

## IO-Link actuator for industrial tower light based on L6364Q and IPS4260L



### Features

- IO-Link Class-A interface based on the L6364Q dual channel IO-Link device transceiver
- IO-Link mini-stack running on the STM32G071CBT6
- 4 low-side output channels based on the IPS4260L (intelligent low-side power switch)
- Supply current for external load 1A/Ch (max. total current 2 A)
- 4 buttons used as digital input channel
- Operating voltage from 18 V to 30 V DC
- TVS protects the device from surge based on the SMBJ30CA
- M12 4-pin connector to satisfy the IO-Link spec and industrial needs.

### Applications

- Factory automation

### Description

The **EVLIOL4LSV1** is an IO-Link actuator for traditional tower lights used in factory automation and system alarm indicator applications: it is a turnkey solution that can be used as a reference design ready for industrialization.

With IO-Link, the **EVLIOL4LSV1** becomes an actuator for smart tower lights. It can also be used as a funnel material indicator for material quantity or urgency level.

The **EVLIOL4LSV1** is designed with the **L6364** as the IO-Link device transceiver, the low power **STM32G071CB** MCU, and the **IPS4260L** as the low-side driver for industrial loads. A dedicated SWD 5-pin connector is used for MCU programming.

With the use of an **IPS4260L** quad low-side switch, the solution can drive an external low-side load, such as a tower light, valve, or pump. It can diagnose whether the LED is working or not using the open load detect function of the **IPS4260L**.

This **EVLIOL4LSV1** works with an IO-Link master board and control tool GUI software with the correspondent IODD file.

Product summary	
IO-Link actuator for industrial load based on L6364Q and IPS4260L	<b>EVLIOL4LSV1</b>
Mainstream Arm Cortex®-M0+ MCU with 128 Kbytes of flash memory	<b>STM32G071CB</b>
Dual channel transceiver IC for SIO and IO-Link sensor applications in QFN package	<b>L6364</b>
Quad low-side intelligent power switch	<b>IPS4260L</b>
600 W, 30 V TVS in SMB	<b>SMBJ30CA</b>

# 1 Specifications

Board specifications are provided in the following table.

**Table 1. EVLIO4LSV1 - specifications**

Parameter		Value
Supply voltage	Nominal	24V DC
	Full operating range	18V ~ 30V DC
Maximum current	DC <sup>(1)</sup>	2A
Transmission rate	IO-Link	COM3 (230.4kbps)

1. Actual maximum current could be limited by power dissipation.

## Revision history

**Table 2. Document revision history**

Date	Version	Changes
03-Sep-2024	1	Initial release.
09-Sep-2024	2	Added links in <a href="#">Section Product status link / summary</a> .



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