

INCENTAGE

E2ECP ■ END2END CYBER PROTECTION



2FA FOR AUTOMATED FINANCIAL TRANSACTIONS

WOULD YOU TRUST E-BANKING WITHOUT 2FA?



Honestly, would you stay client of a bank telling you that e-banking is encrypted and therefore safe, and that there is no need to use two factor authentication (2FA)?

2FA has become the norm.

However, large banks and even central banks are not yet using 2FA when it comes to exchanging transactions with correspondent banks!

SWIFT is secure and everything is double encrypted and safe, therefore there is no need to use 2FA for the transactions themselves. 2FA is only used for user authentication.

The risk that banks are ready to take with substantial amounts is unbelievable.

While the private client gets protection in e-banking, the banks are not protecting themselves.

There are a couple of challenges:

- 1** The number of cyber-attacks is increasing and sometimes funded by regimes.
- 2** The SWIFT FIN standard was difficult to understand for outsiders like hackers. The introduction of the ISO 20022 standard encourages attacks as it is based on the widely known XML syntax.
- 3** Banks are increasing their investments into encryption, system level protection and AI to protect from fraud and cyber risk.
- 4** Additional investments into conventional measures bring decreasing protection.

Things are not going well.

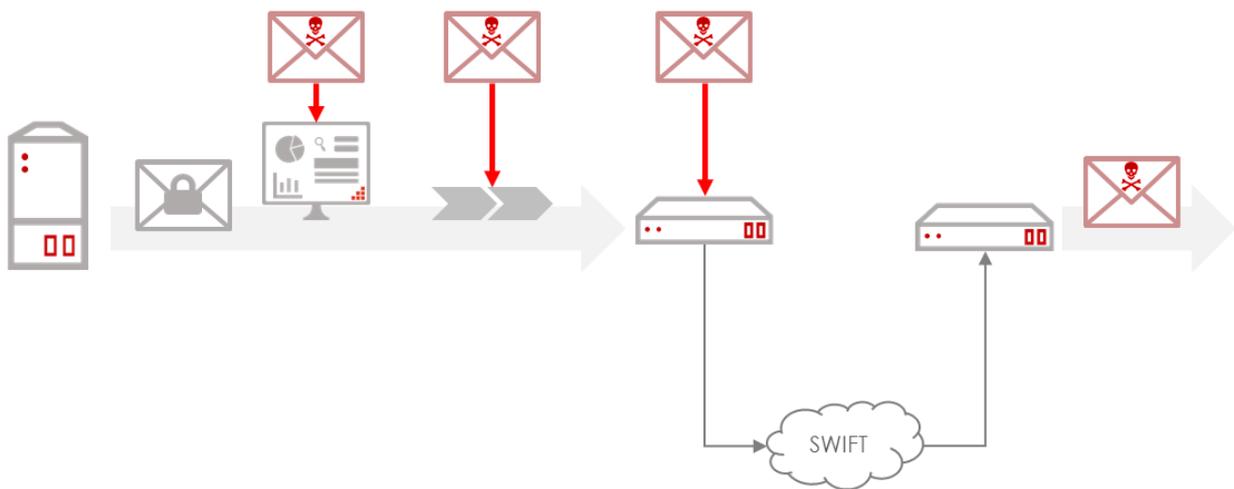
E2ECP IS THE SWISS KNIFE FOR TRANSACTION PROTECTION



Today's focus lies on traditional protection methods, mainly encryption, ideally end-to-end as targeted by the SWIFT CSP₁, LAU₂ with HmacSHA256 and hardware encryption with HSM₃ boxes.

The standardisation of security puts the attackers into the position to know the defence in advance.

Additionally, there are sensitive spots in the lifecycle of a transaction, that remain unprotected.



Attackers prefer walking through the open door rather than breaking the window.

All banks have open doors at three points in the lifecycle of a transaction:

- 1 Manual workflows
- 2 Message transformation
- 3 SWIFT connector

IT IS NOT GOING WELL AND IT GETS WORSE.

Cyber-attacks are the concomitant of geopolitical tensions and wars. The sophistication level of cyber-attacks is increasing rapidly.

WHY IS YOUR RISK INCREASING?

Banks are standardising the security with industry wide programs in order to eliminate security weaknesses. However, this standardisation of security in the financial industry leads to a transparent defence.

The widely used SWIFT connector, SWIFT Alliance, is globally available. Hackers from all around the world have the opportunity to study it hands-on.

A specific attack can now be re-used for multiple payment infrastructures using the same ISO 20022 based standard.

While ISO 20022 is still not fully deployed in the industry, manual message entry and message repair is increasingly used. This is an open door for attackers as the transaction is not encrypted during the manual workflow.

The introduction of ISO 20022 leads to more message transformations. This is another open door for attackers as the messages are not encrypted while being converted.

THE E2ECP SWISS KNIFE

The E2ECP closes all open doors for you! Both, end-to-end in your inhouse process as well as across banks. Additionally it can protect you from fraudulent payment instructions that you might receive from correspondent banks that have been attacked.

E2ECP can run on-premise for inhouse end-to-end protection. To achieve a cross-institutional protection E2ECP must run in both banks.

Alternatively, E2ECP can operate as a shared service in our partner's certified SWIFT service bureau.

E2ECP PROTECTS YOU FROM:

- 1 Attacks to the end-to-end financial transaction integrity within your inhouse processes.
- 2 Attacks to the end-to-end financial transaction integrity across banks.
- 3 Manipulations of financial transactions.
- 4 Injection of fraudulent financial transactions.
- 5 Criminal employees tampering with financial transactions.
- 6 Incoming fraudulent payment orders from hacked correspondent banks.

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ABOUT INCENTAGE

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Through our collaborative and efficient approach, we help our clients successfully innovate, increase revenue, manage risk and regulatory change and reduce costs.

We serve our clients across the Americas, Europe, and Africa.

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