



<b>Title of Change:</b>	Trench 6 Technology Capacity Expansion by Qualification of Aizu Fujitsu Semiconductor Manufacturing, Japan.																																											
<b>Proposed first ship date:</b>	10 November 2018 <i>or earlier after customer approval</i>																																											
<b>Contact information:</b>	Contact your local ON Semiconductor Sales Office or < <a href="mailto:guokun.yeng@onsemi.com">guokun.yeng@onsemi.com</a> >																																											
<b>Samples:</b>	Contact your local ON Semiconductor Sales Office or < <a href="mailto:PCN.samples@onsemi.com">PCN.samples@onsemi.com</a> > Sample requests are to be submitted no later than 30 days from the date of first notification, Initial PCN or Final PCN, for this change.																																											
<b>Additional Reliability Data:</b>	Contact your local ON Semiconductor Sales Office or < <a href="mailto:Don.Knudsen@onsemi.com">Don.Knudsen@onsemi.com</a> >																																											
<b>Type of notification:</b>	This is a Final Product/Process Change Notification (FPCN) sent to customers. FPCNs are issued 90 days prior to implementation of the change. ON Semiconductor will consider this change accepted, unless an inquiry is made in writing within 30 days of delivery of this notice. To do so, contact < <a href="mailto:PCN.Support@onsemi.com">PCN.Support@onsemi.com</a> >																																											
<b>Change Part Identification:</b>	Affected parts will be identified with a date code of WW45'18 or later																																											
<b>Change Category:</b>	<input checked="" type="checkbox"/> Wafer Fab Change <input type="checkbox"/> Assembly Change <input type="checkbox"/> Test Change <input type="checkbox"/> Other _____																																											
<b>Change Sub-Category(s):</b>	<input checked="" type="checkbox"/> Manufacturing Site Addition <input type="checkbox"/> Material Change <input type="checkbox"/> Datasheet/Product Doc change <input type="checkbox"/> Manufacturing Site Transfer <input type="checkbox"/> Product specific change <input type="checkbox"/> Shipping/Packaging/Marking <input type="checkbox"/> Manufacturing Process Change <input type="checkbox"/> Other: _____																																											
<b>Sites Affected:</b>	ON Semiconductor Sites: None	External Foundry/Subcon Sites: Aizu Fujitsu, Japan																																										
<b>Description and Purpose:</b>  This is a final change notification to customers on the qualification of additional wafer fabrication capacity of 30V Trench (T6) MOSFET technology in Aizu Fujitsu Semiconductor Manufacturing (AFSM) located in Aizu, Japan. At the expiration of this notification, product listed here will be dual sourced from its current ON Semiconductor wafer fab in Gresham and AFSM.  There are no product material changes as a result of this change.  There is no product marking change as a result of this change.  Device quality and reliability will continue to meet ON Semiconductors high standards.																																												
<b>Reliability Data Summary:</b>  QV: NVMFD5C650NL																																												
	<table border="1"> <thead> <tr> <th>Test</th><th>Specification</th><th>Condition</th><th>Interval</th><th>Results</th></tr> </thead> <tbody> <tr> <td>HTRB</td><td>JESD22-A108</td><td>Ta=150°C, 100% max rated V</td><td>1008 hrs</td><td>0/240</td></tr> <tr> <td>HTGB</td><td>JESD22-A108</td><td>Ta=150°C, 100% max rated Vgss</td><td>1008 hrs</td><td>0/240</td></tr> <tr> <td>HTSL</td><td>JESD22-A103</td><td>Ta=175°C</td><td>2016 hrs</td><td>0/240</td></tr> <tr> <td>IOL</td><td>MIL-STD-750 (M1037) AEC-Q101</td><td>Ta=+25°C, delta Tj=100°C On/off = 2 min</td><td>30000 cyc</td><td>0/240</td></tr> <tr> <td>TC</td><td>JESD22-A104</td><td>Ta=-55°C to +150°C</td><td>1000 cyc</td><td>0/240</td></tr> <tr> <td>HAST</td><td>JESD22-A110</td><td>131°C, 85% RH, 18.8psig, bias</td><td>192 hrs</td><td>0/240</td></tr> <tr> <td>uHAST</td><td>JESD22-A118</td><td>131°C, 85% RH, 18.8psig, unbiased</td><td>96 hrs</td><td>0/240</td></tr> </tbody> </table>	Test	Specification	Condition	Interval	Results	HTRB	JESD22-A108	Ta=150°C, 100% max rated V	1008 hrs	0/240	HTGB	JESD22-A108	Ta=150°C, 100% max rated Vgss	1008 hrs	0/240	HTSL	JESD22-A103	Ta=175°C	2016 hrs	0/240	IOL	MIL-STD-750 (M1037) AEC-Q101	Ta=+25°C, delta Tj=100°C On/off = 2 min	30000 cyc	0/240	TC	JESD22-A104	Ta=-55°C to +150°C	1000 cyc	0/240	HAST	JESD22-A110	131°C, 85% RH, 18.8psig, bias	192 hrs	0/240	uHAST	JESD22-A118	131°C, 85% RH, 18.8psig, unbiased	96 hrs	0/240			
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**Electrical Characteristic Summary:**

There is no change in electrical parametric performance. Characterization data is available upon request.

**List of Affected Parts:**

Part Number	Qualification Vehicle
NTMFD4C20NT1G	NVMFD5C650NLT1G
NTMFD4C20NT3G	
NTMFD4C50NT1G	
NTMFD4C50NT3G	