

Group discussion:
**Links between baselines and
potential emission scenarios**

Axel Michaelowa

michaelowa@perspectives.cc

MRV Summer School 2013

Hanoi, 21st August, 2013



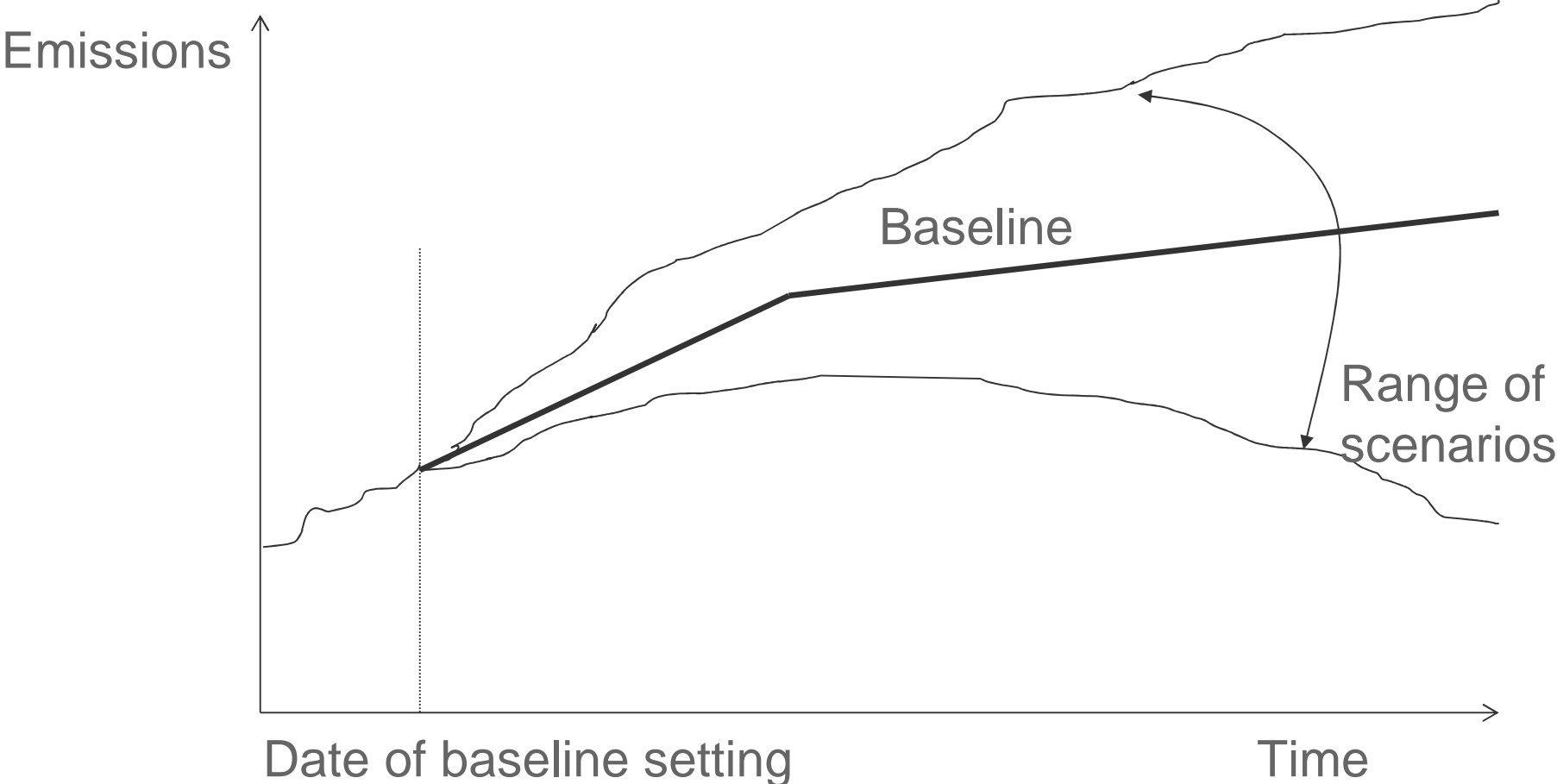
International Partnership
on Mitigation and MRV

Emission scenarios vs baselines

- **Emission scenarios**
 - Depict **range** of possible future developments
 - Can take into account an almost **unlimited range of assumptions**
 - Can but need not include effects of **past and future mitigation policies**

- **Baselines**
 - Depict the “**business-as-usual** “ scenario
 - Should they include the effects of **future** mitigation policies?
 - Should they include the effects of mitigation policies **introduced in the past?**
 - Are **starting point for calculation of emission reduction** under a LEDS/NAMA/mitigation policy
 - Are developed using a **politically agreed methodology**
 - Are updated in **politically agreed intervals**

Emission scenarios vs baselines



Key parameters of emission scenarios influencing baselines

- **GDP growth**
- **Population growth**
- **Autonomous energy efficiency improvement**
- **Share of carbon-intensive sectors in the economy**
- **Cost of mitigation technologies**
- **Fuel prices**
- **Price elasticities**
- **Transport demand**
- ...

Experiences with baseline setting for CDM

- Strong role of **experts** in deciding on baseline methodologies
- **Initial political decisions** trigger development of “**families**” of baseline methodologies
 - Electricity grid emission factor: build vs operating margin
 - Waste-related methane: 1st order decay model from IPCC
- Some, but not all methodologies try to **capture non-additional emissions mitigation** under the baseline
- Mitigation policies introduced in the past were **not taken into account**, in the future after 7 years
- Political move to **simplify** methodologies through introduction of **benchmarks** and **default utilization factors**
- **Differentiation** according to **host country types**
- **Update every 7 years** for existing activities, otherwise **rolling update**

Questions for group discussion I

- What **criteria** should be used to define **values** for parameters used for determination of emissions scenarios in order to **derive baselines**?
 - Conservativeness
 - Internal consistency
 - Appropriateness / Adequacy
 - Accuracy, measurability and reliability of underlying data
 - Limited level of uncertainties
 - ...

Questions for group discussion II

- Should baselines be based on a **“no additional policy”** case?
- Should baselines take into account **policies introduced in the past?**
- Should baselines try to capture the **non-additional mitigation potential?**
- Should baseline methodologies be **agreed on the UNFCCC level?** If yes, should there be **tiers** according to the level of development of a country?
- **How often** baselines should be updated?