

Measuring Cash Management and Forecasting Performance: Self-Assessment Results

Group 3

Countries: Bosnia and Herzegovina, Croatia, Romania, Serbia, and Türkiye

1. Cash Management Outcomes

| Indicator: value range | BiH | Croatia | Romania | Serbia | Türkiye |
|--|-----|---------|---------|--------|---------|
| Percentage of the total amount (by value) of monthly payments due that are not made on the due date (as a result of the lack of liquidity) | 0 | 0 | 0 | 0 | 0 |
| Ratio of outstanding advances or other borrowing from the central bank to total monthly expenditure, % | 0 | 0 | 0 | 0 | 0 |

- ❑ **ROMANIA:** All payments settled in full on the date they are sent, no rejections due to lack of liquidity ever in the last decade or more, now all payments daily done. The second indicator is not relevant because financing through CB loans is forbidden in EU countries. Only short-term deposit from commercial banks and other cash management instruments such as foreign exchange instruments. Active cash management. Each morning after the forecast we see whether there is a need to borrow from the commercial bank or through FX.
- ❑ **CROATIA:** No delays in payments of what has been entered into the system on the daily basis, but sometimes delays if the line ministries have not entered on time. The first indicator is relevant. Deadlines are legally prescribed - up to 60 days by contract by 30 if not specified by the contract. The second not relevant for the EU member states. Could add an indicator to measure the cost of excess liquidity due to poor budget planning by the line ministries. Could measure the extra costs associated with borrowing that proves to be unnecessary due to either bad forecasts or delays in payment obligations (particular problem for large projects, often EU funded). This is relevant for the investment projects and projects funded from the EU funds, which both often have execution delays. Croatia does not have a formal buffer but the resources for all potential obligations exist.
- ❑ **SERBIA:** No delays in payments for years, all goes through SPIRI system since 2023 in which BUs enter multiannual obligations for 3 years. No borrowing from the CB.
- ❑ **BOSNIA AND HERZEGOVINA:** The indicator shows consolidated data for the central levels of state and two entities. No payment delays, and no borrowing from the CB. T-bills/bonds used. Operational plans – BUs get monthly allocations, which is used for BUs’ monthly expenditures.
- ❑ **TÜRKIYE:** Details in presentation delivered earlier on Day 2. No payment rejections, and especially not for the liquidity issue. Borrowing from the CB is legally prohibited.

2. TSA Coverage

| Indicator: average values | BiH | Croatia (annual) | Romania | Serbia | Türkiye |
|--|---------------------|---------------------|-----------------------|-----------------|---------|
| A. Cash balances in the TSA under control of the Treasury and available to meet commitments (in local currency)* | 1.691,5 mil BAM | 2909.9 mil EUR | Around 1.5 bln EUR | Not relevant | |
| B. Total of other general government balances in the banking system (in local currency) ** | 2.582,4 mil. BAM | 2824.3 mil EUR | 0 | Not relevant | |
| C. = A/(A+B) x 100 percent | 39.56% | 50.74% | 100% | | 92.1% |

- ❑ **ROMANIA:** All goes through TSA, including subnational level. No holding account. Currency buffer is in the CB, not through TSA. Large variety from month to month, e.g. because pension payment falling on different dates, or due to T bond redemption cycles.
- ❑ **CROATIA:** subnational levels and their EBFs have their own TSA, the central-level coverage is around 90% (with an increasing trend, with some fluctuations depending the size of EU funding from year to year). Need to further increase central level TSA coverage.
- ❑ **SERBIA:** MoF responsibility, do not have the data on general government in the Treasury. Starting 2025, local level will also be included in SPIRI, but responsibilities/data for the general government not in the Treasury. Indicator A is responsibility of MoF, not Treasury, for indicator B data not available. [Group noted that such data should nevertheless be available to Treasury]
- ❑ **BiH:** A includes TSAs of central State and two entities, B includes also cantons, munis and cities, and EBFs that are outside of the TSAs. Pension funds are in TSA, others not. In Cantons and munis/cities, own TSA. Overall 60% mostly due to Cantons in FBiH, which also have education and health sector jurisdictions.
- ❑ **TÜRKIYE:** Cash balance data is not publicly available. CB BS data and data on the deposits in the state-owned bank is not published (data for the state banks not even published retrospectively). The difference between 92% and 100% is mostly due to munis.

3. Cash Forecasting Accuracy

| Indicator (average values) | BiH | Croatia | Romania | Serbia | Türkiye |
|----------------------------|---------------|--------------|-------------|--------------|---------|
| Error, revenue | 3.28% | 8.0% | 5.0% | 0.85% | 3.8% |
| Error, expenditure | 8.00% | 3.6% | 3.8% | 1.65% | 3.0% |
| Net Deviation | 11.39% | 11.6% | 0.3% | 1.52% | |

- ❑ **ROMANIA:** Pessimistic approach to revenue side. On expenditure size, fluctuations sometimes due to policy changes (e.g. pension increases) or quarterly budget allocation cycle or SOE dividend inflow schedule. Forecasts and actuals are monitored, currently not at a very granular level, planned for the future to understand the driving factors. The actual progress on revenue throughout the month compared to the forecast seems to also affect timing of expenditure.
- ❑ **CROATIA:** Conservative revenue projections. Expenditure in these months had slower execution dynamics, due to some delays in afore-mentioned large project expenditures. Other expenditure projections are more accurate. Expenditure projections conducted along with the line ministries/BUs. For largest outflows, set dates (e.g. pensions always on the same date of each month), which increases predictability. The Liquidity Board members request explanation on forecast deviations; again mostly due to large variable investment/EU projects.
- ❑ **SERBIA:** All BUs enter execution plan on monthly basis through SPIRI for the remainder of the year every month, at 3rd econ classification level for all funding sources. Based on those, the Treasury prepares monthly expenditure projections. The Debt Department deals with the deposits, auctions etc. Few monthly meetings with of the Budget, Debt, and Treasury depts on projections.
- ❑ **BOSNIA AND HERZEGOVINA:** This is only Federation level. Large monthly variations in these three months, mostly because in month 3 dividend payment was not planned for that month but happened on revenue side. On the expenditure side, month 2 (August), probably due to holidays, BUs did not execute all planned expenditures plus central transfer to munis/cities was delayed to the next month. These were extreme months. The first two indicators are very useful, the third one could be further analyzed/sharpened.
- ❑ **TÜRKIYE:** The figures are absolute values. Net deviation not included as the absolute level of revenue data is not published. Additionally, not sure that the proposed Net Deviation is the most appropriate way to calculate it. Revenue and expenditure forecast indicators are already used and reported to the Deputy Minister.

Summary



❑ CASH MANAGEMENT OUTCOME indicators:

- ❑ Not relevant for this group of countries, as no liquidity issue and borrowing from the CB prohibited. However, there is cost of protecting the liquidity excessively when expenditures are delayed/not realized.

❑ TSA COVERAGE indicators:

- ❑ Relevant. However, there are questions on what is measured (e.g., do we include overnight or other deposits under Treasury control; also for the countries that do not have subnational balances in TSA may need to report two indicators)

❑ CASH FORECASTING indicators:

- ❑ Some measures may include policy or constrained variables. (If expenditures are constrained to a previously agreed plan, the ability to forecast expenditure is not being properly assessed).
- ❑ It is difficult to identify the most accurate or useful error measure in the forecast of net deviation.
- ❑ Some discussion of how to best to average errors (net or ignoring the minus sign)
- ❑ Are errors implying greater outflow “worse” than those implying greater inflow?

THANK YOU!

