

# LARGE SIZE CAPACITOR CHIPS 50 - 5,000 VDC



## KEY FEATURES

- Rated Working Voltages from 50 to 15,000 VDC
- Low ESR Ceramic Out-performs Tantalums
- Compact MLC Designs Smaller Than Film or Disc
- MIL-PRF-55681 & Hi-Rel Screened Versions Available
- Custom Sizes, Voltages, and Values Available

## APPLICATIONS

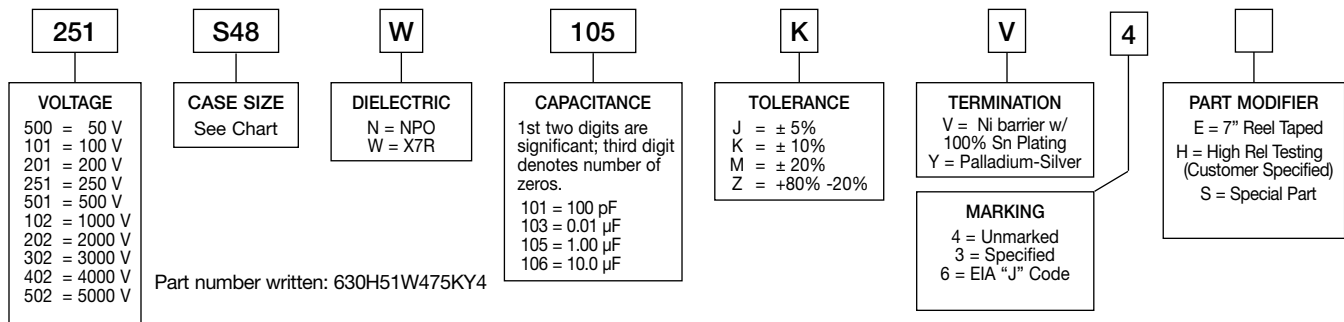
- Power Supplies
- Voltage Multipliers
- Data Isolation
- Surge Protection
- Industrial Control Circuits
- Custom Applications

## MAXIMUM CAPACITANCE VS DC VOLTAGE RATING

			50 V	100 V	250 V	500 V	1K V	2K V	3K V	4K V	5K V	
<b>S49 / 1825</b>	 Inches (mm) L .180 ±.010 (4.57 ±.25) W .250 ±.010 (6.35 ±.25) T .140 Max. (3.56 Max) E/B .025 ±.015 (0.64±.38)	NPO	473	383	273	273	153	562	222	102	271	
		X7R	185	105	125	334	104	223	822	202	821	
<b>S47 / 2220</b>	 Inches (mm) L .225 ±.015 (5.72 ±.38) W .200 ±.015 (5.08 ±.38) T .150 Max. (3.81 Max) E/B .025 ±.015 (0.64±.38)	NPO	683	473	333	273	183	682	272	122	391	
		X7R	185	125	105	564	184	273	822	332	152	
<b>S48 / 2225</b>	 Inches (mm) L .225 ±.010 (5.72 ±.25) W .255 ±.015 (6.48 ±.38) T .150 Max. (3.81 Max) E/B .025 ±.015 (0.64±.38)	NPO	753	563	393	333	223	822	472	222	681	
		X7R	225	225	125	824	224	473	153	563	222	

Available capacitance values include the following significant retma values and their multiples  
 1.0 1.2 1.5 1.8 2.2 2.7 3.3 3.9 4.7 5.6 6.8 8.2 ( 1.0 = 1.0, 10, 100, 1000, etc.)

## HOW TO ORDER



## MAXIMUM CAPACITANCE VS DC VOLTAGE RATING

<b>H42 / 1515</b> 		<b>500 V</b>	<b>1K V</b>	<b>2K V</b>	<b>3K V</b>	<b>4K V</b>	<b>5K V</b>			
	Inches (mm)									
	L .150 ±.015 (3.81 ±.38)	<b>NPO</b>	472	152	681	331	151	101		
W .150 ±.015 (3.81 ±.38)	<b>X7R</b>	683	223	332	222	681	331			
T .150 Max. (3.81 Max)										
E/B .025 ±.015 (0.64±.38)										
<b>H47 / 2520</b> 		<b>500 V</b>	<b>1K V</b>	<b>2K V</b>	<b>3K V</b>	<b>4K V</b>	<b>5K V</b>			
	Inches (mm)									
	L .250 ±.018 (6.35 ±.46)	<b>NPO</b>	223	332	152	681	331	221		
W .200 ±.015 (5.08 ±.38)	<b>X7R</b>	224	683	153	682	222	102			
T .150 Max. (3.81 Max)										
E/B .025 ±.015 (0.64±.38)										
<b>H51 / 3530</b> 		<b>500 V</b>	<b>1K V</b>	<b>2K V</b>	<b>3K V</b>	<b>4K V</b>	<b>5K V</b>			
	Inches (mm)									
	L .350 ±.035 (8.89 ±.89)	<b>NPO</b>	563	472	332	152	102	471		
W .300 ±.030 (7.62 ±.76)	<b>X7R</b>	474	154	473	333	103	682			
T .200 Max (5.08 Max)										
E/B .025 ±.015 (0.64±.38)										
<b>H54 / 3640</b> 		<b>50 V</b>	<b>100 V</b>	<b>250 V</b>	<b>500 V</b>	<b>1K V</b>	<b>2K V</b>	<b>3K V</b>	<b>4K V</b>	<b>5K V</b>
	Inches (mm)									
	L .360 ± .030 (9.14 ± .76)	<b>NPO</b>	224	184	154	683	822	332	222	152
W .400 ± .030 (10.16 ±.76)	<b>X7R</b>	825	565	475	155	474	683	473	153	822
T .200 Max (5.08 Max)										
E/B .025 ±.015 (0.64±.38)										

Available capacitance values include the following significant retma values and their multiples:  
 1.0 1.2 1.5 1.8 2.2 2.7 3.3 3.9 4.7 5.6 6.8 8.2 ( 1.0 = 1.0, 10, 100, 1000, etc.)  
 Consult factory for sizes, values, & voltages not shown.

## ELECTRICAL CHARACTERISTICS

Meets the standard NPO & X7R dielectric specifications listed on page 28 & 29 except

Dielectric Withstanding Voltage      DWV = 750 VDC for 500 WVDC rated units,  
    DWV = 945 VDC for 630 WVDC rated units,  
    DWV = 1.2 X rated WVDC for ratings ≥ 1,000 WVDC

NOTE: Circuit applications above 1KVDC may require surface coating to prevent external arcing.

