



**RDL**<sup>®</sup>  
Radio Design Labs

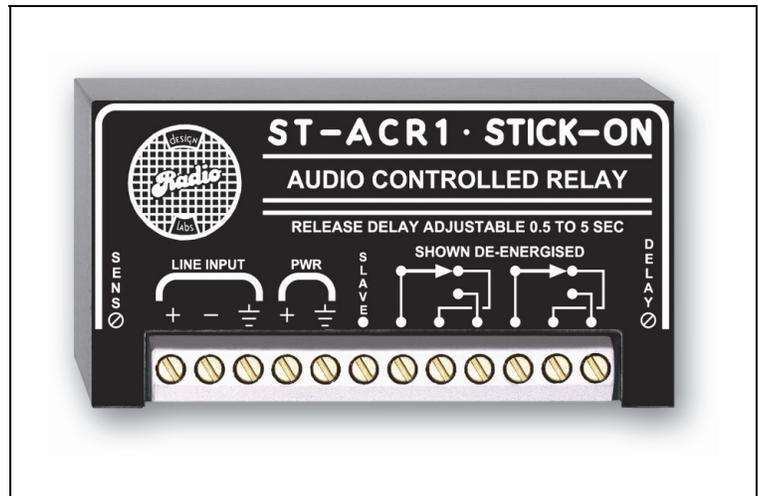
SPECIALISTS IN PRACTICAL PRECISION ENGINEERING™

## STICK-ON<sup>®</sup> SERIES

### Model ST-ACR Series

### Audio Controlled Relay

- Switching Controlled by Audio Signal
- Switching from Mic OR Line Signals
- Silence Sensing
- DPDT Switching Contacts
- Open-Collector Slave Output



The ST-ACR is part of a group of products in the STICK-ON series from Radio Design Labs. The durable adhesives provided with the ST-ACR permit permanent or removable mounting. Numerous available mounting accessories, brackets and rack-mount chassis are optionally available to facilitate any system design. STICK-ONS are designed, built and rated for continuous duty in professional A/V systems.

#### THREE MODELS TO FIT SPECIFIC APPLICATIONS:

**ST-ACR1** This module is designed to switch on *line-level* sources. Its relatively short release delay time makes it the optimum choice for voice applications.

**ST-ACR1M** This module is designed to switch on *low-level* sources, such as microphones or mic-level sources. Its relatively short release delay time makes it the optimum choice for voice applications where the source has not been pre-amped up to a line level.

**ST-ACR2** This module is designed to switch on *line-level* sources, and has a longer release delay time making it the optimum choice for most music applications. The ST-ACR2 is widely used as a *Silence Sensor*.

#### FEATURES IN COMMON TO ALL ACR PRODUCTS:

- High-impedance bridging input connects across any audio line
- Input may be connected to either balanced or unbalanced sources
- Multi-turn sensitivity adjustment permits precise threshold setting
- Multi-turn **DELAY** control adjusts relay release delay
- Band-pass filtering yields triggering on characteristic audio spectrum
- **SLAVE** terminal may also be used to trigger the control inputs on various other RDL Modules
- **SLAVE** terminal may be used with remote switch to manually override the control circuit and turn on the relay
- **SLAVE** open-collector terminal allows additional relays to be added for more contacts (RDL's ST-LCR1 or ST-LCR2)

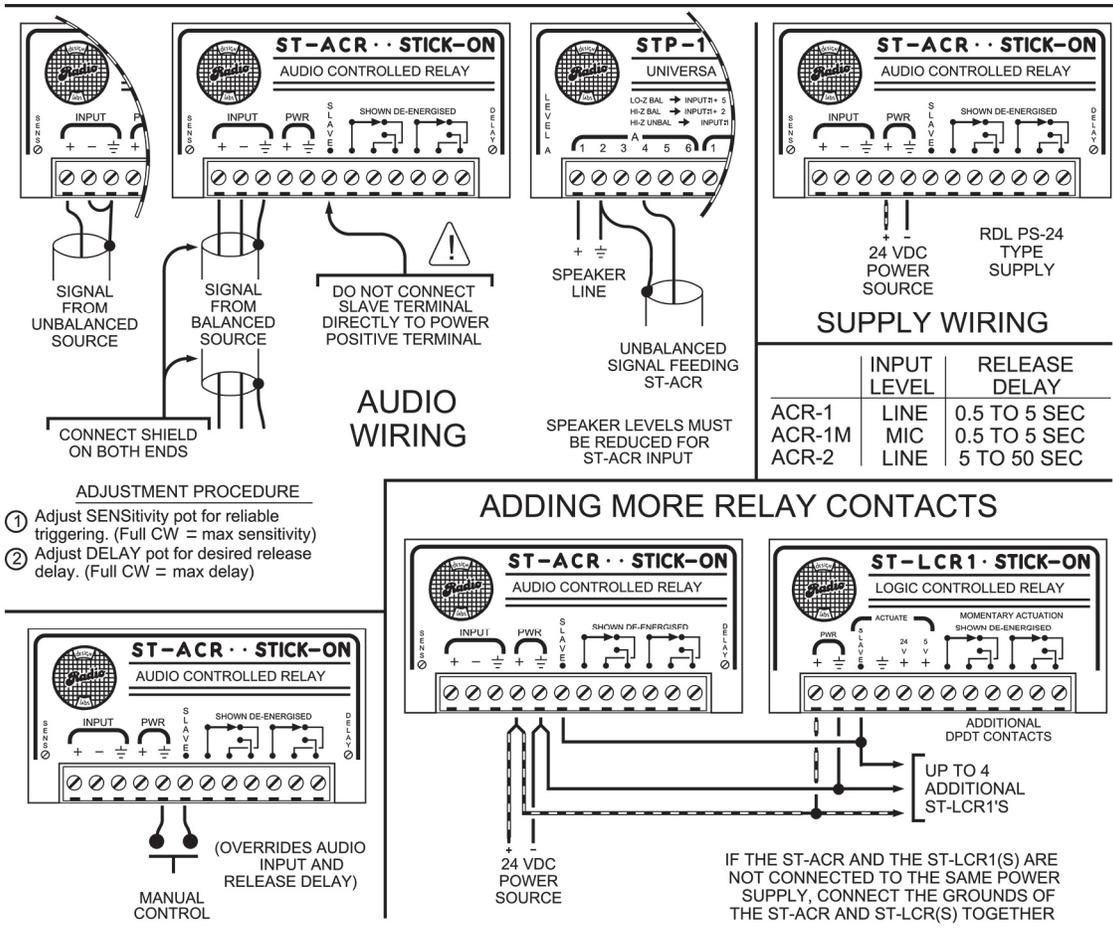
All this is available in the unbelievable compactness and convenience of the RDL STICK-ONS. Put them right where you need them, or design them in with our optional racking kits. Anytime you need DPDT contact closures controlled by ANY audio source, your simple, cost-effective solution is found in the ST-ACR product group! Uses the ST-ACR's individually, or combine them with other RDL products as part of a complete audio/video system.

## STICK-ON<sup>®</sup> SERIES

### Model ST-ACR Series Audio Controlled Relay

### Installation/Operation

**CE** Declaration of Conformity available from rdlnet.com.  
Sole EMC specifications provided on product package.  
Specifications are subject to change without notice.



#### TYPICAL PERFORMANCE

##### ST-ACR1:

Input Sensitivity: -30 dBu to 0 dBu, (adjustable, provides switching at a -20 dB threshold for signals of -10 dBu to +20 dBu)

Relay Release Delay: 0.5 to 5.0 sec. nominal (Multi-turn adjustable)

##### ST-ACR1M:

Input Sensitivity: -60 dBu to -20 dBu, (adjustable, provides switching at a -20 dB threshold for signals of -40 dBu to -10 dBu)

Relay Release Delay: 0.5 to 5.0 sec. nominal (Multi-turn adjustable)

##### ST-ACR2:

Input Sensitivity: -30 dBu to 0 dBu (adjustable, provides switching at a -20 dB threshold for signals of -10 dBu to +20 dBu)

Relay Release Delay: 5.0 to 50.0 sec. nominal (Multi-turn adjustable)

##### COMMON TO ALL ST-ACRS:

Audio Input: 10 kΩ balanced bridging  
 Input Connections: May be connected balanced or unbalanced  
 Control Output: Open-collector @ 25 mA suitable to drive indicators or slave LCR relay  
 Audio threshold LED (for setting sensitivity)  
 Relay Contacts: Double-pole-double-throw; High-reliability; 1,000,000 operations  
 Maximum Switching Power: 60W, 125 VA  
 Maximum Switching Voltage: 220 Vdc, 250 Vac  
 Maximum Switching Current: 2A  
 Retrigger delay: 250 ms  
 Activation response time: 25 ms  
 Ambient Operating Environment: 0° C to 55° C  
 Power Requirement: GROUND-REFERENCED  
 24 @ 50 mA\*  
 \* Assumes 20 mA max load at SLAVE output

Dimensions:

Height:	1.55 in.	3.94 cm
Width:	3.00 in.	7.62 cm
Depth:	0.65 in.	1.65 cm