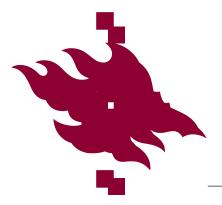


HELSINGIN YLIOPISTO
HELSINGFORS UNIVERSITET
UNIVERSITY OF HELSINKI

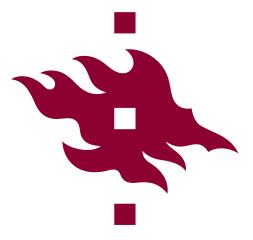


# The intertran reserach group

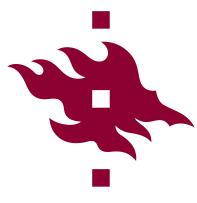


- Interdisciplinary research group for sustainable law and business.
- Established 2010
- Central idea: contribute to sustainable development
- Strong focus on a sustainable circular economy, international transport and global value chains.
  - https://www.helsinki.fi/en/research groups/sustainable-law-andbusiness/about

From the left: Suvi Hirvonen-Ere; Lauri Ojala; Suvi Sankari; Ellen Eftestøl; Anu Bask; Maximilian Huemer; Emilie Yliheljo; Bodo Steiner



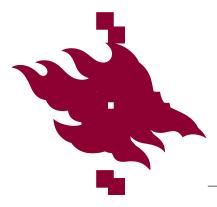
# FIT FOR 55 and SHIPPING



## **Policy targets**

- 'Fit for 55': delivering the EU's 2030 Climate Target on the way to climate neutrality
- EUR-Lex 52021DC0550 EN EUR-Lex (europa.eu)
- Emission reduction target:
  - 55% compared to 1990 levels by 2030
  - A net-zero greenhouse gas economy
- Consistent with:

- European Green Deal (2019)
- EU Climate Law (in force 2021)
- The Polluter Pays Principle



# The European Green Deal COM(2019) 640 final



 Ursula von der Leyen:
 "An integral part of this Commission's strategy to implement the United Nation's 2030 Agenda and the sustainable development goals"



















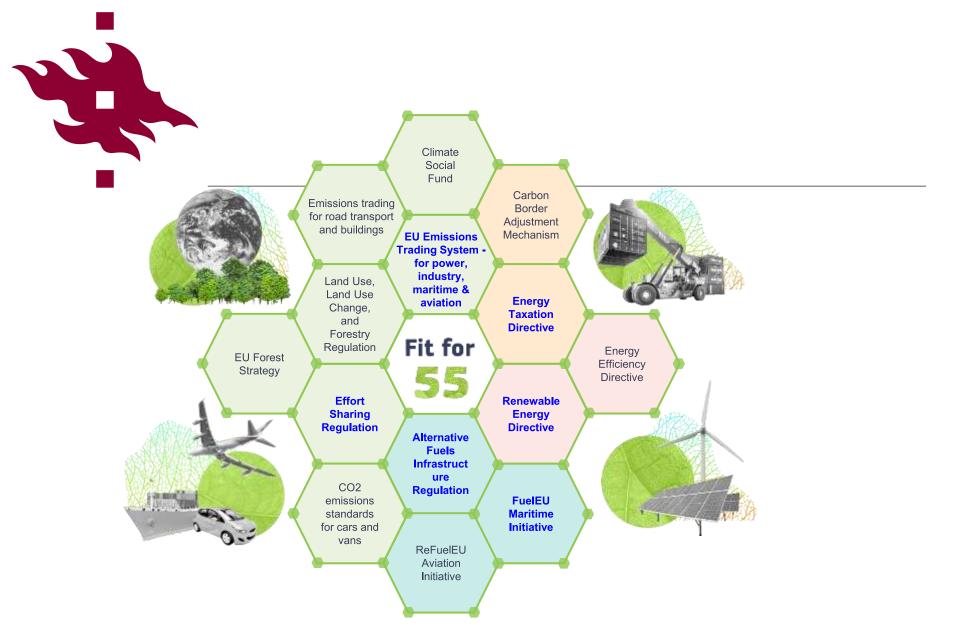


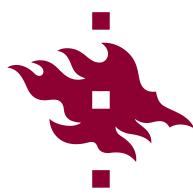




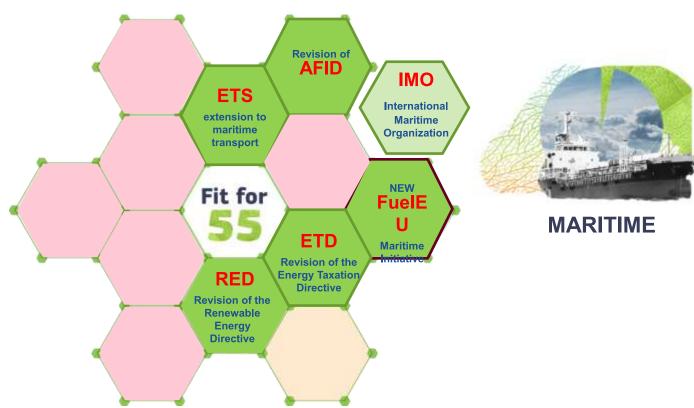
#### The European Green Deal COM(2019) 640 final

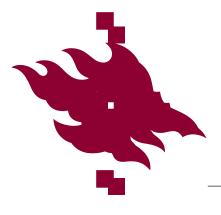






# Initiatives that concern waterborne transport ("basket of measures")

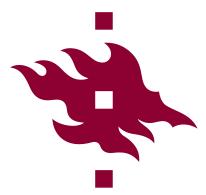




# Background – International Shipping as a Major Pollluter

- Shipping is a major polluter due to its large dependence on fossil fuels.
- Global level: Shipping accounts for 2-3 % of all emissions (higher than any EU state)
- EU level: Shipping accounts for 13% of emissions from transport.
- Estimated to grow
- From about 90% of 2008 emissions in 2008 to 90-130% of 2008 emissions by 2050.
- https://wwwcdn.imo.org/localresourc es/en/OurWork/Environment/Docum ents/Fourth IMO GHG Study 2020 -Full report and annexes.pdf





# What is IMO doing?

#### **Target**

Total GHG emissions to peak and decline: 50% reduction by 2050 - Pursuing to phase them out asap

Based on amendments to MARPOL

Carbon intensity (CO2 emissions per transport work to reduce by 40% by 2030 and 70% by 2050)

Compared to 2008 levels

#### **Tools**

#### Design

- Energy Efficiency design indices of new ships (EEDI)
- Energy Efficiency indices for existing ships (EEXI)

#### Operation

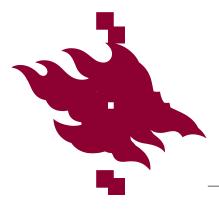
- Ship Energy Efficiency Management Plan (SEEMP)
- Carbon Intensity Indicator (CII)

#### **Data Collection**

Global and anonymous

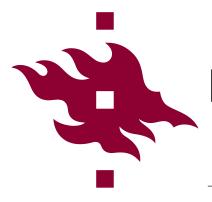
#### **Fuels**

Lifecycle assessment (LCA) is the goal, but still Tank to Wake



### IMO & EU

- Emissions from shipping not included in the international climate agreements (Kyoto Protocol, Paris agreement)
- Kyoto protocol states that limitations and reductions of emissions from marine bunker fuel shall be governed by the IMO, the IMO is responsible for establishing an international legal framework for this
- EU is in because progress in IMO is considered too slow
- Review clause to take account of relevant developments at IMO.



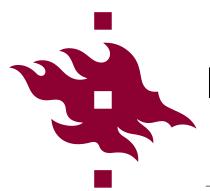
## Not enough?

When the current EU ETS legislation was revised in 2018, it was predicted to deliver a 43% reduction of EU ETS emissions by 2030 compared to 2005.

This would have been coherent with the previous target of at least 40% reduction by 2030 compared to 1990.

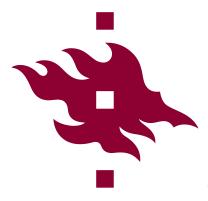
To reach the goal of 55% reduction by 2030 compared to 1990, the sectors covered by the EU ETS need an emission reduction of 61%.

If international shipping was left outside, this would be difficult to attain



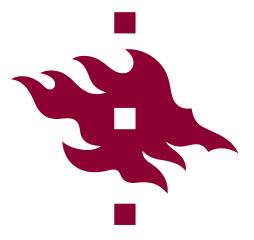
## **EU's THREE STEPS STRATEGY**

- Implement a system of Monitoring Reporting and Verifying (MRV) emissions from shipping
- Introduce a definition of reduction targets for the maritime transport sector and
- Implement market-based measures (MBM)

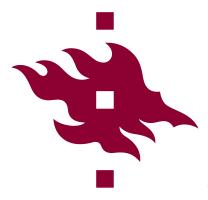


## THE MRV SHIPPING REGULATION

- To monitor, report and verify emissions
- The information based on the bunker delivery note
- ust be reported to authorities and verified by an authorised verifier
- Important that the information is public
- THETIS MRV (databased operated by EMSA)



# 2. The existing EU Emission Trading System (ETS)



# EU ETS – a corner stone of the EU's climate policy

#### **The Emission Trading System**

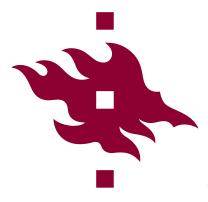
World's first major carbon market

Covers 40% of EU's greenhouse gas emissions

Limits emissions from approx. 10000 installations in the power sector and manufacturing industry as well as airlines operating within the EU

Governed by Directive 2003/87/EC on establishing a system for greenhouse gas emission allowance trading within the Union

EUR-Lex - 32003L0087 - EN - EUR-Lex (europa.eu)



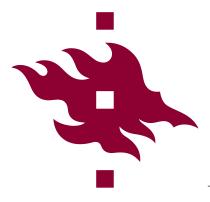
# A "cap and trade" system

A cap is set for the total amount of certain greenhouse gases that can be emitted by the entities covered by the system. Derived from 2018-19 data.

The maximum is reduced over a period. Annual adjustment – linear adjustment factor of 4,2%

The members of the system can buy (auction) or receive emission allowances which they can trade with one another as needed.

Important that the emissions can be measured, reported and verified with a high level of accuracy.

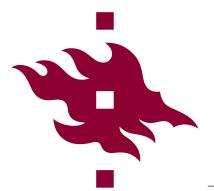


## Licence to emit

It is obligatory for the sectors covered by the system to participate

The operator of an installation covered by the directive needs a permit issued by a competent authority to legally undertake activities covered by the directive (art 4)

The permit gives the operator allowance to emit which is coupled to an obligation to surrender allowances equal to the total emissions of each calendar year.

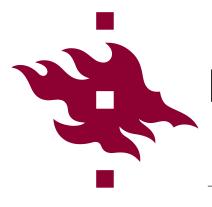


An allowance means allowance to *emit one tonne of* carbon dioxide equivalent during a specified period

The allowance is only valid for the purpose of meeting the requirements of the directive and shall be transferable.

From 2021 onwards 57% of the allowances are auctioned in line with Annex II of the ETS-directive and the auctioning regulation

EUR-Lex - 32010R1031 - EN - EUR-Lex (europa.eu)



## **Public information**

The Member States shall keep a **registry** of the allowances.

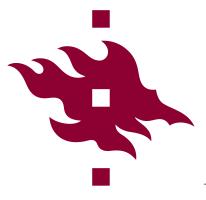
#### The results are published:

Application of the European Union Emission Trading Directive. Analysis of national responses under Article 21 of the EU ETS (25 May 2021):

#### 2019

Total reported emissions 1.500Mt CO2 (eq) **11% lower** than the year before

Aircraft operators: total emissions 70 Mt CO2 (eq) **0,7% higher t**han the year before



## **Penalties**

#### Infringements

**Emitting without permit** 

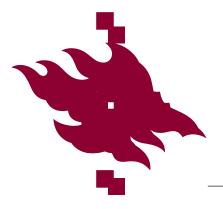
Not complying with permit conditions

Not submitting report

Not monitoring according to plan

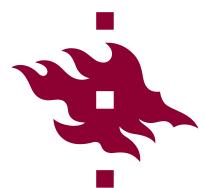
Penalties set by the Member States

Fines, jail, shut down of installation



# EU ETS EXTENSION TO SHIPPING

- Applies to
- International Maritime Transport Activities
- Between EU Member States and between EU Member States and third countries.
- At sea and at berth.
- The exterritorial effect
- Does the EU have competence to do this?
- EUCJ ATA case "Air Transport Association of America and Others v Secretary of State for Energy and Climat Change (Case C-366/10)
- Will it be effective or subject ot carbon leakage?



# Still a proposal, major changes by the Parliament and the Council...

