SUSTAINABLE SINGAPORE GALLERY: THE GO-TO LEARNING HUB FOR SUSTAINABILITY IN SINGAPORE

With Singapore’s shift towards combating climate change, the Sustainable Singapore Gallery at Marina Barrage stands out as the place to learn more about sustainability in Singapore.
Global warming has caused the polar ice caps in Antarctica and Greenland to melt, introducing more water into the ocean. The United Nations (UN) has projected that sea levels will rise by up to one metre globally by the end of the century – just 80 years from now – but scientists’ estimates seem to be more dire. Sea levels may rise higher and faster than we expected.

**SINGAPORE’S NEWEST WATER SOURCE & CITY FLOOD CONTROL MECHANISM**

As a low-lying city state, Singapore is vulnerable to the impacts of climate change such as more intense and frequent heavy rainfall.

One of the key measures that Singapore has implemented to prevent flooding in the city area is the construction of the Marina Barrage. The structure serves many purposes, though most Singaporeans would recognise it as the ideal destination for weekend kite-flying.

The Barrage functions as a flood control mechanism for the entire Central Business District (CBD), especially for low-lying areas such as Boat Quay, Chinatown, Little India, Jalan Besar and Geylang. During heavy rain, a series of nine crest gates at the dam are activated to release excess stormwater into the sea when the tide is low. When the tide is high, seven giant pumps from the pump house can drain excess stormwater into the sea. Individually, each pump can empty an Olympic-sized swimming pool in one minute.

However, as we put measures in place to improve flood resilience, we are also battling other issues that come with a changing climate: an increase in daily mean temperatures, rising sea levels, as well as food and water security.

**THE SUSTAINABLE SINGAPORE BLUEPRINT**

Since 2009, the nation has always had a plan for sustainable development, known as the Sustainable Singapore Blueprint (SSB). The SSB maps out strategies for Singapore’s sustainable development, ensuring that the country remains a highly liveable home for all. These goals encompass multiple areas of sustainable development, such as reducing energy consumption, reducing carbon emission, and increasing green spaces.

In 2015, the Ministry of the Environment and Water Resources (MEWR) and the Ministry of National Development (MND) led a review of the SSB to
highlight new targets that they would like to achieve by 2030. It was also announced that the government would commit S$1.5 billion to support the rolling out of programmes and initiatives contained in the SSB 2015 by various government agencies.

Singapore later launched the Sustainable Singapore Movement in 2016, a community movement that the government hopes will galvanise ordinary Singaporeans and encourage them to adopt more “greener” practices, such as using public transport, switching to energy-saving devices, adopting a zero-waste lifestyle and opting to purchase sustainable product alternatives. The movement hopes that Singaporeans can cherish the natural and man-made resources we have, consume less but enjoy more, and practise sustainable habits.

THE SUSTAINABLE SINGAPORE GALLERY

In June 2018, the 1,618 square-metre Sustainable Singapore Gallery (SSG) was re-opened to the public after an upgrade to its format and content. Housed at the second level of Marina Barrage, the SSG presents an overview of Singapore’s commitment to sustainable development. With its informative and interactive displays, the Gallery is the go-to place for anyone to learn about sustainability in Singapore and how they can play a part in the Sustainable Singapore movement. The SSG hosts an average of 500 visitors every day.

The Gallery is divided into six zones, each providing information about a different aspect of sustainability in Singapore.

In Red Dot (Zone A), visitors can learn more about climate change and its impacts on a small but densely populated Singapore. It also provides information about Singapore’s Climate Action Plan, detailing the measures that will be implemented to combat climate change. The interactive games inside this zone will also help visitors learn more about the carbon footprint they are generating and the steps they can take to reduce it.

The second zone, From The First Drop (Zone B) tells the Singapore water story and the actions that we have taken to ensure that our water supply is diverse and resilient. Besides learning more about the sources of our water, visitors also have the opportunity to inspect a replica of the night soil bucket and step inside a life-sized replica of a cross section of the Deep Tunnel Sewerage System to better understand how our sewage management has evolved over the years.
A First World Oasis (Zone C) introduces Singapore as a City in a Garden. The zone showcases the city's various green and blue spaces and encourages everyone to play their part to make Singapore a liveable and endearing home. An interactive multi-touch map shows Singapore's extensive green and blue waterways while two rotoscope features provide fun facts on 5 native species of trees and flowers. Finally, a showcase of our Eco Champions highlights the environmental, water, and nature stewards who help make Singapore a clean, green and sustainable city.

As Singapore moves towards using smart technologies, the City of the Future (Zone D) shows how the nation is powering our way to remain a vibrant, smart and sustainable city. Besides informative panels about the technologies we are using to conserve energy and generate energy from renewable energy sources, visitors can also take a journey on the stationary bicycles in the zone to experience the features of a car-lite Singapore.

In The Journey to Zero (Zone E), visitors can learn more about the efforts Singapore is taking to become a Zero Waste Nation. Other than insightful information about our waste management strategies, visitors can also see a floor display of Singapore’s only landfill, Pulau Semakau, and how much it has already been filled up. The zone showcases a sculpture made from waste materials contributed by pupils of River Valley Primary School, with fun facts about recyclables and good recycling habits.

Finally, Future Tense (Zone F) concludes the gallery visit by inviting visitors to think about how they can make a difference by being a part of the Sustainable Singapore Movement. Visitors can stand in a trick-eye style mural for an Instagrammable photo opportunity or type their pledge for a sustainable Singapore and have it projected on a wall. Visitors can also expect to see a wall mural that summarises the goals that the Sustainable Singapore Blueprint aims to achieve by 2030.
Besides these informative exhibits, the Gallery organises a wide variety of special events and exhibitions over the course of the year, offering many other reasons to visit the Sustainable Singapore Gallery.

In December 2019, the Gallery was transformed into an escape room, inviting players to experience the Gallery in a different way by exploring the Gallery in the dark and finding their way out. In January 2020, the Gallery hosted an Eco-Poetry Night where anyone could get up onstage and share original poems they had written about sustainability or the environment.

A special school programme is also available for students of all ages, ranging from children in kindergartens to students in tertiary institutions. During the school programme, students will be given a guided tour and an interactive game card which they can fill in by exploring the Gallery independently.

TOWARDS A SUSTAINABLE SINGAPORE

The Sustainable Singapore Gallery is but one small part of the whole Sustainable Singapore Movement. With sustainability now at the forefront of the country’s agenda, the Gallery hopes that it can inspire individuals to take that first step on their sustainability journey.

For more information about future events, follow the Sustainable Singapore Gallery’s Instagram at @ssgallery.sg and Facebook at https://www.facebook.com/ssgallery.sg.