

# GOODWE

Engineered by  UMAX

BOTANY, SYDNEY



## PROJECT CASE STUDY

# BOTANY SOLAR CARPORT

### Strix Series light steel structure

Botany, Sydney | NSW, Australia

GoodWe Polaris Series panels



**55.08** kWp

SOLAR CAPACITY



**23**

PARKING BAYS



**102 × 540 W**

SOLAR MODULES

# Panels, structure and waterproofing



The Botany carport combines a Umax Strix Series light steel structure with 102 GoodWe Polaris Series 540 W panels. The 55.08 kWp system is arranged over 23 parking bays at a new commercial development in Sydney.

## ◆ **GoodWe Polaris**

102 x 540 W panels form the solar roof, with a total rated capacity of 55.08 kWp.

## ◆ **Strix Series**

Modular light steel framing with bolted connections, designed around the parking layout.

## ◆ **Waterproof roof**

Overlapping panels and built-in drainage channels form a waterproof roof and direct rainwater away.

# Structural design & delivery

Strix Series light steel structure



Polaris roof and drainage connection  
Strix frame and column base



## Site layout review

The carport layout was coordinated with the development's final parking plan

## Structural & footing design

Design of the light steel frame and foundations to suit the site

## Engineering & certification

Engineering calculations, construction drawings and certified structural design

## Fabrication

Fabrication of the Strix Series light steel components for the Botany project

## Supply

Supply of the carport structure to the project team



## Inverter

### ◆ GoodWe inverter

Three-phase string inverter, wall-mounted beside the switchboard

# Solar roofing over 23 bays



## ◆ Shade and rain protection

The waterproof Polaris roof provides cover above the parking bays

## ◆ 55.08 kWp solar capacity

102 GoodWe Polaris Series panels, rated at 540 W each

## ◆ Light steel construction

The Strix Series frame uses modular steel components and bolted connections

## ◆ Existing parking footprint

The solar roof sits above the parking area, leaving rooftop space available for other uses

## Discuss your next carport project

For commercial solar carports, Umax provides structural design, engineering, fabrication and supply.

## DISCUSS YOUR PROJECT

☎ 1300 950 868

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