Policy Framework for E-mobility Adoption in Indonesia

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Outline

Stakeholders of electric bus adoption

Challenges in electric bus adoption

Policy framework to accelerate electric bus adoption

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Stakeholders of electric bus adoption



		Electric Bus	Charging Infrastructure	Electricity	BUS	WORLD
Regulations & incentives		Ministry of Transportation Ministry of Energy and Mineral Resource		nd Mineral Resources	foundation	
		 National e-bus adoption roadmap E-bus adoption in Buy-The-Service fleets Technical EV regulations 	 Technical and legal requirements of charging infrastructure High-level coordination on infrastructure development 	 Grid decarbonization policy Electricity tariffs, including preferential tariff policy for charging infrastructure 	the global bus alliance	
		Local Government	State Electricity Company / Perusahaan Listrik Negara (PLN)		ndatio	
		 Local e-bus adoption roadmap Local subsidy for e-bus operation Non-fiscal incentives (e.g. LEZ) 	 Planning and implementation of infrastructure development Grid connection to infrastructure 	 Electricity supply to charging stations 		licy recomme
		Ministry of Industry, Ministry of Trade		Preferential (wholesale) tariff for charging infrastructure	pply	B
		Local content and import policy	Local content and import policy		iy su	NGOs, think tanks,
		Ministry of Finance		Renewable Energy Suppliers	tricit	research institutions, consultants
		Fiscal incentives	Fiscal incentives	 Renewable electricity supply to charging stations 	Elec	inputs
		OEMs/Distributors (E	-bus, EVSE, Battery)			
Product		• E-bus, EVSE, battery, and components manufacturing/importing				hnica
		Bus Operators	Charging Infrastructur	re Providers/Operators		
		 Own/lease e-bus fleets Operate e-buses	Provide and operate charging infrastructure at depots		Financing* Financings,	
						Development Agencies

Mandates, incentives, financing

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Challenges in electric bus adoption

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Higher Cost.

- Fleets purchasing cost is higher due to the additional **battery cost**.
- The operators has to provide the charging facilities and connection to grid at their depots, thus adding additional cost need to reserve.

Dependency on PSO.

High dependency on PSO decided annually creates hesitation to commercial banks or financing institutions on the repayment of the loan.

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Technology Readiness.

Banks tend to provide lower loan portion of e-bus equity due to **lack of experience with the e-buses** and uncertainty in terms of residual value.

Lack of Strong Political Support.



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90% 100%

Nationwide

Jakarta (Transjakarta)

Electric bus deployment target in 2030.

There is already deployment target but still lacks of strong political support for the government to commit resources.

41% 50%

Nationwide

Jakarta

GHG Emission Reduction in end-use sector (transportation) in 2030

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Policy framework to accelerate electric bus adoption

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Policies to provide strong legal basis for resource commitments

Policies to reduce electric bus TCO

Policies to accelerate infrastructure provision

Policies to disincentivize the use of ICE vehicles

Policies to provide strong legal basis for resource commitments



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Presidential Regulation No. 22/2017 on National General Energy Plan (RUEN)

Electric fleet to comprise 10% of total urban public transport fleet population.

Presidential Regulation No. 55/2019 on BEV Acceleration Program

Mandate to accelerate BEV adoption General guideline for possible incentives Establishment of task force

What's next?

 Link clear e-bus adoption roadmaps with national strategic documents and commit budget, aligned with energy diversification plan

Incorporate e-bus adoption plans into the NDC and other national strategic documents (RPJMN, Ministerial strategic plan, SISTRANAS, etc).

• Local governments to issue derivative city-level e-bus adoption targets in local regulations

Local-level legal basis is crucial to enable budgetary commitments from the subnational governments.

Policies to reduce electric bus TCO

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MOI Regulation No. 6/2022 on BEV Specification, Roadmap, and Domestic Component Rate (TKDN) Calculation

Roadmap of minimum TKDN values for BEV to be eligible for incentives

Law No. 1/2022 on Financial Relationship between the National Government and Local Governments

BEV is exempted from annual vehicle tax (PKB) and vehicle title transfer tax (BBN-KB)

Government Regulation No. 78/2019, BKPM Regulation No. 7/2020 on Pioneer Industries and Tax Allowance, MOF Regulation No. 130/PMK.010/ 2020

Tax allowance and tax holiday for EV industries

MOF Regulation No. 26/PMK.010/2022 on Goods Classification and Import Tax

What's next?

• Introduce purchase price subsidy and higher gross cost contract for e-bus operation

MOF and MOI can jointly develop a national EV purchase subsidy program, which prioritizes e-buses. Presidential Regulation No. 55/2019 should also be amended to include vehicle purchase incentives as one of the incentive options to provide a legal basis.

• Offer particular tax incentives for EV industries

Many of the tax incentives are also applicable to ICEV industries. Lower requirements for incentive eligibility can be offered to lower the industry entry.

• Set a limited period for lower CBU taxes only to kickstart pilot adoption

During the pilot stage, quick supply of e-buses are still needed to kickstart the transition while waiting for the domestic products to reach cost parity in later stages.

- Allow a longer contract period for e-buses (14 years ++)
- Introduce centralized e-bus procurement and secondary market programs

The centralized procurement aims to increase sales volume to give economies of scale. Both programs can be bundled with MOT's Buy-the-Service program.

Policies to accelerate infrastructure provision



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MEMR Regulation No. 13/2020 on Charging Facilities for BEV

Provides direction of charging infrastructure development in Indonesia, mandate for PLN to initiate the provision, business model options, preferential electricity tariff for charging infrastructure providers, and plug-in standards

What's next?

• Set national-level vision and city-level targets for charging infrastructure provision

To provide a sound legal basis to enable the following initiatives.

• Offer further fiscal support

The MEMR coordinates with MOF to develop fiscal support policies such as preferential loan rate, tax holidays and allowance for operators, import duty exemptions for suppliers, and land-building tax exemption for a limited period for charging infrastructure.

• Allow government assets to be used as charging infrastructure locations

In particular relevant for microbus electrification, which fleets seldom have depots, and en-route charging locations that might be located at stations or road-side stops.

• Update building codes to facilitate charging infrastructure provision

Policies to disincentivize the use of ICE vehicles



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What's next?

Improve fuel economy standard

Vehicles complying to older norms (EURO III-IV) should be phased out by providing financial incentive for replacement with EVs (scrapping policy).

Establish Low Emission Zones/Zero Emission Zones

Local governments to create LEZ/ZEZ implementation plans, which include implementation area and implementation phases.

• Gradual discontinuation of fossil fuel subsidies

Gasoline and diesel used for public transportation is available at a much lesser price as compared to the price of fuel for private transportation.

• Carbon Tax introduction and earmarking

Any proceeds from such tax should go towards cleaner energy and EVs.



Thank you

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Document	Content overview	
Strategic document		
Presidential Regulation No. 22/2017 on National General Energy Plan (RUEN)	 2025 target for electric vehicle adoption: 2,200 units electric car 2.1 million units E2&3W 10% of public transport fleet 	
Presidential Regulation No. 55/2019 on BEV Acceleration Program	Main strategic directive for the acceleration efforts of BEVs in Indonesia. Includes fiscal and non-fiscal incentives options and national coordination team establishment	
MOI Regulation No. 6/2022 on BEV Specification, Roadmap, and Domestic Component Rate (TKDN) Calculation	Roadmap of minimum TKDN values for BEV eligible for incentives, including E2&3W, as well as policies and strategies for the development of the EVs industry to achieve the minimum TKDN. The domestic content should reach 40% in by 2023, 60% by 2025, and 80% in 2026 onwards. This domestic contents are also aligned with the import policies.	
MEMR Regulation No. 13/2020 on Charging Facilities for BEV	Provides direction of charging infrastructure development in Indonesia, mandate for PLN to initiate the provision, business model options, preferential electricity tariff for charging infrastructure providers, and plug-in standards	
Fiscal incentives		
Law No. 1/2022 on Financial Relationship between the National Government and Local Governments	BEV including E2&3W is exempted from annual vehicle tax (PKB) and vehicle title transfer tax (BBN-KB)	
Government Regulation No. 74/2021 on Luxury Tax Rate for Motorized Vehicles	BEV is exempted from the luxury tax rate. It is applied to BEV (or PHEV and FCEV) with fuel consumption bigger than 28 kilometer per liter or emission factor up tp 100 g CO2 per kilometer. However, 2&3Ws are by default not subjected to luxury tax.	
MOF Regulation No. 26/PMK.010/2022 on Goods Classification and Import Tax	Import tax rate for completely knocked-down E2&3W and ICE 2&3W is the same at 10%	
BKPM Regulation No. 7/2020 on Pioneer Industries and Tax Allowance	Eligible pioneer industries which include manufacturers of certain types of motor vehicles or components, is granted with tax holiday or deduction on corporate income tax	
MOF Regulation No. 130/PMK.010/2020		
MOI Regulation No. 28/2020	Regulates the import of battery electric vehicles in the form of completely knocked down (CKD) and incompletely knocked down (IKD). This allows the manufacturers to imports BEV in those two forms or import the component. However, this option is only available for four wheels or more vehicle. Two- and three-wheelers are only allowed to import in the form of CKD.	
Bank of Indonesia Regulation (PBI) No. 22/13/PBI/2020 on Second Amendment to PBI No. 20/8/2018 on LTV Ratio for Property Credit, FTV Ration for Property Financing and Down Payment for Motor Vehicle Credit or Payment	Allows financial institutions to give 0% down payment for BEV. It is however, not clear whether two- or three-wheelers is subject to the regulation or not. Typically, the down payment for a motorcycle is 5% while for a car is around 10-20%.	
le Regulations		
MOT Regulation No. 86/2020 on Electric Vehicle Type Test, which revises MOT Regulation No. 44/2020	Specifies the standardized methodology to conduct type test for electric vehicles, including 2&3W	
MOT Regulation No. 45/2020 on Certain Vehicles with Electric Motors	Regulates "Certain Vehicles with Electric Motors" category, which includes personal mobility devices such as e-bikes, electric kick-scooters, hoverboards, and unicycles.	

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