

IPCC WG3

Sustainable Development and Climate Change Mitigation

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**Co-CLA Chapter 12:
Sustainable Development and Mitigation**

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Two-way Relationship Between Climate Change and Sustainable Development

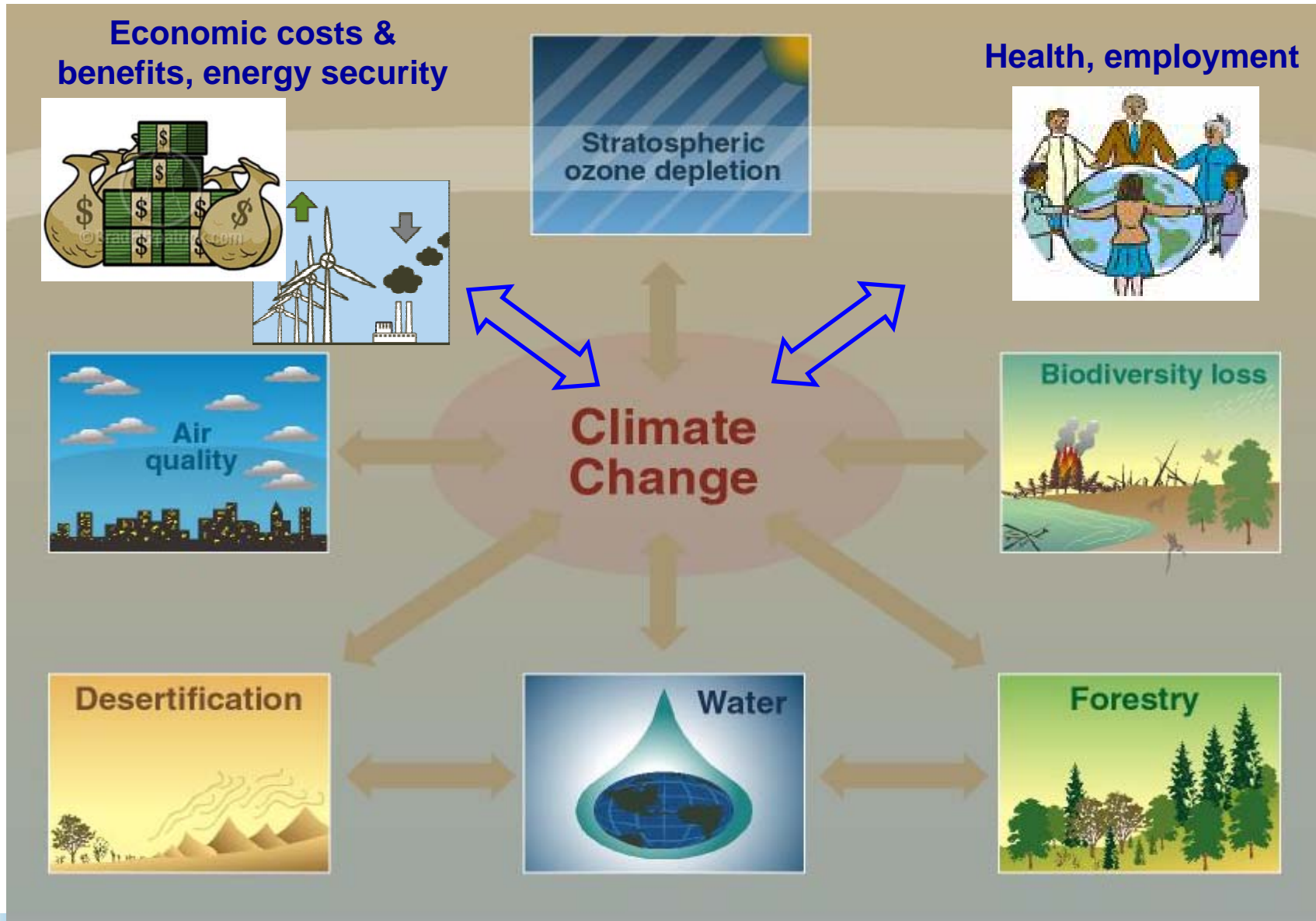
- A. Climate policy can have positive or negative effects on other factors**
 - **Ancillary benefits or co-benefits**

- B. Non-climate policies can influence GHG emissions as much as specific climate policies**
 - **Requires mainstreaming climate change in decision-making**

A




Climate change and other issues

3 dimensions of sustainable development: economic/social/environmental



Examples of side-effects of climate mitigation

A

OPTIONS	SYNERGIES	TRADEOFFS
<p>Energy: efficiency, renewables, fuel-switching</p> 	<ul style="list-style-type: none">• air quality• supply security• employment• costs (efficiency)	<ul style="list-style-type: none">• particulate emissions (diesel)• biodiversity (biofuels)• costs (renewables)
<p>Forestry: reduce deforestation, plant trees</p> 	<ul style="list-style-type: none">• soil protection• water management• employment• biodiversity (deforest.)	<ul style="list-style-type: none">• biodiversity (plantations)• competition food production
<p>waste: landfill gas capture, incineration</p> 	<ul style="list-style-type: none">• health & safety• employment• energy advantages	<ul style="list-style-type: none">• ground water pollution• costs

Two-way Relationship Between Climate Change and Sustainable Development

A. Climate policy can have positive or negative effects on other factors

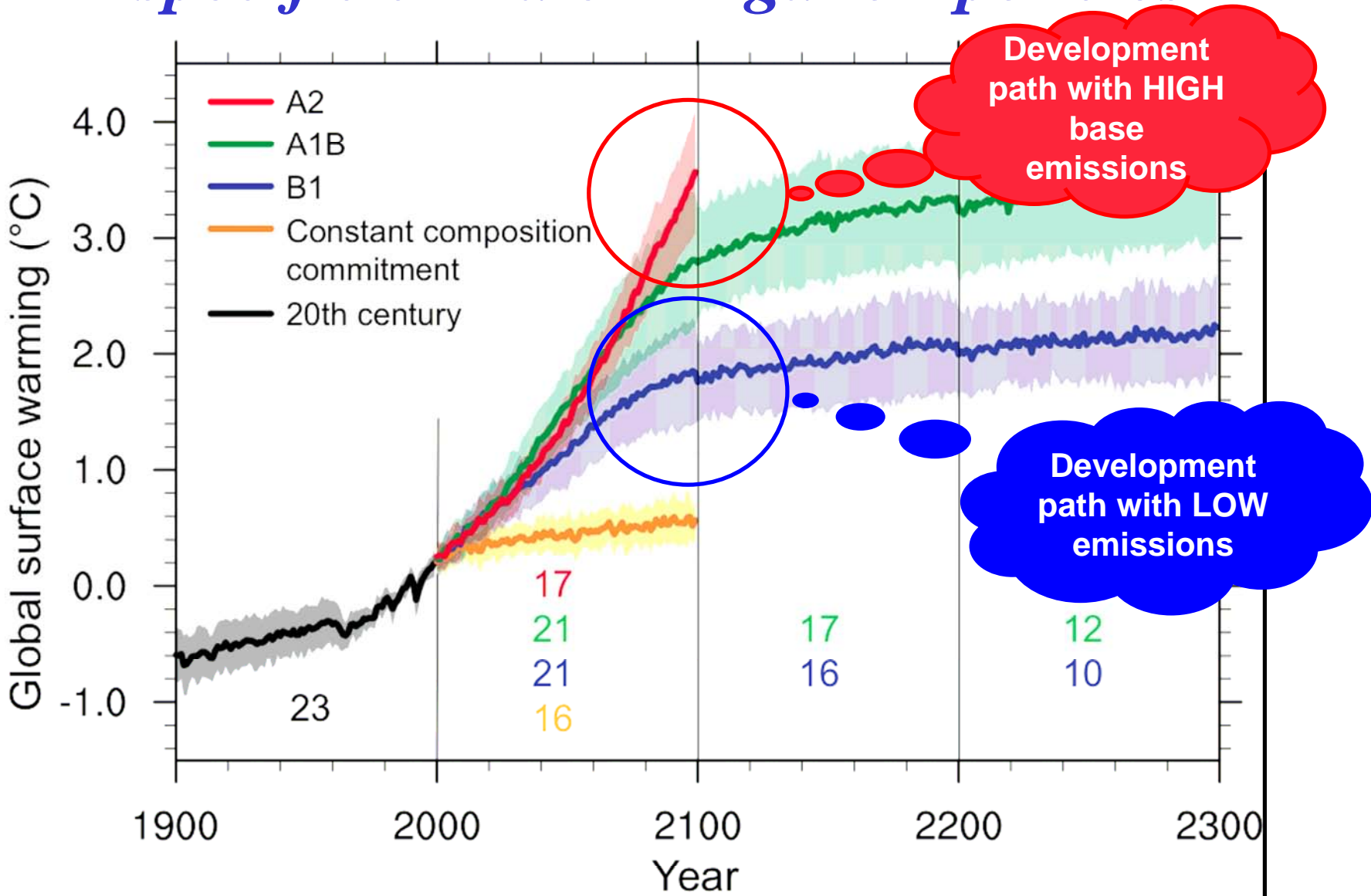
-- Ancillary benefits or co-benefits

B. Non-climate policies can influence GHG emissions as much as specific climate policies

-- Requires mainstreaming climate change in decision-making

B

Development path as important as specific climate mitigation policies



B *Mainstreaming climate mitigation in development decisions with climate consequences is essential*

Examples:

- **Economic policy (incl. fiscal, trade)**
- **Power sector deregulation**
- **Energy/oil import security**
- **Forestry**
- **Bank lending**
- **Insurance industry**
- **Rural energy**



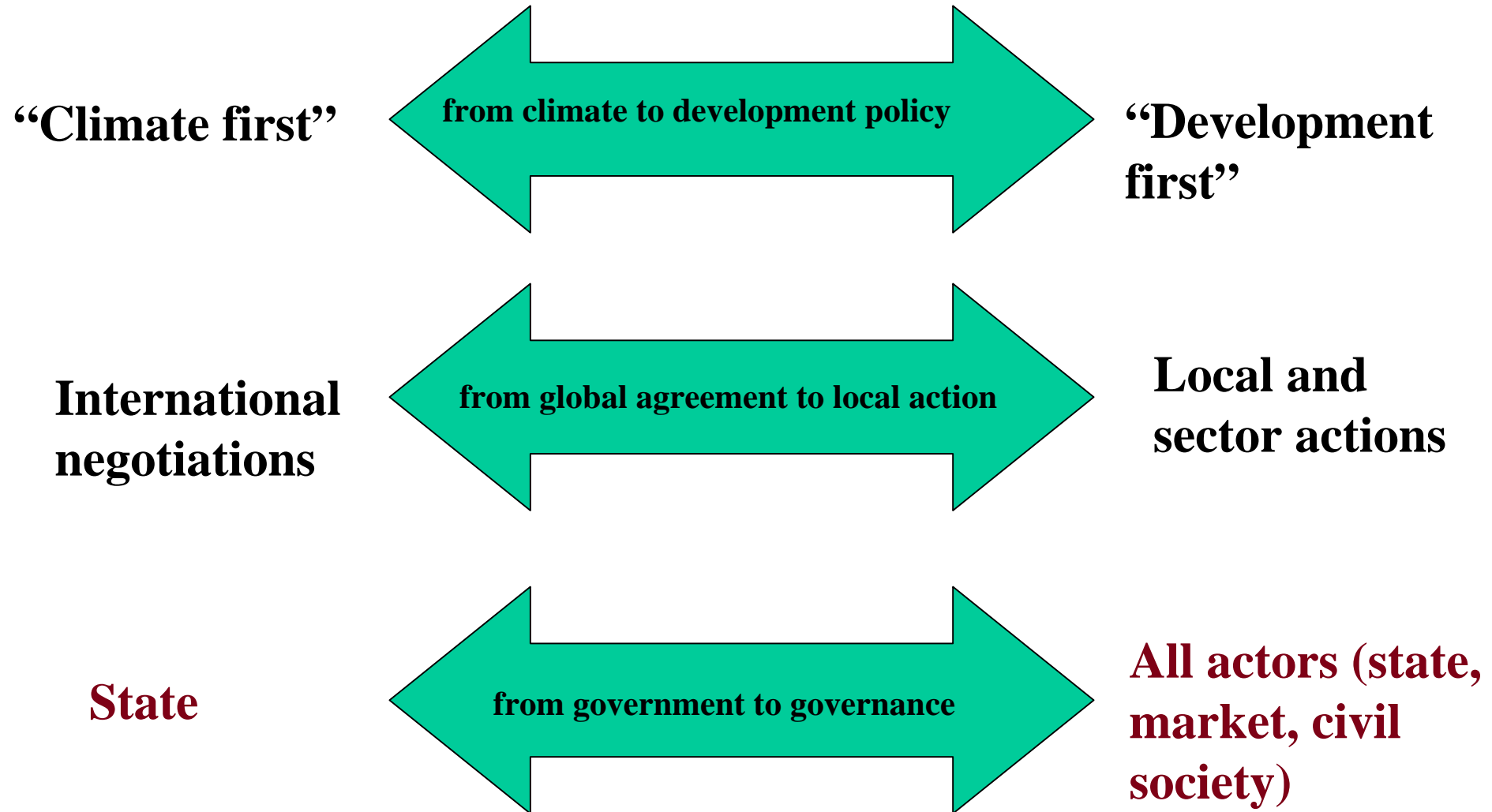
Non-climate policies can influence GHG emissions as much as specific climate policies

Sectors	Non-climate policies -- Candidates for integrating climate concerns	Possible influence (% of global emissions)
Macro-economy	Taxes, subsidies, other fiscal policies	All GHG emissions (100 %)
Forestry	Forest protection, sustainable management	GHGs deforestation (7%)
Electricity	Renewable energy, demand management, decreasing losses transport,/distribution	Electricity sector emissions (20 %)
Oil-imports	Diversification energy sources/decrease intensity -> enhance energy security	GHGs from oil product imports (20 %)
Insurance buildings, infrastructure	Differentiated premiums, liability conditions, improved conditions green products	GHG emissions buildings, transport (20 %)
Bank lending	Strategy/policy, lending projects accounting for options emission limitations	Notably development projects (25%)
Rural energy	Policies promoting LPG, kerosene and electricity for cooking	Extra emissions over biomass (<2 %)



3 Ways to Broaden Climate Policies

(Mitigation and Adaptation)



Conclusions

- Mainstreaming climate mitigation in development decisions with climate consequences is essential for a low-emissions path to emerge
- Entities – state, markets, and civil society – at all levels need to participate in the mainstreaming process
 - National, state, and local governments,
 - Organized and unorganized industry,
 - Non-governmental organizations, and
 - General public

Thank you for your attention!