

Trishuli–Bhote Koshi Flood, August 2026

The Small Earth Nepal (SEN)

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University of Saskatchewan

Presentation/Discussion by John Pomeroy and Dhiraj Pradhananga

INARCH, 8-10 September 2026, Kananaskis, Alberta, Canada

Updates from the Govt. of Nepal

 Nepalese

4595

 Foreign nationals

303

Obtained Rescued Name List

4898



Government of Nepal
Ministry of Home Affairs
National Disaster Risk Reduction & Management Authority

Rasuwa Flood: Search, Rescue and Relief Update - 2026

As of, 9th September 2026, 11:00 AM



Human Casualties: 1,367

Bodies recovered at:

- Rasuwa : 174
- Tanahun : 38
- Nuwakot : 197
- Chitwan : 363
- Dhading: 70
- Nawalparasi East : 226
- Gorkha : 75
- Nawalparasi West : 222
- While undergoing treatment at Kathmandu : 2
(including various unidentified human remains)

Dead Body Handover : 102

For DNA testing, samples can be submitted at the concerned District Police Office with two photographs and proof of kinship.



Helicopter Flights

- Nepali Army : 21 (today)
- Total flights by Nepali Army as of Sep 8 : 1,264
- APF : 258



Injured Receiving Treatment

- Medical treatment at 10 different hospitals : 329 (discharged: 252)
- Medical treatment provided by Nepali Army: 3,535
- Medical treatment provided by APF : 3,287



Security Personnel Mobilised: 21,185

- Nepal Police : 7,975
- Nepali Army: 9,007
- Armed Police Force : 4,203



Relief Supplies

- Food and non-food relief materials continuously dispatched to affected districts by road and air; details recorded in the Authority's Setu App.
- Continued support from government/non-government agencies, private, development partners, civil society, and other stakeholders.



Cash Support from Nepal Government

- Rasuwa : NPR 10 Million
- Nuwakot : NPR 10 Million
- Dhading : NPR 5 Million
- 15 affected local governments: NPR 135 Million



Missing Persons: Around 5,132

- Missing from Rasuwa : 2,860
 - Citizens from Rasuwa : 1,393
 - Citizens from other districts : 1,286
 - Nepali Army : 45
 - Nepal Police : 25
 - Armed Police Force : 12
 - Government employees: 73
 - Bank and financial institution employees: 26
- Missing from Nuwakot : 1,787
 - Citizens from Nuwakot : 651
 - Citizens of other districts (excluding Rasuwa) : 1,136
- Foreign tourists: Around 587

(The number of dead body handover i.e 102 has been deducted from the total count of missing persons).



Rescued till date: 13,646



People at 37 Holding Centers: 3,628

- Rasuwa : 733
- Nuwakot : 2,699
- Dhading: 196



Psychosocial Counselling

- The Ministry of Health deployed more than 150 health personnel to the affected areas.



Fuel Supplies

Fuel stock in the affected area

- Diesel stock : 49,000 liters
- Petrol stock : 22,000 liters
- Aviation fuel stock : 15,000 liters
- LP gas cylinders: 457

Details of missing persons, people receiving treatment, and rescued persons can also be found on the Authority's Facebook page and website.

The above number of missing persons may also include unidentified bodies and rescued persons. The data is currently being verified.

26 August 2026

Science Exhibition
(morning)

Call from MFD, DHM

Susa, Kumar and the SEN
team

Meeting with NEA
(afternoon)
Call from the Ministry



Social Media Post



The Small Earth Nepal

3,362 followers

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🔔 When Will We Be Prepared?

Last year in 2025, Rasuwa, at the China-Nepal border, witnessed **devastating flooding** from a [#supraglacial](#) lake outburst. Yesterday (26 August 2026), another glacier-collapse triggered [#flooding](#) in the same region. **Two events, one clear warning:** the risks in our mountains are intensifying, and becoming harder to ignore.

Yesterday's massive **ice-rock avalanche** behind Langtang-Lirung Himal triggered a [#catastrophic](#) flood surge down the [#BhoteKoshi](#) and [#Trishuli](#) rivers, marking one of the highest-magnitude [#cryospheric](#) disasters ever recorded in the Bhotekoshi basin.

Over the past six years, Nepal witnessed a succession of climate and cryosphere-related disasters:

- Melamchi Flood (2021)
- Mustang Flood (2023)
- Manang Flood (2023)
- Thame GLOF (2024)
- Bagmati and Tributaries (2024)
- Pyurepu Supraglacial Lake Outburst Flood, Rasuwa Flood (2025)

So, how do we map the **Ticking Time Bombs** across the Himalayas? 🌍

We need better risk mapping, better observation network, timely and effective early warnings, transboundary cooperations and locally led preparedness.

⚠️ **The Himalayas are warning us!**

Confirmation!

5

WhatsApp



Kumar

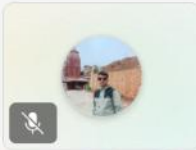
Today at 10:33 pm

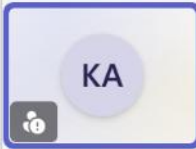


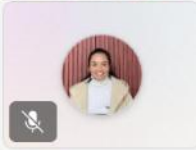
















2025
International
Year of Glaciers'
Preservation

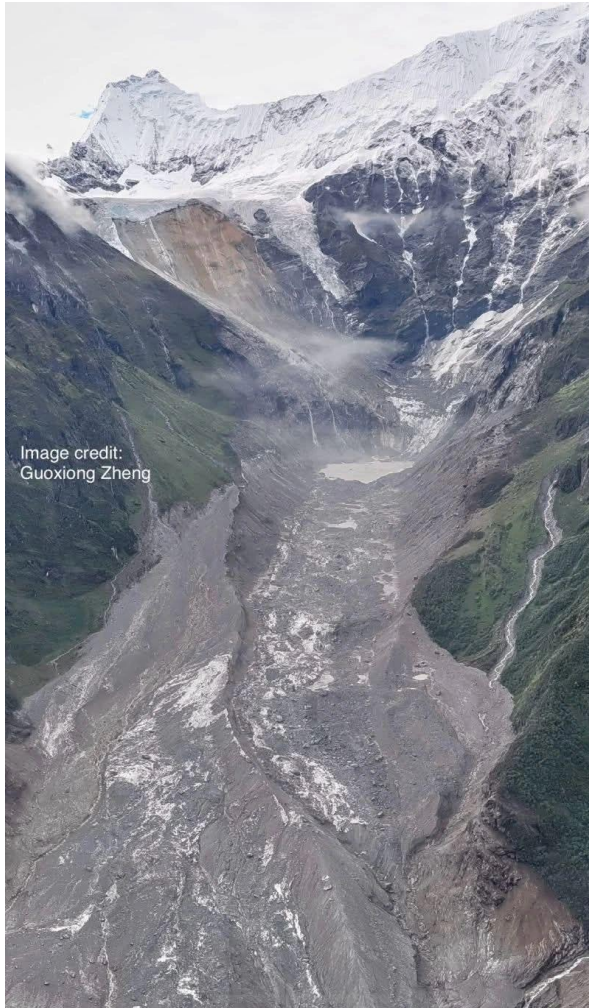


un-glaciers.org

Pomeroy, John



Imagery and Drone Footage



OPEN IMAGERY

Filter by date Sort

Clouds ≤ 50% Sentinel-2

30 Aug 2026
Satellite: CBERS-4 (MUX) L2
 More info

30 Aug 2026
Satellite: CBERS-4 (MUX) L2
 More info

26 Aug 2026
Cloudiness: ☁ 47.54%
Satellite: Landsat 9 T1
 More info

Download image

2338 images found

Layers

Locations, coordinates, scene IDs Upload area

How does EOSDA LandViewer work? Terms and Conditions API 28

Possible Outburst Condition: Indications of Englacial Lake Formation

Landsat imagery — 12 August 2026



(a) Regional overview (b) turquoise tone flags a potential englacial lake



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This may not be just an ice-avalanche event.

On 26 August, a glacier collapse initiated a flash flood downstream. The magnitude of the flood, together with the volume of water still impounded at the lower damming sites, estimated at 2 million cubic meters, and the flood's reach far downstream toward Chitwan, is not readily explained by an ice-avalanche or glacier-collapse mechanism alone. This raises the possibility that a substantial volume of water had accumulated within an englacial lake prior to failure, and that its release may have contributed to, or compounded, the 26 August event rather than the glacier collapse being the sole causal mechanism. ...more

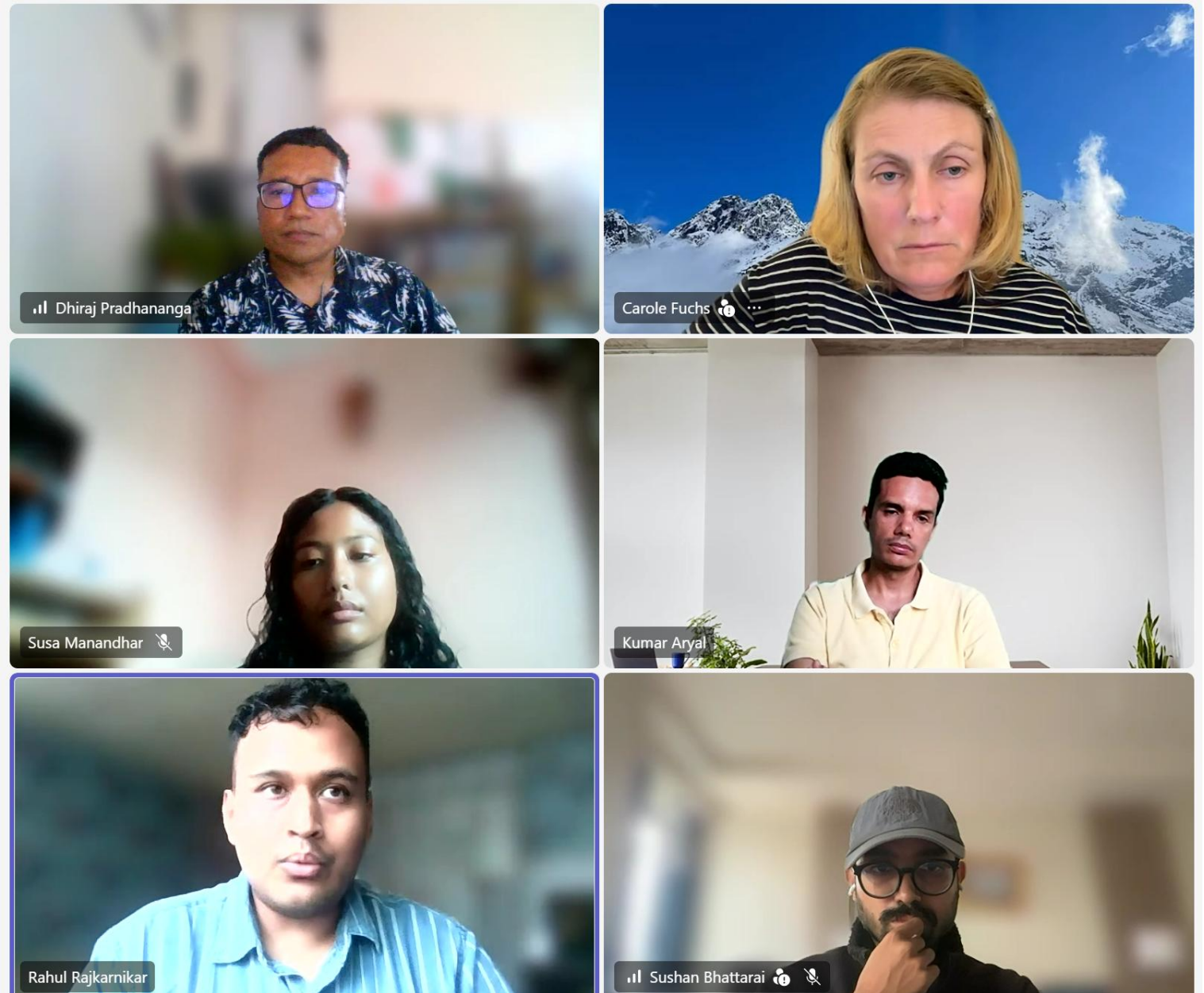
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Like Comment Repost

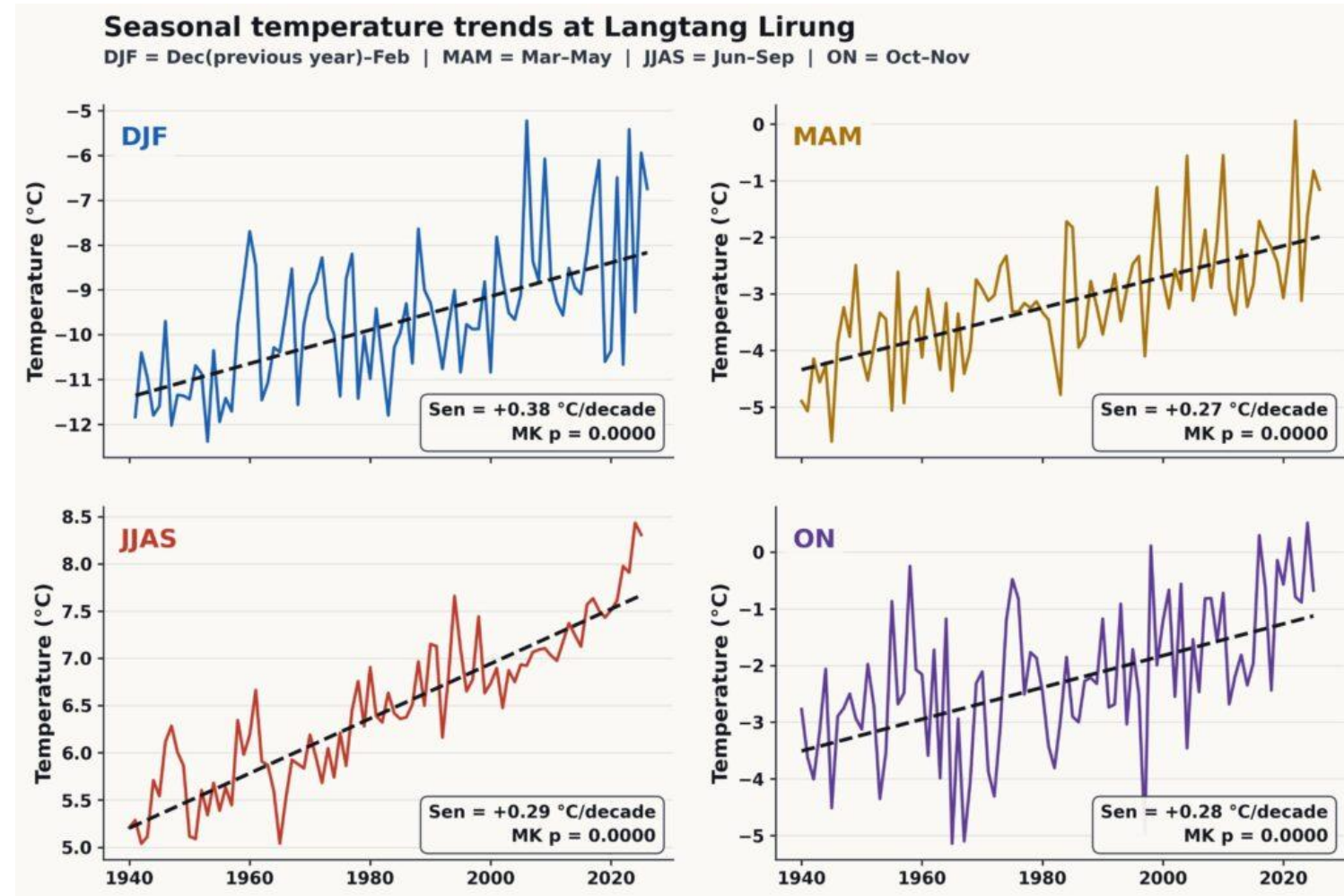


Comment as The Small Earth Nepal...

Situation update with Carole Fuchs



The Small Earth Nepal



<https://smallearth.org.np/activities/when-warming-weakens-mountain/>

M 5.2 Landslide – 55 km NW of Kodārī, Nepal

2026-08-26 02:52:10 (UTC) | 28.271°N 85.515°E | 0.0 km depth

i This event was initially reported as a magnitude 4.4 earthquake. Additional analysis of long period seismic waves indicate that the seismic energy was instead generated by a glacial collapse and debris flow. The location of this event was estimated from satellite images. About three hours after this event, a [second landslide event](#) occurred in the region. For more information see the [USGS landslides special event page](#).

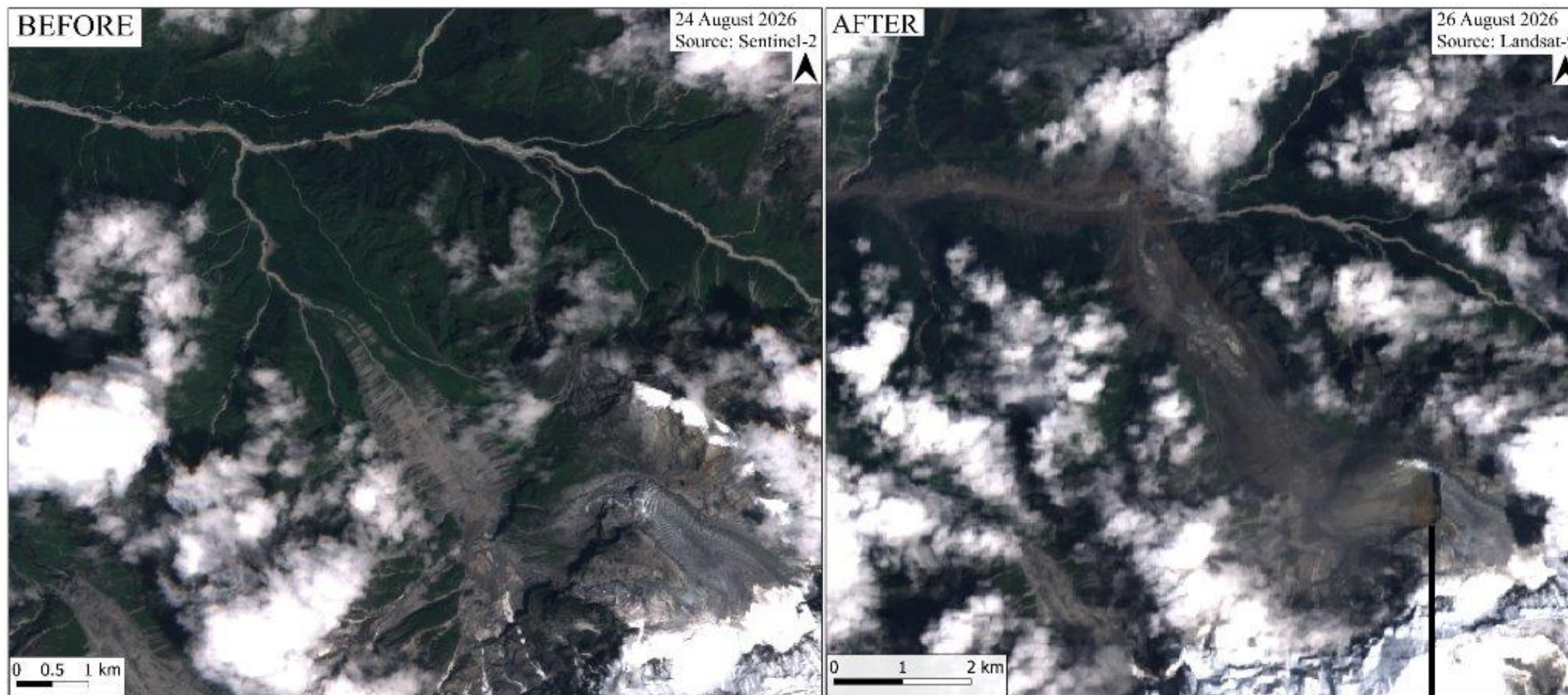
Avalanche Triggered Earthquake

i Key Points (updated Aug 26, 18:44 UTC)

- A magnitude 5.2 seismic event occurred near the border between Nepal and China on Aug 26 at 8:37 AM local time (10:52 AM China Standard Time).
- The USGS determined that the seismic event was a glacial collapse and debris flow that caused subsequent catastrophic impacts downstream.
- This event was initially reported as a magnitude 4.4 earthquake. Additional analysis of nearby seismic stations, long period seismic waves, and satellite imagery led to the determination that the seismic event was instead a glacial collapse and debris flow, and that no earthquake had occurred.

ESTABLISHED FACT

A Glacier and Rock Collapse



Glacier and Rock Collapse Point

What the Established Fact Does Not Explain

The mechanism and water source remain unresolved

Q1

Where did the volume of water involved in the flood originate?

Q2

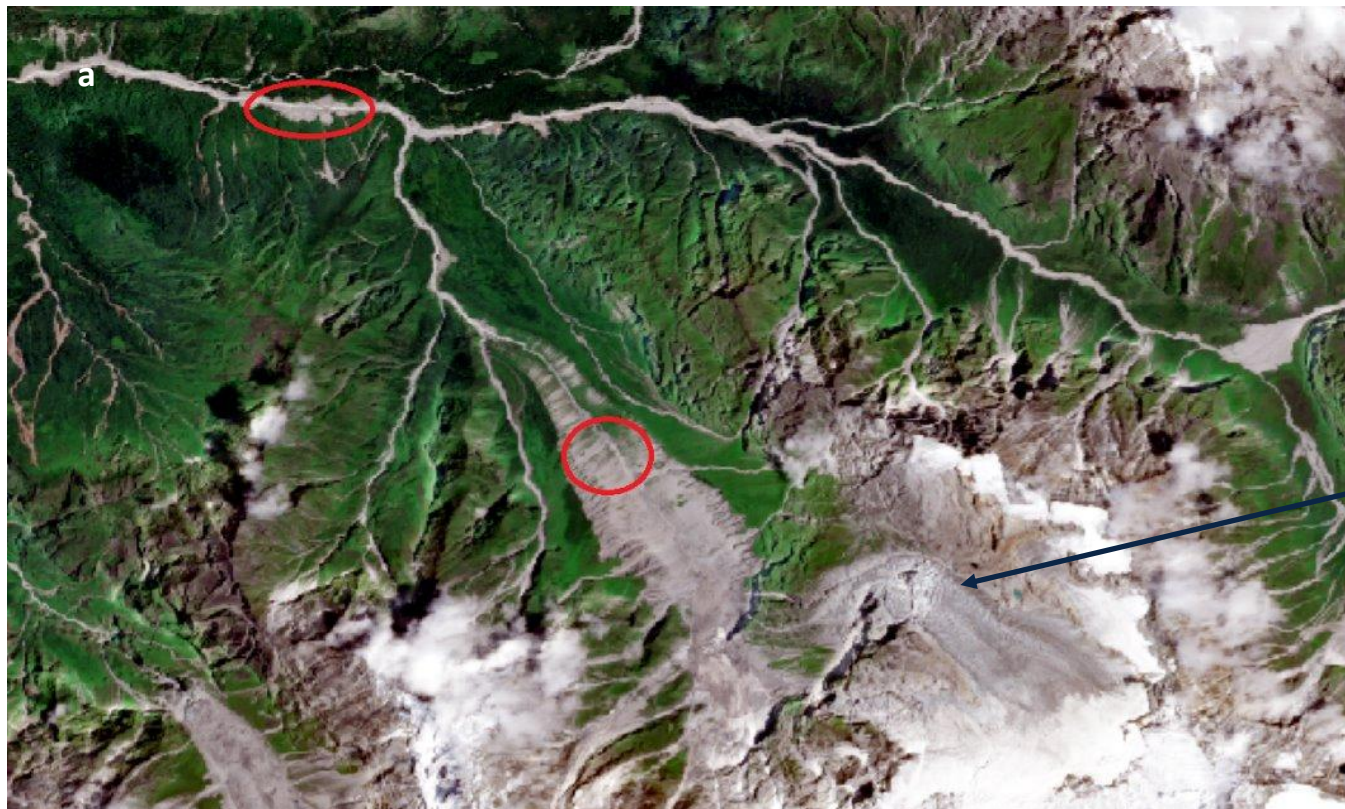
Could the energy released by the rock/ice collapse and associated frictional heating alone generate a flood of this magnitude?

Q3

Is the formation of an englacial lake plausible on a slope of this gradient?

Possible Outburst Condition: Indications of Englacial Lake Formation (Is this a possibility)

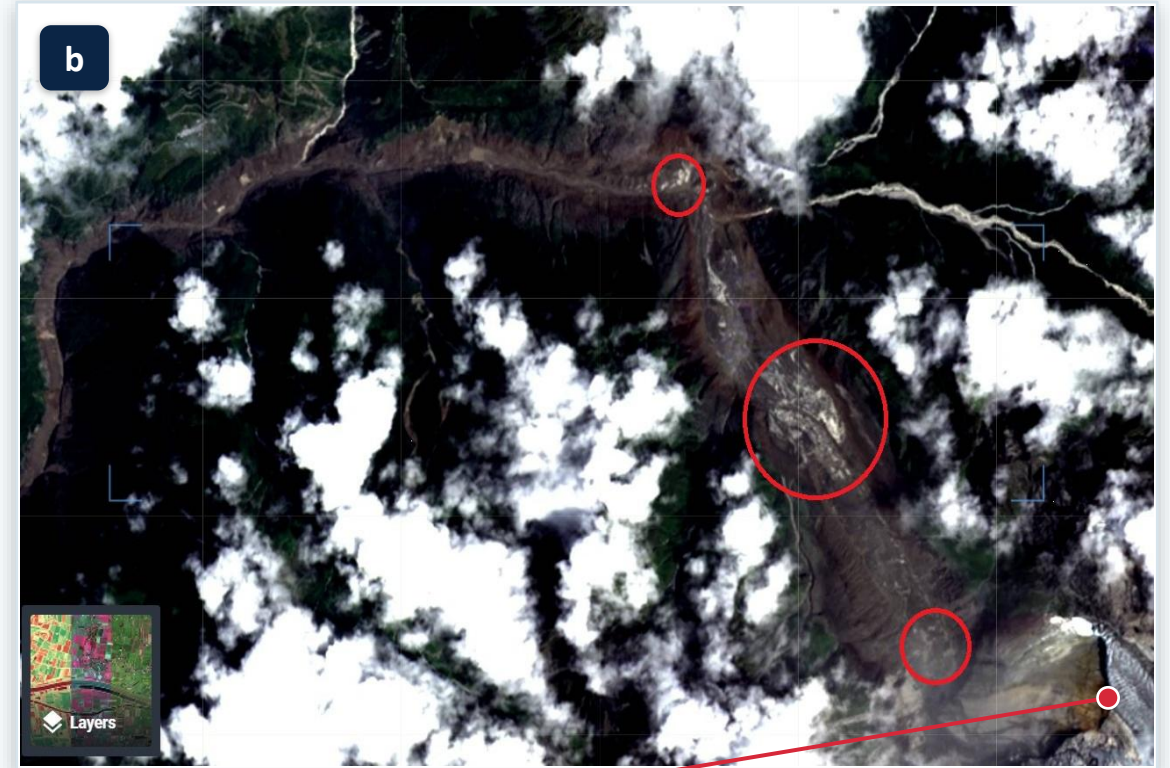
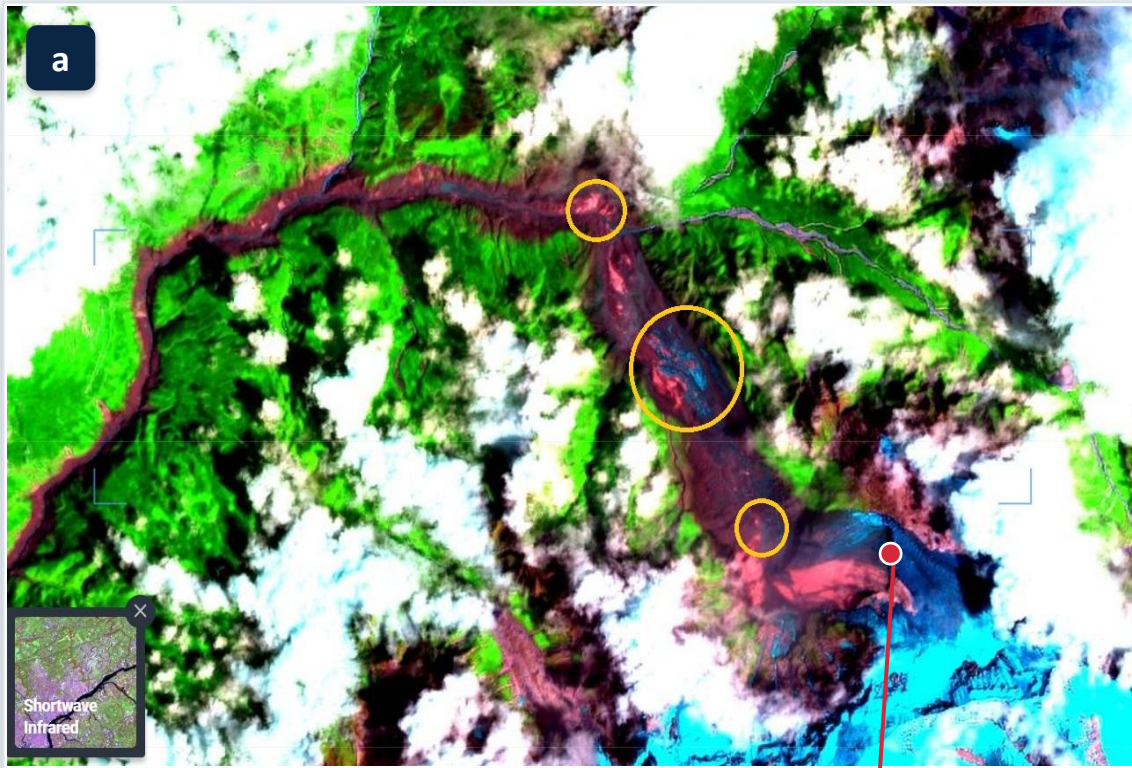
Landsat imagery — 12 August 2026



(a) Regional overview **(b)** turquoise tone flags a potential englacial lake

Post-Avalanche Lake Formation and Potential Lake Formation Locations

26 August 2026 — during the disaster event

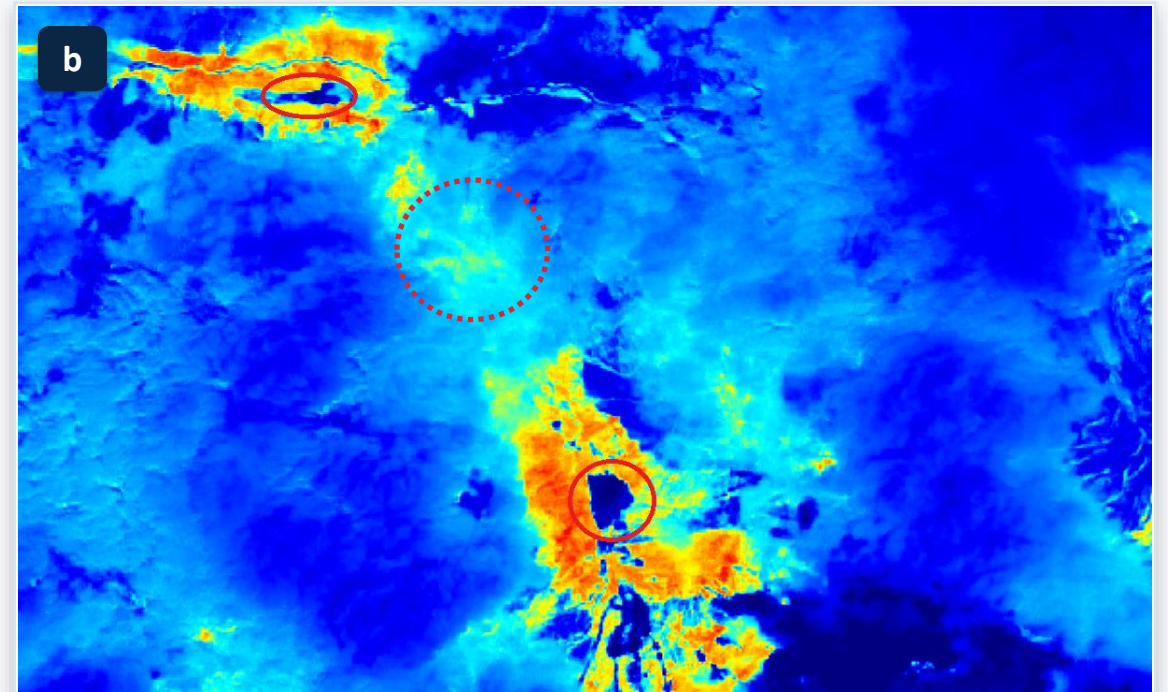
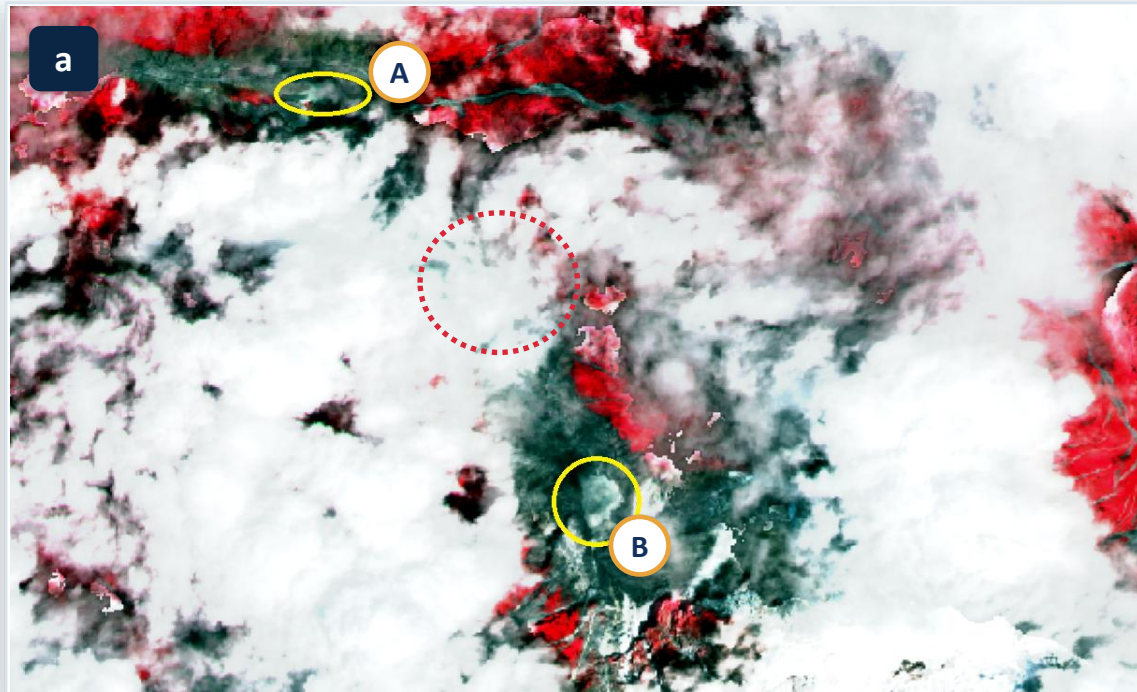


Glacier collapse point

(a) Shortwave-infrared composite **(b)** Companion satellite image

New Temporary Lake Formation

Within 24 hours of the disaster — imagery from 27 August 2026



 Potential 3rd lake (per satellite imagery, 26 August 2026)

Lake A

0.05–0.07 km²

Estimated area — min–max

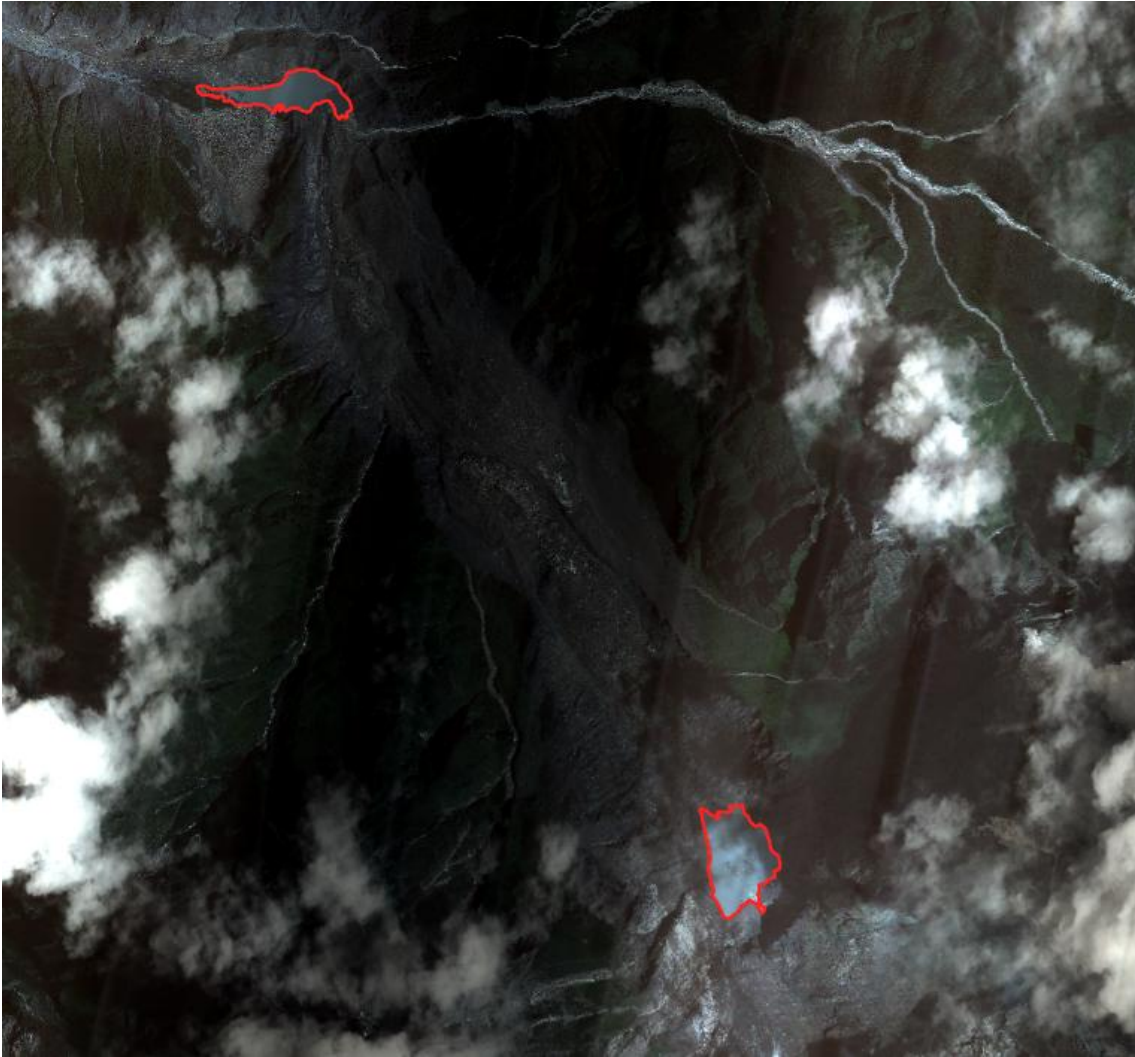
Lake B

0.18–0.20 km²

Estimated area — min–max

Refined Estimates from Clear-Sky Imagery

28 August 2026 — first cloud-free pass



A cloud-free acquisition on 28 August allowed direct delineation of lake extent (outlined in red).

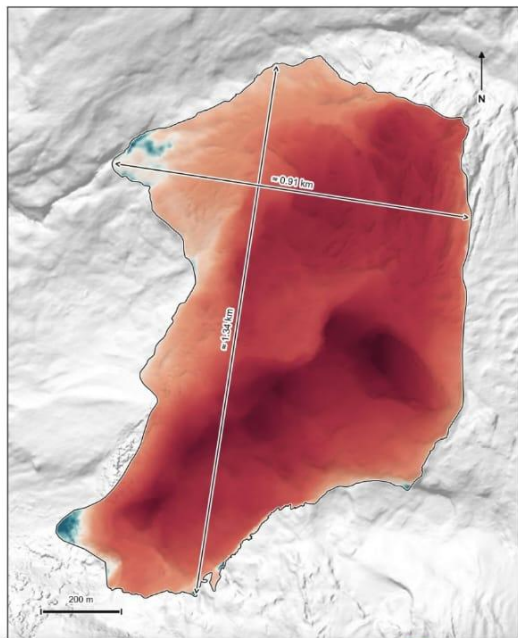
Lake A

0.0767 km²

Lake B

0.128 km²

https://www.linkedin.com/company/xiong-zheng-cao/post/749932371563e3Q?utm_source=member_recommendations&utm_medium=DezofMBvutGrBRfJE



That is roughly four times the scale of the 2021 **#Chamoli** rock-ice avalanche in India and around twelve times that of the 2025 **#Blatten** event in Switzerland, offering a first impression of the extraordinary magnitude of this event.



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On August 28, 2026, we visited the source area of the major China–Nepal transboundary disaster that occurred on August 26, 2026. This video shows the disaster area from the source of the ice–rock avalanche to the nearby downstream areas, giving a clear view of where the disaster started, how it traveled, and its impacts along the way.



 437

14

88



Post-Disaster Rapid Visual Assessment

2 August 2026 — Devighat (Nuwakot)

Unbelievable inundation and destruction at Devighat



Post-Disaster Rapid Visual Assessment

2 August 2026 — Dhunge Bazaar (Nuwakot)

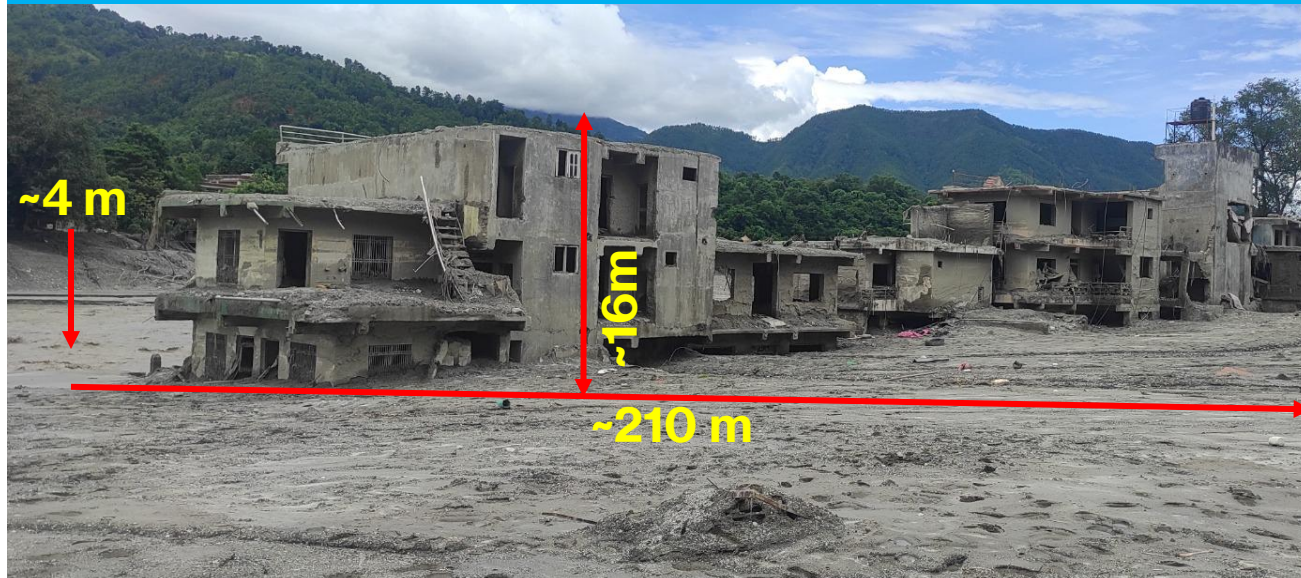
Sediment deposition nearly ~40m above the river bed at Dhunge Bazaar



Post-Disaster Rapid Visual Assessment

2 August 2026 — Devighat and Dhunge (Nuwakot): River Morphology Changes with respect to the adjoining infrastructures

A) Raised river channel and flood extent at Devighat



B) Raised river channel with reference to Hydro Station at Dhunge Bazaar



- **Devighat:** ~210 m flood extent; river channel raised >4 m; flood reached the floodplain upto 15–17 m.
- **Dhunge Bazaar:** Narrow channel with heavy debris/sediment; channel raised ~20–25 m.
- **Tadi River bridge:** Collapsed from backwater flow; ~1600–1700 m affected upstream.
- **Overall impact:** River morphology altered; reduced conveyance capacity; floodplain activation diminished; residential areas highly exposed to flood hazards.

Fast-moving water and debris

<https://www.instagram.com/reel/DcjUk-lsyjK/>

<https://www.facebook.com/reel/1832167454897193>



Ignored warning for a video footage

<https://www.instagram.com/reel/Dcmy0tRz2Y4/?igsi=bXAYnJY1aWo3bWcw>



FLOOD WARNING IGNORED!

An early warning was issued before the Bhoté Koshi flood in Rasuwa, but some people ignored it and stayed to film the flood, resulting in significant

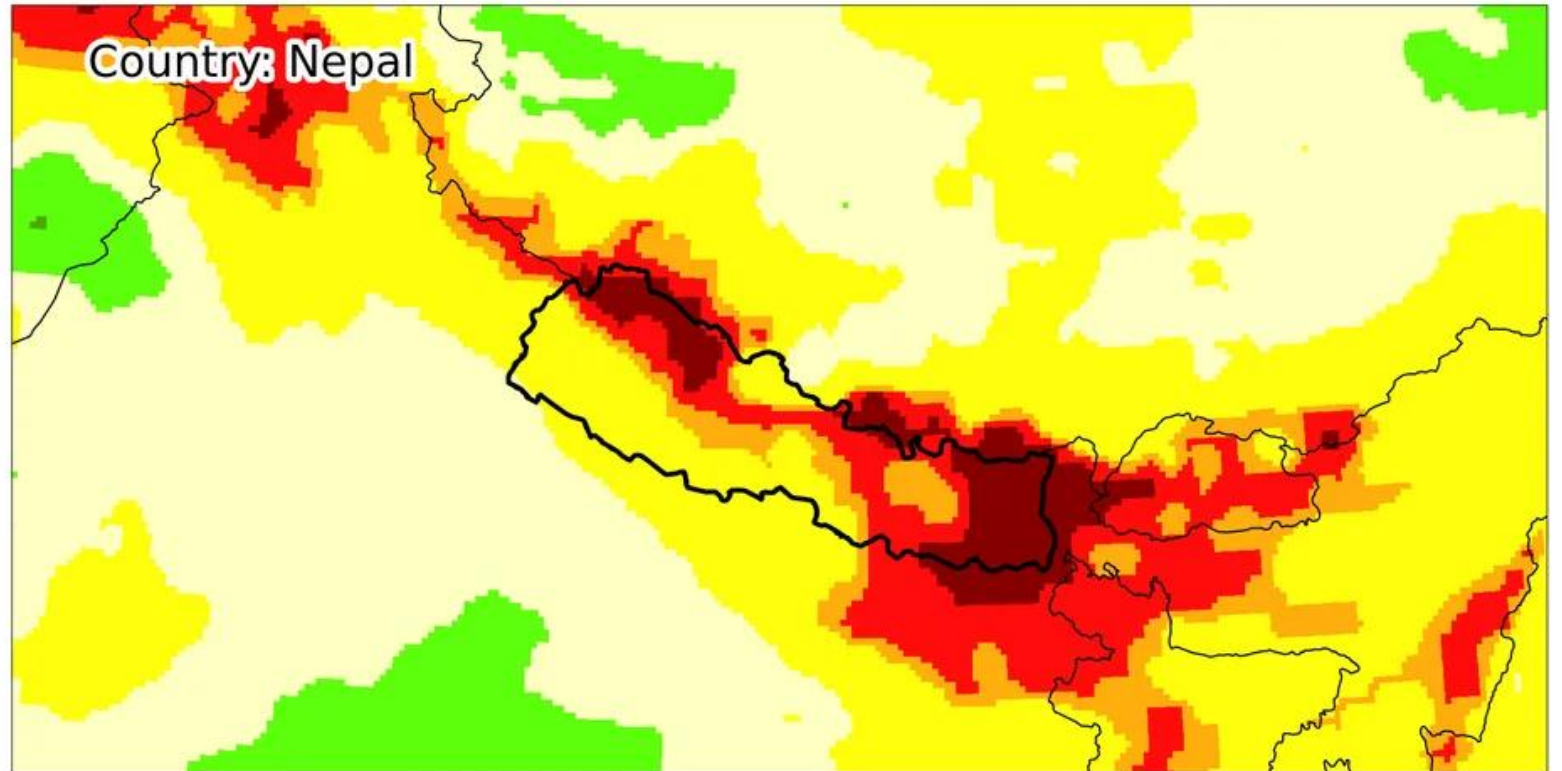
CCTV Footages

https://www.threads.com/@gayan_khatri/post/Dcp98YVDRAG?xmt=AQG0-nyW_827h50t3ksudKzhM5iX25jUEnZe8Yr-xyUNQA13wwzqipK-fgYVfgC7yi1f5ZF&source_surface=35&slof=1



ERA5

Temperature Ranking for Aug 2026



Source: ERA5 Reanalysis

Nepal Rank for Aug 2026 is: 1 out of 87

Map by: Brian Brettschneider



Monitoring Gaps and Questions for INARCH

This assessment relies entirely on intermittent, cloud-affected optical satellite passes, no in-situ or continuous monitoring data were available for this event.

Q1

What rapid-response, cloud-penetrating (e.g., SAR) data-sharing mechanisms exist or are needed for suspected glacier/rock-slope failures in cloud-prone Himalayan terrain?

Q2

How effective are current regional data-sharing mechanisms for this kind of rapid hazard assessment, and where do they fall short?

Q3

Given the significant changes in river morphology and the destruction of settlements, is resettlement the only viable long-term strategy to safeguard communities from recurring flood hazards in the affected region?

Q4

As the UN Decade of Action for Cryospheric Sciences (2025 - 2034, UNESCO-led) advances, does an event like this reveal a gap between the Decade's monitoring/cooperation goals and current on-the-ground capability?

Weblinks for further details

1. Rasuwa Flood Updates

<https://smallearth.org.np/activities/when-warming-weakens-mountain/>

2. HiM-DATA

<https://smallearth.org.np/project/himdata/>

<https://wmo.int/resources/meteoworld/meteoworld-july-2026/himalayan-monasteries-help-close-observation-gaps>

<https://www.spotlightnepal.com/2026/08/29/him-data-bridging-high-elevation-observation/>

3. Hourly Integrated Land–Atmosphere Interaction Observation Dataset for the High-Altitude Mountainous Region of Gyirong, Tibet (2021–2026)

<https://waternet.ca/Metadata/Record/T-2026-08-28-p1f3e5qlqTEyibfPAp3smBeA>

4. Enhancing climate resilience in South Asia and China: Predicting precipitation shifts and their impacts for disaster risk reduction and resource security

<https://www.apn-gcr.org/project/enhancing-climate-resilience-in-south-asia-predicting-precipitation-shifts-and-their-impacts-for-disaster-risk-reduction-and-resource-security/>