1-Channel 5V Relay Module with High/Low Trigger

Electrical data, terminals and nominal dimensions

1 ELECTRICAL CHARACTERISTICS

PARAMETER	VALUE	UNIT	CONDITIONS / SCOPE
Supply	5	V DC	Nominal module supply
Low trigger	0 to 1.5	V	Supplier 5V trigger table
High trigger	3 to 5	V	Supplier 5V trigger table
Trigger current	2 to 4	mA	Supplier table; controller must source/sink this
Quiescent current	5	mA	Supplier table
Maximum working current	190	mA	Supplier table; size supply accordingly
Load limit, AC	10 at 250 / 10 at 125	A at V AC	Fitted relay contacts
Load limit, DC	10 at 30	A at V DC	Supplier table, relay contacts

2 CONNECTIONS

MARKING	FUNCTION
DC+	Positive 5V DC module supply
DC-	Supply return and controller ground
IN	Control input for the relay
H / L	Jumper selects high / low trigger, with power off
COM	Common load contact
NO / NC	Normally open / normally closed, relative to the released relay

3 MECHANICAL DATA

PARAMETER	VALUE	SCOPE
PCB outline	Approx. 51 x 25.5 mm	Nominal; allow connector and wire clearance
Assembly	Fitted components and terminals	One module
Mounting	Four PCB holes	Check actual hole positions before drilling

Load and mains safety. Stay within the load limits above. Motors, lamps and power supplies draw a surge at switch-on, so allow margin for them. Mains voltage can kill: wire mains loads only if you are competent to do so, fully enclose the board and all terminals, and follow NZ electrical safety rules.

1-Channel 5V Relay Module with High/Low Trigger

Connection, expected results and troubleshooting

4 INITIAL CONNECTION AND FUNCTIONAL CHECK

1. **Select the trigger.** With power off, set the H/L jumper to H for high-level triggering or L for low-level triggering.
2. **Power the board.** Connect a regulated 5V DC supply to DC+ and DC-. Share DC- with the controller ground and connect its signal to the appropriate IN terminal. Supply the board from a power rail, never directly from a GPIO pin.
3. **Test before adding the load.** Keep contact terminals disconnected. Apply the selected input state and check the click, indicator and COM-to-NO continuity. The untriggered state should connect COM to NC.
4. **Connect the load.** Turn power off and wire the load circuit through COM and NO, or COM and NC, within the load limits. Recheck the required power-up state before using the circuit unattended.

5 CONTACT STATES

RELAY STATE	COM TO NC	COM TO NO
Released	Closed	Open
Energised	Open	Closed



Functional contact diagram, not a physical terminal-order drawing. Follow the labels on your board. Test continuity with all load power disconnected.

6 TROUBLESHOOTING

SYMPTOM	CHECK
Relay does not click	Check the correct module supply, polarity and control state. Keep the load disconnected while diagnosing.
Relay clicks but load stays off	Check the separate load supply and COM/NO/NC wiring. The relay contacts do not supply power.
Unexpected operation at startup	Set a defined inactive controller output and verify the chosen H/L mode before connecting the load.

7 REVISION HISTORY

REVISION	DATE	CHANGE
1	2026-09-25	Initial variant-specific issue; connection and contact/signal checks.
2	2026-09-29	Added AC and DC load limits and a mains-safety note; single-channel wording.
3	2026-10-12	AC load limit at 125 V AC corrected to 10 A to match the relay markings on current stock.

Electrical and dimensional values are based on the supplier module parameter sheet and reference photographs. Setup steps describe expected behaviour; they are not a record of Click IT bench testing.