

CONNECTing with the wild - how a botanic garden can link World Heritage values with delivering goals from the International Conservation Agenda for Botanic Gardens.

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Abstract

The International Agenda for Botanic Gardens has 6 major targets for achieving the Global Strategy for Plant Conservation by 2010. These are the major focus for the work of Mount Tomah Botanic Garden (MTBG), the cool climate garden of the Royal Botanic Gardens, Sydney. Situated at 1000m altitude it is surrounded by the Greater Blue Mountains World Heritage Area in New South Wales, Australia.

MTBG is developing the Gateway Exhibition for the World Heritage Area using the CONNECT Program to exhibit the universal world heritage values of Australia's characteristic eucalypt vegetation and biodiversity. It is an integrated educational system which provides the Botanic Garden/WHA visitor with a multi layered experience encompassing garden displays, oral stories, MP3, story boards, video, and interpreters.

Critical to success of any program is attracting people to participate. Having a great experience is the basis for success. Engaging customers to use the experience is the challenge. World Heritage is a name with high recognition and attracts considerable interest and response from tourists (Buckley 2002). Linking this value with the botanic garden's conservation agenda will provide a unique opportunity to mobilise support for these environmental objectives. Our measure of success will be developing commitment and action of visitors as they change their behaviours to reduce their environmental footprints.

Introduction

In the last 20 years, zoos have moved from being jails for animals to being perceived as saving the fauna of the planet. In the same period an *International Agenda for Botanic Gardens for Plant Conservation* has been developed. How to make this sexy and inspiring is the conundrum for botanic gardens. Botanic Gardens are revered venerable institutions (Heywood) visited mostly for their peace, beauty and tranquillity by people mostly aged 50 years plus (MTBG Customer Surveys 2006). While keeping these loyal supporters the challenge for botanic gardens is to attract generation X and Y visitors if we are to achieve these critical conservation goals.

Discussion

Mount Tomah Botanic Garden, the cool climate garden of the Royal Botanic Gardens Sydney, is situated at 1000m altitude in the World Heritage listed Blue Mountains of New South Wales, Australia. The Garden displays over 5,000 plant taxa, focussing on temperate cool climate species with a special emphasis on those plant families from the Southern Hemisphere and has been selected to become the gateway to surrounding World Heritage Area.

In 1999 Peter Raven (Raven 1999) President of the International Botanical Congress at its 16th worldwide conference, August 2, 1999 announced:

"We are predicting the extinction of about two-thirds of all bird, mammal, butterfly and plant species by the end of the next century, based on current trends."

Al Gore (Gore 2006) tells us that in solving that "Inconvenient Truth" of Global Warming, it is critical that we as short term residents on the planet stop denying there is a problem. He also points out it is critical not to move to despair which will result in us believing there is nothing that can be done.

Botanic Gardens and the Global Strategy

Mount Tomah Botanic Garden as the cool climate garden of Royal Botanic Gardens, Sydney has as its mission:-to inspire the appreciation and conservation of plants which is summarised on our slogan PLANTS = LIFE.

This links our botanic garden with the global mission of botanic gardens worldwide to:

- *Stem the loss of plant species and their genetic diversity worldwide.*
- *Focus on preventing further degradation of the world's natural environment.*
- *Raise public understanding of the value of plant diversity and the threats it faces.*
- *Implement practical action for the benefit and improvement of the world's natural environment.*
- *Promote and ensure the sustainable use of the world's natural resources for present and future generations*

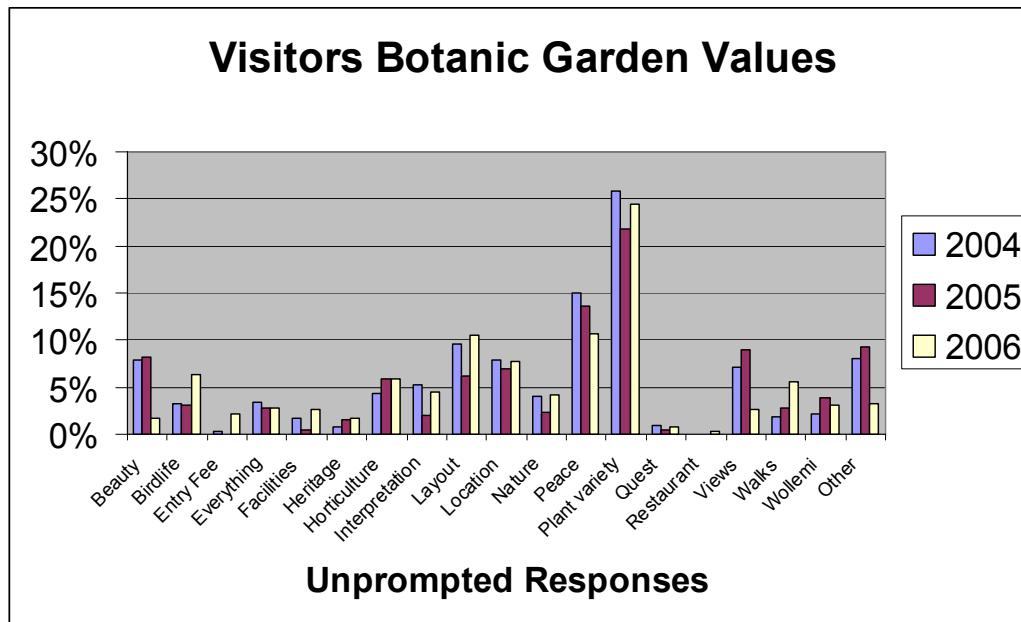
Mount Tomah Botanic Garden is surrounded the Greater Blue Mountains World Heritage Area. The WHA was listed for its outstanding universal values for representation of Australia's characteristic eucalypt vegetation and Australia's biodiversity including the Gondwanic links of the flora.

The WHA covers 1.03 Million Hectares and is composed of 8 National Parks. Being the Gateway to this outstanding area provides MTBG with special educational and environmental opportunities and responsibilities.

Education

The challenge given to MTBG in 2005 was to link a cultivated display of cool climate plants from the temperate regions of the earth with the universal world heritage values of the surrounding National Parks. It is estimated there will be an additional 30,000 visitors each year coming to the botanic garden to experience the world heritage exhibition.

What motivated the existing visitor base to come to a botanic garden has been collected through our random visitor surveys. (Chart 1). Visitors are asked to tell us in an unprompted format the item they value most about their visit to MTBG. About 25% of the visitors each year have given the unprompted response of seeing the great variety of plants (Biodiversity). These values linked with interpretation 5%, Horticulture 6% and Layout 10% indicate that over half the visitors are coming to this botanic garden to enjoy and understand plants.

Chart 1

For us to link this existing customer base with those visitors coming to understand the Blue Mountains world heritage values required a serious review of the role of MTBG. The question we were faced with was how to link the exotic and native cool temperate collections with the surrounding 500,000 hectare wilderness area with its eucalypt and gondwanic plants and the marsupial and monotreme fauna. The answer came from the customers. It was apparent from the statistics we were collecting people came to see and experience the real. Books and Google were providing them with information, yet the customers were coming here for the opportunity to see the real thing.

We have decided to use the acronym CONNECT to link this desire to see, compare and contrast the real (plants) in a botanic garden.

CONNECT

To carry these conservation messages to this new customer base the Garden is developing a CONNECT program. Inspiring the understanding of these world heritage values is the goal. To do this we aim to connect with the customers and provide insight and understanding. Success will inspire people to change their environmental behaviours so reducing their environmental footprints.

The CONNECT Program is an integrated educational system which provides the Botanic Garden visitor with a multi layered experience aligning conservation values and messages with a botanic garden visitor experience.

Contrast – plants in garden with those in wild to understand differences of the Blue Mountains flora and what makes them so unique (understanding biodiversity).

Open – To everyone, the botanic garden is accessible while only a few can see these plants in the wild (in situ)

Natural – Gardens are beautiful and tranquil and this enables plants (biodiversity) to be seen and experienced in natural and safe settings.

New - Use new Technology - Pod casts, video, and web tours to provide further information.

Experience – touch, see, feel the plants (they are real rather than the virtual) and so develop understanding of its importance which leads to environmental action.

Compare - plants in garden with those in wild to see similarities of Blue Mountains flora with plants of the world

Talk to visitors with stories.

The new displays

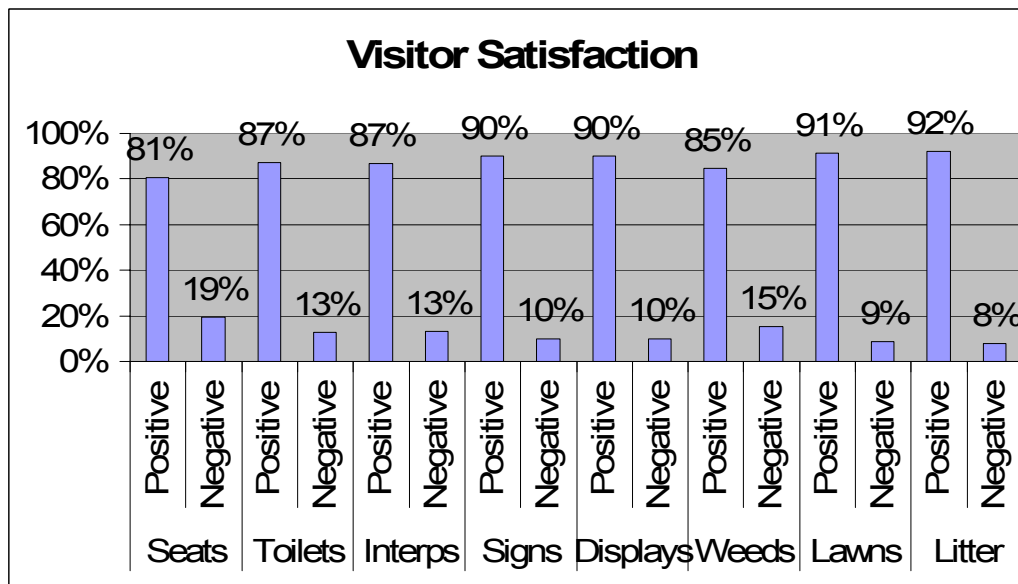
Utilising this system we have created two new displays since 2003. The Australian Woodlands showcases the open woodland species of the region and compares the sclerophyll habits of 103 species of Eucalypt found in the World Heritage Area with deciduous woodland species of North America and Eurasia. Features include a Boora Ground (an Aboriginal performance space where the Darug Peoples stories are being told as part of the schools program) Also we have developed an MP3 audio guide with themes such as photosynthesis powers the planet and also that in a botanic garden one can –Touch Time.

In the Bog Garden displays include Pitcher Plants (*Sarracenia sp*) set beside the *Drosera sp* of the Blue Mountains. Also on display are Venus Fly Traps (*Dionaea muscipula*) and the area has kneeling pads so kids can get close and dirty with them. The Bog was constructed with coir (Coconut husk) instead of peat and garden uses solar powered pumps to reticulate the water through the system.

Linking to these displays will be a world heritage exhibition centre which will provide interactive displays. The Centre aims to have video, story boards and Guides to interpret fascinating stories of the region. Just completed is a Podcast soon to be available as download on the web site (www.rbgsyd.nsw.gov.au/tomah).

Evaluation

It is critical for the success of any thematic display to evaluate its success. As part of this process at MTBG we survey about 400 customers each year. The survey is random with the data collected throughout the year. Below is a summary chart of the responses to survey from 2005.

Chart 2

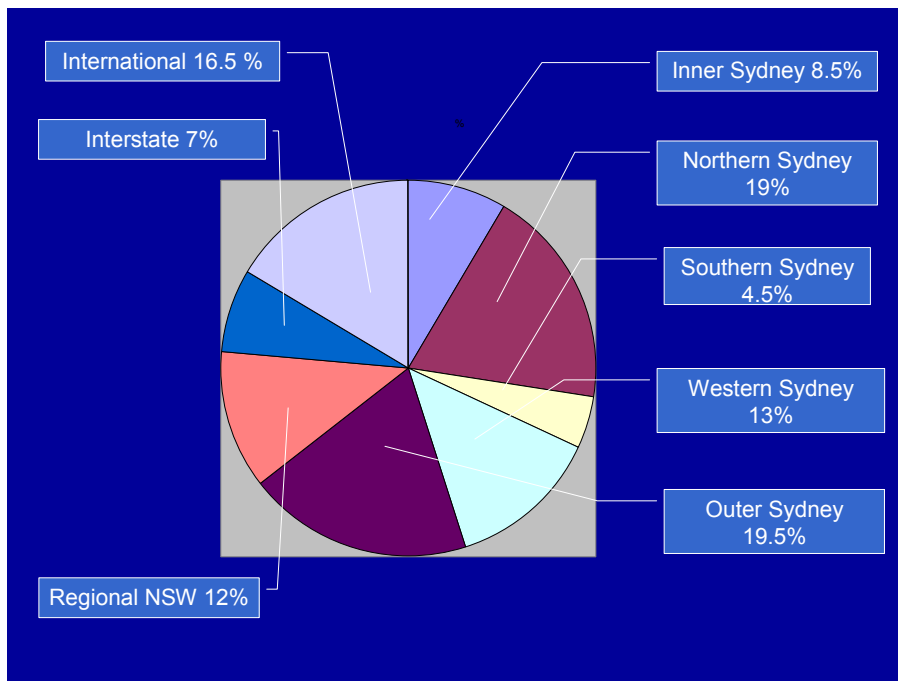
Our target is to achieve an 85% or higher positive response (which in the survey equates to good or very good) in all categories. Areas for improvement are the provision of more seats in the garden, and managing garden weeds in some of the displays. Over all customers were happy with the interpreted displays and the standard of horticulture.

We also noted from the values survey chart 1 that visitors did not list education as reason for visiting and that messages needed to be linked to the values of plant variety and interpreted displays.

Visitors demographics

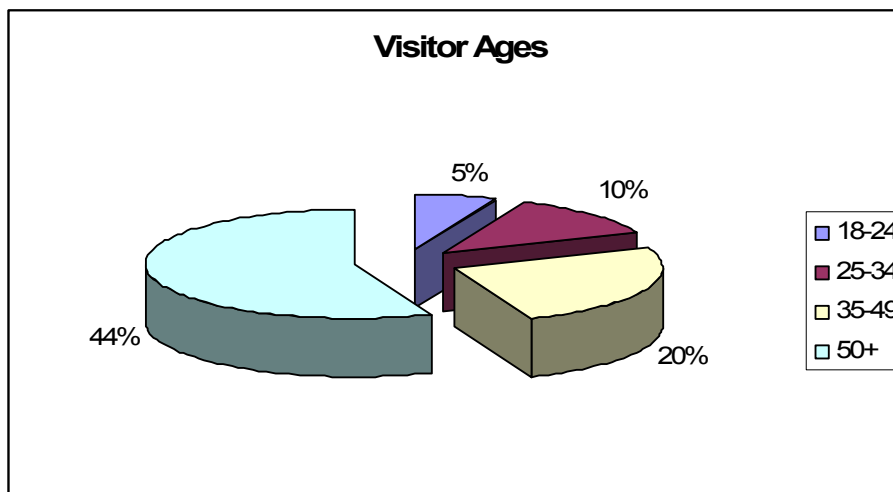
It is important to know who your visitors are. Knowing where visitors come from, their age group and their values are basic tools for developing successful thematic displays. The existing MTBG visitor base is 35% from outside the Sydney with 16.5% International. The International group comes predominately from UK and Europe.

Outer Sydney component of 19.5% are the locals who come to garden as a destination to showcase it friends and visitors. Other Sydneysiders are on a day excursion as Tomah is a 2 hour drive from the CBD.

Chart 3

Botanic Gardens still tend to attract a larger percentage of Baby Boomers while beginning to attract some of Gen X visitors. With 44% being 50 and above this a group who are reaching retirement and now have time to spend on issues rather than being focussed on child rearing. They are certainly a group who can focus on driving the development of political will to have a government policy to achieve our conservation targets.

World Heritage also is acknowledged to have a high attraction value (Buckley 2002). Linking the botanic garden with this value provides an opportunity to attract a new demographic group. These values are thought to resonate with generation X & Y and provides an opportunity to expose another group to our messages. This aims to develop understanding of the actions everyone can take to reduce the loss of biodiversity and cut green house gases and for Australia especially, the sustainable use of water.

Chart 4

Conclusion

Linking a Botanic Garden with World Heritage Values is an exciting opportunity to link with a new audience. This can provide an opportunity to link touching the real with an audience who does not necessarily want to walk on the wild-side. In the safety of the Botanic Garden the visitor sees and touches the rare and the threatened in comfort and safety. This experience also reduces the pressure on the wild which is often fragile as well as threatened. We will continue to evaluate the success of our displays and use what we learn to improve our connection with our visitors.

Bibliography

Buckley 2002

Gore Al, An Inconvenient Truth,

Mount Tomah Botanic Garden Surveys, Unpublished data of BGT.

Raven Peter, Proceedings of the 16th International Botanical Congress,

Blue Mountains World Heritage Listing UNESCO 2000.

Mount Tomah Botanic Garden Visitation

