RF Power Plate Capacitors with Flat Rim, Class 1 Ceramic

FEATURES
• Low losses
• High reliability
• Small dimensions

APPLICATIONS
• Industrial high frequency appliances
• Medical RF equipment
• Filter, bypass, and coupling circuits

CAPACITANCE RANGE
100 pF to 1.0 nF

CAPACITANCE TOLERANCE
± 10 %

CERAMIC DIELECTRICS
• R42 (TCC - 250 ppm/K)
• R85 (TCC - 750 ppm/K)

RATED VOLTAGE
• 3.5 kVp
• 6.0 kVp
• 7.0 kVp
• 10 kVp
• 12 kVp

DIELECTRIC STRENGTH TEST
200 % of rated voltage (50 Hz)

DISSIPATION FACTOR
Max. 0.05 %
Measuring frequencies:
1 MHz (< 1 nF); 300 kHz or 100 kHz (≥ 1 nF)

INSULATION RESISTANCE
Min. 10 000 MΩ (at 25 °C)

OPERATING TEMPERATURE RANGE
-55 °C to +100 °C

QUICK REFERENCE DATA

<table>
<thead>
<tr>
<th>DESCRIPTION</th>
<th>VALUE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ceramic Class</td>
<td>1</td>
</tr>
<tr>
<td>Ceramic Dielectric</td>
<td>R42, R85 R85 R85</td>
</tr>
<tr>
<td>Type</td>
<td>FPS 60 FPS 80 FPS 110</td>
</tr>
<tr>
<td>Voltage (Vp)</td>
<td>10 000 12 000 3500 7000 6000</td>
</tr>
<tr>
<td>Min. Capacitance (pF)</td>
<td>500 100 1000 500 1000</td>
</tr>
<tr>
<td>Max. Capacitance (pF)</td>
<td>500 300 1000 500 1000</td>
</tr>
<tr>
<td>Mounting</td>
<td>Screw terminal</td>
</tr>
</tbody>
</table>

MATERIAL
Capacitor elements made from class 1 ceramic dielectric with noble metal electrodes.
Connection terminals: made from copper / brass, silver plated

FINISH
Capacitor body completely protective lacquered.

MARKING
Type designator, capacitance value and tolerance, rated peak voltage, production date code, ceramic material code, manufacturer logo

ACCESSORIES ADDED
Two screws and washers
### SAP PART NUMBER, ELECTRICAL AND DIMENSIONAL DATA

<table>
<thead>
<tr>
<th>PART NUMBER</th>
<th>CERAMIC</th>
<th>CAP. VALUE (pF)</th>
<th>RATED VOLTAGE (kVp)</th>
<th>RATED POWER (kvar) (1)</th>
<th>RATED CURRENT (A&lt;sub&gt;RMS&lt;/sub&gt;)</th>
<th>DIA. D&lt;sub&gt;MAX&lt;/sub&gt; mm (inches)</th>
<th>WIDTH W&lt;sub&gt;1&lt;/sub&gt; mm (inches)</th>
<th>WIDTH W&lt;sub&gt;2&lt;/sub&gt; mm (inches)</th>
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</thead>
<tbody>
<tr>
<td><strong>TYPE FPS 60</strong></td>
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<tr>
<td>FPS060WF10136BH1</td>
<td>R42</td>
<td>100</td>
<td></td>
<td></td>
<td></td>
<td>29 ± 1 (1.14 ± 0.04)</td>
<td>20 ± 1 (0.79 ± 0.04)</td>
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<tr>
<td>FPS060WF20136BJ1</td>
<td>R85</td>
<td>200</td>
<td>12</td>
<td>10</td>
<td>13</td>
<td>62 (2.44)</td>
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<td>FPS060WF25136BJ1</td>
<td>R85</td>
<td>250</td>
<td></td>
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<tr>
<td>FPS060WF30136BJ1</td>
<td>R85</td>
<td>300</td>
<td></td>
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<td></td>
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<tr>
<td>FPS060BH50136BJ1</td>
<td></td>
<td>500</td>
<td>10</td>
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<td></td>
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<tr>
<td><strong>TYPE FPS 80</strong></td>
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<td>FPS080VY50136BJ1</td>
<td>R85</td>
<td>500</td>
<td>7.0</td>
<td>15</td>
<td>13</td>
<td>86 (3.39)</td>
<td>29 ± 3 (1.14 ± 0.12)</td>
<td>15 ± 3 (0.59 ± 0.12)</td>
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<tr>
<td>FPS080VT10236BJ1</td>
<td></td>
<td>1000</td>
<td>3.5</td>
<td>15</td>
<td>16</td>
<td></td>
<td>27 ± 3 (1.06 ± 0.12)</td>
<td>11 ± 3 (0.43 ± 0.12)</td>
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<tr>
<td><strong>TYPE FPS 110</strong></td>
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<td>FPS110BF10236BJ1</td>
<td>R85</td>
<td>1000</td>
<td>6</td>
<td>30</td>
<td>13</td>
<td>116 (4.57)</td>
<td>30 ± 3 (1.18 ± 0.12)</td>
<td>16 ± 3 (0.63 ± 0.12)</td>
</tr>
</tbody>
</table>

**Note**

(1) The surface temperature during operation must not exceed +100 °C

### DIMENSIONS in millimeters (inches)

![Dimensions Diagram](image)

**Note**

- Dimensions W<sub>2</sub> will vary depending upon capacitance value

### RELATED DOCUMENTS

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