

Blinky Box™ TG2122

Optically Isolated Impulse Distributor

User's Manual

RoHS Compliant & Pb Free*



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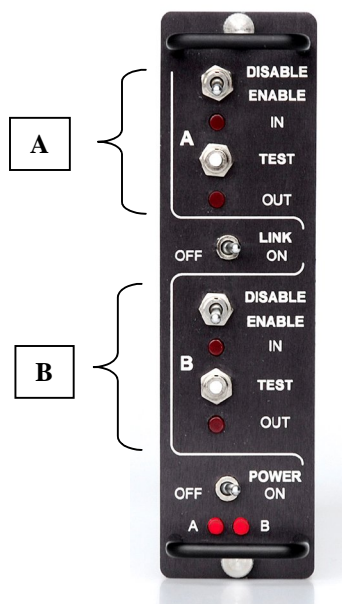
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* Per Directive 2002/95/EC, Batteries excluded.

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EACH CHANNEL A/B

DISABLE/ENABLE – allows blocking of incoming impulses but still allows monitoring of incoming impulses by the “IN” L.E.D.

IN – Visual indication of incoming impulses and short-circuit detection.

TEST – Allows an output impulse on demand (note: is after the Disable/Enable switch)

OUT – Visual indication of output impulses.

LINK – Used to engage the optically isolated “OR” circuit to create 4 outputs at the first input impulse regardless of which channel is received. Also may be used to create a 1 input, 4 output channel.

POWER – Power switch for both A/B channels for onboard 9-volt batteries or external power via the isolated power supply module (on equipped World Cup and Nations Cup editions).

BATTERY CONDITION INDICATORS – Status of battery for each channel.

Flashes slowly (once every second) when battery ≤ 6 volts.

Flashes rapidly (twice a second) when battery ≤ 5 volts.

ALL CONNECTIONS THROUGH 4MM BANANA SOCKETS NORMALLY OPEN (NO) WORKING CONTACTS

A Channel – 1 input, 2 optically isolated outputs for Channel A.

B Channel – 1 input, 2 optically isolated outputs for Channel B.

When LINK is engaged – First impulse on either A or B channel will create 4 optically isolated, simultaneous output impulses through both A/B output jacks. In this mode you can also create a single input with 4 isolated outputs to 4 completely isolated timing systems for extra redundancy.



Technical Specifications

TimingGuys TG2122 Modules Description: Each TG2122 module houses two optocoupled control circuits that are totally separate in terms of electronic parts and power supplies. Each circuit has one input trigger and two isolated outputs.

These completely isolated circuits can be linked via an optocoupled circuit to create an “OR” gate while maintaining complete circuit isolation between the two channels.

The World Cup and Nations Cup versions can contain an isolated, redundant power supply distribution system and adds an acoustical/visual system for all input impulses (available summer 2007).

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Input Triggering – TBD (normally open working contact)

Output Signal – Adjustable: 0.004 - 0.500 sec., depending on setting of Clear Pulse Delay switch. (normally open working contact)

Triggering Delay – Adjustable	Min. Adjustment:	0.0002
	Max. Adjustment:	0.0314
Clear Pulse Delay – Adjustable	Min. Adjustment:	0.004
	Max. Adjustment:	0.500

Working Temperature - -20°C to +50°C

Internal Power Supply – 2 x 9 V Alkaline (6LR61) batteries, isolated, one per channel

External Power Supply – 6-18 V DC via optional power supply module (Redundant)

Triggering Indicator – L.E.D. with short-circuit detection (x 2)

Output Indicator – L.E.D (x 2)

Battery Condition Indicator – L.E.D. with flashing low voltage indication (x 2)

Housing- Aluminum, aluminum extrusion and laser etched aluminum face plates

Dimensions – 215mm x 141mm x 40mm

Weight (incl. batteries) –

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