## A Glimpse into Floral Fantasy Teacher's Resource (Secondary / Tertiary)

## Programme Information

| Venue | $:$ Floral Fantasy |  |  |
| :--- | :--- | :--- | :--- |
| Suggested | $:$ | Pre-visit Activity <br> On Site Activity <br> Post-visit Activity | -30 mins |
| Duration* |  |  |  |

## Learning Objectives

Students will be able to:

- Appreciate the importance and uses of plants as an artform
- Develop visual inquiry skills, sensory awareness and imagination to discover and explore surroundings
- Use elements of art and principles of design inspired by nature in artistic processes
- Acquire skills to describe and interpret art

Getting Here

*This is a guide to explore Floral Fantasy, with suggested activities that can be completed. Teachers should plan their trips with their students in mind and to adapt or adjust the activities based on the curriculum or objectives of the fieldtrip to Floral Fantasy.

[^0] by the Bay


## An Upside-Down Ralnbow Tapestry

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The Dance of Flowers
Daticate spharical amangamenes made out of 150 Phalosnopsls orchick and baty's treath parform agreis wawe-like dance cbowe you. As you walkunder this dance of fiowers you an surrounded by the biossome of poturias tyor ange as and fuschics cascading fromw ais and pioniers.

## (3) Artists' Corner

A changing platiorn for emenging iccal arises to showoase their work to a larger audience.

## हैFloat

## 4. Trees of Unique Forms

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 palargoniumsond rhodedendrors as among the mon than 2,500 flowering plants of ower 500 spaclos found hare.

## 5 Hanging Floral Chandellers

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6 Explore a Rainforest
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## Poison Dart Frog Vivarium

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## Drift

A Cave of MysteryFallow fiowing rockscapes, beyond a curain of vines..,lock up tose9 the pendulous hanging fronds of gigantic sword tere and staghorn lome, while move than 40 specias of stactaving aroids ilise arehurtums and phiodandrors an nastiadwithin the rodss in this pocket CaNe, ilghes that mimic the rhythmic foding in and out of giow worms csale a fartaskicai scons that drowsyou in, You wit diso ind a colection of more than 50 spscies of arotic South A marican orchidsond 30 specles of begonicas, hipealas and mosms growing on the rock surfocss.

## 4D Ride: Flight of the Dragonfly

Your four menes of sight sound, sngil and touch are triggered asyou are talen on a slmutav djoumay of a dragonflys fight poth through Garders by the Bay, Fight of the Dragerty is conceptualsed and dwe evoped in collaboration with STEngineering.

## Bayfront Gift Shop

Cafe Aster by Far East FioraAt the garden-themedwasifront odfo withaview of the Superises andcocied conservatories, aditis flowers are fecwured In mary dessens and drinisi F Fish fiowersfrom allower the wond ase for saie at the new walk-in ficrai glasshouse too.

## PRE-LEARNING JOURNEY ACTIVITY I OPTIONAL

Inform the students that they will be visiting a new attraction at Gardens by the Bay, Floral Fantasy.
Using the area plan and write-up of Floral Fantasy that you will provide the students as a reference, have them draw, with their medium of choice, their expectations of Floral Fantasy.

BRIEFING BEFORE START OF VISIT \| Arrival at Bayfront Pavilion Drop-off Point
Welcome the students to Gardens by the Bay and encourage them to take as many pictures as they like, featuring various parts of Floral Fantasy during their visit. Give a quick list of instructions to the students:

- Do not run or push your friends as you walk through Floral Fantasy
- Do not touch any plants/ display props unless instructed
- Whatever you bring to the garden, bring them back with you; whatever you find in the garden, leave them in the garden
- Raise your hand if you wish to speak or answer any questions
- Let your teachers know if you feel unwell
*Students should not take the 4D ride if they are unwell


## INTRODUCTION TO FLORAL FANTASY

Floral Fantasy has four zones that feature different experiences - Dance, Float, Waltz, and Drift. It is an experiential and immersive journey through four diverse garden landscapes, each showcasing a different ecosystem and perspective.

Note: Refer to the Floral Fantasy Area Plan-Zone 6 \& 7 may not be conducive for a briefing due to the sounds from the water feature.

## AN UPSIDE-DOWN RAINBOW TAPESTRY | Zone 1

## Background Information

Titled An Upside-Down Rainbow Tapestry, this zone features the seasonal rotation of blooms reflecting the seasons - spring, summer, autumn and winter. It is a collection of more than 15,000 flowers put together with the help of volunteers and the blooms lend their vibrant colours and scents to the entrance of Floral Fantasy. The following are examples of flowers that you will see.



Delphinium


Sea Lavender

Ask the students if they know what a tapestry is. Gather their responses.
If students are unable to say what it is, explain that it is a piece of cloth with a pattern or picture that is created by sewing or weaving coloured threads onto a special type of strong cloth.

Ask the students to share how this zone depicts the image of a tapestry. Then, tell them that this zone has drawn inspiration from one, and created a tapestry out of blooms. Refer to Annex A to show them various types of tapestry examples.

Now, get the students to design their own tapestry, drawing inspiration from what they have just seen in Zone 1. Encourage them to take photos and note down visual qualities that they can incorporate into their design on the activity sheet under Design a Tapestry.

*This is meant to culminate in a final product by the students so teacher(s) should decide on media and techniques for the initial sketch, as well as final product to be created for the Post-Learning Journey Activity.

## THE DANCE OF FLOWERS I ZONE 2

Gather the students and give each of them the opportunity to express themselves by asking them about their feelings, thoughts, and inspiration from this zone. They may find their experiences being reflected in The Dance of Flowers activity.


Fun Fact:
A study in 2005 showed that women who received flowers remained significantly happier a few days after receiving them, as compared to receiving other gifts such as chocolates or clothes. Flowers and nature have the power to lift our spirits and transform our emotions.

## TREES WITH UNIQUE FORMS AND HANGING FLORAL CHANDELIER | ZONE 4 \& 5

## Background Information

Zone 4 \& 5 is a simulated enchanted woodland forest made magical with trees of unique forms and hanging floral chandeliers and air plants amidst colourful blooms.

A woodland is a low-density forest forming open habitats with plenty of sunlight and limited shade. Woodlands may support an understorey of shrubs and herbaceous plants. Compared to a rainforest, a woodland forest has sparse ( $10 \%-30 \%$ ) tree cover. A rainforest has greater than $30 \%$ tree cover.

To create an enchanting woodland forest experience for visitors, the choice of plants and landscape features are carefully curated. Show the students an example of a naturally occurring Woodland Forest, using Annex B. Highlight the various features (e.g. windswept trees, hanging air plants, flowing water, rockscape, and hanging baskets) to the students. by the Bay

Give the students 5 minutes to explore this zone on their own. Then, have them jot down their thoughts and ideas in the activity sheet under Creating a Woodland Forest Experience. Instruct the students to gather just before the rain vortex when they are done.


## Additional Notes

Before getting the students to explore this zone, you may consider sharing the following with them, to provide some guidance to what they might need to look out for:

- Form: The form of the trees and hanging floral baskets affect the scale and proportion of this space, and sets the tone for this zone.
- Texture: The hanging air plants on the trees contrast with the ground cover, rockscape and turfed pavement.
- Colour: While the trees and rockscape provide colours in an earth tone scheme, there is the introduction of colour mainly from the flowers in the hanging floral chandeliers and ground cover.
- Line: The curvature of the rockscape and flowing water provide movement and flow of action to guide visitors through the zone via the turfed pavement.

Get 2 or 3 students to share their observations and highlight that the various softscape and hardscape elements come together to create the enchanting woodland forest that they see here.

## EXPLORE A RAINFOREST I ZONE 6

Zone 6 and 7 simulate a rainforest experience complete with driftwood, spiralling vines and cascading water.

Get the students to explore the "rainforest" here on their own over the next 5 minutes and have them focus on the following aspects of the features they see - shape, form, colour, texture, pattern, etc. When they are done, gather them at the Poison Dart Frog vivarium where you may select 2 or 3 students to describe what they had seen with the rest of the class. Students might point out that there were spiralling forest vines, twisted driftwood sculptures, or a rock-lined path amidst cascading water.

You could also highlight that while the area appears small, there are more than 300 species of orchids, pitcher plants and bromeliads on display in these zones.


## POISON DART FROG VIVARIUM I ZONE 7

The following is additional information on poison dart frogs that can be shared with the students.
A vivarium is an enclosure or structure that is adapted to keep animals under semi-natural conditions for the purpose of observation and to raise awareness on the need for conservation. Explain that human action and climate change can have adverse impact on the smallest aspect of biodiversity, such as the Poison Dart Frog.

Information on Poison Dart Frogs:
Native to the tropical areas of Central and South America, they are considered vulnerable because of deforestation. They are known to be poisonous because of the food that they eat in their natural habitat. However, the ones here are not poisonous because of what we feed them - fruit flies.

Information on the vivarium:
30 poison dart frogs can be found in the vivarium. There are more than 20 species of begonias and 50 species of orchids mostly from Southeast Asia and some from Central America. Even in a small vivarium like this, there is rich flora and fauna diversity.

You may want the students to think about how habitats are being destroyed or removed to make way for development, and to reflect on the importance of conservation.

## A CAVE OF MYSTERY| ZONE 8

A Cave of Mystery is an artistic interpretation of the glow worm caves and temperate rainforests of Australia and New Zealand. The lights mimic the rhythmic fading in and out of glow worms.

Direct the students to look up to see the pendulous hanging fronds of gigantic sword ferns and staghorn ferns. Apart from ferns, there are more than 50 species of exotic orchids and 50 species of begonias and mosses growing on the rock surface. And within the rocks, there are many species of anthuriums and philodendrons. Explain that similar to the previous zone, this might be a small area but there is a huge variety of flora diversity here. They can only imagine how much more flora and fauna can be found in an actual forest!


Bird's Nest Fern


Sword Fern


Staghorn Fern

Allow the students 5 minutes to explore this zone further on their own. While doing so, they should compare the plants and landscape features of Zone 6 and 7 , with Zone 8. They may refer to the activity sheet, under Compare $\mathcal{E}$ Contrast to guide their thoughts and should feel free to sketch or jot down any notes they might have. This will help them to identify the importance of visual characteristics of features in creating an experience.


## POST-LEARNING JOURNEY ACTIVITY I OPTIONAL

After the visit to Floral Fantasy, a post-learning journey activity may be conducted as a follow-up back in school. This continues from Design a Tapestry on the activity sheet. Students could be tasked to design and create their own tapestry, using the media and techniques that teachers had identified earlier. by the Bay

A Glimpse into Floral Fantasy Teacher's Guide (Secondary I Tertiary)
Annex A: Examples of Tapestry


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## A Glimpse into Floral Fantasy Teacher's Guide (Secondary / Tertiary)

Annex A: Examples of Tapestry


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## A Glimpse into Floral Fantasy Teacher's Guide (Secondary / Tertiary)

 Annex B: Woodland Forest

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