PANEL INDICATORS WITH 1,44" TFT DISPLAY MD22-TFT STANDARDIZED SIGNALS INDICATOR

DATA SHEET

no: KK-W_MD22-TFT

The MD22-TFT indicators complete MD22 series so far containing signal lamps, LED indicators and buzzers. Main characteristics of all MD22-TFT indicators:

− visualization of the input size or signal on the 1,44" TFT

− assembly in a standard Ø 22 hole

− supply voltage – 24V DC (10÷32 V) or 24V AC (±10%)

TECHNICAL DATA:

Parameter	Value
Supply voltage	24VDC (10÷32V) or 24VAC ±10%
Max. cross-section of connection cables	Dy wire and Ly wire - 0.5 mm2
Voltage to earth	300VAC
Basic accuracy - MD22-TFT-PCT - MD22-TFT-IU - MD22-TFT-T	not applicable 1 ºC+1 digit in the range-100 ÷ 800 ºC 2 ºC+1 digit in the range -200 ÷ -100 ºC
Safety requirements	Acc. to PN-EN 61010-1
Protection class	IP 67 (front side) IP 20 (housing and terminals)
Operating temperature	-20÷50°C
Power consumption	Max. 0,5W
Measurement range - MD22-TFT-PCT - MD22-TFT-IU - MD22-TFT-T	Not applicable 4-20 mA / 0-10 V -200÷850 ºC (for sensor PT100)
Input - MD22-TFT-PCT - MD22-TFT-IU - MD22-TFT-T	4 logic inputs 2 measuring terminals U/I 2 measuring terminals (for sensor PT100)

Mechanical fastening

The indicator is designed for mounting in a standard Ø22.5mm hole with a positioning cut-out at the top. Mounting the indicator to the board is limited to inserting the body into the prepared hole and screwing it from the rear with the fixing nut.

Electrical connections

The indicators are powered with safe voltage, nominally 24 V DC or AC. The supply voltage and the input signal are supplied through six screw connection terminals. The power supply is not galvanically separated from the measuring circuit (the circuits have a common "ground").
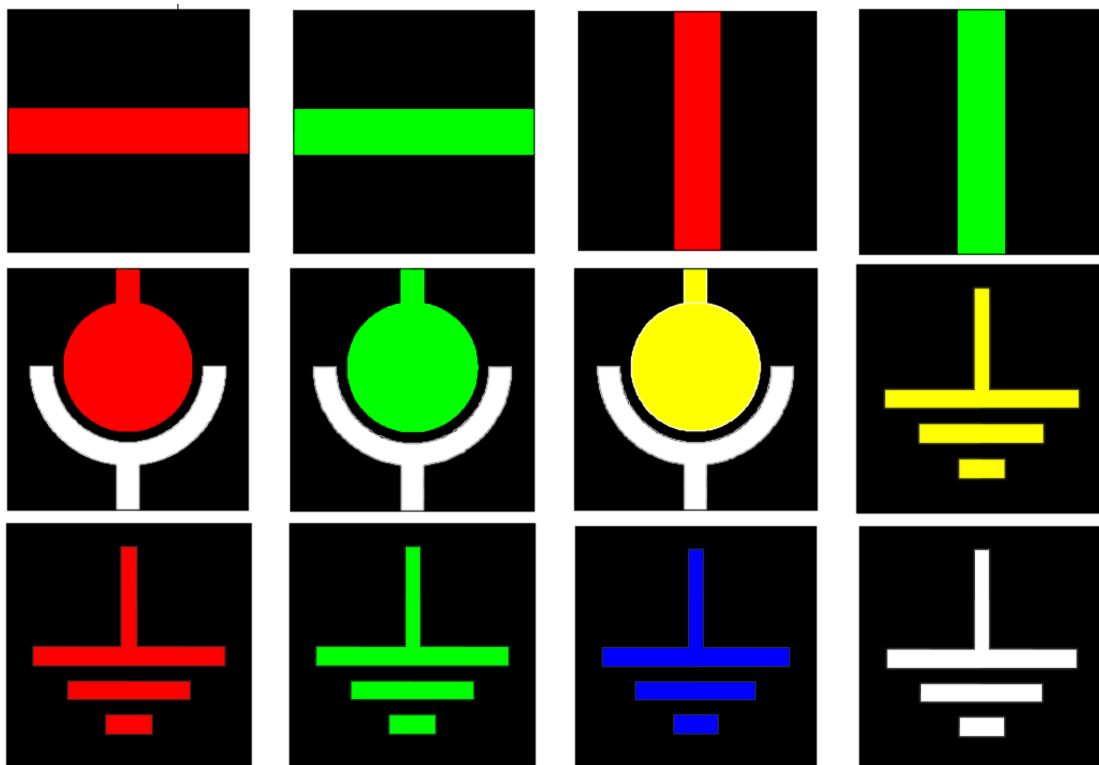
MD22-TFT-PCT

The MD22-TFT-PCT indicator is designed for visualization of a device status (on, off, direction of movement, etc.) by displaying appropriate graphics (pictograms or digits) according to the combination of logic states of four inputs. As a result, it is possible to choose between 16 graphics.
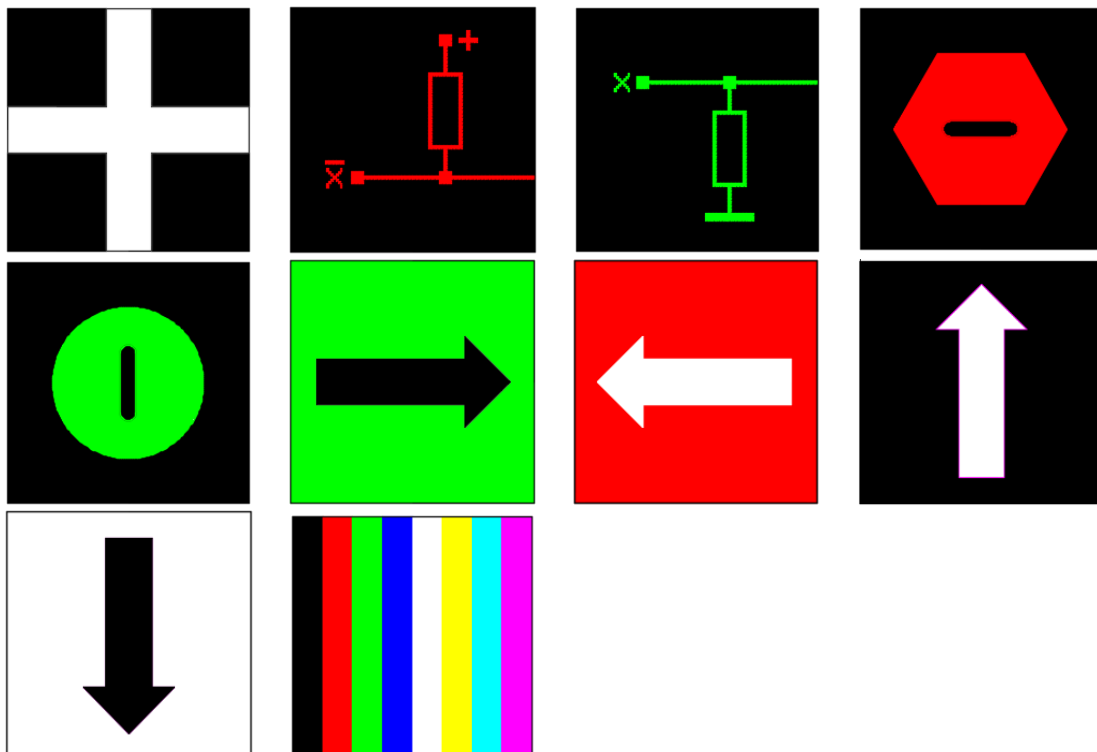The number of graphical elements stored in memory can be bigger, max. 99. All combinations of logic input states can be assigned to any graphical elements.
The set of available graphical elements contains images, which makes it possible to use MD22-TFT-PCT as a functional equivalent of MD2-WP, -WU and -WPW LED indicators.

	Designation	Colour	Weight [g]
	MD22-TFT-PCT	czarny	31

The present set of graphics available

MD22-TFT-PCT-S1

In terms of hardware, it is a graphics display MD22-TFT-PCT, only the software is different. Sixteen two-color graphics are displayed in the form of large numbers from 0 to 9 and letters A to F, permanently assigned to each of the sixteen possible combinations of logical states of inputs. Only the type of inputs can be programmed with the buttons.

On customer's request, the character set may be modified (all or some characters). The new mark must be two-color graphics (the color of the mark itself and the color of the background). The ordered signs may be in the form of * .bmp files from the "Paint" program (128x128 pixels monochrome graphics with the color of the mark and background), or any other graphic form.

	Designation	Colour	Weight [g]
	MD22-TFT-PCT-S1	czarny	31

MD22-TFT-IU

MD22-TFT-IU is a standard indicator of current loop and voltage signal. This model is designed for displaying various physical quantities converted via appropriate sensors/transducers to standard signals 4÷20 mA or 0÷10 V. The quantity displayed consists of three digits. Additionally, the display shows a bargraph (a horizontal bar of variable length) which provides general information about the quantity measured and which is well-visible from a greater distance than a digital indication.
The indicator has two open-collector alarm outputs which are activated below the lower threshold or above the upper threshold.
The programming buttons can be used to:
− choose the measured value (I or U),
− choose between the following units: mA, A, V, %, at, ºK, ºC (other options available on request),
− choose where the decimal point is to be displayed,
− assign minimum and maximum levels (rescaling),
− set the upper and lower alarm thresholds or to switch off alarms.

	Designation	Colour	Weight [g]
	MD22-TFT-IU	czarny	31

MD22-TFT-T

The MD22-TFT-T indicator is a digital temperature meter compatible with the PT100 sensor (not included), designed mostly to monitor temperature of industrial equipment, control and switch cabinets, etc. The measuring range is -200÷800°C, measurement error is ± 2°C.
The quantity displayed consists of three digits. Additionally, the display shows a bargraph (a horizontal bar of variable length) which provides general information about the quantity measured and which is well-visible from a greater distance than a digital indication.
The indicator has two open-collector alarm outputs which are activated below the lower threshold or above the upper threshold.
The programming buttons can be used to:
− choose how the PT100 sensor is to be connected (via two or three wires),
− assign the bargraph range corresponding to minimum and maximum levels,
− set the upper and lower alarm thresholds or to switch off alarms.

	Designation	Colour	Weight [g]
	MD22-TFT-T	czarny	31

DIMENSIONS

40

40

control
buttons

name
plate

48

fastening
nut

gasket

11