Using Ontrol DMX Driver on the R-ION

RS485
(port-2)

DMX
Decoder

DMX
Decoder

Lamp

Lamp

Ontrol DMX Kit

DMX Network in typical application
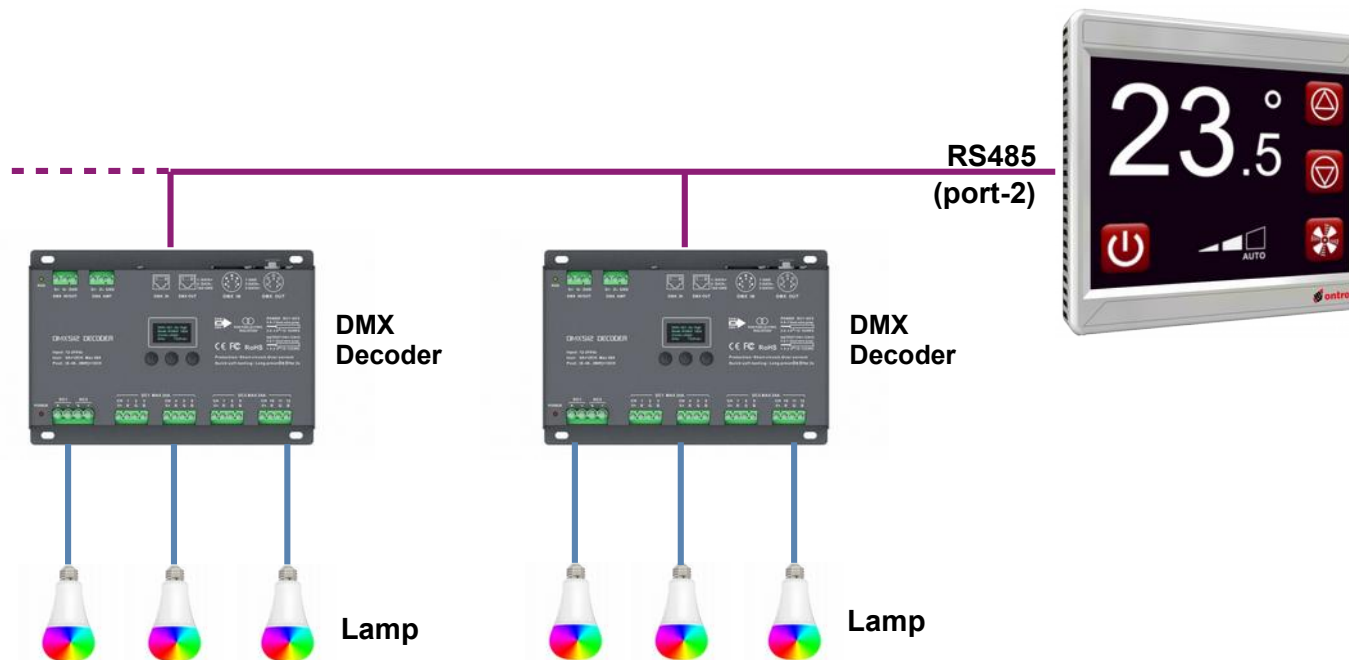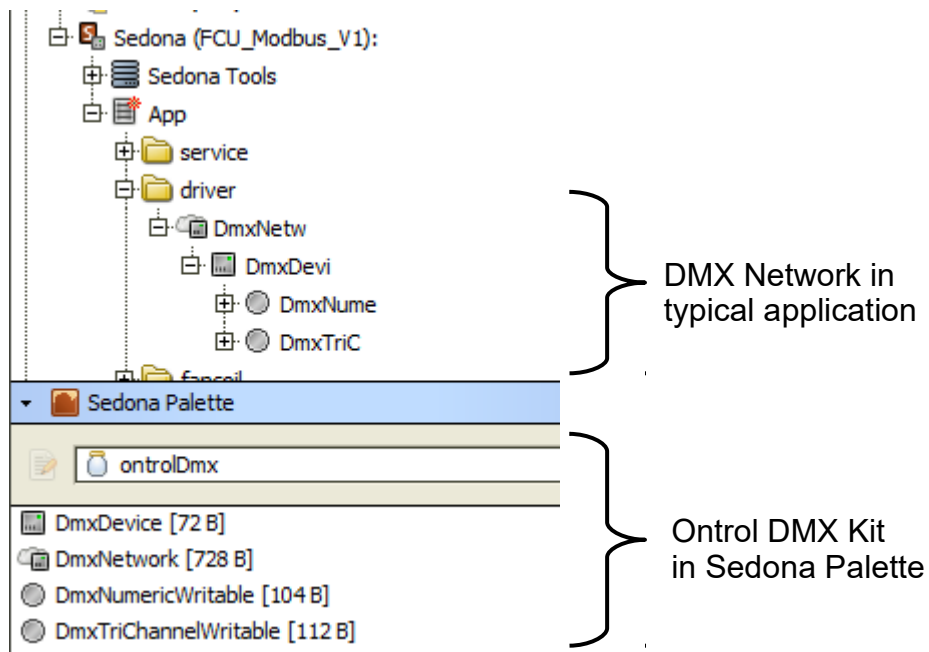
Ontrol DMX Kit in Sedona Palette

OBSERVE HIERARCHY

DmxNetwork can reside anywhere but,

- DmxDevices must go under DmxNetwork

- Client points must go under a DmxDevice

DMX Network Configuration

DmxNetw (ontrolDmx::DmxNetwork)

Meta	Group [1] »	
Status	OK	
Enable	true ▾	
Ping Period	300	s [30 - 65535]
Slow Rate	30	s [30 - 255]
Normal Rate	5	s [5 - 255]
Fast Rate	1	s [1 - 255]
Response Timeout	200	ms [50 - 3000]
Max Retries	1	[0 - 10]
Max Write Time	300	s [0 - 65535]
Min Write Time	500	ms [0 - 65535]
Max Read Fails To Mark Device Down	3	[1 - 255]
Fix Packet Size512	false ▾	
Port Number	2 [0 - 255]	

Enable
To enable or disable DMX communication

Max Write Time
Driver will repeat writes to client points with this frequency even if the value has not changed

Min Write Time
Driver will not write to an individual client point more frequently then this setting

No function in DMX driver

No function in DMX driver

Port Number
Typically port 2 for the R-ION

Fix Packet Size512
If true, the transmitted messages will always contain values for all 512 DMX addresses. If false, shorter messages may be transmitted. (Some DMX devices ignore shorter messages that don't contain all 512 values)
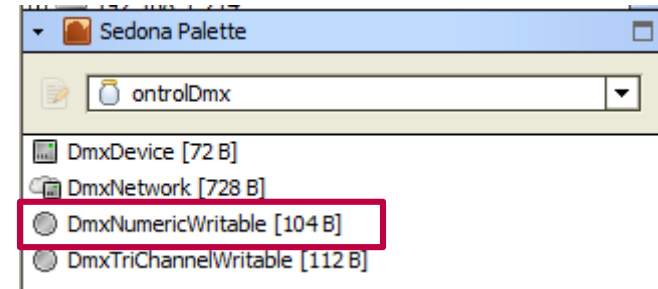
DMX Device Configuration

Channel Offset
Base channel address for points on this device. See following pages for explanation

DmxNumericWritable

This point type is used to drive a single dimmer channel controlling brightness between 0...100%

Channel
Set channel address here. Please note that this works in combination with the channelOffset property of the parent device. Commands from this point will be sent to address:

Point.channel + Device.channelOffset

In
0...100% value to be sent to this channel

DmxTriChannelWritable

This point type is typically used to adjust color on three-channel RGB drivers.

Channel
Set starting channel address here. Please note that

* 3 consecutive channels will be used by this component
* This setting works in combination with the channelOffset property of the parent device.

Commands from this point will be sent to 3 consecutive addresses starting with:
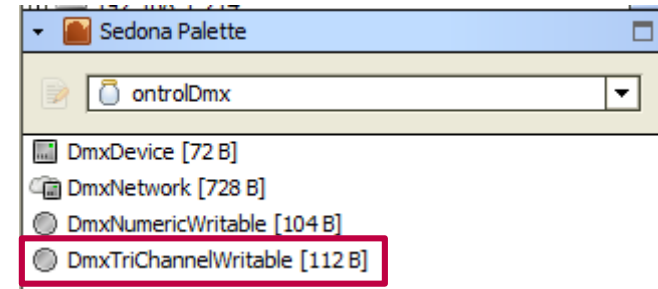
Point.channel + Device.channelOffset

In1, In2, In3
0...100% control values to be sent to red, green and blue channels of DMX driver

Channel Addressing Example

DMX driver with 4x RGB light outputs

LED Lamps

Lamp 1	Lamp 2	Lamp 3	Lamp 4
R=5	R=8	R=11	R=14
G=6	G=9	G=12	G=15
B=7	B=10	B=13	B=16

Channel addresses
(determined by DIP switch setting on DMX device)

DmxDevi (ontrolDmx::DmxDevice)

☐ ⚪ Meta	Group [1] ≫	
☐ ⚪ Fault	false	
☐ ⚪ Status	0	
☐ ⚪ Enable	true ▾	
☐ ⚪ Channel Offset	4	[0 - 95]

DmxTri1   ontrolDmx::DmxTriChannelWritable [DmxTriC:16]

☐ ⚪ Meta	Group [1] ≫	
☐ ⚪ Fault	false	
☐ ⚪ Status	0	
☐ ⚪ Enable	true ▾	
☐ ⚪ Poll Frequency	Normal ▾	
☐ ⚪ Channel	1	[1 - 96]
☐ ⚪ In1	0.00	[0.00 - 100.00]
☐ ⚪ In2	0.00	[0.00 - 100.00]
☐ ⚪ In3	0.00	[0.00 - 100.00]

DmxTri2   ontrolDmx::DmxTriChannelWritable [DmxTri1:75]

☐ ⚪ Meta	Group [1] ≫	
☐ ⚪ Fault	false	
☐ ⚪ Status	0	
☐ ⚪ Enable	true ▾	
☐ ⚪ Poll Frequency	Normal ▾	
☐ ⚪ Channel	4	[1 - 96]
☐ ⚪ In1	0.00	[0.00 - 100.00]
☐ ⚪ In2	0.00	[0.00 - 100.00]
☐ ⚪ In3	0.00	[0.00 - 100.00]
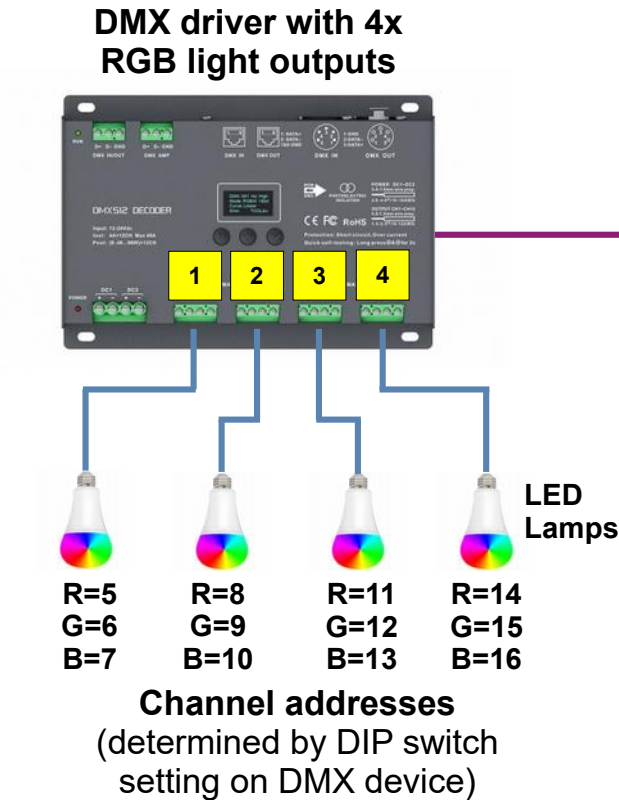
DmxTri3   ontrolDmx::DmxTriChannelWritable [DmxTri2:76]

☐ ⚪ Meta	Group [1] ≫	
☐ ⚪ Fault	false	
☐ ⚪ Status	0	
☐ ⚪ Enable	true ▾	
☐ ⚪ Poll Frequency	Normal ▾	
☐ ⚪ Channel	7	[1 - 96]
☐ ⚪ In1	0.00	[0.00 - 100.00]
☐ ⚪ In2	0.00	[0.00 - 100.00]
☐ ⚪ In3	0.00	[0.00 - 100.00]

DmxTri4   ontrolDmx::DmxTriChannelWritable [DmxTri3:77]

☐ ⚪ Meta	Group [1] ≫	
☐ ⚪ Fault	false	
☐ ⚪ Status	0	
☐ ⚪ Enable	true ▾	
☐ ⚪ Poll Frequency	Normal ▾	
☐ ⚪ Channel	10	[1 - 96]
☐ ⚪ In1	0.00	[0.00 - 100.00]
☐ ⚪ In2	0.00	[0.00 - 100.00]
☐ ⚪ In3	0.00	[0.00 - 100.00]