# UVX Tin-side Mini

## ON-LINE DETECTION SYSTEM

The tin-side detection system employs our field-proven, UVX<sup>™</sup>-based sensor, to accommodate the special requirements for reliable tin-side glass detection.

Identification of the tin-side of float-glass is important to glass processors in laminating, printing and specialty coating applications.

The Control Unit provides a display with a 00-99 range and access to set-up parameters and threshold adjustment. The output of the Control Unit is a discrete, NPN/PNP that indicates when the signal level exceeds the threshold setting which occurs when viewing the tin-side. The Control Unit may be mounted to provide easy access to the controls and display.

The Optical Unit is mounted at approximately 5-10mm from the surface of the glass. A green LED indicates power. The enclosure provides 2 mounting holes for customer-supplied bracket/hardware. The Optical Unit also functions as a shroud over the sampling area to minimize exposure to the UV light source and prevent interference from ambient light. The light source is field replaceable by properly trained technicians.





## Applications

- Detect tin-side of glass
- Laminating
- Printing
- · Specialty coatings
- Glass processing

# **Design & Features**

- Small spot size
- Remote mounted display and control
- Fast response
- Display range 00-99
- Adjustable gain
- Analog outputs
- PNP/NPN discrete output

## **Ordering Information**



UVX-300G-C-CU Control Unit



OU-TS2 Optical Unit, tin-side mini



M12-10-2-MF Cable, 10P, 5M, M12, M/F

## Accessories



UVX-300B Bracket



UVX-300C Cable, 5P, 5M, M12, F



Power Supply Regulated 24VDC

NOT INTENDED FOR USE IN PERSONAL SAFETY APPLICATIONS.

## **Functions**

NORMAL OPERATING MODE CALIBRATION THRESHOLD UV LED INTENSITY HYSTERESIS LEVEL DISCRETE OUTPUT OUTPUT PULSE STRETCH SECURITY TEACH MODE

## **Specifications**

Light source Light spot size Light source intensity Sensing distance **Response time** Switching frequency Relative intensity display range Sensitivity Signal level **Detection threshold Digital output Output function Analog output Power indicator Detect indicator Programming indicator Data retention** UVX-300G-C-CU (receiver) Dimensions

> Weight OU-TS2 (transmitter) Dimensions

Weight Supply voltage Operating current Short circuit protection Overload / reverse polarity protection Operating temperature Storage temperature Housing Displays relative reflection intensity User sensitivity adjustment Set detection level Set LED, LO, MED, HI Set undetect level 1-9 steps below threshold Set normally open or normally closed Set minimum output period 10...90mS Lock/unlock pushbutton controls Auto-set detection threshold

Deep UV 1...2mm 3 levels 5...10mm <150uS 6kHz 00 to 99 Adjustable Two 7 segment digits Two 7 segment digits Auto-Detect PNP / NPN NO/NC selectable 0...5V Green LED Red LED Yellow LED EEPROM non-volatile memory

51mm x 61mm x 25mm (2.0" x 2.4" x 1.0") 95 g (0.21 lbs.)

41mm x 86mm x 91mm (1.6" x 3.38" x 3.55") 500g (1.1 lbs.) 24 VDC 60 mA Discrete output Supply voltage -20°C...55°C -20°C...70°C Metal alloy

WARNING: HIGH INTENSITY UV LIGHT, WEAR EYE AND SKIN PROTECTION.

WARRANTY EMX INC. the product described herein for a period of 2 years under normal use and service from the date of manufacture. The product will be free from defects in material and workmanship. This warranty does not cover

ordinary wear and tear, abuse, misuse, overloading, altered products, or damage caused by the purchaser from incorrect connections, or lightning damage. There is no warranty of merchantability. There are no warranties expressed, implied or any affirmation of fact or representation which extend beyond the description set forth herein. EMX Inc. sole responsibility and liability, and purchaser's exclusive remedy shall be limited to the repair or replacement at EMX's

option of a part or parts not so conforming to the warranty. In no event shall EMX Inc. be liable for damages of any nature, including incidental or consequential damages, including but, not limited to any damages resulting from non-

### Indicators 7-Segment

7-Segment display | LED Green LED | Power Red LED | Detect Yellow LED | Program

### Connector M12

 
 Pin 1
 Power to 24VDC

 Pin 2
 Discrete output PNP/NPN NO/NC

 Pin 3
 Ground

 Pin 4
 Analog output 0 to 5V DC

 Pin 5
 LED enable input

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conformity defect in material or workmanship.

MADE IN THE USA

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The Optical Unit is mounted at approximately 5-10mm from the surface of the glass. A green LED indicates power. The enclosure provides 4 mounting holes for customer-supplied bracket/hardware. The Optical Unit also functions as a shroud over the sampling area to minimize exposure to the UV light source and prevent interference from ambient light. The light source is field replaceable by properly trained technicians.





# **OPTICAL UNIT**

Model: Note: Consult Manual for Warning

Connect this device only to EMX Model UVX300-GC-CU using EMX Interface cable part number M12-10-2-MF

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- Printing
- Specialty coatings
- Glass processing

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- Display range 00-99
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- · Analog outputs
- PNP/NPN discrete output



UVX-300G-C-CU Control Unit



OU-TS Optical Unit, tin-side



M12-10-2-MF Cable, 10P, 5M, M12, M/F



UVX-300B Bracket



UVX-300C Cable, 5P, 5M, M12, F



Power Supply Regulated 24VDC

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Weight Supply voltage **Operating current** Short circuit protection **Overload / reverse polarity protection Operating temperature** Storage temperature Housing

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51mm x 61mm x 25mm (2.0" x 2.4" x 1.0") 95 g (0.21 lbs.)

51mm x 106mm x 167mm (2.0" x 4.2" x 6.6") 500g (1.1 lbs.) 24 VDC 60 mA Discrete output Supply voltage -20°C...55°C -20°C...70°C Metal alloy

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### Indicators 7-Segment display | LED

Green LED Power Red LED Detect Yellow LED Program

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- Pin 1 Power to 24VDC Pin 2 Discrete output PNP/NPN NO/NC Pin 3 Ground Analog output 0 to Pin 4 5V DC
- Pin 5 | LED enable input

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