

**INTERNAL AUDIT DIVISION** 

# **REPORT 2024/097**

Audit of the implementation of COMPASS, the results-based management system at the United Nations High Commissioner for Refugees

Major enhancement to COMPASS functionality, system controls and integration was needed for it to effectively support UNHCR's resultsbased management processes

30 December 2024 Assignment No. AR2023-168-01

# Audit of the implementation of COMPASS, the results-based management system at the United Nations High Commissioner for Refugees

### **EXECUTIVE SUMMARY**

The Office of Internal Oversight Services (OIOS) conducted an audit of the implementation of COMPASS, the results-based management (RBM) information technology (IT) system at the United Nations High Commissioner for Refugees (UNHCR). The audit assessed the adequacy and effectiveness of the implementation of the COMPASS system in supporting UNHCR's RBM processes. It reviewed: (i) COMPASS' achievement of the objective of supporting RBM processes; (ii) system functionality, availability and performance; (iii) system integration and change management; (iv) management of data and reporting; (v) user access management; and (vi) contractual arrangements.

COMPASS went live in 2021 as the Business Transformation Programme (BTP)'s flagship IT system for UNHCR's RBM processes. Although initially conceived as a standalone platform, it was later incorporated into the BTP in 2020, necessitating major modifications to address system design gaps, enhance its performance and integrate it with related BTP systems. The modifications started post-launch and were still on-going three years after go-live. Important features deferred at go-live remained unaddressed at the time of the audit, thereby impacting COMPASS effectiveness in supporting RBM. While the use of the COMPASS system was limited, UNHCR entities were introducing alternative tools in its place. Further, integration issues between COMPASS and other systems contributed to incomplete and inaccurate data which impacted reliability of available information for decision making in UNHCR.

OIOS made two critical and five important recommendations. To address issues identified in the audit, UNHCR needed to:

- Address key system gaps by: (i) instituting mechanisms for detailed planning, budgeting and monitoring of directly implemented programmes; (ii) establishing controls to ensure that changes to key parameters are properly authorized; and (iii) developing effective indicators for measuring and tracking results (Critical recommendation).
- Address system gaps in the budgeting module and mechanisms for strategy modification throughout the Plan, Get and Show cycle.
- Enhance the functionality of COMPASS by: (i) activating data validation controls; (ii) improving the COMPASS user interface; and (iii) conducting performance tests to identify COMPASS vulnerabilities and potential failure points as more adjustments are made to the system.
- Ensure the quality of available data and reports for decision making by: (i) addressing integration issues between COMPASS and other BTP systems; (ii) designing appropriate reports to meet key user needs; and (iii) building staff capacity in collecting, verifying and reporting data within COMPASS (Critical recommendation).
- Review and determine the continued use of other systems and tools alongside COMPASS.
- Update the security assessment for COMPASS and address identified data security and continuity gaps.
- Ensure that system roles and access privileges are granted in line with the established policy to ensure accountability.

UNHCR accepted all recommendations and has initiated action to implement them. Actions required to close the recommendations are indicated in Annex I.

# CONTENTS

I.	BACKGROUND	1-2
II.	AUDIT OBJECTIVE, SCOPE AND METHODOLOGY	2-3
III.	AUDIT RESULTS	3-12
	A. Achievement of COMPASS objectives	3-7
	B. System functionality, performance and availability	7-8
	C. System integration, data quality and reporting	9-11
	D. User access management and security	11-12
IV.	ACKNOWLEDGEMENT	13

- ANNEX I Status of audit recommendations
- APPENDIX I Management response

# Audit of the implementation of COMPASS, the results-based management system at the United Nations High Commissioner for Refugees

## I. BACKGROUND

1. The Office of Internal Oversight Services (OIOS) conducted an audit of the implementation of COMPASS, the results-based management (RBM) support system for strategic planning, budgeting, monitoring and reporting at the United Nations High Commissioner for Refugees (UNHCR).

2. UNHCR's RBM was initially implemented in 2009, with the release of a results framework and the bespoke tool, FOCUS. The RBM renewal project was conceptualized in 2016 with a project initiation document approved in 2019 to: (i) review UNHCR's implementation of RBM; (ii) revise the results framework and associated business processes; and (iii) replace FOCUS with another system with COMPASS selected as the preferred system during the project lifespan.

3. Although initially conceived as a standalone system, COMPASS became part of the Business Transformation Programme (BTP) when the latter was launched in 2020. UNHCR adopted a Platform-as-a-Service (PaaS) cloud-based tool for implementing COMPASS.

4. Table 1 below shows the COMPASS implementation phases:

Date	Details			
2019-2021	Development of COMPASS under the RBM renewal project			
February 2021 - June 2022	COMPASS went live in February 2021 and was completed on 30 June 2022 with all project objectives reported as achieved. COMPASS was implemented in 87 country operations, 15 multi-country operations, 7 Regional Bureaux, and 21 Headquarter entities (including Divisions).			
	The Managing Systems, Resources & People (MSRP) <sup>1</sup> re-alignment project was implemented to support the deployment of the new RBM framework and budget structure with the then existing MSRP system <sup>-</sup> All MSRP re-alignment objectives were reported as achieved.			
June 2022 –	The COMPASS re-alignment project was launched to integrate the system seamlessly with			
December 2023	other newer BTP applications, e.g., Workday, Cloud ERP. This project was closed in December 2023 with key objectives reported as achieved.			

#### **Table 1: Implementation of COMPASS**

5. The Director of the Division of Strategic Planning and Results (DSPR) owns the COMPASS platform. The Division of Information Systems and Telecommunications (DIST)'s role was to ensure that all corporate Information Technology (IT) systems, applications, and services were operational, met business needs, secure, stable and up-to-date, and continued to be developed and supported as needed.

6. UNHCR relies on its corporate systems for managing its planning, budgeting, monitoring and reporting activities. These systems include: (a) COMPASS for planning, budgeting, monitoring and reporting; (b) Workday for human resources management; (c) Project, Reporting, Oversight and Monitoring Solution (PROMS) for partnership management; and (d) Cloud ERP for finance, travel and supply chain. Additionally, UNHCR developed Power BI tools, such as the Results Data Portal, to analyze results data from COMPASS and produce reports. OIOS reviewed the completeness and accuracy of strategies, results chains, budgets, staff positions and expenditures from these systems and assessed the effectiveness of

<sup>&</sup>lt;sup>1</sup> The previous UNHCR enterprise resource planning system.

related internal control. The relationship among the UNHCR corporate systems is explained in figure 1 below.



Figure 1: The relationship between COMPASS and other BTP systems

7. Comments provided by UNHCR are incorporated in italics.

# II. AUDIT OBJECTIVE, SCOPE AND METHODOLOGY

8. The objective of the audit was to assess the adequacy and effectiveness of the implementation of the COMPASS system in supporting UNHCR's RBM process for strategic planning, budgeting, monitoring and reporting.

9. This audit was included in the 2023 risk-based work plan of OIOS due to the importance of the COMPASS in driving UNHCR's enhanced focus on delivering results to affected people.

10. OIOS conducted this audit from April to June 2024. The audit covered the use of COMPASS throughout UNHCR's operation management cycle, i.e., Plan, Get and Show<sup>2</sup> phases for 2022 and 2023. Based on an activity-level risk assessment, the audit covered higher and medium risks areas: (i) COMPASS' support of RBM processes; (ii) system functionality, availability and performance; (iii) system integration, data quality and reporting; and (iv) system compliance and security. This audit took into consideration the findings and recommendations of the recently completed OIOS report on the audit of the progress in implementing the BTP (2024/011).

11. The audit methodology included: (a) interviews with key personnel including users; (b) review of relevant documentation; (c) analytical review of data from COMPASS including testing/review of strategic, operational and indicator data; (d) tests to ensure consistency and completeness of COMPASS data in relation to other systems such as Cloud ERP, PROMS and Workday, (d) sample testing of application controls including access controls; and (f) review of Plan, Get, Show phases in COMPASS in Niger, Ethiopia, Syria, Bangladesh, Multi-Country Office Panama, the Division of Emergency, Security and Supply and the Regional Bureau for West and Central Africa.

<sup>&</sup>lt;sup>2</sup> Plan Phase involves developing three-to-five-year strategies. The Get Results phase operationalizes the multi-year strategy within available resources and the Show phase shows results achieved and feeds back into the Plan phase.

12. The audit was conducted in accordance with the International Standards for the Professional Practice of Internal Auditing.

## III. AUDIT RESULTS

## A. Achievement of COMPASS objectives

#### Benefits of the COMPASS system were yet to be assessed

13. DSPR did not have a separate project initiation document for COMPASS. It instead listed the objective of replacing FOCUS with another system in the RBM renewal project initiation document. The audit of the progress in implementing the BTP (2024/011) also noted that the RBM renewal project initiation document lacked proper criteria against which the success of the COMPASS would be assessed. For example, the listed indicators in the RBM renewal project initiation document were primarily qualitative and were not enough quantitative. This impacted OIOS' ability to assess whether COMPASS was fit for purpose in supporting the implementation of RBM processes.

14. The closure report of the RBM renewal project<sup>3</sup> concluded that the objectives in the project initiation document, including the replacement of FOCUS with COMPASS, were met. However, this was despite the fact that COMPASS specific objective of ensuring its inter-operability with other key systems remained a challenge at the time of the audit. Further, a benefits realization assessment for COMPASS that should have been conducted 12 months after project closure had not been undertaken at the time of the audit. DSPR noted that the benefits realization would be completed by mid-2025. Thus, no recommendation has been raised in this regard.

#### Deferred COMPASS features at go-live were yet to be implemented to ensure system effectiveness

15. The RBM project closure report identified features in COMPASS that were deferred at go-live, with recommendations made that they are addressed under the COMPASS realignment and/or other systems such as PROMS. The OIOS audit of the progress in implementing the BTP had also concluded that for the system to be fully effective, the deferred features in COMPASS at go-live needed to be implemented. However, the deferred features remained unaddressed at the time of the audit, thereby impacting COMPASS effectiveness in supporting RBM, as detailed below:

(a) No provision for direct implementation activities in COMPASS

16. COMPASS did not have a feature for managing workplans, targets and budgets for activities directly implemented by UNHCR, totaling \$1.2 billion in 2024. The 2022 RBM project closure report noted that workplan feature for direct implementation had already been built in COMPASS but needed to be revisited in the COMPASS Realignment project. It was also suggested that this feature be assessed alongside PROMS functionalities. However, this was not addressed in the COMPASS Realignment Project nor considered in the development of PROMS, and thus remained outstanding at the time of the audit.

17. The lack of a feature for direct implementation in COMPASS impacted the planning and budgeting for, as well as financial and programmatic monitoring of, related activities. For instance, direct implementation costs totaling \$431 million in 2024 were listed in COMPASS as 'other expenses' without workplans, detailed budgets and indicators and targets for performance measurement. OIOS also noted that

<sup>&</sup>lt;sup>3</sup> The closure report prepared in 2022 marked the end of the project. The report captured final project performance including costs and timeliness, summarized key achievements, highlighted lessons learned, and detailed outstanding issues or follow-up actions.

no work plans, detailed budgets and targets were set for directly implemented activities in Bangladesh totaling \$8.3 million; yet a partner with a budget of \$264,000 had a work plan and defined set targets, i.e., to reach 446,343 beneficiaries.

18. DSPR noted that direct implementation would not be managed in COMPASS but in other specialist applications such as Cash Assist, ProGres and the Global Distribution Tool. However, unlike COMPASS and PROMS, the proposed applications lacked features for planning, budgeting, monitoring and reporting and therefore were unsuitable for executing the relevant functions. There was a need for UNHCR to identify a suitable system if not COMPASS for managing directly implemented activities.

(b) Versioning and audit trail for accountability and monitoring were not enabled in COMPASS

19. UNHCR's functional requirements for the COMPASS software specified that there should be an audit trail so all activities and changes in the system would be traceable for audit purposes. However, this feature was disabled in the system, resulting in previous versions being overwritten when changes were made in COMPASS and modifications not being retained by the system. The lack of audit trail also meant that the system did not maintain a record of what cells were edited, by whom, at what time, and the modifications effected. Although identified as a major design flaw in the RBM renewal project closure report, it remained unresolved at the time of the audit.

20. DSPR explained that while not all the revisions could be tracked, versions of budgets at a few key milestones such as the draft and approved EXCOM versions were available in the Results Data Portal, the reporting tool for COMPASS. This, however, meant that changes made to the operating level budget, i.e., on average 15 times a year, could not be tracked nor corresponding changes checked to strategies and results chains. The lack of audit trail prevented UNHCR from tracking data changes and identifying unauthorized data modifications. For instance, DSPR could not explain the increase of 2022 OL budget amount in COMPASS from \$5.529 billion in May 2024 to \$5.548 billion in October 2024. Also, Bureaux noted that the lack of version control meant that they lost visibility of changes effected when previously approved strategies were overwritten during updates.

21. The vendor for the COMPASS platform confirmed that the data alteration log feature and version control functions were available in COMPASS but had been disabled during the system setup. However, DSPR maintained that it was impossible to have audit trail functionality at a cell level. DSPR noted that versioning as originally envisaged and partially implemented in COMPASS was ineffective since it did not provide insight or visibility on the overall consistency of the modifications across results, budgets, narratives, population planning figures, indicator etc. It proposed a workaround, i.e., having changes made to key parameters triggering notifications for review and approval by the relevant officers.

(c) Gaps in managing indicators in COMPASS

22. The closure reports for the RBM renewal project in 2022 and the COMPASS realignment in 2023 identified major issues with indicator management; with both calling for a major redesign of the relevant module. Although critical to RBM's Plan, Get and Show cycle, the audit noted that issues related to indicator management remained unaddressed in COMPASS, thereby impacting the measurement of results. For instance, COMPASS did not regulate the number and quality of indicators entered into the system. This resulted in sampled operations having between 142 to 699 indicators in COMPASS, which was not only resource intensive but also inefficient to manage. Additionally, the framework in COMPASS did not include all mandatory indicators, e.g. for measuring accountability to affected populations. At the time of the audit, DSPR had a concept note to address indicator management issues at a cost of \$2.5 million.

(d) Plan Access Controls not decentralized as designed

23. The COMPASS' Plan Access Control ensured that staff had the right access to COMPASS, thereby ensuring data integrity, and facilitated the segregation of duties within an area of budgetary control. The decentralization of change requests regarding Plan Access Control to the operations was part of the initial system design, which according to the RBM project closure report was descoped due to bandwidth issues. Instead, Plan Access Control was centralized under DSPR, which was not managed well and thus increased data integrity risk in COMPASS while also negating the accountability of managers. For instance:

- There was no central repository for requests and/or changes to plan access control that were sent to DSPR as email attachments.
- There were significant differences identified between the roles that were approved by operations and what was provided to the users in COMPASS.
- DSPR and/or Bureaux had not reviewed and approved the plan access control requests from countries and other entities as mandated by the Policy.
- The roles assigned to some users were not disabled when their functions or duty stations changed.

24. The gaps identified in the Plan Access Controls had implications regarding ensuring only authorized users could access, modify, or use certain data, thereby safeguarding system integrity and securing sensitive information. This issue is covered under recommendation 7.

#### The use of COMPASS system is limited

25. The deferred features at go-live indicated that the COMPASS system was not fully built as designed and intended, which resulted in limited use of it. A review of the data in COMPASS showed that UNHCR entities had results reported globally against only 6,132 out of 11,525 output targets (53 per cent) in 2023. Further, no achievements were reported on the other 47 per cent of output targets set for 2023. The low usage of the COMPASS system had not been flagged by the second line in its oversight role and remained unexplained and unaddressed with no repercussions for non-compliant entities.

26. Further, Annual Results Reports from COMPASS for the operations reviewed did not explain why targets were not met yet budgets were mostly spent, and this issue too was not identified by Regional Bureaux during their reviews. The limited use of the COMPASS system indicated a significant deficiency in the effectiveness of COMPASS. While DSPR attributed this low use to inadequate staff capacity, OIOS was of the view that it would take more than training to address these gaps as reflected in recommendation 2. Enhanced control features in COMPASS would also drive better compliance.

(1) The UNHCR Division of Strategic Planning and Results should address system gaps regarding: (a) mechanisms for detailed planning, budgeting and monitoring of directly implemented programmes; (b) controls that ensure that changes to key parameters trigger notifications for review and approval by relevant officers; and (c) developing effective indicators for measuring and tracking results (Critical recommendation).

UNHCR accepted recommendation 1 and stated that DSPR: (a) will prioritize ensuring that mechanisms for monitoring and reporting direct implementation activities against plans are adequate; (b) partially implemented versioning as originally envisaged in COMPASS but it did not provide insight nor visibility on modifications effected across results, budgets, population planning figures, indicators etc.; this was thus replaced by snapshots to reflect the evolution of strategies over time; and (c) had an ongoing project meant to improve the indicator functionality of COMPASS.

#### COMPASS features needed additional enhancement to effectively support the implementation of RBM

27. The audit also identified the following gaps in the existing features that needed enhancement for COMPASS to effectively support the implementation of RBM.

(a) Gaps in controls over multi-year strategic planning

28. All UNHCR entities reviewed had multi-year strategies in COMPASS with results chains and resource requirements duly incorporated. However, these strategies needed to be modified throughout the RBM cycle due to changing operational context, but COMPASS lacked a strategy modification feature to reflect such changes. For instance:

- COMPASS did not have a feature that linked the results of the Show phase in one year to the planned activities in subsequent periods. It also did not provide for the updating of multi-year strategies with the results on the Show phase.
- Modifications to strategies are also needed as circumstances changed as was noted in Bangladesh, where a 20 per cent reduction in refugee numbers called for changes in the operation's strategies, indicators and targets. However, such changes were not done because COMPASS had no feature to identify and process them.
- COMPASS also lacked a feature that ensured that multi-year strategies were translated into annual plans for implementation. Regional Bureaux identified this as a key impediment to them knowing how the many needs reflected in multi-year strategies were prioritized within available resources in the annual plan.

29. DSPR explained that COMPASS was not designed to have the strategy modification feature; and that instead, the relevant controls would be conducted offline, with updates made to multi-year strategies in COMPASS thereafter. However, the workarounds were not effective, with countries and bureaux reviewed stating that strategies in COMPASS were not updated with the results of the Show stage as expected. These issues reflected gaps in system design which if unaddressed would impact the accuracy and quality of strategies in COMPASS.

(b) Control gaps in COMPASS budgeting module

30. The COMPASS budgeting module faced major performance issues post-go live. After a couple of attempts this was resolved under the COMPASS realignment project. Despite this, the audit identified other limitations in the system's budget module that remained unaddressed. For instance, exceptions were only flagged when the expenditure exceeded the overall OL budget<sup>4</sup> at the entity level, with no controls in place to ensure adherence at lower budget levels. DSPR explained that controls to ensure that budget holders operate within their spending authorities at the lower budget categories were in Cloud ERP but the audit confirmed that this was not the case.

31. COMPASS could also not detect key anomalies to budget submissions such as non-adherence to budget authorities. For instance, the audit identified anomalies related to 292 output activities in 2024 where the OL budget exceeded the OP budget by \$211 million. Further, 283 outputs in 2024 totaling \$104 million had OL budget allocations with no corresponding OP budget. The OP budget is UNHCR's approved needs-based budget and OL is the maximum spending authority.

<sup>&</sup>lt;sup>4</sup> The OL budget represents the maximum spending authority against which commitments and payments can be made

32. Users in a survey commissioned by UNHCR in early 2024 to assess whether changes in COMPASS budget processes addressed pain points, raised issues on user interfaces and the need to further simplify business processes. There was a need for DSPR to collaborate with the Division of Financial and Administrative Management in finding solutions to the unresolved system limitations identified above regarding budgets. DSPR's investment in addressing issues in COMPASS budget module raised questions about cost-effectiveness, particularly whether it would have been more economical to use the in-built module in the financial system and, through integration, link budgets to planning documents in COMPASS.

(c) Alignment of the system to underlying policy

33. UNHCR's Plan-Get-Show cycle was clear in the policy and had completed two cycles at the time of the audit. However, the three phases articulated in UNHCR's RBM Policy were not properly aligned to the structural layout of the COMPASS system whose main components were: (i) strategy planning; (ii) implementation, (iii) monitoring and reporting; (iv) change requests; (v) position management; (vi) reports and analytics; and (vii) contingency plans. This impacted users' comprehension of the RBM process and navigation through the system. DSPR acknowledged the need to align the system to the policy and noted that this would be addressed under the ongoing project related to user experience and navigation.

(2) The UNHCR Division of Strategic Planning and Results should: (a) train managers on how to use available reports as an aid to continuous review and adjustment of plans; and (b) address gaps regarding budget allocation, availability and consumption data in COMPASS.

UNHCR accepted recommendation 2 and DSPR stated that: (a) it understands that the system lacks adequate mechanisms to monitor and oversee changes and commits to explore possible ways to ensure that changes are monitored at an appropriate level and on relevant planning elements; and (b) revised rules to elevate the level at which budget controls were enforced when COMPASS was launched, i.e.: by budget category and Area of Budgetary Control. The responsibility for enforcing budget controls at the lower levels was left to operations and the second line.

# **B.** System functionality, performance and availability

Some system availability and performance issues need to be addressed

- 34. The audit considered the system performance at the time of the audit and noted as follows:
  - **Response time**: The countries and Bureaux sampled as part of the audit found the system response time reasonable. However, system performance issues remained during high load times as deadlines for different RBM stages approached.
  - **Throughput**: The Improvement Baseline Project addressed challenges faced in processing data within a given time frame. However, amongst other things, throughput was improved by dropping the validity checks at the time of data entry. Thus, several validation controls in the system were not enabled, implemented or configured (please see below for more details on the impact).
  - Availability: An independent assurance provider conducted System and Organization Controls 1 and 2 audits<sup>5</sup> on the security and availability of the vendor's cloud system and found no exceptions.

<sup>&</sup>lt;sup>5</sup> System and Organization Controls audits are reviews of an IT company's controls that are in place to help ensure the security, availability, processing integrity, confidentiality and privacy of their customers data.

- Error rate: Several system degradations were noted until April 2023, which reflected system performance and stability issues.
- Scalability: The COMPASS realignment closure report noted that the application is scalable in terms of number of users and peak performance load. However, the fact that system performance was improved by dropping certain validity checks indicated that there may still be issues with scalability. This and the fact that system performance was still being impacted during high load times indicated the need to review COMPASS potential failure under extreme conditions.

#### Gaps in data validation controls were noted

35. The dropping of validity checks to increase throughput meant that COMPASS did not have adequate controls to ensure integrity of data and adherence to business processes. It thus was unable to detect and flag UNHCR entities failure to enter all mandatory information into the system, as below:

- 68 of 102 operations did not have context specific impact statements and indicators in COMPASS;
- 31 per cent of the impact indicators in COMPASS did not have baseline information;
- 46 and 54 per cent of outcome and output indicators respectively did not have targets. This meant that \$643 million of the global OL budget did not have targets against which results would be measured; and
- There were more output statements in the system, i.e., 15,183 in 2024 than output indicators, i.e., 12,344 in the system. The lack of data validation controls compromised the completeness, accuracy and reliability of data in COMPASS.

#### Need for improved interface navigation to enhance user experience

36. Despite various interventions, users of COMPASS found the interface navigation unfriendly to use and not intuitive. Twenty-eight per cent of respondents to a survey conducted by UNHCR in 2023 expressed their dissatisfaction with the COMPASS user interface and navigation. Similar sentiments were raised in another survey commissioned in early 2024. The COMPASS realignment project that closed in December 2023 attempted to address related issues but concluded that "user interface and performance improvements were very much needed, along with more fundamental changes". DSPR had started work to address user interface, but it remained work in progress at the time of the audit.

(3) The UNHCR Division for Strategic Planning and Results in collaboration with the Division of Information Systems and Telecommunications should take measures to improve the system functionality by: (a) activating data validation controls in COMPASS; (b) improving the COMPASS user interface; and (c) ensuring that performance tests are conducted to identify COMPASS vulnerabilities and potential failure points as more adjustments are made to the system.

UNHCR accepted recommendation 3 and stated that DSPR:(a) was working on periodic 'snapshots' feature of the system to compare strategies at different business milestones and track their contents and structure; (b) working on improving the User Interface / Experience of the COMPASS system and expects this to be completed by end of Q2 2025; and (c) would require the software provider to conduct 'performance tests' of the next system version release to ensure it meets acceptable performance.

## C. System integration, data quality and reporting

37. The COMPASS re-alignment project was launched to integrate the system seamlessly, thereby supporting its inter-operability with other UNHCR applications. The project was closed in December 2023, with the COMPASS realignment project closure report noting that the objective of integrating COMPASS with other key systems was completed. However, major challenges remained regarding the integration of COMPASS with other BTP systems, and this contributed to the data issues below. Another project (Str8n) had been launched at the time of the audit to address related issues.

#### Need to complete system integration to ensure COMPASS can produce reliable data

38. In UNHCR integrated environment, the COMPASS data (such as budget and indicators) should be consistent across other systems (such as PROMS, Cloud ERP and Workday). The audit compared data contained in COMPASS with that of other related systems and identified differences as reflected in the paragraphs below. These differences evidenced significant gaps in the integration between COMPASS and other UNHCR systems and had serious implications on the data reported in the system.

• **COMPASS, Financial statements and Cloud ERP:** There were unexplained variances between COMPASS data and financial statements for 2023 and COMPASS data and Cloud ERP for 2023 and 2024. For instance, the final OP budget in the 2023 financial statements was \$10.463 billion but the corresponding figure in COMPASS was \$10.453 billion. Similarly, the funds available (OL) per the financial statements was \$5.705 billion while the corresponding figure in COMPASS was \$5.067 billion. Additionally, the unexplained differences between the budget reports in COMPASS and the Cloud ERP are reflected in table 2 below.

	COMPASS \$ billions	Cloud ERP \$ billions	Difference \$ millions
OP budget (2024)	10.217	10.067	150
OL budget (2024)	4.105	4.124	19
OP budget (2023)	10.395	10.455	60
OL budget (2023)	5.020	5.084	64

#### Table 2: Differences between data in COMPASS and Cloud ERP

- **COMPASS and the Results Data Portal:** There was a \$22 million difference between the 2024 OL operation budget data in the Results Data Portal (\$2.279 billion) and COMPASS (\$2.257 billion). In the same year, there was also a difference of \$162 million between the OP budgets recorded in the two systems. The variances were undetected and when asked, DSPR attributed them to a bug in the Results Data Portal and raised a ticket for the issue to be resolved. The audit also noted that data pertaining to past years which should be stable continued to change over time. For instance, the 2022 OL budget data changed multiple times in 2024 and this could not be explained at the time of the audit.
- **COMPASS and Workday:** While the staff position budget data for regular staff between Workday and COMPASS was aligned,<sup>6</sup> this was not the case for temporary assistance and affiliated workforce. This was due to, amongst other things, affiliate staff positions being created in Workday without corresponding budgets in COMPASS.

 $<sup>^{6}</sup>$  Exceptions identified during the audit tests were satisfactorily resolved by DSPR

• **COMPASS and PROMS**: There were also inconsistencies identified in partner indicators and targets recorded in COMPASS and PROMS. For instance, targets related to permanent shelters listed in COMPASS and PROMS in Syria were 1,831 and 1,095 shelters respectively. This was attributed to integration issues between the two systems, with changes effected in PROMS not being picked up in COMPASS.

#### Need to reinforce the extent and quality of reporting

39. DSPR deemed the COMPASS reporting features as inadequate to provide the necessary reports under the RBM. As a result, the Results Data Portal was developed as a dedicated Business Intelligent solution to extract real-time data from COMPASS and transform it into meaningful insights through reports, dashboards and analytics. However, a review of reports available in the Results Data Portal revealed it was unable to produce reports such as budget actual expenditure analyses, and reports by implementer or by expenditure account. Also, despite the fact that 2023 annual results reports in the system had been reviewed and approved by Regional Bureaux, they were incomplete, e.g., they did not contain expenditure data.

40. The Results Data Portal was also unable to deliver key analytics and report dimensions required by UNHCR in its decision making. For instance, Bureaux were facing challenges in obtaining regional data from COMPASS for their decision making. Further, COMPASS had not been configured to identify and produce exception reports. For instance, the system did not identify and flag, through exception reports, mismatches between validated positions in COMPASS and Workday that should have been identified.

41. These issues were attributed to inadequate data validation controls and assessment of reporting needs, integration deficiencies, and delayed development and deployment of reports. Consequently, operations did not have reliable reports on budgets and on results.

42. Data-related issues noted in COMPASS were not only system centric but also people driven. This had been anticipated in the RBM renewal project which sought to strengthen UNHCR's results-based culture by ensuring that UNHCR's office structures had the required RBM capability at country, regional and headquarters levels. The responsibility and accountability in managing for results was not well articulated in UNHCR's Roles, Accountabilities and Authorities (RAAs) for country operations. For effectiveness, this should also have been covered in the RBM policy and related guidance such as the programme handbook. While data verification should have been one of the primary focus areas of multifunctional teams in country operations, several OIOS audit reports noted that this was not the case. There was therefore a need for the second line to reinforce entity capacity to collect, verify and report accurate information.

(4) The UNHCR Division of Strategic Planning and Results in cooperation with the Division of Information Systems and Telecommunications should: (a) address integration issues between COMPASS with other relevant systems; (b) design and implement appropriate reports based on key user needs; and (c) build staff capacity in collecting, verifying and reporting data within COMPASS (Critical recommendation).

UNHCR accepted recommendation 4 and DSPR stated that: (a) integration issues would be addressed through a project (known as the 'Str8n' Project); and (b) developing more reports for users and different use-cases will be a continuous and ongoing process. The reports on indicators and budget utilization will be available by end of Q3 2025. At this time the reports in the Results Data Portal will reflect the newly configured indicators and the Str8n project would have addressed issues related to expenditure reports from Cloud ERP against results chains.

The use of alternative systems needed to be addressed

43. The integration challenges as well as inadequate data validation controls contributed to the data issues and resulted in the proliferation of spreadsheet and other systems across the organization as entities sought ways of mitigating related risks. Various operations opted to use other systems to monitor, collect, and report performance data instead of the designated COMPASS system. For instance, at least 18 operations were using another cloud based (SaaS) system for managing the collection of data against indicators at an annual cost of \$250,000. The vendor of this alternative system listed UNHCR as their customer even though this system was not listed as one of UNHCR corporate systems.

44. Country operations also resorted to using spreadsheets as workarounds for areas where they considered COMPASS functionalities as inadequate. For instance, they used spreadsheets to monitor budgets and affiliate workforce staff and their related costs. Also, the information for Multi-Country Offices in COMPASS was consolidated, with spreadsheets maintained outside the system to record information on the relevant individual countries under the Offices.

45. Operations and Bureaux attributed their use of other tools to the fact that they: (i) were easier to use; (ii) could disaggregate data by partner/location/camp; (iii) made sharing of operational data easy with other stakeholders; and (iv) facilitated monitoring and reliable reporting on the programme activities. No cost benefit of using these non-corporate systems and tools alongside COMPASS had been conducted. In OIOS view, the use of other systems was also an indication of operations' perceived gaps in the functionalities of COMPASS and/or dissatisfaction with the system. The use of other tools was inefficient due to double data entry tasks involved and additional costs incurred to acquire the tools. It also meant processes were not standardized across operations which would potentially impact the aggregation and analysis of data at a central level.

# (5) The UNHCR Division of Strategic Planning and Results in cooperation with the Division of Information Systems and Telecommunications should conduct a cost benefit analysis of the multiple systems and tools in use alongside COMPASS and determine which ones to consolidate into the platform and/or eliminate.

UNHCR accepted recommendation 5 and stated that DSPR and DIST will jointly conduct this review in consultation with the Global Data Service.

### **D.** User access management and security

#### Need to strengthen security controls over access and data protection

46. DIST conducted security assessments on all BTP systems including COMPASS in September 2021 and identified some gaps in the security controls as well as remedial actions on important issues such as vulnerability scanning, logging and backups. However, no follow-up had been conducted on this three-year old assessment to confirm that the issues were resolved to ensure system security.

(a) Inadequate segregation of roles in COMPASS

47. The audit noted that COMPASS Plan Access Control had 4,181 unique users and 39,589 ids at the time of audit, which indicated that some users had access to multiple operations and/or roles. A review of Plan Access Control in COMPASS also identified contravention to the rules, namely: (i) 82 plan owners had other additional roles; (ii) in 101 instances, planning coordinators were also resource preparers; and (iii) area of budgetary control administrators were also planning coordinators in 78 cases.

48. Further, data entry and modification in COMPASS in the operations reviewed during the audit was centralized at the Country Office level and performed by the programme staff instead of the results managers recorded in COMPASS. Centralization of data entry usurped the responsibility and accountability of results managers. Since all operations reviewed had centralized data entry, this potentially could affect 2,500 out of 4,100 (60 per cent) of users worldwide that were results managers. It also negatively impacted the results culture UNHCR was attempting to build, as it diminished the sense of ownership and accountability among results managers. The weak plan access controls, exacerbated by an absence of audit trail as already mentioned, meant that the system could not detect unauthorized modifications to COMPASS data.

(b) Non-UNHCR personnel access to COMPASS

49. The audit identified a dozen non-UNHCR users and those outside its domain that had access to the COMPASS system. Some of these users were marked as developers that had access to the development and production environments. This contravenes control requirements that mandate the separation of development, testing, and operational (production) environments to reduce the risk of unauthorized access or changes to the operational environment. The lack of this separation and the absence of audit logs significantly increased the risk of unauthorized access and changes to the operational environment.

(c) Gaps in agreement with the COMPASS vendor

50. The audit identified some gaps in UNHCR's signed agreement<sup>7</sup> with the COMPASS vendor related to a failure to define the vendor's minimum: (i) retention period of all logs associated with end user activity and all backup copies of data following their respective creation; and (ii) period of written notice for disruption in services due to non-emergency scheduled maintenance or enhancements. Additionally, the audit identified a contradiction between Annex B and the body of the contract, in the time limit for transferring UNHCR data upon termination or expiration of agreement.

# (6) The UNHCR Division of Information Systems and Telecommunications should update and follow up the security assessment for COMPASS and address the data security and continuity gaps in the agreement with the vendor.

UNHCR accepted recommendation 6 and stated that the recommendation will be addressed by March 2025 following a review of data protection and information security measures in COMPASS.

# (7) The UNHCR Division of Strategic Planning and Results should ensure that that system roles and access privileges are granted in line with established policy for accountability.

UNHCR accepted recommendation 7 and stated that the Division of Information Systems and Technology continues to work on a mechanism to monitor user access across multiple corporate systems, including COMPASS. This initiative will improve the ability of DSPR to monitor user roles and access privileges across systems and help ensure alignment of user rights across systems. This automated user access reporting solution is expected to be operational by end Q1 2025.

<sup>&</sup>lt;sup>7</sup> Agreement between UNHCR and the vendor was valid till 23 March 2025

# **IV. ACKNOWLEDGEMENT**

51. OIOS wishes to express its appreciation to the management and staff of UNHCR for the assistance and cooperation extended to the auditors during this assignment.

Internal Audit Division Office of Internal Oversight Services

#### STATUS OF AUDIT RECOMMENDATIONS

#### Audit of the implementation of COMPASS, the results-based management system at the United Nations High Commissioner for Refugees

Rec. no.	Recommendation	Critical <sup>8</sup> / Important <sup>9</sup>	C/ O <sup>10</sup>	Actions needed to close recommendation	Implementation date <sup>11</sup>
1	The UNHCR Division of Strategic Planning and Results should address system gaps regarding: (a) mechanisms for detailed planning, budgeting and monitoring of directly implemented programmes; (b) controls that ensure that changes to key parameters trigger notifications for review and approval by relevant officers; and (c) developing effective indicators for measuring and tracking results.	Critical	0	Receipt of: (a) instituted mechanisms to support the development of workplans, detailed budgets and indicators for monitoring directly implemented programme activities; (b) implementation of controls in COMPASS to ensure key changes to plans are reviewed and approved; and (c) evidence that gaps in indicator function are addressed.	31 December 2026
2	The UNHCR Division of Strategic Planning and Results should: (a) train managers on how to use available reports as an aid to continuous review and adjustment of plans; and (b) address gaps regarding budget allocation, availability and consumption data in COMPASS.	Important	0	Receipt of evidence: (a) in reports that managers are linking the results in the Show stage to the Plan stage of the subsequent year; (b) that identified system gaps in the budgeting allocation, availability and consumption data have been addressed.	1 December 2025
3	The UNHCR Division for Strategic Planning and Results in collaboration with the Division of Information Systems and Telecommunications should take measures to improve the system functionality by: (a) activating data validation controls in COMPASS; (b) improving the COMPASS user interface; and (c) ensuring that performance tests are conducted to identify COMPASS vulnerabilities and potential failure points as more adjustments are made to the system.	Important	0	Receipt of evidence of: (a) improvement in COMPASS data validation controls; (b) survey results reflecting improvements in user interface; and (c) report on performance tests conducted with any identified vulnerabilities and potential failure points rectified.	1 July 2025

<sup>&</sup>lt;sup>8</sup> Critical recommendations address those risk issues that require immediate management attention. Failure to take action could have a critical or significant adverse impact on the Organization.

<sup>&</sup>lt;sup>9</sup> Important recommendations address those risk issues that require timely management attention. Failure to take action could have a high or moderate adverse impact on the Organization.

 <sup>&</sup>lt;sup>10</sup> Please note the value C denotes closed recommendations whereas O refers to open recommendations.
<sup>11</sup> Date provided by UNHCR in response to recommendations.

#### STATUS OF AUDIT RECOMMENDATIONS

## Audit of the implementation of COMPASS, the results-based management system at the United Nations High Commissioner for Refugees

Rec. no.	Recommendation	Critical <sup>8</sup> / Important <sup>9</sup>	C/ O <sup>10</sup>	Actions needed to close recommendation	Implementation date <sup>11</sup>
4	The UNHCR Division of Strategic Planning and Results in cooperation with the Division of Information Systems and Telecommunications should: (a) address integration issues between COMPASS with other relevant systems; (b) design and implement appropriate reports based on key user needs; and (c) build staff capacity in collecting, verifying and reporting data within COMPASS.	Critical	0	Receipt of evidence that: (a) integration issues between COMPASS, Workday, Cloud ERP, Results Data Portal and PROMS were addressed; (b) development of appropriate reports based on key user needs; (c) conducting of training based on a needs assessment meant to improve staff capacity for collecting, verifying and reporting on results.	1 October 2025
5	The UNHCR Division of Strategic Planning and Results in cooperation with the Division of Information Systems and Telecommunications should conduct a cost benefit analysis of the multiple systems and tools in use alongside COMPASS and determine which ones to consolidate into the platform and/or eliminate.	Important	0	Receipt of decision on which systems to consolidate into COMPASS and/or eliminate based on a cost benefit analysis of the multiple systems and tools in use.	1 October 2025
6	The UNHCR Division of Information Systems and Telecommunications should update and follow up the security assessment for COMPASS and address the data security and continuity gaps in the agreement with the vendor.	Important	0	Receipt of updated security assessment for COMPASS, and adjusted vendor agreement addressing data security and continuity gaps.	1 July 2025
7	The UNHCR Division of Strategic Planning and Results should ensure that that system roles and access privileges are granted in line with established policy for accountability.	Important	0	Receipt of evidence that Plan Access Controls of user roles in COMPASS is in place in line with Policy.	1 July 2025

# **APPENDIX I**

# **Management Response**

#### **Management Response**

#### Audit of the implementation of COMPASS, the results-based management system at the United Nations High Commissioner for Refugees

Rec. no.	Recommendation	Critical <sup>12</sup> / Important <sup>13</sup>	Accepted? (Yes/No)	Title of responsible individual	Implementation date	UNHCR comments
1	The UNHCR Division of Strategic Planning and Results should address system gaps regarding: (a) mechanisms for detailed planning, budgeting and monitoring of directly implemented programmes; (b) controls that ensure that changes to key parameters trigger notifications for review and approval by relevant officers; and (c) developing effective indicators for measuring and tracking results.	Critical	Yes	Director, DSPR	31 December 2026	As regards (a), DSPR will work with concerned Divisions to improve detailed planning of directly implemented programmes and ensure that they are reflected appropriately in COMPASS for effective results-based management throughout the PLAN, GET and SHOW phases. As regards (b), DSPR will investigate in early 2025 how such controls can be best built into the COMPASS system and thereafter work with concerned Divisions to implement necessary changes. As regards (c), UNHCR has an ongoing project to improve the indicator functionality of COMPASS. This work is expected to be completed in Q1 of 2025
2	The UNHCR Division of Strategic Planning and Results should: (a) train managers on how to use available reports as an aid to continuous review and adjustment of plans; and (b) address gaps regarding budget allocation, availability and consumption data in COMPASS.	Important	Yes	Director, DSPR	1 December 2025	UNHCR now has several on-line reports to monitor commitments, obligations and actual expenses against budgets against different dimensions including Cost Center, Outputs Statements, Results Areas and more. Additional analysis reports are also available in the Results Data Portal. DSPR expects this recommendation will be fully

<sup>&</sup>lt;sup>12</sup> Critical recommendations address those risk issues that require immediate management attention. Failure to take action could have a critical or significant adverse impact on the Organization.

<sup>&</sup>lt;sup>13</sup> Important recommendations address those risk issues that require timely management attention. Failure to take action could have a high or moderate adverse impact on the Organization.

Rec. no.	Recommendation	Critical <sup>12</sup> / Important <sup>13</sup>	Accepted? (Yes/No)	Title of responsible individual	Implementation date	UNHCR comments
						addressed along with recommendation 4 by end of Q3 2025.
3	The UNHCR Division for Strategic Planning and Results in collaboration with the Division of Information Systems and Telecommunications should take measures to improve the system functionality by: (a) activating data validation controls in COMPASS; (b) improving the COMPASS user interface; and (c) ensuring that performance tests are conducted to identify COMPASS vulnerabilities and potential failure points as more adjustments are made to the system.	Important	Yes	Director, DSPR	1 July 2025	As regards (a), DSPR accepts the need for 'snapshots' of the system periodically to allow comparison of Strategies state at different business milestones and track their contents and structure evolution over time at a detailed level. An initiative has already started on this subject. As regards (b) work is ongoing to improve the User Interface / User Experience (UI/UX) of the COMPASS system. DSPR has been working with Board (the software provider of COMPASS) and a consulting firm on this work and UI/UX design guidelines and best practices are being followed. Extensive user interviews and analysis has been conducted and improvements will be made over the course of 2024 – Q2 2025 to the different modules of COMPASS. DSPR will inform OIOS when all the UI/UX improvements have been made to all modules and can provide OIOS with a walk-through of the improved modules. DSPR expects this to be complete by end of Q2 2025 and proceed as business-as-usual continuous improvement thereafter. As regards (c), UNHCR has service level agreements with vendors to provide software and hardware that meet UNHCR's needs. UNHCR is, however, requiring that the software provider conduct 'performance tests' of the next system version release ('Board 14') to ensure that the new release will meet acceptable performance. UNHCR

Rec. no.	Recommendation	Critical <sup>12</sup> / Important <sup>13</sup>	Accepted? (Yes/No)	Title of responsible individual	Implementation date	UNHCR comments
						can provide the results to OIOS and expects that this will address OIOS's recommendation.
4	The UNHCR Division of Strategic Planning and Results in cooperation with the Division of Information Systems and Telecommunications should: (a) address integration issues between COMPASS with other relevant systems; (b) design and implement appropriate reports based on key user needs; and (c) build staff capacity in collecting, verifying and reporting data within COMPASS.	Critical	Yes	Director, DSPR	1 October 2025	A project has been established that will address this recommendation. The project (known as the 'Str8n' Project) has been approved by the Transformation Governance Board. The project is due to be finished by the end of Q3 2025. Developing more reports for users and different use-cases will be a continuous and ongoing process. With regard to the availability of reports on indicators and budget utilization, UNHCR believes the needs will be addressed by end of Q3 2025 by which time the reports in the Results Data Portal will reflect the newly configured indicators and the Str8n project will have addressed issues relating to expenditure reports from Cloud ERP against results chains.
5	The UNHCR Division of Strategic Planning and Results in cooperation with the Division of Information Systems and Telecommunications should conduct a cost benefit analysis of the multiple systems and tools in use alongside COMPASS and determine which ones to consolidate into the platform and/or eliminate.	Important	Yes	Director, DSPR Director, DIST	1 October 2025	DSPR and DIST will jointly conduct this review in consultation with the Global Data Service.
6	The UNHCR Division of Information Systems and Telecommunications should update and follow up the security assessment for COMPASS and address the data security and	Important	Yes	Director, DSPR	1 July 2025	The recommendation will be addressed by March 2025 following a review of data protection and information security measures in COMPASS.

Rec. no.	Recommendation	Critical <sup>12</sup> / Important <sup>13</sup>	Accepted? (Yes/No)	Title of responsible individual	Implementation date	UNHCR comments
	continuity gaps in the agreement with the vendor.					
7	The UNHCR Division of Strategic Planning and Results should ensure that that system roles and access privileges are granted in line with established policy for accountability.	1	Yes	Director, DSPR Director, DIST	1 July 2025	The Division of Information Systems and Technology continues to work on a mechanism to monitor user access across multiple corporate systems, including COMPASS. This initiative will improve the ability of DSPR to monitor user roles and access privileges across systems and help ensure alignment of user rights across systems. This automated user access reporting solution is expected to be
						ensure alignment of user rights