



Solutions for **CONSTRUCTION SITES**











68 ACS range Efficiency, quality and safety

in even the most heavy-duty environments.



The 68 ACS range is a unique solution for **construction site contexts**, consisting of boards **complying with Standard EN61439-4** and with lighting and signalling devices: a complete range of products to meet every electric need, from the smallest construction site to the biggest one. Gewiss' ACS system perfectly combines the various elements of the boards (casing, energy socket-outlets and protection devices) to guarantee the **excellent electric and design coordination** of

the entire system, plus **high safety levels in all conditions**. These products are designed, in fact, to withstand the effects of wear, impact and the stress caused by atmospheric agents (bad weather, major temperature differences and long exposure to the sun) - typical features of open-air sites.









68 QP ACS and 68 CDK ACS

The main **supply boards** for the construction site: installed immediately downstream from the energy meter, to protect the line from the delivery board to the main site distribution board. They are available in versions with power levels from 17 kW (32A) to 130 kW (250A), all fitted with an emergency push-button.





68 Q-BOX ACS

Thermoplastic **boards** with optimum impact and weather resistance, ideal for **primary and secondary distribution** on construction sites, shipbuilding sites or temporary uses. Available in two sizes, Q-BOX4 and Q-BOX6, they allow to house up to 12 interlocked socket-outlets or, alternatively, up to 60 DIN modules.





68 Q-DIN ACS

Mobile, transportable **terminal boards** that are especially suitable for powering mobile tools and equipment. The accessories - including handles, floor-mounting supports and wheeled carriages - make it extremely easy to move the boards around the site.

68 Q-BOX ACS

Distribution boards for construction sites

The 68 Q-BOX ACS distribution boards stand out for their **high resistance to impact** (IK10) **and UV rays** (in accordance with Standard EN62208). They also come in pre-wired versions fitted with interlocked socket-outlets (with or without a fuse-holder) up to 63A, or fixed socket-outlets of the IEC type. The wired versions are always equipped with accessories like the emergency push-button, lockable doors, stainless steel tear-proof cable-fastening hooks, and built-in transportation handles on the upper part of the board itself. To ensure the best possible positioning on the construction site, 68 Q-BOX ACS boards can be surface-mounted, floor-mounted or fitted on poles.





PROTECTION DEVICES

The wired Q-BOX boards come in versions with energy socket-outlets protected by a miniature circuit breaker or fuses (supplied with boards with CBF socket-outlets). Each energy socket is also protected against indirect contact by a residual current circuit breakers with Idn equal to 30 mA.



CONFIGURATION PANELS

There are additional panels for creating different board configurations to meet the specific needs of the individual construction site. Thanks to the **enclosure panels** for example, it's possible to obtain boards with circuit breakers only (up to 60 modules), whereas boards with 12 interlocked socket-outlets can be created with the **socket-outlet panels**.



EMERGENCY KIT

Every Q-BOX board is fitted with an **emergency push-button** with relative green indicator lamp for confirming the good condition of the circuit. The push-button is clearly visible even from a distance, and can easily be reached to disconnect the power supply in the event of danger.



68 Q-DIN ACS

Mobile terminal boards

The 68 Q-DIN ACS boards are available in various configurations with interlocked or fixed IEC 309 socket-outlets in both the protected and watertight versions. Each board comes **complete with cable** and relative mobile plug for powering portable devices everywhere. The boards can also be equipped with **safety locks with a metallic cylinder**, and can be mounted on poles or walls, or on mobile accident-prevention supports.





EASY TO TRANSPORT

Boards with a **metal carriage** and floor-standing supports are ideal for use in construction sites and wherever a temporary, mobile power supply is needed (e.g. town fairs, temporary events, trade fairs, circuses, markets, etc.).



SPECIAL VERSIONS

On request, are available specific version for construction sites and for temporary uses, equipped with domestick socket 50x50 mm (german of french standard) combined with industrial sockets in the same board to make easy the connection of every type of devices.



DISTRIBUTION PEDESTALS

The **wired pedestals** of the QMC range are certified for use on construction sites. They're extremely versatile and offer a high degree of personalisation. Thanks to the handle built into the head, they can easily be moved all over the site without any need for additional supports.

68 QP ACS - WIRED MAIN BOARDS FOR CONSTRUCTION SITES

				MAIN SWITCH	EMERGENCY	POWER	
TYPE	YPE DOOR N° OF POLES In (A) PROTECTION DEVICE		KIT	MAX (KW)	CODE		
QP		4	125	MCB 125A 4P C 10kA + RCD adjustable - A Type	YES	65	GW 68 521
	Blind	4	160	MCCB 160A 4P C 16kA + ADD ON RCD "L" SHAPED adjustable	YES	85	GW 68 526
		4	250	MCCB 250A 4P C 36kA + ADD ON RCD "L" SHAPED adjustable	YES	130	GW 68 531

68 Q-BOX ACS - WIRED DISTRIBUTION BOARDS FOR CONSTRUCTION SITES

TYPE SOCKET	TOTAL N.			SOCKET	-OUTLE	TS CON	FIGURA	TION			MAIN RCBO		EMERGENCY	POWER
	OUTLETS	16A std. DE	16A 2P+E 230 V	16A 3P+E 400 V	16A 3P+N+E 400 V	32A 2P+E 230 V	32A 3P+E 400 V	32A 3P+N+E 400 V	63A 3P+E 400 V	63A 3P+N+E 400 V	N° OF POLES	In (A)	КІТ	MAX (KW)
			4								2	32	YES	6
Q-BOX			3	1							4	32	YES	17
			2	2							4	32	YES	17
			2	1	1						4	32	YES	17
			3			1					2	63	YES	12
	4		3				1				4	32	YES	17
333			3					1			4	32	YES	17
			2	1			1				4	32	YES	17
			2		1			1			4	32	YES	17
			2	1				1			4	32	YES	17
			1	2			1				4	32	YES	17
			2	3							4	63	YES	33
			3	1			1				4	63	YES	33
			3	1				1			4	63	YES	33
			2	2			1				4	63	YES	33
HILL	5		2	2				1			4	63	YES	33
1000			2	1	1			1			4	63	YES	33
			2	1			1		1		4	63	YES	33
			2	1			1		1		4	80	YES	42
			2		1			1		1	4	80	YES	42
			6								2	32	YES	6
			4	2							4	32	YES	17
			3	3							4	32	YES	17
			3	2	1						4	32	YES	17
			3	2			1				4	63	YES	33
			3	2				1			4	63	YES	33
			3	_	2			1			4	63	YES	33
			3	1	1		1				4	63	YES	33
Henry	6		3	1	1			1			4	63	YES	33
			2	3			1				4	63	YES	33
			2	2			1	1			4	63	YES	33
			2	1	1		1	1			4	63	YES	33
			2	2			2	·			4	63	YES	33
			2		2			2			4	63	YES	33
			2	1	_			3			4	63	YES	33
			3					2		1	4	100	YES	53
			2					2		2	4	100	YES	53
	8		4	3				1		-	4	63	YES	33
	9	4	2	2				1			4	63	YES	33
	11	4	3	2				1		1	4	100	YES	53
		Т	6	3	1			2		'	4	63	YES	33
	12		12	3	1						2	63	YES	12
	12		6	6							4	63	YES	33
			0	0							4	0.5	153	J)

(*) Versions where n.2 sockets-outlets 16A 2P+E are type IEC 309 (not interlocked)



68 CDK ACS - WIRED MAIN BOARDS FOR CONSTRUCTION SITES

				MAIN SWITCH	EMERGENCY	POWER	CODE	
TYPE	DOOR	N° OF POLES	In (A)	PROTECTION DEVICE	KIT	MAX (KW)		
CDK	Transparent	4	32	RCBO 32A 4P C 6kA 0,03A - AC Type	YES	17	GW 68 536	
		4	63	RCBO 63A 4P C 6kA 0,03A - AC Type	YES	33	GW 68 537	
		mansparent	4	100	MCB 100A 4P C 10kA + RCD 0,03A - AC Type	YES	53	GW 68 538
		4	125	MCB 125A 4P C 10kA + RCD 0,03A - AC Type	YES	65	GW 68 539	

INTERLOCKED WITHO	INTERLOCKED WITHOUT FUSE HOLDER (SBF)		FUSE HOLDER (CBF)	FIXED IEC 309			
SUPPLY TERMINAL BLOCK	SUPPLY FIXED PLUG	SUPPLY FIXED PLUG SUPPLY TERMINAL BLOCK SUPPLY FIXED PLUG		SUPPLY TERMINAL BLOCK	COMPLMENTARY ITEMS		
GW 68 561	GW 68 584	GW 68 561 F	GW 68 584 F				
GW 68 562	GW 68 481	GW 68 562 F	GW 68 481 F				
GW 68 563	GW 68 482	GW 68 563 F	GW 68 482 F				
GW 68 564	GW 68 585	GW 68 564 F					
GW 68 511		GW 68 511 F				Secutity lock	
GW 68 565		GW 68 565 F				GW 46 445	
GW 68 566		GW 68 566 F			6		
GW 68 537	GW 68 586	GW 68 567 F	GW 68 586 F				
GW 68 538		GW 68 568 F					
GW 68 569	GW 68 587	GW 68 569 F	GW 68 587 F				
GW 68 570	GW 68 588	GW 68 570 F	GW 68 588 F		^		
GW 68 512*		GW 68 512 F					
GW 68 571*	GW 68 589*	GW 68 571 F	GW 68 589 F				
GW 68 572	GW 68 590*	GW 68 572 F	GW 68 590 F			floor mounting suppo	
GW 68 513*	GW 68 483*	GW 68 513 F	GW 68 483 F			GW68463	
GW 68 573	GW 68 592*	GW 68 573 F	GW 68 592 F		(ا د ا		
GW 68 514*	GW 68 484*	GW 68 514 F	GW 68 484 F				
GW 68 574*	GW 68 593*						
		GW 68 574 F					
		GW 68 498 F					
GW 68 575	GW 68 594	GW 68 575 F	GW 68 594 F				
GW 68 576	GW 68 595	GW 68 576 F	GW 68 595 F		P-R		
GW 68 577	GW 68 473	GW 68 577 F	GW 68 473 F			Pole support kit	
GW 68 578	GW 68 596	GW 68 578 F	GW 68 596 F			(only for Q-BOX4) GW 46 554	
GW 68 493	GW 68 471	GW 68 493 F	GW 68 471 F		4 120	7V +CC 07+	
GW 68 579	GW 68 597	GW 68 579 F	GW 68 597 F		~		
	GW 68 598		GW 68 598 F				
GW 68 580		GW 68 580 F					
GW 68 581							
GW 68 582	GW 68 472	GW 68 582 F	GW 68 472 F		The state of the s	Plug-socket outlets bl	
GW 68 583	GW 68 599	GW 68 583 F	GW 68 599 F		0	GW 68 505	
GW 68 492					Ţ		
GW 68 494	GW 68 600	GW 68 494 F	GW 68 600 F		~		
GW 68 491	GW 68 474	GW 68 491 F					
GW 68 495							
GW 68 496							
GW 68 497					-		
GW 68 542						D	
GW 68 541						Document holder wal GW 46 447	
GW 68 543						OW 10 11/	
GW 68 544							
				GW 68 468			
				GW 68 469			

68 Q-DIN ACS - WIRED MOBILE BOARDS FOR CONSTRUCTION SITES

	TOTAL N.	IP	SOCKET-OUTLETS CONFIGURATION								
TYPE	SOCKET OUTLETS	DEGREE	16A std. DE	16A 2P 24 V	16A 2P+E 230 V	16A 3P+E 400 V	16A 3P+N+E 400 V	32A 3P+E 400 V	32A 3P+N+E 400 V		
Q-DIN	2	IP65		2							
		IP44	1		2						
		IP65			3						
		IP65			3						
Q	3	IP65			2	1					
		IP65			1	2					
		IP65				3					
		IP44	2		2						
		IP44	1		2	1					
		IP65			4						
000		IP65			3	1					
	4	IP65			3		1				
		IP65			2	2					
		IP65				4					
		IP65			2	1		1			
113		IP65		2	2						
		IP65			6						
		IP65			4	2					
	6	IP65			3	3					
		IP65			3	2		1			
		IP44	2		2	2					
	8	IP44	2		2	2		2			
COMBIBLOC		IP55			2		1				
5)	3	IP55			1		1		1		
0							·				
QМС	6	IP56			2	1	2		1		
	7	IP56			7						
6	7	IP56			4	1	1		1		

(*) NOTE Version GW68223N with yellow shockproof case versions GW68401N, GW66388 ad GW68389 with metal conduit support versions GW68411N, GW68421N and GW68424N equipped with metal conduit carriage with two wheels



MAIN RCBO		EMERGENCY POWE		SOCKET	ТТҮРЕ			
N° OF POLES	In (A)	KIT	MAX (KW)	INTERLOCKED WITHOUT FUSE HOLDER (SBF)	FIXED IEC 309	COMPLMENTARY ITEMS		
2	16	-	3	GW 68 235 N				
2	16	-	3		GW 68 241N			
2	16	-	3		GW 68 217 N	Security lock GW 40 42 (Q-DIN 10/14/20)		
2	16	-	3		GW 68 223 N*	((2,		
4	16	-	8		GW 68 242 N			
4	16	-	8		GW 68 243 N			
4	16	-	8		GW 68 244 N	floor mounting support		
2	16	-	3		GW 68 203 N	floor mounting supopr GW 68 431 (Q-DIN 10)		
4	16	-	8		GW 68 401 N*	GW 68 433 (Q-DIN 14/20)		
2	16	-	3		GW 68 216 N	(3200)		
4	16	-	8		GW 68 245 N	-		
4	16	-	8		GW 68 246 N	-		
4	16	-	8		GW 68 204 N			
4	16	-	8		GW 68 247 N	Metal Carrier with two wheels		
4	63	-	33	GW 68 424 N*		GW 68 432 (Q-DIN 14/20)		
2	16	-	3	GW 68 236 N				
4	16	-	8		GW 68 248 N			
4	32	-	17		GW 68 249 N			
4	32	-	17		GW 68 250 N	Metallic transportation		
4	32	-	17		GW 68 251 N	handle GW 68 436 N		
4	32	-	17		GW 68 411 N*	(Q-DIN 10/14/20)		
4	32	-	17		GW 68 421 N*	-		
4	40	-	21	GW 66 388*				
4	40	-	21	GW 66 389*				
4	50	YES	26		GW 68 884 A			
4	40	YES	21		GW 68 881 A			
4	50	YES	26		GW 68 883 A			

68 ACS range - technical characteristics



EMPTY Q-BOX BOARDS TO BE WIRED



Q-BOX boards come in not only wired versions but also empty ones (available in two different sizes) that can be equipped with socket-outlets (interlocked or fixed) or modular devices up to 160A.

EMPTY Q-DIN BOARDS TO BE WIRED



The range of empty Q-DIN boards offers configurations with up to 23 casings. The various versions are designed to house fixed IEC socket-outlets and interlocked socket-outlets up to 63A. It is also possible to install an emergency push-button, locks, handles and floor-standing supports.

GWENERGY PRO SOFTWARE



The GWEnergypro software is freely available at www.gewiss.com, and can be used to certify the boards starting from the empty casing. This means endless configurations to meet every possible need.

68 ACS construction site board system

Range of construction site boards complying with the CEI 64-8/7 Standard for applications on construction and demolition sites. The directives of CEI 64-8/7 specify that boards for electricity distribution on construction sites must comply with EN 61439-1 and EN 61 439-4, and extend this application to the following systems:

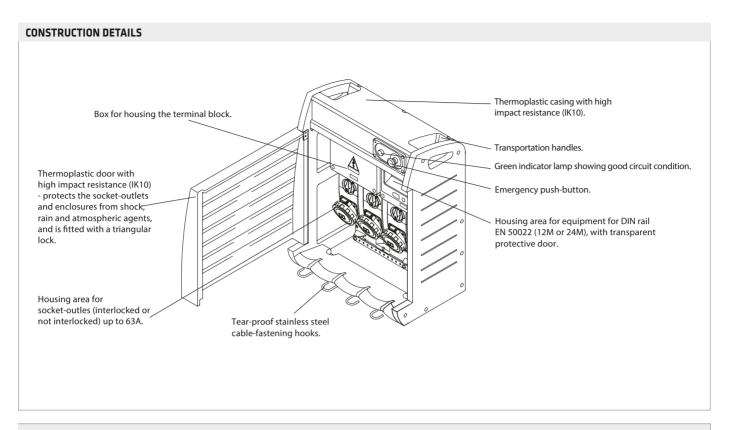
- new build:
- renovation, extension and demolition of existing buildings;
- · public works;
- earth moving works;
- · similar works.

The very name of an ACS (Assemblies for Construction Sites) board indicates that the product complies with the EN 61439-1 and EN 61 439-4 Standard. These boards are available in the Q-BOX, Q-DIN, COMBIBLOC, QMC and QP versions, fully factory-wired, and are supplied with the relative certification and wiring diagram. Alternatively, it is possible to wire empty boards and obtain certification based on the configurations of the Pre-established Construction System.

Technical data and compliance with standards

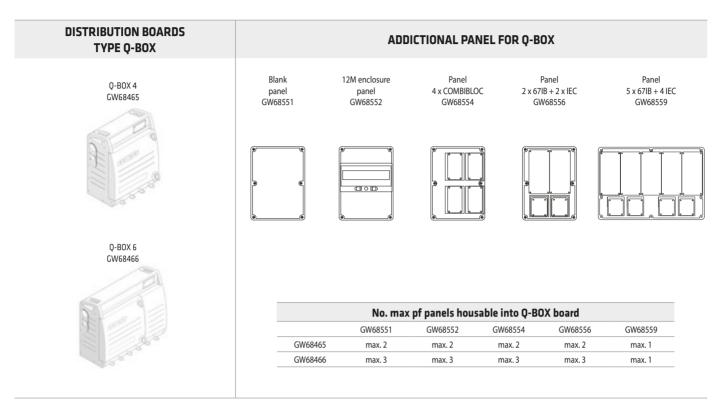
					Shell				
Board type	Reference Standard	Degree of protection (IP)	Insulation provided by the shell	Impact resistance at ambient temperature (IK code)	Thermo-pressure with ball (°C)	Glow Wire Test (°C)	Devices on main circuits	Accesories supplied	
CDK		IP65		IK 09	70	650	Residual current circuit breaker with overcurrent protection	Emergency push-botton with green indicator lamp	
QР		IP66		IK 10	200	960	Residual current circuit breaker with overcurrent protection	Emergency push-botton with green indicator lamp, handle for transportation, metal surface-mounting brackets	
Q-BOX 4-6	EN61439-4	IP55		IK10	70	650	Residual current circuit breaker with overcurrent protection	Emergency push-botton with green indicator lamp, metal surface-mounting brackets	
Q-DIN		IP44 IP65		IK 09	70	650	Residual current circuit breaker with overcurrent protection	Supply cable leght 4 meters with mobile plug	
COMBIBLOC				IK 08	80	650	Residual current circuit breaker with overcurrent protection	Supply cable leght 5 meters with mobile plug	
QMC		IP56		IK 09	70	650	Residual current circuit breaker with overcurrent protection	Supply cable leght 4 meters with mobile plug, and emergency push-botton	

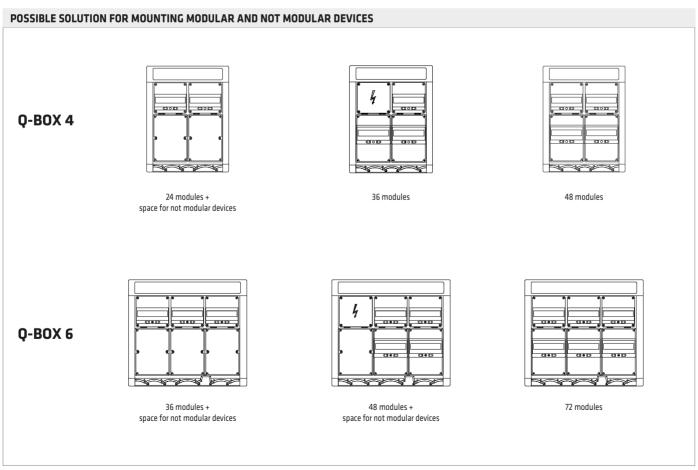




				APPLICATION I	FIELD		
BOARD TYPE	CONST	RUCTION SIT	ES SIZE		TYPE OF USE		GENERAL
	Small In ≤ 32A	Medium In ≤ 63A	Big In > 63A	Main board	Primary and secondary distribution	Final	FUNCTION
QP			X	X			
	Х			X			- Measurement board
CDK		X		Х			- Main supply board
			Х	Х			
	Х				х	Х	
Q-BOX		X			Х		- Primary distribution board to supply other boards or fixed/ mobile machinery
			Х	X	Х		
Q-DIN COMBIBLOC	Х					Х	- Secondary distribution board
QMC 16T		Х				Х	- final board for fixed/mobile machinery

Q-BOX boards enable a large number of socket-outlets to be housed simply by fastening them to the back plate of the board itself. In order to obtain even more complex configurations with a larger number of socket-outlets and more modular space, Q-BOX panels can be added; these are specifically designed to expand the solutions that can be achieved with these boards.

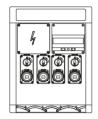




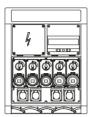


POSSIBLE SOLUTION FOR Q-BOX WITH 16/32A SOCKET-OUTLETS

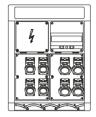
Q-BOX 4



12 modules + 4 interlocked sockets 16/32A

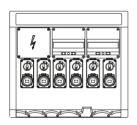


12 modules + 5 interlocked sockets 16/32A + 4 IEC sockets 16A or GW62392

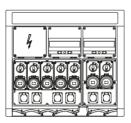


12 modules + 8 interlocked sockets COMBIBLOC 16/32A

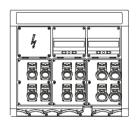
Q-BOX 6



24 modules + 6 interlocked sockets 16/32A



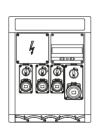
24 modules + 7 interlocked sockets 16/32A + 6 IEC sockets 16A or GW62392



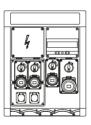
24 modules + 12 interlocked sockets COMBIBLOC 16/32A

POSSIBLE SOLUTION FOR Q-BOX WITH 16/32/63A SOCKET-OUTLETS

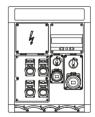
Q-BOX 4



12 modules + 3 interlocked sockets 16/32A + 1 linterlocked socket 63A

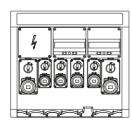


12 modules +
3 interlocked sockets 16/32A +
1 interlocked socket 63A +
2 IEC sockets 16A or GW62392

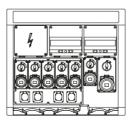


12 modules +
4 interlocked sockets COMBIBLOC 16/32A +
1 interlocked socket 16/32A +
1 interlocked socket 63A

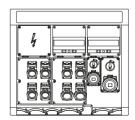
Q-BOX 6



24 modules + 4 interlocked sockets 16/32A + 2 interlocked sockets 63A

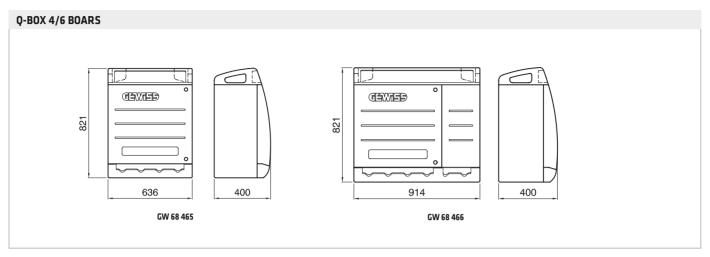


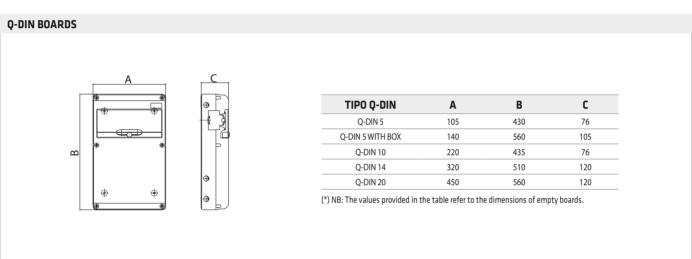
24 modules + 6 interlocked sockets 16/32A + 1 interlocked socket 63A + 4 IEC sockets 16A or GW62392

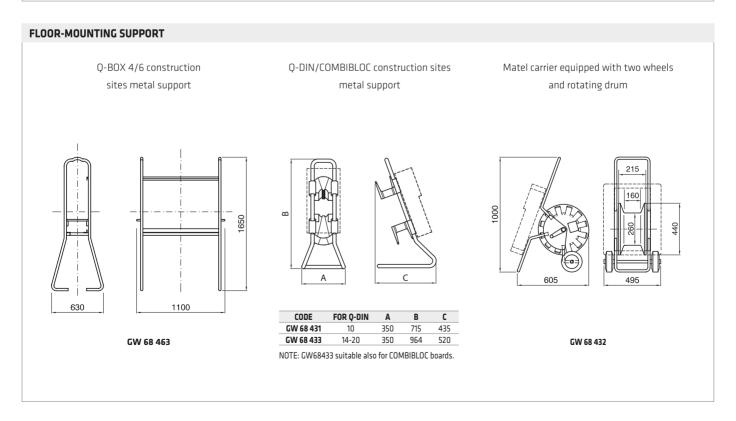


24 modules + 8 interlocked sockets COMBIBLOC 16/32A + 1 interlocked socket 16/32A + 1 interlocked socket 63A

Dimension tables





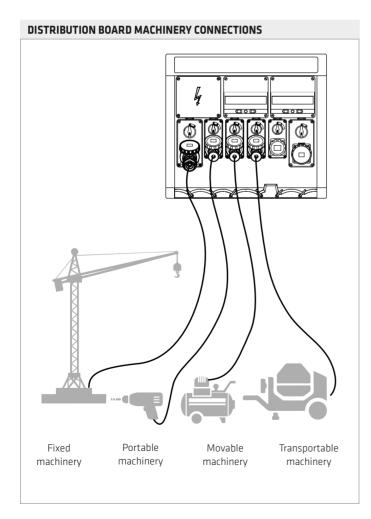


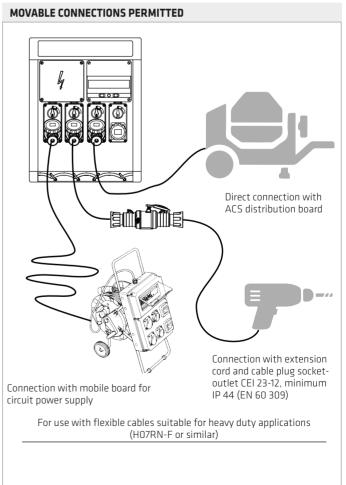


Reference standards:

Temporary systems at construction and demolition sites must be installed in accordance with international standard, following the instructions below:

- all boards must comply with Standard EN 61439-1 and EN 61439-4, and accordingly, must be of ACS type;
- at the site system origin point, i.e. immediately downstream of the supply point, a general sectioning and protection board must be fitted (e.g.: 68 QP ACS and 68 CDK ACS boards);
- construction site machinery must only be connected to final distribution boards (E.g.: 68 Q-BOX ACS and 68 Q-DIN ACS boards);
- the system downstream of the main board is to be considered as being of mobile type, and flexible cables with a sheath that is suitable for heavy duty applications must be used (H 07 RN F or similar);
- in locations to which pedestrians or vehicles have access, the cables must be protected against mechanical damage, either by being buried, suspended, run under protective walkways or protective tiles, or in strong cement or iron conduits;
- the cables that supply the machinery can be directly attached to the ACS distribution boards, to mobile sockets and that are equipped with a coupling device, or to socket-outlets of any type that are incorporated into a cable winder (EN 60309-2);
- all plug socket-outlets with In ≤32A used on construction sites must be protected against indirect contact by residual current circuit breakers with an I∆n not exceeding 30mA; it is not necessary for every single socket-outlet to have its own circuit breaker;
- any final ACS distribution board socket-outlet must have its own overload protection, unless a general protection device is fitted upstream with a rated current not exceeding that of the smaller socket-outlet;
- plug socket-outlets not contained within the final distribution board (mobile sockets or sockets fitted onto a cable winder) must have a degree of protection of at least IP44;
- as an alternative to protection via residual current circuit breaker with I∆n ≤ 30mA, socket-outlets protected by an insulation transformer can also be used: where suitable (for power supply to portable lamps), extra low voltage safety socket-outlets (SELV) can be used; these must be 2P or 3P 12h industrial-type devices (40-50V) or without reference (20-25V), (see the IEC 309 range).



















GEWISS S.p.A.

GEWISS S.p.A. Registered office: Via A. Volta, 1 - 24069 CENATE sono (Bergamo) - Italy Tel. +39 035 946 111 - Fax +39 035 945 222 gewiss@gewiss.com - www.gewiss.com

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Solutions for INDUSTRIAL SETTINGS



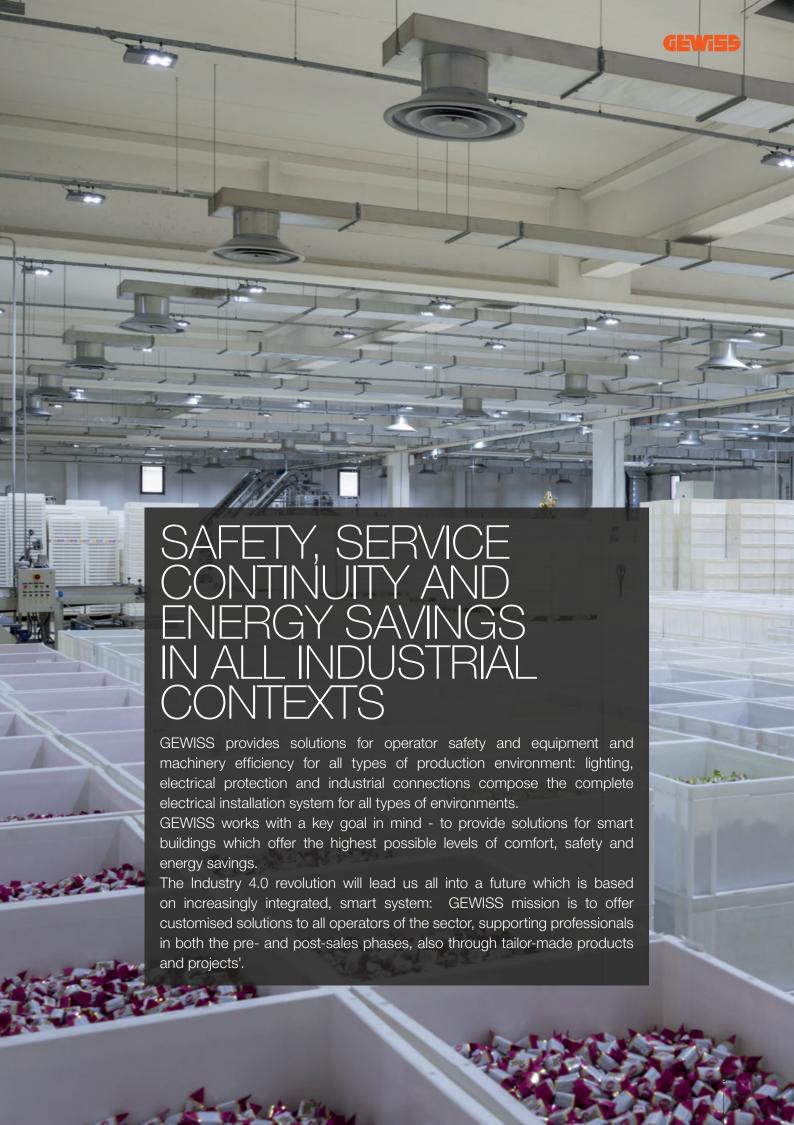


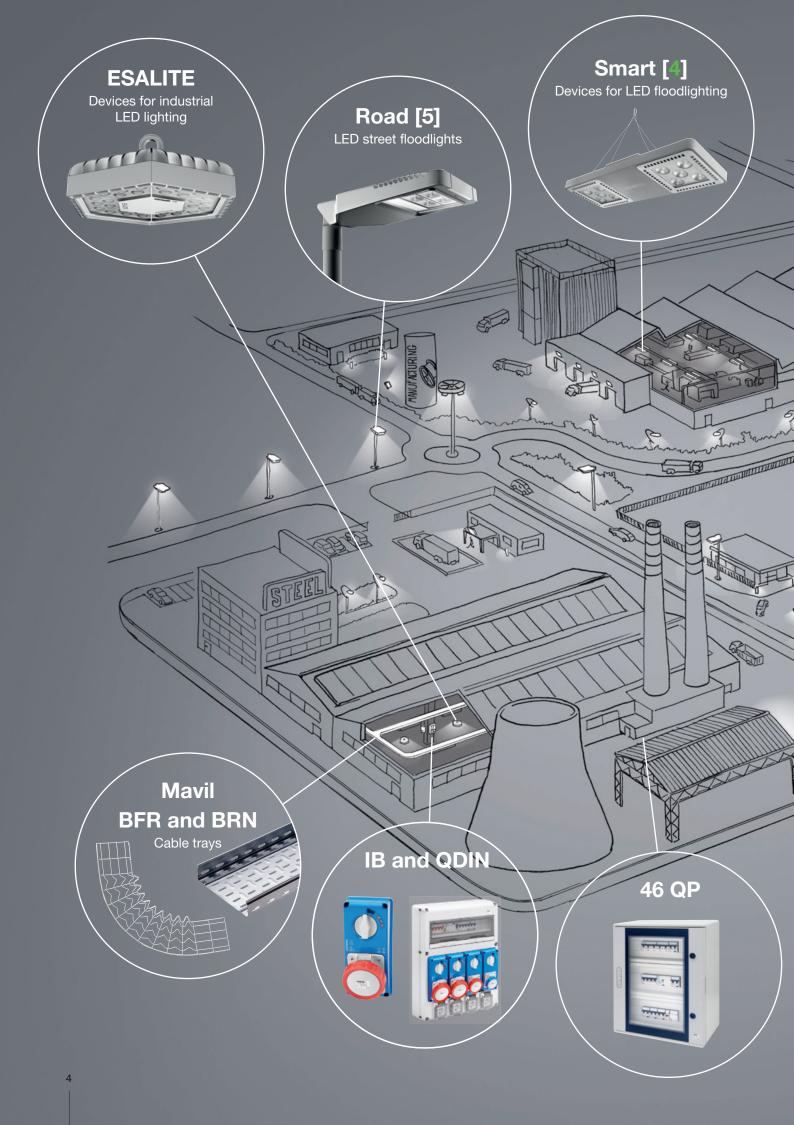


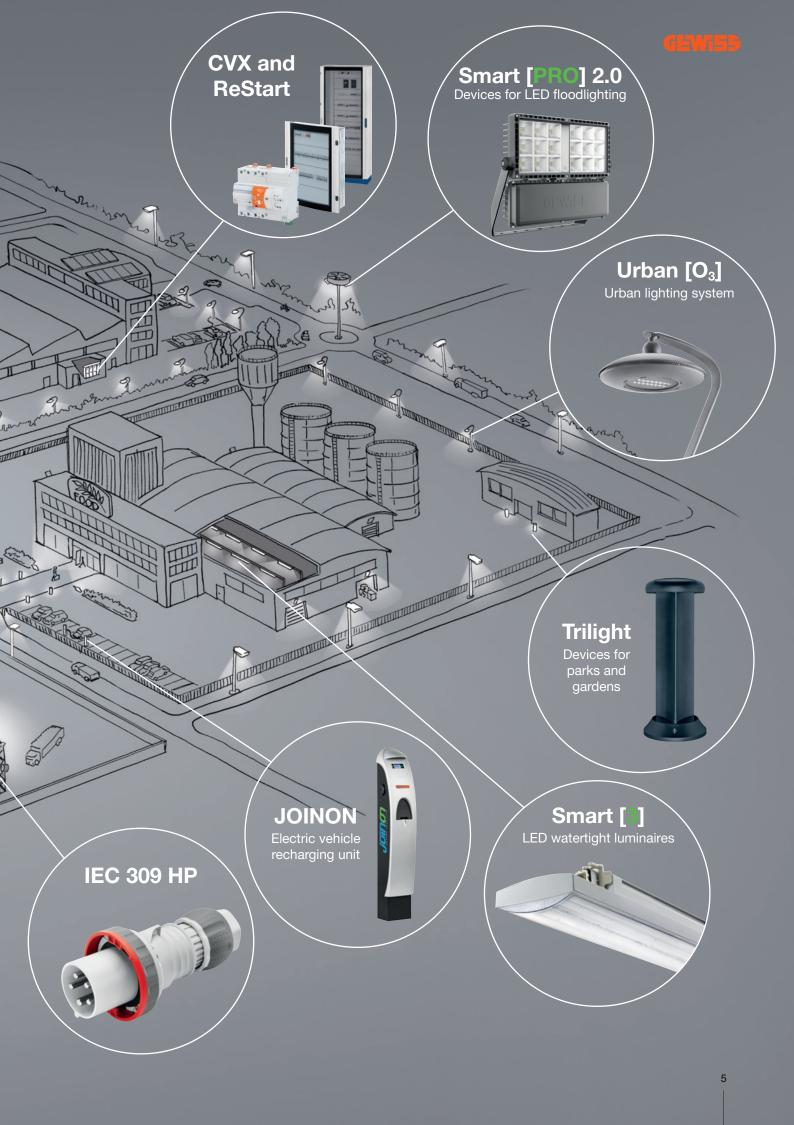




Development as a constant feature of management is the philosophy that has consistently guided the decisions made by GEWISS, from its establishment until today. From the very first day it was founded, the Company has been creating superb high-quality solutions. Over the years, this vocation has become part of a business model that is based above all on three key elements - continuous investment in research and development, staff training at every level, and the ongoing optimisation of production facilities. This has enabled GEWISS to establish itself as a point of reference for the market in the production of solutions and services for home & building automation, for the protection and distribution of energy, for electric mobility and for smart lighting.











SAFETY AND CONTROL

In environments characterised by demanding working conditions, production continuity in all phases is an absolute priority. For this reason, GEWISS manufactures and supplies an entire system of products (industrial lighting, modular and MCCB devices, distribution boards, socket-outlets and plugs) that can operate even under the most extreme conditions.

ReStart Autotest with WIFI

ReStart Autotest devices are ideal for installations in unsupervised systems, where fast and continuous maintenance is not possible. The periodic, automatic testing of the residual current protection's efficiency (automatically occurring every 28 days) doesn't requiry manual operator intervention is required. To ensure maximum safety in different areas of the application, 2P and 4P versions are available for single-phase and three-phase distribution systems.

By means of a Wi-Fi interface, Autotest can be connected to the Internet, providing information regarding the system status at all times. GEWISS app enables users to monitor the status of the residual current device in real time, operating self-diagnosis remotely.

The proper functioning of the residual current device can be tested at any time.

- DETAILS ON AUTOTEST. Possibility to have details about date, time and outcomes of the most recent Autotest operation.
- CONTINUOUS UPDATES. Simple notifications provide the user with information on the status of the circuit breaker (ON/ OFF), as well an alert when there is no power to the system.
- SAFETY AND SERVICE CONTINUITY. ReStart Autotest is the only device on the market that can carry out periodic safety testing on the residual current, without cutting power to the system. This function is due to special GEWISS-patented bypass contacts.







Network analyser

Facilitating real-time monitoring of consumption in order to manage and optimise energy as simply as possible is a key goal for GEWISS. Within this context, control becomes fundamental - to be understood as the measurement of active and reactive energy values (delivered and absorbed) and of instant active and reactive power (delivered and absorbed).

Surge protective device 1+2

Developing and producing electro-technical products means giving shape to the concept of safety first and foremost, placing it at the heart of the Company's development plan, ahead of any other business goal. This awareness is behind the products offered by GEWISS, designed to guarantee total safety in every context. An idea that is based on two core elements: the protection of people and things and the continuity of service.

Measure effectively to improve energy efficiency.

- ENERGY METERS AND NETWORK ANALYSERS. In order to effectively control an electrical system, it is crucial to measure all the necessary parameters. For GEWISS, the goal is to guarantee the consistent quality of the electricity supply, whilst optimising consumption.
- DATA AVAILABILITY. When combined with the KNX interface, the GEWISS energy meter enables the values measured to be sent on the KNX BUS. When used together with the MODBUS interface, it enables the values measured to be sent on the Modbus RS485. The network analyser allows all of the quantities measured (V, I, f, W, VAR, VA, kWH, kVARH, Power factor) to be reported remotely via the RS485 output.

The GEWISS range of surge protective devices enables direct or indirect damage to people or things to be prevented.

- INTEGRATED RANGE. The LST range can be perfectly integrated with the other GEWISS protection devices, for a pleasant aesthetic result.
- REMOTE CONTROL. The integrated auxiliary contact makes it
 possible to control the operating status of the surge protective
 device from a distance.
- **GUARANTEED PROTECTION.** With versions 1+2, the electrical circuit can be protected from both direct and indirect lightening strikes with a single device.





THE EVOLUTION OF CONNECTIONS AND ENERGY DISTRIBUTION

Products that look to the future, designed and built to bring energy to the workplace:
GEWISS offers an advanced range of junction boxes, special containers, enclosures, distribution boards and devices for industrial connections.

IEC 309 HP - Plugs and socket-outlets which meet IEC 309 Standards

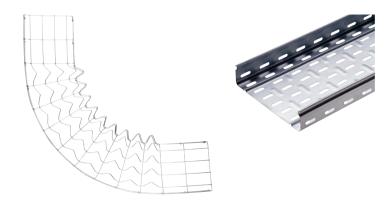
GEWISS offers a range of socket-outlets and plugs ranging from 16A to 125A, guaranteeing high levels of reliability, optimal functionality, excellent performance and cutting-edge technical features. The devices are characterised by a common, modern and functional design, making them instantly recognisable and adding extra value to the entire GEWISS system of industrial connections.

An advanced connection system

- TOTAL PROTECTION. The first and only solutions in the electro-technical sector to offer a degree of protection of IP66/ IP67/IP68/IP69, the IEC 309 HP socket-outlets and plugs prevent dust and powerful jets of water from entering, even at high pressures and temperatures. This feature makes these GEWISS solutions particularly suitable for the food industry.
- GREEN MATERIALS. With a view to providing greater safety in case of fire, all products in the range are made with halogen-free materials (pursuant to EN50267-2-2) and can also be declared silicon free, thus being suitable for use in special environments.







46 QP - Watertight surfacemounting boards

Mavil -Cable trays

For control and automation in both standard and more demanding, heavy-duty applications (industrial systems, robotics, on-board devices and electric/electronic compartments), GEWISS has created a comprehensive and innovative range of versatile solutions that are easy to install, guaranteeing maximum safety for both people and things.

The cable tray is the backbone of an industrial system. GEWISS and Mavil offer an innovative steel cable trays system (flush and slotted) to meet all installation requirements, from the simplest to the most complex and demanding ones.

GEWISS, the ideal partner for energy control and distribution systems.

- ENERGY DISTRIBUTION BOARDS. A complete system
 of energy distribution solutions which can be combined with
 fixed or interlocked industrial socket-outlets, for both fixed and
 mobile applications.
- SURFACE-MOUNTING SYSTEM. The system of containers includes polyester panels which can accommodate up to 180 modules, enclosures, junction boxes, conduits and accessories, for the creation of complete surface-mounting systems.
- 70 RT HP ROTARY SWITCH DISCONNECTORS. These
 control devices for machines, motors and applications with
 similar loads in the industrial sector are essential for ensuring
 the safe sectioning of electrical lines/networks. GEWISS switch
 disconnectors are available in both plastic and metal boxes
 up to 160A, with a high degree of protection (up to IP66/IP67/
 IP69).

A solution for every need

- BFR RANGE. The wire cable trays are suitable for use in both small installations and large industrial applications, and meet all capacity and containment requirements. In the HP finish version, the BFR range ensures good resistance to corrosion even in very harsh environments.
- BRN RANGE. The galvanised steel slotted cable trays are available in different sizes, enabling them to be used in installations with high cable loads. An extensive range of path elements and accessories for surface or suspended mounting complete the offer.





SOLIDITY, MODULARITY AND ENERGY SAVINGS

In industrial applications, lighting accounts for over 40% of total energy consumption. Choosing the right solution can optimise both energy efficiency and lighting performance, facilitating visual tasks for operators and supporting the execution of industrial processes. High-quality materials guarantee optimum levels of resistance of the lighting devices in all application environments.

ESALITE - Devices for industrial LED lighting

The hexagon, as Euclid suggested, is a regular shape carrying other geometric figures within,, such as triangles. This concept of formal regularity, combined with a scalable modularity approach is the source of inspiration for ESALITE, the new range LED industrial lighting assuring an outstanding performance in both indoor and outdoor environments. ESALITE devices, with built-in DALI (Digital Addressable Lighting Interface) brightness control, include functional highbays as well as architectural floodlights for green areas and general outdoor lighting.

Regular shape, robust materials and exceptional modularity for all industrial contexts.

- MODULAR. The hexagonal shape, the use of die-casts for the body of the device and the wide choice of lenses and LEDs combine with an essential design, while achieving the best balance between performance and quality. Enabling different lighting solutions, these devices versatility is the answer to a host of different application needs and environments (outdoor applications for functional and architectural purposes included). Finally, the mechanical fixing brackets and the dedicated accessories make the new range even more complete.
- SOLID. With great resistance to dust, humidity, shocks and acts of vandalism, this range is ideally suited for all industrial environments where strength and reliability are main requirements.







Smart [3] - LED watertight luminaires

The LED Smart [3] watertight luminaires, which feature a compact and elegant design, ensure excellent performance and high resistance to external agents, thanks to their high degree of protection (IP66-IP69). This range of devices is suitable for any application environment, and can be used even a considerable. Installation is quick and simple, and maintenance costs are reduced, thanks to the plug&play system and through-wiring versions.

Smart [4] - Devices for LED floodlighting

The use of powerful LEDs with high colour performance, the high efficiency optical systems (high bays or lenses) and the availability of different configurations make Smart [4] portfolio ideal for minimising operation and maintenance costs whilst optimising lighting performance.

The perfect solution for optimal relamping operations in renovation projects.

- EFFICIENT. Smart [3] devices guarantee high visual comfort and an average reduction of energy consumption of 50% compared to traditional devices, along with outstanding performance (up to 120 lumens/W). The option to incorporate dimming (DALI, 1-10V) contributes significantly to energy efficiency in new and renovated buildings.
- VERSATILE. The transparent or opal prismatic diffuser makes Smart [3] the ideal solution not only for the industrial settings but also for contexts requiring an attractive design and an ease of installation of the lighting devices. The variable assembly centre distance also contributes to the versatility of the range, whilst making installation extremely fast.

The sustainable solution that ensures maximum flexibility and reduced energy consumption.

- HIGH PERFORMANCE. Smart [4] LEDs are carefully selected in order to obtain the best possible performance in real usage conditions (providing light where it is needed). Moreover, the latest generation LEDs enable significant increases in lighting performance, with a lifespan of up to 120,000 hours and lower energy consumption.
- MULTI-FUNCTIONAL. The diverse selection of available and configurations, in accordance with various system architectures, allows GEWISS to offer solutionsable to meet different lighting requirements, with both horizontal and vertical installation options for indoor and outdoor environments. Furthermore, environmental sustainability certification makes Smart [4] range the perfect solution for all newly-conceived projects with low environmental impact and for the most demanding applications thanks to special ATEX, UL, HT versions resistant under extreme conditions..



GEWISS aims at enhancing the **advantages of energy savings**: both relamping and new, LED devices projects can lead to better performing lights in sport facilities. To do so, a free, **preliminary inspection of the courts** where the installation will take place is performed together with a **detailed evaluation** of the existing system, in order to propose the **best technical offer**. When feasible, this is combined with a customised financial plan to support the investment.

A turnkey solution that comprises lighting devices installed according to GEWISS high-quality and efficiency standards.

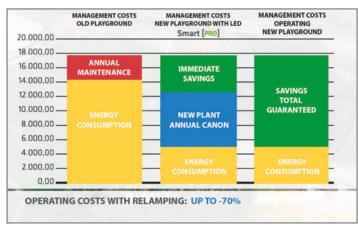
A simple and convenient choice.

Due to relamping, a ${\bf return\ on\ investment\ of\ less\ than\ three\ years}$ is guaranteed.

In fact, the LED devices by GEWISS allow energy savings of up to 80%. In case the deferred payment option is available, the periodic electric bills are covered **without any initial payment**.



DIRECT PURCHASE



DEFERRED PAYMENT





Sensors

A complete system of sensors detects all access to the playing fields, in order to switch on the lamps only when needed.



Dimmers

All products are dimmable, to guarantee maximum optimisation in terms of energy, visual comfort and savings.



Scenes

The sensors and dimming function allow to create lighting scenarios according to the specific needs of the facility, so reducing consumption and guaranteeing maximum visual comfort too.



Remote control

The management and supervision of the main system's functions can be operated remotely, via smartphone or tablet, thanks to the wireless technologies (Bluetooth/Zigbee) connected to the devices.



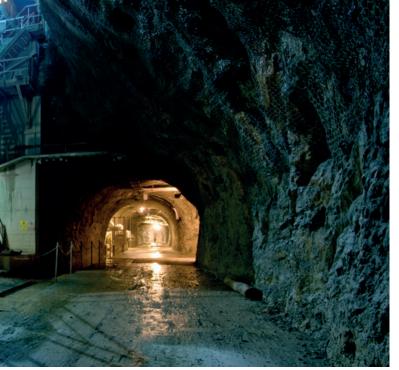






























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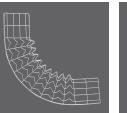








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Registered Office: Via A. Volta, 1 24069 CENATE SOTTO BG - Italy T. +39 035 946 111 - F. +39 035 945 222 gewiss@gewiss.com - www.gewiss.com

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