# T2 DWH:
# Obstacles with different output formats

**Topic:**

**Long-term solutions for obstacles with different
output formats (Tab Issue and Data Issue)**

*T2-CG Meeting 16/10/2024*

# T2 DWH: Obstacles with different output formats

- **While the formats HTML (COGNOS), Excel and PDF are working fine, there are different obstacles when using Excel Data, CSV and XML (caused by technical restrictions of the format itself or by the implementation of the format within COGNOS)**

- **More detailed, the obstacles can be categorised into:**

  – Tab Issue: Only first tab of the HTML version is exported

  – Data issue: Only first list / report objects reflected (in consequence not all data are displayed)

- **4CB presents the long-term solutions on the next slides**

# T2 DWH: Tab Issue

- **The Tab Issue defines that only the first tab of the HTML version is exported when using Excel Data, CSV and XML**

- **Available workaround: no workaround available for normal users**

**4CB long-term solution:**

- **The input screens of the affected T2 PDRs will be enhanced by an additional input filter for selecting the necessary tab. The corresponding T2 PDR screenshots need to be adapted in the T2 DWH UHB.**

- **Thus, the affected T2 PDR will not only show the information on the first tab as default option when using Excel data, CSV or XML, but the customer is able to select any other tab as well. Nevertheless, all other formats (e.g. HTML) are still showing all tabs and not only the selected one in the output screen**

- **4CB will implement the long-term solution for the Tab issue with release NOV.25**

# T2 DWH: Tab Issue Affected T2 PDRs

| Report | Issue | Number of Tabs (for preselection) | Current issue in CSV |
|--------|-------|-----------------------------------|----------------------|
| **BDY01** | Tab Issue | 2 | Only shows data of Tab 1 |
| **MIR01** | Tab Issue | 2 | Only shows data of Tab 1 |
| **PAR02** | Tab Issue | 2 | Only shows data of Tab 1 |
| **TRN05** | Tab Issue | 4 | Only shows data of Tab 1 (except for Overall Total) |
| **TRN08** | Tab Issue | 4 | Only shows data of Tab 1 |

1. **Depending on the option:
(i) It is possible to select the necessary tab in the input screen of the T2 PDR or (ii) Prior to the input screen of the T2 PDR, is it possible to select the necessary tab**

**=> Example: Select "Amount of IDC used" (2nd Tab)**

**2. Select input criteria for T2 PDR (as usual)**

**3. The HTML view will still show all Tabs and it is possible to switch between them**
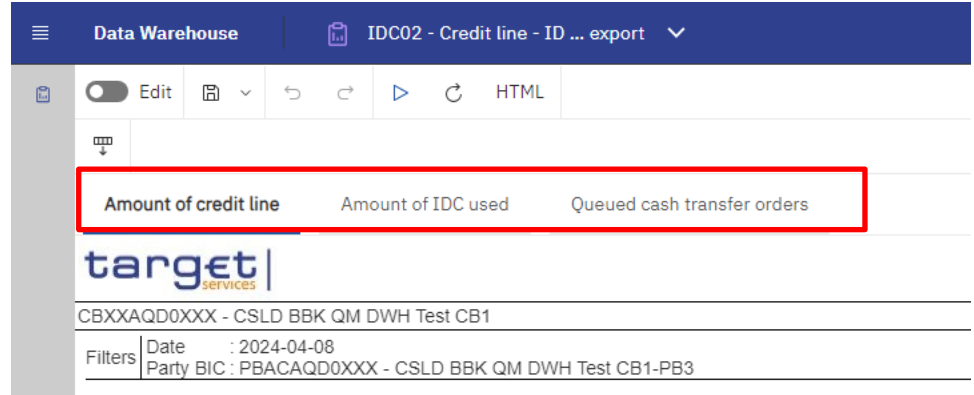


**4. The CSV, XML or Excel Data view will only include the tab selected in the preselection screen (step 1) / works as well for scheduling**

# T2 DWH: Data Issue

- The Data Issue defines that only the first list / report objects are reflected when using Excel Data, CSV and XML (in consequence not all data are displayed)

- Available workaround: workaround via Excel (manual conversion into csv for example)

4CB long-term solution:

- The data of the affected T2 PDRs can be provided as raw data (what means without any format, totals)

- Thus, all data can be provided when using Excel data, CSV or XML and the customer is able to prepare the data himself by using filters / sorting criteria.

- 4CB will implement the long-term solution for the Data issue with release NOV.25

# T2 DWH: Data Issue
# Affected T2 PDRs

| Report | Issue | Issue in CSV |
|--------|-------|--------------|
| **TRN03** | Data Issue | Only shows Currency, Party, Year / Month and Cash Transfer Status without any data |
| **TRN06** | Data Issue | Only shows Party BIC, Party (short) and currency code without any data |

# T2 DWH: Data Issue
# Example for unfiltered data

**1. In HTML view, the raw data in the output screen of a T2 PDR is normally formatted (e.g. calculation of Totals). Nevertheless, those data criteria are leading to empty / incomplete reports when using CSV, XML or Excel Data**

**TRN04 - Cash transfers per time band and per CB**

CBXXAQD0XXX - CSLD BBK QM DWH Test CB1

Filters | Date : 2024-08-12

Cash transfers per time band and CB
for T2 CLM COMPONENT
Currency : EUR

| Time band | Volume | | | | Value | | | |
|---|---|---|---|---|---|---|---|---|
| | Domestic | Cross border debited | Cross border credited | Cumulated volume | Domestic | Cross border debited | Cross border credited | Cumulated value |
| before 19:00 | 1 | 0 | 0 | 1 | 5,000.00 | 0.00 | 0.00 | 5,000.00 |
| 02:30 | 17 | 5 | 3 | 25 | 11,760,056.25 | 3,253,418.75 | 2,152,033.25 | 17,165,508.25 |
| 06:45 | 1 | 0 | 0 | 1 | 2,300.00 | 0.00 | 0.00 | 2,300.00 |
| 09:00 | 8 | 0 | 0 | 8 | 69,674.27 | 0.00 | 0.00 | 69,674.27 |
| 09:45 | 1 | 0 | 0 | 1 | 21,720.65 | 0.00 | 0.00 | 21,720.65 |
| 11:00 | 2 | 0 | 0 | 2 | 3,637.00 | 0.00 | 0.00 | 3,637.00 |
| 11:45 | 10 | 2 | 2 | 14 | 10,506,347.50 | 2,101,325.50 | 2,101,315.50 | 14,708,988.50 |
| 12:00 | 3 | 0 | 0 | 3 | 8,456,159.75 | 0.00 | 0.00 | 8,456,159.75 |
| 13:00 | 9 | 2 | 2 | 13 | 9,455,759.75 | 2,101,325.50 | 2,101,315.50 | 13,658,400.75 |
| 13:15 | 4 | 0 | 0 | 4 | 5,354,714.25 | 0.00 | 0.00 | 5,354,714.25 |
| 14:45 | 4 | 0 | 0 | 4 | 210,020.00 | 0.00 | 0.00 | 210,020.00 |
| 16:15 | 1 | 0 | 0 | 1 | 1.03 | 0.00 | 0.00 | 1.03 |
| 16:45 | 0 | 0 | 1 | 1 | 0.00 | 0.00 | 1,085,023.28 | 1,085,023.28 |
| 17:00 | 1 | 0 | 0 | 1 | 835.56 | 0.00 | 0.00 | 835.56 |
| Total | 62 | 9 | 8 | 79 | 45,846,226.01 | 7,456,069.75 | 7,439,687.53 | 60,741,983.29 |

| | A | B | C | D | E | F | G |
|---|---|---|---|---|---|---|---|
| 1 | The Date | Service | | | | | |
| 2 | 8/12/2024 | T2 RTGS COMPONENT | | | | | |
| 3 | 8/12/2024 | T2 CLM COMPONENT | | | | | |
| 4 | | | | | | | |
| 5 | | | | | | | |

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# T2 DWH: Data Issue Example for unfiltered data

## 2. In order to solve this issue, 4CB will provide raw data in CSV, XML and Excel Data format

| Time band | Domestic | Cross border debited | Cross border credited | Cumulated volume | Domestic | Cross border debited | Cross border credited | Cumulated value |
|---|---|---|---|---|---|---|---|---|
| before 19:00 | 1 | 0 | 0 | 1 | 5000 | 0 | 0 | 5000 |
| 2:30 | 17 | 5 | 3 | 25 | 11760056,25 | 3253418,75 | 2152033,25 | 17165508,25 |
| 6:45 | 1 | 0 | 0 | 1 | 2300 | 0 | 0 | 2300 |
| 9:00 | 8 | 0 | 0 | 8 | 69674,27 | 0 | 0 | 69674,27 |
| 9:45 | 1 | 0 | 0 | 1 | 21720,65 | 0 | 0 | 21720,65 |
| 11:00 | 2 | 0 | 0 | 2 | 3637 | 0 | 0 | 3637 |
| 11:45 | 10 | 2 | 2 | 14 | 10506347,5 | 2101325,5 | 2101315,5 | 14708988,5 |
| 12:00 | 3 | 0 | 0 | 3 | 8456159,75 | 0 | 0 | 8456159,75 |
| 13:00 | 9 | 2 | 2 | 13 | 9455759,75 | 2101325,5 | 2101315,5 | 13658400,75 |
| 13:15 | 4 | 0 | 0 | 4 | 5354714,25 | 0 | 0 | 5354714,25 |
| 14:45 | 4 | 0 | 0 | 4 | 210020 | 0 | 0 | 210020 |
| 16:15 | 1 | 0 | 0 | 1 | 1,03 | 0 | 0 | 1,03 |
| 16:45 | 0 | 0 | 1 | 1 | 0 | 0 | 1085023,28 | 1085023,28 |
| 17:00 | 1 | 0 | 0 | 1 | 835,56 | 0 | 0 | 835,56 |

## 3. As all relevant data is now available in CSV, XML or Excel data, the customer is able to apply the needed sorting criteria / filters by himself (for example calculations of sums)

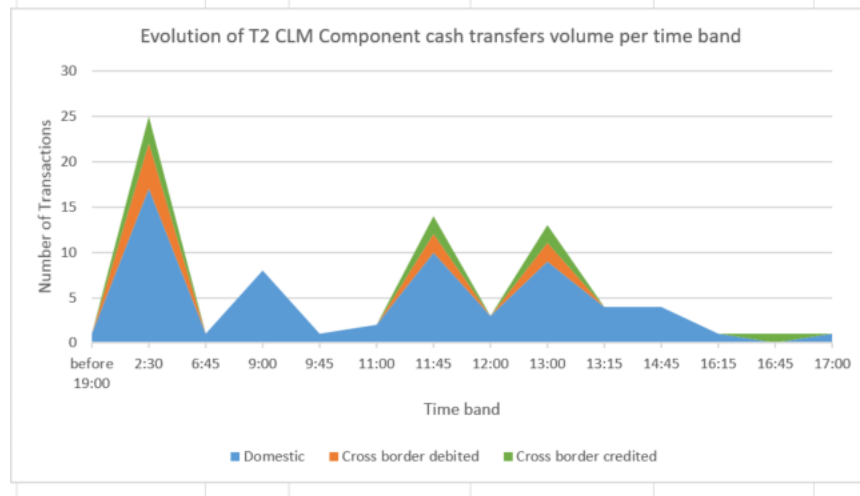| Time band | Domestic | Cross border debited | Cross border credited | Cumulated volume | Domestic | Cross border debited | Cross border credited | Cumulated value |
|---|---|---|---|---|---|---|---|---|
| before 19:00 | 1 | 0 | 0 | 1 | 5000 | 0 | 0 | 5000 |
| 2:30 | 17 | 5 | 3 | 25 | 11760056,25 | 3253418,75 | 2152033,25 | 17165508,25 |
| 6:45 | 1 | 0 | 0 | 1 | 2300 | 0 | 0 | 2300 |
| 9:00 | 8 | 0 | 0 | 8 | 69674,27 | 0 | 0 | 69674,27 |
| 9:45 | 1 | 0 | 0 | 1 | 21720,65 | 0 | 0 | 21720,65 |
| 11:00 | 2 | 0 | 0 | 2 | 3637 | 0 | 0 | 3637 |
| 11:45 | 10 | 2 | 2 | 14 | 10506347,5 | 2101325,5 | 2101315,5 | 14708988,5 |
| 12:00 | 3 | 0 | 0 | 3 | 8456159,75 | 0 | 0 | 8456159,75 |
| 13:00 | 9 | 2 | 2 | 13 | 9455759,75 | 2101325,5 | 2101315,5 | 13658400,75 |
| 13:15 | 4 | 0 | 0 | 4 | 5354714,25 | 0 | 0 | 5354714,25 |
| 14:45 | 4 | 0 | 0 | 4 | 210020 | 0 | 0 | 210020 |
| 16:15 | 1 | 0 | 0 | 1 | 1,03 | 0 | 0 | 1,03 |
| 16:45 | 0 | 0 | 1 | 1 | 0 | 0 | 1085023,28 | 1085023,28 |
| 17:00 | 1 | 0 | 0 | 1 | 835,56 | 0 | 0 | 835,56 |
| **Total** | **62** | **9** | **8** | **79** | **45846226,01** | **7456069,75** | **7439687,53** | **60741983,29** |

# T2 DWH: Data Issue Example for unfiltered data

**4. Same procedure for graphical illustrations\*: As all relevant data is available, the customer is able to create the graphical illustration as well.**

**For example, the graphical illustration shown in TRN04 can be created by the User**

| Time band | Domestic | Cross border debited | Cross border credited | Cumulated volume |
|---|---|---|---|---|
| before 19:00 | 1 | 0 | 0 | 1 |
| 2:30 | 17 | 5 | 3 | 25 |
| 6:45 | 1 | 0 | 0 | 1 |
| 9:00 | 8 | 0 | 0 | 8 |
| 9:45 | 1 | 0 | 0 | 1 |
| 11:00 | 2 | 0 | 0 | 2 |
| 11:45 | 10 | 2 | 2 | 14 |
| 12:00 | 3 | 0 | 0 | 3 |
| 13:00 | 9 | 2 | 2 | 13 |
| 13:15 | 4 | 0 | 0 | 4 |
| 14:45 | 4 | 0 | 0 | 4 |
| 16:15 | 1 | 0 | 0 | 1 |
| 16:45 | 0 | 0 | 1 | 1 |
| 17:00 | 1 | 0 | 0 | 1 |
| **Total** | **62** | **9** | **8** | **79** |



Evolution of T2 CLM Component cash transfers volume per time band

* T2 PDRs including graphical illustrations are: IDC01, IDC03, IDC04, IDC06, STF01, TRN04

```xml
<?xml version="1.0" encoding="UTF-8"?>
<dataset xmlns:xs="http://www.w3.org/2001/XMLSchema-instance" xmlns="http://developer.co
    <!-- <dataset xmlns="http://developer.cognos.com/schemas/xmldata/1/" xmlns:xs="http://www.w
    <metadata>
        <item length="74" type="xs:string" name="Currency"/>
        <item length="702" type="xs:string" name="Service"/>
        <item length="26" type="xs:string" name="Time band"/>
        <item type="xs:decimal" name="Volume domestic" precision="39"/>
        <item type="xs:decimal" name="Volume cross border debited" precision="39"/>
        <item type="xs:decimal" name="Volume cross border credited" precision="39"/>
        <item type="xs:decimal" name="Volume cumulated" precision="39"/>
        <item type="xs:decimal" name="Amount domestic" precision="39" scale="2"/>
        <item type="xs:decimal" name="Amount cross border debited" precision="39" scale="2"/>
        <item type="xs:decimal" name="Amount cross border credited" precision="39" scale="2"/>
        <item type="xs:decimal" name="Amount cumulated" precision="39" scale="2"/>
    </metadata>
    <data>
        <row>
            <value>Euro</value>
            <value>T2 CLM COMPONENT</value>
            <value>before 19:00</value>
            <value>3</value>
            <value>0</value>
            <value>0</value>
            <value>3</value>
            <value>31371.24</value>
            <value>0</value>
            <value>0</value>
            <value>31371.24</value>
        </row>
        <row>
            <value>Euro</value>
            <value>T2 CLM COMPONENT</value>
            <value>13:15</value>
            <value>1</value>
            <value>0</value>
            <value>0</value>
            <value>1</value>
            <value>1778.77</value>
            <value>0</value>
            <value>0</value>
            <value>1778.77</value>
        </row>
```

# Annex:
# Examples of Tab issue and Data Issue

# T2 DWH:
# Example of Tab Issue (BDY01)

## All tabs are exported in HTML, same for PDF and Excel

**Business Day event/delay information and settlement opening time - CLM**

Business Day event/delay information and settlement opening time - RTGS

**target** | services

### BDY01 - Business Day event/delay information and settlement opening time

2024-04-12
15:15:12
IAC - Internal User
Acceptance Test

CBXXAQD0XXX - CSLD BBK QM DWH Test CB1

Filters | Service : CLM | Date From : 2023-05-12
| Currency : EUR | Date To : 2024-03-12

**12.05.2023**

| Event | Event code | Planned time | Revised time | Effective time | End time |
|---|---|---|---|---|---|
| CT01 - BDM BD to CLM | CT01 | 2023-05-11 05:00:00 PM | | 2023-05-11 06:37:34 PM | 2023-05-11 06:37:35 PM |
| CSOD - change of business day | CSOD | 2023-05-11 05:00:00 PM | 2023-05-11 05:00:00 PM | 2023-05-11 06:37:48 PM | 2023-05-11 06:37:48 PM |
| CRTI - Start of CLM RTS | CRTI | 2023-05-11 05:15:00 PM | 2023-05-11 05:15:00 PM | 2023-05-11 06:37:48 PM | 2023-05-11 06:38:00 PM |
| CESO - Execution of standing orders in CLM | CESO | 2023-05-11 05:30:00 PM | 2023-05-11 05:30:00 PM | 2023-05-11 06:38:00 PM | 2023-05-11 06:38:01 PM |
| CSMW - Start of non-optional maintenance window | CSMW | 2023-05-12 06:00:00 AM | 2023-05-12 06:00:00 AM | 2023-05-12 09:40:34 AM | 2023-05-12 09:41:00 AM |
| CEMW - End of non-optional maintenance window | CEMW | 2023-05-12 10:00:00 AM | 2023-05-12 10:00:00 AM | 2023-05-12 10:00:00 AM | 2023-05-12 10:00:00 AM |
| T2PC - Data Propagation for T2 (CLM - RTGS) Pre Check | T2PC | 2023-05-12 12:20:00 PM | | 2023-05-12 12:20:00 PM | 2023-05-12 01:03:23 PM |
| CCII - Cut-off for CLM RTS | CCII | 2023-05-12 04:15:00 PM | 2023-05-12 02:45:00 PM | 2023-05-12 02:45:02 PM | 2023-05-12 02:45:04 PM |

Business Day event/delay information and settlement opening time - CLM

**Business Day event/delay information and settlement opening time - RTGS**

**target** | services

### BDY01 - Business Day event/delay information and settlement opening time

2024-04-12
15:15:12
IAC - Internal User
Acceptance Test

CBXXAQD0XXX - CSLD BBK QM DWH Test CB1

Filters | Service : RTGS | Date From : 2023-05-12
| Currency : EUR | Date To : 2024-03-12

**12.05.2023**

| Event | Event code | Planned time | Revised time | Effective time | End time |
|---|---|---|---|---|---|
| RT01 - BDM BD to RTGS | RT01 | 2023-05-11 05:00:00 PM | | 2023-05-11 06:38:01 PM | 2023-05-11 06:38:01 PM |
| RSOD - Change of business day | RSOD | 2023-05-11 05:00:00 PM | 2023-05-11 05:00:00 PM | 2023-05-11 06:38:11 PM | 2023-05-11 06:38:11 PM |
| RRTI - Start of RTGS RTS I | RRTI | 2023-05-11 05:15:00 PM | 2023-05-11 05:15:00 PM | 2023-05-11 06:38:12 PM | 2023-05-11 06:38:12 PM |
| RESO - Execution of standing orders in RTGS | RESO | 2023-05-11 05:30:00 PM | | 2023-05-11 06:38:12 PM | 2023-05-11 06:38:13 PM |
| RSMW - Start of non-optional maintenance window | RSMW | 2023-05-12 06:00:00 | 2023-05-12 06:00:00 | 2023-05-12 09:40:34 | 2023-05-12 09:40:35 |

**Only first tab of HTML version (CLM) is exported in CSV, same results for Excel data and XML**

**Full data shown in HTML format, same for PDF and Excel**

Edit ▷ ⟳ HTML

Per service | System entity wide sums per service

**BIL01 - Consumption data**

IAC - Internal User Accepta

CBXXAQD0XXX - CSLD BBK QM DWH Test CB1

| Filters | Quarter | : 2022 2nd Quarter |
|---|---|---|
| | Services | : RTGS |
| | Parties | : ASAAAQD0XXX - DWH Test 1-ASAA, ASBAAQD0XXX - CSLD BBK QM DWH, ASCAAQD0XXX - CSLD BBK QM DWH, ASDAAQD0XXX - CSLD BBK QM DWH, ASEAAQD0XXX - CSLD BBK QM DWH, CBXXAQD0XXX - CSLD BBK QM DWH Test CB1, PBAAAQD - CSLD BBK QM DWH Test CB1-PB1, PBABAQD0XXX - CSLD BBK QM DWH Test CB1-PB2, PBACAQD0XXX - CSLD BBK QM DWH Test CB1-PB3, PBADAQD0XXX - CSLD BBK QM DWH Test CB1-PB4, PBAEAQD0XXX - CSLD BBK QM DWH Test CB1-PB5, PBAFAQD0XXX - CSLD BBK QM DWH Test CB1-PB6, PBAGAQD0XXX - CSLD BBK QM DWH Test CB1-PB7, PBAHAQD0XXX - CSLD BBK QM DWH Test CB1-PB8, PBAIAQD0XXX - CSLD BBK QM DWH Test CB1-PB9, PBAJAQD0XXX - CSLD BBK QM DWH Test CB1-PB10, PBAKAQD0XXX - CSLD BBK QM DWH Test CB1-PB11, PBALAQD0XXX - CSLD BBK QM DWH, PBAMAQD0XXX - CSLD BBK QM DWH, PBANAQD0XXX - CSLD BBK QM DWH, PBAOAQD0XXX - CSLD BBK QM DWH, PBAPAQD0XXX - CSLD BBK QM DWH Test 1-PB16 |

**System: RTGS**

| | | Service Item | | | 2022 JUN | |
|---|---|---|---|---|---|---|
| Charged party BIC | Responsible party BIC | Category | Code | Description | Quantity (sum) | Share (%) |
| CBXXAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 5 | 5.56 |
| PBAAAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 9 | 10.00 |
| PBABAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 9 | 10.00 |
| PBACAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 9 | 10.00 |
| PBADAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 9 | 10.00 |
| PBAEAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 9 | 10.00 |
| PBAFAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 9 | 10.00 |
| | | | 5006 | Fee for multi-addressee access | 1 | 100.00 |
| PBAGAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 9 | 10.00 |
| PBAHAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 9 | 10.00 |
| | | | 5005 | Fee for unpublished BICs | 1 | 50.00 |
| PBAJAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 9 | 10.00 |
| | | | 5004 | Addressable BIC | 1 | 100.00 |
| PBANAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 1 | 1.11 |
| | | | 5005 | Fee for unpublished BICs | 1 | 50.00 |
| PBAOAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 1 | 1.11 |
| PBAPAQD0XXX | CBXXAQD0XXX | Account Management Services | 5002 | Fixed fee - RTGS DCA | 2 | 2.22 |

# T2 DWH:
# Example of Data Issue (BIL01)

## Only first list/data object exported in CSV, Excel data and XML
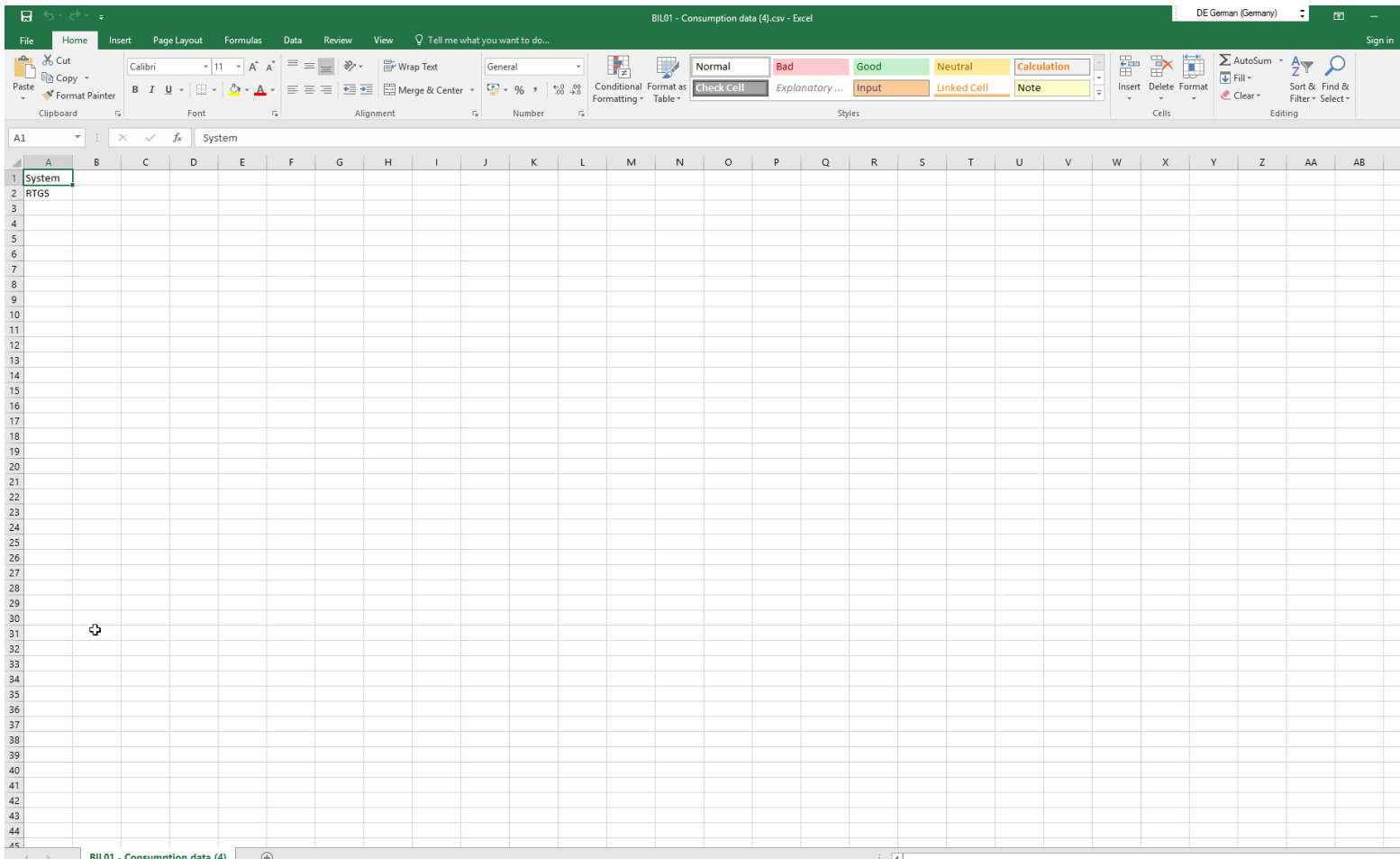
# T2 DWH:
# Comparison - Excel & Excel data

## Excel



## Excel data