



8 APRIL 2020

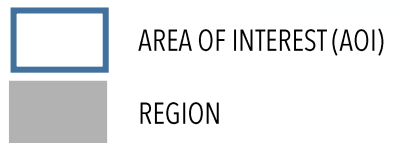
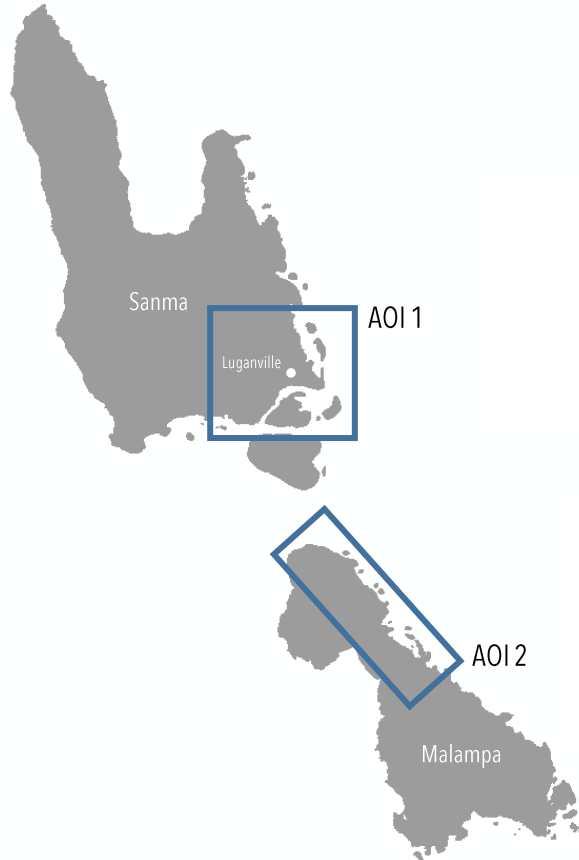
**PRELIMINARY SATELLITE-DERIVED DAMAGE ASSESSMENT  
SANMA AND MALAMPA PROVINCES, VANUATU**

STATUS: Evidences of damaged building detected

FURTHER ACTION(S): CONTINUE MONITORING



## OVERVIEW / BASED ON AOIs ASSESSED



Date of assessment validity:

### Impact and severity\*:

- undetected
- limited impact potentially detected
- significant impact potentially detected

### Data sources:

(1) pre-event (reference) image:  
Google Earth

(2) post-event images:  
Pleiades, 7 April 2020, CNES (2020), distribution  
Airbus D&S

(3) baseline data

- Administrative boundaries: OCHA  
ROP

### Potentially affected elements at risk (indicate all that are applicable):

- buildings - residential
- buildings - commercial/ industry
- vulnerable structures (e.g. schools, hospitals, water, sanitation, power stations,
- internally displaced persons (IDP) camps
- transportation network
- agriculture
- other:

\* disclaimer (i.e. assessment has yet to be validated with field-based information)

## AOI 1 LUGANVILLE MUNICIPALITY, SANMA PROVINCE, VANUATU : DAMAGED STRUCTURES



Image Center :  
167°10'35.586"E  
15°36'23.226"S



Google Earth / 24 JUNE 2016



Pleiades / 7 APRIL 2020



## AOI 1 LUGANVILLE MUNICIPALITY, SANMA PROVINCE, VANUATU : DAMAGED STRUCTURES



Image Center :  
167°10'4.249"E  
15°31'9.179"S



Google Earth / 17 NOVEMBER 2018



Pleiades / 7 APRIL 2020



## AOI 1 LUGANVILLE MUNICIPALITY, SANMA PROVINCE, VANUATU : DAMAGED STRUCTURES



Image Center :  
167°10'57.066"E  
15°30'29.398"S



Google Earth / 17 NOVEMBER 2018



Pleiades / 7 APRIL 2020



## AOI 1 LUGANVILLE MUNICIPALITY, SANMA PROVINCE, VANUATU : DAMAGED STRUCTURES



Image Center :  
167°11'24.189"E  
15°30'32.21"S



Google Earth / 17 NOVEMBER 2018



Pleiades / 7 APRIL 2020



## AOI 1 LUGANVILLE MUNICIPALITY, SANMA PROVINCE, VANUATU : DAMAGED STRUCTURES



Image Center :  
167°12'19.631"E  
15°30'52.934"S



Google Earth / 27 APRIL 2016



Pleiades / 7 APRIL 2020



## AOI 1 LUGANVILLE MUNICIPALITY, SANMA PROVINCE, VANUATU : DAMAGED STRUCTURES



Image Center :  
167°13'12.067"E  
15°30'59.808"S



Google Earth / 27 APRIL 2016



Pleiades / 7 APRIL 2020



## AOI 1 LUGANVILLE MUNICIPALITY, SANMA PROVINCE, VANUATU : DAMAGED STRUCTURES



Google Earth / 27 APRIL 2016



Pleiades / 7 APRIL 2020

Image Center :  
167°13'7.658"E  
15°30'29.251"S

## AOI 1 LUGANVILLE MUNICIPALITY, SANMA PROVINCE, VANUATU : DAMAGED STRUCTURES



Image Center :  
167°13'17.461"E  
15°27'51.162"S



Google Earth / 27 APRIL 2016



Pleiades / 7 APRIL 2020



## AOI 1 LUGANVILLE MUNICIPALITY, SANMA PROVINCE, VANUATU : DAMAGED STRUCTURES



Image Center :  
167°12'35.467"E  
15°27'33.808"S

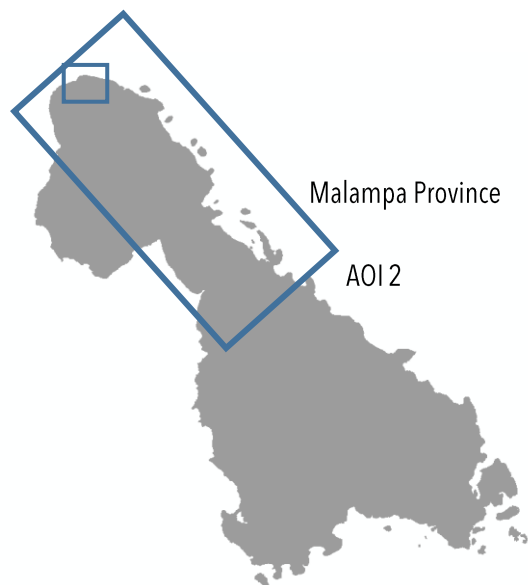


Google Earth / 27 APRIL 2016



Pleiades / 7 APRIL 2020

## AOI 2 NORTH WEST MALEKULA MUNICIPALITY, MALAMPA PROVINCE, VANUATU : POTENTIALLY DAMAGED STRUCTURES



Google Earth / 27 APRIL 2016



Pleiades / 7 APRIL 2020

Image Center :  
167°12'48.76" E  
15°53'19.382" S



## AOI 2 NORTH WEST MALEKULA MUNICIPALITY, MALAMPA PROVINCE, VANUATU : NO VISIBLE DAMAGE

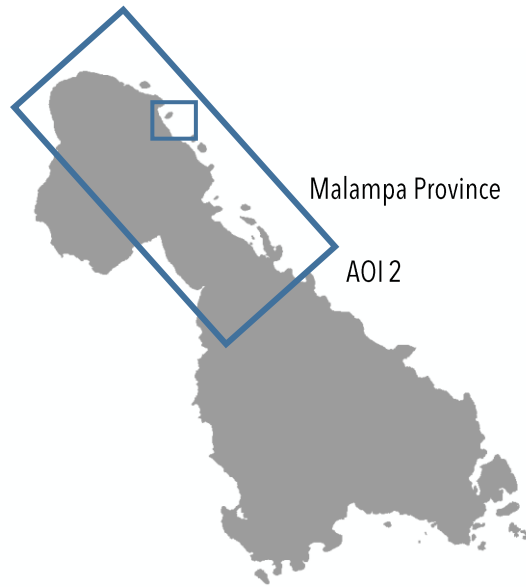
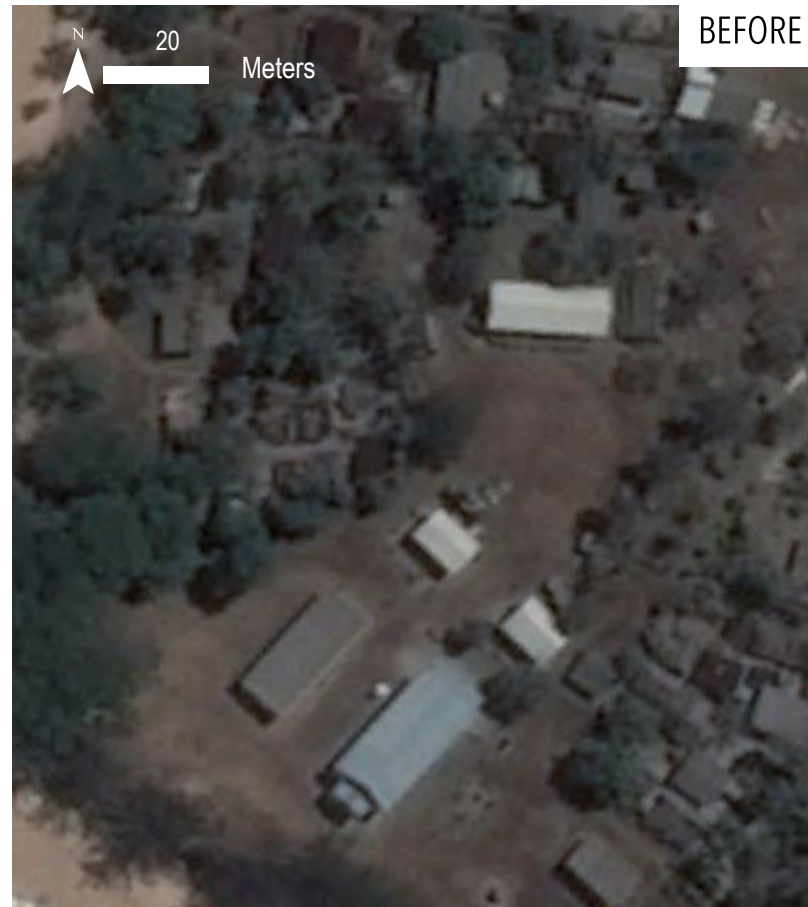


Image Center :  
167°20'18.082"E  
15°56'38.744"S

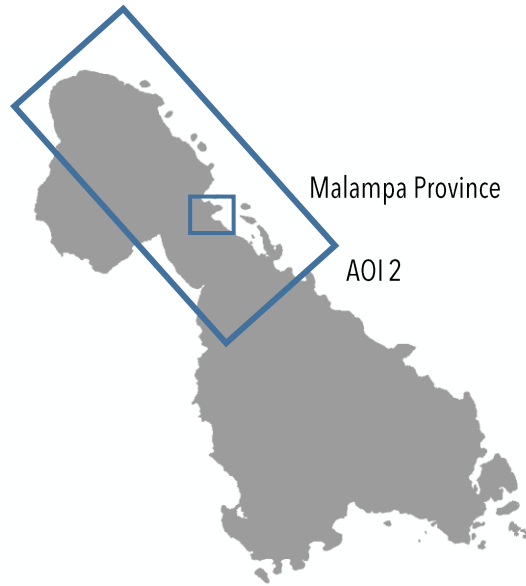


Google Earth / 18 FEBRUARY 2018



Pleiades / 7 APRIL 2020

## AOI 2 CENTRAL MALEKULA MUNICIPALITY, MALAMPA PROVINCE, VANUATU : NO VISIBLE DAMAGE



Google Earth / 26 JULY 2018



Pleiades / 7 APRIL 2020

Image Center :  
167°24'51.243"E  
16°4'26.053"S



## SUMMARY OF PRELIMINARY OBSERVATIONS AND FURTHER ACTIONS

**Date of assessment validity: 8 April 2020**

### **Preliminary observations, impact and severity \*:**

- Evidence of widespread damage observed in several locations of Espiritu Santo island, Luganville, Canal-Fanafo and South East Santo of Sanma Province (AOI1);
- Damaged buildings and agriculture lands affected east of Malakula island in Malampa Province (AOI 2);
- Most of the structural damage are ripped of roofs;
- Roof and structure debris made several road obstructions.

### **Further/ anticipated actions from UNOSAT:**

- no impact detected/ discontinue monitoring over specific AOI
- potential impact detected  continue monitoring over specific AOIs
- full assessment to be conducted
- more data and/ or information needed to confirm impact

\* disclaimer (i.e. assessment has yet to be validated with field-based information)