

 **EMSR847 - AOI26**
Tropical storm Melissa in the Caribbean
ARLINGTON

Situation as of 02/11/2025 12:16 UTC
Grading MONIT02 - Overview map 01



 **Blocked road / interruption**
4 No.

 **Flooded area**
184.2 ha




 **Potentially affected population**
~ 500

Affected Built-up and Transportations




 **Built-Up**
5,719 No.

 **Road**
0.8 km






Crisis Information

-  Blocked road / interruption
-  Flooded Area
-  Flood trace




Built Up Grading

-  Destroyed
-  Damaged
-  Possibly damaged


Transportation Grading

-  Road, Destroyed
-  Road, Possibly damaged
-  Main road, No visible damage
-  Local road, No visible damage
-  Track, No visible damage

General Information

-  Area of Interest
-  Detail map
-  Not Analysed

Hydrography

-  Lake, River

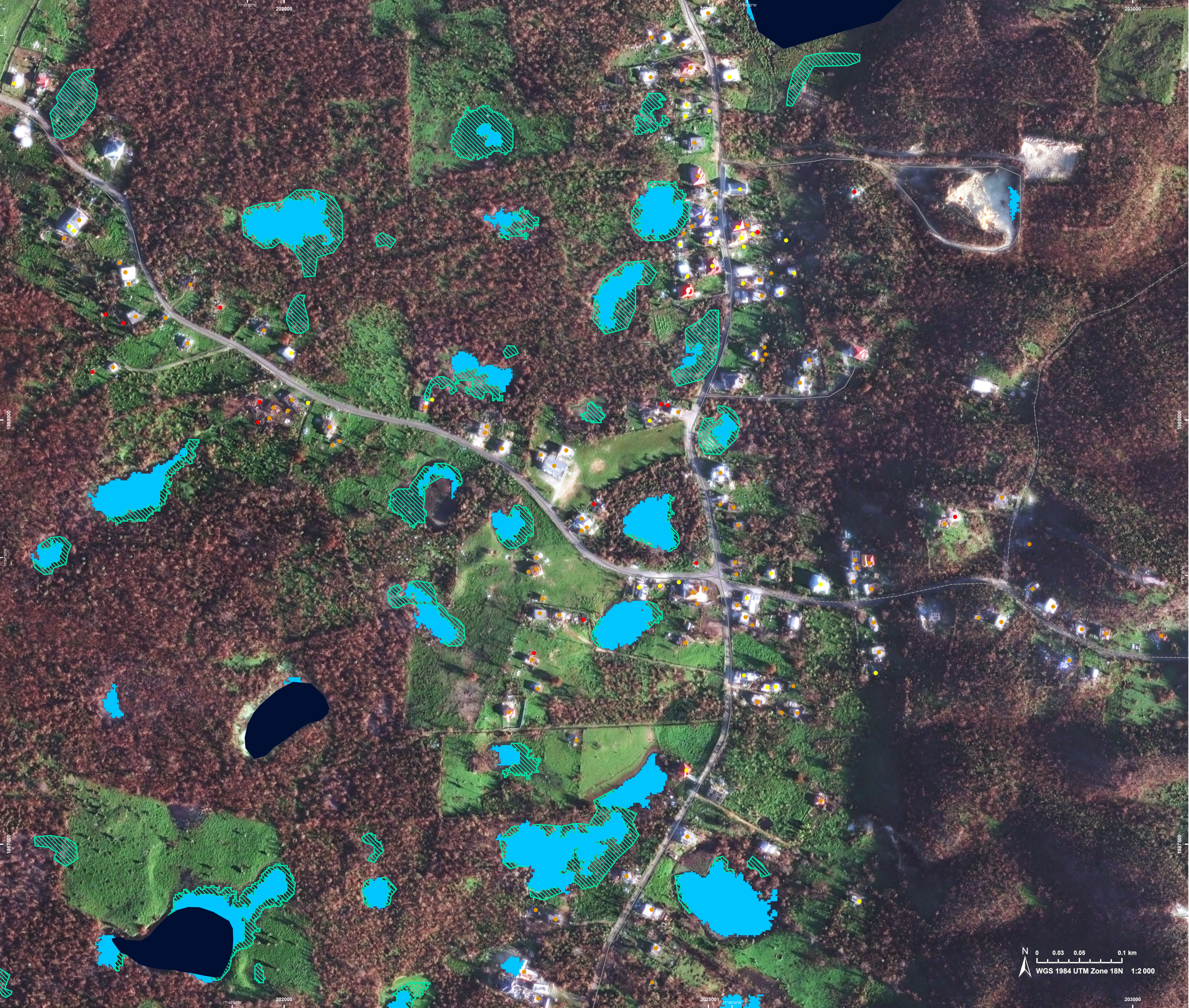
Event: On 25 October 2025 at 20:00, Tropical Storm Melissa is forecast to affect Jamaica and the southern peninsula of Haiti. The event is expected to cause damage to housing, infrastructure, and transport networks due to heavy rainfall, strong winds, flooding, and landslides. Hurricane conditions are forecast for Jamaica during the weekend and subsequently for the southern peninsula of Haiti and Cuba. Copernicus EMS Rapid Mapping is requested to provide flood extent and damage assessment emergency mapping.

Data sources and analysis:
Pre-event image: WorldView-3 © Vantor (2025), provided by European Space Imaging (acquired on 09/02/2025 at 15:40 UTC, resolution 0.5 m).
Post-event image: Legion © Vantor (2025), provided by European Space Imaging (acquired on 02/11/2025 at 12:16 UTC, resolution 0.4 m).
This image is used as background image.
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The thematic layer has been derived from post-event satellite image using a semi-automatic approach.

Map produced by SERTIT released by e-GEOS on the 03/11/2025.










Details on this activation and service conditions available through the QR code or at the link: <https://mapping.emergency.copernicus.eu/activations/EMSR847>



 **EMSR847 - AOI26**
Tropical storm Melissa in the Caribbean
ARLINGTON

Situation as of 02/11/2025 12:16 UTC
Grading MONIT02 - Detail map 02



- | | |
|--|---|
|  Flooded Area | Transportation Grading |
|  Flood trace |  Local road, No visible damage |
| Built Up Grading |  Track, No visible damage |
|  Destroyed | General Information |
|  Damaged |  Area of Interest |
|  Possibly damaged | Hydrography |
| |  Lake, River |

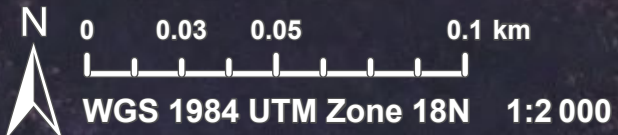
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 **EMSR847 - AOI26**
Tropical storm Melissa in the Caribbean
ARLINGTON

Situation as of 02/11/2025 12:16 UTC
Grading MONIT02 - Detail map 03



- | | |
|--|---|
|  Flooded Area | Transportation Grading |
|  Flood trace |  Local road, No visible damage |
| Built Up Grading | General Information |
|  Destroyed |  Area of Interest |
|  Damaged | Hydrography |
|  Possibly damaged |  Lake, River |

Event: On 25 October 2025 at 20:00, Tropical Storm Melissa is forecast to affect Jamaica and the southern peninsula of Haiti. The event is expected to cause damage to housing, infrastructure, and transport networks due to heavy rainfall, strong winds, flooding, and landslides. Hurricane conditions are forecast for Jamaica during the weekend and subsequently for the southern peninsula of Haiti and Cuba. Copernicus EMS Rapid Mapping is requested to provide flood extent and damage assessment emergency mapping.

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 **EMSR847 - AOI26**
Tropical storm Melissa in the Caribbean
ARLINGTON

Situation as of 02/11/2025 12:16 UTC
Grading MONIT02 - Detail map 04



- | | |
|--|---|
|  Flooded Area | Transportation Grading |
|  Flood trace |  Local road, No visible damage |
| Built Up Grading | General Information |
|  Destroyed |  Area of Interest |
|  Damaged | Hydrography |
|  Possibly damaged |  Lake, River |

Event: On 25 October 2025 at 20:00, Tropical Storm Melissa is forecast to affect Jamaica and the southern peninsula of Haiti. The event is expected to cause damage to housing, infrastructure, and transport networks due to heavy rainfall, strong winds, flooding, and landslides. Hurricane conditions are forecast for Jamaica during the weekend and subsequently for the southern peninsula of Haiti and Cuba. Copernicus EMS Rapid Mapping is requested to provide flood extent and damage assessment emergency mapping.

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Consequences within the AOI

| | | | LATEST IMPACT | |
|--------------------|-----------------------------|--|---------------------|-----------------------|
| | | | Unit of measurement | EO-based observation* |
| Crisis information | Flood trace | | ha | 966.4 |
| | Flooded area | | ha | 184.2 |
| | Blocked road / interruption | | No. | 4 |
| | Maximum of all extents** | | ha | 1 154.6 |

| | | | | Destroyed | Damaged | Possibly damaged*** | Total affected**** | Total in AOI |
|----------------------|----------------|--|-----|-----------|---------|---------------------|--------------------|--------------|
| Estimated population | | Inhabitants | No. | | | | ~ 500 | ~ 11 000 |
| Assets | Built-up | Residential Buildings | No. | 761 | 2 517 | 2 408 | 5 686 | 7 278 |
| | | Other non-residential buildings | No. | 0 | 10 | 23 | 33 | 76 |
| | Transportation | Secondary Road | km | 0 | 0 | 0 | 0 | 24.2 |
| | | Local Road | km | 0.4 | 0 | 0.4 | 0.8 | 147.6 |
| | | Cart Track | km | 0 | 0 | 0 | 0 | 24.3 |
| | Facilities | Constructions for mining or extraction | ha | 0 | 0 | 0 | 0 | 2.1 |
| | Land use | Inland wetlands | ha | | | | 747.7 | 2 093.0 |
| | | Shrub and/or herbaceous vegetation association | ha | | | | 241.6 | 4 309.5 |
| | | Forests | ha | | | | 154.7 | 4 084.6 |
| | | Other | ha | | | | 5.0 | 439.3 |
| | | Heterogeneous agricultural areas | ha | | | | 1.5 | 111.4 |

* Corresponds to the water surface observed in the most recent satellite imagery, excluding permanent water.

** Corresponds to the geographic union (and NOT the sum) of all Crisis Information layers.

*** It is intersected with the population and asset datasets to estimate the impacts.

**** Sum of all damage classes

Disclaimer:

Full disclaimer and other helpful information available in the online manual:

<https://mapping.emergency.copernicus.eu/about/rapid-mapping-manual/>

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Data Access:

All data displayed on the map(s), as well as Land Use - Land Cover layer(s), are available in the Crisis Information Package and the Base Layer Package (for reference data). The table above is available in editable format in the Crisis Information Package. All products and data are also available for download on the portal.

Estimated Population:

Estimated population is based on Copernicus Global Human Settlement Layer (GHSL) dataset. Additional population datasets and analysis are available in the summary table.

Data Sources:

Base Vector Layers: OpenStreetMap © OpenStreetMap contributors (2025); Wikimapia.org; GeoNames 2015; Global Administrative Areas (2022), refined by the producer, Globe Land 30 (2010), Copernicus Global Land Service: Land Cover (2019).

Inset Maps: Natural Earth 2023; HydroLAKES 2016 by HydroSHEDS;

© EuroGeographics, © TurkStat. Source: European Commission – Eurostat/GISCO, 2021.

Digital Elevation Model:

FABDEM (ForestAndBuildingsremovedCopernicusDEM) removes building and tree height biases from the Copernicus GLO 30

Digital Elevation Model (DEM) (Airbus, 2020).

Access to the portal

