

26 April 2007

### **T2S CONSULTATION PAPER:**

### **GENERAL PRINCIPLES AND HIGH-LEVEL PROPOSALS**

### FOR THE USER REQUIREMENTS

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#### **Objective of the public consultation**

This paper outlines the general principles that provide the foundation for the future TARGET2-Securities (T2S) settlement service. It also provides a series of high-level proposals that define the cornerstones of the future system set-up. This document initiates the market consultation phase on the T2S User Requirements.

This consultation paper consists of three sections examining the general principles, the functional high-level proposals, and the non-functional high-level proposals of T2S.

The general principles are based on decisions which the Governing Council of the ECB has taken in setting the main cornerstones of T2S. They answer at a very high level the question "what is T2S?", and are consistent with the T2S Blueprint published on 8 March 2007 on

http://www.ecb.int/paym/market/secmar/integr/html/index.en.htm.

In this respect, they reflect extensive discussions with central securities depositories (CSDs), market participants and public authorities which were conducted between July 2006 and February 2007. The Governing Council does not intend to review these principles, since the objective of this phase is to determine user expectations concerning the future system. Respondents are therefore invited to concentrate their comments on the high-level proposals.

#### Guidelines for providing replies

Market participants are invited to comment on the proposals made below with regard to their appropriateness, completeness and relevance. Most proposals are accompanied by explanatory information illustrating the proposal. The proposals are followed by numbered questions which readers are invited to reply to. <u>Replies should be filled out using the response template attached in Annex 1</u>. Readers are also encouraged to express their overall views on the paper and, where appropriate, to suggest further requirements and proposals that could be specified in the forthcoming T2S User Requirements.

Any comments received will be made public on the internet, unless it is clearly indicated that the author does not consent to such publication. Comments should be sent in English or in the relevant official Community language to the ECB at the following address: ecb.secretariat@ecb.int, or to the respective national central bank of the Eurosystem.

Please reply by 27 June 2007 at the latest. Replies received after this deadline will be handled on a best effort basis, but the ECB cannot ensure that they will be given due consideration.

#### Background information and timeline of the consultation process

This consultation paper issued today by the ECB is part of work being conducted to set up a technical platform for the settlement of securities transactions in central bank money, which has been named TARGET2-Securities, or T2S for short.

This consultation paper is the result of preparatory work conducted by the ECB/Eurosystem in close cooperation with CSDs and other market participants. Preparatory work, termed the "pre-project phase", began in July 2006 when the ECB's Governing Council decided to evaluate opportunities to provide efficient settlement services for securities transactions in central bank money. Feasibility studies were prepared, also taking into account information obtained from several meetings and contacts with market participants (these studies can be viewed under: http://www.ecb.int/paym/market/secmar/integr/html/index.en.htm).

On 8 March 2007 the ECB's Governing Council discussed these studies and decided to launch the current project phase, which consists of preparing the T2S User Requirements. Public consultations are an essential part of this phase and form part of an ongoing market consultation on the T2S project. Market feedback on the various papers is expected, since the replies of market participants constitute an essential basis for drafting the T2S User Requirements.

The consultation process will start at the end of April 2007. A final public consultation will be held at the end of 2007, when market participants will be invited to comment on the fully articulated User Requirements. In the meantime, and on a case-by-case basis, additional technical consultations will be launched at short notice. These will normally last three weeks. All the collected User Requirements will then form the basis for drafting the General Functional Specifications of T2S, which will be completed in the next step of the project. After the completion of this phase, which is scheduled for early 2008, and in conjunction with the commitment of CSDs to join the project, the ECB's Governing Council will decide on the development phase.

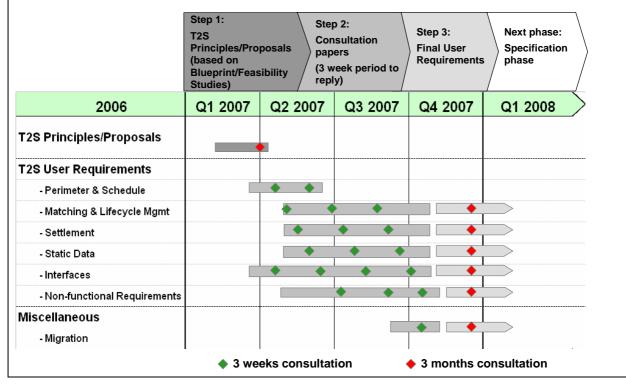


Chart 1: Tentative Consultation/User Requirements Phase Timeline

#### I. General Principles of T2S

The General Principles define the nature and scope of T2S as established by the Feasibility Study, discussed with the market, and communicated in the Governing Council Press Release of 8 March 2007. They are restated here in order to provide the reader with the general framework in which the high-level proposals of the next section should be reviewed and commented on.

### Principle 1: The Eurosystem shall take on the responsibility of delivering T2S by assuming full ownership, and by undertaking the development and operation of the platform.

In line with the July 2006 Governing Council decision, the proposed platform will be fully owned and operated by the Eurosystem. T2S will be governed by a structure defined by the Governing Council. This structure allows for the involvement of the market.

## Principle 2: T2S shall be based on the TARGET2 platform, and will hence provide the same levels of availability, resilience, recovery time and security as TARGET2.

In order to exploit fully synergies with existing Eurosystem procedures and solutions, T2S will be developed and run on the same technical platform as TARGET2. Four NCBs (Deutsche Bundesbank, Banco de España, Banque de France and Banca d'Italia) are ready to develop and operate T2S on TARGET2 via the Single Shared Platform. Use will be made of the valuable experience and knowledge that is available in the market.

# Principle 3: T2S shall not involve the setting up and operation of a CSD, but instead will serve only as a technical platform for providing settlement services to central securities depositories (CSDs).

T2S is purely an IT settlement service operated by the Eurosystem and used by CSDs for the benefit of their customers. It therefore neither constitutes a CSD in itself, nor is it planned that T2S will become one in the future. This excludes the possibility of T2S engaging in any asset-servicing businesses (such as the management of corporate actions). The scope of T2S is restricted to settlement, including the functionalities required to support settlement activities relating to the asset-servicing business. Activities that extend beyond the provision of settlement services lie outside the scope of T2S.

### Principle 4: The respective CSD users' securities accounts shall remain legally attributed to each CSD.

Although from a technical viewpoint the Securities Account Database will lie within the T2S technical environment, each CSD will continue legally to maintain the securities accounts of its users and, where relevant, those of the clients of these users as well. As a consequence, CSDs will retain legal responsibility for opening, maintaining and closing accounts attributed to them. Procedures between CSDs and NCBs will be further defined in case of emergency.

## Principle 5: The T2S service level shall allow CSDs to offer their participants, at a minimum, their current level of functionality and coverage of assets.

To enable CSDs to have T2S perform their entire settlement processing, the centralised platform should cover the full functionality needed for such a service. If this is not achieved, CSDs will be forced to maintain duplicate settlement infrastructures, with a cost impact both through duplication and reduced economies of scale. The objective of T2S is to provide a level of functionality that frees CSDs from maintaining securities balances on a separate platform.

A security will be included in T2S as long as it has a designated International Securities Identification Number (ISIN), and as long as it complies with the other principles presented here.

#### Principle 6: Securities account balances shall only be changed in T2S.

For accounts maintained in T2S, T2S will handle all changes that have a legal effect on securities account balances that relate either to settlement or non-settlement activities of CSDs. Examples of this include balance changes generated via primary and secondary market transactions, corporate actions, lending and collateral management activities.

# Principle 7: T2S shall require participating CSDs to be designated under the Settlement Finality Directive (SFD) in their respective jurisdiction.

When assessing settlement finality, a distinction must be made between finality of transfer orders and finality of transfers:

- The *finality of transfer orders*, whereby transfer orders that are entered into a securities settlement system are protected from insolvency or unwinding risks.
- The *finality of transfer*, whereby entitlement to securities is legally transferred to the receiving entity.

For T2S, a similar approach is conceived as for TARGET2. There will continue to be domestic systems designated under the SFD, linked by a common technical infrastructure for the processing of transfer orders. Transfer orders processed in T2S will acquire adequate protection, relying on the rules of the individual CSDs that are designated under the SFD. Proprietary aspects and finality of transfers will be determined in accordance with the laws where the CSD that has opened the securities account is established. The location of the IT facilities is not relevant in this respect.

#### Principle 8: T2S shall settle exclusively in central bank money.

As stated above, T2S is a service for enhancing the efficiency of securities settlement across Europe while at the same time keeping NCBs' cash account management within the Eurosystem. Its scope is therefore exclusively limited to central bank money, and does not extend to commercial bank money settlement.

#### Principle 9: The primary focus of T2S shall be securities settlement in euro.

The primary focus of the Eurosystem is efficiency and security in the euro area environment. As a result, the focus of T2S is to provide settlement services in euro central bank money. For the extension of T2S to other currencies, please refer to Principle 10.

#### Principle 10: T2S shall be technically capable of settling currencies other than the euro.

T2S will be technically capable of providing settlement not only in euro central bank money but also in non-euro central bank money. This technical capability does not however mean that this will be available from day one of T2S production, unless explicitly requested so by the relevant non-Eurosystem NCB(s). In any case, the provision for settlement in non-euro currencies requires the willingness of non-Eurosystem NCBs to authorise the technical operation of their cash accounts to the Eurosystem. The initiative should come from the relevant NCB in coordination with its local market community.

#### Principle 11: T2S shall allow users to have direct technical access to its platform.

While CSDs will retain business and legal relationships with their participants, CSDs will offer their participants the option of a technical communication channel to T2S settlement services, either directly to T2S or indirectly via the CSD. This connectivity option refers solely to the way in which users will interface with T2S in order to send and maintain settlement instructions, as well as to access reporting facilities.

#### Principle 12: CSDs' participation in T2S shall not be mandatory.

CSDs' participation in T2S is a business choice on the part of the CSDs and their local market community. When deciding whether or not to join T2S, CSDs are expected to follow the interests of their users.

### Principle 13: All CSDs settling in euro central bank money shall be eligible to participate in T2S.

All CSDs settling in euro central bank money are invited to join T2S. The principle implies that all CSDs with access to euro central bank money and designated under the SFD will be eligible to participate in T2S.

#### Principle 14: All CSDs connecting to T2S shall have equal access conditions.

The CSDs' access criteria will be public and non-discriminatory. All participating CSDs will have access to all T2S services. A single, transparent and publicly available fee schedule will be applied (see also Principle 19 on compliance with the Code of Conduct). To avoid distorting competition, the Eurosystem will provide its services to connected CSDs on a non-discriminatory pricing basis (in a similar manner as for other existing Eurosystem infrastructures such as TARGET2). Although not a designated system under the SFD itself, T2S will comply with the price transparency principle of the Code of Conduct.

### Principle 15: All CSDs connecting to T2S shall do so under a harmonised contractual arrangement.

With reference to their contractual relationship with T2S, all CSDs receiving the same service level will be bound by the same contractual arrangement. This means that all CSDs willing to participate in T2S will adhere to the same contract for the platform's core functions.

### Principle 16: All CSDs connecting to T2S shall have a single calendar of opening days and harmonised opening and closing times for settlement business.

Participating CSDs shall adopt the T2S calendar. This will be the same as the TARGET2 calendar. Settlement (delivery versus payment (DvP) as well as free of payment (FoP)) via T2S shall not be possible outside this calendar.

The opening and closing times will cover daytime and night-time settlement. They will be compatible, though perhaps not identical, with TARGET2 operating hours. Further consultation will be conducted on the exact cut-off times within the single T2S operating timetable – different cut-off thresholds might for

instance be required for specific operations (DvP notification submission, automatic lending operations, etc.).

### Principle 17: T2S settlement rules and procedures shall be common to all participating CSDs.

To minimise costs and simplify processes, T2S will aim at harmonising all rules and procedures related to the settlement of securities transactions in cases where different existing procedures imply an additional burden for T2S.

As an example, a single set of matching rules shall apply in T2S which must be observed by instructing parties. These will be based on the European Central Securities Depositories Association (ECSDA) report on matching rules. This does not exclude, however, that CSDs and local markets might want to maintain additional domestic rules beyond what is defined in T2S, provided that such rules are not in conflict with those of T2S.

#### Principle 18: T2S shall operate on a full cost-recovery and not-for-profit basis.

Due to its status as a public authority, the Eurosystem will price the development and operation of T2S on a full cost recovery and not-for-profit basis. While delivering a very high level of service in terms of quality, security and availability, T2S will also seek to be as cost-efficient as possible.

### Principle 19: T2S services shall be unbundled in line with the principles of the European Code of Conduct for Clearing and Settlement.

Compliance with the Code of Conduct with regard to the unbundling of services is a precondition for CSDs using T2S services. This principle implies that each unbundled service will be available at an appropriate price. As stated in the Code of Conduct, this does not preclude that a special price will apply to the joint purchase of several unbundled services.

### Principle 20: T2S shall allow the participating CSDs to comply with oversight, regulatory and supervisory requirements.

In order to ensure a safe, orderly and efficient functioning of the market, the set-up of T2S will aim at allowing the participating CSDs to comply with the relevant oversight, regulatory and supervisory requirements and at the same time strive for achieving a high degree of harmonisation in meeting those requirements.

#### **II. Functional High-level Proposals of T2S**

This section describes the high-level proposals on the functional scope of T2S. These refer to the set-up and the functionality of T2S and how it will fit into the current market infrastructure.

These proposals, together with those presented in Section III, form the basis of the User Requirements which will be drafted by end-2007.

#### A. Account Structure

#### Proposal 1: T2S will have a single and uniform securities account structure.

For T2S to offer settlement services efficiently across different markets, it must have a uniform account structure at the central operational level, in order to provide efficient checking and booking of securities balances via the T2S Settlement Engine. The determination of a single uniform account structure refers to the account *codification* and not to the *level of segregation* of the securities accounts. This codification should allow for, but not impose, a one-to-one mapping relationship between accounts legally opened at the CSDs, and the securities accounts technically operated in the T2S environment.

Section 5 of the T2S Operational Feasibility Study includes a first proposal on how this uniform account codification could be structured. Further elaboration of the details of this proposal will be presented and discussed during the forthcoming drafting of the User Requirements. The feedback expected at this stage should focus on any major concerns foreseen for the adoption of a uniform securities account structure at the centralised level. In particular, the concerns and specificities of end-investor CSDs should be clarified.

## **Proposal 2: TARGET2 real-time gross settlement (RTGS) accounts or sub-cash accounts shall be used as cash accounts for T2S.**

For each user settling in central bank money, the TARGET2 RTGS account or a sub-cash account dedicated to T2S settlement activities will be used. This sub-cash account may not be that of the securities account holder. It is foreseen that in the daytime, due to intraday settlement associated with over-the-counter (OTC) transactions or liquidity and collateral management, a real-time functionality for moving cash balances in and out of the cash sub-accounts is required. During the night-time, mostly for pending or expected settlement transactions, such a high level of liquidity interaction is not required. For the sake of simplicity, the sub-cash account of the TARGET2 RTGS main account that is used as a cash account for T2S is called the "T2S cash account", whereas the TARGET2 main account is called the "T2 RTGS account".

### Proposal 3: The cash balance on the "T2S cash account" (in TARGET2) may be used for all T2S CSDs.

Users will have the option to use one cash account to cover all their settlement processing in T2S. The cash balance on this account can then be used for settlement processing in all participating CSDs. However, users might want to use more than one cash account to segregate cash balances.

### Proposal 4: Participants can directly open a "T2S cash account", or they can participate indirectly, as per the TARGET2 rules.

The cash accounts are sub-accounts of the TARGET2 main RTGS accounts. Therefore, the same TARGET2 rules for direct and indirect participation and access apply.

### Proposal 5: The "T2S cash account" will allow proprietary and non-proprietary holdings to be segregated.

Direct participants can further segregate liquidity on the cash accounts to differentiate between proprietary cash liquidity and the liquidity assigned to indirect participants.

#### Proposal 6: Each T2S securities account shall be assigned to one (and only one) CSD.

Proposal 7: T2S securities accounts shall differentiate between investor and intermediary accounts.

This is required to enable T2S to cover the demands of end-investor countries.

Proposal 8: The T2S securities account structure shall differentiate between different intermediary roles, including direct participants, indirect participants, end-investors, issuers, paying agents, other custody-related roles, and technical CSD accounts.

The different roles will have to be worked out in more detail in a later phase. Direct participants have fully operational accounts with their respective CSDs. Indirect participants do not have fully operational accounts, but at least partially use the accounts of direct participants. Issuers and paying agents may take certain roles in the field of asset-servicing which require specific accounts to be set up to support these activities. Additional technical CSD accounts will be required to support the CSDs' asset-servicing function, and their value-added services. Participants may have accounts relating to different roles. This includes CSDs which will have the option to open inter-CSD accounts to support cross-border settlement in T2S.

### **Proposal 9:** The T2S securities account structure shall allow proprietary and potentially several non-proprietary holdings to be segregated.

T2S will allow for segregation of proprietary and non-proprietary holdings. In the latter case, participants could open multiple accounts in order to allow full flexibility in segregating holdings.

### Proposal 10: The T2S securities account structure shall allow for segregation and/or identification of holdings eligible for self-collateralisation (i.e. pledge accounts).

Generally, the account structure should support the existing levels of segregation that exist in the different markets. Moreover, it should also be able to cover the existing variety of account types and balance types, and should allow all participating CSDs to map each current domestic account to one unified T2S securities account. More details on this will be provided in a dedicated market consultation regarding the account set-up.

#### **B.** Static Data

Static data can be grouped into securities reference data, participant reference data, reference data relating to the setting up of accounts as well as to other access rights and rules, and finally static data on timings and schedules. High-level proposals on how these data should be handled in T2S are provided below. Further consultations on the detailed static data needed will be conducted.

### Proposal 11: Securities reference data in T2S will be restricted to, but will include all, the data required for settlement and auto-collateralisation.

The scope of securities reference data in T2S does not cover the full scope of securities reference data required in a CSD. Participating CSDs will have to maintain for business purposes securities reference data that are not directly relevant for their core settlement businesses. These may include corporate action reference data as well as information on the issue price, issuer classification, etc.

T2S securities reference data shall contain all necessary information for settlement purposes, and in particular end-investor data where relevant.

#### Proposal 12: Changes in the securities reference data can only be initiated by CSDs.

The Securities Reference Database will be exclusively fed with data provided under the responsibility of participating CSDs. Only CSDs will be able to access the Securities Reference Database via the *Authorisation Interface*. They will be able to check and amend the reference data of the securities that are eligible for settlement in the respective CSD. However, a security can only be issued in its primary issuer CSD. Therefore, the reference data might overlap for securities that are eligible for settlement in more than one CSD, and mechanisms to ensure consistency between these data need to be defined.

### Proposal 13: CSD participants' reference data in T2S will be restricted to data required for settlement and auto-collateralisation.

The scope of these reference data does not cover the full breadth of participants' reference data to be maintained in a CSD. T2S will only require a subset of these data to be operational, e.g. data on the account set-up, on access rights and authorisation as well as some basic data on the company. Additional data may be required when users are authorised to instruct T2S directly.

#### Proposal 14: Changes to CSD participants' reference data can only be initiated by CSDs.

Each CSD will be responsible for the reference data pertaining to the users of its securities accounts. For users which are participants in more than one CSD, the respective reference data will overlap, and mechanisms to ensure consistency between these data need to be defined.

Proposal 15: For their securities accounts, only the CSDs can change the set-up, access rights and other rules relating to the settlement process.

### Proposal 16: For their cash accounts, only the NCBs can change the set-up, access rights and other rules relating to the settlement process.

All CSD participant categories benefiting from settlement services should be in a position to utilise the same services once T2S is in place.

### Proposal 17: Reference data on harmonised deadlines and schedules will be maintained in T2S.

Once harmonised, these data cannot be changed by CSDs, except by means of addressing a formal change request to the system operator.

### Proposal 18: Reference data on non-harmonised deadlines and schedules can only be changed by the respective CSD.

The deadlines and schedules refer to the non-settlement processing and value-added services of the CSDs, or to their cross-border settlement processing outside T2S. Presumably, these deadlines will differ between different CSDs, as they might want to schedule their value-added services in a different way, or because they might have different deadline agreements with third parties outside T2S, for example with regard to settlement deadlines for cross-border settlement.

#### Proposal 19: T2S static data shall comply with the relevant ISO standards.

T2S static data will comply with all the relevant standards – e.g. for currencies (ISO 4217 currency codes), countries (ISO 3166-1 country codes) and users (SWIFT/BIC Code ISO 9362).

#### C. T2S Time Schedule

As stated in the principles, T2S will have a single calendar for opening days, namely the TARGET2 calendar, which the market has already adopted. Within this calendar, harmonised opening and closing times for all participating CSDs are foreseen. Additionally, a number of important cut-off times related to specific functionalities of T2S need to be defined and harmonised. This section contains complementary high-level proposals on how the future time schedule will look like.

The underlying idea for the proposed T2S timetable schedule is to introduce a single timetable for all connected markets, as is the case in the TARGET2 framework.

#### Proposal 20: T2S operating hours will be a sub-period of TARGET2 operating hours.

The operation of T2S depends on the availability of TARGET2. The opposite is also true. Being a payment system, TARGET2 needs the securities and collateral services of the T2S platform in order to function smoothly. Therefore, the operating days and hours of T2S will be oriented according to the structure of the TARGET2 day. Presumably, the operating hours will be a sub-period of the TARGET2 ones.

Harmonisation of operating hours is a precondition for equal treatment of CSDs. Otherwise, there would be differences with regard to access to central bank money liquidity, whereby CSDs that open earlier would have preferred access to liquidity, for example.

Proposal 21: The T2S operating day will comprise a night-time settlement period, and a daytime settlement period.

Proposal 22: The night-time period will start with the change of business day in the evening in line with TARGET2 on the previous day, and will end at 7:00, including a maintenance window. The daytime period starts at 7:00 and ends in line with TARGET2.

#### Proposal 23: The use of night-time settlement is optional.

The night-time and daytime periods, as well as the change of business day and the change from nighttime to daytime periods, are in accordance with the respective TARGET2 timings.

It is proposed that the use of night-time settlement facilities is optional. Each CSD should assess with its users whether they want to opt for night-time settlement. In particular, they should assess whether they would experience any disadvantages by not using night-time settlement compared to markets which already use it. From the user's perspective, it is highly probable that some major markets will continue to offer night-time settlement, which already creates the need to reflect this situation in the business organisation. A situation where all connected CSDs provide this option to their users would be the optimal outcome.

#### Proposal 24: Internal T2S core settlement deadlines will be harmonised for all CSDs.

The system will attempt to settle instructions that arrive before these core settlement deadlines at least once. In particular, this covers the deadlines for same-day DvP and FoP settlement. Internal deadlines refer to deadlines relating to domestic settlement within one participating CSD, or cross-border settlement between two participating CSDs, i.e. still within T2S. Ideally, these domestic and internal cross-border deadlines would not differ.

# Proposal 25: CSDs can introduce additional deadlines or cut-off times within the operational hours of T2S, provided that these deadlines do not interfere with the harmonised core deadlines.

These deadlines might be settlement deadlines for cross-border settlement with non-participating CSDs. The related arrangements and contracts would be bilateral between the participating CSD and any other CSD, which leaves the possibility that different participating CSDs might have different deadlines. Each CSD should have the flexibility to negotiate different service levels, and T2S should support this.

Furthermore, these deadlines can relate to value-added services that are related to settlement but exceed the core T2S settlement scope. Lending services are an example of this, whereby a CSD might want to introduce a deadline making all instructions received up to this deadline eligible for the lending service.

The only potential restriction for these additional cut-off times and deadlines is that that they do not interfere with the core deadlines, i.e. that they do not restrict the applicability of these deadlines. This means that they must relate to a different business scope, and must be earlier than the T2S core deadlines.

### Proposal 26: CSDs can schedule the interactions with T2S for their non-settlement business freely within the settlement periods of T2S.

CSDs will have access to identical functionalities to support their non-settlement business. Nevertheless, they might want to schedule these services at different times or at a different frequency, or to deploy them with a different scope. T2S aims at achieving market neutrality with regard to the design and provision of these services on the one hand, but seeks to provide the necessary flexibility for the CSDs to compete in providing this service on the other. For example, a CSD might want to provide lending services continuously during the day, or only at specific times during the day, or alternatively might decide not to provide them at all. T2S will provide the required flexibility in this regard.

To do so, T2S will maximise its operating hour availability (see also Section F) for the related interactions (instructions and reports) with the CSDs. Within these hours, CSDs can schedule their services wherever they deem it appropriate. With regard to the service level, T2S will attempt to process the related requests and settlement instructions as fast as possible according to the (to be mutually agreed) prioritisation rules.

#### **D.** Matching and Lifecycle Management Functionality

This section examines some high-level proposals for the lifecycle management functionality (including matching and instruction maintenance). In the forthcoming detailed market consultations, the exact functionalities will be further elaborated.

### Proposal 27: T2S will provide a lifecycle management functionality (including matching and instruction maintenance).

Lifecycle management is an indispensable part of a securities settlement platform. It covers the lifecycle of an instruction, the different paths through the system that it can take, and the related lifecycle status attached to these paths (validated, matched, unmatched, blocked, settled, etc.). Depending on its current lifecycle status and on the underlying market rules, an instruction will be moved into one of the various functional modules. As already outlined in the T2S Operational Feasibility Study, these include validation, matching, settlement instruction maintenance, settlement eligibility and purging functionalities.

### Proposal 28: Lifecycle management and in particular instruction maintenance are real-time processes which are to be continuously available (except for maintenance windows).

Users will have the possibility to enter new instructions throughout the day, i.e. without restricting the input to specific periods. The same holds for the maintenance of instructions.

#### Proposal 29: T2S will have one harmonised set of settlement eligibility rules.

These rules will be identical for all participating CSDs. This is required to ensure equal treatment of all participating CSDs, i.e. to exclude the possibility that different eligibility rules might for example provide preferred access to liquidity. A single cut-off time is needed for submitting and processing DvP settlement instructions in order to ensure a level playing-field for participating CSDs (see also Section II.C).

#### **Matching functionality**

Matching services in T2S are required at the very least for cross-border settlement, where a centralised matching mechanism will significantly simplify the cross-border matching process. Of course, in an environment where the majority of local CSD participants are concentrating on local transactions, the added value of a new centralised matching mechanism may not seem a prime business opportunity to start with. However, CSD participants with high levels of cross-border activity should benefit from such a mechanism. Eventually, a well designed centralised matching facility should de facto be a major force for post-trading harmonisation in Europe.

### Proposal 30: Instructions can either be matched in T2S, or they can enter T2S already matched

Matching could be executed either in T2S or at the CSD level. Instructing parties would have the option to choose (limited by the fact that both instructing parties have to designate the same location for matching). Different instructing parties are expected to choose different options depending on their business and operational models. Instructions already matched at the local CSD will enter T2S as matched records of instructions.

#### Proposal 31: T2S will have one harmonised set of matching rules.

The same set of matching rules should apply to all participants, independent of their location, whether or not they instruct directly. This set of rules will be defined in T2S. The recent ECSDA report on matching would be used as the benchmark for establishing these rules. A more comprehensive consultation document will delineate the related proposals in more detail.

### Proposal 32: Instructions which enter T2S already matched must comply with the T2S matching rules.

Matching should follow a minimum set of harmonised rules whether it is taking place on the T2S platform or locally. When matched instructions reach T2S, the matching must comply and will be validated against the T2S matching rules, i.e. the matched instructions must fulfil at least the minimum T2S conditions for proper matching. This does not exclude that CSDs might want to retain additional matching rules for their local matching activities.

#### Proposal 33: Matching is binding in T2S. Matching rules will follow the ECSDA standards.

This does not exclude that domestic markets might have different rules for instructions that have not yet entered T2S.

### Proposal 34: Instructions sent to T2S which are not yet matched will be matched as quickly as possible.

It is proposed that unmatched instructions are sent for matching immediately after the validation checks have been performed. Instructions are then proposed for settlement according to their attached settlement date.

#### Proposal 35: Instructions can be enriched either before or after matching.

The processing of settlement instructions in countries with a direct holding structure requires a functionality to perform enrichment. Matching is attempted in T2S, independent of whether the instruction has been already been enriched or not.

#### Proposal 36: T2S will provide settlement allegement functionality.

In case an instruction cannot be matched in T2S, it will provide a functionality to inform the expected counterparty of the alleged missing settlement instruction through settlement allegements.

#### **E. Settlement Functionality**

The principles proposed below will be further detailed through ad hoc consultations.

Proposal 37: T2S will provide a functionality for sequencing instructions, for provisioning them, for executing debits and credits on the securities and the cash accounts, for fails management and recycling, and for optimisation.

This defines the general scope of services to be provided. In this consultation paper, some fundamental proposals on the proposed settlement functionality are presented. In the forthcoming detailed market consultations, the exact functionality will be further elaborated.

### Proposal 38: T2S will provide a common set of rules for sequencing and prioritisation which will apply to all participating CSDs.

Sequencing and prioritisation rules must be fully harmonised across all participating markets. This is required to ensure equal access to liquidity across all participating markets. Differences in sequencing rules could create situations which could be interpreted as giving preferential treatment to some participants or CSDs, and must therefore be avoided.

#### Proposal 39: T2S shall have common settlement process for all participating CSDs.

This process will cover settlement processing in all participating CSDs. It is not foreseen to introduce specific settlement processing, e.g. specific optimisation runs at particular points during the day that would only apply to a subset of all participating parties. Instead, the settlement process will be applicable to all parties. Furthermore, all participants will use the same core settlement functionality for sequencing, provisioning, optimisation and recycling.

This does not however exclude that some specific functionalities might have to be provided. For example, the auto-collateralisation functionality could need to be implemented via repo or pledge mechanisms. This is imposed by different legal set-ups,.

Other examples of differences would be settlement on end-user accounts, which requires a specific functionality for enrichments or corporate actions. Here the functionality would be available to all markets. This service would not however be useful for markets which do not settle on end-user accounts.

### Proposal 40: T2S will provide a common set of rules for recycling which will apply to all participating CSDs.

Recycling rules must be fully harmonised across all participating markets. Again, this is required to ensure that all participating markets are treated equally. Situations where instructions from different markets would be treated with different service levels for recycling, for example, could be interpreted as treating some participants preferentially and must therefore be avoided.

### **Proposal 41: The settlement model will support auto-collateralisation. This functionality is available for all participating markets.**

This implies that auto-collateralisation will be introduced in the markets which currently do not have this functionality. Collateralisation of stocks and flows will be supported. Although it would be preferable to provide auto-collateralisation based on one legal model, presumably two different models will need to be supported: repo and pledge mechanisms.

# Proposal 42: The optimisation functionality will comprise multilateral technical netting algorithms that cover at least back-to-backs, circles, chains, nettings across all instructions with one ISIN, as well as nettings over all eligible instructions.

Technical netting over all eligible instructions (for a single ISIN as well as for all ISINs) will extend across all participating CSDs, including T2S internal cross-border trades. The algorithms to be used for optimisation, as well as the level of depth and sophistication to be used, will be elaborated in the subsequent consultation phase. The optimisation functionality will cater for the specific settlement requirements of central counterparties (CCPs).

#### Proposal 43: T2S will aim to settle instructions as early as possible.

Instructions which are eligible for settlement will be attempted as early as possible. This includes attempting to settle all instructions relating to T+X settlement in the night-time settlement period, if possible. Furthermore, eligible instructions that arrive during the daytime will be attempted as soon as possible (i.e. in real-time during the real-time period).

Proposal 44: The multilateral technical netting algorithm pursuing netting over all eligible instructions will be processed at least three times per day: at the start of night-time processing, before the end of night-time processing, and before the end of daytime processing.

The first technical netting run will aim at settling as many instructions at the beginning of the night-time processing period as possible. The other technical nettings will be introduced to maximise settlement efficiency both at the end of the night-time settlement period and at the end of the daytime period.

### Proposal 45: The settlement model will be deployed in two modes, a real-time mode, and a batch mode. The batch settlement mode will be used for full netting runs.

In the time intervals between the batches, the real-time process will run. The real-time mode will provide settlement functionality with netting restricted to a subset of instructions.

Proposal 46: Failed instructions will be continuously recycled throughout the settlement day.

Proposal 47: T2S will support shaping and partial settlement functionalities.

Rules defining shaping and partial settlement will be harmonised amongst the CSDs participating in T2S. This might apply in particular to CCP settlement instructions, which will include the possibility to use shaping with harmonised thresholds.

### Proposal 48: Instructions which did not settle at the end of the settlement day may be carried over into the next settlement day and reattempted.

Not only should new instructions settle as early as possible, but also instructions that failed at the first attempt but where a second attempt might be successful. Recycling does not stop at the end of the settlement day. All instructions which are still pending may be carried over into the next settlement day when they can be reattempted.

#### Proposal 49: T2S will attempt optimisation throughout the day.

The objective is to settle instructions as early as possible, and therefore to provide a high level of optimisation even on an intraday basis. This implies that the optimisation functionality is not purely switched at a few specific times during the day, but that the system will rather attempt optimisation at various levels of sophistication throughout the entire T2S day.

### Proposal 50: T2S will provide the functionality to perform cross-border settlement between <u>all</u> participating CSDs.

Functionally, the process of settlement through CSD links will be internalised within T2S. From a technical point of view, all steps of the provisioning, booking and reconciliation processes will be effectively processed simultaneously within a single platform.

The decision whether to use these services and to act as an investor CSD is at the discretion of each CSD. Functionally, when deciding to act as an investor CSD for a certain category of securities, the CSD in question will make these securities eligible for settlement on its participants' accounts through a change in securities reference data.

### Proposal 51: T2S will provide functionality for cross-border settlement links between participating and non-participating CSDs.

The exact processes needed to perform these settlement activities have to be elaborated in the subsequent consultations. From the perspective of scope, it would be desirable to cover existing arrangements between CSDs with as few processes as possible, and optimally through a minimum set of common harmonised processes. The legal set-up of these links is, however, based on a bilateral agreement between involved CSDs. Furthermore, the participating CSDs might want to compete with regard to access to non-participating CSDs. The optimum balance between harmonising the service and keeping the flexibility to compete is one of the open topics that need to be resolved in the detailed consultation process.

#### F. T2S Interfaces

Proposal 52: T2S will provide interfaces to users and CSDs. Users will be able to input, query, maintain settlement and cash instructions and to query balances. In addition, CSDs will be able to update static data and to provide settlement reporting.

The scope of the cash instructions covers the cash settlement that relates to settlement activities and the asset-servicing business of the CSD, e.g. interest payments or market claims processing. TARGET2 payments lie outside the scope and are covered by TARGET2 interfaces. Similarly, cash transfers will be processed through TARGET2.

### Proposal 53: Only CSDs will be allowed to update and change static data through the Authorisation Interface. Non-CSD users can perform read-only queries.

The data to be maintained through these interfaces legally belong to the CSDs, and therefore only the CSD should be allowed to change them. Users will receive limited read-only access to query the data pertaining to their account set-up, as well as some basic securities reference data.

#### Proposal 54: Only NCBs are allowed to update and change cash account static data through the Authorisation Interface.

The data to be maintained through these interfaces legally belong to the NCBs, and therefore only the NCBs should be allowed to change them.

# Proposal 55: T2S interfaces will allow CSD participants to access T2S directly. Access is granted by the CSDs for settlement processing pertaining only to their accounts in T2S.

In case a customer has accounts with more than one CSD and opts for direct access, this access must be granted separately by each CSD where the customer has opened accounts. The access rights are then restricted purely to settlement that refers to these accounts. For example, a customer with direct access in one CSD can only directly query balances held with the respective CSD, and instructions that are supposed to settle on the securities accounts belonging to this CSD.

### Proposal 56: T2S interfaces shall be continuously open to accept new instructions, queries or requests throughout the T2S day (except during maintenance windows).

This is required to ensure maximum flexibility to users as well as to CSDs with regard to the input of instructions, to queries, as well as to the scheduling of interactions relating to non-settlement business of the CSDs.

Proposal 57: Specific queries, instructions and requests to support the non-settlement business processing of the CSDs shall be made available to the CSDs through the instructions and balances interfaces. This functionality is only available for CSDs.

This relates to interactions required for processing corporate actions, primary market activities, lending and borrowing business, collateral management and other non-settlement business such as billing, where either information on balances or instruction status or settlement activity is required. The exact queries, instructions and requests will be defined as part of a detailed technical consultation.

It has to be verified whether access should be granted to non-CSDs as well to the functionality required to support non-settlement processing. For example, corporate actions might be directly processed by a paying agent, and not by the CSD. The potential implications of this will be assessed in the consultation phase.

Proposal 58: All T2S interfaces shall allow for user-to-application (U2A) as well as for application-to-application (A2A) interaction.

Proposal 59: T2S interfaces will be based on ISO 15022, ISO 20022, or any subsequent relevant standards, as well as on the proprietary XML messages implemented in the TARGET2 ICM/ASI.

#### III. Non-functional High-level Proposals of T2S

These proposals list aspects that are strongly related to the system, but do not specifically affect its functionality. These aspects can concern capacity or security, support organisation, migration, or miscellaneous items.

### Proposal 60: T2S shall be able to handle a daily average settlement volume of 2.1 million settlements per day.

This figure is based on the assumptions made in the feasibility study.

### Proposal 61: T2S shall be able to handle settlement peak day capacities without degradation of service levels.

Peak day capacity is defined as 200% of the average settlement volumes in the euro area. Peak days primarily relate to the input of instructions. Secondary requirements arise through the need to store and maintain these instructions up to the settlement date (typically T+3), and then finally to settle them.

#### Proposal 62: T2S capacity shall be sufficient to cover the settlement volumes of peak hours.

The peak settlement demand per hour will be defined in accordance with the distribution of volume between the night-time and daytime activities, after consulting the market.

#### Proposal 63: Concurrent TARGET2 peak hours shall not affect service levels in T2S.

The system should be sized in such a way that it can cover concurrent peak hours of both TARGET2 and T2S.

#### Proposal 64: The operator of T2S will provide IT operations support.

Settlement business support will remain with the CSDs, as per the general principles delineated above. This set-up has already been described in the Operational Feasibility Study.

The more detailed consultation will define the technical monitoring tools that CSDs will be provided with, as well as the role and responsibilities of the operator of T2S in contingency situations.

#### Proposal 65: T2S shall provide archiving functionalities.

In particular, archiving functionalities shall allow CSDs to fulfil their regulatory obligations. Online data storage will be provided. Detailed archiving functionalities will be further elaborated upon.

#### Proposal 66: Migration to T2S will be performed on a market-by-market basis.

This is considered as preferable to the alternative migration path, whereby migration would be performed on an asset class - by - asset class basis. In the latter case, duplicate infrastructures would have to be maintained in the migration phase on all involved markets. The general migration approach will follow the approach taken in the case of TARGET2, whereby migration will be performed in several groups, with each group migrating as a whole to the new system, followed by the next group a few months later.

### Proposal 67: Harmonisation and standardisation decisions shall be guided by the principle of minimising the overall market impact

Where harmonisation is introduced, a balance should be struck between solutions that limit the changes imposed on the different markets and those that support an efficient centralised platform. On one hand, there are currently local requirements which cannot be discarded. On the other hand, the solutions and functionalities to be provided by T2S must be harmonised to the greatest extent possible. It would be complex and costly to develop a common platform that contains all local functionalities which may have been developed for specific purposes in different historical backgrounds. Such functionalities may where necessary be developed and offered as optional services. However, where possible a harmonised procedure is preferred that aims at promoting market interoperability and integration. Such a policy will also enhance users' possibilities to streamline their post-trading operations across the EU.

### Annex 1: Response Template

