

Queen Sirikit Garden: Garden for the blind

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Introduction

Thailand is situated in the middle of Southeast East Asia with an area of 513,115 sq. km. and with a population of approximately 64 million. There are about 123,157 people with visual impairment (National Statistical Office, Thailand 2001), and it was reported that there are about 1,000 persons from 1,650,000 in Chiang Mai, Thailand, officially registered as blind.

Many institutions, under the Thailand Association of the Blind and Ministry of Education in Thailand, have tried to serve the blind various educational programmes in same level as general children. According to that, the blind schoolchildren in Thailand have a chance to study the same curriculum as ordinary students, but they still need to be supported for their biological knowledge outside the books especially from environment. From opinions of students and teachers in blind school, Chiang Mai, it was found that even though there are a lot of materials to show them what plants and animals look like, the real things and objects are the best choice for them to imagine.

To fulfill the lives of the visually impaired children by getting experience on nature and learning through exploration using the senses of hearing, touch, smell, and taste. The QSG has a plan to create the “Garden for the Blind” since 2005.

The Queen Sirikit Garden (QSG), Bangkok, was founded in 1993 with the aim to be a garden and forest in the city and education place to enhance the plant conservation for the city. During the past 10 years of development, QSG has well served the city community and general public, while very high attention was also given to school children. However, a project for the visually impaired has just been established. The garden has developed educational programmes for a wide range of audiences, including youth, schoolchildren, university students, community members and tourists. These aim to achieve the goal of botanical gardens to become models of sustainability through work and education programmes, promoting the means by which everyone can become involved in creating a more sustainable way of life.

These days, there are few places in Thailand that provide facilities for the blind, especially on botanical activities. To accomplish this, QSG is working on a safety area to educate them about the environment and plants, including their usefulness and importance to our lives and other living organisms. There will be represented by other attractive senses such as hearing, touch, smell and taste. We have formed a group of educators with diverse backgrounds to design the “Garden for the Blind” and develop the educational programmes with the blind and non-blind to share the same experience.

Objectives

1. To assist actively in knowledge about plants as an “outdoor classroom” for the blind and handicapped students.

2. To empower children of marginalised groups with knowledge relating to plants and environment, with the help of information technology.
3. To serve wider visitors besides the scientific community and nature lovers.
4. To share experiences between ordinary people and people who are visually impaired
5. To encourage people to realise and care about the importance of plants and environment.

Themes of garden and activities

To create a place with special atmosphere in the garden to entertain and educate the blind consisting of materials and tools of touch, smell, sound and taste, etc.

Description of this project

A corner of the garden has been designed to appeal to the visually impaired students and those with multiple physical challenges. It is a complement to classroom teaching and fits into the schools' curriculum. By feeling the different textures of various plants and experiencing the unique fragrance and taste of each, the blind will be able to identify them. The rail, footpath symbols, sound from audio-guiding system, tactile maps, pamphlets and educational materials in Braille will assist orientation and reduce danger of getting lost.

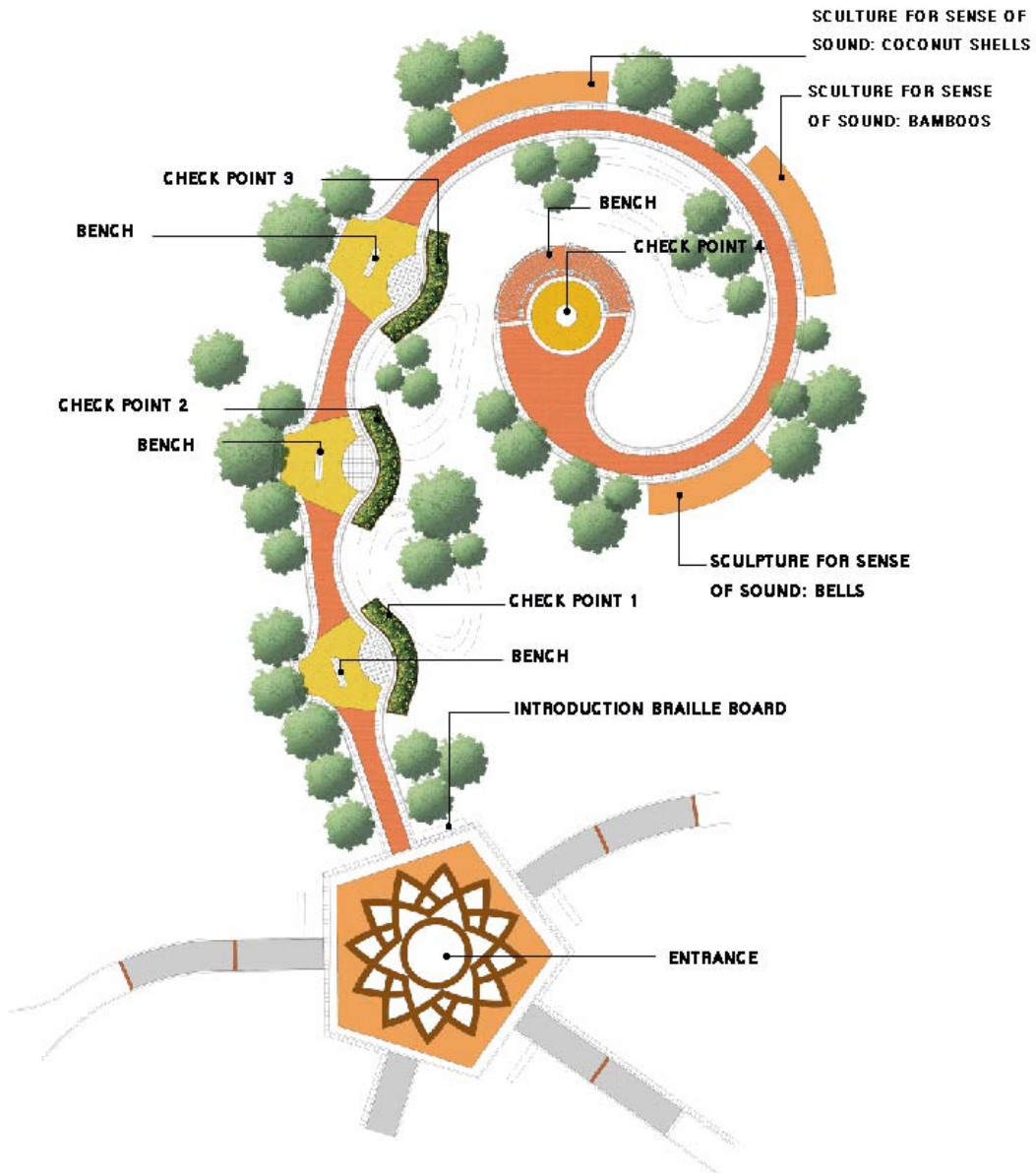
The labelling of plants and trees will be done in Braille or raised letters throughout the garden. It has been designed together with special facilities such as a toilet for handicapped and using strong colour contrast to help the blind locate toilet, basin, light switch, etc. "Garden for the Blind" allows the visitor to use all senses, and careful touching of the plants is encouraged. This project also provides a chance for general people to feel how the visually impaired persons use their special talent of senses by trying to be blind when they explore this garden. A design of the garden is in Figure 1 to provide an image of information presented below.

A Braille board at the entrance explains the topography and introduction of the garden including instructions for children to walk around without any help. To facilitate easier movement of the blind, the garden is accessible by footpaths lined with chequered tiles. Braille board and labelling a brief description of plants in the garden by telling them the botanical, English, and Thai local names and additional information about the plants which are mostly kept in the pots, baskets or special containers, which are easy to replace.

Introduction Braille Board:

Humans consume plants as food, material to build their houses, cloth, medicine, etc., the same as animals and insects. There are about 15,000 species of plants in Thailand. Their habits are mostly tree, shrub and herb. Some of them have adapted themselves to survive in the specific habitats such as the climber that is able to climb up to the top of the tree by their special stem and tendrils to get more sun light.

Figure 1: Design of the “QSG Garden for the Blind”



Check Point 1: Sense of Touch

It is shown by the shape and texture of petals, leaves, barks or fruits. The surface of them can be shiny, smooth, rough or hairy. The blind can identify the plants by comparing the sizes and textures.

President of Thailand Association of the Blind, Northern Thailand Branch, also advised to put some spiny plants with clear labels and signs to let the visual impaired persons try and realized about the danger of plants in real life. Even though we think it is dangerous, he said “they need to know the way adapt to the nature.”

Check Point 2: Sense of Smell

The visually impaired visitors can explore the impressive scents of flowers and leaves of spice plants. There will be labelling explaining the uses of their chemical substances to be condiment, perfume, joss sticks, component of medicines, etc. which are useful in everyday life.

Scents from flowers: rose, jasmine, magnolia, etc.

Scents from leaves: basil, lemon grass, pandanus, etc.

Check Point 3: Sense of Sound

There will be musical instruments made from plant parts such as bamboo, coconut shell, and wood, etc. The blind will able to touch and play with them along with storytelling in braille.

Check Point 4: Sculpture

A large sculpture is made to provide a surprise touch for the blind. It is large, safe, has fancy colours and embedded with simple animals found in the garden such as snakes, frogs, birds, squirrels, rat, etc. A blind can touch the sculpture and feel what the shape of the animals look like and this will be accompanied by sound and Braille explanation.

Conclusion

The Garden for the Blind is designed with the theme of sharing the world of local wisdom and plants and environment. The garden components are developed from the interviews with visually impaired students and adults, Blind School teachers, psychologists, horticulturists, and ethnobotanists. It is hoped that “Garden for the Blind” not only provides a learning place for the visual impaired students, but also reminds those of us with sight how much we take for granted the glorious gift of plants and nature.

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Biography

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