

#### Nationally-appropriate mitigation actions as a means to obtain recognition and support for low-carbon transport interventions

#### A brief introduction to TRANSfer and its handbook "Navigating Transport NAMAs"

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# TRANSfer in Transport

#### Challenge

Motorised transport is responsible for 23% of fossil-fuel related carbon dioxide emissions (IEA, 2010) and for 36% of their growth until the year 2035 (IEA, 2011). The key driver is rapid motorisation, in particular in developing countries.



#### Publications

 Factsheet TRANSfer
 FAQ NAMAs
 CDM and NAMAs
 GIZ Modules on Transport and Climate Change



TRANS

#### TRANSfer Project

#### Objective

To support developing countries to develop climate change strategies in the transport sector as NAMAs.

#### Scope

A three-year project run by GIZ, funded by the International Climate Initiative of the German Ministry for the Environment.

Partner Countries

Colombia, Indonesia and South Africa.

#### Handbook

The handbook "Navigating Transport NAMAs" provides guidance on how to take mitigation action in the transport sector already today.

The handbook consists of two parts:

 Part 1 explains how to design a NAMA in the transport sector in four practical steps.

 Part 2 contains case studies from experiences in selected developing countries.

#### Transport NAMAs

Nationally Appropriate Mitigation Actions (NAMAs) are voluntary emission mitigation measures by developing countries as part of their commitment to fight climate change.

According to the Cancún Agreements, NAMAs are to be "supported and enabled by technology, financing and capacitybuilding, in a measurable, reportable and verifiable manner."



The transport sector offers a broad spectrum of options for mitigation action:

- . Urban land use planning
- Green logistics
- Road pricing
- \* Parking management
- · High quality public transport
- Shift to low carbon fuel
- · Fuel economy standards
- Renewal of the vehicle fleet



### **giz** TRANSfer – Work Packages

#### WP 2: Technical Advice in the three partner countries

- Identify GHG reduction potential
- Identify mitigation policies & measures
- Identify need for international support
- Set-up GHG inventory for transport

e.g. workshops, short missions of international experts, trainings, studies or analyses of emission reduction potential, presentation of international examples

**Technical assistance in Indonesia** 

**Technical assistance in Colombia** 

#### **Technical assistance in South Africa**

#### WP 3: Technical background of transport and the climate regime

Handbook: Navigating transport NAMAs

**Toolbox:** Low Carbon technologies and measures

WP 4: Dissemination of results and communication

**Online communication** 

Final workshop in Berlin / Bonn

Presentation of results at international conferences

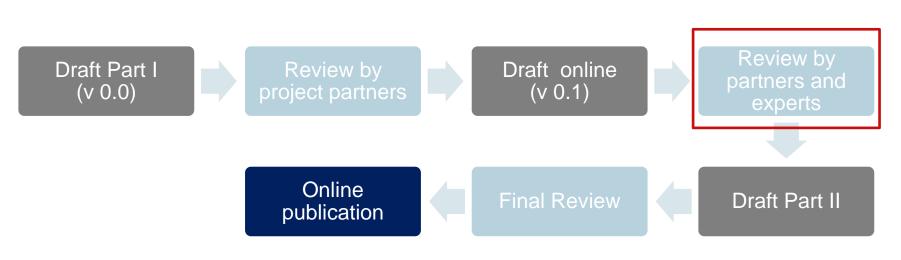
### **giz** Handbook "Navigating Transport NAMAs"

 Contains all relevant information for decision makers and practitioneers in the transport sector

 Available online at <u>www.TRANSferProject.org</u>

Status:





### **giz** Handbook "Navigating Transport NAMAs"

Foreword	ii
How to use this handbook	iv
Introduction	vi
Part I Generic information on mitigation action in the transport sector	1
1. Many solutions towards sustainable low carbon transport are ready for implementation	4
2. Transparency on emission reductions is key	15
3. Financial and technical support can be tapped from different sources	25
4. Implementation of mitigation action is beneficial for all stakeholders	43
Part II Case studies from partner countries	

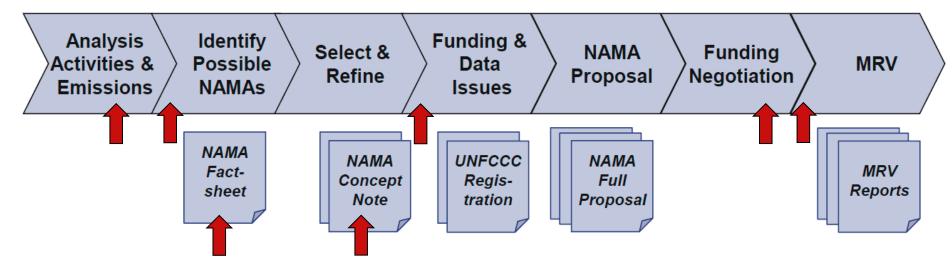
- A. Colombia
- B. Indonesia
- C. South Africa
- D. Mexico
- E. Costa Rica
- F. Chile

Annex A: Overview of options for GHG emission mitigation actions (factsheets) Annex B: International Climate Finance Sources

#### draft v0.1

### **giz** Status Toolbox

 Contains tools and approaches that are country-specific or transregional



#### **Elements and drafts available in 2012**

- Screening Tool
- **Training Material**

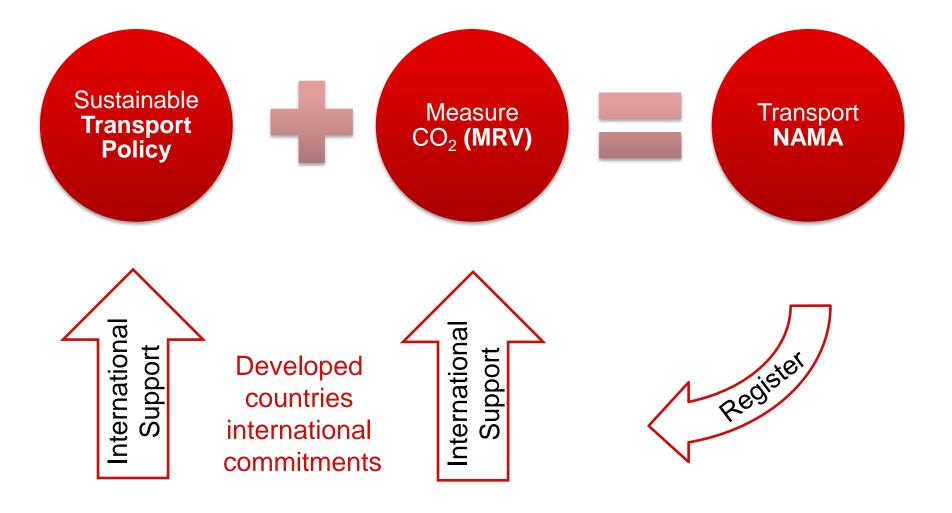
MRV Guideline

Planned for 2013

Matching Platform for Funding

- Templates for NAMA Fact Sheet und Concept Note
- Overview of GHG emission mitigation actions in Land Transport
- Guideline for Local Mitigation Actions in Land Transport

### **GIZ** What makes a policy a NAMA?



## **giz** Hurdles to clear towards NAMAs



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#### **giz** NAMAs enter the climate policy arena

Technology Transfer (e.g. TNA) Clean Development Mechanism (e.g. methodologies)

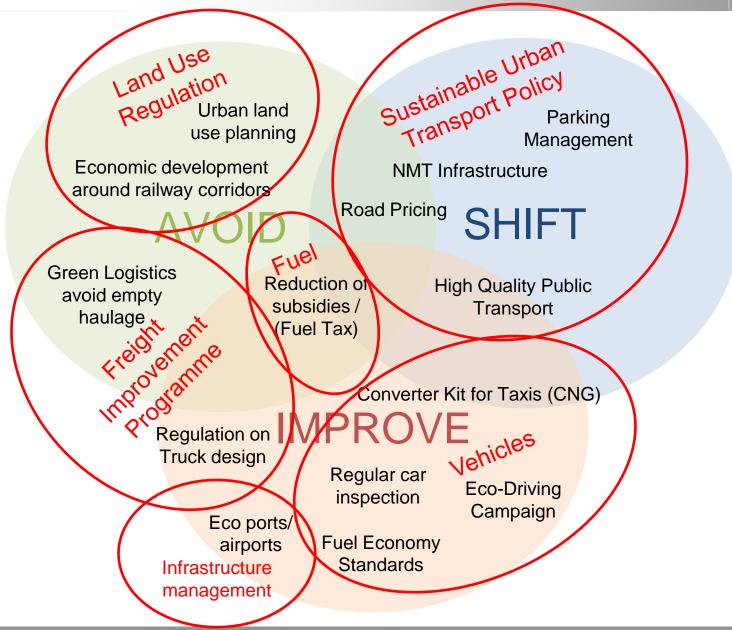
NAMAs

Capacity Building (e.g. inventory trainings) Policies and measures (e.g. estimation of effects)

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### **giz** What could be registered as a NAMA?

ow Carbon Development Strategy



### **giz** 9 Steps of a NAMA Development

- 1. NAMA idea
- 2. NAMA pledge
- 3. NAMA proposal
- 4. Planned NAMA
- 5. Adopted NAMA
- 6. Registered NAMA
- 7. NAMA under implementation
- 8. Implemented NAMA
- 9. Closed / finalized / verified / aborted / cancelled NAMA

### **giz** TRANSfer – 8 key messages and approaches



**<u>Objective</u>:** Support decision makers to develop climate strategies in transport as Nationally Appropriate Mitigation Actions (NAMAs)

- 1. Offer **attractive carbon investment opportunities** in the transport sector, based on the Avoid-Shift-Improve approach
- 2. Provide **bankable solutions in all sub-sectors** (urban passenger transport, inter-urban passenger transport, freight transport and logistics, domestic aviation and shipping, rail, vehicle and fuel techn.)
- Ensure sound inter-ministerial coordination in all stages of design and implementation of transport NAMAs, with Ministers of Transport as central key players

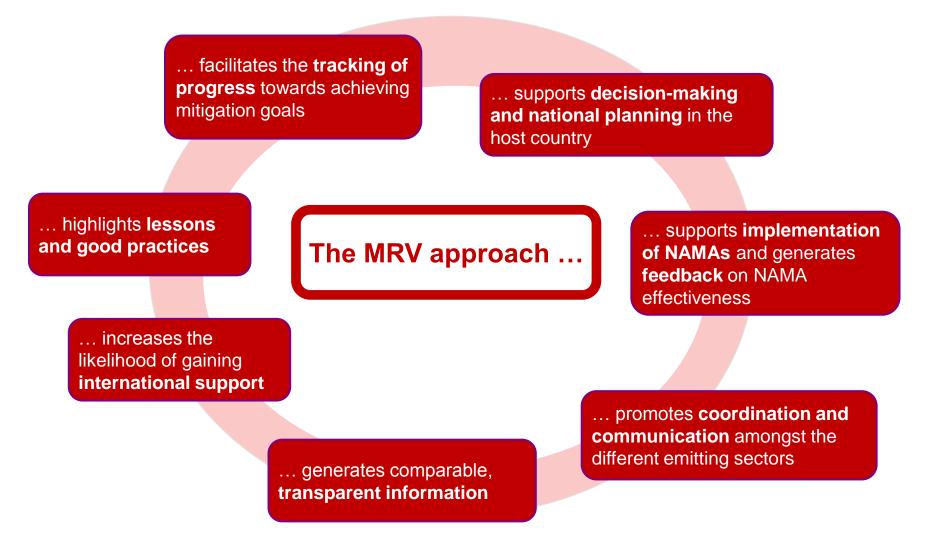
### **giz** TRANSfer – 8 key messages and approaches



- 4. Allow for active **participation of private sector and civil society** through multi-stakeholder workshops
- 5. Provide **simple** yet comprehensive and solid **methodologies for MRV** of transport NAMAs
- 6. Offer **capacity building** to partner countries on sustainable transport options for future transport NAMAs
- 7. Create a **platform to allow matching** of transport NAMA proposals with funding opportunities
- 8. Spread the news about transport NAMAs via a **network for dissemination** of good practices and lessons learned

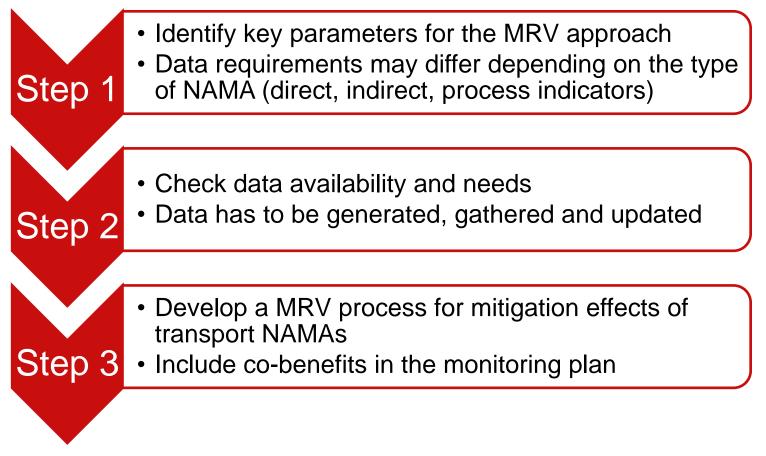
### giz MRV of NAMAs

Initiated in the Bali Action Plan, MRV (Measurement, Reporting, Verification) is a key requirement under the UNFCCC.





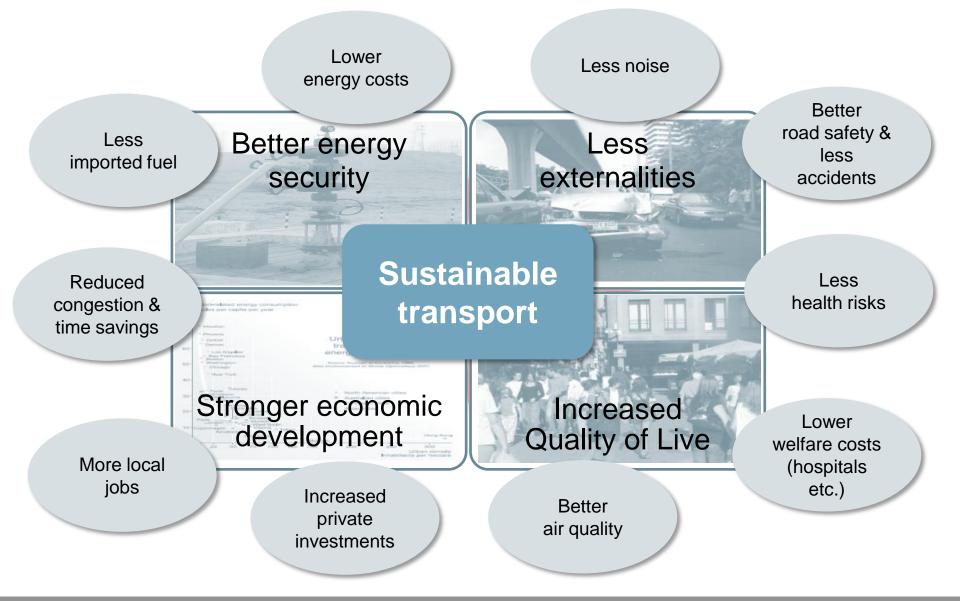
# 3 steps for the elaboration of a MRV-system for tNAMAs



### **giz** Financing low carbon transport

Financing		Technology Transfer	Capacity Building
<b>Concepts &amp;</b> <b>Plans</b> finance of organization	<ul> <li>Integrated urban and transport plans</li> <li>Guidelines &amp; Rules</li> <li>Outlining Transport systems (e.g. BRT)</li> </ul>	<ul> <li>Transport modelling</li> <li>Data gathering (e.g. traffic counting)</li> </ul>	<ul> <li>Organisation development</li> <li>Trainings</li> <li>Setting up networks</li> <li>MRV concept</li> </ul>
<b>Infrastructure</b> mainly initial Investments	<ul> <li>Construction of</li> <li>Bus lanes, rail, stops</li> <li>NMT networks</li> <li>Interchanges (integration of modes)</li> </ul>	<ul> <li>Efficient vehicles and retrofitting</li> <li>E-ticketing</li> <li>Passenger infor- mation systems</li> </ul>	<ul> <li>Green public procurement</li> <li>Building Standards</li> </ul>
Operation & Management continuous financial flows• Operational subsidies • Campaigns • Reporting on performance		<ul> <li>Intel. Transport Systems (ITS)</li> <li>Charging systems</li> </ul>	<ul> <li>Maintenance &amp; Inspection</li> <li>System optimization</li> <li>Eco Driving</li> </ul>

### **giz** Co-benefits as rationale for domestic action

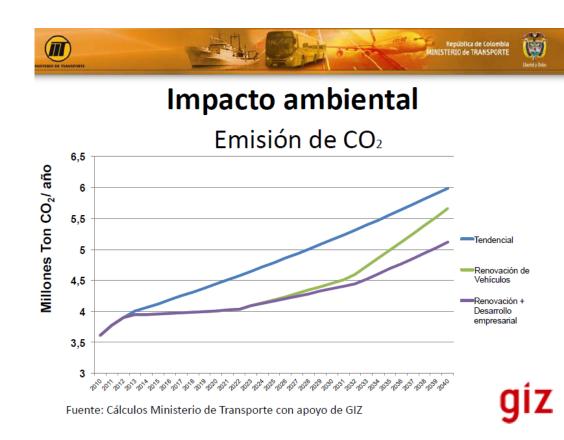


#### Context of tNAMA: Renovation of HDV fleet

- 4-year presidential term has just started in 2010
- Strong and decided support from national government (including Presidential mandate)
- Well-informed and pro-active key stakeholders in all ministries
- Second pilot NAMA on freight logistics (supported by IADB) is complementary to HDV fleet renovation
- Synergy to Mexican NAMA => South-South Cooperation
- Other tNAMAs are currently being planned in Colombia (e.g. urban mobility management)

#### Fleet renovation tNAMA- steps for MRV

- MoE developing MAC curves
- GIZ supporting in preliminary CO<sub>2</sub> estimations and development of studies
- Currently identifying data, information and studies that are needed for tNAMA



#### **Complementary activities of the project**

- Installation of a working group on tNAMAS for Colombia
- Participation in events related to NAMAs and with Colombian delegations
- Individual meetings with other key stakeholders (experts, industry, other ministries, etc)



Photo: Workshop activity in Santiago de Chile related to NAMA development for Colombia (November, 2011)

#### tNAMA Fleet renovation: Barriers/obstacles/challenges

- Data quality must be improved considerably (some steps have already been taken by various parties)
- Some opportunities (i.e. plans for 10 ppm diesel sulphur content) have not been seized by government
- Coordination of various actors takes longer (but yields better results)
- Freight sector needs organizational enhancement to nurture all tNAMA developments via fleet renovation

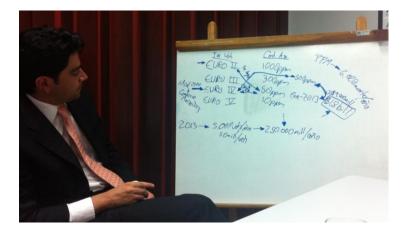
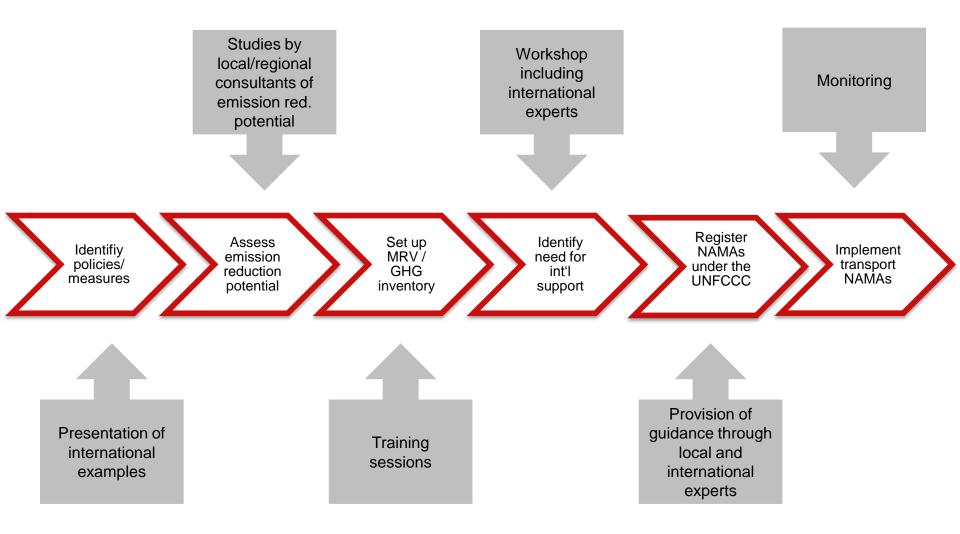


Photo: Preparatory meeting with local government identifying timelines related to diesel fuel quality

### **giz** Potential Activities in Partner Countries



#### The NAMA development and registration process

### **giz** Benefits for Partner Countries

Visibility of your country as inspiring examples in the "NAMA handbook"

> Financial support for studies and background research technical advice from international experts

Training of staff on transport and climate related topics Exchange of knowledge and experiences in a South-South-North expert network Improvement of your **transport** system and related cobenefits

#### Supporting the process of identification and registration of NAMAs

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### **giz** Example of a TRANSfer research study



#### Fuel efficiency and emissions of trucks in Germany An overview

Authors:

Frank Dünnebeil & Udo Lambrecht IFEU-Institute Heidelberg Commissioned by



Federal Ministry for the Environment, Nature Conservation and Nuclear Safety

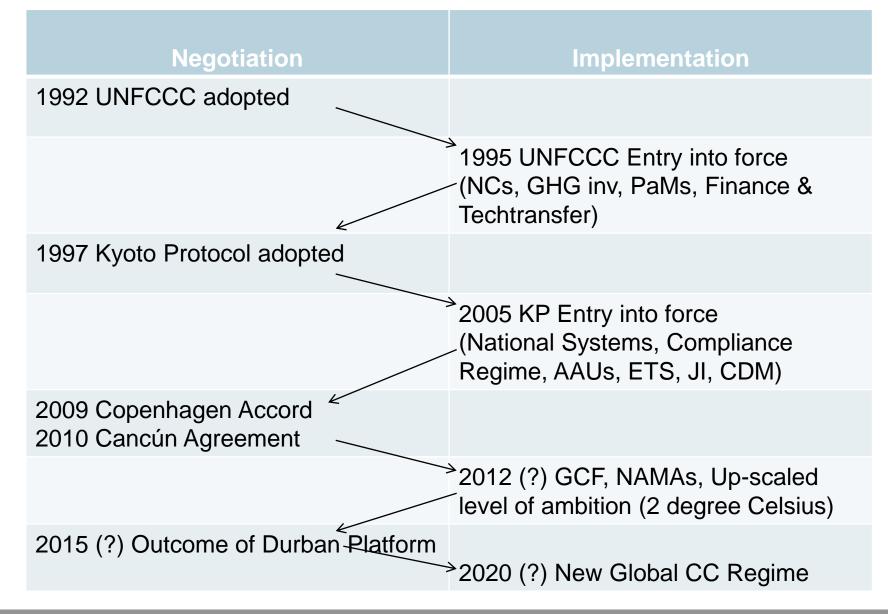
### **giz** Example of a TRANSfer research study

- 1 Background and Scope
- 2 Road Transport in Germany
- 3 Emission Regulation Heavy Duty Vehicles in Europe
- 4 Development of Fuel Quality Europe/Germany
- 5 Emissions from heavy-duty trucks Measurements and Modelling
- 6 Fuel efficiency and GHG emissions from heavy-duty trucks
- 7 Development of Transport, Emissions and Fuel Efficiency
- 8 Summary

### **giz** TRANSfer presentations at COP17, Durban

Date	Time & location	Organisers	Title	Description	INIK
Thursday, 01 Dec 2011	16:45— 18:15 Levubu River	Bridging the Gap Initiative Centro de Transporte Sustentable de México Asociacion Civil (CTS México)	'Bridging the Gap' between transport and climate policy: time to tackle the transport sector (side event)	Leading transport experts explain how to make land transport part of national climate change action plans and how it can be incorporated into NAMA development. Parties and developing country representatives will also discuss existing and emerging finance, capacity building and technology provisions.	COP17/CMP7
Friday, 02 Dec 2011	15.30- 17.00 EU Pavilion, Room Warsaw	The Federal (German) Environment Ministry (BMU)	TRANSfer – Germany's support for developing countries' NAMA in the transport sector	This is a joint BMU-GIZ event on the transfer of climate-friendly technologies and measures in the transport sector.	CLIMATE CHANGE CONFERENCE 2011 DURBAN, SOUTH AFRICA <u>28 Nov – 9 Dec:</u>
Tuesday, 06 Dec 2011	13:00- 15:00 Climate Change Response Expo (outside ICC)	South Africa Ministry of Transport Bridging the Gap Initiative	Tackling Climate Change and Transport: Strategies and Best Practices from around the World	The event will bring together high-level officials from Ministries of Transport from different countries as well as multilateral development banks to share ideas to address climate mitigation challenges in the transport sector.	TRANSfer presentation at Durban CCR Expo, Stand 174

### **giz** Interaction between the two worlds



### **giz** Interaction between the two worlds

Issue	Political Perspective	Technical Perspective
Level of ambition	How much mitigation can we pledge? At what costs?	Assessment of domestic mitigation potential, cost-benefit analysis
Global burden sharing	How much do others do? What's our fair share?	Transparency through MRV of mitigation action
CBDRC <sup>a</sup>	How much technical and financial support may we expect to receive?	Transparency through MRV of support
ACCCT b	Which rules, modalities and procedures need to be set at a global level?	Institutional arrangements, national circumstances, data availability etc.

a: Common but differentiated responsibility and capability b: accuracy, consistency, comparability, completeness, transparency



### Thank You!

#### Contact

#### TRANSfer@giz.de

www.TRANSferProject.org www.giz.de

#### Frequently Asked Questions on Transport NAMAs

Options and Opportunities for Sustainable Transport

#### What are NAMAs?

Nationally Appropriate Mitigation Actions (NAMAc) are voluntary emission reduction measures by developing countries that are directly reported to the United Nations Framework Convention on Climate Change (UNRCCC). NAMAr will be a practical tool to tackle CHC emission from the trainport acotor.

- NAMAs are policies, programmes and projects that are either connomy-wide measures (e.g. CO, taxation) or specific sectoral initiatives (e.g. fuel efficiency standards).
   Proposals for NAMAs need to be submitted to the
- Proposals for NAMAs need to be submitted to the UNFCCC by national governments but they can include actions on domestic, regional, or local levels.
- NAMAs are an opportunity to acknowledge developing countries' unliasteral contribution to reduce GHG emissions and match these with international funding.
- Proposals for NAMAs seeking international support as well as funded NAMAs will be recorded in a registry at the UNFCCCC along with relevant technology, finance and capacity building support.

#### The Bridging the Gap Initiative

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GIZ, TFL, Viaolia Transport, UITP and ITDP join forces in Bridging the Gap – Pathways for transport in the post 2012 process to integrate developments in the transport sector with the International climate change negotiations. Into available at http://www.transport2012.org



#### Why NAMAs in the transport sector?

Sustainable transport systems aim to achieve equitable access and mobility for all people, providing pathways to conomic and uscial development, while imposing minimal environmental impacts. The development of sustainable transport is challenged by a lack of workable mechanisms and instruments. For example, the Clean Development Mechanism has initialized loss than a dozen of projects in the transport sector rine: 2005.

From this perspective, NAMAs are enviaged to provide new opportunities for developing countries to address the large and rapidly increasing emissions from transport, while still managing their need for growth and extronomic development. In developing and registering NAMAs under the UNFCCC, it is enviaged that developing countries can benefit from:

Access to new sources of funding – Funds will be developed to masch actions and funding needs for the support of mitigation, adepution, REDD-plus, technology and capatity building: there is a short-term pledge to provide resources approaching USD 30 billion for the period 2010 – 2012.

 Nacional and international visibility - Countries can move directly to the front of elimate mitigation action by: (a) joining the global effort to reduce GHC emissions, and (b) making the transport sector a part of the solution.

kcapang int co-tereino - sustantate and moters low-carbon transportation systems help to increase the competitiveness of soutaries and chites by attracting top companies and helphy qualified worken. Further benchits are better air quality and health, increased energy security, reduced emgestion, improved asfety, aosial inclusion of poor people, enhanced soutarine, etc.

On behalf of

Federal Ministry for the Environment, Nature Conservation and Nuclear Safety