The CircuitWerkes HC-3 autocoupler is designed to more effectively meet the varied needs of today’s modern broadcast or production facility. The HC-3’s versatility makes it the best all around choice for your telephone needs. The HC-3’s features include the following:

- Auto-answer & auto-hangup
- Remote pickup and hangup control for manual operation
- Pickup inhibit function
- Simple hybrid circuit for bidirectional audio connection
- Built in tone generator for setting hybrid null
- Bridging, balanced audio input w/gain control
- Low impedance, balanced audio output
- All connections made to screw terminals
- LED’s for incoming ring/on line, and power indications
- Momentary or latching dry relay closure at pickup
- Momentary ground pulse output at hang-up
- Ring counter lets you select number of rings before auto-answer
- Optional combination lock adds security & more.
- Defeatable beep tone at pickup
- Automatic signal limiting
- Compact sized metal case mounts to wall or table
- Inexpensive, optional, single or dual Rack mount available
- Two year parts and labor warranty standard

The HC-3’s automatic features make it ideal for a variety of telephone tasks such as listen lines, concert lines & remote broadcasting. The dry relay contacts provide an interface to virtually every type of external device including all types of cart machines. The remote ring thru input can be interfaced to either busy a line or prevent the HC-3 from picking up the line until you are ready.

The HC-3’s remote control features make it useful where the coupler must be mounted out of convenient reach of the personality or user. Additionally, the HC-3 may be easily controlled from multiple locations.

The HC-3 features a simple active hybrid circuit that separates incoming and outgoing telephone audio. The unit has a bridging, balanced audio input with a send level control and a low impedance balanced output.

For applications that require security, an optional combination lock is available. When installed, the caller must enter an owner settable, password. Once the password is entered, a second internal DPDT relay latches for the remainder of the call. If the caller does not enter the correct code, the ComboLok will force the HC-3 to drop the call after three attempts. The ComboLok is priced at an affordable $99.00.

The HC-3 can be set to beep each time it picks up the line. When the optional ComboLok is installed the unit will beep twice when it first answers, then once more when the correct combination is entered.

The CP-1 option can allow the HC-3 to be used on phone systems & PBXs that do not provide normal end of call battery reversal. The CP-1 listens for dial tone or busy signals and forces the coupler to hang up whenever it hears either. The CP-1 is priced at $99.00

With all of its features, the HC-3 is truly the best coupler available today.
Application Notes for the CircuitWerkes HC-3 Autocoupler

The HC-3 answers the line after a selectable number of rings (set at two from the factory) and couples the line to your connected equipment. The unit can also be controlled manually with back panel controls and indicators or by remote control via its screw connector on the back panel. We include a power supply and telco cord for the unit at no additional cost.

The terminals include all of the controls as well as ground-sink outputs for online/ring indication and the hang-up ground sink. Dry relay contacts which can be either momentary or latching for the duration of the call, as set by an internal jumper are also brought out to the terminals.

The HC-3 contains a simple hybrid and can be used bidirectionally, to both send and receive audio from a phone line, however the built in hybrid is not intended to replace more elaborate commercial hybrids.

Options for the HC-3 include the CP-1 and ComboLok:

The CP-1 is a call progress decoder for PBXs and telephone systems that do not supply the typical end of call battery reversal. The CP-1 is a daughter board that listens for either dial-tone or busy and forces the HC-3 to hang up.

The ComboLok is an option that gives you the ability to add programmable password security to your coupler. The caller must enter your password within 15 seconds, or the coupler will hang up. When entered correctly, the coupler stays on line and a second set of DPDT relay contacts close for the duration of the call.

Here’s what some users are doing with their HC-3’s:

Listen line.

Concert/information line. Can automatically start any cart deck and be set to ignore incoming calls while the cart is being recued.

Used at remote broadcast locations (like a far-away ball-game where talent can’t hear the station) so that station can re-establish the call if it is accidentally disconnected.

Closeup view of the HC-3’s connections and brief description of some of its primary controls.

The complete tech manual can be downloaded from the support section of our website.