



Course Reference: B1002I

## EMV Training – Mastering EMV Implementation



This 3-day seminar provides well-balanced business and technical insight on EMV implementation.

It will present the card migration steps and impacts on the bank's different systems, giving a clear vision of the forthcoming migration challenges. This seminar also introduces the Risk Management features available at both Point of Transaction and Back-office systems.

### Objectives

At the end of the training, you will:

- **Understand the EMV transaction (interaction between card & terminal)**
- **Master and take advantage of the mechanisms proposed by EMV to secure your transactions and develop new services**
- **Understand EMV migration impacts on your system**
- **Be able to identify the main lines of your future migration strategy**

### Key topics

- **Introduction to EMV**
- **Business and Security benefits of EMV**
- **EMV Migration Impacts on the Bank IT Infrastructure (Card issuance, authorization system, acquiring system)**
- **Risk Management**

### Who should attend

All people from management working in Banks, Software Houses, Payment organizations, and involved in the EMV migration process, such as:

- Product Managers
- Security & Fraud Managers
- Operations Managers
- Project Managers
- IT Managers

### Each session consists of

- Complete training manual

### Pre-requisites

- This training does not require any specific technical skills
- This course is held in English. On customer request a session in French can be organized.

**Duration:** 3 days

**Location:** Gemalto premises<sup>1</sup>

**Course fee:** € 2099 per person<sup>2</sup>

<sup>1</sup> All training courses can be held on-site at customer premises, or at one of the Gemalto training centers. Please contact us for more details.

<sup>2</sup> Price does not include any taxes

For further information about registration, course schedule:  
please contact us via email to: [banking.training@gemalto.com](mailto:banking.training@gemalto.com)  
or visit our web site: <http://www.gemalto.com/>



Course Reference: B1002I

## Course schedule

When performed at customer premises, the agenda is tailored to customer attendance profile. The standard agenda is provided below:

### Day 1: Introduction to EMV - Business and security benefits

#### EMV General Overview

- Major differences between a magnetic stripe transaction and a chip transaction
- Migration impacts - overview

#### EMV Specifications / Payment System Implementation

- Analysis of the differences between the EMV specifications and the EMV implementations defined respectively by Visa and MasterCard

#### EMV Business Benefits

- Review of the major business benefits of the EMV chip card

#### EMV Security Benefits

Analysis of the security mechanisms defined in EMV to reduce fraud and limit the financial risk taken by an Issuer:

- Solutions provided by an chip EMV card to improve the security of offline transactions
- Solutions provided by chip EMV card to improve the security of online transactions
- Selection criteria between the Offline authentication methods defined in EMV (SDA/DDA/CDA)

### Day 2: EMV Impacts on Bank IT Infrastructure

#### EMV Migration Impacts on Card Issuance

- General overview of the contents of a chip card
- General Overview of the impacts on card personalization (card data preparation and card personalization – review of the possible scenarios)
- Card Platform selection
- Analysis of the card platform currently available on the market (native card / Multi-application card)

#### EMV Migration Impacts on Acquiring System

- EMV Impacts on POS and ATM (functions impacted by EMV, certification procedures defined by Payment Systems)
- EMV Impacts on acquiring network

#### EMV Migration Impacts on Back Office / Front Office

- EMV Impacts on Bank Authorization System and Clearing System
- Security improvement of non-face-to-face transactions
- How EMV may be used to improve non-face-to-face transactions (internet banking / E-Commerce using 3D-Secure)

For further information about registration, course schedule:  
please contact us via email to: [banking.training@gemalto.com](mailto:banking.training@gemalto.com)  
or visit our web site: <http://www.gemalto.com/>



Course Reference: B1002I

### Day 3: Risk Management during an EMV transaction

#### EMV transaction flow

- Review of the checks performed by the terminal during a transaction

#### Risk Management algorithms during an EMV transaction at the point of interaction

- General overview of the Terminal Risk Management algorithm
- General overview of the Card Risk Management algorithms defined by Visa (VSDC) and by MasterCard (M/Chip version 4)

#### Risk Management scenarios at Front/Back Office level

- General Overview of the new risk management checks available at Issuer Authorization System level
- Review of the possible implementation scenarios
- Dependence between Card Risk Management parameter values and implementation selected by Issuer for Front/Back Office Systems
- New Stand-in Services available in Visa Stand-in System and MasterCard Stand-in System related to chip data processing.

### Related Courses:

EMV Business  
Impacts  
(B1001I)

Mastering EMV  
Implementation  
(B1002I)

EMV Migration for  
Issuers  
(B1003S)

EMV Migration  
for Acquirers  
(B1004S)

EMV Migration for  
Personalization  
Bureau  
(B1005S)

Site Evaluation  
and Migration  
Plan Definition  
(B1011W)

Workshop on  
Card Issuance  
Requirements  
(B1010W)

For further information about registration, course schedule:  
please contact us via email to: [banking.training@gemalto.com](mailto:banking.training@gemalto.com)  
or visit our web site: <http://www.gemalto.com/>