

2nd Annual
Digital Ship Scandinavia 2005
Maritime information technology conference and exhibition



**Primar Stavanger ENC service,
Status ENC coverage and IMO regulations development**

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**PRIMAR Stavanger
International ENC Service**



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What is an Electronic Navigational Chart (ENC) - a brief recap

Electronic Navigational Chart (ENC)



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- ENCs are produced in accordance with IHO S 57 and meets the definition of a “Nautical Chart” as defined in **SOLAS V Reg 2**, being **issued officially by or on the authority of** a Government Hydrographic Office and designed to meet the requirements of marine navigation.



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Primar Stavanger - a Regional ENC Coordinating Centre (RENC) and a cooperation framework

Principle purpose of RENCs



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- **Ensure consistency in ENC's from different Hydrographic Offices (HO's), also through RENC-RENC co-operation**
- **Ensure that co-operating HO's (actually the States) meets the obligations of IMO SOLAS V and IHO WEND**

WEND



- International Hydrographic Organization (IHO) established the **Worldwide Electronic Navigational chart Database (WEND)** principles in 1994
- Here, member nations are recommended to cooperate on regional and international level **to ensure the greatest possible uniformity and quality** of a global ENC service.

Obligations under SOLAS



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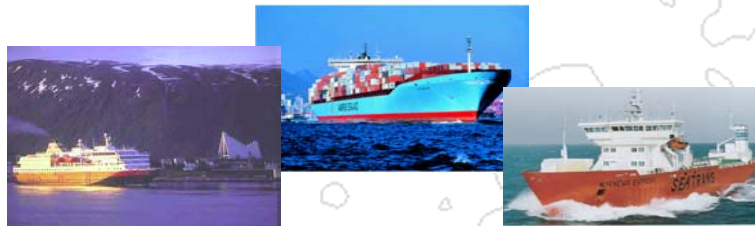
IMO's SOLAS V Reg.9 Paragraph 3: “*Contracting Governments undertake to **ensure the greatest possible uniformity** in charts and nautical publications*”

IMO's SOLAS V Reg.9 Paragraph 4: “*Contracting Government undertake to **co-ordinate** their activities to the greatest possible degree in order to **ensure that hydrographic and nautical information is made available on a world-wide** scale as timely, reliably, and unambiguously as possible*”

Primar Stavanger International ENC Service



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Distributors [30]

Running services

Manage and operate
the ENC service



ECC AS
100%
State owned

Service
agreement

**Norwegian
Hydrographic
Service**



ic-enc

Take delivery of ENCs

Bilateral agreements





Primar Stavanger have ENC's from the following countries in the service:

The Cooperating Hydrographic Offices (CHOs):

- **Denmark**
- **Estonia**
- **Finland**
- **France**
- **Greece**
- **Latvia**
- **Norway**
- **Poland**
- **Russia**
- **Sweden**



NHS is appointed as a Value Added Reseller (VAR) of the IC-ENC Community:

- **Belgium**
- **Germany**
- **India**
- **Netherlands**
- **Portugal**
- **South Africa**
- **Spain**
- **United Kingdom**



Primar Stavanger is also delivering ENC's from other nations:

- **Singapore**
- (S-Korea, Japan, Croatia, USA, Italy, ...)

Our core aim



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To provide the maritime community, through authorised distributors, with an ENC service recognised for its quality, user-friendliness and overall contribution to marine safety and efficiency on a global level.

PRIMAR Stavanger - Important Service Developments



Trend towards increasing demand for official ENC Service functionalities at National Maritime Authorities:

- Coastal Directorate (NO) Pilot Services
- Maritime Directorate/Port State Control Authorities
- Search and Rescue Services
- Other (?)



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ECDIS AS A SAFETY ENHANCER - CONDITIONS

- **The ENC must provide a satisfactory coverage and be of a satisfactory quality**
- ENC and their updates (ERs) must be consistent on a global basis
- ENC service(s) must be user-friendly and globally available
- Users must have a thorough knowledge of ENC and ECDIS, including limitations and possibilities
-



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Global ENC Coverage

Status

IHO Chart Catalogue



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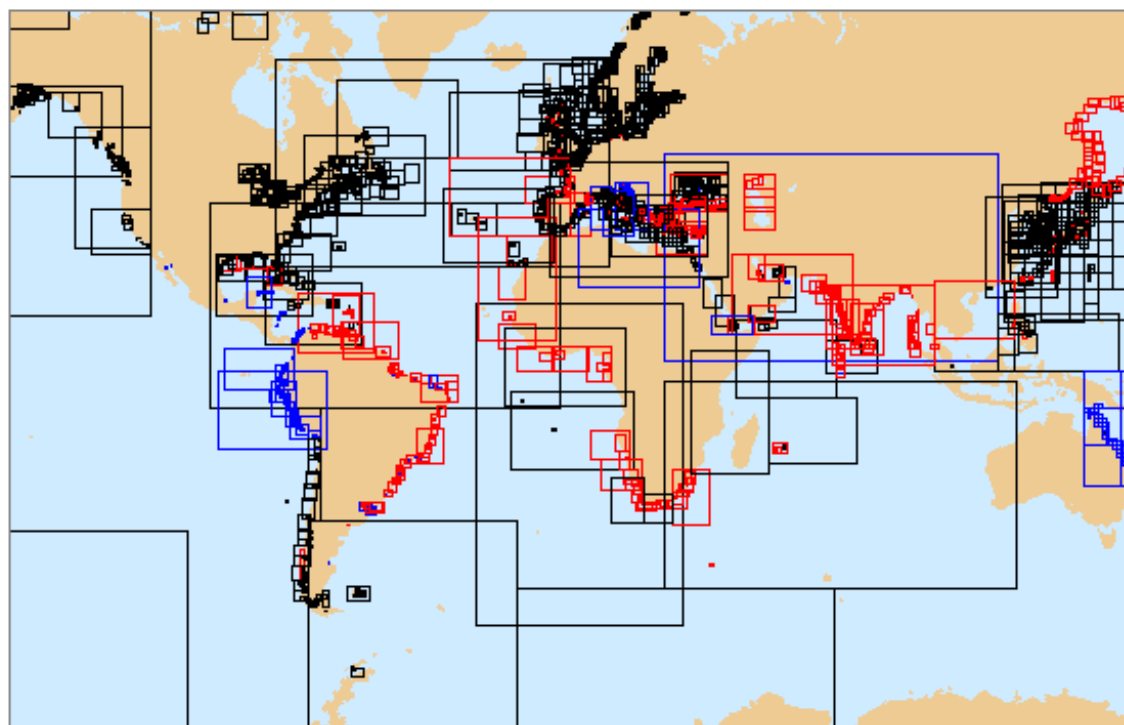


IHO GLOBAL ENC CATALOGUE

The IHO ENC Catalogue displays the global availability of ENC information. Colour codes are used to show the ENC status. The ENC information will continuously be maintained by the Hydrographic Offices or the RENCs.

It is possible to zoom and pan using the buttons below the chart. Further information about an ENC can be obtained by selecting the I (Information) button and clicking on an ENC.

It is also possible to download the ENC catalogue information from [here](#) as a comma separated file.



Layers

Graticule

Usage Bands

- Overview
- General
- Coastal
- Approach
- Harbour
- Berthing

Release Status

- Commercially available
- In production or planned for production
- Completed (issued), but not commercially marketed

Update

Created by
Electronic Chart
Centre AS



Primar Chart Catalogue 3.0

- ENC folio planning, management, on-line ordering and delivery -



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The screenshot displays the Primar Chart Catalogue 3.0 application. The main window shows a map of Europe with various ENC folios highlighted in different colors (green, orange, blue). A 'Quotation' dialog box is open, displaying distributor and customer information, and a table of products with their respective prices and discounts.

Quotation

Distributor: Primar Stavanger demo
Distributor discount group: ALL 100%

Customer: Quotation use
Vessel name: Quotation use

Elements

Product	Subscription type	Price band	Permit end date	Amount	Price	Discount	Total
ENC	12 months	Large	Mar 10, 2006	76	1530.00	1530.00	0.00
ENC	12 months	Medium	Mar 10, 2006	44	466.00	466.00	0.00
ENC	12 months	Small	Mar 10, 2006	380	1690.00	1690.00	0.00
ENC unit	12 months		Mar 10, 2006	37	585.00	585.00	0.00
Sum:					4271.00	4271.00	0.00



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IMO Regulations Development

IMO Regulations Development



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Based on instructions from IMO Maritime Safety Committee, IMO Sub Committee on Navigation decided at its 50th session (NAV 50) to establish a Correspondance Group (CG) on ECDIS to consider amongst others possibilities for the implementation of a phased mandatory carriage requirement for ECDIS for certain classes of vessel



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IMO Regulations Development

Proposals from the CG to NAV 51 (June 05) includes amongst others to

- consider **amendments to SOLAS Ch.V Regulation 19** in Annex I to **implement a phased mandatory carriage requirement for ECDIS**
- consider amendments to HSC Code 13 in Annex II to implement a phased mandatory carriage requirement for ECDIS
- support the IHO initiative to establish a comprehensive on-line catalogue of available official charts
- invite coastal Member States to consider which paper charts would meet the “appropriate portfolio of paper charts” in waters under its jurisdiction and where ENC’s do not exist

ECDIS required for Norwegian high-speed crafts from January 2006



The Norwegian Maritime Directorate has announced that Norway has decided to make the use of ECDIS mandatory on all high-speed passenger crafts along the Norwegian coast.

This requirement will come into force from January 2006 south of the Arctic Circle and from 2008 north of the Arctic Circle (Source: NMD and *Navigare* 01/2005)



Sjøfartsdirektoratet
Norwegian Maritime Directorate

