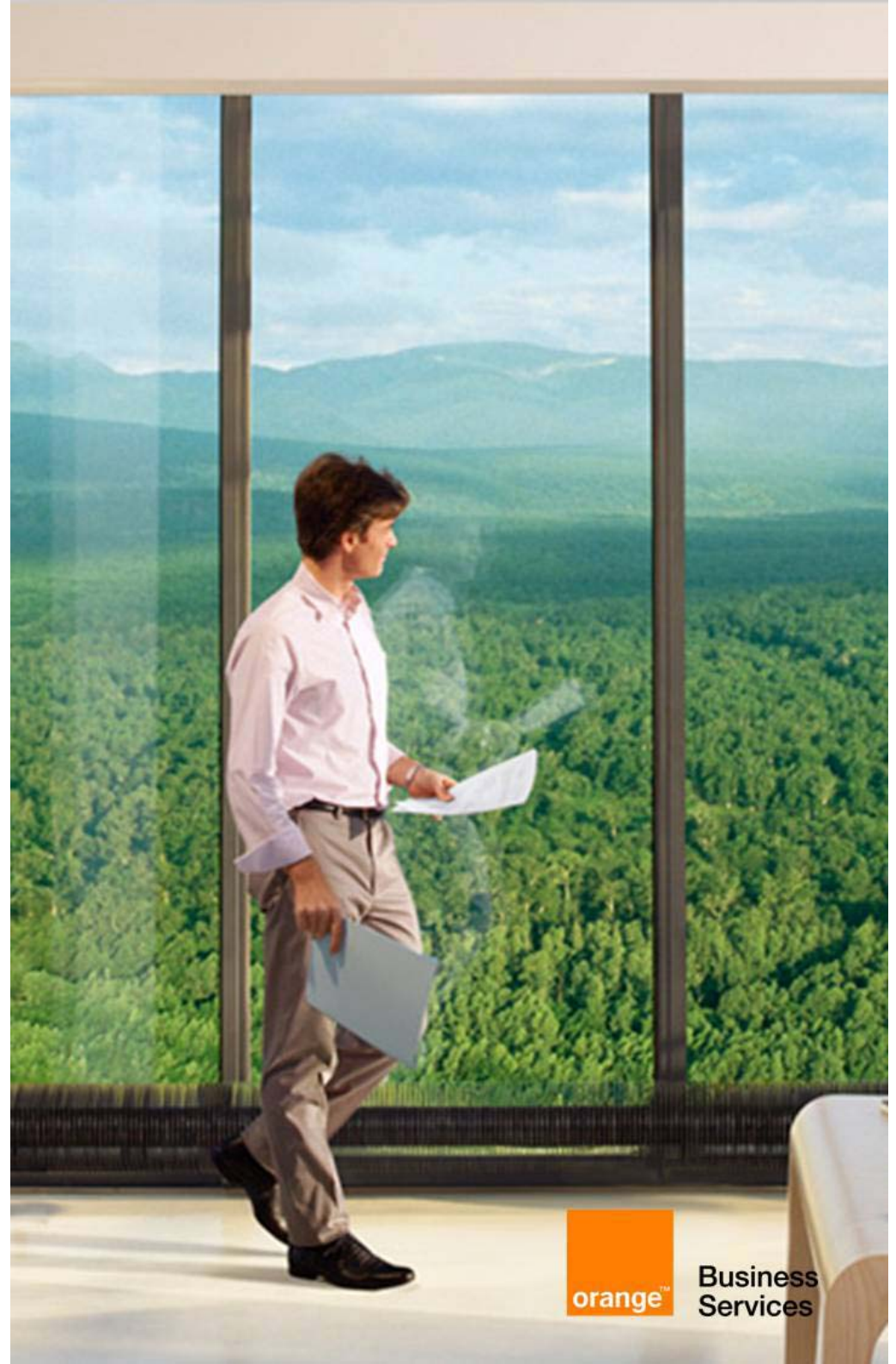


orange

involvement in Green IT

June 12<sup>th</sup> 2008



Business  
Services

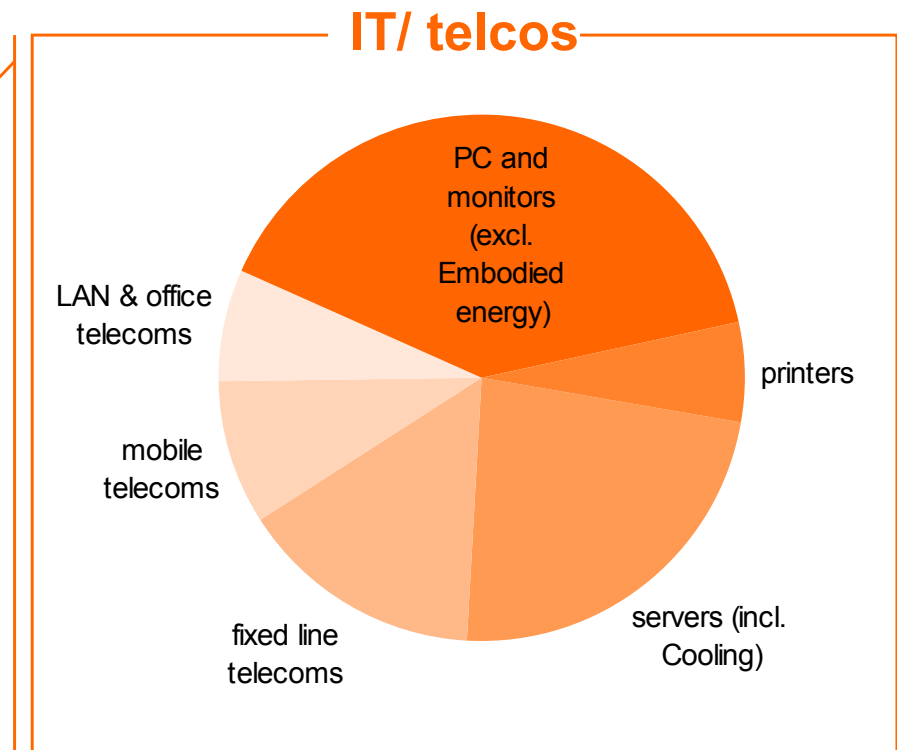
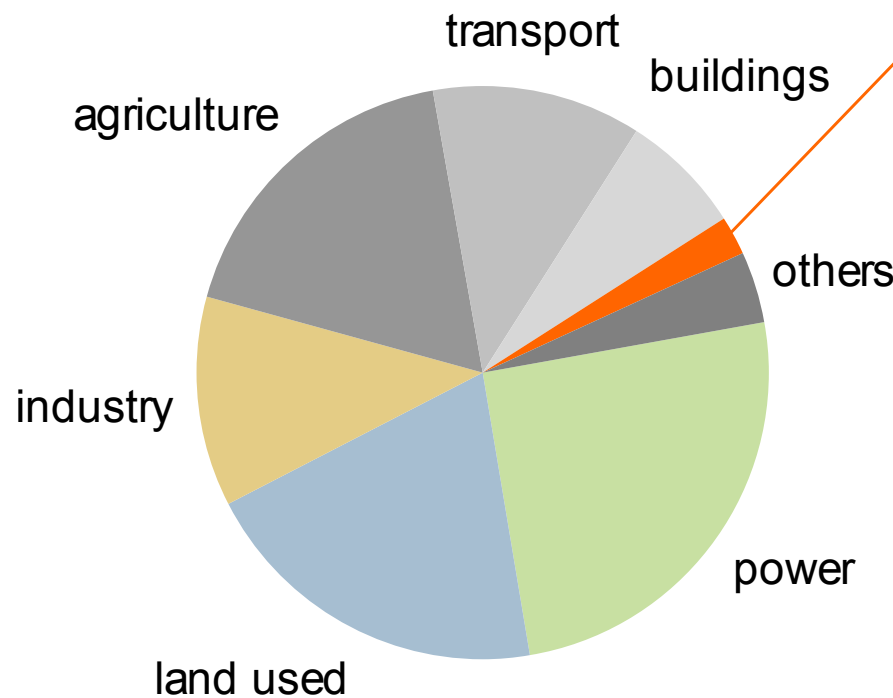
# agenda

1. orange Green IT portfolio: focus on B to B solutions
2. orange commitment to reduce its internal CO<sub>2</sub> emissions

# telco estimated at 0.3% of total CO<sub>2</sub> emissions

- 2% of today's global CO<sub>2</sub> emissions come from the IT industry
- similar to airline industry
- compared to 18% emitted by road transport

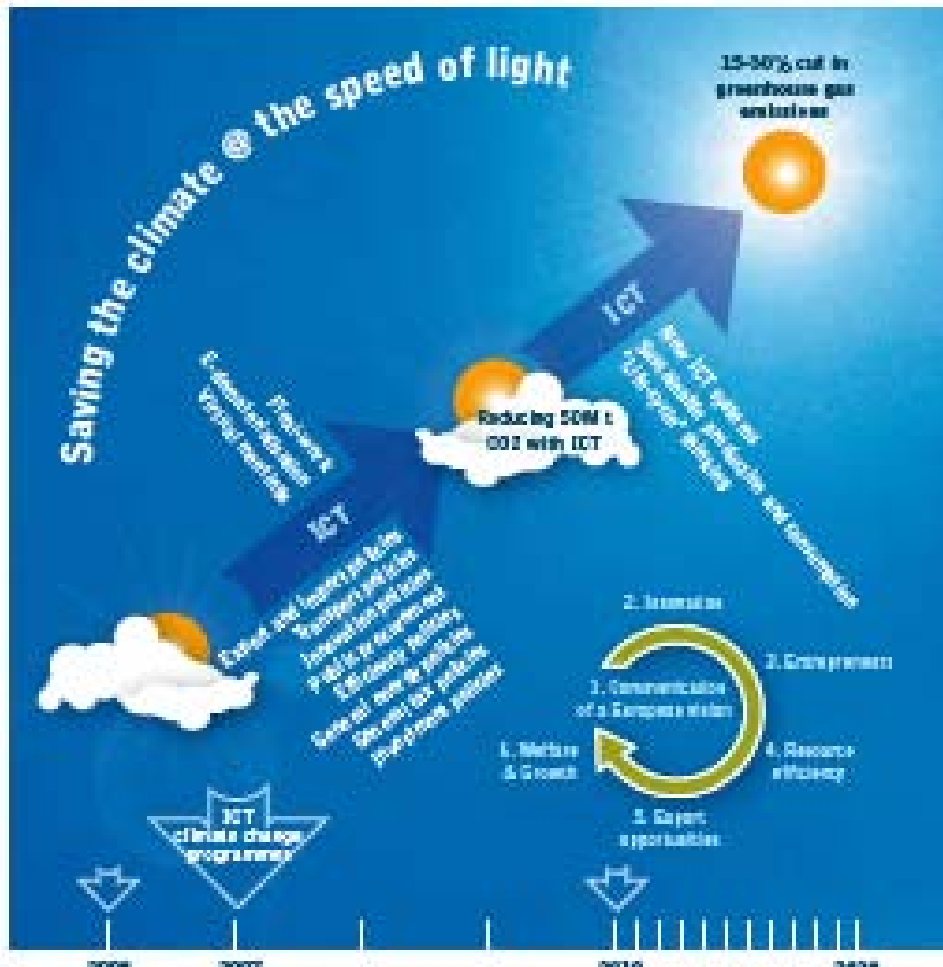
## CO<sub>2</sub> emissions by sector



1 year of mobile usage equals 1 h car highway

# e-strategy for CO<sub>2</sub> reductions in Europe

first steps for 2010: 50 million tons CO<sub>2</sub> reduction per year with ICT



- travel replacement:  
24 million tons CO<sub>2</sub> / year
- e-dematerialisation:  
4 million tons CO<sub>2</sub> / year
- flexi-work:  
22 million tons CO<sub>2</sub> / year
- other...

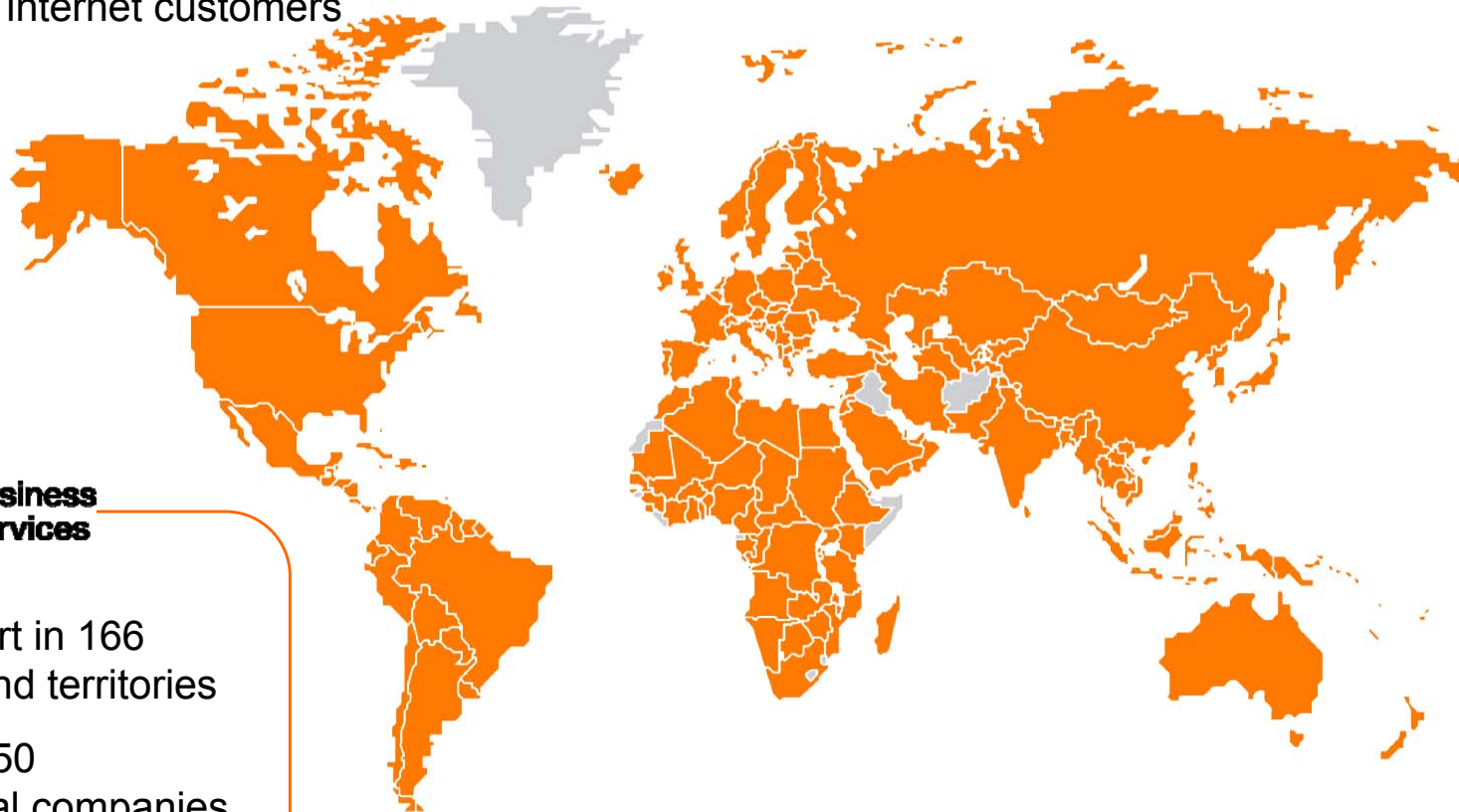
# responsability across our geographical footprint

## 170 million customers in 28 countries

- 112m mobile customers
- 45m fixed lines
- 13m internet customers

## in Europe, 12m ADSL customers

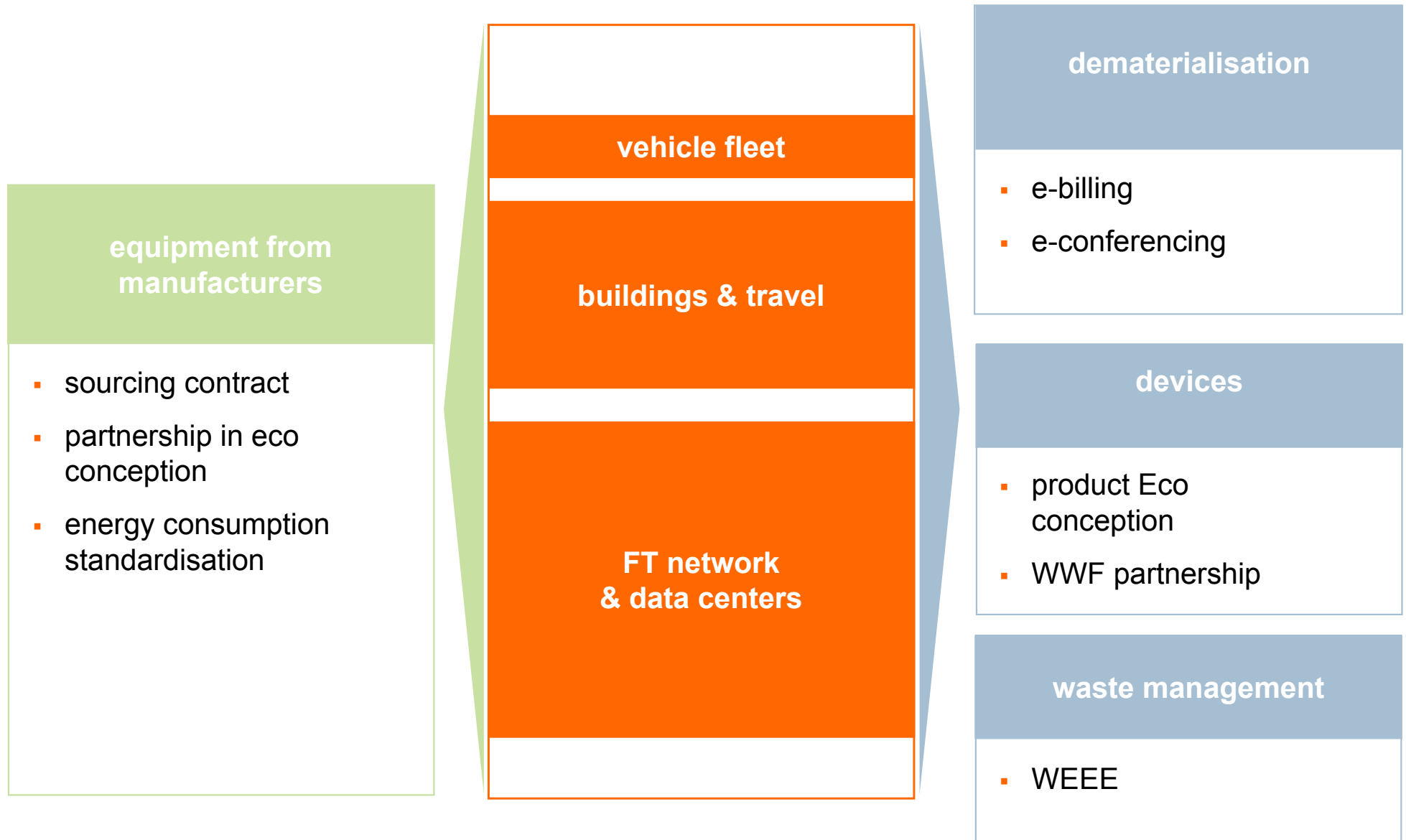
- 6.8m livebox
- 5.4m VoIP users
- 1.4m IPTV users



- local support in 166 countries and territories
- serving 3,750 multinational companies

in Europe, 15m broadband mobile customers

# responsability across our technical footprint



# agenda

1. orange Green IT portfolio: focus on B to B solutions
2. orange commitment to reduce its internal CO<sub>2</sub> emissions

# Orange Business Services - our portfolio helps Green IT become a reality

1. promoting collaborative work
2. optimizing vehicle fleet management
3. consolidating IT infrastructure
4. implementing paper-free workflows
5. deferring IT hardware renewal
6. developing remote personal services

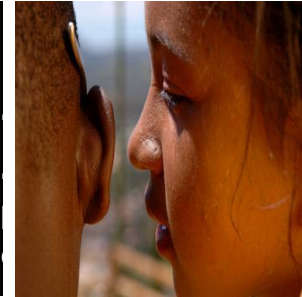
F R O S T & S U L L I V A N

2007 European Green Excellence Award  
for Product Innovation

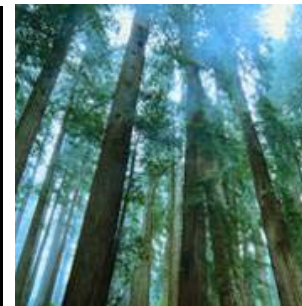
Business  
VPN



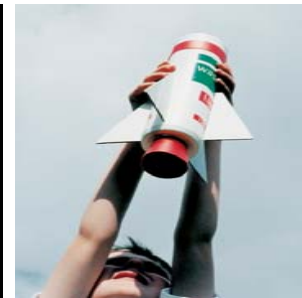
Business  
Talk



Business  
Everywhere



Business  
Acceleration



Business  
Together





# Orange Business Services - our portfolio helps Green IT become a reality

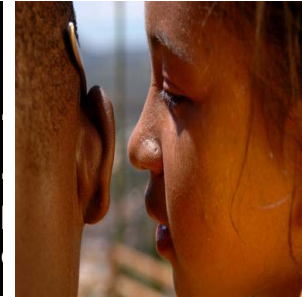
## 1. promoting collaborative work

- Business Everywhere: more than 850,000 end users worldwide at the end of 2007 (x2 in a year)
- Business Together: brings together the best in web, voice and videoconferencing technologies to make it easier for teams to work together

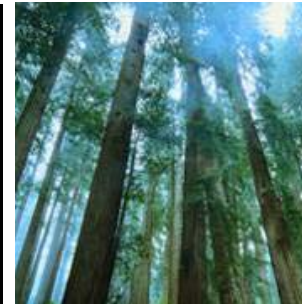
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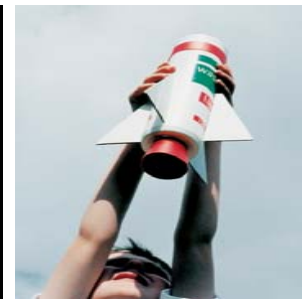
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Talk



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# Orange Business Services - our portfolio helps Green IT become a reality

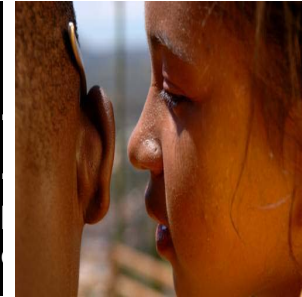
## 2. optimizing vehicle fleet management

- Fleet Advanced machine-to-machine solutions (M2M)
  - optimize routes and service our client vehicle fleets remotely
  - reduce travel distance
  - with better tuned engines
  - and therefore less polluting

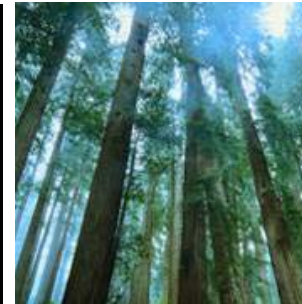
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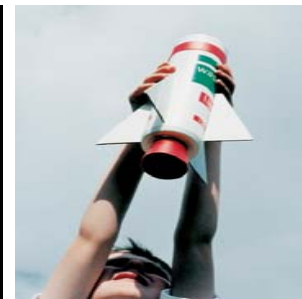
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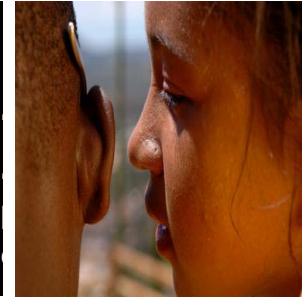
## 3. consolidating IT infrastructure

- virtual, eco-friendly servers
  - optimized access to critical applications
  - reduction in the number of servers by up to 80%
  - reduction in energy consumption by up to 90%

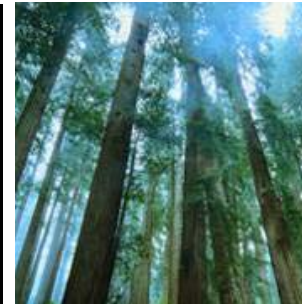
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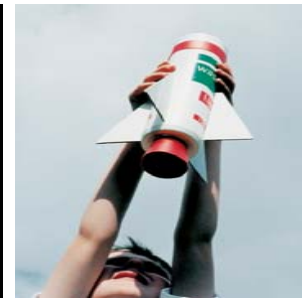
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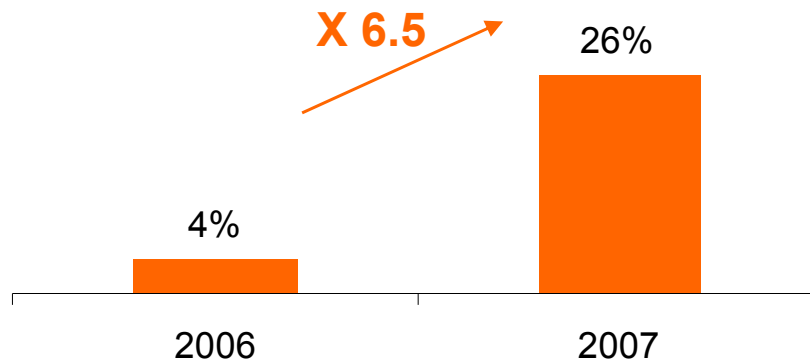


# Orange Business Services - our portfolio helps Green IT become a reality

## 4. implementing paper-free workflows

### Example of orange experience

% of electronic invoice for residential in France

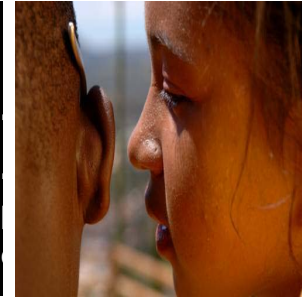


- In the last twelve months, we have saved over 21,500,000 pages, i.e., more than 53 tons of paper

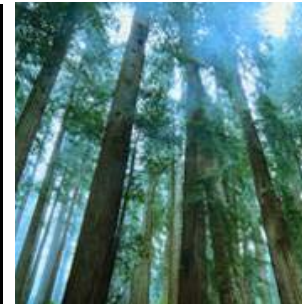
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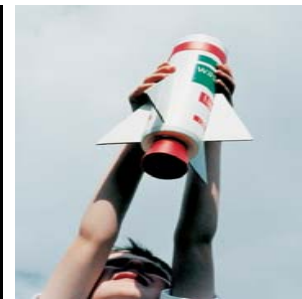
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# Orange Business Services - our portfolio helps Green IT become a reality

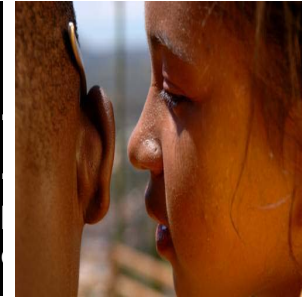
## 5. long lasting equipment/deferring IT hardware renewal

- benefits from virtual workstation:
  - lasts longer than a regular PC (five years compared to three)
  - uses approximately ten times less power (20 W)
  - can be easily shared by several users
  - is easier to recycle because it uses fewer electronics
  - avoids unnecessary commutes because users can access data remotely via the Internet

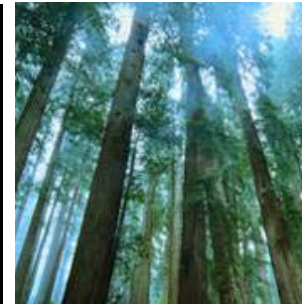
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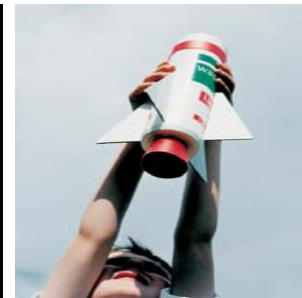
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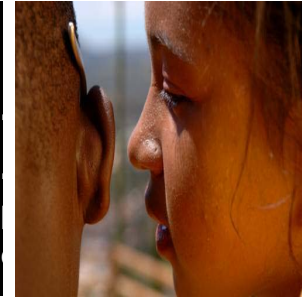
## 6. developing remote personal services

- Point Visio-Public®: 800 virtual meetings using this solution over the last 12 months saved 6 tons of CO<sub>2</sub> emission
- Orange Healthcare line of products
  - M2M applications for regular monitoring
  - columba by orange
  - autonomie visio
  - hostonautes program
- M2M solutions

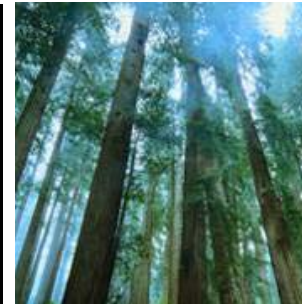
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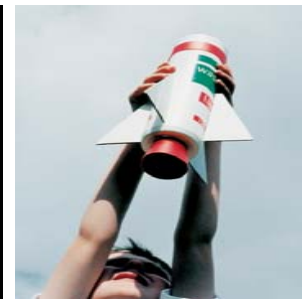
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# agenda

1. orange Green IT portfolio: focus on B to B solutions

2. orange commitment to reduce its internal CO<sub>2</sub> emissions

# FT commitment towards its CO<sub>2</sub> emissions

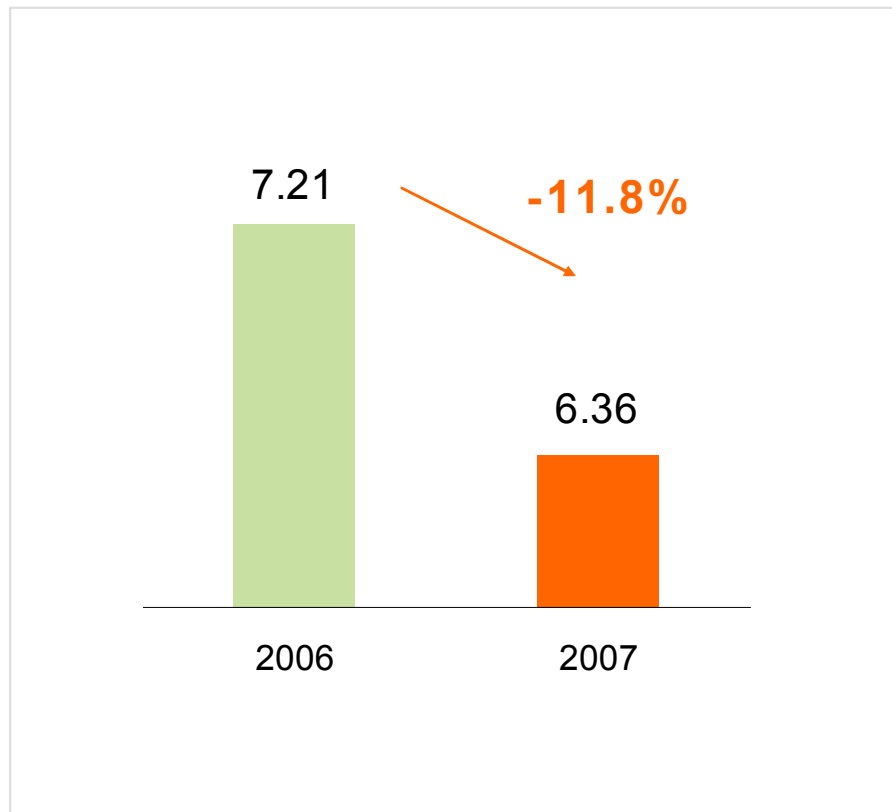
- reduce group CO<sub>2</sub> emissions by 20% below 2006 level by 2020
  - **transportation**: change our entire fleet of 55,000 vehicles to reach in average 130 g CO<sub>2</sub>/km emission in average
  - **buildings**: new environmental friendly buildings, lightning optimization
  - **network**: data center virtualization program (-40% servers by 2010) and new optimized cooling solutions implemented
  - 40% of group invoices send electronically in 2009
  - develop our Green IT portfolio services internally
- 100% of FT group employees will be involved in reducing our CO<sub>2</sub> footprint
- 25% of FT's Group electricity in Africa to be sourced from solar site by 2015



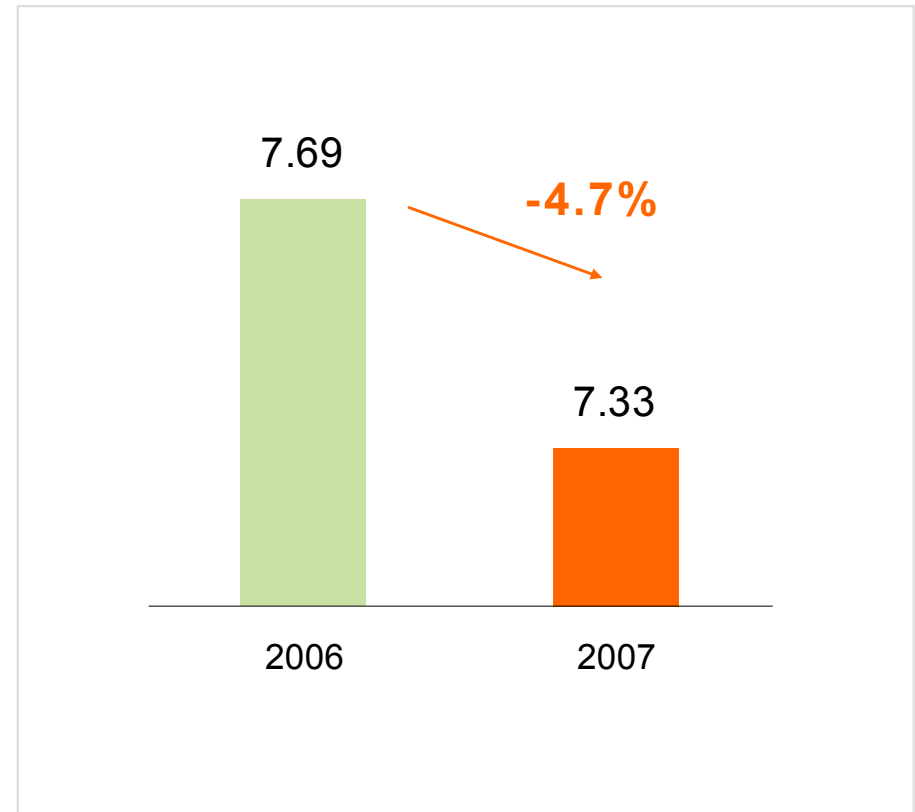
# tangible “Green IT” results within Orange

**group CO<sub>2</sub> emissions 2007: 1.3m tons**  
**reduction vs 2006: -0.6%**  
**reduction for 2008E: -3%**

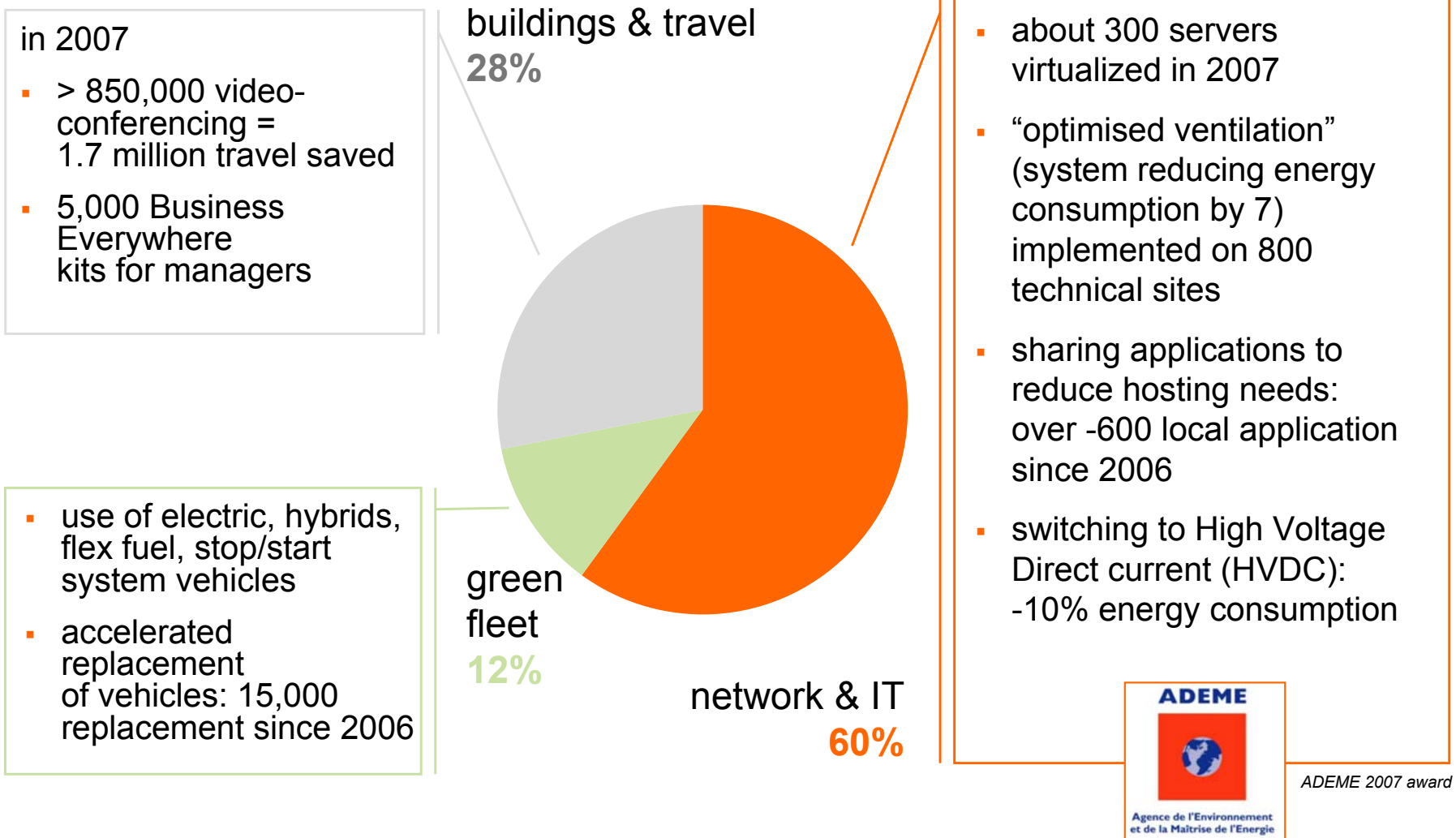
energy consumption TOE/000s customers



kg CO<sub>2</sub> per customer



# orange CO<sub>2</sub> emissions reduction solutions



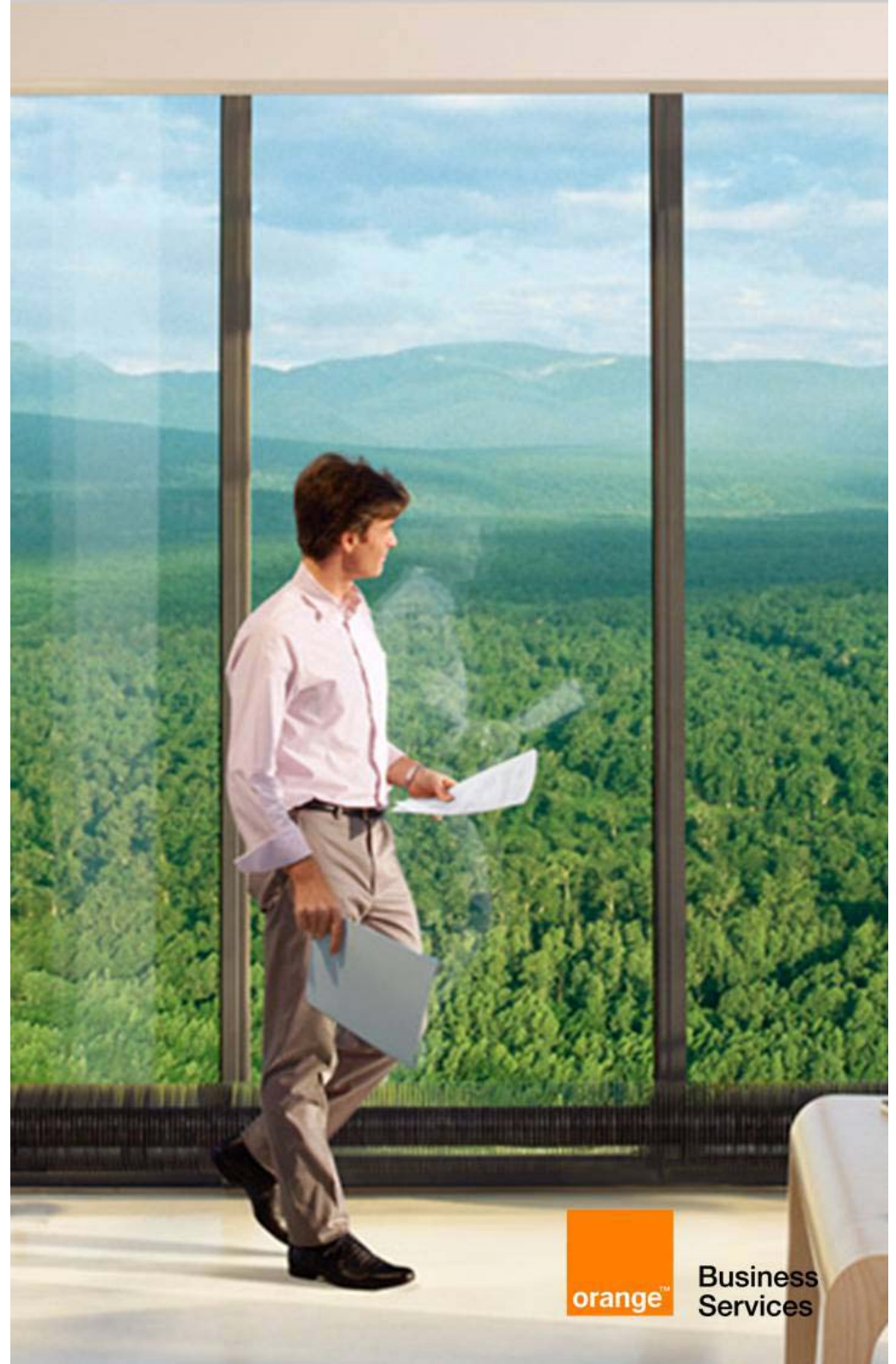
# our key sustainable development challenges



our key  
sustainable  
development  
challenges

- 1 innovative solutions serving sustainable development
- 2 developing access for all
- 3 meeting customers' expectations
- 4 mobilizing our staff
- 5 promoting responsible purchasing principles
- 6 responding to concerns over electromagnetic waves
- 7 involvement in communities
- 8 fighting climate change
- 9 optimizing waste management

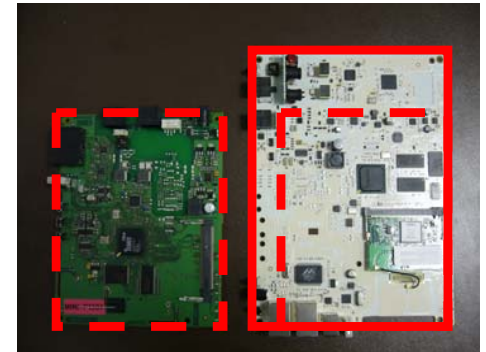
examples



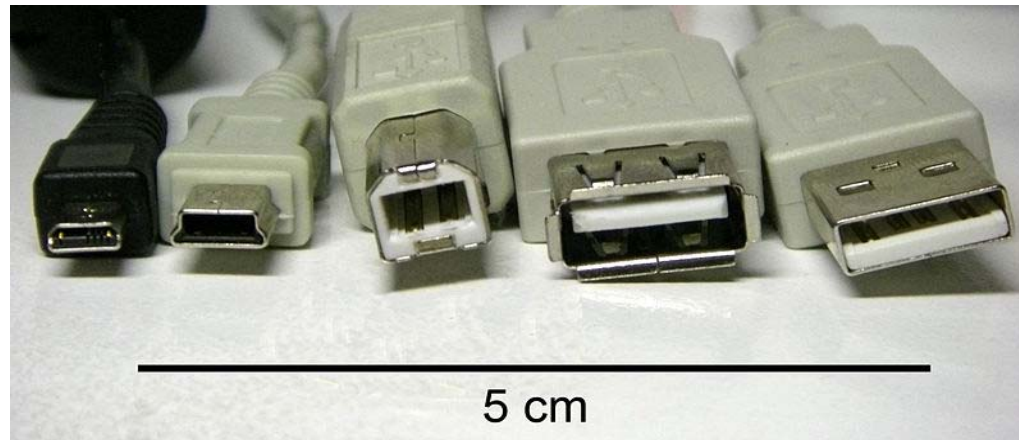
Business  
Services

## eco design also part of our actions (residential market)

- Livebox 1.2 footprint has been **reduced by around 20%** in comparison with Livebox V1
  - **-35%** on volume
  - **-30%** for card board size
  - only one plastic type,
  - energy consumption optimized



- universal charger for all our mobile terminals working group



# example: promoting collaborative work



- world leader in products and systems for electrical installations and information networks
- present in 60+ countries
- 130,000 product references
- 33,000 staff worldwide

## issues and challenges

- share the strategic vision of the group with executives scattered over five continents
- offer access to meetings to as many executives as possible, without wasting time or money

## orange solution

- **managed videoconferencing allows simultaneous connection of 30 group sites**
- an Orange Business Services expert supervises site connections and controls videoconferences in real time

## results and benefits

- 500 to 600 executives are able to participate in remote meetings
- an enhanced sense of cohesiveness
- **saves money, time and carbon footprint by limiting travel**

# example: promoting collaborative work



- a newly independent semiconductor company (founded by Philips)
- global presence in more than 20 countries
- worldwide N°1 position in many areas
- knowledge-intensive business

## issues and challenges

- share complex projects with a network of partners and internal staff based in 20 countries
- increase team productivity
- document sharing requirements

## orange solution

- Business Together with Microsoft
- **a hosted and managed secure IM solution for 25K users**
- **enabling federation to external partners**
- providing additional features: archiving, extended reporting
  - planned extension to OCS 2007, SharePoint Server

## benefits

- secure and controlled collaboration solution that supports compliance
- **reduces the need to travel**
- expected productivity and end-user satisfaction improvement

# example: optimizing vehicle fleet management



- GEFCO is one of Europe's top ten transport and logistics groups
- 21 subsidiaries covering 80 nations around the world
- 50,000 clients
- 52,000 shipments per day
- 9,400 employees

## issues and challenges

- obtain a simple, customizable on-board telematics solution for its 21 subsidiaries worldwide
- track deliveries with precision across Europe
- optimize truck routes
- ensure security of freight and staff

## orange solution

- on-board box incorporating a GPS and a GPRS modem + mobile system connected through the vehicle's cigarette lighter
- Internet access to delivery details (departure time, position, route, etc.) in near real time

## results and benefits

- budget control: no initial investment, fixed monthly charge for on-board box
- improved traceability of deliveries (secure on-line monitoring)
- organizational optimization (GPS positioning systems, allowing optimization of routes at any given moment)



# example: developing remote personal services



- AXA is one of the worldwide leading insurance companies
- one of the largest assistance generalists in the world
- strongly involved in healthcare solutions
- developing comfort and welfare approach

## issues and challenges

- create innovative solutions of prevention in the healthcare field, for
  - chronic diseases management (eg diabetis)
  - assistance for elderly and disabled persons,
  - help for Alzheimer patients
- take a competitive advantage with these solutions

## orange solution

- co-development for blood pressure measure with M2M solutions
- geolocalization solutions for Alzheimer persons using an electronic bracelet
- emergency calls solutions with geolocalization for elderly persons using a specific mobile phone

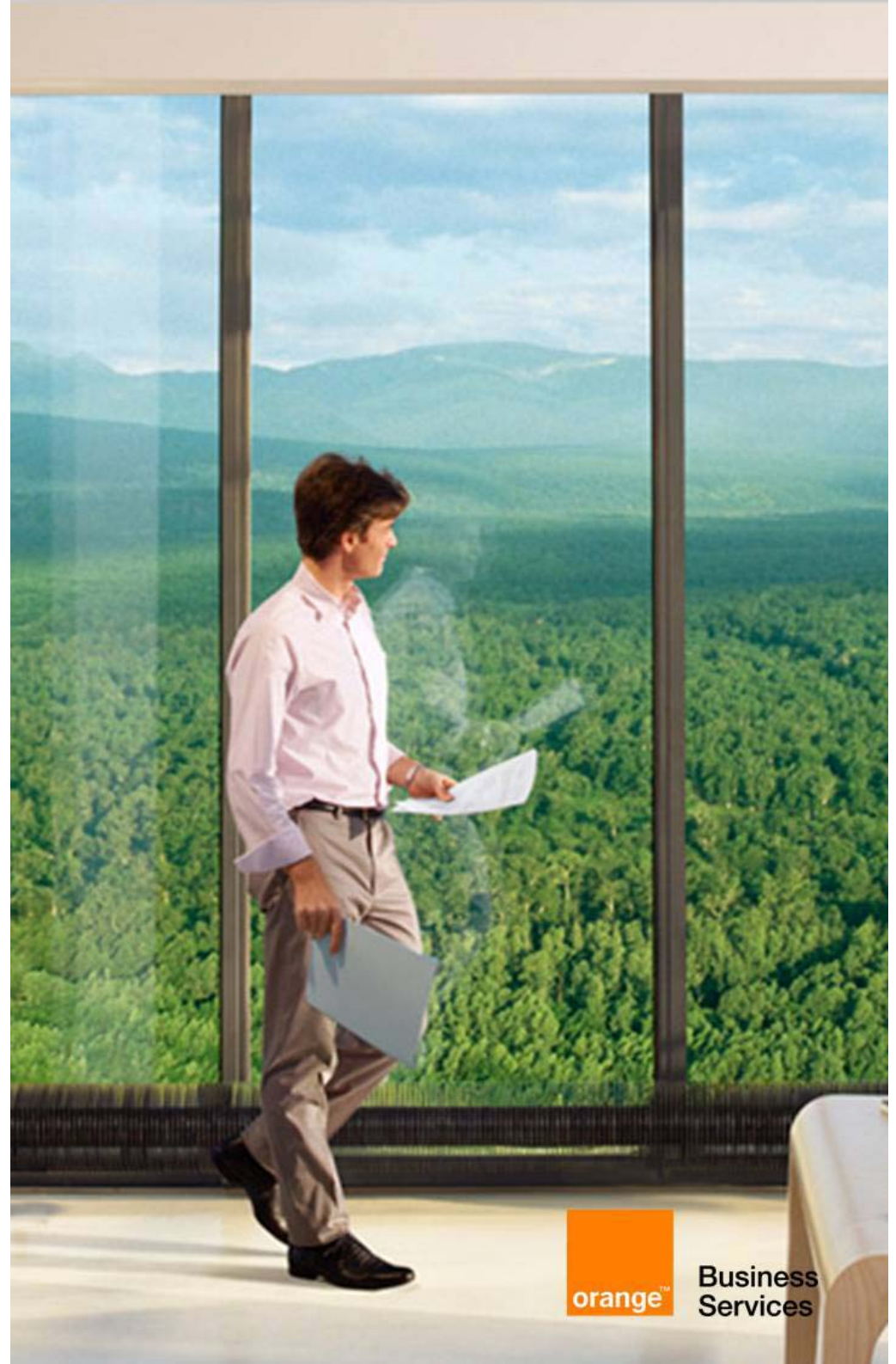
## results and benefits

- better conditions of life for insured persons
- prevention of accident
- secured solutions for staying at home instead of hospitalization
- positive image for AXA
- positive contribution to the social dimension of sustainable development

orange

# involvement in Green IT

June 2008



Business  
Services