

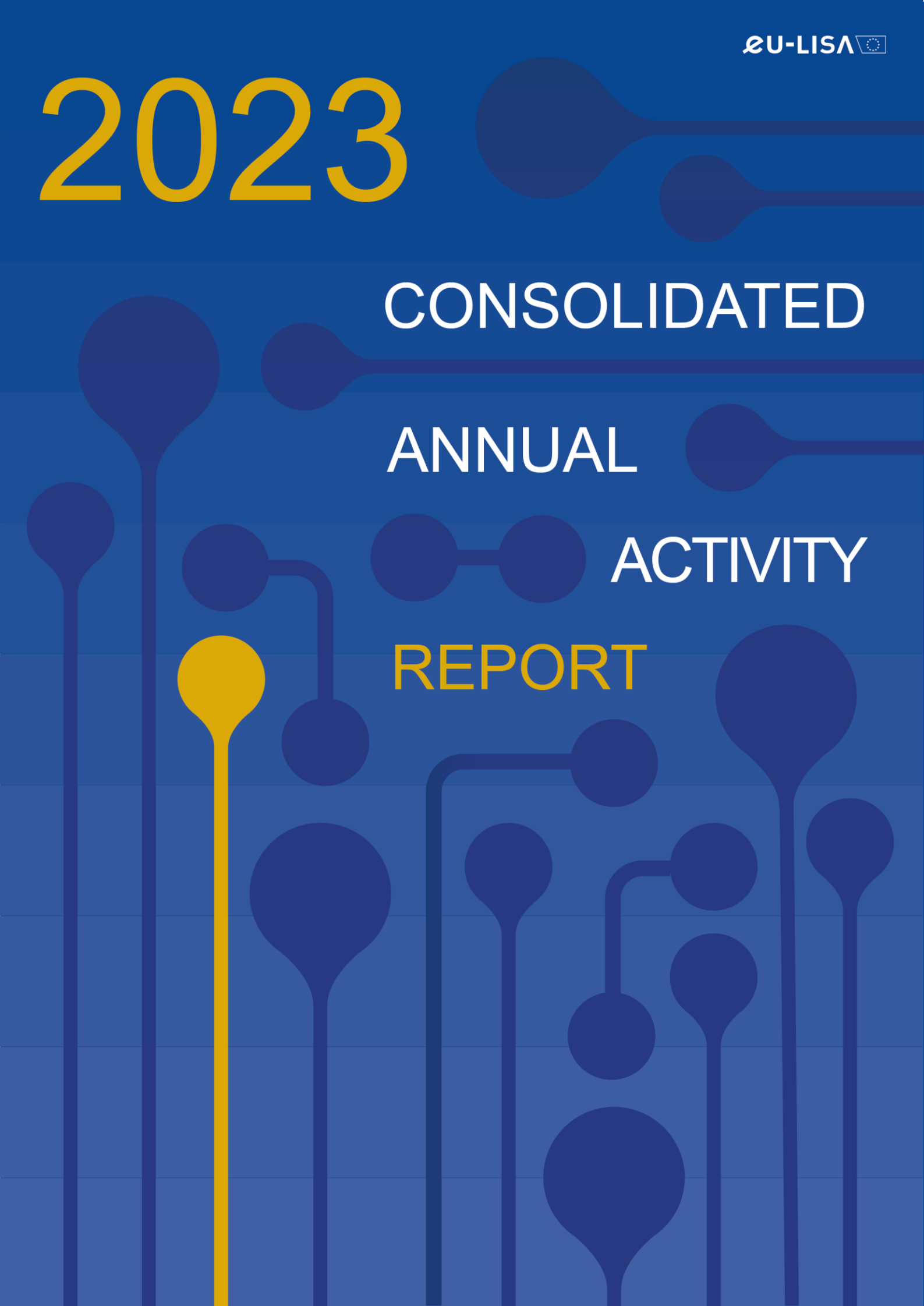
2023

CONSOLIDATED

ANNUAL

ACTIVITY

REPORT



**European Union Agency for the Operational Management of Large-Scale IT Systems
in the Area of Freedom, Security and Justice (eu-LISA)**

Consolidated Annual Activity Report 2023

Adopted by the eu-LISA Management Board on 20 June 2024

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Abbreviations and acronyms

IT systems and communication infrastructure

AFIS	automated fingerprint identification system	ESP	European search portal
API	advance passenger information	ETIAS	European Travel Information and Authorisation System
BMS	biometric matching system	Eurodac	European Asylum Dactyloscopy Database
CIR	common identity repository	JITs CP	Joint Investigation Teams collaboration platform
CRRS	central repository for reporting and statistics	MID	multiple-identity detector
CSP	common shared platform	sBMS	shared biometric matching service
DubliNet	Dublin electronic communications network	SERENA	Secure Network Access (to core business system environments)
e-CODEX	e-Justice Communication via Online Data Exchange	SIRENE	Supplementary Information Request at the National Entries
ECRIS	European Criminal Records Information System	SIS	Schengen Information System
ECRIS RI	European Criminal Records Information System reference implementation	TESTA-ng	Trans European Services for Telematics between Administrations – new generation
ECRIS-TCN	European Criminal Records Information System on third-country nationals and stateless persons	VIS	Visa Information System
EES	Entry/Exit System		

Other acronyms used

ACFC	Audit, Compliance and Finance Committee, under the eu-LISA Management Board	Eurojust	EU Agency for Criminal Justice Cooperation
AG	advisory group	Europol	EU Agency for Law Enforcement Cooperation
ALM	application lifecycle management	Frontex	European Border and Coast Guard Agency
BCU	backup central unit (St Johann im Pongau, Austria)	FTE	full-time equivalent
ALM	application lifecycle management	IAC	Internal Audit Capability
CAF	Common Assessment Framework	IAS	Internal Audit Service of the European Commission
CBS	core business systems	ICF	Internal Control Framework
ALM	application lifecycle management	ITSM	IT service management
CEAS	Common European Asylum System	JHA	Justice and Home Affairs
CEPOL	EU Agency for Law Enforcement Training	JHAAN	JHA Agencies Network
CSIRT	computer security incident response team	KPI	key performance indicator
CU	central unit	MVP	minimum viable product
DG HOME	Directorate-General for Migration and Home Affairs	OLAF	European Anti-Fraud Office
DG JUST	Directorate-General for Justice and Consumers	SEMM	Schengen Evaluation and Monitoring Mechanism
ECA	European Court of Auditors	SPD	single programming document
EDPS	European Data Protection Supervisor	SLA	service-level agreement
EMAS	Eco-Management and Audit Scheme	SNE	seconded national expert
ENISA	European Union Agency for Cybersecurity	TCN	third-country national
EUAA	European Union Agency for Asylum	TEF	Transversal Engineering Framework
EUAN	European Union Agencies Network	TOF	Transversal Operations Framework
eu-LISA	EU Agency for the Operational Management of Large-Scale IT Systems in the Area of Freedom, Security and Justice	USK	user software kit

eu-LISA – the Agency in brief

The European Union Agency for the Operational Management of Large-Scale IT Systems in the Area of Freedom, Security and Justice (eu-LISA) is responsible for the preparation, development and operational management of large-scale IT systems in the Justice and Home Affairs (JHA) domain.¹ Established in 2012, the Agency has been contributing to the implementation of EU policies in the areas of internal security, migration and asylum, visas, and justice. eu-LISA's main focus is on facilitating data-driven border management and efficient information exchange between JHA authorities across Europe to ensure the safety and security of the Schengen area, while also providing a seamless experience for international travellers.

The Agency's core task is to ensure the effective, secure and uninterrupted operation of the EU's JHA information systems in compliance with the respective legal bases, including data protection and security requirements. The continuous availability of these IT systems is essential for ensuring the EU's internal security and for facilitating the freedom of movement for EU citizens and residents. Currently, eu-LISA is responsible for the management of the following JHA information systems:

- the **Schengen Information System (SIS)**,²
- the **Visa Information System (VIS)**,³
- the **European Asylum Dactyloscopy Database (Eurodac)**,⁴
- and the **European Criminal Records Information System Reference Implementation (ECRIS RI)**.

To further streamline the EU's border management and reinforce the internal security of the Schengen area, eu-LISA is developing several new large-scale IT systems and the overarching interoperability architecture:

- the **Entry/Exit System (EES)**,⁵
- the **European Travel Information and Authorisation System (ETIAS)**,⁶
- the **European Criminal Records Information System on third-country nationals and stateless persons (ECRIS-TCN)**,⁷
- the **interoperability components**,⁸ i.e., shared biometric matching service (**SBMS**), European search portal (**ESP**), common identity repository (**CIR**), multiple-identity detector (**MID**),
- the central repository for reporting and statistics (**CRRS**).

In 2023, the Agency started preparations for taking over the operational management of the **e-CODEX system** (e-Justice Communication via Online Data Exchange) that facilitates secure communication between European judicial authorities in cross-border civil and criminal proceedings.⁹ The Agency also commenced preparations for the design and development of the **Joint Investigation Teams collaboration platform (JITs CP)** to provide secure electronic information exchange for cross-border criminal investigations.¹⁰

In addition, eu-LISA was tasked with the development of the **EU Visa Application Platform** to digitalise the visa procedure.¹¹

¹ Regulation (EU) 2018/1726, OJ L 295, 21.11.2018.

² Regulations (EU) 2018/1860, 2018/1861, and 2018/1862, OJ L 312, 7.12.2018.

³ Regulation (EC) No 767/2008; Council Decision 2004/512/EC, and Council Decision 2008/633/JHA.

⁴ Regulations (EU) No 603/2013, and No 604/2013; Regulation (EC) No 1560/2003.

⁵ Regulation (EU) 2017/2226, OJ L 327, 9.12.2017.

⁶ Regulations (EU) 2018/1240, and 2018/1241, OJ L 236, 19.9.2018.

⁷ Regulation (EU) 2019/816, OJ L 135, 22.5.2019.

⁸ Regulations (EU) 2019/817, and (EU) 2019/818, OJ L 135, 22.5.2019.

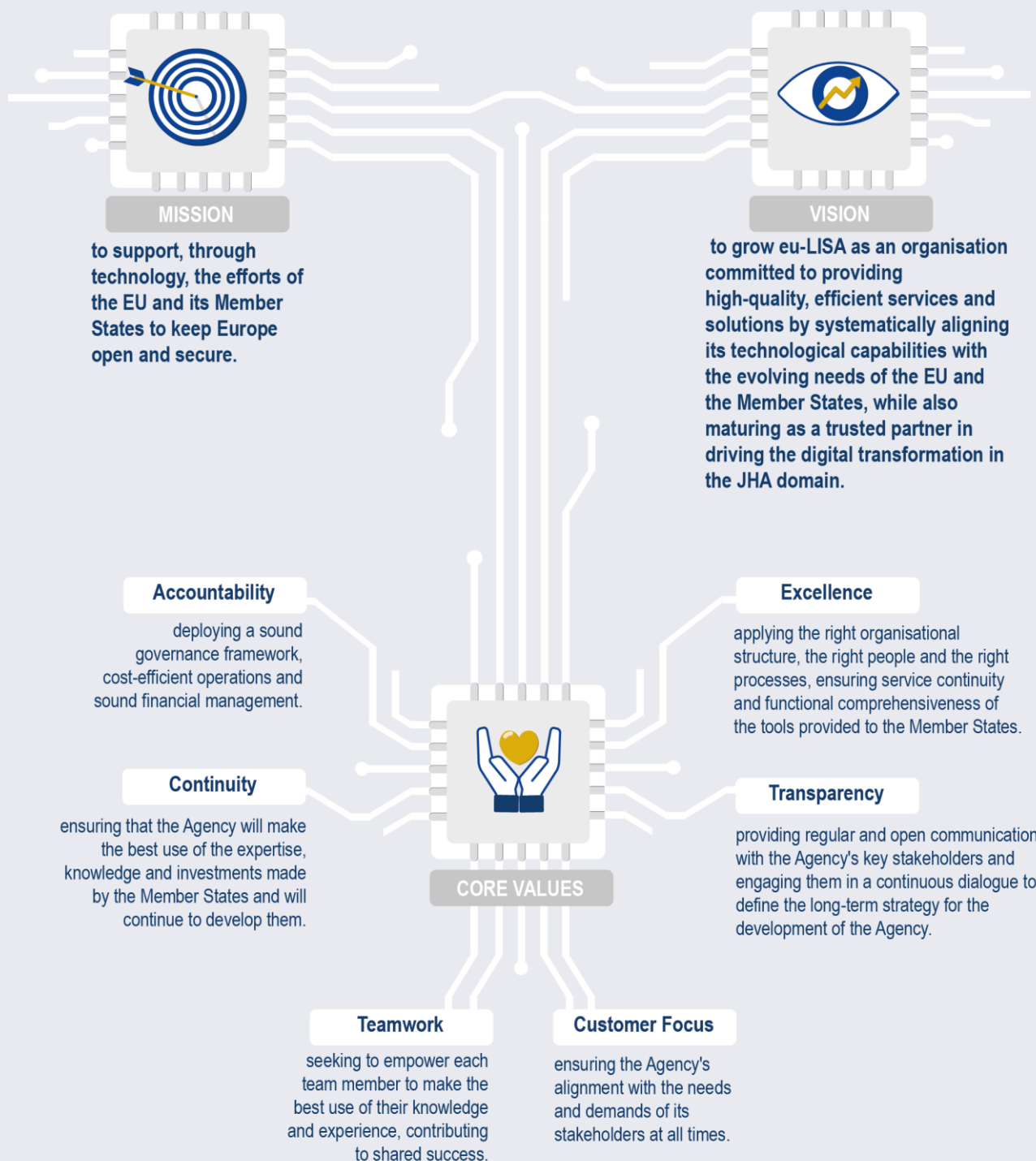
⁹ Regulation (EU) 2022/850, OJ L 150, 1.6.2022.

¹⁰ Regulation (EU) 2023/969, OJ L 132, 17.5.2023.

¹¹ Regulation (EU) 2023/2667, OJ L, 7.12.2023.

To ensure the provision of state-of-the-art expertise to its key stakeholders – the Commission, the Member States and other EU agencies – eu-LISA actively monitors the latest developments in research and innovation to identify new technology solutions, further enhance its operational efficiency, and drive digital transformation in the JHA domain. Additionally, eu-LISA provides high-quality services to all system end-users, including 24/7 support and user training.¹² The Agency also remains transparent and accountable to its stakeholders and EU citizens.

Mission, vision and core values

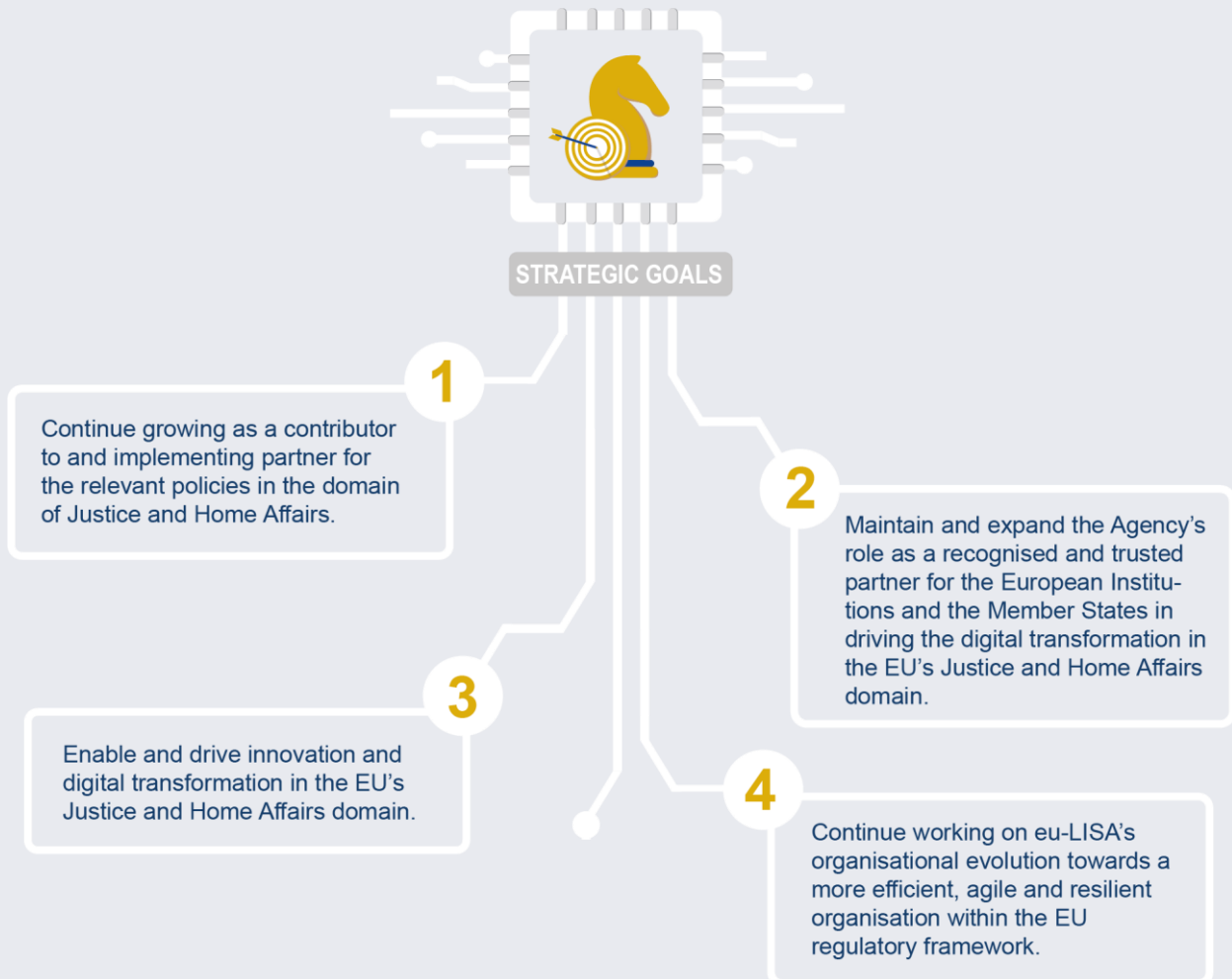


¹² For e-CODEX, the Agency must ensure technical support during business hours.

Long-term strategy

The strategic objectives outlined in the Agency's **long-term strategy for 2021–2027** reinforce eu-LISA's primary mission of delivering state-of-the-art technological solutions and continuing the digitalisation of the JHA domain to support its stakeholders in their efforts to keep Europe open and secure.¹³

The Agency's long-term and annual activities take guidance from the following four strategic goals:



SEAT OF THE AGENCY
Tallinn, Estonia



TECHNICAL SITE
Strasbourg, France







LIAISON OFFICE
Brussels, Belgium



TECHNICAL BACK-UP SITE
St Johan im Pongau, Austria

¹³ [eu-LISA strategy 2021–2027](#), adopted by the Management Board in November 2021.

JHA information systems entrusted to eu-LISA

Purpose of the system	Entry into operation	Status	Data stored in 2023	Operations in 2023
Asylum, migration and borders				
Eurodac European Asylum Dactyloscopy database				
Eurodac is the EU database of digitalised fingerprints for managing asylum applications under the Dublin Regulation. The system assists in establishing the responsible Member State by determining whether the applicant has previously claimed asylum in another EU country. To better combat irregular migration, eu-LISA will undertake a major evolution of the system, introducing new functionalities and central system redesign.	2003 managed by eu-LISA since June 2013	 in operation	7.4 million fingerprint sets	2.6 million data transmitted
EU internal security and borders				
SIS Schengen Information System				
SIS is the largest information-sharing system for managing external borders and ensuring the internal security of the Schengen area. SIS facilitates information exchange about wanted or missing persons or objects, together with instructions for competent authorities on what to do when the person or object has been found. As such, it serves as an invaluable tool for combating cross-border crime and terrorism.	1995 managed by eu-LISA since May 2013	 in operation	90.5 million alerts	14.7 billion searches performed 355 000 hits
Schengen, borders and visa				
VIS Visa Information System				
VIS facilitates the processing of visa applications and the management of short-stay visas for TCNs travelling to or transiting through the Schengen area. It supports the implementation of the EU's common visa policy and helps combat visa fraud by assisting in the identification of persons not fulfilling the necessary conditions for stay or entry.	2011 managed by eu-LISA since December 2012	 in operation	51.2 million visa applications	211 million operations
EES Entry/Exit System				
EES is set to streamline border control procedures by replacing manual passport stamping with the electronic registration of all third-country nationals entering and exiting the Schengen area. Once operational, EES will ensure better monitoring of authorised stays and the identification of possible overstayers, thereby contributing to preventing irregular migration and strengthening internal security, while also helping to combat organised crime and terrorism.	2024	 in development	n/a	n/a
ETIAS European Travel Information and Authorisation System				
ETIAS is an online travel authorisation system for visa-exempt third-country nationals travelling to 30 European countries. This pre-travel screening system will compare information across all JHA systems, as well as Europol and Interpol databases, for advance identification of potential security, irregular migration or high epidemic risks that may give grounds for denying entry to the Schengen area. ETIAS travel authorisations are checked by air, sea and land carriers prior to boarding and also by border guards at Schengen borders.	2025	 in development	n/a	n/a

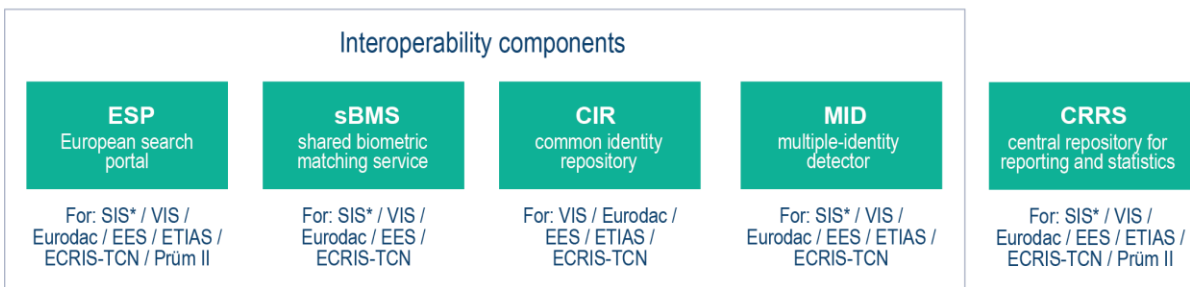
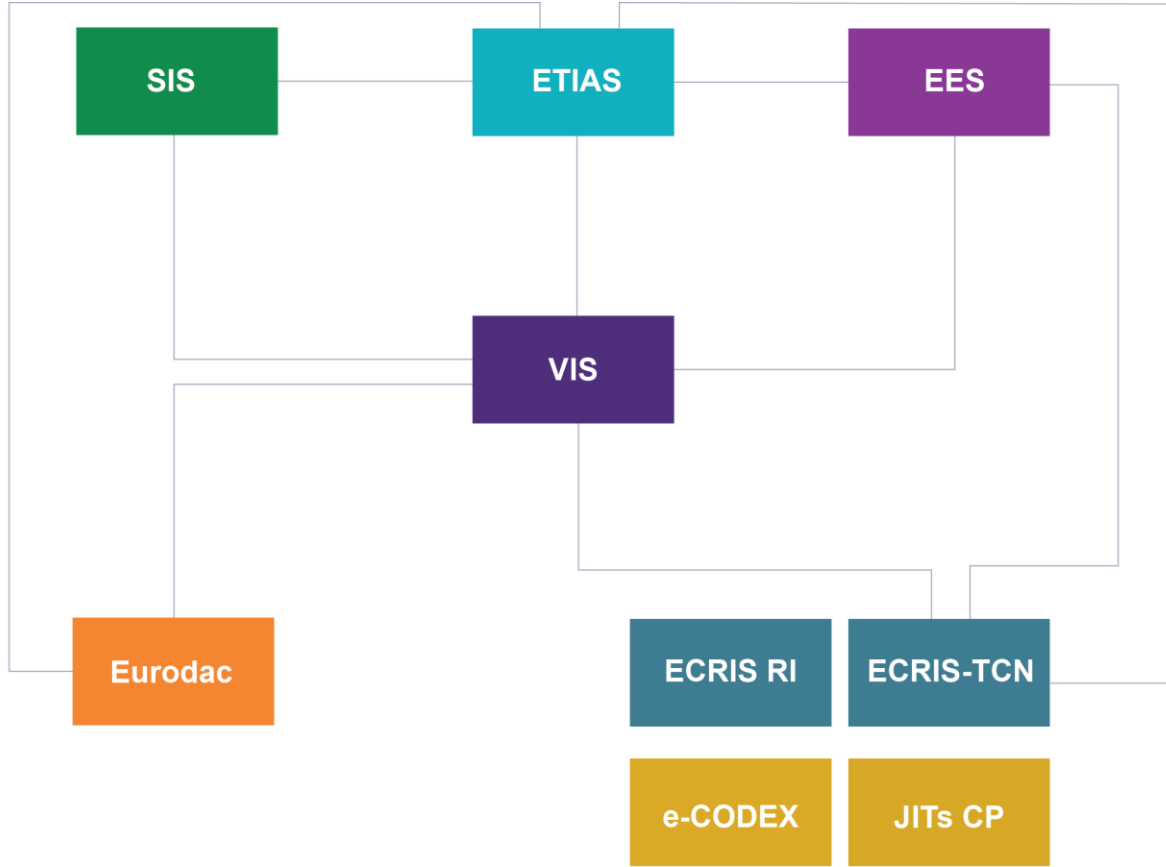
Purpose of the system	Entry into operation	Status	Data stored in 2023	Operations in 2023
Justice cooperation				
ECRIS RI European Criminal Records Information System – Reference Implementation				
ECRIS is a decentralised system for exchanging information between Member States on criminal records of EU citizens. ECRIS RI offers an integration interface which enables connection between national criminal record registers of Member States.	2012 managed by eu-LISA since April 2020	 in operation	n/a	n/a
ECRIS-TCN European Criminal Records Information System – third country nationals and stateless persons				
ECRIS-TCN will facilitate the electronic exchange of information on the criminal records of third-country nationals and stateless persons. As such, it supports the principle of mutual recognition of sentences and judicial decisions across Europe.	2025	 in development	n/a	n/a
e-CODEX e-Justice Communication via Online Data Exchange				
e-CODEX is a communication platform for facilitating the secure transmission of electronic content between judicial authorities and legal professionals in cross-border proceedings, ensuring a more efficient judicial process for citizens and businesses across Europe. eu-LISA will be responsible for the e-CODEX system starting from 3 June 2024. ¹⁴	2013 interim maintenance by eu-LISA since March 2024 ¹⁵	 in operation	n/a	n/a
JITs CP Joint Investigation Teams collaboration platform				
The Joint Investigation Teams collaboration platform will facilitate communication and cooperation between European judicial and law enforcement authorities, relevant EU agencies, and the European Anti-Fraud Office (OLAF), with a view to improving the efficiency and effectiveness of cross-border investigations and prosecutions.	2025	 in development	n/a	n/a
Interoperability				
New interoperability architecture				
Interoperability is the capability of interconnected systems to share data and exchange information, providing relevant authorities with streamlined access to comprehensive information. The overarching systems interoperability for the JHA domain will be enabled by the following components that facilitate authorised searches and information exchange:	2024–2026	 in development	n/a	n/a
<ul style="list-style-type: none"> ■ the European search portal (ESP) enabling authorised users to conduct single searches and receive results from all JHA information systems they are authorised to access; ■ the common identity repository (CIR) provides a shared container for identity data, travel document data and biometric data of persons registered in the EES, VIS, ETIAS, Eurodac and the ECRIS-TCN; ■ the multiple-identity detector (MID) creates and stores links between data in the different EU information systems in order to detect multiple identities, with the dual purpose of facilitating identity checks for bona fide travellers and combating identity fraud; ■ the shared biometric matching service (sBMS) matching an individual's biometric data across different systems. 				

¹⁴ [Commission Implementing Decision \(EU\) 2023/117](#) of 13 January 2023 on the service level requirements for the activities to be carried out by eu-LISA concerning the e-CODEX system.

¹⁵ eu-LISA has been providing interim system maintenance since March 2024. In May 2024, the Commission declared the successful completion of the takeover process, and on 3 June 2024, eu-LISA will officially take over full responsibility for managing the e-CODEX system as per [Commission Implementing Decision \(EU\) 2024/1272](#), OJ L, 14 May 2024.

Overview of business relations between the EU’s JHA information systems managed by eu-LISA¹⁶

The diagram below outlines the lines of information exchange between the existing JHA information systems – SIS, VIS, Eurodac and e-CODEX – and the new systems being developed – EES, ETIAS, ECRIS-TCN and the Joint Investigation Teams collaboration platform (JITs CP), together with the components that will enable interoperability between all JHA systems managed by eu-LISA to facilitate integrated border management and enhanced internal security for the Schengen area.



¹⁶ * Parts of the functionality will be connected to the interoperability architecture.



The Management Board's analysis and assessment

The Management Board of eu-LISA has analysed and assessed the Consolidated Annual Activity Report of the Agency's activities for 2023.¹⁷

The Board emphasises eu-LISA's essential role in the effective functioning of the Schengen area, as well as its invaluable support to EU policies in the areas of border control, visas, migration and asylum, e-justice, digitalisation and cybersecurity.

The Management Board:

- **acknowledges** eu-LISA's efforts towards achieving the objectives set for 2023 in the Single Programming Document 2023–2025;
- **thanks** the Agency for its continued efforts to ensure stable and uninterrupted availability of the EU information systems and thereby contribute to the efficient functioning of the Schengen area;
- **congratulates** the Agency for the successful entry into operation of the renewed SIS on 7 March 2023, the smooth integration of Croatia to VIS, and completion of the full integration of Cyprus into SIS;
- **regrets** that the Entry/Exit System (EES), the European Travel Information and Authorisation System (ETIAS), the ECRIS-TCN and the interoperability components could not enter into operation in 2023;
- **praises** the Executive Director for proposing the new Resolution Strategy (3R) and overcoming the deadlock with the Entry/Exit System;
- **welcomes** the revised interoperability Roadmap devised by the Agency and endorsed by the Management Board and the JHA Council;
- **recognises** the quality and timeliness of the support provided by the Agency to the Member States and the European Commission throughout 2023;
- **acknowledges** the challenge for the Agency to work in parallel on a large number of interrelated activities and notes that the volume and the complexity of the Agency's operations continued to grow in 2023;
- **praises** the Agency's good progress in closing outstanding audit recommendations, reaching an overall implementation rate of 87% by 31 December;
- **welcomes** progress with the implementation of recommendations of the European Data Protection Supervisor (EDPS);
- **praises** the outstanding level of budget execution for 2023 commitment and payment appropriations, close to 100% in 2023, and the notable increase in the occupancy rate of the Agency;
- **expresses concern** about the repeated qualified opinions of the Court of Auditors on the legality and regularity of the payments underlying the Agency's accounts, while noting that the Agency was granted discharge for its budget 2022 by the budgetary authority;
- **encourages** the Agency to further strengthen the efficiency and effectiveness of its internal control system, and close remaining open long-standing audit recommendations;

¹⁷ See Article 19(1)(t) of eu-LISA establishing [Regulation \(EU\) 2018/1726](#).

- **notes** that the occupancy rate of the Agency is gradually improving but that 57 posts remained vacant at the end of 2023;
- **congratulates** the Agency for receiving the European quality management certificate 'Efficient CAF User', underlining eu-LISA's commitment to excellence, adherence to European standards and the Agency's ongoing commitment to continuous improvement; and
- **expresses its satisfaction** with eu-LISA's overall management throughout 2023.

The Management Board believes this report provides sufficient assurance that, despite many challenges hindering adherence to demanding implementation schedules, **eu-LISA took a systematic and consistent approach to implementing its mandate**, and used its financial and human resources in line with the purposes set out in eu-LISA's annual work programme for 2023, as outlined in the SPD 2023–2025.

The Management Board, taking into consideration the information provided in this report:

- emphasises the **considerable pressure on eu-LISA's staff** working on complex projects for which adequate human resources are key, for both operational and horizontal functions;
- further emphasises the need for eu-LISA to reduce **its dependency on external contractors**;
- **supports the Agency in its continuous efforts** to implement its commitments to deliver the revised roadmap for implementing EES, ETIAS, ECRIS-TCN, and the interoperability architecture;
- recognises the **interdependencies** between the Agency's work for the central systems and the Member States at the national level, and encourages eu-LISA to continue its close cooperation with its stakeholders, including the European Commission, to ensure the successful delivery of new systems;
- acknowledges the **importance of eu-LISA's capacity increase programme** to ensure sufficient data centre capacity for the efficient and sustainable deployment and management of both new and already existing IT systems, while continuing to guarantee the uninterrupted availability and timely evolution of all systems under its remit.

The Management Board extends its gratitude to the Agency's Executive Director, Agnès Diallo, to former Deputy Executive Director, Luca Tagliaretti, to eu-LISA's management, and its entire staff for their unwavering commitment and tireless efforts throughout this immensely challenging year.

Zsolt Szolnoki,

Chairperson of the Management Board



Foreword by the Executive Director

In many ways, 2023 has been a pivotal year for eu-LISA.

In March, the Agency successfully delivered the **new version of SIS** that now provides the Member States with a whole new set of functionalities and search capabilities, including biometric functionalities and information on returns. All of these advances contribute to further reinforcing security in the Schengen area.

Throughout 2023, eu-LISA continued to ensure the **seamless operational management of JHA information systems** under its remit (SIS, VIS and Eurodac), ensuring their availability to the Member States 24/7 all year round, with system response times remaining within set targets.

New countries have also joined our systems in 2023: Croatia gained full access to VIS in January, and Cyprus was fully integrated into SIS in July.

With **EES, ETIAS and the interoperability architecture**, the European Union has set an ambitious goal of implementing one of the world's most advanced border management systems to enable stronger security within the Schengen area, while also facilitating seamless international travel to the EU. When I joined the Agency a year ago, the development of these new systems was stalled, following repeated delays for their entry into operation, initially set for 2022.

To address these challenges, we defined a new strategy in June 2023, internally referred to as the '**3Rs**', with the objectives of **Remobilising** our suppliers at all levels, **Resolving** the complexities of the systems, and **Renewing** our internal working methods by adopting agile methodology, best industry practices, and setting up cross-functional teams. This new approach quickly delivered its first results, allowing us to unlock the situation and deliver the first functional system to the Member States by the summer, enabling them to move forward with their preparations.

In the autumn, eu-LISA proposed a new approach for the delivery of the interoperability architecture by 2026: gradual rollout of new systems in four waves of deployment. This approach, the **new Interoperability roadmap**, was unanimously endorsed first by the Management Board, and then by the JHA Council in October. The revised Interoperability roadmap foresees the delivery of new systems in four waves of deployment:

- **EES**, together with the carrier interface, and the shared biometric matching service (**sBMS**) before the end of 2024,
- **ETIAS**, six months later,
- **ECRIS-TCN** by mid-2025,
- and finally, the last **components of interoperability** during 2026.

By the end of 2023, eu-LISA was **on track with the development of new systems**, progressing according to this revised roadmap.

To move away from the silo approach, the Agency has taken inspiration from industry best practices and introduced **new ways of working**. In this regard, the most significant change has been the internal reorganisation of teams into transversal squads, with continuous steering at all levels, and integrating our contractors to work together with our staff as one team under one roof. Based on this success, the Agency has expanded the agile model to all areas of its work and to the interoperability architecture.

The Agency continued to regard as one of its highest priorities the **physical and cybersecurity of the systems and data it hosts, by applying security by default, moving towards no trust policy** and ensuring the **protection of personal data** within the framework of the EU's General Data Protection Regulation, and under the supervision of the European Data Protection Supervisor.

The Agency is also gradually entering a new area of work, supporting the **digitalisation of justice** in Europe. In 2023, efforts have been directed to prepare for the takeover of e-CODEX by eu-LISA and further progressing with the development of ECRIS-TCN.

In 2023, one of eu-LISA's key priorities was to **strengthen its compliance with EU rules**, in particular by setting up an ambitious action plan to address open audit recommendations. As a result, the Agency managed to bring the implementation rate of audit recommendations to 87%, thus paving the way to a more compliant management of its activities. Increased compliance was supported by the deployment of more efficient management tools, close collaboration between financial and operational teams, as well as monthly budget reviews at management level to bring budget consumption to an excellent level by the end of the year, at close to 100% for commitments and payments. In addition, 2023 saw a substantial improvement in the staff occupancy rate (94.7%), gender balance, and implementation of an actions plan to make eu-LISA a 'Great Place to Work'. The latter involved drafting an employee engagement resolution plan and nominating an Engagement Ambassador. These efforts resulted in eu-LISA receiving a mention at the EU Agencies Network (EUAN) 'Diversity and Inclusion Awards' for the work on implementing initiatives outlined in its DEI Action Plan for 2023-2024.

Improvements in compliance activities were confirmed by the annual assessment of the internal control framework, summarised in part 2 of this document. One major achievement for the Agency was being awarded the European **quality management certificate 'Effective CAF User'**, a recognition of eu-LISA's commitment to excellence, adherence to European standards and the Agency's ongoing commitment to continuous improvement. Finally, the Agency was granted discharge from the budgetary authority for its 2022 accounts.

All these efforts underpin the main elements of eu-LISA's strategy for the coming years, namely to:

- **ensure the efficient operation and implementation of the EU's JHA information systems entrusted to eu-LISA**, gradually moving toward a new way of working, with agile methods and updated operating model;
- **continue improving the Agency's performance in terms of compliance**, ensuring a high level of compliance, efficiency and transparency;
- **foster staff engagement by making eu-LISA a great place to work to attract and retain new talent**, further increasing the occupancy rate and fostering transparency, inclusiveness and ethics;
- **be fit for the future, enhancing technology and innovation**, looking at the possible use of new technologies, such as cloud solutions and artificial intelligence;
- **consolidate the Agency's governance and relations with its key stakeholders**, in particular the EU institutions, Member States, host countries, academia and industry.

In addition to managing and developing IT systems, the Agency plays a major role in the EU by being a cornerstone of the Schengen area of freedom, security and justice, providing a range of services to the Member States and professionals, facilitating the work of law enforcement authorities and justice practitioners, while also delivering a noticeably better service to EU citizens.

By leveraging the best technologies and digitalising processes, the Agency remains committed to taking on board new tasks and new systems in order to continue playing a key role in making Europe's digital transformation a success. With the ongoing changes and transformation, eu-LISA continues to expand its capacity to grasp these new challenges and the Agency is proud to positively impact the lives of millions in Europe by bringing better services to citizens and professionals.

Agnès Diallo,
Executive Director



Executive summary

The EU Agency for the Operational Management of Large-Scale IT Systems in the area of Freedom, Security and Justice (eu-LISA) was established in 2011 to take over the management of three existing IT systems developed for the Schengen area. Since then, the Agency has grown into one of the key contributors to safeguarding Europe's internal security, while also facilitating one of the fundamental rights of EU citizens – the freedom of movement. Over the years, eu-LISA has evolved into one of the key drivers of the ongoing digital transformation of the EU's domain of justice and home affairs (JHA).

This report reflects eu-LISA's progress with implementing highly challenging and critical tasks within an increasingly complex operational environment. Throughout 2023, the Agency remained a reliable and committed partner for the European institutions and the Member States in the process of implementing relevant JHA policies and ensuring the safety and integrity of the technologies deployed.

Among many other achievements, eu-LISA's key accomplishments in 2023 include:

devising a 3Rs resolution strategy to unlock the delivery of new JHA systems	new interoperability roadmap for the gradual rollout of the new systems	receiving the European quality management certificate ' Effective CAF User '
successful launch of the renewed SIS on 7 March 2023	Croatia connected to VIS and Cyprus integrated into SIS	finalising preparations for the takeover of the e-CODEX system
87% of outstanding audit recommendations implemented	99.9% budget execution for commitments and payments	notable increase in the Agency's occupancy rate

Achievements of the year

Throughout 2023, eu-LISA continued its efforts to contribute to a fully functioning and resilient Schengen area for the benefit of European citizens. Since all JHA systems managed by the Agency **support the implementation of EU policies** in the areas of border management, visas, migration and asylum, digitalisation, and contribute to combating organised crime and terrorism, their continued evolution and maintenance are of critical importance to the EU and eu-LISA.

In the coming years, the Agency will expand its contribution to the JHA domain by launching several new IT systems that are currently in development. These new systems and the overarching **interoperability architecture** for the JHA domain will be rolled out gradually in four waves of deployment, as set out in the revised interoperability roadmap that was approved by the JHA Council in October 2023. Together, these interoperable systems will transform border management through digitalisation, delivering an **integrated intelligent approach to ensuring Europe's internal security**, while also providing a seamless experience for travellers headed to the Schengen area.

In light of its new responsibilities in the EU's justice domain, eu-LISA continued to increase its engagement with the justice community by continuing the development of new digital solutions for the ongoing modernisation and digitalisation of judicial systems across Europe. While continuing to step up its efforts in **driving the digitalisation** of the EU's JHA domain, the Agency also focused on cybersecurity and combating threats in the cyber domain, in particular by making the necessary preparations for obligations stemming from new EU regulations on information security and cybersecurity.

As the EU agency responsible for the operational management and development of JHA information systems, eu-LISA continued to serve as a **key partner** to its stakeholders by delivering state-of-the-art expertise through proactive cooperation and information exchange with the EU institutions, agencies, and the Member States.

In general, the Agency's work focused on the following annual priorities:

➤ **Priority 1: Ensuring the stable and uninterrupted operation and implementation of evolutions of systems managed and services delivered by eu-LISA (i.e., SIS, VIS, Eurodac, ECRIS RI)**

For 2023, eu-LISA's main objective was to ensure the effective and continuous operation of systems under its mandate while delivering the required evolutions and preparing for their integration with interoperability components. The Agency ensured the stable operation of the EU's core JHA systems:

- the **Schengen Information System (SIS)**, and its automated fingerprint identification system (AFIS);
- the **Visa Information System (VIS)**, its biometric matching system (BMS), and the VIS Mail functionality;
- the **European Asylum Dactyloscopy Database (Eurodac)**, together with DubliNet; and
- the **European Criminal Records Information System reference implementation (ECRIS RI)**.

In addition, eu-LISA ensured the effective operational management of the underlying infrastructure, networks and services, complemented by 24/7 support services to system end-users.

Except for some short-term unavailability and delays, the systems performed in compliance with their respective service-level targets, with SIS availability at **99.67%** and VIS at **99.97%**. Eurodac availability – affected by several critical incidents – fell below target (99.47%). Although **system usage** continued to increase throughout the year (i.e., SIS searches, VIS operations, Eurodac data transmissions), only VIS usage continued to remain below pre-pandemic levels.

Through the combined efforts of eu-LISA, the Member States, and the Commission, the **renewed SIS entered into operation on 7 March 2023**, introducing a new set of functionalities and search capabilities and ensuring that more complete and reliable information is available to the competent authorities. As part of the renewed SIS, eu-LISA concluded the 'AFIS phase 2' project, delivering **new biometric functionalities** such as the possibility to store palm prints and latent prints (impressions on surfaces). The current Schengen architecture, operated by eu-LISA, was further reinforced with the **integration of Cyprus in July 2023**, increasing the number of SIS users to 34. In parallel, the Agency continued supporting Frontex with the development of technical components necessary to achieve readiness to join SIS. In 2023, the Agency also supported the integration of Croatia into VIS.

Since 1 January 2023, **Croatia has full access to VIS**, allowing border controls to be lifted at internal borders with other Schengen countries. This marks the first enlargement since 2011 when Liechtenstein joined the border-free zone. The Agency also continued with the implementation of the **Revised VIS**, which has taken significantly longer than initially foreseen due to the complexity of technical requirements affecting the project's scheduled activities. In October 2023, eu-LISA carried out the **VIS security and business continuity exercise** to test and further improve the system's resilience.

To support the implementation of the **Common European Asylum System (CEAS)**, the Agency continued maintaining **Eurodac** and provided critical system upgrades in anticipation of the forthcoming adoption of the **New Pact on Migration and Asylum** and the **Recast Eurodac Regulation**. In 2023, the Agency completed the Eurodac capacity increase project, expanding the system's maximum **storage capacity** from 7 to 9 million records, while also increasing the daily **throughput capacity** from 15 000 to 24 000 transactions.

Moreover, as the security analysis of the **ECRIS RI application** revealed several **security vulnerabilities**, the Agency commenced discussions with the Commission and the relevant stakeholders on the potential ECRIS RI rewrite to mitigate any residual security risks to safeguard the entry into operation of ECRIS-TCN.

Regarding infrastructure, in May 2023 eu-LISA reached an important milestone, having been **designated as a local internet registry (LIR)**, and becoming a member of the Regional Internet Registry of Europe. As a result, the Agency can now distribute IP addresses to end-users as a service provider or use them for its infrastructure. To support this activity, eu-LISA acquired essential internet resources for connecting to the internet and to provide public JHA system services, such as EES/ETIAS web services.

Additionally, to increase operational efficiency, eu-LISA introduced a dedicated **data centre infrastructure management (DCIM) tool** to improve infrastructure optimisation and energy management. To accommodate future capacity needs, eu-LISA continued to optimise and reorganise its data centres and progressed with preparations for its **future modular data centre in Strasbourg**.

The Agency also ensured the continuous operation and service delivery of the **common shared infrastructure (CSP)**, by implementing an on-premise container platform to reduce delivery time through automation and established a continuous integration, delivery and deployment (CI/CD) pipeline to improve efficiency and deployment time for new applications. Furthermore, eu-LISA worked on the **comprehensive cloud platform** to test and verify the use of cloud technologies for hosting appropriate workloads and designed the **build pipeline for mobile applications**, necessary for the development of applications for new systems.

In addition to the operational management of JHA information systems, eu-LISA continued to deliver other closely related statutory tasks, such as providing training to Member States on the use of JHA information systems, preparing statutory reports on their technical performance, annual statistics and compiling lists of designated authorities.

➤ **Priority 2: Proceeding with the implementation and development of new JHA information systems (i.e., EES, ETIAS, ECRIS-TCN), and the interoperability architecture**

In May 2023, eu-LISA adopted a new approach, internally referred to as the **3Rs Resolution Strategy** (remobilise, resolve and renew), to break the long-standing deadlock with the development of the Entry/Exit System (**EES**), which had started to affect the development and timely delivery of other new systems, i.e., the European Travel Information and Authorisation System (**ETIAS**), the European Criminal Records Information System on third-country nationals (**ECRIS-TCN**), and interoperability components. In a relatively short time-span, the new approach significantly **improved the management of issues and allowed more effective application of corrective actions** to steer project implementation, avoid fallbacks in performance and any new significant delays. As a result, the Agency succeeded in accelerating the development of EES, offering more stable conditions for the Member States to continue their preparations.

To ensure the successful delivery of new JHA systems and the overarching interoperability architecture, eu-LISA took decisive steps to re-frame its existing approach to systems development by introducing the **waves approach**. This new approach foresees the rollout of new JHA systems and the interoperability architecture in four waves, starting from 2024 and extending to 2027, with each consecutive wave focusing on achieving technical readiness for one key system and accompanying services.

- 2024 | Wave 1** **EES**, together with joint web services (including the carrier interface), and the shared biometric matching system (**sBMS**);
- 2025 | Wave 2** **ETIAS**, together with web services for TCNs; two interoperability components: European search portal (ESP), and the common identity repository (CIR); and the central repository for reporting and statistics (CRRS);
- 2025 | Wave 3** **ECRIS-TCN** with interoperability components;
- 2026 | Wave 4** finalisation of the **JHA interoperability architecture** (incl. final interoperability component: the multiple-identity detector, **MID**) and **Revised VIS**.

To oversee the successful delivery of each wave, the Agency established a dedicated Back-to-Green Taskforce, focusing on getting the job done with a one-team-under-one-roof approach based on Agile project management methodology. This approach is devised to deliver tangible results at regular intervals through the gradual rollout of **minimum viable products (MVP)** – an intermediate release of the final product deployed in a stable environment allowing the Member States to conduct test campaigns and continue their preparations.

The development and testing of **EES** continued throughout the year. In cooperation with the contractor, the Agency corrected the technical issues that had been blocking Member States from making progress with testing and preparing their national systems. Since introducing the new approach, three major EES releases have been installed in Member State testing environments, with a considerably lower number of software defects, which highlights the improved quality of development and testing. Moreover, the newly-established high-performing common management mechanism continued to monitor progress on a regular basis and applied corrective actions to steer the implementation, enabling to resolve most of the outstanding contractual issues.

The Agency also continued with the development of the **EES/ETIAS web services**, focusing on the web portal, testing the quality and requirements of the carrier interface software, and the mobile application, the application developed by eu-LISA internally.

The implementation of **ETIAS** remained in the **analysis and design phase** in 2023 due to dependencies on EES shared components (i.e., web services) and interoperability specifications blocking the finalisation of the design for their integration. However, in November, eu-LISA finalised the **testing environment platform**. Additionally, in 2023, the Agency completed the monitoring of technological solutions for the **'white list' of secure audio-video communication tools** to be used by ETIAS national units to interview applicants in cases where consular services are out of reach.

In parallel, eu-LISA also continued with the development of **ECRIS-TCN**, although **analysis, design and development activities** advanced more slowly than planned due to dependencies on EES shared components. In 2023, Member States were delivered two versions of the ECRIS-TCN **integrated simulator** (combining the central system, the interface software, parts of ECRIS RI and an ESP simulator) for testing.

To facilitate information exchange between the new and existing IT systems, eu-LISA will develop an **overarching interoperability architecture for the JHA domain**. Once operational, the interoperability of JHA systems will support integrated border management and internal security. The Interoperability programme remained in the **implementation phase** due to the dependencies with the EES development programme.

Throughout the year, eu-LISA continued with the implementation of interoperability components, focusing on developing sBMS functionalities related to system migrations and recasts, e.g., continued with **data migration** from different JHA systems to sBMS to enable cross-domain identification, and the extension of the common identity repository (CIR) and the multiple-identity detector (MID) for the justice domain. In June, the Agency delivered an sBMS **release aligned with the most recent software** and the new version of the integration layer. In November, eu-LISA completed the development and factory acceptance testing of the **first major MVP release for ESP, CIR and CRRS** that fully support the needs of ETIAS.

In collaboration with Sweden, eu-LISA completed the **sBMS USK VIS pilot project** for visa applications, focusing on collecting the quality score calculated for each capture attempt (fingerprint and facial images) to determine whether the agreed quality thresholds might lead to several capture attempts during the application process and to assess the impact of quality checks on the overall duration of capture. The analysis of the fingerprint quality values showed that the combined quality strategy used in the sBMS USK would improve the current capture process on visa application workstations by focusing only on VIS records needing recaptures. The pilot project also validated the overall quality of the data sets on facial image quality and offered the possibility to reduce time spent on the capture of facial images.

➤ **Priority 3: Providing support and subject matter expertise to the Commission and the Member States**

eu-LISA is always ready to support the Member States, the Commission and EU agencies on issues related to the development and evolution of JHA information systems under its remit, including supporting Advisory Groups and Programme Management Boards. In addition, eu-LISA channels its technical expertise into providing regular training sessions on the operation and technical use of JHA systems, and tailoring them to the needs and identified knowledge gaps of Member States and other stakeholders. The reports on the technical functioning of the system and statistics provided by eu-LISA are used in the **Schengen Barometer+** developed by the Commission to improve situational awareness and forecasting capabilities at EU level.

To ensure the continued evolution of JHA information systems, eu-LISA continues to monitor and conduct research (incl. proof-of-concept projects), while also promoting standardisation and coordinating outreach activities with the industry and academia to foster innovation and digitalisation. In particular, the Agency continued developing its capabilities and expertise in the area of artificial intelligence (AI) by concluding a **proof-of-concept project for an AI-based solution for predictive analytics of IT infrastructure and networks** to improve the availability of infrastructure and reduce downtime.

Throughout 2023, eu-LISA continued its active contribution to the **EU Innovation Hub for Internal Security**, by deploying a staff member to Europol to support the Hub secretariat, and also by mapping relevant projects, knowledge and capability gaps in the JHA domain.

In addition, eu-LISA continued developing its biometrics portfolio by investing in applied research and innovation activities and targeted solutions to increase the quality of biometric aspects and offer prompt and high-quality support to its stakeholders. As part of the ongoing efforts to standardise data quality across all JHA systems, the Agency, in close collaboration with the Commission's Joint Research Centre (JRC), **initiated a new international standard for fingerprints** (latent fingerprints). eu-LISA also continued to work towards becoming an internationally recognised expert in the area of biometrics and identity management. To promote standardisation at the international level and improve the services offered by the Agency, eu-LISA has **put forward a proposal for a new fingerprint quality metric**. These are major advances not only for improving interoperability across all JHA systems, but also for preventing vendor lock-in and achieving better transportability of biometric products across framework contracts/vendors.

Furthermore, in April, eu-LISA presented its **first scientific research paper, a large-scale study on fingerprint data quality**, at the 11th International Workshop on Biometrics and Forensics (IWBF) in Barcelona.

The Agency also continued to host **industry roundtable** events to promote the exchange of views on specific focus areas, showcase innovative technologies, products and services from the industry, and address the needs and capability gaps of Member States. In 2023, the Agency organised two industry roundtables, one on **cyber resilience** and another on the **digitalisation of justice**.

➤ **Priority 4: Stepping up the Agency's contribution to the EU's justice domain**

Throughout the year, the Agency continued expanding its role in driving digital transformation in the EU's justice domain. In 2023, eu-LISA's key objective was to **take over the operational management of the e-CODEX system** (e-Justice Communication via Online Data Exchange). On 8 December 2023, eu-LISA and the Consortium responsible for managing the e-CODEX system submitted to the Commission a joint request to declare the successful completion of the handover/takeover process. The Commission officially declared the completion of the handover/takeover process on 7 May 2024, and eu-LISA will officially take over the operational management of the e-CODEX system on 3 June 2024.

The Agency's next major development project for the justice domain is the **Joint Investigation Teams collaboration platform** that is set to improve the efficiency of cross-border investigations and prosecutions. Following the entry into force of the JITs collaboration platform regulation, in June 2023, the Agency started preparations by setting up governance bodies to steer project implementation and initiated a project for the development work. Throughout the year, eu-LISA continued to increase its engagement with the EU's justice community and established closer partnerships.

➤ **Priority 5: Progressing with the second extension of eu-LISA's operational site in Strasbourg (Capacity Increase Programme)**

Following the consolidation of several interrelated infrastructure projects under the **Capacity Increase Programme** in 2021, eu-LISA continued working on the second extension of its operational site in Strasbourg, with a view to expanding available office space. However, due to budget constraints, the building project has been postponed to the next multiannual financial framework period.

To address urgent business needs ahead of completing the second extension, the Capacity Increase Programme includes two other projects: installing a containerised **modular data centre** (a flexible and scalable solution that does not require any construction activities), and a **power and cooling upgrade** to cover the short- and long-term power and cooling needs of the Strasbourg operational site.

In 2023, the Agency completed a sourcing survey for the containerised **modular data centre** to get an overview of the market options and potential vendors in preparation of launching the planning phase. The project is currently in the planning phase, focusing on defining the final design, security requirements, as well as civil engineering and electrical works.

As for the power and cooling upgrade, the pre-feasibility study for optimising cooling capacity was delivered in June, and the Agency selected two scenarios: the first enables a more efficient use of the current cooling infrastructure in the short term, while the second is a mid-term solution based on a geothermic approach to reduce the carbon footprint. The implementation of these two scenarios will reduce overall power usage effectiveness (PUE) in compliance with EU guidelines for improving the energy efficiency of data centres.

➤ **Priority 6: Preparing for the Agency's regular evaluation in accordance with Article 39 of eu-LISA's establishing Regulation**

Under Article 39 of the eu-LISA establishing Regulation, the Commission shall evaluate eu-LISA's performance in relation to its objectives, mandate, locations and tasks to identify recommendations for any possible modifications of the Agency's mandate.

In 2023, the Agency continued with the independent benchmarking exercise launched in 2022 at the request of the Commission to prepare for eu-LISA's forthcoming external evaluation. An external contractor assessed the Agency's overall operational performance, the adequacy of the distribution and use of human resources, and its contribution to the objectives of relevant EU policies in the area of justice and home affairs. To provide comprehensive insights into eu-LISA's possible development trajectory and evolution in the years to come, the Agency commissioned additional tasks from the contractor by elevating the report to a more strategic level with recommendations on improvements with a medium-term perspective. Due to the extended scope of the exercise, the final report was completed in January 2024.

Management and internal controls assessment

The second and third parts of this report provide an overview of the Agency's management in 2023, including the summary of the annual internal control framework (ICF) assessment report, the summary overview of audits, and follow-up on observations from the discharge authority.

The Agency is developing a complex set of intricate large-scale IT systems, and is evolving in a dynamic environment that requires agility, while ensuring compliance with the EU rules. These circumstances create additional challenges and pressure on the Agency's work and its organisation. In January 2023, eu-LISA's Management Board concluded that the entry into operation of the Entry/Exit System in May 2023 was no longer feasible. Since then, the Agency has put in place a new 3Rs resolution strategy (Remobilise, Resolve, Renew) to unblock the situation and prepared a new interoperability roadmap, with a gradual implementation in four waves between 2024 and 2026.

In May 2023, eu-LISA was awarded the 'Effective CAF User', making it the only EU agency with a valid Common Assessment Framework (CAF) certificate at the time of writing this report. The label is not only a recognition of the work done, but also serves as the joint commitment of the Agency's management and staff to continue striving for quality and excellence. Looking ahead, work continues based on the **CAF improvement plan**, outlining a list of improvement actions to support organisational development, and improve the quality and performance of governance at all levels. Moreover, in 2023, the Agency reached an outstanding level of budget execution for commitments and payments (close to 100%) and achieved a notable increase in the staff occupancy rate.

The 2023 ICF assessment report concluded that **eu-LISA's internal control system is present, functioning and effective, although some improvements are still needed**. Various audits, including by the European Court of Auditors (ECA), have also pointed out areas for improvement. Throughout 2023, the Agency remained fully committed to making improvements in identified deficiency areas, focusing on contract management related to operational programmes and projects. eu-LISA aimed to close the remaining audit recommendations in the most effective way, by giving priority to the most urgent ones and those that have been pending for the longest period. As a result, by 31 December 2023, the Agency had closed 33 out of 38 (87%) outstanding audit recommendations. The Agency is committed to taking prompt and decisive action to address delays in the implementation of remaining outstanding recommendations that still remain.

Introduction

The eu-LISA Consolidated Annual Activity Report for 2023 presents a structured overview of the implementation of the Agency's annual work programme for 2023 and achievement of the objectives outlined in the Single Programming Document 2023–2025.¹⁸

The report follows the structure established by the European Commission for all EU agencies¹⁹ and the requirements in Article 48 of the eu-LISA Financial Rules.²⁰

- **Chapter 1** provides a detailed overview of **achievements** related to the operational management and evolution of JHA information systems, the development of new systems, and other activities.
- **Chapter 2** sets out the main elements of **eu-LISA's management**, incl. budget and human resources.
- **Chapter 3** provides an assessment of the effectiveness of the **internal control framework** (ICF) and lists major corporate risks for the reporting period.
- **Chapters 4 and 5** provide relevant **declarations of assurance**.
- The **annexes** to this report provide a more detailed look at resource utilisation and additional transparency as regards the Agency's work and operations.

LEGAL BACKGROUND

Article 24(3)(g) of Regulation (EU) 2018/1726 requires the Executive Director to prepare and submit the draft Consolidated Annual Activity Report to the Management Board for assessment and adoption, after prior consultation with the Advisory Groups.

Article 19(1)(t) of the same Regulation mandates the Management Board with the assessment and adoption of the Agency's CAAR for the previous year, presenting a comprehensive overview of the results achieved in comparison with the objectives outlined in the annual work programme.

The Management Board must submit the report, together with its assessment, to the European Parliament, the Council, the Commission and to the Court of Auditors by 1 July, and make it available to the public.



Structure of the annual activity report

The Agency's activities are built around **portfolios** to reflect eu-LISA's operating model and interdependencies between different projects and activities. This approach ensures better coordination to enable synergies and economies of scale, while also improving efficiency in terms of resource management and traceability.

Under this approach, a '**portfolio**' refers to a collection of activities, individual projects and non-project tasks that collectively contribute to the achievement of eu-LISA's strategic objectives. Each portfolio comprises several **activity areas** to coordinate the management of interrelated projects and non-project activities.

In 2023, the Agency structured its work programme based on the following portfolios:²¹

- operational management and evolution of systems in operation,
- development of new systems and innovation,
- innovation, research and development,
- infrastructure and networks,
- direct support to operations, and
- corporate activities.

¹⁸ eu-LISA Single Programming Document 2023–2025.

¹⁹ Communication from the Commission on the [guidelines for the SPD and the CAAR](#), COM (2020) 2297 final.

²⁰ [Financial Rules of eu-LISA](#), Management Board decision No 2019-198, entry into force: 1 September 2019.

²¹ The number of portfolios is not fixed and is subject to change depending on the evolution of tasks assigned to eu-LISA.



I

ACHIEVEMENTS

Overview of eu-LISA's main achievements in the operational management and evolution of JHA information systems, the development of new IT systems, research and innovation and other key activities

Achievements of the year

Throughout 2023, eu-LISA continued its efforts to contribute to a fully functioning and resilient Schengen area for the benefit of European citizens. As the Agency responsible for the operational management of the EU's Justice and Home Affairs (JHA) information systems that facilitate integrated border management and cooperation between law enforcement authorities, eu-LISA's activities contribute to the EU's internal security and free movement, affecting millions of people travelling to Europe from all over the world.

eu-LISA's mandate and core operational activities contribute to implementing the **political guidelines for the European Commission for 2019–2024**.²² Taking guidance from the **Commission's strategy towards a fully functioning and resilient Schengen area**²³ and the revised Schengen evaluation and monitoring mechanism (**SEMM**),²⁴ the Agency's work programme contributes to fortifying and improving the resilience and integrity of the Schengen area. The JHA systems managed by eu-LISA facilitate swift, effective and reliable information exchange that is **critical for sustaining and strengthening the EU's area of freedom, security and justice**. To that end, the Schengen Information System (SIS) supports border control and law enforcement cooperation, while the Visa Information System (VIS) facilitates visa issuance and checks.

Within the framework of the **EU Security Union Strategy** for 2020–2025,²⁵ the Agency focuses on activities that contribute to building a **strong European security ecosystem**, including facilitating police cooperation and information exchange, ensuring strong external borders, and engaging in security-related research and innovation. The current Schengen architecture, operated and maintained by eu-LISA, was further reinforced with the full implementation of the **renewed SIS in March 2023**. With the **integration of Cyprus in July 2023**, the number of SIS users increased to 34. What is more, in 2023, the Agency supported the integration of Croatia into VIS. The Agency also supported implementation of the EMPACT 2022–2025 by participating in three operational action plans on the following topics: migrant smuggling, firearms, and cyber-attacks.²⁶

In anticipation of the forthcoming adoption of the **New Pact on Migration and Asylum**,²⁷ in particular the **Recast Eurodac Regulation**,²⁸ eu-LISA continued with critical system upgrades to Eurodac to support the application of the Dublin Regulation,²⁹ one of the central instruments for implementing the Common European Asylum System (**CEAS**).³⁰

Since all JHA systems managed by the Agency **support the implementation of EU policies** in the areas of border management, visas, migration and asylum, digitalisation, and contribute to combating organised crime and terrorism, their continued evolution and maintenance are of critical importance to the EU and eu-LISA.

In the coming years, the Agency will expand its contribution to the JHA domain by launching several new IT systems that are currently under development: Entry/Exit System (**EES**), European Travel Information and Authorisation System (**ETIAS**) and European Criminal Records Information System on third-country nationals (**ECRIS-TCN**). These new systems and the overarching **interoperability architecture** for the JHA domain will be **rolled out gradually in four waves of deployment**, as per the revised interoperability roadmap that was approved by the JHA Council in October 2023.³¹ Together, these interoperable systems will transform border management through digitalisation, delivering an **integrated intelligent approach** to ensuring Europe's internal security, while also providing a seamless experience for travellers headed to the Schengen area (see Figure 1. The traveller continuum).

²² [Political Guidelines for the next European Commission 2019–2024](#), November 2019.

²³ Communication from the Commission '[A strategy towards a fully functioning and resilient Schengen area](#)', COM (2021) 277 final.

²⁴ [Council Regulation \(EU\) 2022/922](#) on the establishment and operation of the **Schengen evaluation and monitoring mechanism**.

²⁵ Communication from the Commission on the [EU Security Union Strategy](#), COM (2020) 605 final.

²⁶ For more, please visit the Commission's page on [EMPACT](#) (European Multidisciplinary Platform Against Criminal Threats).

²⁷ Communication from the Commission on a [New Pact on Migration and Asylum](#), COM(2020) 609 final.

²⁸ [Regulation \(EU\) 2024/1358](#) on the establishment of 'Eurodac' for the comparison of biometric data in order to effectively apply Regulations (EU) 2024/1351 and (EU) 2024/1350 and Council Directive 2001/55/EC and to identify illegally staying TCNs and stateless persons and on data comparison requests by Member State law enforcement authorities and Europol, OJ L, 2024/1358, 22 May 2024.

²⁹ [Regulation \(EU\) No 604/2013](#), OJ L 180, 29.6.2013, p. 31–59.

³⁰ For more information, please visit DG HOME's dedicated page on the [Common European Asylum System \(CEAS\)](#).

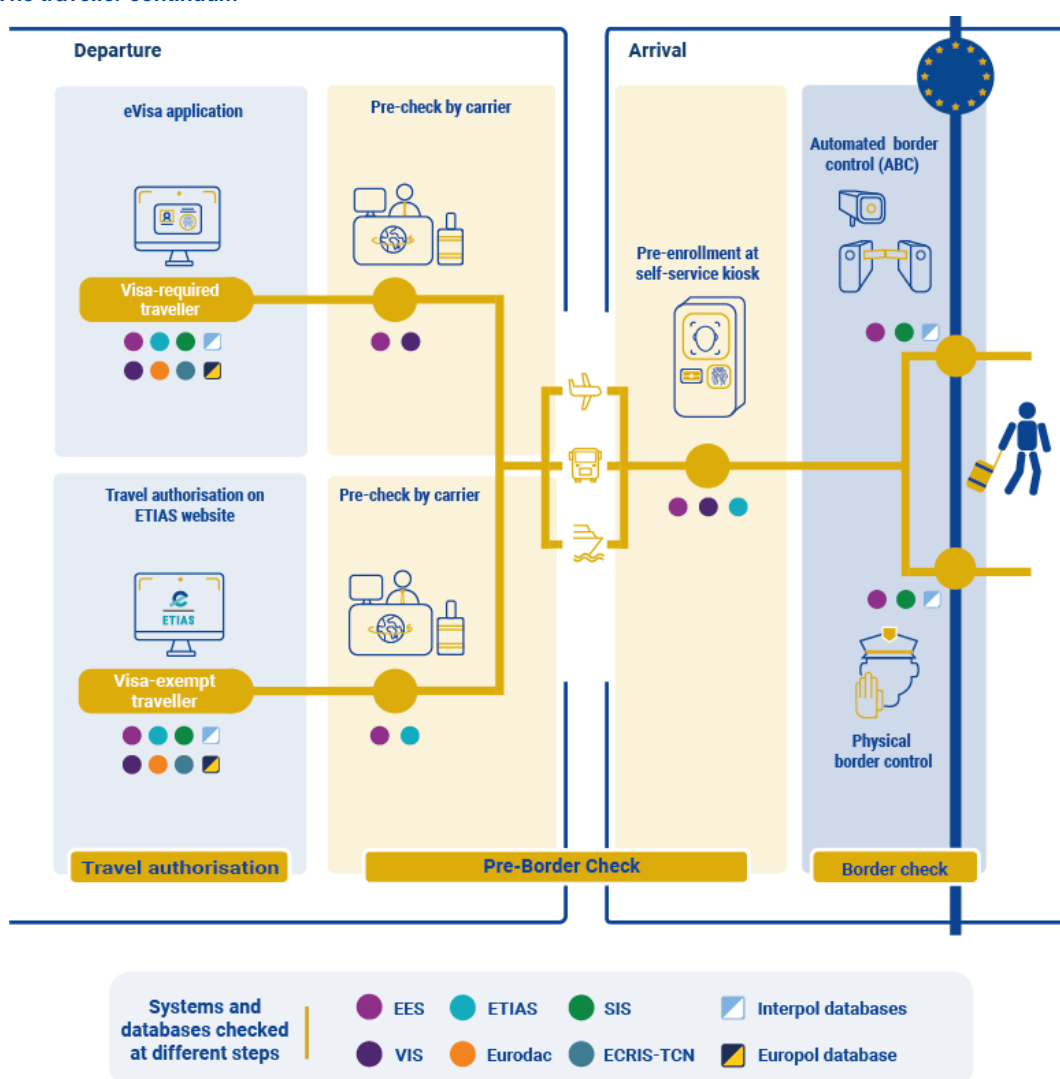
³¹ For more, see '[Main results of the Justice and Home Affairs Council, 19-20 October 2023](#)'.

Additionally, the Agency continued to expand its **contribution to the EU's justice domain**. On 8 December 2023, eu-LISA and the Consortium responsible for managing the **e-CODEX system** submitted to the Commission a joint request for declaring the successful completion of the handover and takeover process.³² As of 3 June 2024, eu-LISA will be responsible for the operational management of the e-CODEX system and will continue with the development of the **Joint Investigation Teams collaboration platform** that will improve the efficiency of cross-border investigations and prosecutions. Throughout 2023, eu-LISA continued to increase its engagement with the EU's justice community and established closer partnerships.

While continuing to step up its efforts in **driving the digitalisation of the EU's JHA domain**, the Agency also focused on cybersecurity and combating threats in the cyber domain, in particular by making necessary preparations for obligations stemming from new EU regulations on information security and cybersecurity.³³

As the EU Agency responsible for the operational management and development of JHA information systems, eu-LISA serves as a **key partner to the EU institutions, JHA agencies, and the Member States** by delivering state-of-the-art expertise through proactive information exchange and cooperation.

Figure 1. The traveller continuum³⁴



³² eu-LISA will officially take over the responsibility for the e-CODEX system on 3 June 2024 as per [Commission Implementing Decision \(EU\) 2024/1272](#) of 7 May 2024 on declaring the completion of the handover and takeover process of the e-CODEX system.

³³ Proposal for a Regulation on **information security** in the institutions, bodies, offices and agencies of the Union, COM (2022) 119 final, and Proposal for a Regulation laying down measures for a **high common level of cybersecurity** at the institutions, bodies, offices and agencies of the Union, COM (2022) 122 final.

³⁴ This infographic outlines the traveller journey from the perspective of third-country nationals planning a short-stay visit to the Schengen area, presenting an overview of how the new systems will contribute to the integrated management of the EU's external borders.

1. Operational management and evolution of systems in operation

The following section provides an overview of eu-LISA's activities related to the operational management and evolution of JHA information systems in the areas of border management, migration and asylum, internal security, law enforcement, and justice cooperation. The Agency's core priority is to ensure the effective and efficient management of all systems under its mandate – the Schengen Information System (SIS), the Visa Information System (VIS), the European Asylum Dactyloscopy Database (Eurodac), and the European Criminal Reference Information System reference implementation (ECRIS RI) – in compliance with the relevant regulations and service-level agreements, while also ensuring uninterrupted systems availability.

1.1. Schengen Information System (SIS)

SIS is the largest and most widely used IT system for internal security and border management in Europe. It is mainly used by designated national authorities for exchanging information on wanted or missing persons or objects, such as identity documents or vehicles. Since 2018, SIS has been equipped with a biometric search functionality – the **Automated Fingerprint Identification System (AFIS)**, enabling the identification of persons based on their palm and fingerprints. As such, SIS constitutes one of the cornerstones of the Schengen architecture, facilitating the management of the EU's external borders, while also supporting law enforcement and judicial cooperation in criminal matters across the Union.

KEY HIGHLIGHTS

- On **7 March 2023**, eu-LISA achieved a major milestone with the **entry into operation of the renewed SIS**. This marks the most comprehensive system update since 2014, offering the EU's JHA community a wide range of new functionalities and search capabilities for identifying people and objects.
- On **25 July**, eu-LISA completed the **full integration of Cyprus into SIS**, increasing the total number of SIS users to 34.

SIS operational management

In 2023, the main objective was to ensure the effective and continuous operation of the **SIS central system**, and its biometric functionality AFIS, to provide system end-users with uninterrupted availability and continuity in compliance with relevant regulations and service-level agreements. The Agency supported the Member States in managing their national systems, while also delivering the required upgrades and evolutions.

The performance of SIS and AFIS remained within requisite service-level targets, with **availability at 99.67%** and **response time at 99.99%**, except for three critical incidents in the SIS central system, resulting in total unavailability of 13 hours and 46 minutes.

System usage³⁵

In 2023, system usage and the **total number of SIS alerts increased** compared to 2022, underscoring its value for police cooperation across the Schengen area. Since the entry into operation of renewed SIS, most Member States have used almost all new alert categories, with the majority having entered return alerts and a few alerts on unknown wanted persons. The other new functionalities have also been used actively, e.g., modifying the reason for alert request and required action to be taken. Practically all Member States have also used AFIS searches (for fingerprints). The increase of automated searches (ANPR systems for automatic number car plate recognition and similar), observed in the last couple of years, continued in 2023.



³⁵ Comparison with previous years is complicated because the system was renewed in March 2023, introducing several changes such as additional alert categories, changed or expanded data categories, expanded access rights and reporting obligations.

DATA STORED

ALERTS IN THE DATABASE



90.5 million

+5% 2022



1.5%

ALERTS ON PERSONS



98%

ALERTS ON OBJECTS

OPERATIONS

SEARCHES



14.7 billion

+16% 2022



DAILY AVERAGE OVER 40 MILLION



AFIS SEARCHES 4 MILLION (over 11 000 per day)

HITS ON FOREIGN ALERTS



357 013

+36% 2022



DAILY AVERAGE OVER 978 HITS

SIS upgrade and evolution

The **SIS Recast Regulations** introduced new alert categories and functionalities for police and judicial cooperation, border checks and returns.³⁶ As a result of the combined efforts of eu-LISA, the Member States, and the Commission, the **renewed SIS entered into operation on 7 March 2023**, offering a new set of functionalities and search capabilities for identifying people and objects.³⁷ As part of the upgrade, eu-LISA also delivered **new biometric functionalities**, e.g., the possibility to store and search palm prints and latent prints (impressions on surfaces). In parallel, the Agency updated the lists of national SIS offices and SIRENE Bureaux,³⁸ and the list of competent authorities authorised to search data in SIS directly.³⁹

In July 2023, eu-LISA completed the **full integration of Cyprus with SIS**.⁴⁰ In parallel, the Agency continued supporting Frontex with the development of technical components necessary to achieve readiness to join SIS.

Interoperability readiness

In 2023, eu-LISA focused on implementing interfaces necessary for ensuring SIS interoperability readiness, with particular focus on the interconnection between SIS and the **European Travel Information and Authorisation System (ETIAS)** through the **European search portal (ESP)** to facilitate biometric and alphanumeric searches and cross-checking across all JHA information systems. Throughout 2023, the Agency has been developing the interconnection module and updating core SIS to allow interoperability with ETIAS and connections to other systems and components.

As regards other **interoperability components** (ESP, MID) and CRRS, eu-LISA has started analysing the business requirements and high-level design for establishing connections with SIS, while also starting preparations for the **migration of SIS AFIS functionalities** to the shared biometric matching service (sbMS).

Progress per tasks and projects⁴¹

Project/non-project task	Key achievements during the reporting period
SIS operational management	
SIS maintenance business as usual	Delivered <ul style="list-style-type: none"> corrective, adaptive, perfective and preventive maintenance; running regular data consistency checks, finalised improving the broadcast handling and splitting the snapshot report.
SIS AFIS maintenance business as usual	Delivered <ul style="list-style-type: none"> corrective, adaptive, perfective and preventive maintenance.
SIS support to Member States business as usual	Delivered <ul style="list-style-type: none"> deployment of new release on 7 March, incl. database and search engine upgrades; full integration of Cyprus on 25 July; preparations for the integration of Frontex; testing and business support provided to Europol; continued support to test and qualification campaigns, focus on readiness and compliance tests for SIS Recast and AFIS phase 2 functionalities; new test tools for the Member States.

³⁶ For a more detailed overview, please visit the [SIS Recast Regulations summary on EUR-Lex](#).

³⁷ European Commission press release '[Security Union: The renewed SIS enters into operation](#)', 7 March 2023.

³⁸ For more information on SIRENE Bureaux, please refer to the Commission's dedicated website on [SIRENE cooperation](#).

³⁹ The lists of competent authorities were published in the [Official Journal of the EU, Vol 66, C 85, 7 March 2023](#).

⁴⁰ For more, see eu-LISA's press release '[Cyprus fully integrated into SIS](#)', 25 July 2023.

⁴¹ As per [eu-LISA Single Programming Document 2023–2025](#).

Project/non-project task	Key achievements during the reporting period
SIS upgrades and evolution	
SIS extended capacity project: SPD end date: 2023	Delivered <ul style="list-style-type: none"> search engine upgraded, database upgrade with the move to a new server.
SIS: new search engine and Oracle upgrade project: SPD end date 2023	Ongoing – delayed <ul style="list-style-type: none"> search engine upgraded; core SIS database upgrade ongoing.
SIS new information alert ⁴² project: SPD end date: 2024	Ongoing – new delivery date 2025 <ul style="list-style-type: none"> procurement phase started based on the stable implementing acts.
SIS AFIS migration to sBMS project: SPD end date: 2025	Ongoing – new delivery date 2026 <ul style="list-style-type: none"> preparations for AFIS migration contractual preparations completed.
SIS interoperability readiness	
SIS central system interconnection with all interoperability components (except sBMS) project: SPD end date: 2023	Ongoing – new delivery date 2026 <ul style="list-style-type: none"> delayed due to dependencies with other SIS projects and the Interoperability programme; analysis and design phase started.
Core SIS generic interconnection module (interface to allow connections to other systems and interoperability with ETIAS) project: SPD end date: 2023	Ongoing – new delivery date 2025 <ul style="list-style-type: none"> analysis and design finalised, business requirements and high-level design approved; continued implementation, preparing testing specifications and tools; build phase started with hardware installation; elaborated full requirements for data correspondence for multiple identity detection;⁴³ work ongoing: DPIA, security and interface control and detailed technical specification documents (ICD/DTS), elaborating aspects for data correspondence.

1.2. Visa Information System (VIS)

As one of the core elements of the Schengen architecture, VIS connects the EU’s external border-crossing points with Member State consulates in non-EU countries, and supports visa authorities in managing short-stay visas for third-country nationals travelling to or transiting through the Schengen area. The system includes a **biometric matching system** (BMS), enabling identity verification at the borders. In addition to visa processing, VIS helps combat visa fraud by identifying persons who may not or no longer fulfil the conditions for entry, stay or residence in the Schengen area.

KEY HIGHLIGHTS

- On 1 January 2023, **Croatia became the 27th country to officially join the Schengen area in full capacity**, marking the first enlargement since 2011 when Liechtenstein joined the border-free zone.

VIS operational management

In 2023, the key objective was to ensure the effective and continuous operation of the VIS central system, its biometric matching system (BMS), and the VIS Mail functionality, to provide system end-users with uninterrupted availability and continuity in compliance with relevant regulations and service-level agreements. The Agency supported the Member States in managing their national counterpart systems, while also delivering the required upgrades and evolutions. In addition, the quality of VIS data was significantly improved based on monitoring results and feedback from the Member States.

The performance of the VIS central system remained within the requisite targets, with **availability at 99.97%** and **response time at 99.98%**, except for two instances of unavailability for a total of 2 hours and 25 minutes.



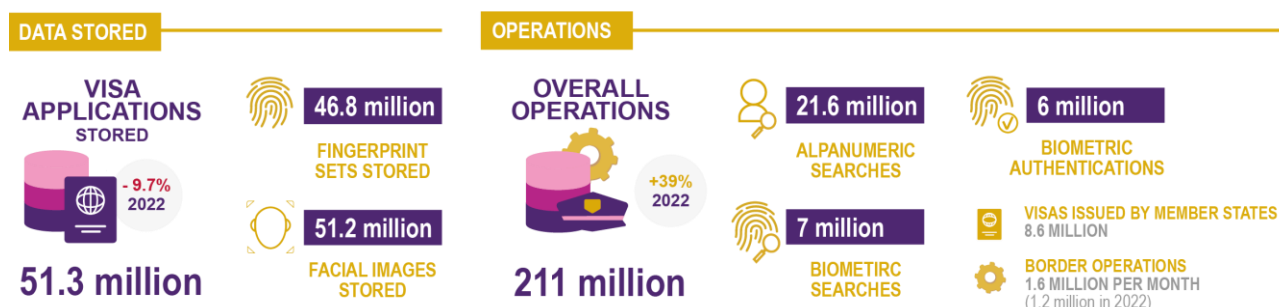
⁴² Regulation (EU) 2022/1190 as regards the **entry of information alerts into the SIS on TCNs** in the interest of the Union.

⁴³ Commission Delegated Regulation (EU) 2023/332 of 11 July 2022 as regards determining cases where identity data are considered as same or similar for the purpose of the **multiple identity detection**, OJ L 47, 15.2.2023, p. 6–16.

On 5 October, the Agency carried out the **VIS security and business continuity exercise** to test and improve system resilience. The exercise focused on collaboration and response actions to unexpected events and disruptive incidents, e.g., testing scenarios for system degradation, large hack impact, hybrid attack.

System usage

Throughout 2023, VIS usage – the **number of visa applications** and **border operations** – continued to increase, but remained still below pre-pandemic levels. At the same time, fingerprint authentications remained below the expected threshold, with the use of fingerprints for first-line border checks also falling significantly below expectations.



VIS upgrade and evolution

The adoption of the Revised VIS Regulation in July 2021, mandated a significant update of the central system and the redesign of business processes to integrate **long-stay visas and residence permits**.⁴⁴ In 2023, eu-LISA continued implementing the **Revised VIS project**, collecting requirements, preparing business use cases, and drafting the interface control document (ICD). The Agency also provided technical support to the Commission in preparing the **secondary legislation** on the technical implementation of new functionalities.⁴⁵ This process is taking significantly longer than initially foreseen due to the complexity of technical requirements, which has affected the implementation of the project's scheduled activities.

A major milestone was reached on 1 January 2023 – **Croatia gained full access to VIS** and became the 27th country to officially join the Schengen area in full capacity, marking the first enlargement in more than a decade.⁴⁶ With Bulgaria and Romania next in line, the Agency has started technical preparations to allow their full access to VIS.

Interoperability readiness

eu-LISA continued with the **VIS interoperability** project launched in 2022 to streamline the efficiency of border checks, as foreseen in the Revised VIS Regulation. This will entail the establishment of connections to interoperability components, and a **direct communication channel with the Entry/Exit System (EES)**, which is necessary to enable the automated retrieval of visa-related data from VIS (e.g., visa validity and identity verification), while also allowing visa authorities to consult EES when processing applications. Although delays related to the EES development programme affected implementation, eu-LISA focused on configuring the different environments to ensure smooth **end-to-end testing**.⁴⁷

To enable the simultaneous querying of VIS and the **European Travel Information and Authorisation System (ETIAS)**, an interoperability connection must be established between VIS and the **European search portal (ESP)**, as foreseen by the ETIAS consequential amendments adopted in July 2021.⁴⁸ The Agency has been working on a new contractual setup to continue extending and expanding the VIS interoperability project.

In 2023, the Agency commenced preparations for the migration of the VIS **biometric search functionality to the shared biometric matching service (sBMS)**. In addition, eu-LISA started developing a common interface between VIS and the **central repository for reporting and statistics (CRRS)**.

⁴⁴ Regulation (EU) 2021/1134 of 7 July 2021 for the purpose of **reforming the Visa Information System**, OJ L 248, 13.7.2021, p.11.

⁴⁵ Implementing and delegated acts on the technical implementation of new functionalities, on the measures necessary for the development of the VIS central system, and on a manual with procedures and rules for queries, verifications and assessments.

⁴⁶ Council Decision (EU) 2022/2451 on the full application of the provisions of the Schengen *acquis* in the Republic of Croatia.

⁴⁷ In February 2024, the Agency reached a critical milestone with the successful launch of Member States compliance testing.

⁴⁸ Regulation (EU) 2021/1152 on accessing other EU information systems for the purposes of ETIAS.

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
VIS operational maintenance	
VIS maintenance business as usual	Delivered <ul style="list-style-type: none"> corrective, adaptive, perfective and preventive maintenance; finalising VIS transition to transversal engineering and operational framework (TEF/TOF).
VIS upgrades and evolution	
VIS: integration of Croatia project: SPD end date: 2023	Delivered <ul style="list-style-type: none"> Croatia granted full access to VIS.
VIS Recast development (incl. active-active setup) project: SPD end date: 2025	Ongoing – new delivery date 2026 <ul style="list-style-type: none"> requirements elicitation ongoing and drafting of high-level design, working with the Member States on the availability of testing environments, contribution to finalising secondary legislation.
VIS interoperability readiness	
VIS integration with interoperability components project: SPD end date: 2024	Ongoing – new delivery date 2026 <ul style="list-style-type: none"> requirements elicitation ongoing and drafting high-level design, activity was merged with the VIS Recast development.

1.3. European Asylum Dactyloscopy Database (Eurodac)

Eurodac supports the application of the **Dublin Regulation**,⁴⁹ one of the instruments for implementing the **Common European Asylum System (CEAS)**.⁵⁰ Eurodac assists Member States in determining the country responsible for examining an asylum application by comparing the fingerprints of new applicants with those already registered in the database. Eurodac is also used to establish the identities of persons apprehended in connection with unlawful border crossings and those found illegally staying in the Schengen area. Under strict conditions and as a last resort for preventing, detecting or investigating terrorist or serious criminal offences, national law enforcement agencies and Europol have been granted access to Eurodac.

KEY HIGHLIGHTS

- In June, eu-LISA completed the Eurodac capacity increase project which expanded the system's maximum **storage capacity** from 7 to 9 million records, and the daily **throughput capacity** from 15 000 to 24 000 transactions.

Eurodac operational management

In 2023, eu-LISA's main goal was to ensure the effective and continuous operation of the Eurodac central system together with **DubliNet**,⁵¹ to provide system end-users with uninterrupted availability and continuity in compliance with relevant regulations and service-level agreements. The Agency supported the Member States in managing their national systems, while also delivering the required upgrades and evolutions.

Eurodac's performance remained slightly below the requisite service-level targets, with **availability at 99.47%** and **response time at 99.99%**. DubliNet performed within the requisite service-level targets without any downtime. Eurodac's availability was affected by several critical incidents, with total unavailability amounting to approximately 35 hours, including scheduled unavailability for project implementation.



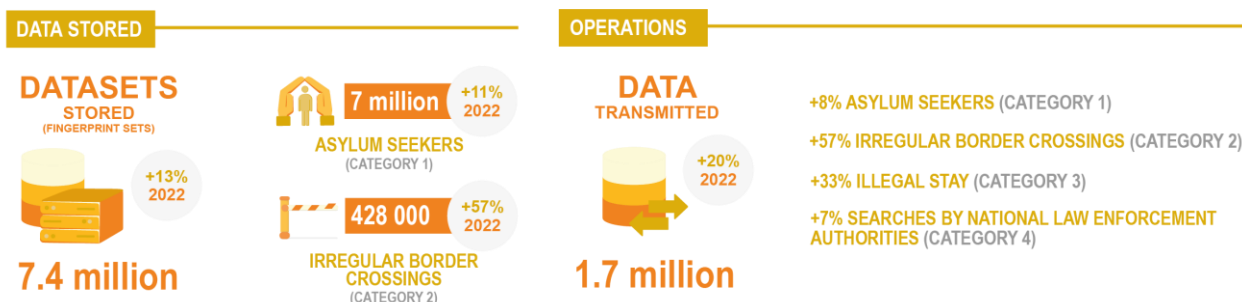
⁴⁹ Regulation (EU) No 604/2013, OJ L 180, 29.6.2013, p. 31–59.

⁵⁰ For more information, please visit DG HOME's dedicated page on the [Common European Asylum System \(CEAS\)](#).

⁵¹ DubliNet is a secure electronic network for data exchange between the national authorities processing asylum applications.

System usage

Throughout 2023, the volume of **records stored** in the Eurodac database continued to increase, and the traffic (data transmitted via Eurodac) has been relatively high due to the ongoing migration flows.⁵²



Eurodac upgrade and evolution

In anticipation of the forthcoming adoption of the new **Pact on Migration and Asylum**⁵³ that includes the **Recast Eurodac Regulation**,⁵⁴ eu-LISA continued with critical system upgrades for Eurodac to support the application of the Dublin Regulation. The Agency focused on the implementation of two Eurodac upgrade projects launched already in 2022 – one for capacity upgrade, and another to cover minimal upgrades.

- **Eurodac capacity upgrade project**, with the objective of increasing the system's maximum **storage capacity** from 7 to 9 million records, and the daily **throughput capacity** from 15 000 to 24 000 transactions, to accommodate the rapidly increasing volume of records to be stored.⁵⁵ In 2023, eu-LISA upgraded the system's hardware and migrated existing files to the common shared platform. In June, as the system was reaching its capacity limit of 7 million records, entry into operation was concluded after some delays due to protracted discussions on the best technical solution.
- **Eurodac minimal upgrade project**, with the objective of upgrading the biometric matcher, the database management system, the synchronisation mechanism between the central and backup central units, and replace hardware components reaching the end of vendor support; solution testing on the pre-production environment was finalised in November.

Interoperability readiness

The **amended proposal for the Recast Eurodac Regulation** foresees Eurodac's integration with the interoperability components to enable searching and cross-checking of identities across all JHA information systems managed by eu-LISA. Eurodac's integration with interoperability components will depend on the progress made with the adoption of the Recast Eurodac Regulation.

⁵² **Fingerprint data sets** stored in Eurodac are grouped into five main categories: (1) asylum applications, (2) irregular border-crossings, (3) persons found staying illegally within the Schengen area, (4) comparative searches by national law enforcement authorities, and (5) comparative searches by Europol.

⁵³ The newly adopted legislative package will significantly expand Eurodac's scope, and transform the existing database into a fully-fledged asylum and migration database. For more, see DG HOME's dedicated page on the new [Pact on Migration and Asylum](#).

⁵⁴ [Regulation \(EU\) 2024/1358](#) on the establishment of 'Eurodac' for the comparison of biometric data in order to effectively apply Regulations (EU) 2024/1351 and (EU) 2024/1350 and Council Directive 2001/55/EC and to identify illegally staying TCNs and stateless persons and on data comparison requests by Member State law enforcement authorities and Europol, OJ L, 22 May 2024.

⁵⁵ eu-LISA estimates that the new capacity ceiling of 9 million records might be reached between 2028 and 2029.

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Eurodac operational maintenance	
Eurodac — DubliNet maintenance business as usual	Delivered <ul style="list-style-type: none"> corrective, adaptive, perfective and preventive maintenance; Eurodac and DubliNet certificates renewed to ensure the highest compliance with security standards, best practices, and EDPS audit recommendations; Eurodac transitioned to the transversal engineering and operational framework (TEF/TOF), completing the takeover in February 2024.
Eurodac upgrades and evolution	
Eurodac Recast implementation (incl. integration with interoperability components) project: SPD end date: 2025	Postponed <ul style="list-style-type: none"> implementation subject to the adoption of Eurodac Recast Regulation. Ongoing – new delivery date 2024 <ul style="list-style-type: none"> Eurodac minimal upgrade project delivery postponed due to dependency on the capacity upgrade project; pre-production environment deployed and reconfiguration finalised, common system solution testing on the pre-production environment completed. Delivered <ul style="list-style-type: none"> Eurodac capacity upgrade project: entry into operation (June), completed in November.

1.4. European Criminal Records Information System Reference Implementation (ECRIS RI)

Under EU law, national courts must consider previous convictions when passing sentences in criminal cases, and the **European Criminal Records Information System (ECRIS)** was set up to facilitate information exchange between European judicial authorities. ECRIS RI provides an integration interface enabling the connection between national criminal record registers for exchanging information on criminal records.⁵⁶

ECRIS RI operational management

In 2023, the Agency ensured the effective and continuous operation of ECRIS RI, providing end-users with uninterrupted availability and continuity in compliance with relevant regulations and service-level agreements, while also delivering required evolutions.

ECRIS RI performance remained within requisite service-level targets, with all tickets handled as per defined targets. To provide a more tailored service, eu-LISA collected updated information on the ECRIS RI environment from the Member States.



ECRIS RI upgrade and evolution

The ECRIS RI security analysis, conducted in 2022, revealed several security vulnerabilities.⁵⁷ eu-LISA shared security recommendations with the Member States, and commenced discussions with the Commission and the relevant stakeholders on the potential ECRIS RI rewrite to mitigate any residual security risks without affecting the entry into operation of ECRIS-TCN.

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
ECRIS RI operational maintenance	
ECRIS RI maintenance business as usual	Delivered <ul style="list-style-type: none"> corrective maintenance, continued transfer of ECRIS RI maintenance to the transversal operating framework (TOF), ongoing discussions on evolutions and upgrades with stakeholders, incl. the Commission.

⁵⁶ The majority of EU countries are currently connected to ECRIS via the ECRIS reference implementation maintained by eu-LISA, while four Member States use their own national implementation (NI) solutions.

⁵⁷ Respecting the opinion of the Commission and the decision of eu-LISA's Management Board, the Commission shared the ECRIS RI vulnerability report with the UK authorities to support them in preparing their security analysis on software used for ECRIS exchange.

2. Development of new systems and innovation

The following section provides an overview of eu-LISA's activities related to the development of new systems and the overarching interoperability architecture for the EU's JHA domain.




The development of these new systems – the Entry/Exit System (**EES**) and the European Travel Information and Authorisation System (**ETIAS**) – has been among the Agency's key priorities since the adoption of their respective establishing regulations in 2017 and 2018. These new systems will facilitate smarter management of the EU's external borders by ensuring secure and seamless access to traveller information for all authorised personnel, e.g., border guards, law enforcement, visa and immigration authorities.

Additionally, the Agency continues with new responsibilities in the EU's justice domain, contributing to the development of new digital solutions driving the ongoing modernisation and digitalisation of judicial systems across Europe. In developing the European Criminal Records Information System for third-country nationals and stateless persons (**ECRIS-TCN**), and taking over the responsibility for the operational management of the **e-CODEX system**, the electronic communication platform facilitating cross-border judicial proceedings, the Agency began stepping up its contribution to the digitalisation of justice, intended to improve cooperation between European judicial authorities and to provide better access to justice for EU citizens and businesses. Following the entry into force of the **Joint Investigation Teams collaboration platform** regulation in June 2023, the Agency started preparations by setting up governance bodies and initiated a project for the required development work.

To facilitate information exchange between the new and existing IT systems, eu-LISA will also develop an overarching **interoperability architecture for the JHA domain**. Once operational, the interoperability of JHA systems will support integrated border management and internal security, which will be a major contribution to the EU Security Union Strategy.

2.1. New Resolution Strategy

In May 2023, eu-LISA adopted a new approach, internally referred to as the **3Rs Resolution Strategy**, to break the long-standing deadlock with the development of the Entry/Exit System (EES). The aim was to accelerate the development of the system by creating more stable conditions for the Member States to continue their preparations. This strategy is based on the following three pillars:

-  **Remobilise the service providers:** restart dialogues and engage with service providers at all levels, including daily interaction and progress monitoring through tightly paced governance, increasing the number and quality of resources available for implementation.
-  **Resolve operationally:** pragmatically resolve the complexities of the systems and address the most difficult technical challenges to offer as soon as possible new functionalities to Member States to complete their preparation.
-  **Renew the ways of working:** adopt best practices from the industry with a stronger collaboration across teams (squads), using agile methodology to deliver at a faster pace, fostering staff and contractors' collaboration onsite under one roof.

In a relatively short time-span, the new approach significantly **improved the management of issues and communication** with the consortium tasked with the development of new systems. The Agency also established a high-performing common management mechanism, comprising experts from eu-LISA and the consortium, to improve the monitoring of progress of technical and contractual aspects. This enabled more effective application of corrective actions to steer implementation and avoid fallbacks in performance and any new significant delays.

To accelerate resolution and focus joint efforts on tangible results through a gradual approach, the Agency defined the elements of a **minimum viable product** (MVP) – an intermediate release of the final product deployed in a stable environment allowing the Member States to conduct test campaigns and continue their preparations.⁵⁸ The Agency designed the scope of each release as close to the final version as possible, continuously improving the quality and stability, thus improving the conditions for the Member States to prepare for entry into operation.

⁵⁸ **Minimum viable product** (MVP) is an intermediate product that adds gradual value to the Member States, creating the conditions for better preparation for entry into operation. New releases are gradually provided, adding more value to the Member States.

To prepare for the challenges ahead, eu-LISA re-framed its approach to deliver the JHA interoperability architecture by introducing the **waves approach**, starting from 2024 and extending to 2027. This new approach rolls out the development of the JHA systems interoperability in four waves, with each wave focusing on the technical readiness of one key system, and new services brought to the users:

- **WAVE 1: EES**, together with **joint web services** (incl. carrier interface), and the shared biometric matching service (**SBMS**);
- **WAVE 2: ETIAS**, together with the web services for TCNs; two interoperability components – the European search portal (**ESP**) and the common identity repository (**CIR**); and the central repository for reporting and statistics (**CRRS**);
- **WAVE 3: ECRIS-TCN** with interoperability components;
- **WAVE 4: finalisation of the JHA interoperability architecture** (incl. final interoperability component: multiple-identity detector, **MID**) and **Revised VIS**.

On 19 October 2023, the Justice and Home Affairs Council endorsed the proposed new timeline for the rollout and interoperability of JHA information systems – the **new Interoperability Roadmap**.⁵⁹

To deliver this ambitious plan, the Agency established a dedicated **Back-to-Green Taskforce to implement the 3Rs Resolution strategy** (remobilise, resolve and renew), with a view to getting the job done with a one-team-under-one-roof approach based on Agile project management methodology. Due to the complexity of the situation, the task force model was later expanded to include two teams: one team focusing entirely on delivering EES, and the second task force dedicated to coordinating the delivery of subsequent waves, i.e., ETIAS, interoperability components, ECRIS-TCN, and establishment of connections to SIS and VIS.

Thus far, the **Back-to-Green Taskforce** has made considerable progress in unlocking the issues hindering the development of EES, which had delayed the development of all other new systems and the interoperability architecture as well. The new approach has proven to be a success, as evidenced by the significant progress made in a relatively short time-span.

2.2. New systems in development

The Agency's key focus in 2023 was to continue with the implementation of new systems as soon as possible. In close collaboration with the Member States and the Commission, the Agency put every effort into devising measures to mitigate the impact and finding solutions to avoid additional significant delays. With the **new 3Rs Resolution Strategy**, the Agency started implementing a gradual 'build-up' approach with a more secure timeline and agile working methods, stabilising the implementation of new systems, in particular EES, and adding value for end-users to accelerate their preparations.

2.2.1. Entry/Exit System (EES)

EES is one of the two IT systems that is set to modernise the management of the EU's external borders by replacing the current practice of manual stamping of passports with the **electronic registration of all third-country nationals** (TCNs) entering and exiting the Schengen area, incl. data on entry refusals. EES will enable the **monitoring of authorised short-term stays** (for visits lasting up to 90 days, in any 180 days) by automatically calculating the duration of stay and generating alerts upon expiry. As such, the system supports preventing irregular immigration and strengthening internal security by helping to combat organised crime and terrorism. Once operational, the resulting automation of border checks will support the Member States in managing increasing traveller flows, while also helping to optimise the number of guards at crossing points.

KEY HIGHLIGHTS

- eu-LISA took decisive action to break the long-standing EES development deadlock by introducing the **3Rs resolution strategy** and a new approach for the **gradual implementation of new systems**.
- The **revised timeline** proposed by eu-LISA was **endorsed by the JHA Council** on 19 October 2023.
- Three new releases were delivered to Member States, as scheduled, to progress with their preparation at national level.

⁵⁹ For more, see '[Main results of the Justice and Home Affairs Council, 19-20 October 2023](#)'.

Implementation

The development and testing of EES continued during 2023, addressing the intrinsic complexity of the system's functionalities, the interdependency of components and the contractor's delays. Throughout the year, the Agency worked towards breaking the deadlock, adopted a new strategic approach, and proposed a revised timeline for implementation. As proof of the **strategy's success**, the Agency produced the first positive results with a gradual delivery of the full application scope through well-defined parts (minimum viable product, MVP):

- **stable environments**: in cooperation with the contractor, the Agency corrected the technical issues that had been blocking Member States' progress with the testing and preparations of their national systems;
- **new releases with fewer defects**: after the adoption of the new approach, three major releases were installed in Member State testing environments, with a considerably lower number of software defects, highlighting the improved quality of development and testing;⁶⁰
- **better monitoring of the system**: the established high-performing common management mechanism continuously monitored progress, applied corrective actions to steer the implementation, and resolved most of outstanding contractual issues.

Interoperability readiness

To enhance and streamline the efficiency of border checks, interoperability connections need to be established with VIS (to enable automated retrieval of visa-related data), and also with the European search portal (ESP) for the simultaneous querying of EES and ETIAS. In 2023, the development of the interface with interoperability components continued with testing activities. Using the real systems, the Agency tested the overall system functions of the updated **VIS central system and EES and sBMS**, and continued with testing the Member States' business functions and processes. In parallel, the Agency continued the VIS-sBMS data migration activities to complete the end-to-end rehearsal in 2024.

EES/ETIAS web services

To facilitate integrated and streamlined processing of incoming third-country nationals (TCN) travellers at Schengen borders, EES will have a joint web service with ETIAS. The joint web services will comprise several public-facing modules, including dedicated **web interfaces and mobile applications for travellers and passenger carriers**, enabling the checking of travel authorisation validity ahead of boarding.

As with EES, eu-LISA adopted a gradual development approach, with the first MVP to include the web portal and carrier interface for large-scale carriers (e.g., airlines) – expected to launch in tandem with EES in 2024. The public website and carrier mobile application for third-country nationals will be delivered together with ETIAS in 2025. The Agency continued with the development of the web portal,⁶¹ and focused on testing the quality and requirements of the **carrier interface software**⁶² and the **mobile application**, the first in-house application developed by eu-LISA.

In 2023, the **registration of carriers** continued with 79 new companies registered, now totalling 1 056 passenger carriers (894 air, 52 sea, 110 land), with approximately 40% from the EU. Due to the number of registrations trending below expectations, the Agency continued raising awareness on the importance of early registration in cooperation with the Commission and passenger carrier associations, because those joining at a later time might experience difficulties in terms of scheduling and contract implementation.



⁶⁰ The Agency reached another major milestone at the end of January 2024 by releasing the full version of EES without blocking defects for compliance testing to the Member States and Europol.

⁶¹ The carrier web portal was delivered on 11 April 2024.

⁶² The central system environments for system-to-system testing for registered carriers became available on 17 January 2024, with several service providers finalising their test campaigns by 9 February 2024.

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
EES and Web Services operational maintenance	
EES core maintenance business as usual	Postponed <ul style="list-style-type: none"> not started due to the delays in EES entry into operation.
Web services maintenance business as usual	Postponed <ul style="list-style-type: none"> not started due to the delays in EES entry into operation.
EES and Web Services implementation	
EES core implementation final system acceptance (FSA) project: SPD end date: 2023	Ongoing – new delivery date mid-2025 <ul style="list-style-type: none"> first MVP release triggered in July provided test environment for Member States, testing quality improved for next releases in August and October; technical environments/underlying infrastructure (central system and NUIs) upgraded to ensure that the system runs on an updated platform; updated ICD, incl. corrections from the system solution test; support for the Commission in amending secondary legislation affecting EES development to incorporate requirements from other regulations, e.g., Revised VIS; rehearsals for operational readiness tests started in December; preparations for transition to operation: technical meetings with Member States, setting up EES and VIS Transition Activities Group, comprising representatives from eu-LISA and Member States to ensure smooth transition, i.e., finalising the operator manual, scheduling rehearsals, setting up communication channels with the Member States.
Web services implementation finalisation project: SPD end date: 2023	Ongoing – new delivery date: web portal and carrier interface with EES in 2024, public website and carrier mobile application for TCNs with ETIAS in 2025 <ul style="list-style-type: none"> central system development, incl. public website and web portal; factory acceptance test finalised for system-to-system software, ongoing for the mobile application; completed infrastructure setup for carrier testing environments and performance testing; regular coordination meetings with Frontex and the Commission; Carrier Working Group meetings (split into separate meetings for air carriers, and for land and sea carriers);⁶³ contract preparations for the development of online carrier registration, carrier support tools and services, transition to operation, and carrier support during testing; finalising standard operational procedures for carrier support.
EES interoperability readiness	
EES adjustments for interoperability components project: SPD end date: 2023	Ongoing – new delivery date: EES for ETIAS mid-2025, IO components 2026 <ul style="list-style-type: none"> EES interoperability with VIS: common solution testing between the updated VIS central system and EES and sBMS, using real systems; continued Member State testing activities (pre-compliance, end-to-end testing); configuration of the pre-production environment completed at central level, start of production environment configuration; VIS-sBMS data migration end-to-end rehearsal; EES interoperability with ETIAS: contractual discussions and preparations for adapting EES to ETIAS to finalise the design of the software modification; continued preparations of adjustment with interoperability components; updated data protection impact assessments to address EDPS recommendations on testing sBMS accuracy using real biometric (fingerprint and facial image) data; impact assessment on the quality of latent and palmprints, addressing all operations for EES, VIS, ECRIS-TCN and SIS; working on a standalone reporting functionality to cover EES first operation period before its eventual integration with CRRS.

⁶³ For more information, please visit eu-LISA's dedicated page: [Working Group for Carriers](#).

2.2.2. European Travel Information and Authorisation System (ETIAS)

ETIAS, the online pre-travel authorisation system for visa-exempt third-country nationals (TCNs), will introduce **travel authorisation as a new condition for entering the Schengen area** for a short stay. In addition to streamlining border-crossing procedures for TCNs, ETIAS will contribute to the EU's internal security by facilitating the **identification of potential security, migration and public health risks**. ETIAS travel authorisations will be checked by air, sea and land carriers prior to boarding and later also by border guards who will take the final decision on granting or refusing entry at the EU's external border crossing points. National law enforcement agencies and Europol will also have access to the ETIAS database to prevent, detect, or investigate terrorist threats or serious criminal offences.

The system is designed to complement the **Entry/Exit System (EES)**, and the two systems will have **joint web services**, with online interfaces for carriers and travellers.

KEY HIGHLIGHTS

- Completed the monitoring of technological solutions for the **'white list' of secure audio-video communication tools** to be used by ETIAS national units to interview applicants in cases where consular services are out of reach.
- In November, the Agency finalised the **testing environment platform**.

Implementation

In 2023, eu-LISA continued with the **analysis and design** for ETIAS development. Due to external dependencies related to the EES shared components (e.g., web services) and interoperability specifications blocking the finalisation of the design for their integration within ETIAS, the Agency opted for a progressive implementation approach and revised delivery schedule, according to the interoperability roadmap, setting the deadline for ETIAS technical readiness by mid-2025.

To mitigate the risk of delaying the next phases after analysis and design, eu-LISA will apply an **iterative approach** by implementing ETIAS development in parallel with the design, focusing on stable elements. The Agency continued with the finalisation of **ETIAS software mock-up** screens, closing the remaining business-related points with the Commission and Frontex, as well as concluding baseline requirements for the user interface. The **intermediate version** was shared with the Member States in May 2023.

The Agency also continued preparations for compliance testing. In April, eu-LISA received the **network and hardware equipment for the testing environment**, including the playground environment, which is necessary to start the **system solution testing**. In November 2023, the platform for the testing environment was finalised. In December the Agency started preparing for the next step of application deployment.

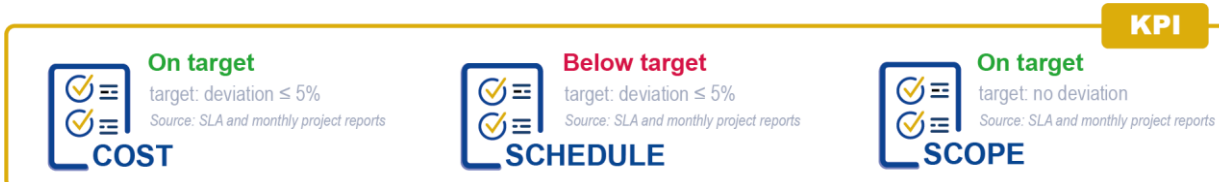
As for **web services**, eu-LISA applies a horizontal approach to ensure efficient implementation. The components are implemented as part of the planned development of the EES web service and will be reused by ETIAS, as they will serve both EES and ETIAS (see 2.2.1).

In addition, eu-LISA completed the monitoring of technological solutions for the **'white list' of secure audio-video communication tools** that the ETIAS national units could use to conduct interviews with the applicants in cases where the consular services are out of reach. In February 2023, following live demonstration sessions, the final report (incl. recommended tools) was shared with the Member States. The Agency also continued with the **ETIAS watchlist implementation**, working with the Member States on authentication requirements.

Interoperability readiness

To support the cross-checking of information across all JHA systems, in addition to ongoing contractual discussions to **adapt EES to ETIAS for simultaneous querying**, the Agency started working on a new contractual set-up to implement the **interoperability between VIS and ETIAS**. Additionally, eu-LISA commenced with the analysis and design phase for the **ETIAS interconnection with SIS** to support ETIAS queries and allow the sharing of automated notifications through the European search portal (ESP). The Agency continued the discussions with the Commission on SIS-related topics, i.e., data correspondence, retention and matching IDs.

In addition, the Agency made further progress with integrating ETIAS with interoperability components (ESP, CIR and MID), receiving the first ETIAS sub-release from the contractor in December.



Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
ETIAS implementation	
ETIAS implementation finalisation project: SPD delivery date: 2023	<p>Ongoing – new delivery date mid-2025 (incl. ETIAS interoperability components (ESP, CIR) and CRRS)</p> <ul style="list-style-type: none"> start of test environment infrastructure equipment installation; intermediate release on the ETIAS software mock-up; intermediate releases: factory acceptance tests completed; releases under development; updating ETIAS requirements (incl. business use cases), providing updated ICD versions (incl. updates on the CIR canonical data model and ETIAS watchlist data entries); closing several pending business open points, and assessing additional requests originally not part of the current scope of ETIAS; In January 2023, eu-LISA shared with the Member States, Frontex and Europol the updated ETIAS data protection impact assessment (DPIA), addressing comments from the EDPS, and continued to close remaining open points; list of recommended audio/video tools for interviews delivered; support for the Commission in amending secondary legislation on the requirements and specifications as per ETIAS consequential amendments⁶⁴, as well as possible impact of the Revised VIS implementing act on the new visa examination process.
ETIAS newest technology watch business as usual SPD delivery date: 2026	<p>Other</p> <ul style="list-style-type: none"> postponed; to be implemented after ETIAS entry into operation, as part of activity: ETIAS implementation finalisation.

2.2.3. European Criminal Records Information System – third-country nationals (ECRIS-TCN)

ECRIS-TCN is a centralised hit/no-hit system, supplementing the European Criminal Records Information System (ECRIS) with information on criminal records of third-country nationals (TCN) and stateless persons convicted in the EU. Together, these two systems – ECRIS and ECRIS-TCN – will help judges, prosecutors and other relevant authorities obtain comprehensive information on the criminal history of TCNs, regardless of the Member State where they were previously convicted. As a result, ECRIS-TCN will also contribute to implementing the principle of mutual recognition of sentences and judicial decisions across the EU.

KEY HIGHLIGHTS

- Delivery of the two versions of ECRIS-TCN **integrated simulator** (combining the central system, the interface software, parts of ECRIS RI and an ESP simulator) to the Member States for testing.

Implementation

In 2023, eu-LISA continued with ECRIS-TCN implementation despite the fact that the **analysis, design and development activities** were advancing slower than planned due to dependencies with EES shared components. The Agency set a new timeline for **ECRIS-TCN entry into operation**, with the objective to achieve technical readiness by first quarter of 2025, i.e., system ready for Member States data uploads. The new timeline considers the time and effort necessary to partially mitigate the dependency with EES (i.e., implementing a new architectural approach to minimise dependency with external systems) and the implementation of the loosely coupled architecture between ECRIS RI and ECRIS-TCN (necessary to avoid the propagation of the ECRIS RI security vulnerabilities to ECRIS-TCN).

⁶⁴ Regulation (EU) 2021/1152 as regards the establishment of the **conditions for accessing other EU information systems for the purposes of ETIAS**, OJ L 249, 14.7.2021, pp. 15–37.

In 2023, eu-LISA concluded the update and **assessment of the functional and non-functional requirements** and started updating the high-level design. In parallel, the Agency made steady progress with the ECRIS-TCN **integrated simulator** (combining the central system, the interface software, parts of ECRIS RI and the ESP simulator) and delivered two versions to the Member States for testing.

Following the launch of **preparations for the testing activities** in May, at the end of the year, using an iterative approach, the Agency started setting up the infrastructure for compliance testing (i.e., capacity-sizing exercise to facilitate the setting up of environments and preparing the cloud set-up for the testing environment).

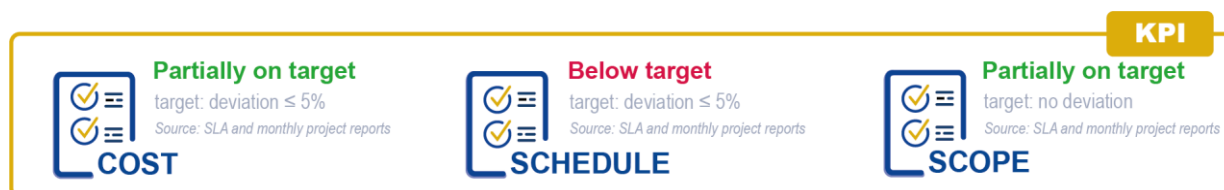
To minimise the exposure of ECRIS-TCN to the **vulnerabilities identified in the ECRIS RI application** during the 2022 security analysis, eu-LISA proposed a technical solution (i.e., loosely coupled architecture), which is essential in the context of the eventual integration of ECRIS RI and ECRIS-TCN (see 1.4).

Interoperability readiness

As part of the overarching interoperability architecture for the JHA domain, ECRIS-TCN will be connected to the interoperability components, enabling other systems – in particular, ETIAS and VIS – to perform searches on TCNs to establish the existence of convictions for terrorism or other serious criminal offences. Throughout the year, the Agency worked together with the Member States and the Commission towards a solution for flagged records for identifying TCNs convicted of serious crimes or terrorism, necessary for the entry into operation, as both ETIAS and VIS will query the common identity repository (CIR) for information on TCNs.

The Agency also made progress with integration with relevant interoperability components, i.e., sBMS, ESP, CIR and CRRS. To mitigate the impact of the unavailability of the external components shared with EES, the Agency worked on **an alternative architectural approach**.

The Agency will need to regularly monitor the **biometric accuracy** in ECRIS-TCN, i.e., false positive/ negative identification rates. To integrate the user software kit (USK) functionality for checking the quality of fingerprints, eu-LISA proposed the initiation of the sBMS user software kit (USK) pilot project for ECRIS-TCN, similar to the ones implemented for EES and VIS, to ensure that Member States have all the necessary functions, i.e., for testing, validation of threshold values for fingerprint quality, optimisation of functionalities. However, thus far, no Member State has expressed interest in participating in this pilot project.



Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
ECRIS-TCN operational maintenance	
ECRIS-TCN maintenance business as usual	Postponed ■ not started mainly due to delays related to EES and Interoperability.
ECRIS-TCN implementation	
ECRIS-TCN implementation finalisation project: SPD delivery date: 2023	Ongoing – new delivery date 2025 (incl. interoperability components and CRRS) <ul style="list-style-type: none"> ■ technical scope modified to address identified vulnerabilities and mitigate dependency with EES (see above); ■ new specific contract signed in August for the development of a new ECRIS front-end to mitigate the propagation of the ECRIS RI vulnerabilities to ECRIS-TCN; ■ two versions of the ECRIS-TCN integrated simulator released (in June and September) and tested by Member States, incl. supporting documentation to facilitate the development at the Member State level, preparations for the final release of the simulator; ■ updated ICD to reflect changes by CIR-MID new canonical data model, ESP and integrated simulator; software architecture design updated; ■ update of the high-level design, finalisation of security deliverables; ■ preparations for testing: defining the testing and quality management plan, preparing the testing platform, concluding the automation feasibility study; ■ supporting the Commission in amending secondary legislation on technical development and implementation, e.g., requirements for using facial images for identity confirmation).

2.2.4. e-CODEX (e-Justice Communication via Online Data Exchange)

The e-CODEX system provides the digital infrastructure for secure and interoperable communication and data exchange between European judicial authorities, serving as the key technological enabler for modernising cooperation in cross-border civil and criminal proceedings.⁶⁵

KEY HIGHLIGHTS

- On 8 December 2023, eu-LISA and the e-CODEX Consortium submitted to the Commission a **joint request to declare the successful completion of the handover and takeover process**.⁶⁶


The takeover process

In 2023, the key objective for the Agency was to **take over the operational management of the e-CODEX system**. The official handover/takeover process started with the delivery of the draft common handover document to eu-LISA in December 2022. On 24 January 2023, a kick-off meeting was held between eu-LISA and the Me-CODEX III (Maintenance of e-CODEX) consortium, hosted by the Ministry of Justice of North Rhine-Westphalia in Düsseldorf, Germany.

In close collaboration with the consortium, in 2023, the Agency finalised the **common handover document** (overview of all assets and artefacts to be handed over) and collaborated on the **transfer of technical components** and knowledge with a series of master classes. In addition, the Agency clarified the technology stack used in e-CODEX and the technical specifications for the **internet-facing hosting environment**. The transfer of all of the components was completed by 30 November 2023, including the ITSM ticketing tool, the configuration management tool, the connector and gateway. The pre-production environment was ready as of 8 December 2023, following the successful tests with the Me-CODEX III Consortium.

On 8 December 2023, eu-LISA and the Consortium submitted to the Commission a **joint request to declare the successful completion of the handover/takeover process**. The Commission officially declared the completion of the handover and takeover process on 7 May 2024, and eu-LISA took over the responsibility for the e-CODEX system on 3 June 2024.⁶⁷

KPI



Compliance with service-level requirements

Other: takeover not completed

set target ≥ 100%

Source: SLA and monthly service reports

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
e-CODEX takeover process	
<p>Handover and subsequent maintenance of the e-CODEX system</p> <p>business as usual: SPD delivery date: 2023</p>	<p>Delivered</p> <ul style="list-style-type: none"> ■ completing handover/takeover activities, incl. finalising common handover document, takeover roadmap with Commission and me-CODEX consortium; ■ knowledge transfer master classes delivered with the me-CODEX consortium on enterprise and infrastructure architecture, system security, gateway, connector, configuration management tool and central testing platform, business collaboration design; ■ working on the process to create and manage digital procedural standards (DPS), ■ delivery of the takeover report: submitted to the Commission on 30 June 2023, detailing the activities undertaken during the takeover process;⁶⁸ ■ e-CODEX hosting environment set up; ■ development resources and the service operation delivered, incl. staffing selection, ■ Operator's Manual for e-CODEX users drafted; ■ e-CODEX governance bodies established: first meeting of the Advisory Group on 17 January 2023; of the Programme Management Board on 18 January 2023.

⁶⁵ For more information, please visit the dedicated [e-CODEX site](#) on eu-LISA public website.

⁶⁶ As per Commission's official declaration, eu-LISA will officially take over the responsibility for the e-CODEX system on 3 June 2024.

⁶⁷ [Commission Implementing Decision \(EU\) 2024/1272](#) of 7 May 2024 on declaring the completion of the handover and takeover process of the e-CODEX system, OJ L, 14.5.2024.

⁶⁸ The updated version was sent in January 2024, following the joint request and the Commission's request.

2.3. Interoperability

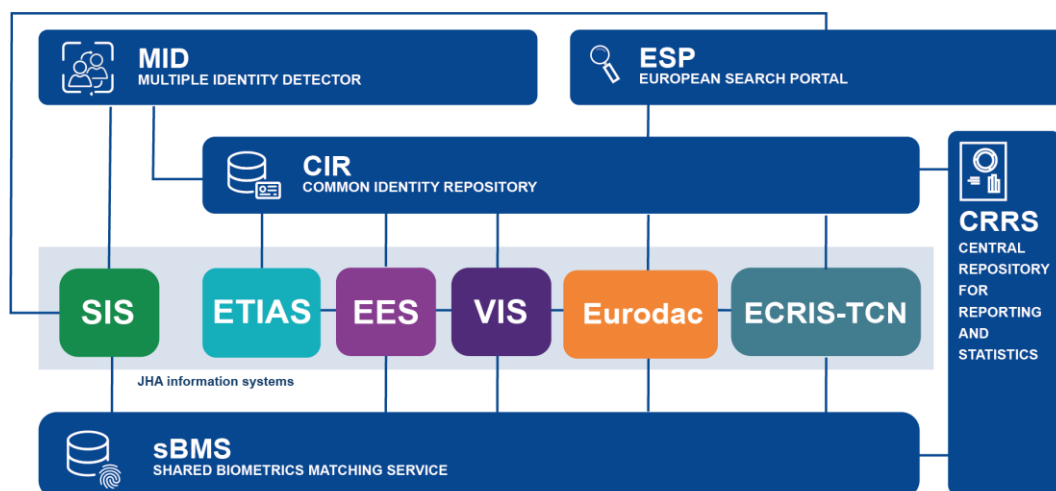
The efficient management of Europe's internal security and external borders relies upon the ability of IT systems to exchange data and information. To facilitate cooperation between national authorities across Europe, eu-LISA is tasked with developing the interoperability architecture for the participating EU information systems under its management: SIS, VIS, Eurodac, EES, ETIAS, and ECRIS-TCN. Once operational, this interoperability architecture will enable more agile and efficient provision of services to the JHA community, while also reinforcing the EU's internal security.⁶⁹

The interoperability architecture will comprise the following components:

- the **European search portal (ESP)** enabling authorised users to conduct single searches and receive results from all JHA information systems they are authorised to access;
- the **common identity repository (CIR)** provides a shared container for identity data, travel document data and biometric data of persons registered in the EES, VIS, ETIAS, Eurodac and the ECRIS-TCN;
- the **multiple-identity detector (MID)** creates and stores links between data in the different EU information systems in order to detect multiple identities, with the dual purpose of facilitating identity checks for bona fide travellers and combating identity fraud;
- the **shared biometric matching service (sBMS)** matching an individual's biometric data across different systems.

In addition, eu-LISA is also developing the **central repository for reporting and statistics (CRRS)** to provide cross-system statistical data and analytical reporting on all JHA information systems for policy, operational and data quality purposes.

Figure 2. Interoperability architecture for the JHA domain



⁶⁹ On 19 October 2023, the JHA Council endorsed the proposed new timeline for the rollout and interoperability of JHA information systems – the **new Interoperability Roadmap**. For more, see '[Main results of the Justice and Home Affairs Council, 19-20 October 2023](#)'.

2.3.1. Shared biometric matching service (sBMS)

The shared biometric matching service (sBMS), storing biometric templates generated from data stored in the common identity repository (CIR) and SIS, will enable biometric data queries across different JHA information systems, making it one of the world's largest biometric systems. As such, it constitutes one of the cornerstones of the EU's internal security and border management system.

KEY HIGHLIGHTS

- In June, sBMS **release was delivered to align with the most recent software version** and the new version of the integration layer.

Implementation

In 2023, the Agency continued with the development of sBMS. At the end of January, following stability issues with the compliance testing platform, sBMS was deployed on all **compliance testing and playground environments**, making it available for all Member States. The Agency continued with the installation of software solutions for the pre-production and production platforms to continue with the remaining testing activity in 2024 (incl. VIS data migration testing), which had been delayed due to the unavailability of testing environments as a result of dependencies on EES shared components.

In June, the Agency delivered an **sBMS release to align with the most recent software version** and the new version of the integration layer. This release entered into the EES minimum viable product flow. However, the current sBMS version will be updated for the entry into operation of the EES.

In parallel, eu-LISA focused on developing sBMS functionalities related to system migrations and recasts, continuing with **data migration** from different JHA systems to enable cross-domain identification, and the extension of the CIR and MID for the justice domain. Additionally, eu-LISA made preparations for the **migration of VIS data to sBMS** and continued implementing the VIS data migration tools. The Agency started with the end-to-end rehearsal in 2023, with migration in production scheduled to start in 2024.

As the **testing of the accuracy** of the sBMS requires the use of real biometric data, eu-LISA has consulted the European Data Protection Supervisor (EDPS) about using real VIS data. The opinion provided by the EDPS allows eu-LISA to proceed with a subset of VIS fingerprint and facial image data.

In collaboration with Sweden, the Agency completed the **sBMS USK VIS pilot project**, consisting of collecting the quality score computed during each capture attempt (for fingerprints and facial images) for each visa application to determine whether the agreed quality thresholds allow for a smooth capture process at the national borders, without leading to an unmanageably high number of recaptures, and to assess the impact of quality checks during the data capture process. The analysis showed that the quality strategy used in the sBMS user software kit (USK) would improve the capture process on visa application workstations by focusing only on VIS records requiring recaptures. The pilot also validated the overall quality of the data sets on facial image quality, while shortening the time for capturing a facial image.

Development of the biometrics portfolio

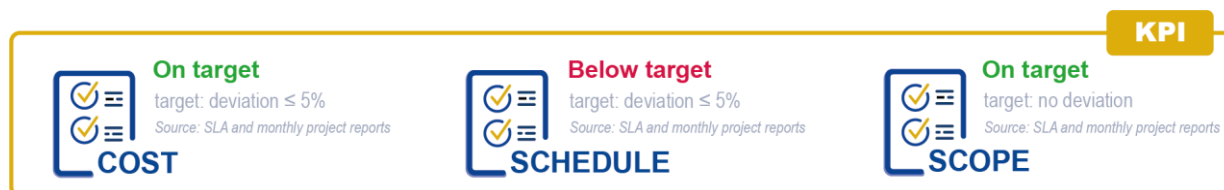
In 2023, eu-LISA continued developing its biometrics portfolio by monitoring research and investing in innovation activities and target solutions to increase the quality of different aspects of biometric solutions, while offering prompt and high-quality support to its stakeholders. As part of the ongoing efforts to standardise data quality across all JHA systems, eu-LISA, working closely with the Commission's Joint Research Centre, **initiated a new international quality standard for fingermarks** (latent fingerprint). As the first of its kind, it is a major achievement for improving JHA systems interoperability.

Biometrics is a key focus area for the Agency, and eu-LISA is committed to becoming an internationally recognised subject matter expert in the area of biometrics and identity management. To that end, the Agency contributed actively to the work of the ISO subcommittee on biometrics,⁷⁰ and followed the development of relevant standards worldwide. In this role, eu-LISA has **put forward a proposal for a new fingerprint quality metric** to promote standardisation at the international level and improve the services offered by eu-LISA. The proposal, important also in the context of SIS and Prüm, received significant support and paved the way for a new ISO standard. This is a major achievement not only for the improvement of interoperability across all JHA systems managed by eu-LISA, but also for the prevention of vendor lock-in and improved transportability of biometric products across framework contracts/vendors.

⁷⁰ [ISO/IEC JTC 1/SC 37](#) is a standardisation sub-committee of the **International Organization for Standardisation (ISO)**, tasked with the standardisation of generic biometric technologies to support interoperability and data exchange between IT systems and applications.

Additionally, in cooperation with the German Federal Office for Information Security (BSI), the Agency put forward a standard for face image quality – the approval of the standard with its open-source library (namely the Open-Source Face Image Quality, OFIQ) will be a major milestone for the biometrics community, as it will enable the use of an opensource, free, fair and performant algorithm to calculate facial image quality.

As part of its active contribution to the ISO efforts in the area of biometrics, eu-LISA hosted meetings of the subcommittee's working groups at the end of June in Tallinn. The working groups made significant progress on several international standards that are of high relevance for the Agency, e.g., common vocabulary, quality assessment, biometric performance testing and biometric identification systems.



Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
sBMS operational maintenance	
sBMS maintenance business as usual	Postponed <ul style="list-style-type: none"> not started due to the delays in EES entry into operation.
Biometrics as a service (BaaS) business as usual	Delivered <ul style="list-style-type: none"> improving service quality, stakeholder support, and international reputation; trainings delivered to European partner agencies, e.g., CEPOL.
Biometric portfolio development and improvements business as usual	Delivered <ul style="list-style-type: none"> participation in Europol's focus discussion on '<i>Biometrics in Law Enforcement</i>' in February, participation in the Biometric Symposium in October; study of the generation of representative synthetic fingerprint and facial image datasets (incl. mated pairs simulation) to reduce dependency on real biometric data; collaboration with the U.S. National Institute of Standards and Technology (NIST); workshop on facial image quality, organised in cooperation with NIST and the European Association for Biometrics (November); high-level design of the future inter-CBS and intra-CBS accuracy measurement tool.
Follow-up and contribution to the ISO SC37 working group business as usual	Delivered <ul style="list-style-type: none"> hosted ISO biometrics standardisation meeting; contributed to drafting a new quality standard for latent fingerprints (ISO/IEC 29794-12), quality assessment for fingerprints (ISO/IEC 29794: fingerprints, facial images, and as new addition, fingerprints) and facial images (ISO/IEC 29794-5), presentation (ISO/IEC 30107) and morphing (ISO/IEC 20059), biometric performance testing and reporting (ISO/IEC 19795; incl. variation across demographic groups to prevent bias – necessary for fairness), and biometric identification systems (ISO/IEC 9868; passive capture subjects); ongoing analysis and solution design for the implementation of accuracy testing for biometric operations in the domain of interoperability and law enforcement.
sBMS implementation	
EES BMS / sBMS implementation finalisation project: SPD delivery date: 2023	Ongoing – new delivery date 2024 <ul style="list-style-type: none"> resolved stability issues with the compliance testing platform; completed installation of hardware components; ongoing installation of software solutions for the pre-production and production platforms; preparations for tools and procedures; updated data protection impact assessments (DPIAs); support for Commission in preparing implementing acts and interoperability handbook.
Implementation of VIS Recast biometric functionalities in sBMS project: SPD delivery date: 2025	Ongoing <ul style="list-style-type: none"> ongoing preparations for the release and data migration, resolved stability issues with the compliance testing platform, completed installation of hardware components, ongoing installation of software solutions for the pre-production and production platforms, preparations for tools and procedures, initiating update of migration toolset.
ECRIS-TCN development in sBMS project: SPD delivery date: 2024	Ongoing – new delivery date 2025 <ul style="list-style-type: none"> testing pending the availability of ECRIS-TCN and CIR.
SIS — sBMS functional integration and biometric data migration for Interoperability project: SPD delivery date: 2024	Ongoing <ul style="list-style-type: none"> ongoing implementation, finalising requirements and design, preparations for delivering the next release.

Project/non-project task	Key achievements during the reporting period
Eurodac sBMS functional integration and data migration project: SPD delivery date: 2025	Ongoing – new delivery date 2026 <ul style="list-style-type: none"> activity not started, pending adoption of Recast Eurodac Regulation.
Europol fingerprint database replication to sBMS (phase 1) project: SPD delivery date: 2024	Other <ul style="list-style-type: none"> after a series of technical and business-level discussions with Europol, the project was deemed unnecessary and reverted back to Europol.
MID impact on sBMS project: SPD delivery date: 2024	Ongoing – new delivery date 2026 <ul style="list-style-type: none"> ongoing analysis of MID impact on sBMS service level agreement, strategy for the accuracy of biometric identification operations in the context of MID.

2.3.2. Interoperability components (ESP, CIR, MID) and CRRS

In addition to sBMS, the EU's JHA interoperability architecture comprises the **European search portal** (ESP), the **common identity repository** (CIR), the **multiple-identity detector** (MID), and the **central repository for reporting and statistics** (CRRS).

KEY HIGHLIGHTS

- In November, eu-LISA completed the development and factory acceptance testing of the **first major MVP release for ESP, CIR and CRRS** that fully supports the needs of ETIAS.

Implementation

In 2023, eu-LISA continued with the implementation of the ESP, CIR, MID interoperability components, and the CRRS. Since implementation was affected by EES development delays, the Agency revised the timeline and set the completion of the interoperability architecture for 2026, in accordance with the interoperability roadmap, with the last upgrades and evolutions scheduled for 2027.

In March 2023, the first contract covering the **preparation for testing** was signed. In parallel, work started on test environments supporting ESP, CIR and CRRS internal testing. In November, eu-LISA completed the development and factory acceptance testing of the first major release for ESP, CIR and CRRS that fully supports the needs of ETIAS. The Agency also progressed with MID, preparing for the first MVP release towards the end of 2024. By the end of 2023, eu-LISA signed the contracts for interoperability testing under Wave 2 (functional and non-functional system solution testing of interoperability components) and testing support for ETIAS (common system solution testing).



Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Interoperability components implementation	
Interoperability implementation (supporting final system acceptance (FSA) activities for ESP/CIR/MID/CRRS) project: SPD delivery date: 2023	Ongoing – new delivery date: ESP, CIR and CRRS in 2025, MID in 2027 <ul style="list-style-type: none"> maintenance activities for high-level design, requirements repository, and security deliverables, with focus on critical elements, i.e., software architecture document, detailed design specifications; updated interoperability interface control documents (ICDs), incl. most recent changes to the implementing acts on linking data and ESP profiles; started collecting requirements and assessing the impact of a central MID tool to resolve the yellow links; factory acceptance tests completed for the first major releases (ESP, CIR, CRRS); continuing with the ESP, CIR, MID and CRRS interaction with SIS, VIS, EES, ETIAS and ECRIS-TCN in preparation for Wave 4; supporting the Commission in preparing implementing/delegated acts, and interoperability handbook.

3. Research and innovation

The following section provides an overview of eu-LISA's activities in the area of research and innovation to further enhance capabilities for the continued development and evolution of IT systems.

3.1. Research and innovation

The Agency actively monitors the latest research and technological developments in order to further improve its operational excellence and the efficiency of JHA information systems under its remit, while also enhancing professional expertise to continue providing added value to stakeholders.

KEY HIGHLIGHTS

- In April, eu-LISA presented its **first scientific research paper, a large-scale study on fingerprint data quality**, at the 11th International Workshop on Biometrics and Forensics (IWBF) in Barcelona.
- The Agency organised two successful industry roundtables, one on **cyber resilience**, and another focusing on the **digitalisation of justice**.

Research and technology monitoring

The Agency continued monitoring research and technological innovation, and promoting standardisation to ensure the ongoing evolution of JHA information systems. It also coordinated eu-LISA's outreach activities with the industry and academia in digitalisation and innovation.

In 2023, eu-LISA started drafting a new **research strategy** to ensure a more structured approach in line with its strategic goals. The strategy, together with the roadmap for 2024–2027, was developed in consultation with various stakeholders and will be adopted in 2024. In addition, the Agency prepared a research and technology monitoring **report on identity management in the context of travel and migration**, to be published in 2024.

Throughout 2023, eu-LISA continued monitoring the implementation of the **Roadmap for Standardisation for Data Quality Purposes**, and delivered the 4th and 5th progress reports to the Council Working Party on JHA Information Exchange (IXIM). The Agency was particularly active in **biometrics standardisation**, contributing to the work of the ISO sub-committee on biometrics. In April, eu-LISA presented its first **scientific research paper, a large-scale study on fingerprint data quality**, at the 11th International Workshop on Biometrics and Forensics (IWBF) in Barcelona.⁷¹

The Agency also continued contributing to the **EU Framework Programme for Research and Innovation**, supporting the Commission and the Research Executive Agency in the implementation of the Horizon Europe framework programme by evaluating project proposals on biometrics for border checks.⁷² In addition, eu-LISA engaged with ongoing research and innovation projects funded by the Commission, with the Community for European Research and Innovation for Security (CERIS), and also with the broader academic and professional community through presentations at conferences and events, e.g., Security Research Event (SRE) 2023.⁷³

eu-LISA continued its active contribution to the **EU Innovation Hub for Internal Security**⁷⁴ by deploying a staff member to the Hub secretariat hosted at Europol. The Agency was involved in several Hub projects, contributing to the Hub's first report on encryption and agreeing to chair the Hub's cluster on biometrics.

To promote the exchange of views and present novel technologies, products and services, the Agency continued its outreach activities by organising **biannual industry roundtable events** that provide a forum for the larger community to discuss challenges, capability gaps and possible practical solutions:

- the first roundtable of 2023 focused on enhancing the **cyber resilience of IT systems**. The event took place in June in Stockholm, Sweden, with around 100 participants joining the event in person and over 160 online, representing over 30 countries worldwide;⁷⁵

⁷¹ J. Galbally, et al. (2023) 'Fingerprint quality per individual finger type: A large-scale study on real operational data', Proceedings of the IEEE 11th International Workshop on Biometrics and Forensics (IWBF), April 2023, pp. 1-6.

⁷² Call for proposal 'Beyond the state-of-the-art "biometrics on the move" for border checks' (HORIZON-CL3-2023-BM-01-03).

⁷³ SRE 2023: 'Societal transformation, digitalisation and climate change – a new paradigm for security research?', Oct 2023.

⁷⁴ For more information, please visit the [EU Innovation Hub for Internal Security](#) website.

⁷⁵ 'Looking Ahead. Ensuring the cyber resilience of the EU's IT systems against emerging threats', June 2023, Stockholm, Sweden.

- the second industry roundtable, organised in collaboration with the Spanish Presidency of the Council of the EU in November in Madrid, Spain. It was the **first eu-LISA event dedicated to the justice domain**, and focused on the **digitalisation of justice**, presenting practical solutions to challenges faced by judicial authorities in Member States. The event attracted interested parties from 30 countries around the world, with more than 110 participants joining the event in person, and nearly 200 online.⁷⁶

In addition, the Agency supported the European Association for Biometrics (EAB) in organising its annual research projects conference that focused on identity management and biometric technologies in the area of internal security,⁷⁷ with Executive Director, Ms Diallo, delivering a keynote speech at the event.

The Agency also continued developing its capabilities in **artificial intelligence**. To improve infrastructure availability and reduce downtime, eu-LISA completed a proof-of-concept project for an AI-based solution for predictive analytics for fault identification and recovery of its IT infrastructure and networks.



3.2. Capability building: reporting and training

eu-LISA provides regular training sessions on the operation and use of the EU's JHA information systems, tailoring them to specified end-user needs and identified knowledge gaps. What is more, the Agency also publishes reports on the technical performance of JHA systems and aggregate statistics on their use.

Statistics and reporting

The Agency is tasked with producing and publishing performance reports and aggregate statistics on the use and technical functioning of the JHA information systems under its remit. This information is also used in the **Schengen Barometer+** developed by the Commission to improve situational awareness and forecasting capabilities at the EU level.

In 2023, eu-LISA published the **annual statistical reports** for SIS⁷⁸ and Eurodac,⁷⁹ the **annual performance reports** on the functioning of **Eurodac**⁸⁰ and **SIS II**.⁸¹ In March, the Agency published the new list of **designated authorities** having access to SIS (incl. SIRENE Bureaux),⁸² which was updated twice (in August and November). The Eurodac list of authorities was updated and published on eu-LISA website in May.⁸³

To comply with the reporting obligations stemming from the recast SIS regulations, eu-LISA collected quarterly data from the Member States, and provided **quarterly statistics** to relevant stakeholders in July and October.

Training for Member States

The Agency continued to provide fit-for-purpose training for Member States on the technical functioning of JHA systems, tailoring them to the needs and knowledge gaps identified by end-users, and maintaining an excellent level of satisfaction. In 2023, eu-LISA **delivered 41 training activities** (both in-person and online), including 17 activities not initially planned but organised in response to emerging needs highlighted by the Member States.

Altogether more than **4 110 people** took part in eu-LISA training activities in 2023, the highest number ever. To access the Agency's online learning management system, more than 780 new accounts were created, and almost 3 000 new enrolments in online training were registered.



⁷⁶ 'Digitalisation of Justice: Turning Challenges into Opportunities', November 2023, Madrid, Spain.

⁷⁷ eu-LISA press release 'eu-LISA co-organising the 2023 EAB Research Projects Conference', September 2023.

⁷⁸ SIS II annual statistics 2022 and factsheet, February 2023.

⁷⁹ Eurodac annual statistics 2022 and factsheet, May 2023.

⁸⁰ Eurodac 2022 annual report and factsheet, August 2023.

⁸¹ SIS II technical functioning report 2021-2022 and factsheet, December 2023.

⁸² The lists of competent authorities were published in the [Official Journal of the EU, Vol 66, C 85, 7 March 2023](#).

⁸³ [Eurodac list of designated authorities 2023](#), May 2023.

To support the **launch of renewed SIS**, eu-LISA organised in-person training events in Sofia in June (the new SIS for SIRENE) and in Vilnius in November (new SIS AFIS for SIRENE), with the support of the local SIRENE Bureaux. The Agency implemented a new approach (using a simulation exercise with the support of the host country). Considering the excellent results and feedback received from participants, the Agency plans to continue with this new approach.

Although training activities focusing on multiple systems are increasing in the lead up to the upcoming systems interoperability, the main training efforts focused on completing a batch of online courses, dubbed 'The Essentials', for all systems managed or developed by eu-LISA.⁸⁴ Those courses are available for all newcomers interested in learning the basics about a particular system. In 2023, eu-LISA updated the essential courses for the renewed SIS and SIRENE.

Throughout 2023, the Agency regularly updated the **annual training plan** by adding new training activities as needed, while also re-calibrating the training schedule based on the updated delivery schedules for the new systems. Three meetings with the **national contact points (NCPs) for training** took place: online meetings in March to present the 2023 training plan and in June to present the midterm report and the annual training needs analysis exercise. The annual meeting in October, in hybrid mode with physical participation in Tallinn, Estonia, focused on the 2023 activities and draft training plan for 2024. Additionally, NCPs from France and Finland shared their training practices, highlighting how they integrate eu-LISA's activities and resources in their national programmes.

For eu-LISA, an important milestone was the **revamped learning management system**. The new, more easily accessible and user-friendly online learning platform was unveiled at the end of June. The new platform offers online training resources specifically designed for Member States, and ensures round-the-clock access to knowledge and training materials. This is an essential element of the training strategy, as today 96% of the eu-LISA training participants follow online courses.

The Agency worked in close cooperation with CEPOL and Frontex in providing joint training courses and sharing expertise in areas of mutual interest with 28 contributions, in particular focusing on EES and ETIAS.

Schengen evaluations

The effective functioning of the Schengen area relies on a complex regulatory and policy framework, and governance. To ensure the proper implementation of the Schengen *acquis*, eu-LISA provides its expertise as an observer to **Schengen evaluations** that focus on SIS/SIRENE cooperation and common visa policy (including VIS). Afterwards, eu-LISA experts contribute to subsequent evaluation reports.

In 2023, eu-LISA took part in five on-site Schengen evaluations for SIS/SIRENE in Lithuania (May), Finland (June), Latvia and Cyprus (October), and Estonia (November). For each of those evaluations, eu-LISA organised a dedicated webinar for the evaluation team, usually held the week before the on-site visit. The Agency also took part in a training organised by CEPOL in the Czech Republic in October.

As for the evaluations on the common visa policy (including VIS), eu-LISA supported four on-site evaluations in consular offices in 2023: Spain (in Ecuador and Santo Domingo in February), Finland (in the United Arab Emirates in June), Lithuania (in Kazakhstan and Armenia in June), and Croatia (in Turkey and South Africa in December). In addition, the Agency supported the annual visa policy training exercise, organised by the Commission in Turkey in October.

Furthermore, eu-LISA contributed to the thematic Schengen evaluation focused on incoming drug-trafficking by helping to develop the questionnaire, analysing Member State input, and assisting onsite visits at harbours located in Belgium, France and Germany (in October).

⁸⁴ eu-LISA video: ['Introducing 'Essential Courses'](#).

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Research and technology monitoring	
Research and technology monitoring business as usual	Delivered <ul style="list-style-type: none"> ■ monitoring new and evolving technologies (from academia and industry); ■ first academic paper presented at the IWBF2023 conference in April; ■ two industry roundtables: cyber resilience (June), and digitalisation of justice (November); ■ drafting annual research and technology monitoring report on identity management; ■ drafting research strategy (consultations w DG HOME, Europol, EMCDDA, Frontex, FRA); ■ EU Innovation Hub for Internal Security: contributions to joint projects, e.g., AP4AI;⁸⁵ ■ EU Data Space in the JHA domain: development of new use cases and training.
Artificial intelligence capability development, incl. establishing a Centre of Excellence business as usual	Delivered <ul style="list-style-type: none"> ■ supported the implementation of a proof-of-concept project on AI for operations.
Supporting the implementation of parts of the EU Framework Programme for Research and Innovation business as usual	Delivered <ul style="list-style-type: none"> ■ contributed to the Security Research Event 2023 organised by DG HOME in October, ■ co-organised the European Association on Biometrics 2023 Research Projects Conference in September, ■ contributed to several Community for European Research and Innovation for Security (CERIS) events organised by DG HOME,⁸⁶ ■ participated in the evaluation of proposals in the domain of internal security.
Integration of research findings into applications life cycle business as usual	Delivered <ul style="list-style-type: none"> ■ contributed to the meetings of eu-LISA Biometrics Working Group; ■ contributed to the work of the EU Innovation Hub for Internal Security: mapping relevant projects, knowledge and capability gaps in the JHA domain; ■ Roadmap for Standardisation for Data Quality Purposes: 4th and 5th progress report; ■ contributed to face quality metric development project, in close collaboration with the Commission's Joint Research Centre (JRC).
Training for Member States	
Training for Member States business as usual	Delivered <ul style="list-style-type: none"> ■ total of 41 training activities delivered (incl. in-person and online courses), ■ updating the annual training plan as per emerging needs and holding the face-to-face annual meeting with the National Contact Points (NCP) network (October), ■ launch of revamped eu-LISA learning and training platform, ■ cooperated with CEPOL and Frontex in providing joint training courses on using JHA systems and sharing expertise in areas of mutual interest, with 28 contributions to their training activities, in particular focusing on EES and ETIAS.
Statistics and reporting	
Drafting reports and aggregated statistics on JHA information systems business as usual	Delivered <ul style="list-style-type: none"> ■ publishing statutory statistical and technical functioning reports for Eurodac and SIS II, ■ compiling and publishing lists of designated authorities for SIS and Eurodac, ■ internal policy on sharing statistics to be presented to the Management Board, ■ data collection for the VIS technical performance report 2022–2023, ■ continuous support to the Commission in the Blueprint network initiatives.
Schengen evaluations	
Contribution to the Schengen evaluation mechanism business as usual	Delivered <ul style="list-style-type: none"> ■ processing the Commission's requests on Schengen evaluations within defined deadlines; ■ participating in five Schengen evaluation exercises for SIS/SIRENE in Lithuania (May), Finland (June), Iceland (August), Cyprus and Latvia (October); ■ participating in evaluations of common visa policy (incl. VIS) held in third countries: Spain (February), Finland and Lithuania (June), and Croatia (December); ■ participating in the thematic Schengen evaluation focusing on incoming drug trafficking, with three onsite visits (Belgium, Germany and France) in October; ■ participating in training exercises: SIS/SIRENE in the Czech Republic (October), and common visa policy (incl. VIS) in Turkey (October).

⁸⁵ The **Accountability Principles for Artificial Intelligence (AP4AI)** project is one of 5 pilot projects under the Hub, and it aims to develop a global framework for AI accountability in policing, security and justice. For more, visit the [AP4AI project official website](#).

⁸⁶ For more, visit the [CERIS official website](#).

4. Infrastructure and networks

The following section provides an overview of eu-LISA's activities related to providing a reliable infrastructure for hosting all systems, and ensuring secure communication and data transfer. The Agency must ensure the high-level security and uninterrupted availability of all JHA systems for end-users at two technical sites — one in Strasbourg, France and another in St Johann im Pongau, Austria, while also providing technical services needed to run the systems and ensuring 24/7 operational support to end-users.

4.1. Networks

The communication infrastructure provides **secure and reliable data transfer** between JHA systems and their end-users, namely the Member States and relevant EU agencies. In addition, it also provides the point-to-point connection between the Agency's main technical site in Strasbourg (central unit, CU), and the backup central unit (BCU) in St Johann im Pongau, Austria.

The communication infrastructure uses the **TESTA-ng network** (Trans-European Services for Telematics between Administrations – new generation), which provides the backbone network separated from the public internet.⁸⁷ On the TESTA-ng network, eu-LISA uses three domains for the operation of JHA systems: SIS domain for SIS and SIRENE Mail,⁸⁸ VIS domain for VIS (incl. VIS Mail⁸⁹), EES and ETIAS, and EuroDomain for Eurodac, DubliNet and ECRIS-TCN.⁹⁰ The end-users connect to each domain separately (also physically separated at user premises), usually via two separate turnkey access points (TAPs).

KEY HIGHLIGHTS

- In May 2023, eu-LISA was **designated as a local internet registry** (LIR), and became a member of the Regional Internet Registry of Europe.

Operational management of the communication infrastructure

The key objective for 2023 was to operate the communication infrastructure in compliance with relevant regulations and service-level agreements, with SIS and VIS communication infrastructure availability at **99.99%**.⁹¹

To ensure SIS and SIRENE Mail data security, in addition to the data encryption ensured by the TESTA-ng service provider, eu-LISA managed a second encryption layer for the SIS and VIS domain, with their availability level at **100%**.

Following the integration of Cyprus to SIS and the provision of full access to Croatia to VIS, the Agency **extended the access of new Member States to SIRENE Mail and VIS Mail**.

Throughout the year, eu-LISA continued supporting the Member States by coordinating and managing the transfer of existing TAPs to new data centre locations, while also installing new and decommissioning old TAPs. The Agency ensured the management of network services and afferent changes required to network components to maintain and evolve the TESTA-ng infrastructure and guarantee operational continuity. In particular, the Agency **reinforced the resiliency of the TESTA-ng network** by improving the entry lines at its operational sites and in some Member States.



⁸⁷ The Commission manages the contract with the private service provider operating the **TESTA-ng network**. The Commission started preparations for the evolution of the TESTA framework contract in 2018, which should have resulted in the design and setup of new communication infrastructure services in 2023. However, in April, the Commission informed the Agency of the cancellation of the procedure following an order from the Vice-President of the Court of Justice to refrain from signing a contract after noting that the situation was having a severe and negative impact on the TESTA programme. Discussions with the Commission are ongoing to ensure business continuity until the new TESTA infrastructure is put in place.

⁸⁸ **SIRENE Mail** is a communication mechanism used by national SIRENE Bureaux for supplementary information related to SIS alerts.

⁸⁹ **VIS Mail** is an information exchange mechanism used by national visa authorities to consult on Schengen visa applications.

⁹⁰ The Agency will use interoperability components on all three domains.

⁹¹ EuroDomain performance indicator is under the responsibility of the Commission's Directorate-General for Digital Services (DIGIT).

Upgrade and evolution of the communication infrastructure

In May 2023, eu-LISA reached an important milestone by being **designated as a local internet registry (LIR)**, and becoming a member of the Regional Internet Registry of Europe. The Agency can now distribute IP addresses to end-users as a service provider or use them for its infrastructure. To support this activity, eu-LISA acquired essential internet resources (e.g., autonomous system number, IPv6 and IPv4 address blocks) for connecting to the internet and to provide public JHA services, e.g., EES/ETIAS web services.

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Operational management of the communication infrastructure	
Operational management of the communication infrastructure business as usual	Delivered <ul style="list-style-type: none"> ■ operating the communication infrastructure, handling requests and incidents; ■ managing communication infrastructure changes, incl. new TAPs, TAP moves, TAP capacity upgrades, and diversity of lines; ■ operating second encryption layer solutions for SIS and VIS, incl. refresh of VIS second encryption layer solution; ■ Croatia added to VISmail, Cyprus to SIRENEmail; ongoing preparations to add Frontex; ■ design of components for new systems and interoperability components; ■ supervising and managing contracts and budgets for ongoing network developments by TESTA network provider for EES (incl. web services), sBMS and VIS-EES interoperability; ■ configurations and deployments for EES core, VIS and sBMS infrastructure, incl. the NUIs and Internet Zone; ■ connecting EES to VIS communication infrastructure to start tests with the Member States.
Corrective maintenance and monitoring of the centralised infrastructure hosting VIS Mail and SIRENE Mail business as usual	Delivered <ul style="list-style-type: none"> ■ 24/7 monitoring of the JHA systems infrastructure, ■ providing minor adaptive maintenance, ■ renewal of the licences, maintenance of hardware and commercial off-the-shelf software.
Upgrade and evolution of the communication infrastructure	
Network capacity planning and operational improvements project: SPD delivery date: 2024	Ongoing <ul style="list-style-type: none"> ■ finalising high-level design and bill of materials (components, instructions, requirements), ■ request for offer dispatched.

4.2. Data centres

The Agency's data centres, the central unit (CU) in Strasbourg, France, and the backup central unit (BCU) in St Johann im Pongau, Austria, are the infrastructure that physically hosts all the IT systems managed by eu-LISA, while also hosting other operational and non-operational systems needed for development or testing. As such, they constitute eu-LISA's core assets and are of critical importance for the execution of its mandate.

KEY HIGHLIGHTS

- eu-LISA introduced a dedicated **data centre infrastructure management (DCIM) tool** to increase efficiency of the infrastructure optimisation and energy management.

Data centre operational management

In 2023, the key objective was to provide a highly available data centre in accordance with the service-level agreement. The Agency took all necessary measures to keep both units continuously operational, contributing to high-level system performance, in particular their **24/7 availability**.⁹² At both locations, eu-LISA managed data centre access and deliveries transparently for all stakeholders via a dedicated web service.

⁹² The services are in operation. The gradual introduction of new business systems increases the demand for site capacities. In view of the necessary lead time, interim measures taken in accordance with management decisions are currently still taking effect.

Throughout 2023, eu-LISA maintained critical assets, facilities and equipment in full working order and improved their overall service performance and scalability. In particular, it started decommissioning legacy systems to reduce dependence on physical access to data centres and facilitate remote access. To that end, interfacing service support and process management was gradually allowed for all systems and technical infrastructure operational environments.



To support operations and projects, the Agency continued developing and implementing a data centre service approach to centralise the operational management, monitoring and capacity planning of the underlying IT infrastructure used by JHA systems. To increase operational efficiency, eu-LISA introduced a dedicated **data centre infrastructure management (DCIM) tool** that includes several modules, such as infrastructure optimisation and energy management.

Data centre upgrade and evolution

To achieve additional or interim buffer capacities to accommodate future capacity needs, eu-LISA continued optimising and reorganising its data centres through structured cabling and modifying rack layouts for cooling optimisation. To optimise space at the Strasbourg data centre, the Agency evaluated all power installations. In addition, eu-LISA has progressed with preparations for its **future modular data centre in Strasbourg** to provide additional buffer capacity needed for the future updates of the main data centre layout. The modular data centre will provide a 50% capacity increase for hosting new JHA systems.

The Agency also implemented and improved power usage monitoring by allowing individual readings of power consumption and load of equipped racks. The Agency additionally fine-tuned the complete setup of the web-based **environment control system** featuring a network of wireless temperature, humidity and pressure sensors in the data centre. At the backup central unit in St Johann im Pongau, working closely with Austrian authorities, the available cooling capacity was maximised by adjusting the hydraulics and pumps together with other upgrades.

Additionally, eu-LISA continued providing hosting services for the backup systems of Frontex and the EU Agency for Asylum (EUAA) in accordance with respective bilateral agreements, and providing support on 35 and 20 occasions, respectively.

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Data centre operational management	
Backup central unit (BCU) operational and running costs business as usual	Delivered <ul style="list-style-type: none"> providing continuous maintenance for the BCU site; access control via dedicated web services, incl. delivery follow-up and registration; supporting Austrian authorities in the timely implementation of a technical / organisational solution to meet significant capacity requirements.
Physical network infrastructure consolidation business as usual	Delivered <ul style="list-style-type: none"> improving overall service quality and performance; updating and improving critical physical infrastructure while maintaining its uninterrupted availability, particularly for the production environment (PRD); transfer of old installations to well-documented structured cabling, identifying and removing a large number of legacy cables and monophasic power breakers, making room for new projects with higher power requirements; new DCIM tool: data integration, incl. 3 025 assets entered in 2023.
Data centres upgrades and evolution	
Central unit and backup central unit operational activities and evolutions and improvements business as usual	Delivered <ul style="list-style-type: none"> supporting stakeholders with forecasting and planning of all activities; technical post-implementation reviews as a service to ensure adherence to standards; supporting projects on standards, legal and regulatory obligations; collaborating with asset management to identify service costs; BCP infrastructure installation completed in October 2023.

4.3. Common shared platform (CSP)⁹³

The common shared platform is the scalable, agile, and standardised infrastructure platform that provides the underlying technical services needed to run all IT systems managed by eu-LISA.⁹⁴ By applying state-of-the-art technologies, the platform offers a resource-efficient framework, streamlining development and operational tasks (with a DevOps-oriented deployment pipeline), while offering a high degree of automation for infrastructure management (Infrastructure as Code).

KEY HIGHLIGHTS

- The Agency ensured continuous operation and service delivery of the **Common Shared Platform (CSP)**.
- The Agency implemented an on-premise container platform to reduce delivery time through automation and established a CI/CD pipeline (continuous integration, delivery and deployment) to improve the efficiency and the deployment time for new applications.
- The Agency launched a **comprehensive cloud platform** to test and verify cloud technologies for the hosting of appropriate workloads.

Infrastructure operational management

In 2023, the main objective was to ensure the continuous operation of the Agency's network and infrastructure, by providing corrective maintenance (incl. pure hardware maintenance and commercial-off-the-shelf software licence renewal), and managing access to JHA systems via the secure management network. Throughout 2023, eu-LISA successfully **maintained the common shared platform (CSP)** servicing all core business systems – the CSP remained fully available, and all issues were resolved within targets defined in respective service level agreements. Furthermore, eu-LISA provided **adaptive maintenance in cyclic releases**, keeping all systems up to date and accurately estimating all necessary replacements.

To address the need for further growth and more efficient build, delivery and operation of core business system hosting, eu-LISA launched the **'Smart Hosting' initiative**, introducing new concepts and technologies for hosting large-scale IT systems with a focus on 5S principles: scalability, sustainability, stability, security and sovereignty. This includes **implementing an on-premise container platform** to significantly reduce the delivery time through automation and **establishing a CI/CD pipeline** (continuous integration, delivery and deployment) to improve the efficiency of the deployment process and reduce the time necessary to deploy new applications. The Agency will use it for the build and deployment of ETIAS, interoperability components and future systems.

Furthermore, eu-LISA worked on the **comprehensive cloud platform (CCP)** to test and verify the use of cloud technologies for hosting appropriate workloads. Additionally, the Agency designed the **build pipeline for mobile applications** necessary for the creation of applications for new systems.

The Agency also continued implementing the EES national uniform interfaces (NUI) in the Member States, and the internet zone for EES, ETIAS and e-CODEX.



⁹³ Previously referred to as the common shared infrastructure (CSI).

⁹⁴ Currently, the CSP hosts several smaller systems (e.g., SIRENE Mail and VIS Mail) and all new systems (e.g., VIS for EES, sBMS). In the future, it will host all systems together with all other platforms under the Agency's mandate.

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Operational management	
Corrective maintenance and monitoring of centralised infrastructure CSI components hosting the core business systems (CBS) business as usual	Delivered <ul style="list-style-type: none"> 24/7 systems infrastructure monitoring, incl. minor adaptive maintenance; migrated to new maintenance support contractor; renewing licences, maintaining hardware and commercial off-the-shelf software.
Corrective maintenance and monitoring of centralised infrastructure hosting e-CODEX business as usual	Ongoing <ul style="list-style-type: none"> staging environment deployment, pending deployment of the production system.
Corrective maintenance and monitoring of centralised infrastructure hosting ECRIS business as usual	Ongoing <ul style="list-style-type: none"> infrastructure design under preparation, infrastructure platform defined.
Corrective maintenance and monitoring of centralised infrastructure hosting EES business as usual	Ongoing – new delivery date 2024 <ul style="list-style-type: none"> infrastructure platform defined, ongoing deployment of pre-production and test environments.
Corrective maintenance and monitoring of centralised infrastructure hosting Eurodac business as usual	Delivered <ul style="list-style-type: none"> 24/7 infrastructure monitoring, minor adaptive maintenance and server refresh.
Corrective maintenance and monitoring of centralised infrastructure hosting SBMS business as usual	Ongoing – new delivery date 2024 <ul style="list-style-type: none"> infrastructure platform design defined, deployment of pre-production and production environment ongoing.
Corrective maintenance and monitoring of centralised infrastructure hosting VIS business as usual	Delivered <ul style="list-style-type: none"> 24/7 infrastructure monitoring, providing minor adaptive maintenance, migrated to new maintenance contractor, renewing licences, maintaining hardware and commercial off-the-shelf software.
Evolution, refresh and adaptive maintenance of centralised infrastructure hosting CBS business as usual	Delivered <ul style="list-style-type: none"> 24/7 infrastructure monitoring, providing minor adaptive maintenance, renewing licenses, maintaining hardware and commercial off-the-shelf software.
Infrastructure operational management of configuration management system business as usual	Delivered <ul style="list-style-type: none"> maintaining and updating the configuration management database (CMDB), incl. onboarding new CBS inventories, providing reports and statistics on configuration management. closure of several pending audit recommendations.
Infrastructure operations management of access to operational platforms (EUWS services) business as usual	Delivered <ul style="list-style-type: none"> updated infrastructure for end-user workstations (EUWS), provision of EUWS endpoints and related services, deploying SERENA (secure remote access) VPN solution.
Maintenance renewal of Oracle licenses for core business systems (CBS) business as usual	Delivered <ul style="list-style-type: none"> database maintenance licence duly renewed, migration of SIS to new database technology, with further upgrade ongoing, provided shared container platform for ETIAS, ECRIS-TCN and Interoperability.

5. Direct support to operations

The following section provides an overview of the support provided for the operational management of JHA systems. This includes ensuring security and business continuity, as well as delivering essential IT services, such as business relations management and service transition. Together, these activities provide reliable and cost-effective solutions and services to the Member States and other users of the EU's JHA information systems.

5.1. Security and business continuity

The Agency continuously monitors and manages security risks and ensures that the established security controls for the IT systems entrusted to eu-LISA are effective, properly implemented and managed, including continuous improvement of cyber security measures.

KEY HIGHLIGHTS

- **VIS disaster recovery exercise** successfully executed in October 2023.
- The Agency has established a **computer security incident response team (CSIRT)**.

In 2023, the focus was on ensuring that each information system, including internet-facing corporate systems, implemented a risk assessment-based '**defence in depth**' approach, under which the Agency implements layers of security measures to provide resilience to incidents and cyberattacks.

To ensure timely identification of and response to **cyber threats**, eu-LISA operates and maintains a security monitoring platform, cybersecurity incident plan, response playbooks, and 24/7 stand-by duty arrangements. The Agency also operates a security information and event management (SIEM) system in conjunction with CERT-EU (Computer Emergency Response Team for the EU) to identify and respond to cyber threats on its IT systems. In this area, the primary focus was on reinforcing eu-LISA's defensive readiness posture in the face of increasing cyber warfare activities by certain nation-state actors. With the support and guidance of CERT-EU, eu-LISA continued improving its cybersecurity posture, strengthening its cyber defences, and ramping up its capabilities to detect and promptly react to cyber operations.

In 2023, the Agency also focused on strengthening and upgrading the **security framework and procedures** for the large-scale IT systems and communication networks managed by eu-LISA. As part of the operational management of JHA systems, the Agency continuously monitored and managed security risks, while testing and enhancing security controls to ensure an **effective security posture**. Given Russia's ongoing aggression against Ukraine, it ensured continuous monitoring of the security threat landscape, focusing on hybrid threats, in particular. The geopolitical situation was under careful consideration also because of eu-LISA's geographical distribution across four EU Member States (Estonia, France, Austria and Belgium), with significant differences in threat levels, mainly physical and cyber. In parallel, the Agency continued improving its business continuity management system and organisational resilience to properly address any disruptive incidents and ensure service continuity. In this context, the main focus was on preparations (objectives and scenario) for the VIS disaster recovery exercise, organised in October 2023. More than 120 people participated in the exercise (70 of them as players), including ENISA, 6 Member States and the TESTA-ng service provider (for more, see section on the Visa Information System).

An integral part of developing **new IT systems** is ensuring that security is built in by design and by default. In 2023, the focus was on eliciting security requirements that will drive the development of the **overarching security architecture** for JHA information systems. In addition, eu-LISA also worked on the reference **enterprise security architecture model** for the JHA systems. Furthermore, the Agency performed security testing activities related to EES, VIS, and sBMS, while integrating all the necessary security testing capacity (tools and capability) in the eu-LISA DevSecOps (development, security, and operations) pipeline.

In 2023, the Agency progressed with the **implementation of security-related recommendations** from several audits and assessments (e.g., 2020 IAS audit on IT Security, EDPS inspection of Eurodac) and those from previous security and business continuity exercises run with the Member States.

eu-LISA adopted several standards and guidelines to improve its **information security management** system. In managing security risks, the Agency finalised the risk assessments, security plans and business continuity plans for Eurodac, EES and sBMS. In addition to in-house experts, these plans were reviewed by security experts from the Commission, Member States and Frontex in the framework of the Security Officers Network (SON). Additionally, eu-LISA provided expertise and specific technical support to the EU Agency for Asylum (EUAA) for the preparation of the JHAAN crisis management exercise in September 2023. This exercise marked the first time that all JHA agencies took part in a joint cybersecurity exercise.

The Agency continued exchanging knowledge and best practices with other EU agencies and institutions on matters related to business continuity, especially in the context of Russia's war of aggression against Ukraine. To keep up-to-date with the latest security matters, eu-LISA takes part in the initiatives of the Inter-Institutional Security Training and Awareness Group, and collaborates with the Security Officers Network (SON). In May, the Agency organised the 17th SON meeting in Italy, focused on the EU's threat landscape, the latest cybersecurity challenges and regulatory developments, and in October, the 18th meeting, held in Tallinn, on cybersecurity resilience with a focus on AI trends and threats. Additionally, in line with eu-LISA security rules on protecting communication and information systems, the Agency's IT security working group met on a bimonthly basis to exchange the latest information on security-related matters.

As per the Commission's decisions on the cooperation procedure for ensuring JHA systems interoperability,⁹⁵ the Agency has established a **computer security incident response team (CSIRT)**. To further reinforce its capacity to manage security incidents, eu-LISA also actively consulted the Interoperability Advisory Group and provided the chairmanship and the co-leadership of the NIS2 Cooperation Group, in the process of devising its security incident cooperation procedure and implementation guidance. In this context, eu-LISA has been actively contributing to **two legislative proposals** put forward by the Commission in March 2022 to improve **information security**⁹⁶ and **cybersecurity**⁹⁷ in EU institutions, bodies, offices, and agencies.



Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Security and business continuity	
Managed IT security services business as usual	Delivered <ul style="list-style-type: none"> managing requests, actions, issues, events, alerts, incidents, and related follow-ups; monitoring vulnerabilities and the security posture of infrastructure; performing vulnerability assessments.
Operational business continuity business as usual	Delivered <ul style="list-style-type: none"> Enterprise Security Architecture model for JHA systems, computer security incident response team (CSIRT), contributions to the Security Officers Network (SON), JHA Security Officers Network (JHASON), IT Security Working Group, ENISA cybersecurity regulation pilot; providing expertise to EUAA (JHAAN presidency 2023) to run the Crisis Management Exercise 2023 in September.
Information security, assurance and cybersecurity operations services business as usual	Delivered Information Security and Assurance: <ul style="list-style-type: none"> implementation of relevant IAS and EDPS recommendations, definition of security requirements for interoperability architecture, testing security requirements for new JHA systems, conducting scheduled risk assessments, improving eu-LISA's security framework.

⁹⁵ Commission implementing decisions [C(2021)6663 and C(2021)6664 of 16 September 2021] laying down the specifications of the cooperation procedure as regards security incidents that have or may have an impact on the operation of the interoperability components or on the availability, integrity and confidentiality of the data, pursuant to [Article 43\(5\) of Regulation \(EU\) 2019/817](#), and [Article 43\(5\) of Regulation \(EU\) 2019/818](#).

⁹⁶ Proposal for a Regulation of the European Parliament and of the Council on **information security** in the institutions, bodies, offices and agencies of the Union, [COM/2022/119 final](#).

⁹⁷ Proposal for a Regulation of the European Parliament and of the Council laying down measures for a **high common level of cybersecurity** at the institutions, bodies, offices and agencies of the Union, [COM/2022/122 final](#).

Project/non-project task	Key achievements during the reporting period
	<p>Security Operations and Response:</p> <ul style="list-style-type: none"> ensuring security for all JHA systems managed by eu-LISA; developing processes / mechanisms for security monitoring, incident management, secure configuration and hardening, continuous vulnerability and patch management; implementing findings and recommendations from external audits and inspections. <p>Cybersecurity:</p> <ul style="list-style-type: none"> cybersecurity management to mitigate cyber threats, enhancing cybersecurity posture maturity level as per CERT-EU guidance, international standards and good practice, Computer Security Incident Response Team (CSIRT), preparations for accreditation of CIRT cyber security monitoring, security incident response and cooperation capabilities as per the TF-Introducer process, regular cyber security Blue Team/Red Team and incident response tabletop exercises, new security approach based on DevSecOps to secure cloud-native technologies, security information and event management (SIEM).
<p>Combined disaster recovery exercise for VIS and EES project: SPD delivery date: 2024</p>	<p>Delivered</p> <ul style="list-style-type: none"> VIS exercise 2023 in October (scope covered only VIS, since EES is not yet operational).

5.2. System operations

To ensure the continuous availability of JHA information systems under its remit, the Agency provides support services to all system end-users via the eu-LISA Service Desk, operating on a 24/7 basis. The Service Desk is responsible for the handling of service requests (standard procedures) and coordinating the resolution of incidents (service disruptions) and problems (investigation of root causes). For effective operations, the Agency also maintains the **IT service management (ITSM) tools**.

KEY HIGHLIGHTS

- Customer satisfaction surveys have consistently shown a positive trend in service quality, reaching an overall satisfaction score of **97.3%** in 2023.
- The Agency has provided comprehensive 24/7/365 support for all production systems, ensuring stability and uninterrupted service throughout the year.

Operational support

In 2023, the main objective was to ensure **continuous and high-quality first- and second-level support for system end-users**. During the reporting period, eu-LISA Service Desk handled 1 404 service requests and 2 336 incidents for all JHA systems in operation. System end-users submitted altogether 1 019 tickets, with another 2 681 tickets submitted internally, either during routine systems monitoring or by onsite contractors.

Table 1. Number of incidents and service requests handled in 2023

	SIS	VIS	Eurodac	Total
Incidents⁹⁸	1230	403	703	2336
<i>opened by the Member States</i>	184	83	308	575
<i>opened internally</i>	1046	320	395	1721
Service requests	864	206	334	1404
<i>opened by the Member States</i>	172	75	197	444
<i>opened internally</i>	692	131	137	960

Table 2. Breakdown of incidents by priority and system

Priority ⁹⁹	SIS	VIS	Eurodac	Total
low	149	120	91	360
moderate	902	255	552	1709
high	170	28	53	251
critical	9	0	7	16
Total	1230	403	703	2336

⁹⁸ An incident is a single unplanned event that causes service disruption; a problem is the root cause of one or more incidents.

⁹⁹ The priority of an incident is determined based on the business impacted on the affected service and the urgency to resolve the incident.

During the reporting period, SIS was switched between sites four times, VIS three times, and Eurodac twice. Despite a few critical incidents, the robust processes and efficient collaboration between the Agency's support teams and other operational teams, as well as with external contractors, resulted in a good level of systems availability to the JHA community. Additionally, operational support participated in the preparation of complex new releases (e.g., renewed SIS) and commenced training on the new systems (e.g., EES, sBMS).

Operational service tools

Another objective for 2023 was to ensure the **effective monitoring of JHA systems** managed by eu-LISA. To that end, the Agency focused on the continued development of the necessary tools to improve responsiveness and quality of first- and second-level support, namely the IT service management (ITSM) tool, the e-Operator Manual (eOPM) and the event management system.

The **ITSM tool** was further enhanced by implementing new requirements from end-users and new workflows in compliance with the transversal operating model. Anticipating the end of life of the current tool (SM9), the Agency launched the implementation of a new **event management system**, which will provide a holistic simplified view of the eu-LISA IT landscape, using artificial intelligence and machine learning algorithms to facilitate full stack observability.

As for the **eOPM tool**, eu-LISA completed the study to replace the 'homemade' and out-of-support tool currently used by eu-LISA Service Desk to interact with SIS Member States. The new solution can be easily extended to all JHA systems operated by the Agency at present, and also in the future.

After assuming responsibility for the maintenance of the **SIS statistics tool** that produces and formats the system's public reports, the Agency delivered a new release compliant with the requirements from SIS Recast and the integration of Cyprus in the SIS.

The Agency finalised implementing the **single integrated monitoring solution** (SIMS). As a result, the Service Desk has a new mobile monitoring wall and additional workplaces ready to perform activities related to new systems and interoperability. The Agency concluded the assessment of SIMS deployment to the backup central unit and started implementing a light monitoring solution. In parallel, the Agency is considering using the VDI infrastructure introduced by SERENA to reduce the physical volume occupied by the SIMS workstations and enhance the administration and user experience.

Key performance indicators

Performance indicators	Target	Status
eu-LISA Service Desk Performance	≥75%	On target: 100% <i>Source: Service Desk performance report</i>
Customer satisfaction % of Member States satisfied/very satisfied with service provided	≥80%	On target: 97.33% SIS 97%, VIS 96%, Eurodac 99% <i>Source: annual customer satisfaction survey</i>

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Operational support	
24/7 1st level support for operational management of the systems (eu-LISA Service Desk) business as usual	Delivered <ul style="list-style-type: none"> providing 24/7 first-level support for JHA systems end-users, incl. reliable communication with customers and stakeholders; active participation in the preparation of the EES (incl. web services) Operator Manual and standard operating procedure; harmonising Operator Manuals across all our systems to standardise processes, reduce confusion and ensure high-quality support, incl. setting standards for new systems; contribution to the technical training with the Member States.
24/7 2nd level application support for the operational management of JHA systems business as usual	Delivered <ul style="list-style-type: none"> providing 24/7 technical support for JHA systems in operation, participation in release deployment and active follow-up of incidents and problems related to production environments, contribution to the review of new systems (sBMS, EES, ETIAS, ECRIS, e-CODEX), support for SIS Recast deployment, Cyprus-SIS integration, and Croatia-VIS connection, migrating legacy systems to the CSI platform, ITSM quality review.

Project/non-project task	Key achievements during the reporting period
Exadata & Zero Data Loss Recovery Appliance business as usual	Delivered <ul style="list-style-type: none"> hardware migration from X6 to X8: completed work on non-production environments, production next year, on software level to reach the latest version available for that platform, launching SIS AFIS database migration to Exadata, launching Eurodac database migration to Exadata with completion in the coming months.
Operational service tools	
Business as usual business as usual	Delivered <ul style="list-style-type: none"> managing resources, technical administration for tools, supporting end-users, training.
eOPM replacement implementation project: SPD delivery date: 2024	Ongoing <ul style="list-style-type: none"> based on study results, purchase and implementation of new solution (Jira by Atlassian), migration of the current SIS workflow.
Event management (purchase, implementation and maintenance of the core system) project: SPD delivery date: 2023	Ongoing – delayed Implementation of event management system started at the end of 2023. Delay due to protracted recruitment process of project manager. <ul style="list-style-type: none"> July 2023: Event Management Study concluded, implementation launched, purchase and deployment of the event management system, support for sequential integration of existing JHA systems.
Operational reporting – training of end-users business as usual	Postponed <ul style="list-style-type: none"> activity depends on the entry into operation of CRRS (delayed).
Migration of SM9 towards SMAX – proof of concept business as usual	Delivered <ul style="list-style-type: none"> study to select a replacement solution for ITSM tool.
Migration of SM9 towards SMAX – implementation business as usual	Postponed to 2024 <ul style="list-style-type: none"> purchasing and deploying the new ITSM tool, migration of existing ITSM processes to the new product.
Support of vendor for corrective, adaptive and evolutive maintenance business as usual	Delivered <ul style="list-style-type: none"> providing vendor support to SM9 administrators for implementing corrective, adaptive and evolutive changes.

5.3. Service transition

Under the continuous development of the EU's JHA systems, one of eu-LISA's key tasks is the quality control aspect, delivered through operational change management, testing, application lifecycle management, release and deployment management.

KEY HIGHLIGHTS

- eu-LISA started implementing a **business requirements analysis toolset** to improve the efficiency and accuracy of requirements analysis and test case validation by automating labour-intensive tasks.
- The Agency deployed VIS4EES (VIS for EES) on the preproduction environment using eu-LISA's internal automation process based on **DevSecOps pipelines** (for build and deployment), thus reducing its dependency on contractors and improving operational stability.

In 2023, the main objectives were to continue providing support and maintenance for all JHA systems and their communication infrastructures and to the centralised infrastructure hosting the systems, together with the application lifecycle management platform. This includes system upgrades and critical recasts, as well as providing continuous operational support to the Member States. The Agency consolidated internal tools and processes, and addressed challenges related to adopting an agile approach to release, change and test/qualification management. Under the System Development Lifecycle (SDLC) project, eu-LISA finalised the collection of requirements and proof of concept for the **business requirements analysis toolset** and began implementation, which will improve the tracking of requirements and test case validation.

Facing an exponential growth of projects and new technologies, while also trying to reduce its dependency on contractors, eu-LISA adapted its way of working which resulted in the **first significant milestone without contractor support**: deploying VIS4EES (VIS for EES) on the preproduction environment using eu-LISA's internal automation process based on DevSecOps pipelines (for build and deployment).

Key performance indicators

Performance indicators	Target	Status
% of test campaigns completed on schedule	>90%,	On target: legacy systems: 100% , new systems: not available <i>Source: test plans and test summary reports</i>
Complete requirements coverage	>95%	On target: new systems 100% , legacy systems: n/a (requirements not fully defined) <i>Source: internal reports</i>
% of effectively implemented operational changes closed annually (i.e., not abandoned or cancelled)	>75%	On target <i>Source: internal reports</i>

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Service transition	
Application management services business as usual	Delivered <ul style="list-style-type: none"> ■ technical advice and document reviews to ensure quality of design, ■ regular updating of eu-LISA's IT Technology Catalogue.
Operational change management business as usual	Delivered <ul style="list-style-type: none"> ■ changes to operational systems: qualification, implementation, post-implementation review; ■ ongoing preparations for new systems: EES, ETIAS, sBMS; ■ more agile approach to systems under construction presented to eu-LISA management; ■ awareness-raising on operational change management (internally and with contractors).
Release and deployment management and transition to operations business as usual	Delivered <ul style="list-style-type: none"> ■ implementing releases (i.e., latest functionalities and patches) according to scheduled release plans for operational systems, e.g., VIS and Eurodac; ■ implementation of SIS Recast release in March 2023; ■ implementation of a more agile and automated approach for release management; ■ EES/VIS/sBMS transition into operation plans/activities (internal/external stakeholders).
Support for application lifecycle management (ALM) platform and related tools (build pipeline, testing tools) business as usual	Delivered <ul style="list-style-type: none"> ■ build pipeline: EES, sBMS and VIS-EES onboarded to the Build pipeline (as part of Continuous Integration toolchain on ALM platform); ■ deployment pipeline: successful deployment of EES, sBMS and VIS-EES in PPE CU, using the Continuous Deployment toolchain integrated within EES project; ■ test tools: support provided on technical matters to ensure their availability; ■ preparations for integrating ETIAS, ECRIS-TCN, and interoperability components into both Build and Deployment pipelines.
Test management business as usual	Delivered <ul style="list-style-type: none"> ■ test management: VIS, SIS, Eurodac, EES, sBMS, ETIAS, ECRIS-TCN, Interoperability; ■ aligning test policies and procedures with the operational reality, regular coordination meetings, incl. several Testing Expert Group meetings for EES-VIS and ETIAS tests; ■ support and evolution for test tools, incl. cloud tools to streamline reporting and handling of test-related defects and issues, resulting in increased tool usage and centralisation of reports, expanding Member State test support tools for SIS and Eurodac.

5.4. Support to the European Commission and the Member States

As stipulated in eu-LISA's establishing Regulation, the Agency stands ready to support the Member States, the Commission and other relevant EU agencies in preparing, developing or operationalising the JHA information systems entrusted to it.

Throughout the reporting period, the Agency continued to manage and further develop the EU's large-scale IT systems under its mandate, and deliver the tasks and services laid down in relevant regulations.

5.5. Operational external support and consultancies

To ensure continuous operation and efficient management, the Agency procures external support or consultancy services in areas that require more specialised capabilities or business experience.

In 2023, the main objective was to ensure the continuous availability of outsourced engineering and operational services for IT systems. To that end, the Agency focused on defining and managing the implementation of the adopted procurement plan and procedures for transferring responsibilities and knowledge from current contractors to their successors via the handover/takeover mechanism.

Key performance indicators

Performance indicators	Performance target	Status of performance indicator
Project cost	total deviation ≤5%	On target <i>Source: project reports</i>
Project schedule	total deviation ≤5%	On target <i>Source: project reports</i>
Project scope	no deviation	On target <i>Source: project reports</i>

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Transition of engineering and operational outsourced services under Transversal Engineering and Operational Frameworks (TEF/TOF) project: SPD delivery date: 2026	Delivered <ul style="list-style-type: none"> procurement strategy and service model, adapted the first set of JHA systems (SIS, VIS, Eurodac, ECRIS RI) in scope of service transition activities; definition of operating model taking into account the transversal service procurement model based on TEF/TOF; preparation and execution of service transition to TEF/TOF for the exiting systems. Ongoing <ul style="list-style-type: none"> adapt transition roadmap to the new waves approach for the systems under development.

5.6. Operational training for staff

To maintain the highest level of professional expertise among its staff, eu-LISA regularly offers a wide range of technical training courses on the JHA information systems under its mandate. To further improve staff performance and service quality, the Agency regularly performs training needs analysis, mainly by monitoring training activities and reporting on results.

In 2023, the main objective was to support eu-LISA's core business services by developing the necessary professional competencies through in-house training courses offered to staff. During the first half of the year, the **annual training plan** was defined and relevant training sessions were delivered to staff.

Key performance indicators

Performance indicators	Target	Status
Satisfaction rate (with training/development activities)	>85%	Below target (82%) response rate too low to draw conclusions <i>Source: iLearn</i>

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Competency development operations business as usual	Delivered <ul style="list-style-type: none"> preparing the annual training plan, Learning Catalogue published on iLearn, information sessions for staff (incl. tailored for units/sectors), foundation trainings delivered: Prince2, Lean IT, ITIL, DevOps.

5.7. Advisory Groups and business relationship management

The Agency supports and coordinates the work of both internal and external stakeholders to coordinate discussions on business demands and requirements, with a view to ensuring that eu-LISA understands stakeholder needs. This includes organising and chairing the meetings of eu-LISA's various governance bodies, i.e., Advisory Groups, Programme Management Boards, and various other working groups.

Business relationship management

The Agency's business relations management function serves as the interface between eu-LISA and its stakeholders, i.e., the Member States, other EU agencies, and the industry. This activity covers governance services for all JHA systems managed by eu-LISA, as well as support and guidance for stakeholders in managing demands, conducting business analysis, and coordinating the assessment of business requirements within the Agency.¹⁰⁰

Programme Management Boards, Advisory Groups and Working Groups

Throughout the reporting period, eu-LISA continued to provide high-quality administrative and logistical support to its Advisory Groups (AG), Programme Management Boards (PMB) and various working groups. In 2023, governance bodies were set up for two new systems: e-CODEX and JITS collaboration platform.

Key performance indicators

Performance indicators	Target	Status
Meetings delivered as planned (as per annual calendar)	meetings organised as requested	On target: all meetings (106) delivered as requested <i>Source: Meeting calendar 2023</i>
Stakeholder satisfaction rate (satisfaction survey)	>70% (satisfaction with organisational and secretarial support provided)	On target: 99.3% <i>Source: stakeholder survey</i>

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Business relations management	
Business relations, requirements, and demand management business as usual	Delivered <ul style="list-style-type: none"> ■ chairing 37 Advisory Groups, incl. various working, expert and sub-groups; ■ coordinating stakeholder activities and reporting at all governance levels (AGs, PMBs, eu-LISA Management Board) and at the level of EU institutions (63 reports); ■ providing end-to-end business analysis to support decision-making; ■ addressing business needs/demands from external stakeholders, guaranteeing higher efficiency, quality and time to market, incl. Demand Management initiative Task Force; ■ establishing and maintaining efficient and productive business relationships by managing collaboration via structured approach and controlled interactions with stakeholders, ensuring that eu-LISA understands expectations and delivers required services, while stakeholders understand general constraints, incl. feasibility of changes, planning, delivery schedule, required resources (human/financial); ■ continuous service/process improvement for managing numerous demand requests.
Advisory Groups	
Administrative support to Advisory Groups business as usual	Delivered <ul style="list-style-type: none"> ■ 106 meetings: 59 AG meetings, incl. extraordinary joint meeting between EES-ETIAS AG and VIS AG to discuss the EES-VIS4EES Roadmap, and extraordinary e-CODEX AG to discuss the use-case creation process; ■ 47 PMB meetings, incl. two extraordinary meetings: EES PMB to assess status, and e-CODEX PMB to discuss progress with handover/takeover; ■ supporting the Cooperation Group for Interoperability Security Incidents, eu-LISA Working Groups for carriers and on biometrics, the informal Testing Expert Groups (TEG) for ETIAS and the joint TEG for VIS and EES, VIS and SIS Programme Management Forums, eu-LISA Working Group on Artificial Intelligence; ■ organising working group meetings (under the mandates of respective AGs) and technical workshops, as well as various ad hoc events as requested by stakeholders.
Administrative support to other meetings and missions business as usual	Delivered <ul style="list-style-type: none"> ■ providing effective administrative support to the missions of eu-LISA staff, incl. conferences, events, stakeholder briefings, regular and <i>ad hoc</i> meetings, as requested.

¹⁰⁰ The Agency established the **demand management initiative** to better assess the impact of all stakeholder requests, ensure control over scope and protect the implementation of the waves approach; incl. providing resource estimates to any new legislative proposals or initiatives, as requested by the Commission or the Member States.

6. Corporate activities

The following section provides an overview of the Agency's corporate activities that support efficient and cost-effective organisational management, while also strengthening eu-LISA's capability to address increasing demands from its stakeholders and changes in political priorities in the EU's justice and home affairs domain.

6.1. Governance

The Agency's primary objective is to ensure efficient governance and cost-effective management. To that end, eu-LISA implements a sound corporate governance system, ensuring transparent and accountable operation based on data-driven decision-making, and makes improvements based on audit recommendations. This area includes strategic and operational planning, performance monitoring and reporting, data protection, as well as day-to-day administration, general support and timely communication about eu-LISA's activities.

KEY HIGHLIGHTS

- In May, eu-LISA was awarded the 'Effective CAF user' label, making it the only EU agency with a valid CAF certificate at the time of writing this report.
- The Agency made considerable progress in closing outstanding audit recommendations, reaching an implementation rate of 87% by 31 December 2023.

6.1.1. Governance, planning, standards and IT service management (ITSM)

To meet its annual and multiannual objectives and follow the requirements and expectations of its stakeholders, the Agency regularly aligns its resources and capabilities, improves its services and processes, reinforces its governance framework, and fosters data-driven decision-making. Throughout 2023, the Agency ensured systematic compliance with the EU's regulatory framework and good governance practices by strengthening strategic management capabilities, while also ensuring performance and compliance through quality management and functioning internal controls. In 2023, all statutory documents were delivered on time. The agency introduced a **new planning tool**, Anaplan, to facilitate internal coordination of the planning effort and provide a single data source on resource allocation across the organisation.

eu-LISA continued with the implementation of the **common assessment framework (CAF)** for public sector organisations and underwent a thorough external assessment that resulted in the award of '**Effective CAF User**' label in May, making it the **only EU agency with a valid CAF certificate** at the time of writing this report. The label is not only a recognition of the work done, but also serves as the joint commitment by both management and staff to continue striving for quality and excellence. Work continues based on the **CAF improvement plan** which outlines a list of improvement actions to support further organisational development, improve performance and quality of governance at all levels. Quarterly progress reports will be discussed by the eu-LISA Quality Board to ensure ownership, strengthen commitments and provide support as necessary.

Key performance indicators

Performance indicators	Target	Status
Delivery of statutory planning and reporting documents	as per statutory requirements and deadlines	On target: statutory programming documents and reports were adopted by the Management Board without major amendments, in line with regulatory requirements and within respective deadlines <small>Source: Management Board decisions</small>

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Governance	
Corporate governance, planning, reporting and assessments business as usual	Delivered <ul style="list-style-type: none"> ■ coordinating annual/multiannual planning and reporting processes, drafting statutory planning documents (SPD 2024-2026, SPD 2025-2027, CAAR 2022, interim report 2023), incl. implementing a new planning tool (Anaplan) to improve resource allocation; ■ monitoring and coordination related to internal control framework (ICF); ■ implementing total quality management framework - Common Assessment Framework (CAF), following the CAF Improvement Plan, obtaining the CAF Effective User label; ■ assessing the effectiveness of Internal Control Framework (ICF), incl. dedicated substantial resources and efforts to monitor, address, and resolve all deficiencies identified in the annual ICF assessment exercise; ■ drafting Internal Control Strategy to ensure the delivery of legal mandate and fulfil stakeholder needs in compliance with legal requirements, applies an effective risk management system and an efficient system of internal controls; ■ maintaining the register for exceptions and non-compliance events, providing support and guidance on reporting, follow-up on corrective and preventive actions and drafting two reports (incl. the information on the follow-up activities); ■ mapping of internal and external governance structures and defining the overarching hierarchical framework of the Agency's governance documents; ■ benchmarking project continuation to support eu-LISA's external evaluation (i.e., operational model and human resource allocation, incl. corporate KPI review to improve the measurement of the Agency's impact on the implementation of relevant EU policies); ■ finalising the charters for eu-LISA sub-divisions, i.e., departments, units and sectors.
Operations department governance, planning and reporting business as usual	Delivered <ul style="list-style-type: none"> ■ contribution to annual/multiannual planning and reporting process, incl. implementing a new planning tool (Anaplan), aligning operational activities with the new wave approach; ■ coordinating eu-LISA's contribution to the Commission's new legal initiatives, incl. API, DTC, Eurodac Recast, screening regulation, Prüm, eVisa), review of existing process; ■ review of activities of the Operations Department in the 2021-2027 strategy roadmap; ■ continued with the benchmarking project focusing on the activities of the Operations Department to support the preparation of eu-LISA's external evaluation.
eu-LISA Service and Process framework business as usual	Delivered <ul style="list-style-type: none"> ■ managing product and service catalogue (PSCAT), providing an up-to-date listing of all its products and services offered to stakeholders; ■ process KPIs: regular monitoring, 2022 report adopted in July, monitoring of action plan; ■ eu-LISA Knowledge management process strengthened; the Knowledge navigator tool project finalised with the tool launched in October 2023; ■ CSI register: implementation of improved functionality, incl. CAF Improvement Plan.
Continuous improvement of eu-LISA services and processes, addressing new JHA systems requirements project: delivery date: 2023	Delivered <ul style="list-style-type: none"> ■ review and update of eu-LISA service and process models (2-year cycle) finalised in August 2023 with 69 processes (operational and corporate), incl. revised process KPIs; ■ eu-LISA Product and Service catalogue updated with 20 products and 80 services; ■ updated eu-LISA Service and Process Framework adopted by the MC in October 2023.
Enterprise architecture continuum business as usual	Delivered <ul style="list-style-type: none"> ■ continued implementing Enterprise Architecture, focusing on optimal alignment of architectural, design and development initiatives with eu-LISA's overarching goals; ■ drafted Architecture Vision, incorporating targets for interoperability and uninterrupted availability, complemented by updated eu-LISA Technology Strategy (TBC Feb 2024); ■ systematic updating of eu-LISA's Technology Catalogue; ■ ongoing definition of Enterprise Architecture process and services (EA continuum phase).

6.1.2. Stakeholder management and communication

To maintain and reinforce eu-LISA's visibility and image as a trusted and reliable partner in its areas of expertise, the Agency continues to improve its information exchange and fosters close working relations with its stakeholders in the EU's JHA domain, particularly with the Member States, EU Institutions and EU agencies (both at bilateral levels and through networks), primarily in the EU's justice and home affairs (JHA) domain. In this framework, eu-LISA provides information and expertise on relevant legislative initiatives, while also delivering its expert opinions on technical matters. To better support the management of stakeholder relations and foster close collaboration, eu-LISA updated its **Stakeholder Management Strategy for 2023–2027**, and submitted it to the Commission for consultation.

Partnerships with the Member States and EU institutions

The Agency continued to foster close and constructive partnerships with EU institutions and the Member States. Contacts, including courtesy and introductory visits, with the Agency's key stakeholders intensified after eu-LISA's **new Executive Director**, Ms Agnès Diallo, took office in mid-March 2023.

The Agency continued its close collaboration with the **European Commission** in the process of drafting secondary legislation and preparation of legislative initiatives which will impact the Agency's mandate and its future activities. The Agency's close cooperation with the Commission was evident also in bilateral meetings with the Directorate-General for Migration and Home Affairs (DG HOME), and the Directorate-General for Justice and Consumers (DG JUST).

As for the **Council of the European Union**, the Agency continued contributing to strategic discussions held by relevant working parties and at the JHA council meetings. This included close working relations with the Member States holding the rotating Presidency of the Council of the EU. The Agency also continued to closely follow the activities of various **European Parliament committees**. Most importantly, on 28 June, eu-LISA's Executive Director participated in the meeting of the Civil Liberties, Justice and Home Affairs (LIBE) committee to address the implementation of the new interoperability architecture for the EU's JHA domain.

Partnerships with other EU Agencies

In 2023, eu-LISA continued its collaboration with other **EU Agencies**, both at bilateral level and through networks, such as the **JHA Agencies Network** (JHAAN) and the **EU Agencies Network** (EUAN).

In the framework of **JHAAN**, eu-LISA collaborated with CEPOL and EUAA as part of the **Presidency Trio** by shaping its priorities and elaborating joint initiatives. In addition, eu-LISA provided active support to the JHAAN priorities in 2023 and contributed its expertise to the inter-agency cybersecurity exercises. Most importantly, the JHAAN community continued its strong engagement in assisting EU Member States in the context of Russia's war of aggression against Ukraine, including a joint paper on EU solidarity with Ukraine.¹⁰¹

As for its contribution to **EUAN**, eu-LISA attended all regular high-level meetings and took part in a wide range of working groups to share its expertise and discuss possible collaboration to increase efficiency and synergies among EU Agencies. Moreover, eu-LISA regularly contributed to requests for information and best practices from other EU agencies, coordinated by the EUAN Shared Support Office.

Regarding **bilateral inter-agency cooperation**, eu-LISA continued to share its expertise with the **EU Agency for Asylum** (EUAA) and support the work of the EUAA-led Dublin Network, mainly through the process of renewing DubliNet security certificates, and providing support in other technical matters.

Close collaboration continued also with **Frontex** and **Europol**, focusing on the implementation of new JHA systems: EES and ETIAS and the interoperability architecture. With Europol, cooperation continued also in the context of SIS and the European Multidisciplinary Platform Against Criminal Threats (**EMPACT**).

As regards cooperation with other JHA agencies, eu-LISA continued its collaboration with **Eurojust**, mainly on ECRIS-TCN, e-CODEX and in preparation for the Joint Investigation Teams (JITs) collaboration platform. With the EU Agency for Law Enforcement Training (**CEPOL**), eu-LISA contributed to its training courses on SIRENE and artificial intelligence. With the EU Agency for Cybersecurity (**ENISA**) cooperation continued through ENISA's support to eu-LISA's security exercises (service-level agreement renewed in June).

As per good practice, the EU Agency for Fundamental Rights (**FRA**) and eu-LISA continued their consultation on relevant reports. eu-LISA also cooperates with the European Institute for Gender Equality (**EIGE**) on cybersecurity, resilience, and business continuity matters.

¹⁰¹ [JHA agencies contribution to EU solidarity with Ukraine](#), JHAAN joint paper, 31 March 2023.

External and internal communication

The Agency focused its external communication on providing transparent, objective, reliable and clear information to increase its overall visibility and public awareness about its activities. Utilising online and offline media formats and information platforms, eu-LISA promoted its role and achievements in managing and **advocating for IT as a key enabler for the implementation of the EU's JHA policies**. Additional efforts were put into employer branding to attract new talent, and also to increase public awareness about how the Agency serves the interests of EU citizens. Throughout 2023, eu-LISA contributed to joint JHA communication campaigns by highlighting shared positions and expanding its outreach.

In February, eu-LISA's visibility efforts were recognised by the City of Tallinn and the Estonian Convention Bureau with the **Conference Award Prize**, acknowledging the Agency's flagship events celebrating its 10th anniversary in 2022.

Key performance indicators

Performance indicators	Target	Status
eu-LISA external communication impact	website: maintain baseline social media: +200 followers per platform/year engagement events: <ul style="list-style-type: none"> ▪ satisfaction >90% ▪ participation at events: >95% 	Partially on target: LinkedIn: +4013 Twitter: +404 Facebook: +403 YouTube: +89. YouTube lagging behind due to content published in formats that are tailored to Twitter/LinkedIn/ Facebook. <i>Source: web analytics</i> Other: annual conference not held in 2023 Other: annual conference not held in 2023
eu-LISA internal communication impact	staff survey participation rate: >51% satisfaction with internal communication channels and actions: >70%	On target: 58% <i>Source: annual satisfaction survey</i> On target: 89% <i>Source: annual satisfaction survey</i>
Implementation of annual internal and external communication action plans	as per objectives, milestones, and deadlines	On target <i>Source: bi-annual implementation report</i>

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Stakeholder management	
Stakeholder management and policy coordination business as usual	Delivered <ul style="list-style-type: none"> ▪ monitoring the Official Journal, institutional communications and studies (incl. upcoming EU legislation/initiatives that may impact eu-LISA's mandate and activities) and conducting internal analysis (policy, legislative, impact analysis) to inform eu-LISA's management and stakeholders (90 relevant policy materials were shared internally by Liaison Office); ▪ representing eu-LISA in committees and expert groups under the Commission, Parliament and Council, and other relevant stakeholders, reporting on meetings and follow-up actions; ▪ coordinating with EU institutions, agencies, Member States, academia, think-tanks, industry and other relevant stakeholders on matters of mutual interest; ▪ working relations with the Member States holding the rotating Presidency of the Council of the EU: Sweden and Spain, incl. meetings, visits and thematic workshops focusing on their programmes/priorities, exploring avenues for collaboration; ▪ coordination and contribution to eu-LISA impact analysis, positions or opinions on legislative or policy developments; ▪ hosted management and expert level visits at Tallinn HQ, in Strasbourg, and the Liaison Office in Brussels, e.g., Commission's DG HOME, the Director of the NATO Cooperative Cyber Defence Centre of Excellence, and OSCE judicial and law enforcement authorities.
Administrative support to the Management Board business as usual	Delivered <ul style="list-style-type: none"> ▪ providing administrative support, ▪ organising meetings: 1 Management Board, 2 ACFC meetings (incl. 1 extraordinary).
Institutional relations management and policy coordination business as usual	Delivered <ul style="list-style-type: none"> ▪ active contribution to the JHAAN, incl. as part of Presidency Trio; preparations for the upcoming eu-LISA JHAAN Presidency in 2024; ▪ contribution to EUAN: high-level workshops on EUAN Future Governance; regular high-level meetings (in February and October 2023) and EUAN working groups; ▪ revised Working Arrangement with Frontex submitted to the Commission for consultation; ▪ Cooperation Plan w EUAN 2023-2025 finalised; FRA and Europol under preparation; ▪ Stakeholder Management Strategy for 2023-2027 submitted to the Commission; ▪ liaison with EU institutions and Agencies, Member States, academics, think-tanks, industry, and other relevant stakeholders; ▪ input to documents and analysis prepared by EU institutions and agencies, incl. presentations at relevant fora (incl. Working Parties, Committees, Expert Groups).

Project/non-project task	Key achievements during the reporting period
Communication	
Internal communication business as usual	Delivered <ul style="list-style-type: none"> ■ facilitating internal communication, incl. EU-wide awareness campaigns, 20 info sessions, and 45 newsletters; ■ organising staff assemblies and special internal briefings;¹⁰² ■ internal promotion of EU-wide social campaigns (e.g., Europe Day, Digital Clean-up Day, Diversity and Inclusion Month, Cybersecurity Month etc.); ■ communication and hosting plans for the JHAAN Presidency in 2024; ■ close to 250 external information requests and enquiries.
External communication business as usual	Delivered <ul style="list-style-type: none"> ■ strengthen host-country relations and broaden online presence (web and social media); ■ main visibility events: Industry Roundtable in November (boosting online following); ■ contribution to the Commission's communication campaigns for EES and ETIAS;¹⁰³ ■ corporate brand messaging, e.g., new video 'We are eu-LISA'; ■ producing and disseminating coverage on eu-LISA's contributions at events; ■ communication priorities and plans for the JHAAN Presidency in 2024; ■ new website development ongoing.
Corporate administrative support business as usual	Delivered <ul style="list-style-type: none"> ■ providing support to the administrative management and coordination of various meetings.

6.1.3. Compliance (incl. data protection, internal audit and accounting)

The Agency is committed to ensuring the highest compliance with the applicable principles of accounting, internal auditing and data protection to enforce sound, transparent and accountable governance, while also stepping up its efforts to implement audit recommendations.

Data protection

The Agency continued to ensure the highest level of data protection by regularly monitoring compliance with all applicable data protection and internal control requirements in accordance with EU data protection law,¹⁰⁴ incl. specific provisions for each JHA system entrusted to eu-LISA. To that end, eu-LISA maintained **two data processing registers**: one for data processing operations under its responsibility, and another for data processing activities carried out on behalf of a controller.

In March, the eu-LISA Management Board was presented with the **DPO Annual Work Report 2022**, which gives an overview of the Agency's data protection activities and compliance.¹⁰⁵

Throughout 2023, eu-LISA ensured the smooth coordination of the **EDPS inspection of SIS**, carried out in December, while also monitoring outstanding recommendations and supporting their implementation. By the end of 2023, all previous EDPS recommendations had been implemented, with all other recommendations remained either on track or expected to be completed within the deadline provided by EDPS.

The Agency's focus remained on its main data protection challenges, i.e., the use of biometric matching technologies and risk mitigation measures, working towards effective and compliant solutions to ensure respect for privacy and personal data. In addition, eu-LISA revised its data protection impact assessment methodology.

Internal audit capability

Through its **Internal Audit Capability (IAC)**, eu-LISA enhances its governance framework, improves the internal controls system, and ensures an adequate understanding of residual risks by the stakeholders.

Based on the Internal Audit Plan for 2023, eu-LISA's IAC reviewed the management of ABAC access rights, delivered required reports on the monitoring and follow-up of audit recommendations, and coordinated activities related to the European Court of Auditors (ECA) audit of the 2022 Annual Accounts.

¹⁰² Online sessions in which eu-LISA units present their team and duties to the rest of the Agency.

¹⁰³ The Agency acted as multiplier for DG HOME's social media activity by sharing and re-posting ETIAS specific content, e.g., video series '[ETIAS Myths](#)', contributing to ETIAS Quarterly Newsletter, regular promotion of the official EES and ETIAS websites.

¹⁰⁴ [Regulation \(EU\) 2018/1725](#) on the protection of natural persons with regard to the **processing of personal data by the Union** institutions, bodies, offices and agencies and on the free movement of such data.

¹⁰⁵ [eu-LISA DPO Annual Work Report 2022](#), March 2023.

Compared to the audit plan, the IAC fell behind with the review of the ETIAS project: solution development (progress 50%), and with the IAC annual audit risk assessment (progress 10%). The delays are mainly due to extensive effort needed for the coordination of ECA’s audit of annual accounts, and the additional measures put in place by the management to ensure swift implementation of outstanding audit recommendations. The Head of IAC is reviewing the audit plan to identify ways to advance with delayed topics.

In February and May, the Head of IAC reported to the Management Board’s Audit, Compliance and Finance Committee (ACFC) on audit-related topics. The IAC annual activity report for 2022 was adopted by the Management Board in March, and in June, the Board took note of IAC’s report on the status of implementing overdue audit recommendations.

Accounting

The Agency ensured the proper maintenance of a sound accounting control system and proper presentation of its financial position. eu-LISA’s Annual Accounts for 2022 were adopted by the Management Board in June.

Benchmarking exercise

The Agency continued with the independent benchmarking exercise, launched in 2023, to prepare for its forthcoming evaluation by the European Commission as stipulated in Article 39 of the establishing Regulation. An external contractor assessed eu-LISA’s overall operational performance and the adequacy of the allocation and use of human resources, together with its contribution to the objectives of JHA policies. To provide comprehensive insights into eu-LISA’s possible development trajectory and future evolution, the Agency commissioned the contractor to provide more strategic recommendations on improvements with a medium-term perspective. Due to the extended scope of the exercise, the final report was completed in January 2024.

Key performance indicators

Performance indicators	Target	Status
Accounting: timely delivery of provisional, consolidated, and final accounts to the budgetary authority and ECA	provisional accounts: 1 March final accounts: 1 July	On target: provisional accounts delivered by 1 March, final accounts by 30 June.
Internal audit: number and age of outstanding recommendations	less than six months: ≤4 between six months and one year: ≤2 more than one year: ≤1	<i>Source: Head of Internal Audit Capability Activity Report for 2023</i> On target: 0 On target: 2 Below target: 3 eu-LISA has significantly progressed towards the target, with 2023 recording the best improvement in recent years
% of audit recommendations implemented within stipulated deadlines	critical: 100% very important: ≥90% important: ≥80%	On target: 100% (3 out of 3) Below target: 80% (16 out of 20) eu-LISA has significantly progressed towards the target, with 2023 recording the best improvement in recent years On target: 93% (14 out of 15)
% of processes with ensured output meeting targets within tolerances	at least 80% of reviewed operational processes meet targets within tolerance	Other: IAC cannot measure this indicator. new indicators will be introduced in 2024 ¹⁰⁶
% of processes undergoing independent review	at least 30% of Agency’s operational processes annually reviewed	Other: See above.
Data protection: number of fulfilled requests for DPO advice received from business owners	80% of requests are submitted at an early stage of the project 60% of requests are fulfilled 60% of the received requests fulfilled within the agreed time	On target: 80% of requests are submitted at an early stage of the project, 60% of requests are fulfilled, 60% of requests fulfilled in due time.

¹⁰⁶ **RACER criteria:** relevant, accepted, credible, easy to monitor and robust.

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Data protection business as usual	Delivered <ul style="list-style-type: none"> ■ monitoring outstanding recommendations and supporting their implementation, incl. reporting implementation status, and formal adoption of the comments on the 2022 EDPS audit draft report; ■ supporting the audits: coordinating 2023 EDPS audit on SIS (5-6 December 2023), incl. advising on the ongoing prior consultation with EDPS on EES, sBMS and Accuracy Measurements; ■ fulfilled EDPS request for information on C.SIS and critical patching; ■ updating data protection registers: data breaches, data controller/processor; ■ assessing data breaches, incl. necessary reports; ■ supported SIS entry into operation in March 2023 (data protection by design and by default); ■ advising data controllers/processors, incl. internal controllers impacted by international transfers; ■ revised methodology carrying out a DPIA, incl. specific training and practical workshops; ■ fulfilled 568 change requests related to JHA systems and eu-LISA's functioning and administration; ■ network meetings (EDPS-DPO, JHA DPOs) to discuss areas of interest, e.g., international transfers, recent case law on privacy and data protection, an introduction to NextCloud; ■ Supervision Coordination Group (Eurodac, VIS, SIS), Coordinated Supervision Committee (SIS); ■ data protection awareness, incl. staff trainings, DP Quiz 2023, 23 news articles, intranet updates.
Accounting business as usual	Delivered <ul style="list-style-type: none"> ■ maintained an accounting quality control system, ■ delivering the Agency's 2023 provisional and 2022 Final Annual Accounts, ■ providing internal guidance on asset management, ■ collaborating with external auditors and the ECA.
Internal auditing business as usual	Delivered <ul style="list-style-type: none"> ■ providing accurate information on audit conclusions and recommendations, incl. regular, accurate and timely information on the status of implementation of audit recommendations; ■ monitoring action plans for implementing audit recommendations; ■ assessing internal control processes and business process controls.
Evaluation of the Agency (Art 39 of establishing Regulation) business as usual	Ongoing – delayed <ul style="list-style-type: none"> ■ benchmarking exercise: scope expanded with the approval of the Commission; ■ deep-dive analysis to be finalised during the second half of 2023.

6.1.4. Enterprise programme and project management (EPMO)

As per establishing Regulation, eu-LISA must have an adequate project management structure and tools to efficiently manage all its projects, while also continuing to improve its project management capabilities. To ensure the achievement of objectives and cost-efficient resource management, eu-LISA continues to promote best practices, focusing on process standardisation and project/portfolio management methodologies.

In 2023, eu-LISA began to assess how to make its project management processes more agile and explored the **Scaled Agile Framework (SAFe)** in order to support the new way of working as per the '3Rs' resolution strategy. The transition from waterfall project management and delivery methods to new agile ways of working have brought the focus on common priorities by enabling transversality and faster decision-making.

Key performance indicators

Performance indicators	Target	Status
Renewing the Capability Maturity Model Integration (CMMI) evaluation	CMMI evaluation renewed	Other : CMMI evaluation was replaced by Agile readiness assessment for Wave 1 projects.
Assessing completion and progress of projects against a (re)baseline of defined quality/cost/time parameters and taking into account the project tolerances	<10%	On target : 9.83% 4 projects (incl. 3 internal) completed in 2023
Assessing the compliance of completed projects against eu-LISA project management methodology during project lifecycle	small projects: >75% medium projects: >80% large projects: >85%	Not applicable : no small projects closed in 2023 Below target : 76% Below target : 75%

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Programme and project management capability, sourcing strategy and corporate risk management business as usual	Delivered <ul style="list-style-type: none">■ coordination of inputs for monthly PMB reports and bi-annual progress reports to the European Parliament and the Council,■ monthly meetings of Corporate Steering Committee (CSC) and EXTRA Contracts Management Committee,■ upgrading the tool for managing external sourcing requests,■ developing and maintaining PPM methodology, incl. annual compliance check on the adequate application of the PPM methodology,■ improving the use of PPM tools (Planview Portfolios and ProjectPlace) and the quality of data collected through these tools,■ set up and sustaining delivery teams and project governance in line with the renewed way of working,■ corporate risk management is monitored throughout the whole year and status is presented to the Management Committee on a regular basis, most recently in July,■ ex-ante evaluation: annual ex-ante opportunity assessment on projects planned for 2025.
Official appraisal of project management practice based on the CMMI model project: SPD delivery date: 2023	Other <ul style="list-style-type: none">■ CMMI evaluation is being replaced by an internal Agile readiness assessment.

6.2. Corporate support

The Agency remains committed to growing as an efficient and agile organisation in order to ensure operational excellence, deliver its mission, and annual objectives in full compliance with the EU regulatory framework. The support functions that enable high-level performance include human and financial resources management, legal services, and effective internal support to stakeholders.

KEY HIGHLIGHTS

- Reached an outstanding level of budget execution for commitments and payments, close to 100%.
- The Agency achieved a notable increase in the occupancy rate.

6.2.1. Corporate security and business continuity

The Agency continues to maintain and improve the high level of physical security in and around its facilities in response to changing business needs. This includes the monitoring and improvement of its **business continuity management** strategy (BCMS) that comprises thoroughly tested policies, procedures and management arrangements for responding to, investigating and recovering from security incidents or other disruptions to operations. During the reporting period, all business continuity roles underwent training to ensure they have the necessary knowledge and expertise on organisational resilience in case of disruptive incidents.

In 2023, the main objectives are to **ensure the security and business continuity** of eu-LISA's sites, assets and staff, as well as all related horizontal elements (i.e., strategies and policies are in compliance with relevant regulations), and to continue the improvement of business continuity and security processes based on recommendations from exercises, inspections and audits.

In terms of **protective and physical security**, eu-LISA reinforced its security and safety posture across all premises and staff operating the systems on a 24/7 basis. To ensure proper governance of physical security, the Agency adopted an updated version of the access policy for physical access in May, covering any person or vehicle requiring access to eu-LISA sites. The Agency also carried out specialised training for its staff and first respondents to increase preparedness for emergency situations.

Key performance indicators

Performance indicators	Target	Status
No of emergency drills/security and business continuity exercises per year	2 exercises per year	On target: one business continuity exercise and two fire drills (one in Tallinn and one in Strasbourg) <i>Source: Security assurance dashboard</i>
Business continuity controls cover all eu-LISA business areas	BCMS covers 100% of eu-LISA business areas	On target: business continuity plans in place, adopted and updated for all business areas. <i>Source: Security assurance dashboard</i>
Business continuity plans are tested and their effectiveness confirmed	at least one corporate resilience exercise is run	On target <i>Source: Security assurance dashboard</i>
% of recommendations implemented as per action plans	85%	On target: >85% recommendations implemented from past exercises and drills. <i>Source: Implementation reports</i>

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Implementation of security and business continuity recommendations business as usual	Delivered <ul style="list-style-type: none"> ■ adaptive improvements to security monitoring infrastructure, ■ focusing on critical cybersecurity management activities in response to increased threat landscape. All recommendations from past audits and inspections have been closed.
Security policy and continuity management business as usual	Delivered <ul style="list-style-type: none"> ■ annual staff trainings, incl. security, health and safety; ■ organising stakeholder outreach events.
Business continuity management business as usual	Delivered <ul style="list-style-type: none"> ■ maintaining eu-LISA's corporate business continuity management system (BCMS), incl. implementation of improvement plan, ■ testing business continuity plans for effectiveness of established controls, incl. annual business continuity exercise.
Protective security business as usual	Delivered <ul style="list-style-type: none"> ■ managing security systems (incl. clearances), and ensuring protective security at all eu-LISA premises on a 24/7 basis, incl. security controls for the temporary premises; ■ providing security requirements for the extension of workplaces and data centre spaces with modular solutions; ■ security landscape monitoring and alignment of relevant security measures to the ongoing evolution of the geopolitical situation; ■ implementing the security measures for the set-up of an EUCI Registry and joint inspection by the European Commission, Council of the EU and EEAS; ■ security measures and requirements in light of additional data centre spaces in Strasbourg (MDC1, 2, ASPIRE); ■ adopted an updated version of the policy on physical access.

6.2.2. Human resources management

The Agency continued to ensure constant improvement of its professional development capabilities, focusing on talent acquisition and onboarding, targeted professional development and retaining diverse staff with requisite skills and experience. The Agency continuously improved its administrative efficiency and transitioned to competency-based HR management through the digitalisation of its processes.

Key performance indicators

Performance indicators	Target	Status
% of administrative resources and % of operational resources compared to all human resources (staff and SNEs)	administrative: 20% operational: 70%	Partially on target: 16.5% <i>Source: HR database, SYSPER reports</i> Partially on target: 74.1% <i>Source: HR database, SYSPER reports</i>
Absenteeism rate	average number of sick leave days per staff: <15 days per staff % of staff on long sick leave: < 10% % of staff who did not use sick leave: > 15%	On target: 9.7 days <i>Source: HR database, SYSPER reports</i> On target: 5.3% <i>Source: HR database, SYSPER reports</i> On target: 42.7% <i>Source: HR database, SYSPER reports</i>

Performance indicators	Target	Status
Annual staff turnover (%)	≤5%	On target: 4.09% Source: HR database, SYSPER reports
Unsatisfactory staff appraisals (%)	between 1% and 5%	On target: 1.8 Source: HR database, SYSPER reports
Staff engagement level	≥6.3	On target: 7.4
Annual occupancy rate (%)	>94%	On target: 94.2% The number includes job offers issued; without job offers issued occupancy rate is 85.7% Source: HR database, SYSPER reports

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Human resources administration and planning business as usual	Delivered <ul style="list-style-type: none"> managing routine staff operations and processes from selection and onboarding to the termination of contracts (incl. appraisal, contract renewal, entitlements, annual leave, etc.), upgrading HR processes (incl. digitalisation, SYSPER optional modules, iLearn), improving recruitment process, staff planning, performance management and training offer, launched regular employee experience survey and developed an action plan to address the areas of improvement.
Transition to competency-based human resources management business as usual	Delivered <ul style="list-style-type: none"> implementing competency-based approach to HR management; revising Competency Framework to provide comprehensive guidelines, tools and procedures, organising in-house trainings, employee well-being projects, deploying new e-onboarding programme, continued internal mobility programme to capitalise on the competencies of existing staff members and foster professional growth.
Talent management business as usual	Delivered <ul style="list-style-type: none"> recruiting new staff, continued efforts to attract a diverse pool of candidates, e.g., CloudFest 2023 in Germany, employer branding activities through dedicated campaigns and using social media as a sourcing tool for talent outreach; revamping the internship programme; raising awareness about eu-LISA's employee value proposition and enhancing visibility of career opportunities, reaching new audiences; enhancing leadership development, performance management, talent acquisition, employee relations, learning and development, people analytics, incl. implementing new rewards and recognition initiatives, such as the Talent Spotlight Award; implementing activities related to the reinforcement of organisational culture and values, incl. EU Agencies Network (EUAN) Charter on Diversity and Inclusion adopted in May, together with an action plan;¹⁰⁷ implementation and use of MS Power BI for online access to KPIs and other HR statistics for management.

6.2.3. Budget, finance and procurement management

The Agency continued to strength and fine-tune its internal financial processes and procurement procedures, incl. enhancing its reporting and analytical capabilities to support strategic decision-making and ensure the transparent, efficient and effective management of its financial resources in compliance with the relevant regulatory instruments and obligations and general governance requirements.

Key performance indicators

Performance indicators	Target	Status
Acquisition management	>60% procurement projects on schedule	On target: 80% Source: procurement report
Efficiency of the procurement process	<25%	On target: 16.7% Source: procurement report
Cancellation rate of payment appropriations	<5%	Partially on target: 5.8% although still slightly above target, reduction has been significant Source: ABAC datawarehouse

¹⁰⁷ [EUAN Charter on Diversity and Inclusion](#), EUAN working group on Diversity and Inclusion, March 2023.

Rate of budgetary commitments implementation	95% to 99%	On target: 99.9% <i>Source: ABAC datawarehouse</i>
Rate of payment implementation	>95%	On target: 99.9% <i>Source: ABAC datawarehouse</i>
Ratio of payments completed within the statutory deadlines	90% to 100%	On target: 96.4% <i>Source: ABAC datawarehouse</i>

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Budgetary, asset and financial management <i>business as usual</i>	Delivered <ul style="list-style-type: none"> duly managed budget implementation, service provision in accordance with defined standards; supported strategic decision-making and provided necessary financial reports; continuously improved analytical capabilities, e.g., budget forecasting and planning, ensuring high-quality monitoring budget execution of financial operations; improved internal financial processes and procedures, i.e., setting requirements for advanced multi-annual and annual budgeting for integrated planning to improve activity-based budgeting.
Procurement and acquisition management <i>business as usual</i>	Delivered <ul style="list-style-type: none"> provided procurement and acquisition services in compliance with statutory obligations and within the planned budgetary framework.
Internal financial controls, and monitoring of audit recommendations <i>business as usual</i>	Delivered <ul style="list-style-type: none"> maintained checklists and workflows for financial transactions in line with eu-LISA Financial Rules, revision of controls and procedures, taking into consideration ECA findings.

6.2.4. Legal services

The Agency's legal services ensure that eu-LISA operates in compliance with the applicable regulatory framework. This is done by providing timely legal advice, opinions and best practice recommendations and, if needed, representing the Agency in EU and national courts. In 2023, eu-LISA observed the highest levels of good administrative conduct, complied with all legal requirements, and remained committed to guaranteeing transparency in its activities, processes and decision-making, including public access to its documents.

Key performance indicators

Performance indicators	Target	Status
Legal advice, opinion and representation	legal services provided within required deadlines	On target

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Legal services <i>business as usual</i>	Delivered <ul style="list-style-type: none"> 351 requests for internal legal advice, that did not proceed to pre-litigation or litigation phase; 8 pre-litigation cases dealt within the legal deadlines (1 advanced to litigation), litigation cases: 3 cases before the EU court (as defendant) closed in 2023, 2 cases pending, 1 as intervener; 9 complaints under Art 90(2) of Staff regulations, 2 admin. inquiries, 1 inquiry closed in 2023; public access to documents: specialised training session and an awareness session, reply within the established legal deadline (23 initial applications and 13 consultations). One of the initial applications advanced to confirmatory application, one confirmatory application done; postponed: specialised training and awareness session on PAD (insufficient staff).

6.2.5. Corporate support services (facility management and corporate IT services)

The Agency's corporate support services focus on developing an optimised and flexible working environment in all locations with a secure, efficient and functional infrastructure that is fully aligned with eu-LISA's business needs and commitment towards becoming an environmentally sustainable organisation.

Capacity increase programme

Following the expansion of eu-LISA's mandate in 2018, the Agency needed to expand the capacity of its technical site in Strasbourg to accommodate the operational needs of new systems, primarily in terms of increasing data centre capacity and providing additional office space for staff. The project for the **second extension of the Strasbourg site** was launched in February 2020, and it is scheduled for delivery in 2028.

In June 2021, two more projects were added: **modular data centre** (MDC) and also the **power and cooling upgrade** to address urgent business needs ahead of completing the second extension.

To ensure effective project management and implementation, these three interrelated infrastructure projects are governed under the overarching '**Capacity Increase Programme**':

- **second extension of the operational site in Strasbourg.** The project focuses on building new office spaces at the current premises. However, due to budget constraints, the project is currently postponed to the next multi-annual financial framework period.
- **modular data centre 2.** The project foresees installing a containerised modular data centre, a flexible and scalable solution that does not require any construction activities. In 2023, the Agency conducted a sourcing survey of market options, and selected the most suitable provider. The project is in the planning phase, with internal stakeholders working to define the final design, security requirements and the required civil and electrical works, with a view to delivery of the first set of modules in the second half of 2024.
- **power and cooling infrastructure upgrade.** The goal is to cover the short- and long-term power and cooling needs of the Strasbourg operational site. The outcomes of the pre-feasibility study for optimising cooling capacity were delivered in June. Two scenarios were selected, with the first enabling more efficient use of the current cooling infrastructure in the short term, while the second is a mid-term solution based on a geothermic approach to reduce the carbon footprint. The implementation of these two scenarios will reduce overall power usage effectiveness (PUE) to comply with the **EU's instruments for improving the energy efficiency of data centres**.¹⁰⁸

Corporate services

Corporate services streamline the Agency's internal IT services and information management to ensure organisational efficiency and agility, while also facilitating the achievement of business objectives with available resources, processes and capabilities. eu-LISA maintains all its sites and facilities to ensure a secure, efficient and functional **building infrastructure**.

The Agency is taking steps to **reduce its environmental impact**. In 2023, eu-LISA started implementing its environmental policy, adopted in 2022, and is preparing to apply for the EU Eco-Management and Audit Scheme (**EMAS**) certification, targeted for 2024.

Key performance indicators

Performance indicators	Performance target	Status of performance indicator
Availability of corporate IT services	>90% (uptime of applications)	On target
Corporate end-user/ employee satisfaction with IT services	>90%	On target
Second extension of eu-LISA operational premises in Strasbourg	cost: total deviation ≤10% schedule: total deviation ≤10% scope: no deviation	Other: project postponed due to budget constraints.
Environmental indicator: carbon footprint	3491 teq CO2 for 2022 3506 teq CO2 for 2023	Other: 2023 will be used as baseline, since prior results are not representative due to COVID-19 restrictions. GHG emissions have been calculated using a new tool, taking into account the 3 scopes of emissions as per GIME recommendations and GHG protocol.

Progress per tasks and projects

Project/non-project task	Key achievements during the reporting period
Capacity increase programme	
Strasbourg data centre –power and cooling capacity increase project project: SPD delivery date: 2025	<p>Ongoing</p> <ul style="list-style-type: none"> ■ implementing short-term actions for power and cooling upgrade, ■ modular data centre 2 (MDC2) project in planning phase; design of dedicated containerised energy premises approved; ■ key achievement: completion of MDC2 sourcing survey and cooling capacity optimisation study, and prefeasibility study for MDC2 civil and electrical works.

¹⁰⁸ For more, please visit the Commission's dedicated page on [green cloud and green data centres](#). For more detailed information, please refer to [ecodesign requirements for servers and data storage products](#), [the European Code of Conduct for Energy Efficiency in Data Centres](#), and [green public procurement criteria for data centres, server rooms and cloud services](#).

Project/non-project task	Key achievements during the reporting period
Second extension of eu-LISA operational premises in Strasbourg project: SPD delivery date: 2028	Postponed <ul style="list-style-type: none"> ■ due to budget constraints, the project is postponed to the next multi-annual financial framework period; in the meantime, eu-LISA will focus on installing the modular data centre, as well as upgrading the supporting power and cooling infrastructure.
General support	
Horizontal corporate support services (missions, facilities, logistics, and office supplies) business as usual	Delivered <ul style="list-style-type: none"> ■ delivering facility services to support operations, incl. continuous service improvement by monitoring tickets and response time to closure, ■ improving building infrastructure, core business activities and employee well-being.
Health and safety management business as usual	Delivered <ul style="list-style-type: none"> ■ implementing roadmap for the occupational health and safety (OHS) management system, ■ adopted OHS Policy to promote and maintain a safe and healthy workplace environment, ■ evaluating risks, identifying possible hazards, and training, as necessary.
Smart space management project: SPD delivery date: 2024	Ongoing <ul style="list-style-type: none"> ■ improving productivity and efficient use of office space by implementing activity-based working (ABW) and hot-desking policy to generate efficiency gains and cost savings, incl. introducing a new software solution to ensure more efficient office space management, i.e., desk management, meeting rooms, space allocation, workplace analytics, etc; ■ key achievement: study finalised to explore options for a suitable activity-based working model; recommendations will be implemented as of next year.
Environmental services management business as usual	Delivered <ul style="list-style-type: none"> ■ implementing EMAS certification roadmap, ■ energy sobriety plan implemented and maintained, incl. green electricity, ■ environmental analysis (direct/indirect impacts of eu-LISA activities on the environment), ■ launch of the project with the Green Team, ■ GHG emissions calculation according to GHG protocol.
Enterprise content management project: SPD delivery date: 2025	Ongoing <ul style="list-style-type: none"> ■ ongoing project implementation: document management system (DMS), and a new modern website incl. public document registry, ■ preparations intranet / extranet project (to be launched in 2024), ■ DMS project implementation ongoing (delivery by end of 2024).
Administrative support to the Executive Director's Office business as usual	Delivered <ul style="list-style-type: none"> ■ providing administrative and executive support, incl. correspondence, calendar management, travel arrangements, event planning, and reporting.
Corporate ICT	
Administration, maintenance and support for corporate ICT infrastructure and applications business as usual	Delivered <ul style="list-style-type: none"> ■ providing corrective, preventive, evolutive, adaptive maintenance and support for corporate ICT infrastructure and applications, incl. development of new tools for staff; ■ procurement of ICT software, hardware, equipment, services, licenses (incl. timely extension), computer network/mobile telephony connection contracts signed/amended; ■ providing end-user support, incl. launch of new corporate ticketing portal, and implementing new approach to providing corporate ICT services by focusing on performance indicators to monitor service quality; ■ new solution for ICT remote access service implemented, incl. for mobile devices; ■ SERENA (Secure Network Access) project: new connectivity for corporate network infrastructure and JHA systems to provide internet-facing services and access to SERENA; ■ network and security modernisation project.
Cloud migration and cloud-based virtual desktop infrastructure project: SPD delivery date: 2026	Ongoing <ul style="list-style-type: none"> ■ ongoing migration to Cloud project to support the digitalisation of corporate services, ■ Cloud ICT ID solution, communication and collaboration solution for teams, cloud ICT backup solution and cloud ICT alternative solution for teams, ■ key achievement: implementation of cloud components incl. Azure tenants in the scope of Document Management System.
Information Technology Infrastructure Library (ITIL) project: SPD delivery date: 2025	Ongoing <ul style="list-style-type: none"> ■ implementing ITIL practices for service and asset management, ■ analysis of 'as-is' process and definition of 'to-be' process, and subsequent process mapping (iterative approach): definition of interfaces, controls and detailed design; ■ eu-LISA Ticketing Portal: analysis and processes definition; ■ assessment of a new ITSM application.



MANAGEMENT

The main elements of eu-LISA's management, such as budget and human resources.



Management

7.1. Management Board

The Agency continued its close, constructive and transparent collaboration with the eu-LISA Management Board. Alongside its statutory functions, the Board was regularly updated on all significant risks and issues identified, incl. implemented mitigation measures, status of systems in operation, progress with the development of new systems, updates on the staffing situation, and the capacity increase programme.

In January 2023, the Board concluded that the entry into operation of the Entry/Exit System in May 2023 was no longer feasible. Most importantly, the Board repeatedly confirmed its strong commitment to implementing the interoperability architecture as the highest priority and received regular updates on the progress made with revising the timeline for its implementation.

In 2023, the Agency put in place a new **3Rs strategy (Remobilise, Resolve, Renew)** to unblock the situation, allowing the revision and update of the interoperability roadmap, with the gradual implementation in four waves between 2024 and 2027. The new interoperability roadmap was endorsed by the Board and approved by the JHA Council on 19 October 2023. As at the date of adoption of this report, eu-LISA is on track to deliver the interoperability architecture in compliance with the new roadmap.



During the reporting period, the Management Board adopted several significant decisions ensuring the Agency's business continuity:

- appointment of the new Executive Director;
- appointment of the new Accounting Officer;
- adoption of statutory planning and reporting documents: Single Programming Document 2024–2026 and the Financial Statement of Revenue and Expenditures for the Financial Year 2024, Consolidated Annual Activity Report 2022, IAC annual report and Annual Accounts for 2022, amendment to the Internal Audit Plan for 2023, and Internal Audit Plan for 2024;
- endorsement of the Agency's updated EES implementation strategy, based on the 3Rs Resolution Strategy: remobilising service providers, resolving technical difficulties and renewing ways of working;
- endorsement of the revised timeline for the Interoperability Roadmap; and
- adoption of revised security and business continuity plans for Eurodac.

Other important Management Board decisions were adopted via written procedures, incl. Interim Report 2023, progress reports, non-automatic carry-over of commitment appropriations from financial year 2022 to 2023, Eurodac list of authorities, Eurodac Annual Report 2021, eu-LISA Communication and Dissemination Plan 2024, model decision on working time and hybrid working, revised Rules of Procedure for EES, ETIAS and Interoperability PMB, eu-LISA Rules on Conflict of Interest, revised mandate of the ACFC.

The Board's Audit, Compliance, and Finance Committee (ACFC) monitored the Agency's risk management and internal controls. The Board and ACFC were given regular updates on the status of budgetary negotiations and financial management, and also on progress with implementing audit recommendations.

In consideration of the observations stemming from internal and external audits, residual risks and control weaknesses still exist in the sourcing of human resources, controls over procurement and contract management activities in the context of operational programmes and projects, with the potential to affect the regularity of transactions performed in financial year 2023.

These issues are currently being addressed by the Agency to resolve them as soon as possible. The progress of open audit recommendations is regularly reviewed by the Management Board.

During the reporting period, eu-LISA organised seven Management Board meetings, including one extraordinary meeting to discuss the entry into operation of the renewed SIS, and the implementation of the interoperability architecture. The ACFC held four meetings, including one extraordinary meeting to discuss the level of current implementation, budget forecast for 2023, and the status of overdue audit recommendations. The Board's technical Horizontal Expert Working Group met once, as requested. To further improve transparency and contribute to raising public awareness of its activities, the Agency continued publishing summaries of regular Management Board meetings on its website.

7.2. Major developments

7.2.1. New regulations impacting the work of eu-LISA

In November 2023, the Council and European Parliament adopted two revised amending regulations that will pave the way for the **digitalisation of the visa procedure**,¹⁰⁹ which will entail a new task for eu-LISA – the development and subsequent management of the **common visa application platform**.¹¹⁰ Throughout the year, the Commission invited eu-LISA to contribute to the preparation of several legislative initiatives that will impact the Agency's mandate and its future activities.

Furthermore, eu-LISA will continue increasing its contribution to the digitalisation of the EU's justice domain, as per the **Digital Justice Package**, adopted in December 2023.¹¹¹ In particular, eu-LISA has started preparations for the development of the **Joint Investigation Teams** collaboration platform.¹¹²

7.2.2. Revised/Amending regulations

In 2022, the Council and the Parliament established their negotiating mandates for the Recast Eurodac Regulation to complete the **reform of the Eurodac system**.¹¹³ Once adopted, it will be the last major building block to be integrated into the JHA interoperability framework. The Regulation will serve as the legal basis for the Eurodac upgrade to be implemented by the Agency.

7.2.3. New Commission initiatives

The Agency provided technical input for the legal financial statement for the future **Prüm II router** for police cooperation regulation¹¹⁴ and the **advance passenger information (API) router**, on the collection and transfer of advance passenger information.¹¹⁵ In addition, upon the Commission's request, the Agency provided its expertise on screening regulations¹¹⁶ and also on the digitalisation of travel documents and travel facilitation initiative (digital travel credentials).¹¹⁷

The Agency prepared a preliminary assessment focusing on the potential impact of the future EU AI Act on existing and future IT systems entrusted to eu-LISA.

¹⁰⁹ [Regulation \(EU\) 2023/2667](#) of 22 November 2023 as regards the **EU Visa Application Platform**, and [Regulation \(EU\) 2023/2685](#) of 22 November 2023 amending Council Regulation (EC) No 1683/95 as regards the digitalisation of the visa procedure.

¹¹⁰ 'Commission Communication on the Development of a prototype for an EU Online Visa Application Platform', 27 April 2022.

¹¹¹ [Regulation \(EU\) 2023/2844](#) on the **digitalisation of judicial cooperation** and access to justice in cross-border civil, commercial and criminal matters, and [Directive \(EU\) 2023/2843](#) as regards digitalisation of judicial cooperation.

¹¹² [Regulation \(EU\) 2023/969](#) of the European Parliament and of the Council of 10 May 2023 establishing a collaboration platform to support the functioning of **joint investigation teams** and amending Regulation (EU) 2018/1726 (OJ L 132, 17.05.2023, p. 132).

¹¹³ 'Eurodac: MEPs updated their position in view of upcoming negotiations with the Council', European Parliament, Committee on Civil Liberties, Justice and Home Affairs (LIBE), press release, 13 December 2022.

¹¹⁴ **Prüm II Regulation** was adopted on 13 March 2024, see [Regulation \(EU\) 2024/982](#), OJ L, 5 April 2024.

¹¹⁵ [Proposal for a Regulation](#) on the **collection and transfer of advance passenger information (API)** for enhancing and facilitating external border controls; and [Proposal for a Regulation](#) on the collection and transfer of advance passenger information for the prevention, detection, investigation and prosecution of **terrorist offences and serious crime**, and amending Regulation (EU) 2019/818.

¹¹⁶ [Proposal for a Regulation amending Regulation \(EU\) 2019/816](#) establishing a centralised system for the identification of Member States holding conviction information on third-country nationals and stateless persons (ECRIS-TCN) to supplement the European Criminal Records Information System, and [Regulation \(EU\) 2019/818](#) on establishing a framework for interoperability between EU information systems in the field of police and judicial cooperation, asylum and migration and amending Regulations (EU) 2018/1726, (EU) 2018/1862 and (EU) 2019/816 for the purpose of **introducing a screening of third-country nationals at the external borders**, COM/2021/96 final.

¹¹⁷ For more, please visit the Commission's dedicated page: [Travel – digitalising travel documents to make travelling easier](#).

7.2.4. Russia's war of aggression against Ukraine

From the onset of the Russian invasion of Ukraine on 24 February 2022, the Agency has been actively supporting Member States, ensuring the uninterrupted availability of the EU's border management systems.

eu-LISA continued to contribute to the meetings of the **EU Migration Preparedness and Crisis Management network**.¹¹⁸ To support the implementation of the Temporary Protection Directive,¹¹⁹ the Agency provided expert support to the Commission in developing the **Temporary Protection Platform** for registering people fleeing Russia's war of aggression against Ukraine. eu-LISA also contributed to the **Integrated Political Crisis Response** (IPCR)¹²⁰ working group, primarily by supporting the Council on matters related to large-scale IT systems in the JHA domain and providing regular reports to inform the Commission on the use of JHA systems and on cyber threat levels.

Throughout, eu-LISA has maintained regular contact with other EU agencies in host countries sharing borders with Ukraine and Russia (i.e., BERIC Office, EIGE, Frontex, CEPOL, ECHA) to analyse threat levels related to cybersecurity and business continuity. Furthermore, eu-LISA has stepped up the monitoring of possible risks and threats to large-scale IT systems and the corporate infrastructure under its remit and is communicating pertinent information to relevant parties. At the staff level, several initiatives have been launched within eu-LISA to support refugees through charity actions.

7.2.5. Change of the Executive Director

In 2022, the tenure of Mr Krum Garkov, who served as eu-LISA's Executive Director since the Agency's establishment, came to an end. On 31 October 2022, the Management Board appointed eu-LISA's Deputy Executive Director, Mr Luca Tagliaretti, to serve as Executive Director *ad interim* until the day on which the new executive director takes up office. In this capacity, Mr Tagliaretti also assumed the tasks of the Authorising Officer who is responsible for implementing eu-LISA's internal controls. To prevent conflict of interest with his previously assigned role of Manager in charge of Risk Management and Internal Control (MRMIC) for the purposes of implementing the Internal Control Framework, the role of MRMIC was delegated to the Head of Governance and Capabilities Unit until the appointment of the next Executive Director.

On 12 January 2023, following a rigorous selection procedure organised by the Commission, and after the hearing of three short-listed candidates by the European Parliament, the Management Board appointed Ms Agnès Diallo as eu-LISA's Executive Director for a term of five years. Ms Diallo took office on 16 March 2023.

¹¹⁸ **Migration Preparedness and Crisis Blueprint**, an EU mechanism for **preparedness and management of migration crises**, established by [Commission Recommendation \(EU\) 2020/1366 of 23 September 2020](#).

¹¹⁹ [Council Directive 2001/55/EC](#) of 20 July 2001 on minimum standards for giving **temporary protection** in the event of a mass influx of displaced persons and on measures promoting a balance of efforts between Member States in receiving such persons and bearing the consequences thereof; and [Council Implementing Decision \(EU\) 2022/382](#) of 4 March 2022 establishing the existence of a mass influx of displaced persons from Ukraine within the meaning of Article 5 of Directive 2001/55/EC, and having the effect of introducing temporary protection, OJ L 71, 4.3.2022, pp. 1–6.

¹²⁰ For a more detailed overview of **how the Council coordinates the EU response to crises**, please visit the dedicated page on [integrated political crisis response \(IPCR\)](#).

7.3. Budgetary and financial management

7.3.1. Financial management

In accordance with Article 46(3) of the establishing Regulation, eu-LISA's budget for the 2023 financial year was financed by funds from various sources, with the main revenue coming from the annual subsidy received from the general EU budget.¹²¹ In addition, eu-LISA receives contributions from associated countries, as partial reimbursement of expenditures incurred by the Agency.

Most importantly, eu-LISA is finalising its **internal control strategy** that will provide information on the costs and benefits of controls implemented by the Agency, i.e., complete information on their effectiveness, efficiency and economy. Best practices and guidance from the EUAN Performance Development Network (PDN) were used in the preparation of sample documents.

7.3.2. Budgetary implementation

The final statement of revenue and expenditure for 2023 was adopted by the Management Board in accordance with Article 45(7) of eu-LISA establishing Regulation. The Agency achieved a high budgetary implementation rate by the end of 2023, evidence of financial planning quality and capacity to implement:

- 99.9% for commitment appropriations,
- 99.9% for payment appropriations, including the carry-forward of administrative expenditure to 2024.

Amending Budget No 1

The Management Board approved one amendment to the budget, to return EUR 32.80 million in payment appropriations.¹²²

Table 3. Breakdown of 2023 amending budget (in million EUR)

Budget title	System/task	Amending budget Payment appropriations
B03 Operational expenditure		
<i>of which</i>	shared system infrastructure	-20.00
	Interoperability	-12.80
Total		-32.80

Execution of commitment appropriations

In 2023, the Agency managed a budget of EUR 262.23 million in commitment appropriations (C1¹²³), divided among the different titles as follows:

- 11% (EUR 27.77 million) for infrastructure and operating expenditure (Title 2),
- 16% (EUR 41.67 million) for staff expenditure (Title 1),
- 73% (EUR 192.79 million) for the operational budget (Title 3).

As regards Title 3, owing to the multiannual nature of the contracts used to support core operations, EUR 189.74 million of open commitment appropriations foreseen for 2023 were automatically carried forward to be used in 2024 and in the following years. For a detailed breakdown, please refer to Annex II.

By the end of the financial year, the execution rate was 100% for Title 1 and 98.8% for Title 2.

The operational budget, amounting to EUR 192.79 million, was implemented 100%.

¹²¹ See section III, title 11, chapter 10 'Border Management – Decentralised Agencies', as adopted by the budgetary authority, i.e., the European Parliament and the Council of the European Union. The EU contribution relates to C1 commitment and payment appropriations (voted credits for the current budgetary year); for more, please refer to Articles 45(5) and 46(3) of the eu-LISA establishing Regulation.

¹²² eu-LISA Management Board decision 2023-333 of 16/11/2023.

¹²³ Appropriations for the year (i.e. initial budget + amending budget ± transfers). These are 'recent' appropriations, entered in the budget at the start of the financial year, and can be transferred or supplemented by appropriations from an amending budget.

In 2023, the Agency cancelled EUR 10.45 million of commitment appropriations carried forward from previous years, representing 2.8% of the total appropriations carried forward under Title 3 – operational expenditure. The de-commitments are summarised in the table below by year of origin of the underlying legal commitment.

Table 4. 2023 de-commitments of budgetary commitments by year of origin (in million EUR)

Budget Chapter	Budget Article	2017	2019	2020	2021	2022	Total
Infrastructure	shared system infrastructure			-0.02	-0.28	-0.02	-0.33
	networks			-0.00	-0.00		-0.00
Home Affairs	SIS II		-0.39		-1.50	-0.03	-1.92
	VIS/BMS			-1.86			-1.86
	EES	-2.92		-1.06	-0.00	-0.14	-4.12
	ETIAS			-0.01	-0.41		-0.41
	Eurodac	-0.05	-0.12		-0.70		-0.87
	Interoperability					-0.77	-0.77
Justice	ECRIS				-0.05		-0.05
Operational support activities	operational support					-0.12	-0.12
Total		-2.97	-0.51	-2.95	-2.94	-1.08	-10.45

Under operational support, EUR 0.12 million refer to cancellations of budgetary commitment appropriations for which the contract end date was reached, and contractually foreseen provisions were not required, e.g., de-commitments related to external support contracts, incl. extra costs for overtime, remainders of Advisory Group meetings and training activities for Member States.

Execution of payment appropriations

The Agency's total voted final budget for payment appropriations amounted to EUR 294.18 million. At the end of 2023, the execution of payment appropriations for C1 credits reached 99.9%, incl. carry-forward of administrative expenditure to 2024. Under Title 1, the execution rate for appropriations was 97.9%, with 2.1% carried forward automatically. Under Title 2, the execution rate reached 54.4%, with 1.2% cancelled and the remaining 44.4% automatically carried forward to 2024. Under Title 3, 100% of appropriations were executed. Under administrative expenditure, eu-LISA executed 94.2% payment appropriations carried forward from 2022 to 2023.

Commitment appropriations under Title 1 (staff expenditure)¹²⁴ amounting to EUR 0.88 million, and under Title 2 (infrastructure and operating expenditure) amounting to EUR 12.34 million, not yet paid in 2023 and for which a valid legal commitment exists, were carried forward to 2024 together with the corresponding payment appropriations, as per Article 12(6) of eu-LISA Financial Rules. Under Title 3, the largest proportion of payment appropriations was spent on the shared systems infrastructure, ETIAS, EES and Interoperability. The breakdown of executed payment credits for the operational budget is provided on the following pages.

Performance indicator: Time to Pay

In 2023, eu-LISA executed altogether 3 447 payment transactions with a payment time limit, an increase of 19.19% compared to 2022, included:

- 3 329 transactions with a maximum payment time of 30 days,
- 58 with a maximum payment time of 45 days,
- 60 with a maximum payment time of 60 days.

The average time to pay for all types of payments remained significantly below the stipulated time limits: 16.6 days for 30-day payments, and 27.7 days for 60-day payments. Paying its creditors on time demonstrates the efficiency of eu-LISA's financial performance.

On the whole, 96.4% of all transactions were made within the contractual time limit. Altogether 125 payments were delayed, with 10 incurring late interest, amounting to EUR 12 920.87 payable to creditors.

¹²⁴ Commitment and payment appropriations related to remuneration are not carried forward.

Budget implementation in 2023

As part of its annual reporting framework, the Agency publishes its budget execution rates and performance indicators.

Figure 3. Consumption of C1 commitment appropriations (in million EUR)

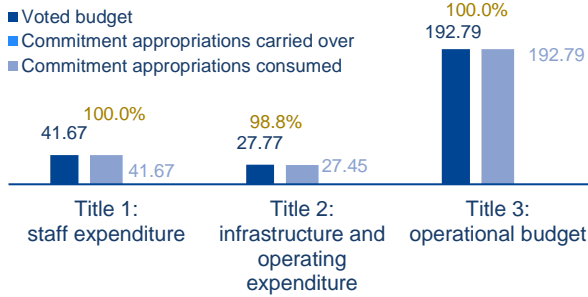


Figure 4. Trends in consumption of funds committed and budgeted in 2023 (in million EUR)

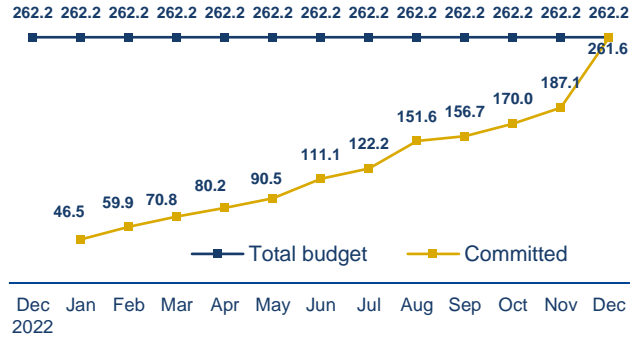


Figure 5. Execution of Title 3 commitment appropriations (in million EUR)

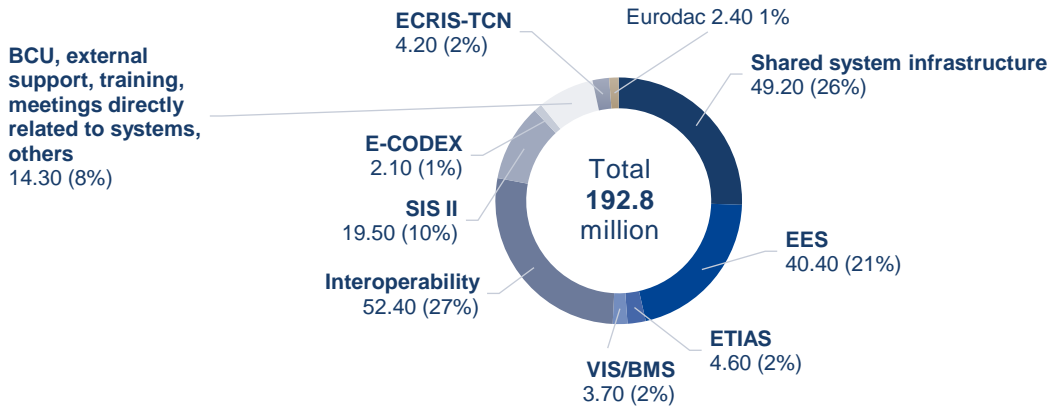


Figure 6. Consumption of C1 payment appropriations (in million EUR)

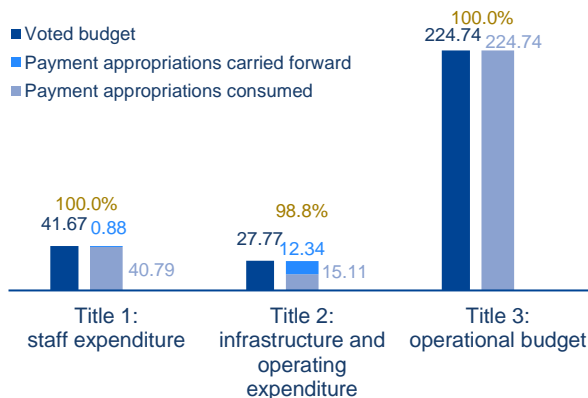


Figure 7. Trends in consumption of funds paid and budgeted in 2023 (in million EUR)

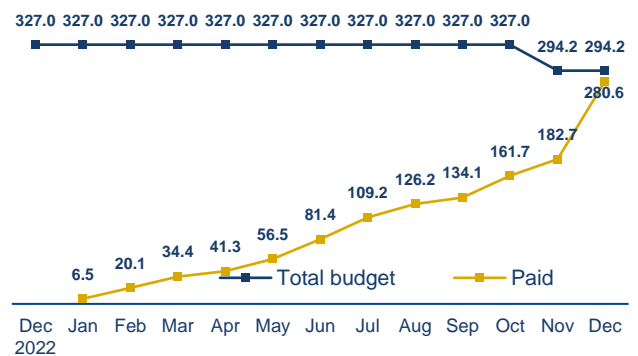


Figure 8. Executed payment appropriations under Title 3 (in million EUR)

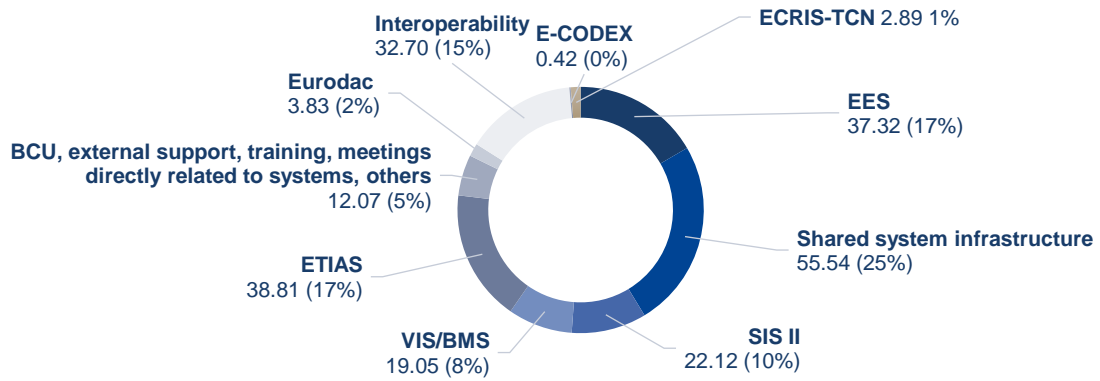


Figure 9. Monthly evolution of overall time to pay

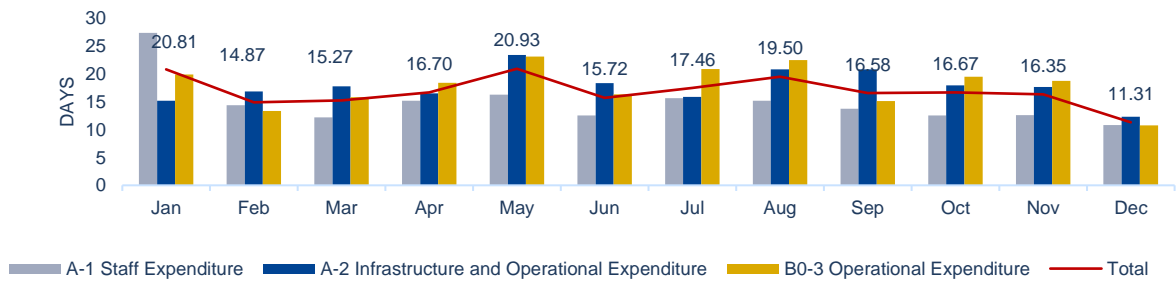


Figure 10. Payments within a time limit of 30 days

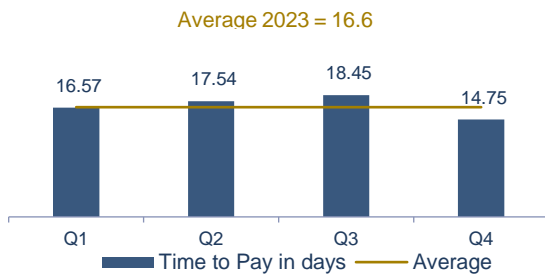
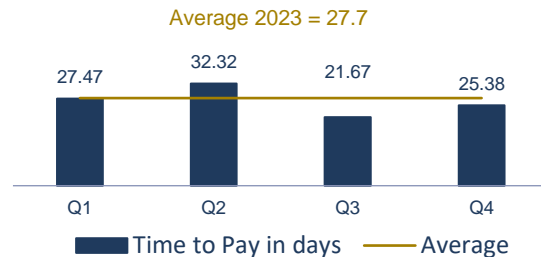


Figure 11. Payments within a time limit of 60 days



7.3.3. Procurement procedures

The volume of transactions (i.e. contracts) and overall **procurement activities continued to increase** in 2023. Altogether **1 108 contracts were signed** during the year, amounting to a **31% increase** compared to 848 contracts in 2022. The most commonly used procurement procedure in 2023 was the negotiated procedure for very low value contracts.

Figure 12. Contracts and contract amendments signed in 2022 and 2023.

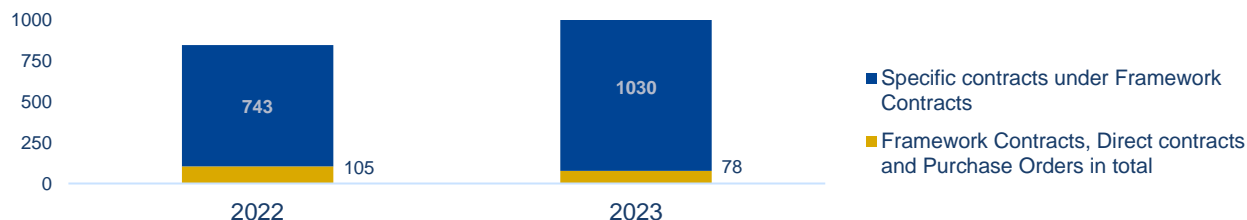


Table 5. Percentage of procurement procedures per type used in 2023

Procedure Type/Legal Basis	Percentage	Number of procedures	Awarded amount (in euros)
Negotiated procedure middle value contract	2.94%	1	140,000.00
Negotiated procedure very low value contract	82.35%	28	256,684.20
Negotiated procedure without prior publication	5.88%	2	860,000.00
Open procedure (FR 164 (1)(a))	8.82%	3	77,553,898.00
Total		34	78,810,582.20

In 2023, the Agency signed the following contract under point 11.1(g) of Annex I of the EU Financial Regulation:

Procedure number	Title	Contractor	Amount (in EUR)	Legal base
LISA-2022-NP-08	Rental of premises for eu-LISA's Liaison Office in Brussels, Belgium	Conseil Central de l'Économie	110,000.00	Annex 1 – 11.1 (g) – Building contracts ¹²⁵

7.4. Delegation and sub-delegation of budget implementation powers to staff

Under eu-LISA Financial Rules, particularly Articles 41 and 46, the Authorising Officer delegates budget implementation powers to designated Authorising Officers mostly at Head of Unit/Department level. The designated Authorising Officer exercises the delegation of powers under the Charter for Authorising Officers by Delegation, which lists their tasks and responsibilities. These delegations are applied based on the budget ownership matrix, established within eu-LISA as the allocation of authority and responsibility to designated staff based on their managerial role within the organisation over activities such as planning, implementing, and monitoring of budgetary resources within all financial circuits. The delegation of power stands at the level of a budget line for all fund sources. It is performed by staff formally appointed to that role by a decision of the Executive Director (ED) within a specified amount (i.e., financial ceiling). The delegations of power are regularly reviewed by the Executive Director.

¹²⁵ Regulation (EU, Euratom) 2018/1046 of 18 July 2018 on the financial rules applicable to the general budget of the Union.

7.5. Human Resources management

HR policy development and adopted implementing rules

To align its legal framework to the changing environment of EU agencies and to increase the flexibility of working arrangements, eu-LISA introduced new rules concerning working time and hybrid working. In November 2023, eu-LISA adopted a decision on working time and hybrid working,¹²⁶ replacing two prior guidelines documents on working time and teleworking.

The new rules introduced a combination of teleworking and working at the office as equivalent ways of working, while indicating possible weekly ratios for office presence and teleworking. In addition, new definitions were introduced to provide a basis for a common understanding of the terms, guidance for working arrangements, and addressing specific situations. To facilitate the implementation of the new rules as of 1 January 2024, several awareness sessions were organised for managers and staff.

Establishment plan and headcount

In eu-LISA's establishment plan for 2023, the number of authorised posts comprised 222 temporary agents (TA), 166 contract agents (CA), and 11 seconded national experts (SNE), for a total of 399 authorised posts. Compared to 2022, there was a total increase of 6 posts, all of which were TA posts granted under EU budget negotiations for 2023 to address increasing cybersecurity threats. The number of CA and SNE posts did not change during this period.

The occupancy rate was 89.2% of the establishment plan and the occupancy level, including issued job offers, was 92.3% - a slight increase compared to 2022 (+0.2%). The overall occupancy rate for all types of posts was 85.7% and the occupancy level was 94.2%, including the issued job offers.

By the end of 2023, the **total headcount** reached 342 staff members with 246.9 full-time equivalents (FTE) (74.1% of staff) employed in operational activities, 31.1 FTEs (9.3% of staff) in related financial and procurement activities, and 55 FTEs (16.5% of staff) in horizontal activities (general coordination and administrative support). This represented an increase from 324 staff members at the end of 2022.

In 2023, eu-LISA succeeded in recruiting a large number of additional staff members. In total, 90 job offers were made, compared to 85 in 2022. Since existing reserve lists had been fully exhausted, the Agency launched new selection procedures, which had an impact on the duration of the recruitment process. Considering the expected staff increase, the Agency successfully piloted its first large-scale talent pool recruitment (at FG IV level) to establish larger internal reserve lists for core IT functions and support staff.

Several successful candidates were internal, leading to a neutral impact on total staff numbers. The situation was further complicated by 26 out of 90 candidates (28%) declining job offers, mainly due to accepting other offers (27%), lack of interest in relocation to the place of employment (23%), personal reasons (23%), or higher salary expectations (15%).

In 2023, the Agency launched 9 new selection procedures (excluding internship calls) that generated a total of 2 127 applications. In total, 62 new staff members were recruited (accepted job offers by 31 December 2023) out of which 13 staff members were offered new career growth opportunities within eu-LISA. The average number of applications per procedure was 152, which constitutes an increase compared to 107 applications in 2022. The highest number of applicants for a closed selection procedure was 535, and the lowest was 68.

In addition, eu-LISA launched an Internal Mobility Programme with the aim of capitalising on the competencies of existing staff members and fostering continuous professional growth within the Agency. The call was launched to identify a new Head of Sector for the Operational Service Tools Sector in the Systems Operations Unit, and concluded with the appointment of one staff member to the role. During 2023, 32 staff members successfully completed their probationary period, and two people left during their probation. There were no probationary period assessments with a negative outcome. The probationary period assessments were fully digitalised by the end of 2023, using eu-LISA's e-learning system.

By the end of 2023, eu-LISA had 342 full-time staff members: 198 TAs, 135 CAs, and 9 SNEs. Additionally, twelve interns were invited to undergo a professional internship at the Agency. Compared to 2022, there were no significant changes in the distribution of staff between eu-LISA's three sites: the HQ in Tallinn, Estonia, operational site in Strasbourg, France, and the Liaison Office in Brussels, Belgium. Almost 1/3 of the staff (26%) were employed at the eu-LISA headquarters in Tallinn, and 73% at its operational site in Strasbourg, with the Liaison Office in Brussels representing 1%. The Agency does not have any staff permanently employed at the backup technical site in St Johann im Pongau, Austria.

¹²⁶ eu-LISA Management Board decision No 2023-333 of 16 November 2023.

The Agency's staff comprises 25 nationalities: 23 EU Member States, Norway, and the United Kingdom. Compared to 2022, there was an improvement in gender balance (+2.7%), with women constituting 34.2% of the staff (117 persons), while men comprised 65.8% (225 persons).

Performance indicators in the area of human resources

The absenteeism rate was measured by three indicators:

- the average number of sick leave days per employee was 9.7 days (target: <15 days per employee);
- the percentage of staff on long-term sick leave was 5.3% (target: <10%);
- the percentage of staff that did not take any sick leave was 42.7% (target: >15% of all staff).

All these figures were on target, although a slight increase of absence could be observed compared to the numbers reported in 2022.

The **staff exit turnover** was 4.09%, i.e., remaining below the 5% target (except for staff in place at the end of 2023, it was slightly above target, with 5.6%). At Tallinn headquarters, staff turnover was 7.45%, compared to 2.82% at the operational site in Strasbourg.

The percentage of staff submitting their **declarations of interest** on time was 91% (target: > 80%), showing slight improvement compared to 2022 when this indicator stood at 90%.

Following the transition to a qualitative appraisal method, the talent retention index KPI was substituted in 2023 for the KPI '**percentage of unsatisfactory staff appraisal**'. For this KPI, the Agency reached 1.8% in 2023 (target: between 1% and 5%).

In 2023, eu-LISA **onboarded 39 newcomers**, supporting their relocation and providing support as necessary.

During 2023, 32 staff members successfully completed their **probationary period** and two staff members left eu-LISA during their probation. There were no probationary period assessments with a negative outcome.

The Agency implemented the **Annual Learning Plan** and numerous activities at team and individual level:

- organised 67 trainings with total duration of 124 days and 1 149 participants,
- organised 22 external training events for a total of 107 participants,
- reached 82% general satisfaction rate for in-house trainings,
- processed 224 individual training requests,
- 59 staff members participated in language courses.

Throughout 2023, eu-LISA continued to enhance its employee experience and well-being through various initiatives. The year kicked off with the launch of the **staff engagement survey** in June, aimed at gauging staff satisfaction and identifying areas for improvement. In response to the lowest-scoring drivers identified in the survey, working groups were established to implement targeted actions geared towards addressing these concerns and boosting engagement. Throughout the year, a wide range of social activities were organised to foster team cohesion and create opportunities for meaningful social interaction among staff.

Recognising the importance of mental health, eu-LISA organised 5 **mental health and well-being** webinars, attracting 312 participants. In addition, 19 people made use of 106 individual counselling sessions, and 142 people subscribed to a well-being app offered by the Agency. Additionally, an exercise specialist was brought onsite to provide guidance and support to improve daily physical activity levels within the office environment. Furthermore, **health-related initiatives** such as bike days were organised to promote a culture of wellness and encourage healthy lifestyle choices. All these initiatives underscore eu-LISA's ongoing commitment to prioritising the holistic well-being of its staff.

New **confidential counsellors** were trained and nominated. A total of 9 cases were reported to them and regular supervision sessions organised. HRU performed 3 preliminary assessments and launched 3 formal administrative inquiries.

Staff benchmarking exercise

In accordance with the requirements of the Framework Financial Regulation, and the methodology adopted by the Heads of Administration of EU agencies, eu-LISA performed its annual benchmarking exercise to assess the ratio of administrative to operational staff. It is generally considered that an optimal distribution of posts and staff should be around 70% for operational activities, 20% for administrative support and coordination tasks, and 10% for neutral (financial) activities. The results of the 2022 benchmarking exercise indicated that eu-LISA's staff distribution is as follows: **73.1% in operational duties**, **17.5% in administrative and coordination tasks**, and **9.4% in neutral functions**. For a more detailed overview of the results of eu-LISA's 2023 benchmarking exercise, please refer to Annex IV.

7.6. Strategy for efficiency gains

Throughout 2023, eu-LISA continued its efforts towards **evolving into an agile and efficient organisation** that delivers excellent results for its stakeholders. To improve its contribution to the implementation of the EU's JHA policies, the Agency considered the **optimisation** of its governance, resource planning and budget management to further improve its operational efficiency and resource utilisation. Most importantly, following the successful implementation of **agile project management methodology** to break the deadlock in the development of EES, the agile approach will be gradually extended to the development of all other systems.

The Agency regularly reviewed its internal governance and organisational structures towards optimisation. To facilitate more efficient collaboration between teams, eu-LISA **mapped and documented all of its processes**, a total of 69 operational and corporate processes, which were subsequently reviewed and updated for further optimisation and to create more synergies.

In order to deliver excellent results and achieve its policy objectives, eu-LISA **analysed budget constraints** and **human resources** available for delivering mandated tasks. In this context, the Agency took into consideration also the following aspects: the possible long-term negative financial effects brought about by an accelerated rate of inflation, driven by increased demand due to economic recovery; the continued disruption of value chains; and pressure from rising energy costs.

eu-LISA has been looking into **modernising its operational model** to reduce dependence on external contractors. To that end, considerable effort has been invested into implementing the **agile project management approach**, enhancing transversality by bringing different teams under temporary squads to deliver stalled development projects. Looking ahead, eu-LISA is assessing how to reduce infrastructure costs by making use of **cloud solutions** and further standardising the management of system maintenance.

The Agency engaged in regular discussions and introduced mitigation measures to address **staff shortages**. The new sourcing strategy, adopted in 2022, clarified the capabilities needed to deliver mandated services and indicates the best sourcing methods, i.e., what type of human resources can be used to perform specific tasks, e.g., using statutory staff for critical services that cannot be outsourced, and external contractors for other services, or applying a mixed model. As the sourcing strategy is an important guide for the planning of human resources and identifying the need for additional resources that cannot be outsourced, the Agency continues to adapt it to changing needs.

In parallel, the Agency concluded a new framework contract for sourcing **external support**, i.e., to outsource tasks for which eu-LISA has not been allocated a sufficient number of staff posts (to achieve short-term objectives). In addition, eu-LISA engaged in comprehensive capacity building, including developing necessary skills and knowledge among the staff, done in conjunction with the implementation of eu-LISA's HR Strategy.

In staff recruitment, eu-LISA has greatly improved the utilisation of internal **reserve lists** from prior selection procedures. For example, by pooling profiles and longer reserve lists to cover several posts under one recruitment procedure, the Agency managed to fill a larger number of available posts with fewer vacancy notices. In this area, efficiencies have also been achieved by combining efforts with other EU agencies for jointly procuring the publication of vacancy notices and sharing established reserve lists of successful candidates. Based on this experience, the Agency is actively looking into other possibilities for creating synergies with other EU agencies to deliver more efficiency gains.

Since 2020, as a result of the COVID-19 pandemic, eu-LISA has been shifting the delivery of training activities from face-to-face sessions to **online courses**. In 2023, 80% of new training activities were delivered online (compared to 36% in 2019), with online participation peaking at 94%. As a result, total participation increased sixfold from 623 in 2019 to 4 112 in 2023. Furthermore, the majority of online training material is reusable, reducing workload and costs, not only for eu-LISA but also for the participants.

Similarly, the use of **videoconferencing** capabilities for internal and inter-agency meetings (incl. with the Commission) has also resulted in significant budgetary savings.

In 2023, eu-LISA introduced a **new digital planning tool** (Anaplan) to improve the efficiency of corporate planning and resource allocation. The new tool enables streamlining the planning effort across the Agency by using a common set of data as a single point of truth. It was used to support the preparation of the annual work programme in 2023 (incl. budget and human resources allocation) and was extended to support the monitoring of the implementation of the work programme, including developing Power BI capacity.

All these activities will be supported by further digitalisation of internal workflows and the use of various IT tools to facilitate and streamline processes. The Agency also began looking into possible use cases of **using artificial intelligence**, in particular generative AI, for creating new efficiency gains, especially for optimising repetitive or low-value tasks in order to enable staff to focus on higher-value activities.

7.7. Assessment of audit and ex-post evaluation results

This section presents a summary of audits carried out by the Internal Audit Service of the European Commission (IAS) and the Internal Audit Capability (IAC) of eu-LISA, including also the audits carried out by the EDPS and opinions of the European Court of Auditors on the reliability and regularity of transactions underlying the accounts, and the relevant findings issued.

7.7.1. The Commission's Internal Audit Service and eu-LISA's Internal Audit Capability

In November 2022, eu-LISA Management Board adopted¹²⁷ the Internal Audit Plan for 2023,¹²⁸ which was amended in November 2023.¹²⁹ In 2023, IAC continued to serve as the contact point for the Internal Audit Service of the European Commission (IAS), the European Court of Auditors (ECA) and the European Anti-Fraud Office (OLAF). This role is important to ensure minimal disruption of the Agency's regular operation and avoid the duplication of efforts. The results of the Internal Audit Plan for 2023 were formalised in a detailed activity report that was analysed and discussed with the Executive Director and the ACFC (meeting of 21 February 2024) and noted by the Management Board on 21 March 2024.¹³⁰

Table 6. Summary of internal audit topics covered in 2023

Auditor	Audit topic delivered in 2023 (by type)	Thematic and results
IAC	Review of the management of ABAC access rights (assurance) ¹³¹	Providing (re)assurance on the management of ABAC access rights. The audit focused on conducting/updating the risk assessment on granted access rights; performing periodic validation of access rights (i.e., workflow, accounting, and reporting) against the responsibilities entrusted to the users as per standing procedure. The audit resulted in a conclusion and two recommendations. ¹³² In response, an action plan was put in place.
IAC	Audit on the Configuration Management process (assurance)	Providing (re)assurance on the effectiveness and efficiency of internal controls put in place for the Configuration Management process (operations). The audit focused on the integrity of the configuration repository. The audit resulted in an audit conclusion and four audit recommendations. ¹³³ In response to the audit, the Agency's management put in place an action plan.
IAC	Monitoring of the implementation of eu-LISA's Anti-fraud Strategy (coordination/ assurance)	Helping to combat fraud by minimising opportunities for perpetrators to commit fraud. eu-LISA's anti-fraud Strategy 2022-2024 outlines three objectives: <ul style="list-style-type: none"> ■ achieve full compliance with anti-fraud principles, ■ set and maintain a high level of ethics in all activities of eu-LISA, ■ develop and use data collection and analysis. IAC delivered the annual monitoring report that disclosed an implementation rate of 75% of the Anti-fraud Strategy action plan. ¹³⁴
IAC	Monitoring of implementation of audit recommendations issued by IAS, IAC, ECA and OLAF (coordination)	Helping to ensure that identified issues are solved and improvements are implemented. In 2023, IAC delivered four monitoring reports.
IAC IAS	Follow-up to audit recommendations (assurance)	Confirming independently that issues are solved, and improvements implemented. IAC and IAS followed up on the recommendations stated as 'implemented' (ready for review) and closed 19 recommendations.
IAS	Multi-entity audit on coordination between DG HOME and EU decentralised agencies eu-LISA, EUAA, Europol, CEPOL, EMCDDA	The final audit report was issued in May 2023, with IAS deeming eu-LISA's action plan for the two audit recommendations as suitable. ¹³⁵

¹²⁷ Ref. Management Board document 2022-382, point B.15.d.

¹²⁸ Ref. Management Board document 2022-387, the Internal Audit Plan for the year 2023, Ares(2022)8560364, 09 December 2022.

¹²⁹ Ref. Management Board document 2023-333, point B18.c.

¹³⁰ Point B15.a. of Decisions of the [48 meeting of the eu-LISA Management Board](#), ref. doc 2024-046, 21 March 2024.

¹³¹ ABAC (accrual-based accounting): the corporate system for the execution and monitoring of budgetary and accounting operations; developed by the Commission, incl. features to ensure compliance to the Financial Regulation and Implementing Rules.

¹³² IAC Report, ref. Ares(2023)5187136, 26 July 2023.

¹³³ IAC Report, ref. Ares(2024)1056607, 12 February 2024.

¹³⁴ IAC Monitoring Report on the implementation of Anti-fraud Strategy action plan for 2023, ref. Ares(2024)1056755, 12 February 2024.

¹³⁵ IAS Report, ref. Ares(2023)3266879, 10 May 2023.

7.7.2. European Data Protection Supervisor (EDPS)

Ensuring a high level of data protection is one of the Agency's main objectives. External audits on data protection compliance contribute to facilitating this goal and are part of the eu-LISA continuous improvement plan for the operational management of JHA information systems. In 2023, eu-LISA continued to follow up on progress with the **implementation of recommendations** identified in EDPS audits on SIS, VIS and Eurodac:

- SIS and VIS audit, conducted in November 2018, resulted in a final report which the Agency received in April 2023, including 43 recommendations (of which the Agency closed all);
- Eurodac audit was conducted in December 2019 and culminated in a final report that eu-LISA received in April 2023, containing 29 recommendations (of which the Agency closed 23).

In September, eu-LISA closed all recommendations from 2017–2019 EDPS audits on SIS and VIS.

Following the 2022 EDPS audit on SIS, VIS and Eurodac, the Board adopted its final comments on this inspection draft report on 15 June, and eu-LISA sent its comments to EDPS on 26 June, in full compliance with the deadline. The Agency received the final report of the audit in September 2023, including 37 recommendations. The last EDPS on-site audit took place in December 2023 on SIS.

In all instances, the Agency prepared corresponding action plans, incorporating the recommendations put forward by the EDPS, while also providing quarterly reports to the EDPS, and status reports on outstanding recommendations to the Management Board and its Audit, Compliance and Finance Committee (ACFC).

7.7.3. European Court of Auditors (ECA)

In 2023, the European Court of Auditors (ECA) finalised the audit on eu-LISA's Annual Accounts for the financial year 2022.¹³⁶ The Court audited:

- the Agency's accounts, comprising the financial statements¹³⁷ and budget implementation reports¹³⁸ for the financial year ended on 31 December 2022;
- the legality and regularity of the transactions underlying those accounts.

In ECA's opinion, eu-LISA's accounts for the year 2022 present fairly, in all material respects, its financial position as at 31 December 2022 (results of operations, cashflows, changes in net assets) in accordance with its Financial Regulation and with accounting rules adopted by the Commission's Accounting Officer. These are based on internationally accepted accounting standards for the public sector. However, under the emphasis of matter title, the Court draws attention to Note 2.1.5.3 to the annual accounts for 2022, which describes the delays in the implementation of the Entry/Exit System and its impact on eu-LISA operations.

In ECA's opinion, the revenues underlying the accounts for the year ended 31 December 2022 are legal and regular in all material respects. Concerning the payments, ECA identified a total amount of payments of EUR 17.8 million affected by non-compliance, representing 4.8% of the payment appropriations available in 2022, thus exceeding the materiality threshold set for the audit and resulting in a qualified opinion on the legality and regularity of payments underlying the accounts. ECA also made observations on the management, control systems and budgetary management that did not call the above opinions into question. The Agency devised an action plan to address these observations.¹³⁹

7.8. Follow-up on audit recommendations and related action plans

Pursuant to the decision of eu-LISA's Executive Director, the Agency's Internal Audit Capability (IAC) is responsible for monitoring progress on the implementation of audit recommendations.¹⁴⁰ To that end, IAC collects updates from the owners of these recommendations and compiles monitoring reports that are submitted to the Executive Director and the Management Board.

¹³⁶ European Court of Auditors (ECA) '[Annual Report on EU Agencies for the financial year 2022](#)', 26 October 2023, pp. 237-248.

¹³⁷ These include the balance sheet and the statement of financial performance, the cashflow table, the statement of changes in net assets and a summary of the significant accounting policies and other explanatory notes.

¹³⁸ These comprise the reports which aggregate all budgetary operations in the explanatory notes.

¹³⁹ Action Plan ref. Ares(2024)2384688, 02 April 2024.

¹⁴⁰ eu-LISA Executive Director decision on the adoption of a system of compulsory reporting to the ED and the Head of the IAC on the subject of the progress made in the area of audit recommendations and/or findings, ref. Ares (2018)6152498, 30 November 2018.

In 2023, the implementation rate of audit recommendations was 87%, with 33 recommendations implemented out of 38 recommendations due.¹⁴¹ The status of eu-LISA's progress on implementing audit recommendations as at 31 December 2023 is summarised in the table below.

Table 7. Audit recommendations: progress on implementation

IAS, IAC, ECA and OLAF recommendations by rating	Total open for 2023	In progress	Implemented	Overdue	Closed	Total open at the end of 2023
critical	3	-	3	-	3	-
very important	20	-	16	4	8	12
important	15	-	14	1	8	7
Total	38	-	33	5	19	19

Terminology:

- **in progress:** implementation is proceeding according to plan or new deadline / action plan agreed with the auditor,
- **implemented:** confirmed by the recommendation owner and is ready for the auditor's follow-up,
- **overdue:** implementation is in progress but was not achieved by the agreed deadline,
- **closed:** the auditor has formally closed the issue,
- **critical:** fundamental weakness in the audited process that is detrimental at entity level,
- **very important:** fundamental weakness that is detrimental to the whole process (all ECA recommendations carry this designation),
- **important:** significant weakness in the whole process or a fundamental weakness in a significant part of the audited process.

Table 8. Outstanding audit recommendations, incl. significant delays (>6 months, as at 31 December 2023)

#	Auditor/ Audit Title / year	Rec Number / Title	Rating	Original deadline	Delayed >6 months	Agency's actions
1	IAS report on controls over the procurement process / 2017	3. Controls before establishing specific contracts	important	31/12/2018	5 years 1 month	The Agency has adopted a control process, with template. The new procedure will be implemented by the end of June 2024.
2	IAS report on staff recruitment and engagement of structural service providers and organisational ethics in eu-LISA / 2020	1. Sourcing of human resources must be based on a documented and updated assessment	very important	30/09/2020	4 years 4 months	In March 2024, a major reorganisation was launched to support the new ways of working to ensure the successful delivery of the Interoperability Roadmap. By June 2024, eu-LISA will receive the results of the external evaluation. These two elements form the basis for updating the sourcing strategy and resource allocation method. Therefore, the Agency has refined the recommended implementation plan and moves the target date to March 2025.
3	ECA report on eu-LISA's annual accounts for the financial year 2017 / 2018	eu-LISA manages three separate, non-integrated large-scale IT systems (SIS, VIS, Eurodac), all dealing with data in the EU's JHA domain. This approach may prevent it from achieving economies scale and synergies between systems.	very important	31/12/2019	4 years	The joint SIS/VIS/Eurodac TOF LOT1 procurement ensures a unified approach and economies of scale for the operational management (maintenance / support) for all three systems. The Agency has completed the transition of infrastructure maintenance for all three systems to the transversal procurement model (TOF LOT2).
4	ECA report on eu-LISA's annual accounts for the financial year 2020 / 2021	Recurrent high rates of carry-overs contradict the budgetary principle of annuality and are indicative of structural issues in the implementation of the budget.	very important	31/12/2022	1 year	Implemented. eu-LISA has enhanced oversight and control over the initiation of commitments. The deadline for submitting new budgetary commitment requests is 30 September, ensuring better alignment of contract periods with the financial year. Senior management is tasked with keeping exceptions to a strict minimum, as the impact on carry-overs is significant. The impact of new measures will be confirmed by the level of carry-overs from 2024 to 2025.
5	ECA report on eu-LISA's annual accounts for the financial year 2021 / 2022	eu-LISA could have used the TEF and TOF contracts as soon as possible instead of amending the legacy contracts by max amount allowed by the Financial Regulation.	very important	31/12/2023	-	The joint SIS/VIS/Eurodac TOF LOT1 procurement ensures a unified approach and economies of scale for the operational management (maintenance / support) for all three systems. The Agency has completed the transition of infrastructure maintenance for all three systems to the transversal procurement model (TOF LOT2).

¹⁴¹ IAC Report on the status of open audit recommendations as at 31 December 2023, Ares(2024)1713484, 05 March 2024.

The Agency is committed to taking prompt and decisive action to address delays in the implementation of outstanding recommendations, including revising target dates. Going forward, eu-LISA will inform the auditors about progress with implementation.

To confirm the closure of the recommendations identified as 'implemented' by eu-LISA (items under 'closed'), IAS and IAC carried out an annual follow-up on action plans declared as 'implemented' and closed 19 audit recommendations.¹⁴² The ECA also followed up on the implementation of its audit recommendations from previous years.¹⁴³

7.9. Follow-up actions related to investigations conducted by OLAF¹⁴⁴

In 2023, the Agency implemented recommendations arising from OLAF investigations related to case OC/2017/1121/A2 and COM(2022)28974 (Administrative Recommendation AR-2022-0031).

7.10. Follow-up on observations from the discharge authority

In 2023, the Budgetary Control Committee (CONT) of the European Parliament launched the annual discharge process on the activities of EU agencies and joint undertakings performed in the financial year 2022. This process ensures compliance with the relevant legal and regulatory requirements and the application of sound financial management principles, namely the principles of economy, efficiency and effectiveness.

In April 2024, the European Parliament granted eu-LISA's Executive Director discharge regarding the implementation of the Agency's budget in 2022, approving eu-LISA's accounts for the financial year 2022, and shared its observations in a resolution.¹⁴⁵

To highlight identified areas for improvement and address areas of critical interest, the Agency, in particular:

- took the necessary steps to strengthen its internal controls and update the internal processes for contract management procedures to mitigate the weaknesses identified by auditors, including finalising its internal control strategy and improving its contract drafting capabilities;
- remained committed to closing outstanding audit recommendations without any further delay, and implementing any new audit recommendations in a timely manner;
- introduced new tools and methods to better plan and monitor budget implementation;
- continued with the transition from vertical to transversal sourcing for the development, evolution and maintenance of core business systems;
- redefined its recruitment strategy to better tackle concerns related to recruitment and gender balance;
- strengthened several elements of its risk assessment component and continued monitoring the strategic roadmap to better align its strategic and operational objectives, while also improving the overall implementation of the Agency's long-term strategy.

The Agency has prepared an action plan in response to ECA's observations on eu-LISA's 2022 accounts.

¹⁴² Follow-up on outstanding recommendations for IT security management at eu-LISA: IAS Note on audit conclusions, ref. Ares(2023)4482, 28 June 2023, Ares(2023)7132265, 01 Dec 2023; IAC follow-up results for 2023, ref. Ares(2024)1549093, 12 Feb 2024.

¹⁴³ [ECA Annual Report on EU Agencies for the financial year 2022](#), pp. 234-240.

¹⁴⁴ Article 11 of [Regulation \(EU/Euratom\) 883/2013](#) concerning investigations conducted by the European Anti-Fraud Office (OLAF).

¹⁴⁵ [European Parliament decision of 11 April 2024](#) on discharge in respect of implementation of the eu-LISA's budget for the financial year 2022 (2023/2165(DEC)); eu-LISA Action Plan ref. Ares(2024)2384688, 02 April 2024.

The following table lists the observations made in **ECA's 2022 discharge report** regarding eu-LISA's budget implementation and the Agency's response and measures taken to address these issues.¹⁴⁶

Table 9. Observations of the Discharge Authority

Discharge Authority's observations	eu-LISA's response and measures taken
Budget and financial management	
<ul style="list-style-type: none"> ■ notes that the budget-monitoring efforts during the financial year 2022 resulted in a budget implementation rate of 91,13% in commitment appropriations, which represents a decrease of 8,87% compared to 2021; ■ furthermore, notes with concern that the payment appropriations execution rate was 86,71%, representing a decrease of 7,94% compared to 2021. 	<p>Implemented</p> <p>The Agency has introduced new tools and methods for the planning and monitoring of budget implementation. The 2023 budget implementation level was 99.9% for both commitment and payment appropriations, with no carry-overs of differentiated appropriations.</p>
<ul style="list-style-type: none"> ■ notes with concern that according to the Court's report the Agency carried over EUR 14,4 million (23%) of available 2022 commitment appropriations to 2023 and that that amount included EUR 13,7 million (or 95%) of appropriations under Title II, related to administrative expenditure (97% in 2021); ■ observes the recurrence of carryovers of appropriations which lead the Court to recall that recurrent high rates of carryovers contradict the budgetary principle of annularity and are indicative of structural issues in the implementation of the budget or weak budgetary planning; ■ notes in this context that the signature in the fourth quarter of 2023 of the new framework contract for the provision of external support services is essential to reach those objectives; ■ expects that the implementation of that action plan will lead to a significant improvement and calls on eu-LISA to report to the discharge authority on the progress made. 	<p>Ongoing</p> <p>The Agency takes note of the observation.</p> <p>The Agency has drawn up an action plan including several measures implemented as of 2023 to respect the annuality principle and to reduce the level of carry-overs. Additionally, the Agency has designed new processes to reduce carry-overs in line with the principle of annuality.</p> <p>At the end of 2023, eu-LISA concluded a new framework contract for external support services (LISA/2022/OP/04). Services under this contract have been provided since the end of 2023 and will continue until the end of 2027.</p>
Performance	
<ul style="list-style-type: none"> ■ expects a significant contribution of the Agency to the digitalisation of justice in order to improve cooperation between Union's judicial authorities and providing better access to justice for Union citizens and businesses 	<p>Ongoing</p> <p>eu-LISA has made substantial contributions to the digitalisation of justice at EU level to improve cooperation between judicial authorities and provide better access to justice for citizens and businesses. eu-LISA's work towards JHA systems interoperability will also contribute to digitalisation of justice. To that end, eu-LISA collaborates with Eurojust, Europol and EPPO on e-CODEX, ECRIS-TCN, and in preparation for the JITs collaboration platform.</p> <p>eu-LISA has continued with ECRIS-TCN implementation as per the new Interoperability Roadmap, which has already produced tangible results with the first system release of ECRIS-TCN in May 2024.</p> <p>As for e-CODEX, the components were fully transferred to eu-LISA hosting environment by 30 November 2023, and the Agency assumed interim management on 27 March 2024. Formal takeover was completed in June 2024, as per Commission's declaration of the successful completion of the handover/takeover process.</p> <p>eu-LISA has also commenced with preparations for developing the JITs collaboration platform. The project will start in 2024 but since the Contribution Agreement for development was signed with the Commission in May, eu-LISA immediately proceeded with official setup of the project team and initiated contracting.</p>
<ul style="list-style-type: none"> ■ encourages the Agency to continue its cooperation with other Union agencies. 	<p>Ongoing</p> <p>The Agency takes note of the observation.</p> <p>eu-LISA has concluded working arrangements, memoranda of understanding and cooperation plans with most JHA agencies: CEPOL, EUAA, Eurojust, Europol, FRA, Frontex, and ENISA. These instruments set a horizontal framework for bilateral cooperation, aiming to facilitate more effective and comprehensive implementation of EU regulations. Bilateral cooperation is also carried out with BEREC and EIGE as fellow agencies located in the Baltic countries with common challenges.</p> <p>In view of strengthening collaboration with other EU agencies, and as part of the presidency trio format, eu-LISA has been preparing to take over the JHAAN presidency in 2024. Furthermore, eu-LISA actively participates in the work of different groups under the EU Agencies Network (EUAN).</p>

¹⁴⁶ European Court of Auditors (ECA) [Annual report on EU agencies for the financial year 2022, C/2023/594](#), 27 October 2023.

Discharge Authority's observations	eu-LISA's response and measures taken
Efficiency and gains	
<ul style="list-style-type: none"> calls on the Agency to continue its cooperation with other Union agencies so that all available resources can be used. 	<p>Ongoing</p> <p>The Agency takes note of the observation.</p> <p>eu-LISA has concluded service level agreements with several EU agencies for providing support in business continuity matters as well as increasing efficiency and synergies in other areas of cooperation. With Frontex and EUAA, agreements are in place for hosting their disaster recovery sites. eu-LISA provides data centre hosting services at its operational site in Strasbourg, France, for EUAA since 2016 and for Frontex since 2019, including support services.</p> <p>With ENISA, an agreement has been concluded for carrying out eu-LISA's annual cybersecurity exercises; with Europol there is an agreement on organising the joint Security Committee.</p>
<ul style="list-style-type: none"> calls on the Agency to step up its efforts towards the full implementation of the PPMT. 	<p>Implemented</p> <p>eu-LISA finalised PPMT onboarding process on 09/10/2023, after gaining access to PPMT production environment. As of 01/01/2024, PPMT is used for all procurement procedures above EUR 15 000.</p>
Staff policy	
<ul style="list-style-type: none"> notes that, despite the Agency's efforts, staff turnover increased from 5,5% in 2021 to 7,1% in 2022 and the occupancy rate dropped to 82%, lower than the Agency's target of 94%, in particular due to the number of short duration and lower grade posts that the Agency has to offer. 	<p>Ongoing</p> <p>The Agency takes note of the observation and continues its efforts to improve the occupancy rate and to reduce the turnover.</p>
<ul style="list-style-type: none"> notes with concern the composition of the Agency's senior and middle management with respect to gender, with 12 men (86%) and 2 women (14 %); of the management board with 50 men (82%) and 11 women (18%); and within the staff overall with 209 men (67%) and 101 women (33%); recalls the importance of ensuring gender balance and calls on the Agency to continue its efforts towards gender balance at all levels through concrete actions that attract applications from women for posts offered by the Agency; asks the Commission and the Member States to take into account the importance of ensuring gender balance when nominating their members to the Agency's management board. 	<p>Ongoing</p> <p>The Agency takes note of the observation and continues its efforts to improve the gender balance among its staff.</p> <p>The Agency has made considerable efforts to increase the number of female applicants, for example, by attending industry fairs and circulating vacancy notices on dedicated forums.</p> <p>In 2022, an informal group was established on the initiative of a woman manager to discuss opportunities to address the issue of gender balance both at managerial and non-managerial levels.</p> <p>Additionally, work continued to attract more female applicants to eu-LISA, including the following activities:</p> <ul style="list-style-type: none"> reviewing and rewording vacancy notices to make them more inclusive and circulating them on dedicated forums for ICT women professionals; inspiring and motivating its staff by organising online webinars with other EU agencies and the Commission, focusing on initiatives to improve gender balance in EU public service. <p>Additionally, eu-LISA is joining efforts and sharing experience with the other EU agencies and the Commission on initiatives to improve gender balance within the EU public service. In 2023, meetings were organised with EIGE and ECA to learn from their best practices in the area of diversity and inclusion. The Agency took part in an online global career fair for women focused on STEM (Science, Technology, Engineering and Math) profiles to attract a more diverse pool of candidates.</p> <p>The representation of female members and/or alternate members in eu-LISA's Management Board is steadily rising as Member States and the Commission have emphasised the importance of gender balance. Currently, the Board comprises 10 female members and/or alternate members from the total of 33. The Commission, represented by two members, nominated a female member to the Board in December 2023.</p>
<ul style="list-style-type: none"> takes note that, in 2022, three administrative inquiries related to harassment were performed and concluded internally, with an additional case taken before the courts; calls on the Agency to proceed swiftly with holding those responsible for misconduct accountable. 	<p>Ongoing/Implemented</p> <p>The Agency takes note of the observation and will continue its efforts to promote respect and dignity in the workplace and apply zero-tolerance to harassment.</p>

Procurement

- highlights the observations in the Court's report that led to a qualified opinion due to the irregularity of several payments made in 2022 for a total of EUR 17,8 million in connection with seven specific contracts, representing 4,8% of the total payment appropriations available in 2022;
- notes that the irregularity of those payments is mainly linked to deviations from the corresponding framework contracts;
- notes that according to the Agency's replies to Parliament's written questions, the irregularities with regard to payments made in 2022 can be grouped under three categories: amendment of fixed-term contracts (EUR 6,5 million); extension of specific contracts beyond the maximum allowed time period (EUR 3,7 million); and lack of details on requirements in specific contracts (EUR 7,5 million);
- notes that some of those irregular payments, totalling EUR 10,5 million, relate to three specific contracts based on which payments were also made in 2021 and found irregular by the Court in its annual report on Union agencies for that year;
- notes that according to the statements made by the executive director of the Agency during her meeting with Parliament's Committee on Budgetary Control on 29 November 2023 (the 'statements of the executive director') six of the seven specific contracts identified in the Court's report have expired without outstanding payments;
- highlights that this has been a recurring issue for the Agency;
- calls on the Agency to continue to address that issue fully and report back to the discharge authority on the progress achieved.

- notes with grave concern that 2022 was the third year in a row for which the Court issued a qualified opinion regarding the Agency's procurement and contract management area, with elevated costs borne by eu-LISA, due to irregularities, delayed and inadequate tender procedures and lack of diligence displayed with regard to procurement rules;
- notes the Agency's action plan for an in-depth review of its processes in order to identify and remove the root causes of ECA's recurrent observations in that area as set out in the replies to Parliament's written questions, in the Agency's follow-up report and in statements of Executive Director;
- expects therefore a lasting improvement as a result of implementing that action plan, in particular given that six of the seven specific contracts deemed by the Court irregular have expired without outstanding payments;
- calls on the Agency to periodically report to the discharge authority on the progress achieved in the implementation of the action plan and any corrective actions undertaken.

- highlights that according to the Court's report in 2022, just as in 2021, the Agency made payments based on a specific contract (of an amount of EUR 40 million) that did not properly implement the associated framework contract because it did not specify the details of the services acquired (the quantities and the date of delivery);
- notes that under that contract the Agency paid EUR 7,5 million in 2022;
- acknowledges that according to the Agency's comments included in the note of 13 November 2023 titled '2022 Discharge - ECA findings on eu-LISA. Brief note for MEPs' the root cause of the indeterminate nature of that contract, signed at the end of 2018, was the need to preserve funding for the EES-VIS interoperability, for which the budgetary planning, outside the Agency's control, shifted significantly from the actual adoption of the relevant legislation;
- notes that without that contract, the associated amount, necessary to ensure interoperability, would have been lost;
- notes, as set out in the Agency's reply to the Court's observation, the corrective measures that the Agency has taken through an amendment to that contract whereby a more detailed description of services provided was added;

Partially implemented

The Agency took note of these observations and focuses on improving contract drafting accordingly. In order to prevent similar occurrences in the future, the Agency has introduced additional and more specific clauses in new tenders to better reflect operational requirements and facilitate change management.

eu-LISA is committed to delivering its mandate in a fully compliant way. That is why, under its new leadership and taking into account the important comments received from ECA, the Agency has started an in-depth review of its processes in order to identify and remove the root causes of these observations:

- strengthening of its procurement capabilities, through organisational consolidation, acceleration of new recruitments and identification of dedicated external advisors to provide independent expertise on specific and highly complex cases;
- a root-cause analysis on more than 500 contracts (of which 160 are still active) was conducted to identify the underlying issues and define remediation measures. Among the solutions identified: dedicated trainings, introduction of checklists, better definition of roles and enhancement of internal communication on contract management;
- intensify controls with new checklists over contract management activities to ensure no material changes are made to framework contracts;
- drafting the Internal Control Strategy for formal adoption in mid-2024. This will include: risk assessment; cost-benefit analysis; measures to reinforce organisational capabilities; staffing levels and intensity of controls;
- creation of an Executive Director sponsored 'zero-defect on contract management' task force to monitor, control and ensure compliance over the conclusion of contracts, from the definition of needs until the signature, including any amendments.

Ongoing

As explained in the previous sections, the Agency is constantly improving its processes and checks in order to support its complex sourcing model.

Implemented

The Agency confirms that the root cause of the issue was the need to secure funding for EES projects despite delays in the information necessary to start development activities.

The strengthening of internal control, as described in the previous paragraphs, substantially reduces the potential repetition of the situation of this 2018 contract, which has now expired.

Discharge Authority's observations	eu-LISA's response and measures taken
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- notes that the Agency did not extend that contract, which expired in 2022;
- recalls in this context that delays in the adoption and implementation of relevant legal acts are key factors in determining the level of detail and precision that eu-LISA is able to offer when initially establishing framework contracts;
- notes the view set out in the Agency's follow-up report that the shortening of the preparation period for the implementing acts would have a direct impact on the Agency's capacity to better plan its procurement and limit contractual changes.

- notes with concern that according to the Court's report the Agency used a negotiated procedure to award a contract, without prior publication of a contract notice;
- notes that the Agency justified this decision on grounds of extreme urgency against the advice of the Agency's procurement and legal services;
- notes the reasons of the Court as to why the use of that procedure was not justified;
- notes eu-LISA's reply that a risk of maintenance gap of several months would have materialised because the timelines for implementing the EES programme formally changed at a later stage and the overall time necessary for the contract award and for transition to a new contractor was estimated to be of at least eight months;
- considers in this context that the Agency's approach was a sensible one;
- notes that according to the Agency's reply the awarded contract has meanwhile expired.

- notes further two observations regarding the Agency's management and control systems contained in ECA report;
- notes the first observation with regard to the acquisition of hardware (EUR 27,7 million) for which the price lists of the hardware vendors were not obtained and ex-ante checks were not performed;
- notes the second observation with regard to the procurement of a transversal operations framework contract with an estimated value of EUR 490 million that for six meetings of the evaluation committee no records were kept and only the final report was signed;
- calls on the Agency to improve its internal control systems to avoid such shortcomings in the future.

- notes that the Agency has eight observations from the Court's reports from previous years (2017, 2018 and 2021) with the status 'open';
- urges the Agency to close those observations without delay and inform the discharge authority of the progress made in this regard.

Internal control

- notes that a major deficiency on principle 10 'Selects and develops control activities' under the component 'Control activities' persists for a third year in a row;
- calls on the Agency to continue its efforts to reduce weaknesses in the area of control activities in order to mitigate risks related to the achievement of policies and operational and internal control objectives.

- calls on the Agency to implement the outstanding recommendations and to report to the discharge authority about the progress made.

Implemented
 The framework contract in question has been terminated by the Agency. The required services necessary for the maintenance and interoperability of the systems have been procured under a framework contract following open procedures.

Ongoing
 Prices paid under the contract for the acquisition of hardware and its maintenance were reconciled ex-post with the framework terms and conditions.
 The documentation of evaluation committee records has been improved.
 The Agency is constantly improving its processes and checks in order to support its complex sourcing model.

Implemented
 For all observations still open, action plans have been prepared to address and close all findings by the end of 2023/mid 2024.

Partially implemented
 According to eu-LISA's 2024 Internal Control Framework report, there were no major deficiencies in 2023, in particular due to the high rate of implementation of outstanding audit recommendations and remediation actions to address internal control deficiencies.
 In addition, the Agency is drafting its Internal Control Strategy, with the aim of finalising it by the summer of 2024. The strategy will be presented to the Management Board's Audit, Compliance and Finance Committee (ACFC) in October 2024.
 Improving compliance is one of the Agency's key priorities, and it will actively continue to reduce the remaining deficiencies.

Partially implemented
 At the end of 2023, eu-LISA implemented and closed 14 out of 16 outstanding audit recommendations (87%). The two remaining recommendations, more complex and dependent on other improvements, are planned to be implemented by December 2024 and March 2025, respectively. The Agency is fully committed to resolving all outstanding recommendations without any further delay, and addressing any new ones in a timely manner.

7.11. Environmental management

Following the endorsement of the **Environmental Policy** in 2022, eu-LISA is committed to putting in place an internal environmental management system (EMS), in compliance with the EU **Eco-Management and Audit Scheme (EMAS)**, and is working to obtain EMAS certification by 2024. This will ensure that eu-LISA's activities are in alignment with the **European Green Deal** initiative to reduce GHG emissions in all business areas.

In 2023, the Agency published its **first official environmental statement report for 2022**, detailing the objectives, monitoring and progress.¹⁴⁷ The report includes a summary table outlining the sources of environmental impacts, action plans, and performance indicators for all environment-related aspects. To engage staff in this EMAS journey, the Agency established an internal task force of volunteers, internally referred to as the **Green Team**, who take part in dedicated working groups.

7.12. Assessment by the Management

The Agency's management is **reasonably confident** that suitable controls are in place and functioning as intended with risks being monitored and mitigated appropriately, with various improvements and reinforcements implemented as necessary. Going forward, the Agency will focus its particular attention on improving the management, control systems and budgetary, procurement and contract management.

In 2023, major risks were identified and managed, as further confirmed by the results of both internal and external audits performed throughout the year. The Agency has devised necessary action plans to address observations and close pending recommendations.

Furthermore, eu-LISA's management recognises the need to maintain the effectiveness of its internal control framework and to ensure monitoring and assessment of its implementation to ensure achievement of the Agency's objectives as set out in the establishing Regulation and long-term strategy.

7.13. External evaluation

According to Article 39 of eu-LISA's establishing Regulation, the Agency must undergo a performance evaluation every five years, and the next evaluation is expected to be launched by the European Commission in 2023. This evaluation will consider eu-LISA's performance against its mandate, objectives, locations and tasks. The evaluation will also assess how successfully the Agency contributes and adds value to the operational management of the EU's JHA information systems, and how it has succeeded in establishing a coordinated, cost-effective and coherent IT environment for their management and operation.

At the request of the Commission, the Agency undertook an **independent benchmarking exercise** to prepare for the external evaluation by the Commission. An external contractor assessed eu-LISA's overall operational performance, the adequacy of the distribution and use of human resources, and its contribution to the objectives of relevant EU policies in the area of justice and home affairs. To provide more comprehensive insight into eu-LISA's possible development trajectory and evolution in the years to come, the Agency commissioned the contractor to provide additional recommendations on strategic improvements with a medium-term perspective. Due to the extended scope of the exercise, the final report was completed in January 2024.

¹⁴⁷ [eu-LISA Environmental Statement 2022](#), published 10 October 2023.



ASSESSMENT OF THE EFFECTIVENESS OF ICF

The effectiveness of the internal control framework (ICF) and major corporate risks for the reporting period.



Assessment of the effectiveness of the ICF

8.1. Effectiveness of the Internal Control Framework

Internal control systems help organisations achieve their objectives while sustaining operational and financial performance in compliance with relevant rules and regulations. A well-functioning internal control system supports sound decision-making and helps reduce risks to acceptable levels through cost-effective controls.

In 2019, the eu-LISA Management Board tasked the Executive Director with implementing an Internal Control Framework (ICF) in compliance with the principles and characteristics adopted by the Board.

The Agency's ICF comprises the following five components: (1) control environment, (2) risk assessment, (3) control activities, (4) information and communication, and (5) monitoring activities. For effective internal control over operations, these five interrelated components must be present and function well at all levels of the organisation. The ICF further specifies the underlying principles for each component and related characteristics of each principle that are defined to consider the specific governance arrangements established in the Agency. These internal control principles and characteristics constitute the minimum standards set in Article 45(2) of the eu-LISA Financial Rules.

The Executive Director is mandated to conduct an **annual assessment of the ICF's effectiveness**. The Agency's Deputy Executive Director serves as the Manager in charge of Risk Management and Internal Control (MRMIC) to support the setup, monitoring, implementation, assessment, and reporting on eu-LISA's ICF.

In 2023, the function of the MRMIC duties were performed by the Deputy Executive Director from 16 March 2023 to 31 December 2023. From November 2022 until 16 March, the Deputy Executive Director was appointed as Executive Director *ad interim*. During this period, the duties of MRMIC were delegated to the Head of Governance and Capabilities Unit. On 16 January 2024, the Deputy Executive Director resigned. In order to ensure business continuity and the necessary segregation of duties between the ED and the MRMIC, the role of the MRMIC was again temporarily delegated by ED Decision to the Head of Governance and Capabilities Unit (GCU), Mr Philippe Harant. The delegation is valid until the appointment of the new Deputy Executive Director, and the delegated responsibilities include the completion of the present ICF assessment.

8.1.1. Methodology

The annual assessment of the ICF includes the following steps: establishing monitoring criteria for each internal control principle, identifying strengths and areas of improvement, conducting an assessment at the level of individual principles and components, and also delivering an overall assessment.¹⁴⁸ For this assessment, the MRMIC collects and analyses data based on pre-defined monitoring criteria from various internal sources, incl. staff engagement survey, the register of exceptions and non-compliance events, internal and external audit reports, and other documentation on internal business processes.

8.1.2. Assessment results

Internal control monitoring criteria

The self-assessment conducted in 2024 resulted in 88% of internal control monitoring criteria achieved or partially achieved in 2023.

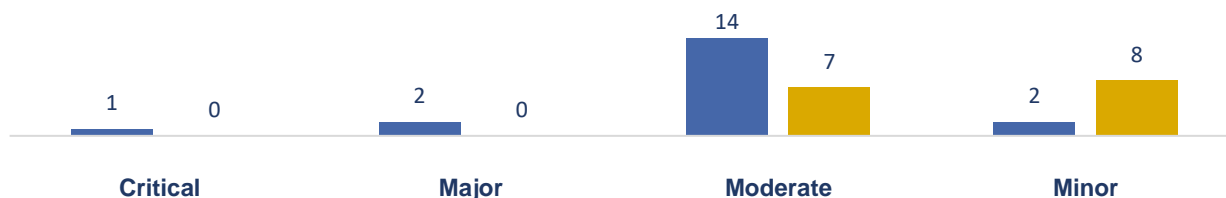
Internal control monitoring criteria	2023	2024
Total number of indicators	79	79
■ achieved	56 (71%)	62 (78%)
■ partially achieved	8 (10%)	8 (10%)
■ not achieved	15 (19%)	9 (10%)
■ not available	0 (0%)	1 (1%)

¹⁴⁸ The indicators for each ICF principle, as well as their baselines and targets, are defined in Annex 2 of the Executive Director's decision on the Adoption of Internal Control Monitoring Criteria and the appointment of the MRMIC.

Internal control strengths and deficiencies

In the 2024 assessment, 6 deficiencies were closed and 12 were reduced in severity. One new moderate and one minor deficiency were identified, leading to a total of 15 internal control deficiencies, comprising 7 moderate deficiencies and 8 minor deficiencies. Two new deficiencies were identified as a consequence of auditing and self-assessment. No critical or major deficiencies remain open for the first time since 2021.

Figure 13. ICF deficiency status assessment in 2023 and 2024



Throughout 2023, the Agency conducted various activities to implement remediation plans and remove internal control deficiencies.



Overall, the results of the 2024 assessment show that eu-LISA's internal control system is present, functioning and effective, although some improvements are needed (category 2).

Assessment of ICF components

ICF components	Strengths	Deficiencies
I Control environment	<ul style="list-style-type: none"> oversight of the management, Management Board and its Audit, Compliance and Finance Committee (ACFC) on internal controls business continuity and segregation of duties 	<ul style="list-style-type: none"> ensure participation/attendance at ethics and integrity capabilities/training sessions increase enforcement of accountability and knowledge transfer
II Risk assessment	<ul style="list-style-type: none"> adoption of revised Risk Management Strategy implementation rate of remediation actions for audit recommendations reached 87% whistleblowing process defined and 75% of Anti-Fraud Strategy Action Plan implemented appointment of new eu-LISA Accounting Officer 	<ul style="list-style-type: none"> completion and follow-up on Units' Risk and Issue Register strengthen internal controls with the implementation of recommendations from the Anti-Fraud Strategy implementation report
III Control activities	<ul style="list-style-type: none"> successful implementation of remediation plans and closure of critical audit recommendations adoption of Asset Management Policy ensuring security objectives, business continuity, and performance vulnerability scans 	<ul style="list-style-type: none"> compliance, especially in the area of contract management and monitoring enhanced risk management finalisation of the Internal Control Strategy
IV Information and communication	<ul style="list-style-type: none"> design of the whistleblowing process and revision of the Guidelines on Whistleblowing annual revision on the appointment of public access to documents (PAD) contact persons all recommendations stemming from the EDPS audit have been closed ('back-to-green') internal and external communication channels are well established and functioning 	<ul style="list-style-type: none"> all deficiencies resolved
V Monitoring activities	<ul style="list-style-type: none"> regular monitoring of deficiencies and follow-up on the remediation actions 	<ul style="list-style-type: none"> finalise the process for assessment of the materiality of potential deficiencies and reservations

I Control environment

The control environment component comprises a set of standards of conduct, processes, and structures that provide the basis for internal control activities across an organisation. At the management level, the overall tone regarding the importance of internal control, including expected standards of conduct, is set by the Management Board, the Executive Director, and the rest of the top management.

The control environment component of the ICF is present and functioning well (**Category 1**).

eu-LISA has a well-established control environment, comprising a set of standards of conduct, processes and structures, that provides the basis for carrying out internal controls. The Agency continuously reviews and updates its control environment to increase its effectiveness and efficiency. The Agency has ensured that its structure, reporting lines, authorities and responsibilities were well established and reviewed, as needed. Despite the Agency's efforts, the staff turnover rate is still above the target value. High workloads negatively affect attendance at trainings and capacity-building opportunities on ethics and integrity. Individual accountability for internal control and transfer of knowledge has been identified as a priority for eu-LISA.

Principle	Assessment
1. Demonstrates commitment to integrity and ethical values	The principle is present and functioning well (Category 1)
2. Exercises oversight responsibility	The principle is present and functioning well (Category 1)
3. Establishes structure, authority and responsibility	The principle is present and functioning well (Category 1)
4. Demonstrates commitment to competence	The principle is present and functioning well (Category 1)
5. Enforces accountability	The principle is present and functioning well (Category 1)

II Risk assessment

Risk assessment is a dynamic and iterative process for identifying and assessing risks that could affect the achievement of objectives, and for determining how such risks should be managed.

The risk assessment component of the ICF is present and functioning, but some improvements are needed (Category 2).

eu-LISA continues to rely on its risk management strategy and risk assessment processes to effectively specify its objectives and identify and analyse risks. Following the adoption of the Strategy Implementation Roadmap in 2022, the first implementation report on the achievement of planned deliverables (contributing to the achievement of strategic goals and strategic objectives) was prepared for the years 2021 and 2022. The Agency revised and adopted its **new Risk Management Strategy**. The strategy further defines the standardised approach for risk materialisation and risk tolerance and provides guidance on its implementation in the Programme Boards. Completion and follow-up on Units' Risk and Unit's Issue Register remains an ongoing deficiency for the Agency. In the area of fraud prevention and detection, the whistleblowing process was defined. The Agency managed to implement 75% of its Anti-Fraud Strategy action plan for 2022-2024. The implementing recommendations from the Anti-Fraud Strategy report will additionally strengthen internal controls in 2024. Substantial efforts were dedicated to close all open audit recommendations. By the end of 2023, the implementation rate of remediation actions for all audit recommendations was 87%. However, 8 very important audit recommendations related to financial management remain to be closed. The Agency's Accounting Officer was appointed in January 2023, and the new Executive Director took over the responsibilities as the Authorising Officer as of 16 March 2023.

Principle	Assessment
6. Specifies suitable objectives	The principle is present and functioning well (Category 1)
7. Identifies and analyses risk	The principle is present and functioning well (Category 1)
8. Assesses fraud risk	The principle is present and functioning, but some improvements needed (Cat 2)
9. Identifies and analyses significant changes	The principle is present and functioning well (Category 1)

III Control activities

Control activities mitigate risks related to the achievement of objectives (policy, operational, internal control), applicable to all levels of the organisation, various stages of business processes, and across the technology environment. They may serve a preventive or detective role, encompassing a range of manual and automated activities, as well as segregation of duties.

The control activities component of the ICF is present and functioning, but some improvements are needed (**Category 2**).

The 2024 assessment of the component concluded that it is partially present, functioning, and effective, but in need of some improvement: raised to Category 2 (compared to Category 3 in 2023). This is largely due to the successful implementation of remediation plans and closure of the ‘critical’ (related to EES) and ‘major’ audit recommendations, as well as reclassification of other remaining ‘major’ recommendations to ‘moderate’. No ‘critical’ or ‘major’ deficiencies remain open for the first time since 2021.

The Agency put significant effort into the most critical compliance areas, such as contract management, procurement and sourcing, and also for the transition to the horizontal operating model. As part of remediation efforts, the Agency adopted the **Asset Management Policy** as a preventive control mechanism. eu-LISA further strengthened the exception reporting process, especially by ensuring systematic follow-up on the remediation actions. Finalisation of the Internal Control Strategy in 2024 will further define and strengthen internal controls, and its implementation will ensure end-to-end project compliance. The Agency continued to increase its control over technology and IT security, posting good results.

Principle	Assessment
10. Selects and develops control activities	The principle is partially present and functioning, but some improvements are needed (Category 2)
11. Selects and develops general control over technology	The principle is present and functioning well (Category 1)
12. Deploys through policies and procedures	The principle is present and functioning, but some improvements are needed (Category 2)

IV Information and communication

Information delivered through communication is necessary for any organisation to carry out internal control activities and to support the achievement of objectives. Internal communication provides staff with the information it needs to achieve its objectives and to carry out day-to-day controls, while external communication provides the public and stakeholders with information on the Agency’s policy objectives and actions.

The information and communication component is present and functioning well (**Category 1**).

The Agency’s information and communication activities follow well-established procedures and processes that support the achievement of broader organisational objectives. In 2023, internal and external communication were conducted in line with the approved annual plan. eu-LISA continued to strengthen its controls on information management with the annual revision of the Appointment of Contact Persons for Public Access to Documents (PAD) and by appointing PAD contact persons across the Agency. For the first time, all recommendations regarding data management and protection stemming from the European Data Protection Supervisor (EDPS) audit have been successfully closed. An ICF awareness session was developed (and delivered in February 2024), and six training sessions on exceptions and non-compliances were delivered to staff across the Agency.

Principle	Assessment
13. Uses relevant information	The principle is present and functioning well (Category 1)
14. Communicates internally	The principle is present and functioning well (Category 1)
15. Communicates externally	The principle is present and functioning well (Category 1)

V Monitoring activities

The Agency engages in continuous and specific assessments to ascertain whether each of the five ICF components is present and functioning. Continuous assessments, built into processes at different levels of the organisation, provide timely information on any possible deficiencies. The Agency regularly assesses all findings and promptly communicates and corrects deficiencies found.

The monitoring activities component is present and functioning well (**Category 1**).

The Agency continued to strengthen the monitoring and assessment of its internal controls which are based on input from reporting activities, internal and external audits, analysis of exceptions and non-compliance events, corporate risk register, implementation of the anti-fraud strategy, and self-assessment by staff within their respective areas of responsibility.

Principle	Assessment
16. Conducts ongoing and/or separate assessments	The principle is present and functioning well (Category 1)
17. Assesses and communicates deficiencies	The principle is present and functioning well (Category 1)

8.1.3. Major corporate risks

The Agency continued to monitor corporate risks and issues in a continuous, proactive and standardised manner. In 2022, the manager in charge of risk management and internal control refined and validated the impact and probability criteria in order to standardise and automatically qualify the items at the corporate level. To address the 2021 ICF assessment findings, the registers for risks and issues are maintained at unit level.

In October 2023, the Management Committee endorsed the **new Risk Management Package**, comprising the risk management policy, classification criteria for corporate risks and issues, definition of the risk management process, working instructions (implementation in Planview portfolios), and the KPI agreement.

Throughout 2023, the status of corporate risks and issues was presented to the Management Committee on a quarterly basis – in April, July and November. In addition, the latest update on corporate risks and issues is sent monthly to all staff members and remains accessible on the intranet.

During the year, the Agency closed five risks, demoted two to unit level and added four new items (two of which were reclassified into issues during the year).

The table below shows the list of corporate risks as at December 2023. In addition to the information included below, the full corporate risks register includes a description of the risk response, together with a timeframe for action, which is regularly reviewed and updated.

Table 10. Corporate risks as at 31 December 2023

ID	Corporate Risk Title	Probability	Impact	Owner and other contributors
2017-01	Targeted and successful external cyber-attack on eu-LISA infrastructure	3 – high	4 – very high	Head of Security Unit
2018-01	Measures already taken might not be sufficient to ensure that the sizing of the data centre capacity will enable eu-LISA to host additional systems in the future	3 – high	4 – very high	Head of Infrastructure Management Unit and Head of Corporate Services Department
2018-06	Breach of confidentiality: accidental public exposure of sensitive data when responding to public information requests	2 – medium	4 – very high	Head of Corporate Services Department
2019-05	Lack of physical space available in time to accommodate the Agency's critical needs	3 – high	3 – high	Head of Corporate Services Department and Head of Corporate Services Unit and Head of HR Unit
2019-08	Technical support model and capacity: significant increase of requests addressed to eu-LISA's technical support functions after the entry into operation of new systems may lead to severe degradation of the technical support for both new and existing systems	3 – high	4 – very high	Head of Systems Operations Unit Head of Security Unit Head of HR Unit
2020-01	Insufficient legal checks	3 – high	4 – very high	Head of Corporate Services Department
2020-06	Challenge to hire resources aligned with the Agency's needs – risk of not finding the 'right fit' for eu-LISA	3 – high	4 – very high	Head of Human Resources Unit
2020-08	Maintenance in working order contracts not efficient enough for end-of-lifecycle hardware and software	3 – high	4 – very high	Head of Planning and Standards Unit and Head of Infrastructure Management Unit
2021-02	Accurate, complete and updated system documentation is not kept in a central repository administered by eu-LISA	3 – high	4 – very high	Head of Planning and Standards Unit Head of Programme and Project Delivery Unit
2022-04	Insufficient resources for management of EXTRA contracts	3 – high	4 – very high	Head of Corporate Services Department
2022-07	Due to the current conflict between Russia and Ukraine, the geopolitical situation in Europe has been impacted, increasing the risks to EU institutions, bodies and agencies. This impacts eu-LISA with increased cyber activities and the need to reinforce physical protection of sites/premises	3 – high	4 – very high	Head of Security Unit and Executive Director
2023-03	Risk of insufficient budget for the communication infrastructure because of the renegotiation of TESTA-ng III framework contract	3 – high	4 – very high	Head of Infrastructure Management Unit
2023-04	Legal risk in the possible requalification of some EXTRA (external support) contracts as staff posts	3 – high	4 – very high	Head of Corporate Services Department Head of HR Unit

8.1.4. Implementation of the Anti-Fraud Strategy Action Plan for 2023

The Anti-fraud Strategy of the Agency for the period 2022–2024 has three strategic objectives:

- to achieve full compliance with anti-fraud principles,
- to set and maintain a high level of ethics in all activities of eu-LISA,
- to develop and use data collection and analysis.

The regular monitoring of the status of implementing the Anti-fraud Strategy 2022–2024 action plan indicated that none of the fraud risks materialised in 2023.¹⁴⁹ The action plan comprises 13 actions, each aimed at mitigating one or several fraud risks. In December 2023, the results of the monitoring exercise showed that the Agency implemented seven out of ten actions due (three actions are ‘ongoing’ within the deadline), thus the implementation rate stood at 75%.

The overall quantitative implementation of the Action Plan to the Anti-fraud Strategy of eu-LISA in 2023 appears sufficient. However, although there were not identified any instances of suspected fraud during this exercise, the following opportunities for strengthening internal controls are highlighted:

- action owners should intensify efforts in order to achieve full implementation of the action plan in the next year. Due to the complexity of the delayed actions, revised deadlines for implementation were agreed;
- the implementation of Implementing Rules on Guide to Missions adopted by the Agency should be strengthened;
- financial ceilings and rules for organising social events should be set and communicated to the relevant stakeholders.

8.2. Conclusions of the assessment of the effectiveness of the ICF

Overall, the assessment results indicate that **eu-LISA’s internal control system is present, functioning and effective, but some improvements are needed (Category 2)**.

8.3. Statement of the Manager in charge of Risk Management and Internal Control

Statement of the Manager in charge of Risk Management and Internal Control

I, the undersigned,

the Manager in charge of risk management and internal control at the European Union Agency for the Operational Management of Large-Scale IT Systems in the Area of Freedom, Security and Justice (eu-LISA), in my capacity as the Manager in charge of risk management and internal control, I declare that in compliance with eu-LISA’s Internal Control Framework, I have reported my advice and recommendations on the overall state of internal control in the Agency to the Executive Director.

I hereby certify that the information provided in this Consolidated Annual Activity Report and its annexes is, to the best of my knowledge, accurate, reliable and complete.

Philippe Harant

Manager in charge of Risk management and Internal Controls *ad interim*

[Qualified electronic signature]

¹⁴⁹ IAC Monitoring Report on the implementation of Anti-fraud Strategy action plan for 2023, ref. Ares(2024)1056755, 12 February 2024.



IV

MANAGEMENT ASSURANCE

Management assurance

9. Review of the elements supporting assurance

This section provides an overview of the building blocks underpinning the reasonable assurance the Authorising Officer gives via their declaration of assurance in the annual activity report.

▾ Building block 1: Assessment by the management

The **Agency's management is reasonably confident** that suitable controls are in place and functioning as intended with risks monitored and mitigated appropriately and various improvements and reinforcements implemented as necessary. Furthermore, eu-LISA's management recognises the need to maintain the effectiveness of its internal control framework and to ensure monitoring and assessment of its implementation to ensure achievement of the Agency's objectives as set out in the establishing Regulation and long-term strategy.

In 2013 the Agency established a formal procedure for **registering exceptions and non-compliance events**, with the respective guidelines developed in 2021. The procedure lays down appropriate measures for ensuring that any exceptional cases of overriding controls or deviations from the established regulatory framework are thoroughly explained, registered and reported in accordance with the principle of transparency. All exceptions and non-compliance events must be documented, registered, and approved appropriately before any action is taken. According to eu-LISA guidelines, the management is tasked with following up on all reported cases twice a year via a dedicated analytical report.

In 2023, 21 exceptions and 12 non-compliance events were registered by eu-LISA. All registered cases, as well as the corrective and mitigating actions, were analysed and reviewed by the Agency's management in Q3 2023 and Q1 2024, resulting in the adoption of an action plan to minimise their occurrence and impact. These analyses were also used to identify deficiencies during the ICF effectiveness assessment.

▾ Building block 2: Results of external audits

The European Court of Auditors (ECA) issued the following statement of assurance to the European Parliament and the Council:

Opinion on the reliability of the accounts: in ECA's opinion, eu-LISA's accounts for the year 2022 present fairly, in all material respects, its financial position as at 31 December 2022 (results of operations, cash flows, changes in net assets) in accordance with its Financial Regulation and with accounting rules adopted by the Commission's Accounting Officer. These are based on internationally accepted accounting standards for the public sector. However, under the emphasis of matter title, the Court draws attention to Note 2.1.5.3 to the annual accounts for 2022, which describes the delays in the implementation of the Entry/Exit System and its impact on eu-LISA operations.

Opinion on the legality and regularity of revenue underlying the accounts: in ECA's opinion, the revenues underlying the accounts for the year ended 31 December 2022 are legal and regular in all material respects.

Opinion on the legality and regularity of payments underlying the accounts: ECA identified a total amount of payments of EUR 17.8 million affected by non-compliance, representing 4.8% of the payment appropriations available in 2022, thus exceeding the materiality threshold set for the audit and resulting in a qualified opinion on the legality and regularity of payments underlying the accounts.

ECA also made observations on the management, control systems and budgetary management that did not call the above opinions into question. The Agency devised an action plan to address these observations.

▾ **Building block 3: Follow-up on reservations from previous reporting periods**

The declaration of assurance provided by the Authorising Officer in the Consolidated Annual Activity Report for 2022 contained the following reservations:

- the entry into operation of the renewed SIS was postponed from November 2022 to 7 March 2023;
- in consideration of the observations stemming from internal and external audits, control weaknesses exist in the context of operational programmes and projects affecting the regularity of procurement and contract management activities performed in the financial year 2022. To address the pending audit recommendations related to procurement and contract management, the Agency began revising its procurement guidelines/procedures adopted in 2021. In parallel, eu-LISA is preparing new contract management guidelines/procedures, with a view to adopting them by September 2024;
- the litigation process with the building contractor (related to the first extension of eu-LISA's technical site in Strasbourg, France), which continued in front of the Court of 2nd instance in Strasbourg, was closed at the beginning of 2023 (out-of-court mediation and signature of bilateral agreement imminent).

9.1. Conclusions

Based on information provided in Chapter 3 of this report, it can be concluded that there are no significant weaknesses in internal controls that might have an impact on the declaration of assurance. However, the Court drew attention to Note 2.1.5.3 to the annual accounts for 2022, describing the delays in the implementation of the Entry/Exit System and its impact on eu-LISA operations.

Additionally, ECA also made observations on the management, control systems and budgetary management, that did not call their opinions into question. The Agency devised an action plan to address these observations.

Furthermore, to address the pending audit recommendations related to procurement and contract management, the Agency started revision of its procurement guidelines/procedures adopted in 2021, and in parallel, setting up new contract management guidelines/procedures.

9.2. Reservations

Based on the information provided above, the Authorising Officer issued the following reservations in relation to the management's declaration of assurance for 2023:

- In January 2023, the eu-LISA Management Board concluded that the entry into operation of the Entry/Exit System in May 2023 was no longer feasible. In order to unblock the situation, the Agency put in place a new 3Rs strategy (Remobilise, Resolve, Renew). This allowed the preparation of a robust interoperability roadmap, with a gradual implementation in four waves between 2024 and 2026. The roadmap was endorsed by the Board and approved by the JHA Council on 19 October 2023. As at 1 May 2024, the Agency is on track to deliver according to the roadmap. To the Agency's knowledge, all parties are engaged in test campaigns.
- In consideration of the observations stemming from internal and external audits, residual risks and control weaknesses still exist in the sourcing of human resources, controls over procurement and contract management activities in the context of operational programmes and projects, with the potential to affect the regularity of transactions performed in the 2023 financial year. These issues are currently addressed by the Agency with the objective of a resolution as early as possible. The progress of the open audit recommendation is regularly reviewed by the Management Board.

Additionally, concerning qualified opinion of the European Court of Auditors on the legality and regularity of the 2022 payments underlying the accounts, the Agency devised an action plan to address observations concerning management, control systems and budgetary management.



V

DECLARATION OF ASSURANCE

Declaration of assurance

I, the undersigned,

Executive Director of the European Union Agency for the Operational Management of Large-Scale IT Systems in the Area of Freedom, Security and Justice (eu-LISA),

In my capacity as Authorising Officer,

Declare that the information contained in this report gives a true and fair view.

I further state that I have reasonable assurance that the resources assigned to the activities described in this report have been used for their intended purpose and in accordance with the principles of sound financial management, and that the control procedures put in place give the necessary guarantees concerning the legality and regularity of the underlying transactions.

This reasonable assurance is based on my own judgement, consultations with the Authorising Officers by Delegation, and on the information at my disposal, such as the results of the annual assessment of the effectiveness of the internal control framework, the annual review of exceptions and non-compliance events, the annual review of the implementation of audit recommendations, and the preliminary opinion of the Court of Auditors on the legality and regularity of the transactions performed in the financial year 2023.

I confirm that I am not aware of anything not reported here which could harm the interests of the Agency or its stakeholders.

However, the following reservations should be noted:

The eu-LISA Management Board concluded in January 2023 that the entry into operation of the Entry/Exit System in May 2023 was no longer feasible. In 2023, the Agency has put in place a new strategy (3 Rs – Remobilise, Resolve, Renew), in order to unblock the situation. This allowed the preparation of a robust interoperability roadmap, with a gradual implementation in four waves between 2024 and 2026. The roadmap has been endorsed by the eu-LISA Management Board and approved by the Justice and Home Affairs Council (JHA) on 19 October 2023. As at 1 May 2024, the Agency is on track to deliver according to the roadmap. To the knowledge of the Agency all parties are engaged in testing campaigns.

In consideration of the observations stemming from internal and external audits, residual risks and control weaknesses still exist in the sourcing of human resources needs, controls over procurement and contract management activities in the context of operational programmes and projects, with the potential to affect the regularity of transactions performed in financial year 2023. These issues are currently addressed by the Agency with the objective of a resolution as early as possible. The progress of the open audit recommendation is regularly reviewed by the Management Board.

I should also emphasise that I took up the role of Authorising Officer on 16 March 2023.

Agnès Diallo

Executive Director

[Qualified electronic signature]



ANNEXES

Annexes provide a more detailed overview of resource utilisation, while ensuring additional transparency regarding the Agency's work and operations

Annex I. Core business statistics

The corporate key performance indicators (KPIs)¹⁵⁰ aim to provide the Agency's stakeholders with an overview of the eu-LISA's performance in core business areas. The Agency's corporate KPIs report for 2023 was adopted by eu-LISA's Management Board on 21 March 2023.

Operational management of JHA information systems

System availability

KPI	Target	2020	2021	2022	2023	Status
3	Eurodac central system availability					
	green ≥99.99% 99.99% > amber ≥ 99.50% red <99.50%	99.87%	99.80%	99.88%	99.47%	Below target: slightly below due to incidents, incl. scheduled unavailability due to project implementation <i>Source: SLA and monthly service reports</i>
6	SIS central system availability					
	green ≥99.99% 99.99% > amber ≥ 99.50% red <99.50%	99.94%	99.98%	99.94%	99.67%	Partially on target: due to incidents affecting availability <i>Source: SLA and monthly service reports</i>
8	VIS central system availability					
	green ≥99.99% 99.99% > amber ≥ 99.50% red <99.50%	99.93%	99.98%	99.69%	99.97%	Partially on target: due to switchover to the backup central unit <i>Source: SLA and monthly service reports</i>

Response time

KPI	Target	2020	2021	2022	2023	Status
4	Eurodac central system response time¹⁵¹					
	green ≥99.45% 99.45% > amber ≥ 90% red < 90%	99.95%	100.00%	99.99%	99.98%	On target <i>Source: SLA and monthly service reports</i>
7	SIS central system response time¹⁵²					
	green ≥99.5% 99.5% > amber ≥ 99% red <99%	99.86%	99.85%	98.98 %	99.99%	On target <i>Source: SLA and monthly service reports</i>
9	VIS central system response time¹⁵³					
	green = 100% 100% > amber ≥ 90% red <90%	99.98%	99.90%	99.70%	99.98%	Partially on target <i>Source: SLA and monthly service reports</i>

Communication infrastructure availability

KPI	Target	2020	2021	2022	2023	Status
5	Wide Area Network (WAN) availability (for SIS and VIS)					
	green ≥99.99% 99.99% > amber ≥99.50% red <99.50%	99.9931%	99.9988%	99.9984%	99.9994%	On target

¹⁵⁰ The latest version of eu-LISA corporate KPIs were adopted by the Management Board on 9 April 2020. Following the review in February 2021, the Agency implemented a few changes, which the Management Board adopted in March 2021.

¹⁵¹ Eurodac's critical business functions are grouped into two categories: a) high-priority transactions (standard response time 1 hour) and b) regular transactions (24 hours). The response time indicator (KPI 4) is the average of these two categories: 'green' if 99.45% of transactions are within the standard response time, 'amber' if transactions between 90-99.45%, and 'red' if transactions fewer than 90%.

¹⁵² The percentage of category 1 queries (exact) replied within one second.

¹⁵³ The percentage of total response within the contractual limits (peak hour, breach and records indicators) for each business group (asylum, border, consular, law enforcement and territory).

Operational support and training

KPI	Target	2020	2021	2022	2023	Status
16	Training for Member States on JHA systems					
	satisfaction rate (scale 1-6) average >4	4.5	5.4	5.4	5.26	On target
19	Customer satisfaction: % of end-users satisfied or very satisfied with the overall operation of JHA systems					
	≥80%	95%	95%	97%	97.33%	On target
20	eu-LISA Service Desk performance					
	≥75%	99.90%	95.00%	82.37%	100%	On target

Security

KPI	KPI	Target	2020	2021	2022	2023	Status
1	Percentage of security objectives implemented (as defined per the legislation)						
		100%	100%	100%	100%	100%	On target
2	Number of emergency drills, security and business continuity-related exercises performed annually						
		2	2	2	3	3	On target: 1 business continuity exercise and two fire drills (TLL and SXB)

Governance and compliance

KPI	Target	2020	2021	2022	2023	Status
21	Project assessment: completion evaluated against the baseline of defined quality/cost/time parameters, taking into account the project tolerances					
	<10%	9.19%	15.75%	16.59%	9.83%	On target: 4 projects completed in 2023 (incl. 3 internal)
22	Project management: assessing the compliance of completed projects against eu-LISA project management methodology during the project lifecycle					
small projects	>75%	n/a	20%	n/a	n/a	Not applicable: no small projects in 2023
medium projects	>80%	71%	76.2%	66%	76%	Below target
large projects	>85%	73.5%	n/a	74%	75%	Below target
23	Audit: (A) Percentage of audit recommendations implemented within stipulated deadlines					
critical	100%	n/a	n/a	n/a	100%	On target: (3 out of 3)
very important	≥90%	67%	72%	63%	80%	Below target: (16 out of 20) significant progress towards target, 2023 marks best improvement in recent years
important	≥80%	60%	85%	62%	93%	On target: 14 out of 15
23	Audit: (B) Number and age of outstanding audit recommendations					
Recommendations overdue for less than 6 months	≤4	2	3	4	0	On target
Recommendations overdue between 6 months and 1 year	≤2	1	0	0	2	On target
Recommendations overdue for more than 1 year	≤1	10	6	8	3	Below target: significant progress towards target, 2023 marks best improvement in recent years

Administration and general support

KPI	Target	2020	2021	2022	2023	Status	
15	Environmental indicator: carbon footprint						
	baseline ¹⁵⁴	341.04 tons	401 tons	570 tons ¹⁵⁵	3506 teq CO ₂ for 2023	Other GHG emissions calculated as per GIME recommendations and GHG protocol.	
10	Cancellation rate of payment appropriations						
	<5%	13.60%	7%	10.6%	5.8%	Partially on target rate significantly reduced	
11	Rate of budgetary commitments implementation (%)						
	95–99%	99.1%	100%	99% (incl. non-automatic carryover)	99.9%	On target	
12	Rate of payment implementation (%)						
	>95%	99%	99%	91.6 %	99.9%	On target	
13	Ratio of administrative resources vs operational resources compared to all human resources (staff and SNEs) (%)						
	Administrative	20%	16.5%	16.9%	16.3%	17.2%	Partially on target
	Operational	70%	72.5%	73.2%	74.7%	74%	Partially on target
14	Ratio of payments completed within statutory deadlines (%)						
	>87.5%	95.9%	99%	90.1%	96.4%	On target	
17	Efficiency of the procurement process						
	<25%	11%	21.4%	9.5%	16.7%	On target	
18	Acquisition management: procurement projects on schedule						
	>60%	163.6%	80.1%	140%	80%	On target	
24	Annual absenteeism rate:						
a)	average number of sick days per employee	< 15 days	5.6 days	4.1 days	7.5 days	9.7 days	On target
b)	% on long-term sick leave	<10%	4.4%	3.2%	4.6%	5.3%	On target
c)	% of staff not using sick leave	>15%	52.9%	51.6%	42%	42.7%	On target
25	Annual staff turnover (%)						
	≤5%	3.70%	5.48%	7.1%	4.09%	On target	
26	Annual occupancy rate (%)						
	>94%	91%	94.2%	82%	94.2%	Partially on target: ¹⁵⁶ slightly below the target, due to 2 'non-recrutable' posts (Eurodac)	
27	Talent retention index						
	>0	0.9	0.2	0.3	1.8	On target	
28	Staff engagement level						
	≥6.3	7.4	7.3	7.3	7.4	On target	
29	eu-LISA external communication impact						
a)	social media	+200 followers per platform per year	LinkedIn: +1888 Twitter: +477 Facebook: +332	LinkedIn: +5490 Twitter: +602 Facebook: +315 YouTube: +389	LinkedIn: +3127 Twitter: +405 Facebook: +285 YouTube: +99	LinkedIn: +4013 Twitter: +404 Facebook: +403 YouTube: +89	Partially on target: YouTube lagging behind due to reprioritisation, i.e., first priority to publish on Twitter/LinkedIn/ Facebook
b)	satisfaction with events	>90%	84%	80%	86.3%	n/a	Other: annual conference not held in 2023
c)	participation rate	>95%	105% ¹⁵⁷	95%	95.3%	n/a	Other: annual conference not held in 2023
30	eu-LISA internal communication impact (satisfaction survey)						
a)	participation rate	>51%	52%	55%	59%	58%	On target
b)	satisfaction rate	>70%	93%	93%	91%	89%	On target

¹⁵⁴ 2023 will be used as the baseline, since earlier results are not representative due to COVID-19 restrictions.

¹⁵⁵ Includes CO₂ emissions for the temporary office building in Illkirch, Strasbourg, France.

¹⁵⁶ The number includes job offers issued; without job offers issued the occupancy rate is 85.7%

¹⁵⁷ Due to the changed format of participation, the baseline was set to in-person participation but due to COVID-19 restrictions the event had to be conducted only online, which considerably increased the number of participants.

Annex II. Statistics on financial management

Initial budget, transfers and amending budgets

The table below summarises at chapter level the internal budgetary transfers operated for C1 funds in 2023.

Budget Chapter		Commitment appropriations (in m euros)				Payment appropriations (in m euros)			
		Initial budget	Transfers	Amending budget	Final budget	Initial budget	Transfers	Amending budget	Final budget
A-11	Salaries & allowances	43.51	-5.29		38.22	43.51	-5.29		38.22
A-12	Expenditure related to recruitment	0.49	-0.19		0.30	0.49	-0.19		0.30
A-13	Mission expenses	0.66	-0.07		0.59	0.66	-0.07		0.59
A-14	Socio-medical infrastructure	2.52	-0.98		1.54	2.52	-0.98		1.54
A-15	Training for staff	1.48	-0.45		1.03	1.48	-0.45		1.03
TITLE 1 - STAFF EXPENDITURE		48.66	-6.99		41.67	48.66	-6.99		41.67
A-20	Expenditure for premises	5.33	-0.67		4.65	5.33	-0.67		4.65
A-21	Corporate IT & telecom	8.15	0.15		8.30	8.15	0.15		8.30
A-22	Movable property and associated costs	0.58	-0.44		0.14	0.58	-0.44		0.14
A-23	Current administrative expenditure	2.29	-0.79		1.51	2.29	-0.79		1.51
A-25	Management Board	0.62	-0.06		0.57	0.62	-0.06		0.57
A-26	Information and publications	0.45	0.57		1.02	0.45	0.57		1.02
A-27	External support services	7.33	-1.15		6.19	7.32	-1.15		6.19
A-28	Security	5.46	-0.05		5.40	5.46	-0.05		5.40
TITLE 2 - INFRASTRUCTURE and OPERATING EXPENDITURE		30.21	-2.44		27.77	30.21	-2.44		27.77
B3-0	Infrastructure	43.27	6.87		50.13	74.28	2.15	-20.00	56.42
B3-1	Home Affairs	117.26	5.70		122.94	150.74	15.89	-12.80	153.83
B3-2	Justice	2.52	3.76		6.29	9.55	-6.24		3.31
B3-8	Operational support activities	20.32	-6.90		13.42	13.55	-2.37		11.18
TITLE 3 - OPERATIONAL EXPENDITURE		183.36	9.43		192.79	248.11	9.43	-32.80	224.74
TOTAL		262.23	0.00		262.23	326.98	0.00	-32.8	294.18

Implementation of eu-LISA budget for 2023 (funding source C1)

As far as the 2023 appropriations (funding source C1 – EU subsidy for 2023) are concerned.

Budget title	Commitments (C1, in million euros)			Payments (C1, in million euros)		
	Budgeted	Consumed	%	Budgeted	Consumed	%
Title 1 – Staff expenditure	41.67	41.67	100.0%	41.67	41.67	100.0%
<i>of which executed</i>		41.67	100.0%		40.79	97.9%
<i>of which automatic carry-forward</i>					0.88	2.1%
Title 2 – Infrastructure and Operating expenditure	27.77	27.45	98.8%	27.77	27.45	98.8%
<i>of which executed</i>		27.45	100.0%		15.11	54.4%
<i>of which automatic carry-forward</i>					12.34	44.4%
Title 3 – Operational expenditure	192.79	192.79	100.0%	224.74	224.74	100.0%
<i>of which executed</i>		192.79	100.0%		224.74	100.0%
TOTAL	262.23	261.91	99.9%	294.18	293.85	99.9%
<i>of which executed</i>		261.91	99.9%		280.64	95.4%
<i>of which automatic carry-forward</i>					13.22	4.5%

Implementation of the budget from other funding sources

In addition to the budget for the year (funding source C1), the Agency implemented appropriations:

- from appropriations carried over to 2023 as per Management Board decision (funding source C3),¹⁵⁸
- from internally assigned revenue (funding source C4),¹⁵⁹
- carry-forward of commitments (differentiated in Title 3 and non-differentiated in Titles 1 and 2 and the corresponding payment appropriations (non-differentiated only) from previous years (source C8),¹⁶⁰
- from externally assigned revenue, as a contribution from the associated countries pursuant to Article 46(3)(b) of eu-LISA's establishing Regulation (funding source R0,¹⁶¹ Title 3 only).

Budget Title	Fund Source	Commitment			Payment		
		Budgeted (in m euros)	Consumed (in m euros)	%	Budgeted (in m euros)	Consumed* (in m euros)	%
A-1 Staff expenditure	C1	41.67	41.67	100.0%	41.67	40.79	97.9%
	C8	0.67	0.56	83.5%	0.67	0.56	83.5%
	subtotal	42.34	42.23	99.7%	42.34	41.35	97.7%
A-2 Infrastructure and Operating Expenditure	C1	27.77	27.45	98.8%	27.77	15.11	54.4%
	C4	0.02	0.02	100%	0.02		0.0%
	C8	13.73	13.00	94.7%	13.73	13.00	94.7%
	subtotal	41.51	40.46	97.5%	41.51	28.11	67.7%
B0-3 Operational Expenditure	C1	192.79	192.79	100.0%	224.74	224.74	100.0%
	C3	25.15	25.15	100.0%			
	C4	0.04	0.04	100.0%	0.04	0.04	100.0%
	C8	368.07	357.62	97.2%			
	R0	79.82	7.42	9.3%	79.82		0.0%
	subtotal	665.87	583.03	87.6%	304.60	224.78	73.8%
TOTAL		749.73	665.72	88.8%	388.45	294.24	75.7%

¹⁵⁸ eu-LISA Management Board decision 2023-040 of 09 February 2023; **Article 12 eu-LISA Financial Rules**.

¹⁵⁹ Appropriations from internally assigned revenue of the year.

¹⁶⁰ When commitments are made against non-differentiated appropriations and the corresponding amounts have not been paid in full, the corresponding payment appropriations are carried over automatically only to the next financial year. In this case, the fund source is changed from C1 to C8. The appropriations are carried over to the following year and the corresponding commitments are carried forward. In the case of differentiated appropriations against which the amounts committed have not been paid, the commitments are carried forward automatically, as are corresponding commitment appropriations (fund source C8). Payment appropriations, on the other hand, are not carried over, and other sources of funding will have to be found for the following year (fund source C1).

¹⁶¹ Appropriations from externally assigned revenue (of the year and carried over).

Budgetary transfers performed in 2023

During 2023, the following internal transfer operations were performed under Article 26 of the Agency's Financial Rules to ensure optimal budget allocation of commitment and payment appropriations. In total, 11 transfers were performed accordance with Article 26(1); whereas none were performed under Article 26(2).

Budgetary transfer ¹⁶²	Budget Title	Title 1 Staff expenditures		Title 2 Infrastructure and operating expenditures		Title 3 Operational expenditures	
	Reference	Commitment Appropriation	Payment Appropriation	Commitment Appropriation	Payment Appropriation	Commitment Appropriation	Payment Appropriation
1	LIS.5075						Transfer within budgetary title
2	LIS.5086	-650,000	-650,000	650,000	650,000		Transfer within budgetary title
3	LIS.5095						Transfer within budgetary title
4	LIS.5117	-3,042,660	-3,042,660	Transfer within budgetary title		3,042,660	3,042,660
5	LIS.5127	Transfer within budgetary title		Transfer within budgetary title		Transfer within budgetary title	
6	LIS.5141	-1,172,500	-1,172,500	-772,500	-772,500	1,945,000	1,945,000
7	LIS.5161	-1,081,017	-1,081,017	-1,416,762	-1,416,762	2,497,779	2,497,779
8	LIS.5167	-1,001,074	-1,001,074	-896,309	-896,309	1,897,382	1,897,382
	LIS.5168						Transfer within budgetary title
9	LIS.5204	-34,460	-34,460			34,460	34,460
	LIS.5207						Transfer within budgetary title
	LIS.5208						Transfer within budgetary title
10	LIS.5244						Transfer within budgetary title
	LIS.5247	-10,657	-10,657			10,657	10,657
11	LIS.5253						Transfer within budgetary title
	LIS.5254						Transfer within budgetary title
	LIS.5261						Transfer within budgetary title
TOTAL		-6,992,369	-6,992,369	-2,435,571	-2,435,571	9,427,940	9,427,940

Detailed list of budgetary transfers (all fund sources)

No.	Reference	Date	Budget Line	Commitment Appropriation	Payment Appropriation
1	LIS.5075	23/05/2023	B03110 VIS	0.00	-6,000,000.00
			B03111 EES	0.00	6,000,000.00
			A01100 TA salaries and allowances	-820,000.00	-820,000.00
			A01120 SNEs and Trainees allowances	120,000.00	120,000.00
			A01401 Nursery allowance	50,000.00	50,000.00
			A02000 Expenditure for premises	425,676.68	425,676.68
			A02200 Office Equipment and logistical services	-425,676.68	-425,676.68
2	LIS.5086	24/07/2023	A02600 Information and Publications	650,000.00	650,000.00
			B03000 Shared System Infrastructure	0.00	-3,000,000.00
			B03110 VIS	0.00	-12,000,000.00
			B03111 EES	0.00	15,000,000.00
			B03120 Eurodac	0.00	3,000,000.00
			B03130 Interoperability	0.00	-3,000,000.00

¹⁶² Budget transfers between titles are indicated in full value in euros.

No.	Reference	Date	Budget Line	Commitment Appropriation	Payment Appropriation
3	LIS.5095	22/09/2023	B03000 Shared System Infrastructure	9,058,000.00	9,058,000.00
			B03100 SIS II	-2,264,500.00	-2,264,500.00
			B03110 VIS	-2,264,500.00	-2,264,500.00
			B03111 EES	-2,264,500.00	-2,264,500.00
			B03120 Eurodac	-2,264,500.00	-2,264,500.00
4	LIS.5117	28/09/2023	A01100 TA salaries and allowances	-580,000.00	-580,000.00
			A01110 CA salaries and allowances	-825,000.00	-825,000.00
			A01200 Recruitment and Reassignment Expenditure	-100,000.00	-100,000.00
			A01402 European school	-1,212,660.30	-1,212,660.30
			A01500 Training for staff	-325,000.00	-325,000.00
			A02100 Corporate IT & Telecom	220,000.00	220,000.00
			A02320 Legal Expenses	-220,000.00	-220,000.00
			A02500 MB meetings	55,000.00	55,000.00
			A02510 Other meetings	-55,000.00	-55,000.00
			B03000 Shared System Infrastructure	0.00	-3,000,000.00
			B03010 Wide Area networks	0.00	-3,500,000.00
			B03100 SIS II	0.00	-2,069,751.00
			B03110 VIS	0.00	-9,000,000.00
			B03111 EES	4,142,660.30	17,512,411.30
			B03112 ETIAS	0.00	11,300,000.00
			B03130 Interoperability	0.00	-4,200,000.00
			B03200 ECRIS	906,964.39	-4,000,000.00
			B03801 Test and Transition	0.00	-500,000.00
			B03802 Training for Member States	-600,000.00	-600,000.00
			B03810 External Support	0.00	2,500,000.00
B03811 Consultancies and studies	-656,964.39	-400,000.00			
B03820 Advisory Groups	-700,000.00	-1,000,000.00			
B03821 Other meetings and missions	-50,000.00	0.00			
5	LIS.5127	30/10/2023	A01110 CA salaries and allowances	-269,000.00	-269,000.00
			A01403 Social activities	269,000.00	269,000.00
			A02000 Expenditure for premises	-125,107.41	-125,107.41
			A02100 Corporate IT & Telecom	125,107.41	125,107.41
			A02330 Other Running Costs	-7,804.61	-7,804.61
			A02331 HR fees and charges	7,804.61	7,804.61
			B03010 Wide Area networks	0.00	3,560,873.00
			B03110 VIS	-1,724,581.40	-3,090,000.00
			B03201 e-CODEX	1,724,581.40	-470,873.00
			A01110 CA salaries and allowances	-1,150,000.00	-1,150,000.00
6	LIS.5141	13/11/2023	A01500 Training for staff	-22,500.00	-22,500.00
			A02000 Expenditure for premises	-250,000.00	-250,000.00
			A02320 Legal Expenses	-150,000.00	-150,000.00
			A02330 Other Running Costs	-150,000.00	-150,000.00
			A02600 Information and Publications	-25,000.00	-25,000.00
			A02700 External Support Services	-172,500.00	-172,500.00
			A02800 Corporate Security	-25,000.00	-25,000.00
			B03100 SIS II	-800,000.00	0.00
			B03110 VIS	-18,000,000.00	0.00
			B03111 EES	10,000,000.00	0.00
			B03112 ETIAS	-6,000,000.00	0.00

No.	Reference	Date	Budget Line	Commitment Appropriation	Payment Appropriation
			B03120 Eurodac	-2,000,000.00	0.00
			B03130 Interoperability	22,022,500.00	1,945,000.00
			B03800 System security and business continuity	-200,000.00	0.00
			B03802 Training for Member States	-576,000.00	0.00
			B03810 External Support	-1,290,000.00	0.00
			B03811 Consultancies and studies	-640,000.00	0.00
			B03820 Advisory Groups	-408,000.00	0.00
			B03821 Other meetings and missions	-160,000.00	0.00
			B03822 Schengen evaluations	-3,500.00	0.00
			A01100 TA salaries and allowances	-931,000.00	-931,000.00
			A01200 Recruitment and Reassignment Expenditure	-71,541.30	-71,541.30
			A01400 Annual medical check-up	-20,000.00	-20,000.00
			A01403 Social activities	-6,000.00	-6,000.00
			A01500 Training for staff	-52,475.80	-52,475.80
			A02000 Expenditure for premises	-529,599.80	-529,599.80
			A02100 Corporate IT & Telecom	-50,000.00	-50,000.00
			A02200 Office Equipment and logistical services	-6,022.46	-6,022.46
			A02220 Documentation and Library Expenditure	-1,396.57	-1,396.57
			A02320 Legal Expenses	-192,806.00	-192,806.00
			A02330 Other Running Costs	-50,000.00	-50,000.00
			A02500 MB meetings	-3,126.15	-3,126.15
			A02510 Other meetings	-26,963.59	-26,963.59
			A02600 Information and Publications	-27,674.46	-27,674.46
			A02700 External Support Services	-500,000.00	-500,000.00
7	LIS.5161	01/12/2023	A02800 Corporate Security	-29,173.24	-29,173.24
			B03000 Shared System Infrastructure	0.00	393,838.96
			B03010 Wide Area networks	2,497,779.37	3,075,137.21
			B03100 SIS II	2,329,739.70	-4,130,765.19
			B03110 VIS	-1,467,186.57	331,966.03
			B03112 ETIAS	0.00	744,445.72
			B03130 Interoperability	0.00	3,141,666.67
			B03200 ECRIS	0.00	-577,702.57
			B03201 e-CODEX	0.00	-0.60
			B03800 System security and business continuity	0.00	-146,360.37
			B03801 Test and Transition	274,062.05	283,062.48
			B03802 Training for Member States	-122,864.09	-217,600.77
			B03810 External Support	-941,413.82	-150,000.00
			B03811 Consultancies and studies	-13,555.85	160,091.80
			B03820 Advisory Groups	-50,000.00	-200,000.00
			B03821 Other meetings and missions	-8,781.42	-210,000.00
			A01100 TA salaries and allowances	-464,581.92	-464,581.92
			A01110 CA salaries and allowances	-284,725.09	-284,725.09
			A01120 SNEs and Trainees allowances	-89,047.74	-89,047.74
			A01200 Recruitment and Reassignment Expenditure	-23,300.00	-23,300.00
8	LIS.5167	13/12/2023	A01301 Mission Expenses	-74,154.35	-74,154.35
			A01400 Annual medical check-up	-5,295.61	-5,295.61
			A01403 Social activities	-39,325.19	-39,325.19
			A01500 Training for staff	-20,643.90	-20,643.90
			A02000 Expenditure for premises	-195,926.89	-195,926.89

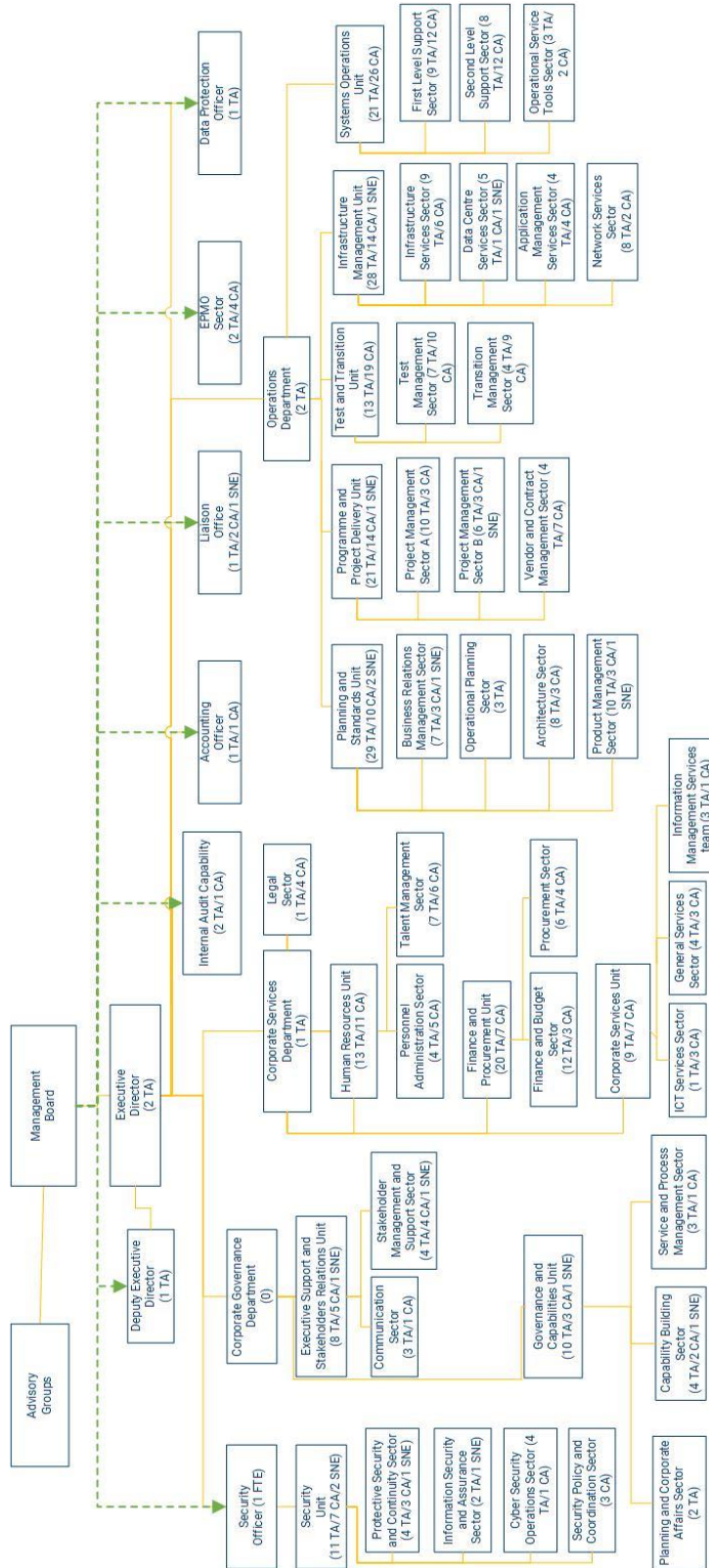
No.	Reference	Date	Budget Line	Commitment Appropriation	Payment Appropriation
			A02100 Corporate IT & Telecom	-144,931.97	-144,931.97
			A02200 Office Equipment and logistical services	-6,421.78	-6,421.78
			A02330 Other Running Costs	-24,792.92	-24,792.92
			A02510 Other meetings	-25,114.82	-25,114.82
			A02600 Information and Publications	-25,000.00	-25,000.00
			A02700 External Support Services	-473,348.43	-473,348.43
			A02800 Corporate Security	-771.70	-771.70
			B03000 Shared System Infrastructure	7,354,247.50	4,168,534.56
			B03002 Back-up site - running costs	-214,752.00	-92,000.00
			B03010 Wide Area networks	-854,316.53	0.00
			B03100 SIS II	1,428,431.83	-2,148,497.39
			B03110 VIS	-17,084,985.35	-2,271,152.25
			B03111 EES	5,214,279.83	-1,670,867.65
			B03112 ETIAS	2,178,583.58	-718,907.01
			B03120 Eurodac	-1,328,190.43	0.00
			B03130 Interoperability	4,232,767.04	7,521,933.61
			B03200 ECRIS	1,629,398.86	-1,431,661.56
			B03201 e-CODEX	-495,042.14	4,425.65
			B03800 System security and business continuity	-6,073.68	-352,523.96
			B03801 Test and Transition	-5,616.90	0.00
			B03802 Training for Member States	-43,875.26	-113,035.95
			B03810 External Support	-48,213.71	-1,016,747.69
			B03811 Consultancies and studies	0.00	30,475.00
			B03820 Advisory Groups	-58,923.36	0.00
			B03821 Other meetings and missions	-243.92	-9,000.00
			B03822 Schengen evaluations	-93.05	-3,593.05
	LIS.5168		B03000 Shared System Infrastructure	40,000.00	40,000.00
			B03810 External Support	-40,000.00	-40,000.00
			A01400 Annual medical check-up	-1,966.87	-1,966.87
			A01403 Social activities	-9,793.42	-9,793.42
			A01500 Training for staff	-22,700.00	-22,700.00
			B03000 Shared System Infrastructure	-1,917,691.86	1,655,594.53
			B03002 Back-up site - running costs	0.00	-42,195.67
			B03010 Wide Area networks	0.00	-159,513.02
			B03100 SIS II	-766,621.98	-279,900.00
			B03110 VIS	0.00	50,223.00
			B03111 EES	-1,215,977.33	-3,190,558.51
	LIS.5204		B03112 ETIAS	-1,660,862.19	282,000.00
9		19/12/2023	B03130 Interoperability	5,858,139.92	1,383,460.29
			B03200 ECRIS	-1,578.52	727,000.00
			B03201 e-CODEX	0.00	-4,425.65
			B03800 System security and business continuity	-1,537.85	-101,681.09
			B03801 Test and Transition	0.00	97,249.23
			B03802 Training for Member States	-56,560.73	-123,212.40
			B03810 External Support	-135,778.92	-158,110.04
			B03820 Advisory Groups	-36,933.02	-59,522.87
			B03821 Other meetings and missions	-30,137.23	-30,146.89
			B03822 Schengen evaluations	0.00	-11,800.62
	LIS.5207		B03000 Shared System Infrastructure	-40,000.00	-40,000.00

No.	Reference	Date	Budget Line	Commitment Appropriation	Payment Appropriation
			B03130 Interoperability	40,000.00	40,000.00
			B03100 SIS II	-1,000,000.00	-1,000,000.00
			B03110 VIS	-1,000,000.00	-1,000,000.00
	LIS.5208		B03111 EES	-1,000,000.00	-1,000,000.00
			B03112 ETIAS	-1,000,000.00	-1,000,000.00
			B03120 Eurodac	-536,358.78	-536,358.78
			B03130 Interoperability	4,536,358.78	4,536,358.78
			B03000 Shared System Infrastructure	0.00	-911,129.68
			B03010 Wide Area networks	0.00	-2,771.60
			B03100 SIS II	0.00	-31,479.62
			B03110 VIS	0.00	-812,420.95
	LIS.5244		B03111 EES	0.00	-6,706,620.96
			B03112 ETIAS	0.00	14,272,352.24
			B03120 Eurodac	0.00	-4,680,346.28
10		21/12/2023	B03130 Interoperability	0.00	-602,495.31
			B03200 ECRIS	0.00	-491,140.17
			B03810 External Support	0.00	-21,854.00
			B03820 Advisory Groups	0.00	-12,093.67
			A01401 Nursery allowance	-6,500.00	-6,500.00
	LIS.5247		A01403 Social activities	-1,961.47	-1,961.47
			A01500 Training for staff	-2,196.00	-2,196.00
			B03112 ETIAS	10,657.47	10,657.47
	LIS.5253		B03120 Eurodac	0.00	40,000.00
			B03130 Interoperability	0.00	-40,000.00
			B03111 EES	0.00	242,538.16
			B03112 ETIAS	-10,657.47	-581,792.94
11	LIS.5254	22/12/2023	B03120 Eurodac	0.00	339,254.78
			B03130 Interoperability	336,685.96	0.00
			B03810 External Support	-34,247.80	0.00
			B03811 Consultancies and studies	-291,780.69	0.00
	LIS.5261		B03100 SIS II	-13,324.52	0.00
			B03130 Interoperability	13,324.52	0.00

Annex III. Organisation chart

In 2023, the Agency's organisational structure remained unchanged.

Figure. Organisational structure (situation in December 2023)



Annex IV. Establishment plan and additional information on human resources management

eu-LISA establishment plan for 2023

The 2023 establishment plan included **222 TA posts**, of which 169 AD and 53 AST.

AD category and grade	Temporary agents	AST category and grade	Temporary agents
AD 16	0	n/a	n/a
AD 15	1	AST 11	0
AD 14	1	AST 10	0
AD 13	3	AST 9	1
AD 12	4	AST 8	4
AD 11	11	AST 7	6
AD 10	12	AST 6	12
AD 9	22	AST 5	11
AD 8	38	AST 4	13
AD 7	11	AST 3	6
AD 6	46	AST 2	0
AD 5	20	AST 1	0
Total AD	169	Total AST	53

Information on the entry level for each type of post (indicative table)

The table below presents the levels at which the key functions listed by the Commission are represented in eu-LISA. In case of differences between the Commission's and eu-LISA terminology, internal job titles are listed. The entry grades that exceed the ones mentioned in Article 53 of the Conditions of Employment of Other Servants of the European Union (CEOS) are due to staff recruitment during the Agency's start-up phase when higher grades were allocated in eu-LISA's establishment plan. In case any of these posts become vacant, the recruitment will be initiated in accordance with the eu-LISA Management Board decision No 2019-32 of 26 June 2019 on Types of post and post titles at eu-LISA.¹⁶³

Key functions	Type of contract (official, TA or CA)	Function group, grade of recruitment	Administrative support or operations
Head of Department (level 2)	TA	AD12	administration/operations
Head of Unit (level 3)	TA	AD 9	administration/operations
Head of Sector (level 4) (no head of entity role)	TA, CA	AD 5, AD 7	administration/operations
Senior Officer	TA	AD 7	administration/operations
Officer	TA, CA	AD 5, AD 6, FG IV	administration/operations
Head of Corporate Services Department	TA	AD 12	administration
Head of Human Resources Unit	TA	AD 9	administration
Head of Finance and Procurement Unit ¹⁶⁴	TA	AD 10	neutral
Head of Internal Audit Capability	TA	AD 9	administration/neutral
Accounting Officer	TA	AD 9	neutral
Data Protection Officer	TA	AD 8	administration
Personal Assistant to the Executive Director ¹⁶⁵	TA	AST 5	administration
Secretaries ¹⁶⁶ /Assistants to Heads of Department/Unit ¹⁶⁷	TA, CA	AST 3, FG II	administration/operations

¹⁶³ As in the Management Board document, reference 2019-149.

¹⁶⁴ The grade indicated in the table is higher than the level included in the Board decision No 2019-32 of 26 June 2019 on Types of post and post titles at eu-LISA, meaning that the person was recruited during eu-LISA's startup phase when higher entry grade was offered.

¹⁶⁵ The person was recruited during eu-LISA's startup phase when higher entry grade was offered.

¹⁶⁶ The establishment plan does not include posts for secretaries or clerical functions. Pursuant to Staff Regulations, effective as of 1 January 2014, eu-LISA decided to keep the grades approved in the establishment plan and to augment the tasks of staff hired in grades AST 2 and 3 for assistant posts. If necessary, secretarial tasks are also performed by external service providers (*intramuros*).

¹⁶⁷ The person was recruited during eu-LISA's startup phase when higher entry grade was offered.

eu-LISA benchmarking exercise 2023

At the end of 2023, eu-LISA conducted its benchmarking exercise in accordance with the methodology agreed by the Heads of Administration of the EU agencies in 2014. This methodology has been devised by adapting, refining and elaborating the Commission's screening methodology. The screening categorises human resources by the organisational role each job is serving. The main focus of this exercise is to generate figures for the number of 'administrative support and coordination', 'operational' and 'neutral' jobs in all organisational entities in order to compare the results with previous years. The screening was applied to all eu-LISA posts. The results of this screening are presented in the tables below.

The results of the 2023 benchmarking show a slight decrease (0.7%) in the proportion of operational posts (from 74.7% to 74.0%), where general operational activities decreased by 0.8%, while programme management decreased by 0.4% and top-level coordination increased by 0.6%. The percentage of administrative and coordination posts increased by 0.8% from 16.3% to 17.1%. The number of neutral posts decreased by 0.1% from 9.0% to 8.9%.

Table 11. eu-LISA benchmarking exercise 2023: staff members

Job type (sub)category	2020 (%)	2021 (%)	2022 (%)	2023 (%)
Administrative support and coordination	16.5%	16%	16.3%	17.1%
administrative support	12%	11.1%	11.3%	12.1%
coordination	4.5%	4.9%	5.0%	5.0%
Operational	72.5%	74.2%	74.7%	74.0%
top-level operational coordination	7%	5.3%	5.1%	5.7%
programme management and implementation	4%	3.5%	3.9%	3.5%
evaluation & impact assessment	0%	0%	0.0%	0.0%
general operational	61.5%	65.4%	65.6%	64.8%
Neutral	11%	9.8%	9.0%	8.9%
finance/ control	11%	9.8%	9.0%	8.9%
linguistics	0%	0%	0.0%	0.0%

The Agency also screened the posts occupied by external service providers (the on-site contractors' personnel), with the following results:

Comparing the last two years, fewer services for administrative support and coordination were outsourced, from 60.5% to 53.5%, while operational activities increased from 36.1% to 43.3%. The outsourced neutral posts have also decreased from 3.4% to 3.2%.

Table 12. eu-LISA benchmarking exercise 2023: external service providers (on-site contractors)

Job type (sub)category	2020 (%)	2021 (%)	2022 (%)	2023 (%)
Administrative support and coordination	52.2%	55.8%	60.5%	53.5%
administrative support	40.2%	37.5%	33%	36%
coordination	12%	18.3%	28%	17%
Operational	42.4%	40.4%	36.1%	43.3%
top-level operational coordination	2.2%	1.9%	0.0%	0.6%
programme management and implementation	2.2%	1.5%	12.3%	10.2%
evaluation & impact assessment	2.2%	1.4%	0.0%	2.6%
general operational	35.8%	35.6%	23.8%	29.9%
Neutral	5.4%	3.8%	3.4%	3.2%
finance/ control	5.4%	3.8%	3.4%	3.2%
linguistics	0%	0%	0%	0%

HR implementing rules adopted in 2023

eu-LISA requested a derogation from the Commission rules on working time and hybrid working in order to have sufficient time to adapt it to eu-LISA's peculiarities, in particular, those concerning internal structure and operations requiring different working hours. In November 2023, the Management Board adopted a decision on working time and hybrid working at eu-LISA¹⁶⁸, which is planned to come into effect on 1 January 2024.

Compensatory leave schemes

Pursuant to the European Parliament's 2011 Discharge Report, all EU agencies are required to report on the number of leave days authorised to each grade under the flexitime and compensatory leave schemes.¹⁶⁹

Flexitime is a working scheme applied at eu-LISA by analogy with the newly adopted implementing rules on working time and hybrid working. The Agency is mandated to provide its services to Member States on a continuous basis (24/7), meaning that some of its staff work in shifts or are on stand-by duty. Occasionally, interventions on the IT systems managed by eu-LISA require that the work be performed outside regular office hours, including at night or on public holidays. Consequently, overtime compensation for flexitime work or during stand-by duty interventions is an integral feature of the Agency's daily operations.

The table below shows the amount of leave (number of days) granted as compensation for overtime work, broken down by function group, and the average number of days compensated. Compared to 2022, there was a slight increase in the number of compensated flexitime and overtime, by 0.7 days (from 5.8 to 6.5) in the overall average number of compensatory leave days. The overview does not include stand-by duty as that staff are compensated financially. However, seconded national experts (SNE) are compensated with time off, under flexitime or overtime, depending on the number of hours or days to be compensated for the stand-by duty service.

Table 13. Compensation for overtime work (per function group)

Functional Group	Type of compensation	Total days used	Number of persons	Average days per person	Total average days per person
TA AD	overtime	19	5	3.8	6.5
	flexitime	1020	125	8.2	
TA AST	overtime	0	0	0.0	5.2
	flexitime	186.5	36	5.2	
CA FGII	overtime	0	0	0.0	2.8
	flexitime	5.5	2	2.8	
CA FGIII	overtime	4	1	4.0	4.7
	flexitime	123	26	4.7	
CA FGIV	overtime	0	0	0.0	5.4
	flexitime	386.5	72	5.4	
SNEs	overtime	3	1	3.0	7.2
	flexitime	71.5	10	7.2	

¹⁶⁸ eu-LISA Management Board Decision No 2023-333 of 16 November 2023.

¹⁶⁹ [European Parliament resolution of 17 April 2013](#) on discharge in respect of the implementation of the budget of the European Union agencies for the financial year 2011: performance, financial management and control, 2012/2214(DEC).

Annex V. Human and financial resources by activity

Human resources by activity

In 2023, out of a total of 342 posts, 249.9 full-time equivalents (FTE) (73.1% of staff) were used for operational activities and 32.1 FTEs (9.4% of staff) for related procurement and financial activities. 60 FTEs (17.5% of staff) were used for horizontal activities (general coordination and administrative support).

The table below presents an overview of eu-LISA staff per legislative proposal in accordance with the authorised budget and establishment plan for 2023.

Table 14. Human resources (per area of activity)

Area of activity	Authorised for 2023			Actual situation in 2023 ¹⁷⁰		
	TA	CA	SNE	TA	CA	SNE
eu-LISA Regulation						
Baseline staff (posts authorised under 2020 budget)	113	30	9	109	34	8
Revised eu-LISA Regulation (additional staff)	23	27	2	22	23	1
System-specific regulations (adopted)						
EES	32			29		
ETIAS	7	35		6	27	
EES-ETIAS carrier support ¹⁷¹		21			13	
ECRIS-TCN		5			5	
e-CODEX	2	3			1	
Interoperability	31	34		26	22	
SIS Recast (Return and Borders)		4			4	
Revised VIS	6	7		6	6	
Security posts granted in 2023	6					
Legislative proposals pending adoption¹⁷²						
Recast Eurodac Regulation	2			0		
Total FTEs	222	166	11	198	135	9

Expenditure according to activity-based costing

In 2018, eu-LISA developed an activity-based costing methodology, allowing it to identify the total costs of each system managed by the Agency. The total system expenditure comprises the following:

- direct expenditure, covering maintenance and project costs,
- network expenditure,
- horizontal expenditure, including operational costs for shared infrastructure, system security and corporate and horizontal expenditure, mainly staff and running expenditure.

The re-allocation of corporate and operational horizontal expenditure is based on the following cost drivers:

- direct system expenditure,
- time (cost of manpower) allocated to the systems.

During the reporting year, the Agency implemented a budget of EUR 287.1 million, of which:

- 74% was spent on operational activities,
- 26% represented corporate horizontal costs, including network/infrastructure and interoperability expenditures as charged to the respective systems.

¹⁷⁰ Staff in place, excluding issued job offers.

¹⁷¹ These posts were temporarily allocated from Frontex to eu-LISA for an initial three-year period from 2022 to 2024. At the end of 2023, the agreement was extended until 2027.

¹⁷² The indicated staff numbers are provisional, based on the legislative financial statement that was adopted in the past.

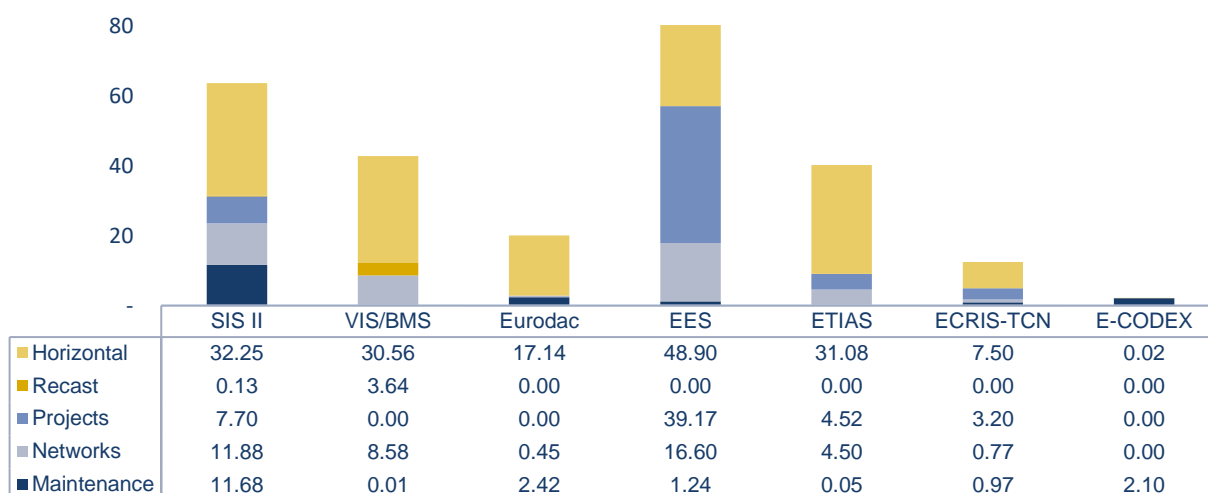
Table 15. 2023 activity-based costs by system (total system costs)

Systems	Total costs (in million euros)	Share of Total Cost (%)
SIS	63.63	22%
VIS/BMS	42.79	15%
Eurodac	20.02	7%
EES	105.91	37%
ETIAS	40.15	14%
ECRIS-TCN	12.44	4%
e-CODEX	2.12	1%
TOTAL	287.06	100%

Most of the Agency's core activities are not repetitive but project-based. Therefore, their costs cannot be standardised as in a standard process-based business model.

The following graphs provide the cost breakdown for each system (in million EUR) and as a percentage of the total cost of the systems:

Figure 14. Cost breakdown per system (in million EUR)



Expenditure related to the multi-site organisation

The direct costs associated with the Agency's multi-site organisation are summarised in the table below.

Figure 15. Share of 2023 direct costs related to eu-LISA's multi-site organisation (in million EUR)

Budget title	Total executed payments	Payments related to eu-LISA's multi-site organisation	Share (%)
A-1 Staff expenditure	40.79	0.19	0.5%
A-2 Infrastructure and operating expenditure	15.11	n/a	n/a
B0-3 Operational expenditure	224.74	0.05	0.0%
TOTAL	280.64	0.24	0.1%

Direct costs related to eu-LISA's multi-site organisation are mission expenditures for statutory staff travelling between the Agency's headquarters in Tallinn, Estonia and its operational site in Strasbourg, France. In 2023, this represented 0.1% of the total of payments executed.

Annex VI. **Contribution, grant and service-level agreements**

Not applicable to eu-LISA in 2023.

Annex VII. Environmental management

The impact of environmental matters on organisational performance is increasing and will continue to do so. The Agency is committed to improving its environmental performance and is working towards registration under the EU's Eco-Management and Audit Scheme (EMAS) by 2024. Following the adoption of eu-LISA's environmental policy in 2022, the Agency has implemented an internal environmental management system (EMS) based on EMAS principles and the European Green Deal.

The EMS contributes to the Agency's strategic goal of 'further evolving eu-LISA towards an efficient, agile and resilient organisation within the EU regulatory framework' by:

Resource Efficiency and Sustainability:

- EMS contributes to eu-LISA's resource efficiency goals, in alignment with the broader objective of being an efficient organisation,
- strategies to reduce waste, energy consumption, or other environmental impacts should be part of resource alignment efforts.

Compliance with Environmental Regulations:

- as per eu-LISA's environmental policy, the Agency is committed to complying with relevant regulations and stakeholder requirements,
- environmental management practices ensure that the organisation complies with environmental regulations and standards.

Mission and Values:

- promoting the Agency's mission and values should encompass a commitment to environmental sustainability,
- demonstrating responsible environmental stewardship aligns with values related to corporate social responsibility.

Reputational effect:

- demonstrating environmental responsibility can contribute to the Agency's growth as a key EU agency, considering the increasing importance of sustainability for organisational reputation.

In recent years, eu-LISA has introduced new indicators to measure its environmental performance. It has been decided that **2023 data will be used as the baseline reference point** for any subsequent assessments, because the COVID-19-induced teleworking policy was in force until the third quarter of 2022. Also, using 2019 numbers as baseline would not be relevant due to the increased staff numbers at the premises.

According to the EMAS regulation, eu-LISA must provide data for the following performance indicators:

- energy efficiency in buildings (electricity consumption),
- energy efficiency in data centre (power usage effectiveness, PUE),
- waste production,
- water consumption,
- paper consumption,
- business travel (number of missions),
- greenhouse gas (GHG) emissions,
- biodiversity.¹⁷³

¹⁷³ [Regulation \(EC\) No 1221/2009](#) of the European Parliament and of the Council of 25 November 2009 on the voluntary participation by organisations in a Community **eco-management and audit scheme (EMAS)**, repealing Regulation (EC) No 761/2001 and Commission Decisions 2001/681/EC and 2006/193/EC, OJ L 342, 22.12.2009, p. 1–45.

eu-LISA began recording its CO₂ emissions in 2020, but only based on electricity consumption and missions. Starting from 2023, the Agency uses a dedicated platform for the **calculation of GHG emissions** with the support of consultants. The GHG emissions have been calculated with Aktio tool which uses the GHG protocol. Scope 1 and 2 emissions are reported fully, whereas scope 3 is based on GIME recommendations,¹⁷⁴ when data is available, and comprises:

- capital assets,
- product and service purchases,
- waste,
- business travel,
- commuting to work,
- other indirect emissions.

Table 16. Evolution of GHG emissions calculation

Types of emissions	2020 in tCO ₂	2021 in tCO ₂	2022 in tCO ₂	2022 in tCO ₂ eq	2023 in tCO ₂ eq
electricity	296	355	425	831.2	883.2
gas, oil and other fuels				7.1	7.1
air conditioning and refrigerants				86.8	86.8
fuels				17.3	17.3
business travel	45	56	143	143.7	294.0
employee commuting				417.6	582.0
purchased goods and services				2.7	35.9
IT inventory				1632.0	378.2
other fixed assets				323.8	1190.1
waste				28.2	31.5
waste water				0.6	0.7
TOTAL	341	411	568	3491	3507

In 2023, the Agency published its **first official environmental statement for 2022**, detailing objectives, monitoring and progress.¹⁷⁵ The report includes a summary table outlining the sources of environmental impacts, action plans, and performance indicators for all environment-related aspects.

The **environmental statement for 2023** is under preparation and will include, in addition to the information presented in the 2022 report, a list of activities to address new environmental objectives for the coming years:

- definition of environmental needs and expectations of eu-LISA stakeholders,
- identification of risks and opportunities based on PESTEL analysis,¹⁷⁶
- identification of eu-LISA's environmental aspects and impacts through an environmental analysis,
- new GHG emission calculation tools.

To engage staff in this EMAS journey, the Agency established an internal task force of volunteers, internally referred to as the **Green Team**, who take part in dedicated working groups.

¹⁷⁴ The EU's [Interinstitutional Group for Environmental Management \(GIME\)](#), established by the Commission to exchange environmental best practices in line with the **European Green Deal**; GIME recommendations: ref ARES (2017) 6028470, 08 December 2017.

¹⁷⁵ [eu-LISA Environmental Statement 2022](#), published 10 October 2023.

¹⁷⁶ [PESTEL](#) is a method of organisational analysis focusing on the macro environment and covers the following domains: political, economic, social (or socio-cultural), technological, environmental and legal.

Annex VIII. Annual accounts

BALANCE SHEET – 2023 (in EUR)

Assets

NON-CURRENT ASSETS	31/12/2023	31/12/2022	Variation	Change in %
Computer software	47,211,505	43,427,266	3,784,239	9%
Intangible assets under construction	63,861,190	66,969,819	(3,108,629)	(5%)
Intangible assets	111,072,695	110,397,085	675,610	1%
Land and buildings	34,341,167	32,017,632	2,323,535	7%
Plant and equipment	71,312	87,067	(15,755)	(18%)
Furniture and vehicles	148,499	159,628	(11,129)	(7%)
Computer hardware	54,926,400	79,616,674	(24,690,274)	(31%)
Other fixtures and fittings	1,301,144	1,020,658	280,486	27%
Property, plant and equipment	90,788,522	112,901,659	(22,113,137)	(20%)
Non-current pre-financing	-	2,546,822	(2,546,822)	(100%)
Non-current exchange receivables	154,575	137,797	16,778	12%
TOTAL NON-CURRENT ASSETS	202,015,792	225,983,363	(23,967,571)	(11%)
CURRENT ASSETS				
Amounts receivable from customers	476,995	-	476,995	
Deferred charges	25,906,041	13,307,960	12,598,081	95%
Other exchange receivables	91,877,664	97,332,433	(5,454,769)	(6%)
Current exchange receivables	118,260,700	110,640,393	7,620,307	7%
VAT receivables	1,709,593	1,325,357	384,236	29%
Contribution from associated countries	9,962,171	6,343,406	3,618,765	57%
Non-exchange receivables	11,671,764	7,668,763	4,003,001	52%
TOTAL CURRENT ASSETS	129,932,464	118,309,155	11,623,308	10%
TOTAL ASSETS	331,948,256	344,292,518	(12,344,262)	(4%)

Liabilities

NET ASSETS	31/12/2023	31/12/2022	Variation	Change in %
Accumulated surplus	244,066,659	201,187,412	42,879,247	21%
Economic result of the year (+ profit)	6,605,912	42,879,247	(36,273,335)	(85%)
NET ASSETS	250,672,571	244,066,659	6,605,913	3%
CURRENT LIABILITIES				
Current Provisions	49,000	-	49,000	
Current Provisions	49,000	-	49,000	
Current payables	27,075,383	32,419,850	(5,344,467)	(16%)
Accounts payable with consolidated entities	1,107,604	26,281,667	(25,174,063)	(96%)
Accounts payables	28,182,987	58,701,517	(30,518,530)	(52%)
Accrued charges	53,043,698	41,524,343	11,519,355	28%
TOTAL CURRENT LIABILITIES	81,275,685	100,225,859	(18,950,175)	(19%)
TOTAL LIABILITIES	331,948,256	344,292,518	(12,344,262)	(4%)

Statement of financial performance 2023 (in euros)

REVENUE	2023	2022	Variation	Change in %
EU Contribution	293,073,132	270,226,598	22,846,534	8%
Contribution of EFTA countries	24,982,568	16,474,672	8,507,896	52%
Non-exchange revenue	318,055,700	286,701,270	31,354,430	11%
Miscellaneous income	532,370	8,613	523,757	6,081%
Total revenue	318,588,070	286,709,883	31,878,187	11%
EXPENSES				
Operational expenses	(184,569,703)	(127,063,564)	(57,506,139)	45%
Staff expenses	(39,194,301)	(36,101,247)	(3,093,054)	9%
Finance costs on late payment	(12,921)	(9,048)	(3,873)	43%
Administrative and IT expenses	(10,670,587)	(8,988,906)	(1,681,681)	19%
Other external service provider expenses	(7,463,280)	(6,360,820)	(1,102,460)	17%
Expenses with consolidated entities	(2,320,682)	(2,807,104)	486,422	(7%)
Fixed asset related expenses	(66,960,630)	(61,780,865)	(5,179,765)	8%
Operating Lease Expenses	(741,050)	(713,280)	(27,770)	4%
Legal provisions	(49,000)	-	(49,000)	
Exchange rate losses	(5)	(5,803)	5,798	(100%)
Administrative expenses	(127,412,455)	(116,767,072)	(10,645,383)	9%
Total expenses	(311,982,158)	(243,830,636)	(68,151,522)	28%
ECONOMIC RESULT for the YEAR	6,605,912	42,879,247	(36,273,335)	(85%)

Cash-flow statement 2023 (indirect method in euros)

Cash Flows from operating activities	2023	2022
Economic result of the year - Profit/(loss)	6,605,912	42,879,247
Amortization of intangible fixed assets	21,276,299	21,480,761
Depreciation and write off of tangible fixed assets	39,220,794	35,073,305
Increase/(decrease) in provision	49,000	-
(Increase)/decrease in Pre-financing	2,546,822	-
(Increase)/decrease in Long-term Pre-financing/Deposits	(16,778)	-
(Increase)/decrease in Short-term Receivables	(11,623,308)	(39,452,668)
Increase/(decrease) in Accounts payable and accrued charges	6,174,888	(4,423,209)
Increase/(decrease) in Liabilities related to consolidated EU entities	(25,174,063)	23,205,937
Net cash Flow from operating activities	39,059,566	78,763,373
Cash Flows from investing activities		
(Increase) of tangible and intangible fixed assets	(39,059,566)	(78,763,373)
Net cash flow from investing activities	(39,059,566)	(78,763,373)
Net increase/(decrease) in cash and cash equivalents		
	-	-
Cash and cash equivalents at the beginning of the period	-	-
Cash and cash equivalents at the end of the period	-	-

Annex IX. Report on public access to documents

To ensure the transparency of its operations, the Agency must publicly disclose information on all its activities, provided that it will not jeopardise the achievement of its operational objectives. Throughout 2023, the Agency remained committed to guaranteeing transparency in its activities, processes and decision-making. The Agency observed the highest levels of good administrative conduct and complied with all legal requirements.

Report on requests for access to documents

The Agency is committed to guaranteeing transparency in all its activities, processes and decision-making, including the procedure for public access to documents.¹⁷⁷ In 2023, the Agency observed the highest levels of good administrative conduct and respected all deadlines specified by Regulation (EC) No 1049/2001.

In 2023, the Agency received twenty-three (23) requests to access documents, an increase from the previous years. In three (3) out of the twenty-three (23) requests, the Agency invited the applicants to clarify the scope of their requests, in accordance with Article 6(2) of Regulation (EC) No 1049/2001.

In addition, in seven (7) requests for public access to documents, the Agency did not hold all or some of the requested documents and, accordingly, it could not grant (or refuse) access. The applicants were duly informed of the fact and directed towards publicly available information and other appropriate institutions, where possible. In the course of 2023, eu-LISA analysed seventy-seven (77) documents, of which twenty-five (25) were fully disclosed to the applicants, forty-nine (49) were partially disclosed with parts of the documents redacted, and only three (3) for which the request of access was refused. These documents consisted of a total of one thousand six hundred and sixty-six (1 660) pages, out of which four hundred and ninety-seven (497) were fully released, one thousand one hundred and forty-one (1141) were partially released, whereas access to the remaining twenty-two (22) pages was refused.

Figure 16. Number of documents analysed in 2023

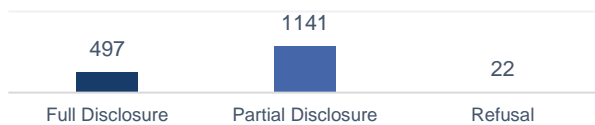
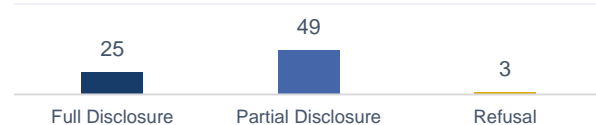


Figure 17. Number of pages analysed in 2023



The partial redaction of documents and the refusal of access to documents by eu-LISA were based on the exceptions specified in Article 4 of the Regulation (EC) No 1049/2001, in particular on the protection of privacy and the integrity of the individual (in accordance with the relevant EU legislation regarding the protection of personal data),¹⁷⁸ public interest as regards public security, ongoing decision-making processes and commercial interests.

It is noteworthy that among the three (3) documents for which the Agency refused access to the applicants in 2023, it contained information related to technical aspects of the large-scale IT systems developed and managed by the Agency. The release of these documents to the public would reveal technical and sensitive information about the systems. Therefore, the disclosure of the requested documents had to be refused based on the protection of the public interest as regards public security.

There was one (1) confirmatory application against the Agency's initial decisions. However, the Agency's decisions on public access to documents were not challenged before the EU Courts. Additionally, no complaints regarding the Agency's process of handling the requests for access to documents were made before the European Ombudsman.

¹⁷⁷ In accordance with Article 17 of eu-LISA Management Board decision of 28 June 2012, which reflects the wording of Article 17 of Regulation (EC) No 1049/2001 regarding public access to European Parliament, Council and Commission documents, and pursuant to Article 34 of its establishing regulation (Regulation (EU) 2018/1726), eu-LISA's annual report shall include a report on access to documents, outlining the number of cases where access was refused and providing reasons for such refusals.

¹⁷⁸ Regulation (EU) 2018/1725 on the protection of natural persons with regard to the processing of personal data by the Union institutions, bodies, offices and agencies and on the free movement of such data, OJ L 295, 21.11.2018, pp. 39-98.

In 2023, the Agency also received thirteen (13) consultations for access to documents from other EU entities, in accordance with Article 4(4) of Regulation (EC) No 1049/2001. This constitutes an exponential increase compared to the previous year.

Other activities related to access to documents

The Agency has been continuously striving to guarantee full compliance with the legal requirements and to improve the practice of handling requests for public access to documents. In this context, the Agency continues to work on reviewing the practical arrangements for public access to documents, in order to improve the efficiency and operational effectiveness of the process. Also, the Agency achieved several milestones in 2023 which will ensure the smooth processing of future public access to document requests.

Following the adoption of the eu-LISA Management Board decision on the practical arrangements regarding public access to the documents held by the Agency, with the ultimate purpose of laying down the practical arrangements of the application of Regulation (EC) No 1049/2001, ensure good administrative practices and high standards of public access to documents, taking into account the specific nature of the Agency and its mandate, the Legal Sector (appointed as eu-LISA's PAD Team) continued working on strengthening the legal framework for the public access to documents.¹⁷⁹

On 27 October 2023, the Executive Director of eu-LISA adopted the amendment to the Decision on the appointment of Public Access to Documents Contact Persons, and its Annex, to be part of a cross-divisional network within the Agency work, coordinated by the Legal Sector acting as PAD Coordinator, with the main objective of handling public access to documents applications in their thematic fields.

¹⁷⁹ eu-LISA Management Board Decision No 2022-090 of 24 March 2022.

Annex X. Sustainability report

Nowadays, addressing sustainability issues is of critical importance for all organisations, especially in the context of achieving the objectives outlined in the European Green Deal.¹⁸⁰ To that end, organisations engage in sustainability reporting, the voluntary disclosure of indicators reflecting their environmental, social and economic performance to provide a systematic overview of their operational impact. As a proactive instrument, these reports include information on relevant action plans, mitigating measures and practices to reduce negative impacts and modernise systems that have been deemed unsustainable. In the long term, this reporting facilitates the systematic monitoring of implementation and tracking of progress to identify areas for further improvement.

The EU agencies have been invited to **set an example by being proactive and transparent** in disclosing their performance and impact not only on the environment but also the society at large.¹⁸¹ Recognising its role and obligations as a public entity, eu-LISA is committed to promoting sustainability efforts as an integral part of our responsibilities towards society and future generations.

Sustainability reporting framework

This is the first time eu-LISA is disclosing sustainability information as part of its annual activity report. Having examined the most commonly used sustainability reporting frameworks, the Agency settled on using the standard developed by the **Global Reporting Initiative (GRI)**.¹⁸² The GRI sustainability standards were chosen not only because they represent global best practice, but also because it is the preferred methodology for public institutions that is recommended by the Performance Development Network (PDN) of the **EU Agencies Network (EUAN)**.

The GRI standards provide a framework for organisations to publicly report on the impacts of their activities in a structured and systematic manner that is transparent to stakeholders, delivering a comprehensive overview of an organisation's material topics, their impacts, and how they are managed.¹⁸³

There are two ways to apply GRI standards:

- reporting in accordance with the GRI standards, i.e., compliance with all GRI requirements and reporting on all GRI Standards; and
- reporting with reference to GRI standards, i.e., reporting only on selected GRI Standards, or parts thereof.

eu-LISA's Sustainability Report 2023

The Agency's sustainability report for 2023 covers the period from 1 January to 31 December 2023. Since eu-LISA is still at the beginning of its sustainability reporting journey, its first-ever sustainability report is presented **with reference to GRI standards**, focusing on the topics for which we have reliable data.

The data are presented in the GRI content index, providing a brief overview of eu-LISA's activities in that particular area and references to other documents where further information can be found. The Agency's key sustainability efforts are summarised on the following page, whereas the full version of **the eu-LISA Sustainability Report 2023** can be downloaded from the eu-LISA website.¹⁸⁴

¹⁸⁰ For more on the **European Green Deal**, please visit the dedicated websites of the [European Commission](#) and [Council of the EU](#).

¹⁸¹ European Court of Auditors (2019) [Reporting on sustainability: A stocktake of EU institutions and Agencies](#).

¹⁸² For a more detailed overview of **Global Reporting Initiative (GRI) standards**, please visit www.globalreporting.org.

¹⁸³ Under the GRI framework, **material topics** refer to the organisation's most significant economic, environmental and social impacts.

¹⁸⁴ [eu-LISA Sustainability Report 2023](#).

In recent years, eu-LISA has taken decisive action by implementing various measures to optimise resource use and reduce negative impacts, while also improving its financial performance, stakeholder engagement and fostering diversity. In its first sustainability report, the Agency has highlighted the following activities:

- eu-LISA has addressed possible financial and operational risks posed by climate change by investing in **energy efficient and climate resilient solutions** in line with the EU's green initiatives. This is exemplified by its green headquarters in Tallinn and ongoing infrastructure upgrades, including new premises in Strasbourg, France and Brussels, Belgium. *For more details, please refer to eu-LISA Sustainability Report 2023, section 201-2 on Financial implications and other risks and opportunities due to climate change;*
- in 2023, the Agency continued working towards the EU's **Eco-Management and Audit Scheme (EMAS)**¹⁸⁵ registration by implementing an environmental management system aligned with EU standards, calculating comprehensive GHG emissions, and publishing its **first official environmental statement**,¹⁸⁶ while also engaging its staff by setting up a **dedicated Green Team task force**. *For more details, please see eu-LISA Sustainability Report 2023, chapter 'Environmental Topics (GRI 300)';*
- the Agency contributes to the **EU's internal security** and facilitates **freedom of movement** within the Schengen area by overseeing the key IT systems for **managing external borders** and facilitating cooperation among law enforcement authorities (i.e., SIS, VIS, and Eurodac), while also developing new systems and the overarching interoperability architecture for the JHA domain. *For more details, please refer to eu-LISA Sustainability Report 2023, section 203-2 'Significant indirect economic impacts sustainability';*
- eu-LISA has adopted the **EUAN Charter on Diversity and Inclusion**,¹⁸⁷ together with an action plan to promote those values among the staff.¹⁸⁸ Throughout 2023, eu-LISA hosted diversity workshops and actively participated in Pride Month, culminating with a mention at the EUAN 'Diversity and Inclusion Awards' for the work on implementing initiatives outlined in its 2023-2024 **Action Plan for Diversity, Equity and Inclusion**. *For more, see eu-LISA Sustainability Report 2023, chapter 'Social Topics (GRI 400)';*
- in 2023, eu-LISA implemented a **structured stakeholder engagement approach**, utilising a new business relationship management model to enhance accountability, control, and mutual understanding, while also commencing with the **revamp of its corporate website** to improve communication and social media integration. *For more, please refer to section 2-29 'Approach to stakeholder engagement';*
- eu-LISA adopted a **comprehensive Occupational Health and Safety (OHS) management system**, conducted regular risk prevention exercises, and improved workplace ergonomics, while also organising OHS awareness sessions, mental health webinars, and introducing new staff well-being initiatives, including individual counselling sessions and promoting physical activity, e.g., bike to work. *For more details, please see eu-LISA Sustainability Report 2023, chapter 'Social Topics (GRI 400)';*
- at the end of 2023, the Agency's **occupancy rate** stood at 94% thanks to a systematic approach to address staffing problems and efficient organisation of selection procedures. In addition, eu-LISA delivered a record number of team trainings, increased internship opportunities, expanded internal mobility and training programmes. *For more, see eu-LISA Sustainability Report 2023, chapter 'Social Topics (GRI 400)'.*

Next steps

Going forward, the Agency aims to gradually expand the scope of disclosed information and has started preparations for collecting additional data to present a more comprehensive overview in the future. As already noted, this sustainability report takes guidance from the GRI standards. However, in light of the new European Sustainability Reporting Standards (ESRS), introduced at the start of 2024, eu-LISA will undertake a comprehensive analysis to ascertain whether to continue applying GRI standards or switch to ESRS which are applicable from 1 January 2024.¹⁸⁹

¹⁸⁵ For more, please visit the Commission's dedicated webpage on the [Eco-Management and Audit Scheme \(EMAS\)](#).

¹⁸⁶ [eu-LISA Environmental Statement 2022](#), published 10 October 2023.

¹⁸⁷ [EU Agencies Network \(EUAN\) Charter on Diversity and Inclusion](#), May 2021.

¹⁸⁸ [eu-LISA Action Plan for Diversity, Equity and Inclusion 2023-2024](#).

¹⁸⁹ [Commission Delegated Regulation \(EU\) 2023/2772](#) of 31 July 2023 as regards **sustainability reporting standards**.

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