



Getting ready for PSD2: STET's Open API for banks and TPPs in Europe

The banking sector is facing major changes induced by the PSD2, such as the extension of the definition of "Payment Institution" to new types and categories of players, third-party account access and prohibition of card surcharges to name just a few. In this whirlwind of transformation, STET stepped in to provide a PSD2-compliant API that will sit as a secure gateway between Third Party Providers (TPPs) and Account Servicing Payment Service Providers (ASPSP, i.e. Banks) when TPPs send and receive data. The API is open source and its specifications are available at www.stet.eu.

Open API for all SEPA banks and TPPs

STET's work on a PSD2 API originates back to the summer of 2016 when shareholders mandated STET to design and write the specifications of a solution that could be used by any bank in SEPA. The API was designed in order to replace the current Screen-Scrapping interface and its security, traceability and performance flaws.

The API solution was designed from scratch in less than a year with the aim of providing each PSD2 actor with a rich and easy-to-implement JSON-RESTFUL API interface. Moreover, the specification of this solution has been designed in order to be usable within the whole SEPA and is available under an open (Creative Commons) license.

What the API allows users to do

The STET API is a standard and secure gateway for TPPs for sending and receiving potential high volumes of data to and from ASPSPs. TPPs and ASPSPs are the two users of the STET-designed API which allows for:

- Identification between actors, i.e. TPPs and ASPSPs
- Authentication of actors with qualified certificates
- The same level of availability and performance as the online banking services made available to the client
- Access to payment account information and associated payment transactions
- Payment initiation and information on the initiation and the execution of the payment
- Confirmation on the availability of funds
- The management of audit trails for payment transactions by Account Servicing PSPs

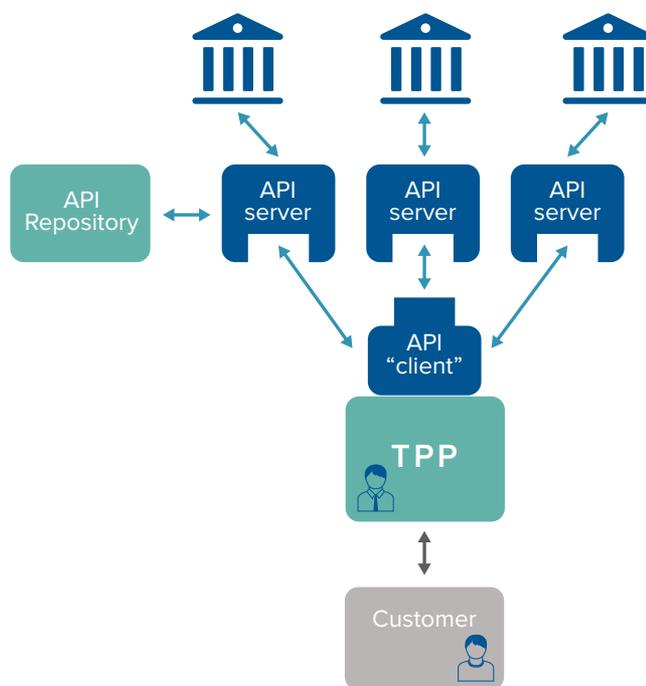
Other services beyond the PSD2 scope may be available depending on each Account Servicing PSP. The API approach designed by STET is an innovative and competitive approach of the TPP-ASPSP relationship.

STET, the trusted partner of European banks

With a longstanding experience in the interbank space and the payment industry as a Systemic Importance Payment System (SIPS), STET stepped up to provide banks with a solution to help them tackle PSD2 challenges.

The design work was facilitated by STET's active involvement in all relevant payment working groups, at national level (French and Belgian Banking Associations), European level (EPC, ERPB, EACHA, Berlin Group) and international level (ISO20022).

STET's work ethics and proven ability to manage agile projects came into play during the design phase in order to meet the requirements and deadline for the publication of the API.



API design process

The project was managed in two parallel tracks:

- A top-down analysis focused on the business and legal requirements of stemming from the PSD2
- A bottom-up process in place to identify the technical and security constraints

Making the choice of this design process allowed for the early drafting of the building blocks, the final assembly of the global interface as well as the quick delivery of use case implementation samples.

What we published

A full set of specifications was publicly released in July 2017 under an open (Creative Commons) license and embedding:

- a SWAGGER 2.0 (aka OPEN-API) file aiming to specify the technical details of the API (data structures based on ISO20022, request messages, response messages and return codes) and providing facilities for automatic coding in several programming languages
- an English-language implementation guideline which provides the description of actors, use cases and sequence diagrams as well as some usage samples of the API