EEA activities in the area of climate mitigation

Dr. Andreas Barkman Head of Group Air and Climate mitigation



Climate mitigation related work at EEA

•Evaluating the application of EU Emissions Trading Scheme

•Climate change indicators

•The post-2012 process •Tracking negotiations •Post 2012 scenarios

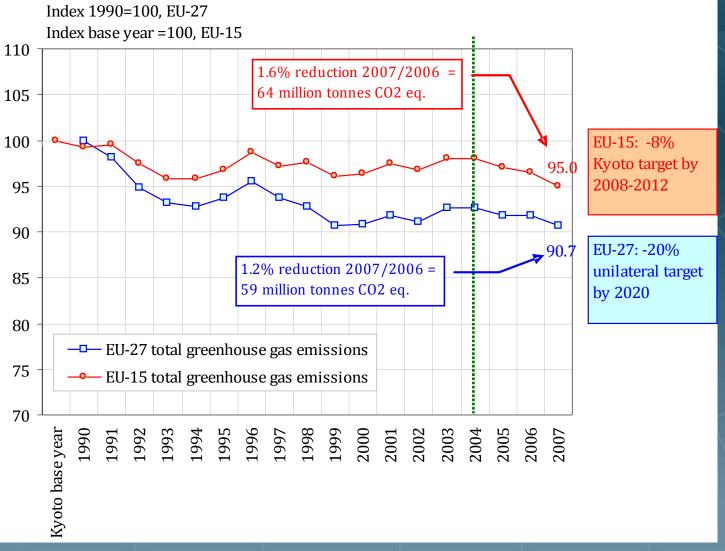


•EC's official GHG inventory submission to UNFCCC

•Tracking progress towards targets – Kyoto Protocol – 2020 targets



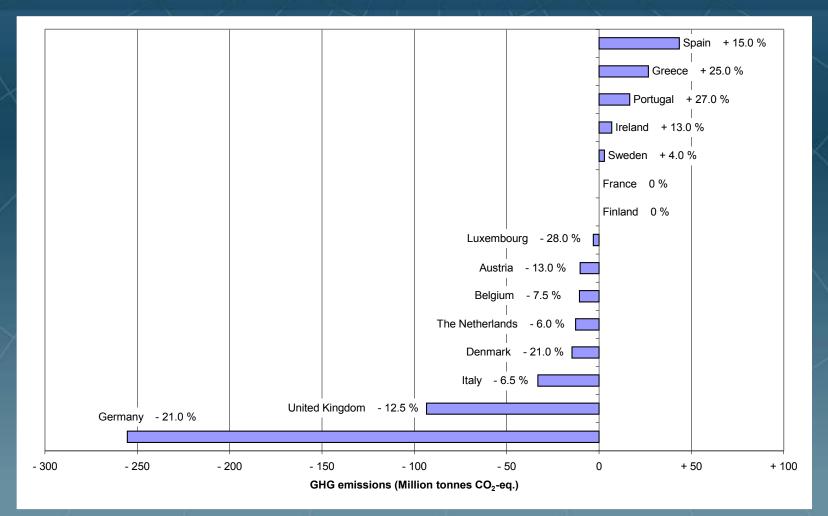
EU15 has a -8% target under Kyoto and EU27 has a taken on a unilateral-20% target for 2020





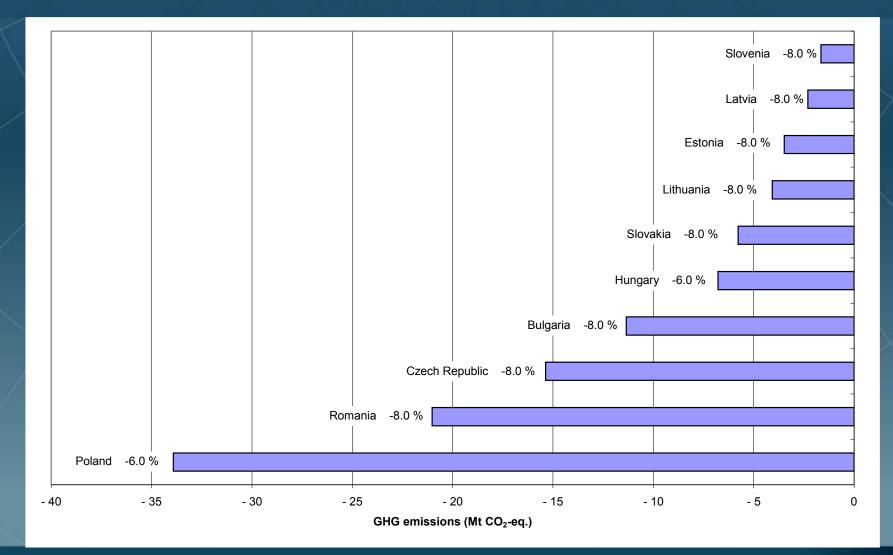
Source: EEA.

EU Member States have individual Kyoto targets EU law summing up to -8% reduction for EU15



European Environment Agency

Ten of the Member States that joined EU 2004 and 2007 has individual targets under the Kyoto Protocol for



European Environment Agency



Greenhouse gas emissions excluding LULUCF (CO2 equivalents) and Kyoto Protocol targets for 2008–12

	1990	Kyoto Protocol base year ^{la)}	20.07	Change 2006-2007	Change 2006-2007	Change 1990-2007	Change base year-2007	Targets 2008–12 under Kyoto Protocol and "EU burden sharing"
MEMBERSTATE	(million tonnes)	(million tonnes)	(million tonnes)	(million tonnes)	(%)	(%)	(%)	(%)
Austria	79.0	79.0	88.0	-3.6	-3.9%	11.3%	11.3%	-13.0%
Belgium	143.2	145.7	131.3	-5.3	-3.9%	-8.3%	-9.9%	-7.5%
Denmark	69.1	69.3	66.6	-4.4	-6.2%	-3.5%	-3.9%	-21.0%
Finland	70.9	71.0	78.3	-1.6	-2.0%	10.6%	10.3%	0.0%
France	562.6	563.9	531.1	-10.6	-2.0%	-5.6%	-5.8%	0.0%
Germany	1215.2	1232.4	956.1	-23.9	-2.4%	-21.3%	-22.4%	-21.0%
Greece	105.6	107.0	1 31.9	3.8	2.9%	24.9%	23.2%	25.0%
Ireland	55.4	55.6	69.2	-0.5	-0.7%	25.0%	24.5%	13.0%
Italy	516.3	516.9	552.8	-10.2	-1.8%	7.1%	6.9%	-6.5%
Luxembourg	13.1	13.2	12.9	-0.39	-2.9%	-1.6%	-1.9%	-28.0%
Netherlands	212.0	213.0	207.5	-1.0	-0.5%	-2.1%	-2.6%	-6.0%
Portugal	59.3	60.1	81.8	-2.9	-3.4%	38.1%	36.1%	27.0%
Spain	288.1	289.8	442.3	9.3	2.1%	53.5%	52.6%	15.0%
Sweden	71.9	72.2	65.4	-1.5	-2.2%	-9.1%	-9.3%	4.0%
United Kingdom	771.1	776.3	636.7	-11.2	-1.7%	-17.4%	-18.0%	-12.5%
EU-15	4232.9	4265.5	4052.0	-64.0	-1.6%	-4.3%	-5.0%	-8.0%
Bulgaria	117.7	132.6	75.5	4.2	5.9%	-35.8%	-43.0%	-8.0%
Cyprus	5.5	Not applicable	10.1	0.2	1.6%	85.3%	Not a pplicable	Not applicable
Czech Republic	194.7	194.2	150.8	1.7	1.2%	-22.5%	-22.4%	-8.0%
Estonia	41.9	42.6	22.0	2.8	14.8%	-47.5%	-48.3%	-8.0%
Hungary	99.2	115.4	75.9	-2.9	-3.7%	-23.5%	-34.2%	-6.0%
Latvia	26.7	25.9	12.1	0.4	3.5%	-54.7%	-53.4%	-8.0%
Lithuania	49.1	49.4	24.7	1.9	8.1%	-49.6%	-49.9%	-8.0%
Malta	2.0	Not applicable	3.0	0.07	2.3%	45.7%	Not applicable	Not applicable
Poland	459.5	563.4	398.9	-0.4	-0.1%	-13.2%	-29.2%	-6.0%
Romania	243.0	278.2	152.3	-1.6	-1.0%	-37.3%	-45.3%	-8.0%
Slovakia	73.3	72.1	47.0	-2.0	-4.1%	-35.9%	-34.8%	-8.0%
Slovenia	18.6	20.4	20.7	0.2	0.7%	11.6%	1.8%	-8.0%
EU-27	5564.0	Not applicable	5045.1	-59.4	-1.2%	-9.3%	Not applicable	Not applicable



Summary of key messages for this year's GHG inventory

- EU emissions falling for third consecutive year
- Emissions fell in 17 EU countries: Germany 40% of reduction
- Main reduction in CO2, but HFCs increased (cooling devices)
- Much lower emissions from households, international transport still growing
- Lower use of oil and gas for direct heating in households
- Increasing temperature in Europe, faster in winter (2007 warmer than 2006)
- Actual heat demand in Europe going down
- Fuel prices for households increasing rapidly (oil and gas)
- Germany: High fuel price expectations and sales in 2006 and warm year 2007



EU Commitments up to 2020

20% GHG reduction by 2020 compared to 1990

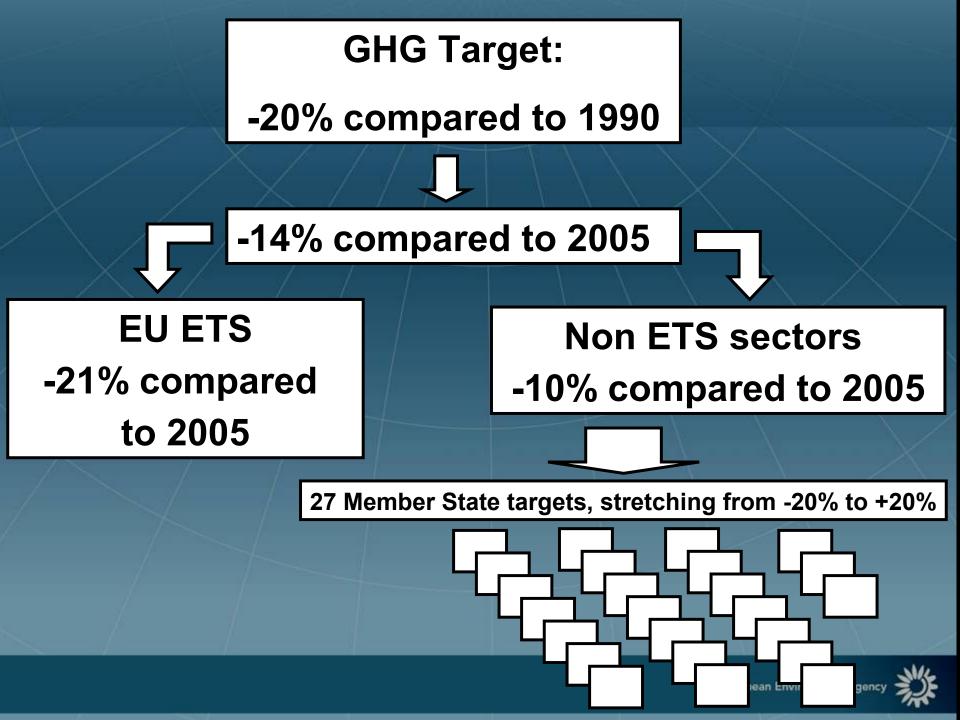
 Independent commitment
 30% GHG reduction by 2020 compared to 1990
 (In context of international agreement)

 20% renewable share of final energy consumption by 2020

10% bio fuels in transport, with

 production being sustainable
 second generation bio fuels
 commercially available

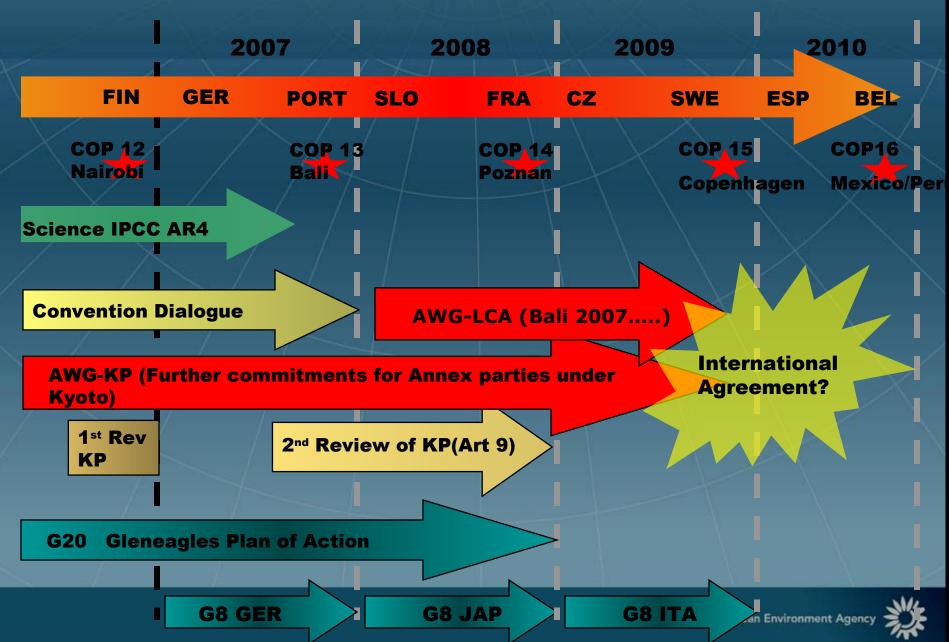




What's in the Climate and energy package?

			\wedge
Revision of the EU ETS Directive	 EU wide -21% (2005) Auctioning Carbon leakage CCS (link and support) Aviation Linking Carbon credits 	 National targets National action plan for national targets in trp, electricity, heating/ cooling Trp 10% RE/MS Flexibility Sust. criteria 	Directive on the promotion of renewable energy
Effort sharing Decision for non - EU ETS sectors	 National targets+- 20% (2005) National trajectories Penalty factor Carbon credits 	 120g/km all fleet 2015 95g/km 2020 Penalties for manufacturers 	Regulation for CO2 emissions from new pass. cars
Regulatory framework for CCS	•MS decides •Demo plants •Storage permits	 Life cycle GHG cuts -6% by 2020 by fuel suppliers MS may require 4%more Encourage blending Sust. criteria 	Revised Directive on fuel quality standards

The Roads to Copenhagen



Important UNFCCC meetings this year

•Bonn 1: 29 March- 8 April •Bonn 2: 1-12 June •Bonn 3: 10-14 August (informal) •Bangkok: 28 September- 9 October •Barcelona: 2-6 November •Copenhagen: 7-18 December Detailed calendar on http://unfccc.int/meetings/unfccc_calendar/items/



More info on...

European Council website: http://www.consilium.europa.eu/
Czech Presidency http://www.eu2009.cz/en/
Swedish Presidency: http://www.se2009.eu/
European Parliament: http://www.europarl.europa.eu/ee2009/news_public_en.ht m

Europen Commission: http://ec.europa.eu/index_en.htm -DG ENV: http://ec.europa.eu/dgs/environment/index_en.htm
UNFCCC: http://unfccc.int/2860.php



Thank you for your attention! andreas.barkman@eea.europa.eu

See for more information the EEA web site:

www.eea.europa.eu

