



MODEL MP-1086

Multi-Purpose Recording System



The EPC Model MP-1086 is a multi-purpose recording system that serves as a continuous gray scale printer, analog tow fish interface, mass storage device, and signal processor.

Photographic quality images are produced using the direct thermal printing expertise that has made EPC the industry leader in this field. The analog tow fish interface allows users to connect commonly used side-scan sonars directly to the MP-1086, with no need for extra external components. Data can easily be logged for post processing directly to a 2.2 GB removable data storage disk.

Signal Processing? No problem. The MP-1086 implements not only the exciting features of the GSP-1086-500 Series such as Time Varied Gain (TVG) and Band Pass Filtering, but also includes the HSI-20 Heave Sensor Interface. Save time, save money. The MP-1086 is your multi-purpose recording solution.

HARDWARE

CPU Bus

16 Bit Industry Standard Architecture (ISA)

Control Panel

Sealed membrane type, software defined

Displays

Twin 2x40 LCD displays, LED backlights

POWER

Power Supply

350 Watt, auto-sensing, universal input

84-265 VAC, 50-60 Hz

Power Consumption

80 Watts non-printing

130 Watts Peak

PHYSICAL

Dimensions & Weight

17.6"W x 23.1"H x 8.9"D

55 LBS.

Media

Heat sensitive thermal paper or high grade plastic film - 23dB dynamic range

Paper Length: 150 feet

Film Length: 130 feet

Temperature (non-condensing)

0°C to 65°C - Operating

-28°C to 65°C - Storage

PRINTING

Gray Levels & Resolution

Selectable: 8, 16, 32, 64 Levels

Printhead: 2048 Pixels @ 203 DPI

Maximum Line Speeds (nominal)

@ 8 Shades: 15 ms

@ 16 Shades: 18 ms

@ 32 Shades: 26 ms

@ 64 Shades: 43 ms

Chart Speeds (Lines Per Inch)

Fixed: 75, 80, 100, 120, 150, 200, 240, 300

Variable: 1.6 kHz max clock, BNC input

1 / 1200th inch per clock

ANALOG INTERFACE

Dual Signal Input

0V to 10V SIGNAL BNC inputs

(2Kohm Input Impedance)

External Trigger Input (slave)

TTL EXT TRIG BNC with slope-sense

Internal Key Output (master)

TTL KEY OUT BNC with polarity selection

(62.5us pulse width)

Gain, Threshold, Polarity

Independent controls for each channel

Minimum printable signal 150 mV

Time Bases

1.5 MHz A/Ds with 8 Bit resolution

Scan - 5 ms to 10 secs, 1 ms resolution

Key - 5 ms to 10 secs, 1 ms resolution

Delay - 0 secs to 8 secs, 1 ms resolution

PARALLEL INTERFACE

Interconnect

25 Pin Sub D, metal shell

Data Input (Pins 2-9)

Eight Bit Centronics Compatible

2048 bytes per raster line

White = 0X00; Black = selectable

Handshake

Low Active host/STB on Pin 1

Low Active printer/ACK on Pin 10

High Active printer BUSY on Pin 11

BUSY cycles on end of line (2048 bytes)

/ACK cycles on every /STB

Burst Rate Bandwidth: Over 250 kHz

Sustained Bandwidth: Based on gray levels

COMMAND INTERFACE

QWERTY Keyboard

Jack for commands and annotation

RS-232 Serial Data Input (DCE)

9 Pin Sub 'D' for commands and GPS

ACCESSORIES

Top Cover Assembly (optional)

Custom mini keyboard

Water proof, Heavy duty keyboard (optional)

Rack mount kit (optional)

Spares kit (optional)

ENHANCED ANALOG FEATURES

Time Varied Gain

255 Logarithmic curves to choose from

Band Pass Filtering

LOW PASS:

1kHz, 1.2kHz, 2kHz, 2.4kHz, 3kHz, 4kHz,

6 kHz, 12 kHz

HIGH PASS:

83Hz, 100Hz, 166Hz, 200Hz,

250Hz, 333Hz, 500Hz, and 1kHz

TOW FISH OUTPUTS

E-type High Voltage

750Vdc short circuit proof indefinitely

E-Type Trigger Pulse

100kHz- +12V pulse duration 125us

500kHz- +12V pulse duration 250us

E-Type Compatibility

Edgetech 272T ans 272TD

E-Type Connector

Amp MS3102E20 EG&G 259, 960 & 260

K-Type High Voltage

750Vdc short circuit proof indefinitely

K-Type Trigger Pulse

12-15Vdc carrier with riding 12V pulse

Pulse duration 1ms

K-Type Compatibility

Klein 100kHz, 500kHz or dual frequency

K-Type Connector

Amp MS3102E22-19 (Klein 595)

HEAVE COMPENSATION

TSS and Seatex compatible

RS232 Input (*TSS Format 1 supported*)

DB9, 9600 baud, 8bits, no parity, 1 stop bit

Indicators

Power on, Data received, Key out

STORAGE

Capacity

2.2GB removable disk

Storage Format

.XTF

Warranty: One Year Limited Parts & Labor. Specifications subject to change.



EPC LABORATORIES INC., 42A Cherry Hill Drive, Danvers, MA 01923 USA PHONE: (978) 777-1996

FAX: (978) 777-3955 EMAIL: sales@epclabs.com WEB: <http://www.epclabs.com>