## **Special-beam Models**

# Detection with Increased Reliability ••• P10

A variety of heads incorporating the latest optical technology makes it possible to solve common problems related to detection and to increase reliability.

- Resistant to dust and dirt
- Capable of detecting small workpieces
- Resistant to workpiece vibration

Use these models to handle unstable detection conditions.

Area-sensing models Small-spot models E32-T16J E32-C42+ E39-F3A

Limited-reflective High-power models models E32-L24L E32-T17L

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#### **High Resistance to External Environment-resistive Models Conditions with Fiber**

We have developed model variations for adapting to a variety of environmental conditions. These models enable detection in high-temperature environments and vacuums.





Chemical-resistant models

- - High-temperature environments
  - Environments subject to the splattering of chemicals Vacuums

Use these models to handle applications in special environments.

## Application-corresponding Models

#### Fiber Units for the Food-packaging, Semiconductor, and FPD Industries

These models, which were developed for specific applications, offer top-quality detection performance.

- Label detection
- Liquid-level detection
- Alignment and mapping of glass substrates
- Wafer mapping
  - Use these models for specific applications,







Liquid-level detection models E32-D36T

### Page Reference

Туре		Feature/ applications	Variations	Туре	Ratings and performance	Dimensions
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# Selection Guide



### Fiber Units

Detection	Environmental conditions	Standard environments	Special environments High-temperature environ- ments (up to 400°C) Environments subject to scat- tering of chemicals and oil Vacuum environments
Standard detection	Workpiece presence Positioning Level differences and marks	Standard Models • • • P.6 Workpiece presence Positioning Positioning Level differences Marks	Environment-resistive Models • • • P.14
Special- beam	<ul> <li>Long-distance sensing, resistance to dust and dirt</li> <li>Small beam, resistance to rattling</li> <li>Detection of transparent objects</li> </ul>	Special-beam Models P.10	
Application- corresponding	Labels Liquid level Alignment and mapping of glass sub- strates Wafer mapping	Application-corresponding Models • • •	▶P.16

## Amplifier Units

Туре	Digita	Manual	
Appearance	and the second s	2-channel models	A management
Response time	48 μs, 1 ms, or 4 ms (2-output models: 80 μs, 1 ms, or 4 ms)	100 μs, 1 ms, or 4 ms	200 μs (high-speed models: 20 μs)
Light source	Red, green, blue, or infrared LED	Red or green LED	
Function	Dual display (including digital, bar, pero Threshold adjustment performed manu OFF-delay, ON-delay, one-shot timer (	LED bar display (5 levels) 8-turn sensitivity adjuster OFF delay timer (fixed at 40 ms)	
	Advanced-function models are available (2-output/input models).		Water-resistant models are available.
Models	E3X-DA□-S E3X-DA□TW-S (2-output model) E3X-DA□RM-S (input model)	E3X-MDA	E3X-NA E3X-NA F (high-speed model) E3X-NA V (water-resistant model)