Overview

The idea behind the Greenfingers Sustainability Classrooms came from a vision that teaching primary school aged children the basics of natural sciences in a practical yet curriculum based process, positively influences their ability to learn, and gives them an understanding of environmental responsibility and understanding of where food comes from and what is good for you.

A key aim of the Sustainability Classrooms is to provide the children with key life skills, such as the ability to grow and cook their own food. This is where the vegetable beds play a key role.

We installed between ten to fifteen raised vegetable beds depending on the size and layout of each Sustainability Classroom. We installed this many vegetable beds, as it was important for the children to have the room to grow and taste as wide a range of vegetables as possible, as many children today have limited experience when it comes to tasting different vegetables. As well as planting the usual orange carrots and green cabbage, we also planted heirloom varieties of beetroot (in a range of colours), rainbow chard, red cabbage and unusual varieties of lettuce.

Tasting fresh vegetables is a great way to get our children eating and loving vegetables. How many times have you bitten into a shop bought tomato and been disappointed? Nothing can compare to the taste of home grown produce. Kids will relish picking fresh cherry tomatoes and eating them like they eat lollies and will delight in popping peas straight from the pod into their mouth.

Health

Developing a broader palate for a range of vegetables is important for overall health. Different vegetables contain different minerals, vitamins and important antioxidants which help keep our bodies fighting fit. The vegetable beds in the Sustainability Classroom enable the students to grow, harvest and taste a huge range of vegetables, ultimately making a difference to their health. The vegetables that the students grow will be eaten within hours (or even minutes) of being harvested, meaning that essential nutrients are at their highest in concentration. Most importantly the students learn about what goes into producing your food is what you get out of it. This will help them better understand their own personal nutrition and hopefully arm them with the knowledge that will help them avoid the fastest growing health concern in Australia childhood obesity.

Economics

With the cost of fresh vegetables the fastest growing shopping expense, the knowledge and ability to grow your own food is becoming increasingly vital. ‘Food Miles’ are also a big concern, much of the fruit and vegetables that we consume in Australia has been grown overseas, and has travelled a huge distance before we buy it in the shops. This uses large and unnecessary amounts of fossil fuels, which has a detrimental effect on our environment. By giving the students experience in growing their own vegetables they will not only be armed with skills that will assist them financially in the future, but will be able to answer the future challenges regarding food production and supply.

Pesticide Free

At Greenfingers we wanted the students to be aware of the dangers of growing and eating produce that is treated with chemicals such as pesticides and fungicides. In the Sustainability Classroom the students will learn how to grow healthy plants that are resistant to pest and disease attack and therefore do not need treating with chemicals. Sustainable gardening practices such as improving the soil nutrient and moisture holding content, mulching,
manual weed removal choosing the correct site and varieties for the vegetable gardens and correct watering are all practices that lead to growing healthy vegetables.
The school has the unique opportunity to teach children about pests and how to control them naturally using organic controls, measuring their effectiveness and learning more about the pests and their relationship with the plants they attack.

Raised Vegetable Beds

You might be wondering why we installed raised vegetable beds in the Sustainability Classrooms. Raising your vegetable beds has several advantages that help to ensure healthy vegetables and bountiful crops such as

- Excellent drainage. The soil in the vegetable beds rarely gets compacted and drains freely, ensuring that the soil never becomes water logged, this also encourages good, strong root growth.
- Higher cropping rates. You are able to grow plants in raised vegetable beds much closer than you normally would do in the ground, meaning a higher harvest of produce per square metre.
- Use less water than a traditional ‘in ground’ vegetable bed. You are applying water to a concentrated area, which means you can apply the water exactly where it is needed. Raised vegetable beds are also highly suitable for installing drip irrigation.
- Protects your crops from pests. Slugs, snails and other climbing pests are less likely to attack your vegetables when grown in raised beds.
- You can fill the beds with premium soil conditioner/soil mix, meaning that you can provide the best possible growing conditions for your vegetables. This is ideal if you live in an area with sandy or poor soils and reduces the amount of work and expense required to turn normally poor quality soil into prime growing medium for highly productive plants.
- You can grow your vegetables in the ideal position. Most vegetables love the sun, a raised vegetable bed means that you can site your vegetable garden in a suitable position, even if this is on existing pavers or concrete.

Suppliers

Raised Garden Beds
Bushy Tanks
Phone: (08) 9622 9555
Email: sales@bushyproducts.com.au
Web: www.bushyproducts.com.au

We installed between ten to fifteen vegetable beds depending on the area and the layout of the school. Our fantastic raised vegetable beds came from Bushy Tanks. These beds come flat packed in four pieces. They are easy to assemble (one metal pin in each corner) and are light and easy to move into position. With no sharp edges they are great for children to use. We loved the range of colours too.

Soil Conditioner/Humus and Mulch

Biowise
Phone: (08) 9410 0477
Email: biowise@sita.com.au
Web: www.biowise.net.au

Compost is an essential additive for planting in WA’s impoverished soils. It turns lifeless sand into great growing soil and can be used for all types of planting including vegetables, annual and perennial flowers, shrubs and trees as well as lawn. We filled our raised vegetable beds with Garden-ARRT™ Compost.
This fully composted compost has passed the strict testing for the Australian Standards 4544 for Composts, Soil Conditioners and Mulches and is free from human and plant pathogens, has a pH range of 5.0 to 7.5 and has excellent wettability.

It was important to mulch the raised vegetable beds as this assisted in lowering the maintenance and upkeep of the crops that the students were growing. Mulching keeps the roots of the plants cool, reduces water loss via evaporation and limits weed germination and growth.

We used Garden-ARRT™ Fine Earth Blanket to mulch the vegetable beds. This mulch is finely textured and has a similar appearance to Karri and Peat mulch. Being fully composted it is a superior mulch as it allows faster water penetration and delivers nutrients to the soil below. It is ideal for adding to the vegetable patch as summer/autumn mulch as it will break down into the soil and increase its fertility over time.

Garden-ARRT™ Fine Earth Blanket has passed the strict testing for the Australian Standards 4454 for Composts, Soil Conditioners and Mulches.

Clay Mineral Additive
Soil Solver
Phone: 0428 352 026
Email: www.soilsolver.com.au
Web: gd@westnet.com.au

Soil Solver is a natural and organic method of improving sandy soil permanently. It changes water repellent sand into a fertile loamy soil and can turn any sandy area into a thriving garden. It contains a unique blend of fine calcium clays, silts, rock minerals and trace elements which absorb and retain water and nutrients in the garden. It saves water, fertilisers and keeps your soil moist for longer. Soil Solver contains rock minerals and trace elements that release nutrients slowly for years such as Calcium, Magnesium, Potassium, Sodium, Phosphorus, Sulphur, Manganese, Iron, Zinc, Copper, Molybdenum, Boron, cobalt and selenium.

The minimum application rate is 5kg per square metre. Prices start at $1.55 per kilo
Edible Flower, Vegetable and Herb Seedlings.

Benara Nurseries
Phone: (08) 9405 0000
Email: benara@benaranurseries.com
Web: www.benaranurseries.com

We used a wide range of vegetable seedlings from Benara Nurseries, including many interesting heirloom and unusual varieties.

Since 1963 Benara Nurseries has been providing Australia with high quality, affordable plants. Their vegetable seedlings are of a high quality grown in one of the most modern and automated seedling nurseries in Australia, using soil pasteurisation, germination chambers, roller benches, robotic planting machines and boom watering facilities.

Benara Nurseries are a wholesale nursery and are not open to the public. However, their range of seedlings can be found widely in retail nurseries and garden centres. Please contact them to find your nearest supplier.