

# POD Hotel – Times Square

## Hospitality

### The Challenge

Making small stylish in the heart of New York City is the Flagship Pod Hotel-Times Square, located at 42nd street.

This micro hotel comprises 257,722-square-feet, rising 28 floors with 665 rooms – in addition to 45 Pod Pad apartments offering short and long-term leases. Guest rooms range from 250 to 300-square-feet, while shared amenities offer more spacious layouts for dining, co-working, and socializing.

The Pod Hotels are known for minimizing unnecessary extras, which extends to their focus on environmental elements - from solar panel heating to energy-efficient lighting to eco-friendly amenities.

Hotels are among the highest consumers of energy and water per square foot, compared to other commercial buildings. Determined to reduce the building's reliance on the local energy grid and increase efficiency, the hotel developers turned to Capstone Green Energy distributor, RSP Systems for an on-site cogeneration solution.

### The Solution

Commissioned in 2017, the combined heat and power (CHP) system consists of two Capstone C65 Microturbines offsetting nearly 15% of the buildings electrical usage.

### Power Profile

#### Customer

POD Hotel – Times Square

#### Location

New York, New York

#### Commissioned

2017

#### Fuel

Pipeline Natural Gas

#### Technologies

- (2) C65 ICHP Dual Mode, Microturbines

#### Capstone Green Energy Distributor

RSP Systems



**For the Pod Hotel, the installation of microturbines not only significantly contributed to overall energy savings for the building but also generated a revenue stream by reducing electricity costs from the utility company. Additionally, the system provided substantial savings for their heating expenses, further enhancing the hotel's operational efficiency and sustainability."**

— Bruce Beckwith, Executive Vice President  
RSP Systems

A photograph of the Pod Hotel Times Square building, featuring a modern glass facade and a prominent "pod" sign. The image is overlaid with a green tint.

**Smarter Energy  
for a Cleaner Future**



Two C65 microturbines can generate 130 kW of electrical power and have an efficiency rate of up to 90 percent in CHP applications.

Located on the 30th floor, the integrated heat recovery module (HRM) of the microturbine feeds the building's boiler heating systems via hot water storage tanks which provides part of the building's heating system in the winter and the building's domestic hot water load all year round.

In the cogeneration process, the microturbine's exhaust heat is harnessed to create both electrical and thermal energy. The integrated HRM mounted over the C65 captures the microturbine's waste heat, providing significant energy and cost savings while reducing emissions.

In addition, to being compact and quiet, the microturbines are configured in a dual mode operation, allowing the property to provide backup power to critical loads in the event of a utility grid outage.

As part of the installation, RSP Systems delivered a carefully executed strategy, which included securing a public grant, minimizing service disruption to guests, and reducing noise.

## The Results

The cogeneration facility has been fully operational since 2017. Increasing energy efficiency, offsetting grid power and lowering carbon emissions have allowed POD Times Square to ensure power availability and help preserve the environment with the cogeneration systems' near-zero emissions profile.

### By the numbers:

- **\$70,000 utility fee savings (electricity & gas)** - In 2023, the microturbines saved 65kWh of energy a month, reducing the total energy consumption by more than a third.
- **55,000 hours (about 6 and a half years)** - Approximate amount of the continuous run time logged.
- **130kW** - The energy produced by the microturbines, reducing the site's total energy consumption by more than a third.
- **100%** - The microturbines are exclusively responsible for heating the building's water for domestic use year-round. In the winter, the system also contributes partially to heating the building.
- **50%** - Amount of the overall project expenses covered through an incentive program provided by the New York State Energy Research and Development Authority (NYSERDA) CHP Program (PON 2568).