KEMENTERIAN KEUANGAN RI

Fiscal Reform on Energy Subsidy Policy in Indonesia

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## Key Macroeconomic Assumptions

<table>
<thead>
<tr>
<th>Assumptions:</th>
<th>Period</th>
<th>2015</th>
<th>2016</th>
<th>2017 Proposed Budget</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Realized</td>
<td>Revised Budget</td>
<td>Budget</td>
</tr>
<tr>
<td>Growth (%)</td>
<td></td>
<td>4.8</td>
<td>5.2</td>
<td>5.3</td>
</tr>
<tr>
<td>Inflation (%)</td>
<td></td>
<td>3.35</td>
<td>4.0</td>
<td>4.0</td>
</tr>
<tr>
<td>Exchange Rate (USD/IDR, Average)</td>
<td></td>
<td>13,392</td>
<td>13,500</td>
<td>13,300</td>
</tr>
<tr>
<td>3-month-SPN (Treasury Bills)</td>
<td></td>
<td>5.97</td>
<td>5.5</td>
<td>5.3</td>
</tr>
<tr>
<td>Indonesia Crude Price (ICP) (USD / bbl)</td>
<td></td>
<td>49.2</td>
<td>40.0</td>
<td>45.0</td>
</tr>
<tr>
<td>Oil Lifting (thousand bbl / day)</td>
<td></td>
<td>777.6</td>
<td>820</td>
<td>780.0</td>
</tr>
<tr>
<td>Gas Lifting (thousand bbl / day oil equivalent)</td>
<td></td>
<td>1,195.4</td>
<td>1,150.0</td>
<td>1,150.0</td>
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</tbody>
</table>

### 2015 Budget Key Focus
- **Quality of Spending**
  - Fuel subsidy savings of IDR 211.3 Tn
  - Re-allocation of savings to basic infrastructure (food security, connectivity and maritime) and social welfare
  - Additional allocation for village funds
  - Capital injection to SOEs
- **Revenue Optimization**
  - Improving tax compliance rate, closing tax leakage and expanding tax base

### 2016 Budget Key Focus
- **General Revenue and Expenditure Policies**
  - Continue Tax Extensification and Intensification program and improve tax compliance
  - Drive priority program to improve growth quality such as the 20% allocation for education, maintain 5% health allocation and increase regional and village fund allocation
- **Subsidy Policies – More Targeted Program**
  - Targeted subsidy scheme and direct subsidy to small households
  - Food & fertilizers subsidy and expand financing program for SMEs
- **Continue to drive key development projects:**
  - Develop infrastructure for Food Security and Connectivity
  - Improve the service and sustainability of national health, labor insurance program and sustainable social protection program
## Budget 2016 and 2017

<table>
<thead>
<tr>
<th>Description</th>
<th>2016</th>
<th>2017</th>
<th>2017</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Budget</td>
<td>Revised Budget</td>
<td>Proposed Budget</td>
</tr>
<tr>
<td></td>
<td>IDR Tn</td>
<td>USD Bn (13,900/USD)</td>
<td>IDR Tn</td>
</tr>
<tr>
<td><strong>Revenue</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>1,822.5</td>
<td>131.1</td>
<td>1,786.2</td>
</tr>
<tr>
<td></td>
<td>1,820.5</td>
<td>131.0</td>
<td>1,784.2</td>
</tr>
<tr>
<td>I. Domestic Revenue</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1. Tax Revenue</td>
<td>1,546.7</td>
<td>111.3</td>
<td>1,539.2</td>
</tr>
<tr>
<td>2. Non Tax Revenue</td>
<td>273.8</td>
<td>19.7</td>
<td>245.1</td>
</tr>
<tr>
<td>II. Grant</td>
<td>2.0</td>
<td>0.1</td>
<td>2.0</td>
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<tr>
<td><strong>Government Spending</strong></td>
<td>2,095.7</td>
<td>150.8</td>
<td>2,082.9</td>
</tr>
<tr>
<td>II. Central Government</td>
<td>1,325.6</td>
<td>95.4</td>
<td>1,306.7</td>
</tr>
<tr>
<td>1. Ministerial Spending</td>
<td>784.1</td>
<td>56.4</td>
<td>767.8</td>
</tr>
<tr>
<td>2. Non Ministerial Spending</td>
<td>541.4</td>
<td>39.0</td>
<td>538.9</td>
</tr>
<tr>
<td>- Energy Subsidy</td>
<td>102.1</td>
<td>7.3</td>
<td>94.4</td>
</tr>
<tr>
<td>- Renewable Energy Subsidy</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>III. Fund Transfer and Village Fund</td>
<td>770.2</td>
<td>55.4</td>
<td>776.3</td>
</tr>
<tr>
<td>Primary Balance</td>
<td>-88.2</td>
<td>-6.3</td>
<td>-105.5</td>
</tr>
<tr>
<td>Surplus/Deficit</td>
<td>-273.2</td>
<td>-19.7</td>
<td>-296.7</td>
</tr>
<tr>
<td>% deficit to GDP</td>
<td>-2.15</td>
<td>-2.35</td>
<td></td>
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</table>
Energy Subsidies Policy
Oil Fuel and LPG Subsidy Policy 2016

1. Continuing fixed subsidy policy for gasoline and price gap subsidy for kerosene and LPG 3 kg;
2. Implementing the efficiency and effectiveness of LPG 3 kg subsidy;
3. Improving the use of new and renewable energy for transportation;
4. Improving and developing the city gas network development for household;
5. Improving the supervision of subsidized fuel and LPG 3 kg distribution through the use of data and technology; and
6. Improving the role of local government in the control and supervision of subsidized fuel and LPG 3 kg.
Electricity Subsidy Policy 2016

1. Subsidizing poor and vulnerable poor household customers to be more targeted;
2. Improving electricity ratio, especially by rural electrification program and free electricity instalation for poor household and fishermen;
3. Improving electricity provision efficiency, by optimalization of gas and coal powered power plant, and reducing the oil fuel usage on power plant energy mix;
4. Developing renewable energy especially on outer islands, and substituting diesel power plant in remote areas; and
5. Improving supervision on investment in power plant infrastructure development.
The budget for subsidies fuel in the Revised Budget 2015 and Budget 2016 declining especially is caused by a decrease of world crude oil price, implement fixed subsidy only for gasoil, and remove fuel subsidy for gasoline RON 88.

Source: Ministry of Finance
Budget for Energy Subsidies Compare to Central Government Expenditure, Total Expenditure and GDP
Quality Spending: Consumptive Spending to Productive Spending (in Trillion Rupiah)

- **Education**:
  - 2011: 266,9
  - 2012: 310,8
  - 2013: 345,3
  - 2014: 375,5
  - 2015: 408,5
  - 2016: 419,2

- **INFRASTRUCTURE**:
  - 2011: 114,2
  - 2012: 145,5
  - 2013: 155,9
  - 2014: 177,9
  - 2015: 290,3
  - 2016: 313,5

- **Energy Subsidies**:
  - 2011: 255,6
  - 2012: 306,5
  - 2013: 310
  - 2014: 341,8
  - 2015: 119,1
  - 2016: 94,4

- **Health**:
  - 2011: 41
  - 2012: 46,6
  - 2013: 52,7
  - 2014: 67,5
  - 2015: 77,4
  - 2016: 104,8
Energy Subsidy Reform
The Government implemented the consumption’s restriction of fossil fuel subsidized through...

1. **Price Control Management**
   - **Almost every year** with macroeconomic and social consideration.
   - **Since 2015**, gasoline was not subsidized.
   - 2015-present: Implementing fixed subsidy for gasoil.

2. **Conversion Program to Gas**
   - **Since 2007**, Government conducts kerosene to LPG (3kg) conversion program to create energy efficiency.
   - **2012**: Converting road vehicles from using gasoline to CNG (Compressed Natural Gas).
   - Government provided free converter kit for public transport vehicles.
   - **2016**: Improve the LPG 3kg subsidy distribution to be better targeted

3. **Consumption Restriction**
   - **2013**: Restriction the use of subsidized fuel: government institution (central and local government and state owned enterprise), mining sector and plantation (excluding citizens mining and plantation under 25 hectares), forestry (except forest which managed by the citizen), non-pioneer cargo shipping. (Permen ESDM 01/2013).
The Government implemented the consumption’s restriction of fossil fuel subsidized through… (con’t)

- **Since 2008**: Encouraging the utilization of new and renewable energy, such as: palm oil, biomass, biogas; not only for fuel but also for electricity.

- Expanding the uses of Biodiesel for transportation around 7.5% in 2013, 10% in 2014, 15% in 2015, and 20% in 2016. **Since 2015**, gasoline was not subsidized.

- **Since 2010/2011**: Provide fiscal incentives to support industries with energy efficiency technology and renewable energy.

- **2012**: Converting public transportation from using gasoline to CNG (Compressed Natural Gas). The implementation of this policy starts gradually in some big cities

- Government provided free converter kit for public transport vehicles.

- **2015-present**: Encouraging infrastructure development for public transportation.

- Improve the railways transport facilities as alternatives public mode.
Electricity Subsidy Policy 2001-2016, with increasing portion on renewable energy on its energy mix (to reduce production cost)...

12 groups that are not subsidized anymore:

1. Household R1 – 1300 VA
2. Household R1 – 2200 VA
3. Household R2 – 3500 VA to 5500 VA
4. Household R3 – above 6600 VA
5. Business B2 – 6600 VA to 200 kVA
6. Business B3 – above 200 kVA
7. Industry I3 – above 200 kVA
8. Industry I4 – above 30.000 kVA
9. Government P1 – 6600 VA to 200 kVA
10. Government P2 – above 200 kVA
11. Public Lighting – P3
12. Special Service
Renewable Energy Development
Energy Policy Direction

1. Energy Conservation: Improve energy efficiency on supply and demand side of industrial sector, transportation, household, and commercial.

2. Energy Diversification: Improving the role of renewables energy on energy.

New Energy
- a. Liquified Coal,
- b. Coal Bed Methane,
- c. Gasified Coal,
- d. Nuclear,
- e. Hydrogen.

Renewable Energy
- a. Geothermal,
- b. Hydropower,
- c. Bioenergy,
- d. Solar,
- e. Windpower,
- f. Sea waves and current.
# Roadmap Mandatory of Biofuel
*(Ministry of Energy Regulation 12/2015)*

## Mandatory of Biodiesel utilization Phasing as a Fuel Mix

<table>
<thead>
<tr>
<th>Sector</th>
<th>April 2015</th>
<th>January 2016</th>
<th>January 2020</th>
<th>January 2025</th>
</tr>
</thead>
<tbody>
<tr>
<td>Household</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>SME’s, Fisheries, Agriculture, Transportations, and PSO.</td>
<td>15%</td>
<td>20%</td>
<td>30%</td>
<td>30%</td>
</tr>
<tr>
<td>Transportation non PSO</td>
<td>15%</td>
<td>20%</td>
<td>30%</td>
<td>30%</td>
</tr>
<tr>
<td>Industry and Commercial</td>
<td>15%</td>
<td>20%</td>
<td>30%</td>
<td>30%</td>
</tr>
<tr>
<td>Power Plant</td>
<td>25%</td>
<td>30%</td>
<td>30%</td>
<td>30%</td>
</tr>
</tbody>
</table>

## Mandatory of Bioethanol utilization Phasing as a Fuel Mix

<table>
<thead>
<tr>
<th>Sector</th>
<th>April 2015</th>
<th>January 2016</th>
<th>January 2020</th>
<th>January 2025</th>
</tr>
</thead>
<tbody>
<tr>
<td>Household</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>SME’s, Fisheries, Agriculture, Transportations, and PSO.</td>
<td>1%</td>
<td>2%</td>
<td>5%</td>
<td>20%</td>
</tr>
<tr>
<td>Transportation non PSO</td>
<td>2%</td>
<td>5%</td>
<td>10%</td>
<td>20%</td>
</tr>
<tr>
<td>Industry and Commercial</td>
<td>2%</td>
<td>5%</td>
<td>10%</td>
<td>20%</td>
</tr>
<tr>
<td>Power Plant</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>

- TOTAL NATIONAL PRIMARY ENERGY: 215 MTOE
- RENEWABLE PRIMARY ENERGY: 13 MTOE
  - GEOTHERMAL: 6 MTOE
  - BIOFUEL: 4 MTOE
  - BIOMASSA: 2 MTOE
  - HYDRO: 1 MTOE

TARGET 2025
- PRIMER ENERGY CONSERVATION: 11%
- RENEWABLE: 23%
- Coal: 30%
- Gas: 22%
- Oil: 25%

BUSINESS AS USUAL
- 450 Million TOE

TARGET 2025
- 400 Million TOE
- 11% PRIMER ENERGY CONSERVATION
- 23% RENEWABLE
Thank You
Kajian Kebijakan Subsidi BBM yang Lebih Tepat Sasaran

Objective
- Developed a more targetted fuel subsidy policy mechanism

Output
- Proposed alternatives for a more targetted fuel subsidy policy mechanism
- Developed the impact analysis of well targeted fuel subsidy (on budget, economic, social, and environment)
- Developed a possibility to help regions in certain sectors related to changes in the fuel subsidy system
- Proposed mitigation steps on the impact of changes in fuel subsidies, so that the new policy be accepted by all parties and not to cause public unrest

Conclusion/Recommendation
- Targeted subsidies policy for land transportation sector
  - Public transport
  - Freight transport
- Fix Subsidies or targeted proportional subsidies
- Price differentiation subsidies:
  - Control device: Smart Card for targeted groups
  - Quota: needs survey to every region
  - Subsidies mechanism trough discounted price

Time Completion
- October 2014 - Februari 2015
Objective

- Developed a more targetted electricity subsidy policy mechanism

Output

- Identified customer consumption behavior/pattern (urban and rural)
- Proposed alternative mechanism of electricity subsidy distribution (cash/voucher/discount) and some scenarios of fix electricity subsidy control (price and consumption)
- Analyzed change in consumer behavior if fix electricity subsidy was applied
- Analyzed impact on fiscal and economic (budget, inflation, growth, and poverty)

Conclusion/Recommendation

- Customer subsidized if only the power consumption didn’t exceed 80 kWh per month for R1-450 VA customer and 60 kWh per month for R1-900 VA customer. If the limits exceed, the customers weren’t subsidized at all. This policy will also trigger power consumption efficiency.
- Non cash subsidies with fix subsidies (Rp/kWh)
- Subsidies distributed through PLN, then PLN gave discounted price to targeted customers

Time Completion

- April - September 2015