## South Africa's Climate Change Mitigation Action thus far... SUMMARY



**Climate Change and Air Quality** 



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Department: Environmental Affairs REPUBLIC OF SOUTH AFRICA Mitigation & MRV retreat – 1<sup>st</sup> Sept 2016

**Thapelo Letete** 

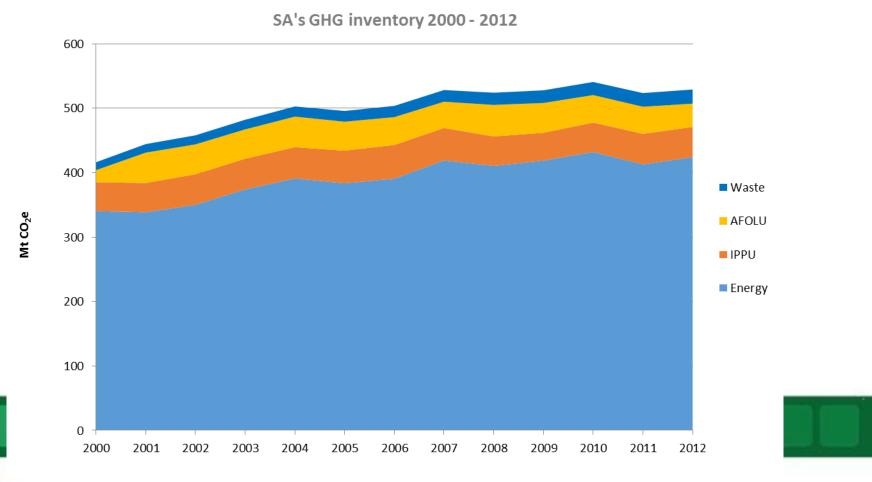
- A. National picture & NDC
- B. Energy sector
  - Supply-side
  - Demand-side
- C. Transport sector
- D. Waste sector
- E. Industrial processes
- F. Cross-cutting
- G. Collective impact



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**Overview** 

#### **A. NATIONAL PICTURE – GHG Inventory**

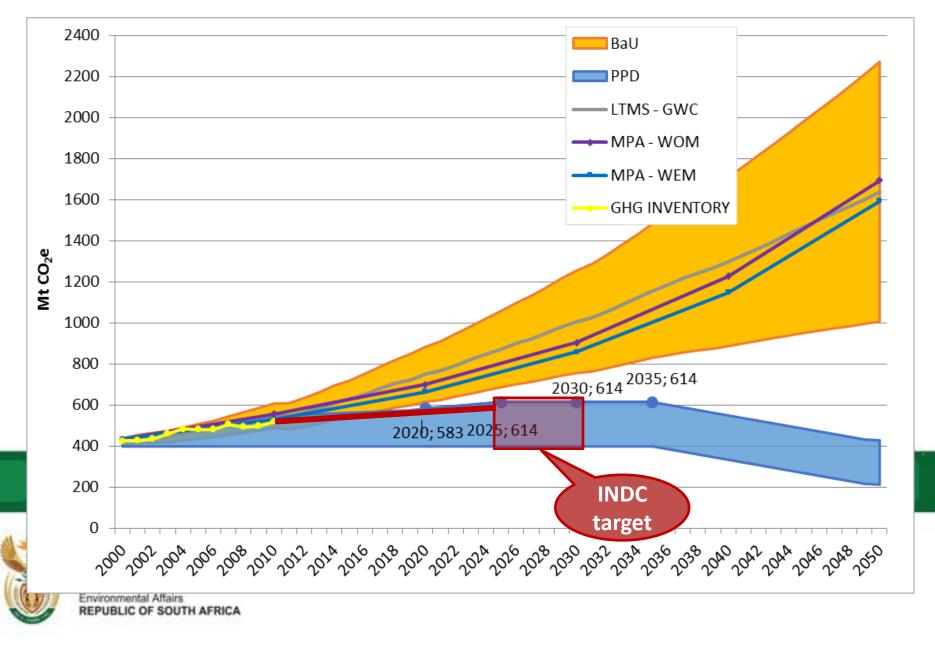




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#### **A. NATIONAL PICTURE - INDC**



#### **B. ENERGY SECTOR - SUPPLY SIDE**



- 1. The Renewable Energy Power Producer Procurement Programme (REIPPPP)
- 2. South African Wind Energy programme (SAWEP)
- 3. Open cycle gas turbines instead of coal power plants
  - National Solar-water heating programme
  - . Private sector co-generation programmes
  - . Industrial fuel switch programmes



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#### **B. ENERGY SECTOR - DEMAND SIDE**





- i. Eskom Integrated Demand-side Management programme
- ii. Municipal Energy Efficiency programme
- iii. Industrial Energy Efficiency improvement programme (NCPC)
- iv. Energy Efficiency Standards and the appliance labelling
- v. Green building programmes
- vi. Income tax act 12L & 12B programmes
- vii. Various private EE programmes (PSEE, voluntary, etc.)

#### **C. TRANSPORT SECTOR**

Bus rapid and integrated rapid transit systems in a number of cities:

- -Cape Town,
- Johannes burg
- Tshwane

Rail improvement programmes:

- High speed rail (Gautrain)
- Rail recapitalization programme
- Road-to-rail freight programme

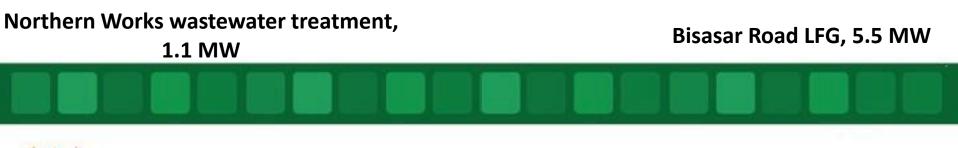


#### Fuel switch:

- 1. Electric cars (DEA, CSIR, Tshwane, etc)
- 2. Natural gas vehicles (taxies)

#### **D. WASTE SECTOR 1**

- Landfill-gas to electricity plants
- Wastewater treatment CHP programmes





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#### **D. WASTE SECTOR 2**

## Bioenergy programmes

(biodiesel, biogas & bioethanol)

**Other interventions:** 

- a. Waste recycling and buy-back centres
- b. Composting programmes



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#### **E. INDUSTRIAL PROCESSES**

 Synthetic fuels industry: Feed switch from coal to natural gas



- Cement industry programmes (reduced clinker, etc.)
- Waste gas and materials recovery and re-use programmes in various industries

### F. CROSS-CUTTING 1

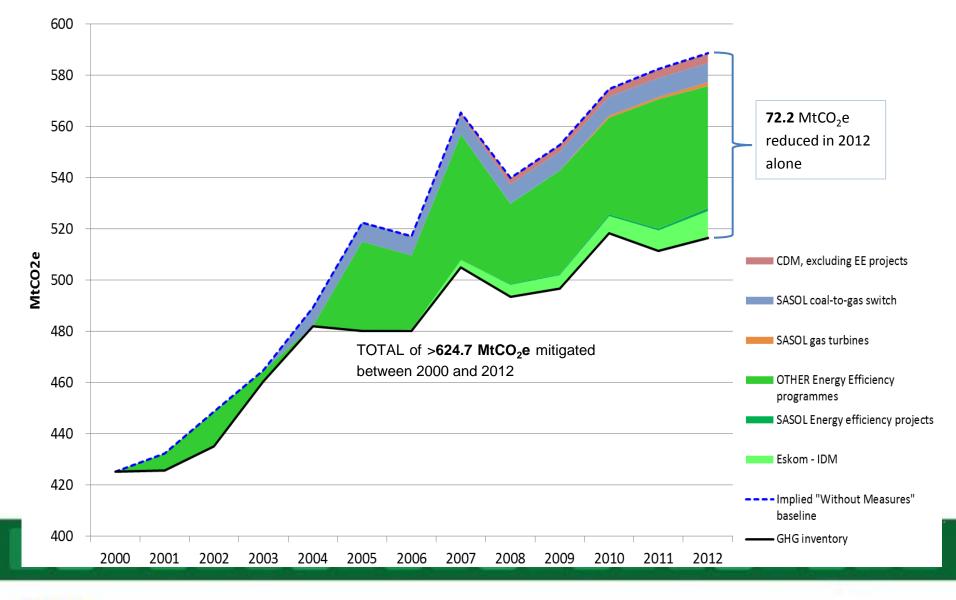
### Green fund

- Provides catalytic finance to facilitate investment in green initiatives that will support poverty reduction and job creation
- The Green Fund responds to market weaknesses currently hampering South Africa's transition to a green economy by:
  - promoting innovative and high impact green programmes and projects
  - reinforcing climate policy objectives through green interventions
  - building an evidence base for the expansion of the green economy, and
  - attracting additional resources to support South Africa's green economy development



#### Carbon tax

 Future: It will allow businesses to internalise the negative effects of GHG emissions by adjusting the price of such services and environmental goods accordingly





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# G. Estimated collective mitigation impact





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