# Mobile to Mobile

End-to-end mobile communications testing

ANALYTEK

Need to test data streams such as bespoke encryption carried on top of the standard GSM communication layers without compromising the security?

To test using standard GSM test equipment involves connecting a single mobile and would require divulging sensitive encryption methods to the test equipment manufacturer for any meaningful analysis. To prevent divulging the algorithm, testing could be performed via live GSM networks. However, if the encryption algorithm between mobiles is negotiated, then it is very difficult to assess which algorithm (if any) has been utilised.

Analytek have developed a solution that provides a permanent GSM simulation to which two mobiles may be connected using either a *Rohde & Schwarz CRTx02 or CRTU-G*. This "end to end" solution allows the two mobiles to provide the encryption and decryption while still giving the operator access to the GSM layers for verification that the encryption has functioned correctly over the GSM network. This implementation keeps the encryption algorithms secure with the customer.
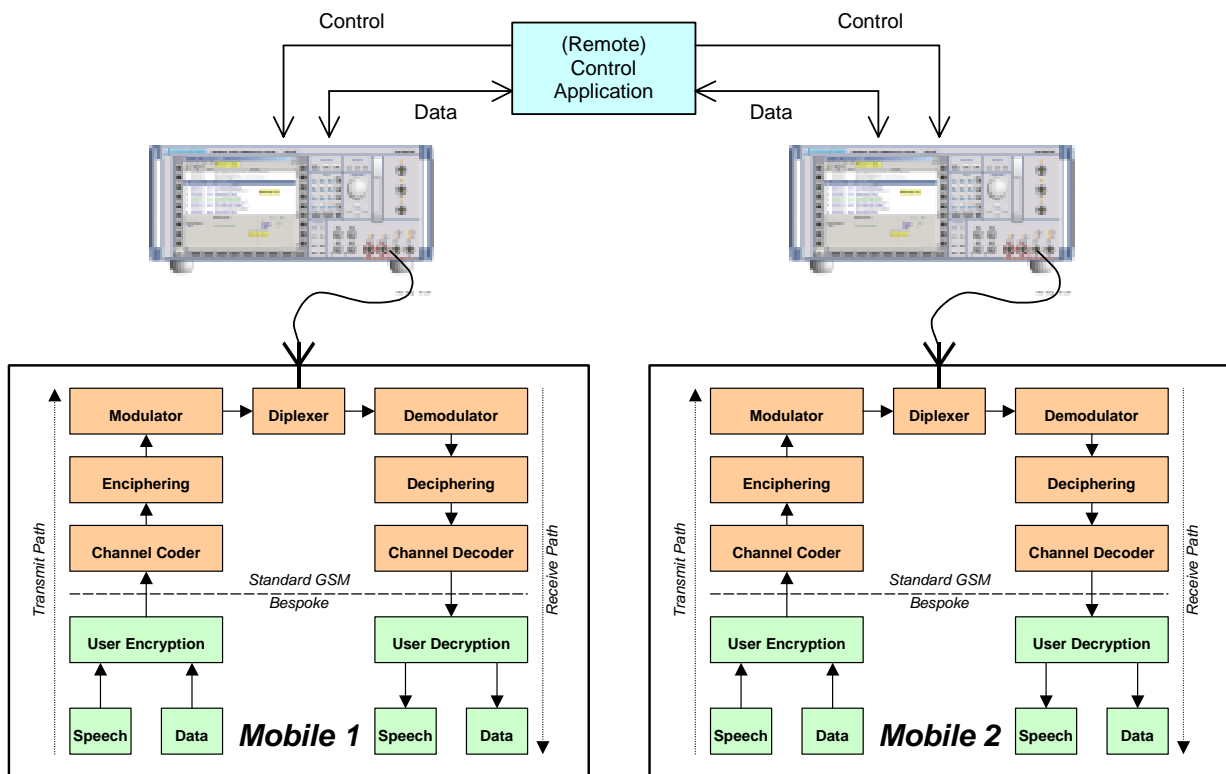
Features

o Used to test encrypted calls between two custom mobiles, speech or data or SMS.

o Prevents the need to disclose the encryption algorithm to the test equipment manufacturer / developer.

o Network Simulation puts up permanent GSM carriers allowing either mobile to establish and clear calls.

o Full logging of the data between both of the Mobiles and the Network Simulation instruments.

o Online access to traffic data stream for analysis available.

o Post analysis down to burst-by-burst bit stream available.