A DATA CENTRE FOR
MEDIUM-SIZED BUSINESSES

For the cabling of its new data centre, the Frings Solution Group chose the copper and fibre-optic system solutions from Datwyler.

The Frings Solutions Group, headquartered in Hilden, sees itself as a technological and service-providing partner for individual solutions and services for everything to do with communication, IT and building technologies. Together with its subsidiaries – system integrator Frings Informatic Solutions, Frings Building Solutions and the cloud-distributor Axxess Digital Solutions – the group offers companies of all kinds and sizes tailor-made all-round packages.

In order to be able to offer its customers an even more comprehensive range of products and services in the area of smarter communication, in June 2016 Frings took its own hosting and colocation data centre into operation. In its current stage of development, it consists of a control room, a service area and two server rooms with a total of 550 square metres of space that can be utilised. 40 racks in each room provide capacity for 1,600 servers.

The fully air-conditioned data centre is TÜV and Cat-II certified in accordance with the provisions contained in the basic-protection catalogue of the Federal Office for Information Security (BSI) and offers customers a fail-safe rate of 99.75%. It meets the highest possible standards in terms of fire protection, the provision of general services and security, as well as access controls. It is currently being predominantly used by medium-sized companies from the wider Hilden/Düsseldorf region.

Redundant copper and fibre-optic networks

In terms of data technology, the data centre is connected to the network of two Carriers with a bandwidth of 10 gigabits per second from two independent nodal points. The power supply is provided via redundant cables at two different positions in the building and is laid connecting to two respectively independent network racks inside armoured steel tubes.

Going outward from this point, the backbone cabling is redundant and star-shaped – and this applies to both the fibre-optic cables, as well as the copper network. Frings chose the "Datwyler Data Centre Solution" with pre-assem-

bled cables and components with which to complete the fibre-optic network. The pre-assembled 6-fold Category 7_A trunk cables and Category 6_A connecting hardware were used for the copper network.

Best product and service quality

Frings has been a Datwyler Premium Solution Partner for many years. It is not any wonder then that the Solution Group procured the entire passive data-cabling system from the Datwyler branch in Hattersheim.

In the server racks, Frings installed a total of 20 FO-DCS sub-racks with FO cable management and 23 modular FO-DCS modular panels, which currently contain 56 breakout and 158 RJ45 plug-in modules. The plug-ins are connected with 28 12-fold OM4 fibre-optic trunks and 52 6-fold flexible copper trunks, of between 9 and 64 metres in length respectively. In addition to that were three OS2 single-mode trunks, a further 25 copper patch panels and around 450 patch cables produced from copper and optical fibres.

"The working relationship with the Datwyler team on this project was excellent as always – from the support provided in relation to detail-related questions that came up, to the on-time delivery of the required cables and through to the system components", is how Thomas Riedel, responsible Project Engineer at the Frings Solutions Group, summed up his experiences. "The system solutions provided by Datwyler were quick and easy to install, and they provided us with the performance that we required from day one."

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