

# LET THE VOYAGE BEGIN!

## GALLERY GUIDE



# IT'S TIME TO TAKE A WALK AND EXPLORE THE MANY TREASURES WITHIN THE SINGAPORE MARITIME GALLERY.

## NAVIGATING THE GALLERY



### ZONE 1 THE DAWN OF MARITIME SINGAPORE

Trace our maritime heritage from early travellers' accounts, to evidence of trade excavated from Fort Canning Hill and other significant events that contributed to the dawn of Maritime Singapore.

### ZONE 2 INSIDE MARITIME SINGAPORE

Find out more about Singapore's thriving maritime ecosystem, her strategic maritime interests and position as a Global Hub Port and International Maritime Centre.

### ZONE 3 DISCOVERING NEW HORIZONS

Read up more on maritime-related topics at the resource area as you take in the panoramic window view of the Marina South Pier at work.

### ZONE 4 EXPLORERS' CORNER

Kids can enjoy the exciting boat navigating game, try out the digital maritime cosplay station and craft activities at this dedicated corner.



## SINGAPORE MARITIME GALLERY

# TOP 10 HIGHLIGHTS

Singapore is strategically located along one of the most important waterways in the world, but geography was not the only reason for its success. To be able to act on opportunities and constantly staying innovative were also important factors in shaping Singapore's transformation from a thriving trading post in the 14<sup>th</sup> century, to the premier Global Hub Port and International Maritime Centre that it is today.

Here are 10 highlights to look out for as you explore the Singapore Maritime Gallery on your own.

# 01

## TRACES FROM THE 14<sup>TH</sup> CENTURY



Early writings by the Portuguese mariners and Chinese traders revealed that Singapore was already a flourishing trading post in its pre-colonial days. As early as the 14<sup>th</sup> century, ships laden with silk, tea, porcelain and spices made their way between China, Southeast Asia and the West while passing through Singapore, then known as Temasek.

Traces of assorted ceramics found from excavation sites in Fort Canning Hill also indicated that these earthenware were common household goods used for storage and dining, showing that Singapore had always actively facilitated trade between people in the region.

**How do you think trading and the types of goods traded have evolved over time in Singapore?**



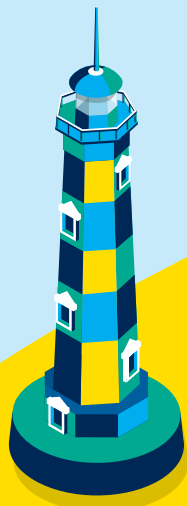


With a powerful beam of light seen as far as 37km away, lighthouses serve as aids of navigation to warn approaching ships of the dangerous rocks and reefs from afar so that they can steer clear and sail safely as they approach the shore.

The Horsburgh Lighthouse was the first lighthouse in Southeast Asia, built in 1851 with donations from mariners and traders. Singapore currently looks after five lighthouses located at key points along the Singapore Strait. They are, from east to west, the Horsburgh, Bedok, Raffles, Sultan Shoal and Pulau Pisang Lighthouses.



**What roles do you think lighthouses play now, with the advent of technology and digitalisation?**



## 03 | MOVE TO CONTAINERISATION



Containers standardised the way goods are carried across the world. Commonly known as TEUs (Twenty-Foot Equivalent Units), containers are easy to move and transfer, which meant goods can be shifted faster and easier.

Seen as a risky and expensive move, Singapore made the bold decision to build Southeast Asia's first container terminal at Tanjong Pagar in 1972 to stay ahead of the competition. The arrival of her first container ship, the MV Nihon, marked the beginning of a new era of shipping for Singapore as trade volumes grew steadily.



**How do you think the decision to build a container terminal benefited Singapore?**



## 04 | SHIP SPOTTER



The invention and rise of coal-burning steamships in the early 19<sup>th</sup> century revolutionised the transport of goods and people by sea. Sailing ships had relied on the wind to travel, but steamships allowed mariners to sail against the wind, which made sea travel more dependable. This had an important impact on cargo shipping and passenger travel.

Today, there are many different types of ships and vessels, each with their own design and purpose.

**Try your hand at the ship spotter to see how these ships differ from one another!**



## 05 | MARITIME SINGAPORE

The maritime industry plays a crucial part in Singapore's growth, with over 80% of global trade carried by sea.

Today, Singapore is one of the busiest ports in the world, with links to 600 ports in over 120 countries. With a complex maritime ecosystem that provides facilities and services beyond the port such as shipping and maritime services, offshore and marine engineering, Maritime Singapore is an integral and vital part of the Singapore economy. The development of Singapore as an International Maritime Centre and Global Hub Port is a development that closely parallels that of Singapore as a hub in the global economy.

**What do you think will happen if we do not have the maritime ecosystem that we have today?**



## 06 | VESSEL TRAFFIC CONTROL



In a world where over 80% of trade is carried by sea, Singapore has one of the busiest sea-lanes in the world, which makes managing vessel traffic very important for both safety and efficiency.

Technology plays a big role in making sure everything runs smoothly. Singapore has two Port Operations Control Centres (POCCs) that use the latest Vessel Traffic Information System (VTIS) to track the movement of vessels in the Singapore Strait and the Port of Singapore. With busy sea-lanes where about 1,000 vessels come and go on a daily basis, the Strait of Singapore is not only important physically, but strategically and economically as well.



**What are some potential threats you can think of that might affect our maritime security?**



## 07 | SUSTAINABLE SHIPPING

As one of the busiest ports in the world, the effects of shipping on Singapore's marine ecosystem is a concern. Before the commencement of land reclamation works for the Next Generation Port (NGP) at Tuas, MPA conducted an Environmental Impact Analysis and embarked on a project to relocate corals from the affected seabed to the Southern Islands, where the re-homed corals continue to grow healthily today.

With the drive towards a cleaner environment, MPA looks to position Singapore as a world leader in providing access to cleaner marine fuels. This includes working with the industry to boost the use of Liquefied Natural Gas (LNG) in building LNG-enabled bunkering vessels, as well as with other international port authorities to build a network of LNG-ready ports around the world. MPA's efforts to promote sustainable shipping can be seen not just in physical infrastructure, but in administrative policies as well.

**What are some other efforts made to ensure that Singapore stays a sustainable and green port?**



## 08 | SHIP HANDLING SIMULATOR



Although this Ship Handling Simulator is designed to be operated by a single person, in real life, most large vessels are manned by a team working in harmony on the bridge of a ship.

The team of officers and seamen manning a ship are collectively called the ship's bridge team. Each member of the team plays a vital role in keeping their vessel safe, and all of them must work together to make sure everything is smooth-sailing for their course.



**Have your friends take on different roles on the Ship Handling Simulator - how is it like working together on the different mission-scenarios?**



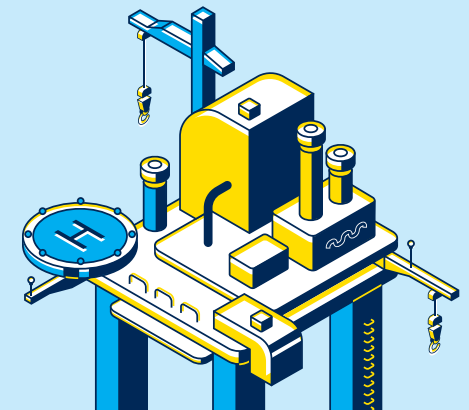
## 09 | SETTING STANDARDS AND ENGINEERING FEATS

As international shipping continues to change, new standards and ship designs continue to emerge. Singapore became the first country to develop and implement standards for bunkering - the process of refuelling a ship - in the 1990s. Since 2017, Singapore made it compulsory for ships to use the Mass Flow Meter System to accurately measure the quantity of fuel being moved. This allowed for greater transparency and accountability, safeguarding the integrity and enhancing Singapore's standing as a trusted hub for bunkering.

Today, Singapore designs and builds Liquefied Natural Gas (LNG) carriers that can safely store and transport LNG. Other Singapore-made marine and offshore engineering structures include icebreakers with heavily-reinforced hulls that can break ice in frozen-over oceans, and huge jack-up rigs that can withstand harsh environment.



**Look at the models of these Singapore-made designs - what thoughts come to your mind?**



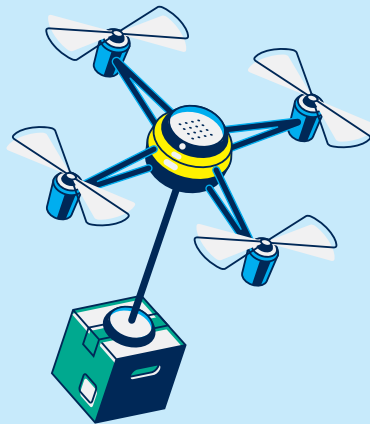


## 10 | SINGAPORE'S NEXT GENERATION PORT

The Next Generation Port (NGP) in Tuas is currently being constructed, and will be a key feature of Maritime Singapore come 2040s, marking a major milestone in Singapore's container terminal development.

Physically, the NGP will consolidate all existing container terminals in Singapore into one single location, increasing its efficiency and ability to handle larger vessels. Technologically, it is planned as an intelligent and green port, integrating lessons from the past with cutting-edge research and development of today. This includes the use of autonomous yard cranes, driverless trucks and intelligent control systems to make the port safe, sustainable and efficient.

**How different and similar do you think the NGP will be, as compared with other port terminals?**



### VISIT US

9am to 6pm ( Tuesdays to Sundays )  
Closed on Mondays (except for public holidays)  
[www.maritimegallery.sg](http://www.maritimegallery.sg)

### CONTACT US

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### LET THE VOYAGE CONTINUE

The Maritime and Port Authority of Singapore (MPA) has a number of fun programmes for you to enjoy, so why not take a look? Scan QR code to find out more.





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