SIMPLWINDOWS NAME:	Clipsal Single Relay Zone Control			
CATEGORY:	Lighting			
VERSION:	1.0			
SUMMARY:	Controls a single relay zone of Clipsal lighting.			
GENERAL NOTES:	A Clipsal lighting system is divided into applications. You must define which application is being controlled using the APPLICATION parameter on the module. This parameter is a 2 digit hex number with no suffix. For example, for application 56 (decimal), use 38. For application 2, use 02.			
	In a Clipsal lighting system, multiple channels on multiple modules can be set to have a common "group" number. All channels with the same group number will behave as if they are the same zone. This module allows a single group number to turned on or off. It also provides an analog output which can be used with Clipsal preset and status modules. The group number must be entered as a parameter in the module, (GROUP). It is entered as a 2 digit hex number with no suffix. For example, for group 1, enter 01. For group 12, enter OB. For group 20, enter 14.			
	This module will also track any activity that occurs on the defined group. So if the group state is changed from a Clipsal keypad, (instead of a Crestron panel), the Crestron system will track that activity, and update its feedback as appropriate. Correct tracking should occur provided that the fade time for the group being adjusted is 0 seconds (as it is a non-dimming zone). Fade times other than 0 seconds are not supported.			
	Although this module will track any activity on the Clipsal system, once the Crestron system is running, it cannot poll the Clipsal system for the current status. Typically this would only need to be done on startup of the Crestron system. The module CLIPSTA can be used for this purpose.			
	Commands cannot be sent from this module directly to the Clipsal system. They must first pass through the module CLIPPRO. This module will format time the commands to be sent, as per the requirements of the Clipsal system. In addition, commands cannot be routed directly from the Clipsal system to this module. They must first pass through the CLIPPRO module also.			
	Note that these modules require the use of Simpl+ modules (which are embedded inside of the modules). Therefore these modules can only be used with generation CNX systems.			
CRESTRON HARDWARE REQUIRED:	CNXCOM, ST-COM			
	The port should be set as follows:			
	Baud Rate - 9600 Parity - None Data Bits - 8 Stop Bits - 1			
VENDOR FIRMWARE:	3.x3			
VENDOR SETUP:	A Clipsal PC Interface module must be used with firmware version 3.x3 or later installed. Also, the SETUP-CLIPSAL input on the CLIPPRO module must be			

CONTROL:

ON	D	Pulse to set the level to full on
OFF	D	Pulse to set the level to full off
FROM-CLIPSAL-PROC	S	Serial signal to be routed from the CLIPPRO module
APPLICATION	Ρ	Specifies which application the selected group is on. Should be a 2 digit hex number with no suffix
GROUP	Ρ	Specifies which group is to be adjusted. Should be a 2 digit hex number with no suffix.

FEEDBACK:

LEVEL	A	Analog signal representing the current level of the zone. Will typically be 0% or 100%. Can be used with preset and status modules to provide feedback updates
ON-FB	D	Indicates the specified zone is on
OFF-FB	D	Indicates the specified zone is off
TO-CLIPSAL-PROC	S	Serial signal to be routed to the CLIPPRO module

OPS USED FOR TESTING:	5.09.07x
COMPILER USED FOR TESTING:	SimplWindows Version 1.30.01
SAMPLE PROGRAM:	CLIPTSTE
REVISION HISTORY:	None