Quick Start Manual MANUAL-RDM (Rev A)



ENTTEC RDM USB PRO

RDM USB Pro



Box Contents

- RDM USB PRO (pn: 70530)
- USB Cable (Part No. 79110)
- This user manual
- CD including RDM Controller (pn:79106)

Features

- Full 512 DMX channel universe of input or output
- Fully compliant with USITT DMX512-A
- RDM enabled (ANSI E1.20 compliant)
- Fully compatible with ENTTEC RDM Controller and RDM Sniffer applications. (Windows only)
- Adjustable Frame Rates and empty frames to accommodate non-standard equipment
- USB 2.0 Support on Windows PC and Mac OSX
- 1500 V full isolation (data & power lines to protect your computer from surges)
- Drivers for Windows, OSX and Linux (drivers released and maintained by FTDI)
- Output refresh rate configurable from 1 to 40 Fps (Frames per second)
- Compatible with various open-source and professional lighting control programs (DMX)



Safety

- Do not expose the RDM USB PRO to rain or moisture, doing this will void the warranty
- Do not remove the cover, there are no serviceable parts inside
- This unit is intended for indoor use only
- Wherever possible, use with a DMX Splitter for safety and better reliability with DMX cables.

Basic Setup

• Install and configure the Driver software on your Windows[™], Linux[™]or Mac[™] computer.

Methods can vary between Operating systems, but the end result is the same: once installed correctly, the drivers will allow software to communicate with the RDM USB PRO.

- Connect the RDM USB PRO to your computer (usb) and the DMX512 control network (DMX cable).
- Load the RDM software of your choice onto the computer. RDM USB PRO is shipped to be ready to use with RDM Sniffer.
- For changing firmware on the RDM USB PRO, install and run PRO-Manager.



for more information visit: www.enttec.com/rdm

LED Status

The RDM USB PRO comes with a green LED indicator located on the left of the usb port. It behaves as following:



- Blinks once on usb connection: signifies that the 1. RDM USB PRO is powered on and ready. After blinking once, it will remain off, until DMX/RDM is sent or received.
- 2. Blinks continuously: signifies DMX/RDM is being sent or received by the RDM USB PRO.
- 3. Stays on always (no blinking): signifies error mode, RDM USB PRO needs to be restored
- 4. Stays off always: normal mode, waiting for software to instruct it to perform DMX operation

DMX Connector pin out

5pin DMX OUT/ DMX IN:

- Pin 1: Ground
- Pin 2: Data -
- Pin 3: Data +
- Pin 4: NC
- Pin 5: NC

Any suitable 3 to 5pin DMX adaptor can be used to connect to 3pin DMX cables or fixtures. Please note the pinout, before connecting to any non-standard DMX connector.

Install Drivers

RDM USB PRO is supported by FTDI drivers for the following **Operating Systems:**

- Windows 8, Windows7, Windows XP, Windows Server 2003, Windows Vista, Windows Server 2008, Windows Server 2008 R2. (32 bit and 64 bit versions)
- Mac OS X (Mac OS X 10.4 or later)
- Linux Raspberry Pi also supported •

To proceed, you need the driver setup file, which is available from :

- the CD which came in the package, or
- download PRO-Manager (includes the driver setup) from the ENTTEC website: enttec.com/dmxubspro
- for latest drivers and OS support, please visit ftdi website: ftdichip.com/Drivers/D2XX.htm

Setting up on Windows 🏄



Execute the setup file and let the drivers install on your Windows machine. If using PRO-Manager setup, click Yes when prompted to install FTDI Drivers

Click on Extract, and follow the setup procedure by clicking Next. It will go through the drivers install process and copy the needed files.

Once done it will show the completion screen, highlighting that the drivers have been installed correctly

		Completing the Device Driver Installation Wizard					
	The device driver installation wi software for your hardware devi the software you currently have	ces because it was not better than					
b enc							
	Driver Name	Status					

In most cases the USB port you plug the RDM USB PRO into will automatically fall into an acceptable range with respect to the other elements of your computer's communications ports, but if you are having problems or conflicts between the ports, here is what you can do to change the COM port.



for more information visit: www.enttec.com/rdm

Before making any changes. it is advisable to keep a record of which serial port has been used in each attempt to configure the hardware and drivers. That way you will be able to retrace your steps should you decide to go back and try something again but with different settings elsewhere.

Device Manager

Open Device Manager on your Windows machine. (*Control Panel* → *Device Manager*)

Expand the "*Ports*" section, and identify the RDM USB PRO, which usually is "*USB Serial Port*"



Right click on it and select *Properties*. Under "*Port Settings*", click on "*Advanced*", and you can then change the COM Port No. under this screen:

COM Port Number:	38	•	ОК
USB Transfer Sizes			Cancel
Select lower settings to correct per	formance problems at lov	v baud rates.	Defaults
Select higher settings for faster pe	rformance.		Reignie
Receive (Bytes):	4096 🔹		
Transmit (Bytes):	4096 💌		
BM Options		Miscellaneous Options	
Select lower settings to correct res	ponse problems.	Serial Enumerator	
Latency Timer (msec):	16 👻	Serial Printer	E
		Cancel If Power Off	E
Timeouts		Event On Surprise Removal	E
Minimum Read Timeout (msec):	0 -	Set RTS On Close	E
Minimum Write Timeout (msec):		Disable Modem Ctrl At Startup	1

Setting up on Mac



Download and install PRO-MANAGER on your Mac (OSX 10.6 onwards). The "D2XX" drivers are copied by PRO-MANAGER and made ready for use.

In some cases, there might be a conflict with other drivers on your Mac, to resolve such conflicts you will need to disable "Serial drivers" on your Mac.

Follow detailed instructions on how to do this, using FAQ/Support links on the ENTTEC RDM USB PRO webpage: <u>www.enttec.com/dmxubspro</u>

PRO-MANAGER

ENTTEC provides a free cross-platform app to configure, test and update RDM USB PRO. The App is available for Windows on the CD or you can download the latest version for Windows or Mac from the ENTTEC website <u>www.enttec.com/pro-manager</u>

- Use this App to test your RDM USB PRO, change default parameters (Refresh rates, Break Time), test DMX Send and Receive.
- This App is merely a troubleshooting tool and not Lighting Control software
- PRO-Manager runs inside a browser window, and it opens up the page by default, however you can also use this address in your browser <u>http://localhost:55555/</u>

Devices Settings DMX			MIDI
	Send DMX Receive	Standalone	MIDI
			DEVICE INFORMA
Device Serial No:	03050273		
Device Firmware:	2.4		
Device Capability:		RDM USB PRO RDM USB PRO RECEIPTION	
			FIRMWARE UP

From the PRO-Manager Home page, you can click the button (Find Devices) to search for USB-PRO's connected to your computer. Once it finds it, please select it from the selection box to talk to it.

Firmware Update

The following steps will guide you on how to update the firmware:

- Firmware 3.3 is for RDM Sniffer only (default)
- Firmware 2.4 is for RDM Controller only
- Firmware 1.44 is for DMX apps only



for more information visit: <u>www.enttec.com/rdm</u>

From the home page of PRO-Manager, select the firmware from the drop-down "Select firmware File" and Click on "Update firmware"



Once Finished, the page will automatically refresh, and device information will be updated to reflect the updated firmware.

Firmware 3.3 is needed, if RDM USB PRO is to be used with RDM Sniffer Application.

Firmware 2.4 is needed, if RDM USB PRO is to be used with RDM Controller Application.

DMX Send Test

PRO-Manager can also be used to send preset DMX patterns or test selected DMX channels by sending DMX through the RDM USB PRO.

Select the "DMX Send" page from the top-menu and from DMX Send page, select "Faders" and drag the needed Channel faders to test the DMX output.



With your fixtures connected to the DMX output of the M USB PRO, you will see the desired effect for the value of the channel you change. For example, a fixture setup with intensity on Ch10, and R,G,B on Ch 4,5,6 - when you change the values on these channels you will see the effect on your fixtures.

This can be used to test that your RDM USB PRO is working as expected.

After testing, you must close PRO-Manager, and then open any lighting control software to use RDM USB PRO.

RDM Sniffer

ENTTEC RDM Sniffer captures packets and displays them with an extensive layout to easily decode RDM Layout of the captured packet. A detailed view lists each byte captured along-with individual time-stamp. With Timing checks enabled it can allow the user to determine whether a certain device complies to ANSI E1.20.

	ptions Eilter S					Showi		1	
Start Capture		-Time opuate STO	IP Capture			< Prev 1000 Fro		t 1000 >>	
Start Time (ms)	Duration (ms)	Source ID	Destination ID	Tran Num	Res Type	Command	Parameter	Comments	
9405.312	1.636	454E02058246	FFFFFFFFFFFF	190	PORT: 01	Discovery	DISC_UNIQUE_BRAN	4845000000 1A4845000000 1B	
9453.201	1.634	454E02058246	FFFFFFFFFFF	191	PORT: 01	Discovery	DISC_UNIQUE_BRAN	4845000000 1A4845000000 1B	
9501.052	1.638	454E02058246	FFFFFFFFFFF	192	PORT: 01	Discovery	DISC_UNIQUE_BRAN	484500000018484500000019	
9503.188	1.059	N/A	N/A	N/A	N/A	RDM Collision	Bad Packet	Length: 17	
9528.975	1.624	454E02058246	FFFFFFFFFFF	193	PORT: 01	Discovery	DISC_UNIQUE_BRAN	484500000019484500000019	
9531,157		N/A		- N/A -	24 bytes	Decovery	Response		
9557.625	1.305	454E02058246	484500000019	194	Packet Lis	t Discovery	DISC_MUTE	good checksum	
9559.343	1.391	484500000019	454E02058246	194		Discovery Response	DISC_MUTE	good checksum	
9571.579	1.829	454E02058246	FFFFFFFFFFF	195	PORT: 01	Discovery	DISC_UNIQUE_BRAN	484500000018484500000018	
9599,482	1,304	454602058246	484500000018	196	PORT: 01	Decovery	Response	Gord checkanii	
9599,482	1.398	484500000018	454E02058246	196	ACK	Discovery Discovery Response	DISC_MUTE	good checksum	
9601.190	1.398	484500000018 454E02058246	454E02058246	196	ACK PORT: 01		DISC_MUTE DISC UNIQUE BRAN	good checksum 484500000010484500000017	
9613.502	1.831	454502058246	mmmmm	197	PORT: 01	Discovery	DISC_UNIQUE_BRAN	484500000010484500000017	
9640.380	1,302	454E02058246	484500000017	198	PORT: 01	Discovery	DISC MUTE	good cheoloum	
9642.126	1.302	484500000017	454E02058246	198	ACK	Discovery Discovery Response	DISC_MUTE	good checksum	
								good checksum	
9648.420	1.833	454E02058246	FFFFFFFFFF	199 200	PORT: 01 PORT: 01	Discovery	DISC_UNIQUE_BRAN	484500000004845000000F	
9695.465	1.637	454E02058246	FFFFFFFFFFF	200	PORTOI	Discovery	DISC_UNIQUE_BRAN	4845000000048450000000F	
	ck: C3 01 00								
- Trans	action Number : C	3		_					
- Port I	D / Response Typ	e:01	RDM Vie	W					
Messa	ae Count : 00								
SubD	evice : 00 00								
	and Class : 10								
Comm	din Class : 10								
C 01 24 FF FF	FF FF FF FF 4	5 4E 02 05 82 46	C3 01 00 00 00 1	10 00 01 0C	48 45 00 00	00 18 48 45 00 00 00	18 OA 78		
						-			
				F	Packet Dum	p			
				_		-			

ENTTEC Sniffer is designed to be used primarily for the capture and analysis of RDM/DMX packets. The entire process is divided into two stages:-

a) Capture of Data, and

b) Analysis of capture data into meaningful form.

Start Capture	tat Capture V Enable Real-Time Update STOP Capture <<< Prev 1000 Showing 0 Next 1000 >>										
Start Time (ms)	Duration (ms)	Source ID	Destination ID	Tran Num	Res Type	Command	Parameter	Comments			
9405.312	1.636	454E02058246	FFFFFFFFFFF	190	PORT: 01	Discovery	DISC_UNIQUE_BRAN	48450000001A48450000001B			
9453.201	1.634	454E02058246	FFFFFFFFFFF	191	PORT: 01	Discovery	DISC_UNIQUE_BRAN	48450000001A48450000001B			
9501.052	1.638	454E02058246	FFFFFFFFFFF	192	PORT: 01	Discovery	DISC_UNIQUE_BRAN	484500000018484500000019			
9503.188	1.059	N/A	N/A	N/A	N/A	RDM Collision	Bad Packet	Length: 17			
9528.975	1.624	454E02058246	FFFFFFFFFFF	193	PORT: 01	Discovery	DISC_UNIQUE_BRAN	484500000019484500000019			
9531 157	0.968	014	0114	11/4	34 hotes	Dismonto	Response	and deduce			

Press *Start Capture* button while *Enable Real Time Update* is selected, to perform both the tasks at the same time. The packet list screen will be updated as and when new packets are captured. If Real Time Update consumes too much resources, it is recommended to not use it. Alternatively a progress bar shows the packets being captured, and *Stop Capture* button allows analysis.

Capture in Progress	
Packets Captured: 1625	
	Course 1
Stop Capture and Analyze	Cancel

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Any packet that does not conform to the Timing as per ANSI E1.20 (RDM) and DMX 512/1990 is highlighted in Yellow. Double Clicking the packet displays the error message with reference to ANSI E1.20 (Pg & table) to lookup for RDM Timing.

3522.208	1.270 22.640		0518 INTERFECTION		PORT-00	Discovery DMX Data	Null Start Code
3517 972 3556.267	22.647	-	ming Error				Lode
3581.413 3583.004	1.386 22.640	454E	RDM Packe	t:Timing Error pacing: 58 u	isec		JTE Code
■ RDM Packet	k : CC 01 18			tween any other 9, Table 3-2, Lin		acket minimum (17	6 usec)
Las energies e	lock : FF FF FF ck : 2B 00 00 00		-				
E- Fourth BI	ock: 00 03 00	07 C8					ОК

Sniffer color codes for captured packets:

- RDM Packet (blue)
- RDM Discovery Response (cyan)
- RDM Collision (red)
- DMX Packet (black)
- Timing error (yellow)

RDM Controller

ENTTEC RDM Controller makes it easy and fast to communicate with compatible (ANSI E1.20) devices which act as responders over the line. The responders are connected via DMX to the USB PRO. RDM Controller connects to this USB PRO and performs RDM functions.

The interface is divided into four tabs:

- *Device Summary*. Useful information reported by the device
- DMX Patch Grid: DMX Patching via drag & drop
- Device Monitor. Sensor information & Status
 Messages
- Advanced RDM Settings: RDM Get & Set for all supported Parameters (incl. Manufacturer PIDs)

Device Summary DMX Patch Grid 🕘 Monitor Devices r D Advanced RDM Settings

First connect a RDM USB PRO to the PC using an available USB Port. Then open the Controller Application and click on Devices menu and all the connected PROS shall be listed under this menu. Click on the selected device to allow the Controller to connect to the RDM USB PRO.

RDM Controller: Device Summary

Once connected, you can click RDM Discovery to find all connected RDM Responders on-line. On activating "Discovery", the status changes to "Discovery in Progress".

Since RDM discovery could take up to a few seconds depending upon the number of RDM responders on the network, it can be canceled by the "Cancel" button if needed.

evices(PRO)				
[Full Discovery]	[Additive Discovery]	Status: Idle		
evice List			-	
	(22)		1	
	Device Summary	MX Patch Grid	Advanced RDM Settings	
788-LD+ Quad Dimmer Pack v2	Device Info			
	700 10 0 0 0	new Product	Refresh	
	788-LD+ Quad Dir	nmer Pack V2	Keitear	
ii) DMX Start: 120	RDM Protocol Version:	0100		
	Device Model ID:			
SubDevice_1	Device model 1D:	788-LD + Quad Dimmer Pack v2		
SubDevice_2	Product Category:	DIMMER_AC_INCANDESCENT		
G SubDevice_3	Software Version ID:	788-LD+ v5		
Hell RDM LED Effect	Solution resources	788-LU+ V5		
	DMX512 FootPrint:	8		
	Current DMX512 Personality:	2 - 16-bit 💌	Change	
- iii DMX Start: 56		2 · 10·0it	change	
	DMX512 Start Address:	120 · Change		
Hell RDM LED Effect	Sub Device Count:	4		
Enttec Responder 2.12		1		
UID: 454E02051859	Sensor Count:	0		
Desc: Test Equipment	Device Label:			
DMX Start: 256				
DMX Footprint: 1	Manufacturer Label:	CDS advanced technology bv, NL		
Hell RDM LED Effect	Supported Parameter Count:	10		
	Supported Parameters:			
	supported i or dilicitei bi	DEVICE_INFO, IDENTIFY_DEVICE, DMX_ SOFTWARE_VERSION_LABEL, SUPPORTE	D_PARAMETERS ,	
		STATUS_MESSAGES , DEVICE_MODEL_DE DMX_PERSONALITY , DMX_PERSONALITY	SCRIPTION, MANUFACTURER_LABEL, DESCRIPTION.	
		and another typing etcometry		

RDM Controller: DMX Patch

The DMX Patch Grid panel contains a grid displaying all possible output addresses (also referred to commonly as "DMX Channels"). This allows user to patch devices and see the results graphically. There are also several buttons assist in the patching operation and to allow on-the-fly control of the dimmers or attributes of a multi-channel fixture.

The Drag & Drop technique is available in this window, and is considered the easiest way to configure the selected device to output on the chosen DMX Channel (or to "address" it.) If you're already familiar with "drag and drop" just drop the selected device onto the Channel you want its DMX Start Address to be.

						DM	IX Pa	tch Gr	id																	
		Exp	ort list	.,,	Imp	port		Devio	e Con	trol		[Iden	tify]		Auto	Pato	h	Statu	s: IDI	E		Sa	ve Pa	itch to	All	
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27
28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49	50	51	52	53	54
55	56	57	58	59	60	61	62	63	64	65	66	67	68	69	70	71	72	73	74	75	76	77	78	79	80	81
82	83	84	85	86	87	88	89	90	91	92	93	94	95	96	97	98	99	100	101	102	103	104	105	106	107	10
109	110	111	112	113	114	115	116	117	118	119	120	121	122	123	124	125	126	127	128	129	130	131	132	133	134	13
136	137	138	139	140	141	142	143	144	145	146	147	148	149	150	151	152	153	154	155	156	157	158	159	160	161	16
163	164	165	166	167	168	169	170	171	172	173	174	175	176	177	178	179	180	181	182	183	184	185	186	187	188	18
190	191	192	193	194	195	196	197	198	199	200	201	202	203	204	205	206	207	208	209	210	211	212	213	214	215	2:
217	218	219	220	221	222	223	224	225	226	227	228	229	230	231	232	233	234	235	236	237	238	239	240	241	242	24
244	245	246	247	248	249	250	251	252	253	254	255	256	257	258	259	260	261	262	263	264	265	266	267	268	269	27
271	272	273	274	275	276	277	278	279	280	281	282	283	284	285	286	287	288	289	290	291	292	293	294	295	296	29
298	299	300	301	302	303	304	305	306	307	308	309	310	311	312	313	314	315	316	317	318	319	320	321	322	323	32
325	326	327	328	329	330	331	332	333	334	335	336	337	338	339	340	341	342	343	344	345	346	347	348	349	350	35
352	353	354	355	356	357	358	359	360	361	362	363	364	365	366	367	368	369	370	371	372	373	374	375	376	377	37
379	380	381	382	383	384	385	386	387	388	389	390	391	392	393	394	395	396	397	398	399	400	401	402	403	404	40
406	407	408	409	410	411	412	413	414	415	416	417	418	419	420	421	422	423	424	425	426	427	428	429	430	431	43
433	434	435	436	437	438	439	440	441	442	443	444	445	446	447	448	449	450	451	452	453	454	455	456	457	458	45
460	461	462	463	464	465	466	467	468	469	470	471	472	473	474	475	476	477	478	479	480	481	482	483	484	485	48
487	488	489	490	491	492	493	494	495	496	497	498	499	500	501	502	503	504	505	506	507	508	509	510	511	512	t

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for more information visit: <u>www.enttec.com/rdm</u>

The channels patched are shown in the following colors:

Patched to a device on the list. (DARK GREEN)



Vacant Cell / Not Patched yet (WHITE)

Overlapped with 2 or more devices (RED)

²⁷⁹ Patched to the currently Selected Device (LIGHT GREEN)

Overlapped And Patched to the currently Selected Device (PINK)

Auto Patch will patch all the devices shown on the list, to a series of channels starting with DMX 1. The devices will be patched consecutively based on the Sort order of their Manufacturer Label.

Overlap Confirm ×								
Patchir Contir	ng here results i nue Patching	n OVERLAP.						
<u>Y</u> es <u>N</u> o Cancel								

To save the changes made, click on the "Save Patch to All" button. Once all the devices have learned their new configurations and responded that they are ready, a prompt will appear showing the status. If anything prevented the successful patching of the entire list, a warning message will appear instead, saying "Not all devices were patched".

All Pato	hed ×
į)	SUCCESS Devices Patched Successfully
	ОК

Identify: This button toggles on/off, and when activated it forces the device to exhibit a distinctive behaviour designed by its manufacturer to help you locate it in your rig.

DMX F	ader		×
255	255	255	255
163	189	76	155
0	0	0	o 🛄
[123	2] [123] [124]	[125]

Device Control: This will open a DMX Fader control for the selected device. Changing the fader values will send live DMX level information over the network.

RDM Controller: Monitor Devices

ub_1 -	788-LD+ Quad Dim	mer Pack v2	[Identify] OEVICE	
ENSORS:			Refresh	
	Sensor 1: TEMPERATURE Min: 0 °C	Filter/Triac temp	Max: 100 °C	
	Lowest: 25 °C	Current: 25 °C	Highest: 26 °C	
essages/Inf	<u>.</u>			

This window displays all sensors reported by the device selected in Device List to the left. The Sensor display area is scrollable if there are multiple values to scan. The following information for each sensor displayed (if available):

- Sensor No.
- Sensor Name
- Min. Defined Value (with units)
- Max. Define Value (with units)
- Lowest reported Value (with units)
- Current reported Value (with units)
- Highest reported Value (with units)

Any Warning, Error or Advisory Status Messages reported by the device are listed under "Status Messages". Critical messages are displayed in red. These messages are updated by manual refreshing only.

The following information might be displayed, if supported by the device:

- DEVICE_HOURS
- LAMP_HOURS
 LAMP_STRIKES



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- LAMP_STATE
- DEVICE_POWER_CYCLE

RDM Controller: Advanced RDM

Enttec Responder 2.12	Refresh PIDs St	upported Parameters
-RDM SET Controls	DE	VICE_INFO
		ENTIFY_DEVICE
String DEFAULT	10011001	IX_START_ADDRESS
		OFTWARE_VERSION_LABEL
MANUFACTURER_LABEL		JPPORTED_PARAMETERS JEUED MESSAGE
-RDM GET Controls		ANUFACTURER LABEL
String V DEFAULT V	And the second	VICE MODEL DESCRIPTION
	KUM GET	
	4	m
	4	III
DM Controller - Log Messages	(III
6:44:17: RDM Discovery Started	<u></u>	m
6:44:17: RDM Discovery Started 6:44:17: DEBUG: 'Discovery Mute' Response Rece	ived. Device Added to List	III
6:44:17: RDM Discovery Started 6:44:17: DEBUG: 'Discovery Mute' Response Rece 6:44:23: DEBUG: 'Discovery Mute' Response Rece	ived. Device Added to List	III
6:44:17: RDM Discovery Started 6:44:17: DEBUG: Discovery Mute' Response Rece 6:44:23: DEBUG: Discovery Mute' Response Rece 6:44:24: DEBUG: Discovery Mute' Response Rece 6:44:24: DEBUG: Discovery Mute' Response Rece	ived. Device Added to List vied. Device Added to List vied. Device Added to List	
6:44:17: RDM Discovery Started 6:44:17: DEBUG: Discovery Mute' Response Rece 6:44:23: DEBUG: Discovery Mute' Response Rece 6:44:24: DEBUG: Discovery Mute' Response Rece 6:44:24: DEBUG: Discovery Mute' Response Rece 6:44:24: RDM Discovery Finished	ived. Device Added to List vied. Device Added to List vied. Device Added to List	III
6:44:17: RDM Discovery Started 6:44:17: DEBUG: 'Discovery Mute' Response Recc 6:44:23: DEBUG: 'Discovery Mute' Response Recc 6:44:24: DEBUG: 'Discovery Mute' Response Recc 6:44:24: DEBUG: 'Discovery Mute' Response Recc 6:44:24: DEBUG: 'Discovery Mute' Response Recc	ived. Device Added to List vied. Device Added to List vied. Device Added to List	III
6:44:17: RDM Discovery Started 6:44:17: DEBUG: 'Discovery Mute' Response Recc 6:44:23: DEBUG: 'Discovery Mute' Response Recc 6:44:24: DEBUG: 'Discovery Mute' Response Recc 6:44:24: DEBUG: 'Discovery Mute' Response Recc 6:44:24: PDBUG: Discovery Mute' Response Recc 6:44:24: PDBUG: National Starter Starte	ived. Device Added to List vied. Device Added to List vied. Device Added to List	
6:44:17: RDM Discovery Started 6:44:17: DEBUG: Discovery Mute? Response Recc 6:44:23: DEBUG: Discovery Mute? Response Recc 6:44:24: DEBUG: Discovery Mute? Response Recc 6:44:24: DEBUG: Discovery Mute? Response Recc 6:44:24: RDB Notewery Finished 6:44:26: DEBUG: Discovery Mute? Response Recc 6:46:26: GET Sent. Waiting for Response 6:46:36: GET Sent. Waiting for Response	wed. Device Added to List wed. Device Added to List wed. Device Added to List wed. Device Added to List	
DM Controller - Log Messages 6:44:17: RDM Discovery Started 6:44:27: DEBUG: 'Discovery Mute' Response Recc 6:44:23: DEBUG: Discovery Mute' Response Recc 6:44:24: DBEUG: 'Discovery Mute' Response Recc 6:44:24: RDM Discovery Finished 6:44:26: RDM Discovery Finished 6:44:26: RDM Carevery Finished 6:44:26: RDM Carevery Finished 6:44:26: RDM Carevery Finished 6:46:36: GET Sent. Waiting for Response 6:46:36: GET Sent. Waiting for Response	wed. Device Added to List wed. Device Added to List wed. Device Added to List wed. Device Added to List	III

This panel allows GET/SET functions for all supported Parameters as reported by the device. Since not all PIDs allow both GET and SET, and since they may or may not have data to send, the relevant controls for each device are pre-selected based on the ANSI E1.20 specification.

Once a different device is selected, the list of PIDs that can be GET or SET will change accordingly.

There is also a log window which logs all relevant RDM messages that are sent or received by the RDM Controller. The log can be used to check for appropriately formed response by the responder.

Specifications

Due to continuous improvements and innovations of all ENTTEC products, specifications and features are subject to change without notice.

Item	Value
Power Requirements	300mA supplied by USB
Weight	0.66 lbs / 0.3 Kg
Shipped weight	0.88 lbs / 0.4 Kg
Length	3.03" / 77mm
Width	2.27" / 57.5mm
Height	1.58″ / 40mm
Op Environment	0°-50°C
Connectors	1x 5-Pin Male XLR for DMX input 1x 5-Pin Female XLR for DMX output 1x USB B Male connector

Ordering Information

RDM USB PRO and related products can be ordered from our website or through your ENTTEC dealer using the following part numbers.

Part Number	Description
70530	RDM USB PRO
70029	5-pin to 3-pin DMX Adapter
79122	5-pin DMX Terminator
79126	0.5m 5-pin DMX Cable
79133	2m 5-pin DMX Cable

ENTTEC PTY LTD 17/5 Samantha Court Knoxfield Victoria 3180 Australia Tel: +61 3 9763 5755 Fax: +61 3 9763 5688 ENTTEC AMERICAS 604A Cornerstone Ct. Hillsborough NC 27278 USA Tel-Fax: (888) 454-5922 email <u>sales@enttec.com</u>

www.enttec.com