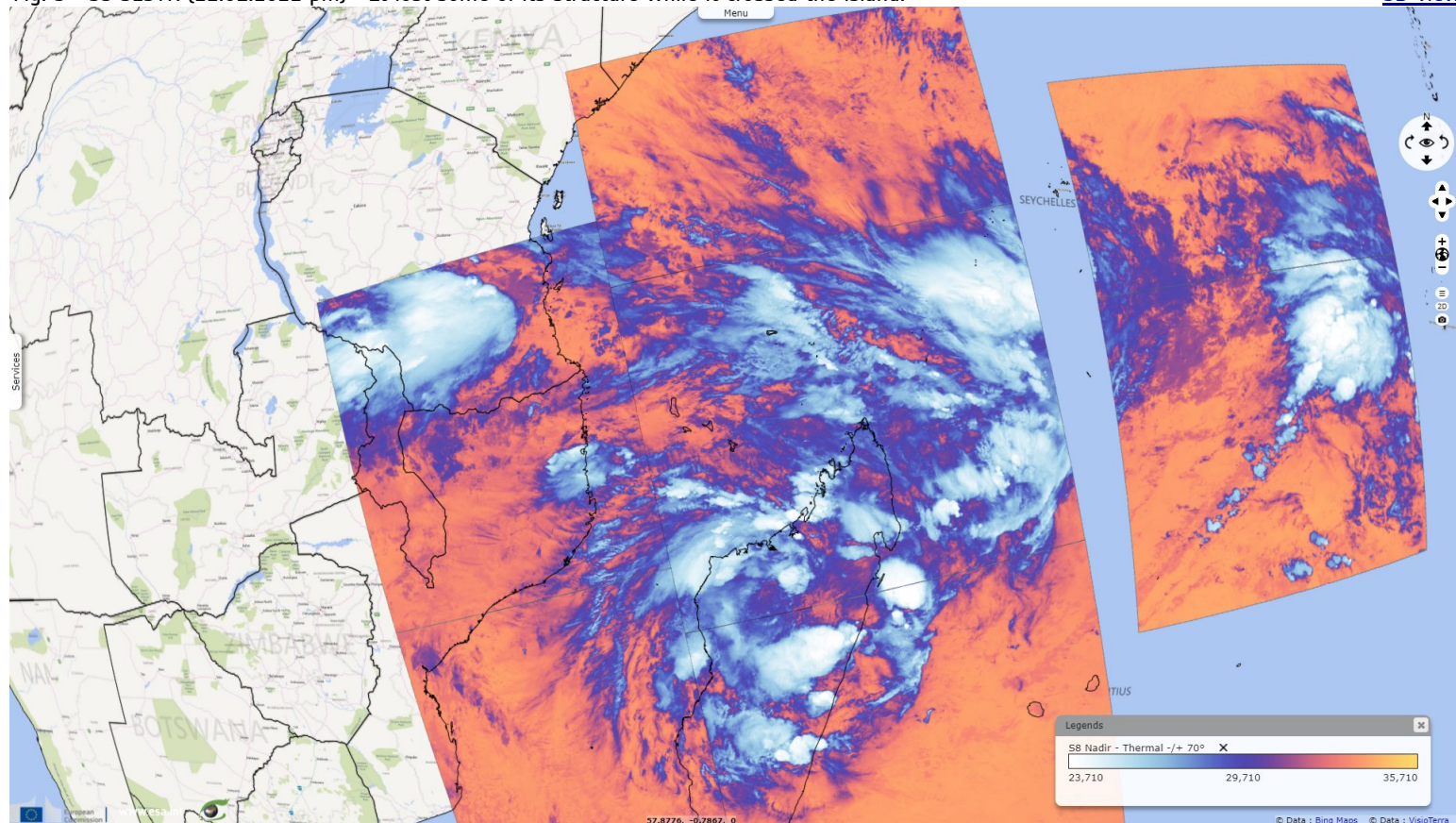


Fig. 3 - S3 SLSTR (22.01.2022 pm) - It lost some of its structure while it crossed the island.

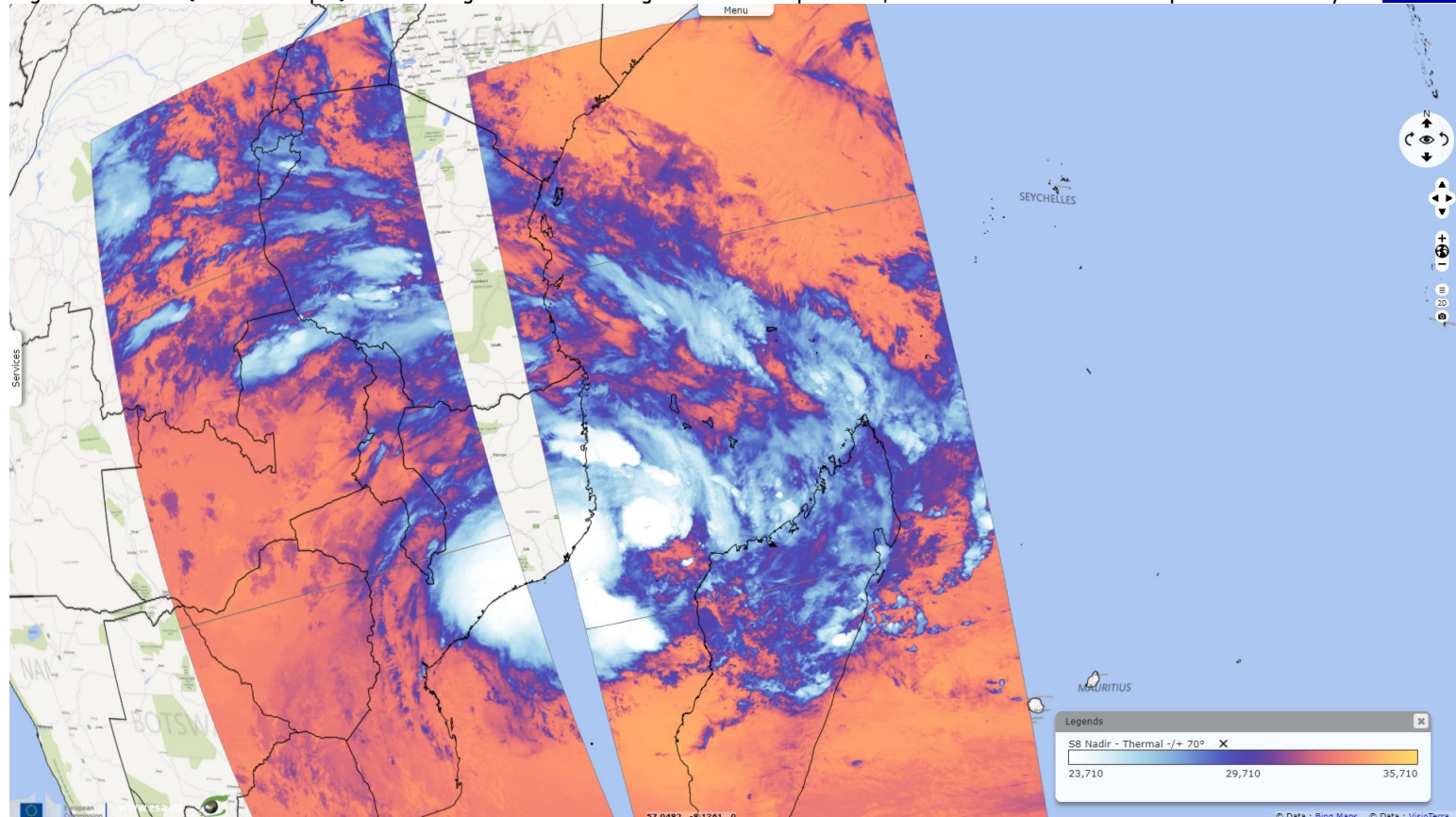
[3D view](#)



Moderate Tropical Storm Ana was a deadly tropical cyclone that affected Madagascar and Mozambique. It was the the first named storm of the 2021–22 South-West Indian Ocean cyclone season. Despite its modest wind speed of the 95 km/h 1-minute sustained, it caused the death of at least 115 persons among four countries.

Fig. 4 - S3 SLSTR (23.01.2022 pm) - After it regained some strength in Mozambique Canal, it made landfall in Mozambique on 24 January.

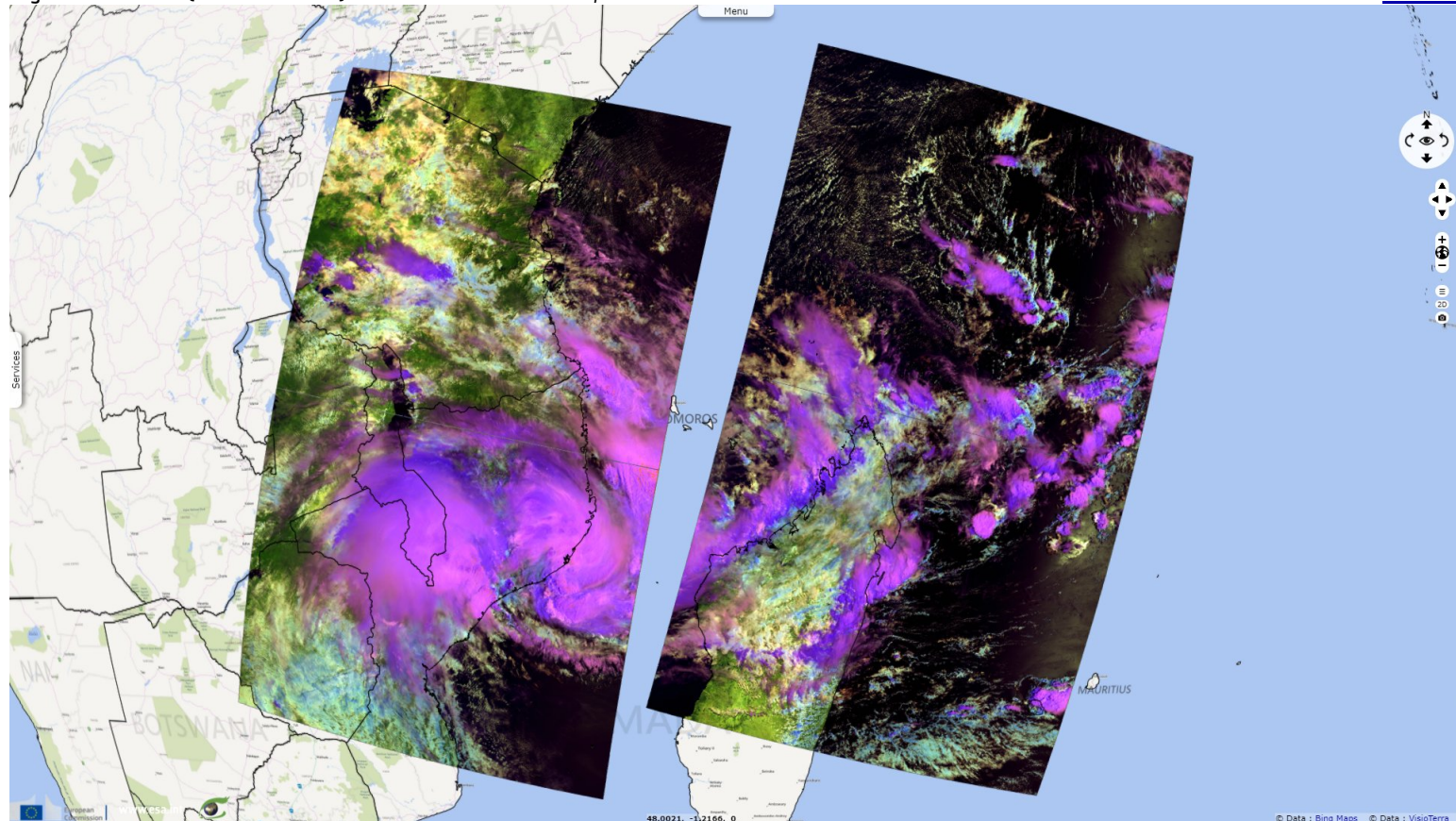
[3D view](#)



ACAPS, independent specialists in humanitarian needs analysis and assessment, detailed the impact of Ana in each country. Ana made its first landfall on Madagascar, they [explain](#): "Tropical cyclone Ana, which formed in the Indian Ocean, made landfall in northern Madagascar on 22 January, increasing flooding and landslides that had already been affecting the country since 17 January. The most affected region is Analamanga – particularly Antananarivo, the capital city."

Fig. 5 - S3 SLSTR (24.01.2022 am) - It also affected Malawi, further inland.

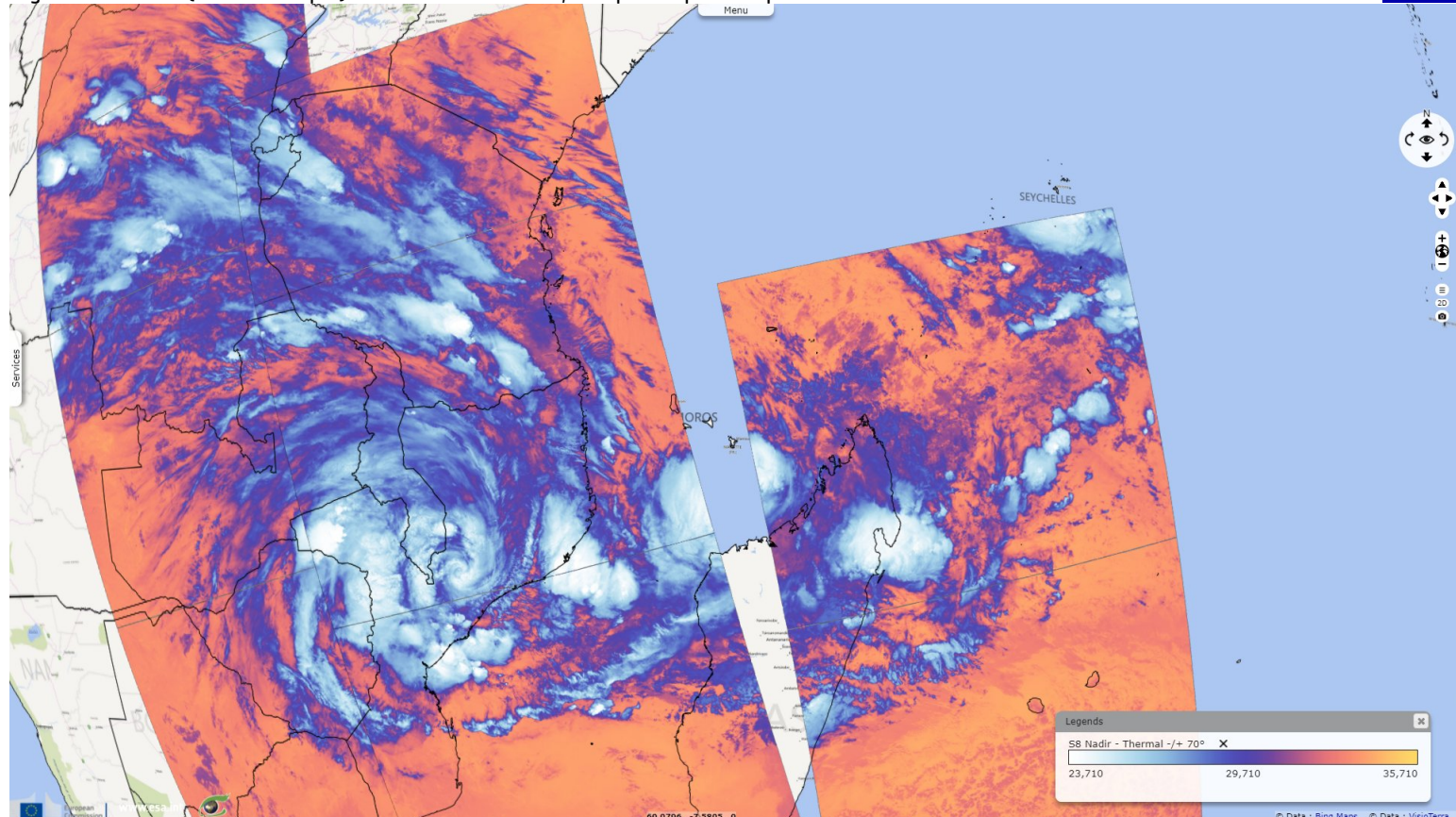
[3D view](#)



"Close to 60 houses are completely destroyed, and 6800 have been flooded. Many other structures are at risk of collapsing or flooding. Heavy rainfall is expected to continue, hampering recovery efforts and delaying the delivery of humanitarian aid. Shortages of fuel and other basic items are likely in the coming weeks."

Fig. 6 - S3 SLSTR (24.01.2022 pm) - Even once over land, it kept its spiral shape for some time.

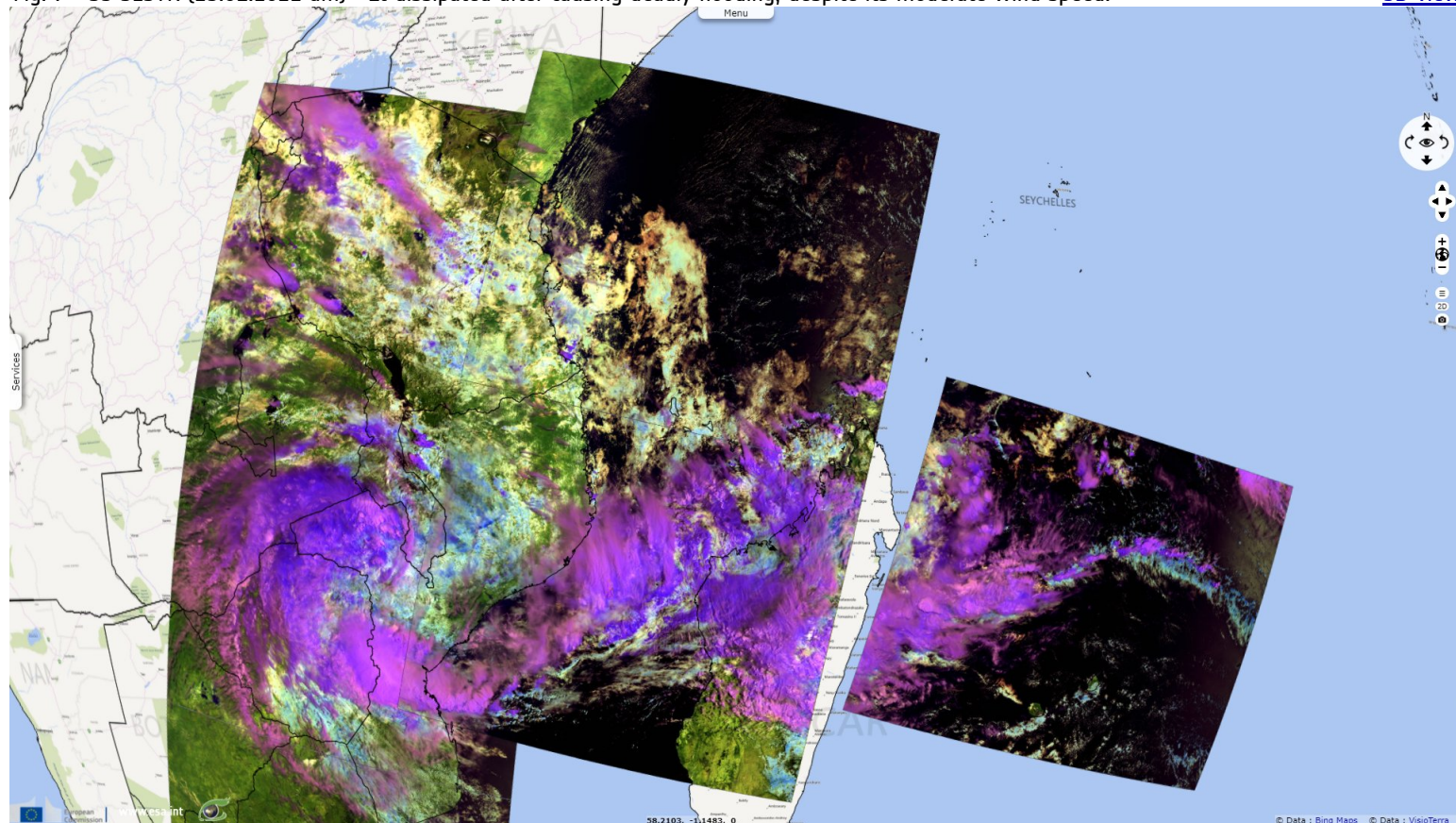
[3D view](#)



ReliefWeb, a humanitarian information service provided by the United Nations Office for the Coordination of Humanitarian Affairs (OCHA), [updated](#) the toll: "In Madagascar, Tropical Storm Ana killed at least 58 people and affected at least 131 000, including 71 000 people who were displaced."

Fig. 7 - S3 SLSTR (25.01.2022 am) - It dissipated after causing deadly flooding, despite its moderate wind speed.

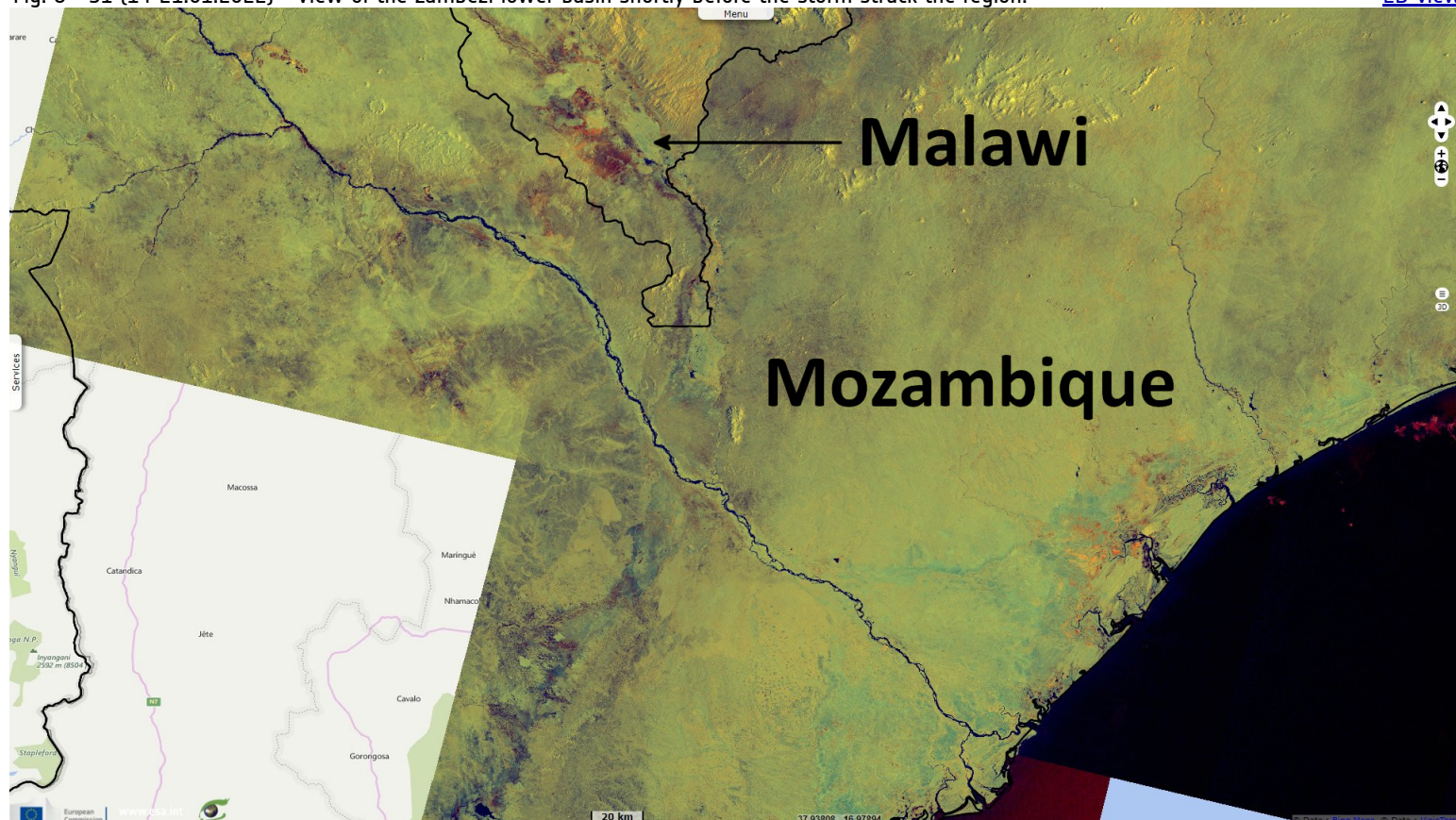
[3D view](#)



Ana then crossed the Mozambique Canal and made landfall in Mozambique, ACAPS [analyzed](#) the situation: "*Tropical Storm Ana made landfall in Mozambique on 24 January, with sustained wind speed ranging from 100–130 km/h. Nampula, Tete, and Zambezia provinces were the worst hit, while Cabo Delgado, Niassa, and Sofala provinces were affected to a lesser extent. As at 1 February, the storm affected 141 483 people, killed 25, and injured 220.*"

Fig. 8 - S1 (14-21.01.2022) - View of the Zambezi lower basin shortly before the storm struck the region.

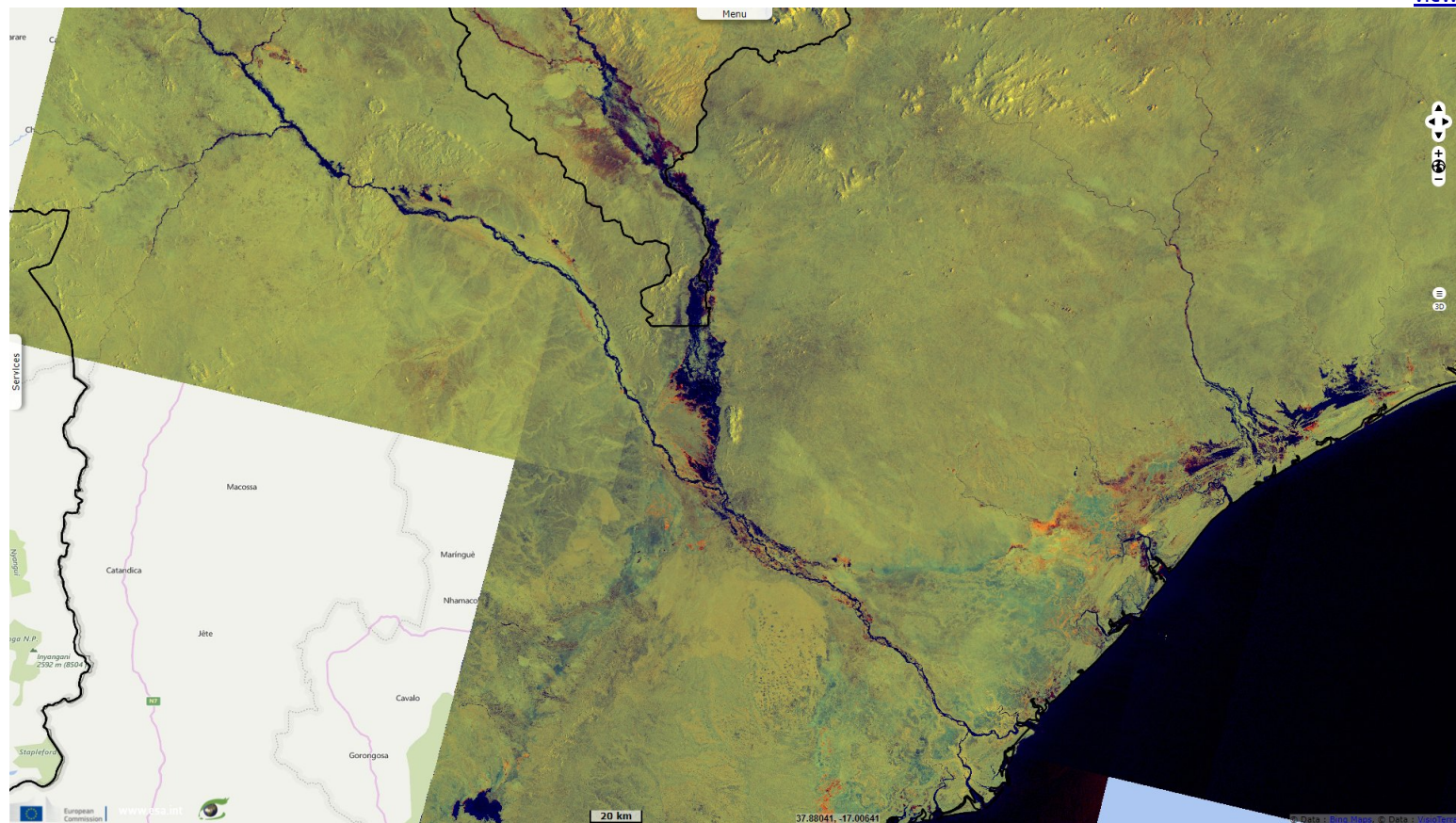
[2D view](#)



"The storm also destroyed at least 7700 houses and 2457 classrooms. It damaged 30 health centres, 23 water supply systems, 144 power poles, and around 2275km of roads. Besides representing high reconstruction costs, damages and destruction hampered access to services for the population in the affected areas. 70 982 hectares of land were flooded, including 37 930 hectares of cropland."

Fig. 9 - S1 (26.01.2021-02.02.2022) - The Shire river in Malawi, lower Zambezi and part of Mozambique coast were the most affected regions.

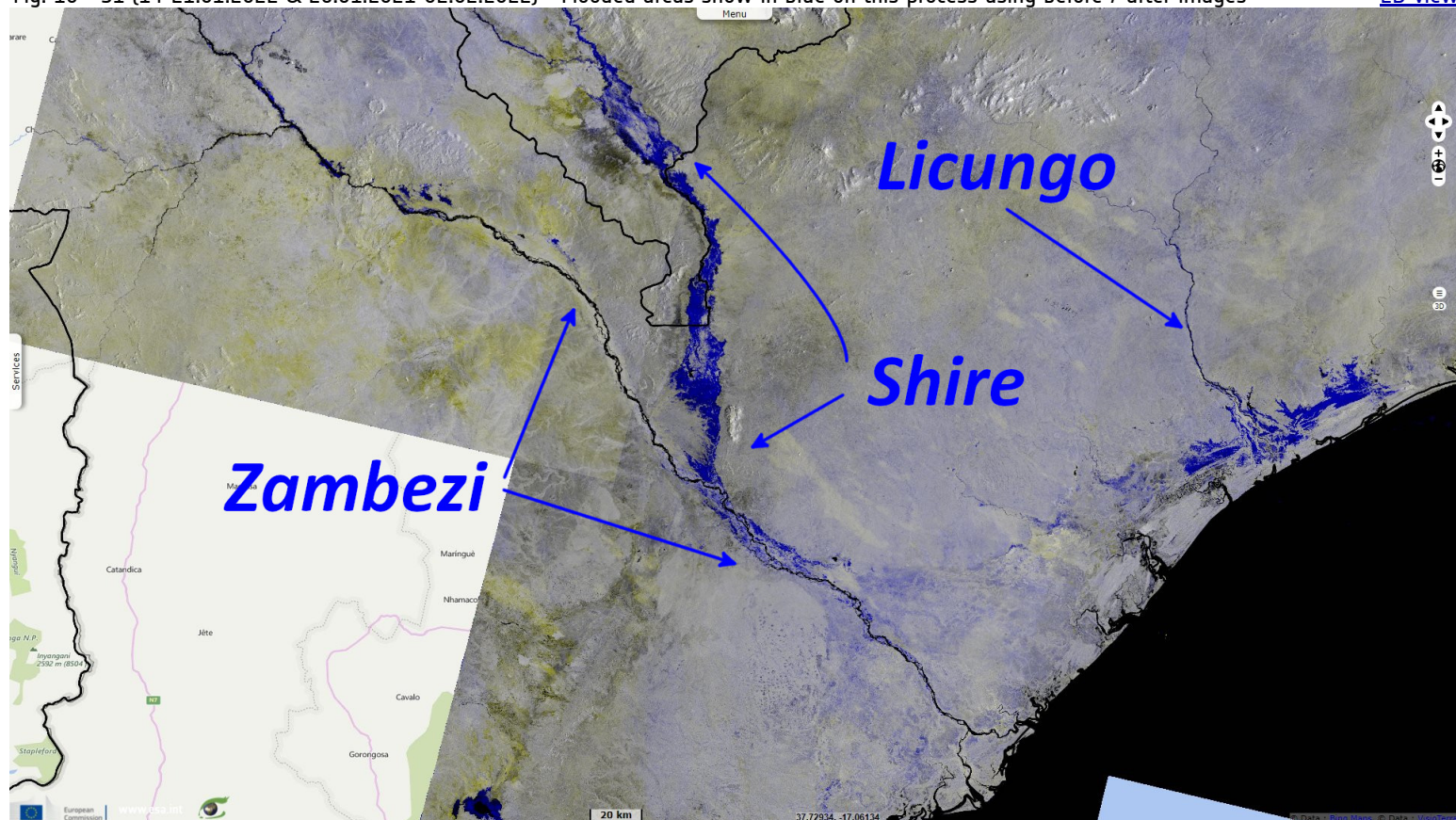
[2D view](#)



Malawi was also affected by Ana, the report [details](#): "Tropical Cyclone Ana, which formed in the Indian Ocean on 21 January, made landfall in Malawi on 24 January, bringing heavy rain and causing floods. The storm affected around 20 districts in the Southern and Central regions of Malawi. The most affected districts are Phalombe, Chiradzulu, Mulanje, and Chikwawa. At least 32 people were killed and 147 injured as at 30 January."

Fig. 10 - S1 (14-21.01.2022 & 26.01.2021-02.02.2022) - Flooded areas show in blue on this process using before / after images

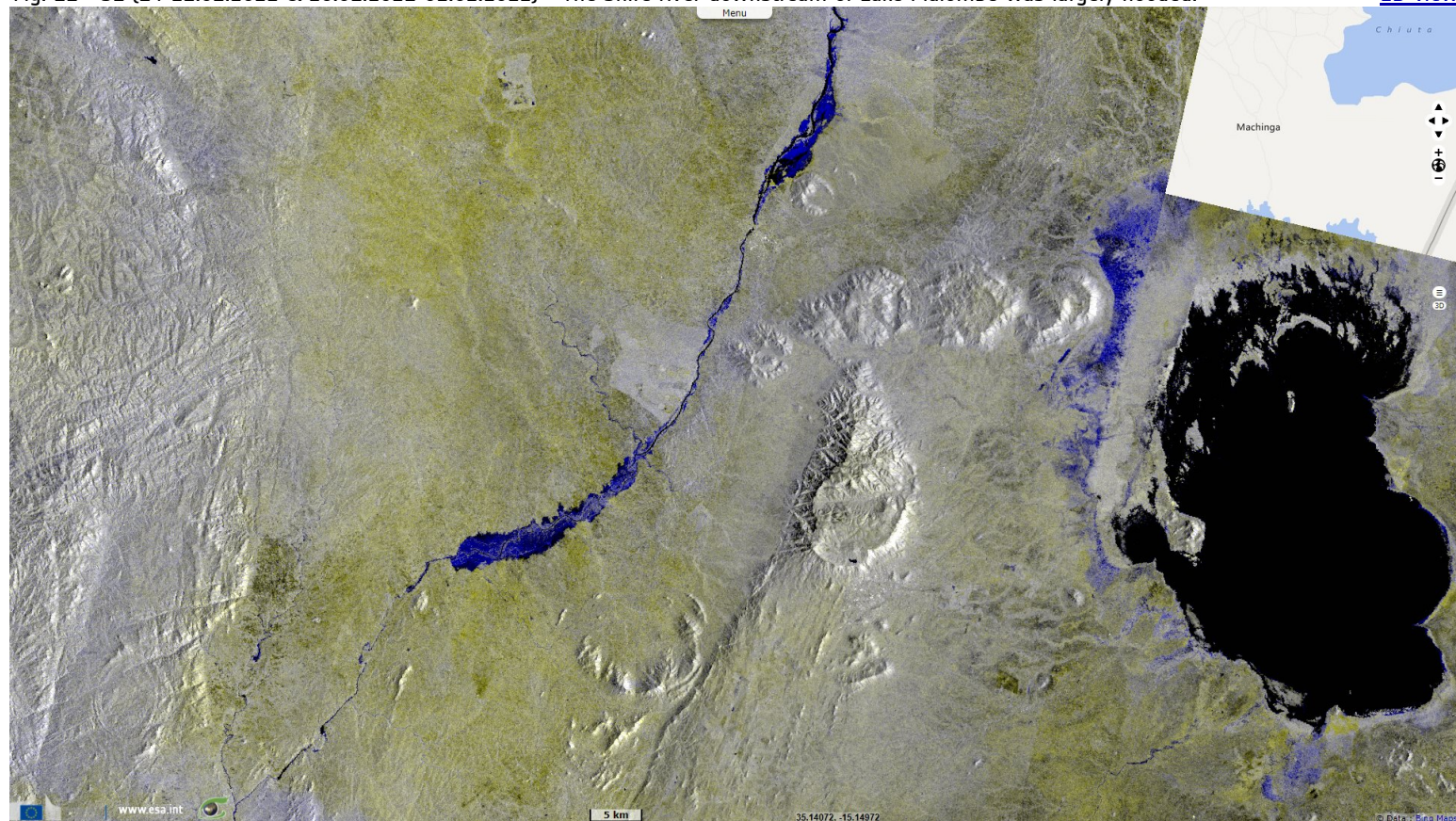
[2D view](#)



"The storm caused damage to infrastructure including electricity generators, resulting in power cuts. Water pumping operations in Blantyre district were affected by the power cuts, leaving people without drinking water and electricity."

Fig. 11 - S1 (14-21.01.2022 & 26.01.2021-02.02.2022) - The Shire river downstream of Lake Malombe was largely flooded.

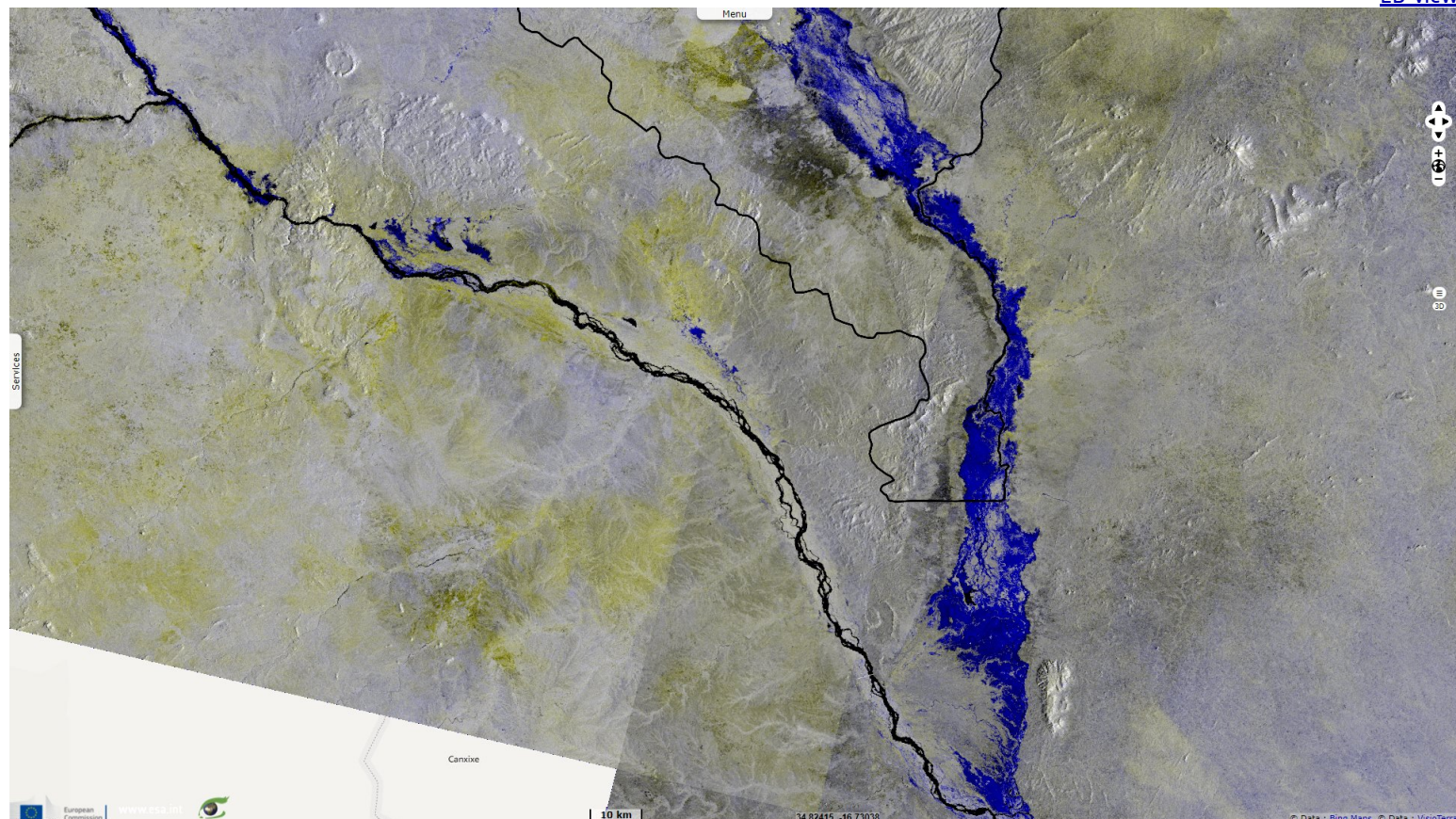
[2D view](#)



"As at 28 January, close to 414 000 people (92 000 households) have been affected Cyclone Ana and subsequent floods and heavy rain. More than 76 000 people (17 000 households) have been displaced. Floods have also destroyed a bridge in Chikwawa district, leaving an unknown number of people stranded before boats were sent to rescue them. It is estimated that flooding damaged about 34 000 hectares of cropland, increasing the risk of below-average harvest in March 2022."

Fig. 12 - S1 (14-21.01.2022 & 26.01.2021-02.02.2022) - Further downstream, the Shire is largely swollen, affecting the Zambezi after then confluence.

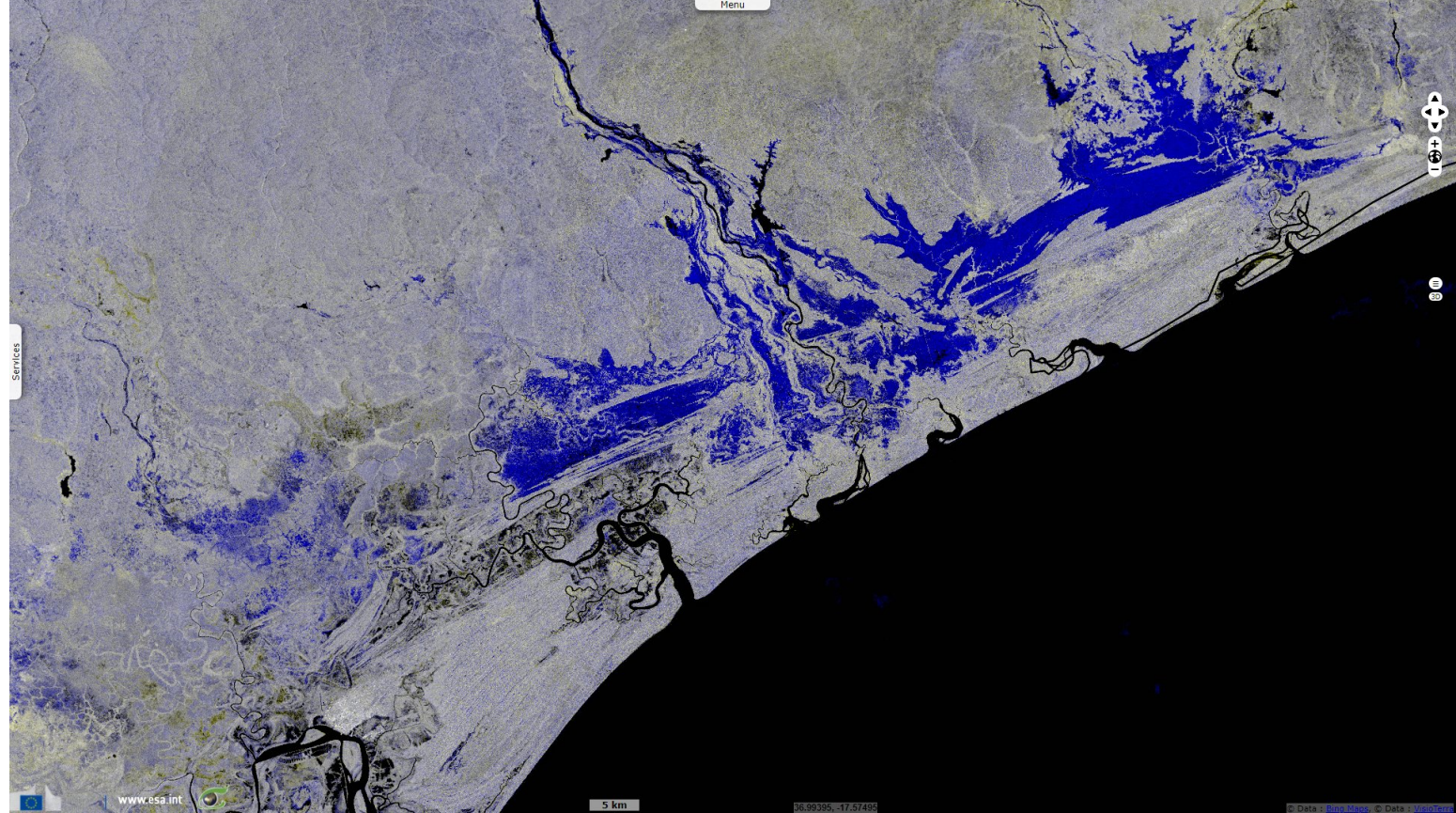
[2D view](#)



ReliefWeb [completes](#): "According to the Government of Malawi – Department of Disaster Management Affairs (DoDMA) as of 31 January, 37 people have been reported dead, 22 missing and 158 injured. Over 193 558 households (948 434 people) are affected, and 740 hectares of crops have been destroyed."

Fig. 13 - S1 (14-21.01.2022 & 26.01.2021-02.02.2022) - The coastal region close to the mouth of Licungo river was also flooded.

[2D view](#)



Meanwhile, weather services in the region have warned of another storm building in the Indian Ocean, which may materialise in the coming days [it became Intense Tropical Cyclone Batsirai]. More storms would usually be expected before the end of the season in two months' time.

The views expressed herein can in no way be taken to reflect the official opinion of the European Space Agency or the European Union.
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