

PARTICIPATING HOUSES

Proudly coordinated in North Queensland by NQ Dry Tropics and ecoSAVVY.

On National Sustainable House Day, Sunday 13th September over 170 private sustainable homes around Australia will open their doors to the public. It's an excellent opportunity to learn about tropical design and sustainable living from homeowners in Townsville who have been there, done that, and are happy to share their learnings with YOU.

YOU are invited! Homes are open 10am - 4pm. Entry is free!

For more info on the houses and SHD visit www.sustainablehouseday.com

84 Ninth Ave, Railway Estate (Townsville)

Tropical design & sustainability principles were front of mind throughout the renovation of this 1930's highset timber Queenslander. Nicole and Just wanted the design to provide coolness and comfort naturally without the use of air-conditioning for most of the year.

Key successes of this house are its tropical design, use of recycled and eco-preferred materials, the fabulous garden, energy and water efficiency and the impact of the home's design on the owner's quality of life and further adoption of sustainable living practices.

The result is a modern Queenslander to house their growing family that is functional, eco-friendly, naturally cool and lifestyle enhancing.

Photos courtesy Nicole Sanderson.



Tyler Home - 20 Halloran Street, Hermit Park (Townsville)

Comfort in Townsville's tropical climate has been achieved on a compact 380m² block in a 2 storey home that features doubly insulated roof and walls, the use of the thermal mass in the floor, a design that embraces indoor/outdoor living and a clever combination of convection and cross-ventilation providing incredible climate control. The home showcases leading edge energy efficiency and renewable energy technologies and considered material choices throughout. The combined artistic talents of the owners who are experienced in building custom eco-homes make this not only a truly innovative modern Queenslander but also a visual feast with tasteful artistic features aplenty. Jam packed with innovative features, the house has even been fitted with a charging point for an electric car!

Photo courtesy Jenny Tyler.



PARTICIPATING HOUSES

Proudly coordinated in North Queensland by NQ Dry Tropics and ecoSAVVY.

Schellback Home - 61A Annville Road, Jensen (Townsville)

Photo courtesy ecoSAVVY.

Owner Brian, describes the concept of his innovative home simply as a tin shed covering timber boxes.

With a 2.5 acre block on which to build, retired architect Brian designed and built a breathtaking beautiful yet practical modern tropical Australian architecture that is also a comfortable contemporary home built to a relatively modest budget. This home achieves comfort with no air-conditioning as a result of the proper consideration of cross-ventilation, orientation and shading - the most



important design considerations for Townsville's tropical climate. The home also features solar hot water, a whole of house fan, grout free bathrooms, the use of some recycled materials, a low water use garden, an innovative plunge pool made from a cut off rainwater tank and a natural looking rock-lined creekbed to manage stormwater runoff.

Dearden Home, 2 Edward Street, West End (Townsville)

The owner of this 1970's concrete block home has gradually retrofitted this home to become an energy saving exemplar with tiny quarterly energy bills.

Improvements have included 5-star energy efficient gas hot water, internal shutters, roof insulation, white reflective roof paint, energy efficient lighting, the creation of a patio for outdoor living, efficient appliances, virtual elimination of standby power and energy conscious lifestyle practices.



Photo courtesy Janet Dearden.



The home also features solar panels producing electricity that is sold back into the grid.

Photo courtesy ecoSAVVY.

PARTICIPATING HOUSES

Proudly coordinated in North Queensland by NQ Dry Tropics and ecoSAVVY.

Rowes Bay Sustainability Education Centre - Cape Pallarenda Road, Rowes Bay (Townsville)

Townsville City Council has retrofitted the Council depot Caretaker's cottage at Rowes Bay, a pre 1980's concrete block home, to demonstrate the retrofitting of energy efficiency measures and renewable energy together with the benefits of maintaining biodiversity through urban nature.

Under its new name, the Rowes Bay Sustainable Education Centre will be a focal point of Townsville City Council's whole of catchment education program providing an interpretive education experience for the wider Townsville community and particularly school groups.

Features of the home include white solar reflective roof paint, a whole of house extraction fan, solar heat pump hot water heating, water efficient taps and shower fittings, 1.5kW grid connect solar panel array on the roof, energy efficient lighting and an outdoor living area. A wind turbine is also under construction.

Photo courtesy Townsville City Council



Backler Home - 4 McElligott Court, Horseshoe Bay (Magnetic Island)

In an unusual application of tropical design principles, this well considered home, provides excellent indoor / outdoor living and year around comfort in the tropics. Coolness in summer and comfort in winter is provided through the unusual use of thermal mass in the form of very thick walls made of stone and concrete combined with more common tropical design features such a raised timber floor, high ceilings, a highly insulated curved skillion roof, and highly openable living spaces (inside and outside) which are ideally oriented to the north-east for natural day-lighting and breeze access.



Photos courtesy ecoSAVVY

A participant in the Magnetic Island Solar Cities Program the household have take on a number of innovative initiatives to effectively reduce their electricity consumption including hardwiring appliances to tariff 33, energy efficient lighting, an in-house energy monitor and installation of 1kW of solar panels on the roof.

Proudly coordinated in North Queensland by NQ Dry Tropics and ecoSAVVY.

Wallaby Way House - 20 Wallaby Way, Horseshoe Bay (Magnetic Island)

This spectacular new home was designed with the specific and primary intent of allowing and encouraging occupants to be 'close' to the outdoors. Boundaries between inside and out are both permeable and removable.



Photo courtesy ATA / Sanctuary Magazine.



Photo courtesy NIM Photo, Townsville

The entire building can open up to let in - the tropical breeze or the sound of rain. Wide overhangs and copious verandah spaces allow the building to remain open and used even during relieving summer downpours. The building is about living in and with the tropics. The home features steel and timber structural elements, and thermally responsive fibrecement wall cladding in combination with highly openable windows, doors, louvres, shutters, timber batten breezeways and insect screens. The roof is corrugated iron sheeting with air-cell type insulation.

Klug Home, 27 Barbarra Street, Picnic Bay (Magnetic Island)

Photos courtesy ecoSAVVY.

This 2 bedroom, 1 bathroom, home, was designed and built four years ago as Victorian couple John and Val's winter home. The home was designed specifically to be suited for use during Magnetic Island's mild tropical winter weather and to support a minimalistic and beachy lifestyle. The home features a large outdoor patio/living/dining area, excellent transitions and connection with the outdoors – including rainforest garden to the rear, a very high curved ceiling over an open plan design with partition walls, large fixed windows high under curve of roof provide excellent natural daylighting and rainforest views, great orientation to prevailing breezes and plenty of openings for cross ventilation. The home is participating in the Townsville Solar Cities Project has as undertaken retrofits advised in that program and as a particularly innovative part of the Project, the Klug's host a third-party owned 1.5kW solar panel array on their roof.



PARTICIPATING HOUSES

Proudly coordinated in North Queensland by NQ Dry Tropics and ecoSAVVY.

Townsville Solar Cities, Smart Lifestyle Centre, 64-88 Horseshoe Bay Road, Horseshoe Bay (Magnetic Island)

Ergon Energy's Smart Lifestyle Centre is an information dissemination point for the Magnetic Island Solar Suburb initiative, which is part of the Townsville: Queensland Solar City Project.

The building which is not unlike most modern Townsville homes in many ways – ie concrete block walls, concrete slab on ground and metal pitched roof and limited airflow inside the building, has been extensively retrofitted to improve its ability to provide a cool and comfortable living / working environment with significantly reduced energy consumption and only an occasional air-conditioner use.

The building also underwent a range of energy efficient retrofits and the trialling of innovative solar technologies including solar panels, leading edge batteries and a solar concentrator. The site is now not only energy efficient but is considered not only carbon neutral but carbon negative!



Photo courtesy ecoSAVVY.

Solar City Energy Assessors will be on hand at the Smart Lifestyle Centre on Sustainable House Day.