

Functional Documentation - Data Quality Dashboard Cost Center Master Data KPI's

1.0 Overview

CC
Menu

Business Context and Application Overview

This Dashboard is under Finance scope to allow the users to check the consistency of the costs centers with a proper analysis and identify potential issues with the cost center definition/assignment through some KPI's such as Active GBU's, ZCBS, SRM7 and BSA.

Application User Profile

To be checked before goes to production:

In DEV environment for now. Access provided directly by technical team.

In Prod we need to see how it will be the access. Creation of a ticket for CMDB to have the option for this dashboard.

Target Users:

Controlling/Reporting teams.

VERSION	DATE	MODIFIED BY	DESCRIPTION
0.01	04.03.2024	Inês Vilares	Initial draft

Application Type

Data Product Type

- Dashboard
- Report
- Advanced analytics
- AI
- Others <specify which one>

Technologies

- BW
- Tableau
- QlikSense
- Talend
- Dataiku
- Others <specify which one>

Data Sources

Note: list of all applications and various environment

- SAP PF1 (Production environment)
- SAP WP1
- SAP PI1
- BW (versions)
- iCare CRM
- CORE CRM
- Others <specify the name of the source>

2.0 Business Process

In the business side they have some checks/data quality processes and the purpose of this analysis is to reduce the number of cost objects that have not been used for 18 months that will lead to clear database, reduced risk of amounts allocated to obsolete CO objects, less chance of errors during month end close and less ad-hoc workload during peak periods.

On a quarterly basis the business do a clean up of inactive objects and this scope we are focusing in the cost center data.

Please see more detail information about the business process in here: [Quarterly clean-up of inactive cost objects](#)

2.1 Challenge/Opportunities

This dashboard will allow the business to have a data quality check and clean up process more efficient, quick and user friendly using our Qlik sense solution instead only the BW query and do some manual effort to have the KPI's and analyze the critical cases.

3.0 Application Feature Overview

Feature	Description	Latest update in production (DD /MM/YYYY)
Cost Center Master Data KPI's	This sheet present 4 KPI's to be analyzed by the teams to have a control on the cost center master data.	Still in DEV but should be a daily load.

4.0 Business Objects

4.1 Glossary

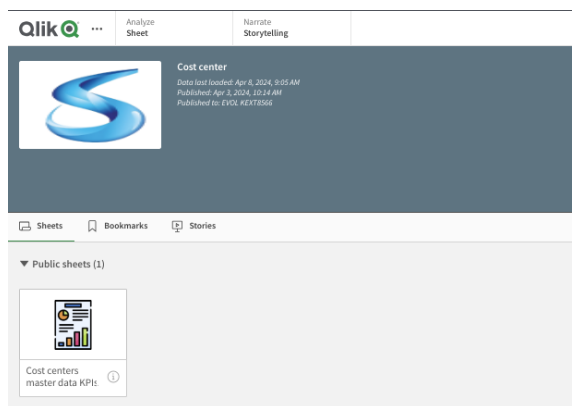
BSA	Stands for Business Support Activity. To know more information about the BSA Business Support Activity (BSA) .
Cost Center	A cost center is a specific organizational unit within a company that is responsible for incurring costs. It represents a location, department, or function where expenses are generated. Cost centers are used for tracking and controlling costs, allocating expenses, and monitoring budget compliance.
GBU	Stands for Global Business Unit. The concept for GBU doesn't exist in SAP but it's a requirement to have in BW since in BFC we have this definition.
SRM7	The person responsible of a cost center is accountable for the elements allocated in the cost center. The companies using SRM7 for purchasing should have a SRM7 user ID (=BIP user ID) entered in this field, starting with 5, such as 50000000. To know more about this KPI we can check the the Finance Data & Reporting wiki Rules - Cost Center Responsible - FAQ .
ZCBS	ZCBS is the code of the alternative cost centers hierarchy that is mainly used for reporting purposes . It's the CBS Structure. Please check in the Finance Data & Reporting wiki more information about this hierarchy Rules - Cost Center ZCBS hierarchy

5.0 Functional Specification

5.1 Dashboard

DEV Link: <https://qliksensedesign.solvay.com/sense/app/0dd845ea-f4f7-4ed1-ad0f-acd093d72e69/overview?qlikTicket=fBMYNmo-nO0X4qNw>

4.2.1 Dashboard Reports Details
<ul style="list-style-type: none"> Cost Center Master Data KPI's



5.2 Data Input

- Data Sources**
 - BW Query BW_QRY_C_COSTCTR_0001 - Cost Center Master Data query and the query used for the frontend is QV_BW_QRY_C_COSTCTR_0001;
 - List of active GBU's - This is filtering only for the Active GBU KPI;
 - List of companies in scope - This is filtering only for the SRM7 KPI
- Transformation Rules (for each of the data source in the previous point)**
 - QV_BW_QRY_C_COSTCTR_0001 with the **General filters:**
 - Cost_Center_Authorization_Scope__Key_ = SCO and ECO;

- ii. Obsolete_object=0 ("0" means the cost center it's active, the "1" means the cost center it's blocked/inactive and "#" should not exist but we have cases maybe it was some direct creations in BW and we don't have an assignment nevertheless, the scope for the business it was decided to only filter for the active cost center.)
 - iii. Source_System = PF1 Client 020, WP1 Client 400 and P11 Client 020.
 - iv. CO AREA from WP1 was excluded Z010
- b. After **specific filter** are applied to the query depending on each KPI:
- i. **Active GBU's**: we consider the information from excel file with the active GBU's and compare with the field BFC GBU (technical CPFCTR1_2) if it's the same it's assigned if not then we consider not assigned;
 - ii. **ZCBS**: field 2_Function_key (technical C_FUNCT_2) is not equal to # and EDISC If the C_FUNCT_2 = # or EDISC => Test failed. (Qlik code: where match(_2_Function_Key, '#','EDISC') is not assigned the rest it's assigned.
 - iii. **SRM7**: Based on the position responsible field (technical name C_POSIT) has 8 digits and the first 3 digits (left to right) they need to start with "500". If the output respect this condition it's "Assigned" if not "Not Assigned".
 - iv. **BSA**: if(Cost_Center_BSA_Group__Key_ = '#','Not Assigned','Assigned') as BSA.
- c. For the List of the active GBU's they were based in an excel file (see below) and added directly in QlikSense.

More information:

5.3 KPI's Definitions

KPI Name	Definition	Calculation
Active GBU's	All cost centers are assigned to an active GBU.	Check if the field BFC GBU (CPFCTR1_2) has any GBU assigned or not. We have a list of active GBU. The List of GBU it's a list in excel copied to QlikSense directly. If the GBU is not in that list then it will be not assigned.
ZCBS	All cost centers are assigned to the ZCBS hierarchy.	Check if the field 2 Function (C_FUNCT_2) don't contain the outputs equal to # (not assigned) and EDISC (Discontinued). If has this information then it will not be assigned.
SRM7	All cost centers have a valid SRM7 responsible.	Check if the position responsible field (C_POSIT) has 8 digits and the first 3 digits (left to right) they need to start with "500". If the output respect this condition it's "Assigned" if not "Not Assigned".
BSA	All cost centers are assigned to a BSA.	Check if the BSA Group field (C_BSAGRP) has a group assigned if not then it will be consider not assigned. Qlikcode: if(Cost_Center_BSA_Group__Key_ = '#','Not Assigned','Assigned') as BSA.

5.4 Visualization

Table name	Description	Calculations //Measures /Rules (if applicable)	Scope / Filters	Graph picture								
Active GBU's	All cost centers are assigned or not to an active GBU.	Calculation in the 5.3 KPI's Definition section. The users will see the number of cost centers assigned or not if they have a GBU assigned based in the active GBU list.	It's possible to filter by Scope: Eco or Sco.	<p>Active GBU's 100.00%</p> <table border="1"> <thead> <tr> <th>GBU</th> <th>Nbr of CC</th> </tr> </thead> <tbody> <tr> <td>Totals</td> <td>18856</td> </tr> <tr> <td>Active GBU</td> <td>18856</td> </tr> </tbody> </table>	GBU	Nbr of CC	Totals	18856	Active GBU	18856		
GBU	Nbr of CC											
Totals	18856											
Active GBU	18856											
ZCBS	All cost centers are assigned or not to the ZCBS hierarchy.	Calculation in the 5.3 KPI's Definition section. The users will see the number of cost centers assigned or not depending on the information in the field 2 Function. For the not assigned we consider the # and EDISC outputs.	It's possible to filter by Scope: Eco or Sco.	<p>ZCBS 99.81%</p> <table border="1"> <thead> <tr> <th>ZCBS</th> <th>Nbr of CC</th> </tr> </thead> <tbody> <tr> <td>Totals</td> <td>18856</td> </tr> <tr> <td>Assigned</td> <td>18821</td> </tr> <tr> <td>Not Assigned</td> <td>35</td> </tr> </tbody> </table>	ZCBS	Nbr of CC	Totals	18856	Assigned	18821	Not Assigned	35
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Not Assigned	35											
SRM7	All cost centers are assigned or not to have		It's possible to filter									

	a valid SRM7 responsible.	<p>Calculation in the 5.3 KPI's Definition section.</p> <p>The users will see the number of cost centers assigned or not if they have a position responsible which needs to be in compliance with the conditions described in the KPI definition.</p> <p>This position has the rule to have only 8 digits and the should start with 500 for the first 3 digits. This is applied for ECO and SCO scope.</p>	by Scope: Eco or Sco.	<p style="text-align: center;">SRM7 80.98%</p> <table border="1"> <thead> <tr> <th>Scope SRM7</th> <th>Nbr of CC</th> </tr> </thead> <tbody> <tr> <td>Totals</td> <td>18856</td> </tr> <tr> <td>Assigned</td> <td>15270</td> </tr> <tr> <td>Not Assigned</td> <td>3586</td> </tr> </tbody> </table>	Scope SRM7	Nbr of CC	Totals	18856	Assigned	15270	Not Assigned	3586
Scope SRM7	Nbr of CC											
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BSA	All cost centers are assigned or not to a BSA.	<p>Calculation in the 5.3 KPI's Definition section.</p> <p>The users will see the number of cost centers assigned or not if they have a BSA Group output or not.</p>	It's possible to filter by Scope: Eco or Sco.	<p style="text-align: center;">BSA 98.35%</p> <table border="1"> <thead> <tr> <th>BSA</th> <th>Nbr of CC</th> </tr> </thead> <tbody> <tr> <td>Totals</td> <td>18856</td> </tr> <tr> <td>Assigned</td> <td>18544</td> </tr> <tr> <td>Not Assigned</td> <td>312</td> </tr> </tbody> </table>	BSA	Nbr of CC	Totals	18856	Assigned	18544	Not Assigned	312
BSA	Nbr of CC											
Totals	18856											
Assigned	18544											
Not Assigned	312											
Data Set Table /Adhoc Report	Flexible report for the users to check and analyze in more detail the KPI's	Please check all the fields available in 5.4.1 Reports section	N.A									

5.4.1 Reports

Data Set Table/Adhoc Report fields:

Type	Table field	BW Technical Field
Measure	Nbr of CC (calculated field)	-
Dimension	2 Function	C_FUNCT_2
	2 Function Key	C_FUNCT_2
	3 Sub-funct Grouping	C_FUNCT_3
	3 Sub-funct Grouping Key	C_FUNCT_3
	4 Sub-function	C_FUNCT_4
	BFC GBU	CPFCTR1_2

BFC GBU Key	CPFCTR1_2
BSA	KPI
CO Area	OCO_AREA
CO Area Key	OCO_AREA
Company Code Key	C_COMPCDE
Cost Center	C_COSTCTR
Cost Center Key	C_COSTCTR
BSA Group Key	C_BSAGRP
BSA Group	C_BSAGRP
Active GBU	KPI
Source System	OLOGSYS
SRM7	KPI
ZCBS	KPI
Position Responsible	C_POSIT
Position Responsible Key	C_POSIT
Authorization Scope	C_AUTHMA
Authorization Scope Key	C_AUTHMA
Regions	attribute C_GZONE from Company Code field
Regions Key	attribute C_GZONE from Company Code field

6.0 System view (Architecture)

The purpose of this part is to describe the physical components that supports the functionalities of the product. From that point of view, this part should capture and visualizes the physical components of the data products such as backend, front end, data providers, libraries for ML models, etc.

7.0 Non-functional Descriptions

7.1 Usability

Usability is about the ease with which a User can learn to start using the solution and the ease with which they can use the system. In addition to ease of learning and ease of use, usability also includes areas such as ease of recall, error avoidance and handling, accessibility among others e.g., 99% of metadata entry Users who have use the Maintenance Dashboard should be able to change filters, extract etc., when required. Maintenance data will be centrally stored in the Google Cloud platform, which will be available to other applications e.g., and Dashboards if needed.

7.2 Regulatory Compliance

Software systems must comply with legal and regulatory e.g., GDPR requirements, this can change depending on country, organisation industry and / or region. The software systems must be secure from unauthorized access. The Maintenance Dashboard will comply with Solvay's regulations and compliance e.g., access only granted to authorized Users.

7.3 Security

Security refers to essential aspects that assure a solution and its components will be protected against unauthorized access or malware attacks. Important considerations related to security aspects of a system are User authentication, User authorization or User access privileges, data theft, malware attacks, data encryption, and maintaining audit trails, e.g., only Users with administrator access shall be able to create new accounts and assign data access privileges to the new accounts e.g.,

- All data will be encrypted in the dashboard
- Only authorised Users / Administrative Users will be able to access data.
- Maintenance data will be split between either SCO or ECO, and Users will only have authority to one Entity data.

7.4 Performance

Performance defines how fast a software system or a particular section of it responds to certain User actions under a certain workload. In most cases, this metric explains how long a User must wait before the target operation happens e.g., the page renders, a transaction is processed, etc., given the overall number of Users now. Performance requirements may describe background processes invisible to Users, e.g., backup and speed of data transfers.

7.5 Reliability

Reliability is the ability of a solution or its component to perform its required functions without failure under predefined conditions for a specified time / period. Reliability can possibly be specified in terms of average time system runs before failure occurs, percentage of operations completed successfully within a time / period, maximum acceptable failure probability, or number of failures within a period. Reliability aspects are in reference to (but not limited to) evaluation of the system to be considered as reliable, classification of reliability defining failures vs. regular failures, and the impact of failure on business operations. The Maintenance Dashboard will display data from the previous refresh of data.

7.6 Scalability

Scalability refers to the degree to which a solution can evolve to handle increased amounts of work. The increased amount of work could be in terms of the user base, transactions, data, network traffic, or other factors e.g., the system should be able to handle an additional load of a maximum of 5,000 Users every month for the next 6 months without any noticeable performance impacts.

7.7 Compatibility

Interoperability is the degree to which the solution is compatible with other components. It is a measure of how effectively the system interoperates with other software systems and how easily it integrates with external hardware devices.

Interoperability aspects to be discussed during elicitation are in reference to (but not limited to) software systems to be interfaced with along with data / messages to be exchanged and any standard data formats, hardware components to be integrated with, and any standard communication protocols to be followed e.g., Order Management system will push the order file into a secured file transfer protocol server from where it will be loaded into the system through a daily job. To guarantee between Google Cloud platform and SAP BW Queries e.g., BW_QRY_MVPMOR01_0002, Solvay has introduced a new tool called Xtract ([Xtract](#)).

7.8 Availability

The availability of the dashboard should be 24 hours during 7 days per week.

7.9 Refresh of the Data

The data is refresh on a daily basis at 6:0 a.m CET (the BW query load it's 5:00 a.m CET).