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CIRCULAR LETTER 71/2004 2 November 2004

WEND ISSUES

1) IHB Circular Letter 42/2004 dated 29 June 2004.

2) Decision No 17a of the 16th International Hydrographic Conference, 15-19 April 2002, Monaco.

Dear Hydrographer,

References:

This letter progresses several Worldwide Electronic Navigational Chart Database (WEND) Committee action items. It informs Member States of completed actions, provides status of ongoing actions and requests information to assist WEND in assessing the status of ENC production, consistency and distribution.

WEND Membership and Officers

Circular Letter 42/2004 requested confirmation of Member States' membership and solicited nominations for the position of Chairman and Vice Chairman. The IHB thanks all 38 Member States who responded. Annex A contains the latest membership list. Captain Roger PARSONS (USA) has volunteered to serve as Chairman and CAPTAIN Abri KAMFER (South Africa) has volunteered to serve as Vice Chairman. These Officers will be confirmed at the 9th WEND Meeting, 7-8 April 2005 in Monaco.

Quality Management Practices

The WEND principle 4.1 states,

"A recognized standard of quality management (e.g. ISO 9000) should be employed to ensure a high quality of the ENC services."

Additionally, Task T4.2.4 of the IHO Work Programme instructs the IHB to "Monitor and inform Member States about developments in quality management, and encourage quality management accreditation (ISO 9000), to strengthen the position of hydrographic offices as quality service providers."

Several Member States' Hydrographic Offices have achieved this distinction of quality management and others are in the process of acquiring this certification. The questionnaire at Annex B is intended to better assess the status of quality management implementation among the Member States and to provide points of contact for advice and assistance to those Member States seeking to implement quality management practices. You are kindly requested to complete the Questionnaire at Annex B and return it to IHB by 30 January 2005.

High Level Briefing Paper

WEND 8 (Tokyo, March 2004) recommended the IHB prepare a suitable briefing paper on the benefits of using ENC / ECDIS, aimed at high level government officials, for use by HOs as necessary. This briefing paper is provided in Annex C. HOs may edit and use it as they see fit. Your comments on its content and usability are welcomed.

WEND Rules of Procedure for Observers

All 38 Member States that responded to CL 42/2004 regarding the adoption of an additional WEND Rule of Procedure approved the inclusion of observers at WEND meetings. The WEND ROP have been amended to include:

"2.2 The Committee may invite accredited international NGOs and professional associations to participate as observers to Committee meetings."

Updated Terms of Reference for WEND are provided at Annex D.

ECDIS Certification and Type Approval Testing

At WEND/8, France noted that several important features are not included in the IHO Special Publication S-64, *IHO Test Data Set for ECDIS* and therefore not tested during type approval. France was requested to provide additional information to the IHB for referral to CHRIS as a potential work item. France has responded to the IHB, noting specific items that are not included in the Test Data Set. Additionally, France proposed the investigation and adoption of a different approach to quality assurance of ECDIS software. This matter has been referred to CHRIS for comment and inclusion in its work program, as appropriate.

ENC Production, Consistency and Distribution

The WEND Task Group has requested Chairmen of Regional Hydrographic Commissions to provide a status report on ENC production, consistency and distribution within their region. Key issues that were identified in the request were the development of a small scale schema with producer nation responsibilities for their region, a method for ensuring cross boundary consistency of ENC amongst the countries of their region and a method of ensuring user-friendly distribution services for ENC of their region. The WEND Task Group will meet in the near future to, among other items, analyze the responses to date from the Regional Hydrographic Commissions.

On behalf of the Directing Committee Yours sincerely,

Rear Admiral Kenneth BARBOR Director

Encl: Annex A -

- WEND Membership List
- Annex B Response Form Implementation of Quality Management for ENC Production
- Annex C High Level Briefing Paper The Importance of Being ECDIS
- Annex D WEND Terms of Reference

Annex A

WEND MEMBERSHIP

(November 2004)

*** = Chairman

** = Vice-Chairman * = Secretary

Member State	Name	E-mail
Algeria	Head of Nautical Charts Department	shfn@shfn.dz
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Australia	Capt. Bruce KAFER** (till 21 Dec 04) Capt. Rod NAIRN (from 22 Dec 04)	Bruce.Kafer@defence.gov.au International.relations@hydro.gov.au
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South Africa	Capt. Abri KAMPFER** (from 22 Dec 2004)	hydrosan@iafrica.com

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Annex B

No

Implementation of Quality Management for ENC Production

(To be returned to the IHB by 30 January 2005 E-mail: info@ihb.mc - Fax: +377 93 10 81 40)

Member State:

1. Is your Hydrographic Office certified as implementing a quality management system?

Yes

No, but progressing towards

- 2. If yes,
 - a. To what standard are you certified (i.e. ISO 9001:2000)?
 - b. What certification authority awarded your certificate (e.g. Det Norske Veritas)?
 - c. What is the scope of your certificate (i.e. All processes and services related to provision of maritime geographic information to enhance safety of navigation)?
 - d. Contact information for a Point of Contact available to provide advice to other Hydrographic Offices seeking certification.
- 3. If progressing towards,
 - a. What standard(s) are you using (i.e. ISO 9001:2000)?
 - b. What is the scope of your activities for which you are seeking certification (e.g. All processes and services or a subset of your processes and activities)?
 - c. What percentage have you completed and when do you expect to seek certification?
 - d. Are there areas of implementation where you need assistance and if so what specific assistance do you need?
- 4. If no,
 - a. Do you intend to implement a quality management system?
 - b. Do you need assistance in making this decision or beginning this process?

The Importance of Being ECDIS

What is ECDIS?

Electronic Chart Display and Information System (ECDIS) is a hardware and software suite that displays navigation information. An ECDIS must meet performance standards specified by the International Maritime Organization (IMO) and has received type approval certification endorsed by a Maritime Safety Administration as complying with performance tests prescribed by the International Electrotechnical Commission (IEC). Integral to the ECDIS is the Electronic Navigational Chart (ENC). An ENC is digital database of navigational information compiled for display on an ECDIS. An ENC is issued by, or on the authority of, a Government authorized hydrographic office or other relevant government institution. The content, structure and format of an ENC are specified by the International Hydrographic Organization (IHO). The IMO has recognized that ECDIS meets the carriage requirements for nautical charts under the Convention for Safety of Life at Sea (SOLAS, 2002) and can therefore replace the paper nautical chart for planning, executing and monitoring the intended voyage of a vessel. The implications of the SOLAS regulations are far ranging.

Why is ECDIS Important?

On the one hand, the efficiency of maritime operations is greatly enhanced. No longer must the navigator laboriously wade through Notices to Mariners, extracting pertinent changes and annotating those changes on a paper chart. Within the ECDIS, changes to the ENC are compiled and displayed through routine electronic changes received via e-mail, internet or on electronic media. For voyage planning, the necessary portfolio of charts at the appropriate scale is quite literally at the navigator's fingertips from the ECDIS console. Additional information such as tide tables, list of lights, and sailing directions are similarly retrievable from the ECDIS console. During the voyage, the vessel's position is continuously plotted and logged, along with other information the mariner may wish to enter manually or automatically. When ECDIS is used, the savings in manpower are significant.

More importantly, safety of navigation is fundamentally improved. ECDIS integrates realtime, accurate positioning on the chart display. The mariner's attention is no longer focused on obtaining and plotting the vessel's position but on evaluating the current situation and determining future actions. Because the ENC database is "smart" – in that it can be interrogated for additional information, integrated with other parameters and set to respond to thresholds set by the mariner, the ECDIS can warn of dangers or indicate planned manoeuvres along the projected path of the vessel. Integration of RADAR displays and Automatic Identification Systems within the ECDIS display further contributes to safety of navigation and particularly collision avoidance.

The cumulative effect of the improvements in maritime efficiency and safety of navigation reduce shipping and insurance costs. They also contribute to the protection of the marine environment through fewer maritime collisions and groundings with the associated catastrophic damages to the ecosystem. Safe and efficient maritime operations are intrinsically linked to sustainable development in both developed and developing countries.

Why is ECDIS a Concern of the Government?

While the software and hardware associated with ECDIS are developed by private industry, the critical data it needs to function – the ENC – is the product and responsibility of the Coastal State. SOLAS obliges the Coastal State to provide and keep up-to-date all nautical information necessary for safe navigation. The data collection, the production of nautical information and the keeping of this information up-to-date may be delegated to a third party, but it is explicitly the obligation and responsibility of the Coastal State. At a minimum, a Coastal State should have the ability to ensure the quality of the nautical information provided by a third party and coordinate maritime activities within its waters to assess the adequacy and currency of its nautical information. Most Coastal States have established hydrographic offices to assess requirements, collect data, produce and keep up-to-date nautical information, and disseminate nautical products.

Where can a Coastal State get Assistance?

The International Hydrographic Organization (IHO) is an intergovernmental organization of a consultative and technical nature comprising over 70 Member States represented by their respective national hydrographic offices. IHO objectives include the coordination of national hydrographic offices activities, standardization of nautical charts and publications, and the adoption of reliable and efficient methods to conduct hydrographic surveys, all aiming to contribute to safety of navigation and the protection of the marine environment. The IHO endorses training opportunities and champions capacity building projects. IHO Member States are prepared to assist through bilateral arrangements or regional initiatives.

WORLD-WIDE ELECTRONIC NAVIGATIONAL CHART DATABASE (WEND) COMMITTEE

TERMS OF REFERENCE

Objective:

To promote the establishment of a World-wide Electronic Navigational Chart Database (WEND) suitable for the needs of international shipping.

1. Terms of Reference

- 1.1 To provide a forum for the coordination of the activities of Member States in achieving the objective.
- 1.2 To harmonize the policies of regional ENC Coordinating Centres (RENC) with respect to matters related to administration, legality, finances, technical processes, etc.
- 1.3 To take account of the Terms of Reference of, and consult with, other IHO bodies as appropriate, particularly CHRIS.
- 1.4 To report to Member States annually through Circular Letter and make a report to the ordinary sessions of the International Hydrographic Conference.

2. Rules of Procedure

- 2.1 The Committee is composed of representatives duly authorized by Member States and an IHB Director will attend WEND Meetings.
- 2.2 The Committee may invite accredited international NGOs and professional associations to participate as observers to Committee meetings.
- 2.3 Meetings shall be held once a year. The venue and date will be announced at least three months in advance.
- 2.4 The Committee Members will elect the Chairman and the Vice-Chairman of the Committee at its first meeting following each ordinary session of the International Hydrographic Conference.
- 2.5 Recommendations of the Committee will be submitted to the IHO Member States for adoption through the Directing Committee.
- 2.6 The IHB will serve as the Secretariat for the WEND Committee.

Reference: IHB Circular Letter 71/2004 dated 2 November 2004