

# GL series

## Features

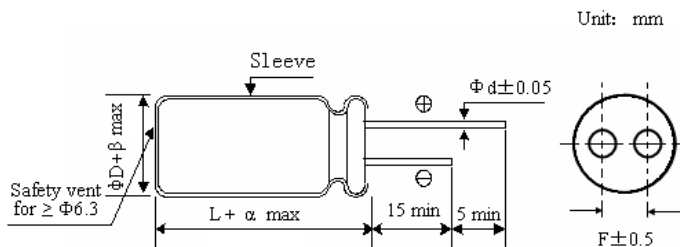
- ◆ PenCap type , High ripple current ,Long life 5000 hours at 105°C.
- ◆ Ideally suited for slim size adaptor, LCD/LED-TV and LCD-Monitor power.
- ◆ RoHS Compliant .



## Specifications

Item	Performance Characteristics						
Temperature Range	-25~+105°C						
Rated Voltage Range	160~450Vdc						
Capacitance Range	22~330µF						
Capacitance Tolerance	±20% (120Hz, +20°C)						
Leakage Current (+20°C,max.)	I≤0.03CV+40 (µA) After 2 minutes, whichever is greater measured with rated working voltage applied						
Dissipation Factor(tgδ) 120Hz, +20°C	Working Voltage(Vdc)	160	200	250	400	420	450
	D.F.(%)max.	15	15	15	20	20	20
Low Temperature Characteristics(120Hz)	Impedance ratio max.						
	Working Voltage(Vdc)	160	200	250	400	420	450
	Z-25°C / Z+20°C	3	3	3	6	6	6
Endurance	The following specifications shall be satisfied when the capacitors are restored to 20°C after the rated voltage is applied for 5000 hours at 105°C						
	Capacitance Change	≤±20% of the initial value					
	D.F.( tgδ)	≤200% of the initial specified value					
	Leakage Current	≤The initial specified value					
Shelf Life	After storing the capacitors under no load at 105°C for 1000 hours and then performing voltage treatment based on JIS C 5101-4 clause 4.1 at 20°C.						
	Capacitance Change	≤±20% of the initial value					
	D.F.( tgδ)	≤200% of the initial specified value					
	Leakage Current	≤200% The initial specified value					
Others	JISC-5101(IEC 60384)						

## Diagram of Dimensions



## Frequency Multipliers

µF \ Hz	50/60	120	300	1K	≥10K
22~330	0.80	1.00	1.25	1.40	1.60
ΦD	8		10		13
F	3.5		5.0		5.0
Φd	0.5		0.6		0.6
α	2.0				
β	0.5				

**GL series****Standard Ratings**

<b>Voltage</b>	<b>160</b>		<b>200</b>		<b>250</b>	
<b>Cap(μF)</b>	<b>Case Size</b>	<b>Ripple Current</b>	<b>Case Size</b>	<b>Ripple Current</b>	<b>Case Size</b>	<b>Ripple Current</b>
<b>47</b>					8×50	305
<b>56</b>			8×45	287	10×40	337
<b>68</b>	8×45	316	8×50	333	10×45	393
<b>82</b>	8×50	365	10×40	369	10×50	453
<b>100</b>	10×40	408	10×45	431	13×45	547
<b>120</b>	10×45	472	10×50	496	13×50	630
<b>150</b>	10×55	581	13×45	607	13×55	736
<b>220</b>	13×50	772	13×55	807		
<b>270</b>	13×55	894	13×60	932		
<b>330</b>	13×60	1030				

<b>Voltage</b>	<b>400</b>		<b>420</b>		<b>450</b>	
<b>Cap(μF)</b>	<b>Case Size</b>	<b>Ripple Current</b>	<b>Case Size</b>	<b>Ripple Current</b>	<b>Case Size</b>	<b>Ripple Current</b>
<b>22</b>	8×45	184	8×50	202	8×55	215
<b>27</b>	8×50	214	10×40	226	10×45	256
<b>33</b>	10×45	253	10×45	265	10×50	296
<b>39</b>	10×50	289	10×55	317	13×40	318
<b>47</b>	10×55	332	13×40	344	13×45	369
<b>56</b>	13×40	359	13×45	396	13×50	423
<b>68</b>	13×50	439	13×55	480	13×60	508
<b>82</b>	13×55	504	13×60	549		
<b>100</b>	13×60	580				

Max Allowable Ripple Current (mA,rms) at 105°C 120Hz,Case Size ΦD×L(mm).

Above size is the standard size for our product. If you need special size please contact our sales offices.