

# TARGET Instant Payment Settlement

## User Handbook

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## Terms and abbreviations

The terms and abbreviations used in the User Handbook are shown in the table below. You find terms with their description and the abbreviations, both in an alphabetical order.

Letter	Description
<b>A</b>	
A2A	Application-to-application
<b>B</b>	
BIC	Business Identifier Code
<b>D</b>	
DD	Day (e.g. used within the timestamp, every letter stands for one digit)
d	Decimal number
<b>E</b>	
e.g.	For example (Latin: 'exempli gratia')
<b>G</b>	
GUI	Graphical User Interface which is a type of interface which allows users to interact with electronic devices
<b>H</b>	
hh	Hour (e.g. used within the timestamp, every letter stands for one digit)
<b>I</b>	
i.e.	That is (Latin: 'id est')
<b>M</b>	
MM	Month (e.g. used within the same timestamp, every letter stands for one digit)
mm	Minute (e.g. used within the timestamp, every letter stands for one digit)
µsµsµsµsµs	Microsecond (e.g. used within the timestamp, every 'µs' stands for one digit)
min.	Minimum
max.	Maximum
<b>N</b>	
NRO	Non-repudiation of origin (NRO) provides the recipient (TIPS) with the evidence NRO which ensures that the originator (TIPS actor) will not be able to deny having sent the U2A instruction. The evidence of origin is generated by the originator and held by the recipient.
<b>R</b>	

Radio button	A type of GUI element which allows the user to choose only one of a predefined set of options.
<b>S</b>	
Select box	A select field in the GUI with an arrow on the right side. By clicking on the arrow, all possible input values are shown and can be selected with a mouse-click.
ss	Second (e.g. used within the timestamp, every letter stands for one digit)
<b>T</b>	
Timestamp	A sequence of characters, denoting the date and the time in TIPS.
<b>U</b>	
UHB	User Handbook
U2A	User-to-application
<b>Y</b>	
YYYY	Year (e.g. used within the timestamp, every letter stands for one digit)

## 1. Introduction to TIPS

This chapter serves as an **introduction to the TIPS service**, which is developed by the Eurosystem as a pan-European Instant Payment solution in central bank money. This chapter is intended as a general description which includes all the main features of TIPS, including those that are out of scope for this document, which is dedicated to the use of the Graphical User Interface.

Section 1.1 describes the features of the TIPS Settlement model and its architecture, whereas section 1.2 focuses on the communication between TIPS and the other Eurosystem market infrastructure services, which are crucial for the smooth functioning of TIPS.

### 1.1 TIPS Overview

TIPS is a harmonised and standardised pan-European service with common functionalities for the settlement of Instant Payments across different countries and jurisdictions. It is based on the Single Euro Payments Area (SEPA) Instant Credit Transfer scheme. It is designed to settle payments instantly with around the clock availability without scheduled service downtime, i.e. it is open for business 24 hours a day, every day of the year. No distinction is made between domestic and cross-border payments.

TIPS offers immediate settlement in central bank money.

TIPS Participants have a Settlement interface to send payment instructions and receive payment confirmations based on ISO 20022 standards and compliant with the SEPA Instant Credit Transfer scheme.

TIPS is designed to be currency agnostic, in order to provide settlement in non-euro central bank money if requested, connecting to other RTGS systems.

### 1.1.1 TIPS settlement service model

All the cash used to settle transactions in euro in TIPS comes from accounts opened in TARGET2, which is the RTGS for the euro currency. As such, TIPS can be considered as an additional service to TARGET2. Since TIPS operates 24/7/365, it does not have to return the liquidity to the RTGS at the end of TARGET2 operating day, but both the inbound and outbound liquidity transfers can take place only during TARGET2 operating hours. Therefore, participants to TIPS have to take into consideration their liquidity needs for the hours during which TARGET2 will be closed. Since TIPS account balances are taken into account on the minimum reserve calculation, a snapshot of the balance on the TIPS accounts is taken at the closing time of TARGET2.

TIPS processes payments in a strict FIFO (First In First Out) order, i.e. the instructions<sup>1</sup> are processed in a rigorously ordered sequence and no prioritisation is foreseen. TIPS processes every instant payment according to **two settlement stages**: the first notifies the beneficiary participant after having reserved the funds on the Originator Participant account by creating a cash posting (since no partial settlement is allowed, the full amount is reserved) and the second settles the reserved amount after TIPS has received the confirmation that the payment has been accepted by the Beneficiary Participant or Instructing Party acting on behalf of the Participant/Reachable Party. In case of negative reply from the Beneficiary Participant, the reserved sum is released and is again available to settle other instructions on the same account. TIPS rejects any payment that is not settled within the configured timeout<sup>2</sup> period.

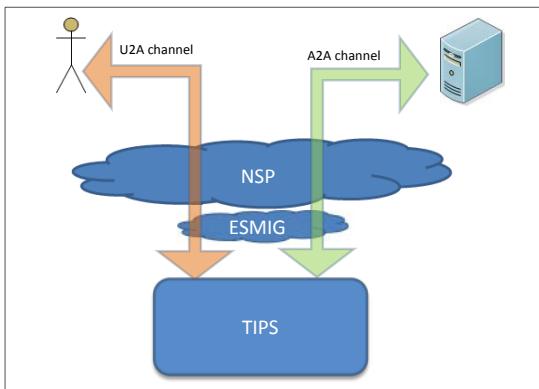
### 1.1.2 TIPS Access

TIPS Actors can access TIPS, via different Network Service Providers through the Eurosystem Single Market Infrastructure Gateway (ESMIG, see section 1.2.1) component, via U2A (User to Application) or A2A (Application to Application) mode.

<sup>1</sup> The term "instruction" refers not only to instant payments or liquidity transfers, but also to local reference data updates and any other type of request that leads to the update of reference or dynamic data in TIPS.

<sup>2</sup> SCTInst Timestamp Timeout value is 20 seconds.

**Figure 1 – TIPS access**



A2A communication relies, whenever possible, on ISO 20022 standard XML messages, for both inbound and outbound communication. When there is no ISO 20022 standard message available or when the usage of XML technology is not advisable for technical reasons (e.g. performance or network traffic constraints) flat data files may be used. At the current stage, there is no business case requiring flat data files to be used instead of ISO 20022 standard messages. All the exchanges are executed through a real-time transfer service, making it compulsory that both parties involved in a transaction are available when the message is sent (the Store and Forward service is only foreseen for the sending of Reports). In case the message cannot be delivered, no retry mechanism is available.

U2A communication, which is available for a subset of TIPS functionalities whose description is the scope of this document, is based on a Graphical User Interface and enables physical users of directly connected TIPS Actors to access and make use of said subset of functions. Authorised users are able to access GUI functions based on their access rights profile (see sections 3.3 and 3.4).

For both A2A and U2A communication any individual or application interacting with TIPS is identified by a Distinguished Name (DN), which is a sequence of attribute-value assertions separated by commas, e.g. <cn=smith,ou=tips-ops,o=bnkacctt,o=nsp-1>. The DN is uniquely linked to a digital certificate issued by the relevant NSP which TIPS Actors assign to their individuals (U2A) or applications (A2A).

The ESMIG carries out an authentication check to identify the DN and an authorisation check at service level, to verify whether the DN is enabled to submit requests to TIPS.

After the ESMIG authentication, TIPS carries out the authorisation of the sender at application level based on the DN's access rights profile, which is defined at Common Reference Data Management (CRDM, see section 1.2.2) level.

TIPS authorises requests from specific users (i.e. individuals or applications identified by means of a DN) based on their relevant access rights profile. Each interaction with TIPS that can be triggered in A2A or U2A mode by means of a message or a GUI screen (e.g. sending a query or blocking a TIPS Account) is defined as a TIPS user function. The capability to trigger a specific TIPS user function is granted by means of the related Privilege.

All Privileges that are relevant for TIPS are defined and stored within the CRDM, which also offers the possibility to group different Privileges into sets known as Roles. Each of these Roles will define a standard, specific business role for TIPS Actors to use to interact with TIPS. TIPS users will be assigned one or more

roles in the CRDM depending on their requirements, and the privileges contained in the roles will define their access rights configuration.

Roles are then granted to users identified by specific DNs. This allows the DN linked to the Role to trigger user functions in TIPS by exercising the Privileges contained within the Role.

## 1.2 Interactions with other services

TIPS is not a stand-alone service: in order to use it, TIPS Actors need to access other Eurosystem services, which are described in this section.

### 1.2.1 Eurosystem Single Market Infrastructure Gateway

The Eurosystem Single Market Infrastructure Gateway (ESMIG) authenticates TIPS Actors and gives them access to all authorised Eurosystem services, including TIPS. It also guarantees sanitisation of XML messages for security purposes and technical validation of the standard messages sent to the different services (schema validation and check of mandatory fields). If these checks are successful, the request and the sender's DN are forwarded to TIPS, which carries out the authorisation of the sender at application level based on the DN's access rights profile.

The ESMIG U2A portal implements an authentication web page that shall authorise users and let them reach the U2A interface URL of the relevant Eurosystem services, including TIPS.

### 1.2.2 Common Reference Data Management

The Common Reference Data Management (CRDM) is a centralised and harmonised reference data management component that allows authorised users to setup and maintain via a single dedicated interface all the data that is shared by more than one Eurosystem service, such as TIPS, TARGET2 and T2S.

For this reason, TIPS does not provide dedicated functions for the setup and most of the maintenance operations of its reference data (e.g. Participants, Accounts, Roles and Privileges). Since the actual creation of the reference data objects is performed on the CRDM, all the necessary steps to be taken in order to create the data are detailed in the CRDM UHB."

Changes to TIPS Reference data fall into two categories:

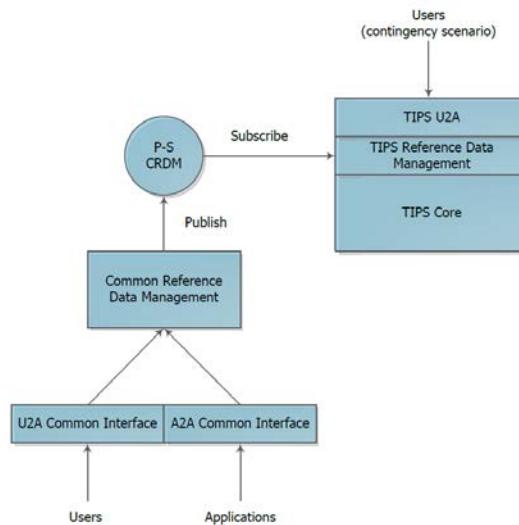
- Common reference data changes: carried out by authorised users in the CRDM interface and then propagated to TIPS on a daily basis. This also includes the initial setup of all reference data required by TIPS (e.g. creation of a new Participant or of a new Account). All functions are reported in table 1.
- Immediate reference data changes: some time-critical reference data changes need to be implemented in TIPS immediately, without waiting the following daily propagation from the CRDM service. They are carried out by authorised users directly in the TIPS interface and processed immediately, in order to update the relevant local reference data.

The access to CRDM is possible in U2A mode (for all functions) and in A2A mode (for a subset of functions) through the ESMIG component. U2A functions can also be triggered in 4-eyes mode, so that a final approval from a different user is required before the change comes into effect.

As the CRDM service is available 5 days a week, 22 hours a day, the possibility to setup and maintain reference data for TIPS is only available during that time window. The data is propagated to TIPS asynchronously, on a daily basis, shortly before the business day change of TARGET2.

The following diagram describes the interaction between the CRDM service and TIPS.

**Figure 2 – Interaction with the CRDM**



The following table lists all the reference data management operations that will be available in the CRDM for TIPS, along with the corresponding responsible TIPS Actors and the expected U2A and A2A availability of each function.

**Table 1 – Responsible Actors for CRDM actions**

Area	Object	Responsible TIPS Actor <sup>3</sup>
Party	Party Party Service Link	Operator, Central Bank Operator, Central Bank
T2S Dedicated Cash Account	TIPS Account TIPS Transit Account TIPS Credit Memorandum Balance Limit Authorised Account User	Central Bank Operator Participant Participant Participant
Access Rights Management	User Role Privilege Certificate DN User Certificate DN Link	Central Bank, Participant Operator, Central Bank Operator Central Bank, Participant Central Bank, Participant
Message Subscription Configuration	Message Subscription Rule Message Subscription Rule Set	Central Bank, Participant Central Bank, Participant
Network Configuration	Network Service Technical Address Network Service Link DN BIC Routing	Operator Operator, Central Bank Operator, Central Bank
Report Configuration	Report Type Report Configuration	Operator Central Bank, Participant
Restriction Type Management	Restriction Type (for TIPS blocking)	Operator
Configuration Parameter	Country Currency System Entity TIPS BIC Directory Service Currency Service Link	Operator Operator Operator Operator Operator Operator

### 1.2.3 TARGET2 and other RTGS systems

Liquidity in TIPS is provided from an external RTGS system (TARGET2 for the euro). TIPS can retain the liquidity when the RTGS system is closed, provided that it collects the balances of all its accounts into a “snapshot” and communicates it to the RTGS system at the end of the business day of the RTGS system.

It is possible to transfer liquidity to and from TIPS<sup>4</sup>, and the owner of the RTGS Account does not need to be the same as the owner of the TIPS Account. TIPS foresees two types of Liquidity Transfers: Inbound (from an RTGS system to TIPS) and Outbound (from TIPS to an RTGS system). There are no internal liquidity transfers between TIPS Accounts. All Liquidity Transfers, whatever the type, are performed by moving the liquidity through an RTGS Transit Account. TIPS has one and only one Transit Account defined for each currency, owned by the relevant Central Bank. The Transit Account for the euro is owned and maintained by

<sup>3</sup> The TIPS Actor types listed refer to the default responsible actors in normal operations. Functionalities for Central Banks to act on behalf of Participants and for the Operator to act on behalf of other actors will remain available as is currently the case in T2S.

<sup>4</sup> TIPS accounts in euro are legally opened in TARGET2 by the responsible Central Bank and have to be dedicated to the settlement of instant payments in TIPS.

the ECB. Liquidity transfers do not entail a reservation of funds, unlike instant payments, and are settled immediately.

An Inbound Liquidity Transfer moves liquidity from an RTGS account to a TIPS account in the same currency. Inbound Liquidity Transfer orders can be triggered only in the RTGS System and are received by TIPS (TIPS does not provide a functionality to pull liquidity from the relevant RTGS System).

Since TIPS can keep and move the liquidity in its accounts while TARGET2 is closed and considering that the balances of the TIPS accounts are, from a legal perspective, considered to be in the jurisdiction of TARGET2, TIPS prepares snapshots of the balances during the TARGET2 end of day procedure, ensuring that no liquidity transfers are pending confirmation from TARGET2. The same procedure is foreseen for any other RTGS system connected to TIPS.

## 2. Overview of the User Handbook

The TIPS User Handbook, hereinafter called UHB, aims at facilitating the use of the Graphical User Interface (GUI) of TIPS. It is intended for any TIPS user regardless of the focus of activities and describes the full range of functionalities available in user-to-application (U2A) mode. The GUI component includes all the necessary elements to provide the authorised users with the possibility to query transactional data (e.g. the balance of account) and to amend the local reference data that shall be maintained on a 24/7/365 basis.

There is only one handbook addressing all TIPS actors: TIPS Participants, Reachable Parties, Central Banks, the TIPS Operator. Updated versions of the UHB will be provided on a regular basis.

The UHB is part of the functional documentation and complements the User Detailed Functional Specifications (UDFS). The UDFS is particularly relevant for UHB readers willing to get more information on the general concepts described in the previous chapter. Although it is mainly focused on the application-to-application mode (A2A), chapter one of the UDFS contains a detailed description of the business concepts used in TIPS, which are also relevant when using the GUI.

### 2.1 UHB Methodology

Several symbols and methodological elements are used throughout the TIPS UHB to ease orientation and help the reader to find their desired information quickly. Every page of the main UHB parts has a similar page layout. The reader can find four different elements:

- | the header, which shows the chapter and sub-chapter title
- | the margin column on the left side of each page, which is used for subheadings and information signs
- | the textcolumn, which contains the main information, tables and screenshots
- | the footer, which shows the page number

### 2.2 UHB Structure

The UHB is structured in five parts:

- |               |  |
|---------------|--|
| <b>Part 1</b> | The <b>Introduction to TIPS</b> provides the reader with a general overview of the TIPS service and its relation with the other Eurosystem market infrastructure services. An extensive description of the TIPS service can be found in the TIPS UDFS.   |
| <b>Part 2</b> | The <b>Overview of the User Handbook</b> explains the content and the approach of both the document and the GUI. While the first section explains how to use the UHB, the second section focuses on the design and common functionalities of the GUI.  |
| <b>Part 3</b> | The <b>Initial Setup</b> gives the reader a rough guide about where to start with TIPS. It describes the reference data the user has to create in order to access and make use of the service. Since the actual creation of the reference data objects is performed on the CRDM, all the necessary steps to be taken in order to create the data are detailed in the CRDM UHB. |
| <b>Part 4</b> | The <b>Screen Reference guide</b> part describes all the screens contained in the GUI. Each description follows an identical structure which comprises detailed information on all screen fields. Readers may refer to this part if they need detailed and precise information on a screen, field or button.   |
| <b>Part 5</b> | The <b>Screen user guide</b> part provides the reader with a step-by-step description of the typical GUI workflows. Each description follows an identical structure. Readers may refer to this part if they need to know how to carry out an action using the GUI.   |

## 2.3 Overview of the Graphical User Interface

The GUI is a browser-based application for communication with TIPS in U2A mode. It is based on the ISO norm 9241 ‘Ergonomics of human system interaction’.

TIPS provides TIPS Actors with a Graphical User Interface offering basic functionalities to access information and controls (e.g. U2A queries, local reference data maintenance). The complete list of functions available 24/7/365 via the TIPS GUI is as follows:

**Table 1 – Functions available in TIPS GUI**

Type	Description
Query	Account balance and status query
Query	CMB limit and status query
Local reference data	Blocking/Unblocking of a Participant
Local reference data	Blocking/Unblocking of an Account
Local reference data	Blocking/Unblocking of a CMB
Local reference data	Increase/Decrease of a CMB limit
Local Reference data	Task List
Liquidity management	Liquidity transfer Order <sup>5</sup>

### 2.3.1 Setup and login process

Before entering the GUI, make sure that your workstation complies with the hardware and software requirements and implement all necessary preparations (e.g. firewall settings) described below.

#### Hardware requirements

[to be specified]

#### Software Requirements

[to be specified]

#### Supported Web-Browsers and Settings

[to be specified]

#### GUI Access

[to be specified]

### 2.3.2 GUI Structure

This chapter explains the basic elements of the TIPS GUI structure (i.e. structure of the menu and the screens) helping you to navigate through the system and to use it quickly and efficiently.

The first subsection describes the menu structure where screens are grouped hierarchically. Afterwards, the second subsection explains the layout structure common to each screen. The following subsections provide details on the different screen types and on recurring elements, such as common field types or buttons and icons.

#### 2.3.2.1 Menu Structure

The GUI menu is structured into two hierarchical menu levels. The first level is presented as a menu bar containing the five first-level menu items (Queries, Blocking, Limit Update, Outbound Liquidity, Task List)

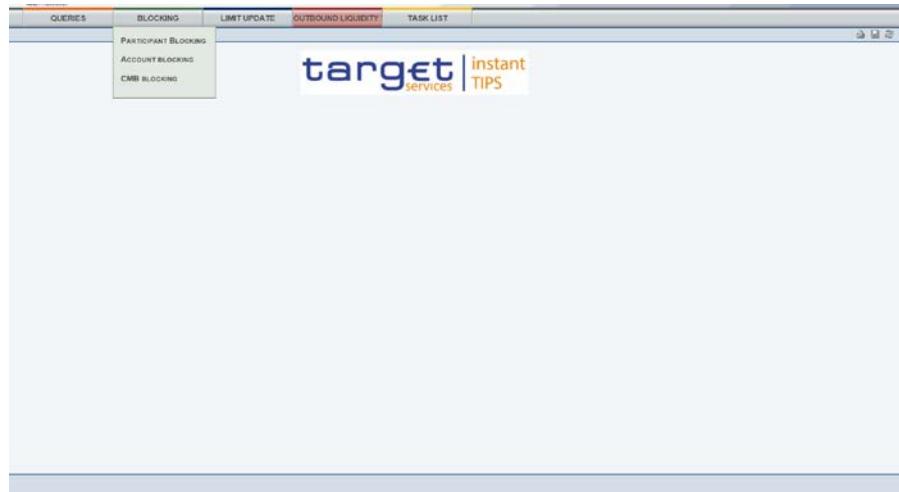
---

<sup>5</sup> Outbound liquidity transfers are allowed based on the operating times of the respective RTGS

which are always visible on top of each screen. The second menu level is accessible via mouse-over on the first level menu items.

Depending on your access rights, it is possible that not all menu entries are visible for you. Contact your system administrator to verify that you have the necessary Privileges to access all screens relevant to you. The Privileges are listed in each screen and business scenario description.

### Screenshot



#### 2.3.2.2 Screen Structure

In general, each screen of the TIPS GUI follows the same layout containing a header and a content area.

**Header** The header appears at the top of every screen. It contains four main elements providing useful information and helping the users to navigate between the different screens as shown in the illustration below

**Screenshot with header elements** [the actual screenshot will be included when available]

**Table 1 – GUI header elements**

Position	Element	Description
1	<i>TIPS</i> logo button	links to the welcome screen. While using the <i>new/edit</i> screens, the <i>TIPS</i> logo button is locked in order to ensure a safe and complete submission process.
2	Information panel	displays your login name, the <i>logout</i> and <i>help</i> buttons as well as date and time of last data access.
3	Menu bar	presents the four main menu items and allows you to navigate to the screens.
4	<i>TIPS</i> Actor logo	displays the respective logo in accordance with the chosen <i>TIPS</i> Actor in line with the white-labelling approach.

**Content Areas** The content area is the part of the GUI where you can trigger all business actions. It is organised by four main elements which help you to interact properly with the GUI as shown in the illustration below.

**Screenshot** [the actual screenshot will be included when available]

The TIPS GUI consists of the following types of screens, each with a different function:

- | Welcome screen
- | Search/List screen
- | Details screen
- | Enter screen

<b>Welcome screen</b>	The <i>welcome</i> screen is the entrance into the TIPS GUI and allows you to choose your system user reference. It also contains a ticker line providing you with the latest information. The ticker is managed by the TIPS operator.
<b>Search&gt;List screen</b>	The <i>search/list</i> screen allows you to query the TIPS database using a predefined set of search criteria. After executing a search, a list of data records matching your search criteria is displayed in a table.
<b>Details screen</b>	In contrast to the <i>search/list</i> screen, you can only access the <i>details</i> screens via other screens. You can find all possible ways of accessing the screen via other screens in the respective screen description within the screen reference part.
<b>Enter screen</b>	Similar to the <i>details</i> screens, you can only access the <i>enter</i> screens through other screens

### 2.3.2.3 Field types and properties

On *search/list* and *enter* screens, users can enter information via input fields and select fields. Pre-filled information is displayed in read-only fields.

#### Input fields

In input fields you can enter text and/or numeric content. Make sure to comply with the format requirements, which are part of each field/screen description. Input-sensitive fields are input fields with an auto-complete mode that helps you to input data. As soon as you start typing the first characters of the respective data into an input-sensitive field, TIPS automatically proposes possible matching entries from which you can select the desired one.

#### Select fields

Select fields are either select boxes, radio buttons or check boxes.

- | **Select boxes:** Functionally a select box is a way to enter data from a limited list of possible values. In TIPS you can find different types of select boxes: standard select box and auto-complete select box. You can select only one value at the same time.
- | **Radio buttons:** Enable you to make exact selections using one value from a set of options. You can select only one value at the same time. Click on the icon corresponding to the option you would like to select.
- | **Check boxes:** Enable you to select more than one value at the same time. Click on the boxes corresponding to the options you would like to select. Selected check boxes contain a check mark.

In addition to enter and select fields, the TIPS GUI has also read-only fields, which are pre-filled and do not allow data changes.

## Field Properties

Following the SEPA Instant Credit Transfer specifications, the allowed character (for Identifiers/reference data elements) set is restricted to support the Latin characters which are commonly used in international communication. Data elements is restricted to the characters of the table below

**Table 2 – TIPS character set**

Character	Description
a-z	26 small characters of the Latin alphabet
A - Z	26 capital characters of the Latin alphabet
0 - 9	10 numeric characters
/	Solidus (slash)
-	Hyphen
?	Question mark
:	colon
(	Opening parenthesis
)	Closing parenthesis
.	Full stop
,	Comma
'	Apostrophe
+	Plus
	Space (blank)

As additional rules, it is required that references, identifications and identifiers must not start or end with '/' or contain '//'.

### 2.3.3 Validation

<b>Front-end validation</b>	<p>In TIPS all submission processes undergo various validations, which take place in the front-end and/or in the back-end. Only correct entries, fulfilling all predefined criteria, can be further processed. To indicate the status of the recently performed action, TIPS uses two different types of messages to indicate a successful or failed validation as described below.</p> <p>In addition to the automatic validation carried out by TIPS, human validation can be imposed by using the 4-eyes mode.</p> <p>Furthermore, non-repudiation of origin (NRO) is implemented for a specified number of screens.</p> <p>As first part of the validation process, the front-end validation takes place without communication to the back-end. The front-end validation includes both the field validation and the cross-field validation. It is carried out after clicking on a button. The field validation verifies that all entries comply with the required format. The cross-field validation checks the data consistency between two or more fields/buttons in relation to each other.</p>
<b>Back-end validation</b>	<p>The back-end validation is the second part of the validation process. After successful front-end validation, the user's request is submitted to the back-end and checked for compliance with the business validation rules. In case of failure an error message is displayed. You can find a detailed list of all error messages and their description in the annex of the UHB (list of references for error messages).</p>

**Result** After each validation, the TIPS GUI informs the user about the result. There are two different message types available, the error message and the success message.

#### Error Message

Each error message appears at the top of the content area and next to the field containing the error. In the case of a failed front-end or back-end validation, it indicates the source of the failure, the type of error and a short hint.

#### Success message

If you are working in 4-eyes mode, the success message also provides you with the 4-eyes principle ID.

**4-Eyes Mode** Depending on the access rights setup, you can use TIPS in 2-eyes or in 4-eyes mode. The 2-eyes mode and the 4-eyes mode apply for enter screens (new and edit mode) and for any kind of deletion processes. If you are a 4-eyes mode user, your actions have to be confirmed by a second user in order to be processed.

#### First user

In 4-eyes mode the first user enters, changes or deletes the data on a screen and afterwards submits the action by clicking on the submit button in the button bar. The success message appearing after successful validation includes a 4-eyes principle ID. For the final execution a second user is needed to confirm the action.

#### Second User

After the first user has entered, changed or deleted the data, a second user (with the required privilege) has to approve or revoke this action via the task list screen either using the 4-eyes mode ID or the search functionality. An alert icon is shown on the active TIPS screen for those users with appropriate privileges to approve a pending action via the Task list screen. By clicking in the alert icon you are directed to the Task List - Search/List screen where you can first search and then approve/revoke the pending changes.

#### Digital Signature – NRO

In order to ensure non-repudiation of origin (NRO) for critical transactions, the use of a digital signature has been implemented for specified screens. This means that the user will be asked to enter a PIN code for signature purposes whenever an instruction is initiated. With the entry of the PIN, TIPS attaches a digital signature to the instruction entered by the TIPS actor.

The following (exhaustive) list provides an overview of screens for which the NRO feature is implemented:

- | *Participant Blocking – Change Status Screen [ ]*
- | *Account Blocking – Change Status Screen [ ]*.
- | *CMB Blocking – Change Status Screen - new screen [ ]*.
- | *CMB Limit Modification – Modify Limit screen [ ]*.
- | *Outbound Liquidity Transfer - new screen [ ]*.
- | *Data Changes - Details screen [ ]*.

### 2.3.4 Communication Network and services

Refer to the TIPS Connectivity Guide document for details on the communication network and services.

### 2.3.5 User Administration

**Registration** [To be specified]

## 2.3.6 Security and administration service

In order to guarantee a secure and safe handling of the information and to protect customer data provided via the GUI, various security elements have been put into place:

- | Each action requires system or human validation as described in the validation
- | The scope of available data and functions is controlled via the management of access rights
- | The security features provided by the network providers and described in their respective user documentation prevent unauthorised access

## 3 Initial Setup

In order to use the TIPS Service, any Actor needs to create a series of Common Reference data that are used by TIPS but maintained and stored in a dedicated tool, the Common Reference Data Management (CRDM) component. The CRDM allows users to setup and maintain reference data that is shared by multiple Eurosystem services such as TIPS, T2 and T2S<sup>6</sup> and propagates such data to the relevant services. The description of the CRDM is out of scope of this document: the following paragraphs will be devoted to a general description of the objects that are created in the CRDM in order to understand how to use them in the TIPS service.

### 3.1 TIPS Actors

Legal entities or organisations that interact with the TIPS application either directly or indirectly (i.e. through an Instructing Party) are generally known as TIPS Actors in the Common Reference Data Management repository. The TIPS participation model envisions different types of Actors, with different roles and responsibilities, as outlined below. Each legal entity may play different roles in TIPS. Generally speaking, any legal entity playing multiple business roles in TIPS results in the definition of multiple parties.

Legal relationship between parties in TIPS determine a hierarchical party model based on a three-level structure. The TIPS Operator is the only party on the top level of the hierarchy and it is in a legal relationship with each party of the second level, i.e. each Central Bank in TIPS. Similarly, legal relationships exist between each party belonging to the second level (i.e. a Central Bank) and all of its community (i.e. Participants and Reachable Parties).

The possibility for users of each TIPS Actor to access their respective functions and fulfil their roles and responsibilities is enabled by setting up an adequate access rights configuration.

#### 3.1.1 TIPS operator

The TIPS Operator is the legal and organisational entity that operates TIPS. They are responsible for the initial setup and day-to-day operations of TIPS and act as a single point of contact for Central Banks and directly connected TIPS Actors<sup>7</sup>. They are responsible for monitoring the system and carrying out corrective actions in case of incidents or in the event of service unavailability. The TIPS Operator is also responsible for setting up and maintaining Central Banks reference data in the Common Reference Data Management repository and, if required, they may operate on behalf of any TIPS Actor. They have full access to all live and all archived reference data and transactional data in TIPS.

#### 3.1.2 Central Bank

<sup>6</sup> The reference data of T2 and T2S is not part of CRDM for the time being, until the approval of the relevant CR674.

<sup>7</sup> TIPS Actors different from Central Banks may contact the Service Desk only for connectivity-related incidents.

Central Banks are responsible for setting up and maintaining reference data for all the TIPS Actors belonging to their national community. As far as the submission of liquidity transfers or the maintenance of reference data are concerned, they can act on behalf of one of their Actors in case of need. In order to allow the transfer of liquidity from TARGET2 to TIPS and vice versa, a single Transit Account must exist in TIPS. The European Central Bank owns and manages the single Transit Account in euro. For any other settlement currency in TIPS, the relevant non-euro Central Bank shall define a single Transit Account for its currency. In case a Central Bank is willing to make use of TIPS not only for the provision of liquidity to the Participants of its community, but also for the settlement of Instant Payments, it will have to open another Party as Participant.

### 3.1.3 Participant

Participants represent entities that are eligible for participation in TARGET2 (but do not necessarily own a TARGET2 PM account). They are identified by a BIC11 in TIPS and hold TIPS Accounts, which cannot have a negative balance. They can manage CMBs linked to their own accounts as well as Instructing Party Privileges for Actors acting on behalf of themselves or of Reachable Parties defined as users of their accounts or CMBs. In addition, they can restrict the access rights of those Instructing Parties. They can also act as Instructing Parties.

Participants shall hold TIPS Accounts, which are opened by their responsible Central Bank and used to settle Instant payment transactions and Liquidity Transfers in TIPS.

### 3.1.4 Reachable Party

Reachable Parties are also identified by a BIC11, but they cannot hold TIPS Accounts and rely on a Participant's account to settle payments in TIPS. They can also act as Instructing Parties, which allows them to interact directly with TIPS. Participants can set CMBs on their accounts. CMBs represent credit limits defined for their individual customers (Reachable Parties). CMBs offer the possibility to define limit management flexibly on a TIPS Account, without dedicating liquidity exclusively for each single customer.

### 3.1.5 Instructing Party

The Privileges of **Instructing Party** allows an Actor to send (or receive) Instant Payments to (or from) TIPS. Participants and Reachable Parties can act as Instructing Parties. Third parties, not necessarily being a TIPS Participant or a Reachable Party, can act as Instructing Parties on behalf of other Participants or Reachable Parties, taking on a subset or the whole set of functionalities that are available to the Participant or Reachable Party granted them in terms of access rights.

## 3.2 TIPS Accounts and CMBs

This entity represents data related to accounts that are held in TIPS and can be credited or debited during the processing of Instant payment transactions or Liquidity Transfers. Accounts can only be deleted from

TIPS after their closing date and if their balance is zero. Once an Account is closed (i.e. its closing date has passed) only the responsible Central Bank can send instructions to modify its balance. If an Account is deleted while its balance is not zero, this deletion is rejected.

### **3.2.1 Types of Accounts**

Accounts are opened in TIPS for the provision of liquidity and the settlement of instant payments. There are two types of Accounts: TIPS Accounts and Transit Accounts.

#### **3.2.1.1 TIPS Account**

TIPS Accounts are accounts that are used by Participants for the settlement of Instant payment transactions and Liquidity Transfers. They cannot have a negative balance. Each TIPS Participant may own one or many TIPS Accounts and they may use them for their settlement activities or to give the possibility to settle to Reachable Parties or other Participants as well as authorising several BICs to operate on the account. They are maintained by Central Banks for their Participants.

#### **3.2.1.2 Transit Account**

Transit Accounts are accounts that are opened by and belong to Central Banks and they are used for liquidity transfers between RTGS and TIPS Accounts. Transit accounts can have a negative balance, but they are not usable for the settlement of Instant payment transactions. They are defined for carrying out the transfer of liquidity between the relevant RTGS system and TIPS. Only one transit account per settlement currency can exist in TIPS. The Transit Account for euro belongs to the European Central Bank.

### **3.2.2 Credit Memorandum Balance**

Credit Memorandum Balances (CMBs) represent a credit limit defined for a Reachable party in TIPS. Each CMB is linked to one TIPS Account, but each TIPS Account can have any number of CMBs, each representing a credit line for a Reachable party in TIPS. CMB identifiers are in the same ISO-compliant format as the ones used for TIPS accounts.

CMBs offer the possibility to define limit management flexibly on a TIPS Account, without dedicating liquidity exclusively for each single customer. Specifically, the sum of all CMB limits on a TIPS Account can be higher than the balance of the same Account at any time. A CMB can be defined without a limit. In this case, the related Reachable Party can make full use of the capacity of the related Account without any limitation.

TIPS continuously keeps track of the utilisation and available headroom for each CMB for which a limit is defined. Whenever an Instant payment transaction is settled against a given Originator or Beneficiary CMB, TIPS will debit/credit the TIPS Account and decrease/increase the relevant CMB headroom accordingly at the same time. It is possible for the headroom to exceed the limit as a result of crediting payments: in this case the utilisation will be negative.

If an Instant payment transaction exceeds the current CMB headroom for the Originator Participant, it is rejected. If a CMB headroom reaches zero, no more instant payments can be addressed to it until additional

funds are provided through an instant payment transaction. In other words, in order for a debiting instant payment transaction addressing a given CMB to settle, the amount to be debited must be lower or equal to the current CMB headroom as well as the current balance on the TIPS Account. The CMB limit can be modified independently as a reference data update, which leads to the headroom being recalculated accordingly.

For unlimited CMBs, the headroom must always be considered infinite and, conversely, the utilisation always zero. If a limit is set for a previously unlimited CMB, the headroom and utilisation are calculated starting from the moment the limit is set. In other words, the headroom is automatically set to the same value as the limit, while the utilisation remains zero. These values are then normally updated with each subsequent payment transaction and limit change as described above.

### 3.3 Users

A user in TIPS is an entity representing either a physical user or an application. They are linked to a single Actor and can be assigned different Privileges. They are identified by a DN used for authentication purposes. Both U2A and A2A Users are identified by a unique identifier which can never be assigned again to a different user.

A system user can be either a party administrator or a standard user. The party administrator is a special user that is able to assign Privileges to the other users of its party.

### 3.4 Privileges

Each individual action that can be undertaken in TIPS, such as instructing a payment or modifying a CMB, is defined as a TIPS Function. Access to TIPS Functions is regulated by Privileges, being in one-to-one association with them: given a Privilege, it is possible to uniquely determine which is the TIPS Function allowed.

This means that a user UX owns the access right to trigger a given TIPS user function FY if and only if UX was previously granted with the privilege PY identifying the capability to trigger FY.

The Privileges are grouped in a set of Roles; thus, each Role covers one or more TIPS functions. Roles are additive, meaning that the TIPS Functions that a User can access are equal to the sum of the Functions allowed by each Privilege. Each User is linked to one or more Roles. Authorisation for a User to carry out a specific action in TIPS is determined by the combination of the Roles assigned to the User and the TIPS Actor the User belongs to. For example, a User belonging to a certain Participant may be allowed to instruct instant payments (based on its assigned Roles). This means that the user will be able to instruct an instant payment on a TIPS Account belonging to that Participant, but not on an Account belonging to another Participant.

The set of objects on which a TIPS Actor can use different functions is known as their data scope and is not modifiable. The TIPS Operator users are granted with the entire pool of privileges. It is the TIPS Operator user who performs the initial configuration for Central Bank Parties. Privileges are propagated – grouped into Roles - to users of TIPS Actors by the Central Bank party administrators.

Not all Privileges can be assigned to all TIPS Actor types. For example, it is not possible for a Central Bank or a Participant to create or update Currencies.

### 3.4.1 Privileges

A TIPS Privilege represents the ability to access a given TIPS function. TIPS Privileges are set up and maintained by the TIPS Operator. They are assigned to Roles in the CRDM in order to create an organised set of access profiles to be granted to the Users.

### 3.4.2 Roles

They are assigned to Parties and Users for authorisation purposes. The Users are authorised to access the TIPS functionality related to the set of Privileges which are contained in the Role. CBs can configure specific roles to be granted to their own Participants and Reachable Parties, in order to grant them with proper access to functions. In turn, system administrators of Participants or Reachable Parties can use Roles granted by the relevant CB in order to assign proper access rights to their own system users.

Based on the granted set of Privileges, all system users are authorised to input their own Reference data objects and to access and maintain them, i.e. to create new objects or to update or delete already existing objects.

## 3.5 General reference data

Some reference data used in TIPS are maintained in the CRDM by the TIPS Operator.

### 3.5.1 Business Identifier Code

Each TIPS actor is identified with a 11-character Business Identifier Code (BIC11) which must be unique in TIPS. BICs in TIPS are normally based on the SWIFT BIC Directory but can be manually inserted, modified and deleted by the TIPS Operator in contingency situations.

### 3.5.2 Currency

The TIPS Operator is responsible for maintaining the data of all the currencies that are available for settlement in TIPS. They are defined using ISO-compliant codes. Currency data includes the maximum number of decimal positions that can be accepted in a TIPS payment instruction in a given currency.

### 3.5.3 RTGS System

The TIPS Operator is responsible for listing all the RTGS systems that interact with TIPS, along with the respective currency, status (i.e. whether they are open and ready to receive liquidity transfers or not), distinguished name and business date. This distinguished name is used by the RTGS to send any messages or queries to TIPS (e.g. to manage the transfer of liquidity from the RTGS to TIPS and to query the balances of the TIPS accounts linked to the RTGS account).

The status and the business date are updated automatically upon receiving a camt.019 message from the relevant RTGS system and can be modified manually by the TIPS Operator in contingency situations.

### 3.5.4 System parameters

The system parameters are configured by the TIPS Operator in the CRDM and propagated to TIPS once a day. They include the Retention Period, the SCTinst Timestamp Timeout, the Originator side Offset, the Beneficiary side Offset, the Sweeping Timeout, the Maximum Amount, the Acceptable Future Time Window, the Investigation Offset and the RTGS Alert. Please refer to the UDFS section 1.7.1 Service configuration for a detailed description.

## 4 Screen Reference Guide

The TIPS Graphical User Interface provides the TIPS user with a number of U2A functions that must be available on a 24/7/365 basis. The GUI will be typically used to perform changes to local reference data that need to have immediate effect and to query the status of the accounts and the CMBs.

Within TIPS, local reference data maintenance instructions submitted in U2A mode can be triggered either in 2-Eyes or in 4-Eyes mode. In the second case, a final approval from a different user is required before the change comes into effect. When a 4-Eyes instruction is submitted, it is provisionally validated and put on hold until a second user, different from the initial submitter, confirms or revokes it. If the instruction is confirmed, it is submitted to TIPS as any other local reference data management instruction.

<b>Context of Usage</b>	The context of usage explains what a screen displays, what you can do with the screen and which special features are available for the screen, for example the need for confirmation in 4-eyes mode or usage restrictions.
<b>Screen Access</b>	The screen access lists all possible ways to access the screen. This includes navigation via the menu and navigation via other screens.
<b>Privileges</b>	The Privileges segment lists all necessary Privileges to access the screens and to use its functions. First, the Privileges to access a screen are mentioned, followed by the Privileges that are necessary to use all functions on the screen.
<b>Screenshot</b>	You can use the screenshot as orientation for your work with the UHB. All screenshots are based on the maximum of access rights, so deviations are possible if you do not own all privileges which are necessary to use the screen in its full extent. In addition, deviations between the screenshot and the field/button description are possible in the case of mutually exclusive functions and based on a specific selection you have made. Values shown on the screenshot might also deviate from the default values indicated in the description.
<b>Field description</b>	The field description provides all the relevant information related to the respective field name. It is structured in table format with a separate table for each frame. Sub-frames are indicated by subsection headings in the table. The following table explains the structure of a field description.

**Table 1 – Example of a Field description**

Query Account balance and status: Results	
TIPS Participant Identifier	Shows the BIC of the party which sent the transaction
Account Identifier	Shows the ID of the Account
Account status	Shows whether the Account is blocked for credit, blocked for debit, blocked for credit and debit, unblocked
Currency	Shows the currency under which the Account is denominated
Timestamp of the reported balance	Shows the timestamp at which the data was retrieved
Current Account balance	Shows the sum of unreserved and reserved balances

Position no.	Element	Description
1	Field name	Indicates the respective name of each screen field
2	Frame name	indicates the respective name of each screen frame.
3	Field description	indicates the field type and required content

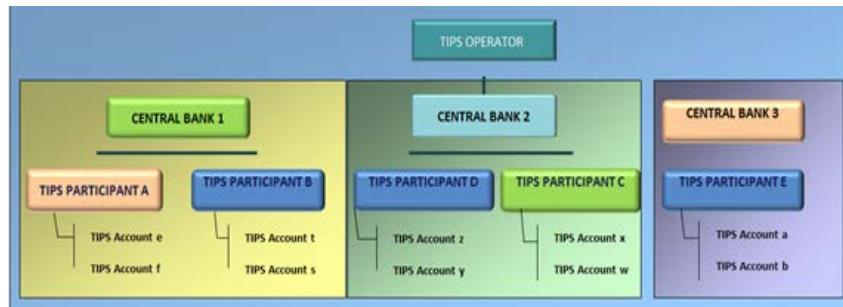
## 4.1 Queries

The Queries component provides the user with real-time information on production data (e.g. limit utilisation, account balances). The queries are available during the operating hours of the TIPS service, i.e. 24/7/365 and they are not queued but processed immediately, using the most recent data available in the system.

Each query may be available in A2A mode and/or U2A mode. The Queries component generates A2A queries as XML messages and in compliance with the ISO 20022 standard, where applicable.

The Queries component provides different users with a different scope of data, depending on their access profiles. While Central banks have access to all accounts in their books (and subsequently to all transactions on these accounts) Participants can only access their own accounts. Access for Instructing parties is even further restricted to those accounts which they are permitted to instruct or on transactions they have submitted. If a party does not have access to the underlying data the query returns an error code. The TIPS Operator has access to all the Accounts, CMBs and transactions data in TIPS.

**Figure 3 – TIPS hierarchy model**



## 4.1.1 Query Account balance and Status

The Account balance and status query allows the authorised actor to get detailed information for one account. TIPS does not foresee the usage of wildcards, therefore only one account per search can be retrieved.

### 4.1.1.1 Query account balance and status – Search/display screen

**Context of Usage** This screen contains the ID of the Account as the only available search field. By inputting the relevant data, you can search the detailed information on the balance and the status of the Account. Account data, which will appear in the lower part of the screen, can only be viewed by users of the Account Owner, the relevant Central Bank which created and maintains it and the relevant Instructing Party, if granted the necessary privileges to instruct using this Account. In case the user is not entitled to view the data on the searched Account an error code is returned.

**Screen Access**  Queries >> Account balance and status

**Privileges** To use this screen, you need the following Privileges:  
 TIP\_Query

#### Screenshot



#### Field description

Query Account balance and status: Search Criteria	
Object	Required Format
TIPS Account number	max. 34 characters (SWIFT-x)

#### Buttons

Search	This function enables the user to retrieve the information on the selected Account
--------	--

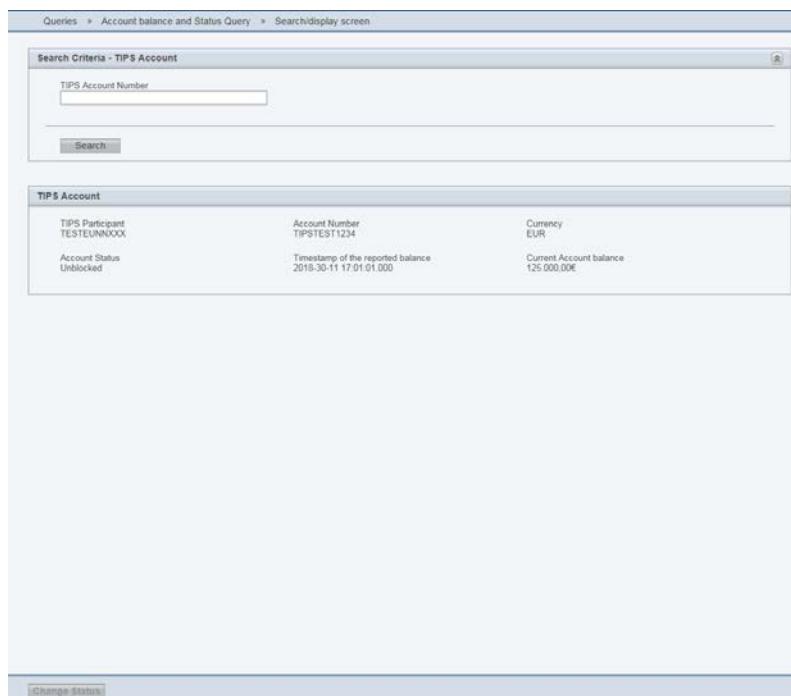
### 4.1.1.2 Query account balance and status – Details screen

**Context of Usage** The lower part of the screen displays detailed information on the balance and the status of the Account. In case the user is not entitled to view the data on the searched Account an error code is returned. The Change Status button is not available since the screen was not reached through the Account Blocking submenu.

**Screen Access**  Queries >> Account balance and status Query >>Details screen >> Click on the Search button

**Privileges** To use this screen, you need the following Privileges:  
 TIP\_Query

## Screenshot



Query Account balance and status: Results	
TIPS Participant	Shows the BIC of the party which owns the Account
Account Number	Shows the ID of the Account
Currency	Shows the currency under which the Account is denominated
Account status	Shows whether the Account is blocked for credit, blocked for debit, blocked for credit and debit, unblocked
Timestamp of the reported balance	Shows the timestamp at which the data was retrieved. Displayed format is: DD-MM-YYYY hh:mm:ss;ususususus
Current Account balance	Shows the sum of unreserved and reserved balances

### 4.1.2 Query CMB limit and Status

The CMB limit and status query allows the authorised actor to get the detailed information for one CMB. TIPS does not foresee the usage of wildcards, therefore only one CMB per search can be retrieved.

#### 4.1.2.1 Query CMB limit and status – Search screen

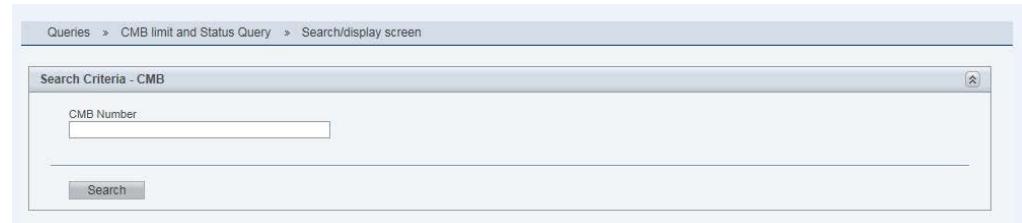
Context of Usage	This screen contains the ID of the CMB as the only available search field. By inputting the relevant data, you can search the detailed information on the limit utilisation and the status of the CMB. CMB data, which will appear in the lower part of the screen, can only be viewed by users of the Account Owner, the relevant Central Bank which created and maintains it and the relevant Instructing Party, if granted the necessary privileges to instruct using this Account. In case the user is not entitled to view the data
------------------	--

on the searched CMB an error code is returned.

**Screen Access**     | Queries >>CMB limit and status Query

**Privileges**     To use this screen, you need the following Privileges:  
| TIP\_Query

**Screenshot**



Query Account balance and status: Search criteria	
Object	Required Format
CMB number	max. 34 characters (SWIFT-x)

Buttons	
Search	This function enables the user to retrieve the information on the selected CMB

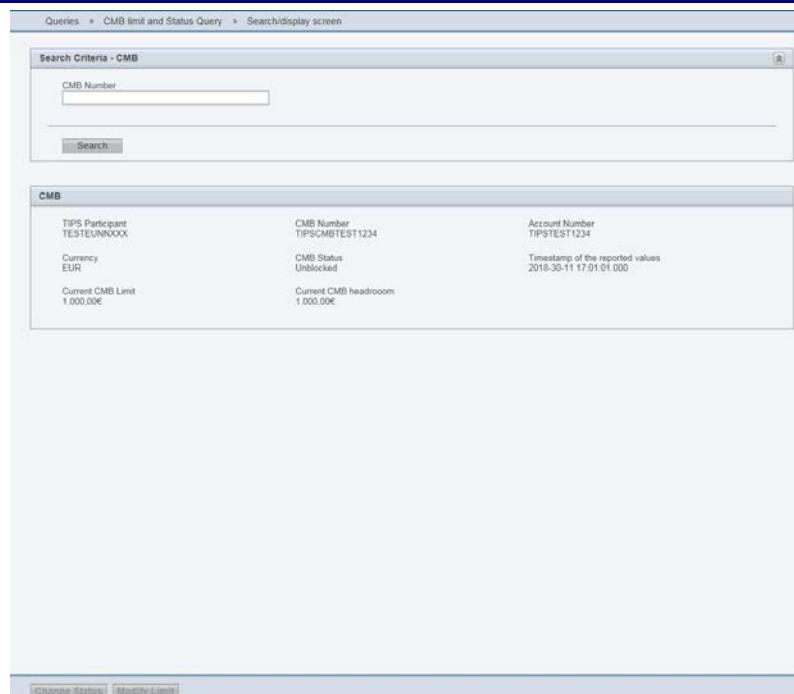
#### 4.1.2.2 Query CMB limit and status – Details screen

**Context of Usage**     This screen displays detailed information on the balance and the status of the CMB. Data can only be viewed by users of the Account Owner, the relevant Central Bank which created and maintains it and the relevant Instructing Party, if granted the necessary privileges to instruct using this CMB. This function is available in both U2A and A2A mode.  
In case the user is not entitled to view the data on the searched CMB an error code is returned. The Change Status and the Modify Limit buttons are not available since the screen was not reached through the CMB Blocking submenu or the Limit Modification submenu.

**Screen Access**     | Queries >>CMB limit and status Query >> search/list screen >> Click on the Search button

**Privileges**     To use this screen, you need the following Privileges:  
| TIP\_Query

## Screenshot



The screenshot shows the 'Search Criteria - CMB' section with a 'CMB Number' input field containing 'TIPSCMBTEST1234' and a 'Search' button. Below this, the 'CMB' results table displays the following data:

TIPS Participant	CMB Number	Account Number
TESTEUNXXXX	TIPSCMBTEST1234	TIPSTEST1234
Currency	CMB Status	Timestamp of the reported values
EUR	Unblocked	2018-08-11 17:01:00
Current CMB Limit	Current CMB headroom	
1.000.00€	1.000.00€	

At the bottom, there are 'Change Status' and 'Modify Limit' buttons.

## Field description

Query CMB Limit and status: Results	
TIPS participant	Shows the BIC of the CMB user
CMB Number	Shows the ID of the CMB, which is unique in TIPS
Account Number	Shows the ID of the Account to which the CMB is linked
Currency	Shows the currency under which the CMB is denominated
CMB status	Shows whether the CMB is blocked for credit, blocked for debit, blocked for debit and credit, unblocked
Timestamp of the reported values	Shows the timestamp at which the data was retrieved. Displayed format is: DD-MM-YYYY hh:mm:ss:μsμsμsμs
Current CMB limit	Shows the maximum amount of liquidity reserved that can be used for settlement of Instant Payments attempting to debit the selected CMB
Current CMB Headroom	Shows the amount of liquidity still available for Instant Payments debiting the selected CMB

## 4.2 Blocking

Due to the level of criticality entailed in the blocking of a TIPS Actor, Account or CMB, the function is made available in TIPS in real-time and on a 24/7 basis. These changes in the configuration of the said Reference Data objects are done using the same input stream of the instant payments.

### 4.2.1 Participant Blocking

The Actor can be blocked for crediting and/or debiting directly in TIPS and the relevant data changes will be taken into account in real-time on a 24/7 basis. These operations are carried out by authorised users directly in TIPS via the TIPS interface (available 24 hours a day) and processed in the same flow as instant payment instructions. The operations can be carried out by an authorised user of the Central Bank of the TIPS

Participant holding the relevant Account or by an authorised user of the TIPS Operator (only in contingency situations).

Blocking a TIPS Participant for debiting/crediting results in an equivalent blocking on all Accounts owned by that Participant and all the CMBs linked to those Accounts. The individual Account and CMB blocking status is not overwritten. When crediting or debiting a TIPS Account, TIPS also checks the Owner Participant blocking status. If this Participant is blocked, the whole payment operation is rejected. Unblocking the TIPS Participant means that all of its Accounts and CMBs revert back to their individual blocking status.

Blocking/Unblocking status are also available, with non-immediate effect, in the CRDM; any change that is propagated from the CRDM to TIPS does not overwrite these values if they have been changed within TIPS via an immediate change.

The possible values that an Actor can assume are:

- Unblocked
- Blocked for debiting
- Blocked for crediting
- Blocked for crediting/debiting

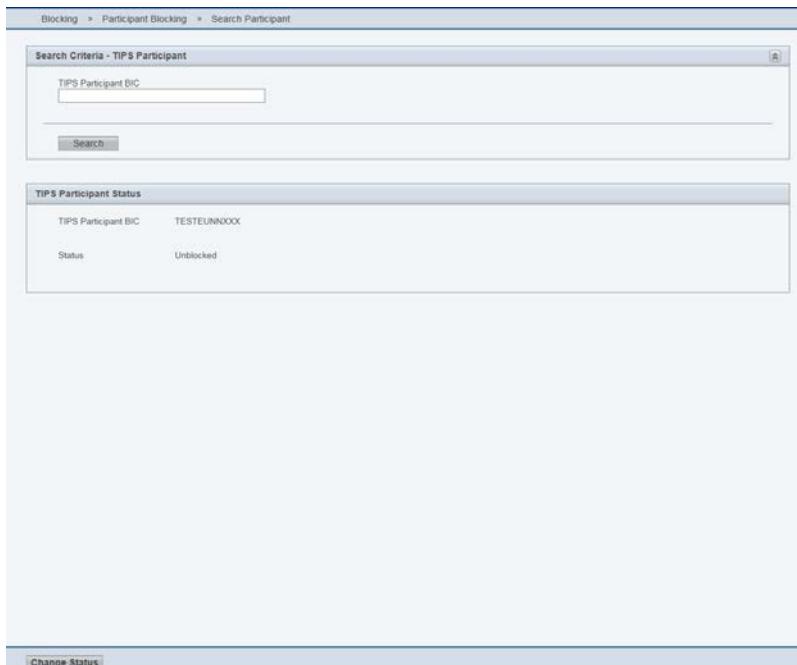
#### 4.2.1.1 Participant Blocking – Search>List Screen

**Context of Usage** This screen contains the BIC of the Participant whose Blocking status has to be changed as the only available search field. Participant data can only be viewed by the relevant Central Bank which created and maintains it. In case the Actor is not entitled to view the data an error code is returned. This function is available in both U2A and A2A mode.

**Screen Access**  Blocking >> Participant Blocking >> Search>List screen  
>> Click on the search button >>

**Privileges** To use this screen, you need the following Privileges:  
 **TIP\_Query**  
 **TIP\_ModifyAllBlocking**

#### Screenshot



TIPS Participant Status	
TIPS Participant BIC	TESTEUNNDOOK
Status	Unblocked

Field description	Participant Blocking: Search criteria	
	Object	Required Format
	TIPS Participant BIC	BIC11

Participant Blocking: List	
TIPS Participant BIC	Shows the BIC of the Party whose Blocking status the user is checking
Status	Shows the blocking status of the TIPS Participant. Possible values are: Unblocked, Blocked for Debiting, Blocked for Crediting, Blocked for Crediting/Debiting

**Buttons**

Search	This function enables the user to Search the Blocking status of the selected Participant
Change Status	This function enables to access the Change Status screen where to create or modify the Blocking status of the Participant

#### 4.2.1.2 Participant Blocking – Change Status Screen

**Context of Usage** This screen contains a number of fields regarding the Actor Blocking. You can enter a blocking status, modify an existing blocking status or remove an existing blocking status. You can use this screen either in 2-eyes or in 4-eyes mode. This function is available in both U2A and A2A mode. In case the Actor is not entitled to view the data on the searched Participant an error code is returned.

**Screen Access**

- I Blocking >> Participant Blocking
- >> Click on the New button >>

**Privileges** To use this screen, you need the following Privileges:

- I TIP\_ModifyAllBlocking

**Screenshot**



**Field description**

TIPS Participant blocking: List	
Object	Description
TIPS Participant BIC	Shows the BIC of the Party whose Blocking status the user is modifying
Current status	Shows the current blocking status of the TIPS Participant.

**New Status** Drop-down menu where to choose the new value of the Blocking status. Possible values are: Unblocked, Blocked for Debiting, Blocked for Crediting, Blocked for Crediting/Debiting. In case the actor chooses a New Status that is identical to the Current status, an error message appears

**Buttons**

Submit	This function enables the user to Submit the desired Blocking status for the TIPS Participant. Upon clicking on the submit button you will be asked to enter your PIN for

	digital signature purposes (NRO). With the entry of the PIN, TIPS attaches a digital signature to the instruction entered by the TIPS actor
Cancel	This function enables you to cancel the process and return to the previous screen

## 4.2.2 Account Blocking

The Account can be blocked for crediting and/or debiting directly in TIPS and the relevant data changes will be taken into account in real-time on a 24/7 basis. These operations are carried out by authorised users directly in TIPS via the TIPS interface (available 24 hours a day) and processed in the same flow as instant payment instructions. The operations can be carried out by an authorised user of the Central Bank of the TIPS Actor holding the relevant Account or by an authorised user of the TIPS Operator (only in contingency situations).

Blocking/Unblocking status are also available, with non-immediate effect, in the CRDM; any change that is propagated from the CRDM to TIPS does not overwrite these values if they have been changed within TIPS via an immediate change.

The possible values that an Account can assume are:

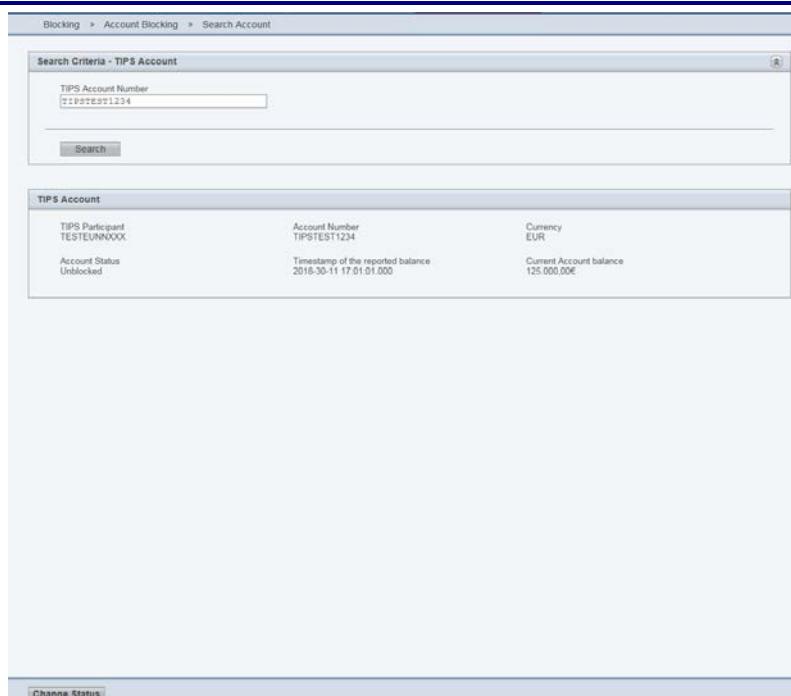
- Unblocked
- Blocked for debiting
- Blocked for crediting
- Blocked for crediting/debiting

The blocking status of an Account is not taken into account in case the Party holding the Account is blocked. Only once the TIPS Party is unblocked the blocking status of the related Account is taken into consideration. Blocking a TIPS Account for debiting/crediting results in an equivalent blocking on all CMBs linked to that Account. The individual CMB blocking status is not overwritten. When crediting or debiting a CMB, TIPS also credits or debits the related account. If this account is blocked, the whole payment operation is rejected. Unblocking the TIPS Account means that all linked CMBs revert back to their individual blocking status.

### 4.2.2.1 Account Blocking – Search Screen

<b>Context of Usage</b>	This screen contains the ID of the TIPS Account whose Blocking status has to be changed as the only available search field. Account data can only be viewed by the relevant Central Bank which created and maintains it. In case the Actor is not entitled to view the data an error code is returned. This function is available in both U2A and A2A mode.
<b>Screen Access</b>	<ul style="list-style-type: none"> <li>■ Blocking &gt;&gt; TIPS Account Blocking &gt;&gt; Search/List screen</li> <li>&gt;&gt; Click on the search button &gt;&gt;</li> </ul>
<b>Privileges</b>	To use this screen, you need the following Privileges: <ul style="list-style-type: none"> <li>■ TIP_Query</li> <li>■ TIP_ModifyAllBlocking</li> </ul>

## Screenshot



### Field description

Account Blocking: Search criteria	
Object	Required Format
TIPS Account Number	max. 34 characters (SWIFT-x)

Account Blocking: List	
TIPS Participant	Shows the BIC of the party which owns the Account
Account Number	Shows the ID of the Account whose Blocking status the user is checking
Currency	Shows the currency under which the Account is denominated
Account Status	Shows the blocking status of the TIPS Account. Possible values are: Unblocked, Blocked for Debiting, Blocked for Crediting, Blocked for Crediting/Debiting
Timestamp of the reported balance	Shows the timestamp at which the data was retrieved. Displayed format is: DD-MM-YYYY hh:mm:ss:ususususus
Current Account Balance	Shows the sum of unreserved and reserved balances

### Buttons

Search	This function enables the user to Search the Blocking status of the selected TIPS Account
Change Status	This function enables to access the Change Status screen where to create or modify the Blocking status of the TIPS Account

### 4.2.2.2 Account Blocking – Change Status Screen

**Context of Usage** This screen contains a number of fields regarding the TIPS Account Blocking. You can enter a blocking status, modify an existing blocking status or delete an existing blocking status. You can use this screen either in 2-eyes or in 4-eyes mode. This function is available in both U2A and A2A mode. In case the Actor is not entitled to view the data on

the searched Account an error code is returned.

**Screen Access**    | Blocking >> TIPS Account Blocking  
>> Click on the New button >>

**Privileges**    To use this screen, you need the following Privileges:  
| TIP\_ModifyAllBlocking

#### Screenshot



The screenshot shows a web-based application for managing TIPS account blocking. The URL in the address bar is "Blocking > Account Blocking > Change Status". The main content area is titled "TIPS Account Status" and displays the following information:

TIPS Account Number	TIPSTEST1234
Current status	Unblocked
New status	<input type="text" value="Blocked for Crediting/Debiting"/>

At the bottom of the form are two buttons: "Submit" and "Cancel".

#### Field description

TIPS Account Blocking: List	
Object	Description
TIPS Account Number	Shows the ID of the Account whose Blocking status the user is modifying
Current status	Shows the current blocking status of the TIPS Account.
New Status	Drop-down menu where to choose the new value of the Blocking status. Possible values are: Unblocked, Blocked for Debiting, Blocked for Crediting, Blocked for Crediting/Debiting. In case the actor chooses a New Status that is identical to the Current status, an error message appears

#### Buttons

Buttons	
Submit	This function enables the user to Submit the desired Blocking status for the TIPS Account. Upon clicking on the submit button you will be asked to enter your PIN for digital signature purposes (NRO). With the entry of the PIN, TIPS attaches a digital signature to the instruction entered by the TIPS actor
Cancel	This function enables you to cancel the process and return to the previous screen

### 4.2.3 CMB Blocking

The CMB can be blocked for crediting and/or debiting directly in TIPS and the relevant data changes will be taken into account in real-time on a 24/7 basis. These operations are carried out by authorised users directly in TIPS via the TIPS interface (available 24 hours a day) and processed in the same flow as instant payment instructions. The operations can be carried out by an authorised user of the Central Bank of the TIPS Actor holding the relevant Account, by an authorised user of the TIPS Actor holding the Account or by an authorised user of the TIPS Operator (only in contingency situations).

Blocking/Unblocking status are also available, with non-immediate effect, in the CRDM; any change that is propagated from the CRDM to TIPS does not overwrite these values if they have been changed within TIPS via an immediate change.

The possible values that a CMB can assume are:

- Unblocked
- Blocked for debiting
- Blocked for crediting

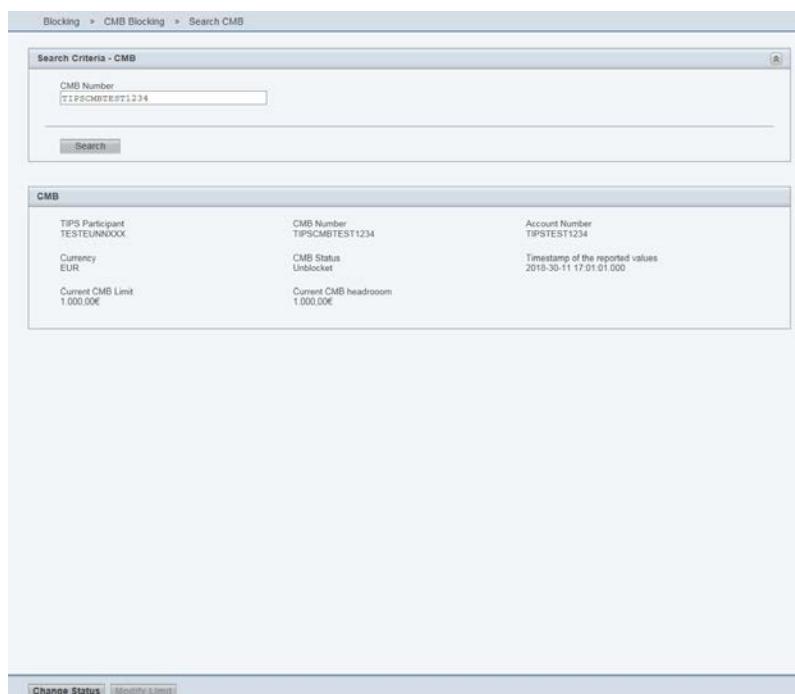
- Blocked for crediting/debiting

The blocking status of a CMB is not taken into account in case the relevant Account or the Party holding the Account are blocked. Only once the TIPS Actor and the TIPS Account are unblocked the blocking status of the related CMBs is taken into consideration.

#### 4.2.3.1 CMB Blocking – Search screen

<b>Context of Usage</b>	This screen contains the ID of the CMB whose Blocking status has to be changed as the only available search field. In case the Actor is not entitled to view the data an error code is returned. This function is available in both U2A and A2A mode. The Modify Limit button is not available because the screen was not accessed through the CMB Limit Modification submenu
<b>Screen Access</b>	<ul style="list-style-type: none"> <li>■ Blocking &gt;&gt; CMB Blocking &gt;&gt; Search&gt;List screen</li> <li>&gt;&gt; Click on the search button &gt;&gt;</li> </ul>
<b>Privileges</b>	To use this screen, you need the following Privileges: <ul style="list-style-type: none"> <li>■ TIP_Query</li> <li>■ TIP_ModifyCMBBlocking</li> </ul>

#### Screenshot



CMB			
TIPS Participant TESTEUNIBOX	CMB Number TIPSCMBTEST1234	Account Number TIPSTEST1234	Timestamp of the reported values 2018-30-11 17:01:01.000
Currency EUR	CMB Status Unblock	Current CMB headroom 1.000.00€	
Current CMB Limit 1.000.00€			

CMB Blocking: Search criteria	
Object	Required Format
CMB Number	max. 34 characters (SWIFT-x)
CMB Blocking: List	
TIPS participant	Shows the BIC of the CMB user
CMB Number	Shows the ID of the CMB whose Blocking status the user is checking
Account Number	Shows the ID of the Account to which the CMB is linked
Currency	Shows the currency under which the CMB is denominated
CMB Status	Shows the blocking status of the CMB.

	Possible values are: Unblocked, Blocked for Debiting, Blocked for Crediting, Blocked for Crediting/Debiting
Timestamp of the reported values	Shows the timestamp at which the data was retrieved. Displayed format is: DD-MM-YYYY hh:mm:ss.ususususus
Current CMB limit	Shows the maximum amount of liquidity reserved that can be used for settlement of Instant Payments attempting to debit the selected CMB
Current CMB Headroom	Shows the amount of liquidity still available for Instant Payments debiting the selected CMB

**Buttons**

Search	This function enables the user to Search the Blocking status of the selected CMB
Change Status	This function enables to access the Change Status where to create or modify the Blocking status of the CMB

#### 4.2.3.2 CMB Blocking – Change Status Screen

**Context of Usage** This screen contains a number of fields regarding the CMB Blocking. You can enter a blocking status, modify an existing blocking status or delete an existing blocking status. You can use this screen either in 2-eyes or in 4-eyes mode. This function is available in both U2A and A2A mode. In case the Actor is not entitled to view the data on the searched CMB an error code is returned.

**Screen Access** **I** Blocking >> CMB Blocking  
>> Click on the New button >>

**Privileges** To use this screen, you need the following Privileges:  
**I** TIP\_ModifyCMBBlocking

**Screenshot**



CMB Status			
CMB Number	TIPSCMBTEST1234		
Current status	Unblocked	New status	<input checked="" type="checkbox"/> Blocked for Crediting/Debiting
<input type="button" value="Submit"/> <input type="button" value="Cancel"/>			

**Field description**

<b>CMB Blocking: List</b>	
<b>Object</b>	<b>Description</b>
CMB Number	Shows the ID of the CMB whose Blocking status the user is modifying
Current status	Shows the current blocking status of the TIPS CMB.
New Status	Drop-down menu where to choose the new value of the Blocking status. Possible values are: Unblocked, Blocked for Debiting, Blocked for Crediting, Blocked for Crediting/Debiting. In case the actor chooses a New Status that is identical to the Current status, an error message appears

## Buttons

Buttons	
Submit	This function enables the user to Submit the desired Blocking status for the CMB. Upon clicking on the submit button you will be asked to enter your PIN for digital signature purposes (NRO). With the entry of the PIN, TIPS attaches a digital signature to the instruction entered by the TIPS actor
Cancel	This function enables you to cancel the process and return to the previous screen.

## 4.3 Limit management

The limit is the maximum amount of liquidity available for a CMB. It is the sum of the utilisation (amount of cash used for that CMB) and the headroom (amount of cash still available for that CMB). It can be modified at all times directly in TIPS.

A CMB can be defined without a limit. In this case, it is possible to make full use of the capacity of the related Account without any limitation. For unlimited CMBs, the headroom must always be considered infinite and, conversely, the utilisation always zero.

CMBs offer the possibility to define limit management flexibly on a TIPS Account without dedicating liquidity exclusively for each single customer. Specifically, the sum of all CMB limits on a TIPS Account can be higher than the balance of the same Account at any time.

The CMB limit can be modified independently as a reference data update directly in TIPS (although the service is available also on the CRDM), which leads to the headroom being recalculated accordingly.

If a limit is set for a previously unlimited CMB, the headroom and utilisation are calculated starting from the moment the limit is set. In other words, the headroom is automatically set to the same value as the limit, while the utilisation remains zero. These values are then normally updated with each subsequent payment transaction and limit change.

When a CMB limit is modified, the headroom and utilisation are updated accordingly. It is possible that a change in a limit leads the headroom to become negative, after which the CMB will only accept instant payments in credit until the headroom is again more than zero.

The increase and reduction of a CMB limit has no effect on the values of the other possible CMB limits linked with the same TIPS Account.

### 4.3.1 CMB Limit modification

The limit is the only other CMB feature, together with the blocking feature, that can be modified in A2A and U2A mode directly in TIPS.

The new limit is immediately taken into consideration after it is set, i.e. the headroom and the utilisation are calculated starting from the moment the limit is modified.

The limit can be modified directly in TIPS and the relevant data changes will be taken into account in real-time on a 24/7 basis. These operations are carried out by authorised users directly in TIPS and processed in the same flow as instant payment instructions. The operations can be carried out by the Central Bank of the

TIPS Actor holding the relevant Account, by the TIPS Actor holding the Account, by an Instructing Party authorised by the TIPS Actor holding the account or by the TIPS Operator (only in contingency situations). Limit update is also available, with non-immediate effect, in the CRDM.

#### 4.3.1.1 CMB Limit Modification – Search screen

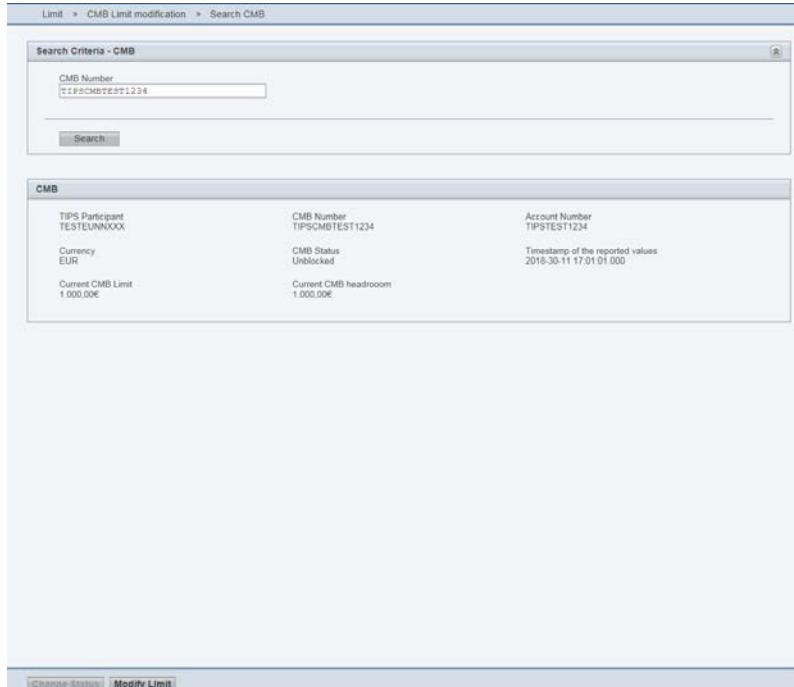
**Context of Usage** This screen contains the ID of the CMB as the only available search field. By inputting the relevant data, you can add, modify or delete the limit of the searched CMB. CMB data can only be viewed by the Account Owner, the relevant Central Bank which created and maintains it and the relevant Instructing Party, if granted the necessary privileges to instruct. The lower part of the screen shows detailed information about the CMB. In case the Actor is not entitled to view the data on the searched CMB limit an error code is returned. The Change Status button is not available because the screen was not accessed through the CMB Blocking submenu

**Screen Access**

- | Limit >> CMB Limit modification >> Search screen
- >> Click on the search button >>
- >> Click on the Modify Limit button

**Privileges** To use this screen, you need the following Privileges:  
**| TIP\_Query | TIP\_AdjustCMBLimit**

#### Screenshot



**Field description**

CMB Limit Modification: Search criteria	
Object	Required Format
CMB Number	max. 34 characters (SWIFT-x)

**Field description**

CMB Limit Modification: List results	
Object	Description
TIPS Participant	Shows the BIC of the CMB user
CMB Number	Shows the ID of the CMB, which is unique in

	TIPS and whose Limit the user wants to create or update
Account Number	Shows the ID of the Account to which the CMB is linked
Currency	Shows the currency under which the CMB is denominated
CMB status	Shows whether the CMB is blocked for credit, blocked for debit, blocked for debit and credit, unblocked
Timestamp of the reported values	Shows the timestamp at which the data was retrieved. Displayed format is: DD-MM-YYYY hh:mm:ss:μsμsμsμs
Current CMB Limit	Shows the maximum amount of liquidity reserved that can be used for settlement of Instant Payments attempting to debit the selected CMB
Current CMB Headroom	Shows the amount of liquidity still available for Instant Payments debiting the selected CMB

#### Buttons

Buttons	
Search	This function enables to access the lower part of the screen where to view the CMB details
Modify Limit	This function enables to access the Modify Limit screen where to create/update the Limit

#### 4.3.1.2 CMB Limit Modification – Modify Limit screen

**Context of Usage** This screen contains a number of fields regarding the CMB Limit. You can enter a new Limit or modify an existing Limit. TIPS shall allow the Account Owner to modify the Limit of a CMB. You can use this screen either in 2-eyes or in 4-eyes mode. This function is available in both U2A and A2A mode.

In case the Actor is not entitled to view the data on the searched CMB Limit an error code is returned.

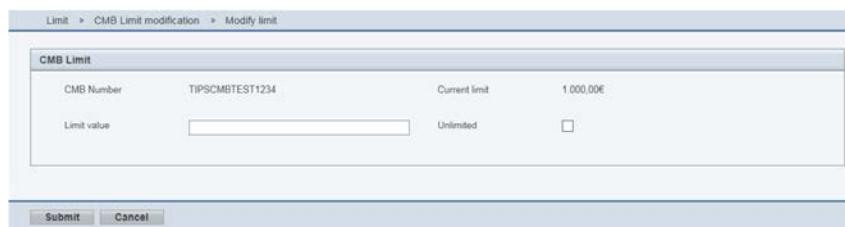
**Screen Access**

- I Limit >> Modify Limit
- >> Click on the search and/or details button >>
- >> Click on the Modify Limit button

**Privileges** To use this screen, you need the following Privileges:

- I TIP\_AdjustCMBLimit

#### Screenshot



CMB Limit			
CMB Number	TIPSCMBTEST1234	Current limit	1.000,00€
Limit value	<input type="text"/>	Unlimited	<input type="checkbox"/>

Submit Cancel

#### Field description

CMB Limit Modification: Search criteria	
Object	Description
CMB Number	Shows the ID of the CMB, which is unique in TIPS and whose Limit the user wants to

	create or update
Current Limit	Shows the current Limit of the TIPS CMB
Limit Value	Field where to enter the amount of the Limit for the CMB. Leaving the value blank means that the CMB will have no limit. In case the actor inserts a Limit that is identical to the Current Limit, an error message appears
Unlimited value	Radio button to fill with a checkmark in case the user wants to set the Limit value of the CMB to Unlimited. In case the Current limit is already unlimited this button is not available

#### Buttons

Buttons	
Submit	This function enables to create or modify a CMB Limit according to the information entered. Upon clicking on the submit button you will be asked to enter your PIN for digital signature purposes (NRO). With the entry of the PIN, TIPS attaches a digital signature to the instruction entered by the TIPS actor
Cancel	This function enables you to cancel the process and return to the previous screen.

## 4.4 Liquidity Transfer

TIPS supports Central Bank Money transfers between accounts denominated in the same currency from TIPS to an RTGS System (Outbound) or vice versa from an RTGS System to TIPS (Inbound).

The Outbound Liquidity Transfer functionality can be triggered in A2A and in U2A via a dedicated TIPS GUI screen and it is executed immediately. The process foresees that an authorised entity, e.g. a TIPS Participant, Instructing Party or Central Bank acting on behalf, triggers an Outbound Liquidity Transfer order towards the corresponding RTGS System, in the form of a Liquidity Transfer message. A target RTGS Account must be specified. No reservation of funds occurs in this scenario and settlement takes place immediately.

### 4.4.1 Liquidity Transfer functionality

This section describes the processing of an Outbound Liquidity Transfer order sent by a Central Bank, a Participant or an Instructing Party acting on behalf of the Participant in order to transfer liquidity from a TIPS Account to an RTGS Account. Central Banks shall be able to initiate an Outbound Liquidity Transfer even if the closing date of the TIPS Account is exceeded and regardless of the TIPS account's blocking status.

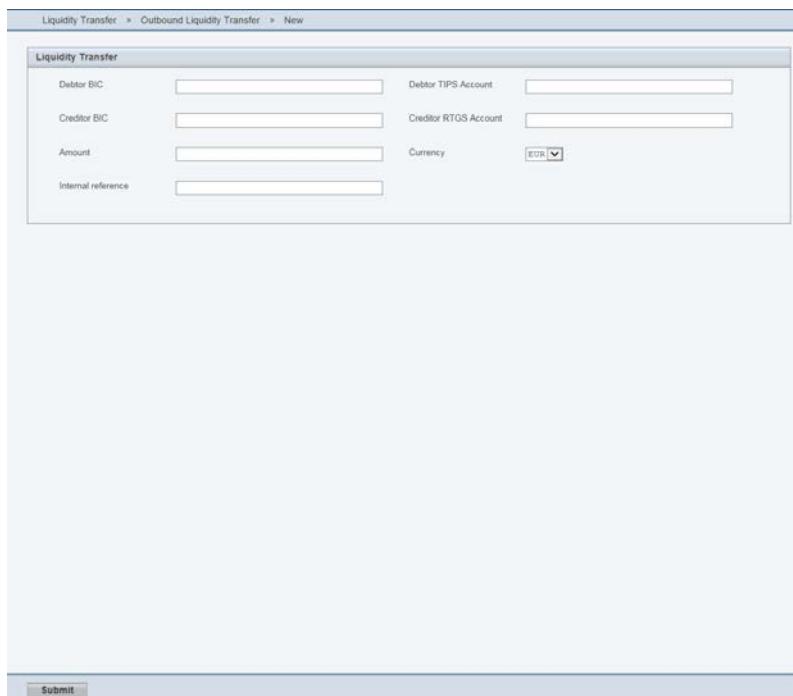
#### 4.4.1.1 Outbound Liquidity Transfer - New screen

**Context of Usage** This screen contains a number of fields regarding immediate liquidity transfers. You can enter data to create a new outbound liquidity transfer. TIPS shall allow the TIPS Participant which is the owner of the TIPS Account to be debited or the Instructing Party (if granted the necessary privileges to instruct) or the relevant Central Bank to trigger this function. You can use this screen either in 2-eyes or in 4-eyes mode. This function is available in both U2A and A2A mode. In case the Actor is not entitled to launch the Outbound Liquidity Transfer an error code is returned.

**Screen Access**     I Outbound Liquidity transfer >> New screen  
                        >> Click on the Submit button >>

**Privileges** To use this screen, you need the following Privileges:  
**I TIP\_LiquidityTransfer**

**Screenshot**



Outbound Liquidity Transfer: Search criteria	
Object	Required Format
Debtor BIC	Field where to enter the BIC11 of the owner of the TIPS Account to be debited. Format is BIC11
Debtor TIPS Account	Field where to enter the TIPS Account to be debited. Format is max. 34 characters (SWIFT-x)
Creditor BIC	Field where to enter the BIC11 of the owner of the RTGS Account to be credited. Format is BIC11
Creditor RTGS Account	Field where to enter the RTGS Account to be credited. Format is max. 34 characters (SWIFT-x)
Amount	Field where to enter the amount to be transferred with the Liquidity Transfer. Format is max. 18 digit(s) including decimal points (thereof max. 5 decimal places)
Currency	Field where to enter the currency used for the amount of the Liquidity Transfer. It has to be the same as the currency of the Debtor and the Creditor Accounts. Required format is 3 characters (SWIFT-x)
Internal reference	End to end identifier for the requested credit transfer. Format is max. 16 characters (SWIFT-x)

Buttons	
Submit	This function enables to Inject the Outbound Liquidity Transfer according to the information entered. Upon clicking on the submit button you will be asked to enter your PIN for digital signature purposes (NRO). With the entry of the PIN, TIPS attaches a digital signature to

	the instruction entered by the TIPS actor
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## 4.5 Task List

### 4.5.1 Task List functionality

#### 4.5.1.1 Task List – Search>List Screen

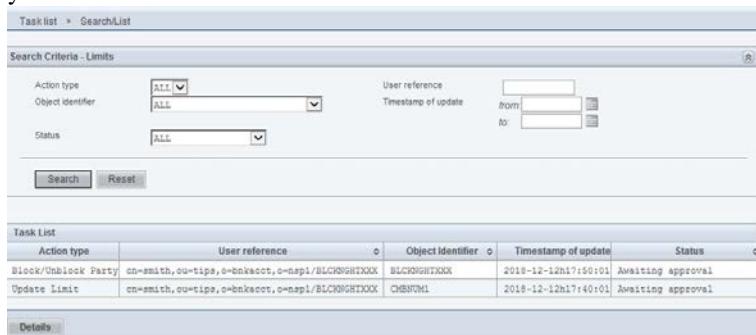
**Context of Usage** This screen contains the Action type and the 4-Eyes identification to be used together as the only available search fields. You can use this screen to find the item waiting for approval and then approve or revoke it. In case the Actor is not entitled to view the data on the searched transaction an error code is returned. The 4-Eyes functionality is available for the following functions: Block/Unblock of a Party, Block/Unblock of an Account, Block/Unblock of a CMB, Limit Update and Outbound Liquidity Transfer. This function is only available in U2A mode. The search results will be displayed in a list, which is sorted by the values of the

**Screen Access**

- I Task List >> Details
- >> Click on the search button >> Details screen
- >> Click on the edit button

**Privileges** To use this screen, you need the following privileges:  
I TIP\_Query

**Screenshot**



Action type	User reference	Object Identifier	Timestamp of update	Status
Block/Unblock Party	cn=smith,ou=tips,o=bnkacct,o=nsp1/BLCKNGHTXXXX	BLCKNGHTXXXX	2018-12-12h17:40:01	Awaiting approval
Update Limit	cn=smith,ou=tips,o=bnkacct,o=nsp1/BLCKNGHTXXXX	CHBNUM1	2018-12-12h17:40:01	Awaiting approval

**Field description**

Task List: Search criteria	
Action type	Select the type of action initiated by the first user for a dedicated reference or dynamic data object from the possible values: <ul style="list-style-type: none"> <li>I All</li> <li>I Block/Unblock Party</li> <li>I Block/Unblock Account</li> <li>I Block/Unblock CMB</li> <li>I Update Limit</li> <li>I Outbound LTO</li> </ul>
User reference	Type the DN/BIC that entered the Action to be approved/revoke
Object identifier	Enter the identifier of the object. Possible values are: <ul style="list-style-type: none"> <li>I Party BIC in case of Block/Unblock Party</li> <li>I Account number in case of Block/Unblock Account</li> <li>I CMB number in case of Block/Unblock CMB</li> <li>I CMB number in case of Update Limit</li> <li>I Transaction reference in case of Outbound LTO</li> </ul>
Timestamp of update from	Enter the lower bound of the date from which the Action was requested.

Timestamp of update to	Required format is: DD-MM-YYYY hh:mm:ss Enter the upper bound of the date from which the Action was requested. Required format is: DD-MM-YYYY hh:mm:ss
Status	Select the status of the Action from the possible values: <ul style="list-style-type: none"> <li>  All</li> <li>  Awaiting approval</li> <li>  Approved</li> <li>  Revoked</li> </ul>

Task List: List	
Action type	Type of action initiated by the first user for a dedicated reference or dynamic data object. Possible values are: <ul style="list-style-type: none"> <li>  Block/Unblock Party</li> <li>  Block/Unblock Account</li> <li>  Block/Unblock CMB</li> <li>  Update Limit</li> <li>  Outbound LTO</li> </ul>
User reference	DN/BIC that entered the Action to be approved/revoked
Object Identifier	Business identifier of the object whose Status the user is checking. Possible values are: <ul style="list-style-type: none"> <li>  Party BIC in case of Block/Unblock Party</li> <li>  Account number in case of Block/Unblock Account</li> <li>  CMB number in case of Block/Unblock CMB</li> <li>  CMB number in case of Update Limit</li> <li>  Transaction reference in case of Outbound LTO</li> </ul>
Timestamp of update	Shows the timestamp at which the Action was inserted by the first user. Displayed format is: DD-MM-YYYY hh:mm:ss:μsμsμsμsμs
Status	Shows the status of the Action. Possible values are: <ul style="list-style-type: none"> <li>  All</li> <li>  Awaiting approval</li> <li>  Approved</li> <li>  Revoked</li> </ul>

Buttons	
Search	This function enables to retrieve the list of actions initiated by the first user. In case there is only one Action the approver is automatically redirected to the Details screen where to Approve or Revoke the Action
Reset	This function enables you to set all fields to default value and blanks out all optional fields.
Details	This function enables the user to display the details of the selected task.

#### 4.5.1.2 Task List – Details Screen

<b>Context of Usage</b>	This screen contains a number of fields regarding the Action Awaiting approval. In case the Actor is not entitled to view the data on the searched transaction an error code is returned.
<b>Screen</b>	Task List >> Details

**Access** >> Click on the search button >>  
>> Click on the Approve or the Revoke button

**Privileges** To use this screen, you need the following privileges:  
**I TIP\_ModifyAllBlocking<sup>8</sup>**  
**I TIP\_ModifyCMBBlocking<sup>9</sup>**  
**I TIP\_AdjustCMBLimit<sup>10</sup>**  
**I TIP\_LiquidityTransfer<sup>11</sup>**

**Screenshot**

**Field description**

Selected Task	
Object	Description
Action type	Shows type of Action the user is about to Approve or Revoke
4-Eyes identification	Shows the ID of the Action
Timestamp of update	Shows the time at which the Action was triggered in the first 2 Eyes. Displayed format is: DD-MM-YYYY hh:mm:ss:μsμsμsμs
Details of Selected Task	
Block/Unblock Party	
TIPS Participant BIC	Shows the BIC of the Party whose new Blocking status the user is Approving/Revoking
TIPS Participant Blocking Status	Shows the New Blocking status that is awaiting for approval
Block/Unblock Account	
TIPS Account Number	Shows the ID of the Account whose Blocking status the user is modifying
Blocking Status	Shows the New Blocking status that is awaiting for approval
Block/Unblock CMB	
CMB Number	Shows the number of the CMB whose Blocking status the user is checking
Blocking Status	Shows the New Blocking status that is awaiting for approval
Update Limit	
CMB Number	Shows the number of the CMB, which is unique in TIPS
Linked Account	Shows the ID of the Account to which the CMB is linked
Limit Value	Shows the New value of the CMB Limit that is awaiting for approval
Outbound Liquidity Transfer	
Debtor BIC	Shows the BIC <sup>11</sup> of the owner of the debited TIPS Account.
Debtor Account	Shows the debited TIPS Account.

<sup>8</sup> In case the action to approve or reject is the modification of the TIPS Participant Blocking status or the TIPS Account Blocking status

<sup>9</sup> In case the action to approve or reject is the modification of the TIPS CMB Blocking status

<sup>10</sup> In case the action to approve or reject is the modification of the CMB Limit

<sup>11</sup> In case the action to approve or reject is the sending of a LTO

Creditor BIC	Shows the BIC11 of the owner of the credited RTGS Account.
Creditor Account	Shows the credited RTGS Account
Amount	Shows the amount to be transferred with the Liquidity Transfer.
Currency	Shows the currency used for the amount of the Liquidity Transfer.

#### Buttons

Buttons	
Approve	This function enables you to approve the action initiated by the first user. Upon clicking on the Approve button you will be asked to enter your PIN for digital signature purposes (NRO). With the entry of the PIN, TIPS attaches a digital signature to the instruction entered by the TIPS actor
Revoke	This function enables you to revoke the action initiated by the first user. Upon clicking on the Revoke button you will be asked to enter your PIN for digital signature purposes (NRO). With the entry of the PIN, TIPS attaches a digital signature to the instruction entered by the TIPS actor
Cancel	This function enables you to cancel the process and return to the previous screen

## 5 Screen user guide

The Screen user guide part comprises business scenarios adapted from typical user workflows. Each business scenario represents a single workflow and consists of single action steps, intermediate results and a final result. In detail, each business scenario description has the same structure and contains the following elements.

- |                         |   |
|-------------------------|---|
| <b>Context of Usage</b> | The context of usage describes the aim of the business scenario and indicates whether this business scenario is mandatory or optional in order to fulfil the overall business package. It also contains the usage restrictions and the pre-requisites (excluding the privileges), if available.   |
| <b>Privileges</b>       | In this section, all the necessary Privileges to access and use the involved screens are listed. First the Privileges to access the first screen are mentioned, followed by the Privileges necessary to proceed with the business scenario. Afterwards, the Privileges for the following screens are mentioned in the same order.   |
| <b>Reference</b>        | This section lists all references to the screens involved, in order of their appearance in the business scenario.   |
| <b>Instructions</b>     | Each workflow is described from the start to the end, beginning with the access to the starting screen. The instructions involve a number of separate steps which lead you through a series of screens and actions. Each action step is focused on one single action. Intermediate results are included and the instructions end with a final result. Possible alternatives and repetitions are highlighted with a notice sign. |

## 5.1 Monitoring of Accounts, CMBs and Payments

### 5.1.1 Query Account Balance and Status

<b>Context of Usage</b>	This business scenario describes how to view the Account balance details allowing you to monitor and manage your balances through queries. To perform these queries and use these screens you must consult a party with existing TIPS accounts.
<b>Privileges</b>	To carry out this business scenario, you need the following Privileges:   TIP_Query
<b>Reference</b>	Further information on screens involved can be found in the screen reference part:   4.1.1 Query Account balance and Status
<b>Instructions</b>	<ol style="list-style-type: none"> <li>1. Go to the Account Balance and Status Query screen Query &gt;&gt; Account Balance and Status</li> <li>2. Enter the TIPS Account number as Search criteria</li> <li>3. Click on the Search button</li> </ol> <p>→ The <i>TIPS Account balance - details</i> screen containing the search results is displayed</p>

### 5.1.2 Query CMB Limit and Status

<b>Context of Usage</b>	This business scenario describes how to view the CMB Limit and Status allowing you to monitor and manage your Limit set on a Participant Account, for instruction investigations, through queries. In order to monitor the Limit, you have to insert the CMB number, which is always unique in TIPS (no other CMB and no Account can have the same number).
<b>Privileges</b>	To carry out this business scenario, you need the following Privileges:   TIP_Query
<b>Reference</b>	Further information on screens involved can be found in the screen reference part:   4.1.2 Query CMB Limit and status
<b>Instructions</b>	<ol style="list-style-type: none"> <li>1. Go to the Query CMB Limit and Status screen Query &gt;&gt; CMB Limit and Status</li> <li>2. Enter the CMB number as Search criteria</li> <li>3. Click on the Search button</li> </ol> <p>→ The CMB Limit and status details screen, containing search results is displayed on the screen.</p>

## 5.2 Management of Local Reference Data

### 5.2.1 Blocking/Unblocking of Participants

<b>Context of Usage</b>	This business scenario describes how to modify the blocking status of a TIPS Participant allowing you to unblock, block for crediting, block for debiting or block for debiting/crediting said Participant. When a Participant Blocking status is modified,
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payments involving the Participant are affected immediately. This scenario is needed when the settlement should be prevented for all the Accounts owned by a specific Participant.

**Privileges** To carry out this business scenario, you need the following Privileges:

- | TIP\_Query
- | TIP\_ModifyAllBlocking

**Reference** Further information on screens involved can be found in the screen reference part:

- | 4.2.1 Participant Blocking

**Instructions**

1. Go to the Participant Blocking screen, Search screen
2. Enter the TIPS Participant number as Search criteria
3. Click on the Search button. The current Blocking status is shown
4. Click on the New button
5. Select the desired Blocking Status from the drop-down menu
6. Click on the Submit button

→ The TIPS Participant is displayed with the new Blocking status

## 5.2.2 Blocking/Unblocking of Accounts

**Context of Usage** This business scenario describes how to modify the blocking status of a TIPS Account allowing you to Unblock, block for crediting, block for debiting or block for debiting/crediting said Account. When an Account Blocking status is modified, payments involving the Account are affected immediately. This scenario is needed when the settlement on a specific Account should be prevented.

**Privileges** To carry out this business scenario, you need the following Privileges:

- | TIP\_Query
- | TIP\_ModifyAllBlocking

**Reference** Further information on screens involved can be found in the screen reference part:

- | 4.2.2 Account Blocking

**Instructions**

1. Go to the TIPS Account Blocking screen, Search screen
2. Enter the TIPS Account number as Search criteria
3. Click on the Search button. The current Blocking status is shown
4. Click on the New button
5. Select the desired Blocking Status from the drop-down menu
6. Click on the Submit button

→ The TIPS Account is displayed with the new Blocking status

## 5.2.3 Blocking/Unblocking of CMBs

**Context of Usage** This business scenario describes how to modify the blocking status of a CMB allowing you to Unblock, block for crediting, block for debiting or block for

debiting/crediting said CMB. When an Account Blocking status is modified, payments involving the CMB are affected immediately. This scenario is needed when the settlement on a specific CMB should be prevented.

**Privileges** To carry out this business scenario, you need the following Privileges:

- TIP\_Query
- TIP\_ModifyCMBBlocking

**Reference** Further information on screens involved can be found in the screen reference part:

- 4.2.3 CMB Blocking

**Instructions** 1. Go to the CMB Blocking screen, Search screen

2. Enter the CMB number as Search criteria
3. Click on the Search button. The current Blocking status is shown
4. Click on the New button
5. Select the desired Blocking Status from the drop-down menu
6. Click on the Submit button

➔ The CMB is displayed with the new Blocking status

## 5.2.4 CMB Limit Modification

**Context of Usage** This business scenario describes how to maintain the CMB Limit allowing you to add, modify or delete a Limit value. When a CMB limit is modified, the headroom of the CMB is updated accordingly. The CMB headroom is updated (increased or decreased) on the basis of the difference between the old limit value of the CMB and the new limit value.

Creating a Limit is not mandatory in TIPS, a CMB can be used without a Limit.

**Privileges** To carry out this business scenario, you need the following Privileges:

- TIP\_Query
- TIP\_AdjustCMBLimit

**Reference** Further information on screens involved can be found in the screen reference part:

- 4.3.1.2 CMB Limit Modification – New/Edit screen

1. Go to the CMB Limit modification screen, Search screen
2. Enter the CMB number as Search criteria
3. Click on the Search button. The current Limit is shown
4. Click on the Edit button
5. Type the desired amount on the Limit field
6. Click on the Submit button

➔ The CMB limit is displayed with the new amount

**Instructions**

## 5.3 Liquidity Transfer

### 5.3.1 Inject Outbound Liquidity Transfer

<b>Context of Usage</b>	This business scenario describes how to inject an Outbound Liquidity transfer from a TIPS Account to an RTGS Account opened in an RTGS System connected to TIPS. When a Liquidity transfer is instructed, the balance of the Debited TIPS Account is updated accordingly. Before you create a new immediate liquidity transfer order, check whether the account to be debited exists in TIPS. This functionality is needed every time a Participant needs to move liquidity back to the relevant RTGS system.
<b>Privileges</b>	To carry out this business scenario, you need the following Privileges: <ul style="list-style-type: none"> <li>■ TIP_InstantPayment</li> </ul>
<b>Reference</b>	Further information on screens involved can be found in the screen reference part: <ul style="list-style-type: none"> <li>■ 4.4.1.1 Liquidity Transfer - New screen</li> </ul>
<b>Instructions</b>	<ol style="list-style-type: none"> <li>1. Go to the Liquidity Transfer, New screen</li> <li>2. Enter the Liquidity transfer information (Debtor BIC, Debtor Account number, Creditor BIC, Creditor Account number, Amount, Currency)</li> <li>3. Click on the Submit button</li> </ol> <p>→ The Liquidity Transfer is sent and the TIPS Account is debited</p>

## 5.4 Task List

### 5.4.1 Task List confirmation/Revoking

<b>Context of Usage</b>	This business scenario describes how to approve or revoke an action, which has been initiated by a different user in 4-eyes mode. The use of 2-eyes or 4-eyes mode depends on your access rights configuration. Approving an action is mandatory for the usage of the 4-eyes mode. Before you start, the action has to be initiated by a different user.
<b>Privileges</b>	To carry out this business scenario, you need the following Privileges: <ul style="list-style-type: none"> <li>■ TIP_Query</li> <li>■ TIP_ModifyAllBlocking<sup>12</sup></li> <li>■ TIP_ModifyCMBBlocking<sup>13</sup></li> <li>■ TIP_AdjustCMBLimit<sup>14</sup></li> <li>■ TIP_LiquidityTransfer<sup>15</sup></li> </ul>
<b>Reference</b>	Further information on screens involved can be found in the screen reference part: <ul style="list-style-type: none"> <li>■ 4.5.1 Task List</li> </ul>

<sup>12</sup> In case the action to approve or reject is the modification of the TIPS Participant Blocking status or the TIPS Account Blocking status

<sup>13</sup> In case the action to approve or reject is the modification of the TIPS CMB Blocking status

<sup>14</sup> In case the action to approve or reject is the modification of the CMB Limit

<sup>15</sup> In case the action to approve or reject is the sending of a LTO

## Instructions

1. Go to the Task List – search>List screen:  
Task List >> Search>List Screen
2. Enter the search criteria (Action type and 4-Eyes identification) about the action waiting for your approval.
3. Click on the search button. The search result will appear on the lower part of the screen
4. Choose one action to approve/revoke and then click on the Details button. The result is displayed in the Details screen
5. Check the data. If everything is correct, click on the approve button.