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**INSTALLATION INSTRUCTIONS
DRY CONTACT INTERFACE
DCI-24-24**

Use this product according to this instruction manual. Please keep this instruction manual for future reference.

GENERAL:

Wheelock's Dry Contact Interface (DCI-24-24) is a handy interface for powering telephone bells, chimes, horns, strobes and other extension alerts for electronic key systems. The wall-mountable unit is a quick and convenient way to provide power for up to 5 signals. This capability can be doubled by simply using one DCI to actuate another.

The unit is attractively packaged for wall mounting and comes with a six foot power cord to reach a 115 VAC receptacle. Two wires are directly connected from the dry contact closure of the key system unit (KSU) to the DCI input terminals. An extra input terminal is provided on the DCI so it can also be activated by 24VDC if available at the KSU or at an individual telephone station set. One pair of wires is run from the DCI output terminals to the alerts, through modular telephone terminal blocks.

NOTE: All **CAUTIONS** and **WARNINGS** are identified by the symbol ⚠ All warnings are printed in bold capital letters.

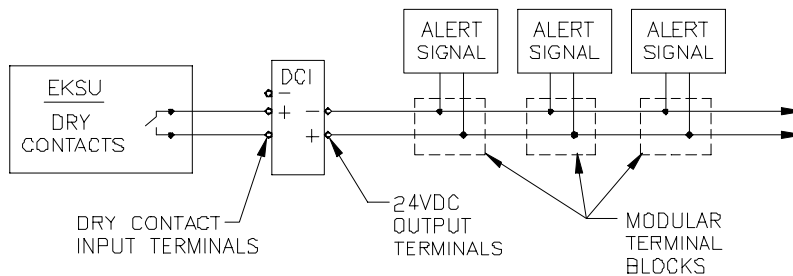
⚠ WARNING: PLEASE READ THESE INSTRUCTIONS CAREFULLY BEFORE USING THIS PRODUCT. FAILURE TO COMPLY WITH ANY OF THE FOLLOWING INSTRUCTIONS, CAUTIONS AND WARNINGS COULD RESULT IN IMPROPER APPLICATION, INSTALLATION AND/OR OPERATION OF THESE PRODUCTS IN AN EMERGENCY SITUATION, WHICH COULD RESULT IN PROPERTY DAMAGE AND SERIOUS INJURY OR DEATH TO YOU AND/OR OTHERS.

INSTALLATION INFORMATION:

The various circuit configurations that the DCI could be used in are shown in Figures 1, 2 or 3.

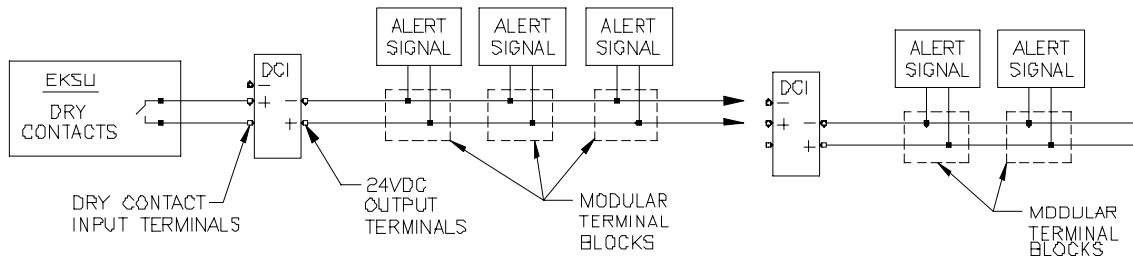
Connect the DCI Dry Contact closure provided by electronic key system control unit or telephone set to drive up to 5 alert signals (see rating chart for alerts) as shown in Figure 1.

Figure 1.



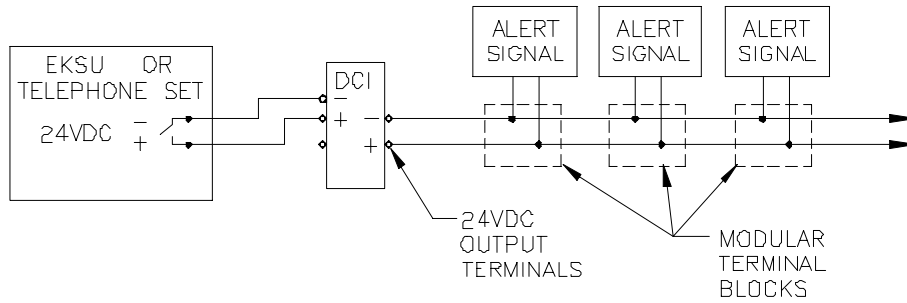
Connect more than one DCI to drive multiple alert signals (the 24VDC output of the DCI is wired to the 24VDC input terminals of a second DCI (see rating chart for alerts) as shown in Figure 2.

Figure 2.



Connect the DCI to 24VDC provided by electronic key system control unit or telephone set to drive up to 5 alert signals (see rating chart for alerts) as shown in Figure 3.

Figure 3.



MOUNTING INFORMATION:

Hang the DCI vertically on the two mounting screws supplied. Space the screws vertically on 2" centers per Figure 4, within 6 feet of a 115VAC power receptacle.

Connect all wiring as per Figures 1, 2 or 3. The DCI terminals accept #16 through #24 AWG. Strip insulation to expose 3/8" of bare wire. Press in the orange tab above the appropriate terminals with a small screwdriver and insert the bare wire into the wire hole. Release the tab to securely clamp the wire.

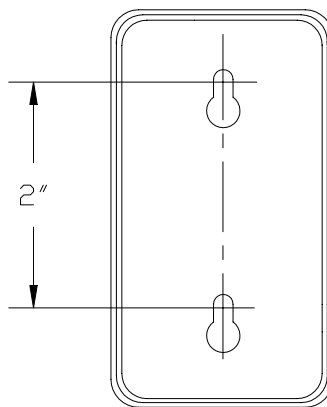
Tap the DCI enclosure several times to insure that the mercury reed relay within the DCI is cleared of excess mercury. After the signals have been all wired up, check the resistance of the line that connects to the output of the DCI to insure it is not shorted, then connect the input and output lines to the DCI. Plug in AC power cord. Check signal activation.

SPECIFICATIONS:

<i>Table 1.</i>			
Input Specifications		Output Specifications	
Dry contact closure or		Unregulated (filtered	
Input Voltage	19.2-32VDC	Nominal Output Voltage	24VDC
Input Current	.030A	Maximum Output Current	.300A
Minimum Input Pulse **	.25 seconds	Duty Cycle	33%
Fuse Rating ***	1/5A SLO	Maximum On-Time Continues	2 Minutes

** The input pulse or ring cycle on-time must be a minimum of one second if a strobe signal is used.
 *** If fuse replacement is necessary replace with San-O Fuse SD6-200 mA.

**Figure 4: Mounting Template
(Not To Scale)**



ALERT SIGNALS RATING CHART:

The following 24VDC alert signals are recommended for use with the DCI-24-24. Refer to Wheelock specification sheets for complete description of these signals.

SPECIFICATIONS:

<i>Table 2.</i>			
Alert Signal	Wheelock Model Number	Rating Per Signal	Maximum Signals Per DCI
TelChime	CH-AT2-W	60	5
TelChime	CH-BT2	60	5
TelHorn *	TH-ET5	30	10
TelHorn & Strobe *	THS-ET2	20	15
Horn	HR-AT5-W	37.5	8
Warble	WR-AT5-W	6	50
TelStrobe	PS-33A-WPW	150	2
Incandescent Lamp	VL-AT5-W	100	3
Electronic Bell	BL-AT5-W	20	15
TelBell *	TB-592	37.5	8

* For Indoor Or Outdoor Use

NOTE:

When selecting multiple alert signals the total DCI Rating should not exceed 300. For example, one TelChime (60) plus one TelHorn (30) and a TelStrobe (150) would total 240. This combination would be an acceptable load, because it does not exceed the DCI Rating of 300.

⚠ CAUTION: Check the installation instructions of the manufacturers of other equipment used in the system for any guidelines or restrictions on wiring and/or locating Notification Appliance Circuits (NAC) and notification appliances. Some system communication circuits and/or audio circuits, for example, may require special precautions to assure electrical noise immunity (e.g. audio crosstalk).

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IMPORTANT: READ SEPARATE "GENERAL INFORMATION" SHEET FOR INFORMATION ON THE PLACEMENT, LIMITATIONS, INSTALLATION, FINAL CHECKOUT, AND PERIODIC TESTING OF NOTIFICATION APPLIANCES.

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