

ST4SIM solutions for M2M cellular connectivity



M2M Industrial & IoT Growing demand for wireless connectivity applications

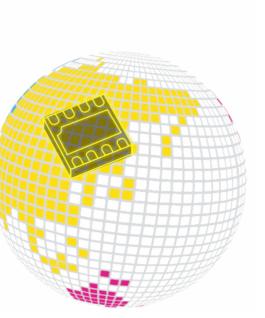




Connecting everything everywhere

Several connected devices using cellular networks

Providing connectivity services wherever you go



- ✓ Always connected
- ✓ Real-time asset management
- ✓ Improved coverage
- ✓ Flexible connectivity



Introducing the SIM & eSIM concept

From the removable SIM to the soldered and interoperable eSIM

Classical SIM Card Removable

Traditional SIM concept inherited from mobile phone



1 SIM Card = 1 operator

Embedded SIM (eSIM) Soldered

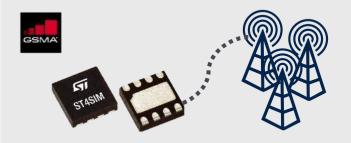
An optimized footprint and reliable package as soldered



1 eSIM Card = 1 operator

GSMA-certified eSIM Soldered & Interoperable

Possibility to change remotely the operator without replacing the SIM



1 eSIM Card = [X] operator



ST4SIM solution overview

Secure cellular connectivity solutions for IoT, Industrial & Automotive

Wide range of SIM/eSIM solutions

based on Basic, Cryptographic and GSMA SGP.02 configurations

GSMA eSIM certified and interoperable with MNOs & Subscription Management platforms

Complete ecosystem with trusted partners for connectivity & Subscription Management Platforms

Industrial & Automotive grade solutions (T° & reliability)

Multiple packages (Card plugin, MFF2, WLCSP, TSSOP20)

ST4SIM complete portfolio

Internet of ThingsIndustrialAutomotiveImage: Strain Str

ST4SIM-S

ST4SIM-M

ST4SIM-A

Basic SIM & eSIM (ST4SIM-100 S / M)

Optimized and Cost effective

Crypto SIM & eSIM (ST4SIM-110 S/M/A)

Advanced secure communication

GSMA eSIM (ST4SIM-200 M / A)

Scalable & interoperable solution



ST4SIM complete portfolio

ST4SIM meets customer needs

ST4SIM-100x



- Classic SIM compliant to ETSI/3GPP
- Java Card-based OS
- Pre-defined Telecom Operator
- + Available on card plug-in and MFF2
- + IoT and Industrial
- Optimized for Low Power (ETSI Suspend/Resume)





- Classic SIM compliant to ETSI/3GPP
- Java Card-based OS
- Pre-defined Telecom Operator
- Based on CC EAL5+ certified chip
- Available on card plug-in, MFF2, WLCSP
- + IoT, Industrial & Automotive
- Optimized for Low Power (ETSI Suspend/Resume)



ST4SIM-200x

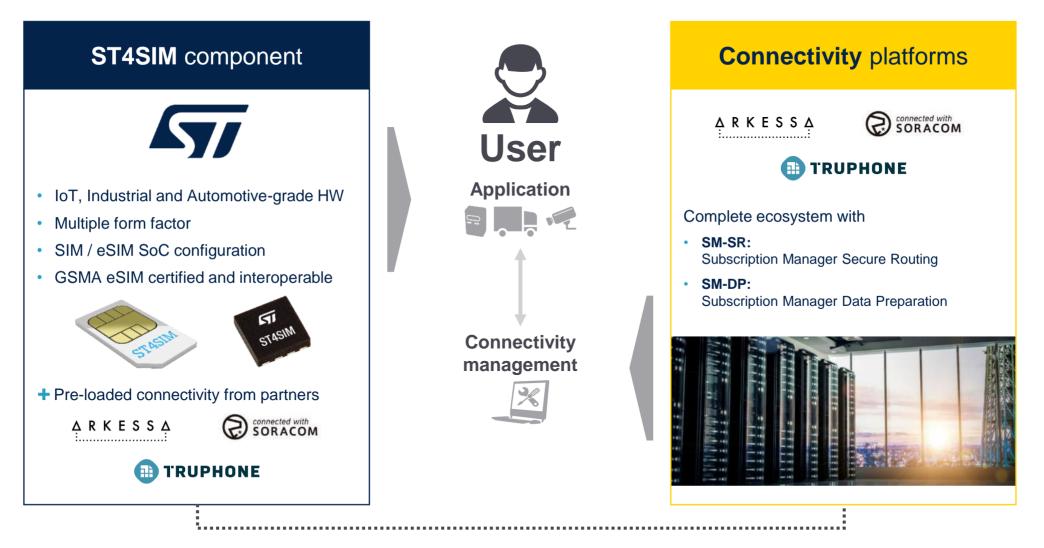
- eSIM compliant to GSMA SGP.02 v3.2
- Pre-defined bootstrap Operator and Subscription Manager from partner
- Based on CC EAL5+ certified chip & GSMA certified



- Available on card plug-in, MFF2, WLCSP
- + IoT, Industrial & Automotive
- Optimized for Low Power (ETSI Suspend/Resume)

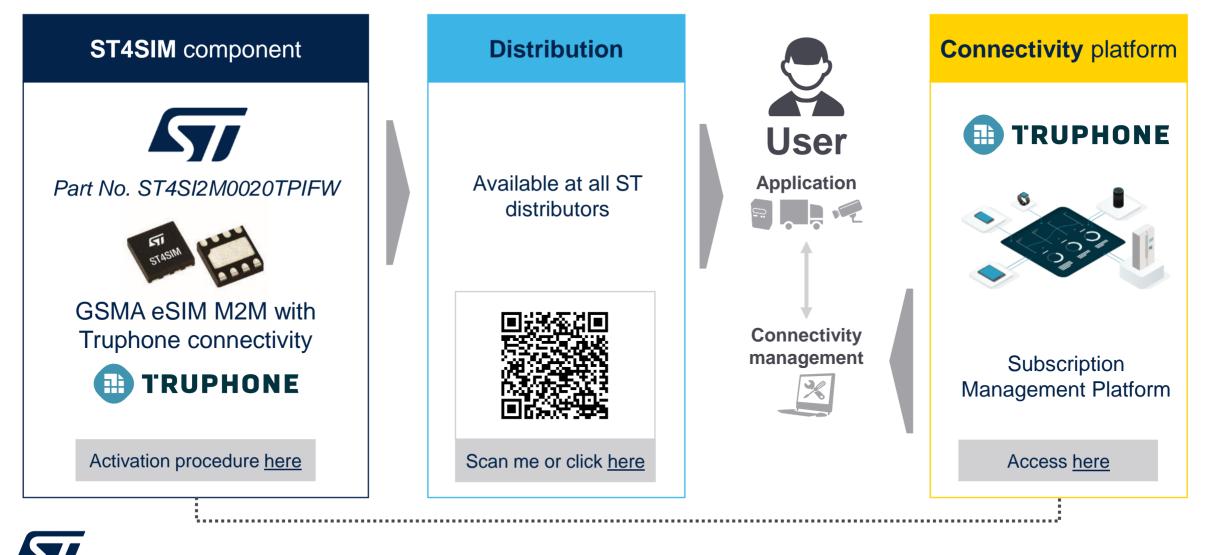


ST4SIM ecosystem





ST4SIM-200M available at e-distribution



9

Secure connectivity solutions



Cellular Connectivity secure solution Leader

SIM / eSIM for consumer or IoT devices (GP / GSMA-certified) Proven field quality with more than 1.7 billion ST33 family cards deployed

J<u>EDEC</u>.

Common Criteria

Strong reliability and security in Industrial and Automotive markets

Industrial-grade qualification JEDEC [-40°C / +105°C] Automotive-grade qualification AEC-Q100 grade 2 [-40°C / +105°C] Common Criteria EAL5+ certified solutions



State-of-the-art secure product

State-of-the-art, secure and flexible embedded OS (including certified cryptographic algorithms) Java Card applet development (Extended OS features and added services) Standard involvement (GSMA / SIMalliance / Global Platform / 3GPP / ETSI / Car Connectivity Consortium)

ST4SIM documentation





ST4SIM solutions takeaways

IoT, Industrial and Automotive grade solutions

Complete cellular connectivity solution with trusted partners



Interoperability with large panel of partners (platform/MNO)

Our technology starts with You



© STMicroelectronics - All rights reserved. ST logo is a trademark or a registered trademark of STMicroelectronics International NV or its affiliates in the EU and/or other countries. For additional information about ST trademarks, please refer to <u>www.st.com/trademarks</u>. All other product or service names are the property of their respective owners.

