

# Building smarter, sustainable cities.

A 37% energy savings justifies the chosen LED scheme for Stage 2 of the Albany Park & Ride major extension. Fast pay back and a 'fit and forget' approach to maintenance made this scheme a practical choice for Auckland Transport.

### Challenge/Solutions

The Albany Park & Ride facility runs alongside State Highway 1. Controlling the spill light and glare were important factors to consider in the lighting design calculations. The Cree LEDway with backlight shields were chosen because of their exceptional spill light control. They also provide clean, bright light, ensuring Albany Busway users are able to navigate to and from their cars with comfort and security.

A 'fit and forget' approach to maintenance was essential. Vandal resistant, easy to maintain, 'Pracht Troja' luminaires were implemented in the bus shelters (4 in each shelter) and custom painted to match the steelwork.

In a car park environment there is always the risk of 'car versus pole' damage. All the poles were located on raised concrete pile foundations to help prevent this mechanical damage. Custom made brackets for CCTV cameras were also incorporated into the application.

From a design aesthetic perspective, the poles were also sized to complement the aesthetics of "Luna" – a 7 m tall limestone sculpture that was commissioned by Auckland Transport.

## **Key Benefits**

- 37% energy cost savings
- Payback of 2.5 years for the LED fittings compared to the HID fittings already installed for Stage 1
- Low maintenance 'fit & forget' approach









### Project Title

- Albany Busway Park & Ride Extension, Auckland, NZ

#### Client

- Auckland Transport

### **Advanced Lighting Specialist**

-Antony Collett, MIES

#### Contractor

- Coll Electrical Limited

#### **Project Completion Date**

- August 2012

#### **Applications**

-Transportation

#### Services

- Lighting calculation service
- Lighting brief development
- Pole and luminaire package

#### Product

#### SHELTER LIGHTING:

- 44 x Pracht 'Troja' 1 x 21W/840 T5

### CARPARK:

- 18 x Ruud 7.0m 5mm poles mounted on 600mm raised concrete pile foundations.
- 5 x poles with custom made brackets for CCTV cameras.
- 18 x Cree 'LEDway' 120LED 700mA 4300K 272W - 3No. with backlight shields (T4MB) 15No. T5M
- 1 x Ruud 6.0m 5mm pole mounted on a 600mm raised concrete pile foundations with custom bracket for CCTV camera.



#### **Product Warranties**

Light Fittings – Cree Manufacturer's Warranty of 10 years Light Fittings – Application Life of 20 years