



The Pan American Institute of Geography and History Modernizing the Geodetic Reference System in the Americas

MA. Antonio Campuzano Rosales,
Secretary General of the PAIGH

The Pan American Institute of Geography and History recognizes the great importance of geodesy as the science that studies the shape and dimensions of the Earth.

The PAIGH has supported the development of geospatial information and geodesy capacity building in the Americas.



Projects

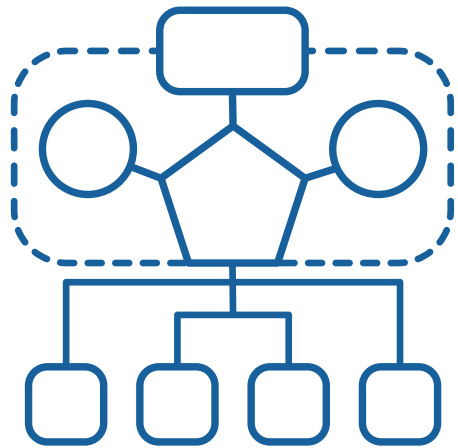
We have supported scientific research projects based on criteria of relevance and priority.

Projects that propose mechanisms for coordinating efforts with internal or external actors in accordance with the Sustainable Development Goals of the United Nations 2030 Agenda.





Quality Criteria



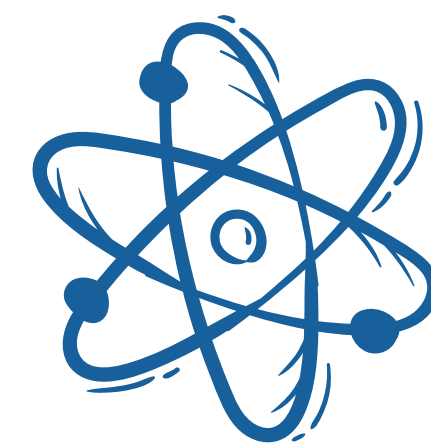
The problem statement, objectives, and methodology are formulated rigorously and with theoretical support.



The proposed results are consistent with the indicators, activities, and timelines.



Proposals must be consistent in terms of the problem statement, objectives, indicators, results, timetable, and activities.

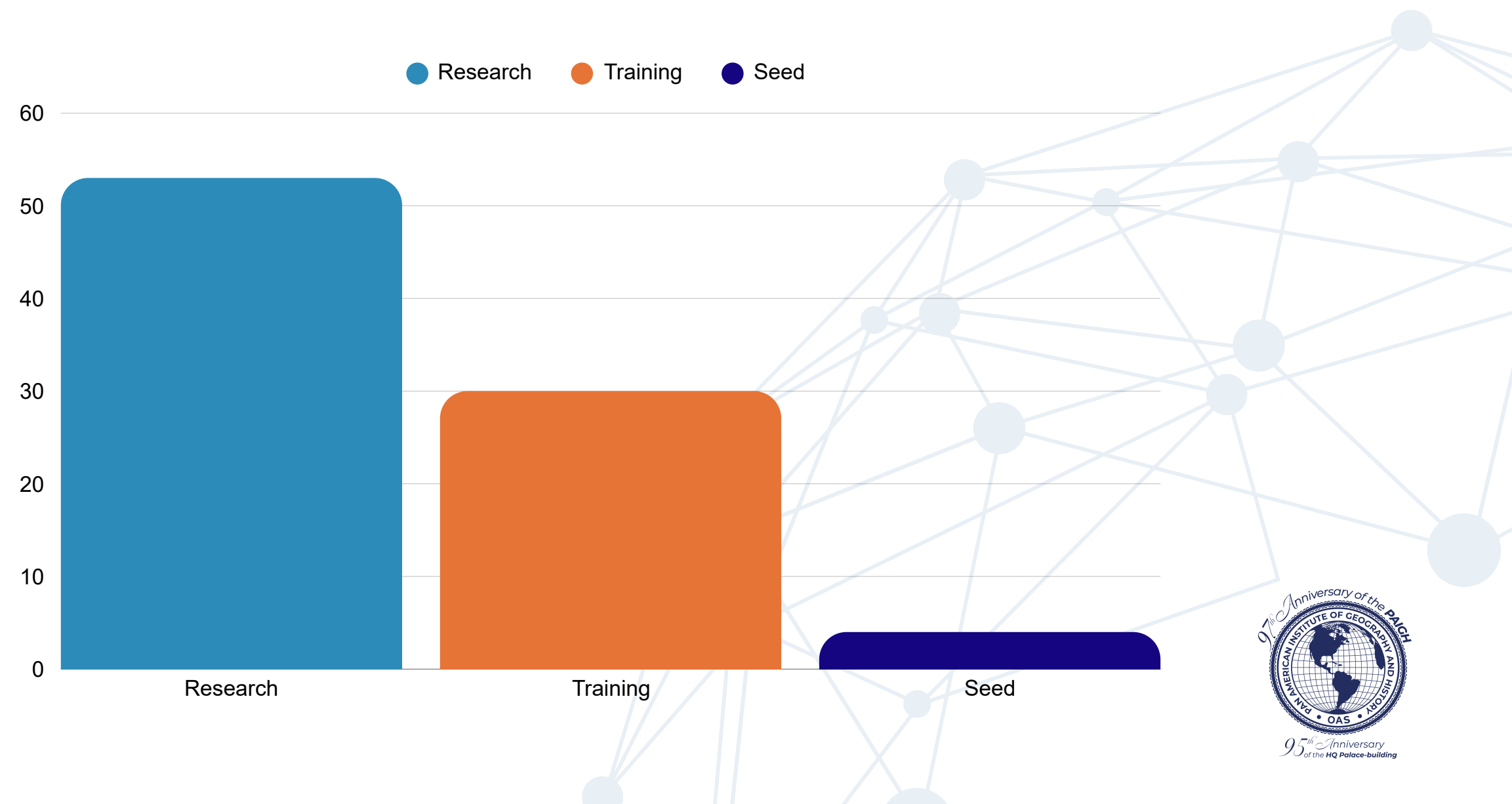


That the proposed results promote communication with the public and the technical and scientific community.

The use of online tools for the evaluation of Technical Assistance Projects was implemented.

Over the last four years, 87 scientific projects from 14 Member States have been submitted.

- Research: 53
- Training: 30
- Seed: 4





The selection criteria are listed below:

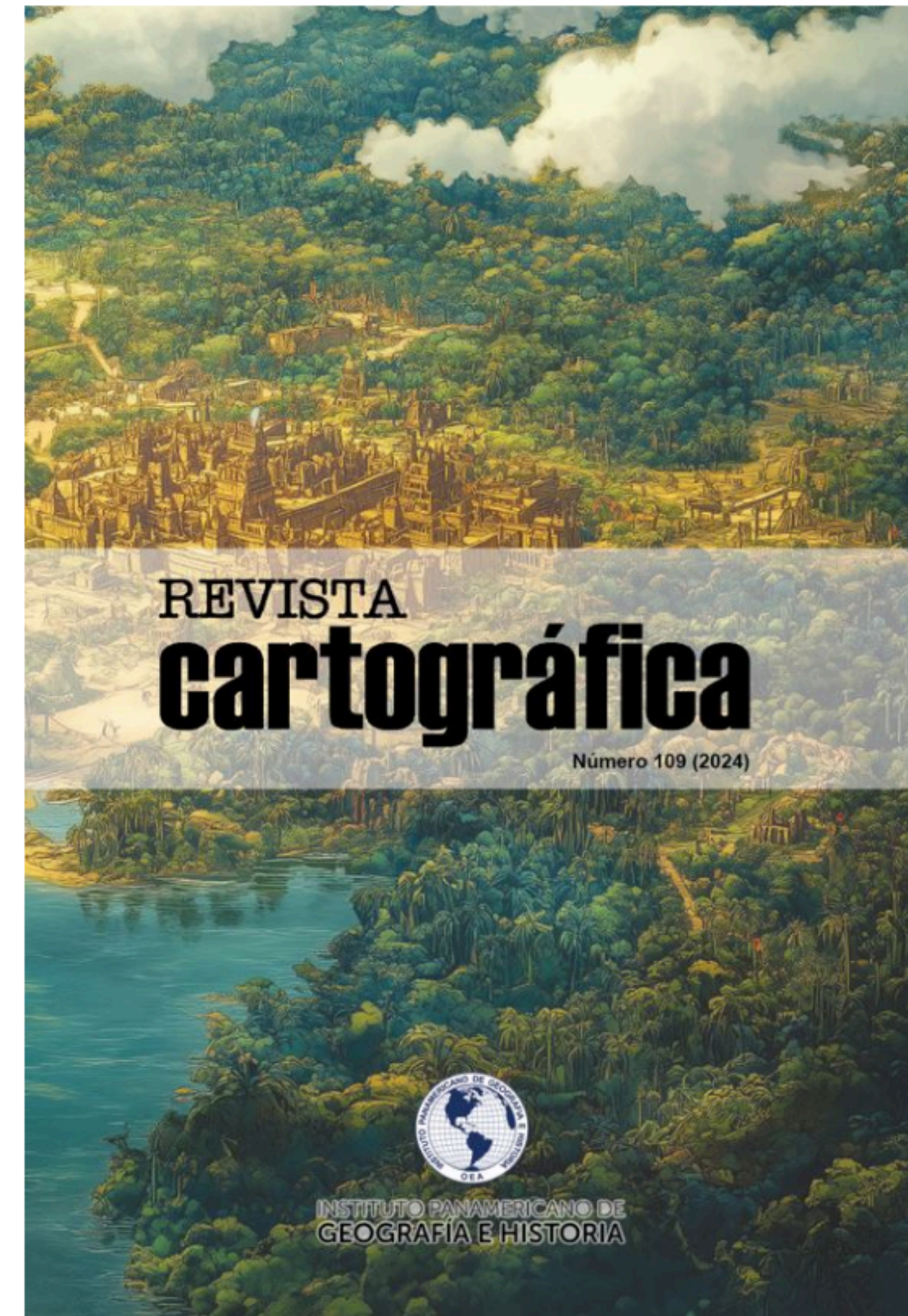
1. **Technical/professional qualifications of applicants.**
2. **Historical balance in the selection of applicants by Member State for courses in 2022, 2023, 2024, and 2025.**
3. **Reasonable regional representation of Member States: North America, Central America, the Caribbean, and South America.**
4. **Balance in terms of gender equality (Male/Female).**



Funding

166,000 USD has been allocated.

To this amount must be added the costs of publishing the Cartographic Journal and funding for the leadership of the Cartographic Commission. This brings the total to over USD 200,000.



Grants

Scientific training has been a priority for the current Secretary General.

Centro Geo from México

With Centro Geo from México, in recent years we have been able to offer the Diploma in Geospatial Information Analysis, which was taught in 2022, 2023, and 2025, and the Diploma in Geospatial Information Analysis with the module: Design of Collaborative Solutions for Territorial Problems, in 2024.

Twenty-six specialized scholarships were awarded. These scholarship recipients represented 16 Member States of the PAIGH



CentroGeo

Centro de Investigación en
Ciencias de Información Geoespacial, A.C.



A collaborative program has been in place since 2023 with **Spain's National Geographic Information Center**, through which 13 courses have been taught on the following topics:

1. Spatial Data Infrastructure.
2. Geographic Information Systems (Basic).
3. High-value geospatial data. Geolocation.
4. Geographic Information Systems (Advanced).

These courses have benefited 95 scientists and technicians from 17 Member States.





With the Observer State of the Republic of Korea, we have secured the delivery of the Face-to-Face Workshop on Geographic Names and Geospatial Information at the National Geographic Information Institute (NGII) in Suwon, South Korea, in 2022, 2023, 2024, and 2025. which has been held in person and has benefited 74 specialist participants.





Awards

The award policy at the PAIGH has been a fundamental factor in scientific development in the Americas, and has been reinstated by the current PAIGH administration, as we believe it motivates scientific research.



Over the last four years, awards have been given for the best postgraduate thesis (master's and doctoral) in cartography, geodesy, and/or geographic information, which have been as follows:

1. Annual Award for the Best Master's Thesis in Cartography, Geodesy, and/or Geographic Information (2022, 2023, 2024 and 2025).
2. "Pedro Vicente Maldonado" Award for the Best Doctoral Thesis in Cartography, Geodesy, and/or Geographic Information. Every two years (2022 and 2024).



The 26th General Assembly of the PAIGH, held in Tegucigalpa, Honduras, last October, authorized the PAIGH Awards Regulations.

The contributions to Revista Cartográfica indicate that 45% of the articles published in the regular issues of the journal originated from award activities.

It should be noted that submitting a thesis for consideration as the best Master's or Doctoral thesis does not in any way oblige the author to publish their work but does offer them the voluntary option of publication.



The identification and characterization of the regional academic community is as follows: There is a database of 747 people (608 with doctoral degrees and 139 with master's degrees) who participate as award evaluators. Of these, 140 doctors constitute the core selection of jury members for the awards.



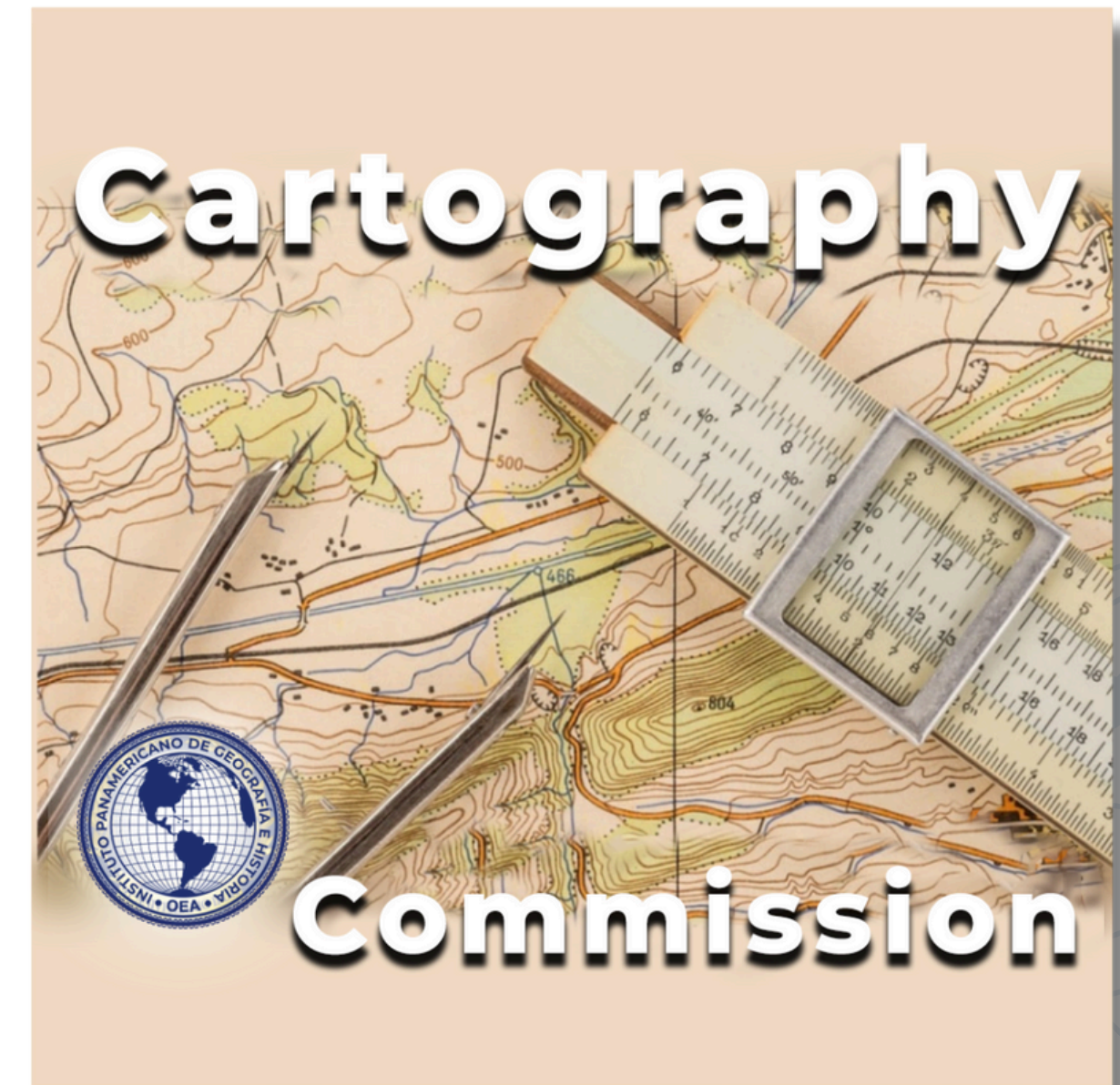
The Cartography Commission has several important working committees that I would like to highlight:

I. Committee on Geographic Information Standards and Norms (CT-NEIG).

II. The Thematic Cartography Committee (CT-CT).

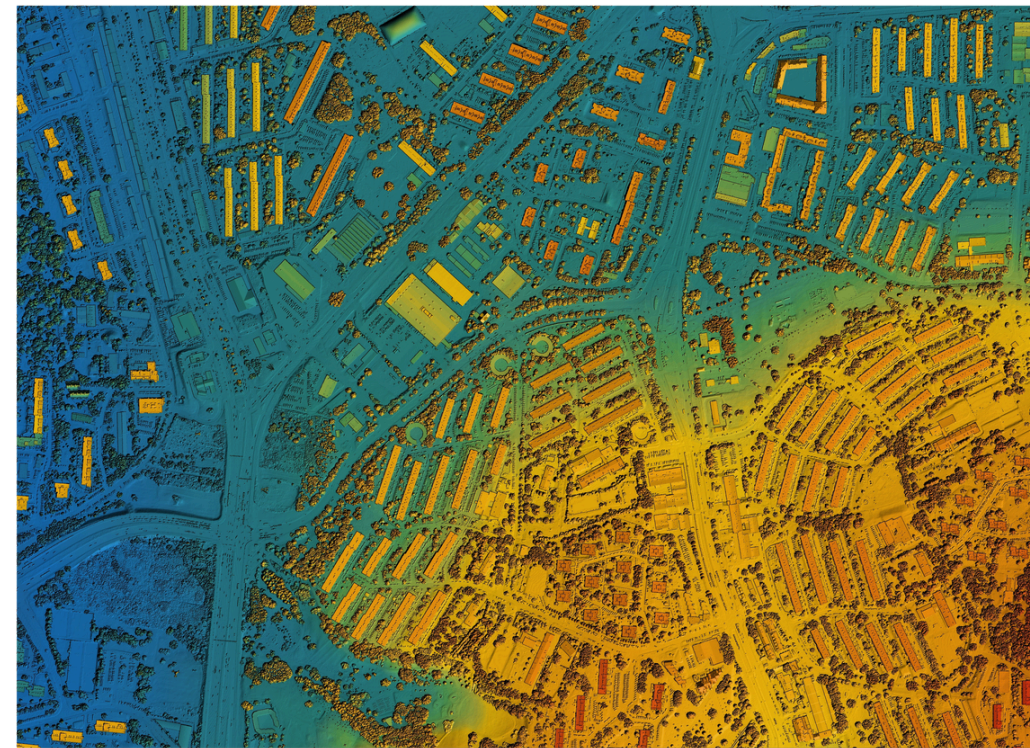
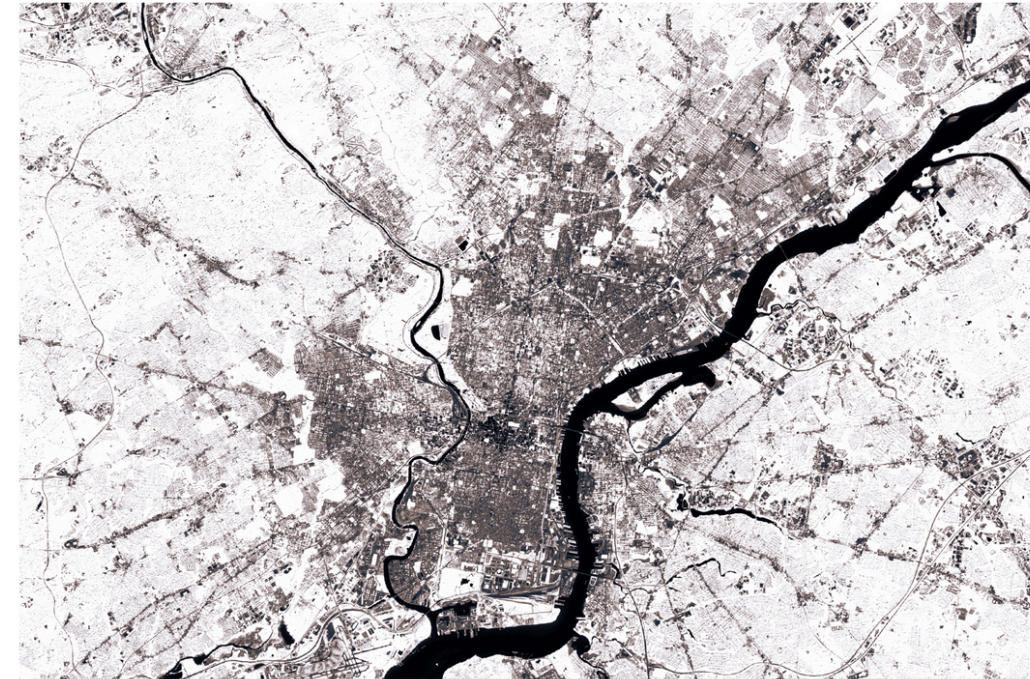
III. The Geospatial Data Infrastructure Committee (CT-IDG).

IV. The Geographical Names Committee.



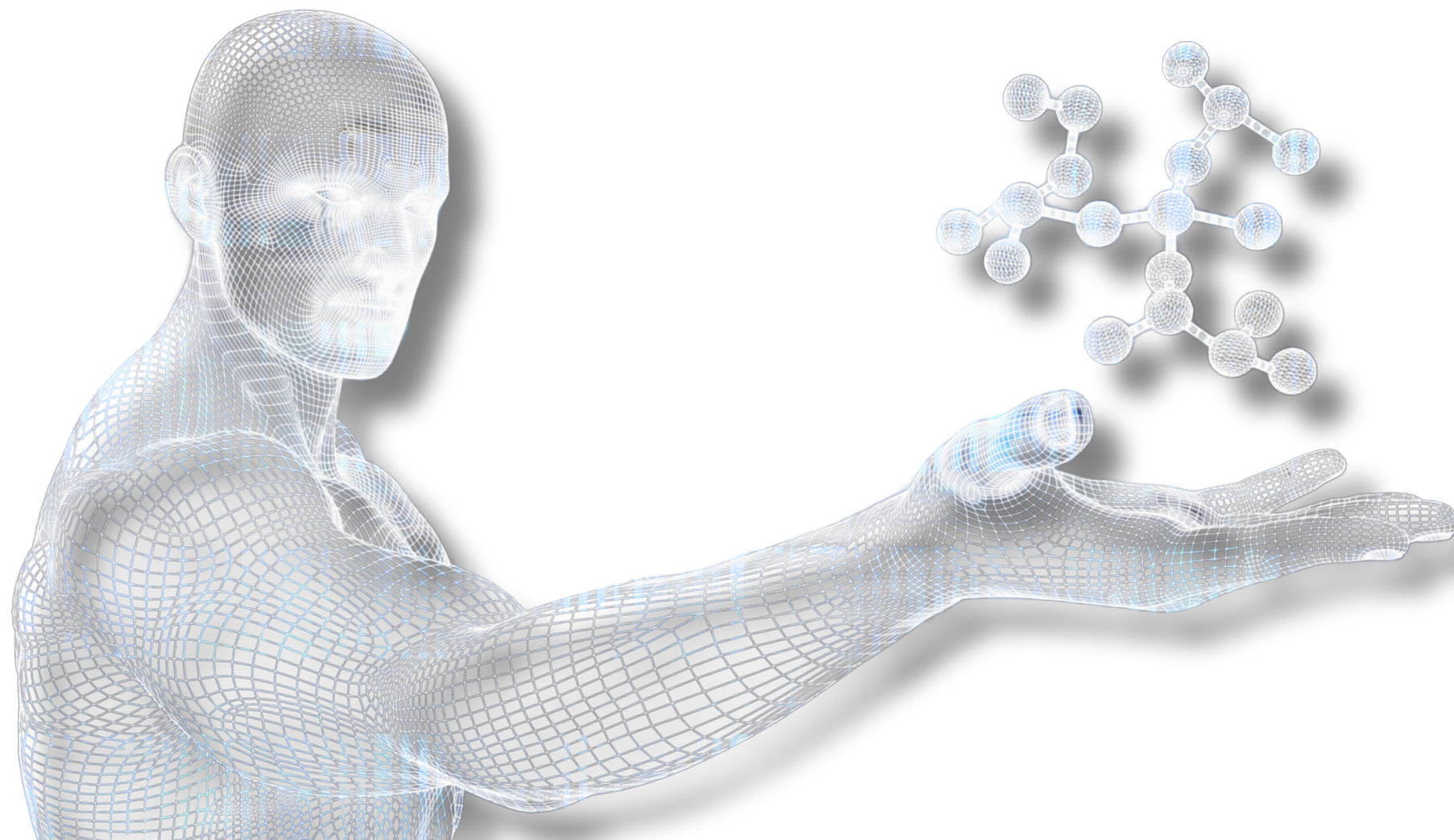
The Committee on Geographic Information Standards and Norms (CT-NEIG) aims to strengthen links and standards in geographic information. It does this through the following actions:

- **Collaboration with international organizations and Member States of the PAIGH.**
- **Development and adoption of geographic information norms and standards.**
- **Improvement of Geospatial Data Quality.**
- **Support for the development of Spatial Data Infrastructures (SDIs).**



The Thematic Cartography Committee (CT-CT) aims to promote development in thematic cartography, and to achieve this it carries out the following actions

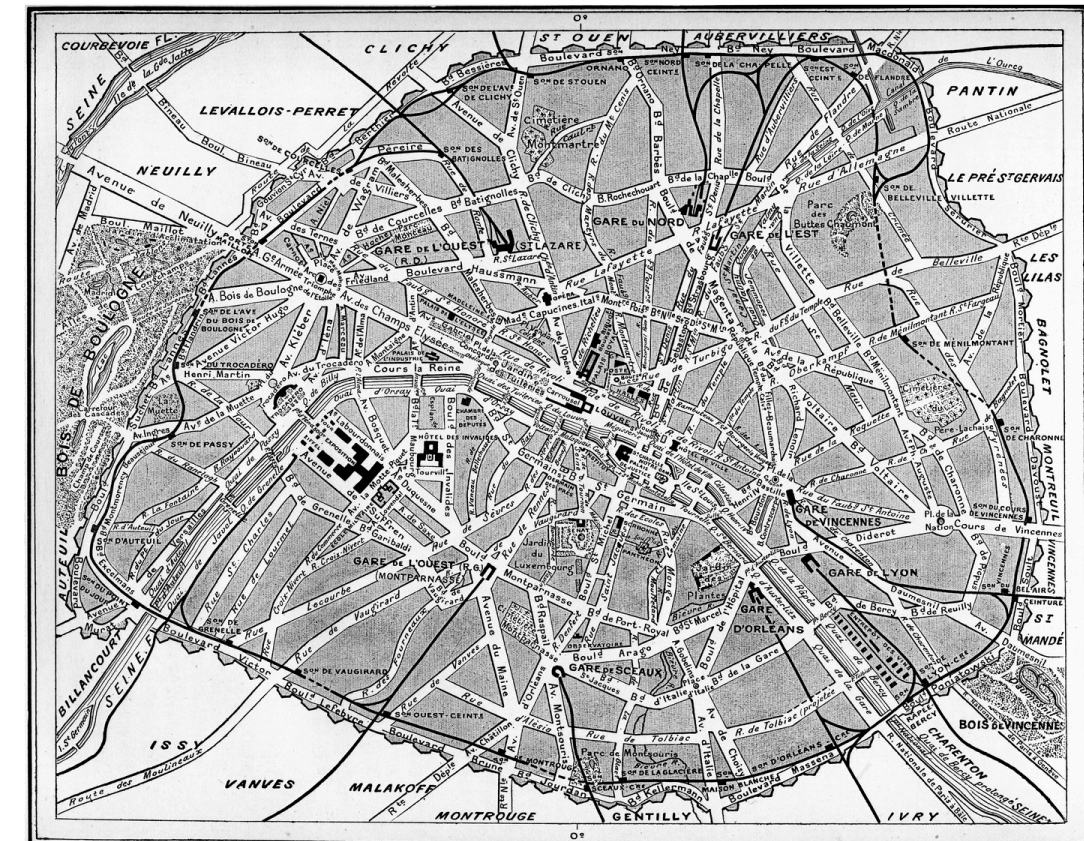
- The promotion of joint actions between professionals and specialized organizations.**
- Strengthening scientific and technological exchange.**





The Geospatial Data Infrastructure Committee (CT-IDG) aims to monitor and promote SDIs. It does this through the following actions:

- Development of Spatial Data Infrastructures (SDIs).
- National, regional, and subregional levels.
- Collaboration among Member States of the PAIGH.
- Strengthening geographic information management in the Region.



The José Joaquín Hungría Morell Committee on Geographical Names, whose mission is to unify and coordinate work on geographical names in the Americas and represent the PAIGH before the Latin American Linguistic Division of the United Nations Group of Experts on Geographical Names, and any other institution, academic center, entity, or international or Member State organization.

Science outreach: Cartographic Journal

The PAIGH Cartographic Journal is one of the most important publications in its scientific field in the Americas and worldwide.

In recent years, it has been indexed in various ways.

These results have been significant as a result of the objective to continue strengthening the quality and timely publication of the Cartographic Journal (RCA). The aim is to advance in compliance with the Journal's quality and scientific validity standards and its dissemination.

Over the last four years, issues 104, 105, 106, 107, 108, 109, 110 and 111.





SIRGAS

This entity celebrated its 32nd anniversary last October; its origins date back to the International Conference for the Definition of a Geocentric Datum for South America, held in Asunción, Paraguay, between October 4 and 7, 1993.

Its objectives are to define and maintain the continental geocentric reference frame, the unified vertical reference system, the gravimetric geoid model, and the continental absolute gravity network, as well as to establish the definition of the geodetic reference frame for the Americas.





The General Secretariat of the PAIGH continues to provide support to SIRGAS regarding the requirements of its website (official SIRGAS website) by providing hosting and subdomain services <https://sirgas.ipgh.org>

For more than three decades, the PAIGH has provided the necessary funding and support through its Technical Assistance Program for the organization of various events at the Pan American level.



The Secretary General visited the city of Montevideo, Eastern Republic of Uruguay, to meet with Colonel Gustavo Caubarrére, President of the Geodetic Reference System for the Americas (SIRGAS), who reaffirmed the support and collaboration between the two scientific organizations.



The Secretary General informed the head of SIRGAS that the organization would continue to receive financial and scientific support, which was approved by the General Assembly of the PAIGH.

The Secretary General presented him with a plaque commemorating the thirtieth anniversary of the aforementioned international organization, in recognition of its work and uninterrupted service.



Work is currently underway with the Economic Commission for Latin America and the Caribbean (ECLAC), which has agreed to receive the information generated by the Geodetic System of the Americas. Progress is therefore being made in concentrating this information in SIRGAS, while the PAIGH is working on the legal documentation that will enable these actions to be carried out.





Thank you for your attention.

*Towards the Centenary of the **PAIGH***

