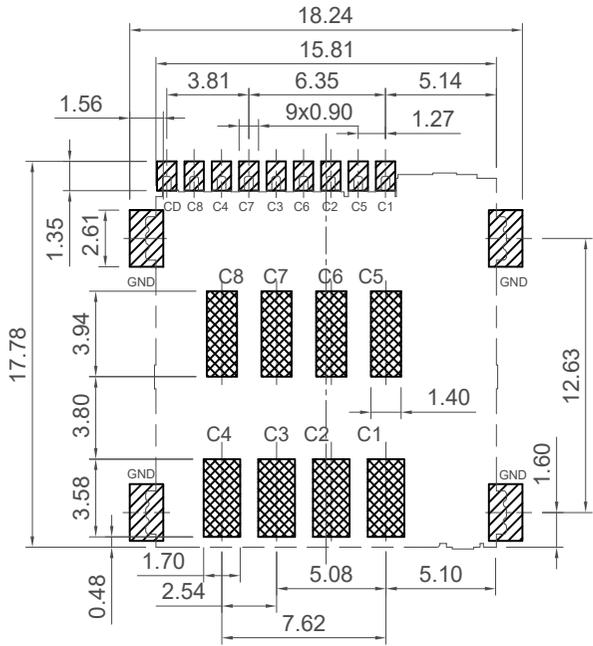
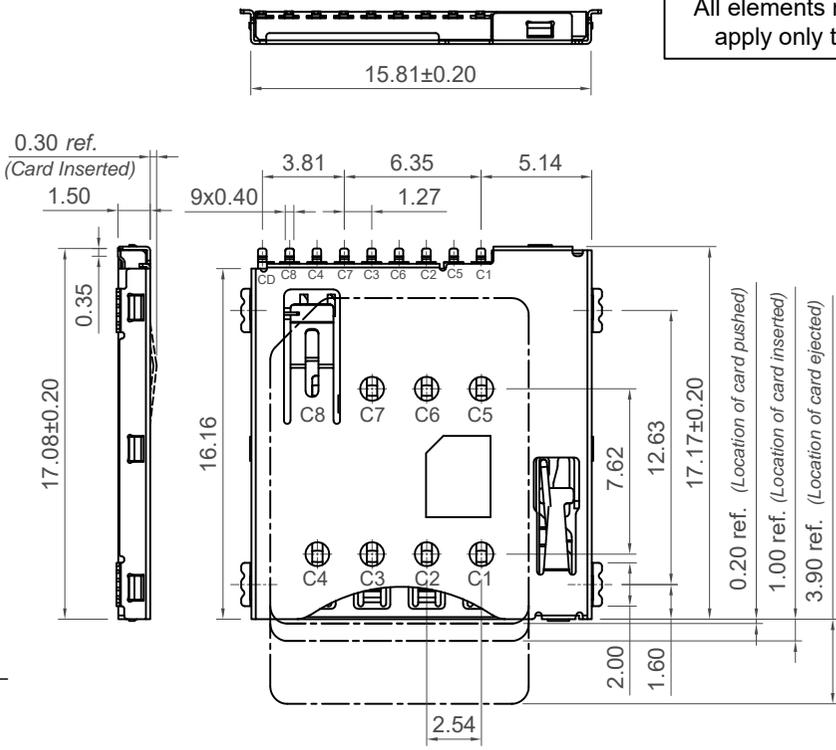
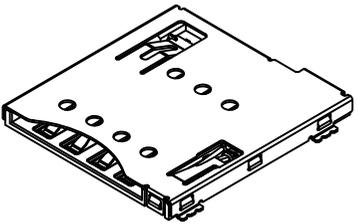


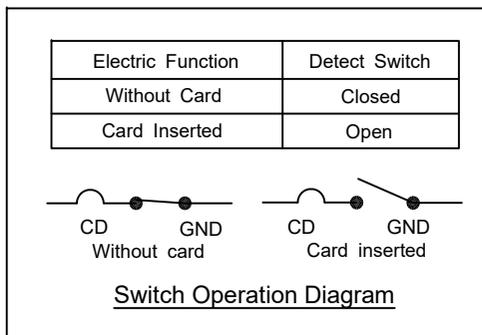
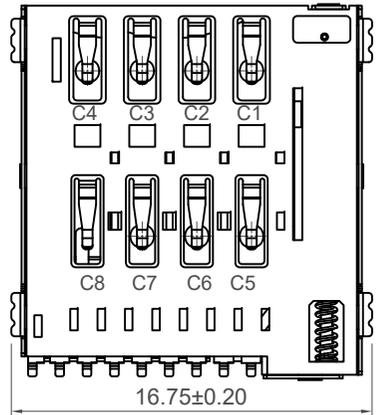
H  
G  
F  
E  
D  
C  
B  
A

All elements marked as C4 and C8 apply only to 8 contact version.



Recommended PCB Layout  
General Tolerance ±0.05

Locating peg holes only applicable to locating peg version  
 ▨ Solder Area ▩ Keep Out Area □ Component Outline



Specification:

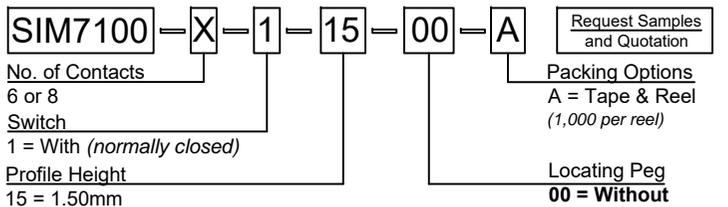
**Material:**  
 Plastic Housing & Slider:  
 Thermoplastic, UL94V-0, Black  
 Contact Terminal & Card Detection Switch :  
 Phosphor Bronze  
 Shell, Cam Pin: Stainless Steel  
 Coil Spring: SWP (steel)

**Plating:**  
 Contact Terminal:  
 Contact Area: 3μ" Gold  
 Solder area: Gold Flash  
 Underplating: Ni overall 50μ" min.  
 Shell: Ni overall, 30μ" min.  
 Solder area: Gold Flash

**Electrical:**  
 Voltage Rating: 50V max.  
 Current Rating: 1A max.  
 Dielectric Withstanding: 500V AC  
 Insulation Resistance: 1000 MΩ min.  
 Contact Resistance: 100 mΩ max. (signal)  
 300 mΩ max. (switch)

**Mechanical:**  
 Duration: 1500 cycles  
 Operating Temperature: -40°C to +85°C

Ordering Grid



Part Number		Product Description	
SIM7100		Micro SIM Card Connector - Push-Push Type	
Drawing Date		12th September 2014	
By		CC	
Detail		C PCN	
Revision		C2	
Date		15/06/21	
Tolerances (Except as Noted)		Units:	
Length		Metric (mm)	
Angle		3rd Angle Projection	
X. ± 0.35		X.° ± 5°	
X.X ± 0.25		X.XX° ± 4°	
X.XX ± 0.15		X.XXX° ± 3°	
X.XXX ± 0.10		X.XXX° ± 2°	



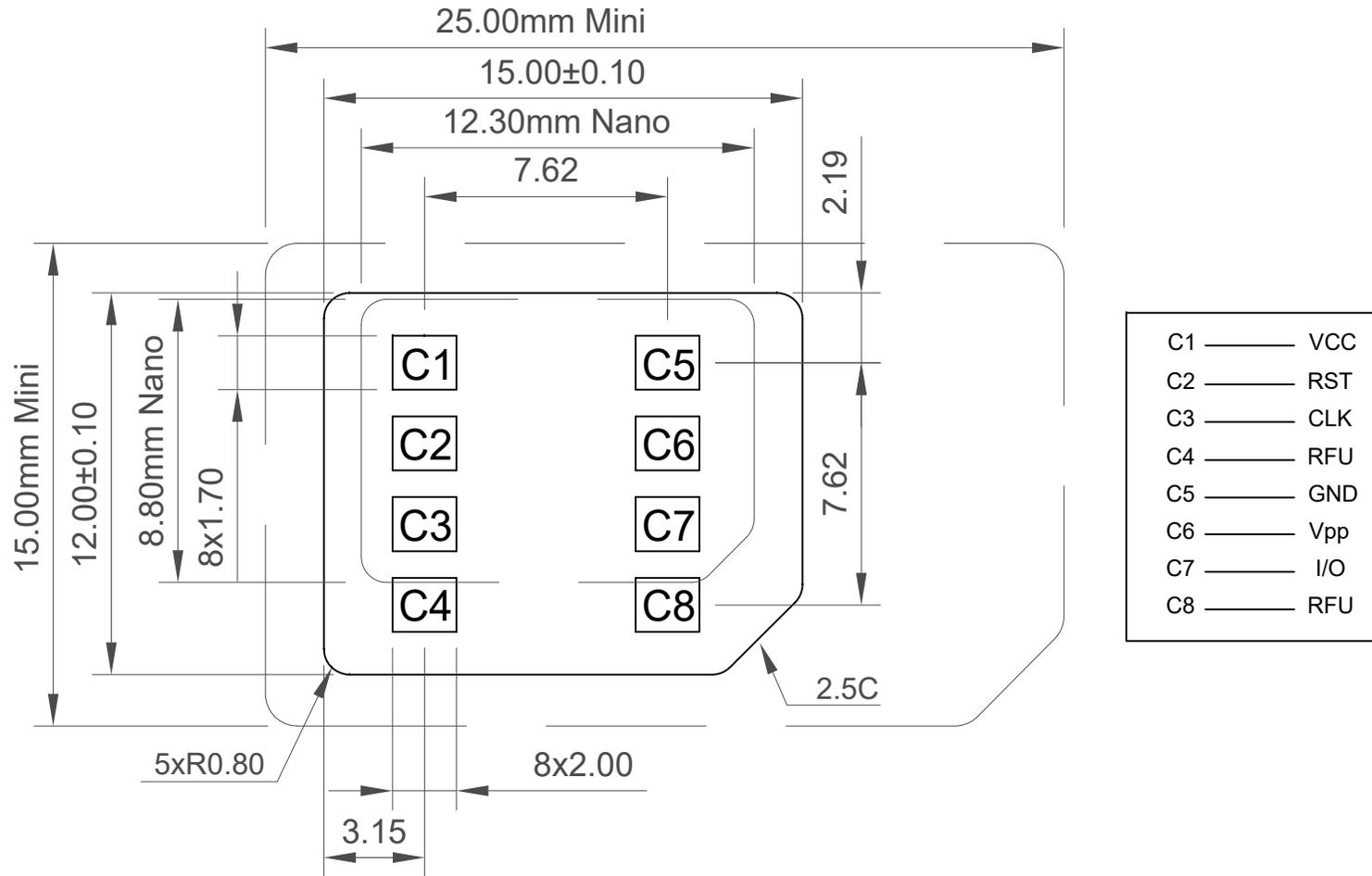
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Not to Scale	Drawn By AJO	Sheet No. 1/3
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# Micro SIM Reference

thickness =  $0.76 \pm 0.08$



C1	VCC
C2	RST
C3	CLK
C4	RFU
C5	GND
C6	Vpp
C7	I/O
C8	RFU

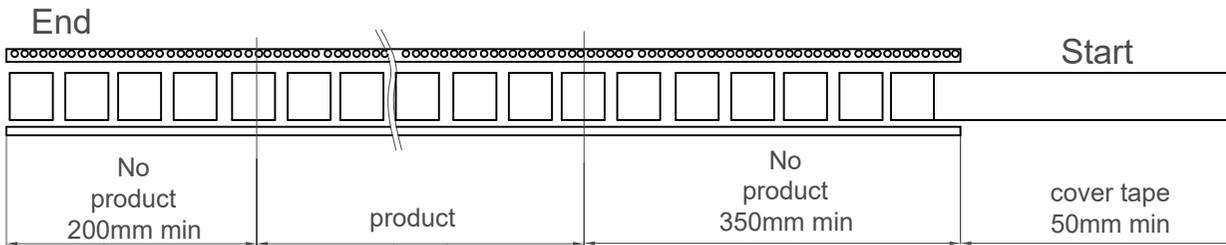
Part Number		Product Description	
SIM7100		Micro SIM Card Connector - Push-Push Type	
Drawing Date		6 or 8 Pin, SMT, 1.50mm Profile	
12th September 2014			
By	CC	Tolerances (Except as Noted)	Units:
Detail	SIM7100 C PCN	Length X. ± 0.35 X.X ± 0.25 X.XX ± 0.15 X.XXX ± 0.10	Metric (mm)
Revision	C2	Angle X.° ± 5° X.X° ± 4° X.XX° ± 3° X.XXX° ± 2°	
Date	15/06/21		



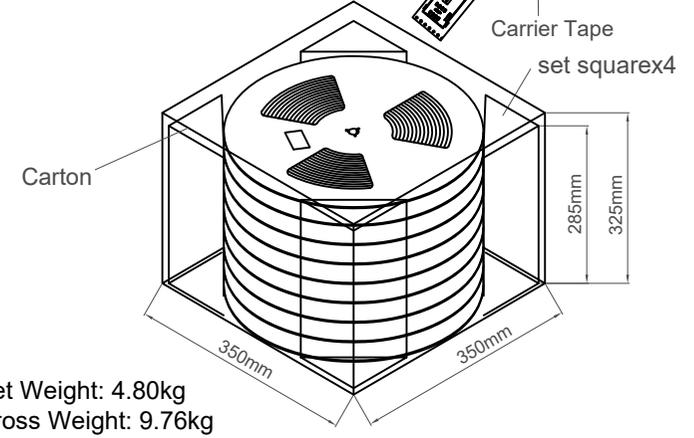
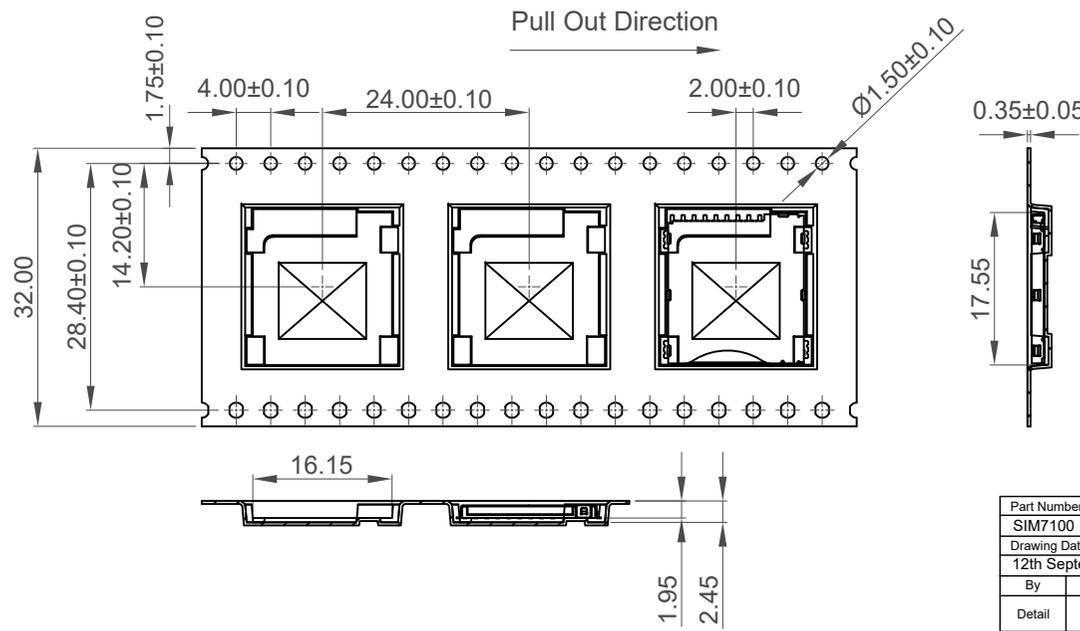
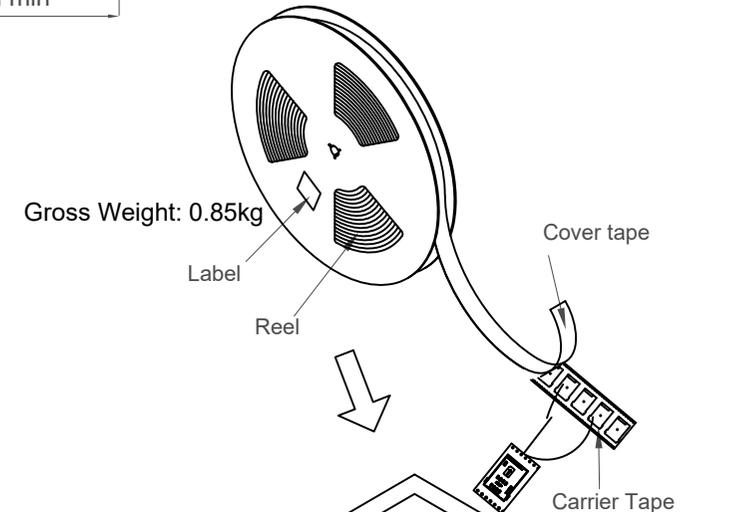
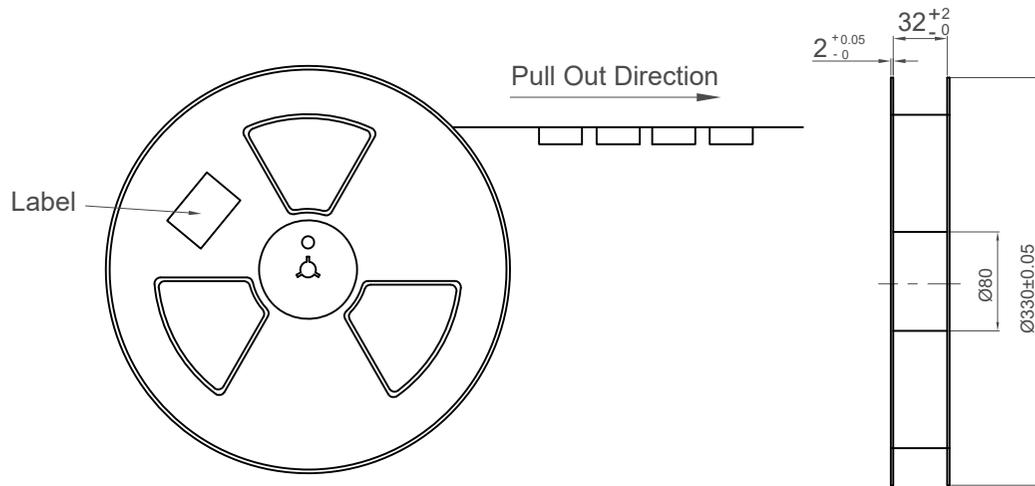
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Products P/N	PCS/Reel	Reels/Carton	PCS/Carton
SIM7100	1000	8	8000



Part Number		Product Description	
SIM7100		Micro SIM Card Connector - Push-Push Type	
Drawing Date		6 or 8 Pin, SMT, 1.50mm Profile	
12th September 2014			
By	CC	Tolerances (Except as Noted)	Units:
Detail	SIM7100 C PCN	Length	Metric (mm)
Revision	C2	Angle	
Date	15/06/21		



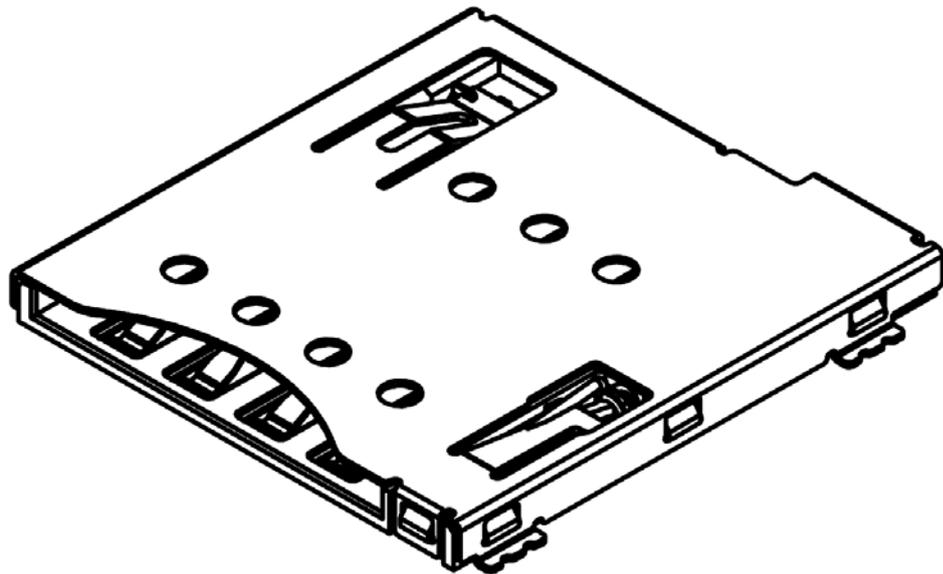
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Not to Scale	Drawn By AJO	Sheet No. 3/3
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# PRODUCT SPECIFICATION

<b>Part Number</b>	SIM7100	<b>Rev</b>	C	<b>Date</b>	17/12/19		
<b>Product Description</b>	Micro SIM Card Connector, Push-Push, 6 or 8 Pin, SMT, 1.5mm Profile, With Card Detection Switch			<b>Page</b>	1		
<b>Doc Number</b>	SIM7100	Prepared	CC	Checked	VJ	Approved	PH



# PRODUCT SPECIFICATION

<b>Part Number</b>	SIM7100	<b>Rev</b>	C	<b>Date</b>	17/12/19
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				<b>Approved</b>	<b>PH</b>

## 1.0 SCOPE.

This specification covers performance, tests and quality requirements for the Micro SIM Card Connector SIM 7100 (Push-Push Type, 6 or 8 Pin, SMT, 1.5mm Profile).

## 2.0 PRODUCT NAME AND PART NUMBER.

Micro SIM Card Connector, 6 or 8 Pin, Push-Push Type: SIM7100.

## 3.0 PRODUCT SHAPE, DIMENSIONS AND MATERIAL.

Please refer to drawings.

## 4.0 RATINGS.

Current rating ..... 1.0 Amp Max.  
 Voltage rating ..... 50 Volts DC Max.  
 Operating Temperature Range ..... -40°C to +85°C  
 Storage Temperature ..... -40°C to +85°C

## 5.0 TEST AND MEASUREMENT CONDITIONS.

Product is designed to meet electrical, mechanical and environmental performance requirements specified in Paragraph 6.0. All tests are performed at ambient environmental conditions unless otherwise specified.

## 6.0 PERFORMANCE.

Item	Test Condition	Requirement
Examination of Product	Visual, dimensional and functional inspection as per quality plan.	Product shall meet requirements of product drawing and specification.

# PRODUCT SPECIFICATION

<b>Part Number</b>	SIM7100	<b>Rev</b>	C	<b>Date</b>	17/12/19
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				<b>Approved</b>	<b>PH</b>

## 6.1 Electrical Performance.

Item	Test Condition	Requirement
Contact Resistance	Mate connector, measure and record contact resistance using test a current of 10mA max and 20mV open circuit voltage, in accordance with IEC 60512-2-1.	Signal: 100 mΩ Max. Switch: 300 mΩ Max
Insulation Resistance	Apply 500Volts DC between adjacent contacts of unmated connector for one minute, in accordance with IEC 60512-3-1.	1000 MΩ minimum
Dielectric Strength	Unmated connector with 500 VAC for 1 minute between adjacent contacts, in accordance with IEC 60512-3-1.	No creeping discharge or flash over.

## 6.2 Mechanical Performance.

Item	Test Condition	Requirement
Durability	The SIM card should be mated and unmated for 1500 cycles at a rate of 500 cycles/ hour.	No evidence of physical damage.  Contact Resistance Signal: 100 mΩ Max. Switch: 300 mΩ Max at end of test
Vibration(Random)	Frequency: 10 -100 Hz ,0.0132g <sup>2</sup> /Hz ; 100 - 500Hz, -3dB/Oct. Applied for 1 hour in each 3 mutually perpendicular axes In accordance with IEC60068-2-64Fh.	No evidence of physical damage  Contact Resistance Signal: 100 mΩ Max. Switch: 300 mΩ Max at end of test Current discontinuity ≤ 1 μs
Mechanical Shock	Pulse shape=half sine Peak acceleration =50G Duration of pulse=11ms Apply 3 shocks in each direction along the 3 mutually perpendicular axes (18 shocks). In accordance with IEC60068-2-27Ea.	No evidence of physical damage  Contact Resistance Signal: 100 mΩ Max. Switch: 300 mΩ Max at end of test Current discontinuity ≤ 1 μs

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<b>Part Number</b>	SIM7100	<b>Rev</b>	C	<b>Date</b>	17/12/19
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				<b>Approved</b>	<b>PH</b>

## 6.3 Environmental Performance and Others.

Item	Test Condition	Requirement
Thermal Shock	<p>The card shall be mated and exposed to the following condition for 25 cycle at <math>T_a = -40^\circ\text{C}</math> for 0.5 hours; change of temp=<math>25^\circ\text{C}</math> maximum 5min; then <math>T_b = +85^\circ\text{C}</math> for 0.5 hours; cool to ambient.</p> <p style="text-align: center;">In accordance with IEC60068-2-14.</p>	<p>No evidence of physical damage, Contact Resistance Signal: 100 m<math>\Omega</math> Max. Switch: 300 m<math>\Omega</math> Max</p>
Humidity Test	<p>The card shall be mated and exposed to temperature of <math>40 \pm 2^\circ\text{C}</math> with 90-95% RH for 500 hours then place in ambient temperature for 1 to 2 hrs.</p> <p style="text-align: center;">In accordance with IEC60068-2-3.</p>	<p>No evidence of physical damage, Contact Resistance Signal: 100 m<math>\Omega</math> Max. Switch: 300 m<math>\Omega</math> Max</p> <p>Insulation resistance <math>\geq 1000</math> M<math>\Omega</math> Dielectric: No creeping discharge or flash over.</p>
Salt mist	<p><math>5 \pm 1\%</math> salt concentration 24 hours <math>35 \pm 2^\circ\text{C}</math>.</p> <p style="text-align: center;">In accordance with IEC60068-2-11.</p>	<p>No rust on contact area Contact Resistance Signal: 100 m<math>\Omega</math> Max. Switch: 300 m<math>\Omega</math> Max</p>
Temperature Life (High)	<p><math>85 \pm 2^\circ\text{C}</math> for 96 hours. Recovery time 1-2 hours under ambient conditions.</p> <p style="text-align: center;">In accordance with IEC60068-2-2Bb.</p>	<p>No evidence of physical damage, Contact Resistance Signal: 100 m<math>\Omega</math> Max. Switch: 300 m<math>\Omega</math> Max</p>
Temperature Life (Low)	<p><math>-40 \pm 3^\circ\text{C}</math> for 96 hours. Recovery time 1-2 hours under ambient conditions.</p> <p style="text-align: center;">In accordance with IEC60068-2-1Ab</p>	<p>No evidence of physical damage, Contact Resistance Signal: 100 m<math>\Omega</math> Max. Switch: 300 m<math>\Omega</math> Max</p>
Temperature Rise	<p>Apply test current of loaded rating and measure the temperature rise of contact when rated current is passed.</p> <p style="text-align: center;">In accordance with EIA-364-70 Method 1.</p>	<p><math>30^\circ\text{C}</math> Max.</p>
Solderability	<p>Dip solders tails into molten solder up to a depth of 0.5mm, held at a temperature of <math>250 \pm 5^\circ\text{C}</math> for <math>3 \pm 0.5</math> second.</p>	<p>95% of immersed area must show no voids of pin holes.</p>
Resistance to Reflow Soldering Heat.	<p>Mount connector, place in reflow oven and expose to the temperature profile with peak temperature of <math>250^\circ\text{C}</math> for 15seconds. See Fig. 1.</p>	<p>No evidence of physical damage or abnormalities adversely affecting performance</p>

# PRODUCT SPECIFICATION

<b>Part Number</b>	SIM7100	<b>Rev</b>	C	<b>Date</b>	17/12/19		
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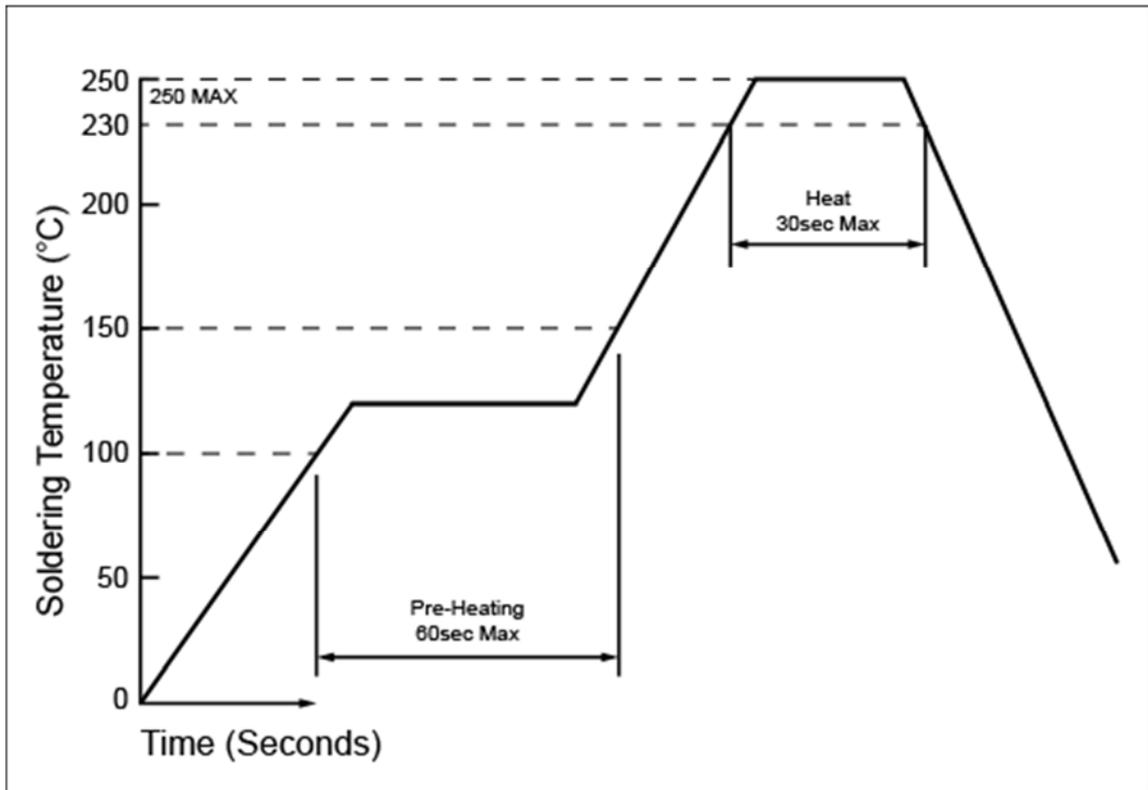


Fig. 1. Recommended Reflow Temp. Profile

# PRODUCT SPECIFICATION

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<b>Product Description</b>	Micro SIM Card Connector, Push-Push, 6 or 8 Pin, SMT, 1.5mm Profile, With Card Detection Switch			<b>Page</b>	6		
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## 7.0 PRODUCT QUALIFICATION AND TEST SEQUENCE

Test Item	Group									
	A	B	C	D	E	F	G	H	I	J
Examination of Product	1,5	1,5	1,5	1,5	1,9	1,6	1,3	1,3	1,9	1,3
Contact Resistance	2,4	2,4	2,4	2,4	2,6	2,5			2,6	
Insulation Resistance					3,7				3,7	
Dielectric Withstanding					4,8				4,8	
Durability					5					
Vibration(random)						3				
Mechanical Shock						4				
Thermal Shock	3									
Humidity									5	
Salt mist		3								
Temperature Life (High)				3						
Temperature Life (Low)			3							
Temperature Rise								2		
Solderability							2			
Resistance to Reflow Soldering Heat.										2
Sample QTY.	5	5	5	5	5	5	5	5	5	5

# PRODUCT SPECIFICATION

<b>Part Number</b>	SIM7100	<b>Rev</b>	C	<b>Date</b>	17/12/19		
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## Revision details

Revision	Information	Page	Release Date
A	Specification Released	-	05/09/2014
B	Update the 3D image on the cover page	1	18/04/2018
C	Update the 3D image on the cover page	1	17/12/2019