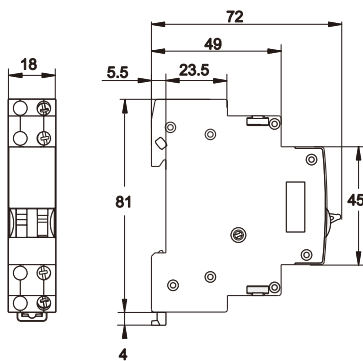


Impulse Relay BIR



BIR-16/10, BIR-16/20
BIR-16/11, BIR-16/1C

Customer needs

- The lighting system must be able to be turned on locally, by the residents.
- It must be possible to switch off all the lighting areas by means of a centralized control in a single action, to ensure extinguishing of the whole house.
- For practical reasons, all the lighting areas can also be switched on in a single action.

Proposed solution

- The use of Denor **Impulse Relays** allows both local control of each room and centralized control of the whole house.
- Centralized control is provided by ON/OFF push buttons, remote from all the rooms to be managed.

User/customer benefits

- **Energy savings:** centralized control allows extinguishing of all the rooms in the house to prevent leaving rooms lit when there are no residents.
- **Comfort:** all the rooms in the house can also be switched on in a single action.
- **Ease of installation:** the small size (18 mm) of the impulse relay is equivalent to that of a simple impulse relay.

MOUNTING:

- mounting to 35mm DIN-rail
- mounting : in different position of installation
- plastic: nonflammable (self-extinguishing material)
- ambient temperature: -20°C to + 50°C
- degree of protection(IEC 60529) : IP20
- tropicalization(IEC 60068-1) : treatment 2 (relative humidity 95% at 55°C)

Technical Specifications

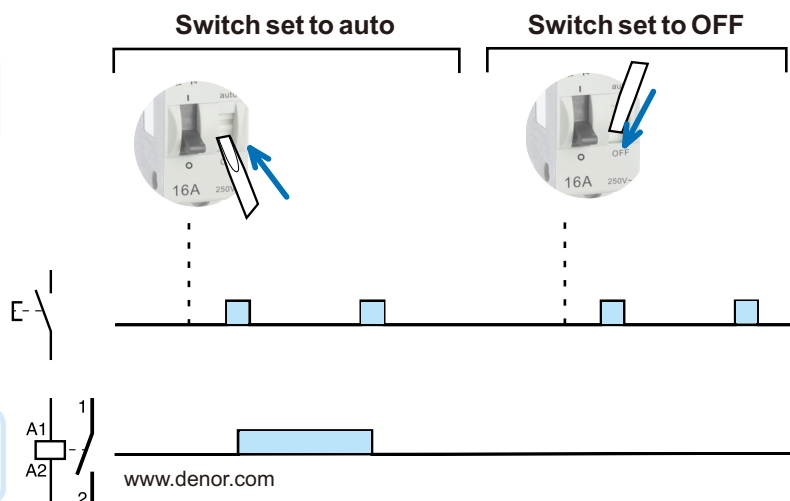
Control circuit	Dissipated power (during the impulse)	1, 2P: 19 VA
	Illuminated PB control	Max. current 3 mA
	Operating threshold	Min. 85 % of Un IEC/EN60669-2-2
	Duration of the control order	50 ms to 1 s (200 ms recommended)
	Response time	50 ms
Power circuit	Voltage rating (Ue)	1P, 2P 24 ...250 V AC
	Frequency	50 Hz or 60 Hz
	Maximum number of operations per minute	5
	Maximum number of switching operation a day	100
Additional characteristics to IEC/EN 60947-3	Insulation voltage (Ui)	440 V AC
	Pollution degree	3
	Rated impulse withstand voltage (Uimp)	6 kV
Endurance (O-C)	Electrical to IEC/EN 60947-3	200,000 cycles (AC21) 100,000 cycles (AC22)
	Overvoltage category	IV

Operation

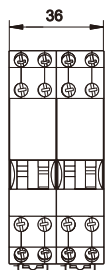
- Disconnection of remote control by selector switch (except for 4P single-piece BIR) for maintenance operation



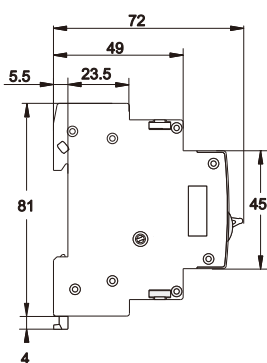
- Manual controls on front face: direct and priority manual control by O-I toggle
- Mechanical contact position indicator



Basic Information for Impulse Relays (5 coils for option)



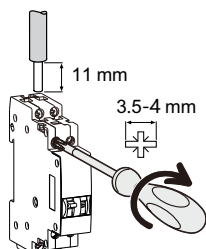
BIR-16/30
BIR-16/21
BIR-16/40
BIR-16/31
BIR-16/22
BIR-16/2C



Type 1P	Rated (Ie) Current	Model	Control voltage (VAC) (VDC)		Contact	In 18 mm modules	Denor code
	16A	BIR-16/10	230 130 48 24 12	110 48 24 12 6	1NO	1	IR1610230 IR1610130 IR161048 IR161024 IR161012
	16A	BIR-16/20	230 130 48 24 12	110 48 24 12 6	1NO+1NO	1	IR1620230 IR1620130 IR162048 IR162024 IR162012
	16A	BIR-16/11	230 130 48 24 12	110 48 24 12 6	1NO+1NC	1	IR1611230 IR1611130 IR161148 IR161124 IR161112
	16A	BIR-16/1C	230 130 48 24 12	110 48 24 12 6	1 Change over	1	IR161C230 IR161C130 IR161C48 IR161C24 IR161C12
	16A	BIR-16/30	230 130 48 24 12	110 48 24 12 6	3NO	2	IR1630230 IR1630130 IR163048 IR163024 IR163012
	16A	BIR-16/21	230 130 48 24 12	110 48 24 12 6	2NO+1NC	2	IR1621230 IR1621130 IR162148 IR162124 IR162112
	16A	BIR-16/40	230 130 48 24 12	110 48 24 12 6	4NO	2	IR1640230 IR1640130 IR164048 IR164024 IR164012
	16A	BIR-16/31	230 130 48 24 12	110 48 24 12 6	3NO+1NC	2	IR1631230 IR1631130 IR163148 IR163124 IR163112
	16A	BIR-16/22	230 130 48 24 12	110 48 24 12 6	2NO+2NC	2	IR1622230 IR1622130 IR162248 IR162224 IR162212
	16A	BIR-16/2C	230 130 48 24 12	110 48 24 12 6	2 Change over	2	IR162C230 IR162C130 IR162C48 IR162C24 IR162C12

www.denor.com

Connection



Connection

Type	Rating	Lenght tripping	Circuit	Tightening torque	Copper cables	
					Rigid	Flexible or ferrule
PZ1:4 mm	16A	9mm	Control	1N.m	0.5 to 4mm ²	1 to 4mm ²
			Power		1.5 to 4mm ²	1.5 to 4mm ²