

MALAYSIA

Final Report on ECAP 17

9 Nov 2018
Tokyo, Japan

OUTLINE

01

NEXT PLAN

- GBC/BEC/ZEB in Malaysia

02

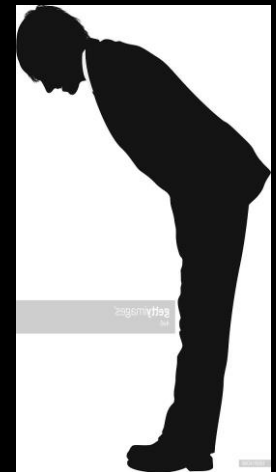
KEY TAKEAWAYS FROM ECAP17

03

CHALLENGES AND SUPPORTS FOR THE IMPLEMENTATION OF ZEB

04

THANK YOU



Ahmad Firdaus

NEXT PLAN



Suruhanjaya Tenaga
Energy Commission



1. Start engaging with all relevant stakeholders and to continue disseminate information on ZEB Family Concept



KPKT



Construction Industry
Development Board (CIDB)



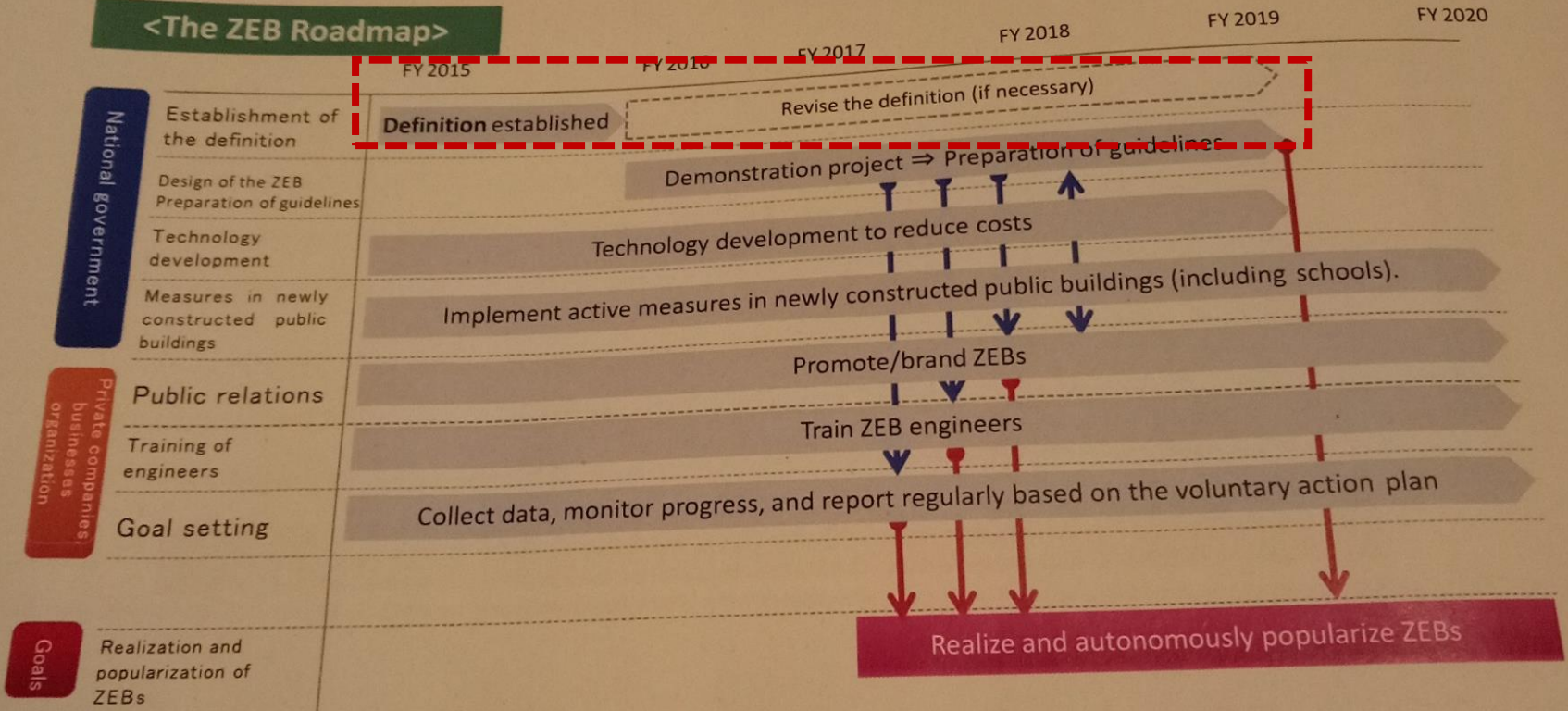
NEXT PLAN

The ZEB Roadmap – ZEB diffusion schedule for newly build building

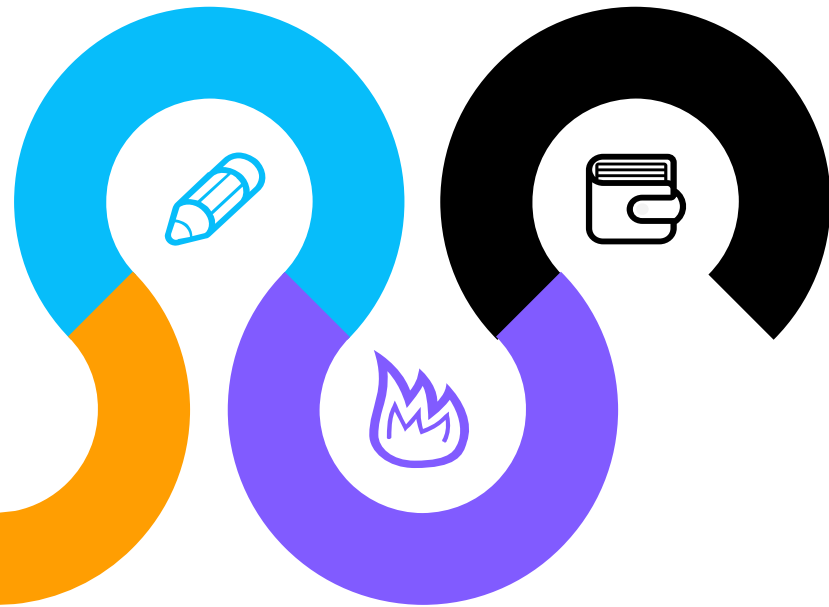
Japan's Strategic Energy Plan (adopted at the Cabinet Council in April 2014) establishes the following goals to realize and promote of ZEBs:

- Realize ZEBs in newly constructed public buildings by 2020
- Realize ZEBs in average newly constructed public and private buildings by 2030

<The ZEB Roadmap>



NEXT PLAN



Country definition on ZEB Family Concept

- ZEB Ready
- Nearly ZEB

ZERO ENERGY BUILDING FACILITATION PROGRAM







NEARLY ZERO ENERGY BUILDING (nZEB)
NET ZERO ENERGY BUILDING (NZEB)

(Part of Low Carbon Building Facilitation Program by SEDA Malaysia)

- Nearly Zero Energy Building (nZEB) is an advance Low Carbon Building initiatives.
- It is a few steps ahead towards achieving Net Zero Building Carbon Neutral Building (operational carbon)







OBJECTIVE

To promote the adoption of super low carbon green building by using a method focusing purely on sustainable energy practices, starting with energy efficiency measures in reducing overall energy demand or consumption and offsetting the balance of minimum energy needed by using on-site renewable energy.

Level of Achievement (% of CO ₂ e Reduction)	Assessment Scheme for buildings (diamond)
100% Carbon Neutral	
≥ 70 to < 100	
≥ 50 to < 70	
≥ 30 to < 50	
≥ 10 to < 30	
≥ 1 to < 10	

ZEB = (EE + RE) X Sustainable Practices



Level of Achievement (% of CO ₂ e Reduction)	Assessment Scheme for buildings (diamond)
100% Carbon Neutral	
≥ 70 to < 100	
≥ 50 to < 70	
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≥ 1 to < 10	

Assessment tool by SEDA Malaysia :

Construction Industry Standard (CIS-20:2012) – GreenPASS developed by CIDB Malaysia

Info at:

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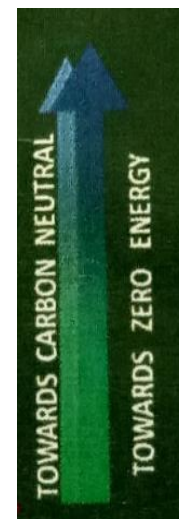
E-mail: steve@seda.gov.my

SABAH BRANCH OFFICE:

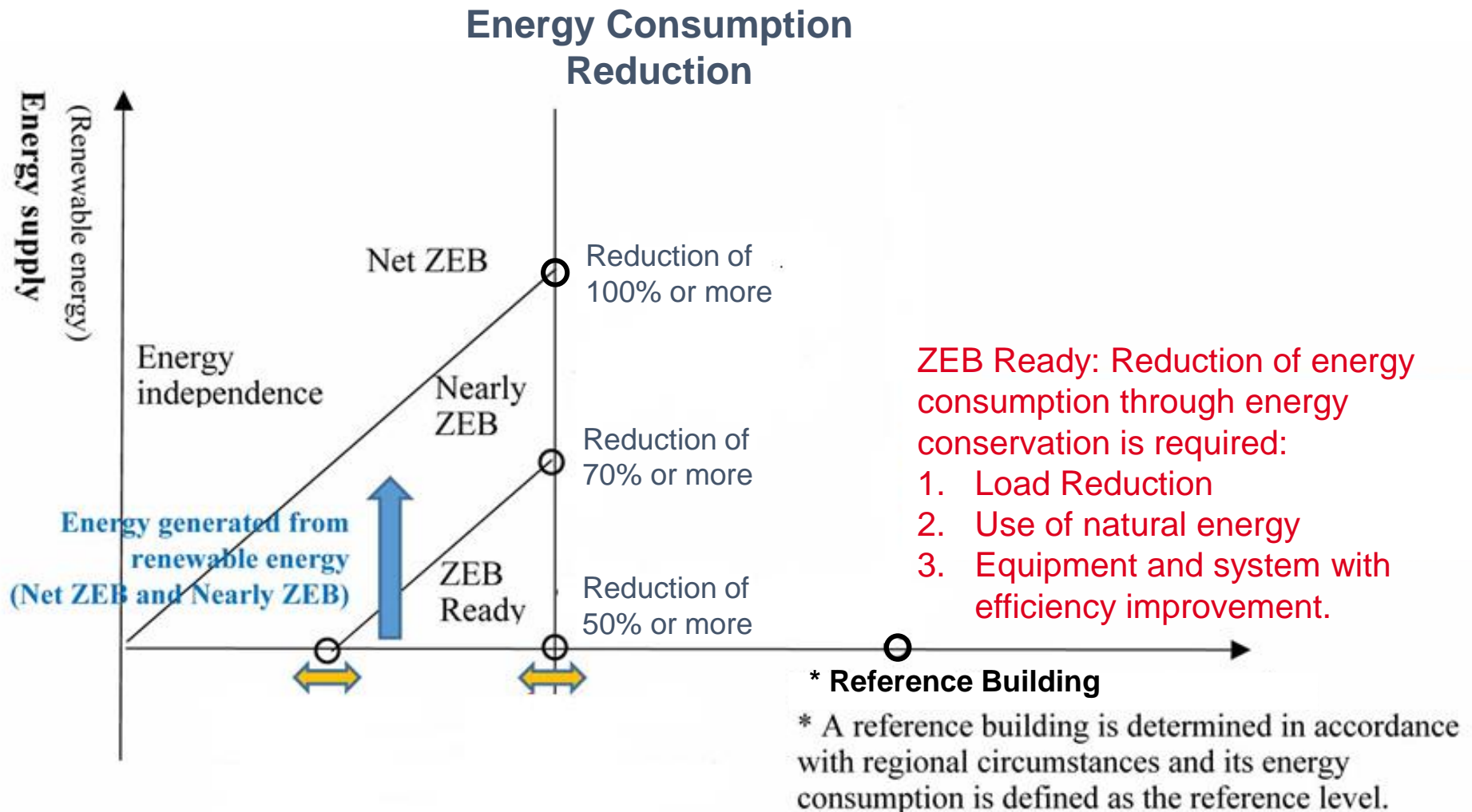
Sustainable Energy Development Authority Malaysia
(SEDA Malaysia)

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PROPOSAL BY SEDA MALAYSIA ON DEFINITION ON ZEB FAMILY CONCEPT



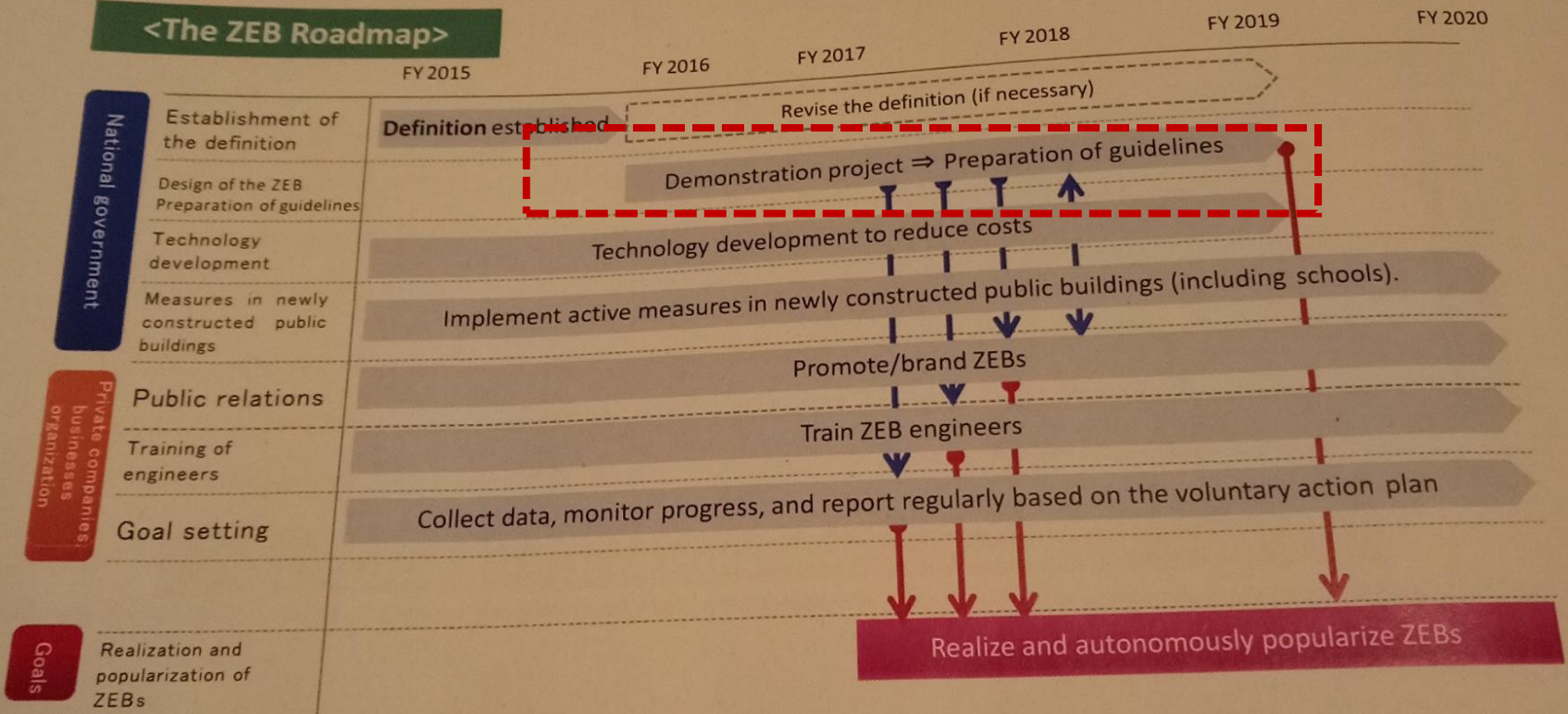
NEXT PLAN

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<The ZEB Roadmap>



NEXT PLAN

01 ENERGY PERFORMANCE CONTRACTING (EPC) BY ENERGY SERVICE COMPANY (ESCO)

- ✓ Developing EPC Implementation Guidelines at Government Building
- ✓ Initiative under Government Lead by Example program
- ✓ Target 2019: 50 EPC projects in Government buildings
- ✓ There are several fund available for example:
 - i. Green Technology Financing Scheme (GTFS)
 - ii. EPC Fund

02 ENERGY EFFICIENCY & CONSERVATION ACTS

- ✓ Regulations for Building Sector

NEXT PLAN






AWARENESS



PROMOTION

KEY TAKEAWAYS

Six Core Elements of ZEB Family Concept

- 1  At planning stage
- 2  At design stage
- 3  During construction
- 4  After completion of building
- 5  After operation start
- 6 After design and completion

KEY TAKEAWAYS

- As mention by Ushio san during his presentation, “Data collection and analysis are very important”
- To have management representative to be involve in energy management which are EMCO and EMPP
- As mention during site visit to SNK
 - To cooperate with public university and to do survey involving private sector in order to set the standards
 - To collect various actual data and to compare with simulation

Longer way forward

To look into system similar to that being used in Japan (Web-pro)

CHALLENGES AND SUPPORTS FOR THE IMPLEMENTATION OF ZEB

MOU between SEDA Malaysia and JASE-W



THANK YOU