Application Spotlight
SmartLights improve plant efficiency through process visualization

At an automotive body-in-white plant operators were struggling to keep pace with the process. This was causing delays for just-in-time production at the plant. The plant management realized the need for visualization of the process statistics to ensure that racks with parts were unloaded in time and manual operations took place to keep the pace of the process. Initially, the plant adopted the large television monitors displaying process parameters and counters to indicate the progress. The numbers, however, did not tell operators whether they were keeping pace or not - that did not help with improving the flow.

Balluff programmable SmartLights were then installed just above the operator stations. The maintenance technicians programmed the SmartLights in level mode of operation and mapped the counter directly to indicate the level. SmartLights were also programmed to show different colors indicating the progress of the operation. When operation would lag, the color would change to orange or yellow then to red - or if the operation progressed to keep pace with the rest of the plant the color would change to green - providing visual feedback on the status. Additionally, the same Smartlight was also used to provide audible and visual feedback to the forklift operators to replenish parts for the operation.

Using SmartLights with function blocks for ease of programming, the plant management successfully improved their plant's efficiency.

SmartLight Advantages

- Adaptable to any industrial network or fieldbus with IO-Link communication. Add-On-Instructions or function blocks supplied for ease of programming

- Fully programmable LED tower lights offering multiple modes of operations: multicolor stack light, run light or level indication

- Difficult to ignore in the plant with customizable colors and brightness - models with 95dB programmable buzzer also available

- Eliminates complex wiring or assembly by using standard 3-wire M12 sensor cable for power and data communication

- Flexible mounting options for ceiling, wall or column mounting

Order Code	Part Number	Description	
BNI0085	BNI IOL-802-102-Z037	SmartLight 5-segment with buzzer	1
BNI0082	BNI IOL-802-102-Z036	SmartLight 5-segment	2
BNI008A	BNI IOL-801-102-Z037	SmartLight 3-segment with buzzer	3
BNI0088	BNI IOL-801-102-Z036	SmartLight 3-segment	4
BAM026L	BAM MB-NI-017-400-1	Pedestal mounting for SmartLight	5
BAM0255	BAM MB-NI-016-800-1	Right angle wall mount bracket	6
BCC05M1	BCC M415-M414-3A-304-EX44T2-005	Standard M12 5m sensor cable (high flex)	7