

DAS-CF-20/1-EU



## Battery-driven Converter Caddy 90kVA / 180kVA

### INTRODUCTION

The Cavotec Battery Driven Converter Caddy is a hand-guided, battery-driven electrical mobile Ground Power Unit supplying 400Hz power to aircraft during ground handling operations. Providing the same function as a diesel mobile GPU, it presents the benefits of being electrically driven resulting in lower operational expenses and avoidance of pollution.

The Cavotec Battery Driven Converter Caddy is equipped with a 400 Hz jet cable featuring the Cavotec Aircraft 400Hz Connector and provides an outreach of up to 48m from its power source thanks to a 40 m long 50 Hz cable. Easy cable management due to cable storage on a motorized cable reel automatically reeling in and out when the caddy is being moved.

### ADVANTAGES

- 24V DC Mobile chassis, equipped with a 400Hz electrical 400Hz Solid State Frequency converter reducing operational costs
- Low noise pollution
- Battery driven chassis avoiding the investment, cost of operation and pollution of airport tugs
- Higher ground handling efficiency with one-man operation, fast deployment and user-friendly for ground operators with less physical strength
- Automatic battery charging when being plugged-in to the 50/60Hz mains power
- Low maintenance cost due to the solid state frequency converter, longer life cycle of the 400Hz and 50Hz power cables being stored on the motorized cable reel
- Improved safety on the apron
- Increased 400Hz redundancy for airports already having fixed 400Hz power at the gate or apron
- Reduced 400 Hz power losses due to short cable compared to usage of fixed 400 Hz converter

### COMPONENTS

#### Carriage

- Carriage with 24 V DC battery powered motor
- Batteries are maintenance free and will be automatically recharged
- Controlled via drawbar with shift paddles and key switch
- Basket for 400 Hz aircraft connector on top of the Caddy
- Integrated stairs to make reaching the aircraft receptacle easier
- Colour pure white RAL 9010

#### Cable drum

- Motor overload protection
- Positively driven cable outlet
- Power transmission from reel to 400 Hz converter with slip ring

#### 400 Hz cable

- High flexibility at all operating temperatures
- Low adhesion, abrasion resistant, halogen-free
- Resistant to UV radiation, oil, hydrolysis and microbial attack



Positively driven cable outlet



Power transmission via slip ring



Drawbar with control elements

## COMPONENTS

### Cavotec Aircraft Connector

- Replaceable contacts, connector housing and front part
- All contacts sealed with water proof resin
- Micro switch ensures voltage is applied only when proper mechanical connection is established
- LEDs to show connection status
- Control buttons let operator control 400 Hz supply

### 400 Hz frequency converter

- Custom-made
- Solid state, 90 kVA / 180 kVA, 115/200 V



## TECHNICAL DATA

Cable Type	Dimensions L/W/H (mm)
Maximum velocity:	4.5 km/h
Dimensions	2076 mm x 1310mm x 1540mm / 82" x 52" x 61"
Weight:	1500kg / 3307 lbs
Carriage motor:	24 V DC / 900 W
Braking system:	Controlled by drawbar; in upright position brake is activated
Battery:	2 x 12 V / 100Ah
Battery charging via integrated charger, supply voltage:	50/60 Hz 110/220 V
Motor cable drum:	24 V DC / 600 W
Length 50 Hz-cable:	up to 40m / 131 ft
Length 400 Hz-cable:	ca. 8 m / 16 ft
Frequency converter:	400Hz / 90 or 180 kVA
Input:	3-phase 400V / 50/60 Hz $\pm$ 15% / ca. 115A/230A
Output:	3-phase 115V / 200 V / 1 x 90 or 180 kVA / 400 Hz / PF 0.8
Temperature Range:	-25° to +40°C

## TECHNICAL DIMENSIONS

