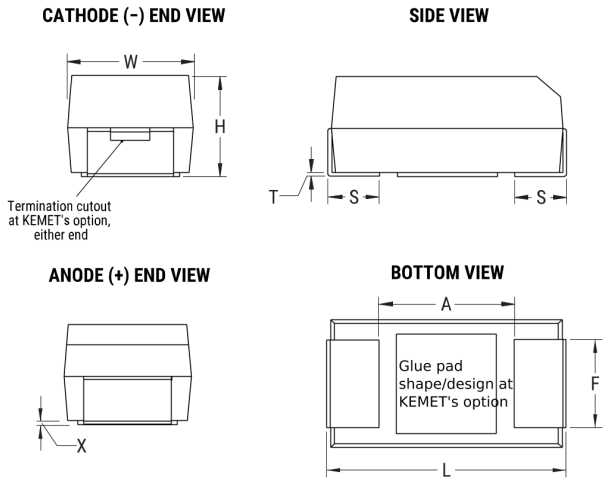
T525T476M006ATE080

T525, Tantalum, Polymer Tantalum, Commercial Grade, 47 uF, 20%, 6.3 VDC, SMD, Polymer, Molded, Low Profile/ESR, NonCombustible, 80 mOhms, 3528, 1.2mm



Click here for the 3D model.

Dimensions	
Footprint	3528
L	3.5mm +/-0.2mm
W	2.8mm +/-0.2mm
H	1.1mm +/-0.1mm
T	0.13mm REF
S	0.8mm +/-0.3mm
F	2.2mm +/-0.1mm
A	1.9mm MIN
X	0.05mm REF

Packaging Specifications	
Packaging	T&R, 178mm
Packaging Quantity	3000

General Information	
Series	T525
Dielectric	Polymer Tantalum
Style	SMD Chip
Description	SMD, Polymer, Molded, Low Profile/ESR, NonCombustible
Features	Low ESR
RoHS	Yes
Termination	Tin
AEC-Q200	No
Typical Component Weight	54.84 mg
Shelf Life	52 Weeks
MSL	3

Specifications	
Capacitance	47 uF
Capacitance Tolerance	20%
Voltage DC	6.3 VDC (105C), 4.22 VDC (125C)
Temperature Range	-55/+125°C
Rated Temperature	105°C
Life	2000 Hrs (125C)
Humidity	60C, 90% RH, 1000 Hours, No Load
Dissipation Factor	8% 120Hz 25C
Failure Rate	N/A
ESR	80 mOhms (100kHz 25C)
Ripple Current	1100 mA (rms, 100kHz 45C), 770 mA (rms, 85C), 275 mA (rms, 125C)
Leakage Current	29.6 uA (5min 25°C)

Statements of suitability for certain applications are based on our knowledge of typical operating conditions for such applications, but are not intended to constitute - and we specifically disclaim - any warranty concerning suitability for a specific customer application or use. This Information is intended for use only by customers who have the requisite experience and capability to determine the correct products for their application. Any technical advice inferred from this Information or otherwise provided by us with reference to the use of our products is given gratis, and we assume no obligation or liability for the advice given or results obtained.

© 2006 - 2024 KEMET

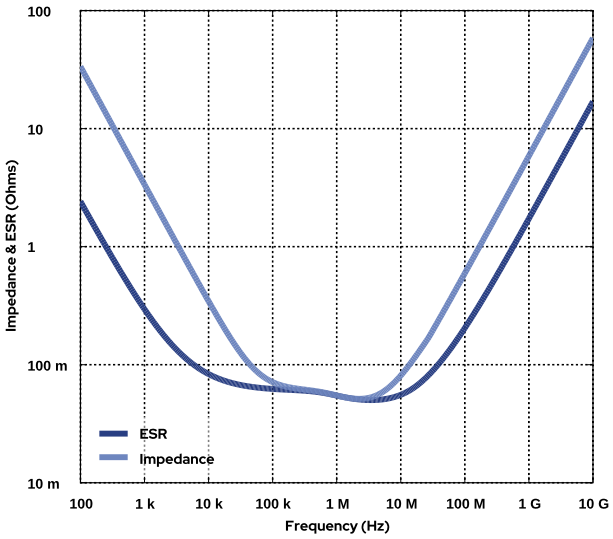
T525T476M006ATE080

T525, Tantalum, Polymer Tantalum, Commercial Grade, 47 uF, 20%, 6.3 VDC, SMD, Polymer, Molded, Low Profile/ESR, NonCombustible, 80 mOhms, 3528, 1.2mm

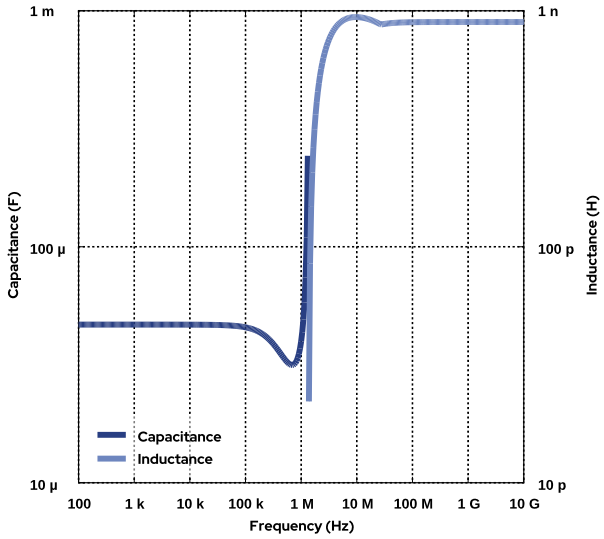
Simulations

For the complete simulation environment please visit K-SIM.

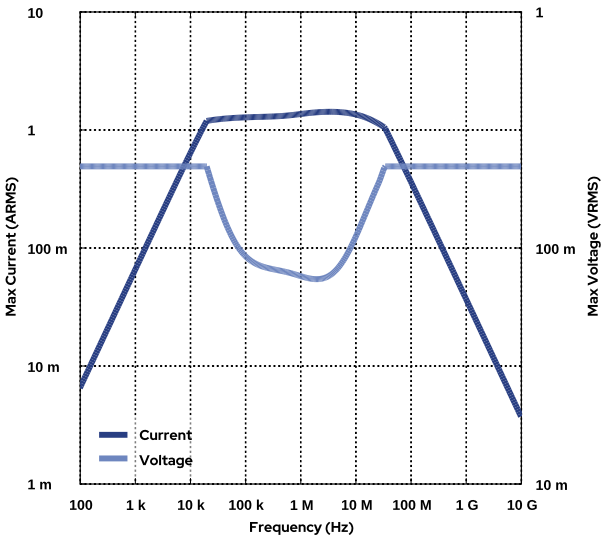
Impedance and ESR



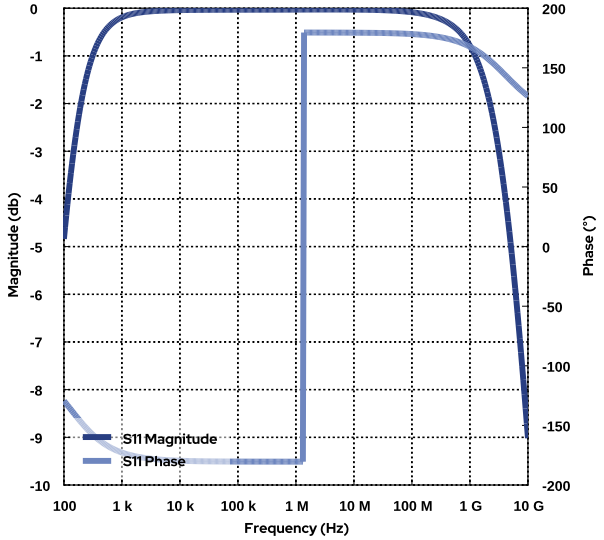
Capacitance and Inductance



Current and Voltage



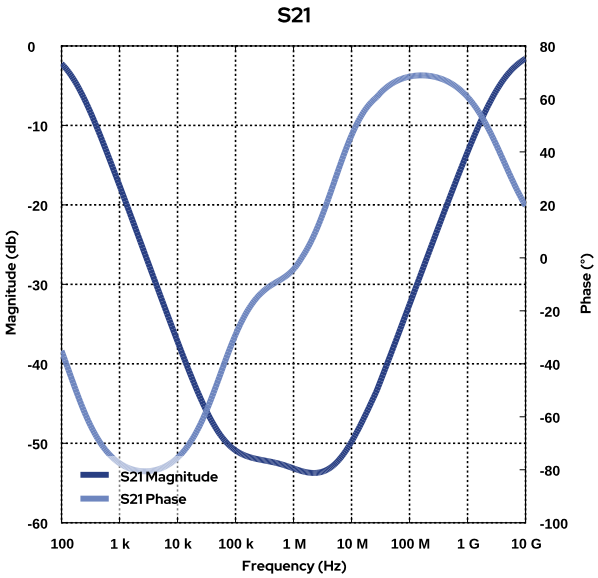
S11



© 2006 - 2024 KEMET

T525T476M006ATE080

T525, Tantalum, Polymer Tantalum, Commercial Grade, 47 uF, 20%, 6.3 VDC, SMD, Polymer, Molded, Low Profile/ESR, NonCombustible, 80 mOhms, 3528, 1.2mm



© 2006 - 2024 KEMET

T525T476M006ATE080

T525, Tantalum, Polymer Tantalum, Commercial Grade, 47 uF, 20%, 6.3 VDC, SMD, Polymer, Molded, Low Profile/ESR, NonCombustible, 80 mOhms, 3528, 1.2mm

These are simulations.

This is not a specification!

The responses shown represent the typical response for each part type. Specific responses may vary, depending on manufacturing variation affects of all parameters involved, including the specified tolerances applied to capacitance and unspecified variations of ESR, ESL, and leakage resistance.

The responses shown do not represent a specified or implied maximum capability of the device for all applications.

- The ESR used for ripple "Ripple Current/Voltage vs. Frequency" plots is the ESR at ambient temperature.
- The ESR in the "Temperature Rise vs. Ripple Current" plots is adjusted to each incremental temperature rise before the power and ripple current is calculated.
- The effects shown herein are based on measured data from a multiple part sample of the parts in question.
- Ripple capability of this device will be factored by thermal resistance (Rth) created by circuit traces (addi affects of all parameters involved, including the specified tolerances applied to capacitance and unspecified variations of ESR, ESL, and leakage resistance.
- The peak voltages generated in the "Temperature Rise vs. Combined Ripple Currents" plot are calculated for each frequency and are not combined with voltages generated at any other harmonics.
- Please consult with the catalog or field applications engineer for maximum capability of the device in specific applications.

All product information and data (collectively, the "Information") are subject to change without notice.

KEMET K-SIM is designed to simulate behavior of components with respect to frequency, ambient temperature, and DC bias levels. The responses shown represent the typical response for each part type. Specific responses may vary, depending on manufacturing variation effects of all parameters involved, including the specified tolerances applied to capacitance and unspecified variations of ESR, ESL, and leakage resistance.

All Information given herein is believed to be accurate and reliable, but is presented without guarantee, warranty, or responsibility of any kind, expressed or implied. Statements of suitability for certain applications are based on our knowledge of typical operating conditions for such applications, but are not intended to constitute – and we specifically disclaim – any warranty concerning suitability for a specific customer application or use. This Information is intended for use only by customers who have the requisite experience and capability to determine the correct products for their application. Any technical advice inferred from this Information or otherwise provided by us with reference to the use of our products is given gratis, and we assume no obligation or liability for the advice given or results obtained.

If you have any questions please contact K-SIM.

© 2006 - 2024 KEMET

Unikeyic Electronics

Global Electronic Components Distributor

Click to view pricing, inventory, delivery, and lifecycle information:

KEMET:

C0603C470K5RACAUTO CBR04C180F2GAC EXV227M050A9PAA PEH532RDG4180M2 RSBEC1470AA00K C0805C339D5GACTU C4AQLBU5160M11K MPX1D1235L1R0 MPX1D1740L6R8 MPXV1D1054L100 SNT-D30T SBC4-471-491 C0603C160J5GACTU C0603X339C5GACTU C0805C473K2RACTU LDEDD4100KA0N00 R413F1100CK00M R66ID3220AA7AK SS26V-080350 C0603C273K1RACTU C1206C222K2RACTU GTX-2200-Y0X RM4A(025)-185X70T0800 T350A104K035AT CBR04C808B5GAC SN8S-40P2 T498X106K050ATE500 C0805X221M5RACTU CBR04C339B5GAC T496X227K010ATE500