



PEMPAL Treasury Community of Practice Plenary Meeting 2024

June 3-6, 2024 Belgrade, Serbia



Photo: Getty Images

Event Report



Table of Contents

Introduction & Opening	3
Day 1: Serbian Experience in Treasury Modernization	5
Day 2: Expanding Treasury Services to Spending Units	8
Day 3: Enhancing Analytical and Reporting Capabilities through Application of Modern Digital Tools	
Day 4: News from the PEMPAL Member Countries	. 19
Conclusions	. 21
Planning for the Future	. 22



Introduction & Opening

The 2024 PEMPAL Treasury Community of Practice (TCOP) Annual Plenary Meeting was held on June 3-6, 2024, in Belgrade, Serbia. The main objective of the meeting was to deepen understanding of the latest trends in treasury modernization based on application of modern information technologies and draw lessons for the member countries. Presentations of the Treasury Administration of Serbia set the stage for thematic discussions. The event provided an opportunity for participants to share information on the recent developments in their countries. The meeting also served the forum for formulating the TCOP activity plan for FY2025 and beyond.

The meeting was attended by 80 participants, including 62 representatives of 16 TCOP member countries (Albania, Armenia, Azerbaijan, Bosnia and Herzegovina, Croatia, Georgia, Hungary, Kazakhstan, Kyrgyz Republic, Montenegro, North Macedonia, Romania, Serbia, Tajikistan, Türkiye, and Uzbekistan) and guest speakers from the Directorate General of Treasury, Ministry of Finance of Indonesia. Representatives of the Korea Fiscal Information Service joined the plenary remotely.

The meeting was facilitated by the World Bank team, including Mr. Arman Vatyan (PEMPAL Team Leader), Ms. Galina Kuznetsova (TCOP Resource Team member), Ms. Elena Dobrolyubova (TCOP Resource Team member), Mr. Cem Dener (Chair of Financial Management Information Systems CoP, Governance Global Practice), Mr. Mark Silins (TCOP Lead Thematic Advisor), and Ms. Naida Carsimamovic (Consultant). Ms. Elena Nikulina (TCOP Resource Team Leader) joined the plenary remotely. The PEMPAL Secretariat, including Ms. Tetiana Shalkivska and Ms. Ekaterina Zaleeva, provided logistical support.

The first day of the plenary was moderated by **Mr. Erekle Gvaladze**, TCOP Executive Committee Chair, and **Ms. Sandra Vraneš**, Assistant Director, Budget Execution Sector, Treasury Administration of Serbia.





The plenary was opened by Mr. Marko Gvero, Director, of the Treasury Administration of Serbia.

He highlighted the significant development that the Serbian treasury had undergone since it was first established as a Service for Public Accounting in 1963. Mr. Gvero welcomed all participants in Belgrade and noted the importance of exchanging experience in treasury modernization among the practitioners from the region and wished the participants productive discussions throughout the plenary.





In his welcoming remarks, Mr. Nicola Pontara, Country Manager for Serbia, the World Bank, highlighted the importance of the treasury reforms in Serbia, including the expansion of treasury coverage and development of the new integrated financial management information system (IFMIS). He noted the World Bank's support to public financial reforms in Serbia, including green public financial management (PFM) and fiscal risk management. Further cooperation is envisaged under the new PFM Program in Serbia for 2026 – 2030.

Mr. Erekle Gvaladze, TCOP Executive Committee Chairman thanked the Treasury Administration of Serbia for hosting the 2024 TCOP Plenary and the World Bank Resource team for supporting the event preparation. He emphasized that the agenda proposed by the Serbian Treasury was highly relevant to most countries in the region as they were embarking on similar reforms related to broadening treasury services and using modern IT tools in treasury operations. Therefore, the platform for peer-assisted learning provided by PEMPAL is highly valued by all TCOP members.





Mr. Arman Vatyan, PEMPAL Team Leader, the World Bank, thanked the hosts for organizing the TCOP plenary meeting in Belgrade and congratulated Mr. Gvaladze on his election as Chair of the TCOP Executive Committee. Mr. Vatyan noted that the work on the new PEMPAL Strategy beyond 2025 was underway and he was looking forward to hearing the ideas on how the participants see PEMPAL evolving and meeting new challenges, including green PFM and digital transformation. He welcomed all participants to exchange their thoughts and express their preferences

and wished everyone a fruitful and productive event.

Following the opening remarks, **Mr. Erekle Gvaladze** presented a brief overview of the activities performed by the TCOP since the last plenary in Almaty in May 2023 (Fig.1). During this period, TCOP conducted 4 thematic events (a face-to-face meeting of the Thematic Group on Cash Management and Forecasting in Vienna and 3 videoconferences), two knowledge products are under preparation. Mr. Gvaladze welcomed Hungary as a new TCOP member and highlighted



the importance of the feedback to the Thematic Survey in shaping the short and long-term vision for TCOP development. He took the opportunity to pay tribute to the memory of Ms. Yelena Slizhevskaya, the former member of the TCOP Resource Team, and a valuable colleague and supporter for everyone, who sadly passed away in late January. It was noted that her loss was significant, not just for her immediate family, but also for PEMPAL.

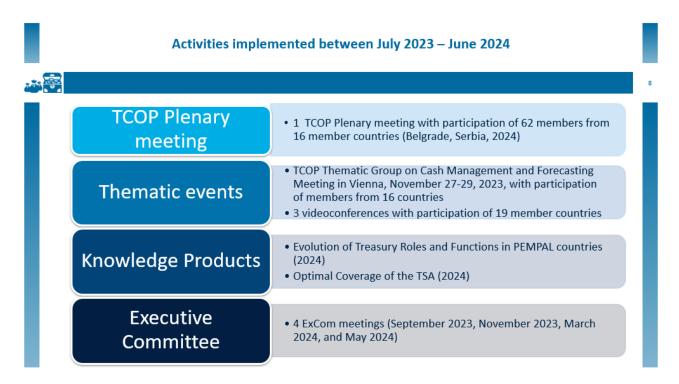


Fig. 1: TCOP Activities Since Almaty Plenary Meeting

Day 1: Serbian Experience in Treasury Modernization

The first day of the plenary was devoted to the experience of the hosting country. Mr. Marko



Gvero opened the session and presented an overview of the Treasury Administration of Serbia. The Treasury Administration is a three-tier structure and includes headquarters, 34 regional and 110 branch offices (Fig. 2). 27% of staff are employed in headquarters, while 73% are located in sub-national offices. The Treasury Administration is engaged in financial planning, management of financial assets of the Republic of Serbia, public payment execution, budgetary accounting and reporting, control of expenditures based on the approved appropriations, and reporting to the authorities. The Treasury processes payments in national and foreign currencies and conducts centralized calculation of wages for the budget sector.

Fig. 2: Structure of Treasury Administration



In recent years, the Treasury has implemented several information systems to improve the effectiveness and efficiency of its operations (Box 1).

Box 1: Information Systems Implemented by the Treasury Administration of Serbia

Central Invoice Register (CIR): a system for recording, tracking, controlling, and reporting on receivables between economic entities and the public sector (operational since 2018).

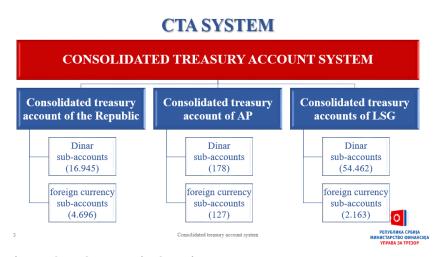
Budget execution system for autonomous provinces and local self-government units: a payment execution system with in-built controls that limits payments within budget appropriations and suspends payment requests that do not comply with local budgets (operational since 2021).

Electronic payment traffic service of the administration: an integrated service that enables users of public funds to make electronic payments over the Internet (operational since 2022).

Centralized Payroll System (ISKRA) - the system has 2,812 users with approximately 300, 000 employees (operational since 2022).

System for Preparation, Execution, Accounting, and Reporting (SPIRI) - an integrated FMIS platform that supports all core PFM functions of the Ministry of Finance and the Treasury Administration regarding the budget of the Republic of Serbia, simplifying user workflows and enabling a more efficient way of managing public finances (operational since 2023).

The next presentation was by Mr. Vladimir Despot, Acting Assistant Director to the Sector of Public Payments, Treasury Administration of Serbia, who focused on the consolidated treasury account (CTA) system comprising CTAs for the Republic, autonomous province, and for local self-government (Fig. 3). CTA of the republic includes sub-accounts for the execution of the state budget and other beneficiaries (i.e., beneficiaries of extra-budgetary funds) and



comprises both dinar and foreign currency accounts. Notably, only dinar subaccounts are part of the Treasury Single Account (TSA). For dinar payments, a payment system (JAFIN) is used to process payments less than RSD 300 thousand instantly.

Fig. 3: CTA System in Serbia

Ms. Elena Fišćan, Assistant Director for IT Sector, Treasury Administration of Serbia provided a detailed overview of the development and implementation of the data warehouse (DW) in the Treasury Administration. The DW collects data from various IT systems (including real-time data) and supports ad hoc analyses to inform management decisions. A demonstration of the DW system was also delivered. Currently, all direct treasury clients who



have access to SPIRI also have access to the DW. No public access is allowed to protect data integrity.

The Serbian presentations invoked animated discussions among participants. The following aspects were noted in particular:

- The role of regional and local branches they provide direct access for citizens for government payments, with lower payment commissions and the ability to process refunds,
- Extensive treasury services covering local governments,
- Significant progress in implementing instant payments 24/7 and quick settlement of accounts,
- Unique ISKRA system for payroll management in the public sector,
- Integrating the processes of budget planning, execution, and reporting in one system (SPIRI) and further interoperability with other relevant IT systems, and
- Various aspects of DW implementation, including data cleaning and data management techniques, analytical tools employed, and the choice of implementing the DW as a cloud solution.

These points are relevant to treasury modernization efforts in other PEMPAL countries.

Based on the discussions, participants made recommendations for further improvements in Serbia, including:

- Further consolidation of cash to allow investing cash surpluses at higher rates;
- Continued increase of treasury coverage to indirect beneficiaries/low-level spending units;
- Establishing a cash management department and using the data in DW for cash flow management and cash forecasting;
- Further automation of operations in regional and local treasury branches; and
- Further expansion of the data sources for the DW, including the information systems on social security and other sectors, and the public procurement management system.

Wrapping up the first day of the plenary, **Arman Vatyan** noted the depth of the discussions which were critical for further implementation of PFM reforms in all PEMPAL countries.

Key Takeaways from Day 1: Overall, the participants agreed that the experience of the Treasury Administration of Serbia presented useful insights for further treasury modernization in PEMPAL member countries. Looking ahead, it would be useful to consider how the impressive results achieved by the Serbian Treasury could be leveraged to create new synergies for the government-wide digital transformation. Planning for future steps, the Treasury Administration might find it useful to consider how the systems could be developed to better meet the requirements of all stakeholders, including external. Finally, while extending the treasury coverage is important, during the consolidation process it is



critical to consider the fungibility of consolidated cash to maximize the benefits from this process.

Day 2: Expanding Treasury Services to Spending Units

The second day of the plenary was devoted to discussions on the coverage of TSA and how spending units are integrated into treasury systems for payment, accounting, and reporting purposes. The panel sessions were moderated by the TCOP Chair, **Mr. Erekle Gvaladze.**

To set a framework for the discussions, **Mr. Mark Silins** presented options, advantages, and disadvantages of integrating spending units as direct treasury clients. Traditionally, low-level spending units, such as schools, were most commonly treated as indirect treasury clients interacting with the treasury through a ministry/sectoral hierarchy or a regional treasury/finance hierarchy. However, modern IT systems allow for the direct integration of spending units through IFMIS, using various technical solutions, such as APIs, portals, or additional third-party software. Some combinations of these models are also possible. Notably, the integration entails both advantages and disadvantages for the spending units (Table 1).

Table 1: Pros and Cons of Integration for Spending Units (SUs)

	Cons		Pros
•	Perceived loss of control: treasury may not process payments when required or reject payments without reasonable cause Cash Rationing – payments are processed with delays due to cash shortfalls Tools Treasury provides or processes in place are burdensome or not flexible Treasury does not share investment returns Reports are poor or non-existent – does the Chart of Accounts (CoA) meet SU reporting requirements? – e.g. all sources supported	•	Treasury is an expert on cash management – better returns on cash surpluses Access to modern tools: Treasury provides technical accounting software payment and revenue mechanisms can be highly efficient reduced costs for SUs (assuming treasury does not charge) SUs can operate "directly" - no need to seek approval or submit to higher level entities "indirectly"
		•	Comparability with other spending units – potentially a more equitable system

Source: presentation by Mark Silins.

Noteworthy, treasuries should consider the following factors to ensure the successful integration of spending units. First, the CoAs and FMIS must support the reporting requirements, both imposed at the central government level and at the level of line ministries (e.g. separation of fund sources, sub-entity reporting if required, projects, etc.). Second, additional support should be provided to the SUs (through help desks, training, etc.), especially at the initial stage of the integration process. Finally, the Treasury must assure SUs that the budget will be executed as they need and will not be impacted by Treasury cash rationing issues.





Day two continued with four PEMPAL countries presenting on their approaches for integrating spending units into the treasury system. **Ms.** Sandra Vraneš, Assistant Director, Budget Execution Sector, Treasury Administration of Serbia presented the Serbian experience of integrating schools as direct treasury clients through the IFMIS. Training and test environments were organized for the spending units to facilitate the integration process with significant support provided by the regional treasury offices. As of 2024, secondary education institutions have been connected to SPIRI, with elementary schools expected to follow in 2025.

SPIRI includes all sources of funds and allows spending units to perform various operations related to financial planning, budget execution, and reporting (Fig. 4).

Working in the budget execution system- SPIRI



From January 1st 2024, secondary education institutions in SPIRI system have been successfully performing the following:

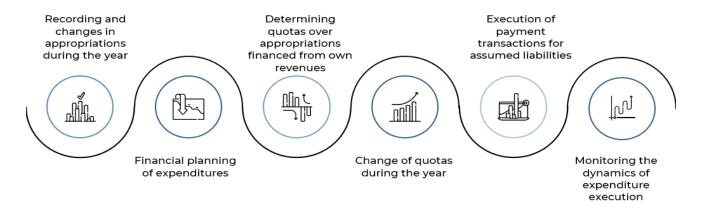


Fig. 4: Financial Planning and Execution Functions Available in SPIRI to Spending Units

Mr. Erekle Gvaladze presented next on the direct integration of over 2,000 schools and kindergartens implemented in Georgia in 2023-2024. The spending units previously did not have a direct relationship with the treasury and held accounts in commercial banks. Support for this transition was provided by the Academy of the Ministry of Finance which conducted training including hands-on sessions and video tutorials. While all expenditure operations are conducted through the treasury system and are subject to treasury control, the spending units are allowed to accumulate own source revenues, invest surplus balances in commercial banks and retain all interest earned as an incentive. Future plans include integrating state-owned enterprises into the treasury system.

Mr. Mekhman Nasibov, Head of IT Section, State Treasury Agency of Azerbaijan delivered the third country presentation on Innovative solutions in the Azerbaijani treasury. Unlike Serbia and



Georgia which integrated spending units directly into FMIS, Azerbaijan developed third party software and integrated its clients through a web-based portal. Over the past ten years, the treasury information portal has undergone several phases of modernization (Fig. 5). The most recent phase involves introducing functionality to create and sign documents and implementing a green corridor (reduced central controls) automating some of the treasury controls such as controls within the appropriation limit. However, some treasury controls, such as expenditure types, remain manual.

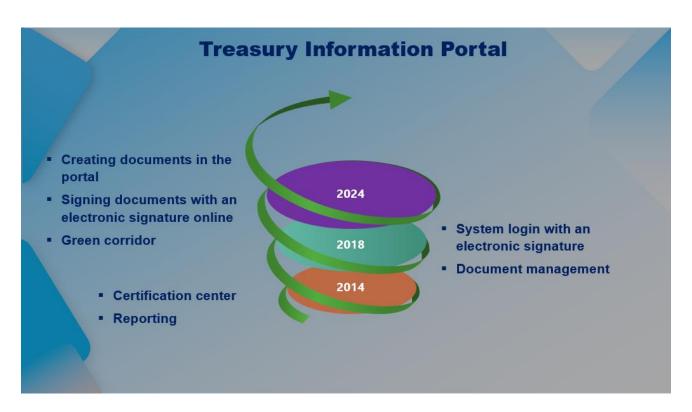


Fig. 5: Developing Treasury Information Portal in Azerbaijan

Overall, automating treasury operations and integrating spending units allowed downsizing of the treasury network in Azerbaijan: the number of treasury branches in the capital and across the regions has been reduced from 36 to 18. In the future, further downsizing of the network is envisaged.

Ms. Mimoza Pilkati, Director, Treasury Operations' Department, General Directorate of Treasury of Albania, provided a detailed overview of the Albanian experience in expanding treasury coverage to include local self-government spending units. Currently, Albania uses three models of integration: the three largest municipalities are integrated into AGFIS directly while most of the remaining municipalities are integrated online through a portal. Finally, some spending units continue to be serviced by local treasury units.

Overall, there are several benefits from integration: raising transparency and accountability of public spending, reducing the risks of fraud through enhanced treasury controls, and the opportunities provided to government through improved cash management. Direct integration



also provides municipalities with online access to real-time data on budget execution by subordinate units and facilitates the consolidation of reports (Fig. 6).

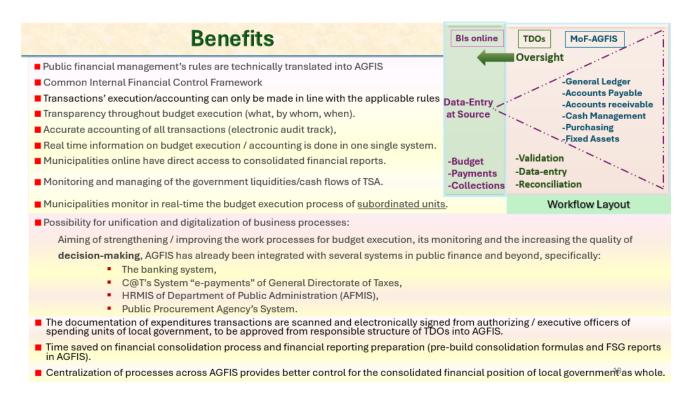


Fig. 6: Benefits of Direct Integration of Local Self-Government Units to IFMIS: Case of Albania

The challenges for integration relate to capacity issues and the need for training, as well as the interoperability of information systems and the increased workload for data management.

At the conclusion of discussions on country cases, participants broke out into three smaller groups to discuss in more detail the modalities of providing treasury services to the spending units using the example of schools. The discussions demonstrated that PEMPAL treasuries employ various models to service schools. In most countries spending units are directly or indirectly integrated into treasury systems for payment processing purposes (except for Montenegro and Croatia¹), although in some countries, paper-based procedures for payment processing are still used (such as payment vouchers in Republika Srpska, BiH and North Macedonia) or a combination of electronic and paper-based procedures are used (Albania, Romania). Albania and Türkiye reported that payment procedures vary by source of funds. Non-budgetary sources for school financing ('special means', such as donations) may also be outside the treasury system, for example, in the Kyrgyz Republic.

The discussion also revealed that in many PEMPAL countries the accounting and financial reporting functions are not integrated with IFMIS at the spending unit level. Consequently, the

⁻

¹ In Croatia, only payroll payments are processed through the treasury system, while other types of payments are processed through commercial banks.



reports are consolidated through a ministry or regional hierarchy, resulting in the same data being recorded multiple times. Thus, digitizing the consolidation of accounting and financial reporting remains a priority for many countries, including Armenia, Kazakhstan, Kyrgyz Republic, and Tajikistan. Streamlining and automating reporting is also a priority in Hungary and Romania.



Key Takeaways from Day 2: There are various models for treasury coverage of spending units in PEMPAL countries ranging from direct integration of payments and financial reporting into IFMIS, to spending units being completely excluded from treasury coverage. While the direct integration of spending units provides many benefits in terms of increased transparency, data availability for management purposes, new opportunities for cash management, and efficiency gains for accounting and reporting, there are also challenges. These include the lack of capacity on the ground and the need to maintain local self-government independence. Though broadening the treasury coverage is a prevailing trend in the PEMPAL region, and integrating payment execution with accounting and financial reporting is a goal, planning and implementing such reforms requires adequate IT capacity and a well-planned change management strategy involving all stakeholders.

Day 3: Enhancing Analytical and Reporting Capabilities through Application of Modern Digital Tools

The third day of the plenary focused on enhancing analytical and reporting capabilities through improved application of modern digital tools. The plenary sessions were moderated by **Mr.** Nazim Gasimzade, Director of State Treasury Agency of Azerbaijan, and a former head of ICT in Treasury.

The framework for further discussions was set in a presentation by **Mr. Cem Dener** who shared key global trends in IFMIS modernization. Currently, many countries are investing significantly in



transitioning from FMIS to integrated FMIS (IFMIS) by combining core modules through online transaction processing (OLTP) with powerful Data Warehouse (DW) capabilities and online analytical processing (OLAP) tools. This is enhancing planning capabilities, decision support, service delivery, and performance monitoring. The main objectives behind these changes include raising PFM sustainability, improving the efficiency of public service delivery, and promoting transparency and accountability.

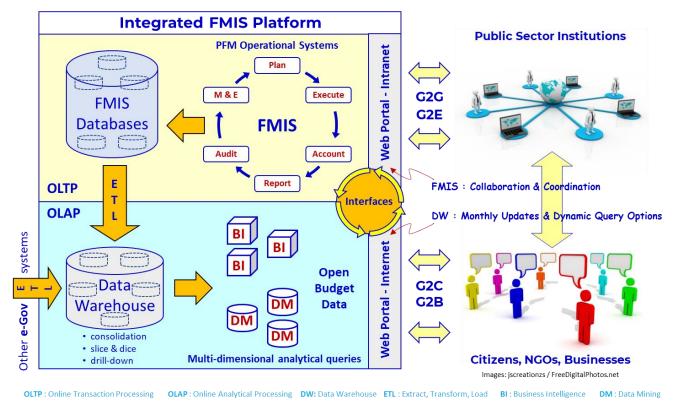


Fig. 7: Integrated FMIS for Enhanced Data Analytics

However, the implementation of IFMIS faces several challenges (Table 2).

Table 2: Implementing IFMIS. Trends and Challenges

	IFMIS Implementation trends	Key Challenges		
•	Growing focus on results: Program-Based Budgeting & Public Investment Mgmt. Integrating core FMIS with DW and other government systems to	•	Leadership & change management for transition to digital culture in the public	
•	improve data quality & value, and to expand the scope of transactions / TSA Rapid IFMIS modernization by combining traditional & agile approaches Improving interoperability through web services / Application	•	sector Enforcing the use of IFMIS for daily recording of all budget transactions, and web publishing of results (for	
•	Program Interfaces (APIs) & shared Digital Public Infrastructure (DPI) Exploring the use of new/disruptive technologies (Big Data & AI/ML) for performance monitoring, decision support and savings	•	building trust) Improving the interoperability of IFMIS with other government systems	

Source: Presentation by Cem Dener.



The IFMIS data may be used both for business intelligence and advanced analytics (Table 3). While there is a high interest in using advanced analytics tools, including AI, in governments, a special policy framework is needed to mitigate AI-related risks. Also, it is becoming more important to focus on the interoperability of core government systems including IFMIS and the automation of data exchange using APIs through shared government service bus (GSB) platforms. The GovTech Maturity Index (GTMI) 2022 dataset (covering 198 economies) can be used to learn more about the good practices in shared GSB and interoperability platforms. Cem Dener concluded his presentation by sharing several country cases demonstrating the benefits of using shared interoperability solutions.

Table 3: Business Intelligence Vs. Advanced Analytics

	Business Intelligence	Advanced Analytics		
Answers the questions:	What happened?When?Who?How many?	Why did it happen?Will it happen again?What will happen if we change X?What else does the data tell us that we never thought to ask?		
Includes:	 Reporting (KPIs, metrics) Automated monitoring and alerting (thresholds) Dashboards Scorecards OLAP (cubes, slice and dice, drilling) Ad hoc query Operational and real-time BI 	 Statistical or quantitative analysis Data mining Predictive modeling Multivariate testing Big data analytics Text analytics 		

Three presentations followed where countries shared their experience in using modern analytical tools for enhanced treasury operations.

Mr. Tae Ho Yoon, expert, Korea Fiscal Information Service joined the plenary remotely and presented on the development of an integrated Fiscal Data System (FDS) used to support data-driven decision-making in Korea. The FDS is composed of three interconnected platforms: (i) the Korea Fiscal Information Service (KOFIS), (ii) the Korea Risk Assessment and Horizon Scanning (KORAHS); and (iii) the Korea Data Analysis System (KODAS) (Fig. 8).

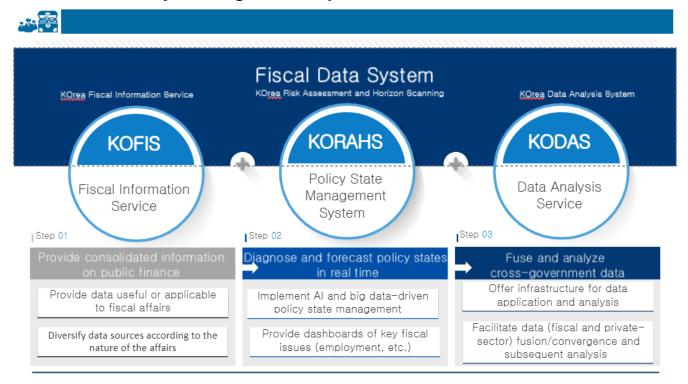


Fig. 8: Overview of Fiscal Data System in Korea

The FDS provides an advanced example of how the integration of treasury data with performance data may be used for descriptive, predictive, and prescriptive analytics. For instance, AI models are used for GDP forecasting and cash management forecasting based on 60-80 parameters and historical data. The authorities report that the AI models have been highly accurate, especially in the short-term. Merging treasury, administrative, social and economic data, has also enabled the development of early warning systems to guide management decisions in various sectors.



Special emphasis has been given to capacity building and training with KFIS developing data science training courses which are available to all interested citizens. It also launched an offline Data Analysis and Education Center in Sejong to enable the private sector, including corporations and academic researchers, to analyze fiscal data using dBrain's analytics infrastructure.



Mr. Ákos Kőrös, Project Manager, Hungarian State Treasury delivered the next presentation on developing a public finance data warehouse in the Hungarian Treasury. The Hungarian State Treasury manages four DWHs: on agricultural and rural development, social security and family

support, local government, and public finance. The public finance DWH includes the data from 12 source information systems. It is based on an SAP solution and is currently used by internal users in the treasury, the Ministry of Finance and external users within the government. It provides BI functionality (Fig.9) and allows the integration of non-financial data from external systems to facilitate data-supported decisions.



Fig. 9: BI Functionality of Public Finance DWH in Hungary

Mr. Rusli Zulfian, Deputy Director for Treasury Information System and Data Science Management, and Mr. Heru Cahyadi, Section Head of Budget Execution Consolidation, Directorate of Treasury Technology and Information System (SITP), Ministry of Finance of Indonesia delivered the third country presentation on how data analysis has been implemented in the Directorate General of Treasury of Indonesia. The Treasury has gone through a long-term process automating and digitalizing its operations. Currently, the FMIS system (SPAN) includes or is integrated with other information systems providing for automation of all stages of budget preparation, execution, reporting, and audit (Fig. 10). Another system – SAKTI – was developed by the treasury as an application of SPAN and is used by spending units for financial management purposes, including budget preparation, commitment, execution, management of fixed assets, inventory, and receivables, as well as accounting and reporting. A major reason for the development of SAKTI was SPAN's high recurrent license costs (it is a commercial system) which limited the capacity for expansion to new users.



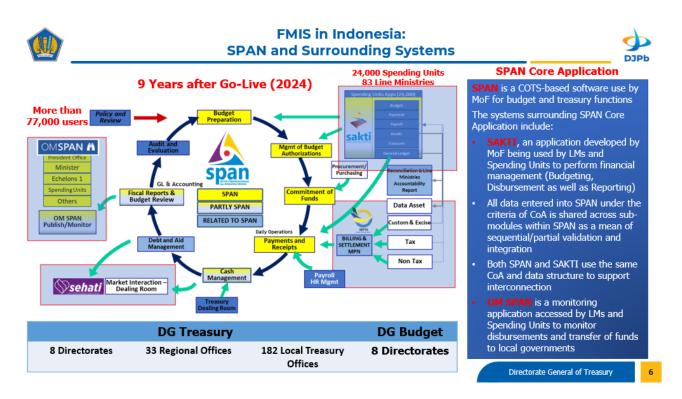


Fig. 10: Overview of FMIS in Indonesia

The implementation of data science in the Treasury of Indonesia is a part of a larger Big Data initiative underway in the Ministry of Finance, supporting the longer-term vision of the ministry as a data-driven organization. Five Big Data products were highlighted (Box 2).

Box 2: Big Data Products in the Treasury of Indonesia

Open Data: provides access to the treasury data and the data from external sources for the MoF and external clients.

Dynamic Dashboard is intended for the leadership of the MoF and Treasury DG and uses real-time data on government expenditures, including regional subsidies, and informs decision-making.

Artificial Intelligence: simulation system producing projections of revenues, expenditures, and other main budget items based on predetermined scenarios.

Data Analytics involves a dashboard providing flexible access to both actual real-time data and projected data.

Machine Learning is used for early warning systems, i.e. for predicting the risk of failure of regional governments to repay debts to the national budget or determining the financial capacity of the stateowned enterprises.

The need for the development of a competency-based framework and maintaining interoperability of data between the different levels of government (i.e., using the same Chart of Accounts) were flagged as challenges for effective use of emerging technologies in treasury operations.



Following the presentations, the meeting formed small groups where discussions focused on unlocking the potential of treasury data. The outputs of the discussions demonstrate that PEMPAL countries use treasury data to meet the requirements for both internal and external clients. There are examples of using treasury data for transparency and accountability purposes (e.g., open budget portals launched in Albania, Armenia, Croatia, Hungary, Kazakhstan, Kyrgyz Republic, Romania, Türkiye) and supporting high-level decisions (e.g., the Operational Management Center under Presidential Administration in Kyrgyz Republic).

Treasury data is also used for descriptive analytics, diagnostics (e.g., for identifying the threshold for the "green corridor" transactions in Georgia), forecasting (Hungary, Türkiye), and analyzing trends. The meeting concluded that using data analytics has significant potential for enhancing treasury operations in various areas, including:

- Improving transparency of public spending,
- Designing and monitoring performance indicators for the treasury and spending units (Albania, Türkiye),
- Implementing advanced liquidity forecasting / active cash management (Croatia, Georgia, Türkiye),
- Further improvement in arrears management (Albania, Romania, Serbia),
- Distribution of revenues and e-Payment Portal, POS e-payments (Armenia),
- Merging external/secondary data (statistical, administrative, citizens' / users' feedback on service delivery) for performance indicators with internal data for evidence-based decision-making,
- Overall improvement of macro-fiscal analysis and allocation decisions in the mediumterm budget,
- Enhancing the quality of public investment management (Azerbaijan), and
- Strengthening treasury control, risk management, and fraud mitigation (Albania, Georgia, Kazakhstan, Kyrgyz Republic).

The participants identified various challenges including: technical (data completeness, interoperability, and accuracy; integration of various information systems), human resource and capacity-related, issues with expenditure classification related to estimating costs of programs and cross-program activities, methodological issues, and in measuring the impact of the use of data analytics in treasury operations.

Key Takeaways from Day 3. There is high interest in implementing emerging technologies to enhance treasury performance in PEMPAL countries as well as around the globe. Currently, treasuries in PEMPAL countries use treasury data for many purposes, including descriptive analytics, diagnostics, predictive analytics, and historical data analysis. Some countries provide real-time data to support management decisions. However, unlocking the full potential of treasury data calls for addressing several key considerations:



- o implementing a whole-of-government approach to maximize the benefits of digital platforms,
- o ensuring integration and interoperability of IFMIS with other government information systems using shared digital public infrastructure (GSB, APIs),
- o investing in capacity building around data analysis and data science,
- o focusing on using the data for identifying and minimizing treasury risks and improving performance, and
- o strengthening transparency and accountability and supporting public engagement by providing better public access to the treasury data on public execution.

Day 4: News from the PEMPAL Member Countries

The final day was reserved for sharing news on recent relevant developments in member countries. Delegates of North Macedonia, Kazakhstan, and Kyrgyz Republic made presentations highlighting specific developments in treasury operations in their countries.

Ms. Magdalena Simonovska, State Advisor for Financial System Affairs and President of the IFMIS Working Body, presented the progress in developing IFMIS in North Macedonia. The IFMIS

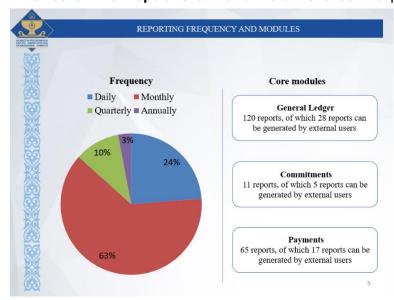


is expected to support the implementation of the Organic Budget Law and support PFM reforms. It will entail both a modernized version of existing IT systems and include new modules on project management, cash forecasting, accounting, asset management, collection of unpaid claims, open budget, a DWH, and BI tools (Fig 11). IFMIS is expected to be implemented by the end of 2026.

Fig. 11: Planned IFMIS Modules in North Macedonia



Ms. Danagul Yelubayeva, Head of Department, Committee of Treasury of the Ministry of Finance of the Republic of Kazakhstan shared the progress made by Kazakhstan in data



management. Currently, the Treasury Information System in Kazakhstan allows to generate over 200 types of reports automatically, while 50 reports can be generated as required by users (Fig. 12). This user-centric approach helps to meet a variety of analytical requirements and improve public expenditure transparency. Further development of the system will support the gradual transition to financial reporting under the accrual basis IPSAS planned for 2024-2028.

Fig. 12: Reporting Modules and Frequency in Kazakhstan

Mr. Talant Keldibekov, Deputy Director, Central Treasury, Ministry of Finance, Kyrgyz Republic, shared the experience in implementing a distributed centralized accounting system in budget-funded entities. The system will replace existing accounting software currently used in the budget sector, including 1S. It provides support for all major accounting functions (Fig. 13) and was launched in early 2024 after training in 2023. The new system also involved development of a new CoAs.

ACCOUNTING SUPPORT FOR:



Fig. 13: Functionality of Centralized Accounting System in Kyrgyzstan



Currently, the centralized accounting system is used in a test environment, and it is planned to go live and replace the other systems from 2025. A pilot project on accrual accounting is also underway.

Conclusions

Mark Silins and Cem Dener wrapped up the thematic agenda of the plenary.

Overall, the discussions demonstrated that PEMPAL countries have achieved significant progress in the digital transformation of their treasuries. Substantial progress has been made in Serbia, as well as other member countries, in extending treasury coverage, implementing real-time payment systems, and integrating budget execution with accounting and financial reporting. Though much has been achieved,



the discussions have highlighted several points worth exploring in the future.

First, as demonstrated by examples of Serbia, Georgia, and Azerbaijan, integrating spending units as direct treasury clients of the IFMIS has significant benefits, especially if the integration involves both transaction processing and other financial management stages (i.e., financial planning, accounting, financial reporting). Integration into the FMIS for the broader general government, including statutory bodies may depend on the degree of independence that these entities have and their governance capacity. Consolidation is beneficial (simpler consolidated reporting, improved cash management) if these entities can be convinced of the benefits or compelled to consolidate. From the treasury side, digitization, ensuring early controls, for example, at the procurement stage (CoA classification, budgetary checks, vendor numbers) are passed forward to later stages, a common Unified Chart of Accounts, and elimination of redundant central controls are important pre-conditions for successful expansion of FMIS and coverage of the TSA.

Second, while most PEMPAL countries report extensive TSA coverage, often such consolidation does not include full fungibility of funds, reducing the benefits of consolidation. To maintain the key benefits from the consolidation of accounts, cash management should be centralized in the treasury, while the benefits from such centralization, for example, revenues from investing idle balances could be shared. To this end, the recent knowledge product prepared by the TCOP resource team on *Optimal Coverage of TSA*² could be a useful basis for discussing further consolidation plans.

Third, the impressive progress in developing and implementing IFMISes highlights Treasuries' potential leadership role in government data management. However, using treasury data effectively requires integration with other data sources including performance data, through the

² https://www.pempal.org/knowledge-product/optimal-coverage-treasury-single-account



use of data warehouses or data lakes, providing access to external and internal clients for different reporting and analytical purposes. Achieving these synergies calls for integrating Treasuries' development efforts with government-wide approaches to digital transformation, ensuring data interoperability and effective system integration.



Fourth, leveraging the potential of treasury data also requires the right balance between data transparency and privacy considerations. The examples of South Korea and some other countries demonstrate that a balance can be maintained in the interest of all parties. Ensuring access to data on budget execution is critical for tracking performance and conducting benchmarking across and within various government sectors.

Fifth, while data analysis tools may be applied for various purposes, one of the most promising areas for applying these tools is managing various treasury risks, including operational risks, cash management-related risks, as well as fraud and arrears prevention.

Finally, the successful implementation of advanced digital tools calls for developing adequate skills among treasury staff and increases the importance of retaining those staff. The modern BI systems, let alone AI algorithms set higher requirements for staff competencies that cannot be outsourced. Thus, apart from significant investment in software and hardware, investment in human resources should not be neglected.

Planning for the Future

The plenary meeting concluded with a wrap-up session during which the participants reflected on their impressions of the meeting and shared their ideas for organization and thematic content of the future events of the community. Participants pointed out that they received useful information during the plenary sessions and highlighted the presentations by guest speakers from Indonesia and South Korea, as well as the presentations of plenary hosts, among the most useful. In-depth group discussions stimulating peer-to-peer learning and informal exchange of experience were identified as the most useful. Country delegations also provided their detailed suggestions by filling in the 2024 thematic survey which will inform the TCOP activity plan for FY2025 and beyond.

