

Reference: QOD-510

Product Change Notification PCN-102919-ASG-AUTO

Date:	ID Number (MMDDYY): 102919-AUTO																																																																												
Affected Products	<p>Product Series: Flexible Termination and Standard Termination System X7R dielectric Automotive grade.</p> <p>Part Types.</p> <ul style="list-style-type: none"> X7R 1210 EIA Case Size 4.7uF 50V <p>Termination System/s and finishes: Flexible Termination and Standard Termination with 100% Sn finish.</p> <p>Product Grade/s:</p> <ul style="list-style-type: none"> All Automotive grade part types (See Part Types affected section for details) 																																																																												
Product Series Ordering Information	<p>Standard & Flexible Termination</p> <table border="1" style="width: 100%; border-collapse: collapse; text-align: center;"> <thead> <tr style="background-color: #cccccc;"> <th>C</th> <th>1210</th> <th>C</th> <th>475</th> <th>K</th> <th>5</th> <th>R</th> <th>A</th> <th>C</th> </tr> </thead> <tbody> <tr> <td style="text-align: left;">Ceramic</td> <td style="text-align: left;">Case Size (L" x W")</td> <td style="text-align: left;">Specification/Series</td> <td style="text-align: left;">Capacitance Code (pF)</td> <td style="text-align: left;">Capacitance Tolerance</td> <td style="text-align: left;">Rated Voltage (VDC)</td> <td style="text-align: left;">Dielectric</td> <td style="text-align: left;">Failure Rate / Design</td> <td style="text-align: left;">Termination Finish</td> </tr> <tr> <td></td> <td style="text-align: left;">1210</td> <td style="text-align: left;">C=Standard Termination X=Flexible Termination</td> <td style="text-align: left;">2 Sig. digits+ + Number of zeros</td> <td style="text-align: left;">J = ±5% K = ±10% M = ±20%</td> <td style="text-align: left;">5 = 50</td> <td style="text-align: left;">R=X7R</td> <td style="text-align: left;">A=N/A</td> <td style="text-align: left;">C=100%Matte Sn</td> </tr> </tbody> </table> <p>Ordering Information for both Standard and Flexible Termination is not changing with this PCN.</p>	C	1210	C	475	K	5	R	A	C	Ceramic	Case Size (L" x W")	Specification/Series	Capacitance Code (pF)	Capacitance Tolerance	Rated Voltage (VDC)	Dielectric	Failure Rate / Design	Termination Finish		1210	C=Standard Termination X=Flexible Termination	2 Sig. digits+ + Number of zeros	J = ±5% K = ±10% M = ±20%	5 = 50	R=X7R	A=N/A	C=100%Matte Sn																																																	
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Effective Date and Identification	<p>KEMET Part Types with C-AUTO Beginning April 13th / Date Code. 2017XXXXXX</p> <p>KEMET Part Types with C-3083, C-3020, C-3123, C-3124, C-3199, C-3198, C-9017 Beginning July 20th / Date Code. 2030XXXXXX</p> <ul style="list-style-type: none"> Please see full list of affected part types for conversion dates Samples on these parts are available through your sales representative. 																																																																												
Change Description	<p>Change Classification. Minor</p> <p><input type="checkbox"/> Form <input type="checkbox"/> Fit <input checked="" type="checkbox"/> Function</p> <p>KEMET is optimizing the dielectric formulation and designs to meet the growing global demand of class II X7R ceramic capacitors. Primary material set of the X7R dielectric will remain BaTiO₃ although minor modifications to dopants and powders have occurred which remain proprietary. Part types affected by this change continue to meet or exceed Automotive Electronics Council AEC-Q200 qualification in addition to internal KEMET qualification standards (Qualification Packages upon request).</p> <p>Dimensional and Electrical Parameters.</p> <p>Standard Termination</p> <table border="1" style="width: 100%; border-collapse: collapse; text-align: center;"> <thead> <tr style="background-color: #cccccc;"> <th rowspan="2">Part Type</th> <th colspan="2">Length (mm)</th> <th colspan="2">Width (mm)</th> <th colspan="2">Thickness (mm)</th> <th colspan="2">pcs/reel (7" reel/13" reel)</th> <th colspan="2">DF (max %)</th> <th colspan="2">IR min (Mohm)</th> </tr> <tr style="background-color: #cccccc;"> <th>Current</th> <th>Planned</th> <th>Current</th> <th>Planned</th> <th>Current</th> <th>Planned</th> <th>Current</th> <th>Planned</th> <th>Current</th> <th>Planned</th> <th>Current</th> <th>Planned</th> </tr> </thead> <tbody> <tr> <td style="text-align: left;">X7R 1210 4.7µF 50V</td> <td>3.20 ± 0.30</td> <td>3.20 ± 0.30</td> <td>2.50 ± 0.22</td> <td>2.50 ± 0.22</td> <td>2.50 ± 0.30</td> <td>2.50 ± 0.30</td> <td>1,000/4,000</td> <td>1,000/4,000</td> <td>2.5</td> <td style="color: red;">5.0</td> <td>106.4</td> <td style="color: red;">21.28</td> </tr> </tbody> </table> <p>Flexible Termination</p> <table border="1" style="width: 100%; border-collapse: collapse; text-align: center;"> <thead> <tr style="background-color: #cccccc;"> <th rowspan="2">Part Type</th> <th colspan="2">Length (mm)</th> <th colspan="2">Width (mm)</th> <th colspan="2">Thickness (mm)</th> <th colspan="2">pcs/reel (7" reel/13" reel)</th> <th colspan="2">DF (max %)</th> <th colspan="2">IR min (Mohm)</th> </tr> <tr style="background-color: #cccccc;"> <th>Current</th> <th>Planned</th> <th>Current</th> <th>Planned</th> <th>Current</th> <th>Planned</th> <th>Current</th> <th>Planned</th> <th>Current</th> <th>Planned</th> <th>Current</th> <th>Planned</th> </tr> </thead> <tbody> <tr> <td style="text-align: left;">X7R 1210 4.7µF 50V</td> <td>3.30 ± 0.40</td> <td>3.30 ± 0.40</td> <td>2.60 ± 0.30</td> <td>2.60 ± 0.30</td> <td>2.50 ± 0.30</td> <td>2.50 ± 0.30</td> <td>1,000/4,000</td> <td>1,000/4,000</td> <td>2.5</td> <td style="color: red;">5.0</td> <td>106.4</td> <td style="color: red;">21.28</td> </tr> </tbody> </table>	Part Type	Length (mm)		Width (mm)		Thickness (mm)		pcs/reel (7" reel/13" reel)		DF (max %)		IR min (Mohm)		Current	Planned	Current	Planned	Current	Planned	Current	Planned	Current	Planned	Current	Planned	X7R 1210 4.7µF 50V	3.20 ± 0.30	3.20 ± 0.30	2.50 ± 0.22	2.50 ± 0.22	2.50 ± 0.30	2.50 ± 0.30	1,000/4,000	1,000/4,000	2.5	5.0	106.4	21.28	Part Type	Length (mm)		Width (mm)		Thickness (mm)		pcs/reel (7" reel/13" reel)		DF (max %)		IR min (Mohm)		Current	Planned	Current	Planned	Current	Planned	Current	Planned	Current	Planned	Current	Planned	X7R 1210 4.7µF 50V	3.30 ± 0.40	3.30 ± 0.40	2.60 ± 0.30	2.60 ± 0.30	2.50 ± 0.30	2.50 ± 0.30	1,000/4,000	1,000/4,000	2.5	5.0	106.4	21.28
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Affected Part Numbers

Please refer to "Affected Part Types" Excel file for KEMET part numbers being affected by this change.

Part numbers listed in the "Affected Part Types" excel file will begin to be supplied on April 13th, 2020 and/or July 20th, 2020 depending on the specific part type.

Only the part numbers listed will be impacted.

PCN Name	KEMET Part Type	Implementation Date
PCN-102919-ASG-AUTO	C1210C475J5RACAUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RACAUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RACAUTO7210	April 13th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RACAUTO7621	April 13th, 2020
PCN-102919-ASG-AUTO	C1210C475M5RACAUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RACAUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RACAUTO7210	April 13th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RACAUTO7621	April 13th, 2020
PCN-102919-ASG-AUTO	C1210X475M5RACAUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210X475M5RACAUTO7210	April 13th, 2020
PCN-102919-ASG-AUTO	C1210C475J5RACAUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RACAUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210X475J5RACAUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RACAUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RACAUTO7210	April 13th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RAC9400AUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RACAUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RACAUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210X475M5RACAUTO	April 13th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RAC3083	July 20th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RAC3123	July 20th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RAC3124	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC3123	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC3124	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC31247683	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC31997683	July 20th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RAC3123	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC3123	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC3124	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC31247665	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC3199	July 20th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RAC3083	July 20th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RAC3123	July 20th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RAC3123R023	July 20th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RAC3124	July 20th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RAC31243455	July 20th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RAC3124R023	July 20th, 2020
PCN-102919-ASG-AUTO	C1210C475K5RAC90177800	July 20th, 2020
PCN-102919-ASG-AUTO	C1210C475M5RAC31247665	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC3020	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC30207536	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC3123	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC3124	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC31243455	July 20th, 2020
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PCN-102919-ASG-AUTO	C1210X475K5RAC3124X023	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC3198	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC3199	July 20th, 2020
PCN-102919-ASG-AUTO	C1210X475K5RAC3199X023	July 20th, 2020

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**For General
Information**

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