

PUBLIC



# Hitachi Energy - BusWorld North America Conference

Grid-eMotion Fleet – Charging more, with less

Alexandre Lalonde – Grapewine, TX – January 10, 2022

# Motorcoach Electrification – The future is green!

Today's vehicle range

>200 miles

Today's infrastructure

Depot Charging  
(return to base)

Future

400-500 miles range  
Public ultra-fast charging  
(shared with eTrucks)





# Our vision of large-scale e-mobility

## All-in-one digital platform



**Fleet telematics, scheduling and asset management**



**Digitally-enabled services**  
(spare parts optimisation, predictive maintenance tool)



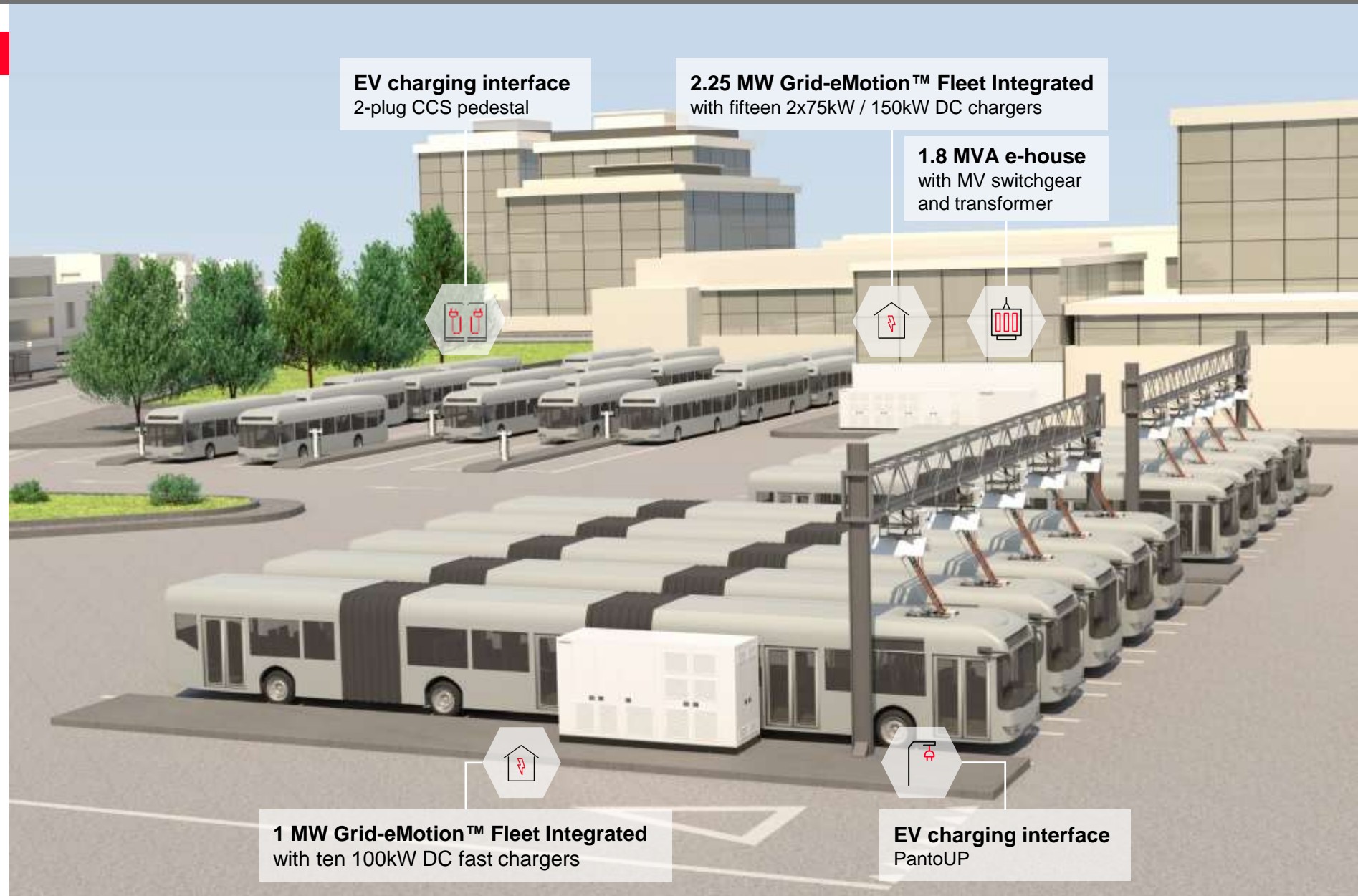
**Smart charging**  
(load balancing, priority charging, preconditioning)



**EVCI remote monitoring**  
(on cloud and on premise)



**Charging system control**  
(OCPP compliant)



Designed to electrify large-scale electric vehicle fleets,  
Grid-eMotion™ Fleet Integrated uses AC/DC centralized rectification

## 01

- Plug-and-play concept
- Factory assembled and tested
- Relocatable, expandable

## 02

- Available with direct connection to MV grids
- CCS plug up to 200 kW
- e-bus pantographs up to 600 kW

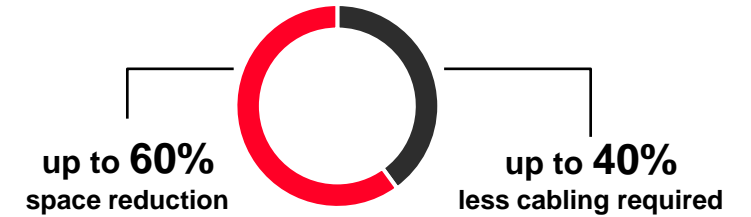
## 03

- On-cloud / on-premise remote monitoring
- Energy Management System (OCPP)
- Connectivity to fleet management (VDV)

**1 MW**  
total charging power  
and scalable up to 2 MW

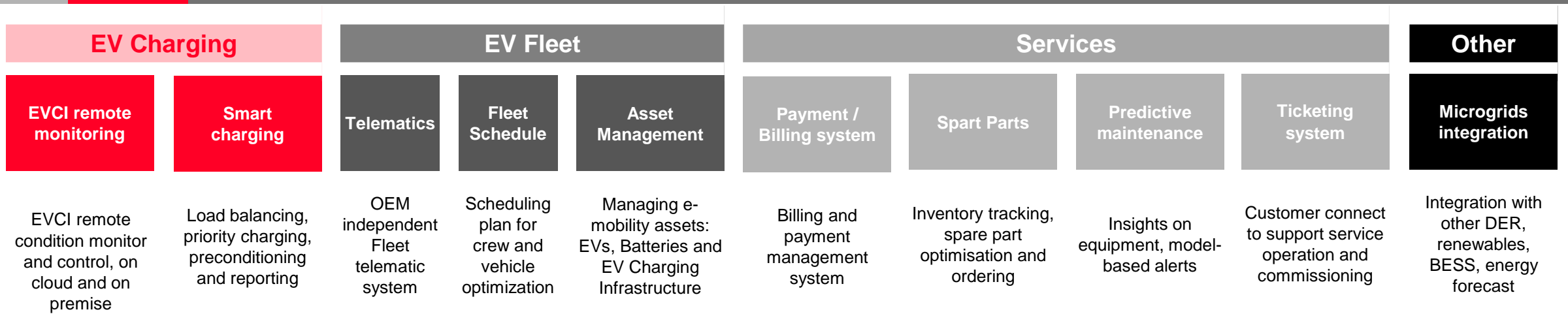
**40 EVs**  
charged with direct, sequential  
or simultaneous charging

Creating value for our customers  
towards a carbon-neutral future



**Robust, reliable, scalable and easy to deploy charging solution for fleet electrification**

# All-in-one digital platform for e-mobility



Plug-in different modules

- **Remote condition monitoring** features Predefined **smart charging** “engines” that comply to industry standard (OCPP, VDV, Modbus and OpenADR)
- **Hitachi Energy connect** portal, to support commissioning, operation and spare part requests
- **Digitally-enabled service** “brains” to optimise spare parts request and **predict maintenance tasks**
- Interoperable interfaces with **Fleet telematics, scheduling** and **asset management**



Manage remote monitoring, smart charging, ticketing system and service level agreement in one user experience



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Inspire the Next 