

#### ABOUT PYLONTECH

#### **VISION**

To energize billions with smarter power

A **long-termist** in the industry, starting from 2009 and delivered the first energy storage system back in 2013.

The **first publicly listed company** in China in 2020 with a primary focus on **energy storage** as its core business.

**Integrating industrial chain:** cells, BMS and system integration.



#### STRONG R&D CAPABILITIES

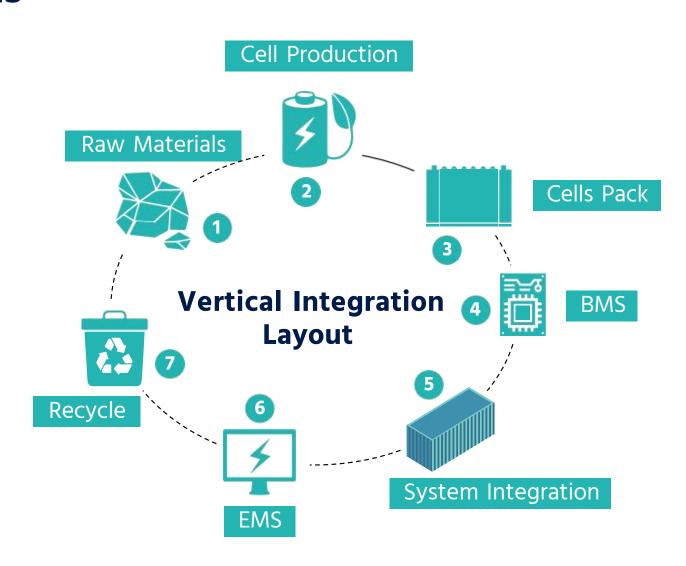
8.56%

**R&D** Investment

30.66%

The ratio of research and development (R&D) personnel

238+
Independently-Developed Patents



#### STRONG R&D CAPABILITIES

- Top Reliability Certified
- Product Design Suitable for Global World
- Fair Trade for Global Customer

#### **Global Certifications**

IEC62477-1 UL1973 UKCA

IEC62040-1 UL9540A CE LVD

IEC62619 CE EMC

IEC63056 UN38.3

VDE-AR-E

2510-50















UL 9540A TESTED



#### PYLONTECH

#### **Our Mission**

Liberating Your Energy Sustainably

#### **Our Value**

To Energize Billions With Smarter Power

### **Original Lithium Battery Manufacturer**

13.5<sub>GWh+</sub>

Battery Production
Capacity Only for BESS

# VERTICAL INTEGRATION

Vertical production chain from raw materials to system levels

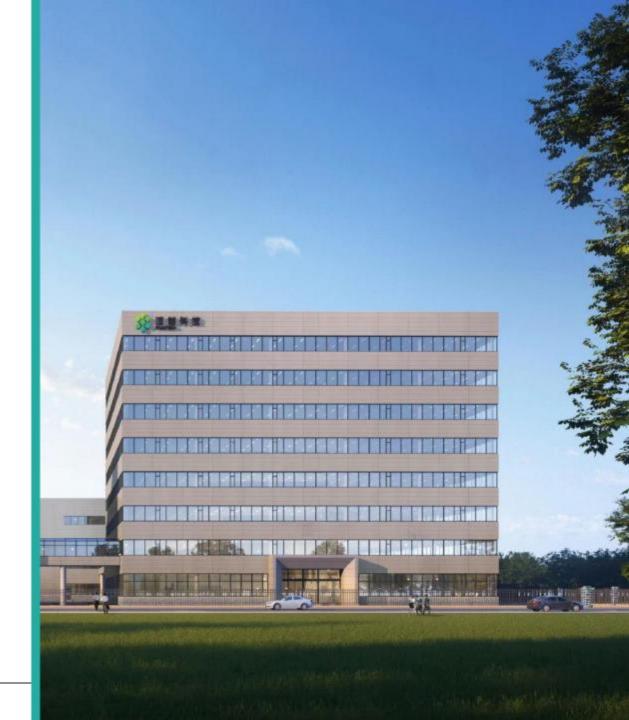
#### **10 Years+ Dedication**

Top1

1.000.000+

Residential BESS Supplier Gloablly

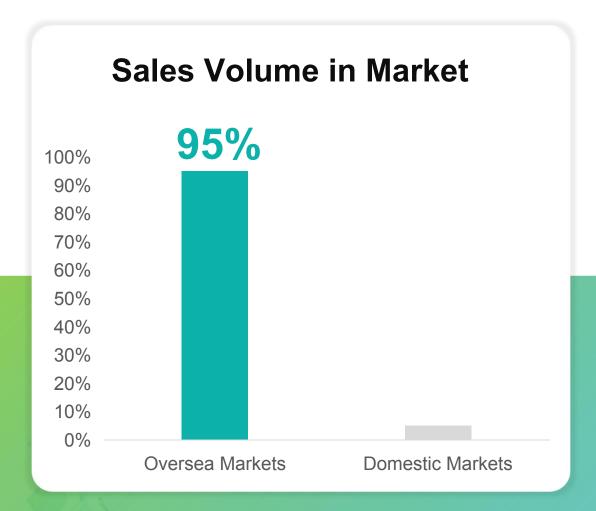
1 Million+ BESS Systems Delivered Since 2013

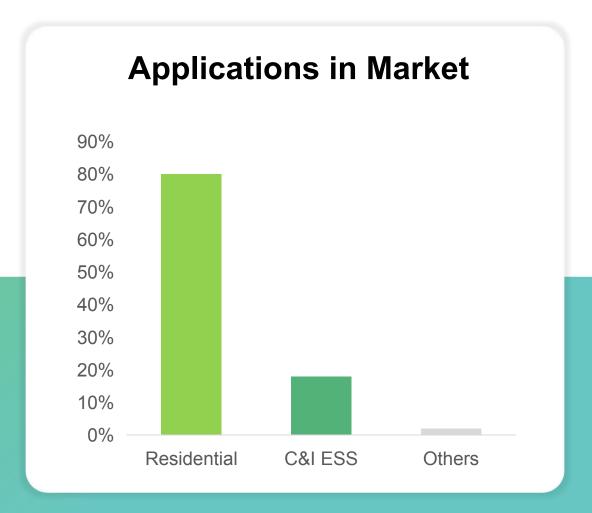


# Milestone



# **Business Structure**







#### PYLONTECH GLOBAL Netherlands Germany Japan Spain In Progress USA UK Headquarter Shanghai, China Italy **Global Service Center** Kunshan, Jiangsu Yangzhou, Jiangsu UK North America • Huangshi, Hubei Germany South America Hefei, Anhui Italy Mexico Spain South Africa Australia Czech Republic Australia Belgium In Progress

# **Products**

# Voltage



12V

24V

48V

48V

473Wh

**UP Series** 

2.8kWh Lead acid battery replacement Light RESS

**US Series** 

2.4, 3.5, 4.8kWh / 19" rack mount

Force-L Series

3.5kWh / IP55 / stackable mount

Pelio

5.1kWh / IP65 / stand-alone

Amber Rock / Mini Amber

Camping/Caravan

**RV/PY12100** 

1.2kWh Caravan/track/Marine etc.



Certifications

☑ IEC62619

☑ IEC63056

✓ CE

☑ VDE2510-50

☑ UL1973

☑ UKCA

☑ JET/JIS

2.4, 4.8kWh / 19" rack mount

**BP Series** 

# **Products**

# High Voltage



400V

Force-H Series 3.5kWh / IP55 / Stackable mount

Powercube-X Series 2.4, 3.5kWh / 19" rack mount







1000V

#### Powercube-H series

2.4, 3.5kWh / 19" rack mount Light Commercial

#### Powercube M1C / M2

108kWh/rack Up to 32 racks per system Up to 1C-rate for daily cycle application

#### **Optim US**

60~240kW / 100~400kWh All-in-one ESS solution PCS, BESS, EMS, HVAC, FSS pre-mount

#### LiPower-U100-400

5.7kWh / 19`` rack mount 3.6C discharge Data Center



1500V

1000~1500V

#### Powercube-M3 series

182kWh/rack Up to 32 racks per system 0.5C ~ 1C continuous operation Powercube-20H/40H

Up to 3.3MWH per container Utility ESS

☑ IEC62619

☑ IEC63056

✓ CE

✓ VDE2510-50

☑ UL1973

☑ UL9540A

☑ UKCA

✓ JET/JIS

# PYLONTECH Portable Series Amber Rock- AR500/2000







**AR500** 



**AR2000** 



## **Amber Rock- AR500**

# Boosting more power with Extendable Battery Pack



Amber Rock 473Wh



Max. 60W for phone charge



Mini Amber 473Wh



Max. 100W for laptop charge

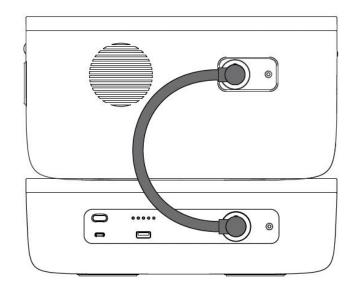


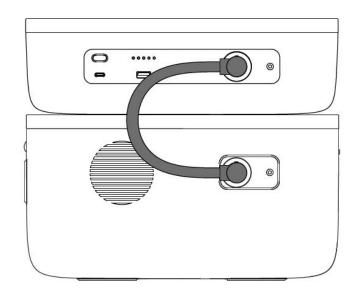
Amber Rock/Mini Amber 946Wh



2.0/3.0 Fast Charging port

# **Amber Rock- Capacity Expansion**





# Specification

#### Amber Rock Plus



#### Mini Amber



Nominal Capacity:	473Wh	473Wh	
Cell Material:	lithium Ion Phosphate (LFP)	LFP Lithium Ion(LFP)	
Size:	303*198*161	303×198×108	
Weight:	6.4kg	3.2kg	
Working temperature:	0~40 °C	0~40 °C	
Output:	2 AC 1 USB-A Port 1 Type-C Port 1 Cigar Lighter 2 DC jack	1 USB-A Port 1 Type-C Port	
Input:	9hrs full charged-Standard Charger 2hrs full charged-Optional Charger		

PYLONTECH Portable Series
 Amber Rock- AR2000 Coming soon



# **PYLONTECH 12V Battery Series RV/RT Series**















BASIC PARAMETERS	RV12100CH	RV12200	RT12100	RT2450
Nominal Voltage (v)	12.8	12.8	12.8	25.6
Nominal Capacity (kWh)	1.28	2.56	1.28	1.28
C-rate	1.0	0.5	1.0	1.0
Heating Film	$\checkmark$	$\checkmark$	$\checkmark$	×
Bluetooth APP	×	$\checkmark$	$\checkmark$	$\checkmark$
Charge / Discharge Current (A)	100	100	100	50
Depth of Discharge (DoD)	100%	100%	100%	100%
Communication	-	Wireless Optional	CAN/RS485	Wireless Optional
Scalability*	16P	4S 4P 16pcs max.	4S 4P 16pcs max.	2S 8P 16pcs max.
Working Temperature / °C	-20~50	-20~50	-40~60	0-50(Charge) -20-50(Discharge)
Cycle Life**	> 4500	>4000	> 4500	>4000
Reference to standards	UN38.3	UN38.3, TELEC, FCC, CE	SAE J930, SAE J1455,Telec, Bluetooth SIG, UL1973,IEC62619,F CC,CE,UN38.3	UN38.3, TELEC, FCC, Bluetooth SIG
IP Rating	IP20	IP65	IP67	IP67

# **PYLONTECH Residential Battery**

# High Compatibility



















SCAN TO CHECK
FULL COMPATIBLE LIST



# **PYLONTECH Residential Battery Rack Mounted 48V - US Series**







Model		US2000C	US3000C	US5000	
Basic Paramet	ters				
Nominal Voltage (Vdc)		48	48	48	
Nominal Capacity(kWh)		2.4	3.55	4.8	
Usable Capacity(kWh)		2.28	3.37	4.56	
Dimension(mm)		442*410*89	442*410*132	442*420*161	
Weight (kg)	Weight(kg)		32	39.7	
	(Recommend)	25	37	80*	
Charge/	(Max. Continuous)	25	37	100*	
Discharge Current(A)	(Peak 1)	50~89@60sec	74~89@60sec	101~120@15min	
Cullent(A)	(Peak 2)	90~200@15sec	90~200@15sec	121~200@15sec	
Communication Port			RS485,CAN		
Single string quantity(pcs)		16	16	16	
Working Temperature/ C Charge			0~50		
Working Temperature/ C Discharge		е	-10~50		
Shelf Temperature/ C			-20~60		
Short current/duration time		<4000A/2ms	<4000A/2ms	<2000A/1ms	
IP rating			IP20		
Cooling type			Natural		
Humidity			5% ~ 95%(RH) No Condensation		
Altitude(M)			<4000		
Design life 15+ Years (25 C //77 T		5+ Years (25°C /77°F)	15+ Years (25 C /77 T)	15+ Years (25 C /77 F)	
Cycle Life >8,00		>8,000 25 °C	>8,000 25 C	> 8,000 25°C	
		JL1642/ IEC62619 /ICE63056 /ICE61000-6-2/3 UN38.3	UL1973 /UL1642 /UL9540A/VDE2510-50 /IEC63056/IEC62619 /IEC62040/IEC62477-1 /ICE61000-6-2/UN38.3	UL1973/UL9540A IEC62619/IEC63056 /ICE61000-6-2/3 /UN38.3	



# Pylontech New BESS solution



- Dual active protection
- → High current strike endurance
- Remote upgrade feature



#### Ensure Safety and Quality



#### Lithium iron phosphate (LFP)

More than 10yrs of dedicated experience on lithium battery raw matierals R&D for battery storage application only



#### 1,000,000+ Installation Experience Globally

over 1 million units have been delivered and installed in 80+ countries since 2013



# Vertical industrial chain from cells to battery system integration with own BMS

ESS-driven R&D and production in terms of performance stability and long life span from cell to battery systems integration.



#### **Extraordinary powerful performance**



#### 80A(0.8C) Continuous charge/discharge power

Peak power: 101~120A @ 15 Mins and 121~200A @15Sec; 3.2 times powerful than US2000 (25A)



#### Four Levels of current protection

Charging/Discharging MOS, dual-passive&active fuse, Pre-charge circuit, DC Brekaer to enhance the system safety



#### Smoother power supply:

Enable 50% more power during critical temperature condition



#### Flexible and easy installation



#### Flexible DIY installation methods

With standard 19inch bracket/rack/cabinet



#### Unlimited on the capacity expansion

Up to 16 units per COM string. If work with LV-HUB could maximum have 480 units in one single system.



#### Robust installation envirement

 $-10^{\circ}\text{C} \sim 50^{\circ}\text{C}$  working temperature range, up to 4000M altitude.



**PYLONTECH NEW GENERATION RESIDENTIAL BATTERY-LV** 

Pelio - L

Scalability 5kWh~100kWh

PER MODULE

**95**%

CHARGE/DISCHARGE

100 kWh MAXIMUM CAPCITY Cycle life

| 8000+ | UL9540A

Certification



# **Smaller Footprint**

0.1m² for 20kWh

Minimalist design





# High Power Efficiency

5kW continuous per single unit maximizes your Rol









**PYLONTECH NEW GENERATION RESIDENTIAL BATTERY-HV** 

## Force H3

Scalability 10kWh~210kWh

PER MODULE

100%

CHARGE/DISCHARGE

210 kWh MAXIMUM CAPCITY Cycle life

| 8000+ | UL9540A

Certification



#### ESAY INSTALLATION





## Easy to handle

Light on Weight 39kg per module



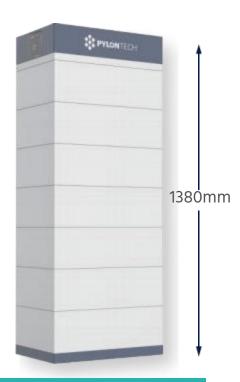
## 10kWh System

Outdoor Installation IP55 &Samll Footprint



### 20kWh System

Use Friendly
Plug & Play
High Voltage System



### 35kWh System

Easy Installation
Stackable & Fool-proof

# PYLONTECH NEW GENERATION C&I BESS SOLUTION

## Optim-US-M1C/M5

#### **High Integration**

Include Battery, BMS, HVAC, FFS and PCS(optional)

#### **Pre-Engineered System**

Easy for on-site installation and reduces the cost of storage

#### Safe and Reliable

Self-developed battery and BMS with UL-Certified system

#### Flexible and Scalable

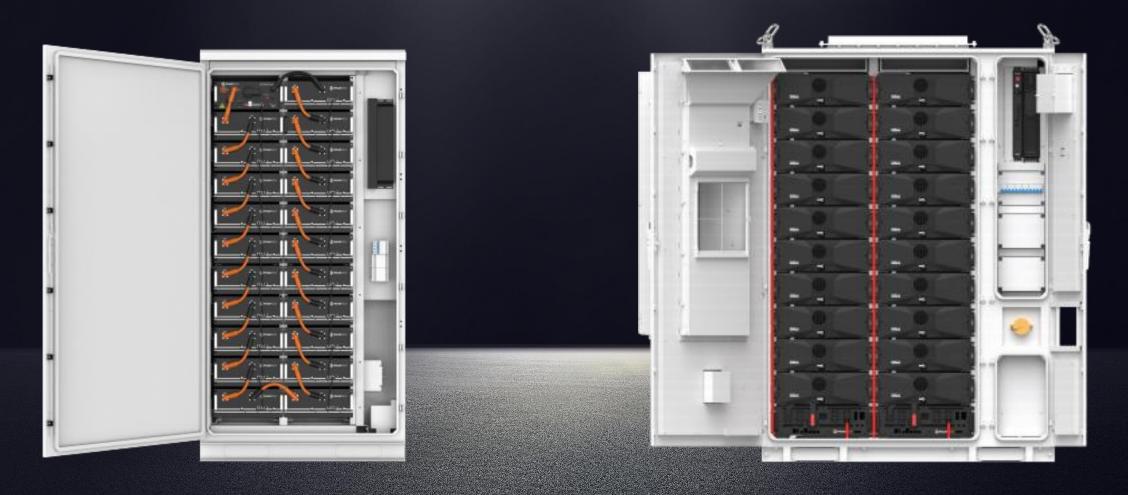
Ultra strong Inverter compatibility with Capcity Expansion ability

#### **Recommended capacity:**

M1C BESS: 100kW/100kWh M5 BESS: 100kW/316kWh



# Optim-US Outdoor BESS



# PYLONTECH NEW GENERATION C&I CONTAINERIZED BESS SOLUTION

## **M5-10FT/20FT Container BESS**

#### **High Integration**

Include Battery, BMS, HVAC, FFS and PCS(optional)

#### Safe and Reliable

Self-developed battery and BMS with UL-Certified system

#### **Recommended capacity:**

#### **Pre-Engineered System**

Easy for on-site installation and reduces the cost of storage

#### Flexible and Scalable

Ultra strong Inverter compatibility with Capcity Expansion ability

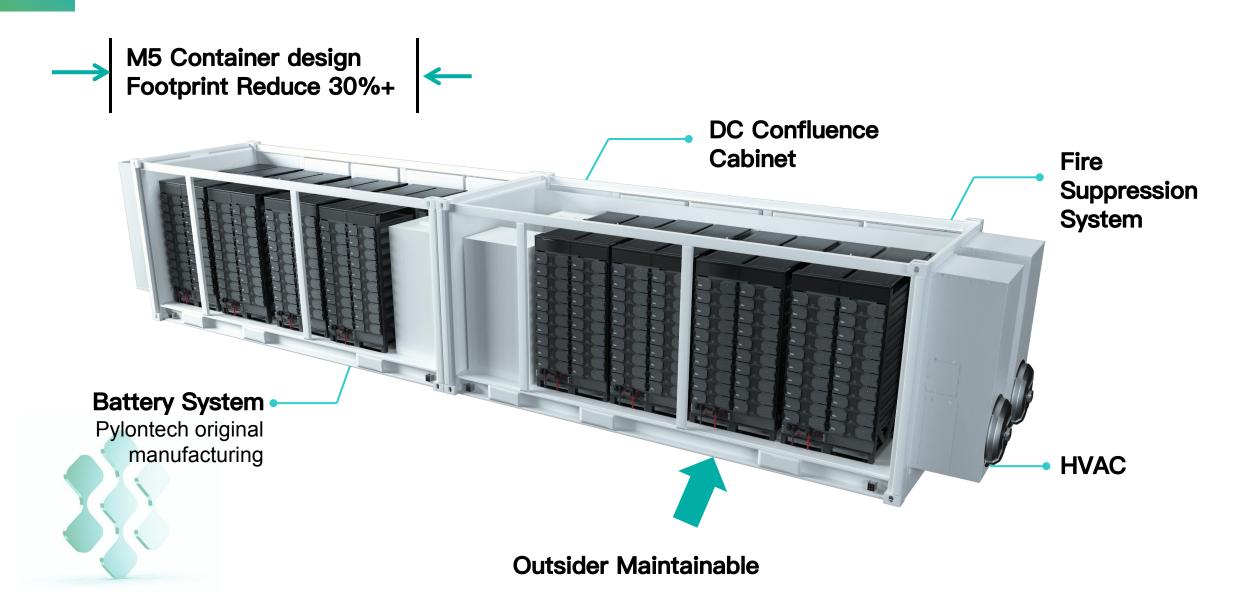
M5-10FT BESS: 500kW/1MWh

M5-20FT BESS: 1MW/2MWh

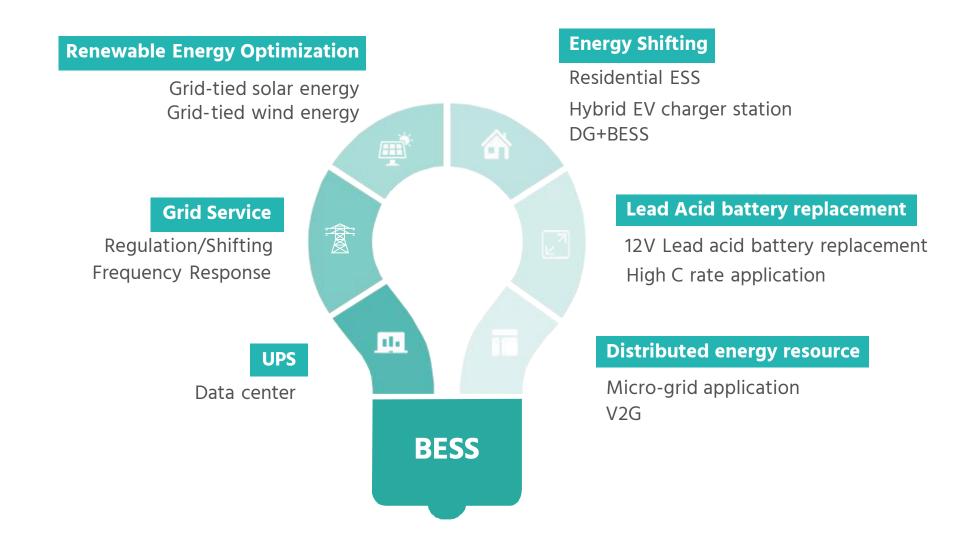
M5-20FT BESS: 2.96MWh, DC Battery only



## **M5-10FT/20FT Container BESS**



#### MORE APPLICATIONS





10 + Years

# DEDICATION TO ENERGY STORAGE



## RELIABILITY IS PROVEN

# 1,000,000+ ESS delivered globally from 2013









































#### RELIABILITY IS PROVEN



**Peak Shaving** 

Location: Mexico

Capcity: 5MW/10MWh

Date: 2023



**Micro-Grid** 

Location: Europe

Capcity: 1MW/1.5MWh

Date: 2021



**Grid-Tied StandAlone** 

Location: America

Capcity: 1MW/2MWh

Date: 2019



**Self-Consumption** 

Location: Asia

Capcity: 3.2MW/7MWh

Date: 2022



**Self-Consumption** 

Location: Asia

Capcity: 1MW/2MWh

Date: 2020



#### **Grid-Tied StandAlone**

Location: Europe

Capcity: 1MW/2MWh

Date: 2022



**Location: Europe** 

Capcity: 1MW/2MWh

Date: 2022



Off-Grid

Location: Asia

Capcity: 1.2MW/2.6MWh

Date: 2019



#### Micro-Grid

Location: Africa

Capcity: 0.5MW/1.5MWh

Date: 2019

