

Agency for Geodesy, Cartography and Cadastre

Beyond Digitalization: Building Strong Institutions for a Modern Cadastre

PRESENTED BY

Ms. **Cristina Telpiz-Burlac**
Head of Public Policy Coordination and EU integration
Agency for Geodesy, Cartography and Cadastre
Republic of Moldova

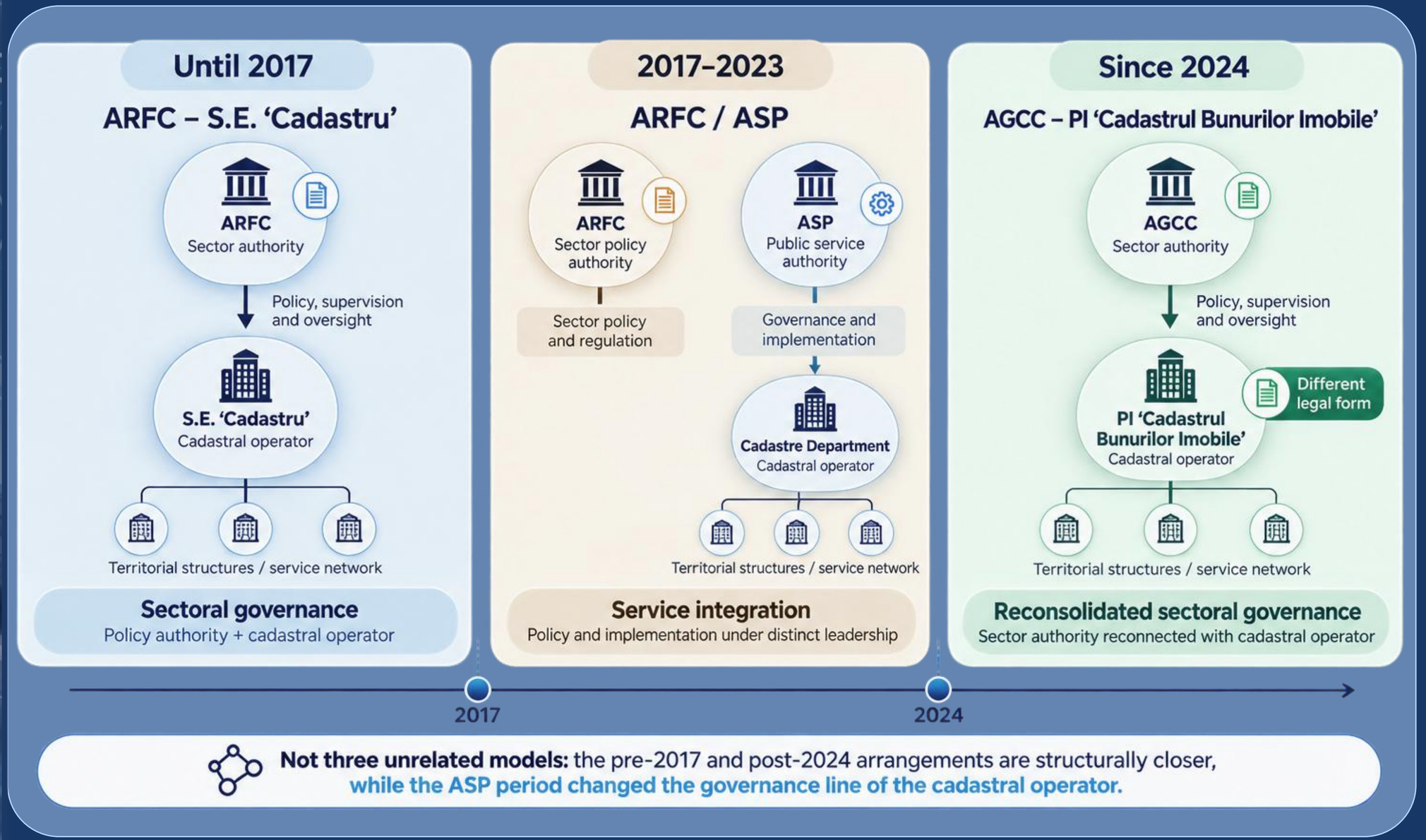
Dublin 2026

Is Digitalization Enough for a Modern Cadastre?



Agency for Geodesy, Cartography and Cadastre

Three Institutional Arrangements, Two Governance Approaches



Agency for Geodesy, Cartography and Cadastre

The 2017 Reform Was Designed Around the Citizen

eurogeographics

- Citizen Registration and Documentation
- Vehicle and Driver Registration
- Civil Status Registration
- Business Registration and Licensing
- Cadastre and Land Registration

Public Services Agency (ASP)

Bringing key public service areas together in one agency

Citizen / Beneficiary

Easier access to public services

The five service domains are a **functional classification**, not a one-to-one correspondence with the five reorganised legal entities.

Declared objective: **one-stop shop and easier access to services** — not automatic technical integration of registries.

Distinct service domains → **Public Services Agency** → **Beneficiary**

Agency for Geodesy, Cartography and Cadastre

One Agency, Five Different Data Ecosystems

eurogeographics



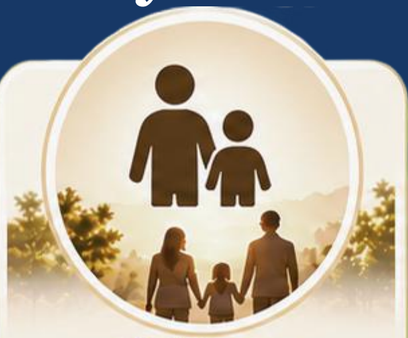
Citizen Registration and Documentation

Personal identifiers
Identity documents
Residence and status data



Vehicle and Driver Registration

Vehicle identifiers
Technical characteristics
Driver entitlements



Civil Status Registration

Legal life events
Civil status certificates
Supporting records



Business Registration and Licensing

Legal entities and status
Ownership / administration data
Authorisations and licences



Cadastre and Land Registration

Spatially located immovable property
Rights over land and buildings
Legal and technical documentation

Functional domain	Reference data	Events	Historical documents	Spatial information
Citizen Registration and Documentation	High	Yes	Yes	No
Vehicle and Driver Registration	High	Yes	Limited	No
Civil Status Registration	Medium	**Core**	Yes	No
Business Registration and Licensing	High	Yes	Yes	No
Cadastre and Land Registration	High	Yes	Yes	**Core**

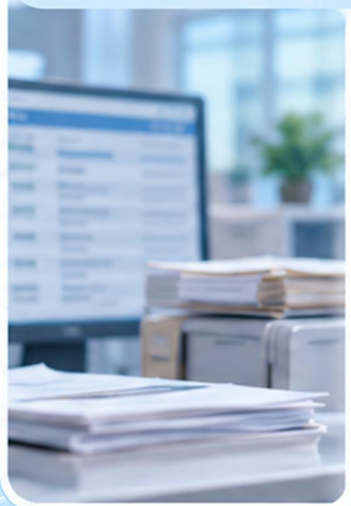
Different data ecosystems were brought under **one administrative roof**, but this did not automatically produce a single technical architecture or unified development logic.

Agency for Geodesy, Cartography and

Why Cadastral Data Require a Different Governance Approach

eurogeographics

Administrative register



- Identifier
- Attributes
- Events
- Legal acts

Legal + technical + geospatial data tied to physical property



Cadastre

- Spatial identifier
- Geometry
- Rights
- Restrictions
- Values
- Archives
- Real-world situation



Key figures (2016)



>5 million
properties in registers



4.7 million
parcels in digital plans
out of about 6 million parcels



>120 million
archive pages



39
territorial offices

The 120 million pages reported in 2016 and the 72 million pages cited in a later archiving project are not directly comparable; they reflect different methodological scopes.

Digitalisation alone does not ensure complete, accurate and up-to-date cadastral data.

Agency for Geodesy, Cartography and Cadastre

Digitalising Services Is Not the Same as Modernising Registers

eurogeographics

Digital services and user-facing workflows



SIA GEAP (2018)
electronic submission and management of permissive acts

Request → Payment → Signing → Tracking → Delivery



Civil status online services (2023)
online requests and delivery for selected civil status services

Request → Payment → Signing → Tracking → Delivery



E-cadastral services (2023)
electronic cadastral services available nationwide

Request → Payment → Signing → Tracking → Delivery

Faster access does not automatically fix the underlying register.

Information infrastructure and register modernisation

Databases
core records

Archives
historical documents

Geometry / spatial data
parcel boundaries

Systematic completion
missing entries

Rectification and data quality
corrections and validation

Interoperability
data exchange

Cadastral archive digitisation example:
by Oct 2022, about 47% of the 72 million pages included in the programme were scanned and verified.



2017–2023: there is not yet a fully comparable financial inventory of actual expenditure executed per register.

Simplifying a request or issuing a document online does not automatically solve gaps in the underlying data.

Systematic Registration Is a Long-Term Public Responsibility

eurogeographics

1998
State Programme for the Creation of the Cadastre

Launch of the State Programme for the creation of the cadastre of immovable property. Systematic registration of land and buildings.

2019
Land Registration and Valuation Project (LRVP)

Launch of the World Bank financed Land Registration and Valuation Project (LRVP). Objectives: complete registrations, correct errors, register public properties, and modernise valuation.

2024
Continuation in the new institutional model

LRVP continues under the new institutional arrangement. The programme remains a long-term commitment, requiring stable governance, adequate resources and consistent implementation.

- Complete and validate registrations of private, public and state properties
- Correct errors, delimit and register public properties
- Modernise mass valuation and related data
- Strengthen the information system and institutional capacities

LRVP Action Plan 2022
Planned costs (million MDL)



- Registration of immovable properties **121,896**
- Valuation **6,372**
- System strengthening **29,100**
- Capacities and project management **5,900**

Important

- The figures represent the planned budget for 2022 activities, not the actual expenditures.
- The original LRVP loan of EUR 30.1 million was restructured and reduced in 2022 to approximately EUR 23.65 million (according to the 2024 Progress Report).
- The LRVP started in 2019 and continued after the reorganisation in 2024.

Agency for Geodesy, Cartography and

Institutional Fragmentation Complicated Programme Coordination

eurogeographics

AGCC

- Strategy and regulation
- Methodological frameworks
- Oversight of the cadastre sector

IP CBI

- Operational management of the project
- Cadastral services
- Data administration
- Territorial structures (SCT)

APP

- Identification and delimitation
- Provision of documents
- Registration of public property

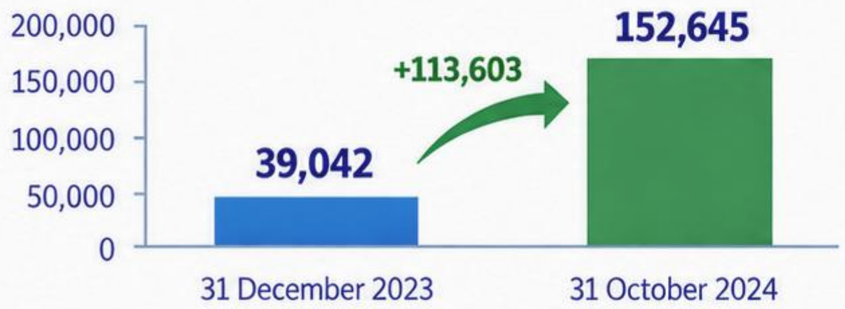
LPA

- Local documentation and approvals
- Consultation with landowners
- Support in identification of property holders

Professionals

- Field measurements
- Preparation of documentation
- Submission for verification and acceptance

Coordination, decision-making and accountability mechanisms



The increase reflects cumulative progress within the project during a longer period (31 Dec 2023 – 31 Oct 2024), not a direct causal effect of the institutional reform.

Documentation
Missing or incomplete title documents, identification of property holders.

Approvals
Delays in local approvals and coordination procedures.

Verification and acceptance
Erroneous or inconsistent documentation, additional checks and clarifications.

Other factors
Disputes, financing constraints, and difficulties faced by contractors.

A system with responsibilities shared between distinct institutions requires clear and robust coordination, decision-making and control mechanisms, especially when implementing nationwide cadastral programmes.

Agency for Geodesy, Cartography and

The 2023 EU Twinning Assessment: The Case for Change

1 Fragmented institutional responsibilities



- Policy development and operational implementation were located in different institutions.
- Responsibilities for cadastre, cartography and geoinformation were not sufficienlty coherent.

2 Limited oversight and coordination



- Sectoral supervision mechanisms were insufficient.
- Coordination between key functions (cadastre, geodesy, cartography, geoinformation) was weak.

3 Non-unitary management of cadastral and geospatial resources



- Cadastral, cartographic and geospatial data were managed in different institutional settings.
- Data governance, standards and interoperability needed strengthening.



> "The current institutional setup results in a **fragmented** allocation of responsibilities between **policy development and operational implementation.** A more **coherent governance** framework is needed for the cadastre, cartography and geospatial data, including clearer mandates and stronger coordination mechanisms."
>
> EU Twinning Project
> Final Report, Component 1
> Institutional and Legal Framework, 2023

Key recommendation for cadastre

Separate cadastral operations from ASP and establish a specialised public institution under the authority of the sectoral body, with clearly defined responsibilities.



The 2024 Reform Reconnected Policy and Implementation

eurogeographics

AGCC
Agency for Geodesy, Cartography and Cadastre

- Sectoral policies and regulation
- Governance and oversight
- Coordination of the cadastral, cartographic and geodetic system

Founding authority (Government Decision No. 959/2023)

IP CBI
Public Institution
Cadastrul Bunurilor Imobile

- Operational administration of the cadastre
- Maintenance and development of registers
- Data management and information services
- Implementation of state programmes

Subordinated institution (Government Decision No. 959/2023)

Cooperation for certain service channels

INGEOCAD
State Enterprise Institute of Geodesy, Technical Surveys and Cadastre (Întreprinderea de Stat Institutul de Geodezie, Prospecțiuni Tehnice și Cadastru)

- Geodetic network and reference systems
- Cartographic production
- Spatial data infrastructure
- Specialised support for the cadastral system

ASP
Public Services Agency

- Provision of public services through multifunctional centres
- Certain cadastral service channels based on agreed mechanisms
- Remains a separate institution with its own governance

SICBI – institutional roles
According to Government Decision No. 319/2025

AGCC – Holder (posesor)
Holds SICBI, sets strategic directions and ensures governance of the system.

IP CBI – Operator (deținător)
Administers SICBI, ensures operational management, maintenance and development.



SICBI
State Information System of Real Estate Cadastre

- Cadastral data (parcels, buildings)
- Geospatial data (geometry)
- Rights, restrictions, valuations
- Reference data and metadata

Continuity of accessibility
Cooperation with ASP for certain service channels continues, supporting citizen-friendly access to services.

A model similar to pre-2017
The overall architecture resembles the pre-2017 model, with a direct link between the sectoral authority and the cadastral operator, now under a new legal status and a modern framework for data governance.

Legal basis
Government Desision No. 959/2023 – subordination of INGEOCAD to AGCC.

Government Decision No. 319/2025 – Concept and Regulation of SICBI.

What Changed, and What Remains to Be Demonstrated?

Achieved instttutionally
Confirmed changes and decisions

- **Reorganisation in 2024:** AGCC and IP CBI with clearly defined responsibilities.
- **Legal framework for SICBI** (HG No. 319/2025): AGCC – holder (posesor), IP CBI – operator (deținător).
- **Updated tariff framework** (HG No. 130/2025) and increased fees for non-monopoly services (about +20%).
- **Continued investment in** cadastral services and archive digitisation within ASP (2017–2023) and in IP CBI (since 2024).
- **Continuity of national programmes,** including the Land Registration and Valuation Project (since 2019).

In development
Ongoing modernisation

- Completion and improvement of the cadastral and geospatial databases (SICBI).
- Reengineering of operational processes and further digital services for citizens and professionals.
- Systematic registration and delimitation of public properties under the LRVP.
- Correction of data gaps, geometry updates, and integration of historical documents.
- Strengthening interoperability with other registers (e.g. population, business, taxation, spatial data).

To be demonstrated
Requires specific and comparable indicators

- **Operational performance:** processing times, volume of errors, need for corrections, service availability.
- **Data quality:** completeness, correctness, up-to-date geometry and legal status.
- **Impact for beneficiaries:** accessibility, user satisfaction, effects on the real estate market and the public budget.
- **Financial sustainability:** long-term balance between costs and revenues.

IP CBI – financial result in 2025
(million MDL)

332.7	246.7	-9.8
Revenues from sales (+20.5% vs 2024)	Cost of sales (+18.1% vs 2024)	Net result (loss)

Comparisons between 2016 and 2025 expenditures are not meaningful without adjustments for methodology, perimeter and tariff levels.
The 2025 financial figures reflect IP CBI and cannot be read as a direct effect of the 2024 reform.

Agency for Geodesy, Cartography and

Governing the Entire Cadastral Data Lifecycle

eurogeographics



Cadastral spatial database (geometric data)

- Digital cadastral plans (parcels and buildings)
- Topographic and geodetic data
- Integration and quality assurance

Electronic archive

- Historical cadastral documents
- Digitisation and indexing
- Long-term preservation and access

National spatial data infrastructure (INDS)

- Data sharing and interoperability
- Standards and harmonisation (e.g. INSPIRE)
- Use of cadastral and other geospatial data

1. Create
Data capture from field measurements, existing records and systematic programmes

2. Validate
Technical and legal verification, quality checks, conformity with standards

3. Register
Entry in the Real Estate Register (SICBI) and assignment of identfiers

4. Update
Changes through transactions, public acts, systematic registration and error correction

5. Protect
Data security, access control, audit trail and disaster recovery

6. Share
Services for citizens and institutions, interoperability with national systems (INDS)

Institutional accountability
Quality • Legality • Transparency
Security • Public value

Real Estate Register (SICBI)

- Legal data on real estate objects
- Rights, restrictions and other records
- Holder: IP CBI (according to HG No. 319/2025)
- System owner: AGCC

Cadastral values

- Mass valuation for taxation
- Values for all categories of real estate
- Regular updating
- Integration with the real estate register

Interoperability and services

- Exchange with population, business, taxation and other registers
- Online services and open data
- Supports transparent and efficient public administration

A modern cadastre requires integrated governance, not only digital services.

Projects such as SICBI, the cadastral spatial database, the electronic archive and INDS are being developed in an integrated manner and are at different stages of implementation. Technology enables the processes, while institutional accountability ensures the quality, legality and sustainable use of data.

Beyond Digitalisation: Strong Institutions, Trusted Cadastre

eurogeographics

Technology can improve access, but a trusted cadastre requires institutional accountability for the completeness, updating and integrity of data.

1 Service integration ≠ sector governance



Common service channels can improve access for citizens.

Cadastral governance remains a specialised sectoral responsibility with its own data, rules and long-term obligations.

2 Long-term data accountability



Completeness
Systematic registration and data gaps reduction

Up-to-dateness
Regular updates from transactions, public acts and systematic programmes

Integrity
Validation, quality controls and traceability

Security and sharing
Protected data, controlled access and interoperability

3 Reorganisation ≠ completed transformation



Reorganisation creates the necessary conditions, but transformation requires continued development of data, processes, capacities, financing and technology.

Data and registers
Completion, quality and integration

Processes and people
Clear responsibilities and adequate capacities

Financing
Sustainable resources

Technology
Modern and interoperable infrastructure

Technology enables services. Institutions safeguard the cadastre.
A modern cadastre requires both.

For citizens
Secure rights and easier access to information

For the economy
Legal certainty and investment opportunities

For public administration
Reliable data for planning and evidence-based decisions

For sustainable development
Efficient land use and resilient communities

Back to our opening question:
Is digitalisation sufficient to build a modern cadastre?

Experience from the Republic of Moldova:
Digitalisation is essential, but not sufficient.



eurogeographics

Thank You

- www.agcc.gov.md
- www.geoportalinds.gov.md
- www.sigsnl.gov.md
- www.geodata.gov.md

