The EPM series of high voltage power supplies provides very well regulated, low ripple high voltage in a highly efficient, compact design.

The output voltage and current are controllable over the full range of operation. Voltage and current programming and monitoring signals are all 0-10Vdc where corresponds to 0 to 100% rated output. A High Voltage Inhibit/Enable signal allows for simple on/off control of the power supply.

**TYPICAL APPLICATIONS**
- Electrophoresis
- Photomultipliers
- Electron Beam
- Laboratory Applications
- Ion Source
- Electrospinning

**SPECIFICATIONS**

**Input:**
+24Vdc ±10% @ 2A

**Output:**
- 8 models from 1kV to 30kV. Each model is available in positive or negative polarity output.
- Voltage Regulation:
  - Load: 0.02% of output voltage for a full load change.
  - Line: 0.01% for ±10% change in input voltage.
- Current Regulation:
  - Load: 0.01% of output current from 0 to rated voltage.
  - Line: 0.01% of rated current over specified input range.
- Ripple:
  - 0.1% p-p of maximum rated output voltage.
- Dimensions:
  - 2.06"H x 5.63"W x 5.69"D
  - (52.32mm x 143mm x 144.53mm)
- Weight:
  - 2.2 pounds (1kg)
- Input Connector:
  - 9 pin AMP Metri-Mate. Mating connector and pins supplied.
- Output Cable:
  - 18" ±1" (457mm) of UL® listed high voltage wire.
- Voltage Stability:
  - 0.02% per 8 hours (after 1/2 hour warm-up).
- Voltage Temperature Coefficient:
  - 0.01% per °C.
- Voltage Test Point:
  - 10Vdc ±2% = maximum rated output.
- Current Test Point:
  - 10Vdc ±2% = maximum rated output.
- Remote Enable:
  - 3.4Vdc = HV ON.
  - 1.0Vdc or open = HV OFF.
- Regulatory Approvals:
  - Compliant to EEC EMC Directive (1kV to 15kV only).
  - Compliant to EEC Low Voltage Directive (1kV to 15kV only).
  - UL/CUL recognized, File E148969 (1kV to 15kV only).
### EPM SELECTION TABLE

<table>
<thead>
<tr>
<th>Maximum Rating</th>
<th>Model Number</th>
</tr>
</thead>
<tbody>
<tr>
<td>kV</td>
<td>mA</td>
</tr>
<tr>
<td>1</td>
<td>30</td>
</tr>
<tr>
<td>3</td>
<td>10</td>
</tr>
<tr>
<td>5</td>
<td>6</td>
</tr>
<tr>
<td>10</td>
<td>3</td>
</tr>
<tr>
<td>15</td>
<td>2</td>
</tr>
<tr>
<td>20</td>
<td>1.5</td>
</tr>
<tr>
<td>25</td>
<td>1.2</td>
</tr>
<tr>
<td>30</td>
<td>1</td>
</tr>
</tbody>
</table>

*Specify “P” for positive polarity or “N” for negative polarity.

### INPUT—9 PIN AMP CONNECTOR

<table>
<thead>
<tr>
<th>PIN</th>
<th>SIGNAL</th>
<th>PARAMETERS</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Power Ground</td>
<td>Power Ground</td>
</tr>
<tr>
<td>2</td>
<td>+24Vdc</td>
<td>+24Vdc @ 1.8S amps, maximum</td>
</tr>
<tr>
<td>3</td>
<td>High Voltage Enable/Inhibit</td>
<td>0Vdc = HV OFF, +5Vdc = HV ON (see manual for details)</td>
</tr>
<tr>
<td>4</td>
<td>Voltage Test Point</td>
<td>0 to 10Vdc = 0 to 100% rated output, Zout = 10Ω</td>
</tr>
<tr>
<td>5</td>
<td>Current Test Point</td>
<td>0 to 10Vdc = 0 to 100% rated output, Zout = 10Ω</td>
</tr>
<tr>
<td>6</td>
<td>Voltage Programming</td>
<td>0 to 10Vdc = 0 to 100% rated output, Zin = 10MΩ</td>
</tr>
<tr>
<td>7</td>
<td>Current Programming</td>
<td>0 to 10Vdc = 0 to 100% rated output, Zin = 10MΩ</td>
</tr>
<tr>
<td>8</td>
<td>+10Vdc Reference</td>
<td>+10Vdc @ 1mA maximum</td>
</tr>
<tr>
<td>9</td>
<td>Signal Ground</td>
<td>Signal Ground</td>
</tr>
</tbody>
</table>

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[Diagram of dimensions and views]