



Maritime and Port Authority of Singapore Inspector Firdaus Juraini checking the licence of a harbour craft in Singapore waters last month. ST PHOTOS: MARK CHEONG

Turning to tech to keep S'pore waters safe

Zhaki Abdullah

As the maritime sector continues to digitalise, Singapore's port authority is increasingly turning to technology to ensure the security of the Republic's waters.

The Maritime and Port Authority (MPA) has equipped all 49 of its port inspectors with gadgets such as body-worn cameras and tablets.

Port inspectors are responsible for conducting safety and enforcement checks on vessels in Singapore waters, as well as detecting any illegal activity. They also act as first responders to incidents such as oil spills and vessel collisions.

Accompanying MPA port inspector Firdaus Juraini while on duty two weeks ago, The Straits Times observed how tablets could be used to check the speed and location of vessels, as well as instantly confirm whether their documents are valid.

Meanwhile, body-worn cameras help to deter and document threats to port inspectors, while drones give them a bird's-eye view of incidents such as oil spills, said Mr Firdaus, 33, who has been a port inspector for six years.

MPA operations technology director David Foo, 48, said technology acts as a "force multiplier" for port inspectors.

He added that in the future, data analytics and artificial intelligence will be used to better detect anomalies such as unapproved vessels.



Mr Firdaus with a body-worn camera (left) that helps to deter and document threats to port inspectors. Separately, tablets can be used to check the speed and location of vessels, as well as instantly confirm the validity of their documents.



Mr Foo said the MPA is looking to implement 5G as well as electronic navigation to improve connectivity in Singapore's waters.

The MPA said it is planning to replace its existing patrol craft with "more technologically advanced" vessels, which would be better able

to respond to incidents at sea.

"Together with GovTech (Government Technology Agency) and other technology partners, we are also exploring the use of smart glasses to equip our port inspectors with capabilities such as live video streaming to augment their work," said a spokesman.

The MPA did not say how much it was investing in such technology.

At the International Safety@Sea Conference last week, Senior Minister of State for Transport Lam Pin Min noted that the use of technology as well as digitalisation could "further enhance maritime safety by providing seafarers better access to critical safety-related information and early warning of potential incidents".

azhaki@sph.com.sg