

Module Information:

Name: RBI Single Zone Control v5b

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Summary: *This module requires one instance of the RBI Single Zone Control Initialize Function v5b. The Zone Helper module reads in an XML file stored on the processor to setup the configuration of all of the lighting zones. This file will be read in automatically on a program reset. Some settings can only be edited from the XML file.*

Inputs/Outputs/Parameters:

Inputs:

lvl_in	True feedback of the current analog value of the zone. This must be defined in order for this module to work. This value cannot be the same signal as the lvl_fb output of the module.
[keypad_on]	Optional signal that can be used to tie a friendly zone on signal name to a keypad.
[keypad_off]	Optional signal that can be used to tie a friendly zone off signal name to a keypad.
[keypad_on/off]	Optional signal that can be used to tie a friendly zone toggle signal name to a keypad.
[keypad_raise]	Optional signal that can be used to tie a friendly zone raise signal name to a keypad.
[keypad_lower]	Optional signal that can be used to tie a friendly zone lower signal name to a keypad.
[relay_on_fb]	For a switched zone only, this should be tied to the relay on feedback. This signal will be used for preset setting.
zone_on	Pulse to turn this lighting zone on.
zone_off	Pulse to turn this lighting zone off.
zone_on/off	Pulse to toggle this lighting zone on or off.
zone_raise	Pulse to raise this zone.
zone_lower	Pulse to lower this zone.
room_raise_all	This signal should be tied to the raise all signal for the room where this zone is located. When pulsed, it will raise all zones at once. This signal will not raise this zone if it is currently off. To raise from off, set raise from off to true in the XML file. <raise_from_off>1</raise_from_off>
room_lower_all	This signal should be tied to the lower all signal for the room where this zone is located. When pulsed, it will lower all zones at once.

[find_me]	When latched high, this will toggle lvl_out on and off so that a zone can be physically located by looking for flashing lights.
[fusion_offline_fb]	If using Fusion, this should be tied to the offline feedback device extender of the Fusion EISC.
[fusion_lvl_in]	If using Fusion, this should be tied to the level set signal on the Fusion EISC. This signal is buffered so that the lights won't shut off when the EISC connects.
[save_on_level]	Pulse to save the current level as the on level when zone_on or [keypad_on] is pulsed.
[save_off_level]	Pulse to save the current level as the off level when zone_off or [keypad_off] is pulsed.

Outputs:

lvl_out	The analog output used for setting lighting levels.
[keypad_on_fb]	Optional signal that can be used to tie a friendly zone on feedback name to a keypad.
[keypad_off_fb]	Optional signal that can be used to tie a friendly zone off feedback name to a keypad.
[keypad_raise/lower_fb]	Optional signal that indicates that the zone is currently being ramped.
[relay_off_fb]	For switched zones only, this indicates that the true feedback of the relay is currently off.
[zone_on_pulse]	For switched zones, this should be tied to the relay on input of the panel. This will fire if lvl_in is $\geq 1d$.
[zone_off_pulse]	For switched zones, this should be tied to the relay off input of the panel. This will fire if lvl_in is $< 1d$.
[dali_raise]	For DALI zones, this should be tied to the group raise input of the DALI controller.
[dali_lower]	For DALI zones, this should be tied to the group lower input of the DALI controller.
zone_name\$	The friendly name of the zone, for use on the GUI.
Lvl_fb	The current level of the zone, for use on the GUI. This signal should not be the same as lvl_in .
zone_on_fb	Indicates that lvl_in is $>$ the off level of this zone.
zone_off_fb	Indicates that lvl_in is \leq the off level of this zone.

dimmable_fb	Indicates that this zone is dimmable.
zone_used_fb	Indicates that this zone actually exists.
rgb_fb	Indicates that this is a color-changing, RGB zone.
harvested_fb	Indicates that this is a daylight harvested zone.
[harvest_enable_fb]	Indicates that daylight harvesting for this zone is enabled.
[harvest_disable_fb]	Indicates that daylight harvesting for this zone is disabled.
[dali_fb]	Indicates that this zone is DALI.
[raise_from_off_fb]	Indicates that this zone will raise from off when raising all zones in the room.
[ramping_fb]	Indicates that this zone is currently raising or lowering.
[slew_rate]	Indicates the time that it will take for this zone to turn on or off.
[ramp_time]	Indicates the time that it will take for this zone to raise all the way on, or lower all the way off.
zone_not_initialized_fb	This signal will oscillate if there is an error reading the XML file from the Single Zone Control Initialize Function v5b. It will also oscillate if this zone is not included in the XML file.
zone_initialized_fb	This will latch high if the room is found in the XML file when it is initialized by the Single Zone Control Initialize Function v5b.
[wattage]	Indicates the calculated wattage of this zone.
[fusion_lvl_fb]	If using Fusion, this should be tied to the level feedback signal on the Fusion EISC. This signal is sampled in order to not send too many values to Fusion at once.
[on_level_saved]	Indicates that the current zone level has been saved as its on level.
[off_level_saved]	Indicates that the current zone level has been saved as its off level.

Parameters:

zone_id	The ID of this zone. It needs to match xx in <zone zoneID="xx"> in the XML file.
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