TARGET Instant Payment Settlement
CRDM\textsuperscript{TIPS} UDFS Version v.0.3.0

TIPS Contact Group #6
1. Market feedback on CRDM$^{\text{TIPS}}$ UDFS v.0.2.0
2. Overview of CRDM$^{\text{TIPS}}$ UDFS v.0.3.0
3. Specific topics
Market feedback on CRDM\textsuperscript{TIPS} UDFS v.0.2.0
## Classification of comments

<table>
<thead>
<tr>
<th>Category</th>
<th>Actions</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Accepted</strong></td>
<td>• Request to change the UDFS (e.g. typos, inconsistencies, errors, further details, etc.).&lt;br&gt;• The comment have been included in the final UDFS version.</td>
</tr>
<tr>
<td><strong>Clarification</strong></td>
<td>• No changes in the UDFS document.&lt;br&gt;• Additional explanation provided while answering the comment.</td>
</tr>
<tr>
<td><strong>Rejected</strong></td>
<td>• Request cannot be accepted (e.g. request contradicting the User Requirements Document).</td>
</tr>
<tr>
<td><strong>To be clarified by the requestor</strong></td>
<td>• No changes in the UDFS document.&lt;br&gt;• Additional information is required by the requestor.</td>
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Market feedback on CRDM\textsuperscript{TIPS} UDFS v.0.2.0

Overall figures

<table>
<thead>
<tr>
<th>Category</th>
<th>Figures</th>
<th>Percentage</th>
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<tbody>
<tr>
<td>Accepted</td>
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<td>Clarification</td>
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<td>Rejected</td>
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<td>Total</td>
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Overview of CRDM\textsuperscript{TIPS} UDFS v.0.3.0
Overview of CRDM$^{\text{TIPS}}$ UDFS v.0.3.0

- Version v.0.3.0 will include the **full scope** of CRDM$^{\text{TIPS}}$ UDFS.

- Chapter 1
  - Introduction and Reader’s guide.
  - Section 1.5 (Interactions with other services).
  - Section 1.6.3 (Archiving management).

- Chapter 2
  - DMT interactions

- Chapter 3
  - DMT files’ specifications

- Chapter 4
  - Business rules
Specific topics
Specific topics

1. TIPS directory
2. Reference data propagation
3. Massive reference data upload
Specific topics

TIPS Directory
The TIPS directory includes the list of all BICs of TIPS Participants and Reachable Parties that are addressable within TIPS.

Its structure is based on the TARGET2 directory and it includes the following fields:

- User BIC
- Institution Name
- Party BIC
- Type of Change
- Valid From
- Valid To
- Participation Type

Each version of the TIPS directory is identified by the name of its file.
TIPS Directory (CRDM UDFS v.0.2.0)

• **Generation**
  • CRDM generates both a full and a delta version every day at 17:00 CET and it forwards it to TIPS for distribution.

• **Distribution**
  • TIPS Actors may receive the TIPS directory either in push mode (based on report configuration) or in pull mode (from a CRDM web-page).

• **Open Issue**
  • Two respondents asked for including one more field (meaningful only for records related to Reachable Parties) indicating the BIC of the relevant TIPS Participant (i.e. the TIPS Account holder).

  • **Is the TIPS-CG fine with this proposal?**
Reference Data Propagation
Reference data propagation

• All reference data setup and maintenance operations, with the exception of changes in the local reference data management, are performed in the CRDM and reference data are then propagated from CRDM to TIPS on a daily basis. This may happen in two ways:
  • **Daily propagation**: every CRDM opening day, at 17:00 CET, reference data are propagated from CRDM to TIPS. The set of propagated reference data includes all active data at the moment of the propagation, regardless whether they were already propagated the previous days.
  • **Contingency propagation**: the TIPS Operator may trigger an ad hoc daily propagation, when an immediate change of a set of data, not manageable directly into TIPS, must be performed.
Reference data propagation

- Daily propagation example:
The propagation process described in the UDFS refers to CRDM\textsuperscript{TIPS}, which does not implement all the reference data propagation features that the fully-fledged CRDM will implement in the context of the T2-T2S Consolidation project.

Indeed, CRDM will also provide an \textit{intraday propagation} functionality whereby a pre-defined set of reference data changes will be immediately propagated to the interested services, without waiting for the daily propagation process.

As it happens already today in T2S, blocking/unblocking and limit updates are supposed to be propagated intraday. Therefore, this may happen \textit{only when the fully-fledged CRDM will be available}.

Meanwhile, blocking/unblocking of parties/accounts/CMBs and CMB limit updates \textit{can only be performed directly in TIPS}.
Specific topics

Massive Reference Data Upload
After the approval of the T2-T2S Consolidation project by the Governing Council, 4CB started working into more detail on the different pieces of shareable components required for TIPS.

In this context, an issue related to the massive upload of reference data in the CRDM was identified.

The following slides describe said issue in the first place and subsequently propose a possible way to address it.
The access to the fully-fledged CRDM (in 2021) will be possible in U2A mode (for all functions) and in A2A mode (for the subset of functions for which it is possible today in T2S SDMG).

The original idea was to use the same channel also for CRDM\textsuperscript{TIPS} (in 2018), in order to allow Central Banks and their participants to perform massive upload of reference data, when needed.

Out of a recent more detailed analysis, however, it appears this approach would be suboptimal from two different angles, i.e.:

- from a technical connectivity standpoint and
- in terms of coverage of the required functional scope.
Access to CRDM via A2A mode

- The technical connectivity solution that ESMIG\textsuperscript{TIPS} will provide for TIPS in 2018 does not cover the full scope of technical connectivity services that ESMIG will provide in the T2-T2S Consolidation context in 2021.
- This includes the A2A connectivity towards the fully-fledged CRDM (based on the SnF service), which will only be available in 2021.
- At the same time, the current T2S A2A connectivity solution cannot be considered as a possible option, as it is not granted that all TIPS Actors are also T2S Actors today.
Access to CRDM via A2A mode

- For these reasons, the only possibility to provide an A2A connection to CRDM\textsuperscript{TIPS} in 2018 would be to convey the related A2A traffic through the same channel that TIPS Actors will use for sending instant payment messages and local reference data updates to TIPS, by using the instant message service.

- This would imply the need to develop a \textit{throw-away solution} only for the interim period \textit{between 2018 and 2021}. 
Access to CRDM via A2A mode

- As even the fully-fledged CRDM will not enlarge the scope of available XML messages, using the A2A mode to perform massive upload of reference data for TIPS would only be possible for a very limited set of reference data objects, i.e.:
  - Party, Cash Account (including CMB).

- Therefore, **many other reference data objects** (expected to have high cardinality) **would have to be loaded in U2A mode**:
Proposed solution

- Already today in T2S, the DMT allows a massive upload of reference data for many of the objects required by TIPS and with a high cardinality, i.e.:
  - Party, User, Certificate DN, User Certificate DN Link, Grant System Privilege, Grant Role, Message Subscription Rule, Message Subscription Rule Set, Technical Address Network Service Link, Report Configuration.

- Therefore, only the following five objects would not be covered:
  - Party Service Link, Cash Account (including CMB), Limit, Authorized Account User, DN BIC Routing.

- On this basis, the proposed solution is to avoid a throw-away investment for the implementation of an interim A2A channel and to implement via DMT the full scope of TIPS reference data objects with high cardinality.

- This solution would not entail any additional cost.

- The A2A channel will be implemented at a later stage, as part of the T2-T2S Consolidation project.
**Annex: high-cardinality CRDM objects**

<table>
<thead>
<tr>
<th>Reference Data Entity</th>
<th>A2A</th>
<th>DMT</th>
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<tbody>
<tr>
<td>Authorized Account User</td>
<td>✓</td>
<td>✗</td>
</tr>
<tr>
<td>Cash Account</td>
<td>✓</td>
<td>✗</td>
</tr>
<tr>
<td>Certificate DN</td>
<td>✗</td>
<td>✓</td>
</tr>
<tr>
<td>CMB</td>
<td>✓</td>
<td>✗</td>
</tr>
<tr>
<td>DN BIC Routing</td>
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</tr>
<tr>
<td>Grant Role</td>
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</tr>
<tr>
<td>Grant System Privilege</td>
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<td>✓</td>
</tr>
<tr>
<td>Limit</td>
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</tr>
<tr>
<td>Message Subscription Rule</td>
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</tr>
<tr>
<td>Message Subscription Rule Set</td>
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</tr>
<tr>
<td>Party</td>
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</tr>
<tr>
<td>Party Service Link</td>
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<td>Report Configuration</td>
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</tr>
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<td>User</td>
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</tr>
<tr>
<td>User Certificate DN Link</td>
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<td>✓</td>
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</table>

✓: currently available in A2A/DMT  ✗: U2A only  ✗: new development required in the DMT. In **bold** the objects maintained by Central Banks only and TIPS Operator.