

"Tourism response to climate change challenges"

The Tourism Sector
Response to Climate Change:
Mitigation and Adaptation
Initiatives and Strategies

SIDE EVENT WITHIN THE FRAMEWORK OF COP18

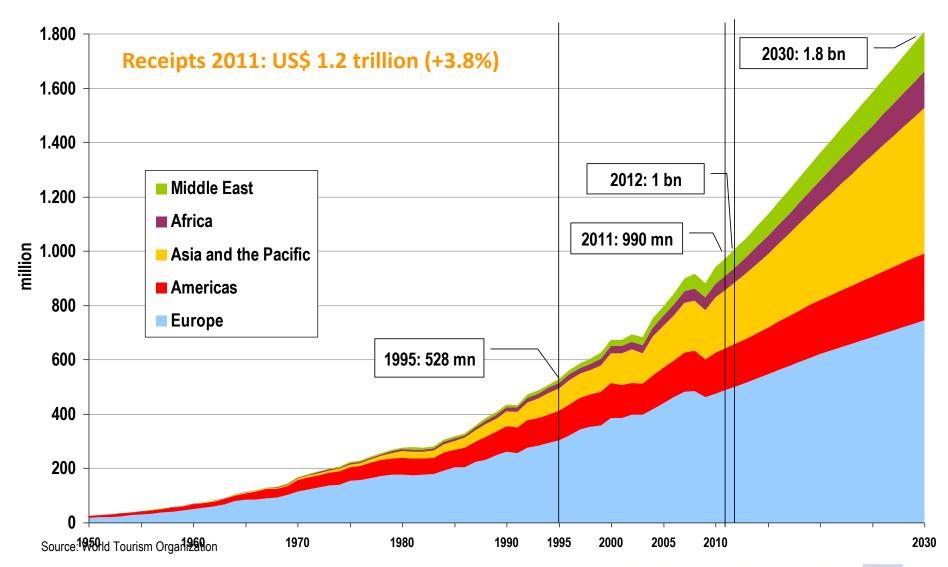
29 November 2012 Doha, Qatar





### **International Tourist Arrivals, 1950-2030**

#### Current situation and forecasts UNWTO Tourism 2030 Vision



## **Tourism**

One of the world's top job creators

Generates US\$
3 billion / day
in overall
export income

5% of global GDP

4th after fuels, chemicals and automotive products

world's largest and fastest growing economic sectors

One of the

Represents

1 in every

12 jobs

main export for 1/3 of developing countries

30% of the world's exports of services



## Potential for addressing local development and poverty reduction

#### International Tourism Receipts (in billion US\$)

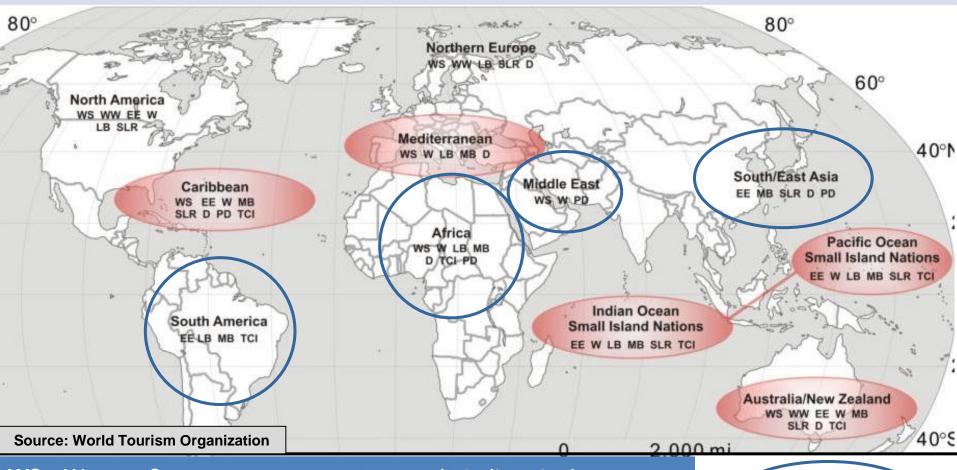
	1990	2000	2010	Growth rate
World	262	475	928	254 %
High income Countries	207	336	588	184 %
Developing Countries	55	139	340	518 %
48 LDCs	1.1	2.9	9.9	800 %

Source: UNWTO

- First source of foreign exchange earnings in most of the 48 LDCs (excluding oil)
- UNWTO ST-EP initiative promotes poverty reduction projects in developing countries
- ▶ Three countries have graduated from LDC status, thanks in part to the contribution of tourism: Botswana (1994), Cape Verde (2007) and the Maldives (2011).

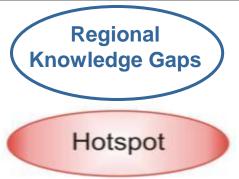


## **Tourism Vulnerability 'Hotspots'**



WS = Warmer Summers
WW = Warmer Winters
EE = increase in extreme events
SLR = Sea Level Rise
TCI = Travel Cost Increase from
mitigation policy

LB = Land Biodiversity loss
 MB = Marine Biodiversity loss
 D = increase in Disease outbreaks
 PD = Political Destabilization
 W = Water scarcity



## **Global Tourism Emissions in 2005: CO2 Only**

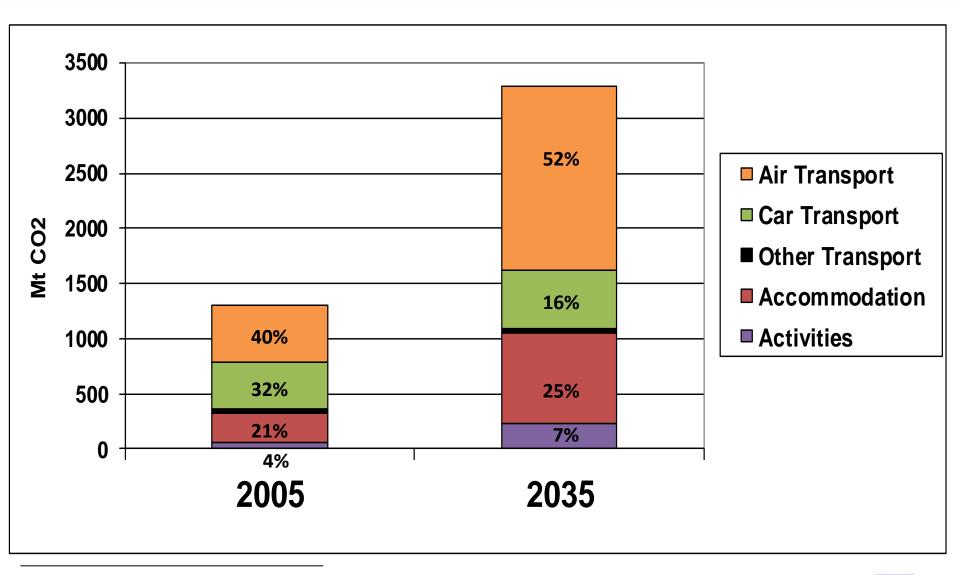
Sub-Sectors	CO <sub>2</sub> (Mt)	
Air transport *	522	2%
Car transport	418	1.7%
Other transport	39	0.1%
Accommodation	274	1%
Activities	52	0.2%
TOTAL	1,307	5% -
Total World (IPCC 2007)	26,400	100%

## **Tourism Contribution**

\* - does not include non-CO2 emissions and impact on climate



# **'Business as Usual' Projection of Future CO2 Emissions from Tourism\***

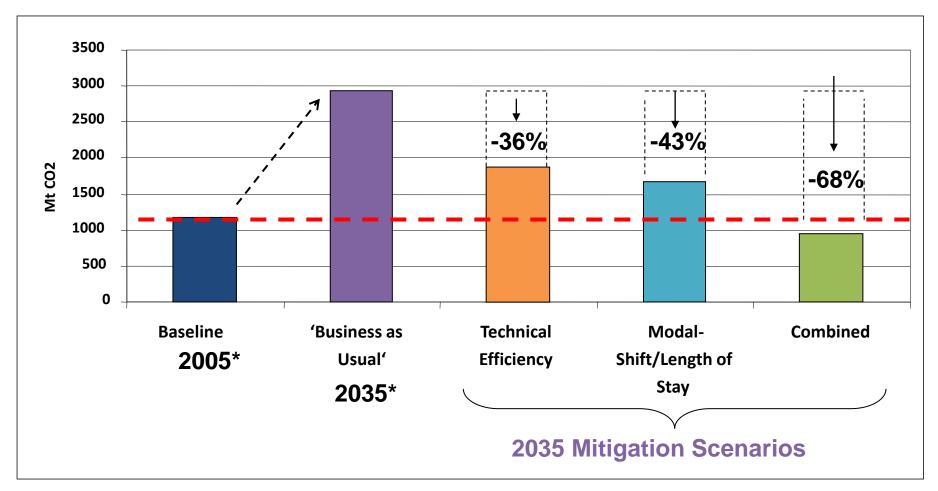


<sup>\*</sup> Excluding same-day visitors



### **Future CO2 Emissions from Global Tourism**

#### **Scenarios of Mitigation Potential in 2035**



<sup>\*</sup> Excludes same-day tourists



## **Mitigation Measures**

#### Air Transport

- Acceleration of fleet renewal with more fuel efficient planes.
- R&D innovation to develop new long-term technology.
- Reduce infrastructure inefficiencies in airspace management.
- Alternative Fuels



#### **Land Transport**

- Development of more efficient vehicles.
- Cleaner fuels.
- Changes to consumer behaviour



#### Water Transport

- Operation & technical measures to reduce energy use
- Change of energy source to power cruise lines



## **Mitigation Measures**

#### Accommodation

- Operational & technical measures to reduce energy use
  - > Insulation
  - Building design for new buildings
  - Building Energy Management System
  - Change in room temperature
- Change in energy source
  - > Solar
  - Biomass / Bio-fuel
  - Combined heat Power
- Change in consumer behaviour
  - Increased energy awareness:
  - Incentives for customers:



Zion National Park Visitor Centre

#### **Accommodation**

## Investments on Energy Efficiency and Energy Savings

Major hotel chains and SMEs in the accommodation sector undertake energy reduction plans, with a short term investment recovery.

#### Measures:

- LED lighting technology
- Biomass absorption chillers
- Quantum heat recovery system
- Improvements in insulation and cladding
- Presence detection lighting and climate systems in rooms
- Replacement of chillers and boilers and use on mini chillers systems
- Global water cycle: Desalination, grey water recycling and sewage treatment



 Hotel Energy Solutions (HES) is a UNWTO-initiated project that delivers information, technical support & training to help such enterprises to achieve these results.





#### **Tourism for tomorrow**



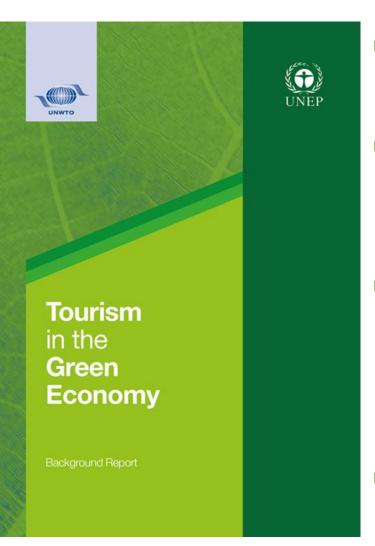
- One of WTTC's three strategic priorities
- Tourism as a growth industry which balances the needs of "people, planet and profits"
- Includes human resources and technology as well as environmental sustainability

#### Hotel carbon measurement initiative

- Developed out of 2009 "Leading the Challenge on Climate Change" report
- More than 20 hotel chains working together with WTTC and International Tourism Partnership
- Developing a common industry methodology for calculating and reporting carbon emissions
- First iteration launched in June 2012



## **Tourism in the Green Economy - Background Report**



- Tourism Background Report launched today at COP 18
- Aims to demonstrate that concerted "greener" policies can steer the growth of the sector toward a more sustainable path.
- Compared with a BAU scenario, it shows how a green investment scenario would allow the sector to continue to expand steadily over the coming decades while ensuring significant environmental benefits.
- Aims at encouraging policy makers to support increased investment in greening the tourism sector.

## **Key Messages**

- Green tourism has the potential to create new jobs
- Investing in greening of tourism can reduce costs
- Tourists are demanding the greening of tourism
- The private sector can, and must be mobilized to support green tourism
- The development of tourism is accompanied by significant challenges:



- energy and GHG emissions
- water consumption
- waste management
- loss of biological diversity
- effective management of cultural heritage



## Investing in the greening of tourism

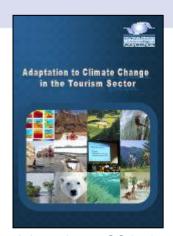
### The Energy scenario

- **▶ Total energy consumption** for tourism activities in **2050**: **44% savings** in relation to BAU scenario thanks to:
  - A modal shift to less carbon intensive transport: **electrified train and coach**
  - Behavioral changes: shorter-haul trips
  - Better energy management: setting targets and benchmarking for hotels
  - Technological advances in fuel efficiency.
- CO2 emissions will descend -52% by 2050 in relation to BAU.
  - Back to 1,44 GT (2005 level) in 2050, or 7% of global emissions: projected GDP growth higher than average projected growth of global GDP.
- **▶ Energy costs** in "Best practice" hotels are **reduced from 6% to 2.5%** of annual turnover. JOJ

## The Davos Process on Climate Change and Tourism



CC & Tourism. Djerba



Adaptation to CC in the Tourism sector



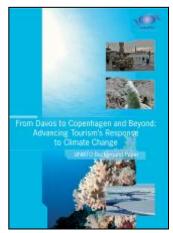
From Dayos to Bali



CC and Tourism: Responding to Global Challenges



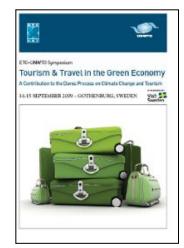
CC Adaptation & Mitigation



From Davos to Copenhagen and Beyond



Low carbon travel



T&T in the Green Economy



2003 

2007 

2009 

2010 

2011 

2012 

2020 

2050 

Djerba Davos - Bali Copenhagen Cancun Durban Doha

## **Conclusions / Key messages**

Tourism industry must play a strong role as a part of a broader response to climate change, but it should not be disadvantaged through the imposition of a disproportionate burden.

Tourism generates wealth, creates jobs and contributes to the alleviation of poverty.

No discrimination against developing countries, especially long-haul destinations, by creating obstacles to their economic development.

Special consideration to LDCs and SIDS by providing financial, technical and training support.

Mitigation measures in the context of a global concept of tourism considering social and economic costs and benefits.

No duplication of emission rates for transport and other tourism-related activities.

Assignment of all revenues from taxes and trade of emission permits to GHG mitigation activities.

