

Collaboration, Innovation and Resilience: Championing a Digital Generation

## The Impact of IGS Services in the Pacific:

**Enabling Geospatial and Surveying Projects** 

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# About the IGS

Providing openly available GNSS data and products that benefit science and society.

> INTERNATIONAL G N S S SERVICE

IGS



# **ABOUT THE IGS**





The **IGS** is one of the 4 technical services of the International Association of Geodesy (IAG)





## **IGS Goals**

Serving the community with facilitation, coordination, incubation, and advocacy in three strategic goals









To explore all stations, visit <u>https://network.igs.org</u>.





## **Pacific Contributions**

Over the last decade the contribution to IGS from the Pacific has grown.

While there are several IGS stations, they are mainly operated by foreign partners.

There are relative few IGS associate members from the Pacific.

# Associate Members

IGS INTERNATIONAL G N S S SERVICE

#### What is an IGS Associate Member?

The Associate Members of the IGS are described in the terms of reference as "...persons representing organizations that participate in any of the IGS components. The membership is balanced with respect to IGS components, organizational representation and geography, and is meant to represent institutions which contribute **significantly** to the IGS on a **continuous basis**" Visit IGS Associate Membership Guidelines (2019) to learn more.

#### **List of Associate Members**

- To view the full list of IGS Associate Members accepted or renewed AFTER the 1st of February 2023, visit Associate Members List.
- To view the full list of IGS Associate Members PRIOR TO the 1st of February 2023, visit Legacy Associate Members List. (Note: The legacy list will be removed once the transition period ends, on June 2024.)

ASSOCIATE MEMBER LIST

LEGACY ASSOCIATE MEMBER LIST



## Become an Associate Member

Fill out the <u>IGS Associate</u> <u>Membership</u> form to apply to become an Associate Member. To view a list of associate members, visit <u>Associate</u> <u>Members.</u>





## **Benefits of contributing to the IGS Network**



**Global Impact**: Contribute to a global effort in advancing precise positioning and understanding of Earth.



**Contribution to Global Reference Frame**: Contribute to the development and maintenance of a global reference frame crucial for various scientific and societal applications.



**Support for Scientific Research**: Support scientific research in geodesy, Earth sciences, and related fields by providing essential data.



**Network Collaboration**: Collaborate with a diverse network of international partners, fostering knowledge exchange and collaboration opportunities.



**Capacity Building**: Access training resources and capacity-building initiatives aimed at enhancing skills in GNSS data analysis and interpretation.



**Recognition and Visibility**: Gain recognition and visibility as a contributor to a globally known organization focused on Earth observation and positioning technologies.



## 

# **Pacific Case Studies**



## **Pacific Sea Level & Geodetic Monitoring Project**



Network to monitor land motions & sea level changes



One of the GNSS COR Station & the Tide Gauge Station



## **Pacific Maritime Boundaries Project**



- 36 out of 48 shared boundaries are under treaty and agreed.
- 6 treaties remain to be brought into force (yellow)
- 12 shared boundaries remain to be signed (pink)
- 5 countries high seas limits have yet to be declared (white)





### **Drone Survey Data Acquisition in the Pacific**





"I have made use of the LAUT CORS station data, for Geo-Tagging drone imagery and for Post-Processing Kinematic (PPK) of the Drone Data. This had provided my team with the flexibility of not having a GNSS Base Station on a known point within the project Area of Interest, as we flew the DJI 300RTK drone in Nadi. After the aerial data acquisition, the LAUT CORS data was downloaded through the Geoscience Australia Data Centre website and used with the Pix4D and Mission Planner geotagging to preciously geotag the images for photogrammetry processing" Salmendra Chand

