# Innovative concepts for transnational education and research in maritime transport

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# Current Situation on Education in Maritime Transport

Requirements for professionals in maritime transport:

Quality, Internationality and Accessibility

- Challenges for the educators
  - Lack of industry-specific educators
  - Complexity to make available requirements possible in the most efficient way

 Policy: Strategic goals & recommendations of the EU's maritime transport policy until 2018



# How to cope with the challenges?

- Innovative concept on services and products which respond the industrial needs and complexity
- Dynamic collaboration platform
- Network development and engagement among high quality educators, professionals and policy makers



#### Process innovation...

...is the implementation of a new or significantly improved production or delivery method.

#### Product innovation...

...is the introduction of a good or service that is new or significantly improved with respect to its characteristics or intended uses.

Sources:

http://stats.oecd.org/glossary/detail.asp?ID=6868

http://stats.oecd.org/glossary/detail.asp?ID=6870



#### Key "ingredients" for innovation

## Open & open source

Flexibility

**Transparency** 

Knowledge

Skill Development

Innovation Infrastructure

Network for Innovation Mentoring & Facilitation



#### A new approach

#### Northern Maritime University – project

- Partly funded project by ERDF under the programme Interreg IVB North Sea Region
- Project period: April 2008 April 2011

#### Vision:

The academic network for innovative maritime education and R&D

#### **Mission:**

The establishment of a sustainable collaboration between industry and educational institutions to enhance the innovation capacity of the maritime industry.

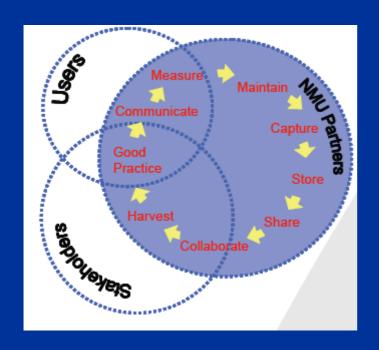


#### **NMU** Global Objectives

- To *create a collaborative network* of universities, institutions, maritime industry, and related organisations.
- To enhance the European maritime business sector by delivering teaching and qualifications that correspond to the industry's needs and expectations.
- To *develop agreed curricula* of maritime, port and short sea shipping (SSS) related teaching modules.
- To *educate and train forward thinking professionals* in the maritime and port industry.
- To create awareness and interest in the maritime industry and port sector as well as with policy makers.



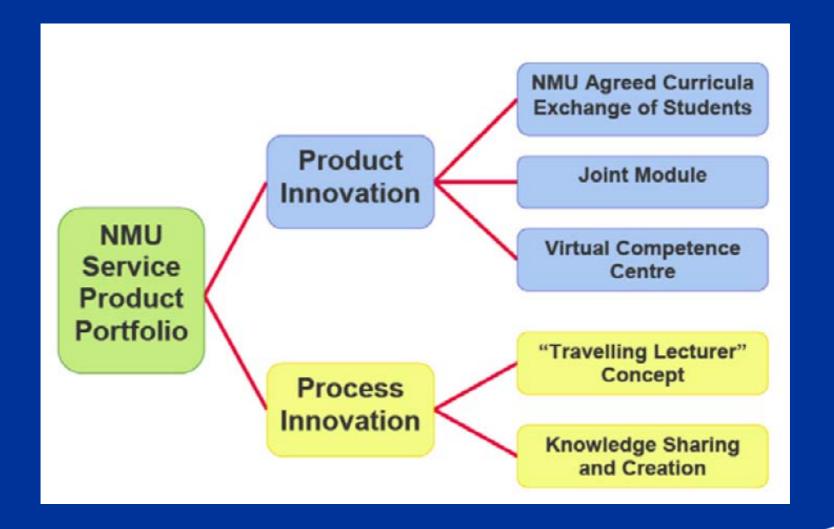
### NMU Knowledge Circle



The extensive knowledge and expertise within the NMU partners will be brought together to create a network of universities, able to specifically and directly address the education and *training needs* of the maritime industry. The new **education offerings** will be developed by the NMU partners in cooperation with stakeholders and users involved in maritime transport.



#### Service Product Portfolio





#### Service Product Portfolio

Some examples from the Service Product Portfolio:



#### "Travelling Lecturer" Concept

- Lecturers will not only teach at their home universities but also at partner institutions
- Students gain international learning experiences from external lecturers
- Following a modular structure, outcomes of the courses can be fully credited



#### Service Product Portfolio



#### **Knowledge Sharing and Creation**

- Knowledge, each institution gained through close relations with maritime companies, can be shared and provided to a greater group of people
- Common development of products or services will help creating something really new



#### e-Collaboration Platform

What is it?

an integrated web platform which provides the access to education, research and industrial cooperation within a single virtual location.

Who uses it?

NMU community members (incl. stakeholders), other universities, research institutes, maritime related institutions and companies in maritime business.

Why is it good?

- High level of accessibility to information among the community members
- Enhanced collaboration by exploiting available web technology
- Single access to all services and information
- Facilitated accessibility to knowledge on maritime transport
- Synergies between industry and education through knowledge and information trading



#### e-Collaboration Platform

 Virtual Competence Centre facilitates NMU service offerings such as knowledge support, research and benchmarking services as well as establishment of common research projects

Main Features at a Glance E-Learning

Source of
Knowledge and Expertise
in Maritime Transport

Working, discussing and collaborating on-line in one place

Information Exchanges



#### Challenges for success

- Acceptance from industry
- Innovation
- Accessibility
- Continuity
- Sustainability
- Quality assurance



#### Addressing challenges

#### How will they be addressed?

- Self enhancement strategies
- Continuous dialogue and cooperation with stakeholders
  - (to provide them with "what they really need")
- "Mobilisation" of knowledge
- Allow for "organic" growth
- Avoidance of institutionalisation



#### Conclusion

- Quality, internationality and accessibility as main challanges
- Challenges from strategic goals & recommendations of the EU's maritime transport policy until 2018
- Innovative concept for transnational education on maritime transport as a supportive solution
  - New concept of learning and teaching
  - Synergies on expertise and resources
  - Use of available technology to perform best practice



#### Northern Maritime University

North Sea Region

## Thank

## you

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