



2006 – 2012 ACTION PLAN

# QUÉBEC AND CLIMATE CHANGE A Challenge for the Future



JUNE 2006

SHINE  
AMONG  
THE  
BEST

Québec



## 2006-2012 Action Plan

### QUÉBEC AND CLIMATE CHANGE A Challenge for the Future

#### Background:

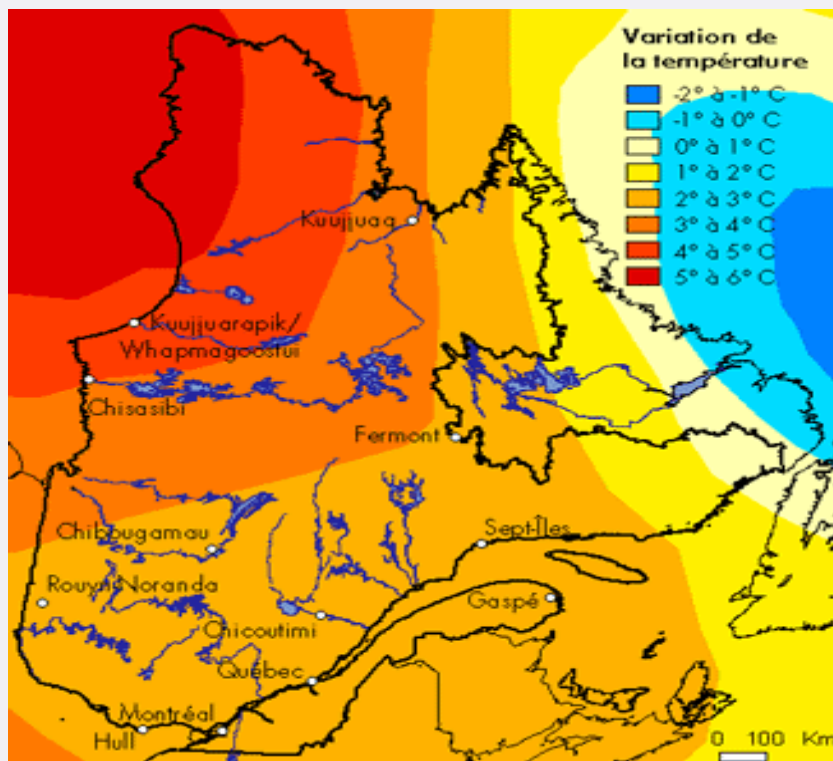
#### Québec and Climate Change

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## INCREASE IN AVERAGE ANNUAL TEMPERATURES IN QUÉBEC



Projected temperature variations for the 1961-1990 and 2040-2060 periods

Source: Canadian Institute for Climate Studies, BC.

Layout: Direction du suivi de l'état de l'environnement

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## INTERNATIONAL ACTIONS TO FIGHT CLIMATE CHANGE

- UNFCCC (Rio, 1992)
- Kyoto Protocol (Kyoto, 1997)
  - Ratification by Canada in December 2002 – commitment to 6% reduction under 1990 levels



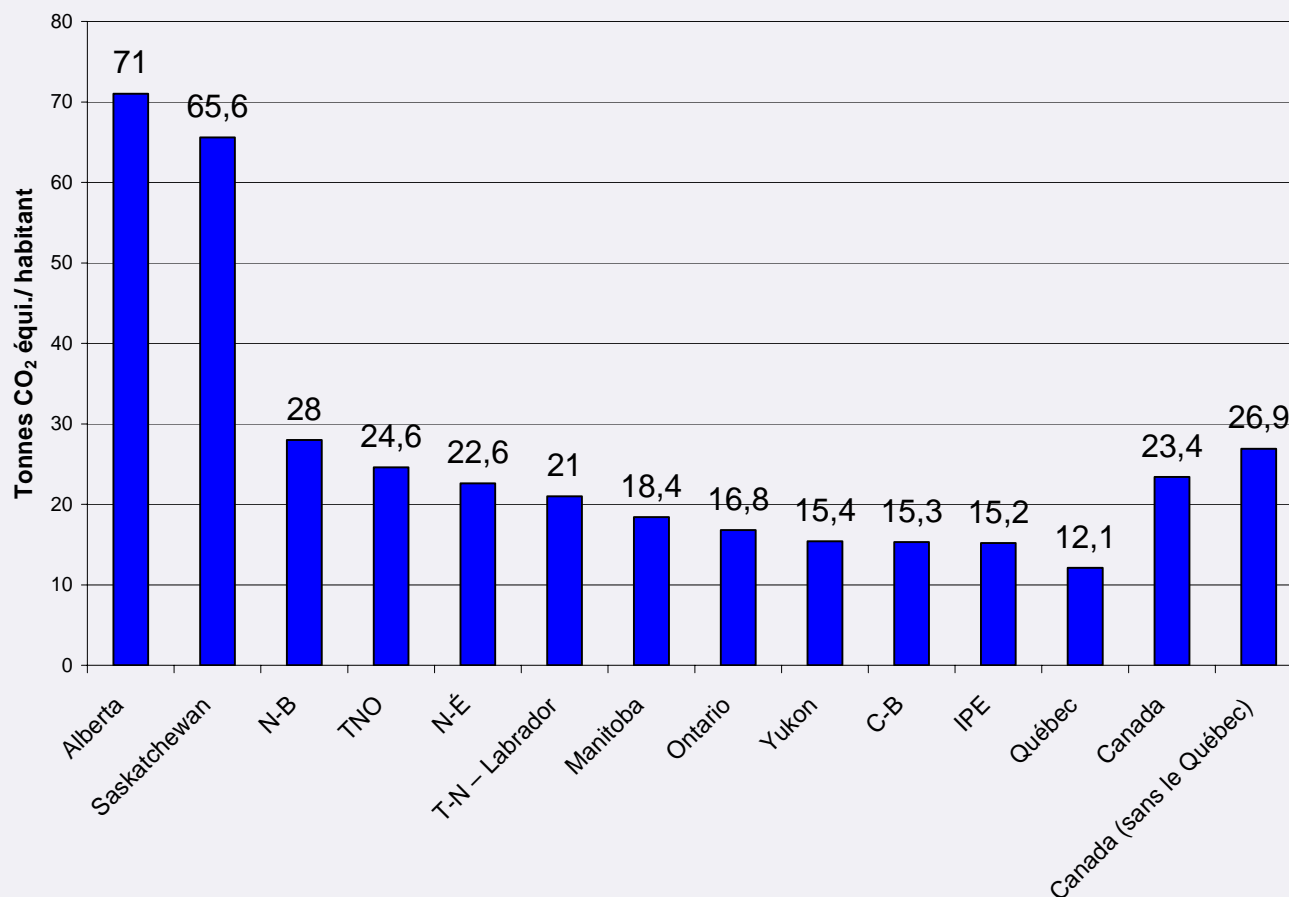
## ACTIONS TO FIGHT CLIMATE CHANGE IN QUÉBEC

Québec's support of the Kyoto Protocol:

- Five motions adopted unanimously by Québec's National Assembly
- Québec's new 2006-2012 climate change plan



## SOME STATISTICS – GHG EMISSIONS IN CANADA IN 2003



Source: Canadian Greenhouse Gas Inventory 1990-2003

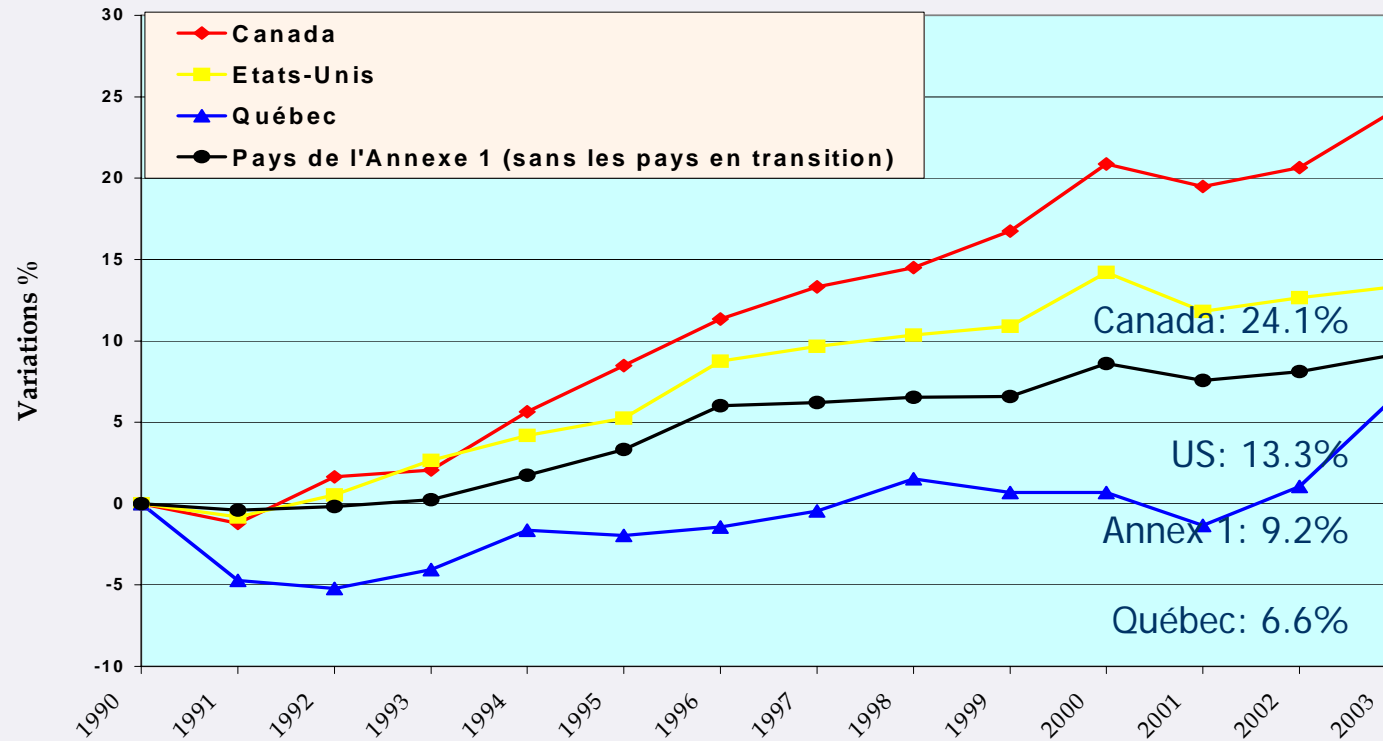
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## VARIATIONS IN GHG EMISSIONS, 1990-2003



Source: MDDEP, Québec greenhouse gas inventory 1990-2003

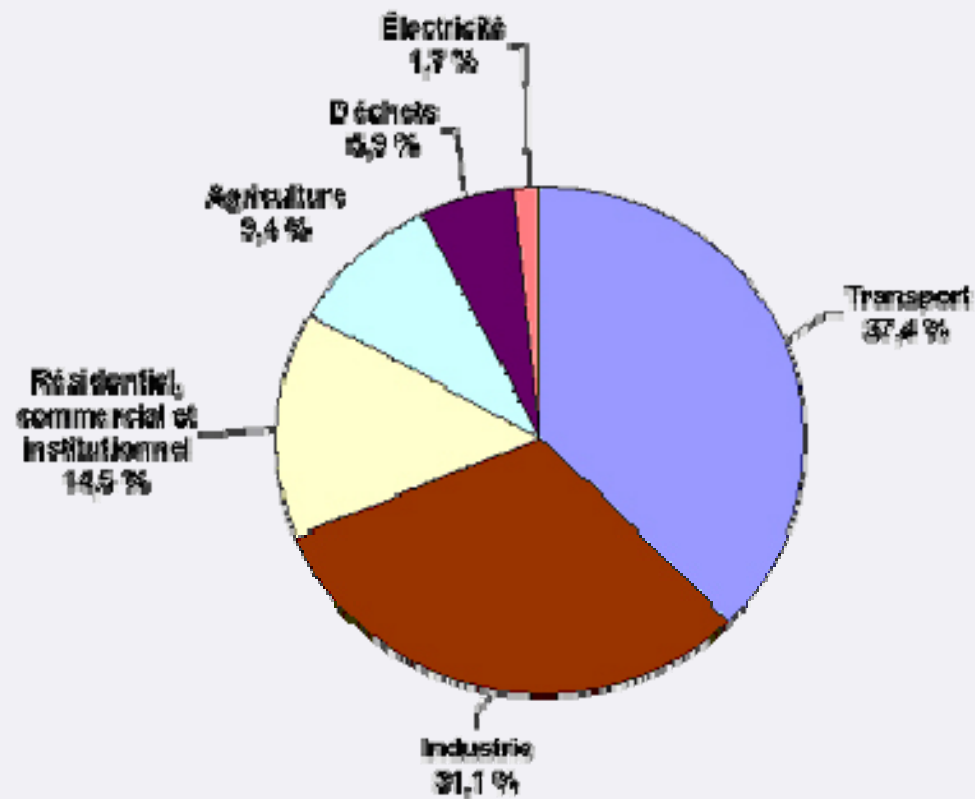
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## BREAKDOWN OF GHG EMISSIONS BY SECTOR OF ACTIVITY IN QUÉBEC IN 2003



Source: MDDEP, Québec GHG inventory 1990-2003

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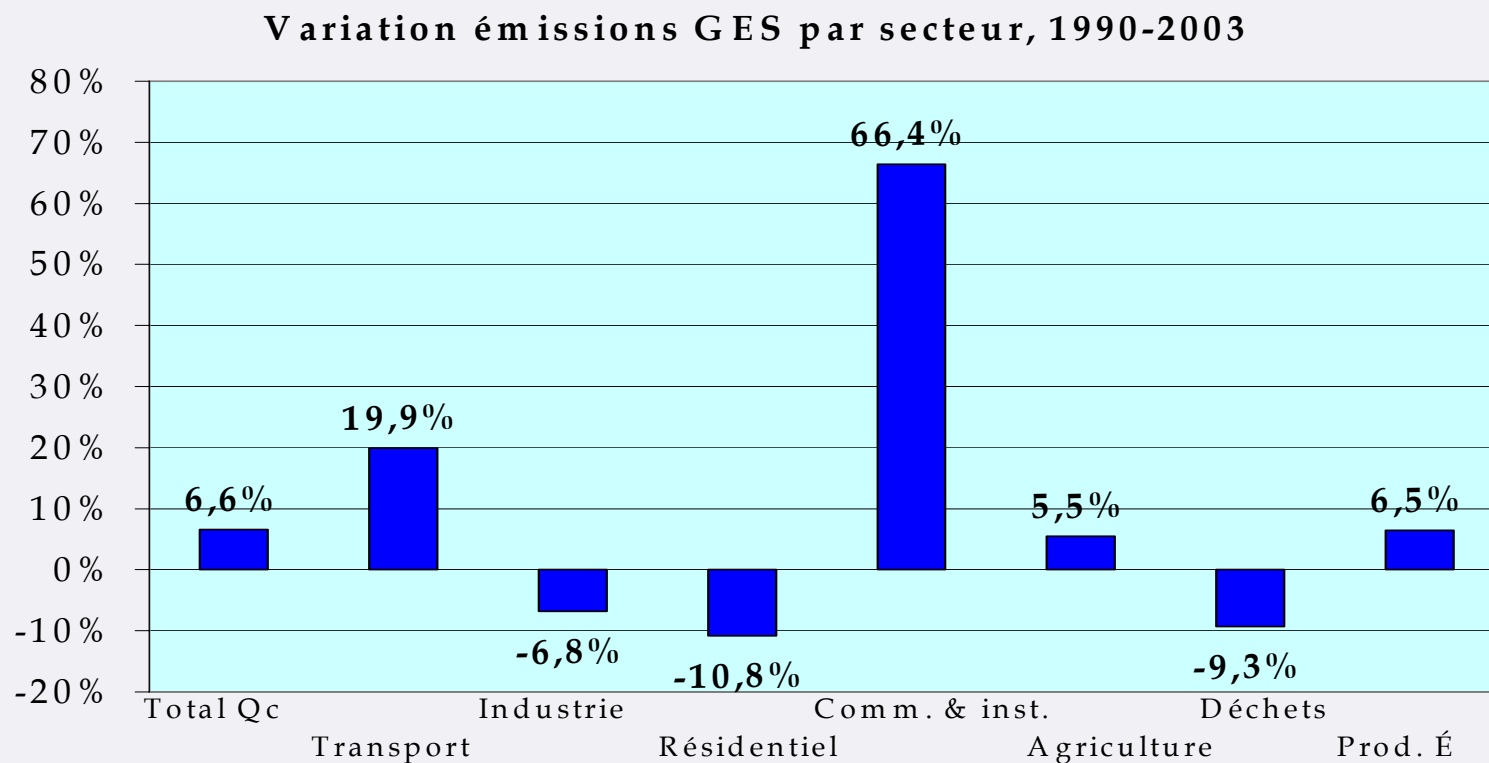
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## VARIATIONS IN GHG EMISSIONS BY SECTOR, 1990-2003



Source: MDDEP, Québec GHG inventory 1990-2003

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## 2006-2012 Action Plan

### QUÉBEC AND CLIMATE CHANGE A Challenge for the Future

#### The Action Plan:

- description
- objectives
- financing



## 2006-2012 ACTION PLAN

### 24 actions based on two broad objectives:

- The reduction or avoidance of GHG emissions, including research, development and deployment of new technologies
- Adaptation to climate change



## THE ACTION PLAN: REDUCTION / AVOIDANCE

- Energy
- Transportation
- Industry
- Residual materials
- Agriculture
- Government leadership
- Public awareness
- Research, development and deployment of technologies



## THE ACTION PLAN: ADAPTATION

- Health
- Environment, natural resources and land



## EMISSION REDUCTION TARGETS TO BE REACHED BY EACH SECTOR BY 2012

GHG emissions GHG emission reduction actions	Potential for GHG emission reductions
Energy and transportation (technological innovation, energy efficiency in buildings, replacement fuels and transportation of persons and merchandise)	4.8 Mt CO2 eq.
Industry (voluntary agreements and Regulation respecting halocarbons)	1.6 Mt CO2 eq.
Residual materials (implementation of the Regulation respecting the landfilling and incineration of residual materials and biogas capture in existing landfill sites)	3.0 Mt CO2 eq.
Agriculture (waste treatment and recovery of agriculture biomass)	0.3 Mt CO2 eq.
Government leadership	0.2 Mt CO2 eq.
Public awareness	0.1 Mt CO2 eq.
TOTAL	10.0 Mt CO2 eq.



## QUÉBEC'S CONTRIBUTION

GHG emissions	Mt
1990 level	85.3
2003 level	90.9
CAN 2012 projection	94.0
<b>Effort provided by Québec's Action Plan</b>	<b>10.0</b>
Impact of Action Plan on emissions projected for 2012 (represents a 1.5% reduction under 1990 emission levels)	84.0
Application of Canada's GHG reduction objective in Québec (6% under 1990 levels) for 2012	80.2
Extra effort required to reduce GHGs by 6% under 1990 levels by 2012	3.8



## ACTION PLAN: FINANCING

### Recourse to climate change economic instruments

- Hydrocarbons and coal: 73% of GHG emissions in Québec
- Fair and transparent approach: Introduction of levies applied to GHG emitting businesses in the energy sector
- Levies calculated by the Régie de l'énergie prorated to CO2 eq. emissions by energy type





## ACTION PLAN: FINANCING

- Levies paid into the MDDEP's Green Fund to finance the plan's actions
- Green Fund's financing needs: estimated at \$200 million per year
- Approach complies with the polluter-pays principle, as provided for under the Sustainable Development Act

## 2006-2012 Action Plan

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## The Action Plan: Implementation

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## ACTION PLAN: IMPLEMENTATION

### Financing the Action Plan

- Régie de l'énergie:
  - Legislative changes
  - Development, application and collection
- Green Fund:
  - Accountability mechanism
  - Monitoring indicators



## THE ACTION PLAN: IMPLEMENTATION

### Energy sector

- Québec's Energy Strategy and Climate Change Action Plan:
  - Financing program aimed at **climate-related energy efficiency** (2007)
  - Québec Building Code (2008)
  - By 2010, improve the energy efficiency of public buildings and reduce fuel consumption of government departments and organizations



## ACTION PLAN: IMPLEMENTATION

### Transportation

- Québec's public transportation policy (2006)
- Alternative transportation of persons (2007)
- California standards (2007)
- Transportation of merchandise
  - Devices to limit speeds to 105 km/h (2007)
  - Encourage implementation of intermodal projects (2006)



## ACTION PLAN: IMPLEMENTATION

### Industrial and residual materials sectors

- Industrial sector (2006)
  - Aluminum plants
  - Chemical and petrochemical products
  
- Residual materials sector (2007)
  - capture
  - recovery



### Other sectors

- Agriculture (2007)
- Public awareness (2007)
- Research, development and deployment of new technologies (2007)
- Government leadership
  - Employer program (2008)



## ACTION PLAN: IMPLEMENTATION

### Adaptation measures

- Health
- Climate monitoring networks
- Forests



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## Conclusion

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## CONCLUSION

- Québec's leadership role
- Québec government is not the only government whose actions on Québec territory will have an effect on the reduction of CO2 eq. emissions.
- Participation of the federal government must include financial support for this Action Plan as well as federal actions coordinated on Québec territory, taking its specificities into account.