

Precise Automation & Electric Engineering

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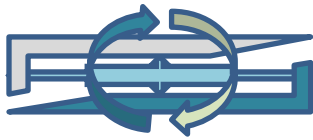
PAEE provides services of industrial processes, power houses, all types of plants automation and engineering consultancy. We provide services in automation, instrumentation, system integration, process control and maintenance to various industries.

We deal in sales and services of all type instruments, Oil/Gas fired burner, flow meter, PID controller, multiple programmable logic controller, transmitter, sensor, detector, HMI/SCADA, control valve, pressure regulator, IP positioner, VFD/inverter and other many products required for processes and plants to different industries.



We provide all instruments, equipment, control panels and electric panels as per plant requirements





Precise Automation & Electric Engineering

with complete installation, commissioning and maintenanceservices. Be it for drives, control, sensor, and communication applications, Precise Automation Engineering accelerates application development with dedicated industrial automation solutions. Furthermore, providing industrial process and plant automation and consultancy functional safety and security technology from PA pave the path to Industry 4.0 and Industrial Internet of Things applications.

CONTENT

Company Service & Reliability, Quality, Standards

Application & Common Technology

What PAEE1 Solution

Lab and Workshop

Marine / Offshore Services

PAEE Offering Services

Electric Control Panels

Power House Services

Product Supplier & Services

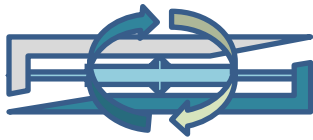
Industrial Services

Contact US

Company Service & Reliability, Quality & Standards

Quality, Reliability and Time are our Company Aims for best services to clients and also to use our skills and potential to make best organization in achieving its goals which seeking long term career with optimum growth. This objective would be supported by our skills, experience, reliability, economical solution and quality in addition to the management experience and multi- lingual command of projects.

In first step of project we provide batter project Planning and Estimating for best reliable, economic and precise technical solutions. In second step we provide services of project Designing, Installation, Commissioning, also training after completion of project about Operation, Maintenance and Troubleshooting with our given manuals and drawings. In third step we provide long time maintenance, troubleshooting, solutions and services with the help of our technical team that every time available on your call.



Precise Automation & Electric Engineering

Company Consultancy Services provide you reliable, economic and precise technical solutions.

Company supplies instruments and provides services on our committed time as per your requirement.

Application and Common Technology Compatible

Distributed Control Systems (DCS)

Basically, Distributed Control Systems (DCS) is a control systems consist of:

- Control modules: to compute the control algorithm, execute logical expression
- IO modules: as interface to field devices, provide conversion from analog to digital and vice versa
- Workstation: as human machine interface, server, historian, or provide software utilities to do engineering

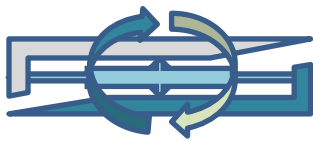
All of these modules are communicate to each other via communication networks (Ethernet, fieldbus, profibus, serial, etc.).

Because of its distributed nature, DCS is very powerful system to control a large petrochemical plant; the IO modules or control modules can be placed in a distributed area of the plant. The advance on communication systems also make it possible for DCS to be integrated to various type of dedicated 3rd party systems, such as PLCs.

In this post, I would like to present several types and basic architecture of DCS according to the manufacturer.

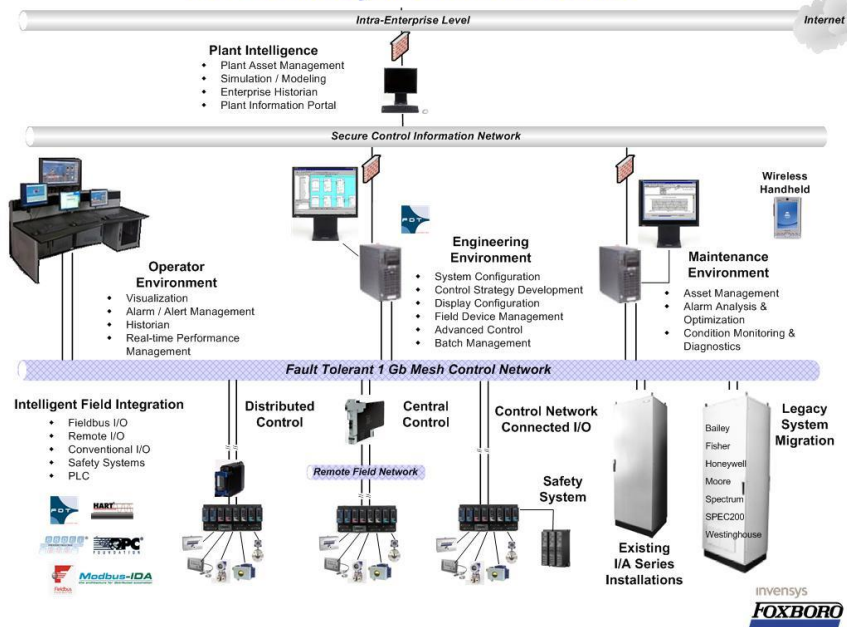
Foxboro I/A Series

The following figure is the basic architecture of Foxboro I/A Series system



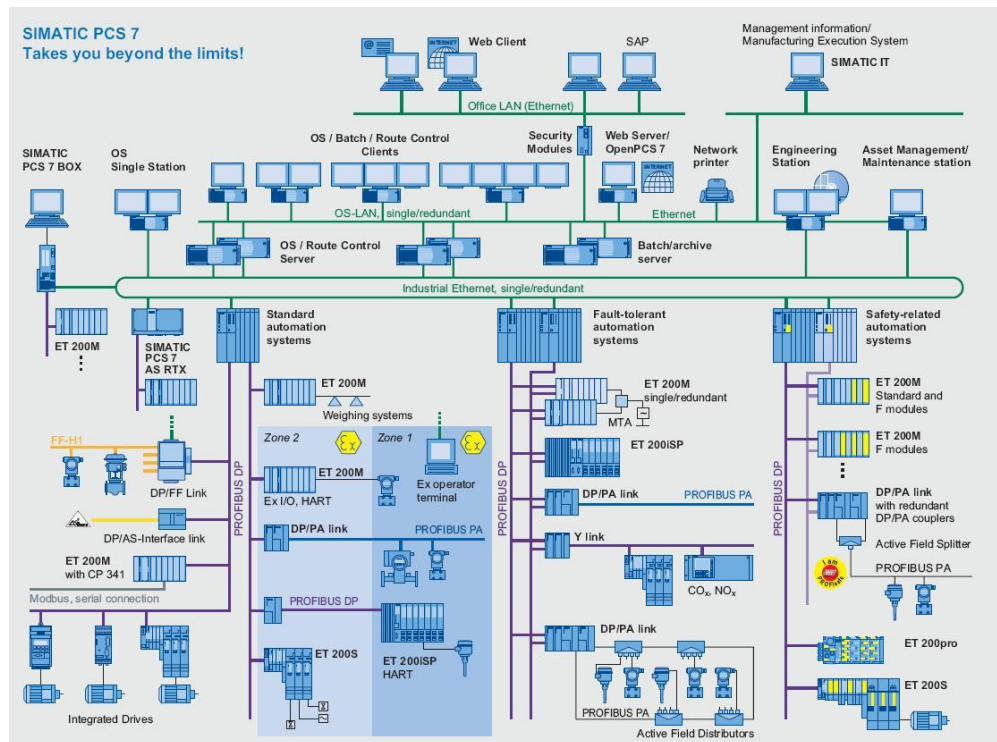
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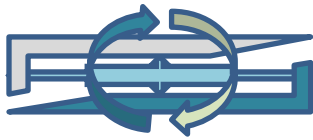
I/A Series System Architecture



Siemens PCS7

The following figure is the basic architecture of Siemens PCS7

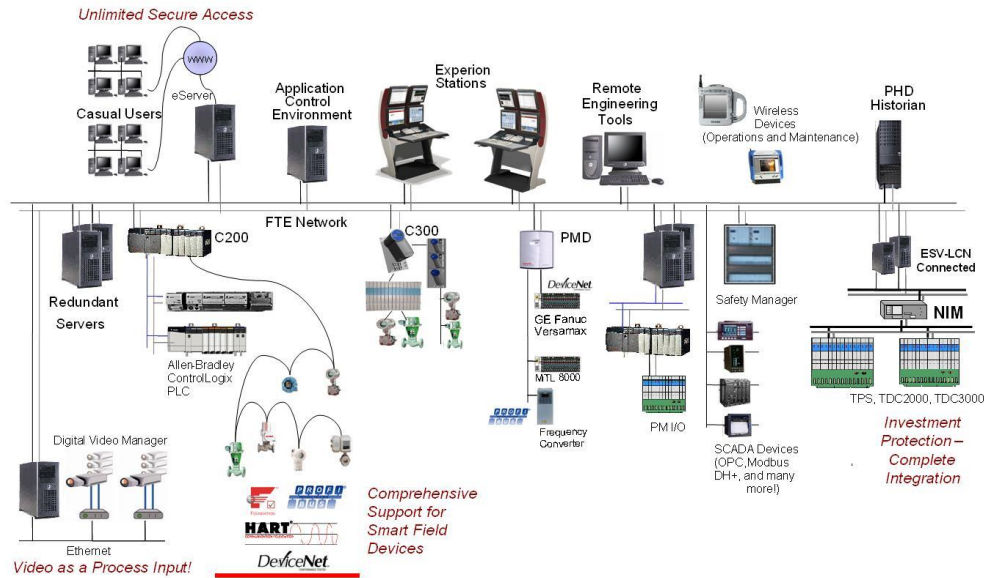




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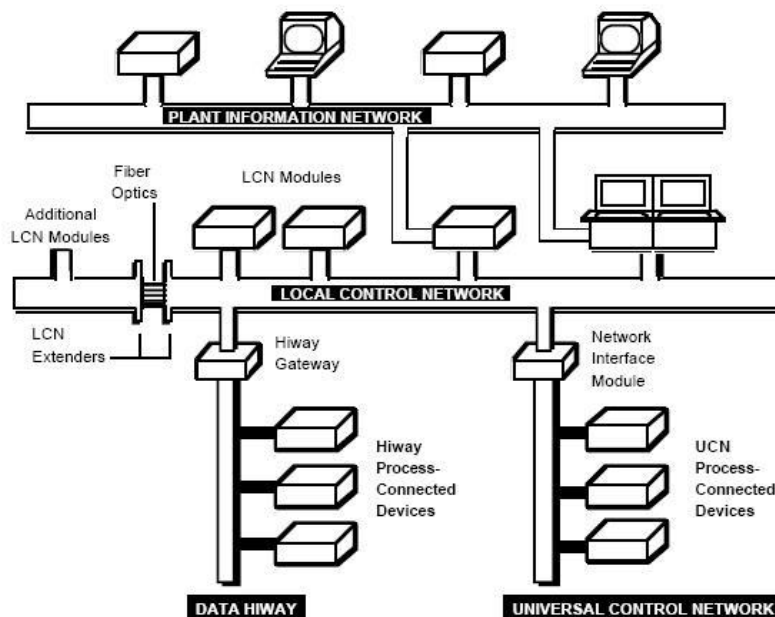
Honeywell Experion PKS

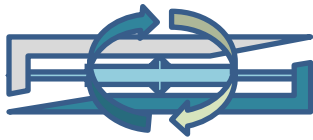
The following figure is the basic architecture of Honeywell Experion PKS



Honeywell TDC3000

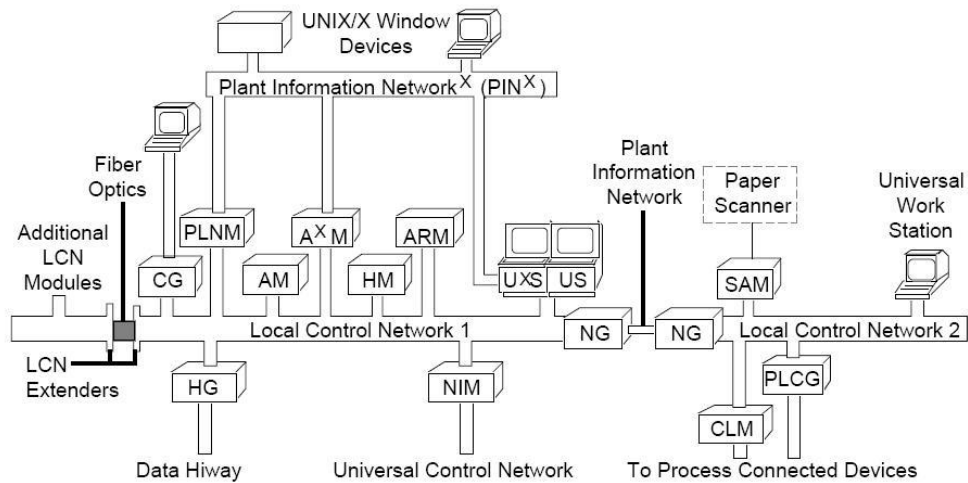
The following figure is the basic architecture of Honeywell TDC3000





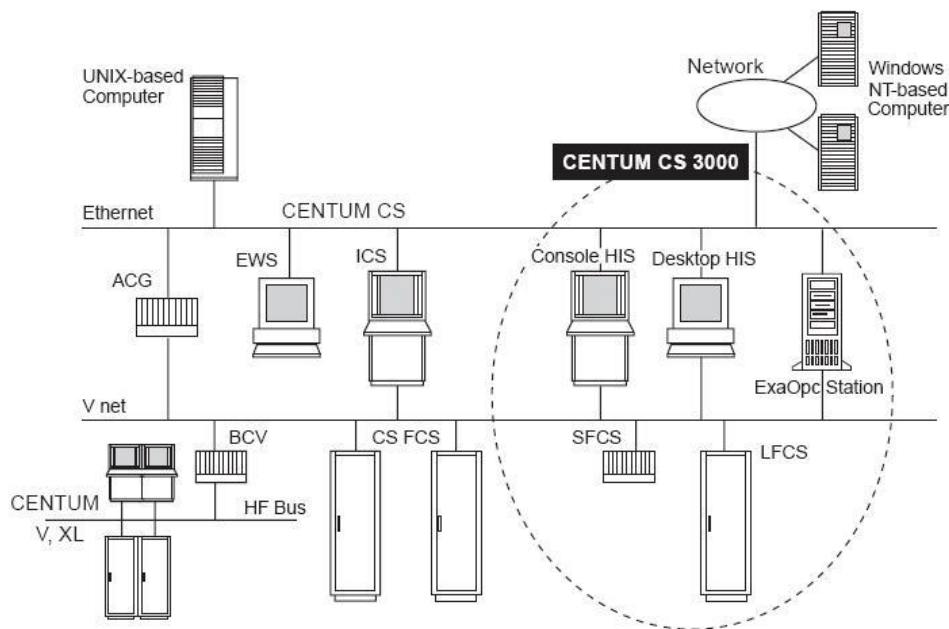
Honeywell Total Plant Solutions (TPS)

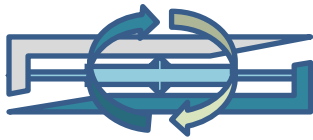
The following figure is the basic architecture of Honeywell TPS



Yokogawa Centum CS3000

The following figure is the basic architecture of Yokogawa Centum CS3000





SCHNEIDER Modicon Quantum CPU MODULE

Programmable Automation Controller Processors under Unity Pro software

Original factory sealed new Modicon PLC Quantum 140 PLC series

The Modicon™ Quantum™ PACs provide well-balanced CPUs able to provide leading performance from Boolean to floating-point instruction...

- Unity™ Pro programming software supports five IEC languages as standard: IEC Ladder (LD), Structured Text (ST), Function Block Diagram (FBD), Sequential Function Chart (SFC), and Instructional List (IL), as well as the Modicon LL984 language to facilitate installed base upgrades.
- High-level multitasking system
- Memory capacity up to 7 Mb using Personal Computer Memory Card International Association (PCMCIA) extensions.
- Specially designed for process control applications with conformal coated modules and an extensive catalogue of partner modules
- Safety processors and I/O modules to manage Safety Instrumented Systems (SIS) >Safety PLC.
- Plug & Play high-performance Hot-Standby solutions with LCD keypad for local monitoring

Modicon 140 cpu modules benefits:

Choose performance

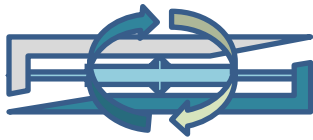
offering a large range of processors, Modicon Quantum is ideal for complex processes. The power of its processors results in optimum cycle times, while integrating even more communication functions, diagnostics, memory flexibility and data storage. The Quantum Safety system is now available, certified by TÜV Rheinland, simple to use and ready to be integrated in your automated system. >SIL3 Modicon Quantum Safety PLC

More flexibility

Choose the best topology, daisy chain loop, ring, star, bus... for the design of your Ethernet architecture.

Higher availability

Hot-standby CPUs and daisy chain loop topology improve the availability of your process. In the event that the cable is broken, the recovery time is less than 50ms for an entire Quantum Ethernet I/O architecture.



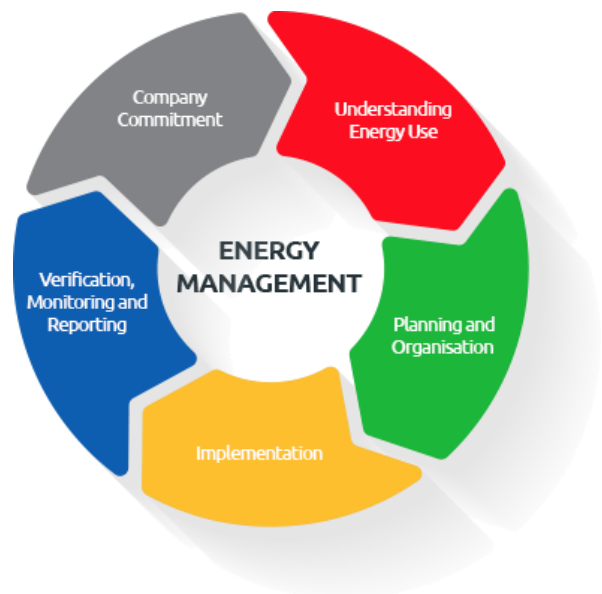
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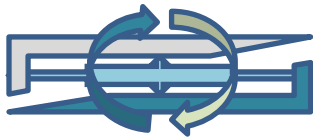


Complex applications				Hot Standby redundant applications		
Unlimited (26 slots max.)		Unlimited (13 slots max.)		Unlimited (26 slots max.)	Unlimited (13 slots max.)	Unlimited (26 slots max.)
31744 inputs (RIO)/8000 inputs (DIO) and 31744 outputs (RIO)/8000 outputs (DIO)		31744 inputs and 31744 outputs		31744 inputs (RIO)/8000 inputs (DIO) and 31744 outputs (RIO)/8000 outputs (DIO)	31744 inputs and 31744 outputs	31744 inputs (RIO)/8000 inputs (DIO) and 31744 outputs (RIO)/8000 outputs (DIO)
Unlimited (27 slots max.)		Unlimited (13 slots max.)		Unlimited (27 slots max.)	Unlimited (13 slots max.)	Unlimited (27 slots max.)
1984 inputs (RIO)/500 inputs (DIO) and 1984 outputs (RIO)/500 outputs (DIO)		1984 inputs and 1984 outputs		1984 inputs (RIO)/500 inputs (DIO) and 1984 outputs (RIO)/500 outputs (DIO)	1984 inputs and 1984 outputs	1984 inputs (RIO)/500 inputs (DIO) and 1984 outputs (RIO)/500 outputs (DIO)
Intrinsically safe I/O, counter, motion control, high-speed interrupt inputs, time-stamp, serial link, AS-Interface sensor/actuator bus		—			—	—
1 RS 232/485		1 RS 232/485		1 RS 232/485	1 RS 232/485	1 RS 232/485
1 integrated, 6 in local rack		1 integrated		1 integrated, 6 in local rack	1 integrated	1 integrated, 6 in local rack
1 integrated, 6 in local rack		1 integrated, 6 in local rack		6 in local rack	1 integrated, 6 in local rack	6 in local rack
Profibus DP: 6 in local rack		—		Profibus DP: 6 in local rack	—	Profibus DP: 6 in local rack
768 KB	1024 KB	3072 KB	1024 KB	1024 KB	1024 MB	3072 KB
7 MB	7 MB	7 MB	7 MB	7 MB	7 MB	7 MB
8 MB	8 MB	8 MB	—	8 MB	—	8 MB
140CPU65150 (4)	140CPU65160 (4)	140CPU65260 (4)	140CPU65160S (5)	140CPU67160 (4)	140CPU67160S (5)	140CPU6726● (6)

What PAEE-1 Solution

- The PAE-1 is a partner collaboration for Industry that makes factory more efficient and provides added value by implementing ISO 50001:2008
- The consortium can offer various solutions to customers that develop industrial systems. Contact us for your system development.





Lab and Instrumentation Workshop

Calibration Services

PAEE provides facility to calibrate pressure or DP Transmitter, Flow Meter, Control Valves, IP Positioner and other instrument in site or in our lab also.

To best meet of the customer demands and reliability of each product for gives robust and efficient operation.

Projects Startup

On preparation of any project we start job from our lab with designing, wiring of control and electric panels withall Equipment (PLC, PID Controller and Indicators etc.) and calibrations of instruments.

Project engineer gives lecture to project team and designs complete circuits, logics, wiring drawings hard copy inVisio tech for client.

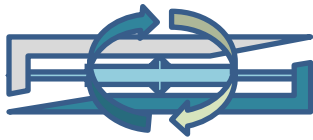
Maintenance of the Equipment's& Instruments

Checking, Calibrations, Maintenance and Repair is done on the work shop by the standards workshop equipment's, test benches' by competent engineers.





Precise Automation Engineering is providing solution of each industrial, factory and offices automation solution.



Precise Automation & Electric Engineering

- **Annealing Furnace Automation**

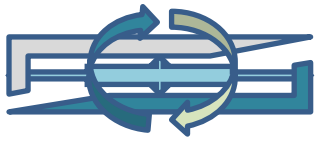


- **Oil Heater Automation**



- **Effluent Treatment Plants**





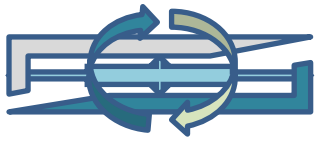
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- Industrial Conveyors



- Weighing System





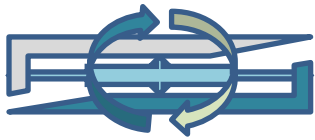
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- Flow Metering (Gas, Air, Steam, Water, Oil, Beverages and Chemicals etc)



- Galvanizing Plants





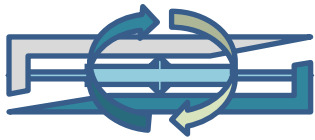
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- Combustion Flue Gas Analysis



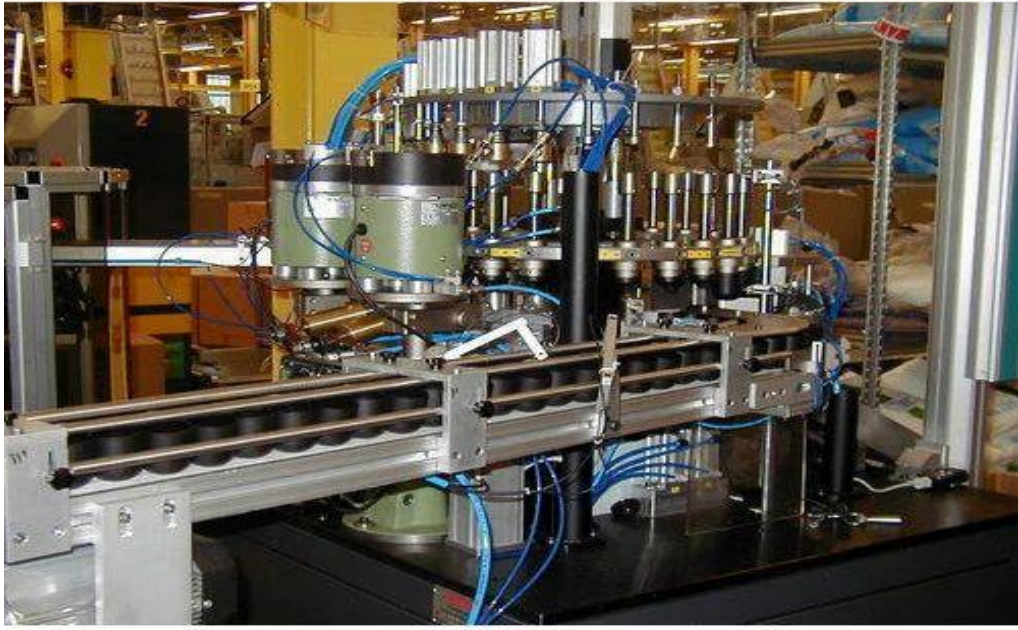
- Boiler Automation with Dual Fuel or Gas Fired Burner/LPG System





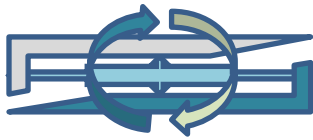
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- All types of Machines Control & Automation



- Servo Motors Control Systems





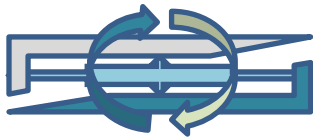
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- Multiple Motors Speed Synchronization Control Systems (Encoder System Application)



- Annual Maintenance Contact/ Shutdown Maintenance Projects.



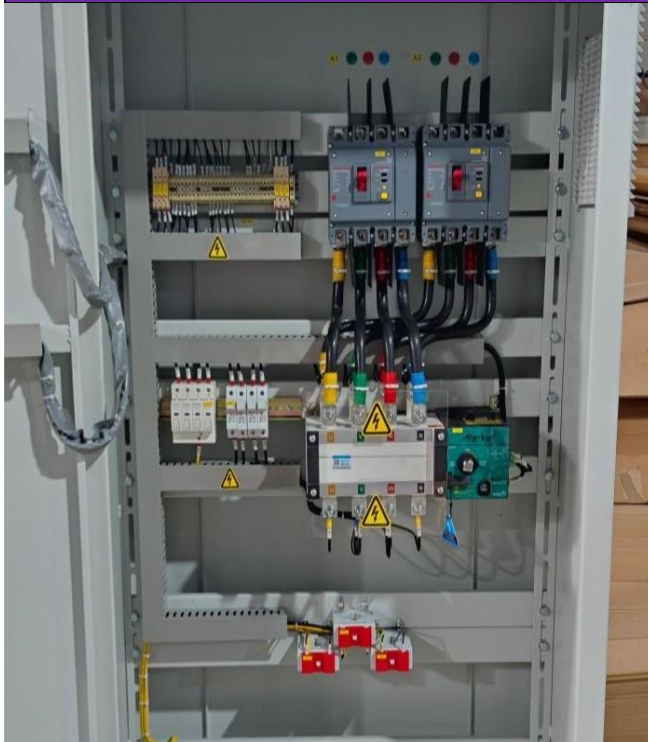


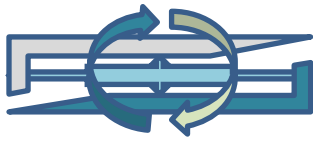
Electric Services

Solutions & Modification of the electrical control panels is available on the ground of PA.

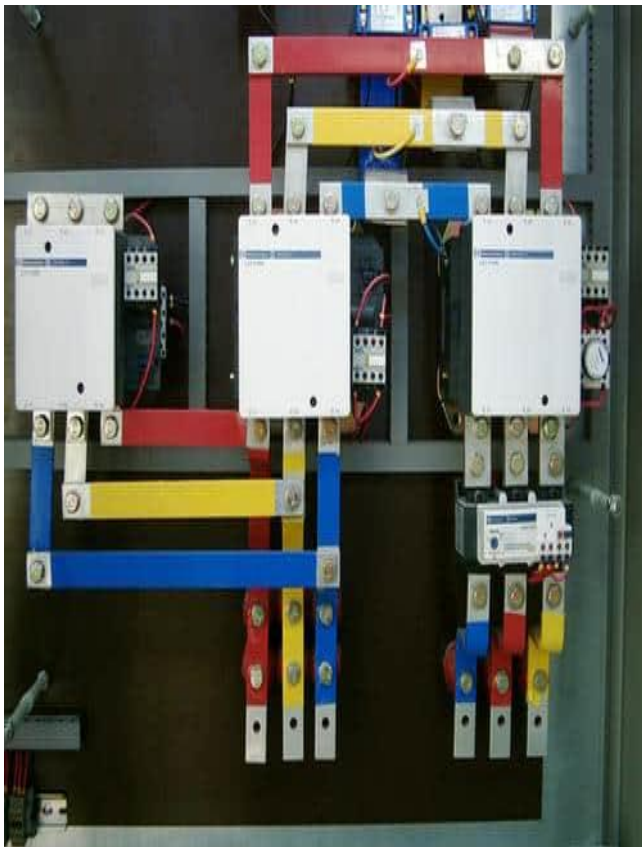
We are offering the designing of ECP its maintenance spare trouble shooting and modifications to meet the needs of new regulations.

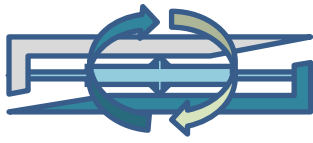
Electrical Panels	PFI Panel
	MCCB Panel
	PLC Control Panel
	MCC Panel
	Star Delta, DOL Panel
	ATS/AMF Panel
Routing, Lying, Dressing of Signal, Control and Power Cables with respect to all factors. We also provide Distribution Control Panels and Cable Trays with complete Installation and Commissioning Services.	





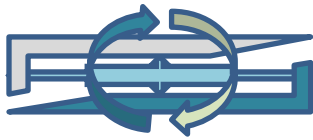
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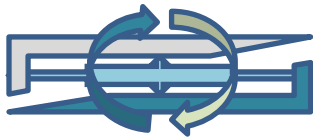




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Power House Control and Automation

Generator Parts	Diesel and Gas (Heavy and Medium) Generators Automation Complete with Fuel Actuation, Frequency Controlling, AVR or DVR, Over/Under Voltage, Over Load, Temperature (Heat Exchanger and Cooling Tower), Oil Level, Ignition System, Complete Safeties and Control Systems on HMI, SCADA etc.(For all type of Generators like Caterpillar-3512, 3516, 3520C etc, Janbacker, Waukesha, Cummins).
Power House Projects	Power Plant Installation, Commissioning and Maintenance Services
Control Panels	We provide Complete Control and Electric Panels for Generator Automation with installation, Commissioning and Maintenance Services
Power House Equipment's	We Supply all Instruments, Safeties and Electric Equipment's like Actuator, AVR, DVR, Governor, Gas Pressure Regulator, Temp Sensor/Switch, Level Sensor/Switch, Solenoid Valve, Safety Instruments, Contactor, Circuit Breaker, Frequency Relay, Overload Relay, Over/Under Voltage Relay, Temperature/Pressure Gauge etc



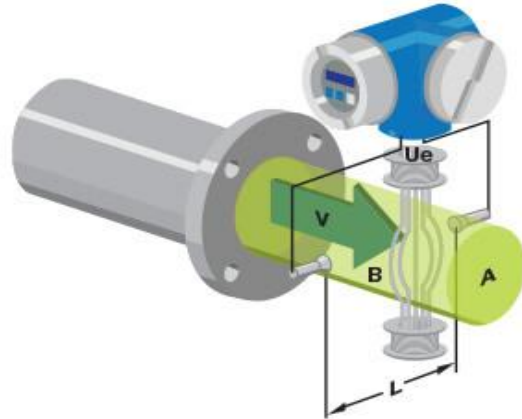
Products and Services

PAEE deals in Sales and Services of Oil/Gas Fired Burner, Flow Meter, PID Controller, Programmable Logic Controller, Transmitter, Sensor,

Detector, HMI/SCADA, Control Valve, Pressure Regulator, IP Positioner,

VFD/Inverter and other many Products required for Processes and Plants to different Industries

PAEE provides facility in all Instruments, Equipment, Control Panels and Electric Panels as per Plant requirements with complete Installation, Commissioning and Maintenance Services.



höntzsch

flow measuring technology

Flow measurement with sensors ZS25 at working temperatures up to +500 °C
Optional with integrated and configurable transducer UFA

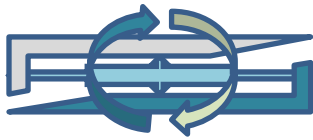
Advantages

- ☐ low starting value
- ☐ large measuring range span
- ☐ maximum fatigue strength thanks to vane wheel which is easy on the bearings
- ☐ corrosion resistant
- ☐ sterilisable
- ☐ high working temperature and pressure ranges
- ☐ accurate values even in varying and/or unknown gas compositions
- ☐ low pressure drop
- ☐ easy adjustment to process parameter
- ☐ compact unit with optional local display

Measured variables

- ☐ (actual) flow velocity v [m/s] and
- ☐ (actual) flow rate [m³/h] in air/gases and water/liquids
- ☐ conversion to standard velocity/standard volume flow with input parameters pressure and temperature





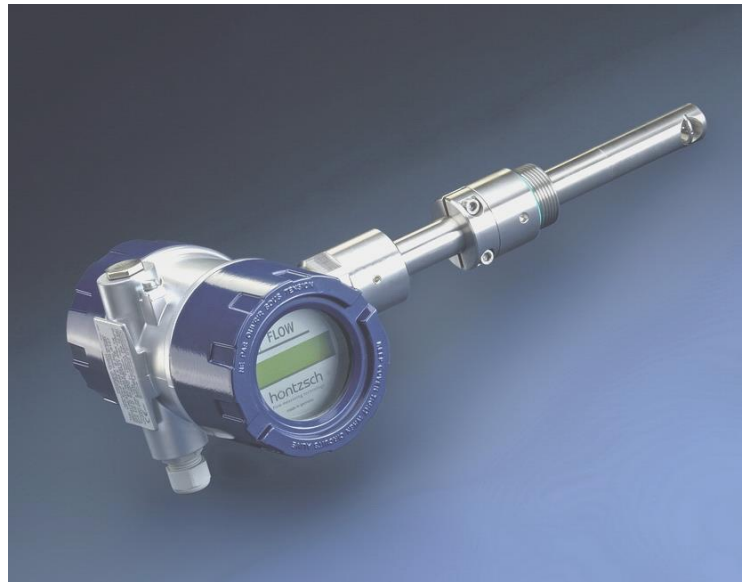
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Examples of application

- ☐ flow measurement of air, exhaust gas, process gas, ...
- ☐ in processes with varying and/or unknown gas com-positions
- ☐ flow monitoring in pharma- ceutical installations
- ☐ monitoring neutralisation processes
- ☐ measurement of flammable liquids
- ☐ measuring in non-conductive liquids such as ultra pure water, for example in the semiconductor industry

Functional principle

- ☐ vane wheel flow sensor
- ☐ sensing the vane rotation; non-contact inductive proximity switch



(USA)

ONICON is proud to be part of TASI Measurement. The TASI Measurement business segment delivers flow measurement instrumentation and controls, using multiple flow measurement technologies, across a broad number of end markets. Also included in this business segment is a complementary wireless mesh data transmission system and an array of dispensing solutions. TASI Measurement has expertise in metering paints & coatings, hydraulic fluids, and chemicals, delivering dispensing systems that streamline manufacturing and production lines, and providing wireless information networks to drive intelligent decision making. TASI Measurement products are designed, manufactured, customized and serviced through technical centers in the USA and Europe.



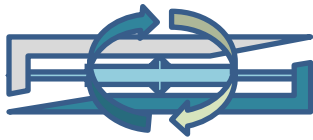
Electromagnetic Flow Meters



Turbine Flow Meters



Energy Measurement



Azbil Differential Pressure Transmitter/Pressure Transmitters Advanced Transmitter Model GTX_ _ _

Advanced Transmitters are smart differential pressure and pressure transmitters equipped with microprocessors for high performance and reliability. They can measure flow rate, pressure, and fluid levels of gases, liquids, and steam, as well as transmitting 4–20 mA DC analog or digital signals in proportion to the measured pressure. By means of two-way communication between the transmitter and a CommStaff or HART® communicator, operations such as self-diagnosis, range setting, and zero adjustment can be easily accomplished.

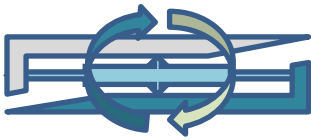
Azbil Paperless Recorders Model ARF100/ARF200

User-friendly ARF100/ARF200 series paperless recorders come equipped with various recording formats and display functions.

These Ethernet-capable recorders offer 100 ms high-speed data acquisition and a high precision of $\pm 0.1\%$. With standard features that include a USB port and CF card slot,

ARF100/ARF200 paperless recorders are ready for use in a variety of fields. Uses include not only recording, but also remote monitoring, sending of e-mail alerts in the event of an emergency, automatic data transmission, and distributed remote measurement.





Features of the ARF100

Superior usability (loaded with functions easy enough to use without the manual)

- Operation and configuration were designed with consideration for ease of use.
- Large-capacity data memory
- Files can be read via the USB port

Various recording functions (high-speed data acquisition and multiple recording/computing functions)

- High-speed, high-precision recording of up to 12 input point
- Various recording methods are possible
- Data storage formats can be selected
- Text can be inserted on the display

Full network functionality (remote monitoring of collected data and data management)

- Standard LAN (Ethernet) support enables various applications, including remote monitoring
- Various functions can be realized over the network



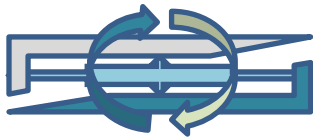
Proximity Switches (Proximity Sensors)

Proximity switches (proximity sensors) provide contactless detection of an approaching metal object.

We offer a variety of induction-based proximity switches, which make use of electromagnetic coupling to detect eddy currents generated in a metal target object.

Available types include cylindrical, square, compact, unshielded, DC two-wire, DC three-wire, AC-DC, and connector connection models, as well as varieties for particular environments, such as coolant-resistant, spatter-resistant, and aluminum-powder-resistant models.





| Photoelectric Switches with Self-Contained Amplifier

Distinguished among general-purpose photoelectric switches for usability and high reliability

Easy to operate, various connection methods, long-distance detection, protective structure

A variety of types for various applications.

Detection methods: thru-scan, diffuse-scan, retro reflective, distance-measurement models.

Applications: harsh environment applications, liquid detection, substrate detection, glass substrate detection, displacement measurement

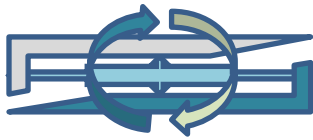


Germany

WAGO's automation technology is versatile, offers open standards, simplifies your production process and building applications and offers an all-encompassing product selection – from software, HMI devices and control technology, to fieldbus-independent I/O systems, to switches and sensor/actuator boxes.

Flexibility and planning freedom are the major advantages of modular and fieldbus-independent devices used for decentralized automation. WAGO broke new ground in 1995 by introducing a fieldbus system patterned after building blocks – modular fieldbus nodes could be adapted to fit a specific application. Since then, we have continued expanding and evolving this system with state-of-the-art control technology and displays.



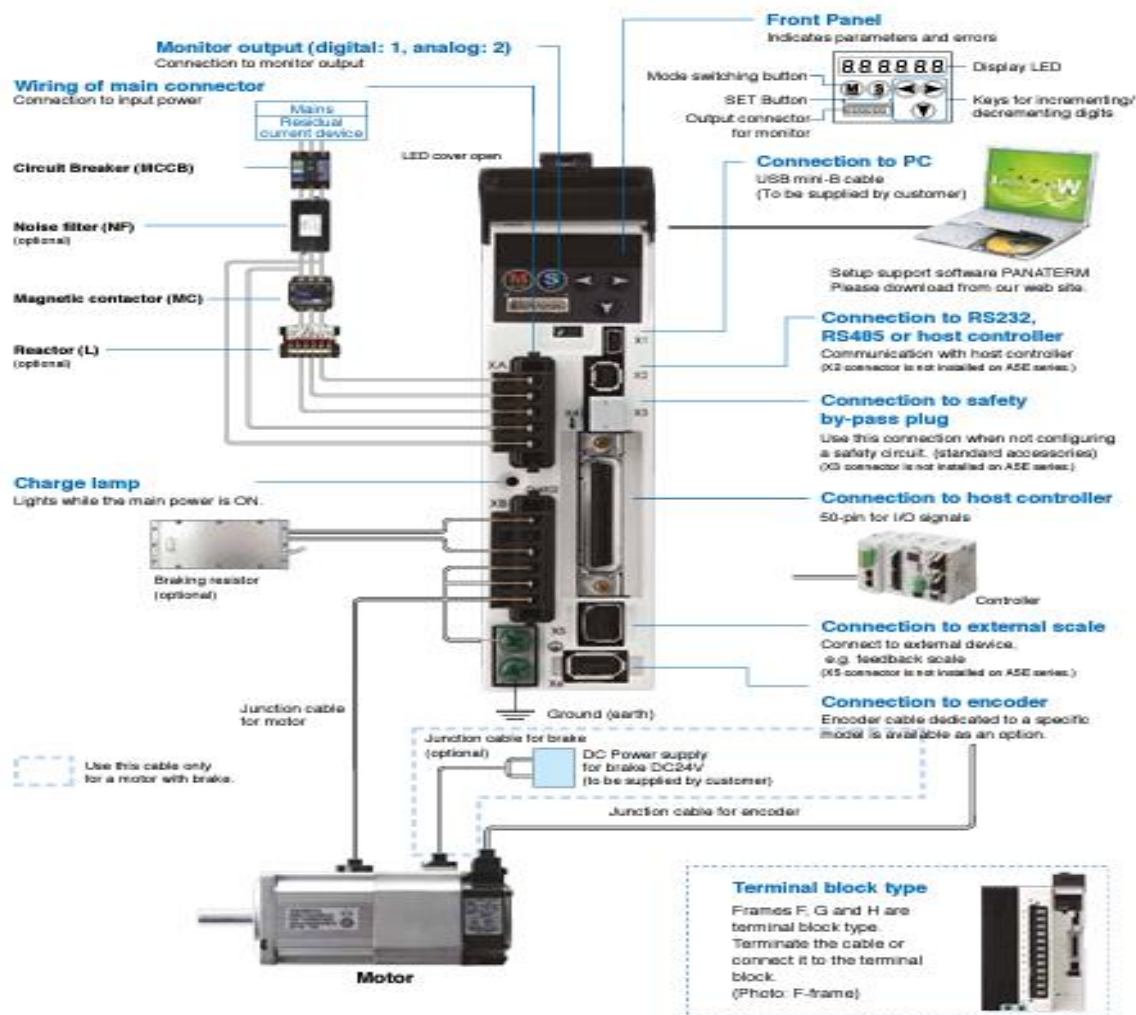


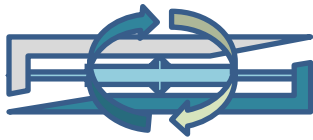
AC SERVO MOTORS

Panasonic offers a wide range of AC Servo Motors from 50W to 15,000W, making them ideally suited for both small (1 or 2 axes) and complex tasks (up to 256 axes).

A complete solution with PLC, touch terminal, and servo drives from Panasonic. Our compact drives offer a

Great advantage over competitor's products for packaging machines (labeling, packing, etc.)



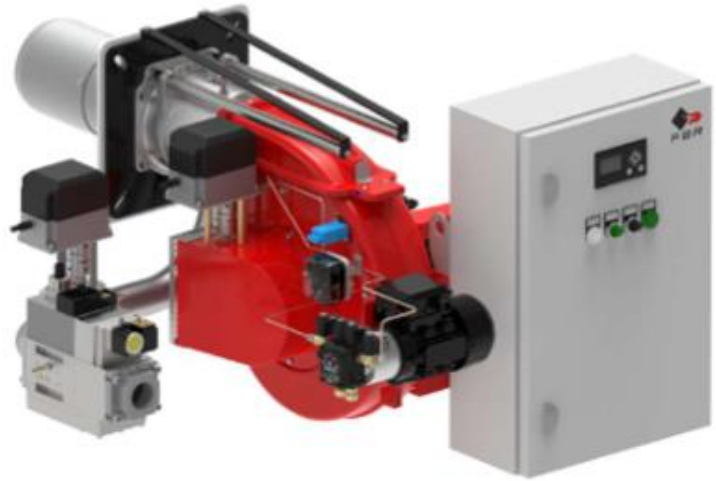


Precise Automation & Electric Engineering



FBR Burners

Dual fuel gas/light/heavy-oil/Diesel/Gas/Single stage/two-stage burners with electronic control box. Gas fuel operation: two stages progressive or modulating operation (if equipped with addition of optional modulation kit PID and probe; to guarantee an ideal proportionality of the power supplied to the thermal load). Light-oil fuel operation: two stages. Composed by: aluminum frame, fan at high pressurization and combustion head with adjustment at high efficiency and high flame stability.



The burners are equipped with a display that allows to: - adjust the operating parameters of the burner- visualize the flame intensity- adjust the operating curve of the burner (air / gas ratio) With the addition of optional accessories (probes) thanks to the most advanced systems for automatic modulation in mechanical or electronic version, the burner constantly ensures the proper gas / air ratio. The maximum efficiency of the returns in each combustion point derived from the punctual adaptation of the thermal load to the heat requirements of the burner at any instant of operation. In the version with the electronic cam the fuel / combustion air curve, more extended, is fully exploited, guaranteeing excellent performance in terms of accuracy and speed, even during the calibration phase. A microprocessor monitors the different stages of the process and allows the correct repetition of the sequences of operation. Optional accessories: PID power modulator kit, probe, PC interface, VSD, O2 control, O2 + CO control, field bus (profibus, modbus, profinet).



Light Oil Burner

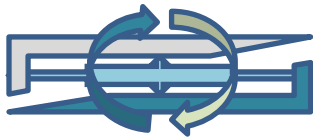


Gas Burner



Heavy Oil Burner





Graco Husky Pumps

HUSKY AIR OPERATED DOUBLE DIAPHRAGM PUMP

The Husky double diaphragm pumps are manufactured with your productivity in mind – providing you with one of the most reliable and efficient pumps in the market. Each membrane pump is thoroughly tested before it leaves our factories.



Husky 1590 Air Operated Double Diaphragm Pump

The Husky 1590 air-operated diaphragm pump features a patented, high-reliability closed center air valve that is online serviceable and an epoxy-coated air section for tough environmental conditions.

Husky 15120 Air Operated Double Diaphragm Pump

The Husky 15120 air-operated double diaphragm pump features a stall-free low pulsation air valve which provides a smooth and rapid changeover. The one-piece center section eliminates leaks and reduces maintenance on Husky pumps when compared to other double diaphragm pumps.

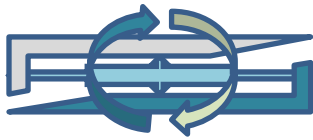


KELLER

Pressure Transmitters

A market leader in the production of isolated pressure transducers and transmitters





Precise Automation & Electric Engineering

KELLER Pressure was established in 1974 by Hannes W. Keller, the inventor of the integrated silicon measuring cell. Today, his sons Tobias and Michael Keller run the business. The company is wholly family-owned and employs 480 staff.

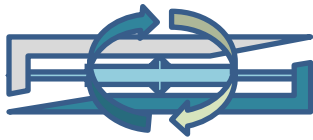
KELLER feels a strong connection to its home of Switzerland. Its headquarters are where the value is added and where most of our employees work. As a result, all KELLER products bear the quality seal «Made in Switzerland» and embody the Swiss values of quality, functionality and reliability.

KELLER Druckmesstechnik AG, including KELLER Gesellschaft für Druckmesstechnik mbH in Jestetten, is certified to ISO 9001. This means that our measured values can be fully traced to national standards.



The Spirax Sarco pilot operated pressure regulator works by balancing the downstream pressure against a control spring. This modulates a small valve head over a seat (the pilot). The flow through this seat is directed, in turn to the main valve diaphragm, where it modulates the main valve. In order to achieve the most stable operating condition, an external pressure sensing line must be used. This allows downstream pressure to feed back to the underside of the pilot diaphragm, balancing the spring force, causing the pilot valve to throttle. This settles the pilot valve, allowing a constant flow across the main diaphragm. This ensures that the main valve is also settled to give a stable downstream pressure.





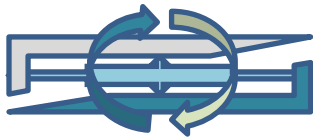
Precise Automation & Electric Engineering



MASCOT meets customer needs with a wide range of proven and new manufacturing technologies. If looking for a specific solution; MASCOT can assist you with its practicing R&D resources.

Custom engineering solutions and Specialty Valves for severe service with reduced lead-times is the focus of MASCOT. This with complete in-house Manufacturing, Assembly, and Testing along with full material traceability and extensive quality procedures that is in the system; assures that MASCOT products will exceed your expectations.





BECKHOFF

Beckhoff Automation

New Automation Technology

Beckhoff implements open automation systems using proven PC-based control technology. The main areas that the product range covers are industrial PCs, I/O and fieldbus components, drive technology, automation software, control cabinet-free automation, and hardware for machine vision. Product ranges that can be used as separate components or integrated into a complete and mutually compatible control system are available for all sectors. Our New Automation Technology stands for universal and industry-independent control and automation solutions that are used worldwide in a large variety of different applications, ranging from CNC-controlled machine tools to intelligent building control.



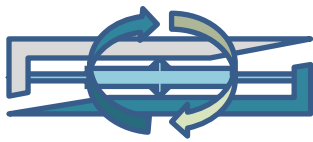
PC-based control technology

Since Beckhoff's foundation in 1980, the development of innovative products and solutions on the basis of PC-based control technology has been the foundation of the company's continued success.

We recognized many standards in automation technology that are taken for granted today at an early stage and successfully introduced to the market as innovations. Beckhoff's philosophy of PC-

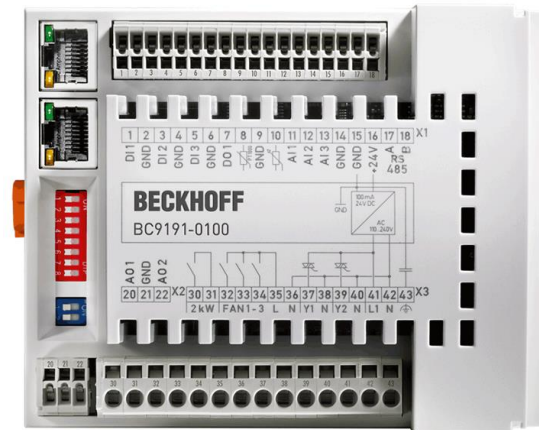


based control as well as the invention of the Lightbus system and [TwinCAT](#) automation software are milestones in automation technology and have proven themselves as powerful



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alternatives to traditional control technology. **EtherCAT**, the real-time Ethernet solution, provides a powerful and future-oriented technology for a new generation of control concepts.



SIEMENS

Modular production - maximum flexibility

combined with maximum standardization

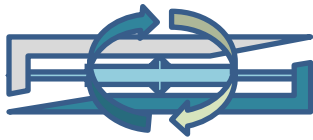
In today's world, process/production plants must be able to respond instantly to changes in the environment, such as labor shortage, disruptions in world trade, fluctuations in demand, etc. The solution to these challenges is modular automation.

Compared to traditional automation, modular automation enables flexible manufacturing by allowing a production line to be divided into mobile modules and reconfigured quickly. This modular design makes it easier to meet different requirements.

Module Type Package (MTP) standard as modularization enabler

When operating a modularly structured plant, the integration of process units from different manufacturers often involves a great deal of effort and problems, especially due to the use of different communication protocols and interfaces.





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Standardization is the key to open and flexible automation and plant concepts. This is where MTP comes into play. Module Type Package (MTP) is a formal description of the interfaces and functions of the automation technology of a modular process unit. MTP is standardized in the VDI/VDE/NAMUR 2658 guideline and enables manufacturer-independent integration of process units into a higher process control level. In the standard, a process unit is referred to as a PEA (Process Equipment Assembly) and the process control layer is referred to as a POL (Process Orchestration Layer).

The functional description is generated from the module automation data. This allows any higher-level automation system that "understands" MTP to precisely control a specific module, regardless of whether this involves, for example, a tank or a mixer.

This solution approach makes it possible to modularize today's automation systems and thus increase the flexibility of production plants.



OEM / Module layer

The module or plant constructor supplies the plant operator with a pre-automated, independently executable and tested module, which ensures faster commissioning and fault-free production at the customer site.

System integrator / Process Orchestration Layer

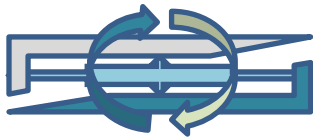
MTP files with integrated process pictures are imported into the higher process control layer, where the content of the machine/plant is created. This permits uniform operation of the standard and modular automated process unit.



We offer a range of products that support end-to-end use cases and enable you to seamlessly integrate MTP into your operation. Whether a native MTP implementation or a legacy upgrade is concerned, Siemens has a solution!

Portfolio overview:

- Machine level



Precise Automation & Electric Engineering

- SIMATIC Control Function Library (CFL)
- SIMATIC Process Function Library (PFL)
- SIMATIC MTP Creator
- Orchestration level
 - SIMATIC PCS neo
 - SIMATIC PCS 7
- Horizontal communication
 - SIMATIC Live Link

Benefits

- "Re-purposing" of production lines/plants
- Increased flexibility
- Multi-vendor
- Easy scalability and adaptation to fluctuations in demand
- Shorter time to market
- Seamless integration of PEAs (Process Equipment Assemblies)
- Higher efficiency

Application

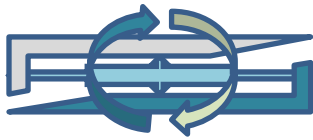
Originally, the concept of modular automation with the use of a standardized interface between the module and the orchestration layer was developed for the process industry, such as the pharmaceutical and chemical industries.

As a result, MTP is erroneously associated only with these industries.

However, since the modularization of production and process lines offers immense advantages, other industries are also convinced of this and are using the MTP standard to benefit from it.



In today's production lines, the Human-Machine Interface (HMI) plays an important role, connecting numerous devices and making their status, alerts, control elements or even the entire production accessible to operators. However, with HMI projects getting larger, developers often find themselves buried in tasks involving mass configuration of similar types. These repetitive and inevitable tasks not only get increasingly laborious as the design phase unfolds, but also present a formidable challenge for ongoing maintenance.



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In response to this challenge, WEINTEK introduces a new feature in Easy Builder Pro – Template. Similar to the idea of PowerPoint master slides, now developers can first define specific window pages as templates and replicate them in various pages within the HMI project. This feature helps developers expedite HMI program development significantly, leading to substantial time savings.

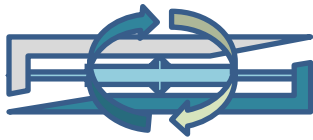


Weigh modules are used when unique scales such as tanks, hoppers, vessels, reactors and conveyors are required.

Weigh module users are under increasing pressure to improve efficiency, quality and safety of their production.

In response, METTLER TOLEDO has designed a new generation of weigh modules to significantly improve accuracy and to offer real-time status information about the health of the weighing system—benefits that are not available using classic weighing technology.





Precise Automation & Electric Engineering

This white paper explains the key features of modern weigh modules compared to traditional weighing technology.

Tension Weigh Modules

Tension Weigh modules enable the safe conversion of suspended tanks and hoppers into a scale. Built-in features ensure that safety, performance and pr...



Fire Electric and Diesel Pumps and Jockey Fire Fighting Pump Set Price list from PURITY Pump

TECHNICAL DESCRIPTION

- * Flow **50GPM--5000GPM**
- * Head/Pressure **5-17bar (50-170m)**
- * Switch **Automatically** among the three pumps
- * Both **Manual and Automatic** operation is available
- * Can work when the power is off
- * **Customized size and pump group**



PSF

STANDARD END...



PSD

PSD...



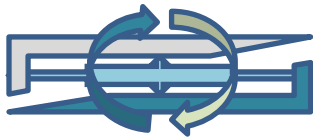
PSD

[PSD]FIRE...



XBD

XBD FIRE WATE...



Precise Automation & Electric Engineering

- * YE3 **high efficient motor** with protection **IP55 class F**
- * Pump case with **Anti-corrosive** coating
- * With **NSK** bearings, wear resistance **mechanical seal**
- * Different Mounting Styles, Easy Installation
- * **ISO 9001** Manufacturing Facility

PSC

F double suction split case fire pumps

TECHNICAL DESCRIPTION

- New split case pump
- Original design by PURITY (patented)
- Available complete with electric motor or diesel engine
- Easily back pull-out from driver
- Pump case with anti-corrosive coating HT250
- Impeller in stainless steel AISI 304 or HT250
- Shaft in stainless steel AISI 304 or galvanized iron
- Quality bearing, mechanical seal/gland packing.



PEDJ

FIRE ELECTRIC...



PSC

F DOUBLE...



PEEJ

HIGH PRESSURE...

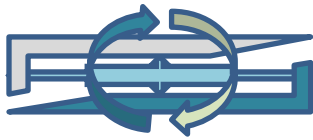


PURITY



PSD

FIRE FIGHTING...



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Endress+Hauser 
People for Process Automation


EMERSON
Process Management

Swagelok

VEGA

ASCO[®]

WIKAI[®]



KROHNE

ABB

Schneider
Electric



 **PHOENIX**
CONTACT



ROSEMOUNT[®]
Analytical

SIEMENS

Johnson
Controls



FISHER

Rexroth
Bosch Group

bürkert
Fluid Control Systems



EATON
Powering Business Worldwide

BALLUFF
sensors worldwide

FLOWERVE



HIRSCHMANN



GEMÜ[®]

IMI Hydronic
Engineering

 **Belman**



LAPP GROUP

Lenze

FITOK
Valves and Fittings

OMRON

SICK
Sensor Intelligence.



JOVENTA
The Actuator Maker

Masoneilan

PILZ
THE SPIRIT OF SAFETY

 **Magnetrol**[®]



PEPPERL+FUCHS



Pentair

spirax
sarco



Allen-Bradley

sitron
Sensor

tyco Electronics

kamstrup

TURCK

MTL Instruments

 **Leuze electronic**

HITACHI
Inspire the Next

Hengesbach
Prozessmesstechnik

 **BERNSTEIN**

BELIMO

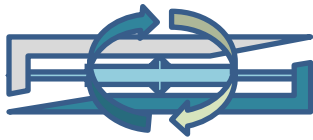


HELUKABEL[®]

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MESS- UND REGELTECHNIK

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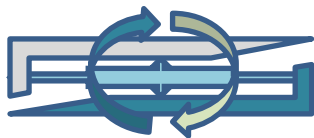
höntzsch
flow measuring technology

BECKHOFF



GRACO®

+ KELLER



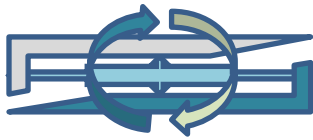
Precise Automation & Electric Engineering

Experience and Services

- PAEE have well qualified, skilled and experienced engineers in industrial automation, instrumentation and electrical field.
- PAEE trains our technical staff with lectures and practical experience on Electrical, Electronics, Instruments, Pneumatic, Hydraulic, Temperature, Level, Flow, Pressure, Wiring (Power, Control and Signal), Logics, Programming and Process Parameters settings etc.
- PAEE also trains our staff highly on calibration and installation of Flow Meters (Mag. flow, Differential Pressure, Probe insertion, Turbine Type Flow meter), Adjustment and Installation of PH, Level, Temperature, RPM, Vibration, Proximity, Humidity, Chute and Pressure Sensors, Metal Detectors, Encoders, Load Cells etc., Calibration of (Pressure, Temperature, PH, DP) Transmitters, Proportional Control Valve, IP Positioner, Gas Pressure Regulator etc.

Services Provided to

M/s. Matiari Sugar Mill (Pvt) Ltd	M/s. Getz Pharma (Pvt) Ltd.
M/s. Al-Noor Sugar Mill (Pvt) Ltd.	M/s. Demar Engineers (Pvt) Ltd.
M/s. Itehad Sugar Mill (Pvt) Ltd.	M/s. Allied Engineering (Pvt) Ltd.
M/s. GojraSamundari Sugar Mill (Pvt) Ltd.	M/s. Masco Engineering (Pvt) Ltd.
M/s. Dewan Sugar Mill (Pvt) Ltd.	M/s. Nayyar Carpets (Pvt) Ltd.
M/s. Descon Engineering Ltd.	M/s. Nabi Qasim (Pvt) Ltd.
Babar Galvanizing Plant (Pvt) Ltd.	CDL (Haleeb) (Pvt) Ltd.
Champion Paints (Pvt)Ltd.	Maza Juice (Pvt) Ltd.
Ayesha Amin Textile Mills (Pvt)Ltd	Pakistan Tobacco Company (Pvt)Ltd
Kohinoor Textile Mills (Pvt) Ltd	Naveena Textile Mills (Pvt) Ltd
Surge Laboratories (Pvt) Ltd	Miraj Rebuilt Factory
MK Sons Textile Mills (Pvt) Ltd	Sitara Chemical (Pvt) Ltd
Gohar Textile Mills (Pvt) Ltd	Pepsi Cola (Pvt) Ltd.



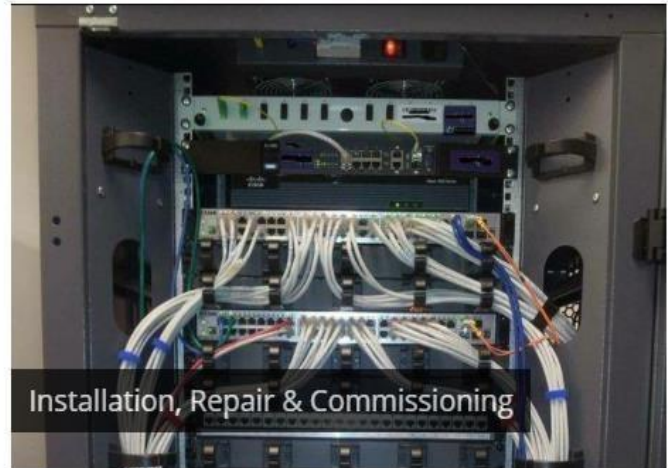
Turnkey Solutions / Marine / Offshore services

The Precise Automation have offered 24/7/365 specialist services, to all marine and offshore operators, all around the world.

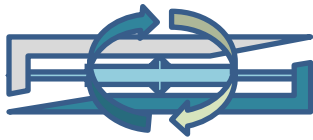
Our expertise in shipbuilding sectors continue to steer us in new advancement in technological innovations. Our company has its own in-house Marine department providing various electrical & Mechanical services. Qualified marine engineers follow all guidelines and ship standards as outlined by classification societies.



- Electrical load calculation, analysis and diagrams
- Electrical design and redesign of power distribution systems
- Protection, Automation and control
- On-site supervision



- Cable trunking and conduits
- Power Distribution – Equipment, lighting, cabling installation
- Commissioning for Power Panels, Transformers, UPS Systems, Inverters, Converters, etc
- Protection, Automation and Control Systems
- Fire detection and alarm systems
- Data networks
- CCTV – Surveillance and Security Systems
- Wi-Fi communication systems
- General Electrical Service for Revitalization and Refurbishment
- Repairs of electrical installations
- Repairs and maintenance of electrical machinery motors and generators AC-DC every type
- Infrared Thermograph to electrical domain (Wirings & Electric Cupboards Control, defective connections, a bad dimensioning cables/load, electro motors etc...)
- Inspection and repair of power circuit breakers



Precise Automation & Electric Engineering

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Bank: United Bank Limited
Account Number: **0845-290804432**