

Project Name: Gardens of the World – Berlin Ropeway



Company:	Leitner AG Leitner Seilbahn Berlin GmbH
Location:	Berlin, Germany
Project Date:	2016
Main Contact:	Hermann Schwarzenbacher Head of Operations
Application:	Stand Alone Radio Transmission
Customer Type:	OEM - Designer / Project Management & Operations
Phocos Product:	ECO10 Charge Controller
Quantity:	64 Units

Project Description/ Key Details

- General Description - Gardens of the World Ropeway: 1.5 km long route has 3 stops and serves two purposes. 1) Accessible means of transportation for visitors of the "Gardens of the World" attraction. 2) Provides functional transportation between city districts with direct connection to the subway station. 6000 passengers/hour are serviced by this gondola lift.
- Each individual gondola required power to run a radio transmitter and loudspeaker. Installing a utility grid powerline was technically impossible because the gondolas are always moving and are also detachable from the rope.
- The power solution needed, must create energy that is quiet, clean, and performs well in vibrating conditions
- Equipment must be proven to handle large temperature fluctuations
- Each cabin is designed to hold 10 passengers, so space and weight were an important consideration when deciding how to generate and store power for each gondola cabin.

Solution/ Results

- Solar was the clear choice to offer the flexibility required for this project. A compact, lightweight PV system design provides mobile and independent electricity to each of the 64 individual gondola cabins to power the radio transmitter and loudspeaker in each unit.
- 64 self-contained solar unit packages were purchased, including a 20W, 12 Vdc solar module and the Phocos ECO10 Charge Controller. The ECO10 has proven to be the perfect, cost effective solution to meet the demands specified for this project. Between occasional condensation, vibrations, and large temperature fluctuations, this rugged product has proven reliable from the first day of service.
- The ECO10 is IP68 and the customer has noted they trust the high quality Phocos provides, and the excellent price performance ratio this PWM charge controller offers.

"The Phocos ECO10 optimally fulfills our sometimes high demands in mobile use: small, light, withstands vibrations, large temperature fluctuations and occasional condensation."

-- Mr. Hermann Schwarzenbacher
Head of Operations

6000

Passengers per hour are serviced on this gondola lift

3 Million

trips completed in the first six months of the cable car's operation

Featured Product:



**ECO10
Charge Controller**