2-channel Programmable Timer CT12

♦ **2 programmable timers in one case**
♦ **Up to 2 freely programmable relay outputs**
♦ **Up to 10 programmable periods per channel**
♦ **2 programs or 1 longer one**
♦ **4-digit LED display**
♦ **Start from external input or from keyboard**
♦ **Maximum time per period 9999 minutes**

CT12 is a programmable device for timing control incorporating 2 independent timers in one case. Two relay outputs (one per channel) control electrical actuators by switching them on and off. A time sequence that may consist of up to 10 ON or OFF periods, each with different duration, may be programmed for each output (channel). The device may be used as a single channel timer with up to 20 period time sequence. After a start command from the featured external input or the front-panel keyboard, the time sequence may be run once or repeated endlessly. A 4-digit digital display indicates current time and – during programming – parameter values, and the keyboard enables setting of all modes and parameters of time sequence. The CT12 timer is easy to program and – with its rich set of features – widely applicable.

Technical specifications

Inputs

Passive contact input	NO contacts
Active signal input	voltage, max. 40 VDC
External 'Start/Stop'	starts and stops time sequence [1]
Input setting [2]	programmable

Times and modes

Time sequences	1 per channel
Time periods	up to 10 per channel or
	20 in single-channel mode
Period duration range	0.01 s...9999 min
Time setting	programmable for each period
Output state setting	programmable for each period
Mode selection	programmable
Measurement unit selection	programmable

Outputs [3]

	(up to 2 relay outputs)
Relay electromechanical	5A/250V w/ NO/NC contact
Solid state relay	1A/250 VAC
MOS gate	0.1A/60V, optically isolated
Transistor gate [4]	open collector, 40mA/40V
Output for external SSR	12/24 V, 30 mA
Relay function	ON and OFF, acc. to time sequence

Accuracy

Measurement error	0.7%
Temperature drift	insignificant

Indication and controls

Digital display	4 LED indicators, 10 mm
LEDs	2 LEDs for output state,
	2 LEDs for indicated channel
Keyboard	4 membrane keys

Power supply

Mains supply voltage [5]	230 VAC or 115 VAC
SMPS voltage	90…250 VAC/DC
Isolated low voltage	12…24 VAC/DC or 24 VAC [5]
Non-isolated low voltage	12…24 VAC/DC
Consumption	max. 3 VA

Operating conditions

Operating temperature	-10...65 °C
Operating humidity	0...85 %RH
Storage temperature	-20...65 °C
Storage humidity	0...95 %RH, non-condensing

Design and materials

Case material	plastic
Mounting	in 93x45 mm panel cut-out
Wiring	screw terminals
Dimensions	96x48(front)x125 mm
Mounting depth	120 mm
Weight	max. 350 g
Protection, front/terminals	IP54 / IP20
Increased front IP (option) [5]	IP65

[1] Time sequence start and stop may be initiated through external input or keyboard.
[2] Select the active front of external signal
[3] When only the single-channel mode will be used (20-period time sequence), only one (the first) relay may be ordered.
[4] ONLY with isolated power supply!
[5] Ask for availability!

Ordering code   CT12 - G1.G5G5 - #1

Code	Feature or option	Code values
G1	Power supply	**A** - 230 VAC [5], **B** - 115 VAC [5], **C** - 90…250 V, **P** - 12…24 V, non-isolated, **Q** - 12…24 V, isolated, **R** - 24 VAC [5]
G5	Relay output [3]	**X** - none, **C** - relay NO/NC, **D** - SSR, **E** - open collector NPN [4], **J** - for external SSR, **M** - isolated MOS gate
#1	Increased front protection	**X** - none, **P** - IP65 front protection [5]