

### Energy shift – New Incentives for Energy Efficiency and Renewable Energies

14<sup>th</sup> Germany-Taiwan Joint business Council Meeting Berlin, September 10, 2014

> Stefanie Schmid-Lübbert Federal Ministry for Economic Affairs and Energy



#### Content

1. The German energy transition – Overall aims and ambitious targets

2. Implementation in a number of action fields

3. Implementation process: Renewable energies

4. Implementation process: Energy efficiency

5. Conclusion



# 1. Overall aims and ambitious targets



#### **German Energy Transition – long term strategy up to 2050**

Long-term strategy towards a higher share of renewables and higher energy efficiency



**Overall aims:** 

Reduction of import dependency

⇒ Facing an increasing global energ

demand

#### Climate protection as an international goal

 $\Rightarrow$  Reduction of greenhouse gas emissions

#### Development of new technologies and markets

⇒ Renewable and efficiency technologies

•Phase-out of nuclear energy generation (broad political and









#### German primary energy consumption

#### 2003 total: 14,600 PJ

**2013** total: 13,908 PJ



The renewables share tripled within ten years.



### **Trends in German gross electricity production**



Renewables share in electricity production tripled within ten years.



#### Ambitious targets until 2050 in different sectors





## 2. Implementation process – Progress in a number of action fields needed



### **Energiewende: Fields of action**





## 3. Renewable energies



#### **Cornerstones of the Renewable Energy Sources Act**

- Guaranteed grid access; priority transmission and distribution
- Fixed price (tariff or premium) for every kWh produced
- Tariffs are set for each type of technology and with regard to further provisions (e.g. site and size)
- Additional costs for renewable energy production are offset through the EEG levy (2014: ~ 6,24 ct/kWh), with reductions for energy-intensive industries
- Additional costs are offset via grid operators and independent of the public budget
- Regular monitoring and evaluation; accompanying research



#### Trends in the Renewable energy surcharge (EEG-Umlage)



Sharp increase of the renewable energy surcharge during the last years.



#### **Reform of the Renewable Energy Sources Act 2014**



More planning security

• binding development corridor



More coordination and precision •technology-specific regulatory instruments



**More cost-efficiency** 

- focus on cost-efficient technologies (PV, Onshore-Wind)
- avoid excessive support, implement degression mechanisms

More market-orientation

- compulsory direct marketing
- tendering model (2017)

affordability

environmentally friendly energy supply

security of supply

Germany keeps ambitious goals, but optimises mechanisms and increases market integration.



### 4. Energy Efficiency



#### Efficiency targets and energy productivity in Germany



Economic growth decouples from energy consumption and emissions.



#### **Energy efficiency measures: Broad mix of instruments**



#### **Buildings**

- Energy Saving Ordinance (building codes)
- on-site consultations
- Low-interest loans for renovations
- Heat Metering Ordinance
- **Energy performance certificates**

#### **Appliances and consumer products**

- **Electricity tax**
- **Energy Efficiency Labelling Ordinance**
- Energy-using Products Act (EBPG), ecodesign directive
- Energy advice in consumer advice centres

#### **Industry and business**

- Grants for cross-cutting technologies
- On-site consultations
- European emissions trading
- Efficiency classification (Ecodesign Directive)
- Voluntary agreements in some sectors



#### Transport

- Motor vehicle taxation
- Fuel taxes
- Federal fuel strategy

A balance of incentives, regulations, consultation and information.



### Conclusion



#### **Further steps are necessary**





### Conclusion

- The energy transition is a big challenge...
- ...but also offers opportunities for companies and consumers.
- Environmental and economic aspects need to be considered together.
  Germany must remain a competitive base for industry.
- Cost efficiency as well as market and system integration are the key
- European integration and cooperation with neighbours is needed
- long-run perspective, further steps are necessary for successful implementation



# Thank you for your attention! <u>schmid-luebbert@bmwi.bund.de</u>

Further information on German energy policy: <u>http://www.bmwi.de</u>