

vision system

CHB-C-N

Part number: 3501040

FESTO

Intelligent Line Scan Camera System with adaptive part flow control for sorting small parts by type, by position orientation, by quality, and also by quantity (quantity pre-selection). CMOS-Sensor, resolution 1 x 2048 pixels, LED-Illumination, Ethernet-Interface 100 Mbit/s, PLC-Interface, Digital I/Os. Main application field is feeding technology.



Data sheet

Feature	Value
Sensor resolution	2048 pixels/line
Pixel size	0.014 mm
Sensor type	CMOS line scan
Max. line frequency, sensor	8,500 Hz
Max. no. of test programs	256
Max. no. of types per inspection program	1
Max. no. of different orientations per type	8
Counting function	Yes
Counting range	1 - 9999999
Quantity pre-selection	About CheckOpti software
Min. part length	1 mm
Max. part length	Depends upon conveyor belt speed and required resolution
Min. part diameter	0.5 mm
Max. part diameter	25 mm
Nominal operating voltage DC	24 V
Permissible voltage fluctuation	-15 % / +20 %
Current consumption with load-free outputs	400 mA
Internal fuse	4 A fuse
Max. starting current per output channel	1.3 A
Electronic output limiting	700 mA
Power supply, type of connection	Plug
Power supply, connection technology	M18x1
Power supply, number of pins/wires	4
Max. total current, power supply	3 A
Actuator interface, type of connection	Plug socket
Actuator interface, connection technology	M12x1, A-coded in accordance with EN 61076-2-101
Actuator interface, number of pins/wires	5
Max. total current, actuator interface	1.9 A
Buffer/feeder interface, type of connection	Plug socket
Buffer/feeder interface, connection technology	M12x1, A-coded in accordance with EN 61076-2-101
Buffer/feeder interface, number of pins/wires	5
Max. total current, buffer/feeder interface	1.9 A
PLC interface, type of connection	Plug socket
PLC interface, connection technology	M16x0,75
PLC interface, number of pins/wires	24
Max. total current, PLC interface	0.9 A
Outputs	Good part, correctly oriented Good part, incorrectly oriented Incorrect part Conveyor equipment controls “Warning” status message

Feature	Value
	Error output Target number reached PLC power supply Transport system controller/Ready for operation
Inputs	Build-up sensor 1 Back pressure sensor 2/check program bit 2 External error Start new counting cycle External start/stop External sensor/inspection program bit 3 Key disable Check program bit 0 Check program bit 1
Input characteristics	To IEC 61131-2, type 1
Ethernet interface, type of connection	Plug socket
Ethernet interface, connection technology	M12x1, D-coded in accordance with EN 61076-2-101
Ethernet interface, number of pins/wires	4
Ethernet interface, protocol	TCP/IP
Ethernet interface, transmission rate	10/100 Mbit/s
Ethernet interface, function	diagnosis Programming
Encoder interface, type of connection	Plug socket
Encoder interface, connection technology	M16x0,75
Encoder interface, number of pins/wires	8
Encoder interface, protocol	RS485
Note regarding fieldbus interface	Not connected
Fieldbus interface, protocol	CAN, not supported
Material housing	Wrought Aluminium alloy
Material cover	Wrought Aluminium alloy
Materials note	Conforms to RoHS
Mounting type	with internal (female) thread With dovetail slot with accessories
Dimensions W x L x H	60 mm x 164 mm x 256,9 mm
Dimensions of optical channel W x H	59,2 mm x 40 mm
Product weight	2,325 g
Ambient temperature	-5 ... 45 °C
Storage temperature	-20 ... 70 °C
Protection class	IP64
Authorisation	RCM Mark
KC mark	KC-EMV
CE mark (see declaration of conformity)	to EU directive for EMC
Ambient Conditions	Screening from extreme external light sources Cleanest possible ambient air Dry
Photobiological safety	Risk group 1 (low risk) per DIN EN 62471:2009-03
Vibration resistance	Transport application test at severity level 2 in accordance with FN 942017-4 and EN 60068-2-6
Shock resistance	Shock test with severity level 2 in accordance with FN 942017-5 and EN 60068-2-27
Protection against direct and indirect contact	Protective extra-low voltage with safe disconnection (PELV)
Corrosion resistance classification CRC	2 - Moderate corrosion stress