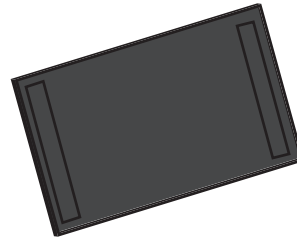


## High Stability & Reliability Capacitor

**HSSC0402 10nF**  
**935.131.424.510**

The IPDIA Technology offers industry leading performances relative to failure rate with a FIT<0.017. This technology also offers high reliability, up to 10 times better than alternative capacitor technologies & eliminates cracking phenomena.

This silicon based technology is RoHS compliant and compatible with lead free reflow soldering process.



### Key Applications

- All Demanding Applications such as Military, Aerospace, Automotive Industry
- High Stability Applications
- Decoupling / Filtering / Charge Pump (ie. Pacemakers / Defibrillators)
- Devices with Battery Operations
- Replacement of X7R and NP0
- Downsizing

### Key Features

- High Stability up to 200°C;
  - Temperature  $<\pm 0.5\%$  (-55 to +150°C)
  - Voltage  $< 0.1\%$  / V
  - Negligible Ageing  $< 0.001\%$  / 1000hours
- Unique High Capacitance in EIA/1005 Package Size, up to 1.5nF
- High Reliability (FIT  $< 0.017$  parts / billion hours)
- Low Leakage Current down to 100pA
- Low ESL and Low ESR
- Suitable with Lead Free Reflow-Soldering

### Part Number

<b>935.132.</b>	<b>B. 2</b>	<b>S.</b>	<b>U.</b>	<b>XX</b>
	↓ <b>Breakdown</b>	↓ <b>Size:</b>	↓ <b>Unit:</b>	↓ <b>Value</b>
ie. 1.5nF/0201 case (HSSC type) → 935.131.422.415	<b>Voltage:</b> 4 = 11V 7 = 30V	2 = 1005 3 = 0201 4 = 0402	0 = 10f    5 = 1n 1 = 0.1p    6 = 10n 2 = 1p    7 = 0.1u 3 = 10p    8 = 1u 4 = 0.1n    9 = 10u	

Parameters	Value
Capacitance Range	1.5nF
Capacitance Tolerances	$\pm 15\%$
Operating Temperature Range	-55°C to 150°C
Storage Temperatures	-70°C to 165°C
Temperature Coefficient	$<\pm 0.5\%$ , from -55°C to +150°C
Breakdown Voltage (BV)	11VDC
Capacitance Variation Vs. RVDC	0.1% /V (from 0V to RVDC)
Equivalent Serial Inductor (ESL)	Max 100pH
Equivalent Serial Resistor (ESR)	Max 200mΩ
Insulation Resistance	100GΩ min @ 3V, from -55°C to +150°C
Ageing	Negligible, $< 0.001\%$ / 1000h
Reliability	FIT $< 0.017$ parts / billion hours
Capacitor Height	Max 400μm