# International transferability of measures

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# Overview of presentation



- General comments on transferability of measures
- Overview of the TURBLOG project
  - TURBLOG = “Transferability of URBan LOGistics concepts and practices from a worldwide perspective”
- TURBLOG case study concerning transfer of urban freight measures to Cariacica, Brazil

# Key ideas behind transferability

- We are living in an increasingly globalised world
  - with increasing flows of information around the world

- So that everyone has greater access to knowledge about policy measures implemented in other locations
  - such knowledge plays an increasingly important role in measure selection

- However, measures cannot simply be ‘lifted’ from one place to another place without questioning whether they are appropriate
  - or, at the other extreme, simply rejected since they seem ‘strange’

## Key questions / issues

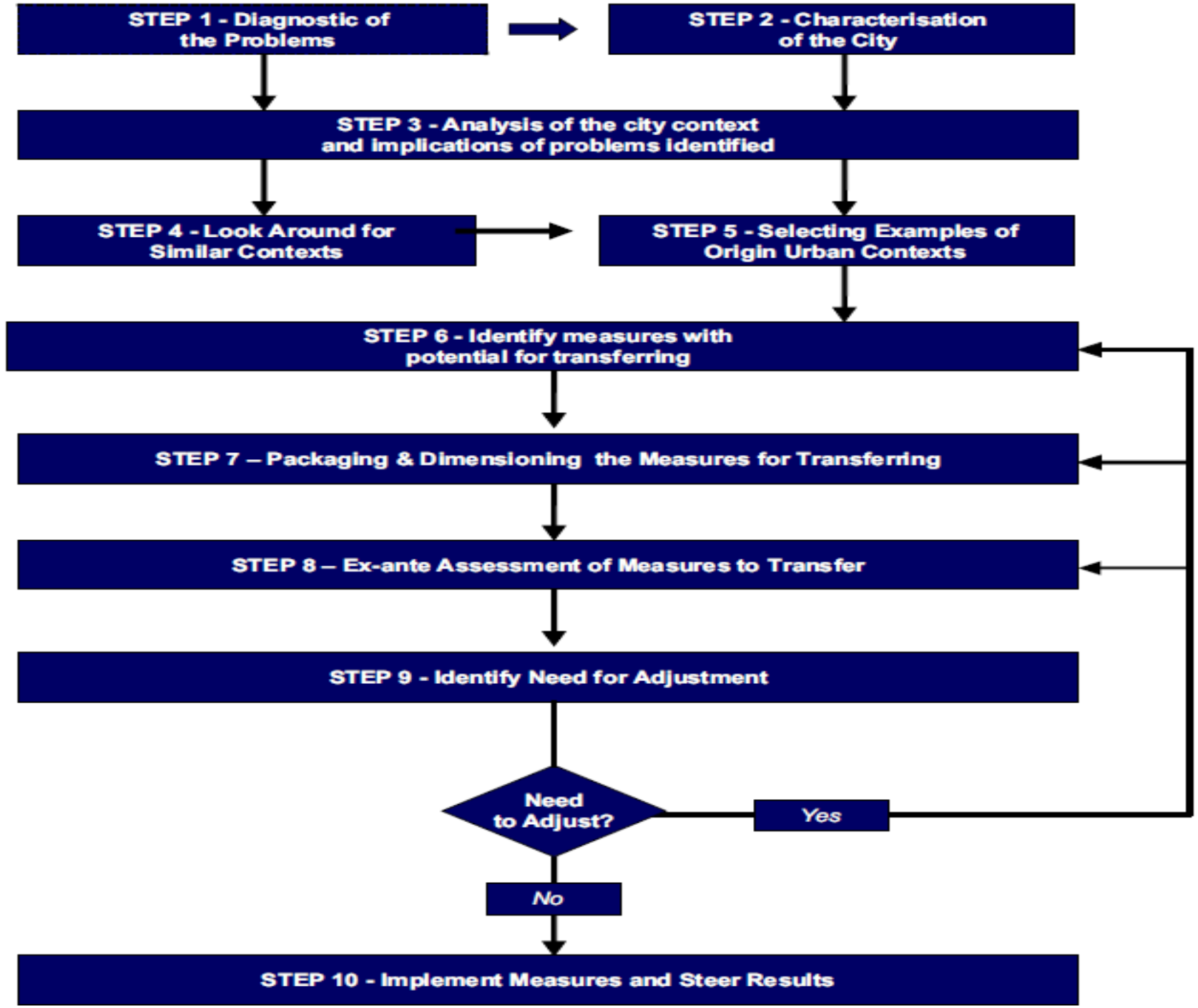
- How can we devise coherent approaches to judge whether or not a measure is transferable?
    - before they are implemented
- What is the role of evidence from ‘very different locations’ when analysing transferability?
- What is the role of ‘transferability experts’?
- What barriers might exist to successful transfer of measures?
    - cultural, political, technological, financial etc
- What facilitators might exist to support successful transfer?
    - are there any ‘windows of opportunity’?

# A practical approach for assessing future transferability of measures

- A “10 steps transferability method” was developed and used in the EU CIVITAS project METEOR:
  - http://www.rupprecht-consult.eu/nc/projects/projects-details/project/civitas-meteor.html

- The EU CIVITAS Initiative is designed to assist European cities to achieve a more sustainable, clean and energy efficient urban transport system, by implementing and evaluating an integrated set of technology and policy based measures (http://www.civitas.eu/)

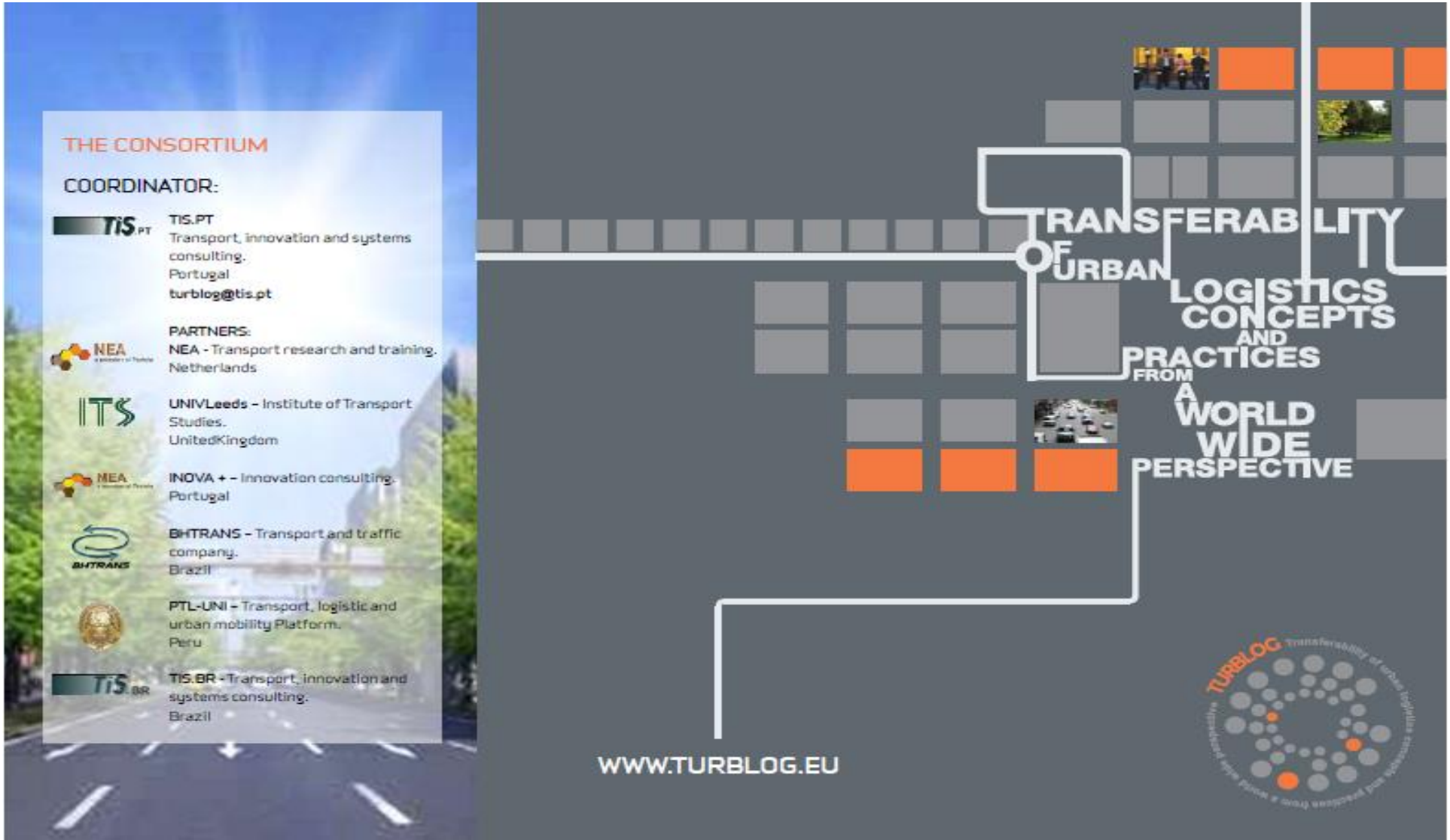
- More information from Macário, R., Marques, C.F., 2008. Transferability of sustainable urban mobility measures. *Research in Transportation Economics* 22(1)


STEP 1 - Diagnostic of the Problems
STEP 2 - Characterisation of the City
STEP 3 - Analysis of the city context and implications of problems identified
STEP 4 - Look Around for Similar Contexts
STEP 5 - Selecting Examples of Origin Urban Contexts
STEP 6 - Identify measures with potential for transferring
STEP 7 – Packaging & Dimensioning the Measures for Transferring
STEP 8 – Ex-ante Assessment of Measures to Transfer
STEP 9 - Identify Need for Adjustment
Need to Adjust?
Yes
No
STEP 10 - Implement Measures and Steer Results

# The TURBLOG project

- TURBLOG focussed upon the **urban freight** aspects of creating sustainable urban mobility plans (SUMPs)

- Freight is often ‘forgotten about’ when developing SUMPs



# Urban freight measures: Background

- Urban freight represents typically between 20 to 25% of road space contributing to between 10 to 20% of urban road traffic

- Freight movements are indispensable for a city's economy
    - but at same time significantly affect the attractiveness and quality of urban life

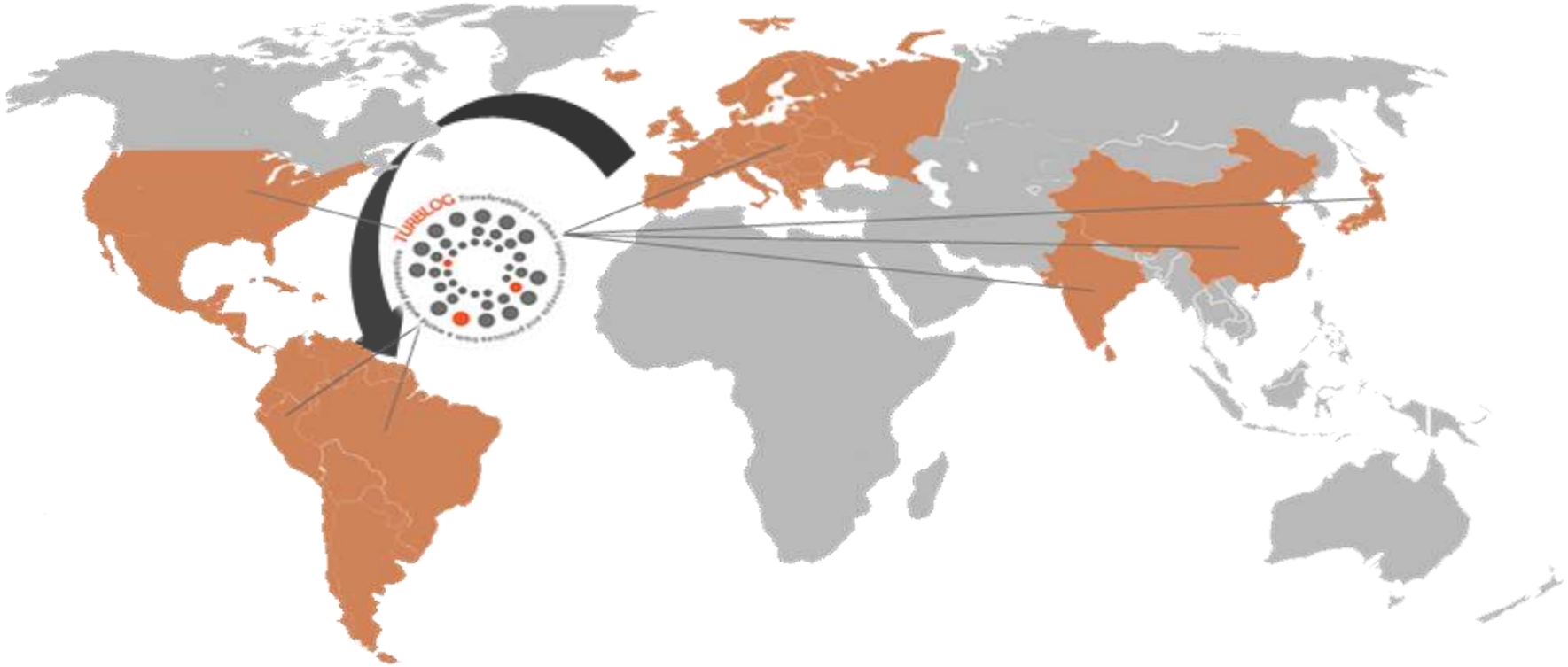
- Urban freight movement is a complex and heterogeneous activity

# Complex and heterogeneous activity

- In comparison with passenger movements, freight movements can be less frequently associated with (simple) ‘origin-to-destination’ movements between zones within the urban area
    - intra-urban freight carriers frequently make complex tours involving multiple delivery / pick-up points
    - much freight traffic within a city is ‘through traffic’ involving movement between external zones.
- Implementing urban freight measures involves intervening in a multiplicity of areas of urban mobility
    - including institutional, regulatory, infrastructural, and technological

# TURBLOG strategy

- Address urban logistics from a worldwide (geographical) perspective
  - whilst looking at specificities of Europe,  Brazil and Peru
- Assess issues of transferability of urban freight measures



# Example of a “specific problem situation”: the Gamarra area in Lima



- Gamarra is the largest urban shopping area in Peru. Occupying 60 ha, there are 10 thousand micro-enterprises working in the area
- 60 thousand people work in Gamarra, and in periods of marketing campaigns there are more than 250,000 visitors


# TURBLOG worldwide review of measures



TURBLOG made a worldwide review and analysis of potential solutions, including:

- Interventions on loading/unloading
- Integration with comprehensive urban transport and land use planning
- Supportive measures (signing, maps etc)
- Alternative modes
- Policy packages

Grant Agreement n°.SCS8-GA-2009-234061
Coordination and support action (Coordinating)
FP7-TRANSPORT SST.2008.3.1.4. Urban delivery systems
Project acronym: TURBLOG_ww
Project title: Transferability of urban logistics concepts and practices from a world wide perspective

SEVENTH FRAMEWORK PROGRAMME

TURBLOG Transferability of urban logistics concepts and practices from a world wide perspective

**Deliverable 1**

***A worldwide overview on urban logistic interventions and data collection techniques***

Due date of deliverable: 31st March 2010
Submission date:

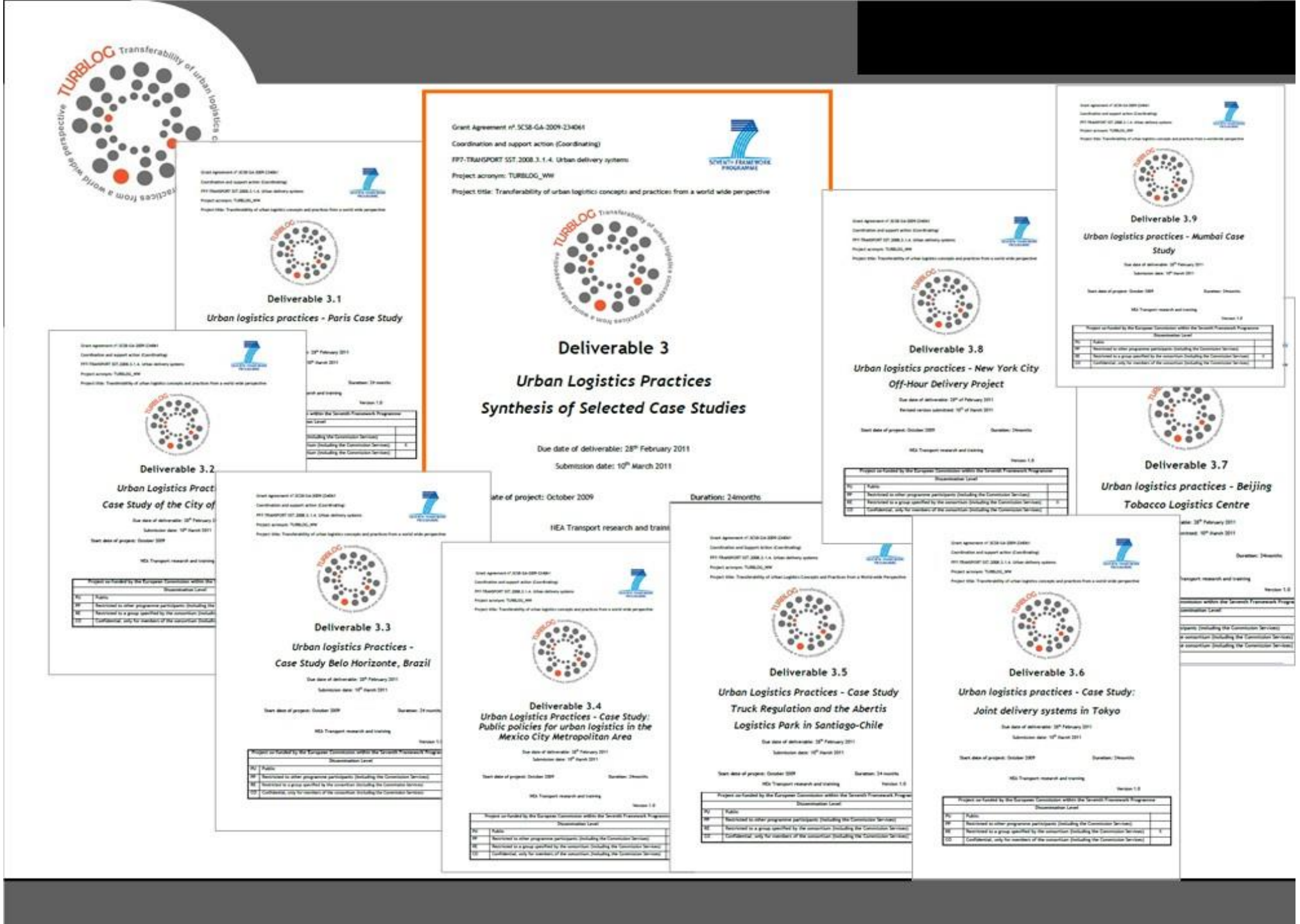
Start date of project: October 2009 Duration: 24 months

TIS.pt - Consultores em Transportes, Inovação e Sistemas, S.A.

Version 1.0

available from http://www.inovamais.pt/turblog/results/D1.pdf

TURBLOG also produced detailed case study reports



# Transferability case studies in TURBLOG

The potential transferability of measures from around the world were considered in four case studies:

- Lima (Peru)
- Belo Horizonte (Brazil)
- Cariacica (Brazil)
- Lisbon (Portugal)

# Overview of Cariacica case study

- Cariacica is a relatively small-sized city (in Brazilian terms)
  - Population approx. 350,000
  - Small transport (sub-) department within Local Authority

- How might a ‘light’ transferability analysis be carried out?
  - which sticks to the same logic as a full transferability analysis

- Relevant to many other cities in the world

Espírito Santo State, Brazil


Cariacica is the poorest of the seven cities in the Greater Vitória Metropolitan Area

# Main events in the case study



- Initial visit made to Cariacica on 26th January
  - General agreement about type of measures to be considered in transferability analysis (i.e. regulation of freight traffic)
- Assessment Workshop held in Cariacica on 9th February
  - Attended by approximately 20 people (city authority personnel and stakeholders)
- Final seminar held in Cariacica on 18th October
  - Analysed the results of the workshop
  - Further discussion about the possible future implementation of measures in Cariacica.

# Simplified ‘3 step’ transferability process applied in Cariacica



- Step 1: Information about receptor city (Cariacica)
  - including urban problems and (specific) freight problems

- Step 2: Identifying cities and measures/instruments from similar contexts
  - from TURBLOG case studies and regional reports

- Step 3: Results of assessment workshop held in Cariacica
  - including results from barrier analysis

## Step 1: Urban and freight problems

- Much of the traffic within Caricica does not have an origin or destination in the city
  - i.e. it is ‘through traffic’

- The needs of the city inhabitants tend to be overlooked by (Espírito Santo) state authorities
  - Cariacica is the poorest city in the Vitória Metropolitan Area

- Lack of of regulation of freight transport concerning loading/unloading, lorry bans, lorry routes etc.


Linhares
Fundão
Aracruz
ES 440
Ferrovia
Aracruz ES 257
Celulose
Porto de
Regência
PORTOCEL
Porto de
Barra do Riacho
Estrada de Ferro Vitória - Minas
BR 101
Serra
rodovia ES - 010
rodovia do sol
CIVIT
I e II
Laranjeiras
Terminal
Industrial
Multimodal
Carapina
Companhia Siderúrgica
de Tubarão - CST
Oceano Atlântico
SILOTEC
COIMEX
TERCA
Coca Cola
AEROPORTO
Porto de Praia Mole
CVRD
Porto de Tubarão
rodovia ES - 080
Cariacica
BR 101
(Contorno)
UFES
Vitória
Itacibá
Estação
Ferro-
Vitória
BRASPÉROLA
Porto de Vitória
Vila Velha
Campo
Grande
REALCAFÉ
Vila Velha
CBF
Ibes
Micropólo de Confecções
Chocolates Garoto
BR 262
Distrito Industrial
de Vila Velha
Viana
Companhia Siderúrgica da
Grande Vitória (Belgo Mineira)
Ferrovia Centro - Atlântica
rodovia ES - 060
rodovia do sol
BR 101
ES-148
Guarapari
Anchieta
Porto de Ubu
Samarco Mineração
Legenda:
Divisão intermunicipal
Terminais de integração de transp. coletivo
Linhas de ônibus troncais
Rodovia
Ferrovia
EADI - Estação aduaneira de interior
Principais indústrias
Portos
Fonte: IJSN/Coordenação de Desenvolvimento Urbano

# Step 2: Identifying cities and measures



| City | Measure(s) |
|---|---|
| Belo Horizonte | Loading/unloading regulations (location-based and time-based), signs |
| Sao Paulo | Zones/routes for restricting freight traffic, vehicle size restrictions |
| USA, NZ + UK | Signs |
| New York | Lorry routes/map |
| Vancouver | Lorry routes/map |
| Barcelona | Night deliveries |
| Utrecht | City centre lorry restrictions, emissions zones and policy packaging |

# Loading/unloading regulations in Belo Horizonte, Brazil




# Restricted zones and routes, São Paulo



# Signing in Great Britain



# TRUCK ROUTES & TRUCK AREAS

(GVW>10,000kg)
VANCOUVER, B.C.
JANUARY 2009

GVW>10,000 kg

A vehicle or combination of vehicles with a GVW greater than 10,000 kg (22,046 lbs) must use the truck routes and truck areas.

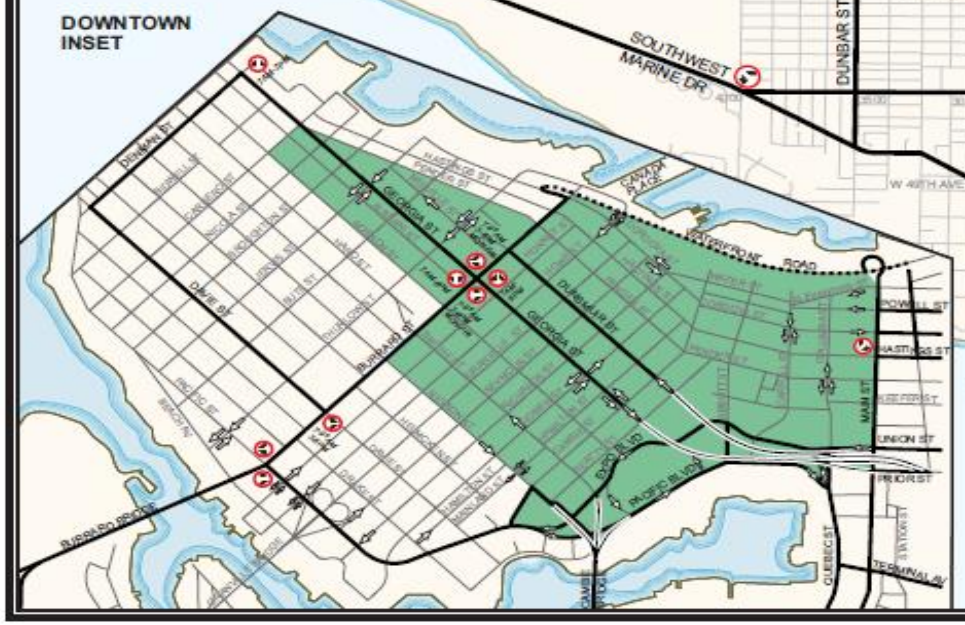
Legend

- Truck Route
- Restricted Access

Truck Areas

- Industrial
- Downtown *
- One Way Street
- End Of One Way Street

* Vehicles over 15.25 metres (50 feet) in length may only travel on a designated truck route in the Downtown area between 7am and 6pm.



# Night delivery in Barcelona, Spain

# Utrecht: Time restrictions for freight vehicles in pedestrian area



# Policy Packaging (Utrecht)

**1994**
- Oprichting CABU
- Start SDC's

**1998**
Evalutaie SDC- beleid

**2003**
Bevoorradingplan afgerond

**2005**
Folder
Bewust Bevoorraden


**2007**
Milieuzone

**2010**
Zero Emission
Bierboot

**1994**

**1996**
- Start Bierboot
- Instelling voertgangsgebied

**2001**
CABU- advies
bevoorradingsplan

**2004**
Logistiek Routes

**2005 - 2007**
Samen
Goed Geregeld

**2009**
Bevoorradingsprofiel

**2009**
Cargohopper

**2010**

# Step 3: Assessment of measures by participants in the workshop



| Measures | Assessment |
|---|---|
| Loading/unloading regulations (location- and time-based) | +++ |
| Signs | +++ |
| Zones/routes for restricting freight traffic | +++ |
| Vehicle size restrictions | ++ |
| Lorry routes | ++ |
| Lorry route maps | + |
| Night deliveries | – |
| Emissions zones | – |
| Policy packaging | +++ |

# Step 3: Barriers and facilitators



- There are different ways of categorising barriers and facilitators
- The approach used in Cariacica was to use the following categories
  - Financial
  - Physical
  - Technological
  - Cultural
  - Political
  - Legal
  - Security

# Step 3: Barriers

| Barriers identified in workshop |
| --- |
| • Measures need **financing**<br>  • including paying for wardens to fine people not complying with rules<br>  • and paying local authority personnel to apply for governemnt grants<br>  • though ways could be found to solve this<br><br>• General **cultural barriers** to regulation (this type of regulation is new to Cariacica)<br><br>• Physical and security barriers were not seen as big problems |

# Step 3: Facilitators

| Facilitators identified in workshop |
| --- |
| • History of **cooperation** between local authority and stakeholders (e.g. this workshop) was seen as an important facilitator<br><br>• Measures are in line with **current government policies**<br>  • thus helping ‘to make the case’ to people sceptical about regulation<br>  • and helping get government technical support /money<br><br>• Current local authority administration has a dynamic approach and is interested in good practice examples from other cities |

## Impact of case study

- Many regulatory measures on parking/loading etc have now been implemented in Cariacica since the workshop

- Overall, the case study showed that much progress can made for examining ‘transferability’ with relatively small resources
    - creating a useful precedent for other ‘smaller cities’


# Overall conclusions



- Transferability analysis is an increasingly important aspect of measure selection
  - making use of the vast amount of information available from a variety of sources

- More research (involving ‘real life’ case studies) needs to be put into studying the potential of transferability of measures
  - collaboration on transferability research between Russia and the EU would be of great interest

- ‘Light’ transferability approaches are feasible in locations that do not have resources for carrying out complex transferability analyses

**Thank you!**

**Any questions?**