

Photos: Courtesy of DEA Deutsche Erdoel AG

DEA Deutsche Erdoel AG

Draco tera KVM solution optimizes the working environment on the Mittelplate oil rig

The Customer

Mittelplate is Germany's largest oil field. The drilling and production island is located in the North Sea north of the Elbe estuary, seven kilometers from the coast. It is operated by DEA Deutsche Erdoel AG in cooperation with BASF subsidiary Wintershall Holding GmbH.

With an annual production volume of 1.4 million tons of oil, Mittelplate is Germany's largest and most productive crude oil deposit. The oil field contains about 65% of the remaining economically recoverable German oil reserves. Since its development in 1987, more than 35 million tons of crude oil have been produced.

The Challenge

A control room for process control is located on the drilling platform. In this control room essential services including the gas warning system, fire alarm system, camera system and process control systems are monitored and operated around the clock by shift supervisors.

System computers were previously located by operator workstations. These took up valuable space and caused a considerable amount of noise and heat. In addition, the computers required regular cleaning because of the dust and dirt in the air.

As part of a rebuild project, a new control room was proposed that would be quieter and more ergonomic. Materials were chosen that are not only visually more attractive but are



capable of reducing the noise within the room.

All the IT infrastructure was to be relocated to a remote equipment room to further reduce the noise in the control room and aid maintenance. To provide the necessary connection to the remote computers in the equipment

room 50 meters away with interference-free access, the DEA required a high-performance, fail-safe video and data transmission and switching system.

The Solution

Fiber optic cables were laid from the control room into the data room to enable robust and reliable connection between the computers and the operators. In contrast to copper cables, glass fibers are insensitive to electromagnetic fields and enable longer distances with higher data rates.

An IHSE Draco tera KVM system is used for computer access. All computers and process control systems as well as the operating devices (ten monitors, eight keyboard-mouse sets and loudspeakers) are connected via a Draco tera KVM matrix. From the workstations, the operators can access all necessary systems as if the computers were located under the wide console in the control room.

“The KVM system was installed during regular operation of Mittelplate. Thanks to good preparation and good cooperation, the project was a great success.

Fabian Ehlers, Electrical Engineer
DEA Holstein Production District

The Benefit

The main benefit of the conversion project is the optimization of the working environment in the control room through the space gained and improved acoustics in the room.

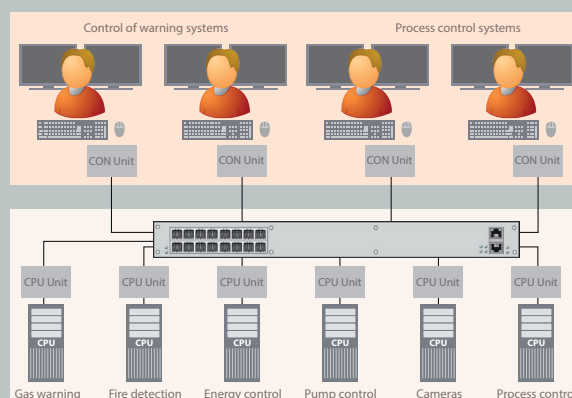
The computers are now located in the remote data room in environmentally-controlled server racks, where they are protected from dust and unauthorized access. This increases safety and life span of the devices and reduces maintenance requirements.

In addition to the user-friendly environment, the system offers extensive switching options so that operators can access all connected devices and computers in real time from their individual workstations - with optimum video quality.

These measures have transformed the old control room into a highly efficient command and control center and a place where employees can feel very comfortable. The space is used by Mittelplate staff as well as for external companies that work on the Mittelplate platform.

This unique platform sets new standards in safety and efficiency in the environmentally-conscious extraction of oil. The IHSE solution contributes to the process, enabling the continuation of effective and trouble-free oil production now and in the future.

Functional Diagram



KVM products in use

- > Draco tera compact matrix switch
- > Draco vario extenders

IHSE GmbH
Maybachstr. 11
88094 Oberteuringen
Germany

☎ +49 (7546) 9248-0
☎ +49 (7546) 9248-48

info@ihse.de
www.ihse.de

ihse.
KVM & Beyond