



Perspective on Energy Storage Systems developments in South America

ABOUT US

South America's
largest battery
manufacturing hub
**and one of the most
advanced in the world**



67 YEARS
FAMILY OWNED
COMPANY
FOUNDED IN BRAZIL



SUPPLYING OEM
FOR
45 YEARS



7 INDUSTRIAL PLANTS
6 BRAZIL
1 ARGENTINA



> 10 MILLION
CAR BATTERIES
PER YEAR



+6.700
EMPLOYEES
(inc. Distribution)



**GREAT PLACE TO
WORK**
43rd IN BRAZIL AND
24th IN ARGENTINA

MANUFACTURING



DISTRIBUTION



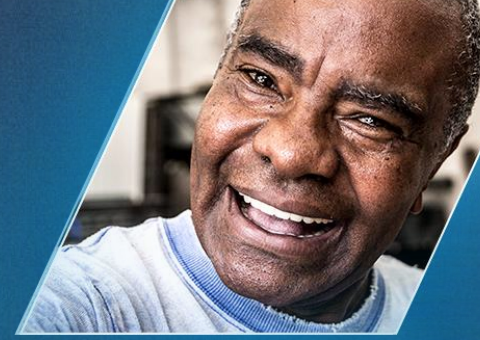


COMPLETE

PORTFOLIO

32
MILLION

PEOPLE NEED
BATTERIES PER YEAR IN
SOUTH AMERICA



MOURA

- MOST REMEMBERED
- BEST-SELLING
- TOP OF MIND

among our consumers in Brazil,
Argentina and Uruguay.

1st PLACE
IN ARGENTINA



1st PLACE
IN BRAZIL



1st PLACE
IN URUGUAY

MOURA'S ENERGY

+40 YEARS OF

CIRCULAR ECONOMY

100% aftermarket battery – scrap collection



GLOBAL TECHNOLOGICAL PARTNERSHIPS



RESEARCH & DEVELOPMENT

Non-profit independent
R&D institute
+10 years of research and
development
40+ team focused on
developing future technologies
& business models



Intelligent
charging
systems



EV chargers
connected
to BESS



Monitoring
IoT

ESS MARKET OVERVIEW



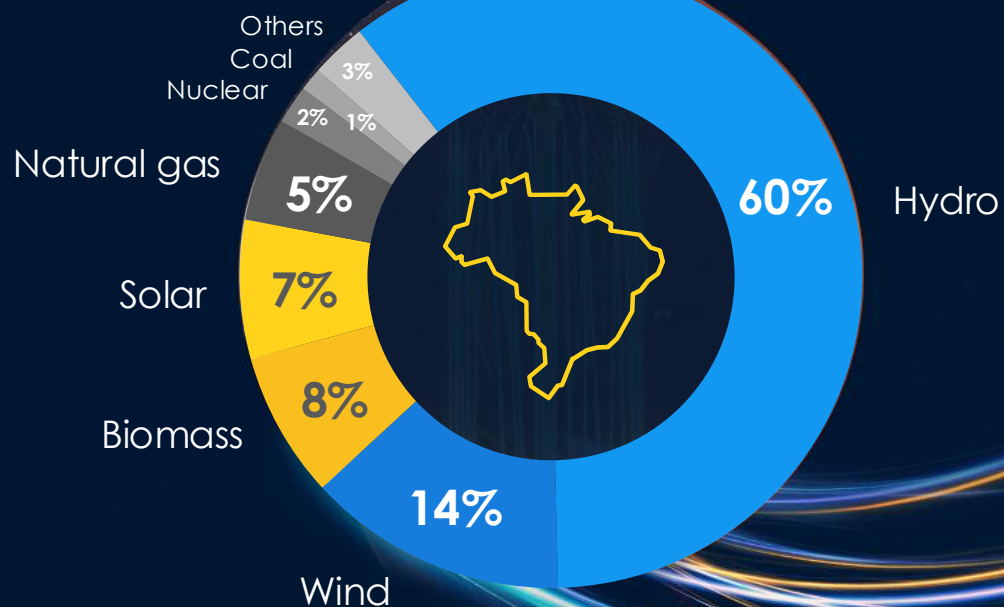
CLEAN ENERGY TRANSITION



The world
is targeting
to reach
70%
of its energy
source from
renewables
by 2050

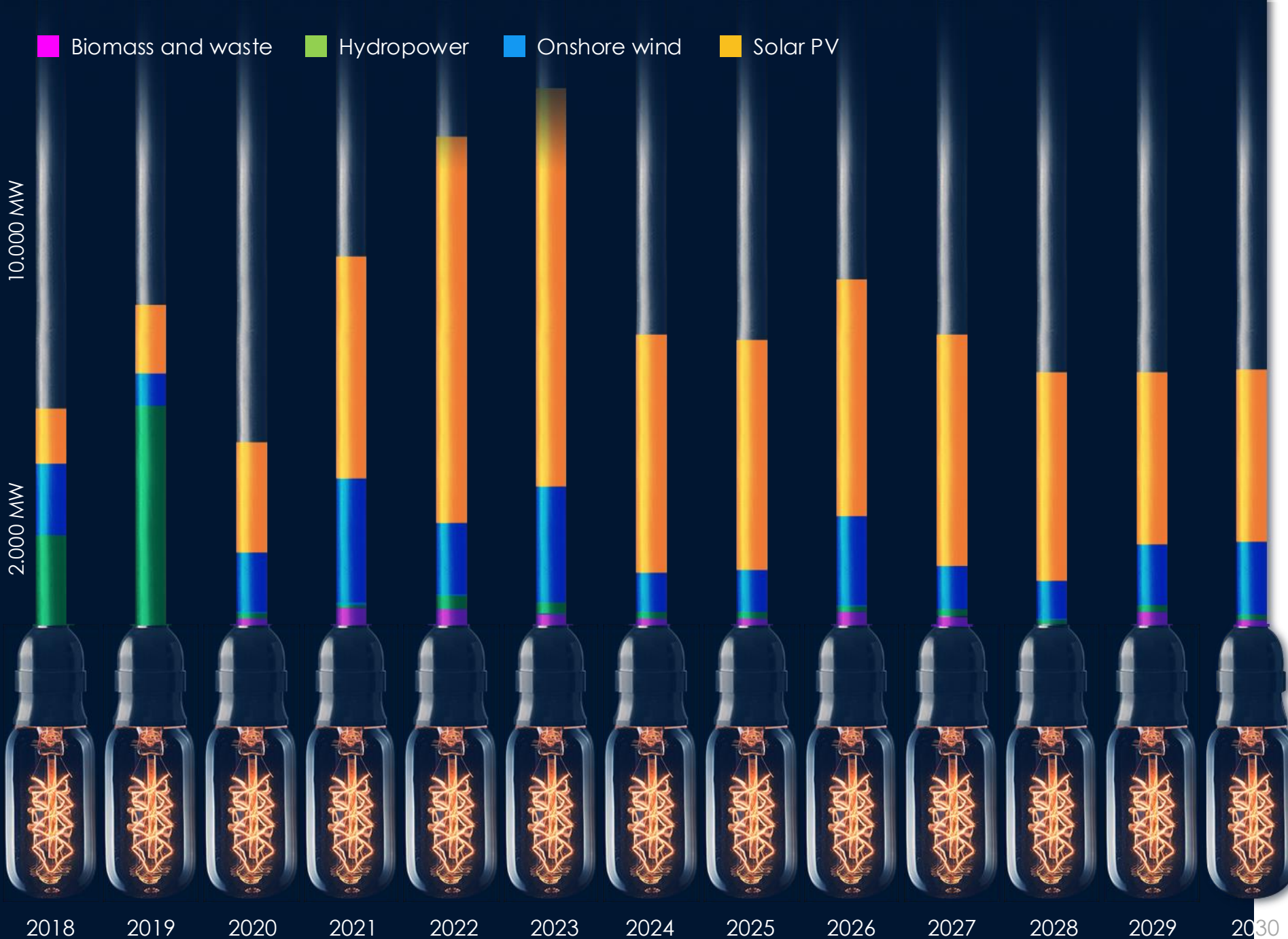
BRAZILIAN PERSPECTIVE

Total Energy Supply 2023



89%

of Brazilian electricity
is already from
renewable sources



RENEWABLES CAPACITY ADDITIONS

Most of the **investments for capacity** additions are in renewable.

Brazil will reach, by 2031, **32%** from its power coming from wind and solar

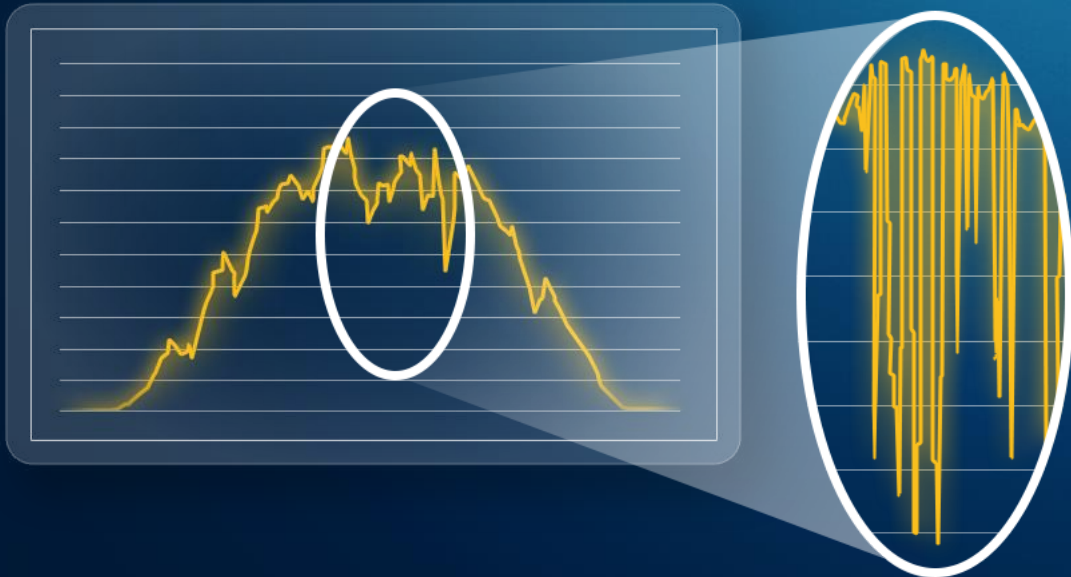
ENERGY TRANSITION AND ITS OPPORTUNITIES

The Role of BESS in Facilitating the Energy Transition

The production of renewable energy is intermittent, variable, and non-dispatchable.

PV Generation
(15 min measurement)

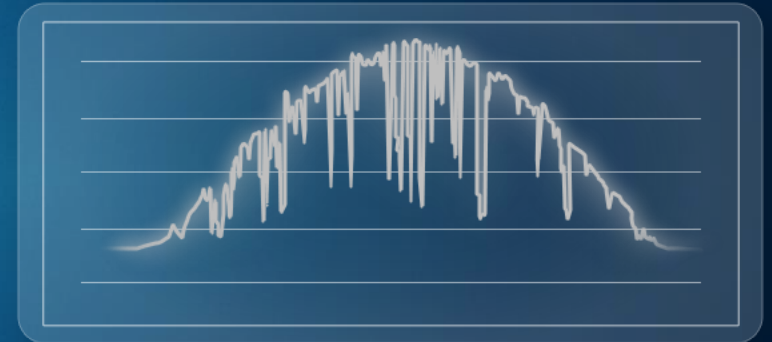
PV Generation
(1 min measurement)



Ensuring dispatchability and reliability of renewable sources.

PV Generation
without BESS

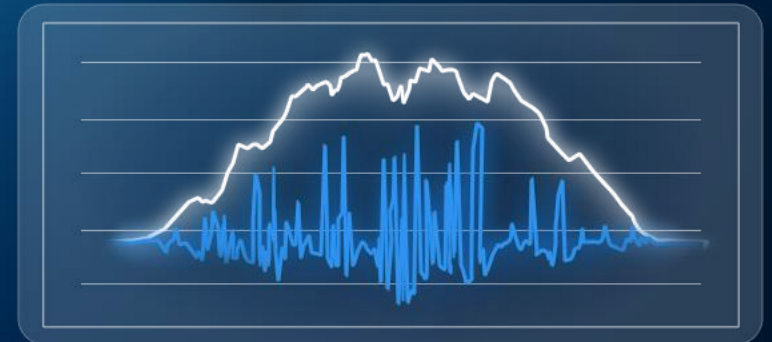
○ PV



PV Generation
Supported
by BESS

○ PV + BESS

● BESS
Operation



MOURA ESS – PRODUCT PORTFOLIO

MODULAR DESIGN

240 kWh

LFP

Liquid cooling - 1.0 kV



Energy Arbitrage
Microgrids
Ancillary Services
Power Smoothing
Backup Power

410 kWh

LFP

Liquid cooling - 1.6 kV



Energy Arbitrage
Microgrids
Backup Power
Defense & Special scenarios

150 kWh

PbC

1.0 kV / 1.5 kV



Time of discharge (h)



REAL CASES





**Application: Auxiliary Power
backup and PV Power
Smoothing** at a grid
substation

PbC 500 kW / 1700 kWh

LFP 250 kW / 430 kWh

APPLICATION NOTES

UTILITY APPLICATION

PV
Capacity
900 kWp

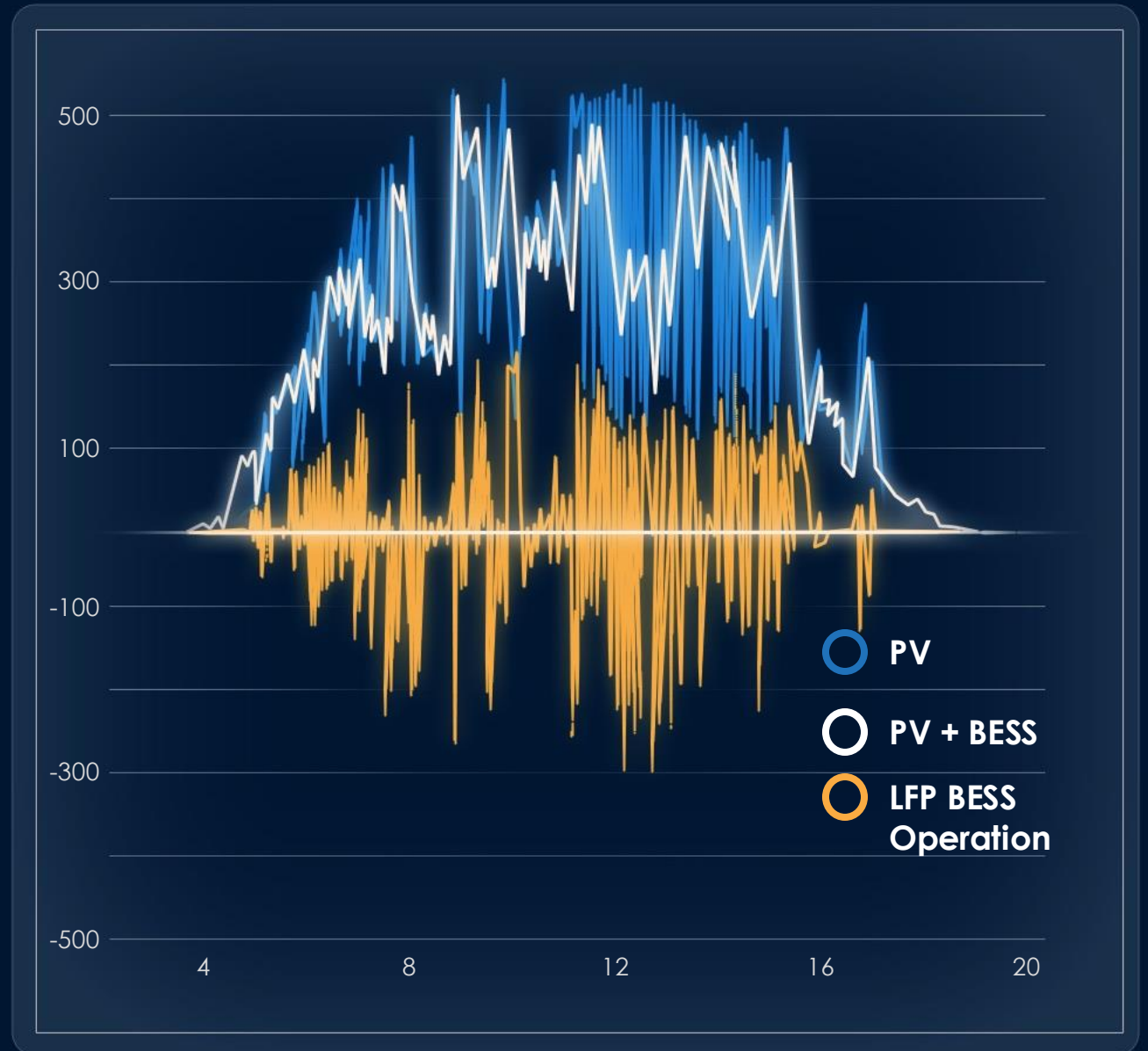
PbC BESS
Capacity
**500kW -
1.700kWh**

LFP BESS
Capacity
**250kW -
430kWh**



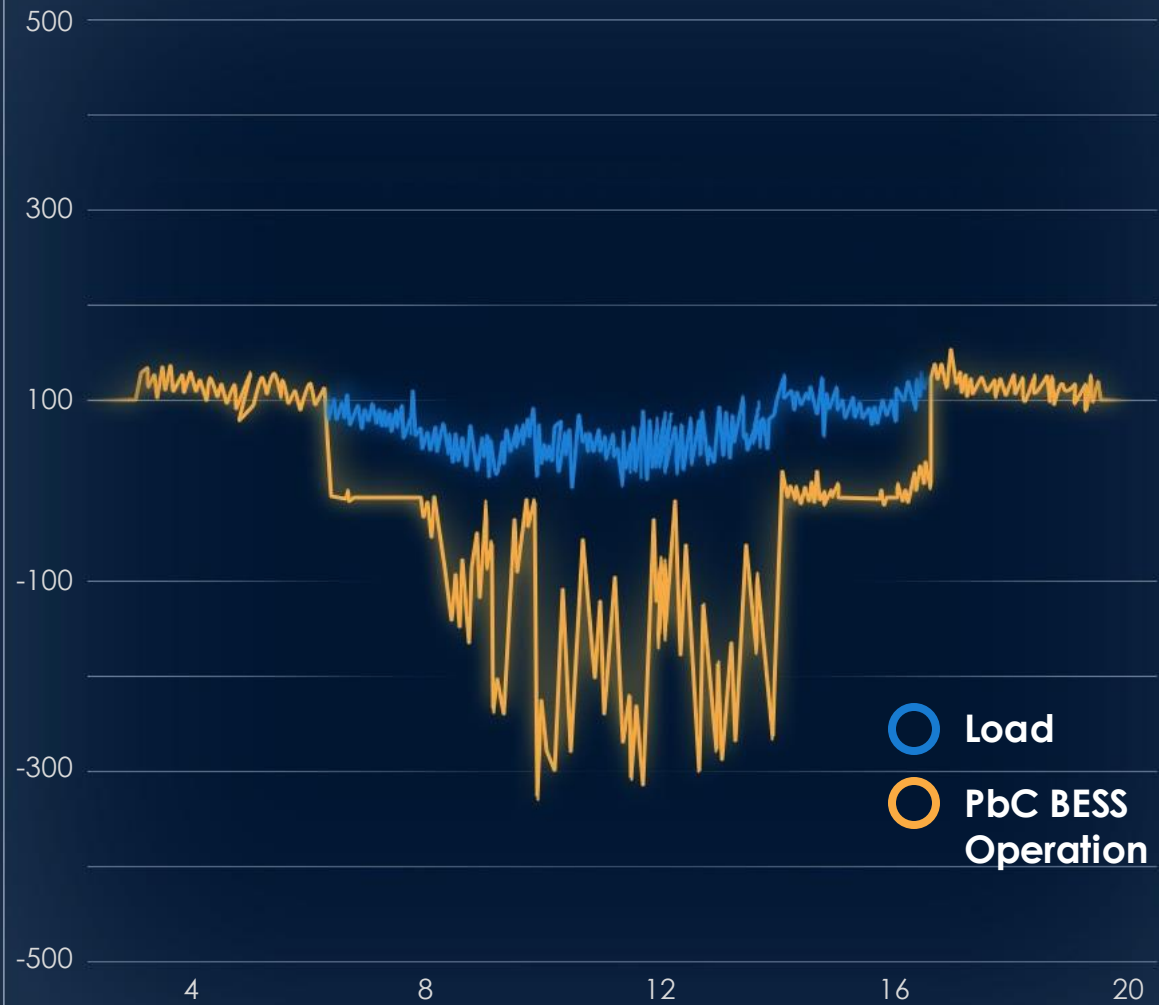
LFP ESS

OPERATION



PbC ESS

OPERATION





DECATHLON

**Application: EV Charging
Station at a Mall**

PbC 100 kW / 250 kWh



**Application: Arbitrage
and peak shaving** in a
large scale fruit
producer

PbC 500 kW / 900 kWh





Application: Backup power and arbitrage at a water utility company

PbC 500 kW / 1.800 kWh





THANK YOU