

A yellow excavator is shown in profile, lifting its bucket. The scene is set at sunset or sunrise, with a warm, orange and blue sky. A large, stylized white wireframe globe is positioned on the right side of the image. A solid blue triangle is located in the bottom left corner, partially overlapping the excavator's tracks.

CONSTRUCTION MACHINERY

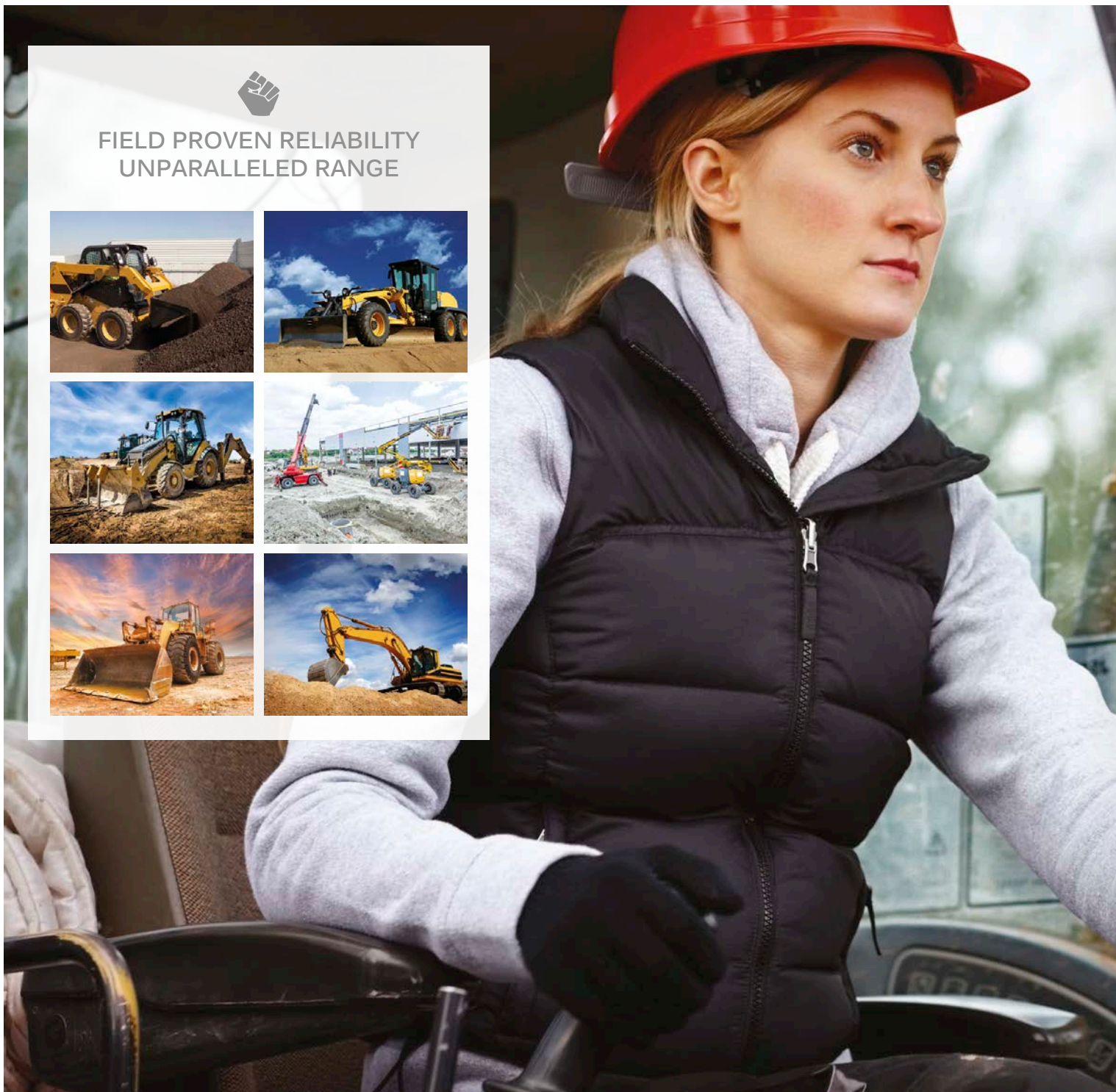
APEM offers high-reliability Human Machine Interface (HMI) products for special vehicles.

With vertically integrated manufacturing, APEM guarantees an uncompromised reliability through its custom product development, manufacturing excellence and outstanding service. APEM offers a very broad range of HMI components designed for the off-highway vehicles, including joysticks, switches and keypads.

APEM IN CONSTRUCTION MACHINERY



FIELD PROVEN RELIABILITY
UNPARALLELED RANGE



A BROAD RANGE OF PRODUCTS AND SOLUTIONS

APEM OFFERS

1 STANDARD PRODUCTS

PANEL SWITCHES



PCB SWITCHES



LED INDICATORS



JOYSTICKS



PANEL SOLUTIONS



2 CUSTOMIZED PRODUCTS

With robust development processes, and with the support of ergonomics experts, APEM offers a unique expertise in HMI customization. APEM engineers will propose you the best ergonomics, shape, marking, backlighting, material, waterproofing, connection... in line with your expectations and environment.

Depending on your need, APEM can propose fully customized products ("customer exclusive") or a custom design with already qualified HMI components, joystick handles and joystick bases.



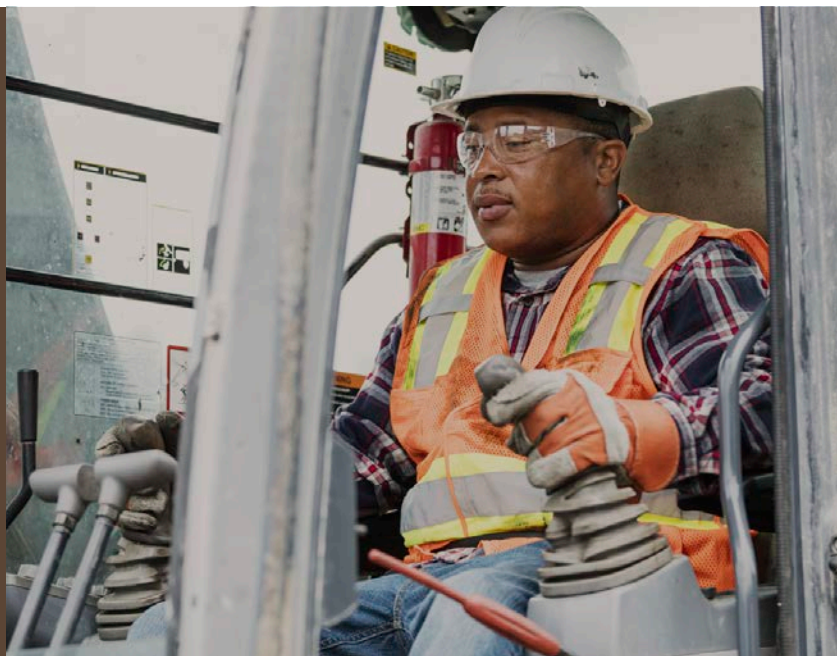
3 CAPABILITY TO BUILD PANEL SOLUTIONS



With quality components and 9 keyboard technologies available, APEM can provide sub-assemblies, design and build a remote control or a complete HMI precisely to your need.

APEM can provide you with full service capabilities, including studies and testing. With control of all stages of production, you can be sure that the solution will perform to mechanical, electrical, environmental and EMC/EMI standards. Our internal electronic teams manage the integration of communication protocols as well as protection filters and power supplies.

**YOU HAVE
SPECIFIC
NEEDS,
WE HAVE
DEDICATED
SOLUTIONS**



**PREVENT ACCIDENTS DUE
TO UNINTENDED OPERATION**
Choose a rocker with a reliable
interlocking mechanism.

KL SERIES

The KL Series features a small switch at the top that, once pressed, will prevent the switch from being turned on unless it is pressed down.



IMPROVE ERGONOMICS
Integrate a mini joystick
on your main joystick.

TS SERIES

This proportional two axis joystick is similar in size and operation to «gamepad» controls, but in a rugged industrial package.



**OPTIMIZED SPECIFIC
FUNCTIONS
ON ONE HANDGRIP**
Differentiate your HMI
with a custom joystick using
qualified and field proven
components.

XD RT HANDLE

A multi-axis Hand Grip joystick with ergonomics designed specifically by APEM for demanding vehicle applications.



**NAVIGATE THE TOUCH PANEL
WHILE KEEPING YOUR HAND
ON THE JOYSTICK**
Integrate a navigation joystick
on you handgrip.

NV SERIES

Contrary to most navigators currently on the market, the NV series provides enhanced tactile feedback in 4 directions plus pushbutton. This results in improved haptics and extremely precise control.



THE XD SERIES RT HANDLE

CONFIGURE YOUR JOYSTICK WITH QUALIFIED OFF-THE-SHELF HMI COMPONENTS

The following HMI components can be used on the face and rear plates of our handles:



NV SERIES

- 4 and 5 way operation
- Momentary actuation with tactile feedback
- IP67 panel sealed



FNR SERIES

- Ideal for forward-neutral-reverse functions
- Momentary and latching operations
- Panel sealing to IP69K



IX SERIES

- Momentary tactile operation
- Elastomer boot provides IP67 panel sealing
- LED backlighting options



HR SERIES

- Hall effect roller
- Spring centering or friction hold
- IP67 sealed electronics and panel sealed options

XD SERIES

Shallow mounting depth < 60 mm
Extremely robust, resists high axial load (1780 N - 400 lbf)

PANEL SOLUTIONS

APEM offers dedicated solutions of complete HMIs or remote controls, based on its knowledge of keyboard technologies and their integration, but also the right selection of high-quality components.

By combining the expertise acquired in the construction market and its environment during the last decades, APEM provides the most suitable solution to its customers.

TECHNOLOGIES MASTERED BY APEM AND ADAPTED TO CONSTRUCTION EQUIPMENTS:

Membranes

Elastomeric*

MEC PCB switch panel*

Membranes on PCB*

Metal*



*CAN Bus output available

ELECTRONIC & SOFTWARE

PERFORMANCE - APEM's Panel Solutions ensure the highest performance to electronics, environmental and EMC/EMI standards.

EFFICIENT INTEGRATION - APEM designs electronics and connector systems to fit most applications.



COMMUNICATION PROTOCOLS

CAN, (J1939, CANopen),
RS485, RS422, USB...

INTEGRATED BOOT LOADER

Diagnostic and software
upgrade capability

ELECTRONICS AND SOFTWARE DESIGN

LOW POWER

BIT SOFTWARE

Real time Built-In-Test

FILTERING & PROTECTION

ESD, EMI, filter and protection
of network...

INTEGRATED DIMMING

SAFETY

APEM offers standard SIL2 compliant components but also develops custom PLx (AgPLx, MPLx, ...), SILx solutions as per customer requests.

CUSTOMER EXCLUSIVE

CUSTOM PRODUCTS
CO-DEVELOPED WITH CUSTOMERS



**APEM
EXCLUSIVE**

ON DEMAND ELECTRONICS
& SOFTWARE INTEGRATION

INTEGRATION OF CAN BUS OR
OTHER PROTOCOL AND SAFETY
FEATURES ON DEMAND

SEALING UP TO IP69K, IP68



ROBUST CONTACTS
AND RESISTANT MATERIALS
FOR LONG LIFE EXPECTANCY

APEM offers a large selection of part numbers consisting of switches, indicators, joysticks and keypads in different colors, markings, finishes, shapes and dimensions... creating an unlimited combination of possibilities.

APEM develops complete interface solutions combining components (switches, keypads, indicators, joysticks), standard electronic boards and programming.

An APEM team professional is happy to assist you in the development of these complete turnkey solutions meeting your specific requirements, with responsiveness and flexibility.

OUR PRODUCTS

WHETHER IT'S A STANDARD
PRODUCT OFFERING
OR A CUSTOMIZED
SOLUTION, LET APEM'S
DECADES OF EXPERIENCE
WORK FOR YOU

CONTENT



JOYSTICKS



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DESIGNED FOR CONSTRUCTION



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PCB SWITCHES



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XD SERIES

HALL EFFECT ROBUST JOYSTICK

TOP APPLICATIONS:
LOADER, EXCAVATOR, TELEHANDLER, MINING



DESIGNED FOR CONSTRUCTION

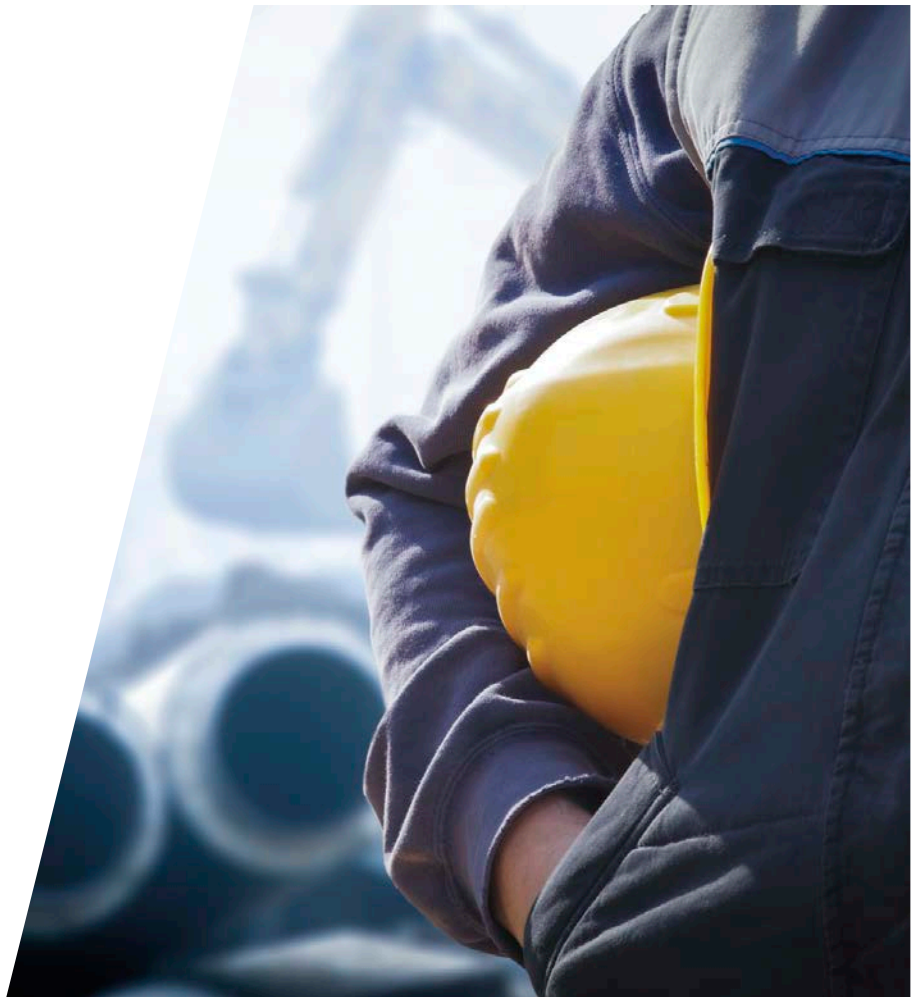
- 10 million lifecycles
- Extreme robustness
- Available with CAN bus J1939-71
- Shallow mounting depth
- IP67 above panel sealing
- Up to 1780 N - 400 lbf horizontal load (depending on handle)
- SIL2 / PId capable

SERIES	MECHANICAL LIFECYCLES	AXIS	TECHNOLOGY	OUTPUT OPTIONS						MOUNTING OPTIONS	ABOVE PANEL SEALING
				Single	Dual	Analog	PWM	USB	CAN bus		
XD	10 million	1 to 2 axis	Hall effect	X	X				X	Drop-in	IP67

HJ SERIES

HALL EFFECT ROBUST JOYSTICK

TOP APPLICATIONS:
LOADER, DUMP TRUCK



HEAVY DUTY AND FIELD PROVEN

- 5M cycles
- Standard or custom handle
- CAN options available
- Up to IP69K
- Up to 180 Nm horizontal load (depending on handle)
- SIL2 / PId capable

SERIES	MECHANICAL LIFECYCLES	AXIS	TECHNOLOGY	OUTPUT OPTIONS						MOUNTING OPTIONS	ABOVE PANEL SEALING
				Single	Dual	Analog	PWM	USB	CAN bus		
HJ	5 million	1, 2, 3	Hall effect	X	X	X		X	X	Drop-in or rear mounting	IP69K

XF SERIES

SMALL HALL EFFECT JOYSTICK

TOP APPLICATIONS:
COMPACT VEHICLES, ROAD CONSTRUCTION, MINING



AVAILABLE WITH CAN BUS

- 5M cycles
- Many outputs available, including CAN bus J1939
- Available with 1, 2 or 3 axis
- Very compact
- SIL2 / Pld capable
- Up to IP67 above panel sealing

SERIES	MECHANICAL LIFECYCLES	AXIS	TECHNOLOGY	OUTPUT OPTIONS						MOUNTING OPTIONS	ABOVE PANEL SEALING
				Single	Dual	Analog	PWM	USB	CAN bus		
XF	5 million	1, 2, 3	Hall effect	X	X	X		X	X	Drop-in or rear mounting	IP67

3000 SERIES

PREMIUM HALL EFFECT JOYSTICK

TOP APPLICATIONS:
LOADER, ROAD CONSTRUCTION



COMPACT, PRECISION HALL EFFECT JOYSTICK

- Precision contactless Hall effect technology
- Compact for low profile applications
- Robust with over 10 million mechanical lifecycles

SERIES	MECHANICAL LIFECYCLES	AXIS	TECHNOLOGY	OUTPUT OPTIONS						MOUNTING OPTIONS	SEALING
				Single	Dual	Analog	PWM	USB	CAN bus		
3000	10 million	1, 2, 3	Hall effect	X	X	X	X			Drop-in or rear mounting	IP67

HR SERIES

PROPORTIONAL THUMBWHEEL

TOP APPLICATIONS:
EXCAVATOR, TELEHANDLER, SKID STEER



ROLLER AVAILABLE WITH MANY OPTIONS

- Up to 5M cycles
- Electronics sealed up to IP68
- Available with detents, friction, latching and 360° infinite wheel
- 7 colors and 4 shapes in standard
- Illumination of the body in option
- SIL2 / PId capable

SERIES	MECHANICAL LIFECYCLES	AXIS	TECHNOLOGY	OUTPUT OPTIONS						MOUNTING OPTIONS	SEALING
				Single	Dual	Analog	PWM	USB	CAN bus		
HR	5 million	1	Hall effect	X	X	X				Rear mounting	IP68

CW SERIES

MINIATURE PROPORTIONAL THUMBWHEEL

TOP APPLICATIONS:
EXCAVATOR, TELEHANDLER, LOADER



MINIATURE ROLLER

- Up to 3M cycles
- Snap-in mounting
- Custom actuator on request
- Spring to center

SERIES	MECHANICAL LIFECYCLES	AXIS	TECHNOLOGY	OUTPUT OPTIONS						MOUNTING OPTIONS	SEALING
				Single	Dual	Analog	PWM	USB	CAN bus		
CW	3 million	Single	Hall effect	X	X	X	X			Snap-in	-

TS SERIES

PROPORTIONAL HALL EFFECT THUMBSTICK

TOP APPLICATIONS:
TELEHANDLER, EXCAVATOR, LOADER



PRECISION FINGERTIP CONTROL

- Illuminated version available
- Ergonomically designed for repetitive operation over extended periods
- Highly reliable: up to IP67 and IP69K sealing
- Easy integration with rear or drop-in mounting & compact size
- Available with multiple handle options and material

SERIES	MECHANICAL LIFECYCLES	AXIS	TECHNOLOGY	OUTPUT OPTIONS						MOUNTING OPTIONS	PANEL SEALING
				Single	Dual	Analog	PWM	USB	CAN bus		
TS	1 million	1, 2	Hall effect	X	X	X		X		Drop-in or rear mounting	IP67, IP69K

NV SERIES

NAVIGATOR SWITCH

TOP APPLICATIONS:
ROAD CONSTRUCTION, TELEHANDLER



IDEAL AS DISPLAY CONTROLLER

- Compact momentary micro switching thumbstick
- Available with "push to validate" option, ideal for navigation in display menu
- Enhanced tactile feedback
- Easy integration in joystick handle
- Sealed up to IP69K

SERIES	MECHANICAL LIFECYCLES	AXIS	BUSHING DIMENSIONS	TECHNOLOGY	TERMINAL OPTIONS	MOUNTING OPTIONS	SEALING
NV	1 million	1,2	Ø16 mm (.629 in)	Switching	Wire leads or connector	Panel	IP69K

BHN/BL SERIES

PROPORTIONAL PADDLE

TOP APPLICATIONS:
DUMP TRUCK, ROAD CONSTRUCTION



STYLISH AND ROBUST

- Available in 2 heights
- Soft touch sculpted grip
- 5 color options
- Sealed up to IP67
- Custom actuator on request
- SIL2 / PLd capable

SERIES	MECHANICAL LIFECYCLES	AXIS	TECHNOLOGY	OUTPUT OPTIONS						MOUNTING OPTIONS	SEALING
				Single	Dual	Analog	PWM	USB	CAN bus		
BHN/BL	10 million	Single	Hall effect	X	X	X	X			Drop-in	IP67

FNR SERIES

FNR ROCKER SWITCH

TOP APPLICATIONS:
EXCAVATOR, LOADER, TELEHANDLER



FOR EFFORTLESS FORWARD/REVERSE CONTROL

- 2 or 3 positions, momentary or maintained
- Sealed up to IP67
- 1 NO/NC in each direction
- Illumination with marking
- SIL2 / PLd capable

SERIES	POLES	MAXIMUM RATINGS	BUSHING DIMENSIONS	TERMINAL OPTIONS	MOUNTING OPTIONS	SEALING
FNR	2 NO+NC	1A /24V	Ø20 mm (787 in)	Flying leads, solder lugs	Panel	IP69K

IA SERIES

DUSTPROOF PUSHBUTTON SWITCH

TOP APPLICATIONS:
EXCAVATOR, LOADER, TELEHANDLER



THE REFERENCE IN THE CONSTRUCTION INDUSTRY

- Dustproof: Membrane on top with no gap between actuator and panel
- Frost, sand and hydrocarbon resistant
- Sealed up to IP67
- Flush on panel
- SIL2/PId capable

SERIES	POLES	MAXIMUM RATINGS	BUSHING DIMENSIONS	TERMINAL OPTIONS	MOUNTING OPTIONS	SEALING
IA	1 NO+NC	2A 24VDC	Ø16 mm (.629 in)	Flying leads	Panel	IP65 IP67

IX SERIES

COMPACT PUSHBUTTON SWITCH

TOP APPLICATIONS:
EXCAVATOR, LOADER, TELEHANDLER



THE NEXT STANDARD

- Compact
- Available with backlit marking
- Dustproof: Membrane on top with no gap between actuator and panel
- Frost, sand and hydrocarbon resistant
- Flush on panel
- Sealed up to IP67/IP69K
- SIL2/PId capable

SERIES	POLES	MAXIMUM RATINGS	BUSHING DIMENSIONS	TERMINAL OPTIONS	MOUNTING OPTIONS	SEALING
IX	1 NO/NC	2A 28VDC	Ø12 mm (.472 in)	Solder lugs / Wire leads	Panel	IP67 IP69K

IM / IP / IS SERIES

COMPREHENSIVE PUSHBUTTON RANGE

TOP APPLICATIONS:
SKID STEER LOADER, GRADER, TELEHANDLER



EXTENSIVE COMPACT RANGE

- Compact
- Available with illumination
- Available with snap action and audible tactile feedback (IM)
- Marking in option
- Sealed up to IP67
- Momentary or latching
- Up to SIL2/PID capable

SERIES	POLES	MAXIMUM RATINGS	ILLUMINATED	BUSHING DIMENSIONS	MOUNTING OPTIONS	TERMINAL OPTIONS				SEALING
						PCB	Solder lugs	Quick-connect	Flying leads	
IM	1 NO/NC	(1A 250VAC)* 3A •28VDC		Ø 12 mm (.472 in)	Panel	x		x		IP67
IP momentary	1	(2A 250VAC)* 5A 28VDC	x	Ø 12 mm (.472 in)	Panel	x	x	x	x	IP67
IP latching	1	(2A 250VAC)* 4A 12VDC	x	Ø 12 mm (.472 in)	Panel	x	x	x	x	IP67
IS	1	(2A 250VAC)* 100mA 48VDC		Ø 12 mm (.472 in)	Panel	x	x	x		IP67

IHS / IHL SERIES

HALL EFFECT PUSHBUTTON RANGE

TOP APPLICATIONS:
BACKHOE LOADER, EXCAVATOR



HALL EFFECT TECHNOLOGY

- Long life: 5M cycles
- Hall effect technology
- Momentary (IHS) or proportional (IHL)
- Sealed up to IP67

SERIES	MAXIMUM RATINGS	BUSHING DIMENSIONS	MOUNTING OPTIONS	TERMINAL OPTIONS	SEALING
IHS	5mA 24VDC	Ø 12 mm (.472 in)	Panel	Flying leads	IP67
IHL	1,25mA 4,5VDC	Ø 12 mm (.472 in)	Panel	Flying leads	IP67

KH / KL / KR SERIES

ROCKER SWITCH

TOP APPLICATIONS:
DUMP TRUCK, LOADER



SEALED, CUSTOMIZABLE ROCKER

- Protected against accidental actuation (KH)
- Customised laser etched legends
- Up to IP68/IP69K
- Patented locking system for safety application (KL)
- Illuminated versions

SERIES	POLES	MAXIMUM RATINGS	BUSHING DIMENSIONS	MOUNTING OPTIONS	TERMINAL OPTIONS			SEALING	ILLUMINATION
					Solder lugs	Quick-connect	Screw		
KR	1, 2	20A 12VDC	36.8 x 21.08 mm	Panel	X	X	X	IP68 or IP69K	X
KL	1, 2	10A 24VDC	36.8 x 21.08 mm	Panel	X	X	X	IP68 or IP69K	X
KH	1, 2	10A 24VDC	36.8 x 21.08 mm	Panel	X	X	X	IP69K	X

3500 / CT SERIES

HIGH PERFORMANCE TOGGLE SWITCH

TOP APPLICATIONS:
PAVER, LOADER, MINING



MARKET LEADER

- High current rating
- Very broad range: 5 finishes, 6 levers styles, 3 types of locking, 3 types of terminals...
- Sealed up to IP67/IP69K
- Available accessories: guard and boot

SERIES	APPROVALS	POLES	MAXIMUM RATINGS	BUSHING DIMENSIONS	MOUNTING OPTIONS	TERMINAL OPTIONS						SEALING
						Solder lugs	Quick-connect	Screw	PCB	Flying leads	Connector	
3500	CECC	1,2	15A 28VDC	Ø12.2 mm (.49 in)	Panel	X	X	X				IP67 IP69K
CT	UL	1,2	10A 125/250 VAC	Ø12.2 mm (.48 in)	Panel	X	X	X			X	IP67

CW SERIES

MODULAR AND STYLISH PUSHBUTTON

TOP APPLICATIONS:
ROLLER, GRADER, PAVER



NEW INDUSTRIAL STYLE

- Stylish design
- Sealed up to IP67 with rubber boot option
- Illumination in option
- Selector switch available

SERIES	APPROVALS	POLES	SEALING	PANEL CUT OUT	TERMINAL	CONTACT TYPE	RATINGS
CW	UL, CE, CCC	Up to 6	IP65, up to IP67	Ø 22 mm (.866 in)	Screw	IP67	Heavy duty (up to 10 Amps)

MW SERIES

FOR DEMANDING ENVIRONMENTS

TOP APPLICATIONS:
ROLLER, GRADER, PAVER



DUSTPROOF

- Dustproof: no gap between actuator and panel
- Sealed up to IP66
- Selector switch available

SERIES	APPROVALS	POLES	SEALING	PANEL CUT OUT	TERMINAL	CONTACT TYPE	RATINGS
MW	CE, CCC	Up to 2	IP65 IP66	Ø 22 mm (.866 in)	Solder/tab or screw	Monobloc	Heavy duty (up to 10 Amps)

ES SERIES

HEAVY DUTY METAL SAFETY SWITCH

TOP APPLICATIONS:
ROAD CONSTRUCTION



METAL SAFETY SWITCH

- Sealed up to IP65, IP67 & IP69K
- Compact body
- Complies with EN60947-5-1
- Impact resistant to IK10

SERIES	POLES	MAXIMUM RATINGS	BUSHING DIMENSIONS	TERMINAL OPTIONS		MOUNTING OPTIONS	SEALING
				Solder lugs	PCB		
ES	2,3	1A 24VDC	Ø22.28 mm (.877 in)	X	X	Panel	IP65 IP67 IP69K



XA / XW SERIES

ROBUST EMERGENCY STOP

TOP APPLICATIONS:
ROAD CONSTRUCTION



«SAFE BREAK ACTION» TECHNOLOGY

- Exclusive safety technology ensuring that the machinery is stopped if actuator is broken
- Sealed up to IP67
- Compact behind panel
- Available with illumination
- Twist or pull to release

SERIES	SAFE BREAK TECHNOLOGY	PANEL CUT OUT	OPERATOR SIZES	NUMBER OF CONTACTS	TERMINAL CONNECTION	OPERATION	ILLUMINATION
XA	X	16 mm	Ø 29 mm (1.141 in) Ø 40 mm (1.574 in)	Up to 4 NC : 1,2,3,4 / NO : 0,1	Solder, PCB	Push to lock, pull or turn to reset	Option
XW	X	22 mm	Ø 38 mm (1.496 in) Ø 40 mm (1.574 in) Ø 60 mm (2.362 in)	Up to 4 NC : 1,2,3,4 / NO : 0,1	Screw, solder, PCB	Push to lock, pull or turn to reset	Option

LIMIT SWITCH

ROBUST SENSOR

TOP APPLICATIONS:
EXCAVATOR, ROAD CONSTRUCTION



DESIGNED FOR HEAVY DUTY

- High life time
- Super robust
- Long travel
- Dustproof
- NO+NC

LIMIT SWITCH

Total sealing

Shock and vibration resistant

Design on request

MULTIMEC 5 SERIES

TACTILE PCB SWITCH

TOP APPLICATIONS:
LOADER, TELEHANDLER



LARGE SELECTION OF STANDARD ACCESSORIES

- 10 million activations
- Front panel sealing to IP67 depending on cap solutions
- Different haptic options
- Wide range of cap options

SERIES	POLES	MAXIMUM RATING	MOUNTING OPTIONS	SEALING	MECHANICAL LIFE
Multimec 5 series - 5E & 5G	Single pole / momentary	50mA - 24VDC	Trough hole or SMT mounting	IP67	10,000,000 operations

Q SERIES

LED INDICATOR

TOP APPLICATIONS:
ROAD CONSTRUCTION, LOADER



LARGE VARIETY OF SIZES AND COLORS

- Reverse diode protection available
- Wide variety of LED colors
- Wire customization available
- Optional sealing up to IP67
- Many different panel cut-out sizes
- Available with custom and secret until lit legends

SERIES	PANEL CUT-OUT	MAXIMUM RATINGS	BEZEL STYLES	BEZEL FINISHES	TERMINAL OPTIONS			TYPE OF ILLUMINATION	LED COLORS
					Fastons	Pins	Wire		
Q	Ø6, 8, 10, 12, 14, 16, 19, 22, 25, 30	2VDC -220VAC	Prominent, recessed & flushed	Bright, satin & black	X	X	X	Fixed light, bi-color, RGB, night vision	Suitable for in cab use and outside use which are daylight viewable

KP6 CAN BUS KEYBOARD

RUBBER KEYPADS

TOP APPLICATIONS:
LOADER, GRADER, EXCAVATOR



STANDARD SOLUTION FOR MULTIPLE BUTTON APPLICATIONS

- CAN bus or direct wiring output options
- CAN solution e-marking qualified (EMI, EMC)
- Backlit and quick front assembly
- Bargraph & indicators available
- Braille usage and glove usage compatible

SERIES	SEALING	OPERATING VOLTAGE	COMMUNICATION PROTOCOL	MOUNTING	EXTRA FEATURES
KP6	up to IP67	12 to 24 VDC	Can J1939 or discrete	Snap-in front mounting	Special illumination / phantom marking / special key colors

REMOTE CONTROL

ENHANCED KEYPADS

TOP APPLICATIONS:
ALL CONSTRUCTION EQUIPMENTS AND VEHICLES



ENHANCED MEMBRANE KEYPADS

- Cable output
- Slim design
- Sealed up to IP67
- Impact resistant to IK10
- High performance at a low cost

BUTTON BOXES

IP68 sealed buttons

Standard 22mm dia. long course interface

Less than 22mm below panel

CAN, USB or RS output

ISO 13849 compatible

Shock protection option available

CUSTOM KEYBOARD

METAL AND RUBBER KEYBOARDS

TOP APPLICATIONS:
ALL CONSTRUCTION EQUIPMENTS AND VEHICLES



COMPLETE SOLUTION

- Rear or front panel mounting
- Backlighting
- IP67/IP69K sealing
- Up to SIL2/PLd capable

CUSTOMISATION OPTIONS

Integration possible of all APEM products

Design for outdoor and dusty environment

APEM Available Communication Protocols as a standard : CAN bus, RS485/422, USB



APEM

an IDEC company

AT A GLANCE



70 YEARS OF TRUST BUILT ON QUALITY



1,400 EMPLOYEES WORLDWIDE



50,000 + PART NUMBERS

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