

Acceptance and Integration within the Larger Ecosystem



DockTech

DockTech's Vision

Data Science

Maritime ops

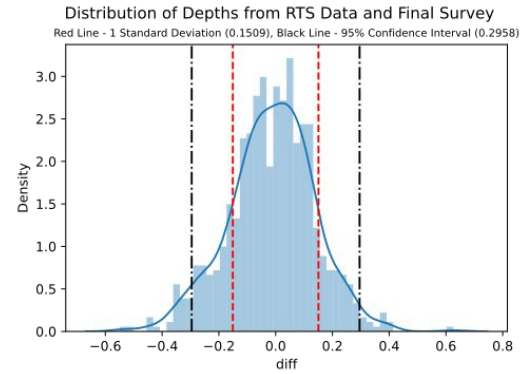
Hydrography



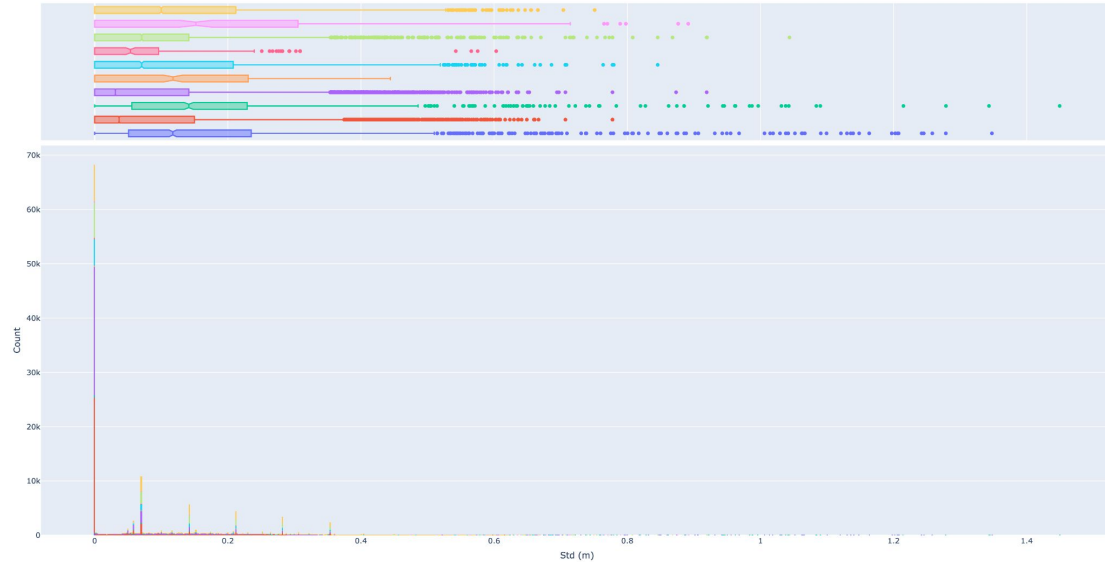
DockTech

Data Validation

DockTech has developed its own data validation pipeline and Deep-Dive Report to best estimate quality of the data on a port-by-port basis.

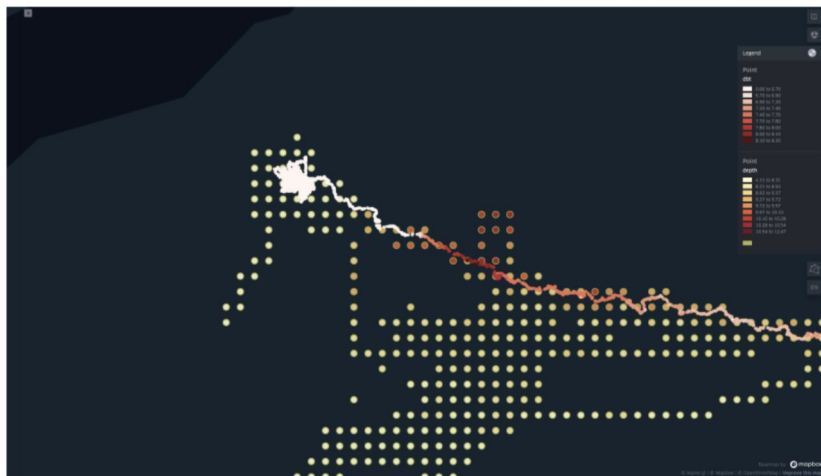
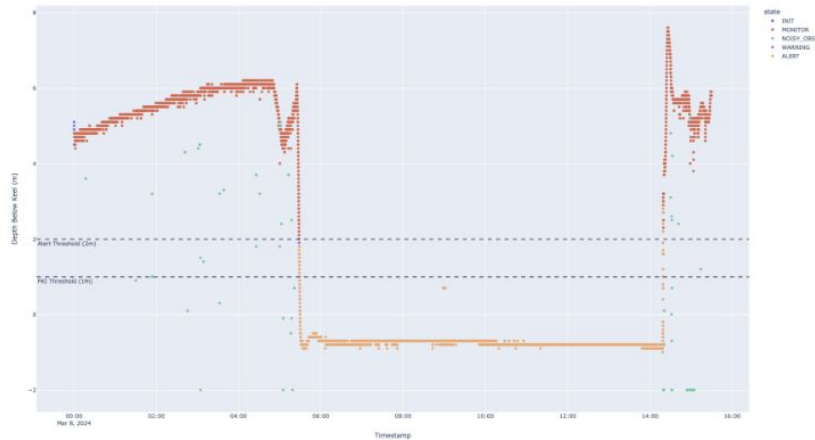


Top: Accuracy - Difference between RTS (Real-Time Surface) Data and MBES from Case Study
Bottom: Precision - Evaluation of cell-based standard deviation per vessel (Dif. case study)



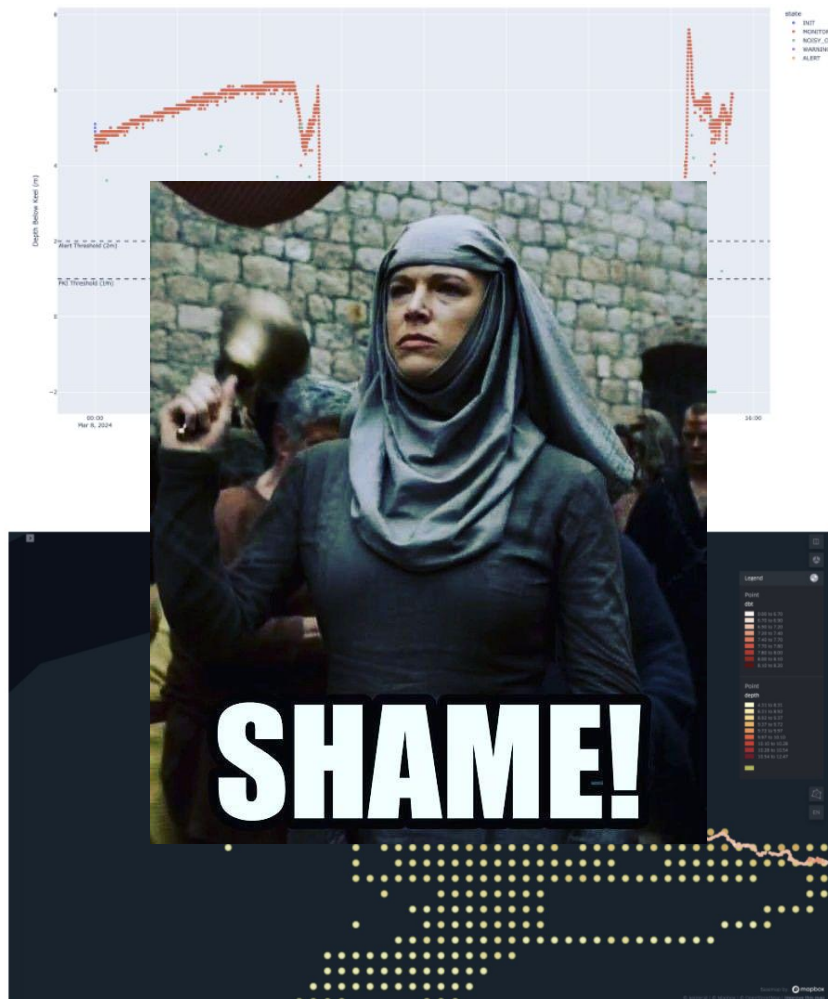
If we build it, Will they come?

Several use-cases where we used CSB data to understand a grounding incident, but the data wasn't even looked at because it wasn't MBES.



If we build it, Will they come?

Several use-cases where we used CSB data to understand a grounding incident, but the data wasn't even looked at because it wasn't MBES.









The path forward

What are the roadblocks to getting CSB data to be used in real-life scenarios?

What are the varying degrees of integration?

Could we detach Coverage from TPU?

ZOC	ZOC Symbol	Position Accuracy	Depth Accuracy	Seafloor Coverage
A1		$\pm 5 \text{ m} + 5\% \text{ depth}$	$0.50 + 1\%d$	Full area search undertaken. Significant seafloor features detected ⁴ and depths measured.
A2		$\pm 20 \text{ m}$	$= 1.00 + 2\%d$	Full area search undertaken. Significant seafloor features detected ⁴ and depths measured
B		$\pm 50 \text{ m}$	$= 1.00 + 2\%d$	Full seafloor coverage not achieved; uncharted features, hazardous to surface navigation are not expected but may exist.
C		$\pm 500 \text{ m}$	$= 2.00 + 5\%d$	Full seafloor coverage not achieved, depth anomalies may be expected
D		Worse than ZOC C		Full seafloor coverage not achieved, large depth anomalies may be expected.
U		Unassessed - The quality of the bathymetric data has yet to be assessed		

INF to the HSSC

DockTech was invited to write an INF (Information Document) for the Hydrographic Services and Standards Committee (IHO HSSC).

We want to use this opportunity to advocate for legitimate ways CSB can/should be used in industry.

HSSC16-INF xx.xx

Paper for Consideration by HSSC16

Document header

Submitted by:

Executive Summary:

Related Documents:

Related Projects:

Introduction/Background

A short statement of the current S-100 standard situation and mention few of the current CSB Solutions (including DockTech's AI-Centric Solution).

Analyses/Discussion

Brief description of the service and the benefits it offers

Recommendations

xxxxxxxxxxxx

Justifications and impacts

A short explanation is that the S-100 products are kind of static products, although they provide some products in real time.

Conclusion

Statement that such developments are enhancing the potential of the S-100 world.

Action required of HSSC16:

The HSSC16 is invited to:

- a. Take note of the paper.
- b. Invite DockTech to provide annual updates of areas where the service is established.

INF to the HSSC

Questions for the WG:

1. General thoughts re: INF to the HSSC?
2. Specific points to mention to stress the importance of the recognition of CSB data?
3. Are there similar actions DockTech/WG can do to move in the direction of “regulation”?



DockTech

HSSC16-INF xx.xx

Paper for Consideration by HSSC16

Document header

Submitted by:

Executive Summary:

Related Documents:

Related Projects:

Introduction/Background

A short statement of the current S-100 standard situation and mention few of the current CSB Solutions (including DockTech's AI-Centric Solution).

Analyses/Discussion

Brief description of the service and the benefits it offers

Recommendations

xxxxxxxxxxxx

Justifications and impacts

A short explanation is that the S-100 products are kind of static products, although they provide some products in real time.

Conclusion

Statement that such developments are enhancing the potential of the S-100 world.

Action required of HSSC16:

The HSSC16 is invited to:

- a. Take note of the paper.
- b. Invite DockTech to provide annual updates of areas where the service is established.



Shaul Solomon
Chief Data Scientist, DockTech
ShaulS@docktech.net



DockTech

For more info: <http://www.docktech.net/>
[LinkedIn](#) | [Facebook](#) | [MySpace](#)