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118 Mall, Kuala Lumpur:

DATA NETWORK FOR ICONIC SHOPPING CENTRE

Interview with Jaione Pagazaurtundúa-Alberte, Microsoft

**KEY TECHNOLOGIES** 

FOR FASTER INNOVATION

Edge computing:

MANY-FACETED

**END-TO-END SOLUTIONS** 

DATWYLER

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# **EDITORIAL**

# ARTIFICIAL INTELLIGENCE

- cutting edge technology with drawbacks

# Dear Readers, Ladies and Gentlemen,

Something big is coming our way. Or rather it is already here, in our midst, partly without our even noticing it! It is in our mobiles, in most CCTV cameras, in our photography and video equipment, in the electronics of our holiday aircraft – and yes, in our beloved cars as well. We are talking about artificial intelligence. Al has already been successfully used in many areas for quite some time. It performs tasks which would totally overwhelm us humans if we had to carry them out ourselves.

Datwyler IT Infra also makes successful use of artificial intelligence. Our edge computing applications in the sphere of Industry 4.0, for example, work increasingly with AI technology, register the tiniest changes on hundreds of sensors and cameras and alert us in real time to threatening developments, thus allowing worse damage to be avoided. It would now be unthinkable to do without Al in traffic monitoring, supermarkets and warehouses or in governmentrelated entities like the police, border protection or customs. We and our solutions are involved in all these organisations.

Experience teaches us that all progress is associated with certain snags and drawbacks. Unfortunately artificial intelligence can also be used for illegal purposes. Composing student assignments or postdoctoral theses using artificial aids is still relatively harmless. On the other hand, cracking passwords in seconds or the self-learning control of killer drones, other weapons and satellites tend to horrify us.

Particularly worrying is the fact that this technology is making such rapid advances that both education in and legislation on this development are lagging incredibly far behind. The danger here is a loss of control, with an impact on our society as yet quite impossible to foresee.

As things stand at present all we can do is appeal to people's common sense and hope that we will be able to use



this very exciting technology to our benefit and successfully overcome the risks it involves.

I hope you enjoy reading this issue of our customer magazine. I can assure you that we have compiled all the articles - including this editorial - with heart and mind, and without the aid of artificial intelligence.

Kind regards

Johannes Müller

**CEO Dätwyler IT Infra AG** 

Datwyler IT Infra 3 Datwyler IT Infra



Head office of Arthur Weber AG in Seewen

The new data centre of Arthur Weber AG meets the highest quality and security requirements. Datwyler supported this project from conception through to commissioning.

Arthur Weber AG, based in Seewen, Canton of Schwyz, is one of Switzerland's leading suppliers of structural product systems, tools and ironmongery. The owner-run family business was established in 1868 as a hardware company and today employs a workforce of more than 900 at over 30 locations.

At the head office Arthur Weber operates a data centre which provides the business-critical IT applications. This is where the data from all the sites converge. Two years ago it was decided to replace the existing data centre with a modern one which

would cope with the company's increasing quality, security and data protection requirements. "A reliable and highly available ICT infrastructure is an obligation for a company like Arthur Weber AG," explained Philipp Weber, Director of ICT.

An on-premise data centre is a basic component of IT strategy because the company wants to retain data sovereignty inhouse. By comparison with a cloud connection the in-house solution also offers a better cost-benefit ratio: the ICT Director is convinced that "security in a manageable and self-administered environment is easi-

er to handle than in or with an external one." For this purpose Arthur Weber AG has its own specialist department with a great deal of expertise.

The customers will also benefit from the new data centre, and not only as regards data security: "It was particularly important to us to be able to continue serving them even in the event of a possible power failure or Internet outage," says Philipp Weber. "It's all about responsibility, trust and long-term relationships, so that we can be a strong and reliable partner for our customers in future as well."

# **Stringent requirements**

In October 2021 Datwyler was commissioned by R. Mettler AG, the planning consultants responsible, to prepare a non-binding offer based on the available key data. Possible solutions were explored



when the ICT team and the consultants visited Altdorf in January 2022, and further project details were clarified. It quickly became clear that a Mini Data Centre would be the best way to meet the requirements. Datwyler was able to provide a tailor-made solution which made optimum use of the existing space. The order was placed in the spring of 2022 because, as the ICT Director said, "the price and the proposed solution added up."

Thanks to forward planning by the Datwyler service team the Mini Data Centre was already installed in September 2022 – despite supply difficulties in the market. Datwyler delivered the customer-specific solution in fully preassembled form so as to save time on site. The existing IT infrastructure was integrated into the new data centre and expanded.

# Failsafe solution

The new Mini Data Centre comprises a system rack containing the UPS system among other things, and three connected server racks. The fully enclosed solution is air conditioned by two slim in-row coolers and a classic redundant DX system with split unit and compressor. In each rack a normal PDU and a UPS-assisted "intelligent" PDU (iPDU) take care of the power distribution. A mobile standby power system, which can operate the data centre for days in an emergency, stands ready in the event of a power failure. There is also a system for early fire detection.

The DIMS – Datwyler's Infrastructure Monitoring System – used to monitor the Mini Data Centre was specially configured for Arthur Weber AG. Current energy con-

 ${\it Customised\ data\ centre\ solution\ from\ Datwyler}$ 



Redundant high-speed cabling in the rack

sumption, backup times and other important parameters can be seen at a glance on the system dashboard at all times. In the event of a fault in the IT infrastructure the DIMS transmits alerts via email or SMS.

# Reserve capacity for future applications

Philipp Weber sees the biggest advantage of the new data centre as being that it minimises the risk of outages, which can incur considerable expense. "We previously had two racks – without redundant cooling and cabling – and only one small UPS which was just enough to shut down the servers in the event of a power failure. With the new solution we can also iron out local interruptions during the night or at the weekend. Now even in a worst-case scenario in Seewen the other sites can continue working thanks to the clean geo-redundant connection."

His conclusion is positive in every respect: "We now have a neat, reliable solution which gives us 100 percent service availability. It is scalable, and thanks to the allowance made for reserve capacity the new Mini Data Centre can also be used for future applications." (dap/dir)

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In the autumn of 2019, it was decided to build a new Tergooi MC in Hilversum, North Holland. The new hospital was created to bundle all acute, intensive care and regular care in one place and to enable patients from the region to benefit from modern medical treatments and modern infrastructure.

The new Tergooi MC, with a capacity of 525 beds, will be built right next to the existing hospital on the 55,645 square metre forest area of Monnikenberg on the outskirts of the city. In the four buildings, which are surrounded by greenery on all sides, floor-to-ceiling windows, light building transitions, green roofs and large patios will ensure that they are in harmony with the natural environment. At the end of the construction work, most of the old buildings from the 1950s will be demolished. Only one wing is

being renovated to house offices, laboratories and technical services.

Sustainability plays an important role in the new construction, not only in terms of architecture, but also when it comes to the use of state-of-the-art technology. For energy-efficient operation, heat pumps and a cold-heat storage system are being utilised, which use the thermal energy of 120-metre-deep water layers. All buildings will also have their own machine and electrotechnical rooms, including power generation and air conditioning, and solar panels on the roofs to be able to produce most of their required energy.

# Copper and fibre optic cable systems

When choosing the new IT infrastructure, Tergooi MC also wanted to install a highperformance solution that guarantees a stable and efficient IT operation in the long term. The data network had to be able to transmit all services and applications not only quickly but also reliably.

Datwyler IT Infra was selected to equip the four new clinic buildings with an appropriate copper and fibre optic network solution. The installation was performed by Conecto Networks B.V., an experienced, certified Datwyler Solution Partner.

# Securely connected: the new clinic buildings

Datwyler provided a high-quality solution for the cabling of the four new clinic buildings, including 340 kilometres of category 6<sub>A</sub> copper cable and approximately 6500 data connection points. All services such as Internet, WLAN, telephony and surveillance are integrated in this communication net-

work. In addition, there is about 10 kilometres of fibre optic cable for the backbone, which connects the buildings, and 54 racks for a total of 16 main and sub-distributors.

The construction of the network infrastructure started in May 2021 and required a great deal of coordination right from the start: with the main contractor BAM Bouw en Techniek – Speciale Projecten, the installation combination consisting of ULC Installatietechniek and BAM Bouw en Techniek and last but not least with the other involved parties on the construction site. Because the cables could only be laid section by section, floor by floor and each time within a tight time window, the just-in-time delivery of the required material was all the more important. "Fortunately, Datwyler is a very reliable supplier. Over the past few months, we have been able to fully rely on

the Datwyler team in every construction phase," says Ton Beij, the Project Manager at Conecto Networks.

# **Special installation requirements**

Another challenge was that both the main and the sub-distribution racks had to be placed on the fifth floor in each building – together in just one room and in four different zones. In order not to exceed the maximum length of 90 meters when laying the copper cables, a high degree of knowledge and experience was required.

Meanwhile, the Conecto Networks team was able to complete the installation on time. "Our installers are happy that they were able to work with Datwyler products. Because the cables are robust and easy to lay. In addition, the connectors – just like the panels – are easy to assemble. Another rea-

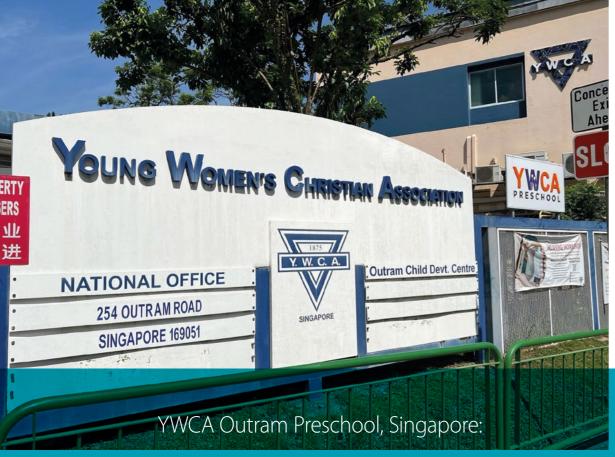
son why the installation went largely without a hitch," Ton Beij sums up.

The commissioning of the new building is planned for 2023. The Tergooi MC will receive a 25-year system warranty from Datwyler on the installed network. (emt)

Network cabinet from the back side



panorama 6 Datwyler IT Infra



# COMPACT **COMPUTING POWER**

A Micro Data Centre from Datwyler was installed in a YWCA preschool in Singapore. This saved time and money.

The Young Women's Christian Association (YWCA) is the largest ecumenical women's organisation in the world. In 125 countries throughout the world the charitable organisation promotes the (self-) empowerment of girls and young women.

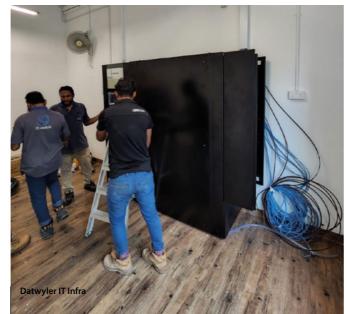
In Singapore the YWCA runs a preschool in the Outram district. The YWCA operates a server room here. As part of expansion and refurbishment work the data cabling was to be renewed and the IT room moved to the second floor. The challenge was to set up an enclosed IT room in an existing space – a former classroom – as the current fire restrictions in Singapore do not permit this.

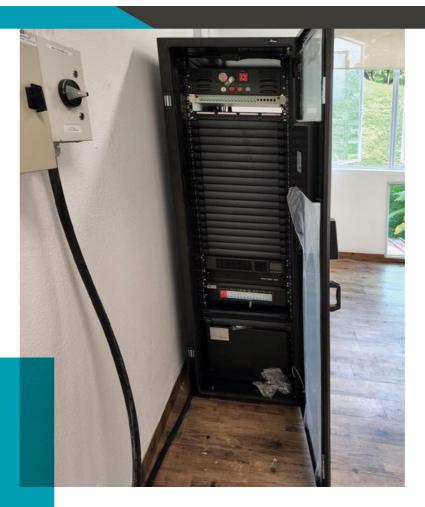
Those in charge of IT at the YWCA turned to Advanced InfoComm Pte Ltd, a local IT service provider, which has many years of experience with multinational companies from a wide variety of industries. Advanced InfoComm has been collaborating with the Datwyler team in Singapore for many years, and supplies its customers with Datwyler's structured cabling and data centre products and solutions.

## Conforms to fire safety regulations

In June 2022 Advanced InfoComm suggested that a Micro Data Centre would suit the YWCA. This is an integrated system including

# Installation of the Micro Data Centre





power distribution, cooling, UPS and active network equipment - and is available from Datwyler in a completely enclosed rack.

The YWCA immediately took up the suggestion. On the one hand this solved the problems with the fire safety regulations, and on the other it kept the renovation work to a minimum, for thanks to the Micro Data Centre a separate air conditioned room does not need to be set up for a single server rack.

### A multitude of benefits

The Micro Data Centre provides the YWCA with a multitude of benefits: in addition to the components mentioned it also houses the structured cabling management system - likewise the environmental management software which allows the visual centralised monitoring of the entire IT infrastructure using sensors (smoke, water, temperature), thus ensuring the safe operation of the active equipment. The cooling unit integrated in the rack also ensures high energy efficiency (Power Usage Effectiveness, PUE).

Installation took place in December 2022. It was accomplished relatively quickly, since the Micro Data Centre is a plug-and-play solution which Datwyler delivered in prefabricated form.

The YWCA is currently examining the possibility of also using a Micro Data Centre in the hotel which it runs in Singapore. The existing data centre solution could, moreover, be expanded in the near future should the IT requirements increase. (jic)

Siamese Rama 9, Bangkok:

# **LUXURY ENSEMBLE**

Siamese Rama 9 – part of the Landmark @MRTA Station Residential Complex in Bangkok – is a mixed-use condominium project developed by Siamese Asset. It is located

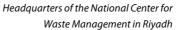
2024, Siamese Rama 9 will include over 2000 residential, office and commercial units. Residents will enjoy a wealth and library, a Skypool, a bar and roof restaurant. Like the

The developer found a reputable and experienced parttegrated optic fibres. (ivt)



Datwyler IT Infra





had been allowed for in the schedule. As far as cost was concerned it was also completed within budget.

# **Extremely positive results**

"The solution gives us the flexibility and scalability which we need to be able to react guickly to new requirements, and will help us cut our energy consumption and operating costs," summed up Bilal Alshabbah, MWAN Senior Infrastructure Consultant, following the successful handover of the data centre. "The expertise and support of the Datwyler team members during the whole project were invaluable, and we look forward to working with them again

With ongoing support and maintenance services Datwyler Middle East is ensuring that the new data centre will always continue to deliver the best performance. (mua)



Energy efficient: the Smart Modular Data Centre in the MWAN head office

The National Center for Waste Management (MWAN) is a Saudi Arabian government authority responsible for managing the kingdom's waste and promoting more sustainable waste management practices. The MWAN is pursuing the goal of designing the waste sector effectively and sustainably by improving tried and tested procedures and using state-of-the art technologies.

Last year a data centre was installed in the Riyadh head office to support the authority's business operations. A Smart Modular Data Centre from Datwyler was selected.

In September 2022 Datwyler Middle East together with its local partner Zamil Information Services successfully installed and handed over the solution. The data centre solution was custom-made to meet specific MWAN requirements. It features modular components which can be reconfigured and scaled as required. This flexibility en-

sures that the user can always react to changing business requirements without the need for expensive and time-consuming infrastructure upgrades.

# Reduced CO<sub>2</sub> footprint

The new data centre at MWAN head office comprises six IT racks, two in-row coolers and a power rack designed for an IT load of 30 kVA. The modern cooling system is highly efficient and environmentally friendly: it maintains the optimum operating temperature, at the same time keeping energy consumption to a minimum. This enables the authority to reduce its CO<sub>2</sub> footprint and cut its operating costs.

Datwyler and Zamil Information Services collaborated closely with the team from MWAN to ensure that the installation and configuration met the specifications. The installation was completed on time - with a brief interruption in business operations which

118 Mall, Kuala Lumpur:

# **DATA NETWORK**

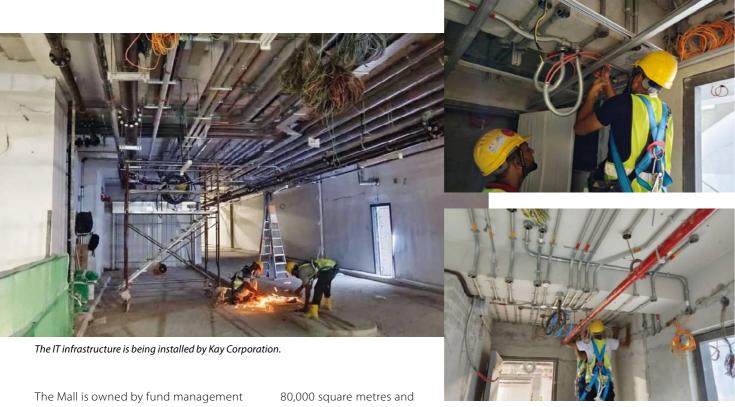
# for iconic shopping centre

The decision to adopt a Datwyler solution was made when communication cabling was being chosen for 118 Mall in Kuala Lumpur.

At almost 679 metres the Merdeka PNB 118 skyscraper in the heart of Kuala Lumpur is the highest building in Malaysia and the second highest in the world. In recent years a gigantic shopping centre was created at its base. This is 118 Mall, which owes its name to the number of storeys in the neighbouring office and hotel tower. After the opening, which is scheduled for late 2023, it will provide the inhabitants of the Malaysian capital with a wide range of retail outlets, luxury brands, household goods, restaurants, electronics, fashion and entertainment attractions.

Merdeka PNB 118 in Kuala Lumpur is the highest building in Malaysia.





company Permodalan Nasional Berhad (PNB). It has invested around 165 million US dollars in the lifestyle shopping centre. The project occupies a floor space of

400 businesses on seven

floors. It is covered by a unique glass dome which – as part of the owner's efforts to promote sustainability – is de-

The shopping centre at the base of Merdeka PNB 118 is scheduled for completion by the 4th quarter of 2023.



signed to introduce a lot of natural light into the centre of the building.

# **Quality and security**

The IT infrastructure of the new building is being installed by Kay Corporation Sdn Bhd, which is also responsible for project management. Kay Corporation is an experienced electrical engineering company specialising in medium, low and extra-low voltage projects as well as in ICT projects in the private and state sector.

The Mall's new communications network comprises around 300 kilometres of low-smoke, halogen-free Category 6 copper data cable and 6000 data connection points. All of this comes from Datwyler IT Infra. Kay Corporation opted for the Datwyler solution because it provides excellent quality and reliability.

With the Datwyler system warranty, which is valid for 25 years, the developer will benefit from long term investment security.

Last but not least, the new IT infrastructure will help to ensure that tenants have seamless connectivity and that visitors enjoy a pleasant shopping experience. (tzp)

Icon+, Depok:

# Computing power CLOSE TO CUSTOMERS

Internet service provider Icon+ is building a distributed data centre in West Java. This project makes use of a container solution from Datwyler and its partner PT Kilat Wahana Jenggala.



Data centre container from Datwyler

In 2001 Icon+ began its business activities with a network operations centre (NOC) in Gandul, in the Cinere district of Depok. Established as a subsidiary of the state Indonesian electricity company PT PLN (Persero), the basic task of Icon+ was to monitor and maintain their telecommunications network.

With the sector's growing need for networks which provide a consistent level of availability and reliability, lcon+ developed its business further, also making the free capacity of the fibre optic network accessible to companies and private households. Today lcon+ divides its offerings to the corporate client segment into four categories, namely ICONect, ICONWeb, ICONBase and ICONApps. Fixed broadband Internet is available to private customers as ICONNET.

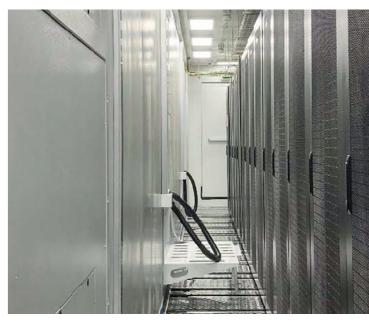
Not only does digitisation involve rapidly increasing demand, it is also important to increase service assurance – the quality of the services offered. Icon+ has recognised that more data centre capacity is needed for this, for instance to be able to offer customers more storage space and lower latencies. To this end Icon+ is pursuing the concept of edge computing design and is building a distributed data centre which includes several outdoor containers.

### Turnkey solution

Last year lcon+ took the decision to use a data centre container offered by Datwyler and its partner PT Kilat Wahana Jenggala. This is a turnkey solution which includes both the complete IT infrastructure as well as construction of the platform together with a generator and diesel tank.

Building work on the platform began in early 2023. At the same time the container was assembled and delivered.

Once installation is complete Icon+ will have a Datwyler Mini Data Centre with five racks and in-row cooling (40 kW output), designed for an IT load of 40 kVA. (frs)



Complete data centre infrastructure in an outdoor container

Farasis Energy, Zhenjiang:

# BECAUSE IT'S ABOUT SUSTAINABILITY



There is a growing consensus in Chinese society about concepts such as sustainable development and living. For this reason the demand for clean, green energy in the People's Republic is currently growing rapidly.

As one of the leading lithium-ion battery manufacturers, Farasis Energy's mission is to "provide green energy and build an intelligent world". Since it was founded the company has focused on the research, development, production and sale of these ternary lithium batteries. They are mainly used in electrically operated passenger and special vehicles as well as in motorcycles. In terms of installed capacity, Farasis Energy has held the number one spot in China for four consecutive years.

Datwyler is supporting Farasis Energy in setting up a new production site in Zhenjiang.

# **Network products and services**

In order to be able to offer more and better "clean energy" products and services, Farasis Energy has expanded its production base with a location in Zhenjiang. Since the beginning of 2022 Datwyler has been supporting the company as a top supplier of the required IT infrastructure with a wide range of products and services.

The communication network of Farasis Energy Zhenjiang Co., Ltd. includes over 10,000 data connection points. More than half of these are shielded cat. 6<sub>A</sub> ports. Double-shielded category 6<sub>A</sub> data cables from Datwyler are used here. A single-mode cable, also from Datwyler, was chosen for the backbone cabling. More than 60 kilometres of this cable were installed.

### Sustainable data centre solution

In order to provide a stable operating environment for IT, several Datwyler Mini

Data Centres were installed at the Zhenjiang site. This decision was based on the general requirement of large, sustainability-conscious companies for green energy, high efficiency, low consumption and low  $\mathsf{CO}_2$  emissions. In addition, the mini data centre solution enables the intelligent management of the distributed IT devices.

Despite the restrictions imposed by the COVID-19 pandemic, the installation of the data centre solution, including testing and commissioning, was completed on time – and in just five days. This is an impressive example of Datwyler's product performance and ability to deliver.

Farasis Energy expressed their satisfaction with the collaboration. With this project Datwyler has created a solid basis for future cooperation in the construction of further production sites. (gas/mew)

# Farasis Energy's new location in Zhenjiang





A future-proof data centre solution – Datwyler's Smart Modular Data Centre – has been installed at Sajaya.



The new data centre at the company's head office

Sajaya is a company which is based in Riyadh and provides medical care for people. Sajaya is taking a comprehensive approach here, following the highest standards and using the latest medical technologies as well as advanced electronic applications.

Together with its local solution partner, NTC Digital Technology, Datwyler was

awarded the contract to provide a reliable, high-performance data centre infrastructure in the company head office.

In July 2022 a Smart Modular Data Centre was installed there as a Tier 1 solution. It comprises eight IT racks, three cooling units and a power rack, designed for an IT load of 40 kVA. In addition to this it has an

uninterruptible power supply (UPS), intelligent power distribution units (iPDUs), and access control, fire suppression and monitoring systems.

# Flexible and scalable

Datwyler's Smart Modular Data Centre ideally meets the requirements of a medical service provider: it is a prefabricated solution which can be installed on site as plugand-play and which is very flexible and easily scalable. Its cooling system is designed for energy efficiency, so helping to reduce operating costs. Last but not least, the installed data centre has a high level of security to protect confidential data.

"We are pleased about the partnership with Datwyler in the installation of the Smart Modular Data Centre," explained Syed Yousef Quadri, IT Operations Manager of Sajaya Medical Care Services. "Datwyler's expertise and their state-of-the-art solution enable us to achieve a high degree of efficiency in our data centre operations." The successful installation was also a milestone on the company's road to digital transformation. (soa)

# ElisabethenPark



ElisabethenPark, Lucerne:

# PIONEERING RESIDENTIAL PROJECT

For future-oriented living in old age the ElisabethenPark has equipped all its new buildings with a communications network from Datwyler.

In early 2023 the ElisabethenPark was completed in the Bruchmatt quarter of Lucerne. Three new buildings designed to meet the future requirements of the elderly were erected on a site of around 7300 square metres near the centre of town. They house an 85-bed nursing home, 37 apartments – with and without support services – as well as communal lounges, a bistro, a "quiet room" and three event spaces. There are plans for a dental labora-

tory and dental practice. Between the apartment buildings there is an inviting central leafy square for sitting and relaxing. A petanque piste can be used as a meeting place for those who enjoy playing.

In late January 2023 the residents of the previous Elisabethenheim in Oberhochbühl, run by the Lucerne Nursing Association, were able to move into the new ElisabethenPark.

### Fast, reliable communications network

After a development and planning period of around six years the construction work on the apartment buildings started in February 2021. The contract for the installation of the communications network in the buildings was awarded to Maréchaux Elektro AG Luzern, an experienced electrical and IT service provider and one of Datwyler's certified Solution Partners.

Maréchaux commissioned Datwyler IT Infra to supply the entire communications cabling system. This is a Class E<sub>A</sub> network containing 520 links. It comprises 26 kilometres of type CU 7060 4P copper data cable which – in accordance with Cantonal Fire Insurance Association requirements – conforms to CPR Class D<sub>ca</sub>-s2,d1,a2. In addition there are 1700 Cate-





This Datwyler solution allows Elisabethen-Park to keep pace with the steadily rising transmission rates and to make use of the full performance capability of the whole network. In this respect it provides high investment security for the future.

For the fibre optic cabling a fibre optic trunk solution with single-mode fibres was decided on, pre-terminated at one end. In order to ensure the quality Datwyler had already assembled the connectors and measured the cables by means of OTDR prior to delivery. On the construction site the trunk cables were terminated onto 21 type OV-S and OV-CH splice and breakout boxes.

Datwyler also supplied nine Premium wall-mount racks for the sub-distributors on the floors, and four passively ventilated network racks for the main distribution board in the basement.

Today all the services of the internal network are integrated in the communications network, including the telephone service, video cameras and the technical installations such as heating, ventilation and air conditioning. In addition to this there is a guardian angel system which triggers a message should a disorientated resident leave the nursing home without being noticed.

All the services of the internal network are

integrated in the new communications

# **Everything from one source**

Throughout the project Datwyler collaborated closely with the Maréchaux team, ensuring that delivery dates were always met – despite difficult conditions and supply shortages due to the COVID-19 pandemic. Professional technical consultation played a part in this collaboration before and during the installation phase.

With its modern reliable communications cabling Datwyler is making a major contribution to the future-oriented IT infrastructure set-up of the ElisabethenPark residential project. (dap)

panorama | 16 | Datwyler IT Infra panorama | 17 | Datwyler IT Infra



Visitors to the Datwyler stand

# AT GITEX GLOBAL IN DUBAI

# Premiere of Datwyler's new Smart Service Platform

In October last year Datwyler Middle East attended GITEX Global, which was held in the Dubai World Trade Centre. One of the largest and most innovative technology trade fairs in the world, it brings to-



Ihab Gazawi, Head of Services & Data Centre Experts, gave a well-received talk.

gether companies and experts to exchange views on pioneering technology trends.

Datwyler used the opportunity to present its comprehensive range of future-proof IT and OT infrastructure solutions, which play a crucial role in the digital transformation of companies.

# Centralised monitoring solution

A special highlight on the Datwyler exhibition stand was the presentation of a new centralised monitoring platform, the Smart Service Platform (see page 34). Interested visitors to the stand were also able to check out a Smart Modular Data Centre (SMDC). Datwyler's SMDCs are highly scalable solutions which can quickly and easily be adapted to changing requirements. They are extremely energy efficient due to their innovative cooling and energy management systems. SMDCs are, moreover, equipped with cutting-edge security systems, including fire suppression.



Datwyler's Outdoor Micro Data Centre attracted great interest.

In Dubai Datwyler also presented SMDCs designed for use outdoors and in remote locations. These flexible scalable solutions are particularly suitable for telecommunications and GSM providers, who can use them to extend their network capabilities and provide reliable high-speed connections.

### **Know-how transfer**

Ihab Gazawi, Head of Services & Data Centre Experts, commanded the full attention of his listeners as he discussed the latest trends in technology and data centre. Experts from the European Datwyler team were also represented at the exhibition. Together with their Middle Eastern colleagues they shared valuable insights into how Datwyler supports organisations in driving forward their digital transformation with its future-proof IT and OT infrastructures.

Participation in the trade fair was a great success. As well as presenting technically innovative solutions, the Datwyler team was able to make many new contacts and expand its network in the region. (neg)



Presenting the new Smart Service Platform.

# China:

# MOTIVATING RECOGNITION

In early November 2022 the Import Trade Promotion Conference 2022 and the Forum for MNC Cooperation and Open Innovation took place in Suzhou. As part of these events, which were held in collaboration with the China International Import Expo (CIIE), the local Chamber of Commerce honoured multinational companies (MNCs) based in Suzhou which are making an important contribution to the economic growth of the city.



Datwyler IT Infra, which was one of the nominees in 2022, received an award as Functional Organisation of Multinational Company in Suzhou. This is associated with a grant of 300,000 renminbi (approximately 40,000 euros).

Cao Lubao, Secretary of the Committee of the Chinese Communist Party in Suzhou, thanked the company on behalf of the city's Party Committee and the municipal government for their long-term confidence and their contribution to the city's development. As far as the economic future of Suzhou was concerned, he anticipated that the framework conditions for export would improve, that the city would create an optimum business environment for foreign investment, and that other companies would establish not only their production in Suzhou, but also their head-quarters including research and development.

The entire Datwyler team at Chinese head office is proud of the recognition. It will motivate the company to further strengthen its commitment in Suzhou – "in China for China". (ral)

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China:

Egypt:

# TECHNICAL WORKSHOP IN CAIRO

In December last year Datwyler Middle East organised a two-day workshop in the Dusit Thani LakeView Hotel in Cairo, which was attended by well-known engineering consultants and Datwyler Solution Part-

Soubhi Al-Aliwi in a conversation

ners. The purpose of the event was to provide information on the latest industry trends, best practices and pioneering technologies. Datwyler's partners can use this know-how in future to provide even better support to their customers in achieving their business goals.

The workshops run by Soubhi Al-Aliwi, Head of Sales, MEA, and Ahmed Abdelaleem, Technical Manager at Datwyler Middle East, dealt with topics like Software-as-a-Service solutions (SaaS), edge and cloud computing, data centres, and the importance of robust IT and OT infrastructures in the process of digital transformation. The presentations occasioned a lively exchange with those present.

In addition there was the opportunity of getting together for discussion in smaller groups and benefiting from the expertise of the other participants. The focus was on the daily challenges which the companies had to overcome. These "breakout sessions" were rated as particularly helpful for their own work.

The feedback at the end was decidedly positive.

The workshop once again demonstrated how important events like this are for professional development. They make partners and engineering companies more competitive and encourage innovation in Egyptian industry. (nem)

Participants in the Datwyler workshop





AWARD-WINNING OFFERS

At the China International Building Intelligence Summit Datwyler again won two prizes for its range of solutions.

At the beginning of January the 23rd China International Building Intelligence Summit, organised by QJ. Smartech, was held in Guangzhou. Since it was established in 2000 this event has evolved into a huge industry get-together encompassing all the relevant fields of intelligent building: from Smart Home to Smart City, including intelligent security solutions and system integration.

◆ DATWYLER 德特威勒 (苏州) 信息技术科技有限公司

> CHINA INTELLIGENT BUTCHEN 2012



Jack Lin, Technical Service Manager, with the Datwyler Regional Sales team South

Jack Lin, Technical Service Manager at Datwyler, gave a highly regarded talk at this year's summit. His subject was "Facing the digital future – hyper converged Datwyler IT infrastructure solutions".

# Focus on hyper converged IT infrastructures

Lin contended that in the course of the fourth industrial revolution digital transformation is posing major challenges for IT infrastructures. As a traditional company which has strong Swiss roots and possesses comprehensive expertise in the field of cabling solutions, Datwyler is driving forward the development of hyper converged IT infrastructures by integrating and further optimising the existing solutions.

With DatAIM software, the DatSentinel modular data centre solution and the DatRubik cabling solution Datwyler is addressing all the challenges facing organisations today – and, as Lin emphasised, this extends over the whole life cycle of their IT infrastructures: from planning and design, through budgeting, procurement and installation to operation and maintenance.

### **Doubly honoured**

That evening the presentation of the Intelligent Building Brand Awards organised by QJ. Smartech took place in the Guangzhou Dongfang Hotel. It was attended by dozens of industry experts and managers

and more than 200 representatives of well-known brands in intelligent building.

In this year's selection Datwyler came third in the "Top Ten Brands" for Cabling Systems and was awarded a "Best Practices Prize" in the Data Centre field. Sissy Pi, Regional Sales Manager South, and Jack Lin accepted the awards on behalf of Datwyler. (chc)

The trophies for the award certificates (top left)



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5G network

Many companies accepted Datwyler's invitation to a 5G event with Nokia in Hattersheim.

In mid-March Datwyler offered its customers at the European logistics hub in Hattersheim the special opportunity to experience the live operation of a private 5G network. The Field Experience Team of



Introduction to holistic IT infrastructures with 5G plus edge and cloud computing

Nokia, one of Datwyler's technology partners, installed a mobile 5G system in the showroom, a radio transmission licence from the Federal Network Agency having been specially applied for in advance.

15 representatives from companies in various sectors of industry attended the event. They used their visit to learn about the components comprising a 5G system for a private (company) network - and how simple the concept is.

# **Typical applications**

After an introduction by Andreas Busch, Partner Manager at Nokia, and Karsten Lengnink, Head of Partner Management at Datwyler, there were several interesting applications from the industrial field to experience live. First of all a push-to-talk connection was made between smart phones

and tablets via the 5G network, with the participants able to move around the site. The connections were consistently excellent, both outdoors as well as over several factory buildings – and that was with just one Nokia Pico antenna with a maximum transmitting power of only 250 milliwatts. This shows that only three or four wellplaced antennae are sufficient to provide reliable cover for an area of 20,000 square metres.

Other antenna options were also demonstrated, for example Nokia Micro Radio Head, which is also suitable for outdoor installation and has even greater transmit-

The powerful transmission bandwidth of 5G was illustrated by a typical example from the sphere of augmented and virtual



Pico or Micro Radio Head: connecting the antennae is so easy

reality. To do this the Nokia team simulated maintenance on a small machine model. A participant at the event – summarily appointed service technician – called up the maintenance assignment and the instructions on what to do on his tablet via a QR code on the model. Depending on the position of the machine viewed on the tablet camera, his sub-tasks and other instructions were projected directly onto the machine parts on the tablet.

The other participants were able to watch and follow how the execution of each task was registered and stored in the maintenance log – until the job was successfully completed.

A fine illustration of the merging of virtual and actual reality.

### Lively discussion

Soon the participants were also discussing other use cases and debating the combination of 5G with edge and cloud computing. What's it like if I move around the network with mobile forklifts? How does transmission take place between various antennae? What is the best way to process the data acquired – at the edge or in the cloud? Can I integrate an existing WiFi network into the private 5G network to continue using investment already made?

It was good that Andreas Busch and Nokia's Field Experience Team - Karin Urbatsch and Julia Meixner - were on site until the close of the event. They were able to take an active part in answering the many questions. (kal)



Lively discussion on use cases and technical solutions

# Switzerland:

# **SHOWROOM OPENED ON LAKE GENEVA**

From now on a pop-up Datwyler showroom in Morges near Lausanne gives those in Western Switzerland who are interested the opportunity of finding out about the IT infrastructure provider's products and solutions on the spot, as well as of taking part in events and training courses.

For the official opening on 3rd March Datwyler IT Infra welcomed around a dozen invited guests to the new showroom, including partners, system integrators and wholesalers. At this event they were given information of interest about current Datwyler projects and the plans for activities in the showroom. For example, a free training course on the Construction Products Regulation (CPR) and System Circuit Integrity for installers was on the agenda.

Those attending were then able to exchange views and socialise in a relaxed atmosphere over an apéro riche, at which Malakoff, the local cheese speciality, was served. From the perspective of the Datwyler team the opening event was a great success. (vih)



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In line with the growth strategy in Europe the Management Board of Datwyler IT Infra recently approved the plan to launch a greenfield project in the Czech Republic with an investment of 13 million Swiss francs. This decision is a milestone – including for the Datwyler team in Děčín, which has made great strides since independence four years ago.

Datwyler IT Infra s.r.o. is currently still working in rented premises. A thorough assessment, however, concluded that this posed a considerable limitation on planned corporate development, for example in respect of layout and cost structure. In addition, Datwyler's sustainability targets can only be achieved with difficulty as things stand, particularly in respect of CO<sub>2</sub> emissions.



# Greater product variety, better services

The greenfield project – the complete rebuilding of the plant in Děčín – will bring a host of benefits to Datwyler's customers in particular. The local competence centre will evolve – from expertise in the field of elevator cables through industrial segment and components to assembly and harnessing. This will enable Datwyler to offer even more tailor-made products and services. In so doing the company is reaffirming its ambition to support its customers in the seamless operation of their IT and OT infrastructure.

The additional production, assembly and harnessing capability includes unshielded copper data products and fibre optic components, products for industrial applications as well as for lifts and data centres.

Thanks to its geographical location the Děčín site will support Datwyler's service targets – for example short lead times and just-in-time deliveries – throughout Europe, and further boost competitiveness on the European markets. Fully digitised production and lean processes will play their part here.

The roadmap is ambitious: the plant is scheduled to come on stream in the first quarter of 2025. Excavation work is planned to start later this year. The whole process will be supported by a dedicated project team in order to keep within budget and ensure smooth migration and full contract fulfilment in the final phase. (tok)



# Germany:

# SPE SHOW IN HANOVER

During the Hanover Fair in April 130 000 visitors descended on around 4000 exhibitors from the mechanical engineering, electrical engineering and digital sectors as well as from the energy industry.

In addition to machine learning, Al and energy management the focus of the fair this year was on Industry 4.0 – and Single-Pair Ethernet was one of the key topics in this area.

In Hanover over 130 exhibitors – from start-ups to the big players – presented innovative solutions based on the new Ethernet standard.

As an active member of the Single Pair Ethernet System Alliance Datwyler showcased its solutions developed for SPE applications on the joint stand (see page 35).

With over 50 member companies the SPE System Alliance is a strong association which promotes new technology on the market. The stand, manned by experts from various industries, was of an appropriately high calibre. (ivc)

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# Which technologies do you see as the key to accelerating the innovative power of companies?

Three years since the start of the pandemic, most businesses understand that technology needs to be part of their plans if they want to improve productivity, build resilience, and look to create new revenues. "Digital Transformation" is a broad term, and a lot of companies struggle to know where to start. Successful digital transformation requires them to select partners and technologies that will help them create a sustainable platform for fast innovation. This approach will reduce the risk of creating fragmented solutions, which will increase complexity and costs in the long term.

There are three technology components that enterprises should consider as fundamental building blocks. The first is data access. As more "things" are connected (the Internet of Things), more data will need to be transferred and processed. Enabling these "things" to be quickly and securely connected will be key. The ability to gather data from sensors, cameras and other devices, and securely transfer it to an application that will process information and turn it into actionable insights. 5G will be one of the data access technologies to consider, as it delivers high performance and security. Other access technologies like Satellite, Wi-Fi or LoRaWan will also play a role to enable this ubiquitous connectivity paradigm. Enterprises should ensure they can quickly provide devices with the right connectivity.

The second building block is cloud and edge compute. Easy access to scalable, secure, and cost-effective computing power for these applications is required to accelerate innovation. Traditional cloud services enable applications to access data storage and compute services quickly. With Edge computing the same experience will also be available for those applications that require near real time data processing or have higher security or privacy requirements that means data must remain on site. Computing at the edge will also reduce the need for high bandwidth backhaul, not always be available, especially in remote sites.

The third key enabler will be having easy access to a large application ecosystem – these will be industry specific applications, which can quickly be deployed and managed when needed.

Microsoft has designed a solution, Azure private Multi Access Edge – MEC – that provides enterprises with a simple way to deliver these technology components. Azure private MEC provides simple solutions that include 4G/5G and other networking, edge cloud computing, and a portfolio of curated applications, available on Azure Marketplace, making it easy to quickly deploy these new innovative solutions anywhere.

Datwyler's Q-tainer uses Azure private MEC and makes it easy to access the technologies and data needed to transform the business.

# In which areas can these technologies be used in companies?

Most industries will benefit from the of use of Al, video analytics, IoT and autonomous guided vehicles (AGVs), and >>>



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KNOW-HOW

all these applications have one thing in common: they require reliable, secure connectivity and access to edge compute. With 5G and edge compute, new solutions can be built in days versus months – solutions like enhanced worker safety, optimised workforce management with Al, computer vision for improved quality and reduced rework or to quickly set up perimeter security on a new site. Enterprises can also now reliably implement AGV solutions to manage heavy workloads or repetitive tasks on site.

# What are the advantages of using cloud and edge technologies?

Cloud provides many advantages – security, flexibility, and cost control –, and most enterprises are already leveraging it. Edge cloud enables local access to these services, for those applications whose data must be processed on site. Processing data locally will improve security, by limiting the data "leaving" your site, it will reduce the cost of your enterprise backhaul and fixed line connectivity and it will enable higher performance and resilience. Some applications are latency sensitive, such as robotics or augmented reality, and edge compute will enable lower and consistent latency for these types of application.

# How does Microsoft support its customers during the implementation?

In several ways. First, by delivering innovations and the latest technologies and making them easily accessible



The Q-tainer from Rhomberg Sersa and Datwyler is running on Azure private MEC.

and secure. In addition, enterprises have access to our partner ecosystem from an application as well as from a delivery perspective. Our partner network makes it easy for customers to find the right partner for their transformation goals, providing the relevant industry knowledge and experience.

Microsoft also offers a range of industry solutions templates to streamline implementation, provides best practice recommendations as well as a wide range of training that can be used by both partners and customers to quickly develop new skills across a large range of services.

# The Q-tainer from Rhomberg Sersa and Datwyler is running on Azure private MEC. How can users benefit from Microsoft's Al technologies?

Azure private MEC offers an extension of the cloud at the edge, enabling customers to leverage the same tools and services that they would use for a cloud deployment.

Microsoft has made the edge an additional cloud resource and developed enhanced service orchestration tools to make it simple to manage the lifecycle of these solutions – across multiple edge sites.

This orchestration provides the Al applications with the right connectivity and enables application providers to upgrade and make changes across multiple sites using templates, simplifying the maintenance and reducing operational costs.

All of this is built on top of our strong Azure zero trust security framework.

# Do you see other areas of application in which local computing power can lead to innovative solutions for customers?

Microsoft sees the world of Modern Connected Applications as just beginning. The Q-tainer, with Microsoft Azure technology, will enable quick innovations for enterprises that would otherwise struggle to provide the right connectivity to these applications. We continually work with developers to explore new possibilities and help improve their applications by leveraging the edge and enhanced connectivity services, to provide the strongest portfolio of cloud and edge applications for our customers and partners.

# Many thanks for an interesting conversation.

(rat



Companies can benefit greatly from outsourcing the services relating to their IT infrastructure – and this can also make financial sense.

Rapid digital transformation and the use of modern technologies make companies increasingly dependent on their IT infrastructure. At the same time the spread of cloud computing, the Internet of Things (IoT) and increasing networking mean an increased risk of cyber attack and data loss. Companies are forced to improve their IT

security in order to protect themselves from these threats.

In this context managed services are becoming more important. Companies can optimise their resources and concentrate on their core competences by outsourcing IT tasks to specialist providers, while at the

same time ensuring that their IT systems are always state-of-the-art and safe from attack.

### Managed services

Managed networks is the term used when companies outsource the administration and monitoring of their network >>>

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infrastructures to third-party providers. The latter monitor the traffic, manage switches and routers and monitor the network connections and devices. They ensure better availability and performance, and cut downtimes and operating costs.

Managed services can also include numerous security services, for example firewall management, intrusion detection and prevention, antivirus and antimalware management and incident management. The benefits are clear to see.

Another kind of managed services is managed hosting. Here applications and services are hosted and operated by a third party provider, reducing the load on the in-house IT infrastructure. The benefits of managed hosting are an improvement in IT infrastructure scalability and flexibility as well as a reduction in the cost of operating IT systems.

# Edge data centres and managed services

Edge computing refers to a distributed architecture in which data processing and storage are decentralised and thus located closer to data sources and end devices. This re-

duces latencies. Micro or mini data centres are often used at the edge, because by contrast with traditional data centres they can be flexibly used and are easily scalable.

Managed network and monitoring services are

especially effective for such edge systems, as decentralisation and the high number of distributed components make management and monitoring considerably more difficult. Managed services, on the other hand, provide continuous monitoring and diagnosis. This means that potential problems and errors can be quickly identified and rectified before they result in a malfunction.

In addition, by using security solutions like firewalls, intrusion detection systems and encryption which are always up to date, the service provider ensures that the network is protected from potential attack.

# Better availability, lower cost

Managed services can be a cost-effective solution for companies wanting to improve the performance, security and availability of their IT infrastructure. Not only because the third-party providers use the latest technologies and tools and hence design the IT services more effectively and efficiently, but also because companies save substantial amounts of money on personnel, training, hardware and software.

A further benefit of managed services is scalability. If a company is growing or its requirements change, it is often difficult and expensive to adapt the internal IT infrastructure. With managed services the requisite resources can be added or removed quickly and easily without making additional investment in hardware, software and personnel.

Being able to identify and rectify problems early, before they cause downtime or other malfunctions, not only cuts the cost of repair or reinstatement, but also reduces the impact on the company's productivity and reputation. Third party protection against cyberattack, malware and other security risks helps to minimise costs incurred by data loss and theft.

Last but not least, managed services can help to improve a company's ROI (Return on Investment), because they optimise its business processes, increase productivity and competitiveness, and result in greater customer satisfaction.

### Managed services from Datwyler

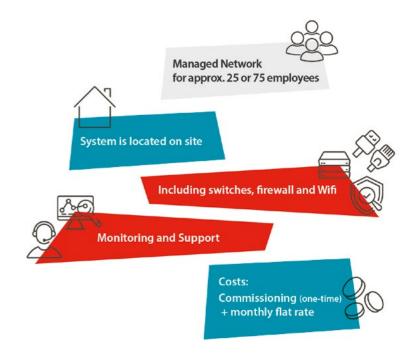
Datwyler IT Infra has established a reputation as a provider of reliable IT infrastructure solutions. By adding managed networks and managed monitoring to the portfolio Datwyler supports organisations in being able to concentrate on their core competences.

Datwyler offers standardised managed network packages for up to 25 or up to 75 employees. As well as this there are individualised solutions tailor-made to the customer's requirements. The services include planning, implementation and administration of the network, and they ensure that everything runs smoothly. Also included are monitoring services for the early identification and rectification of potential problems, and network security solutions which protect from cyber attack.

Datwyler's managed monitoring or monitoring-as-a-service allow companies to monitor their IT infrastructure around the clock. Data from the network, servers, applications and end devices are continuously collected and analysed, and

potential problems are identified before they can cause malfunctions. The team of experts also supplies its customers with detailed reports which help them optimise the performance of their IT infrastructure.

If problems should occur Datwyler IT Infra considers firstclass support and fast response times to be a matter of course. (paw)



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Edge computing:

# Many-faceted **END-TO-END** SOLUTIONS

A steadily increasing range of products, solutions and services for edge computing are available to Datwyler customers – all over the world.

After many years of centralisation of IT systems and data storage in the cloud, decentralisation has gained more focus again, because in the past few years edge computing has increased significantly in popularity – to the benefit of greater availability, security and privacy for in-house data and applications. At the same time virtualisation has now also reached areas which in the past were (inadequately) addressed by cloud technologies, for example industrial and building automation. And, last but not least, the major cloud providers for IoT - the Internet of Things – have introduced de facto global standards for the worldwide use of similar or comparable IoT architectures.

Datwyler IT Infra is addressing these trends by continually gearing its range of solutions and services to cover them. Today the

products supplied by Datwyler can be di-

vided into three groups: Connectivity, Infrastructure and Business Applications. As

a turnkey supplier - with one-stop solu-

tions - Datwyler has recently expanded its portfolio by an increasing number of services in the fields of IT infrastructure planning, construction and operation. The focus here is on applications at the edges of the network, known as the "Edge".

In the field of connectivity Datwyler has developed new products for industrial applications and building automation. The most recent examples are UL-AWM-certified Industrial Ethernet cables and Single-Pair Ethernet solutions (see page 35), including the associated components such as connectors and network devices.

### Infrastructure

In the infrastructure field Datwyler customers benefit from an expanded data

centre offering with modular elements al-

lowing the efficient collection, processing,

storage or forwarding of data at the Edge.

From the simple edge gateway (fog com-

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Datwyler IT Infra

also take the special regional characteristics of a project into consideration.

tomers to reduce interfaces.

In Business Applications Datwyler provides

puting) via the edge computing environment through to the hybrid cloud solution Datwyler covers the needs of various scenarios for decentralised computing. Thanks to its global footprint Datwyler can meet all the requirements of such architectures - with its own experts as well as strong technology partners and local OEMs who

Among other things Datwyler's service portfolio includes the pre-assembly, integration and maintenance work needed for each project. Receiving these additional services from a single source helps cus-

In order to monitor and configure their decentralised IT infrastructures Datwyler provides them with the DIMS infrastructure management platform. This is continually evolving. For example, OEM components are constantly being integrated into the software so that projects can be implemented more quickly on customer premises.

# **Business Applications**

The construction and operation of decentralised IT infrastructures is increasing in complexity. Smart factories, intelligent buildings, Smart City applications: digitisation increasingly requires decentralised data processing. Extensive experience and comprehensive expertise are required to be able to plan, implement and securely operate the appropriate solutions.

the services which facilitate smooth system

integration, and supports its customers not only in collecting data, but in realising complete information chains, achieving end-to-end functionality and making the best possible use of the knowledge gained from the data.

Cloud architectures in particular call for a lot of expert knowledge – even more so if the cloud provider's fog or edge computing offerings are to be incorporated. The latter makes sense to the extent that these offerings not only contribute to the global availability and standardisation of functions - for example device management, databases, analytical methods etc. –, but also offer the advantage of high scalability.

Particularly with decentralised IT infrastructures the network connection and the monitoring thereof are important activities in ensuring smooth operation. Here technologies like SD-WAN and 5G have created new opportunities which, depending on the requirements of a project, Datwyler will integrate into an edge computing solution together with its partners.

Considering such a comprehensive technology stack, security becomes even more important, both physical and virtual



Single-Pair Ethernet: future technology for industrial applications and building automation

(cyber security). Here again Datwyler provides comprehensive services to ensure security at all times - for both IT and OT environments.

# Continuous online experience for cus-

Datwyler believes that individual and flexible solutions are part of a good service. The company is developing an uninterrupted online chain of experience for its customers - from the first expression of interest through real time status information to the deactivation of individual edge infrastructures, should these no longer be

The new global online configurator is making a start (see page 34). Those interested can use it to draft their own solution for

their edge computing infrastructure - and receive an initial estimate of cost.

With Datwyler's support they can then plan, develop, commission and maintain their individual solution. Thanks to Datwyler's Smart Service Platform (see page 34) it is possible to inspect the existing IT and OT infrastructures on the various sites of an organisation – and the associated services – and remotely monitor, administer and maintain them.

Datwyler supplements its comprehensive, globally available technology, infrastructure and system integration portfolio with an extensive network of specialist regional service partners. (jud)

With Datwyler's Smart Service Platform the IT and OT infrastructures at the different locations of an organization can be monitored, managed and maintained remotely.



New products for industrial applications: UL-certified Industrial Ethernet cables

# Software:

# TOOL FOR REMOTE MONI-TORING AND MAINTENANCE

# Datwyler has developed a platform with which organisations can optimise their IT and OT infrastructures.

Datwyler Middle East has recently provided its customers with a Smart Service Platform (see page 18). This Software-as-a-Service solution (SaaS) was developed to give organisations better oversight and control over their critical IT and OT infrastructure – and hence to support their initiatives for digital transformation worldwide.

Datwyler customers can use the new software for the remote monitoring and administration of the IT systems and applications in their global network. The platform's comprehensive performance characteristics and functions make it an indispensable tool for safeguarding the reliability and availability of these important systems. It enables administrators to identify and solve problems quickly, to reduce downtime and optimise system performance. The software also includes analysis and report-

ing tools, with which companies can record the condition and performance data of their IT and OT infrastructures. These data can be used by managers as the basis of major decisions to improve their business operations. Of course the SaaS solution can be adapted to the specific requirements of each organisation.

The introduction of the new Smart Service Platform is an important component of Datwyler's innovation initiative. It gives compa-



### Datwyler's Smart Service Platform

nies a powerful tool for the management of their IT and OT infrastructure, helping to ensure smooth and secure business operations.

After the rollout in the Middle East Datwyler will continue to offer the SaaS solution in other regions as well in the coming months, so that all customers, particularly those active worldwide, can benefit from the functionality of this software and the seamless online experience in remote monitoring and remote maintenance. (iha)

# Software:

# **DATA CENTRE CONFIGURATOR**



# New tool available on Datwyler's website

Since March a new configurator for Datwyler IT Infra's Smart Modular Data Centre (SMDC) has offered interested parties around the world the opportunity to easily plan and design the desired solution – from small (Micro) to medium-sized (Mini) to larger data centres.

The configurator includes racks, UPS, intelligent power distribution, air conditioning, cabling, leak detection, fire alarm, fire suppression, access control and environ-

mental monitoring – with SMS and email notification.

After entering the project requirements, the tool generates workshop drawings with technical specifications, data sheets and target prices. In addition, users are able to design Smart Modular Data Centres that comply with international standard Tier classification levels.

The new online configurator is initially available in an English, French and Chinese version. Other languages will follow shortly. (alm)

# Industrial Ethernet:

# CABLES TO UL-AWM STANDARD

# New product portfolio for industrial applications from Swiss production

After the UL registration of the Swiss plant, the first data cables having UL-AWM certification are available from Datwyler: a flexible Cat.7 data cable (AWG 26), suitable for transmission rates of up to 10 Gbit/s, and thus meeting the real time requirements of Industry 4.0., and AWG 22/7 and AWG 26/7 Singe-Pair Ethernet (SPE) cables. With their oil-resistant, robust, halogen-free PUR sheath they are ideal as connection cables for Industrial Ethernet applications in harsh industrial environments.

The new data cables are tested for an operating temperature of -40 °C to +80 °C. They provide high-quality twofold shielding for excellent transmission reliability in areas of high electromagnetic interference and can, for example, be installed in cable trays together with motor cables. The 4-pair CU 7702 also meets the electrical requirements specified in IEC 61156-6 and the requirements of the EU Construction Products Regulation (CPR) set out in EN 50575.

As a specialist in Ethernet data cables Datwyler offers a comprehensive portfolio of Cat.5, Cat.6, Cat.6<sub>A</sub> and Cat.7 data cables, also including those for Single-Pair Ethernet. Now that the Swiss plant is registered with UL, products for factory automation are also being developed in Altdorf and produced to the UL-AWM standard.

Other certified Industrial Ethernet cables of Swiss production will follow. The new portfolio of IE cables will be supplied with a green or black outer sheath. (ivc)



# Industrial Ethernet:

# CONNECTION CABLES WITH M8, M12 AND RJ45

# Robust products for demanding industrial applications

Today, following the third industrial revolution, Industry 4.0 – the comprehensive digitisation and networking of industrial production – has become the force driving industrial development. In a modern smart factory where technologies such as IoT devices, automation, machinery manufacturing and artificial intelligence are used it is of inestimable importance that all the devices are stable, reliable and safely connected and interlinked.

Since Datwyler in China started offering Industrial Ethernet cables in the DatProfi family last year (see Panorama 2/2022), a comprehensive range of preassembled connection cables is now available to Chinese customers as well. This allows the fast secure connection of all intelligent field devices, and ensures reliable signal and data transmission as well as a power supply.

The new connection cables come with M8, M12 and RJ45 connectors and jacks as standard – or, if requested, also with other internationally accepted connectors covering the modules and devices of all the leading manufacturers.

The round connectors are fitted with grooved knurled screws and nuts, and allow tool-free connection in the field. They are eminently suitable for industrial applications which call for robustness and vibration resistance.

In addition there are cables with injection connectors for connection boxes and I/O boxes, straight and curved as well as in various designs, and which meet all the requirements of present-day field applications.

The new range of connection cables was specially developed for harsh industrial environments, giving users reliable protection against electromagnetic interference, damp, dust and mechanical stress. (jow)

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