Fact sheet on switching modem applications to IP

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Many applications still communicate using voice modems through a traditional landline network similar to a telephone. There are less expensive and more efficient options via IP or mobile networks, and switching to the newer technology is often a sensible idea.

From 2018, complete switch of landline-based telephony to IP region by region

With All IP, Swisscom is providing the technical basis for the digitisation of Switzerland as a business location and thus for our customers to remain competitive. Thanks to All IP, they are always connected to all their services and data on all their devices. **By the end of 2017, nearly all of Swisscom's residential customers and most business customers in Switzerland had switched to All IP. Since the start of 2018, the first municipalities and larger regions have been switching over to All IP so that the decommissioning of the old network infrastructure can proceed.** The affected regions benefit from the latest communication options.

IP potential in future

Technological advancements never stand still. That is why the switch to IP telephony is an important driver for new innovations. When using a mobile network, the bandwidth alone is significantly greater than when using a modem with the traditional landline network. The switch will allow a number of these applications to be transferred to simple, wireless data communication, which will bring with it a great deal of added value.

Which applications are affected?

The only applications affected by the switch are those that currently use traditional landline-based data transfer (analogue or ISDN). There are a number of systems that are not affected because they only use mobile networks for data transfer, or else they have already been switched over to IP.

Procedures for applications that transmit data via traditional landline networks

If your application uses the traditional landline network to transmit data, you have the following options:

Hybrid

Dual solutions offer the most security because they transmit signals primarily via IP and secondarily using mobile networks. This is considered the most secure method of transfer and is more secure than traditional transfer via landline networks. This transfer method is preferred for critical applications.

Mobile network

For most applications, a connection to a 3G/4G network will be the best alternative. Nowadays, these connections are inexpensive and reliable. Wireless communication usually offers lower installation costs as well. Swisscom will only support 2G mobile technology (GSM, GPRS, EDGE, CSD) until the end of 2020.

Landline IP network

A purely IP connection can be advantageous when it can be simply integrated into the LAN. This makes it easier for the application to communicate with other machines in the network or to monitor the application directly.

Landline – Voice over IP

The existing modem will often function smoothly using the analogue interface of the router. This can be a utilitarian solution, particularly for non-critical data transfer. The connection must be checked regularly and paired with the modem's remote terminal.

Emergency power supply for the system and transmission

If you would also like to ensure transmission even in the event of a power outage, we recommend a two-way solution, whereby a combination of landline and mobile network creates a real redundancy. Swisscom is unable to provide any guarantee regarding the network-side independent power supply (Swisscom landline). An emergency power supply for the router is useful during local power cuts where the Swisscom landline is not affected. A fail-safe option has been available for the Swisscom Line basic product since June 2017. An Uninterruptible Power Supply (UPS) system with battery backup is provided with the router. For more details see: www.swisscom.ch/fail-safe

What should the owner of an application with modem transmission do?

Owners of these kinds of applications should deal with the topic of operating their systems over IP today. We generally recommend that they switch their application before the telephony network is switched. This will allow them to decouple the two projects and make the future transition to telephony over IP simpler. Contact your supplier; they will be able to advise you further.

www.swisscom.ch/ip