



OPEN COLLECTOR TALLY INTERFACE

Roland Switchers Tally Interface

Real-time red/green camera tally from your Roland switcher to Ikan tally lights — up to four cameras, plug-and-play.



TI-OC-ROL-25-4 TI-CBL-OC-ROL-25 DB25

TI-OC-ROL-15-4 TI-CBL-OC-ROL-15 DB15

Contents

- 01 Introduction** What this interface does and how open-collector tally works

- 02 What's in the Box** Interface, switcher cable, and power adapter

- 03 Hardware Overview** Connectors, enclosure, and markings

- 04 How It Works** Signal path from switcher to tally lights

- 05 Installation & Quick Start** Six steps to a working tally system

- 06 Roland Switcher Tally Setup** Default PGM/PST output, plus V-40HD, V-440HD and V-1600HD notes

- 07 Verifying Operation** Confirming red, green, and transition behavior

- 08 Troubleshooting** Common issues and how to resolve them

- 09 Specifications** SKUs and full technical specifications

- 10 Safety & Regulatory** Safe use, regulatory notes, and warranty

- 11 Appendix A — Roland Compatibility** Every supported model, by tally connector

This manual covers both Roland bundle variants. Setup is identical except for the switcher cable and the model-specific notes in Section 6 and Appendix A.

1 · Introduction

The Ikan Open Collector Tally Interface connects your Roland switcher's tally system directly to Ikan tally lights. When you switch cameras, the matching light turns red on air and green on preview, so talent and crew always know which camera is live — with no extra software, custom wiring, or IP setup.

Tally, briefly

A tally system shows which camera is **live** and which is **next**. By convention, **red** means the camera is on program (on air) and **green** means it is on preview. Roland switchers output program and preview per channel; most work as soon as they are connected, and the exceptions are called out in Section 6.

Who it's for

Roland switcher owners in broadcast, corporate AV, house of worship, education, and live-event production who want reliable hardware tally for up to four cameras per interface.

THIS MANUAL COVERS

Both Roland bundles — the DB25 variant (TI-OC-ROL-25-4) and the DB15 variant (TI-OC-ROL-15-4). Setup differs only in the included cable and a few model-specific notes, all called out in Section 6.

2 · What's in the Box

Each Roland bundle ships as a single carton. Confirm all three items are present before installation.

1 × TI-OC-U interface	Open Collector Tally Interface — black ABS enclosure, DB9 female input, four RJ45 outputs (OUT 1-4).
1 × TI-CBL-OC-ROL-25	3-ft DB9-to-DB25 tally cable — DB25 switchers (bundle TI-OC-ROL-25-4)
1 × TI-CBL-OC-ROL-15	3-ft DB9-to-DB15 tally cable — DB15 switchers (bundle TI-OC-ROL-15-4)
1 × Power adapter	5VDC 750mA wall adapter with barrel-jack connector.

WHICH CABLE IS IN MY BOX?

Your bundle includes **one** switcher-specific cable that matches your Roland switcher's tally connector. Match the SKU on the carton label to the table above, then confirm your switcher model in Section 6.

3 · Hardware Overview

The interface is intentionally simple: one tally input from your switcher, four identical tally outputs to your Ikan tally lights.



Black ABS enclosure, 105 x 78 x 40 mm - Ikan logo - "TALLY INTERFACE" - "MADE IN USA"

TI-OC-U interface — output side (four RJ45 jacks) and input side (5VDC power + DB9 tally input).

Input side

- **DB9 female (INPUT)** — accepts the switcher tally signal through the included DB9-to-DB25 (or DB9-to-DB15) cable.
- **5VDC barrel jack** — connect the supplied power adapter here.

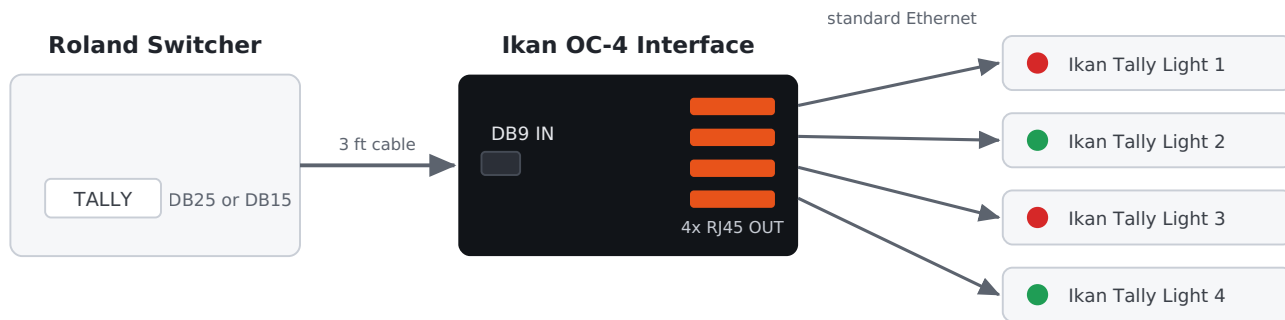
Output side

- **Four RJ45 jacks (OUT 1-4)** — one per camera position. Run a standard Ethernet cable from each output to an Ikan tally light.
- Outputs carry both program (red) and preview (green) tally for their channel.

Enclosure	Black ABS plastic, 105 × 78 × 40 mm (4.13" × 3.07" × 1.57")
Markings	White silk-screen — Ikan logo, "TALLY INTERFACE", "MADE IN USA"
Tally protocol	Open collector

4 · How It Works

The interface taps the tally signal your Roland switcher already produces and distributes it to up to four Ikan tally lights over ordinary Ethernet cable — no software, drivers, or network configuration.



● Program / live (red) ● Preview / next (green) ● Transition (amber)

Signal path: switcher tally output → 3-ft switcher cable → OC-4 interface → four Ethernet runs → Ikan tally lights.

Each output corresponds to one camera. When a camera is taken to **program** the matching light turns **red**; when it is selected on **preview** the light turns **green**. During a mix or wipe a switcher may briefly assert both, which appears as an **amber** (red + green) indication.

OPEN COLLECTOR, IN ONE LINE

An open-collector tally output switches each signal to ground to turn a light on. It is fast and low-current — ideal for live production — and shares a common ground with the switcher, which is why the OC-4 connects directly to the dedicated Roland tally port.

5 · Installation & Quick Start

Most Roland installations are running in a few minutes. Follow these steps, then complete the switcher-side setup in Section 6.

- 1 Connect the switcher cable.** Plug the included DB9-to-DB25 (or DB9-to-DB15) cable into the OC-4 **DB9 INPUT**, and the other end into your Roland switcher's **TALLY** port. Seat both connectors fully and hand-tighten the thumbscrews.
- 2 Connect power.** Plug the 5VDC adapter into the OC-4 barrel jack and into a wall outlet or power strip.
- 3 Run Ethernet to your tally lights.** Connect a standard Ethernet cable from each output — **OUT 1-4** — to an Ikan tally light. Use one output per camera position.
- 4 Match outputs to cameras.** OUT 1 should feed the light for the camera on the switcher's tally channel 1, OUT 2 for channel 2, and so on. Keep this mapping consistent across your studio.
- 5 Configure the switcher (if required).** Complete the Roland tally setup in Section 6. Datavideo switchers need no menu setup; Roland and Ross switchers may require you to confirm or assign tally outputs.
- 6 Test.** Take each camera to program and confirm the matching light turns red; select it on preview and confirm green. See Section 7.

MORE THAN FOUR CAMERAS?

Each interface drives up to four Ikan tally lights. For larger studios, use an additional interface fed from a second tally output on your switcher, or contact Ikan about IP-based tally distribution.

6 · Roland Switcher Tally Setup

Roland switchers output open-collector tally on a TALLY (or TALLY/GPIO) connector, carrying program (PGM) and preview (PST) per channel. On most models the default pin assignments already output PGM and PST, so tally works as soon as it is connected. A few models behave differently and are covered separately below.

Which cable does my switcher use?

Tally connector	Bundle / cable	Switcher models
D-sub 25-pin (DB25)	TI-OC-ROL-25-4 TI-CBL-OC-ROL-25	V-60HD, V-80HD, V-160HD, V-600UHD, VR-6HD, VR-120HD
D-sub 15-pin (DB15)	TI-OC-ROL-15-4 TI-CBL-OC-ROL-15	V-40HD*, V-440HD, V-800HD, V-800HD MKII, V-1600HD

*V-40HD is program-only — see the note below.

Setup — DB25 models (example: V-160HD)

The V-160HD has a D-Sub 25-pin TALLY/GPIO connector with an open-collector tally output (max 12V / 120mA). By default, pins 1–16 output PGM and PST alternately for inputs 1–8 (pin 17 is ground; pins 18–25 are GPI inputs), so program and preview tally are available without any changes.

- 1 Locate the **TALLY/GPIO** (D-Sub 25-pin) connector on the rear of the switcher.
- 2 Connect the **TI-CBL-OC-ROL-25** cable from the OC-4 **DB9 INPUT** to the TALLY/GPIO connector.
- 3 The default assignments already output program and preview per channel — no changes are usually needed. To review or reassign tally functions, see the tally settings in the V-160HD reference manual (p.70).
- 4 Power on and test each camera on program and preview.

V-60HD, V-80HD, V-600UHD, VR-6HD and VR-120HD use the same DB25 TALLY/GPIO arrangement (program + preview per channel).

Setup — DB15 models (example: V-800HD)

The V-800HD provides tally on a D-Sub 15-pin TALLY connector, with the lamp state following channel selection (program and preview per channel). Connect the **TI-CBL-OC-ROL-15** cable to the TALLY connector. The **V-800HD MKII** uses the same layout.

Models that need special attention

V-40HD — PROGRAM (RED) ONLY

The V-40HD has a D-Sub 15-pin TALLY connector (open-collector, max 12V / 200mA), but the tally lamp follows the **selected program channel only** — the switcher does not output a separate preview signal. With the OC-4 you will get **red/program tally; green/preview will not illuminate**. This is a limitation of the switcher, not the interface.

V-440HD — SELECT THE TALLY TYPE AND USE TALLY HD

The V-440HD (Edirol) has two connectors, **TALLY HD** and **TALLY SD**, and can output six tally patterns (Type 1–Type 6). Connect the OC-4 cable to the **TALLY HD** connector, then choose the output pattern in the menu: **SYSTEM (13) → Tally Signal (12)**, and select the Type that routes program (and preview) to TALLY HD.

V-1600HD — ASSIGNMENTS ARE RECONFIGURABLE

The V-1600HD has three D-Sub 15-pin TALLY connectors and lets you reassign tally pin functions in the **SYSTEM** menu. Connect to the appropriate TALLY connector and confirm the program/preview assignments before going live.

Not covered by this release

V-1HD and VR-400UHD use a 9-pin (DB9) tally connector, which needs a separate TI-CBL-OC-ROL-9 cable (not included). SR-20HD, V-1SDI, V-8HD and VR-50HD have no tally output.

7 · Verifying Operation

With the switcher configured and lights connected, confirm correct behavior before going live.

Switcher action	Expected tally light
Camera taken to Program (on air)	RED on that camera's light
Camera selected on Preview / Next	GREEN on that camera's light
Mix / wipe transition in progress	Brief amber (red + green) on the sources involved
Camera not selected on any bus	Light off

MODEL-SPECIFIC BEHAVIOR

On the V-40HD only red (program) tally appears — the switcher has no preview output. On configurable models (V-160HD, V-1600HD, etc.), confirm the preview (PST) pins are assigned if green does not appear.

8 · Troubleshooting

Symptom	Check
No tally lights at all	Confirm the 5VDC adapter is connected and powered. Re-seat the DB9 cable at both ends. Verify the cable matches your switcher's tally connector (Section 6) and that the switcher's tally output is active.
Red works, but no green (preview)	On most Roland models preview (PST) is output by default; on configurable models confirm the PST pins are still assigned in the SYSTEM menu. The V-40HD is program-only and will never show green.
Only some outputs work	Swap the Ethernet cable and the tally light to isolate the fault. Confirm the camera is assigned to that tally channel on the switcher.
Wrong light illuminates	Your output-to-camera mapping does not match the switcher's tally numbering. Re-map OUT 1-4 to the correct cameras (Section 5, step 4).
A light stays on constantly	Check for a tally assignment left on a bus (aux or clean feed) on the switcher. Confirm the source is not permanently selected.
V-440HD shows no tally	Confirm the cable is on the TALLY HD connector (not TALLY SD) and that a suitable Type (1-6) is selected under SYSTEM → Tally Signal.
Tally works but channels are offset	Roland numbers tally by input; confirm OUT 1-4 map to the same input numbers used on the switcher.
Intermittent or flickering tally	Re-seat connectors and replace any suspect Ethernet cable. Keep tally runs away from high-power cabling.

9 · Specifications

Bundle SKUs (Roland)

Bundle SKU	Included cable	Switcher connector
TI-OC-ROL-25-4	TI-CBL-OC-ROL-25	DB25
TI-OC-ROL-15-4	TI-CBL-OC-ROL-15	DB15

Interface (shared across all bundles)

Input connector	DB9 female
Outputs	4 × RJ45 (standard Ethernet to Ikan tally lights)
Tally type	Open collector — program (red) & preview (green) per output
Switcher cable	36" (3 ft), DB9-to-DB25 or DB15
Power supply	5VDC 750mA, 5.5 mm barrel jack
Enclosure	ABS plastic, 105 × 78 × 40 mm (4.13" × 3.07" × 1.57")
Product weight	~1 lb
Shipping weight / size	2 lb, 7 × 7 × 7 in carton
Warranty	1-year limited
Country of origin	United States

10 · Safety & Regulatory

Safety

- Use only the supplied 5VDC power adapter. Operate indoors in a dry location within normal room-temperature conditions.
- Do not open the enclosure. There are no user-serviceable parts inside; opening it voids the warranty.
- Route Ethernet and tally cabling away from mains power and high-current runs to avoid interference.
- The open-collector output shares a common ground with the switcher. Connect the interface only to a compatible Roland tally port and to Ikan tally lights.
- Observe normal ESD precautions when handling connectors.

Regulatory

These units are configured and sold for use in the United States. CE marking is not included on this release; contact Ikan before deploying in markets that require CE conformity.

Limited warranty

The interface, cable, and power adapter are covered by a 1-year limited warranty against defects in materials and workmanship from the date of purchase. The warranty does not cover damage from misuse, unauthorized modification, or connection to incompatible equipment.

Appendix A · Roland Compatibility

Tally behavior verified against Roland published specifications and support documentation.

Connector	Models	Tally	Bundle
DB25	V-60HD, V-80HD, V-160HD, V-600UHD, VR-6HD, VR-120HD	Red + Green	TI-OC-ROL-25-4
DB15	V-440HD, V-800HD, V-800HD MKII, V-1600HD	Red + Green	TI-OC-ROL-15-4
DB15	V-40HD	Red only	TI-OC-ROL-15-4
DB9 (legacy)	V-1HD, VR-400UHD	Red + Green	Not in release
None	SR-20HD, V-1SDI, V-8HD, VR-50HD	No tally output	—

DB9 tally models require a TI-CBL-OC-ROL-9 cable, which is not part of this release. Contact Ikan if you need it.

— END OF MANUAL —