

International Taskforce



Port Call Optimization

Who is International Taskforce Port Call Optimization?

The Taskforce:

- Started in January 2014
- Comprises subject matter experts with hands on expertise in shipping, ports and standards
- Works together with Non-Governmental Organizations to make submissions to robust standardization bodies to improve and formalize existing industry practices
- Works together with other port call optimization initiatives
- As a neutral body, consults but does not promote solution providers



Why did we start?

Initiator:

- Request from shipping to improve port call data quality and availability to IHMA

Followed by:

- IMO MEPC.323(74): call for action to improve quality and availability of data in ship-port interface



RESOLUTION MEPC.323(74)
(adopted on 17 May 2019)

**INVITATION TO MEMBER STATES TO ENCOURAGE VOLUNTARY COOPERATION
BETWEEN THE PORT AND SHIPPING SECTORS TO CONTRIBUTE TO REDUCING
GHG EMISSIONS FROM SHIPS**

THE MARINE ENVIRONMENT PROTECTION COMMITTEE,

RECALLING Article 38(a) of the Convention on the International Maritime Organization concerning the functions of the Marine Environment Protection Committee conferred upon it by international conventions for the prevention and control of marine pollution from ships,

HAVING ADOPTED resolution MEPC.304(72) on the *Initial IMO Strategy on reduction of GHG emissions from ships* (hereinafter the Initial Strategy),

NOTING that the Initial Strategy calls for the encouragement of port developments and activities globally to facilitate reduction of GHG emissions from shipping, including provision of ship and shoreside/onshore power supply from renewable sources, infrastructure to support supply of alternative low-carbon and zero-carbon fuels, and to further optimize the logistic chain and its planning, including ports,

Why is port call data important?

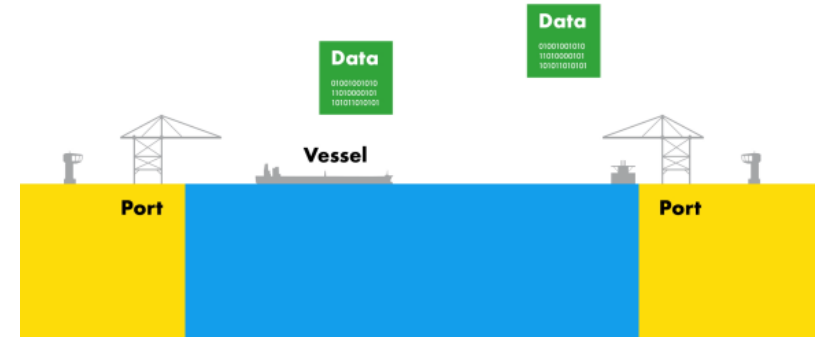
- To improve safety, security and environmental performance to address financial concerns, and encourage innovation and efficiency (IMO)
- Most cost-efficient way to do it, to ensure global outreach



What is the scope of port call data?

Focus: movement of the vessel:

- Realizing safe and sustainable berth to berth navigation
- Important for shipping, shippers, terminals and ports



Related: movement of the vessel's cargo:

- Realizing reliable and sustainable end to end supply chain
- Important for shippers



Why is the data owner important?

- Port call data from data owner is up to date and validated during daily operations
- Data owner for berth approaches (depths, pilot boarding time) is from port planner
- Data owner for berths (depths, berthing time) is from berth planner



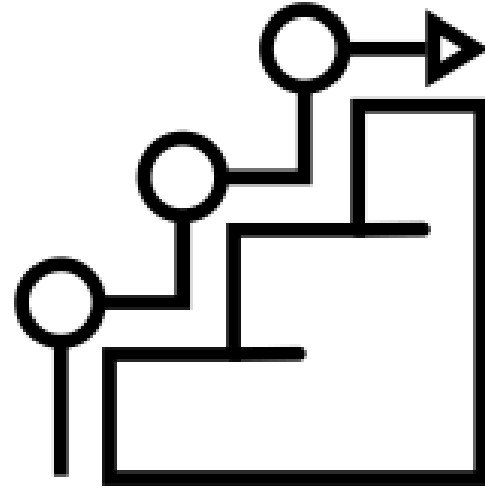
Why is a global approach important?

- Data owners like to share data one to many globally, to minimize administrative burden, errors and delays in updates
- Ports sharing data one to many: they can receive up to 98.000 (2) different ships
- Shipping sharing data one to many: they operate in a global network of up to 8.000 (1) different ports



Why is a step-by-step implementation important?

- Many ports and terminals use national / local / company standards for many years; switching over to international standards cannot happen overnight
- A first step is to have the data in international standards, but the information in local standards
- Again: a small step is already a big effort!



For a global approach, we need a strong and global road map

- 1) Agree on business process of port calls
- 2) Agree on minimum scope of data
- 3) Agree on robust standardization bodies
- 4) Agree on non-technical standards
- 5) Agree on technical standards
- 6) Develop incentives for data owners
- 7) Develop guidance for data owners
- 8) Implementation



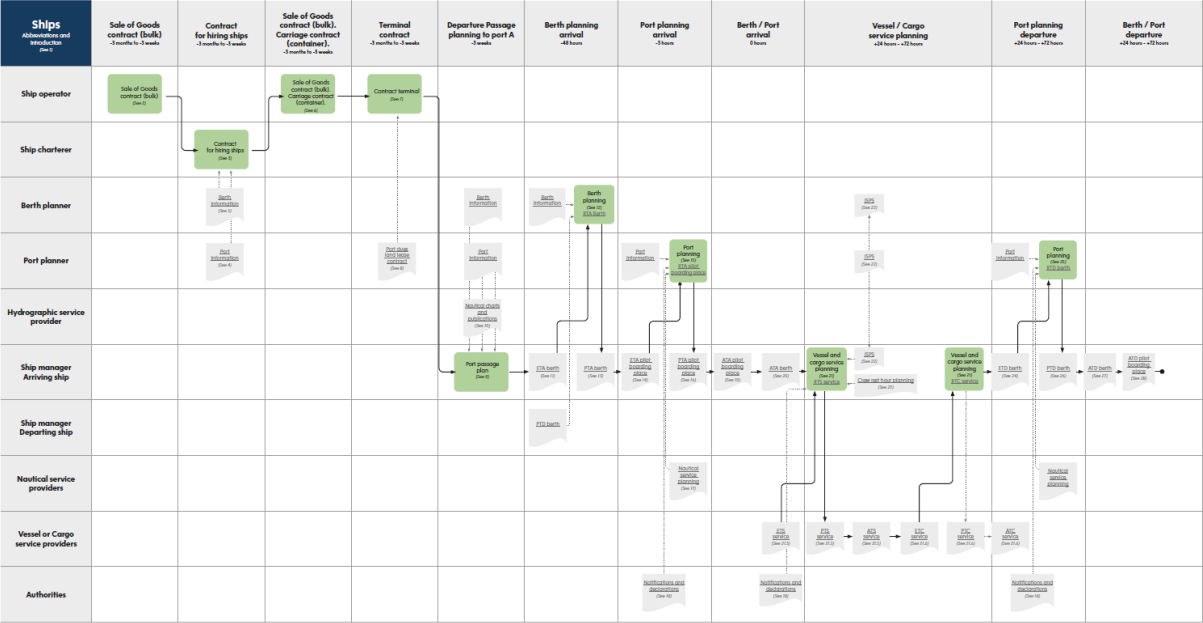
Road map Port Call Optimization

- 1) **Agree on business process of port calls**
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1) Agree on business process of port calls

Accomplishments: port and trade agnostic business process and appendix; identification of data ownership

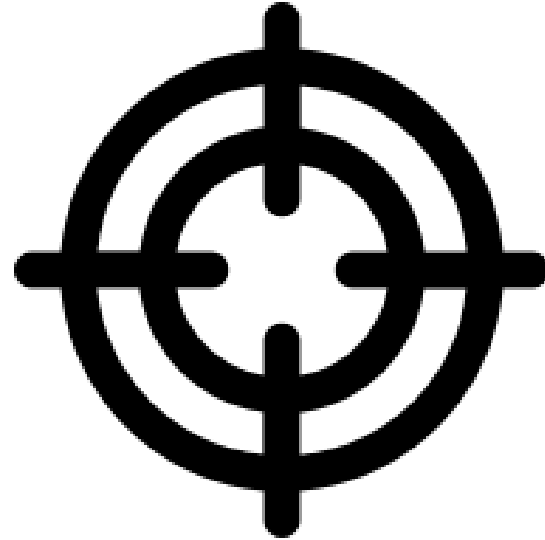


Appendix to Port Call Process
Last update July 18 2022



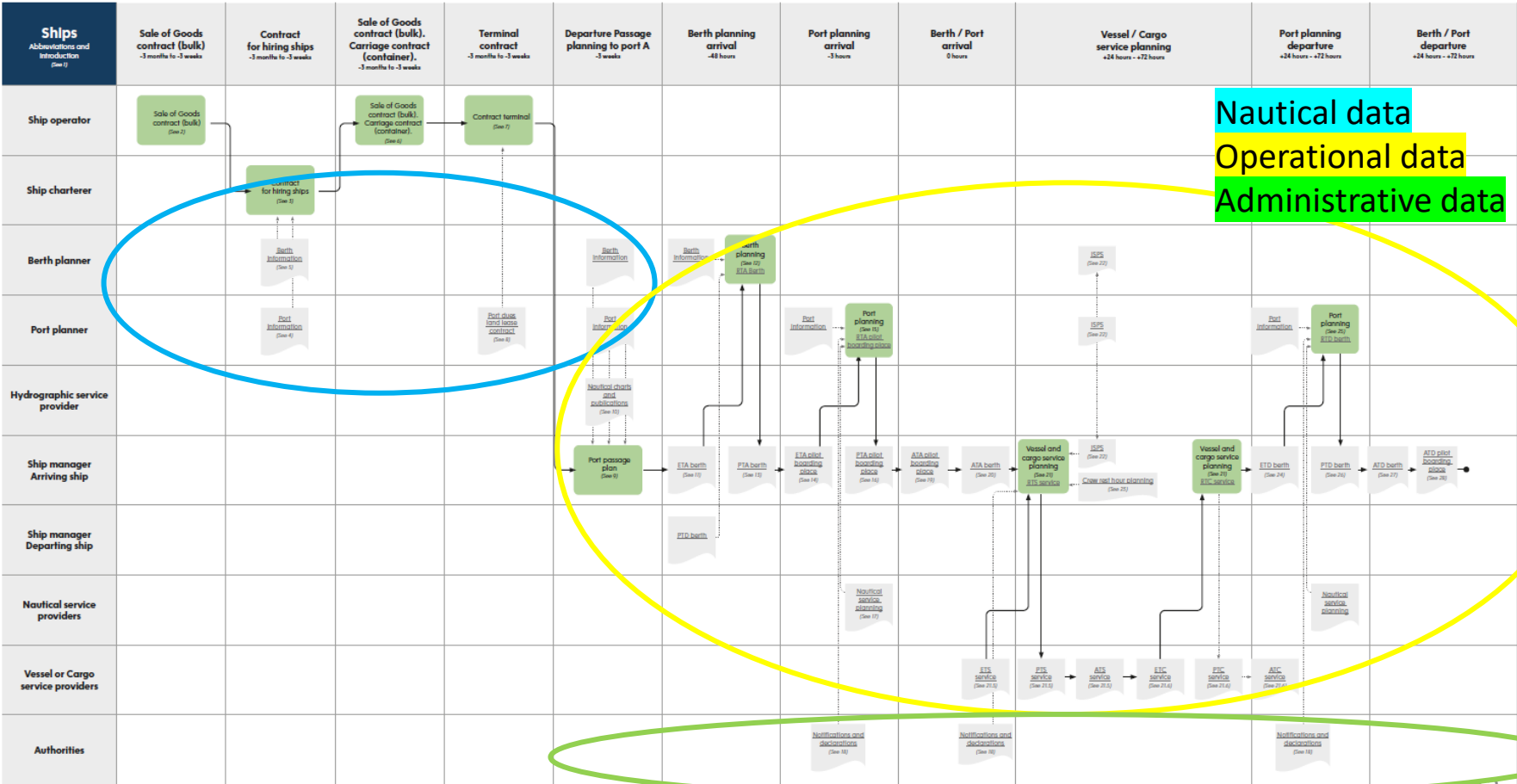
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2) Agree on minimum scope of data

Accomplishments: identified data sets based on IMO resolutions and BIMCO contracts



2) Agree on minimum scope of data

Accomplishments: identified data sets – IMO FAL 46/5/1

Nautical data

- Data that are provided by hydrographic offices or similar service provider that is used in safe navigation

Operational data

- Data that are submitted to non-authority parties as part of planning or execution of certain operations

Administrative data

- Data that are submitted by ships or other non-authority parties to authorities based on legislation or regulations

2) Agree on minimum scope of data

Accomplishments: identified data elements within data sets

Nautical data

- Terminal
- Berth

Operational data

- PTA PBP
- PTD Berth

Administrative data

- Not in scope

2) Agree on minimum scope of data

Accomplishments: rationale based on being compliant with IMO (most ports are public ports governed by Member States)

Nautical data

- To be compliant with IMO Resolutions A.893(21) and A.862(20)

Operational data

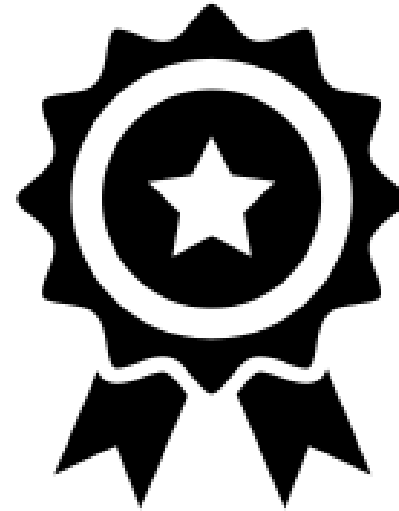
- To be compliant with IMO MEPC.304(72) and MLC

Administrative data

- NA

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3) Agree on robust standardization bodies

Accomplishments: selection for non-technical standards (are we talking about the same object)

Nautical data



- From the start assigned to set standards for nautical publications
- Being robust party for both shipping and ports; has 93 Member States

Operational data



- Time stamps serve both administrative and operational data, it is common sense to develop them under the same body and build on existing work

Administrative data



- From the start assigned to set standards for notifications and declarations
- Being robust party for both shipping and ports; has 174 Member States

3) Agree on robust standardization bodies

Accomplishments: selection for technical standards (API specifications, technical/business performance specs)

Nautical data



- From the start assigned to set standards for nautical charts and publications

Operational data



- Time stamps serve both administrative and operational data; it is common sense to develop them under the same body and build on existing work

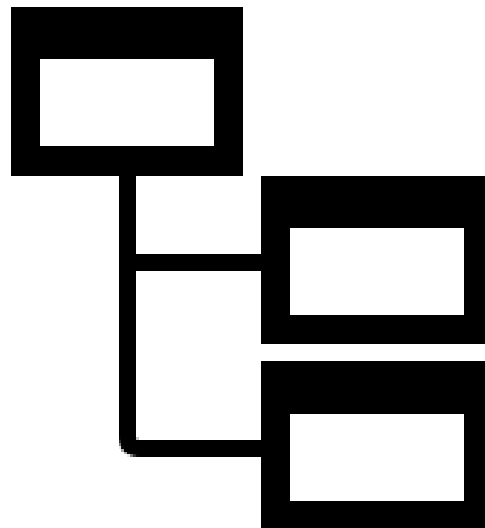
Administrative data



- ISO 28005-2 is the data model for the FAL Convention, aligned with IMO Model

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4) Agree on non-technical standards (are we talking about the same object)

Accomplishments

Nautical data

All defined in IHO Registry:

- Maintained depths
- Berth, berth position, berth types, berth pocket
- Static/Dynamic draught
- Static/Dynamic under keel clearance
- Breasting/mooring dolphins
- Sea passage, Port passage
- Port passage Planning Area
- Waiting Area
- Fender line as berth geo data

Operational data

All defined in IMO FAL:

- Arrival/Departure times
- Starting/completion times

Administrative data

NA

Harmonization between IMO and IHO on data elements that have both geospatial and operational interest
IHO and IALA already harmonize

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5) Agree on technical standards (API specifications, technical/business performance specs)

Accomplishments

Nautical data

- Given limited number of parties: JSON is good for now
- Format ready for IHO Testbed

Operational data

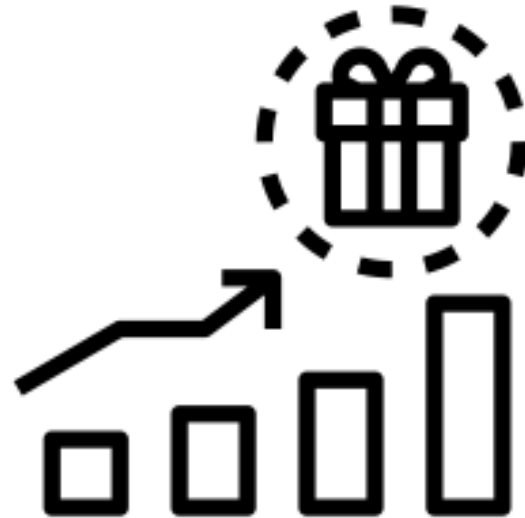
- Given limited number of parties: JSON is good for now
- Format ready for IHO Testbed

Administrative data

- Not part of ITPCO

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6) Develop incentives for data owners

Accomplishments

Nautical data

- Submission of IMO FAL 50/17

Operational data

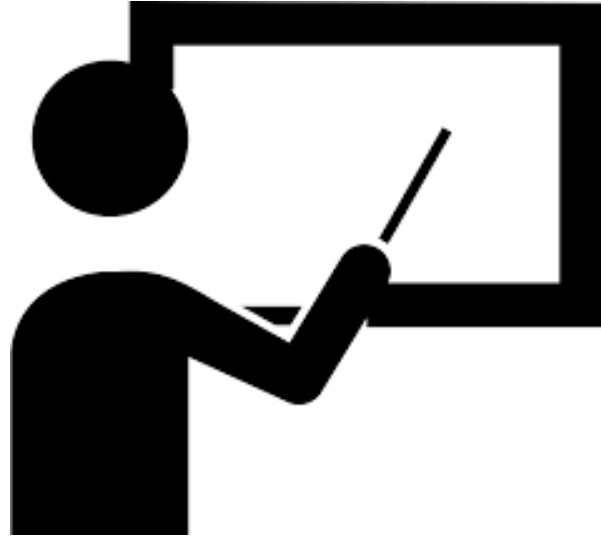
- Follow IMO FAL 51/XX

Administrative data

- NA

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- 7) **Develop guidance for data owners**
- 8) Implementation



7) Develop guidance for data owners

Accomplishments

Nautical data

- Port Information Manual 3.02
- Guide for Nautical Data
Completed IHO NIPWG
- PCO Guide completed 01/04/26

Operational data

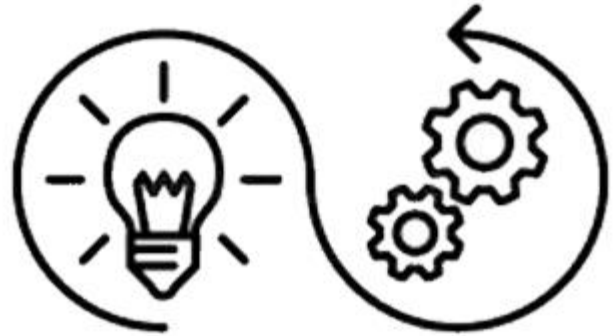
- Port Information Manual 3.02
- Guide for Operational Data
Completed IMO FAL 47
- PCO Guide completed 01/04/26

Administrative data

- NA

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- 8) **Implementation**



8) Implementation

Accomplishments

Nautical data

- Port depths and water levels in Rotterdam
- Terminal, Berth, Berth position in Rotterdam
- First ENC published with terminal API

Operational data

- JIT Arrivals in Tanger Med
- Implementation in Rotterdam with container terminals
- Implementation in Gothenburg with tank terminals

Administrative data

- NA

Thank you for your attention

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