

# **Executive Summary**

# JOHOR SMART CITY

Blueprint





### PLANMalaysia@Johor

(Jabatan Perancangan Bandar dan Desa Negeri Johor)

In collaboration with

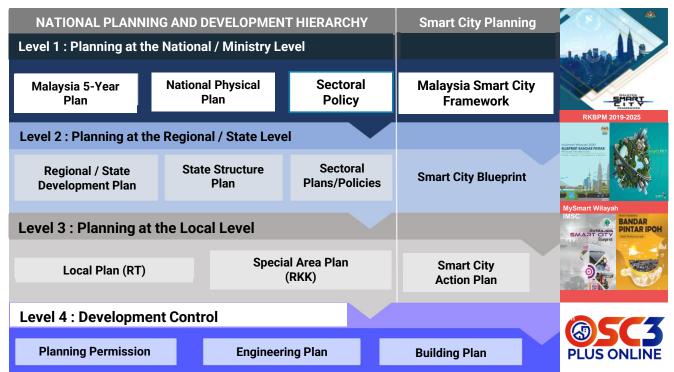
### **PLANMalaysia**

(Jabatan Perancangan Bandar dan Desa) Kementerian Pembangunan Kerajaan Tempatan

### **BUILDING FUTURE SMART CITIES**

The **Johor Smart City Blueprint 2030** is an initiative that represents the aspiration of a Smart State by the Johor State Government. This Action Plan outlines the direction of Smart City planning and development through policies, strategies, and initiatives focused on the People-Centric Smart City, which aims to develop Smart Cities that prioritise and meet the needs of the people of Johor in addressing urban issues and challenges. This implementation will be facilitated and integrated by leveraging technology (technology-oriented approach) and smart solutions to enhance the quality of life, economy, and environmental sustainability.

### The Smart City Blueprint in the National Planning and Development Hierarchy



# WHAT IS A SMART CITY?

information and communication
technology (ICT) and technological
advancements to address urban issues and challenges
to enhance the quality of life, economy,
and environmental sustainability and
ensure effective and efficient city
management

(Malaysia Smart City Framework (RKBPM) 2019-2025)

## **EVOLUTION AND DEVELOPMENT** OF JOHOR SMART CITY

2008



### **Johor State Structure Plan (RSN) 2020** Introduced smart systems for :

- Centralised traffic management;
   Integrated public transport information and control system; and

  Government delivery facilities.

2012

### Johor Tourism Master Plan 2014-2023

 Transformation of State tourism services through smart applications.

Iskandar Malaysia Smart City

MBJB, MBIP, MBPG, MPKu dan MP Pontian



2013 | Initial CCTV Installation in 36 locations in Muar.



### 2014 I Command Centre Platform

facilitates traffic information management and city monitoring in Johor Bahru City. It has been upgraded to Smart Centre MBJB in 2021.



2014 I Online complaints via the WhatsApp application to facilitate communication with the public. A pilot project in Muar District.



2015 | Radar-based Smart Traffic **Lights** conceived through the use of the Dynamic Traffic System (DTS). A pilot project in Pontian area.



2018 | Zapper Code, uses artificial intelligence (AI) to enable people to access and interpret the Muar mural project augmented reality content through a smartphone.



2018 | Smart Street Lighting (LED) is equipped with sensors and timers, located on the main roads and residential areas in Muar. Batu Pahat. Pontian and other districts



2018 | Smart Vending Machines, are reverse vending machines that reward users in exchange for recyclable materials, placed in recreation areas of Muar District and through mobile vans/counters.



2016 l e-Job introduced in Kluang District to give access to job vacancies in the district.



2016 | Sistem GeoLedang facilitates access to geospatial information for planning and development purposes in Tangkak District.

### 2015 Comprehensive Development Plan ii (CDPii) 2014 - 2025; Iskandar Malaysia

- A high-impact transformation programme as a catalyst for economic, social, environmental, regulatory and spatial management development.
- Introducing physical projects including the development of IMUO

### Johor State Structure Plan (RSN) 2030

2018 The adoption of a Smart City system towards a progressive and prosperous Johor, supported by equitable growth based on district niche areas, mainstreaming sustainability, and focusing on the well-being of the people. It contains 33 strategic directions, 77 development strategies, and 428 implementation initiatives.

### Malaysia Smart City Framework (MSCF) 2025

2019 A national-level framework that serves as a guide and reference to local authorities (PBT), state governments, ministries and departments, industry players, and stakeholders in planning and developing a holistic Smart City in Malaysia. It contains 16 policies, 36 strategies, 112 initiatives, and 92 indicators.



2019 | Smart Bin is based on the 5R + 2C (Rethink, Replace, Reuse, Reduce, Recycle + Composting and Closing the Loop) concept, with a focus on providing special bins in residential areas.

2019 | Smart Low Carbon Transportation Monitoring System record the number of vehicles and the current carbon emission rate by vehicle.

2019 | Treesid - Green Area/ Tree Cover/ Tree Inventory, a complete and safe online amenity tree management software system initiated in the Kluang area.

Johor Sustainable Development Plan (PPMJ) 2030

Aims to realise the vision of the State of Johor as a High-Performance State (Negeri Berprestasi Tinggi) and the Intelligent Johor Nation (Bangsa Johor Beštari).



2021 Smart City Integrated Operation Centre and Smart City Dashboard The development of a special Smart City display in line with the

Malaysia Urban Observatory (MUO) started in the Batu Pahat Municipality area.



Source: Johor Smart City 2030 Study

JOHOR STATE EXISTING CONDITIONS AND PROSPECTS

MELANA Translation (INC. Translation

**Landuse, Population and Employment** 



1,920,885 hectares



**4.01** millions Population



**29.09% Skilled Workers** (513,400 workers)



**10% Built-ups** (190,666 hectares)



**25.42% Forests** (422,477.69 hectares)



**1.98% Water Bodies** (38,055.85 hectares)

(1,283,994 hectares)

**68.84%** Agriculture



**1.83% Vacant Lands** (35,286.16 hectares)

### **Prospects**



Investment destination and main contributor (9.23%) to the National GDP



Iskandar Malaysia as the Southern Economic Region



Strategic location as the gateway to southern Malaysia and proximity to Singapore and Indonesia

Johor Bahru (MBIP, MBJB, MBPG) Area: 106,399 hectares



Johor Bahru - Singapore Rapid Transit System Link (RTS Link) project



Good facilities and attractive international tourism destinations



Bilateral relations between Johor, Singapore, and Riau (SIJORI)



Johor State High Impact Development Zone -Pagoh Special Economic Zone (PSEZ)



High rate of working age (15-64 years) of 69.1%



High rates of access to ICT services and equipment (99.4% mobile phones and 81.4% computers)

# **CHALLENGES OF URBANISATION**



Improving E2E Services



Reducing Private Ridership



Leveraging Talented Human Capital



Optimising
Sustainable
Energy
Resources



Providing Good Healthcare



Elevating Digital Services Level of Use



Improving the Wellbeing of Senior Citizens



Intensifying Business Digitalisation



Increasing Sustainable Water Usage



Strengthening B40 Income



Reducing Crime Rate



Providing Affordable Housing



Strengthening Sustainable Solid Waste Management



Minimising Flood Risks



Mainstreaming
Use of Digital
Technology



Promoting Use of Public Transportation



Developing Skilled Workers



Enhancing Environmental Quality



Boosting Broadband Speed, Connectivity and Coverage



Expanding
Industry and HE
Institutions
Collaborations

# JOHOR SMART CITY IMPLEMENTATION CHALLENGES

**70%** 

of the 169
Sustainable
Development Goals
(SDGs) targets can
be accomplished by
leveraging Fourth
Industrial Revolution
(4IR) technologies

84%

of Internet of Things (IoT) usage can resolve urbanisation challenges



### **Lack of Financial Resources**

to fund smart initiative implementation, technology adoption, and risks mitigation



### **Inter-Agency Data Integration**

is still deficient



### **Lack of Inter-Agency Cooperation**

resulting in operational duplications and increased costs



### The Capabilities of Digital Infrastructure

vary by district and city



### The Digital Level of Society

shows a lack of acceptance in embracing the usage and utilisation of digital technology in its lifestyle



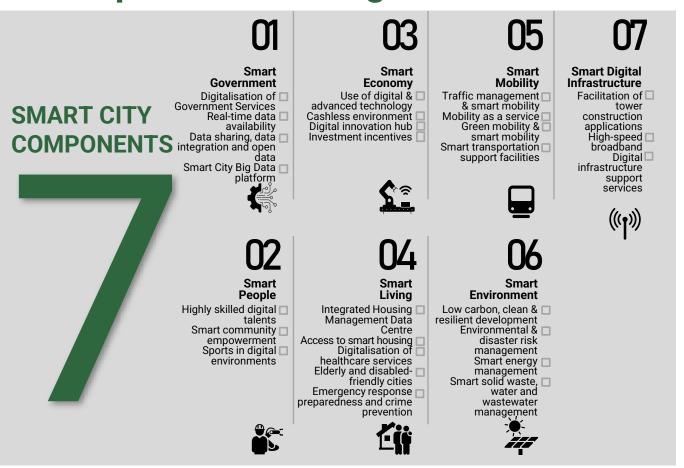
### **Staff Shortages and Insufficient Expertise**

in technology and ICT to manage the implementation of an initiative



## **VISION**

# Livable Johor by 2030 through the Smart City Initiative for the People's Well-Being



The Johor Smart City outlines efforts and comprehensive planning for:

- a. Preparing the State of Johor as a Smart State by 2030;
- b. Supporting the State of Johor's commitment at the National and International levels; and
- c. Implementing policies, strategies, and projects/ programmes that have been developed as a guide and commitment to the **necessary actions**.

124 111 119 **STRATEGIES TARGET INITIATIVES POLICIES IMPLEMENTING INDICATORS AGENCIES** 

### Policy (D), Strategy (S) and Initiatives (I)

### **Smart Government**

### D1

### **Digitalisation of Government** Services

### **Government Transformation** towards Digital Services

- 11 | Developing Online E2E Services
- 12 | Developing Johor Gateway Portal
- 13 | Developing a Digital Service Monitoring Platform

### Strengthening of ICT Infrastructure & Skills

- 14 | Performing an assessment of the ICT infrastructure capacity level
- 15 | Creating Cloud Johor
- 16 | Establishing Cyber Security Governance
- 17 | Providing and enhancing training and technology skills programmes for government employees
- 18 | Encouraging self-training

### Implementation of National Digital Identity

19 | Implementing Johor's National Digital Identity

### **Adoption of Digital Signatures**

110 | Enforcing Digital Signatures

### D2

### City Management in Real-Time

### **Real-Time Data Generation**

111 | Enhancing the use of sensors / smart devices

### D3

### **Data Sharing, Data Migration** and Open Data

### **Encourage Data Sharing &** Integration

Formulating Data Policy (Data Sharing, Data Integration and Open Data)

### D4

### Smart City Big Data Platform

### **Establishment of Big Data Platform**

- 113 | Establishing Johor Urban Observatory
- 114 | Setting up Local Urban Observatory
- 115 | Forming a Data Analytics Section

### Setting Up of Smart Operations & **Control Centre**

116 | Constructing a District Intelligent Operation Centre (DIOC)

### **Smart People**

### D5

### **Highly Skilled Digital Talents**

### **Development of Digital Talents**

117 | Providing and diversifying training and industry collaboration for workforce development

### **Establishment of Database**

118 | Developing Integrated Skills Training Hub Platform

### **Enhanced Digital Technology** Access, Programmes, and Use

- 119 | Intensifying enrolment in TVET education
- 120 | Incorporating STEM education in teaching and learning
- 121 | Organising STEM, TVET and HTVET Programmes

### Access to Digital Learning

- 122 | Expanding DELIma implementation
- 123 | Improving the availability and readiness of technology and infrastructure
- 124 | Introducing "My Device" Programme
- 125 | Accelerating high-speed broadband

### D6

### **Smart Community Empowerment**

### **Empowering Smart Community**

- 126 | Transforming Community Centres as Digital Skills Training
- 127 | Developing Digital Interaction Platforms

### **D7**

### Leveraging Sports in a Digital Environment

### Improvement of e-Sport Development

128 | Strengthening research and development of e-Sport

### Sports as an Active Lifestyle

129 | Developing Sports Digital Platforms

### Note:

- 1. D: Policy | S: Strategy | I: Initiative/Project/ Programme
- Please refer to Johor Smart City Blueprint 2030 for detailed Implementing Agencies and Target Indicators for every Initiative/Project/ Programme

### of Johor Smart City by Component

### 03

### Smart Economy

### D8

### Adoption of Digital and Advanced Technologies

#### **S16**

Harnessing of Digital Technology and Innovation to Boost Readiness of SMEs, MSMEs & SMEC

- I30 | Increasing the use of IoT-based Smart Precision Agriculture techniques
- I31 | Intensifying the application of digital technology in the manufacturing sector
- I32 | Enhancing the application of digital technology in the services sector
- I33 | Increasing participation and engagement in programmes and Skills Training
- 134 | Integrating information from various agencies through the Johor Entrepreneur Data Centre (PADU)

### S17

### Leveraging eCommerce Platform

- I35 | Intensifying participation of SMEs, MSMEs and SMEC in the eCommerce platform
- I36 | Expanding local eCommerce Perkhidmatan e-Dagang Setempat (PeDAS)

### D9

### **Cashless Environment**

#### 919

Provision of Online Payment Gateway Facilities

- 137 | Harnessing potential to develop Johor Single Sign-On Payment Gateway
- 138 | Promoting Online Business transactions
- 139 | Exploring new generation Digital Payment technology

### D10

### Digital Innovation Hub Ecosystem

#### **S19**

Development of Digital Innovation

I40 | Johor Technology & Innovation Sandbox

### D11

### **Attractive Incentives**

### S20

**Provision of Investment Incentives** 

- I41 | Designing Smart City innovative incentives
- 142 | Building crowdfunding platforms

### 04

### **Smart Living**

### D12

### Integrated Housing Data Centre

### S21

Establishment of a Housing Data Centre

- I43 | Upgrading e-Rumah Johor system

### D13

### Access to Smart Housing

#### S22

Incorporation of Smart Home Elements

- 145 | Enforcing installation of Smart Energy Meter and Smart Water Meter
- I46 | Ensuring that new developments are equipped with high-speed Internet access

### D14

### Digitalisation of Healthcare Services

#### S23

**Expansion of Virtual Clinic Services** 

147 | Increasing the number of virtual clinics

#### **S24**

### Encourage the Use of Health Apps

148 | Promoting MOH mobile apps

#### 625

Implementation of Electronic Medical Records

149 | Expanding Electronic Medical Report (EMR)

### D15

### Elderly and Disabled-Friendly Cities

#### S26

Improvement of City Facilities and Infrastructure

- 150 | Imposing conditions for the provision of elderly and disabledfriendly facilities in new developments
- 151 | Providing a Virtual Care Monitoring Platform

### D16

### Smart Crime Prevention, Emergency Preparedness and Response

#### **S27**

Enhancement of City Security through Smart Monitoring System

- I52 | Increasing installation of CCTV
- 153 | Enforcing the installation of CCTV in new developments
- I54 | Strengthening inter-agency CCTV and data sharing
- I55 | Enhancing panic button provisioning

#### S28

### Extensive Mapping of Crime Areas

I56 | Integrating the Safe City Monitoring System (SPBS) into Johor Urban Observatory (JUO)

#### 520

Implementation of the Crime Prevention Through Environmental Design (CPTED) Concept

157 | Imposing CPTED in new developments

### Policy (D), Strategy (S) and Initiatives (I)

### 05

### **Smart Mobility**

### D17

### Smart Traffic and Transportation Management

### 630

### Smart Traffic Management and Monitoring

- 158 | Establishing a Smart Traffic Management Centre
- I59 | Interfacing Commercial Vehicle Operation Information System Data with DOIC
- I60 | Using the Smart Integrated Mobility Management System as a traffic management framework in the JB Region
- I61 | Setting up Traffic and Public Transport Management Units in Local Authorities (PBT)

### D18

### Mobility as a Service (MaaS)

### S31

### MaaS Platform

- I62 | Upgrading geopaj.com.my system
- I63 | Developing Mobile Applications for Public Transportation

### D19

### Green Mobility and Active Mobility

#### 000

### Enhancing the Utilisation of Green and Active Mobility

- I64 | Prioritising low-carbon vehicles for Government official vehicles
- I65 | Implementing a Sustainable Urban Mobility Plan
- I66 | Providing active mobility infrastructure

### D20

### Smart Transportation Support Services

#### \$33

### Upgrading of Infrastructure Facilities

- 167 | Providing Park n Ride facilities and smart support
- 168 | Installing EV charging ports
- 169 | Constructing green highway network with special facilities

### S34

### Enabling a Single Integrated and Unified Mobile Application

170 | Developing a single parking application for the State of Johor

### 06

### **Smart Environment**

### D21

### Low Carbon, Clean and Resilient Developments

#### \$3!

### Developmental Implementation of the Energy Efficiency Initiatives

- I71 | Imposing prerequisites for energy efficiency facilities in new developments
- 172 | Retrofitting government and private buildings

### S36

### Fostering Energy Reporting through Local Authority (PBT) Monitoring

I73 | Adopting a carbon monitoring and auditing system based on BEMRS

### S37

### **Green Building Certification**

174 | Enforcing compulsory Green Building Certification for new developments

#### 538

### Generation of Renewable Energy

- I75 | Developing waste to energy facilities
- 176 | Setting up biogas and biomass energy plants
- I77 | Exploring renewable energy development of solar energy farms

#### 620

### Smart Park and Tree Management System

- 178 | Providing Smart Park support facilities
- I79 | Preparing a Tree Inventory and Encyclopedia
- 180 | Developing a Smart Park and Tree Management platform

### D22

### Environmental Management and Disaster Risk

#### S40

### **Holistic Disaster Management**

181 | Developing a disaster management platform in DIOC

### D23

### Smart Energy Management

### S41

### Smart Energy Management through a Smart Grid

182 | Accelerating Smart Grid implementation

### D24

### Smart and Sustainable Solid Waste Management

#### S42

### Leveraging Technology and IoT in Solid Waste Management

183 | Strengthening the Smart Solid Waste Management System

#### S43

### Construction of Solid Waste Management Facilities

- 184 | Expanding material recovery facility
- 185 | Building and managing recycling centre facilities
- 186 | Developing a compost manure processing site
- 187 | Recycling of solid waste for compost fertilizer production
- 188 | Strengthening law enforcement

### of Johor Smart City by Component

06

### Smart Environment

D25

### Smart and Sustainable Water Management

#### \$44

Leveraging Technology and IoT for Water Management Efficacy

- 189 | Developing a smart water management system
- I90 | Constructing a new water treatment facility fortified with smart elements
- 191 | Reducing the rate of nonrevenue water (NRW) through the replacement of ageing pipes with smart elements

D26

### Smart and Sustainable Wastewater Management

#### S45

Smart Wastewater Treatment

- I92 | Reinforcing Centralised Sewage Treatment Plant (CSTP) requisites for new developments
- I93 | Developing Waste Water Reclamation (WRP)
- 194 | Regulating the implementation of the industrial Zero Discharge Concept through the adoption of advanced water treatment technology

#### **S46**

Centralised and Smart Rainwater Harvesting and Utilisation System (SPAH)

- 195 | Harnessing SPAH for new developments
- 196 | Studying the legal aspects of imposing intelligent design for SPAH

**07** 

### **Smart Digital Infrastructure**

### D27

Facilitating Applications for the Construction of Tower Structures and Digital Communication Infrastructure

#### **S47**

Coordination of Utility and Communication Services

197 | Creating a utility data integration platform

### S48

Implementation of Communication Infrastructure

- 198 | Adopting the development procedures for communication towers or structures by OSC
- 199 | Coordinating application fee and process

#### S49

Application of GPP-I MCMC at the Development Stage

- I100 | Allocating communication tower reserves as a development prerequisite
- I101 | Implementing GPP-I at the development stage
- I102 | Adopting GPP-MCI (Small Scale Infrastructure)

### D29

Support Services for Digital Infrastructure

#### \$5/

Coordinate and Standardise IoT Devices

I111 | Drafting new guidelines for the installation of IoT devices

### D28

Access to Quality Broadband Services

#### S50

Expanding Mobile Broadband Coverage to 100%

- I103 | Upgrading existing transmitters to 4G services
- I104 | Implementing 5G in industrial/potential areas

### **S51**

Enhance In-Building Coverage (IBC) and MCI Infrastructure

- I105 | Imposing conditions for the installation of IBC infrastructure in new developments
- I106 | Developing a database of buildings that have IBC issues
- I107 | Facilitating the MCI application and approval process

#### S52

Expansion of Fibre Optic Network and High-Speed Broadband Services

- I108 | Providing additional fibre optic fixed line services
- I109 | Enforcing the provision of fibre optic infrastructure for new developments

#### ·F2

Intensify the Provision of Free Wi-Fi/ Hotspot

I110 | Increasing the provision of complimentary Wi-Fi/hotspot

# **SMART PILOT**



### MB Johor Bahru

- 1. Intelligent Operation Centre (IOC)\*
- 2. Smart CDS Trash Trap - Gross **Pollutant Traps** (CDS-GPT)
- 3. Super Apps for **Greater JB\***



**MP Batu Pahat** 

- 1. Integrated Operation Centre (IOC) and **Smart City** Dashboard
- 2. Open Data Policy\*



### **MB** Iskandar Puteri

- City Wide Intelligent 1. **Operation Centre**
- 2. Use of EV Vehicles in **MBIP** Operations
- 3. MYEcoPLAN System\*
- 4. Digitalisation of **Property Tax** Assessment



**MP Muar** 

- 1. Geographical Asset **Management System\*** 2. Smart Street Lighting
- 3. Smart Van and Smart **Reverse Vending** Machine\*
- 4. Mud Balls
- 5. Grease Traps
- 6. Waste To Wealth
- 7. Waste Composting



### **MB Pasir Gudang**

- Pasir Gudang Data & Surveillance Command Center (PG DASCOM)
- 2. Smart Pole\*
- 3. Air Pollution Sensor (APS System)\*
- 4. Wastewater and Flood Sensors\*



MP Kulai

- MyPATIL 1.
- 2. Analytic CCTV\*
- 3. Geospatial & Planning Approval Smart System (GeoPASS)
- 4. Smart Traffic Lights\*



**MP Kluang** 

- 1. Smart Parking\*
- 2. Expansion of CCTV Coverage
- 3. Smart Digital Display (Integration with IOC)\*



**MP Segamat** 

- 1. Smart CCTV and Traffic Lights
- 2. Waste to Compost Programme\*
- 3. Installation of Solar Panels
- 4. Smart Parking MPS
- 5. Segamat Wifi Hotspot\*

## CITY **PROJECTS** In the State of Johor



### **MP Pengerang**

- 1. Smart Building
- 2. Pengerang Smart City Management Centre (Command Centre)
- 3. Pengerang Digital Application\*



### **MP Pontian**

- 1. Smart Traffic Light
- 2. Widespread Installation of Solar **Led Lights\***
- 3. SPAH System\*



### **MD Kota Tinggi**

- E-Khidmat System
- 2. Paylink Payment Kiosk
- 3. Online Payment **Application -**'JomPAY'\*



MD Tangkak

- 1. Waste Eco Park\*
- Record Management System
- 3. Digital Payment in License/Permit Issuance



**MD Simpang** Renggam

- 1. CCTV
- Installation 2. Solar **Photovoltaic** Panel System\*
- 1. CCTV Installation

**MD Yong Peng** 

2. Cashless **Environment** through Online **Payment** Gateways\*

**MD Mersing** 

1. Mersing Tourism **Operating** System (MeTOS)\*



**MD Labis** 

### **IRDA**

**ISKANDAR** 

- 1. Lampu Jalan **LED**
- 2. Smart Tourism
- 3. Smart Traffic Light
- 4. Smart CCTV\*
- 1. MagicX Tips Incubator Program\*
- 2. Academia -Industries Collaboration

Note: \* Refers to major pilot projects

# SMART CITY 2022 BLUEPRINT ROADMAP 2030

PHASE 1 2021-2022

# MOBILISATION AND PREPARATION OF BLUEPRINT

4 April 2021- Directives to prepare the Smart City Framework by the YAB Menteri Besar Johor at the State Planning Committee Meeting (SPC) No. 1/2021.

6 July 2021- Approval of Johor Smart City Blueprint Terms of Reference (TOR) at SPC Meeting No. 2/2021.

- **16 August 2021-** Blueprint kickoff meeting held online with multiple stakeholders' participation.
- 1 21 September 2021- A survey was conducted to obtain the views of Johor State's general public and agencies.
- 11 12 October 2021 Engagement Session Series 1 involving 16 PBTs, 113 agencies and 14 Smart City experts.

November – December 2021- Preparation of Blueprint Interim Report.

- **25 January 2022** Engagement Session Series 2
- 15 17 February 2022 Smart City Blueprint Preliminary Draft Refinement Meeting.
- **15 March 2022** Smart City Blueprint Preliminary Draft Technical Committee Meeting.

### 18 April 2022 -

Smart City Blueprint Final Draft Technical Committee Meeting.

9 May 2022 -

SPC Meeting No.1/2022

### PHASE 2

### 2022-2023



### SMART CITY PLANNING

- Establishment of a Working Committee under the Johor Digital Council to strengthen the Smart City implementation governance.
- Establishment of the Smart City Project Management Office (SCPMO) under the purview of PLANMalaysia@Johor.
- Identification of implementation methods, funding sources, and opportunities for collaboration and strategic cooperation.
- Identification of cities as a test bed for the implementation of relevant Smart City initiatives.
- Encouraging the preparation of Smart City Action Plans.
- Identification of project initiative proposals, implementation schedules and timeframes by priorities (quick win, short, medium, and long term), and agency/stakeholder roles and responsibilities in consonance with MS ISO 37122:2021.
- 7. Conducting Smart City awareness/training programmes.

### PHASE 3

2023-2026

### IMPLEMENTATION AND MONITORING

- Monitoring the Implementation of Johor Smart City Blueprint Initiatives.
- Advancing the implementation of Smart Cities through Initiatives applicable at the development phase.
- Improving the availability, accessibility and performance of digital infrastructure to achieve comprehensive coverage and increased penetration rate of highspeed broadband in line with JENDELA planning.
- Enhancing inter-agency and stakeholders' cooperation.

### PHASE 4

2026-2030



### **REVIEW**

- Monitoring initiatives implementation and, continuous progress and advancement.
- Evaluating the efficacy and outcomes of initiatives to be synchronised with the RMLT agenda, while also reporting to the Johor Digital Council.
- 3. Evaluating for Smart City Accreditation, Recognition, and Certification based on the MS ISO 37122:2021 Standard.

## **2030 TARGET LEVEL OF SMART CITY**

In the State of Johor

### Level 4 **Smart City**

### **Visionary Smart City**

Level 5 **Smart City** 

 Significant Income in Level 3 Leading the 5-Year Action Smart City

			Smart City	Smart City	Plan
	Level 2 Smart City		Collaborative Smart City	<ul> <li>Mid-Term Review of the 5-Year Action Plan</li> <li>Appointment of Chief Urban Data Officer</li> <li>Integration between City Verticals</li> <li>Operational Savings</li> </ul>	Strengthening the     Urban Data Team     Integration Across     Multiple Cities     Increased Savings in     PBTs' Operations     Identification of New     Sources of Revenue
Level 1 Smart City		Developing Smart City	Periodic 5-Year Action Plan Reporting		
General Characteristics	Pre- Development Smart City	<ul> <li>Preparation of a 5-Year Action Plan</li> <li>Synchronisation of Open Data Policies</li> <li>Integration of Pilot Projects Individually</li> <li>Reporting Capabilities</li> </ul>	<ul> <li>Implementation of Open Data Policy</li> <li>More Comprehensive Integration of Urban Data</li> <li>Optimisation of Urban Services</li> <li>Analytical Capabilities</li> </ul>	<ul> <li>Propose New Sources of Revenue for PBT</li> <li>Predictive Capability</li> </ul>	for PBTs Prescriptive Capability
	<ul> <li>No 5-Year Action Plan</li> <li>No Open Data Policy</li> <li>Focus on Individual Pilot Project</li> <li>Data Disconnectedness</li> </ul>				
Data Ge	<ul><li>Siloed Data</li><li>Manual Data Accessibility</li></ul>	<ul><li>Basic Dashboard</li><li>Limited Insights</li></ul>	Create Standard     Operating     Procedures For Data     Management	<ul> <li>Able to Integrate         Various Data</li> <li>Integrate Third-party         Applications into One         Platform</li> </ul>	<ul> <li>Use of Data Pipelines         Automation         Simplifies the Work of Data Processing         Use of Machine Learning Models in Daily Life     </li> </ul>
Indicator	<ul><li>Does Not Implement MS ISO 37122:2021</li></ul>	<ul><li>Begin Implementing MS ISO 37122:2021</li><li>Early adopter status</li></ul>	<ul><li>Partial Implementation of MS ISO 37122:2021</li></ul>	<ul><li>Substantial Implementation of MS ISO 37122:2021</li></ul>	• Full Implementation of MS ISO 37122:2021
Inc	BASELINE	HINDSIGHT	INSIGHTS	INSIGHTS	FORESIGHT

Smart City	Smart City		Smart City
(Foundation)	(Intermediate)		(Advanced)
Source: Modified from the original source by <i>KiwiTech</i>	6 PBT (Daerah) 1. MDT 4. MDYP 2. MDM 5. MDSR 3. MDKT 6. MDL	7 PBT (Perbandaran) 1. MPKu 5. MPP 2. MPBP 6. MPS 3. MPK 7. MPPn 4. MPM	3 PBT (Bandaraya)  1. MBJB 3. MBPG 2. MBIP



### PLANMalaysia@Johor

(Jabatan Perancangan Bandar dan Desa Negeri Johor)

Aras 1 & 2,

Bangunan Dato' Mohamad Salleh Perang, 79646, Kota Iskandar, Iskandar Puteri, Johor





**4** 07-266 1402



ttps://jpbd.johor.gov.my



**f** PLANMalaysia Johor



planmalaysiajohor







