

ANNEX A: FACTSHEET ON 5G@SENTOSA AND SMART NATION SENSOR PLATFORM

5G@Sentosa Timeline

Jan 2021

5G@Sentosa project awarded to Singtel

Aug 2021

5G network and associated systems deployed

Aug 2021 - Aug 2023

2-year window for agencies to conduct trials

5G@Sentosa Technical Offerings for Agencies Trials



- Main 3.5Ghz near-Sentosa-island-wide outdoor coverage to support general outdoor use cases (excludes Sentosa Cove and Golf Course area)
- Seaward 3.5Ghz coverage south-west of Sentosa to support drones/sea vessel trials
- Old Ranger Station Building with 3.5Ghz indoor coverage to support indoor use cases
- Palawan Green 28Ghz site to support mmWave use cases
- 5G Standalone Network full access to advance 5G capabilities (eg network slicing, ultra-low-latency)
- MEC (multi-access edge compute) for application hosting within 5G network
- Includes BareMetal, AWS and Azure MEC platforms



Offers full suite of 5G capabilities so that agencies can develop future proof trials that can be applicable for deployment with the future 5G networks in mainland

Multiple types of 5G coverage to cater

for agencies trials that can be

representative of deployment

scenarios in mainland

5G Peripherals

5G Network &

Platform Capabilities



- Inventory of SIM Cards and devices to support agencies trials
- Different types of devices for different connectivity requirements (handphones, MIFI, normal and ruggedized routers)



Providing agencies with easy access to essential 5G peripherals to facilitate trials

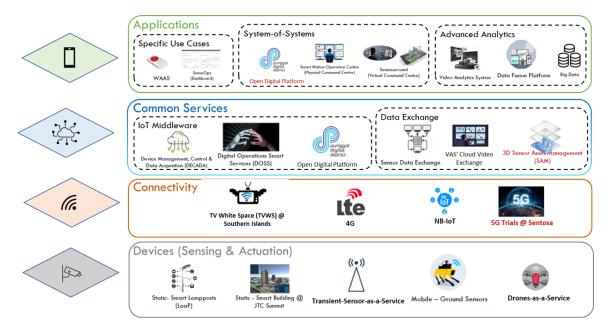


opyright © Government Technology Agency. Not to be reproduced without permission



Background on Smart Nation Sensor Platform

The Smart Nation Sensor Platform (SNSP) is a whole-of-government technology platform that translates data from sensors and IoT devices into situational awareness of what's happening in urban spaces in Singapore. Through the SNSP, GovTech aims to partner with other public agencies to transform their concept of operations with sensors and IoT technology.



The SNSP is made up of:

- A nationwide network of sensors and IoT devices that collect real-time information from the physical world
- Technologies to translate the collected sensor data into intuitive insights for decision-making, such as artificial intelligence (AI), 3D visualisation, and data analytics tools.
 These are divided into four interconnected layers, as shown in the diagram above

The SNSP follows a 3-step process – Sense, Contextualise, Act – in bridging the cyber and physical worlds with real-time sensor data:

Sense

The SNSP senses what's happening in real time across the nation – and shares timely and relevant data across the Government's IT infrastructure.

Examples: temperature or air quality within a district, crowd levels at a traffic junction, power consumption in a building

Contextualise

The SNSP analyses large amounts of raw data to produce actionable insights.



Examples: automated charts of real-time hotspots or historical trends, simulations for scenario planning

• Act

The SNSP makes data-driven decisions without being at the physical location.

Examples: automated notification and workflows, integrated smart systems