Collis Test Tools

Collis Card Spy

Who is it for?

Collis Card Spy is essential for anyone in the business of smart cards and card accepting devices that wish to thoroughly analyze card-terminal communication. Collis Card Spy can be used in the payment, e-identification, and transit industry.

Why do you need it?

Collis Card Spy offers a unique solution for analysis of the card-terminal communication, whether it is contact or contactless, and investigating any problems that may occur.

Collis Card Spy is an ideal tool when it comes to troubleshooting interoperability-related problems between cards and card accepting devices, such as EMV payment terminals (POS or ATM), eMRTD readers, and AFC readers.

What is inside?

Collis Card Spy provides an automatic interpretation of smart card commands and responses. The tool shows the exchange of data between a smart card and card accepting device in a clear, logical, understandable manner on your screen. This gives a good, clear view of the facts.

Furthermore, the time stamp feature allows for accurate time measurements on the byte level. In this way you can carry out your required performance measurements.

Collis Card Spy supports cross-industry data interpretation on contact and contactless communication:

Contact

- Generic: ISO 7816-3 and 7816-4
- Payment: EMV

Contactless

- Generic: ISO 14443
- Payment: MasterCard *PayPass*, Visa payWave, American Express ExpressPay, Interac Flash
- E-ID: ICAO
- Transit: MIFARE DESFire

Collis Card Spy works in conjunction with the industry-proven hardware Collis SmartLink Box (contact) and Collis SmartWave Box (contactless).

Key benefits

- In-depth spying of communication between the smartcard and the terminal
- Assists in fault cause analysis of interoperability problems
- Comprehensive reports including insight to application logic
- Save time through fast analysis
- Easy-to-use

Collis Card Spy

Specifications

For **Contactless** cards:

GENERIC

- **ISO 14443**
  Low level data interpretation will be given for type A or type B card protocol, RF on and RF off events.

PAYMENT

- **MasterCard *PayPass***
  Application data layer interpretation is given according to the MasterCard *PayPass* specifications.
- **Visa payWave**
  Application data interpretation is given according to the Visa payWave specifications.
- **American Express ExpressPay**
  Application data layer interpretation according to the AmEx ExpressPay specifications.
- **Interac Flash**
  Application data layer interpretation according to the Interac Flash specifications.

E-IDENTIFICATION

- **ICAO**
  Application data interpretation is given according to ICAO specifications.

TRANSIT

- **MIFARE DESFire**
  Application data interpretation is given according to the MIFARE specifications.

For **Contact** cards:

GENERIC

- **ISO 7816-3**
  Low level data interpretation will be given for T=0 and T=1 protocol, clock-changes and supply voltage events.
- **ISO 7816-4**
  Application data layer interpretation is given according to the ISO standard.

PAYMENT

- **EMV**
  Application data interpretation is given according to the EMVCo specifications. The data interpretation also includes the proprietary data elements specified by the payment schemes such as MasterCard, Visa, American Express, Discover, etc.

Hardware

- Contact testing: **Collis SmartLink Box**
- Contactless testing: **Collis SmartWave Box**

Technical Support

To ensure that you can effectively use the tool and gain the maximum benefits, UL offers for tools a Service Contract that gives you access to our Technical Support services. Our experienced technical team is available to provide support, advice and guidance.

The following services are covered

- New releases
- Helpdesk support
- Bug fixes
- Instant hardware replacement

You can access these services through the MyCollis service site at www.mycollis.com.