Appraising the Potential Impacts of an Agricultural Mitigation Target on the Irish Agriculture Sector

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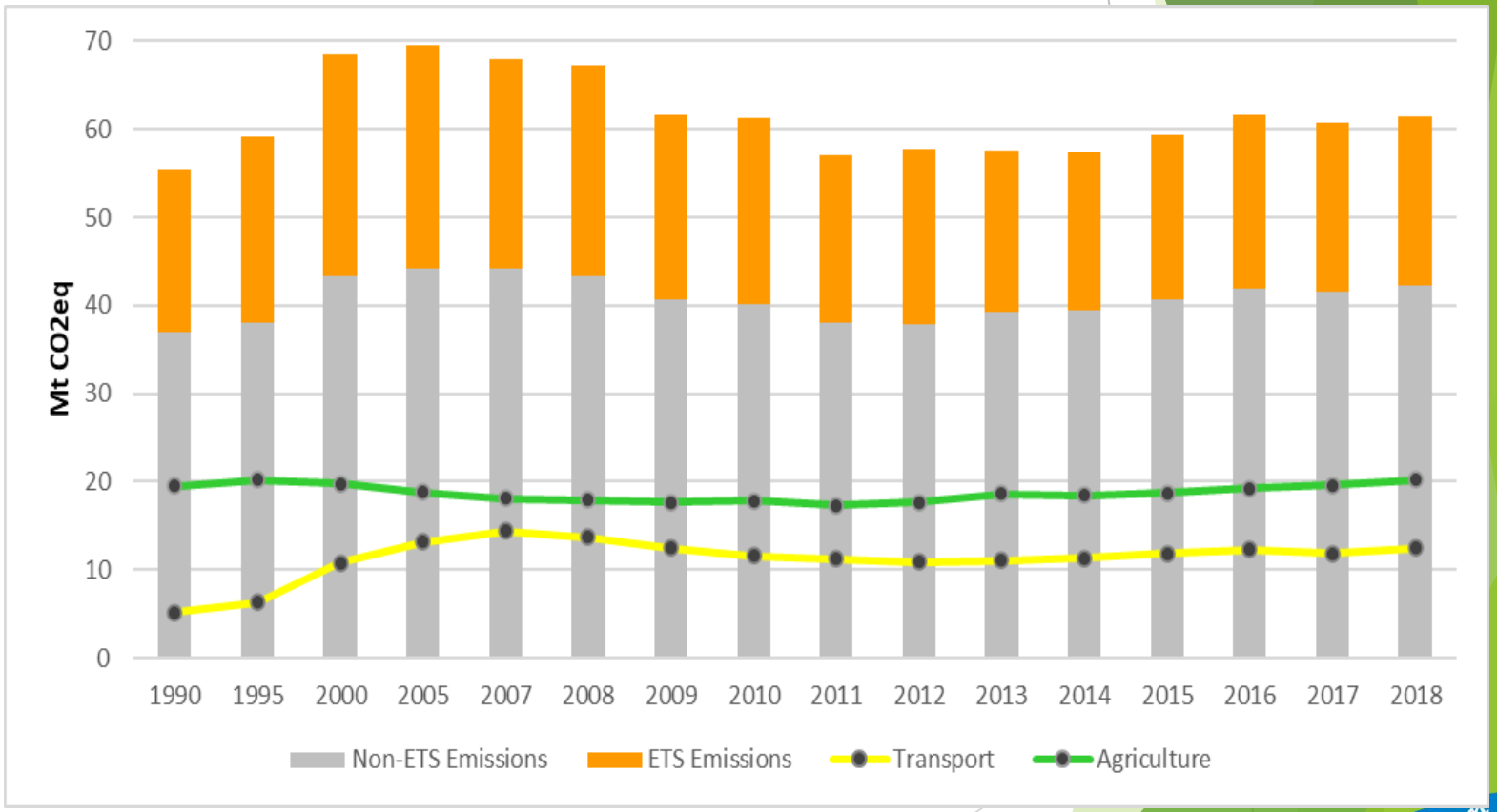
Irish GHG reduction targets and the development of GHG emissions (1990-2018)

- EU potential agriculture mitigation target
  - For 2030 a reduction by 20%
- Irish Climate Action Plan
  - For 2030 a reduction of 10-15% relative to 2030 projections



CAPRI Mitigation Scenarios

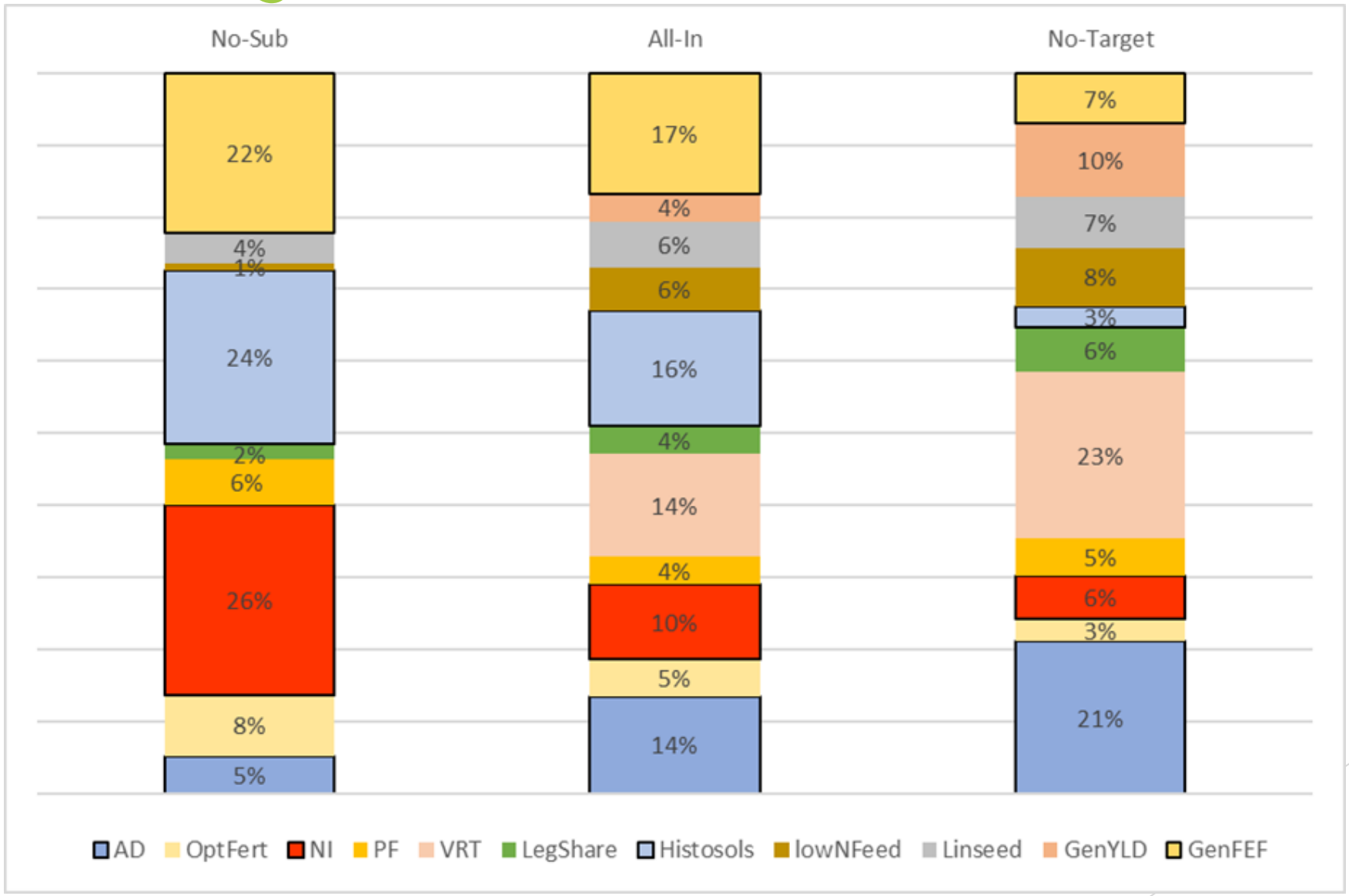
For all scenarios:

- EU agricultural and traded policies approved up to 2015
- UK separate from EU aggregate
- 12 mitigation technologies and management practices

Reference	No-Sub	All-in	No-Target
No EU-27 mitigation target	Compulsory EU-27 mitigation target: Ireland -15% relative to 2030	Compulsory EU-27 mitigation target: Ireland -15% relative to 2030	Voluntary EU-27 mitigation target
No subsidy for mitigation measures	No subsidy for mitigation measures	80% Subsidy for mitigation measures	80% Subsidy for mitigation measures

Abatement potential of Irish Agricultural GHG emissions by technology and production change

Share of mitigation options in Irish Agricultural GHG mitigation



Change in area, herd size and supply for main activities in Ireland

	Reference		No-Sub		All-in		No-target	
	Hectares/ herd size	Supply	Hectares/ herd size	Supply	Hectares/ herd size	Supply	Hectares/ herd size	Supply
	1000 ha/hds	1000 ha/t	%-difference to Reference					
Dairy cows	1426	8130	-4.27	-4.21	-3.24	3.66	1.23	13.26
Beef meat activities	4876	664	-10.44	-9.10	-9.05	-7.57	1.50	1.40
Sheep and Goat meat activities	2045	50	-11.15	-10.29	-12.25	-10.96	0.72	0.76
Grass and grazings ext.	1580	45850	35.14	35.38	40.52	40.79	2.39	2.41
Grass and grazings int.	1626	105419	-34.15	-34.42	-39.38	-39.69	-2.32	-2.34

- Note: Red indicates a decrease and green an increase.
- Total supply of beef meat activities includes beef from suckler cows, heifers, bulls, dairy cows and calves (carcass weight).

Change in producer prices and farmer's income for main activities in Ireland

	Reference		No-Sub		All-in		No-Target	
	Price	Income	Price	Income	Price	Income	Price	Income
	€/t	€/ha or head	%-difference to Reference					
Cow milk/ Dairy	418.14	1201.02	8.83	25.58	3.97	33.58	-12.78	-0.81
Beef	4336.04	284.39	21.19	82.05	24.96	105.02	-1.56	11.45
All outputs	74.21	414.49	15.99	29.83	21.11	38.47	-0.69	-2.06

- Note: Red indicates a decrease and green an increase.

Nexus of Agricultural development and GHG emission targets

- **Compulsory Emission Target: With a strong adaption of livestock production systems (implementation of mitigation measures and changes in production) EU and Irish Climate Action Plan mitigation targets can be achieved**

- **Without subsidies: Impact on Irish Agriculture sector high**
- **With subsidies: Impact on Irish Agriculture is buffered, and farmers can adapt easier**

- **Voluntary Emission Target with subsidies: Least effective solution**

Thank you for you Attention!
Any Questions?