



JB-110N Bus power PG output module

The JB-110N is a component of the **JABLOTRON** system. It provides an output power relay switch. It can be used for switching on/off the lights, ventilators, etc. The relay can be controlled with a programmable control panel (PG) output or according to the status of a section (set = relay on) or when there is an alarm in a chosen section (alarm = relay on). The device should be installed by a trained technician with a valid certificate issued by an authorized distributor. **This product is compatible with JA-101K, JA-102K, JA-103K, JA-106K and JA-107K control panels.**

Installation

The module should always be installed inside a guarded area (JA-190PL mounting box, a control panel housing or a standard mounting box are appropriate). To comply with EN 50131-1, EN 50131-3 (Security Grade 2 classification) and Incert (T031), the module must be installed into JA-194PL or JA-195PL mounting boxes together with JA-111H TRB module.

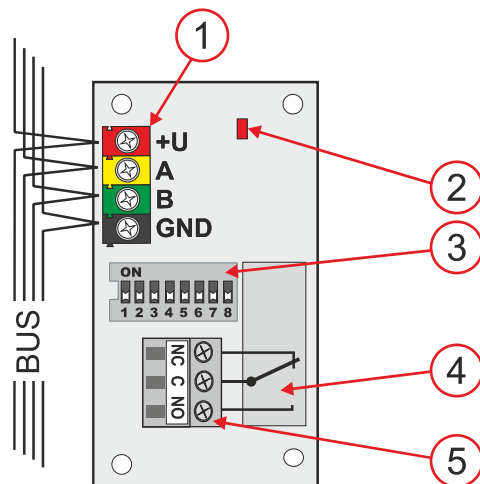


Figure: 1 – bus terminals; 2 – red relay switching indicator; 3 – configuration DIP switch; 4 – output relay; 5 – relay terminals

1. Use the DIP switch (3) to set the required number of the PG output or the number of the section to which the relay should react (see tables).
2. Connect bus wires to the bus terminals (1).

When connecting the module to the system bus, always switch the power off.



If the module is installed outside the protected area, the JA-110T bus insulator should be used for the external section of the wiring.

Electrical devices can only be connected by an authorized technician!

3. Switch on the system and test its functioning.
4. Check the supply voltage at the bus terminals (red, black) when the relay is activated. The voltage must be at least 9 V.
5. Connect the controlled device to the relay output terminals (5).

Notes:

- The module does not occupy any position in the control panel (it is not enrolled into the system).
- If you enrol multiple modules with identical settings to the system, they will have the same reaction.
- The number of modules is only limited by the power consumption from the bus.
- The setting of individual programmable outputs is done in the **PG outputs** window in the F-Link software. A detailed description of the setting is available in the control panel installation manual.
- If the output reacts to a setting of a section, it is triggered when the selected section is fully set.
- If the output reacts to an alarm, it is triggered when there is external or internal warning (EW or IW).

ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	1	1 2 3 4 5 6 7 8	9	1 2 3 4 5 6 7 8	17	1 2 3 4 5 6 7 8	25
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	2	1 2 3 4 5 6 7 8	10	1 2 3 4 5 6 7 8	18	1 2 3 4 5 6 7 8	26
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	3	1 2 3 4 5 6 7 8	11	1 2 3 4 5 6 7 8	19	1 2 3 4 5 6 7 8	27
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	4	1 2 3 4 5 6 7 8	12	1 2 3 4 5 6 7 8	20	1 2 3 4 5 6 7 8	28
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	5	1 2 3 4 5 6 7 8	13	1 2 3 4 5 6 7 8	21	1 2 3 4 5 6 7 8	29
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	6	1 2 3 4 5 6 7 8	14	1 2 3 4 5 6 7 8	22	1 2 3 4 5 6 7 8	30
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	7	1 2 3 4 5 6 7 8	15	1 2 3 4 5 6 7 8	23	1 2 3 4 5 6 7 8	31
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	8	1 2 3 4 5 6 7 8	16	1 2 3 4 5 6 7 8	24	1 2 3 4 5 6 7 8	32
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	33	1 2 3 4 5 6 7 8	41	1 2 3 4 5 6 7 8	49	1 2 3 4 5 6 7 8	57
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	34	1 2 3 4 5 6 7 8	42	1 2 3 4 5 6 7 8	50	1 2 3 4 5 6 7 8	58
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	35	1 2 3 4 5 6 7 8	43	1 2 3 4 5 6 7 8	51	1 2 3 4 5 6 7 8	59
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	36	1 2 3 4 5 6 7 8	44	1 2 3 4 5 6 7 8	52	1 2 3 4 5 6 7 8	60
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	37	1 2 3 4 5 6 7 8	45	1 2 3 4 5 6 7 8	53	1 2 3 4 5 6 7 8	61
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	38	1 2 3 4 5 6 7 8	46	1 2 3 4 5 6 7 8	54	1 2 3 4 5 6 7 8	62
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	39	1 2 3 4 5 6 7 8	47	1 2 3 4 5 6 7 8	55	1 2 3 4 5 6 7 8	63
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	40	1 2 3 4 5 6 7 8	48	1 2 3 4 5 6 7 8	56	1 2 3 4 5 6 7 8	64
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	65	1 2 3 4 5 6 7 8	73	1 2 3 4 5 6 7 8	81	1 2 3 4 5 6 7 8	89
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	66	1 2 3 4 5 6 7 8	74	1 2 3 4 5 6 7 8	82	1 2 3 4 5 6 7 8	90
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	67	1 2 3 4 5 6 7 8	75	1 2 3 4 5 6 7 8	83	1 2 3 4 5 6 7 8	91
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	68	1 2 3 4 5 6 7 8	76	1 2 3 4 5 6 7 8	84	1 2 3 4 5 6 7 8	92
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	69	1 2 3 4 5 6 7 8	77	1 2 3 4 5 6 7 8	85	1 2 3 4 5 6 7 8	93
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	70	1 2 3 4 5 6 7 8	78	1 2 3 4 5 6 7 8	86	1 2 3 4 5 6 7 8	94
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	71	1 2 3 4 5 6 7 8	79	1 2 3 4 5 6 7 8	87	1 2 3 4 5 6 7 8	95
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	72	1 2 3 4 5 6 7 8	80	1 2 3 4 5 6 7 8	88	1 2 3 4 5 6 7 8	96
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	97	1 2 3 4 5 6 7 8	105	1 2 3 4 5 6 7 8	113	1 2 3 4 5 6 7 8	121
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	98	1 2 3 4 5 6 7 8	106	1 2 3 4 5 6 7 8	114	1 2 3 4 5 6 7 8	122
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	99	1 2 3 4 5 6 7 8	107	1 2 3 4 5 6 7 8	115	1 2 3 4 5 6 7 8	123
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	100	1 2 3 4 5 6 7 8	108	1 2 3 4 5 6 7 8	116	1 2 3 4 5 6 7 8	124
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	101	1 2 3 4 5 6 7 8	109	1 2 3 4 5 6 7 8	117	1 2 3 4 5 6 7 8	125
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	102	1 2 3 4 5 6 7 8	110	1 2 3 4 5 6 7 8	118	1 2 3 4 5 6 7 8	126
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	103	1 2 3 4 5 6 7 8	111	1 2 3 4 5 6 7 8	119	1 2 3 4 5 6 7 8	127
ON	PG	ON	PG	ON	PG	ON	PG
1 2 3 4 5 6 7 8	104	1 2 3 4 5 6 7 8	112	1 2 3 4 5 6 7 8	120	1 2 3 4 5 6 7 8	128

Table 1: The output reacts to the PG output state.

JB-110N Bus power PG output module

ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL
1	9	1	1	9
ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL
2	10	2	2	10
ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL
3	11	3	3	11
ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL
4	12	4	4	12
ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL
5	13	5	5	13
ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL
6	14	6	6	14
ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL
7	15	7	7	15
ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 SC	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL	ON 1 2 3 4 5 6 7 8 AL
8	SECTION: SET	8	SECTION: ALARM	8

Table 2: The output reacts to setting the chosen section

Table 3: The relay reacts to an alarm in the chosen section

Technical specifications

Power	from control panel bus 12 V DC (9...15 V)
Quiescent current consumption (relay off / on)	5 mA / 45 mA
Maximum current consumption	45 mA
Relay contact rating:	
Maximum switched voltage	250 V AC
Maximum current - resistive load ($\cos \varphi = 1$)	16 A
Maximum current - inductive (capacitive) load ($\cos \varphi = 0.4$)	8 A
Minimum acceptable relay output through-wattage (DC)	0.5 W
Protection	Class II
Dimensions	78 x 40 x 20 mm
Weight	34 g
Classification	Security grade 2 / Environmental class II (according to EN 50131-1 and T 031)
Only when installed into the JA-194PL or JA-195PL mounting box together with the JA-111H TRB module!	
Environment	indoor general
Operational temperature range	-10 °C to +40 °C
Average operational humidity	75% RH, non-condensing
Certification body	Trezor Test s.r.o. (no. 3025), Kiwa Nederland b. v.
Complies with	EN 50131-1, -3, EN 50130-4, T 031 EN 55032, EN IEC 62368-1, EN IEC 63000



JABLOTRON a.s. hereby declares that the JB-110N is in a compliance with the relevant Union harmonisation legislation: Directives No: 2014/35/EU, 2014/30/EU, 2011/65/EU, when used as intended. The original of the conformity assessment can be found at www.jablotron.com – Section Downloads.



Note: Disposing of this product correctly will help save valuable resources and prevent any potential negative effects on human health and the environment, which could otherwise arise from inappropriate waste handling. Please return the product to the dealer or contact your local authority for further details of your nearest designated collection point.

