

Sustainable Living Champions 2007

| Student & Project | Teacher & School | Description |
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| <p><i>“The Leaf House”</i></p> <p>Albert Nguyen Year 12</p> | <p>Randwick Boys High School (NSW)</p> <p><i>Teacher</i> Marie Harris</p> | <p>Inspired by a simple leaf, Albert designed an unconventional environmentally sustainable house that promotes a healthy and harmonious lifestyle. The Leaf House combines the organic feel of natural houses built in regional areas of developing countries and integrates them with modern principles of the built environment. The Leaf House was inspired by a desire to reconnect people with the natural environment, strengthen family and social networks and encourage more healthy lifestyles in a creative and exciting way.</p> |
| <p><i>“Vertical Wind Turbines and Sustainable Living”</i></p> <p>Callan Dick Year 10</p> | <p>Lambton High School (NSW)</p> <p><i>Teacher</i> Carolyn Hayden</p> | <p>“Imagine if a building acted like a tree using the environment to create its own energy”. Dick Callan’s project calls for building redesign to harness wind energy and reduce our reliance on coal fired power plants. His research idea explores using a building’s resistance to air to concentrate wind energy by focusing air currents over turbine blades. He developed a prototype of a vertical wind turbine. Through this project he developed a practical, versatile and feasible solution to address the growing demand for renewable energy.</p> |
| <p><i>“Going Grey”</i></p> <p>Cat Gaggin Year 9</p> | <p>Marist Regional College (TAS)</p> <p><i>Teacher</i> Ann Burke</p> | <p>Cat researched the effectiveness of using grey water as a source of garden water. In a thorough and detailed study, she compared growth rates of different seeds when watered with different forms of household waste water, at varying pH levels. Her research was inspired by her understanding of the potential future worldwide water shortage and the need for dramatic change in our use of water.</p> |

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| <p style="text-align: center;"><i>“Dry Coal, Squeeze Please”</i></p> <p style="text-align: center;">Luke Fletcher Year 9</p> | <p style="text-align: center;">Marist Regional College (TAS)</p> <p style="text-align: center;"><i>Teacher</i> Ann Burke</p> | <p>Luke completed a scientific study exploring ways to increase the efficiency of brown coal, by drying brown coal to industry standards. He trialled two drying methods, evaporative and non-evaporative. As part of his project he built an evaporative device and sought technical advice from a local business with a long-term goal of revolutionizing the coal industry! Luke’s project demonstrated a strong vision inspired by the desire to explore solutions to global warming that specifically reduce the greenhouse gases that result from the millions of tonnes of coal burnt every year.</p> |
| <p style="text-align: center;"><i>“Just a Drop in the Ocean?”</i></p> <p style="text-align: center;">Storm Holwill Year 9</p> | <p style="text-align: center;">Marist Regional College (TAS)</p> <p style="text-align: center;"><i>Teacher</i> Ann Burke</p> | <p>Storm’s scientific research explores how marine micro-algae can act as a carbon sink as they grow and absorb atmospheric carbon dioxide. Her research involved using industrial carbon dioxide to carbonate filtered sea, introducing nutrients and painstakingly measuring dry mass yield of the micro-algae. She also designed a bio-reactor and calculated the capacity of the bio-reactor to sequester atmospheric carbon dioxide. This project aimed to address problems of global warming and dwindling fuel resources. Her proposed solution for creating biodiesel (by growing micro-algae in a bio-reactor) addresses environmental issues such as reducing reliance on limited land surface area and freshwater and increasing absorption of atmospheric carbon dioxide and availability of plant biomass produce alternative fuels.</p> |
| <p style="text-align: center;">“Fowl Water”</p> <p style="text-align: center;">Hannah Younger Year 9</p> | <p style="text-align: center;">Marist Regional College (TAS)</p> <p style="text-align: center;"><i>Teacher</i> Ann Burke</p> | <p>Through her scientific research, Hannah explored the impacts of the large concentrations of fowl faeces on the water quality of a local ‘duck pond’ at Burnie’s Romaine Reserve. Her study involved water quality testing for faecal coliform bacteria, dissolved oxygen levels and macro invertebrate. Her project explores issues of water health and the integrated reliance species share with others within the ecosystem.</p> |

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| <p style="text-align: center;"><i>“Crude Oil and Sustainability”</i></p> <p>Christopher Walsh Yr 8</p> | <p style="text-align: center;">Normanhurst Boys High School (NSW)</p> <p style="text-align: center;"><i>Teacher</i> Debra Black</p> | <p>Through his Yr 8 research project, Chris explored the uses and impacts of crude oil. Recognising our current reliance on petroleum products, he explored solutions for sustainable fuel supplies. His project examined scientific theory and research and developed a strong understanding of the issues around our relationship between sustainability and our use and dependence on oil.</p> |
| <p style="text-align: center;"><i>“Energy and Sustainability at Geelong College Preparatory School”</i></p> <p>Year 7 students</p> | <p style="text-align: center;">Geelong College Preparatory School (VIC)</p> <p style="text-align: center;"><i>Teacher</i> Stuart McCallum</p> | <p>Yr 7 students at Geelong College Preparatory School took on the challenge to explore their personal and family ecological footprint. As part of their Bioscience studies, students developed their own Personal Action Guides and monitored their achievements in living more sustainably. Students created individual research projects, encouraged their family to reduce their eco-footprint, and took part in cycling and Waterwatch events. Their group project targeted a number of interconnected sustainability issues such as consumption, energy use, transport, water quality and conservation.</p> |
| <p style="text-align: center;"><i>“Lord of the Weed: MBBC Nature Refuge”</i></p> <p>Matthew Day, Joshua Ferguson, Dominic Guifolye, Saad Khan Alex Mann, Matthew Martin, Matthew Moy Kieran Pugh, Adam Ralls, Daniel Ryenberg, William Toohey</p> | <p style="text-align: center;">Moreton Bay Boys College (QLD)</p> <p style="text-align: center;"><i>Teacher</i> Dianna Patchett</p> | <p>Yr 9 students at Moreton Bay Boys college have become Sustainable Living Champions through their work promoting stewardship of the local Nature Refuge. Students were actively involved in designing and implementing a weed management and habitat enhancement strategy and establishing a monitoring program for their local Nature Refuge. Through their teamwork, detailed research and practical bush regeneration efforts, they are supporting biodiversity within their catchment area.</p> |

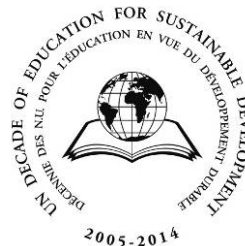
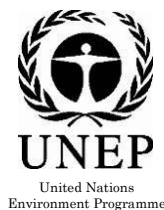
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| <p style="text-align: center;"><i>“Drink Tap Water Campaign & Strobos Magazine”</i></p> <p>Stacey Reynolds Fiona Yates Shane Cameron Years 10 & 11</p> | <p style="text-align: center;">Katoomba High School (NSW)</p> <p style="text-align: center;"><i>Teacher</i> Chris Yates</p> | <p>Budding journalists Stacey Reynolds, Fiona Yates and Shane Cameron have created their own monthly environmental magazine ‘Stobos’ to support the Blue Mountains Conservation Society. The students also developed a school campaign on drinking tap water in efforts to conserve ground water. Through community education campaigns and science journalism they are encouraging other young people to play their part in conserving our environment.</p> |
| <p style="text-align: center;"><i>“Coastal Management at Botany Bay”</i></p> <p>Nicholas Rokkas Matthew Nguyen Daniel Cung Year 9</p> | <p style="text-align: center;">Sydney Technical High School (NSW)</p> <p style="text-align: center;"><i>Teacher</i> Michael Bellamy</p> | <p>Team members Nicolas, Matthew and Daniel worked collaboratively to research and design sustainable solutions for Botany Bay coastline. In a detailed and thorough research project they examined environmental, social and economic impacts on the Botany Bay coastline and proposed integrated solutions for more sustainable coastal management. Their project recognises the importance of effective coastal management for the majority of Australians that live, work and depend on the coastal environment.</p> |
| <p style="text-align: center;"><i>“Sustainability project”</i></p> <p>Sarah Holper Alysia Rawlings Year 9</p> | <p style="text-align: center;">Kilvington Girls Grammar School (VIC)</p> <p style="text-align: center;"><i>Teacher</i> Alison Kershaw</p> | <p>Sarah Holper and Alysia Rawlings examined local solutions to the global challenges of climate change. Through their investigative research they explored opportunities to make their local sporting field, Bailey Reserve, more sustainable through effective water use and conservation. They proposed plans to install water tanks and efficient irrigation systems, plant drought tolerant grass and developed long-term goals that they will be sharing with their local council.</p> |

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| <p style="text-align: center;"><i>“Wetlands and Environment Group”</i></p> <p style="text-align: center;">Group of 29 students Years 7–12</p> | <p style="text-align: center;">Catherine McAuley Westmead (NSW)</p> <p style="text-align: center;"><i>Teacher</i> Sue O'Connell</p> | <p>Motivated students from <i>Catherine McAuley Westmead</i> are working together to regenerate a local wetland and establish a school composting system, worm farm and vegetable gardens. Students and teachers are involved in weed identification and removal, plant and fauna identification, composting and gardening and have more plans for native planting and water conservation. Through their ongoing efforts, they are enhancing local biodiversity, reducing waste, enhancing soil quality and producing food.</p> |
| <p style="text-align: center;">“Future Earth' – a holistic approach to sustainability based on the Earth Charter”</p> <p style="text-align: center;">Whole school project</p> | <p style="text-align: center;">Wondai State School (QLD)</p> <p style="text-align: center;"><i>Teacher</i> Sue Gibson</p> | <p>Enthusiastic students and teachers at Wondai State School are continuing on their sustainability journey by adopting the Earth Charter framework to engage students in real life learning experiences. The school developed a Sustainability Action Plan incorporating curriculum, school grounds and resource management. Through Action Science and social skilling programs, students explored the interconnectedness of sustainability issues and have been involved in education and action campaigns.</p> |
| <p style="text-align: center;"><i>“Ecomania”</i></p> <p style="text-align: center;">Whole school project</p> | <p style="text-align: center;">The Lakes South Morang P–9 School (VIC)</p> <p style="text-align: center;"><i>Teachers</i> Bonnie Butterworth & Kate Mildenhall</p> | <p>The Lakes South Morang P–9 School has been overcome with Ecomania! Though the school is not even a year old, it is holistically embracing the challenge to be environmentally sustainable. Sustainability was integrated holistically across the Yr 7 curriculum, with students action groups working to address complimentary elements of school sustainability including aquatic ecosystems, trees and indigenous birds, rockeries and lizards, weed management, indigenous planting and school environment management.</p> |

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| <p>“Wello's World Wise News”</p> <p>Whole school project</p> | <p>Wellington Point State High School (QLD)</p> <p><i>Teacher</i> Gay Phillips</p> | <p>Students at Wellington Point State High School are striving to achieve the school vision of becoming more sustainable. School initiatives included student working groups, (Sustainability Group, Community in Action and Wello Water Watchers), incorporating education for sustainable development principles into curriculum units, introducing the Earth Charter program into welfare classes, and generally promoting sustainability within the school community. Through these initiatives students have reduced water usage and energy consumption, promoted recycling and biodiversity and created more awareness in the wider school community about sustainable practices.</p> |
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PRINCIPAL PROGRAM PARTNERS

QUEENSLAND PARTNER