

Annual Review 2024



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Connecting you to maps, geospatial and land information for Europe

EuroGeographics is the not-for-profit membership association for the European National Mapping, Cadastral and Land Registry Authorities.

We are proud to represent official providers of geospatial information across Europe, working with them to enable access to their data and expertise for the public good. Today, our members provide much more than traditional maps.

By using cutting edge technologies, they collect, maintain and deliver high quality data and services that link information, gain insight and target action to address key environmental, social and economic issues.

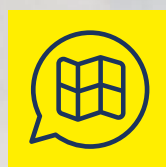
In doing so, they are enabling a data-driven society empowered by the use of their trusted maps, geospatial and land information.



VISIT OUR WEBSITE
<https://eurogeographics.org>



Enabling access
to members' data
and expertise



Representing
members'
interests



Providing opportunities
for knowledge
exchange



List of Members

Albania

- | State Authority for Geospatial Information
- | State Cadastral Agency

Armenia

- | Cadastre Committee of the Republic of Armenia

Austria

- | Federal Office of Metrology and Surveying

Azerbaijan

- | The State Cadastre and Registry of Real Estate under the Ministry of Economy

Belarus

- | State Committee on Property of the Republic of Belarus

Belgium

- | General Administration of Patrimonial Documentation
- | National Geographic Institute

Bosnia & Herzegovina

- | Federal Administration for Geodetic and Real Property Affairs

Bosnia & Herzegovina

Rep.Srpska

- | Republic Authority for Geodetic and Property Affairs of Republic of Srpska

Bulgaria

- | Geodesy, Cartography and Cadastre Agency

Croatia

- | State Geodetic Administration of the Republic of Croatia

Cyprus

- | Cyprus Department of Lands and Surveys

Czech Rep

- | Czech Office for Surveying, Mapping and Cadastre

Denmark

- | Agency for Climate Data
- | Danish Geodata Agency
- | Faroese Environment Agency

Estonia

- | Estonian Land and Spatial Development Board

Finland

- | National Land Survey of Finland

France

- | General Directorate Cadastral Bureau
- | National Institute of Geographic and Forest Information

Georgia

- | National Agency of Public Registry

Germany

- | Federal Agency for Cartography and Geodesy
- | Working Committee of the Surveying Authorities of the Laender of the Federal Republic of Germany

Great Britain

- | HM Land Registry
- | Ordnance Survey
- | Registers of Scotland

Greece

- | Hellenic Cadastre
- | Hellenic Military Geographical Service

Hungary

- | Lechner Non-Profit Ltd.

Iceland

- | Natural Science Institute of Iceland

Ireland

- | Tailte Éireann

Italy

- | Italian Geographic Military Institute
- | Revenue Agency

Kosovo*

- | Kosovo Cadastral Agency

Latvia

- | Latvian Geospatial Information Agency
- | The State Land Service

Lithuania

- | National Land Service under the Ministry of Environment
- | State Enterprise Centre of Registers

Luxembourg

- | Administration of the Cadastre and Topography

Malta

- | Malta Land Registry
- | Malta Planning Authority

Moldova

- | Agency for Geodesy, Cartography and Cadastre of the Republic of Moldova

Montenegro

- | Real Estate Administration

North Macedonia

- | Agency for Real Estate Cadastre

Northern Ireland

- | Land and Property Services

Norway

- | Norwegian Mapping Authority

Poland

- | Head Office of Geodesy and Cartography

Portugal

- | Directorate General for Territory

Romania

- | National Agency for Cadastre and Land Registration of Romania

Serbia

- | Republic Geodetic Authority

Slovak Republic

- | Geodesy, Cartography and Cadastre Authority of the Slovak Republic

Slovenia

- | Surveying and Mapping Authority of the Republic of Slovenia

Spain

- | General Directorate for the Cadastre
- | National Geographic Institute of Spain
- | Territorial Commission of the Geographic High Council

Sweden

- | The Swedish Mapping, Cadastral and Land Registration Authority

Switzerland

- | Federal Office of Topography swisstopo

The Netherlands

- | Cadastre, Land Registry and Mapping Agency

Turkey

- | General Directorate of Mapping

Ukraine

- | State Service of Ukraine for Geodesy, Cartography and Cadastre

* This designation is without prejudice to positions on status, and is in line with UNSC 1244 and the ICJ Opinion on the Kosovo Declaration of Independence.



President's Report



EuroGeographics has been proudly representing Europe's National Mapping, Cadastral and Land Registration Authorities for 25 years.

Today we are recognised as the point of contact for advice, comment, and supply of European geospatial and land information from official national sources, not only in Europe but also at global level through our partnership with the United Nations Statistical Division and United Nations Committee of Experts on Global Geospatial Information Management (UN-GGIM).

We believe in a society empowered by our members' trusted data which provides fundamental information about location to find solutions for global challenges. Its integration into the infrastructures we rely upon as a modern society enables the connection between people and place to provide the link between information and action.

In a world where misinformation and disinformation are rife, authoritative geospatial data has never been more important for confident and informed decision-making. Its value is recognised as an essential enabler for achieving the 2030 Agenda for Sustainable Development and in the UN-endorsed Integrated Geospatial Information Framework (IGIF), which is being implemented by many of our members to strengthen capabilities.

The EU defines geospatial as a high-value dataset for its important benefits for society, the environment and the economy, in particular the creation of value-added services, applications and jobs. In 2024, the European Parliament took a significant step towards addressing the current lack of policy ownership for geospatial data within the European Union (EU) by approving a €2 million pilot project. The proposal for the study, which will analyse and recommend how the Commission can ensure an effective and harmonised policy for core reference geospatial information, was the direct result of EuroGeographics 2023 event for MEPs in Strasbourg.

A focus on delivering trusted, high-quality and reliable pan-European datasets, combined with our strong knowledge exchange and representation capabilities, therefore continues to give the Association and its members increased relevance. Current users include One United Nations Geospatial Situation Room, the European Commission and its agencies, notably the European Environmental Agency (EEA) and Copernicus Services, FRONTEX, and the EU External Action Service.

However, providing easy access to data alone is not enough to meet the needs of our stakeholders – they need data they can use. We achieve this through our unique harmonisation and edge-matching production process. By seamlessly integrating members' national data, it provides the added-value that make our pan-European datasets useable.

The datasets, available through the Open Maps For Europe (OME) portal and OME2 Project, prove that Europe's National Mapping, Cadastral and Land Registration Authorities can deliver the authoritative large and small-scale data users want. Indeed, OME2, which is co-funded by the EU, has seen higher-than-expected user numbers for all its datasets and by the end of 2024, an average of 491 new users a month were registering on the portal.

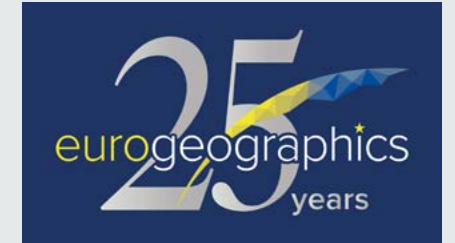
In the past 12 months, OME2, which will be completed in December 2025, has also extended coverage of the high-value, large-scale pan-European prototype and the pilot Open Cadastral Map. Both provide a foundation for future pan-European high-value data aligned with UN core geospatial data recommendations and key EU Policy objectives. Together with our members, we are committed to securing ways to continue to offer this high-value pan-European data after the end of the project.

It is a privilege to represent members and to highlight the tangible benefits their expertise and data deliver to society. As the case studies in this report demonstrate, they fulfil an essential role ensuring fundamental information about location is available for confident, informed decision making. In doing so, they enable us all to look to the future with greater certainty as we work together to overcome a wide range of challenges from security, climate change and environmental monitoring to economic growth and prosperity.

Tomaž Petek
President, EuroGeographics



Secretary General and Executive Director's Report



EuroGeographics is a remarkable example of what can be achieved through Europe-wide cooperation.

Our collaborative approach, which brings together collective expertise across national boundaries, is one of the Association's primary strengths. Whether working with our members to enable access to their data and expertise, using our unique data harmonisation process to deliver pan-European datasets, or building relationships with those who share our goal of using geospatial data for the benefit of all, it underpins all our activities.

Throughout 2024, we have continued to make a compelling case for the further integration of official data within the European and global infrastructures by highlighting its essential contribution to realising EU and UN objectives. Whilst the high-value, large-scale data delivered by the Open Maps For Europe 2 (OME2) project provides a practical demonstration of its value, our responses to European Commission Calls for Evidence, such as those on the GreenData4All and the Digital Europe Funding Review, showcase our members' extensive experience and expertise in policy implementation.

At global level, EuroGeographics' Policy Network (POLKEN) contributed to a UN paper on authoritative geospatial data for disaster risk reduction and crisis management as part of a collaboration with the UN-GGIM Working Group

on Policy and Legal Frameworks for Geospatial Information Management. These joint activities, which were part of our agreement with the United Nations Statistical Division to provide a platform for knowledge exchange and capacity building, included co-hosting a meeting with National Geographic Institute, Belgium and UN-GGIM: Europe. In addition, we contributed to the 'One United Nations Geospatial Situation Room' through the provision of harmonised, open pan-European data to the UN's Second Administrative Level Boundaries (SALB) programme.

In Europe, our agreement with Eurostat continues to provide a database of official administrative boundaries for geo-referencing statistics to the European Commission, its agencies and National Statistical Institutes. The EU institutions have access to our pan-European topographic, gazetteer and imagery datasets and services delivered through the Open Maps for Europe interface and the OME2 project.

National Mapping, Cadastral and Land Registration Authorities are also recognised for their essential contributions to Copernicus through our strong partnership with the European Environment Agency (EEA).

In particular, we have developed a framework licence as a practical solution to overcoming legal barriers to data access for disaster response and recovery, security and land services. The licence delivered through the GEOspatial In situ Data (GEOID) contract is key to increasing the use of authoritative data and strengthening cooperation. Following the successful completion of this contract in 2024, I am pleased to announce that we are again providing services as a sub-contractor in the eGEOS consortium which includes exploring opportunities for working with the EEA to provide high-value, edge-matched, harmonised pan-European hydrography data.

Hydrography is one of the three themes being delivered in the OME2 high-value large-scale pan-European prototype which now covers five countries, and one which attracted a great deal of interest from the newly appointed EU Commissioners. As a result, we have presented the project, which is co-funded by the EU, to representatives from Economy and Productivity; Agriculture and Food; Prosperity and Industrial Strategy; Implementation and Simplification, under whose portfolio Eurostat sits; and the Commissioners Cabinet responsible for Sustainable Transport and Tourism.

OME2 runs until the end of 2025 and continues to deliver its objectives. Its success shows that the availability of high-value large-scale data is a positive game changer for the National Mapping, Cadastral and Land Registration Authorities of Europe, with the innovative tools and processes being developed representing significant advancements for High-Value Data implementation.

As EuroGeographics approaches its 25th anniversary, the project is just one of the many achievements to be celebrated. In 2025, our members will not only celebrate past successes, but they will also set the future direction of the Association. By continuing to provide data and expertise aligned with user needs, they will ensure that it remains well-positioned to meet the challenges and opportunities of the next quarter century.

Sallie Payne Snell
Secretary General and
Executive Director

Highlights 2024



Enabling access to members' data and expertise



Connecting users
to official national
geospatial information



Facilitating access to high-value geospatial datasets



Providing
expertise in data
production

Pan-European datasets

Updated and quality continuously improved through our unique data integration process in collaboration with:

- > 45 Data Producers

National Institute of
Geographic and Forest
Information (IGN)

Coordinates production of
EuroGlobalMap, 1: 1 million scale
multi-themed topographic open data.

Cadastre, Land Registry
and Mapping Agency,
The Netherlands (Kadaster)

Provides quality management and generalisation tools.



Federal Agency for Cartography and Geodesy (BKG)

Agreement signed with BKG to continue management of dataset production for:

- > **EuroBoundaryMap**, which enables the exact matching of administrative units with statistical data using a European-wide unique identifier.
- > **EuroRegionalMap**, multi-themed topographic data at 1:250 000 scale.
- > **Open datasets** available through www.mapsforeurope.org
- > **Open data version** of EuroRegionalMap
- > **Open Gazetteer**, a service providing authoritative multilingual geographical names.
- > **EuroDEM**, 1:100 000 scale digital open data elevation model providing height data.



Enabling the European Institutions to access official pan-European data

Agreement with Eurostat

- Provides EuroBoundaryMap to European Commission, including all EU National Statistical Institutes.



Contribution to 'One United Nations Geospatial Situation Room'

- > Provides European open data for UN Second Administrative Level Boundaries (SALB) initiative.
- > Supports aim of compiling global administrative boundaries data from authoritative national sources.



Cooperation with the European Environment Agency (EEA)

Successful conclusion of GEOspatial In situ Data (GEOID) contract, coordinated by e-GEOS.

- Increases number of official national geospatial datasets available via the Copernicus Reference Access Data gateway.
- Streamlines licensing process through Copernicus Framework Agreement.
- 27 members signed the Copernicus Framework Agreement.
- 23 members have signed the annexes facilitating data to the Copernicus Land Monitoring Service (CLMS) and Copernicus Security Service (CSS).
- 27 members have signed the Copernicus Emergency Mapping Service (CEMS) annex.
- Case Studies from Albania, Spain, Germany, Iceland, Latvia, Poland, Portugal and Slovenia published.

Open Maps For Europe 2 (OME2)



Foundation for future
pan-European
high-value datasets



Production process and
prototype for harmonised
large-scale data



Aligned to EU Policy
objectives and UN
core geospatial data
recommendations

OME2 provides a foundation for future pan-European high-value datasets.

It is developing:

- New production process and technical specification for free-to-use, edge-matched, interoperable data under a single open licence to create a prototype dataset covering 10 countries.
- The prototype is aligned to key EU Policy objectives and UN core geospatial data recommendations.

OME2 is co-funded by the European Union.
The project:

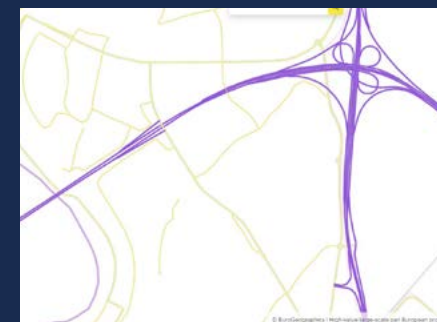
- Advances the data sharing tools needed to deliver free-flowing, interoperable data for the single market.
- Saves users time, effort and resources by providing harmonised data from multiple countries through one portal.
- Supports implementation of the Open Data and reuse of Public Sector Information Directive by re-using techniques nationally and sharing good practices.

The three-year project is being delivered by EuroGeographics; National Geographic Institute, Belgium; National Institute of Geographic and Forest Information, France; Hellenic Cadastre; General Directorate for the Cadastre, Spain; and Cadastre, Land Registry and Mapping Agency, The Netherlands.



Key achievements

- High-value large-scale pan-European prototype
 - Release of version one providing authoritative administrative boundary and transport data for Belgium, France and The Netherlands.
 - Release of version two with coverage for two additional countries, Luxembourg and Switzerland, as well as updates and improved edge-matching tools.
- Update of Open Cadastral Map
 - Data service expanded with four more countries: Greece, Latvia, Luxembourg and Slovakia.
 - Metadata now available for all datasets.
 - Machine-readable metadata now available on the European Data Portal.
- Launch of prototype Geopackage download by theme, country or administrative area. Users preferring a web service can continue to choose from WFS, WMS or WMTS.
- Update of Open Gazetteer which provides geographical names, variant names, toponyms and exonyms for over 40 countries and territories.
- An average of 491 new users a month registered on the Open Maps For Europe portal. Since the launch of OME2, the total number of registered unique users has increased by 250% to 14 430 unique registered users.
- OME2 datasets now available via the Belgian, German, French, Spanish and the Netherlands national geoportals.
- Plans for a pan-European Cadastral Data Strategy presented at workshop on Sustainable Business Models for NMCAs jointly organised by EuroSDR and EuroGeographics.
- OME2 User Requirements Workshop held for key stakeholders.
- Victoria Persson, Project Manager – Data Access and Integration, EuroGeographics presented the Open Cadastral Map, which is being enhanced by OME2, at the Cadaster Data - A Better Country Tomorrow conference in Latvia.
- Dorus Kruse from project partner, Kadaster gave an overview of OME2 in the context of Europe's growing role using high-value datasets and digital transformation at FIG - International Federation of Surveyors Working Week 2024.
- Joint webinar with MAREGRAPH, RODEO, and BeOpen EU-funded projects showcasing collaborative efforts to revolutionise the landscape of High Value Datasets (HVDs).



OME2 high-value large-scale pan-European prototype showing the Maastricht border.



Victoria Persson, Project Manager – Data Access and Integration, EuroGeographics promotes OME2 in Latvia



Open Cadastral Map

OME2



Co-funded by
the European Union

Representing Members interests



Demonstrating value of trusted geospatial services from official national sources

- Weekly policy news summary
- Policy pages in regular members newsletter



Establishing partnerships to support the public good

- Tracking Records
- Briefing papers, meetings and webinars



Promoting integration of authoritative data within the European and International systems

European activities



- EuroGeographics accepted as a member of the Strategic Stakeholder Forum (SSF) of the Data Spaces Support Centre (DSSC), the support action that facilitates the deployment of the Common European Data Spaces across Europe.
- Sallie Payne Snell, EuroGeographics Secretary General and Executive Director presented on the value of members data to the EU External Action Service.
- Joint Permanent Committee on Cadastre (PCC) and EuroGeographics Cadastre and Land Registry Knowledge Exchange Network (KEN) Conferences and Plenary in Belgium.
- Participation in EU Space Days 2024 which brings together policymakers, the space industry, and entrepreneurs to share knowledge and experiences.
- Participation in the SEMIC Conference – the agenda was aligned with the Interoperable Europe Act
- Joint PCC – EuroGeographics Cadastre and Land Registry KEN workshop in Latvia.
- Tomaž Petek, EuroGeographics President presented on the geospatial ecosystem for sustainable development at the First Assembly of Surveyors of Serbia and Republic of Srpska, and the Spatial Data Infrastructure Days in Bosnia and Herzegovina.
- Commission Call for Evidence for an Interim evaluation of the Digital Europe programme: EuroGeographics highlighted the importance of EU funding for pan-European authoritative geospatial data for Digital Europe's Data Spaces.
- GreenData4All Commission Call for Evidence: EuroGeographics welcomed modernisation of INSPIRE Directive rules but warned that removing location data from its scope risks having little or no governance in the geospatial sector.
- Participation in 11th Plenary Meeting of UN-GGIM: Europe as observer on the Executive Committee.
- Sallie Payne Snell, EuroGeographics Secretary General and Executive Director presented on members use of AI at the Joint Meeting between CES and UN-GGIM: Europe (Common Day).
- Participation in European Forum for Geography and Statistics (EFGS).
- Participation in the 2024 General Assembly of the Council of Geodetic Surveyors.
- Participation in the 2024 General Assembly of the European Land Registry Association

Global activities

14th Session of UN-GGIM Committee of Experts

Interventions demonstrated EuroGeographics participation, collaboration and contribution to the Committee's activities as observers, globally and in Europe.

- Confirmed our continuing commitment to providing the UN-GGIM: Europe Secretariat through the Service Level Agreement with The Netherlands.
- Reiterated our willingness to share our network, which links different players within wider data ecosystem, and communications infrastructure, for the benefit of the broader UN-GGIM community.
- Welcomed the paper Rescuing the SDGs with Geospatial Information and suggested that it is an excellent avenue through which to demonstrate the importance of including the geospatial community in drafting the post-2030 development agenda.
- Welcomed the Hidden Risk Report paper on Authoritative data in an evolving geospatial landscape: an exploration of policy and legal challenges and will continue to raise awareness of the importance of the global geodesy supply chain.



- Sallie Payne Snell, EuroGeographics Secretary General and Executive Director presented on the importance of authoritative data from official sources at a UN-GGIM 14 side event.
- Participated in the seventh High-level Forum (HLF) on United Nations Global Geospatial Information Management which highlighted practical examples and case studies showing the value of geospatial data in building resilience and supporting sustainable development.
- Collaboration between EuroGeographics' Policy Network (POLKEN) and UN-GGIM Working Group on Policy and Legal Frameworks for Geospatial Information Management. This includes co-hosting a meeting with National Geographic Institute, Belgium and UN-GGIM: Europe and contributions to a UN paper on authoritative geospatial data for disaster risk reduction and crisis management.
- Participated in Geospatial World Forum 2024 where Sallie Payne Snell EuroGeographics Secretary General and Executive Director and Angela Baker, Head of Partnerships and Sustainability moderated panels on the roles and mandates of contemporary National Geospatial Agencies, and the role of AI and machine learning in geointelligence.

Providing opportunities for knowledge exchange



Maintaining an extensive knowledge exchange network



Delivering webinars that enable maximum participation by members



Organising a comprehensive calendar of events, including with partners

- > 1500 total participants in knowledge exchange programme
- > Members-only webinar series
- > Wide range of events held by Cadastre and Land Registry KEN, Policy KEN, Quality KEN and Technical Data KEN.
- > Quality KEN held a virtual spring Plenary meeting and an in-person Plenary in Slovakia.
- > European Policy Update webinar.
- > Technical Meeting of the EuroGeographics Data Producers 2024
- > Permanent Correspondents Exchange annual webinar was held as a virtual meeting.
- > Joint webinar with the EEA on Copernicus Services Framework Agreement and associated annexes.
- > Joint workshops with EuroSDR on geodata discovery, and sustainable business models for NMCAs.
- > Continued collaboration with UN-GGIM, including providing a platform for UN-GGIM: Europe webinar series.



General Assembly 2024

115 participants from 37 countries

Hosted by the National Geographic Institute, Spain in Sevilla.

Focused on high-value geospatial data and its role in providing fundamental information about location to find solutions for global challenges.



Members Case Studies



Enhancing spatial data capabilities in Armenia

“During 2024, the Cadastre Committee implemented a series of priority measures aimed at advancing the spatial data sector in the Republic of Armenia. In the context of the full implementation of the National Spatial Data Infrastructure (NSDI), the integration processes of sectoral/thematic spatial data play a significant role. Looking ahead, the continued development of the NSDI will be supported by a new five-year strategy, set to be finalised in 2025, which will further refine the sector’s framework for data creation, management, and integration. With these ongoing initiatives, the Republic of Armenia is poised to enhance its spatial data capabilities, promote better decision-making, and contribute to sustainable development across various sectors.”

Suren Tovmasyan
Head, Cadastre Committee,
Republic of Armenia

Visualization of some of the new
geospatial data themes integrated into
the national geoportal.

Electronic service delivery platform.

Visualization of a geographic
object passport.

Armenia is enhancing its spatial data capabilities by further improving the national geoportal and continued development of the National Spatial Data Infrastructure (NSDI).

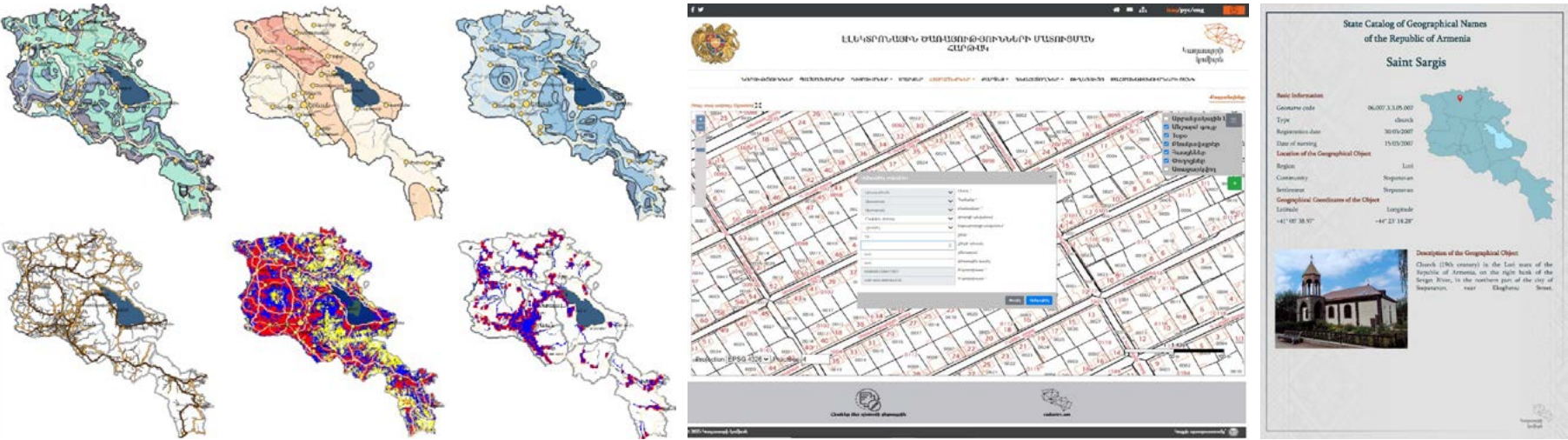
The Cadastre Committee worked in collaboration with the Ministry of Environment, the Ministry of Territorial Administration and Infrastructure, the Ministry of Internal Affairs, and the Ministry of High-Tech Industry to successfully integrate their official datasets in the geoportal using web-based cartographic services. This enables seamless access to geospatial data and ensures interoperability across various platforms. As a result, users now have access to more than 20 geospatial data themes. These include nature reserves, national parks, natural monuments, road networks, mineral water sources, hydraulic infrastructures, power lines, landslide zones, avalanche-prone areas, and mobile network coverage.

Implementation of a new multifunctional national geoportal, offering advanced capabilities for the integration and interoperability of sectoral thematic spatial data and comprehensive suite of geospatial tools and services, also began in 2024. The initiative, under the Asian Development Bank grant framework, enhances data access, analysis, and visualisation.

Technical specifications and national compliance standards ensure the quality of NSDI data. The Cadastre Committee has therefore initiated the correction and accuracy enhancement of cadastral maps for 500 settlements, with 155 of these adjustments completed in 2024. Furthermore, it has integrated the cartographic component of the Registry of Geocoded Addresses, which is accessible to all communities, into its electronic service delivery platform.

In addition, users can now retrieve detailed information about an object as a result of a new system for the automatic generation of geographic object passports. This includes its unique identifier (code), geographic location, coordinates, a brief description, and visual representation (with associated photograph), by interacting with the corresponding symbology of the object within the geoportal interface.

The Cadastre Committee has also developed an automated algorithm to perform rapid, systematic comparison between property registration data and the designated and functional use data reflected on maps to identify inconsistencies. Any discrepancies detected are subsequently transmitted to the relevant territorial subdivisions, where necessary adjustments are made in the database.



Benefits

- Provides seamless access to geospatial data and ensures interoperability across various platforms thanks to data integration in national geoportal.
- Enables communities to access continuously updated spatial data on property addresses, ensuring the completeness and accuracy of the registry information.
- Streamlines the addressing process of properties.
- Reduces the time required for property registration database reconciliation, optimises resource allocation, and enhances the objectivity and accuracy of results using an automated algorithm.
- Promotes better decision-making and contributes to sustainable development across various sectors.

Austria

Federal Office of Metrology and Surveying

Describing the topography of Austria with a new land cover service

“In Autumn 2024, BEV launched a new service allowing access to nationwide land cover information. This product is the outcome of an ongoing programme of digitisation at Austria’s national mapping agency. In addition to improving the efficiency of internal processes, we also expect it to have a significant impact on the quality of analysis and products using this data for environmental monitoring.”

Wernher Hoffmann
President, Federal Office
of Metrology and Surveying,
Austria

Easy-to-use really high-resolution land cover information is now available for Austria via a new service from the Federal Office of Metrology and Surveying (BEV).

Launched in Autumn 2024, BEV-Land Cover allows access to nationwide land cover information for six classes: water body, high vegetation, medium vegetation, low vegetation, building and ground area.

The service is based on digital orthophotos with 20 cm ground sampling distance and a Digital Surface Model derived from the ident set of aerial images.

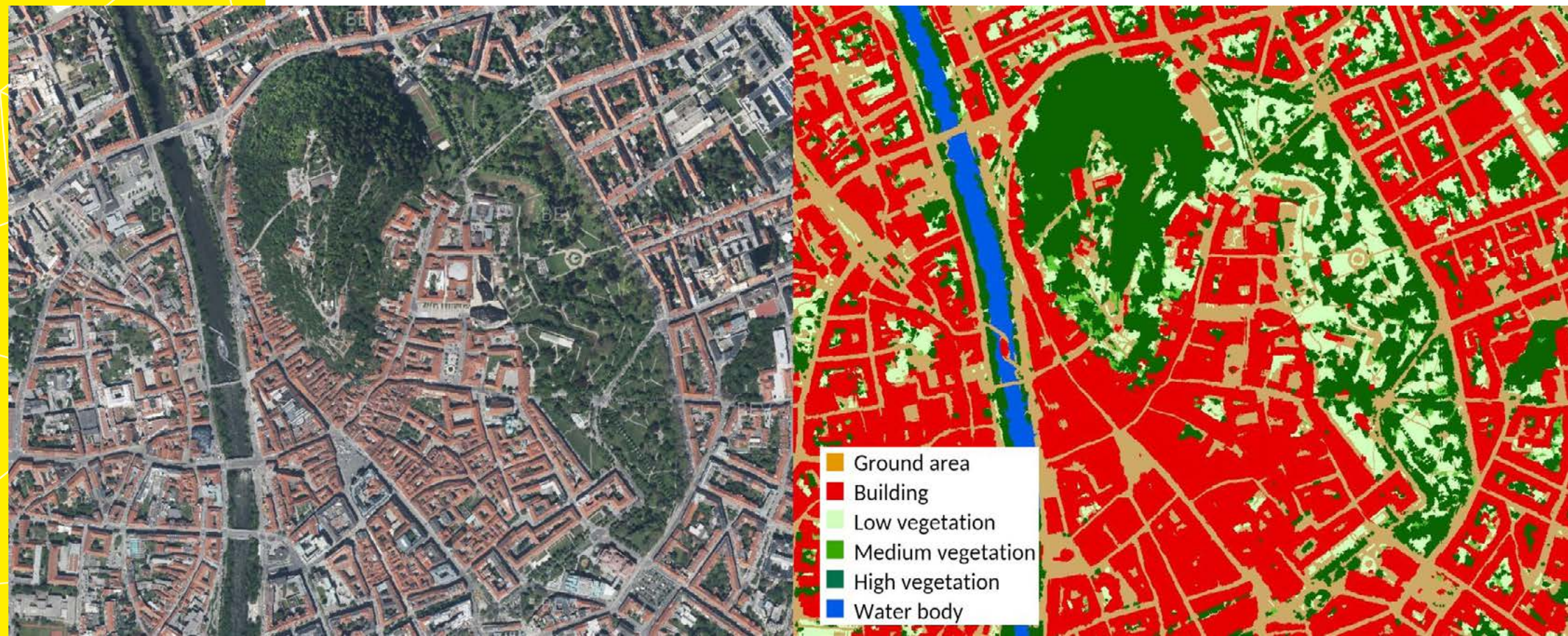
It also incorporates an airborne laser scanning-based Digital Terrain Model. An accurate separation of the regions covered with vegetation is achieved by calibrating the threshold of the Normalized Digital Vegetation Index (NDVI) in a few test areas within each flight block. Object-based image analysis is then used to classify the land cover information.

The data, which has a planned three-year update cycle, is available to users as a Web Map Service (WMS) or download from the BEV geoportal.

Benefits

- Provides an easy-to-use service that delivers really high-resolution land cover information.
- Improves efficiency as part of the digitalisation of BEV’s core processes.
- Enables the detection of land cover classes without any presuppositions.
- Plays an essential role in the detection and monitoring of soil use.
- Provides information to improve the accuracy of greenhouse gas balance.
- Incorporates land cover information into a modern national geodata infrastructure.

Graz city centre: digital orthophoto and BEV-Land Cover



Belgium

National Geographic Institute of Belgium

Enhancing climate risk assessment through geospatial collaboration

“Everything happens somewhere. Geodata enable us not only to understand the spatial dimensions of climate change, but also to develop adaptation and mitigation strategies that increase a country’s resilience. Thanks to our collaboration with CERAC, the indispensable role of geospatial data is being fully exploited to tackle climate challenges and build resilience, and thus a more secure future for Belgium.”

Ingrid Vanden Berghe
Administrator General, National
Geographic Institute of Belgium

A partnership between Belgium’s National Geographic Institute (NGI) and the newly established Climate Risk Assessment Center (CERAC) is delivering geospatial expertise and critical reports on biodiversity loss and wildfire risks. The collaboration is equipping CERAC to better evaluate Belgium’s exposure and vulnerability to climate and environment hazards in the middle and long term.

NGI started by conducting a comprehensive geodata needs assessment and benchmarking CERAC’s practices against those of similar organisations in the UK and Germany. To enhance CERAC’s capacity, NGI provided tailored training on geospatial tools, such as QGIS and GeoHub, empowering staff with essential skills. Advanced mapping materials were developed to visualise the results of CERAC’s internal analysis projects, ensuring these findings are accessible and impactful for both policymakers and the public.

In the second half of 2024, NGI produced two pivotal reports addressing important Belgium climate and environment risks. The first, a pre-analysis of literature on the risks associated with biodiversity loss, serves as a baseline reference for CERAC’s First Risk Assessment. The second report, initiated at the suggestion of the National Crisis Center, examines the growing risk of wildfires in Belgium – a challenge that is expected to grow significantly over the next decade due to climate change.



Visit the website:
<https://www.cerac.be>



Benefits

- **Strategic leadership:** Reinforced NGI’s position as Belgium’s federal geobroker and a key contributor to national climate resilience, safety and security.
- **Collaboration foundation:** Laid the groundwork for a Memorandum of Understanding to extend the partnership beyond 2024, making sure that Climate Risk Assessments in Belgium do not lack essential geospatial information
- **Effective communication:** Use of advanced maps and visualisations to clearly convey complex risk analyses to diverse audiences, ensuring the findings resonate with both experts and non-experts.
- **Strengthened policy-making and public awareness:** Provided actionable insights and accessible tools, including impactful visualisations, to enable the National Security Council, policymakers, and the public to better understand and anticipate climate risks.
- **Enhanced preparedness:** Delivered reports addressing biodiversity loss and future wildfire risks to guide long-term strategies.
- **Capacity building:** Trained CERAC staff in geospatial tools, enhancing their analytical capabilities.

Croatia

State Geodetic Administration

Surveying Croatia's land and real estate to strengthen economic competitiveness

"Land and real estate are valuable economic resources, with accurate information about their ownership, boundaries, and usage being critically important. The Multi-Annual Cadastral Survey Program in Construction Areas serves as a foundation for future development, more secure planning, and greater transparency in spatial management. The full benefits of this project will become even more evident in the years to come."

Antonio Šustić
Director-General of the State
Geodetic Administration

Croatia is strengthening economic competitiveness through a new initiative to provide accurate information about land and real estate. The landmark land administration project – **Multi-Annual Cadastral Survey Program in Construction Areas** – addresses the longstanding issue of discrepancies between cadastral and land registry data.

The €401 million programme, run by the State Geodetic Administration (SGA), will cover 600,000 hectares of construction land across Croatia over a period of 10 years. It is expected to deliver a significant return on investment to the Government as a result of an improved business environment, increased investment, better management and maintenance of state assets, as well as enhanced public administration. Additionally, the project will contribute to greater judicial efficiency and improved spatial planning.

The programme was adopted by the Croatian Parliament in October 2021 and citizens in the areas to be included then received an invitation from the SGA with all the information needed to participate. Citizen participation is crucial for data accuracy as it assists in marking boundaries and can provide feedback on the final documentation before it is submitted for judicial procedures.

Compared to previous surveys, the process has been significantly shortened through the integration of information systems, legal changes, and active citizen participation. The surveys are conducted by licensed geodetic engineers with all activities overseen by the SGA.

Updated and accurate cadastral and land registry data is available free of charge to the public via Uređena zemlja portal.



More information

<https://www.visegodisnjiprogram.dgu.hr>

better quality pictures available?



Benefits

- Enables accelerated implementation of development and infrastructure projects, improved management of real property, increased opportunities for utilising EU funds, and a strengthened real estate market for local government.
- Provides clear and updated property documentation at no additional cost to private property owners, enhancing value and improving competitiveness in the real estate market.
- Facilitates the implementation of sustainable development policies and supports green technology through enhanced energy efficiency in building construction, reduced CO2 emissions, sustainable land planning, waste management, conservation of natural resources, and effective management of water, soil, and other natural resources.
- Contributes to increasing transparency in land and real estate management through digitalised registers and systems, as well as shortening the timelines for the entire process.

Cyprus

Department of Lands and Surveys

Using a modern alternative to traditional surveying methods to deliver accurate, detailed data in Cyprus

“By harnessing the capabilities of Unmanned Aerial Vehicles (UAVs), this pilot project offers a modern alternative to traditional surveying methods. The aim is to enable the efficient and cost-effective collection of cadastral and topographic data to create detailed, accurate, up-to-date maps, 3D models and geospatial information for a wide range of applications, such as mapping and cadastral surveying.”

Klito Demetriou

Manager of Cartography Branch,
Department of Lands and Surveys,
Cyprus

More detailed and accurate geospatial data including 3D models and updated topographical features can be delivered for a wide range of applications in Cyprus, thanks to a pilot project harnessing the power of Unmanned Aerial Vehicles (UAVs).

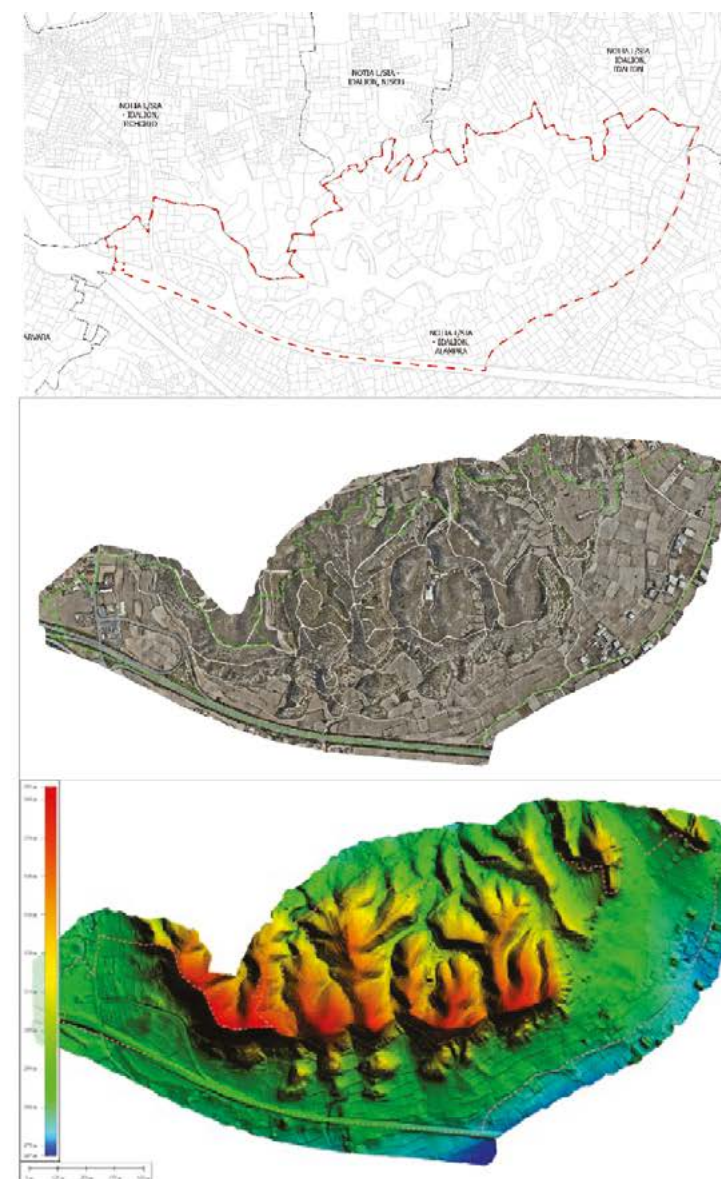
The initiative by the Department of Lands and Surveys, Cyprus uses the capabilities of UAVs for the efficient and cost-effective collection of cadastral and topographic data. Applications benefiting from the project include mapping and cadastral surveying.

The area of interest (AOI) of the pilot study covered an extent of approximately 2,7 km² – a block area for cadastral resurvey including 536 plots of government land, private parcels and forest land with uneven terrain.



The work was carried out using DJI's M350 RTK integrated with RGB camera P1 45MP full-frame sensor for photogrammetric data, and L2 LiDAR sensor, which supports up to five returns and real-time point cloud generation.

Field data collection, (project plan, GCP targets setting, data collection of images, and lidar) together with office data processing (orthomosaics, 3D mesh and GIS) were used to produce a range of products such as: Digital Elevation Models (DEM), Contours, Depiction of Rivers, Colour LiDAR by elevation and LiDAR elevation points.



Benefits

- Reduces manual processing time compared to typical field survey.
- Improves precision by delivering high-resolution imagery.
- Facilitates easier frequent updates.
- Monitors terrain changes over time.
- Enables feature extraction using AI.
- Delivers flexibility and cost savings compared to aerial photography and traditional field survey.
- Environmentally-friendly and minimises disruption to the surrounding area.
- Provides up-to-date data for mapping.

Denmark

Agency for Climate Data

Achieving the digitisation of Danish-German border documentation

“The digitisation of the Danish-German border delineation is a substantial and important task. For many years there have been calls to transition the analogue recordings to a digital version, and I am proud that we have now succeeded in initiating this task despite the differences between the two countries in areas such as administration and technology. This achievement testifies to a strong relationship, great trust and good cooperation across the border.”

Rikke Zeberg
Director General,
Agency for Climate Data,
Denmark

An important cooperation between authorities in Denmark and Germany has realised a long-held ambition to digitise the technical and legal documentation of the Danish-German 1920 border. The digitisation project was presented at the August 2024 joint border inspection, where the Agency for Climate Data represented Denmark.

The project aims to digitise, modernise and secure the analogue Border Atlas documenting the delineation of the border that spans more than 100 years. This honours the Danish-German treaty from 1920, following the Treaty of Versailles and the end of World War I, where the authorities of the two countries are obliged to cooperate on the maintenance of the border.

The so-called Border Atlas describes the delineation of the border in text and hand drawn sketches with both absolute and local coordinates. It is a requirement that the border is visible and therefore it is marked physically in the landscape by numerous border markers, and by the

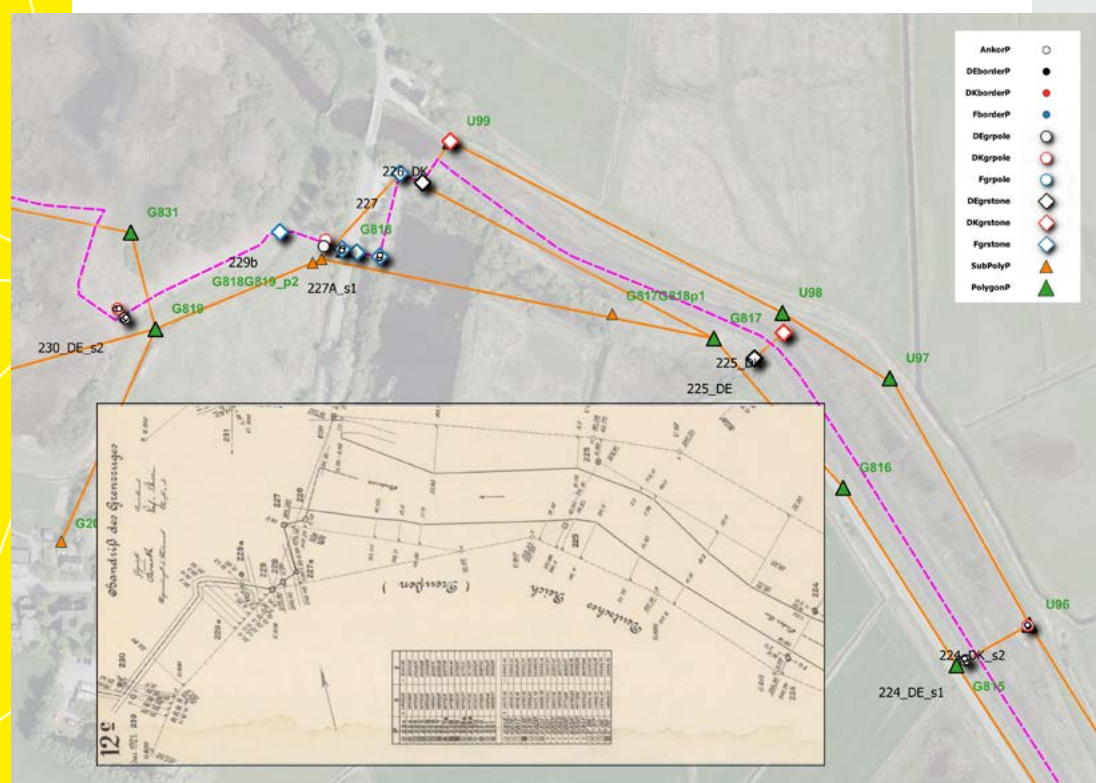
essential subsurface network of benchmarks. After more than 100 years, the old documents and the physical markers have partially deteriorated. This has been an increasing problem for fulfilling the joint obligation.

Now and in the coming years, extensive data collection fieldwork is being carried out. The physical attributes are measured in ETRS89 (European Terrestrial Reference System 1989), forming the basis for an equally extensive digitisation of the old sketches, coordinates and the many historical protocols documenting changes. The work is partly carried out simultaneously and the results are mediated if differences arise.

The digitisation secures the documentation and makes future maintenance more efficient. At the same time, it is a good example of the fine cooperation between the administrative authorities of the two countries, also contributing to the support and development of a good relationship between neighbours.

What does the 1920 treaty dictate and the Border Atlas contain?

- In 18 articles, the Danish-German treaty from 1920 regulates the many challenges arising from drawing a new border. Two of the articles describe the workflow and cooperation for the physical maintenance of the border.
- The Atlas serves as both the technical and legal documentation. It contains detailed documentation of the delineation of the border, described in text and by hand-drawn sketches with absolute and local coordinates related to the subsurface network of benchmarks. The Atlas also contains all historical protocols during the course of more than 100 years.



Denmark

Danish Geodata Agency

Providing cadastral data via one central platform for users in Denmark

“Cadastral data is Denmark’s foundational data and the platform that can support the extensive land reorganizations Denmark is undertaking as part of the green transition. With the launch of Matriklen.dk information about properties is available in one place so it can be easily accessed, found and used.”

Pia Dahl Højgaard
Director General,
Danish Geodata Agency

Denmark’s new platform for cadastral data enables users to explore the cadastral map, register and view information about properties in one place.

Launched by the Danish Geodata Agency in 2024, Matriklen.dk consolidates all cadastral information about real estate (real property), condominiums and buildings on leased land on a single platform. The intuitive, user-friendly and agile online service has enabled the Agency to future-proofed its data as well as to meet users’ current and emerging needs and preferences.

Around 60,000 visitors each month are using the platform which offers a number of ways to access cadastral data. Users can search for information about properties by cadastral number, address or BFE number. They can also search and click on the map to see information about properties and the cases which have affected them. In addition, historical data is available to show changes over time, both in the cadastral map and the register.



More information
<https://www.matriklen.dk>



Benefits

- Allows the Danish Geodata Agency to adapt to emerging needs for new datasets as they arise.
- Provides a user-friendly and intuitive experience for visitors.
- Saves time and effort – maintenance is now needed for only one platform.
- Enables agile data delivery.

Finland

National Land Survey of Finland

Safeguarding resilient positioning in Finland with activities strengthening the global geodesy supply chain

“We are relying on resilient positioning allowing us to navigate and create reliable spatial data to fuel innovation and growth. To maintain this, we need to tackle the hidden risks in the global geodesy supply chain and find solutions to alert and mitigate GNSS jamming and spoofing. This is crucial for ensuring a secure and resilient future.”

Pasi Patrikainen
Director General,
National Land Survey
of Finland

Modernisation and research activities in Finland are strengthening the global geodesy supply chain to ensure a precise and stable coordinate reference frame for satellite positioning, navigation, and Earth observation satellites.

The initiatives being delivered by the National Land Survey (NLS) of Finland support the United Nations (UN) resolution for a global geodetic reference frame for sustainable development. They are also part of NLS's contribution to the work of the UN Committee of Experts on Global Geospatial Information Management (UN-GGIM) and the UN Global Geodetic Centre of Excellence.

Modernisation of the Metsähovi Geodetic Research Station ensures the on-going link between international and national systems. The Station is part of the global network of geodetic core stations and also the core station for the national GNSS network, FinnRef.

In addition, Finland is taking a leading role in research with the Finnish Geospatial Research Institute of NLS seeking innovative solutions for resilient positioning such as open source multi GNSS software receiver and decoders for Open Service Navigation Message Authentication (OSNMA) and the Galileo High Accuracy Service (HAS).

Software tools allowing the implementation of Galileo's services in GNSS receivers are already available at <https://github.com/nlsfi/HASlib>. These include Galileo OSNMA and Galileo HAS which have been designed for improved protection against spoofing and improved positioning accuracy. NLS also runs GNSS-Finland, a real-time alerting system for GNSS signal anomalies.



To find out more about the research, contact
hannu.koivula@nls.fi



More information:
<https://github.com/nlsfi/>



Benefits

- Strengthens the global geodesy supply chain.
- Delivers tools for developing GNSS jamming and spoofing mitigation methods to improve the receiver resilience.
- Provides tools for testing and using the new European Galileo services.
- Enables maximum benefit through the use of open-source solutions.

France

National Institute of Geographic and Forest Information

Creating a Digital Twin of France and its territories to address 21st century challenges

“In a world increasingly confronted with the challenges of climate change and human activity, France is embarking on an ambitious project: the Digital Twin of France and its territories. This initiative aims to establish a public-private ecosystem and platform integrating a continuously updated dynamic virtual replica of French regions tied to strong simulation capacities in order to help informed decision making and improve the design, the management and the evaluation of projects, policies, and investments. While its scope is broad, a strong focus will be on sustainable development and ecological transition.”

Sébastien Soriano
General Director,
National Institute of Geographic
and Forest Information,
France

National Institute of Geographic and Forest Information (IGN France) is part of an innovative collaborative project to create a very high resolution and high-fidelity digital replica of France and its territories.

Following a hugely successful Call for Commons, which received more than 200 contributions, the Digital Twin project was launched by an unrivalled public-private consortium. It intends to establish a core infrastructure and platform that will support the development and use of advanced technologies such as artificial intelligence, augmented reality and high-performance computing. These tools will enable the visualisation, analysis and simulation of natural and social phenomena to meet challenges such as natural resource management, land management, or natural risk prevention.

A three-year national research program will complement these efforts, addressing technological challenges such as data interoperability and the development of robust 3D semantic meshes and models continuously updated with newest data. The aim is to provide an open, shared architecture, fostering innovation and the emergence of a new industry around digital twins.

The Digital Twin will serve as a foundation for addressing tangible challenges, including:

- Urban planning and ecological transition: Optimising urban densification, green planning and energy management.
- Natural risk management: Simulating floods, forest fires, coastal erosion and other climate-related phenomena.
- Public health: Modelling epidemic propagation and forecasting hospital demand.

These use cases will provide local authorities, decision-makers and citizens with precise tools for informed decision-making. At the same time, IGN-France and BKG are looking at cross-border use cases.

In addition, the digital twin platform will serve as a ‘Place of Science’, designed to host, develop, and promote more open, collaborative, evaluated and reproducible science and innovation.

Work to develop the core infrastructure and technological components of the platform started in 2025, with the first use cases set to be delivered by 2027. In the meantime, efforts will continue to unite public and private stakeholders around a shared vision: transforming and scaling-up territorial management using powerful, collaborative digital tools and making possible the global replication of local innovation experiments.



Georgia

National Agency of Public Registry

Transforming real estate transactions in Georgia with a cutting-edge smart service

“The National Agency of Public Registry is committed to providing innovative services to Georgian citizens. The smart contract has the potential to transform the real estate acquisition process, making it significantly more accessible and beneficial for Georgian citizens both within the country and abroad.”

David Devidze
Chairman of the
National Agency of Public Registry,
Georgia

Real estate transactions are being transformed by a new cutting-edge service that can be used anywhere in the world.

Introduced by the National Agency of Public Registry (NAPR) under the Ministry of Justice of Georgia, the smart contract is a user-friendly application for conducting real estate transactions securely, managing payments, and registering property rights. It can be used by Georgian citizens whether they are at home or abroad.

The concept of the smart contract was conceived at the NAPR and brought to life by the IT Department's skilled architects and programmers. This advanced system seamlessly integrates real estate transactions, personal identification, and a payment service supported by commercial banks.

Developed through a strong collaboration between the public and private sectors, the smart contract represents an innovative, high-tech advancement in NAPR's service portfolio. The platform is expected to expand with additional services, such as remote business registration and more.



Benefits

- Enables Georgian citizens, including those abroad, to purchase real estate without the need for intermediaries or power of attorney.
- Mitigates contractual risks by ensuring that property registration and payment transfers occur simultaneously.
- Ensures secure identification through the remote verification of the parties' identities using an AI-driven solution.
- Creates new opportunities for construction companies and real estate agencies to attract clients.
- Demonstrates effective public-private collaboration in the delivery of innovative digital solutions.
- Enhances international recognition of Georgia's real estate registration services.
- Contributes to Georgia's economic development through its potential to drive growth in the real estate market.

Germany

Working Committee of the Surveying Authorities of the Laender of the Federal Republic of Germany (AdV)

Ensuring a high-quality, consistent spatial reference for Germany

“The results presented contribute to a high-quality and homogeneous spatial reference for the Federal Republic of Germany. The AdV’s spatial reference working group has made a valuable contribution to infrastructural public services by carrying out the GNSS measurement campaign and subsequently providing an updated integrated geodetic spatial reference. This makes it possible to integrate various technical topics of different types at the highest level of accuracy in the spatial reference.”

Karin Schultze

AdV Chairwoman 2024/2025,
Ministry of Infrastructure and Digital
Affairs of the Land Saxony-Anhalt

The decision to introduce new coordinates by the official German surveying authorities in 2024 ensures consistency and quality in the integrated geodetic spatial reference. The new official spatial reference will be introduced as a realisation in 2025.

The new coordinates are the result of the GNSS measurement campaign carried out in summer 2021 on 250 geodetic basic network points. The evaluation was carried out at two computing centres – the BKG in Frankfurt/M. and the LGLN in Hanover. Both computing centres have access to the 24-hour observation data from at least two point occupations.

The campaign, delivered by approximately 35 measuring teams, was designed to be climate-friendly; around 100,000 km in driven distance was saved compared to the 2008 deployment whilst the same number of measurement points was covered. In the overall balance, this corresponds to an approximate 50% reduction of CO₂ emissions.

The results of the evaluation clearly show no nationwide uniform movements of the geodetic basic network points. In comparison with the existing official spatial reference, around 10% of the points show significant movements, particularly in height. Here, the expected geological movement rates in the centimetre range have been verified. The requirement for a position accuracy of 1 mm and a height accuracy of 2 mm for the point determination was met.

Geodetic reference network point “Altenberg” seen from South



© Christian Lewerenz (BKG)

Benefits

- Ensures the consistency of the SAPOS® coordinates as a result of the uniform introduction of the new realisation.
- Confirms the quality of the existing official integrated geodetic spatial reference.
- Creates the basis for the introduction of new measurement methods such as the new official PPP-RTK service of the AdV.

Germany

Federal Agency for Cartography and Geodesy

Keeping an eye on Germany's water resources with a high-precision network of sensors

"In the last 20 years, the water balance in Germany has not always been easy. Droughts like those in 2003 and 2018 not only caused problems for the groundwater level, but also for natural water storage as a whole. The lack of availability of the elementary resource water not only leads to considerable damage to nature and its ecosystems, but also has a significant impact on agriculture, forestry and other sectors. A large part of the reservoir for the vital element of water is located below the Earth's surface and cannot be seen with the naked eye. In combination with satellite data and hydrological models, the extended gravimeter network in Germany will help to make reliable statements even about regional changes in water resources."

Professor Paul Becker
President, Federal Agency for
Cartography and Geodesy

High-precision instruments for measuring changes in gravity are being used alongside satellite data and hydrological models to monitor Germany's water resources.

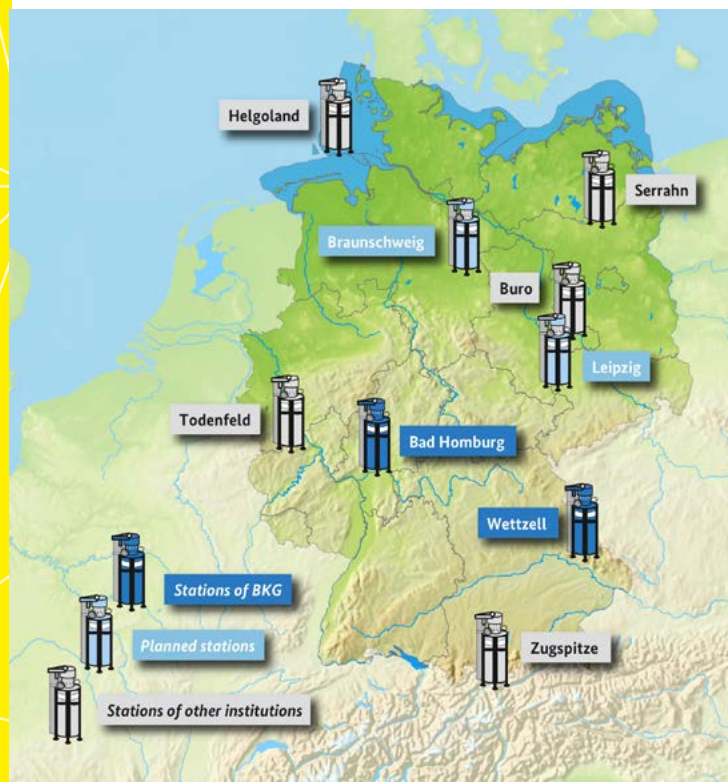
The Federal Agency for Cartography and Geodesy (BKG), together with partner institutions such as the GFZ Helmholtz Centre for Geosciences, is implementing a network of high-precision superconducting gravimeters. These measure the acceleration of gravity and its changes over time, that are influenced by terrestrial water storage changes, like groundwater or soil moisture.

For more than two decades, these small changes have been successfully monitored from space by the satellite missions of the Gravity Recovery and Climate Experiment (GRACE). The new network, which comprises the most stable and precise terrestrial gravity sensors, complements the data of large-scale features provided by GRACE with locally sensed and temporal highly resolved measurements.

Regional hydrological models that describe the water flux on the Earth's surface and into the ground are validated by comparing simulated and measured gravity variations. This bridges the gap in resolution between local terrestrial and global space-based gravity signals.

BKG's existing gravimeter stations in Wettzell and Bad Homburg, as well as those of GFZ in Helgoland, Mount Zugspitze, and Northern Germany, are being extended to build the permanent gravimeter observation network. The first steps have already been achieved with a new site in Leipzig-Holzhausen set up by BKG in partnership with Germany's National Weather Service. In addition, a new field installation by GFZ next to the Middle Elbe is also close to operation.

The gravimeter network in Germany



Superconducting gravimeter GWR OSG



Benefits

- Provides - based on terrestrial measurements - independent validation of variations in total water storage monitored using satellite data (GRACE).
- Enables detailed conclusions on water storage changes to be derived using a combination of high-precision gravimeters, regional hydrological models and satellite data.
- Uses the latest technology to record hydrological signals for the localisation of changes in water supplies.
- Applies the latest research findings to take a closer look at the changes in water storage.
- Demonstrates how BKG and its partner institutions are pooling resources to establish a gravimeter network for Germany that it could not have maintained alone.
- Delivers relevant and knowledge-based information about the changes in water storage for decision-makers and the public.

Great Britain

Ordnance Survey

Enhancing geospatial data quality to meet evolving user needs in Great Britain

“2024 has seen Ordnance Survey embark on a new journey to evolve our role in supplying foundational geospatial data to serve as a valuable resource for decision-makers and customers across Great Britain. Our Better Data, More Destinations strategy seeks to ensure that OS is able to keep pace with our users’ demands, by designing and executing workflows for greater effectiveness, while safeguarding the reliability and trust in the data. From building our capabilities in AI and automation, through to unlocking additional potential in existing data, we can enhance our value to users, while maintaining our authoritative role as the National Mapping Service for the country.”

Nick Bolton
Chief Executive,
Ordnance Survey
Great Britain

Ordnance Survey’s (OS) Better Data, More Destinations strategy is leveraging advanced technologies to enhance geospatial data quality and meet evolving user needs.

Initiatives being delivered include innovative data products and models, collaborations, and skills development.

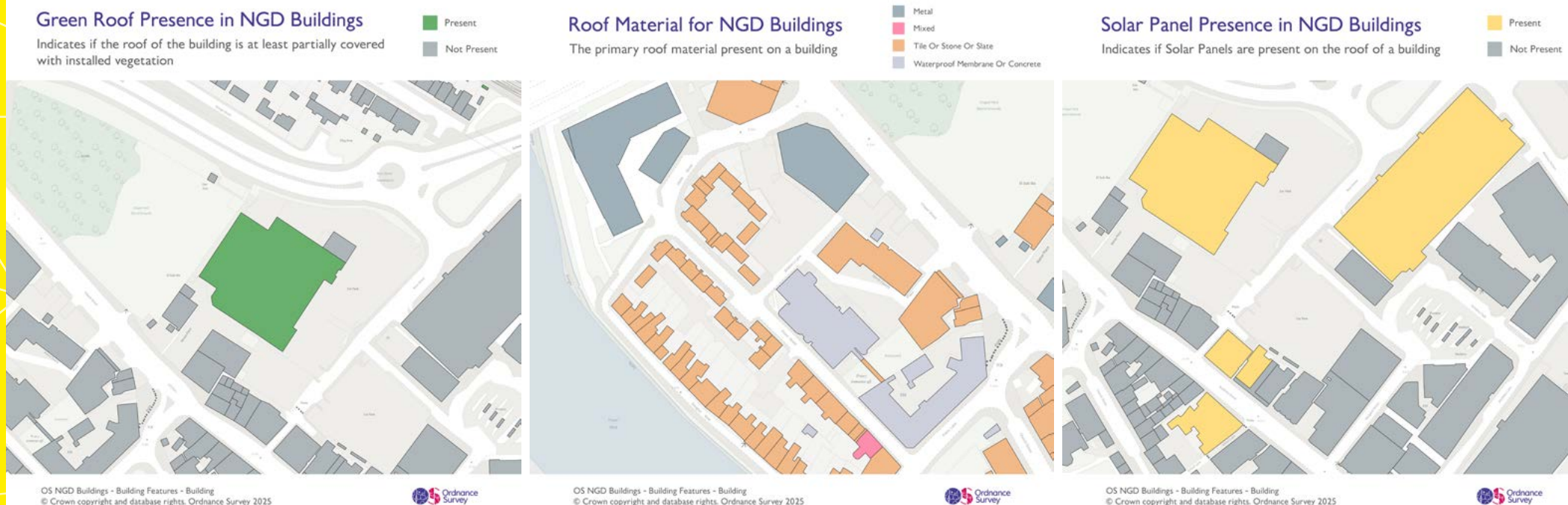
The implementation of automatic feature extraction (AFE) models in production has enabled the creation of a range of new national-scale products. These are generated using machine learning and geospatial post-processing to produce cartographically suitable data and metadata. The data provides information on roof materials, solar panels, and green roofs, as well as updated landcover datasets with detailed percentage cover information, and a field boundaries dataset with height and width attributes. In addition, the training of geospatial foundation model, using both current and historical imagery, is handling changes such as shadows and atmospheric conditions and benchmarked using manually labelled land cover data.

By providing essential geospatial context, OS’s collaboration with the National Centre for Earth Observation (NCEO) is unlocking the potential of Land Surface Temperature data. This is transforming Earth Observation (EO) data into actionable insights, ensuring its value is accessible to a broader audience beyond those with specialised skillsets.

Within the organisation, there has been a focus on AI adoption and skills development for employees. The emphasis is on responsible use underpinned by a Generative AI policy, modification of the software approvals process to include AI considerations, and the organisation of virtual training sessions alongside ‘promptathon’ hack days.

Benefits

- **Efficient data generation:** Automatic creation of datasets using OS aerial imagery and machine learning enhances data accuracy and availability.
- **Scalable updates:** Reusable data processing pipelines allow for efficient and large-scale updates, ensuring data remains current.
- **Enhanced model performance:** Improved production model performance leads to more reliable and actionable insights.
- **Resource efficiency:** Lower training data requirements and reduced model training time decrease costs and carbon footprint.
- **Increased productivity:** Streamlined processes and automation boost overall productivity by decreasing need for manual editing in certain workflows, improving efficiency and reducing human error.
- **Skill development:** Comprehensive training programs enhance digital skills among employees, benefiting the workforce and ensuring we keep pace with our users and the ambitions of the UK Government around the deployment of AI.
- **Informed decision-making:** EO data supports increased currency and better responsiveness to user requirements. For instance, the creation of climate adaptation plans for high temperatures, helping identify and protect at-risk areas, businesses, and people.



Hungary

Lechner Knowledge Centre

Tracking the effects of extreme water conditions with earth observation

“Geospatial datasets combined with time series of satellite images can provide a solid basis for trend analysis, anomaly detection and modelling, and hence should play a significant role in the long-term strategic development of climate change adaptation, responding to and monitoring of ad hoc phenomena, and for revealing cause and effect relationships.”

Gábor Mikus

Head of Earth Observation Operations, Lechner Knowledge Centre

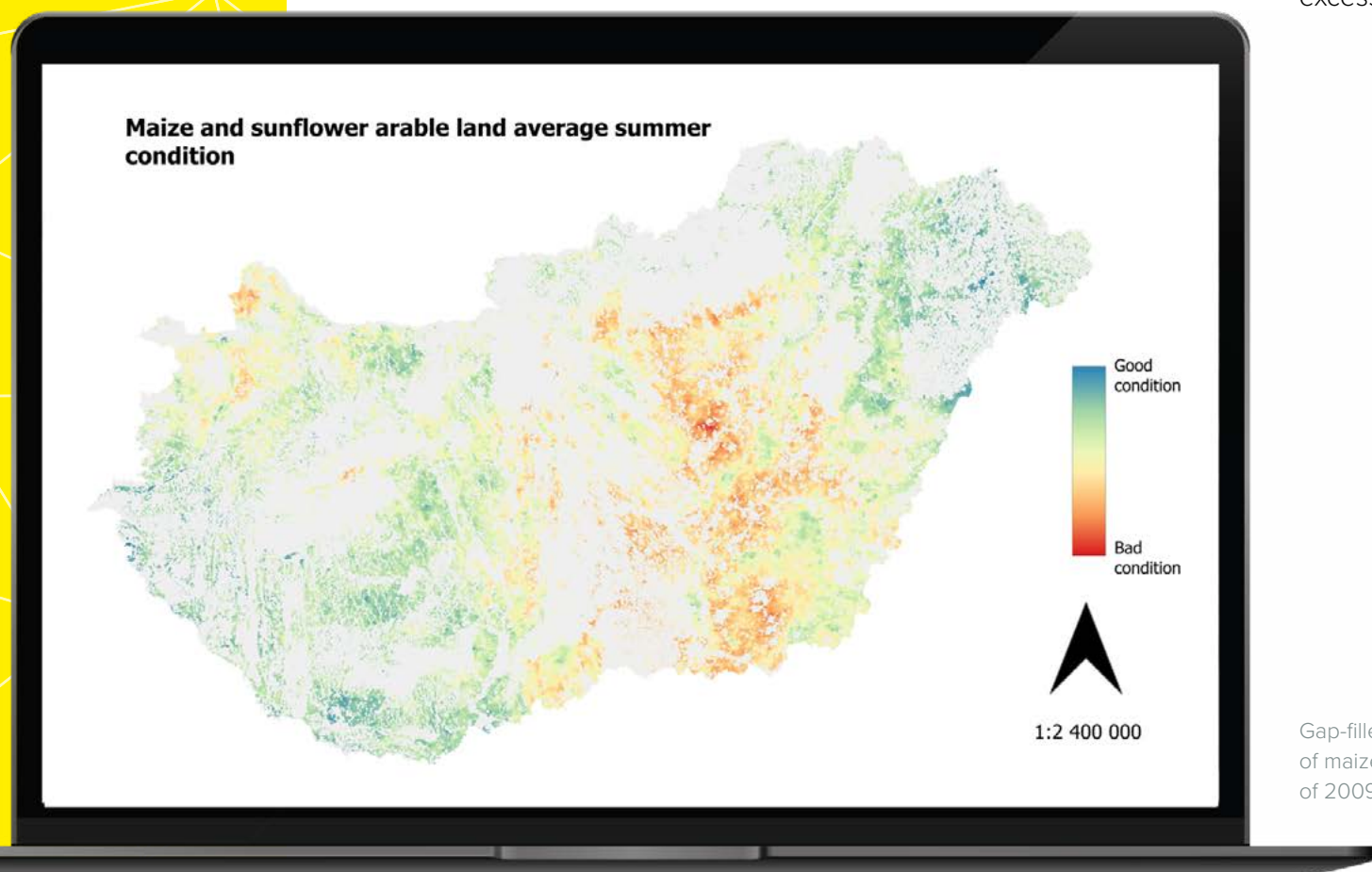
Mapping and monitoring of extreme hydrological events by time-series earth observation data, in combination with national geospatial datasets, provides insights for decision makers at different levels. As the Carpathian Basin and Hungary are particularly affected by climate change, the approach of data-driven, mindful decision making is indispensable for the adaptation to changing conditions and to mitigate related effects.

In Hungary, the Lechner Knowledge Centre (LTK) is providing authorities with regularly updated inland excess water and drought maps at multiple resolutions and timescales.

LTK, and its predecessor, the Institute of Geodesy, Cartography and Remote Sensing (FÖMI), have been actively involved in countrywide mapping and monitoring of extreme water conditions by remote sensing since the late 1990s.

For more than 10 years, data provision has been operational towards the Agricultural Risk Management System (MKR), a governmental infrastructure integrating relevant authorities and even the insurance sector.

The advent of the European Copernicus Sentinel ecosystem marked an important breakthrough in this field. Combined with other long-term Earth Observation time series along with thematic products such as crop maps and ancillary geospatial data, LTK now operationally provides high-resolution crop condition maps, drought maps, inland excess water maps and other derived products.



Gap-filled average summer condition of maize and sunflower over the period of 2009-2024, based on MODIS data.

Benefits

- Enables timely input for authorities assessing crop damage claims and helps to optimise field work through the delivery of high-resolution inland excess water and crop condition maps based mainly on Sentinel imagery.
- Provides medium-resolution drought, crop condition and water abundance maps based on a 25-year time series of MODIS imagery to detect trends and anomalies over long periods.
- Enables tracking of frequency, severity and seasonal characteristics of extreme water conditions at multiple resolutions.
- Provides invaluable input for strategic, synergistic planning of water management and possible land use conversions when products are combined with relevant information sources such as land cover/land use and cadastral data.

Iceland

The Natural Science Institute of Iceland

Monitoring lava flow to protect critical infrastructure and support decision-making in Iceland

“The Natural Science Institute of Iceland’s swift response to the Svartsegi eruptions and innovative use of geospatial technology demonstrate how science and collaboration can safeguard communities and critical infrastructure from the challenges of nature.”

Eydís Líndal Finnbogadóttir
Director General of The Natural Science Institute of Iceland

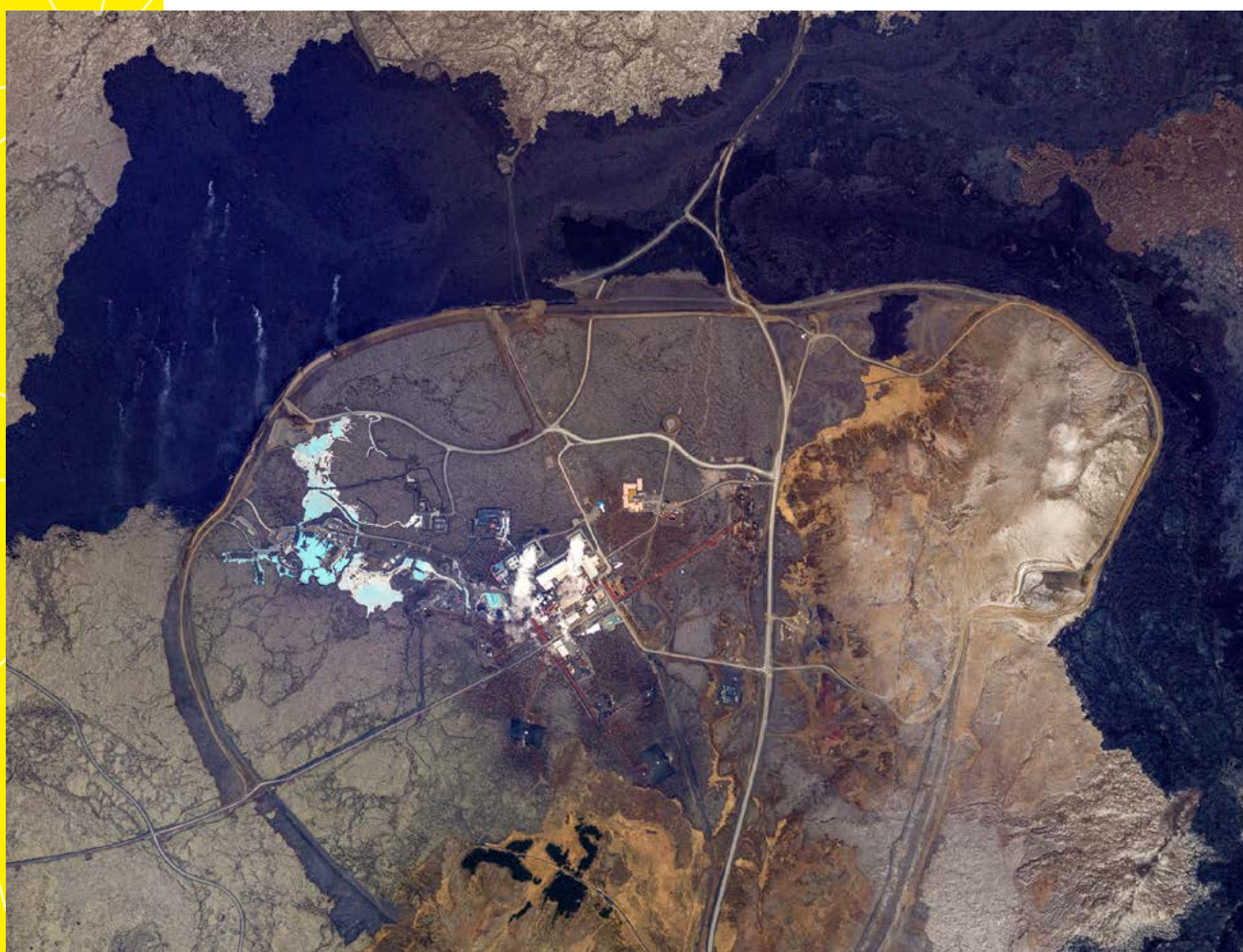
Data provided by the Natural Science Institute (NSII) was critical to Iceland’s civil protection activities following a series of volcanic eruptions in the Svartsengi region.

The NSII used arial photography to monitor 220 million m³ lava flowing across an area of 50 km². after the six eruptions in 2024. The insights provided were used to support decision-making and protect critical infrastructure after a state of emergency was declared.

Aerial imagery was collected before, during and after each eruption. It was then processed in near-real-time to produce a series of geospatial datasets, including orthophotomosaics, elevation models, lava outlines, lava thickness maps and lava volumes.

This information was used to design and position dikes and barriers, and to model and predict future scenarios of lava flows, safeguarding infrastructure such as the Blue Lagoon, Grindavík town, and a geothermal power plant. Thanks to a highly automated and streamlined workflow, all the data was distributed to the public within six hours of data acquisition.

The open and accessible data was used to underpin decisions to ensure public safety, minimise the economic impact, and enhance collaborative between public and private organisations.



Benefits

- Protects critical infrastructure, including power plants and businesses.
- Ensures the safety of communities in Grindavík and nearby areas.
- Supports informed decision-making during emergencies.
- Reduces economic losses from potential lava damage.
- Provides open and accessible data for researchers and policymakers.
- Enhances collaboration between public and private sectors.
- Demonstrates innovative use of geospatial technology.
- Strengthens public trust through transparency and rapid response.

Latvia

Latvian Geospatial Information Agency

Looking to the sky in Latvia to modernise large-scale map production

“Satellite imagery is one of the main building blocks used in the production of 1:500 000 scale maps. They are detailed enough to distinguish the main features: forests, agricultural land, built-up areas, marshes, water bodies, large watercourses, roads, railways. Improving and modernising data extraction enables us to speed up and facilitate the production of maps. The acquired knowledge enables us to further develop the Agency’s potential.”

Valdis Bērziņš
Deputy Director-General
in Geoinformation Matters,
Latvian Geospatial
Information Agency

Significant improvements to modernise and expand the use of Sentinel-2 satellite imagery in large-scale map production are being delivered in Latvia.

The Latvian Geospatial Information Agency has developed mechanisms and solutions to use the tools and knowledge available internally to produce orthomosaics of large areas from satellite imagery. This is enabling it to improve efficiency in the production of 1:500 000 and other scale maps.

Freely available Sentinel-2 satellite imagery provides the homogeneous, cloud and distortion free coverage needed for the successful production of the mosaics for the projected area. During the process, ArcGIS and Trimble software is used to adapt the data to the local coordinate system, select and combine RGBI channels, create the orthomosaic and correct its seam lines.

The plan is to produce at least 4 orthomosaics, covering the whole territory of Latvia and neighbouring countries, each year.



Benefits

- Speeds up the production of final products by modernising and simplifying Sentinel-2 data acquisition.
- Enables data to be quickly produced for any area in Latvia and beyond.
- Provides data in user-friendly and accessible formats for Agency staff.
- Enables cartographers to receive up-to-date information on the territory and its changes, and to compare it with previously acquired data as information is constantly updated and maintained.
- Opens up the possibility of its use in other areas of production and research as data for large areas is regularly produced.

Lithuania

State Enterprise Centre of Registers

Opening high-value data at the State Enterprise Centre of Registers

“Since the first datasets were opened by the Centre of Registers five years ago, data from all the registers and information systems we administer have been opened to the public. With this opening of high-value datasets, we are implementing the objectives set out in the Open Data Strategy of the Centre of Registers and the provisions of the European Union Directive, while contributing to the development of digital innovations and advanced services.”

Adrijus Jusas

Director General
of the State Enterprise
Centre of Registers,
Lithuania

Lithuania has opened its first high-value geospatial datasets enabling the public to access land parcels and building information as open data.

The high-value datasets are now available along with all other data administered by the Centre of Registers, which has been successfully implementing its Open Data Strategy since 2019. As a result, it has opened data from all its main registers and information systems. Furthermore, integrated data analytics services based on GIS grids and visual open data scoreboard solutions have been created using open data.

The implementation of the high-value open data opening initiative first required assessment of legal, financial and technical issues, as well as the development and approval of the open data strategy and rules.



For this purpose, an Open Data Working Group was formed, consisting of mid- and top-level managers and data analysts, and a unique methodology for determining the level of data openness was developed. This included indicators such as the number of data objects to be opened, feature groups, and priority areas.

In the past 6 years, the most important datasets of the main registers (Real Property Register, Address Register, Register of Legal Entities, Population Register, Register of Wills, Register of Marriage Contracts, Register of Contracts and Restrictions on Rights, Register of Legally Incapable Persons and Persons with Limited Legal Capacity, Register of Property Seizure Acts, Register of Powers of Attorney) and information systems (Information System of Lists of the Members of Political Parties, Bailiffs' Information System, Information System of Legal Aid Services, Information System of Electronic Health Services and Collaboration Infrastructure, Information System of Patient Appointment Management) have been opened.



More information:
[https://www.registrucentras.lt/
atviri_duomenys/](https://www.registrucentras.lt/atviri_duomenys/)

Benefits

- **Promotion of digital innovation.** Open data enables the creation of advanced technologies and services which can be used in various sectors from business to public administration.
- **Efficient public sector.** Data opening helps to optimise decision-making, and information from open registers ensures more efficient resource planning.
- **Access to relevant data.** Businesses can use data from the Real Property Register, the Population Register and the Register of Legal Entities to improve their activities and decision-making.
- **GIS services.** 10 sets of GIS grid cells with the Population Register statistics, 7 sets with Real Property Register information and 4 sets with transaction statistics, have been created.
- **Convenient tools for citizens.** A scoreboard of open data from the Population Register has been created, showing the age and gender distribution of the Lithuanian population, the most popular newborn names and other information at the municipal level.
- **Efficient use of resources.** The Centre of Registers achieved these results without additional funding or compensation for the lost income – all work was carried out using its own resources.

Poland

Head Office of Geodesy and Cartography

Continuing the development of easy-to-use e-services

“The Head Office of Geodesy and Cartography remains dedicated to the ongoing enhancement of e-services, prioritising user-friendliness and transparency with a key focus on the national geoportal. To align with user expectations, we have redesigned the interface of the website, simplifying its usability. Updates have been implemented across all thematic modules such as Geodesy and Cartography, Crisis Management, Spatial Planning and Agriculture – enhancing navigation intuitiveness and granting users more convenient access to the geoportal’s essential features.”

Alicja Kulka

General Surveyor of Poland,
Head Office of Geodesy
and Cartography

Poland’s Head Office of Geodesy and Cartography (GUGiK) continues to develop easy-to-use e-services aligned with EU priorities and global aspirations to underscore the critical role of spatial data and services.

Enhancements to the national geoportal and the use of artificial intelligence technologies directly address these challenges to contribute to a more resilient and informed society. It exemplifies how modern geospatial technologies can overcome challenges, drive sustainable development and contribute to achieving shared goals at both the national and international levels.

A new map composition for crisis management is among the highlights of 2024 and provides vital tools for responding to emergencies, supporting rapid decision-making, and minimising risks during critical situations. The ICEYE Analyses module enables the download of flood monitoring data obtained using ICEYE radar satellites equipped with synthetic aperture radars (SAR).

The images show the extent and depth of the flood, as well as analyses estimating the number of buildings and areas affected by flood. The analyses are provided as a WMS service.

GUGiK is also making use of AI through the implementation of Chatbot in the Geoportal as well as its IT applications CertifiAI and Soilmapping. CertifiAI detects a range of conditions in photos, including clouds/cloud shadows, smoke, haze, reflectors, discoloration, blurredness, and burnouts, while Soilmapping recognises texts and characters in a soil and agricultural map. Both enhance the user experience, making spatial data more accessible, actionable and valuable.

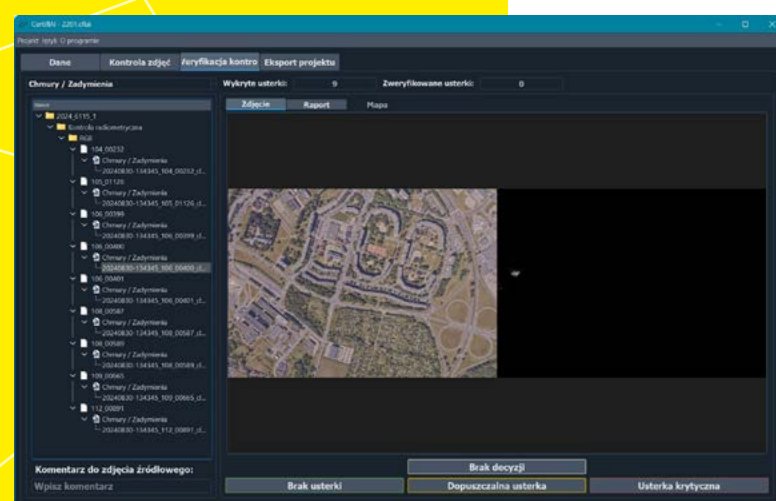
The Integration of the National Geodetic and Cartographic Resource (PZGiK) (Integration PZGiK) project will provide access to materials and orders for base maps or cadastral maps. Conducted under the European Funds for Digital Development 2021 – 2027, it will launch a consolidated e-service that will allow users to request data from PZGiK from any area in Poland in one place. This will enable requests for data from EGIB, GESUT BDOT500 databases and other materials, such as copies of PZGiK documents.

The project’s goals also include transforming country-level documentation from analog/hybrid format to digital format (database) format; integration with the country systems where the transformed documentation originates; and storing scanned and metadata-tagged technical reports and other documents in the PZGiK. Furthermore, it will covert large-scale analog maps into database format, including original maps on metal substrates, for example, district areas or sheets of the map containing (Land Parcels and Buildings) EGIB, (Geodetic Control Network) GESUT, and Topographical Feature Database500 (BDOT500) data.

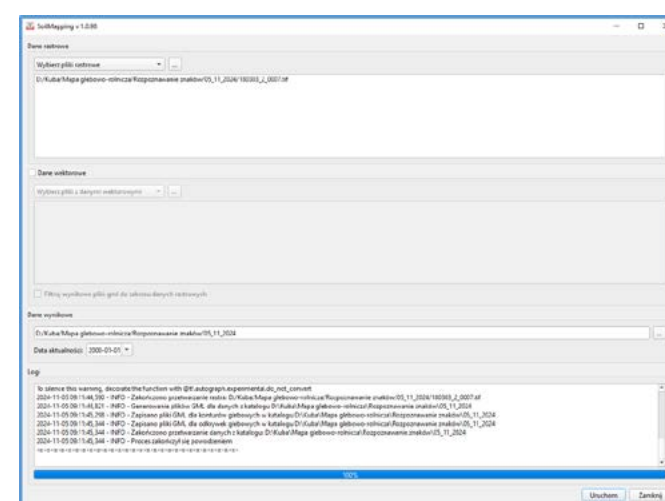
Benefits

- Facilitates the use of online spatial resources – ensures accessibility and usability for all, regardless of the level of expertise.
- Supports environmental data and local development plans by integrating data relevant to crisis management and local development.
- Empowers decision-makers with accurate and up-to-date spatial information for sustainable planning.
- Enables access to the latest, most relevant information and new types of data.
- Continuous evolution of the national geoportal strengthens its framework and database infrastructure, fostering innovation and adaptability to meet future challenges.

The orthophotomap with ICEYE Analyses



Geoportal website with Chatbot



More information:

<https://www.geoportal.gov.pl/en/>

Portugal

Directorate-General for the Territory

Marking a new era of transparency and accessibility with open data

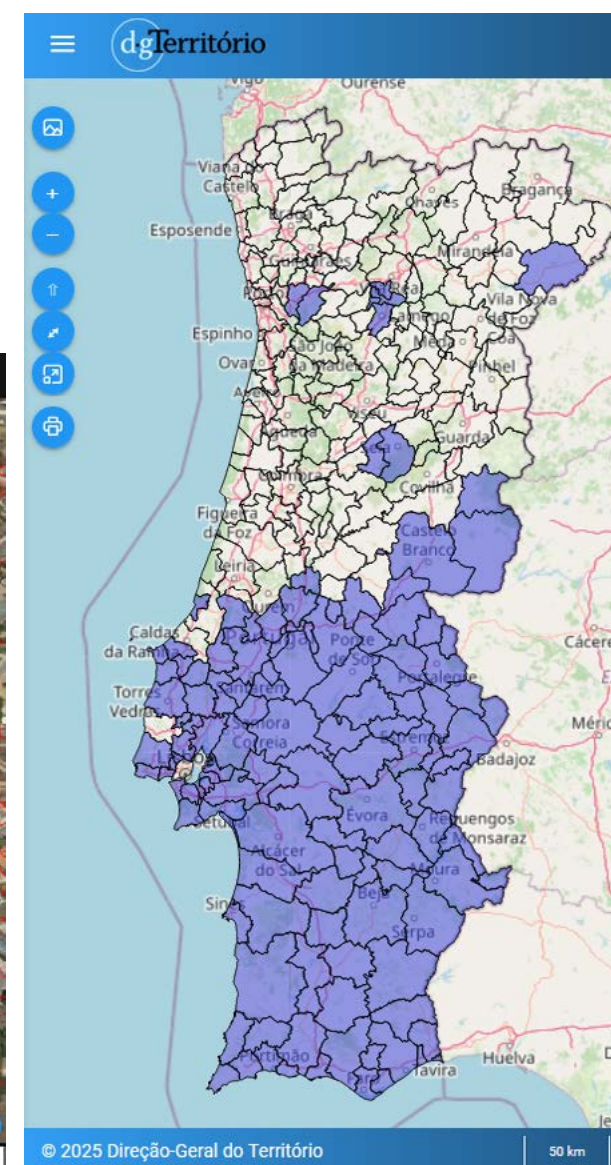
“In 2024, the Directorate-General for Territory took a significant step by making the geometry data of cadastre available as open data. This marks a new era of transparency and accessibility and complies with the EU Directive on open data and the reuse of public sector information. Our aim is to promote the reuse of public sector geographic information, enhance transparency and accessibility, and support for the digital economy.”

Fernanda do Carmo
General Director,
Directorate-General for
the Territory, Portugal

Cadastral geometry data is now available as open data in Portugal thanks to a new initiative by the Directorate-General for the Territory (DGT). This not only facilitates more informed and sustainable decisions in areas such as the economy, housing, transport, environment, agriculture, and finance but also contributes to more organised cities and a better quality of life.

The data has been released in compliance with the EU Directive on open data and the reuse of public sector information and the 2023 Implementing Regulations, which establish the criteria for identifying and using High-Value Datasets (HVD).

Data is available via direct download from the Cadastral Map viewer on SNIC: <https://snic.dgterritorio.gov.pt/visualizadorCadaastro>. Property geometry can be downloaded in various formats, including geopackage, geojson, dxf, and shapefile. In addition, assuring compatibility with INSPIRE Directive, data and associated metadata can be accessed at Cadastro Predial on SNIC using WMS or WFS. In 2025, further activities are planned including the access via OGC API.



Benefits

- Delivers open cadastral mapping data to bring significant benefits to various sectors of society.
- Provides access to accurate data for analyses and scientific projects carried out by users in academia and research.
- Enhances efficiency in public administration by enabling the integration and optimisation of processes related to land-use planning, urban development, and environmental management.
- Promotes innovation in private sectors such as technology and geospatial services, strengthening transparency and inclusion in access to information.
- Increases transparency and accessibility to information, improving public services and strengthening trust between citizens and the government.

Slovakia

Geodesy, Cartography and Cadastre Authority of the Slovak Republic

Collaborating to expand Slovakia's cutting-edge satellite radar data monitoring capabilities

"For strengthening sustainability in the field of geodesy, geoinformatics, cartography and cadastre our Authority actively cooperates with the Slovak University of Technology in Bratislava in solving tasks of technical development and research. One of the current tasks concerns the construction of collocation stations for the use of InSAR technology on the territory of Slovakia."

Juraj Celler

Head, Geodesy, Cartography and Cadastre Authority of the Slovak Republic

Slovakia's Geodesy, Cartography and Cadastre Authority is collaborating with the Slovak University of Technology to construct a network of collocation stations to ensure the precise integration of radar and GNSS data.

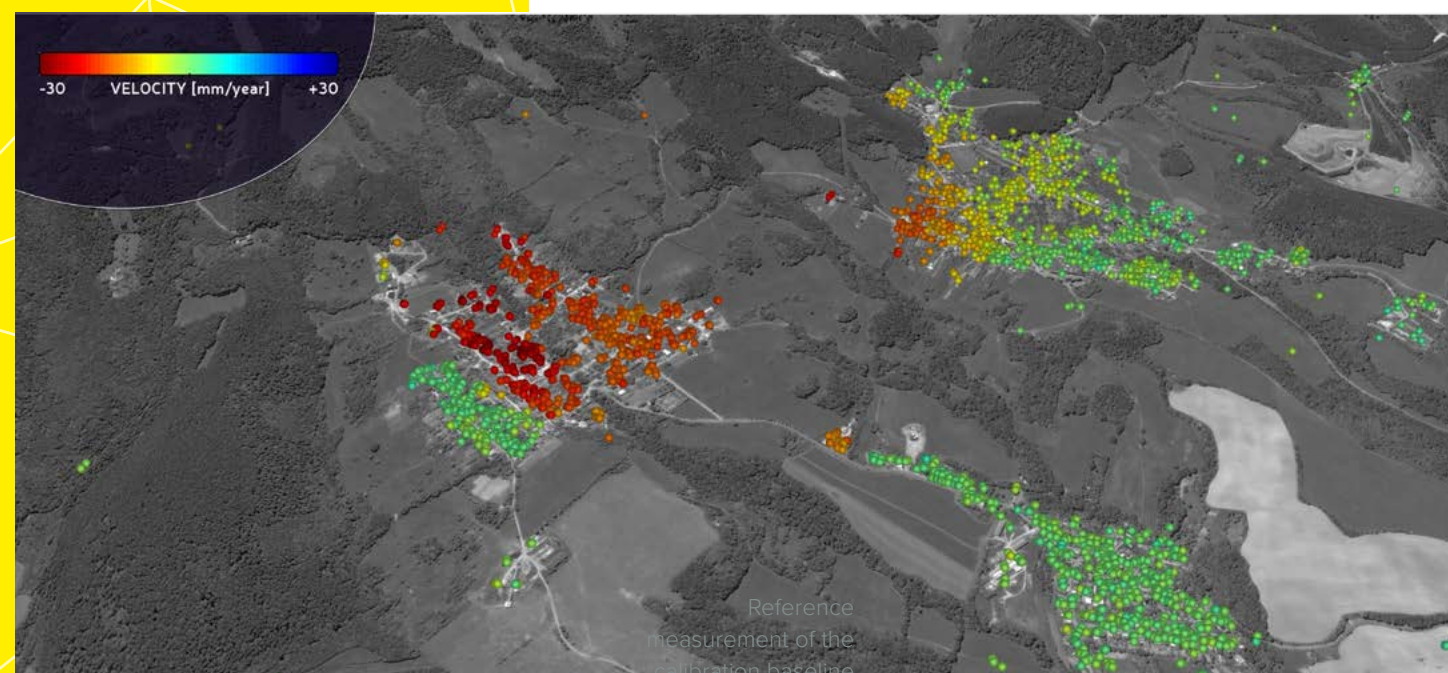
The stations provide valuable insights for monitoring landslides and critical infrastructure. For example, they have been deployed in landslide-prone regions, such as Upper Nitra and Košice Basin where the combination of satellite and ground-based data, enabling the monitoring of displacement trends with seasonal and event-specific accuracy. Collocation stations have also been used to track subsidence and deformation near water management structures, providing essential data for safety evaluations and risk mitigation.

Interferometric Synthetic Aperture Radar (InSAR) is a cutting-edge geodetic technique that leverages satellite radar data, such as from Copernicus Sentinel-1, to precisely measure Earth's surface deformation. With millimetre-level precision and the ability to cover extensive areas, InSAR is widely used for monitoring infrastructure, geohazards, earthquakes, and water management structures.

Unlike traditional methods, it requires no on-site personnel or installations.

InSAR is a relative geodetic method, akin to GNSS, that measures spatial and temporal changes in the positions of numerous natural radar reflectors relative to a stable reference point. While relative measurements are sufficient for many applications, absolute motion tracking requires connecting InSAR to terrestrial reference systems, such as ETRS89. This is achieved by collocating InSAR with GNSS at specially designed stations, where artificial radar reflectors (corner reflectors or transponders) and GNSS antennas are mounted together on stable pillar.

Slovakia's network of collocation stations ensures precise integration of radar and GNSS data. Parameters such as Radar Cross Section (RCS) and Signal-to-Clutter Ratio (SCR) are analysed to maintain data quality. Slovakia continues to expand its InSAR-based monitoring capabilities by improving collocation methodologies, integrating data from other satellite missions, and further enhancing the accuracy and scalability of national monitoring networks.



Example of InSAR displacement monitoring over a landslide-prone area.



Collocation station with GNSS and artificial corner reflectors.

Benefits

- **Efficiency:** Enables monitoring of large areas without extensive fieldwork or sensor installations.
- **Precision:** Provides millimetre-level displacement measurements and links to absolute geodetic reference frames.
- **Versatility:** Effective for diverse applications, from geohazard assessments to infrastructure monitoring.

Slovenia

Surveying and Mapping Authority of the Republic of Slovenia

Using digital twin technology for a 3D view of Slovenia

“The Surveying and Mapping Authority of the Republic of Slovenia continued with the digitalisation of operations and the integration of spatial, land and environmental policies. Its aim is to improve the business and investment environment and encourage sustainable, high value economic investment. Enhancement of the 3D viewer, in particular, brings users even greater opportunities to benefit from spatial data. These activities all contribute to the building of a digital twin of Slovenia which will represent virtual copies of real-world objects that exist and function in parallel with their physical counterparts. The digital twin technology enables real-time updates of a virtual replica to make it behave like the real object it represents.”

Tomaž Petek
Director General,
Surveying and Mapping Authority
of the Republic of Slovenia

Slovenia’s 3D viewer is enabling users to take a closer look at the surface of the entire territory as a result of a national laser scanning initiative.

By the end of 2025, the Surveying and Mapping Authority will have captured detailed data for the whole country to provide a 3D overview of the point cloud. The 3D viewer also enables the download of products created within the framework of this task.

The work builds on the full laser scan of Slovenia which took place from 2011 to 2015 – the first iteration of this type of remote sensing method for the entire country. The latest activity uses the laser method to capture data and aerial photography. This allows the points in the cloud to be assigned a colour value and a complete orthophoto to be created.

Users are provided with a georeferenced and classified point cloud, a digital relief model, a digital surface model and shaded relief image. A complete orthophoto in two colour versions – in the visible and infrared spectrum – is also available. All the data is available in the form of files with a spatial extent of one square kilometre.

The viewer is published at <https://clss.si> and, in addition to 2D and 3D viewing, it also allows simple measurement operations and data download.



More information:
<https://clss.si/>



Benefits

- Ensures access to laser scanning data is available to everyone; individuals, government and private organisations.
- Enables data download and simple measurement operations (measurement of distances, heights, areas and angles).
- Increases the use of data as a result of easier access.
- Allows data users to make suggestions to influence the adjustment of data acquisition (point density, acquisition cycle).
- Delivers data, that together with other information from the Surveying and Mapping Authority, has multiple uses, including as a source for spatial planning, spatial management, protection against natural disasters and flood studies.
- Supports high-quality 3D topography.
- Contributes to the green transition programme – Recycle Space Slovenia.

Spain

Directorate General for the Cadastre

Implementing a historical cadastral cartography download service in Spain

“The new historical cadastral cartography download service is very intuitive, easy to use and completely free of charge. It also reduces the workload of the public service offices and allows other enquiries to be dealt with.”

Aragon Amunarriz
General Director
of the Cadastre of Spain

Historical cadastral cartography for Spain is now available thanks to a new download service launched by the Spanish Directorate General for Cadastre (SDGC).

As a result, cadastral data for the entire territory under the SDGC's jurisdiction can be accessed free of charge by the general public.

This information is provided by municipality with each type of document digitised from its original on paper. Users can download the document (product) as a PDF with the complete specification of the format of the information provided.

Access criteria, delivery formats and conditions are approved by a Resolution of the SDGC.

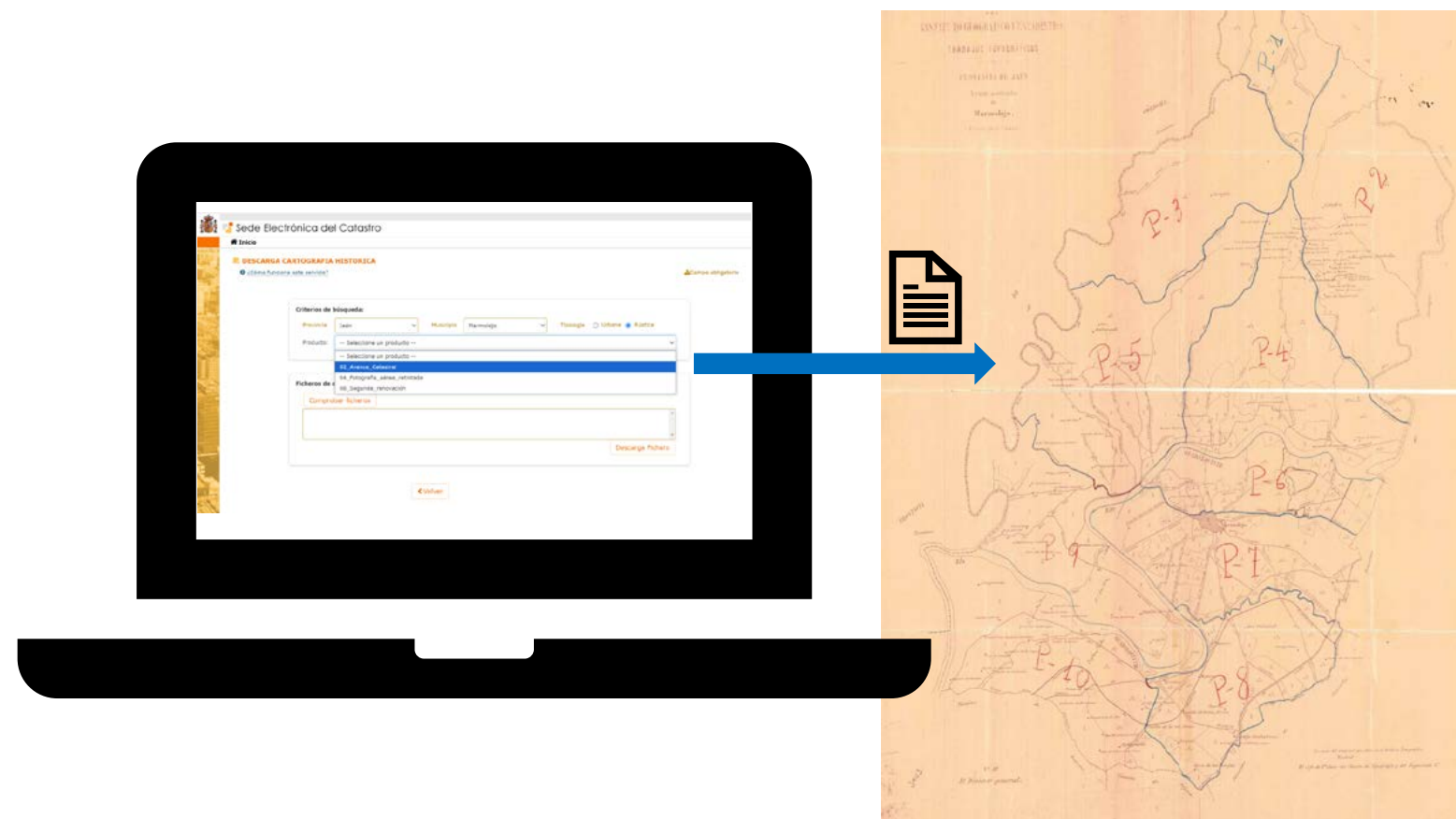
Procedure for downloading service:

The first step is to select Province, Municipality, Typology (urban or rural) and Product (from those existing in that municipality). In the next step, the application offers the cartography and alphanumeric products of that municipality selected in the previous phase. It is possible to select one or both. Finally, a compressed file containing all PDFs processed can be obtained.



More information:

[https://www.sedecatastro.gob.es/](https://www.sedecatastro.gob.es/Accesos/SECAccDescargaDatos)
[Accesos/SECAccDescargaDatos](https://www.sedecatastro.gob.es/Accesos/SECAccDescargaDatos)



Benefits

- Provides historical cadastral cartography that plays a key role in urban planning, academic research and heritage management.
- Enables access to historical cadastral cartography as a useful tool for researching the evolution of land and property.
- Delivers a very intuitive and easy to use download service.
- Reduces the workload of the public service offices and allows other enquiries to be dealt with.

Spain

National Geographic Institute

Collaborating to create a single point of access to official geospatial data in Spain

“The location, or geolocation, of a place (street, city or neighbourhood) is a task that we perform continuously in our daily lives. CartoCiudad is a project that brings together the geographic identifiers of public bodies in Spain, allowing both direct and inverse geolocation to comply with European regulations.”

Emilio López Romero

Director of the National Center of Geographic Information, Spain

CartoCiudad is a collaborative project that brings together official geospatial data from a range of Spanish organisations in one place for easy reuse.

The initiative is coordinated by the National Geographic Institute working with the General Directorate for Cadastre, Post Office and National Statistics Institute. Information includes street maps and regional or local databases, orthophotos from the National Aerial Orthophoto Plan (PNOA), building numbers, postcodes, addresses, official roads names, national topographic data, boundary lines, and toponyms from gazetteers.

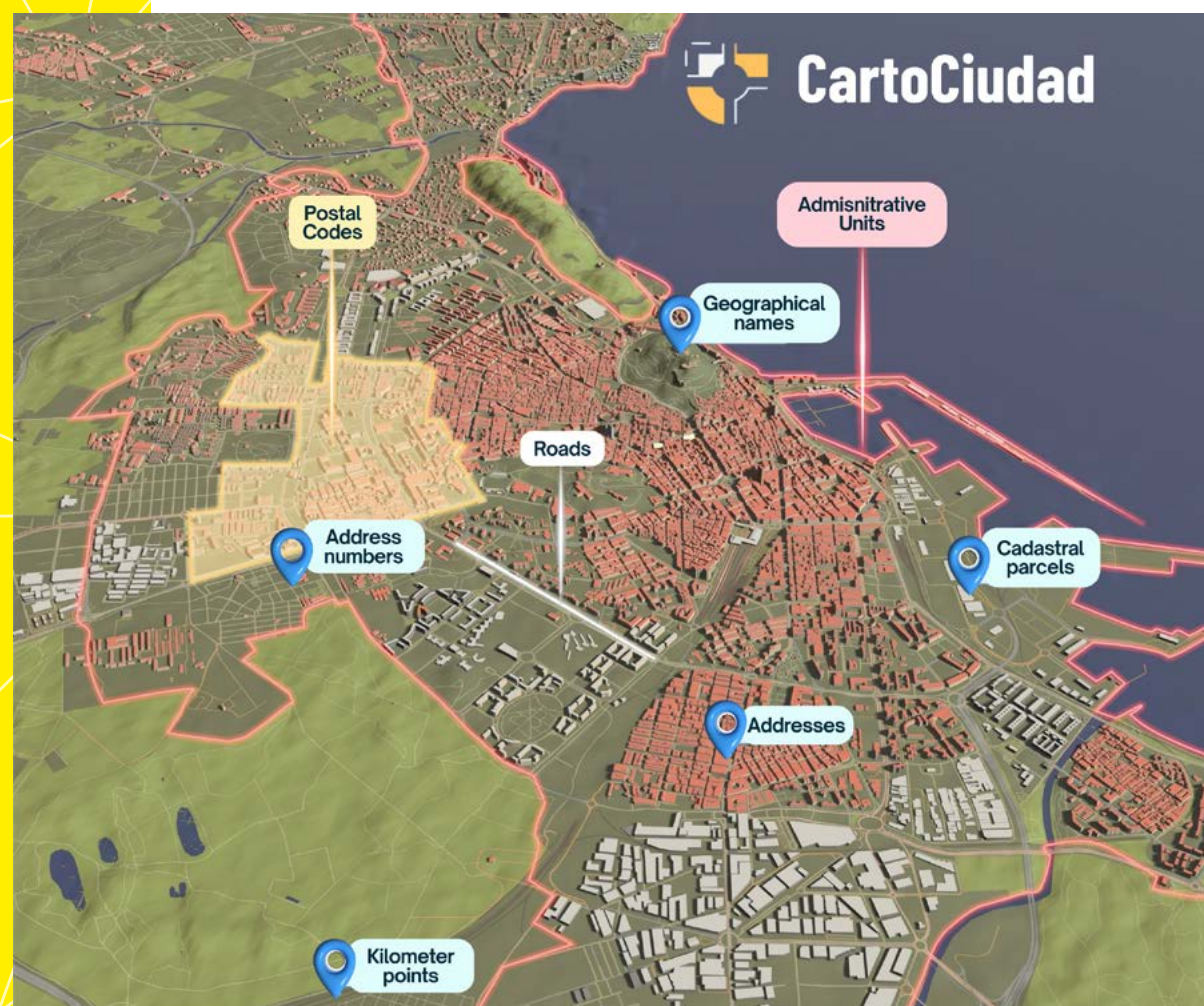
Geographic identifiers, such as addresses, points of interest, geographical name and administrative units, from official agencies at the national, regional and local levels are first harvested. To meet the requirements of the INSPIRE Directive, they are then published through ATOM, WFS, API Feature and REST services.

To enable geolocation, a plugin has been developed for QGIS and another created for the Spain viewer API that uses the geolocation REST service.



More information:

<https://www.cartociudad.es/web/portal>



Benefits

- Enables shipping, courier and routing companies to access millions of postal addresses and other geospatial data.
- Provides a single point of access to the data of public organisations in Spain.
- Allows reuse of data through API and bulk download.
- Supports functionality used by mobile companies via bulk mapping of coordinates to postal addresses and vice versa,
- Enables the reuse of geospatial data through open services with licence CC-BY 4.0.
- Facilitates the geolocation of a place through QGIS plugins and viewers.

Switzerland

Federal Office of Topography swisstopo

Monitoring drought with unprecedented precision for climate resistance in Switzerland

“The dissemination of tailor-made near-real-time satellite products through our robust, open-access geospatial infrastructure allows us to address the challenges of drought monitoring with unprecedented precision and speed at the national level.”

Fridolin Wicki

Director, Federal Office of Topography swisstopo

Earth observation data is improving climate resilience in Switzerland by enabling the early detection and management of drought conditions.

The operational national drought monitoring service is underpinned by the swissEO suite of near-real-time Sentinel-2 satellite open data products developed by swisstopo. As a result, Switzerland is monitoring drought with unprecedented precision and speed which provides an early warning of conditions to support planning and response.

Together with the Federal Office of Meteorology and Climatology MeteoSwiss and the Federal Office for the Environment, swisstopo processed Sentinel-2, Landsat and Meteosat satellite data to create the analysis-ready open data products in cloud-native formats. Key steps included advanced cloud masking, terrain shadow detection, and precise geolocation.

The swissEO suite includes swissEO VHI which shows the current health status of vegetation as observed by satellites. This enables vegetation health assessment using Sentinel-2-based NDVI and Meteosat land surface temperature, including historical data covering the climate reference period 1991-2020. Users can also access swissEO S2-SRI which shows land surface reflectance in a spatial resolution of 10 metres.

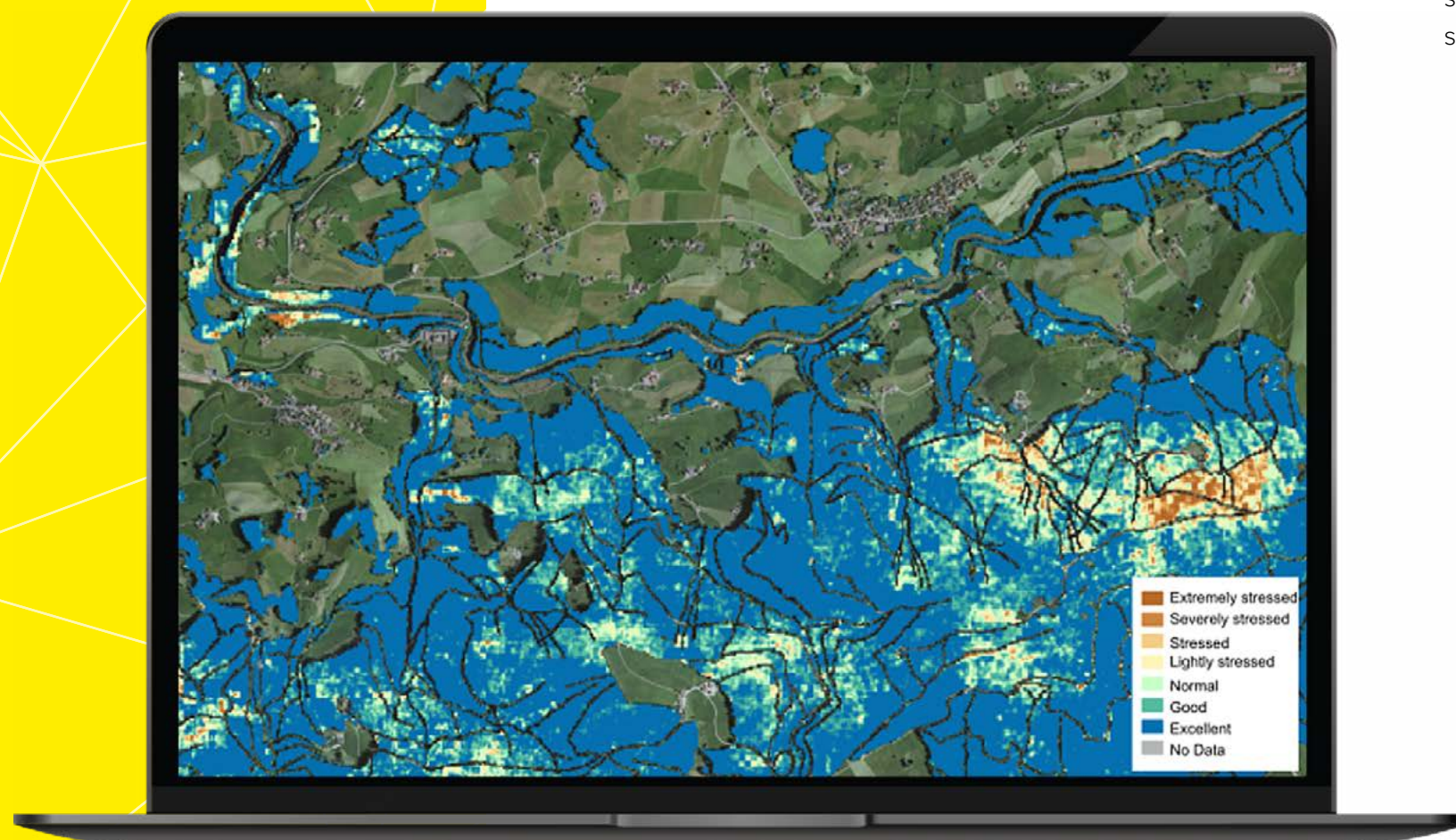


More information:

<https://www.swisstopo.admin.ch/en/satellite-images-swisseo>

Benefits

- Provides early warning of drought conditions to improve drought preparedness.
- Supports informed decision-making with accurate, high-resolution nationwide data.
- Enables efficient allocation of agricultural and forestry resources during droughts.
- Improves environmental monitoring with daily updates and historical comparisons.
- Facilitates research with open data and interoperable formats.
- Strengthens collaboration by integrating geospatial and meteorological expertise.
- Promotes climate resilience by addressing the impacts of prolonged droughts.
- Promotes transparency and accessibility through open-source tools and cloud-native solutions.



The Netherlands

Cadastre, Land Registry and Mapping Agency

Enabling The Netherlands' energy transition using geo and land administration data

"Integrating authoritative geospatial data with partner data is a necessary step towards solving social challenges."

Frank Tierolff
Chair Executive Board Cadastre,
Land Registry and Mapping Agency,
The Netherlands

Collaboration between the Cadastre, Land Registry and Mapping Agency (Kadaster), regional grid operators and municipalities is supporting The Netherlands' transition to sustainable energy.

Kadaster conducted an exploratory study on the spatial characteristics and potential for adding new transformer stations and collaborated with regional grid operators and municipalities, using interviews to understand their requirements and preferences.

Additionally, it developed a viewer with high quality geospatial information (layers) to identify promising locations for new transformer stations. Work started with a municipal overview map, excluding unsuitable areas and applying filters based on the combined requirements of municipalities and grid operators. The remaining areas were placed in an interactive viewer, allowing municipalities to toggle unsuitable areas on and off, which ensures efficient and effective coordination between both parties.

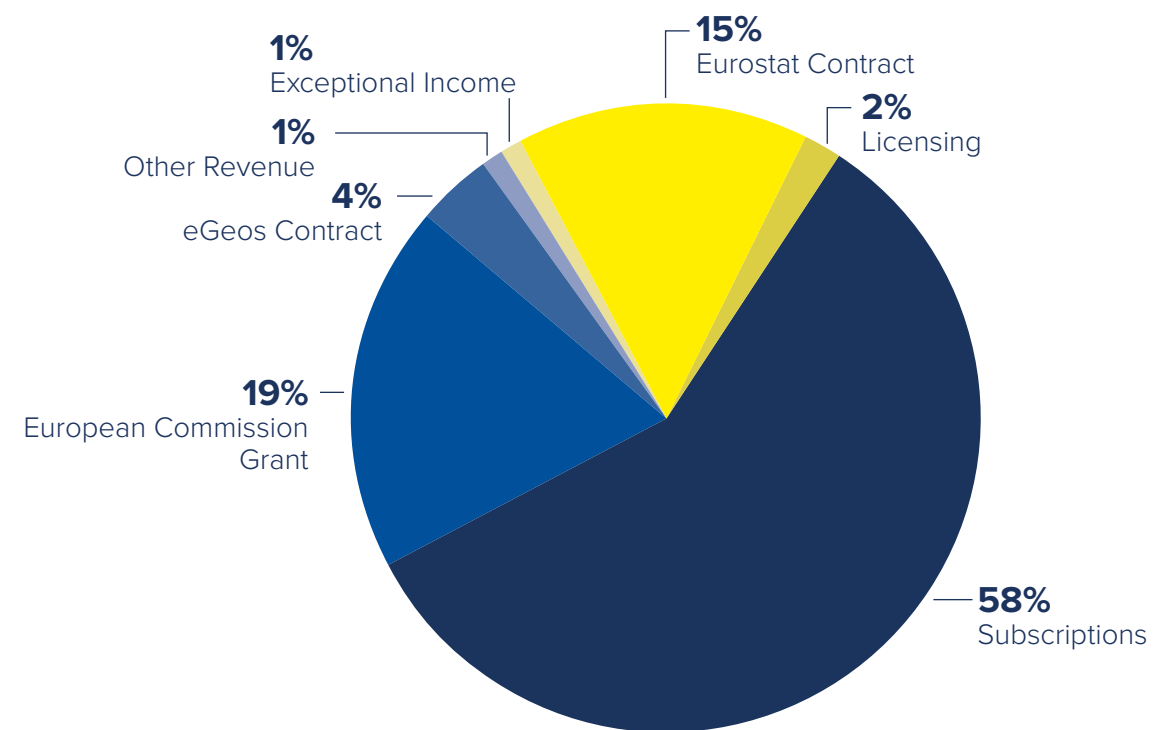


Benefits

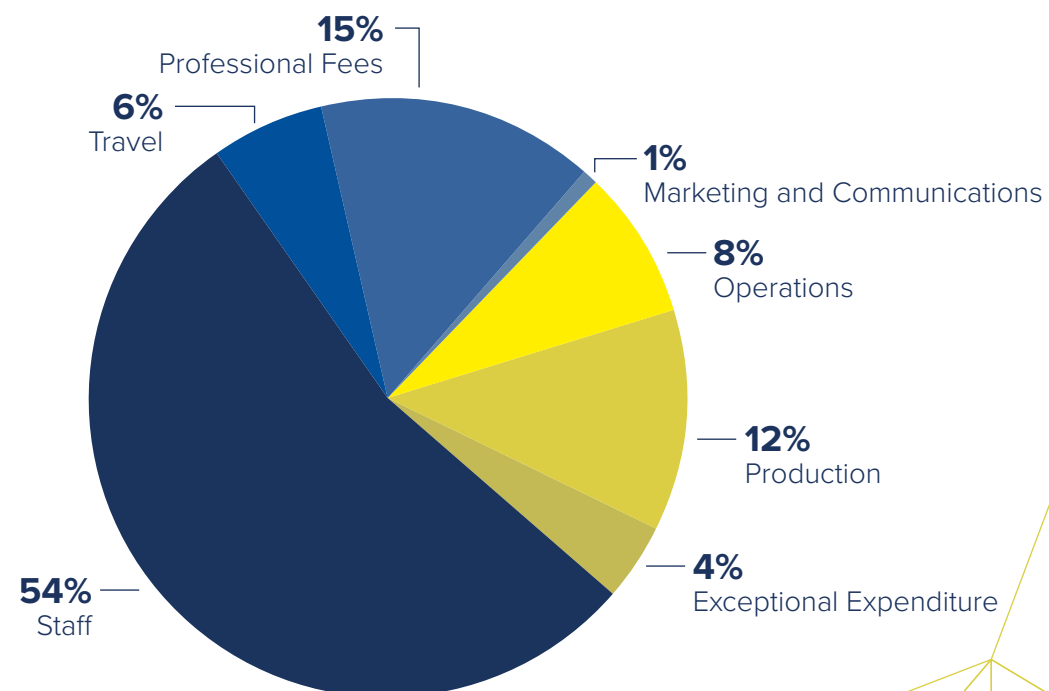
- Provides municipalities with a quick overview of potential locations and quickly excludes unsuitable areas from consideration.
- Offers a clear spatial and interactive assessment of possible locations.
- Allows for integration of requirements and preferences from both parties.
- Simplifies the coordination process between municipalities and grid operators.
- Reduces time and resources spent on site selection and therefore enhances decision-making efficiency.
- Helps to identify challenging areas, allowing for quick action to address them early in the planning process.

Finances

Income



Expenditure



2024 annual accounts

Income

Eurostat Contract	233 910 €
Licensing	39 266 €
Subscriptions	916 134 €
European Commission Grant	303 216 €
eGeos Contract	31 560 €
Other revenue	61 707 €
Exceptional Income	8 449 €
Total Income	1 579 350 €

Expenditure

Staff	841 308 €
Travel	89 570 €
Professional Fees	231 809 €
Marketing and Communications	16 176 €
Operations	123 340 €
Production	185 778 €
Exceptional Expenditure	59 241 €
Total Costs	1 547 224 €
Final Result	32 126 €

Management Board



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Tomaž Petek
Surveying and Mapping
Authority of the Republic
of Slovenia



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National Institute of
Geographic and Forest
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Sallie Payne Snell
Secretary General and
Executive Director



Carol Agius
Head of Representation
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Engagement



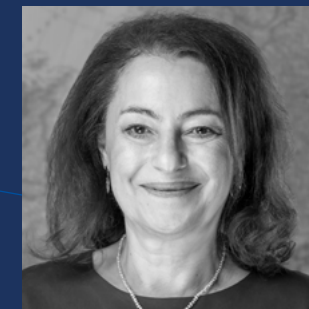
Angela Baker
Head of Partnerships
and Sustainability



Alina Talipova
Head of Corporate
Services



Victoria Persson*
Project Manager – Data
Access and Integration



Matina Fuentes
Knowledge Exchange
Manager



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Membership and
Communications Manager



Marjana Zelic
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Giuseppe Novella
Communication and
Representation Executive



Nadir Meskini
Administrative Officer



Oliwia Marszalek
Membership and
Data Assistant



Rhian French
Public Relations
Consultant

* Victoria Persson left EuroGeographics in March 2025

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833 607 112, TR 51080067776-74

EuroGeographics Head Office
Rue du Nord 76/Noordstraat 76
1000 Brussels
BELGIUM

www.eurogeographics.org
contact@eurogeographics.org
phone +32 (0) 2 888 71 93
fax +32 (0) 2 888 71 94

