

## PRODUCT OVERVIEW

TASCAM's MD-801RmkII is TASCAM's finest professional MiniDisc recorder designed for live performance, recording studios, and broadcast applications. The MD-801RmkII provides all the amenities needed in live environments with advanced cueing functions, and a separate cue output for checking a signal without sending it to the main output. Plus, the BU-801 RAM buffer could be added for true instant start functionality. All the I/Os needed to make the connections are built in. The latest encoding scheme (ATRAC v4.5) is used for better sounding recordings on the MD-801RmkII or other units. An RS-232 port and parallel controls allow standardized controller interfaces, and two wired remotes are available.



- 3-U Rack Mountable MiniDisc Recorder
- Balanced XLR Main I/O with Fine Calibration Controls
- Unbalanced RCA Analog I/O Controllable Separate From Main Output for Use as Cue Output
- AES/EBU and SPDIF Coaxial Digital I/O
- Word Sync In/Thru Ports
- Headphone Output with Level Control
- Auto Ready, Auto Cue, Incremental Play, Call Function
- $\pm 9.9\%$  Pitch Control
- 74 min Stereo and 144 min Mono Recording Modes
- Soft Mute Feature Eliminates Clicks When Pausing & Restarting
- Complete TOC Editing for Changing Track Order
- ATRAC v4.5 Encoding Scheme Offers Top Sound Quality
- High Quality 20 bit A/D and D/A Converters
- Selectable SCMS Copy ID Modes
- Built-in Clock for Time Stamped Recordings
- PS/2 Keyboard Input for Track Naming & Remote Control
- RS-232 and Parallel Control I/O
- Optional BU-801 RAM Buffer For True Instant Start Capability
- Optional RC-8 and RC-801 Remotes Available

## APPLICATIONS

The MD-801RmkII could very well be the most advanced MiniDisc recorder ever, giving you the confidence that you'll be ready for anything.

### Advanced Live Theater - Broadcast Applications - Show Control

In live applications, there is no take two; everything needs to happen right the first time. The MD-801RmkII takes advantage of the track names available in the MiniDisc format, since "Train Station" lends a bit more information about the track than "Track 37". Auto Cue will search for the first audio in the track, so you can eliminate lag time between the time you press PLAY and the time you hear it. Auto Ready will stop at the next track ID, preventing the player from rolling right into the next track accidentally. For live applications where a sound cue disk can be assembled in show order order, the Auto Cue function will park at the start of the next cue ready for playback. Broadcast standard fader start function is available in the parallel I/O, as are other remotes and tallies.

The MD-801RmkII takes cueing functions a step further by allowing the RCA outputs to be used as a separate cue output. A set of monitor speakers could be connected to the cue output so the audio can be checked without playing through the normal outputs.

The MD-801RmkII offers a number of methods for interfacing with show control systems, and offers one of the most robust transports in the business. When the stakes are high, count on the MD-801RmkII.

### Recording Studio

MiniDisc is becoming more and more accessible, offering personal and hi-fi recorders, as well as players for the car. MiniDisc is a wonderful format for creating reference mixes for the ride home from the studio. Plus, with instant start offered with the BU-801 RAM buffer, the MD-801 becomes a powerful tool in assembly editing or sound cue drops.

## SPECIFICATIONS

### Performance Specifications:

Format:	MiniDisc digital audio system
Recording System:	Magnetic field modulation overwrite
Capacity:	74 minutes stereo; 148 minutes mono
Compression System:	ATRAC v4.5 (Adaptive Transform Acoustic Coding)
Modulation System:	EFM (Eight-to-Fourteen Modulation)
Frequency Response:	20Hz-20kHz, $\pm 0.5$ dB (playback)
Signal to Noise Ratio:	>101dB (1kHz, A-Weighted)
Dynamic Range:	>94dB (1kHz, A-Weighted)
Total Harmonic Distortion:	<0.006%
Sampling Frequency:	44.1kHz
A/D & D/A Resolution:	20 Bit
Balanced Analog Input:	XLR, +4dBu (-16dB ref), 2.2kOhms Trim offers -4dB cut to +7dB boost +24dBu maximum input
Unbalanced Analog Input:	RCA, -10dBV (-16dB ref), 8kOhms
Balanced Analog Output:	XLR, +4dBu (-16dB ref), 11 Ohms Trim offers -7dB cut to +4dB boost +24dBu maximum output
Unbalanced Analog Output:	RCA, -10dBu (-16dB ref), 220 Ohms
Digital Input and Output:	AES/EBU XLR, AES3-1992 SPDIF Coaxial, IEC60958 BNC Connectors
Word Sync In/Thru:	32kHz to 48kHz
Sample Rate Conversion Range:	50mW+50mW Max, 32 Ohms
Headphone Output:	DB25 for RC-8 or RC-801
Remote Connectors:	RS-232 Serial Port 6 pin Mini DIN keyboard port DB37 for Parallel Control & Tallies

### General Specifications:

Power Requirements:	120V AC, 60Hz (US/Canada) 230V AC, 50Hz (Europe/Gen Export) 240V AC, 50Hz (Australia)
Power Consumption:	33W
Dimensions:	482x132x353mm 19" x 5.2" x 13.9"
Weight:	8Kg, 17.6 lbs.
Optional Accessories:	RC-801 (full function wired remote) RC-8 (simple wired remote) PW-1XMD cable for title copying BU-801 RAM buffer for flash start RC-FS10/20 flash start control unit

## PARALLEL CONTROL I/O

PIN:	FUNCTION:
1	PLAY in
2	NEXT TRACK in
3	PREVIOUS TRACK in
4	READY in
5	STOP in
6	RECORD in
7	AUTO CUE in
8	FADER START in
9	AUTO READY in
10	CALL in
11	PLAY tally
12	READY tally
13	AUTO READY tally
14	STOP tally
15	RECORD tally
16	AUTO CUE tally
17	ONLINE tally
18	TIME SEARCH tally
19	- N/A -
20	END OF MESSAGE tally
21	PROGRAM tally
22	PROGRAM in
23	KEY 0 in
24	KEY 1 in
25	KEY 2 in
26	KEY 3 in
27	KEY 4 in
28	KEY 5 in
29	KEY 6 in
30	KEY 7 in
31	KEY 8 in
32	KEY 9 in
33	CLEAR in
34	ENTER in
35	DISC IN tally
36	GND
37	+5V

### Parallel Control Notes:

All command controls are labeled as "in" on the chart at left. The commands are active when brought to ground for more than 50 milliseconds or longer.

FADER START pin (8) operates as a latched function. Playback begins when the pin is brought to ground for more than 50 msec, and stops when the ground is released for more than 50 msec.

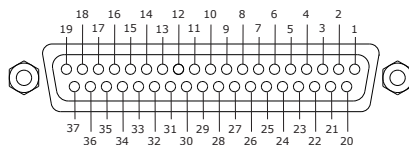
The ONLINE tally pin (17) becomes active when a play command is received from any of the following:

- The ONLINE function of the RC-801 remote
- The RC-8 remote
- Parallel or Serial Remote ports
- A PS/2 keyboard

RECORD pin (6) puts the MD-801RmkII into input monitor mode. To engage the recorder into record, RECORD (6) and PLAY (11) commands must be transmitted simultaneously. While the MD-801RmkII is in input monitor mode, the RECORD tally signal (15) will flash.

Tally outputs are open collectors, with a 20mA max load current and a 30V maximum. Take care not to overload these pins: the maximum supply current is 100mA.

REMOTE (PARALLEL)



## KEYBOARD CONTROL

A standard PS/2 compatible keyboard (typical PC keyboard) can be plugged into the back of the MD-801RmkII to offer quick editing and naming functions as listed below.

FUNCTION:		SHIFT+FUNCTION:
PREVIOUS TRACK	F1	ERASE TRACK
NEXT TRACK	F2	ERASE DISC
CALL	F3	ERASE A-B
STOP	F4	MOVE TRACK
PLAY	F5	DIVIDE TRACK
READY	F6	COMBINE TRACKS
AUTO CUE	F7	INSERT (A-B POINTS)
RECORD READY	F8	TITLE
AUTO READY	F9	PROGRAM PLAY
REPEAT	F10	DELETE PROGRAM ITEM
PLAY MODE	F11	TIME SEARCH
PITCH CONTROL	F12	FLASH START READY
SCAN FORWARD	->	- N/A -
SCAN REVERSE	<-	- N/A -

EDIT FUNCTIONS:	
MOVE CURSOR	<- and ->
UPPER/LOWER CASE	CAPS KEY
ERASE CHARACTER BEFORE CURSOR	BACK SPACE
ERASE CHARACTER AT CURSOR	DELETE
INSERT CHARACTER	INSERT
END TITLE ENTRY	ESCAPE

## ARCHITECT'S SPECIFICATIONS

The MiniDisc recorder shall be able to record to a standard audio MiniDisc in stereo for 74 minutes or mono for 144 minutes of record time.

The MiniDisc recorder shall utilize ATRAC v4.5 compression system to ensure the best sound quality and compatibility with other MiniDisc systems.

The MiniDisc recorder shall offer advanced cueing functions including Auto Cue, Auto Ready, Incremental Play, and a Call function. A jog/shuttle wheel shall assist in the location of cue points.

The MiniDisc recorder shall offer editing of the table of contents data on the MiniDisc for rearranging, deleting, combining, or splitting tracks. Additional features shall be provided for editing within a track.

The MiniDisc recorder shall have balanced XLR and unbalanced RCA analog inputs and outputs. The RCA output shall be capable of acting as an independent monitor output. Digital audio inputs and outputs shall be available in AES/EBU format on XLR

connectors, and SPDIF coaxial connectors. The SCMS codes on the SPDIF line shall be selectable between copy prohibit, one generation limit, or no copy protection at all.

The MiniDisc recorder shall be controllable from TASCAM RC-8 and RC-801 wired remote controls. A mini DIN 6-pin keyboard input shall be provided on the front panel to accept a standard PS/2 compatible keyboard. The keyboard controls shall include transport control, editing functions, and track naming. A 9-pin serial (RS-232) control shall be provided for connecting other controllers. A parallel port shall provide access to controls and tallies as well.

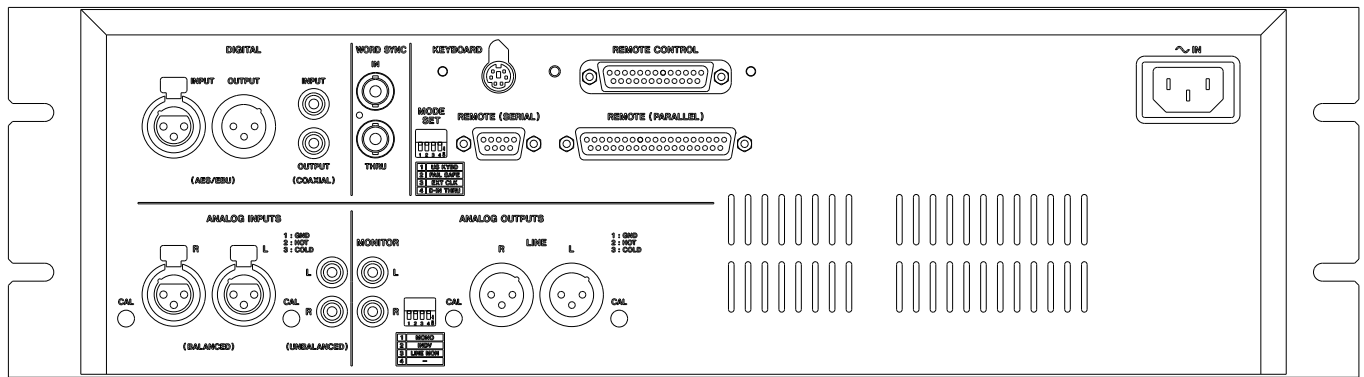
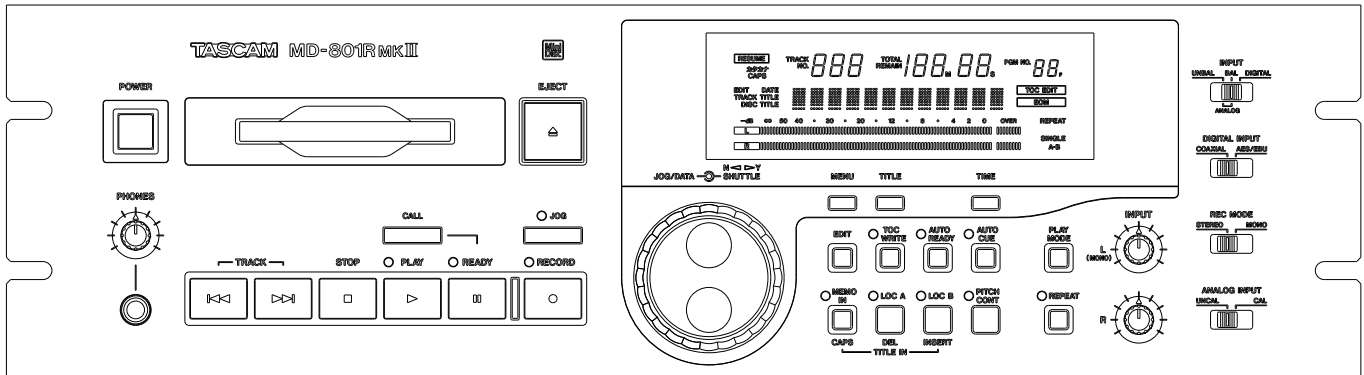
The MiniDisc recorder shall be able to mount in a standard 19" rack mount. Dimensions shall be 19" x 5.2" x 13.9" (W x H x D), taking up three standard height rack spaces.

Metric measurements: 482x132x353mm

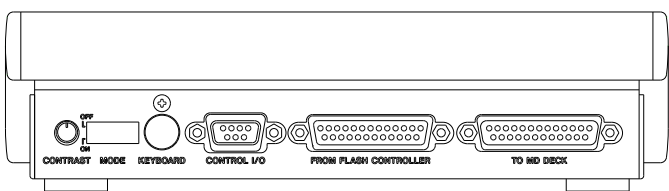
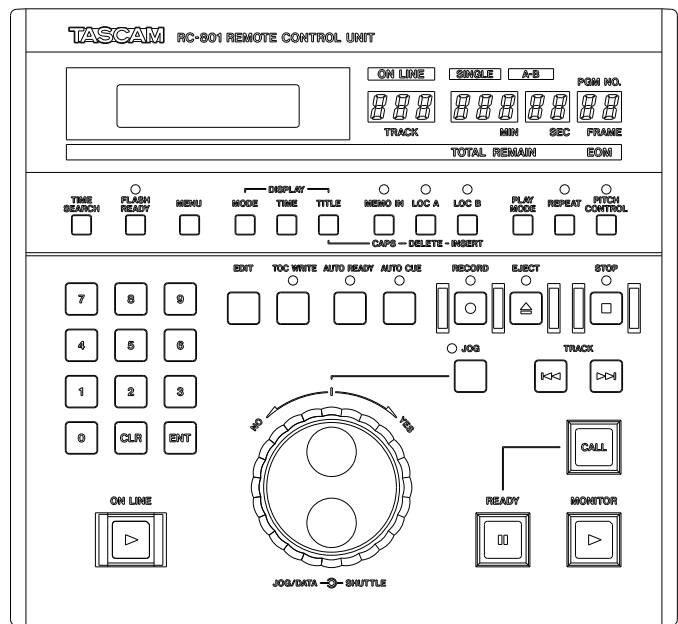
**The MiniDisc recorder shall be a TASCAM MD-801RmkII.**

NOTE: This text is available in a standard text file on TASCAM's Sound Contractor CD-ROM.

## FRONT AND BACK PANELS



## OPTIONAL REMOTES



**RC-801** Full Function Wired Remote System  
 Front panel at left,  
 back panel above

**RC-8** Basic Wired Remote at right

