microvast

OVERVIEW

May 2023

DISCLAIMER

Forward-Looking Statements

This communication contains "forward-looking statements" within the meaning of the Private Securities Litigation Reform Act of 1995. Such statements include, but are not limited to, statements about future financial and operating results, our plans, objectives, expectations and intentions with respect to future operations, products and services; and other statements identified by words such as "will likely result," "are expected to," "will continue," "is anticipated," "estimated," "believe," "intend," "plan," "projection," "guidance," "outlook" or words of similar meaning. Such forward-looking statements are based upon the current beliefs and expectations of our management and are inherently subject to significant business, economic and competitive uncertainties and contingencies, many of which are difficult to predict and generally beyond our control.

Actual results, performance or achievements may differ materially, and potentially adversely, from any projections and forward-looking statements and the assumptions on which those forward-looking statements are based. All information set forth herein speaks only as of the date hereof and we disclaim any intention or obligation to update any forward-looking statements as a result of developments occurring after the date of this communication. Forecasts and estimates regarding Microvast's industry and end markets are based on sources we believe to be reliable, however there can be no assurance these forecasts and estimates will prove accurate in whole or in part.

Microvast's annual, quarterly and other filings with the U.S. Securities and Exchange Commission identify, address and discuss these and other factors in the sections entitled "Risk Factors."

ABOUT MICROVAST

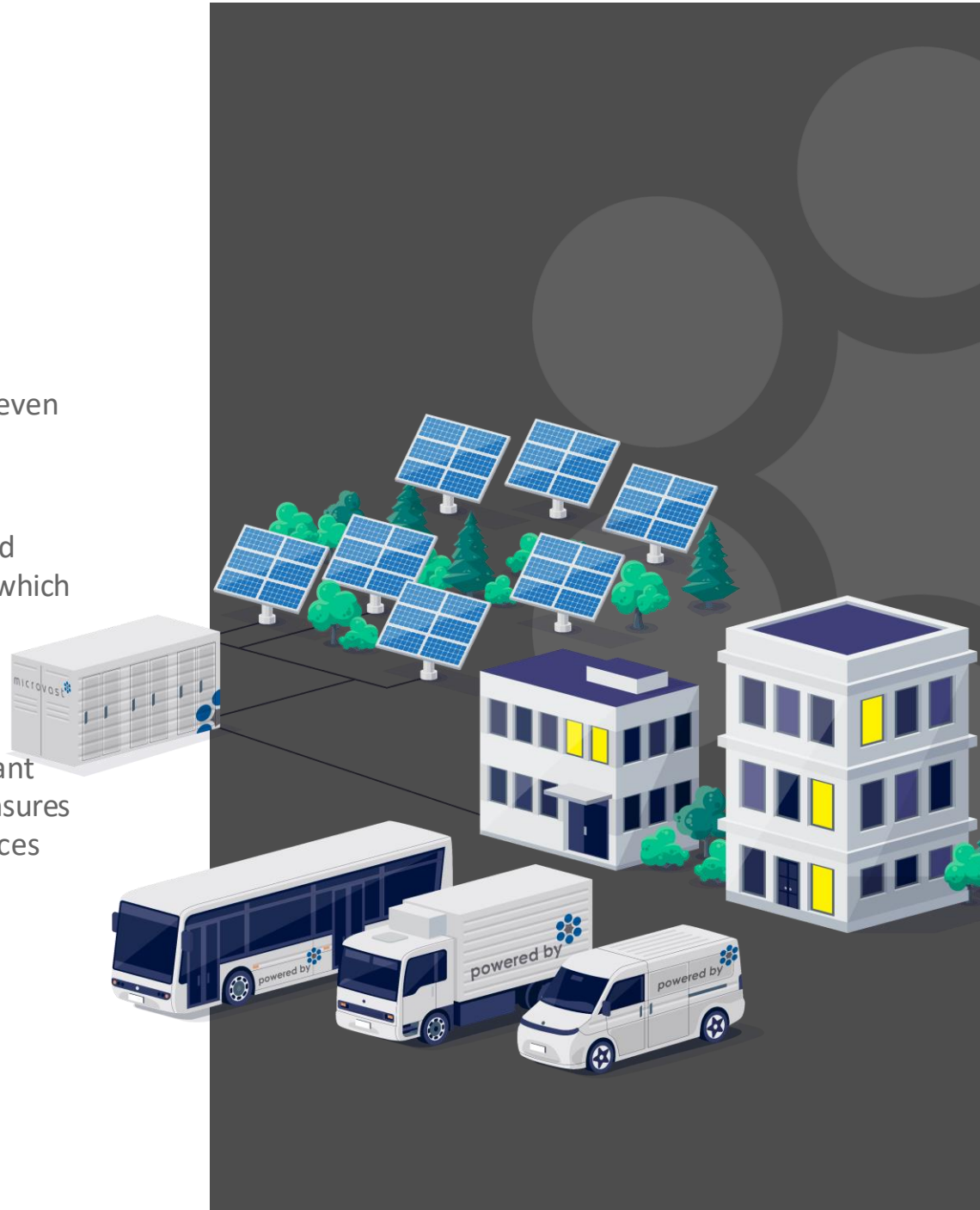
OUR STORY

Innovating superior lithium-ion battery solutions to power a more sustainable future.

The name Microvast encapsulates our founder's conviction that advancements in even small, "micro" battery components can a have long-term, large-scale, and "vast" positive impact to our environment.

This philosophy is embodied in our relentless commitment to R&D and has enabled numerous innovative and practical breakthroughs in battery technology, many of which have become industry standards and raised the bar for what can be accomplished in terms of energy efficiency.

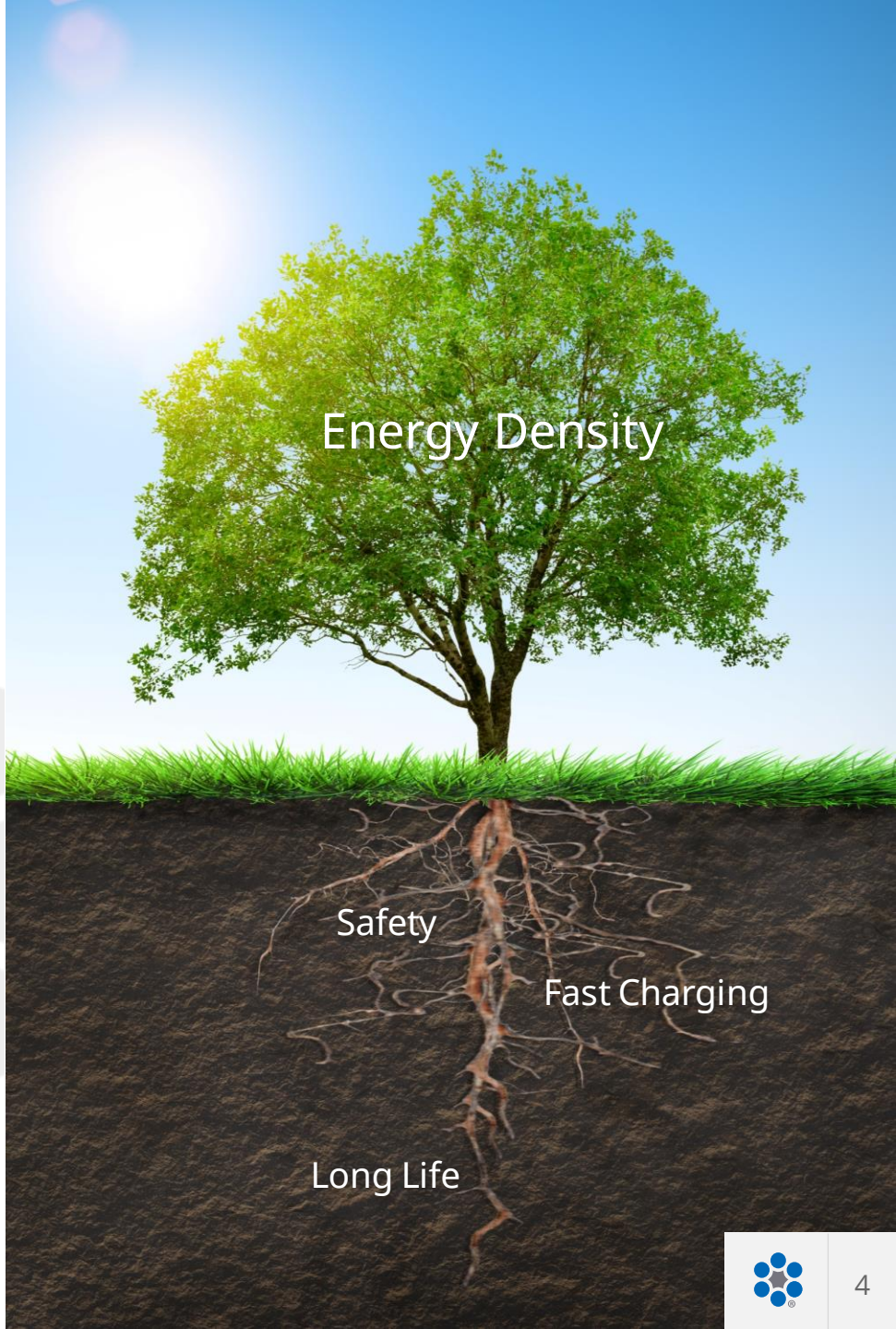
By understanding that advancements in micro battery components can lead to vast opportunities has allowed Microvast to have significant competitive advantages as it enters a multi-year high growth phase. This legacy ensures our innovative spirit will continue burning bright and producing meaningful advances for years to come.



FORWARD THINKING. **POWERING NOW.**™

Innovating superior lithium-ion battery solutions to power a more sustainable future.

- Delivering advanced battery technology for high performance
- Delivering distinct competitive advantages to customers
- Accelerating the adoption of clean energy in transportation and energy storage markets



BY THE NUMBERS

What Sets Us Apart

28+
Country
Global Footprint

3
Manufacturing Plants

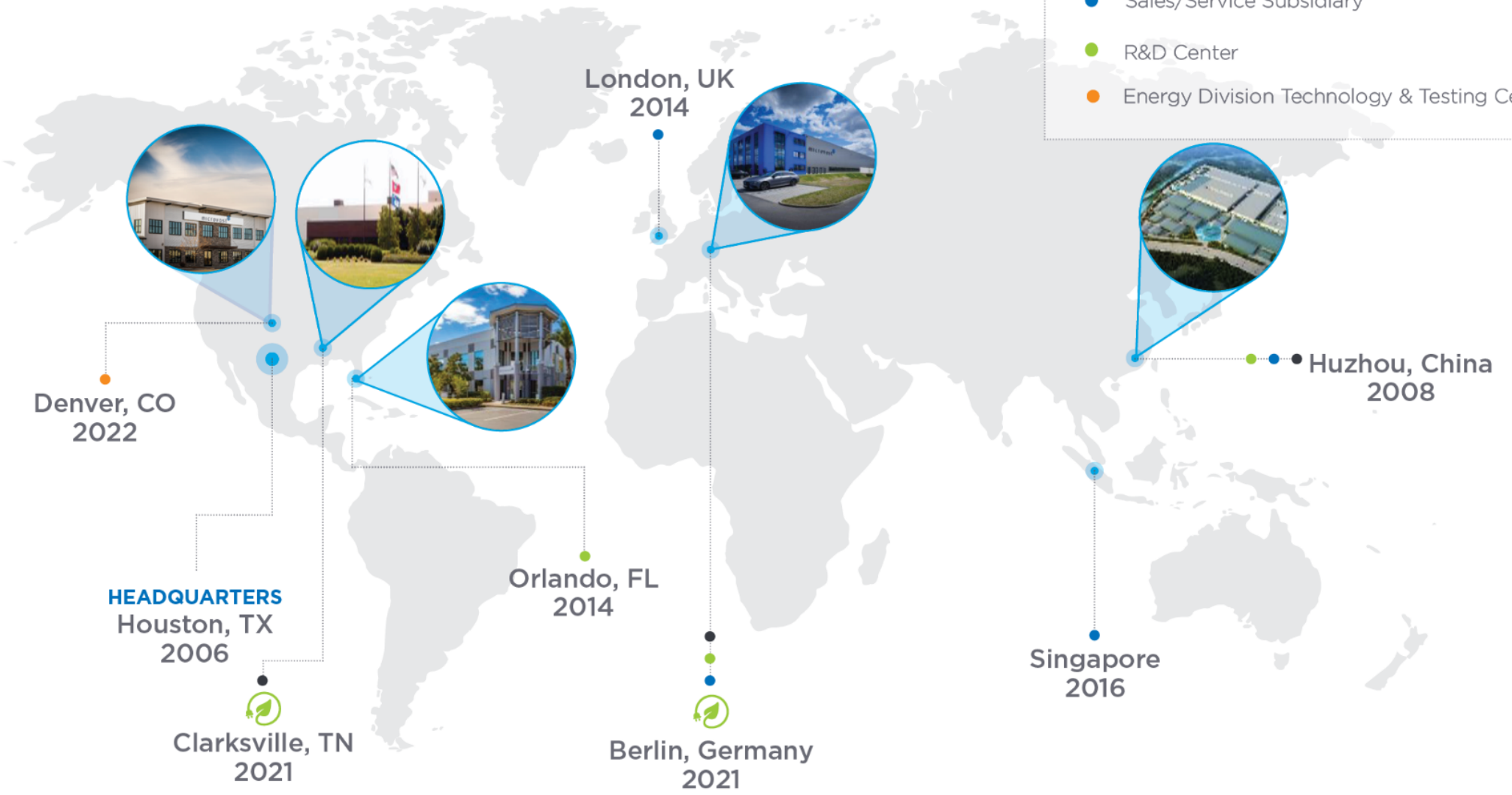
630+
Patents &
Patent Applications

2,000+
Employees Globally

30,000+
Installed Battery Systems

17
Years Experience
Manufacturing Lithium-Ion Batteries

OUR LOCATIONS



WELL-POSTIONED

Product Portfolio

Differentiated product portfolio serving the **commercial vehicle, energy storage, and battery component** markets

Large and growing market **opportunity of over $130BN** by 2030 across commercial vehicle and ESS end markets

MARKET OPPORTUNITY

$130BN

Vertical Integration

Vertically integrated business model enables **faster product development, greater customization and margin advantage**

$2.5BN+

CONTRACTED REVENUE

partnerships with industry leaders through 2030 providing high visibility[1]

Decades of Experience

World-class management team with **significant cross-disciplinary experience** and track record commercializing innovative technologies

[1] Contracted revenue represents business where a contract or sales agreement is in place; amount based on Microvast management estimates

LONG-STANDING PARTNERSHIPS

What Sets Us Apart

Customer Partnerships

CARGOTEC

DANA

IVECO • GROUP

GAUSSIN

WRIGHT

eVersum

FPT POWERTRAIN TECHNOLOGIES

OSHKOSH

HIGER

ZF

JBM Group Our milestones are touchstones

R&D Partnerships

USCAR UNITED STATES COUNCIL FOR AUTOMOTIVE RESEARCH

BMW

Argonne NATIONAL LABORATORY

Significant recent wins provide market validation and highlight business momentum

Signed industrial and commercial cooperation agreement with FPT Industrial (“FPT”), the global powertrain brand of CNH Industrial Group, in 2020 (now Iveco Group)

Supply FPT with battery modules which are manufactured in our new facility near Berlin, Germany

Enable FPT to design and assemble battery packs in-house at its facility in Turin, Italy; to be offered for CNH Industrial vehicles, IVECO and to third-party customers

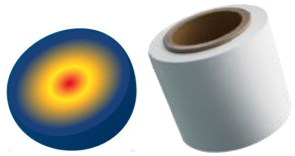
PRODUCT

VERTICALLY INTEGRATED

What Sets Us Apart

We're vertically integrated and maintain absolute control of every aspect of our development process from R&D to manufacturing.

This enables us to create custom battery solutions quickly, with industry-leading energy density, superior safety, ultra-fast charging capabilities, and long lifespans



Advanced Battery Components

Battery Modules

Energy Storage Solutions

1

2

3

4

5

Complete control and custom R&D capabilities at each step of development and manufacturing.

Battery Cells

Battery Packs & Trays

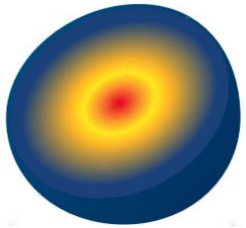
TECHNOLOGY PORTFOLIO

What Sets Us Apart

PROPRIETARY TECHNOLOGY Across All Battery Components

Gradient Cathode

Enables the precise distribution of elements (e.g. cobalt) across the cathode particles– boosts energy density and reduces cost



Non-Flammable Electrolyte

Virtually eliminates the risk of battery fires, addressing a major industry challenge

Aramid Separator

Higher thermal stability than charged cathode material; 2x the temperature resistance of traditional poly-ethylene separators, enhancing safety and charging time

BROAD PORTFOLIO OF CELL CHEMISTRIES

LTO

Lithium Titanate ($Li_4Ti_5O_{12}$)

Ultra-fast charging, Ultra long cycle life, Safest LIB chemistry

LFP

Lithium Ferrophosphate ($LiFePO_4$)

Lowest cost Good cycle life

NMC-1

Lithium Nickel-Manganese-Cobalt Oxide ($LiNi_xMn_yCo_zO_2$)

Ultra-fast charging Long cycle life

NMC-2

Lithium Nickel-Manganese-Cobalt Oxide ($LiNi_xMn_yCo_zO_2$)

Highest energy density Fast charging
Long cycle life

EXTENSIVE 3RD PARTY TESTING AND VALIDATION

Argonne NATIONAL LABORATORY

220-240 Wh/kg Extreme Fast Charge (XFC) Cells

INL Idaho National Laboratory

220 Wh/kg High Power Cells
270 Wh/kg High Energy Density Cells

Sandia National Laboratories

HnCO-52Ah cells

WARWICK THE UNIVERSITY OF WARWICK

18 kWh LpTO Pack

TÜV SÜD

200 Wh/kg Power Cells &
270 Wh/kg High Energy Density cells

PRODUCT

SUPERIOR TECHNOLOGY

What Sets Us Apart

Our batteries have earned us bragging rights…and awards.

High Energy Density
Our industry-leading energy density allows you to store more energy in a smaller volume space.

Rapid charging
With our ultra-fast charging capabilities, achieve a full recharge in as little as 10 minutes.

Safety first
Safety is our top priority. With our patented chemistries, superior battery components, advanced battery management, and thermal management systems, we have consistently ensured safe and reliable operations for over 17 years (field-tested with real-world operational experience).

Long life
Our battery systems are designed for long cycle life, matching the vehicle lifespan for commercial transportation and over 10,000 cycles for our energy storage solution.

PRODUCT

INDUSTRY-LEADING TECHNOLOGY

		Representative Applications	Energy Density	Life Cycles	Charging Time (full charge)
Currently in Production	Ultra Fast Charge (LTO) Introduced in 2011	Buses, Mining Trucks	+30% (95 Wh/kg)	+70%	1/2 time (10 min)
Currently in Production	High Power (NMC-1) Introduced in 2017	Commercial Vehicles, Buses	+ 15% (210 Wh/kg)	More than Double	1/3 time (15 min)
Currently in Production	High Energy Density (NMC-2) Introduced in 2019	Commercial Vehicles, Passenger Vehicles	+10% (270 Wh/kg)	More than Double	1/3 time (30 min)
Upcoming	High Energy Density Target Cell (Won R&D 100 Award)	Commercial Vehicles, Passenger Vehicles	+30% (330 Wh/kg)	+80%	1/2 time (45 min)

BATTERY CELLS

Our newest technologies enable our customers to easily optimize vehicle design in terms of energy density and cycle life, delivering improved overall performance and reducing TCO while preserving fast charging capabilities

For Fast Charging and Long Cycle life

Medium Energy Density of >205 Wh/kg
+11% vs MpCO-17.5Ah (its predecessor)

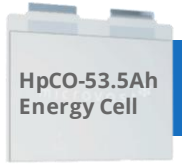
Extra Long cycle life
Designed for lasting use, featuring a long cycle life of over 7,000 cycles at 25℃ with 3C charging and discharging

Ultra-Fast charging
Charge to 80% capacity in just 16 minutes at room temperature.

Outstanding safety and thermal management
High safety feature with high tolerance for abuse. Excellent low temperature performance (@-20°C with around 80% usable energy).

Lower TCO
-25% vs MpCO-17.5Ah

High Power
Perfect for powering heavy duty and high frequent usage applications. Solution for fast charging BEH, PHEV; HEV and FC commercial vehicle applications.



For High Energy Density and Range

High Energy Density of >235 Wh/kg
+7% vs MpCO-21Ah (its predecessor)

Long cycle life
Over 5,000 cycles at 25℃

Fast charging
Charge to 80% capacity in just 48 minutes at room temperature.

Outstanding safety and thermal management
High safety feature with high tolerance for abuse. Excellent low temperature performance (@-20°C with around 80% usable energy).

Lower TCO
-25% vs MpCO-21Ah

Great Balance between High Energy Density and Long Cycle Life
Perfect solution for BEV commercial vehicle applications (LD, MD, HD)

PRODUCT

COMPONENT TECHNOLOGIES

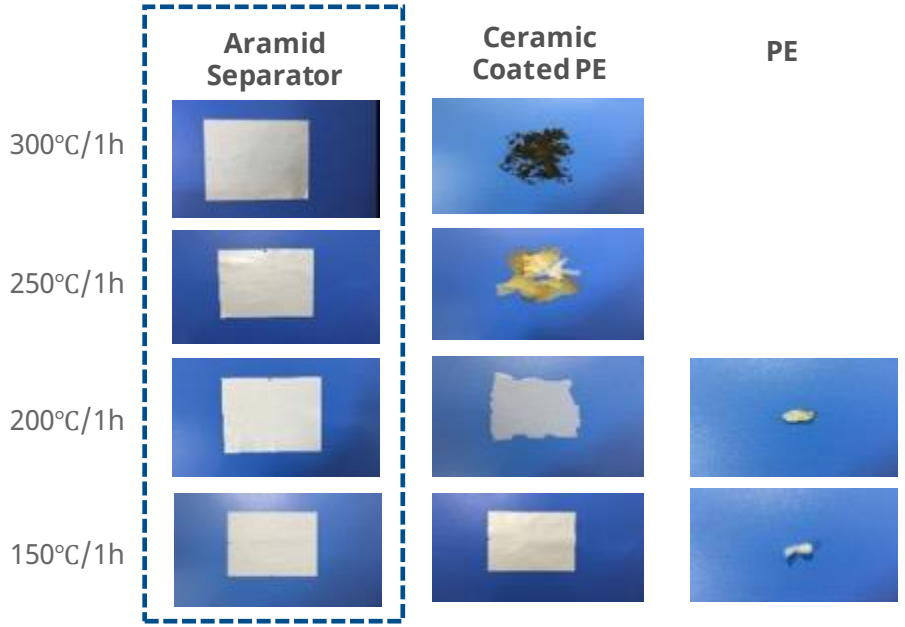
Aramid Separator

The separator is a key component for increased safety and critical for high performance cells.
Microvast's proprietary aramid separator has **a far superior safety** proposition compared to PP and PE separators.

Microvast´s Aramid technology

- Patented technologies (**26 in total**) that possess unique benefits over traditional PE separators
- 10+ years R&D, Microvast separator has 2x the temperature resistance of traditional PE separators
- High mechanical and thermal stabilities

Aramid vs. PE separators at different temperatures



Key Takeaways

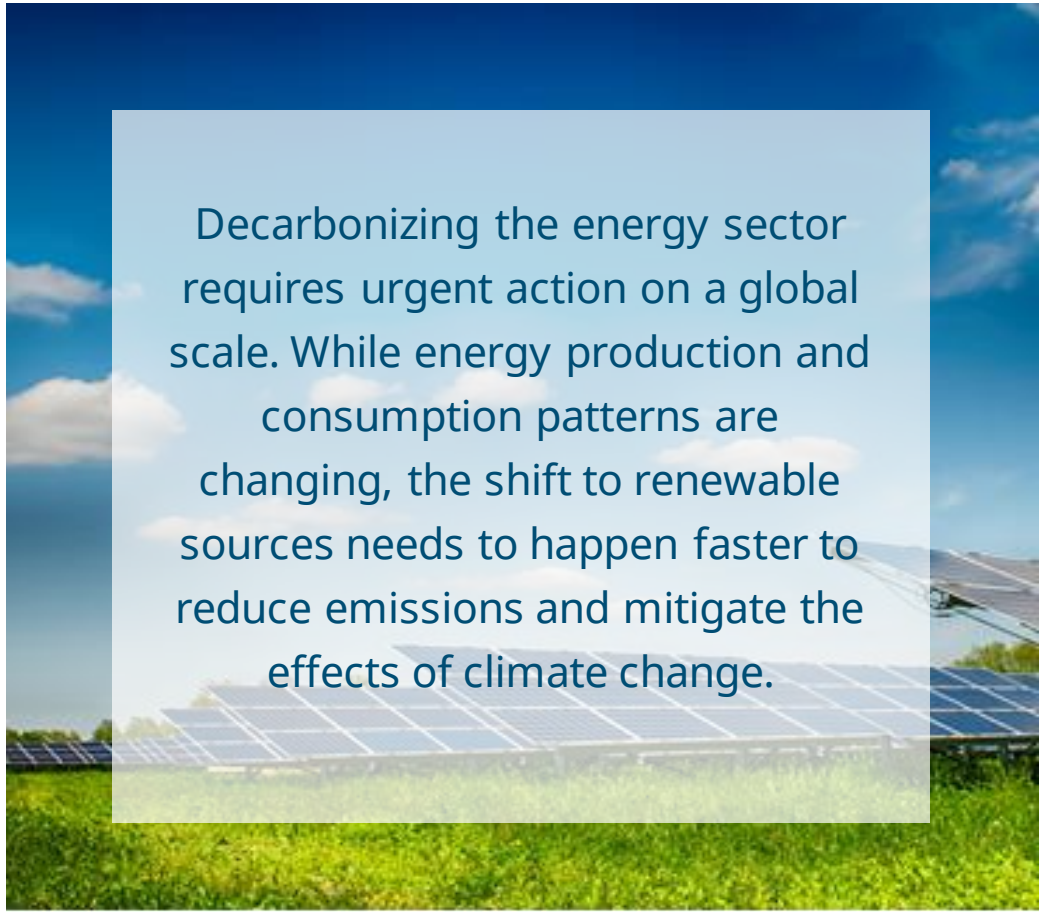
- Microvast's aramid separator shrinks and deforms less in higher temperatures than plastic based separators.
- The thermal stability of our patented aramid separator **prevents shrinking when the battery heats up**, thus reducing the risk of cathode and anode edges touching and short- circuiting and catching fire.

PRODUCT

SELECTED BY THE U.S. DEPARTMENT OF ENERGY
for a $200 Million Grant

- Microvast **selected by the U.S. Department of Energy** ("DOE") to receive **a $200 million grant.**
- Over 200 companies applied for $2.8 billion in grant funding; **only 20 companies selected.**
- The DOE grant, plus funding to be arranged by Microvast, will support construction of a **mass production facility in the U.S. for our thermally stable polyaramid separator** technology.
- Microvast **holds unique, patented wet-process technology to produce a thin polyaramid base** film for very high temperature resistance.
- The separator is a **critical element for battery safety** and our polyaramid technology has significant safety advantages over incumbent technology such as polyethylene and polypropylene.
- Microvast and **General Motors will collaborate** to create a specialized separator.
- **Target markets** for polyaramid separator **are large and growing** and include commercial, specialty and passenger EVs, as well as consumer electronics and ESS systems.

ADDRESSING CLIMATE CHANGE



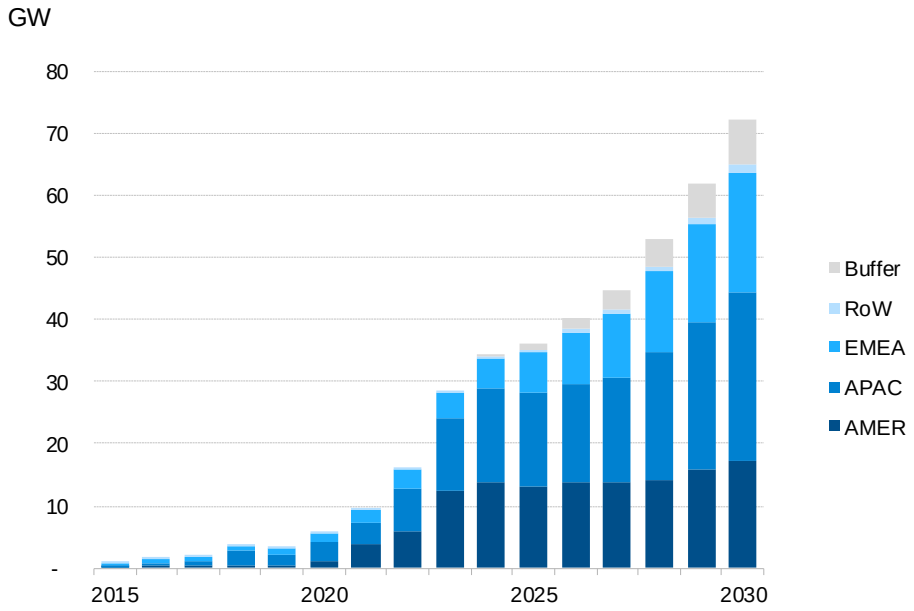
Battery Energy Storage Systems are Key to Renewable Energy Progression and Mitigating Climate Change:

- Microvast Energy, Inc. was created to open a new global market segment and revenue stream for Microvast Holdings
- Our ESS solution incorporates the proven, high-energy, lithium-ion 53.5Ah NMC cell technology from our commercial electric vehicle (CEV) battery
- The goal of the company is to become a **leading global ESS solution provider** to the energy market

ENERGY

GLOBAL ENERGY STORAGE OUTLOOK

Global Annual Storage Installations by Region Based on Energy Capacity



Source: Bloombergnef, Oct 2022

KEY TAKEAWAYS

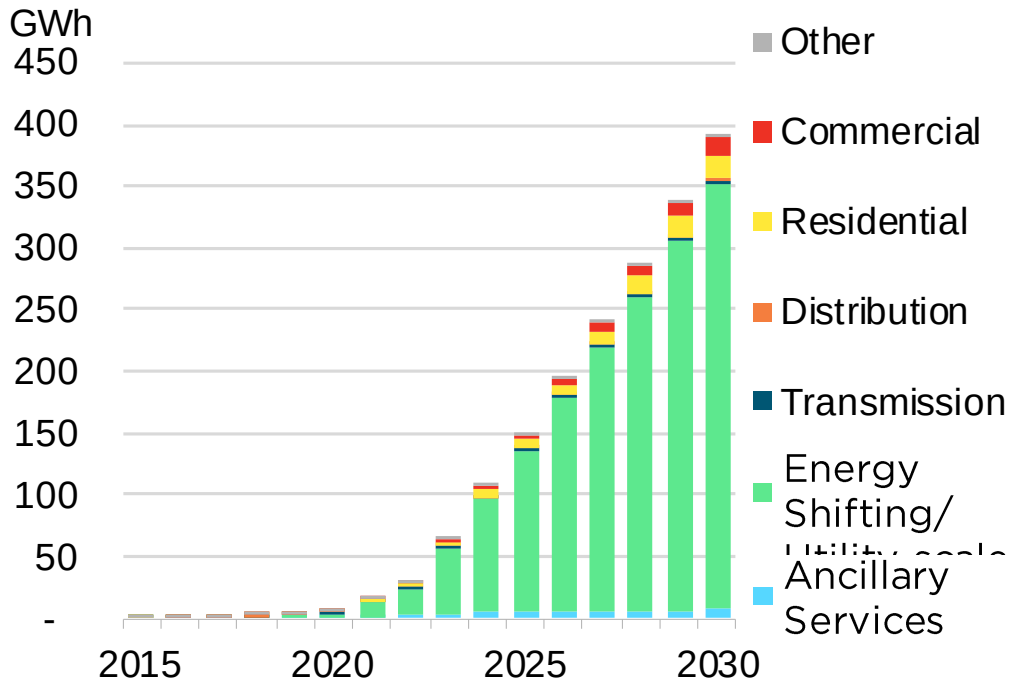
- U.S. and China will be the leading markets globally
- 2023 will be an inflection year for the US with 35GWh of additions
- Microvast will be adding 1.2GWh of this on its first ESS project

Energy Storage Market Opportunity

The U.S. Energy Storage Market is Expected to Reach $45-50B[(1)] by 2030

- Government incentives and mandates such as the **Inflation Reduction Act**, which **provides tax credits for wind, solar, and battery production** (energy storage), increases momentum in the shift to renewable energy and expands demand for energy storage systems
- Such incentives have led to a **24% increase in BNEF's U.S. energy storage forecasts** and **cumulative capacity is now predicted to reach 396GWh by 2030** with a majority deployment of utility scale projects
- Significantly **more demand than supply exists for energy storage systems today** primarily caused by related supply chain constraints due to macroeconomic factors
- **95% of confirmed global projects for utility-scale applications as of 1H 2022 are for lithium-ion batteries,** indicating lithium remains the preferred energy storage technology

U.S. Cumulative Energy Storage Deployments



Source: BNEF and management estimates.

1. TAM calculated by multiplying 2030 cumulative capacity for energy shifting/utility-scale applications of 350GWh by estimated price of $200M per GWh.

ENERGY

BUILT FOR UTILITY-SCALE ENERGY STORAGE

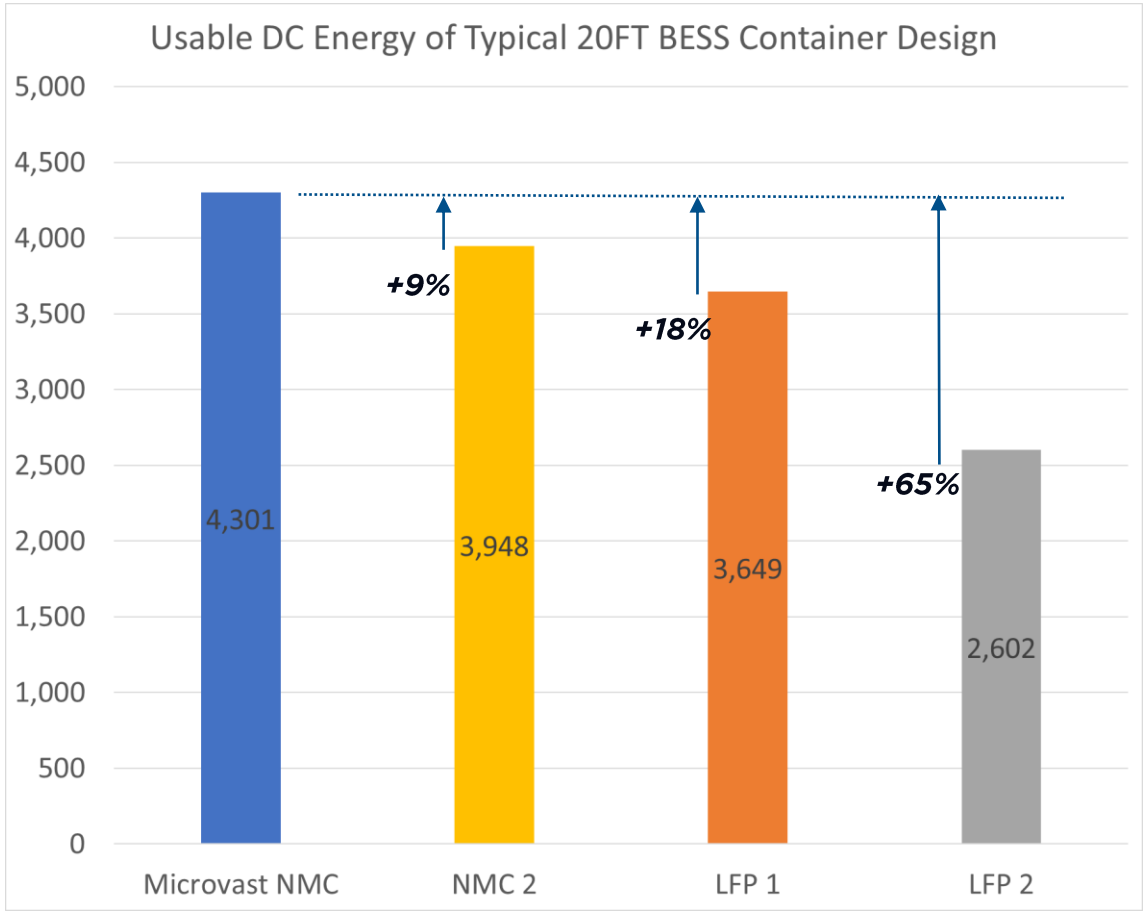
Very High Energy Retention
Microvast delivers an ESS solution with higher energy retention/slower degradation than leading competitors. This translates into lower CAPEX, lower OPEX, and less capacity cliff risk.

Highest Available Energy Density
A single battery container features an industry leading 4.3MWh energy

Long Battery Life >10,000 Cycles
Maintains functionality for more than 10,000 operation cycles

System Reliability
Microvast delivers U.S. owned technology, manufactured in state-of-the-art U.S. cell facilities, with the aim of ensuring the security of US energy infrastructure

ENERGY DENSITY



0.25CP/4HR Duration, 1 cycle per day, 100% DOD

Industry Leading

Energy Density

- Higher System Reliability/Availability
- Lower EPC Cost
- Lower O&M Cost

WHY ESS IS A HUGE GROWTH OPPORTUNITY…

Technology

We are bringing to market the best product – our 4.3MWh container has at least a 10-30% higher density rate when compared to leading competitive products

Execution

We started in April 2022, and we already have a 1.2GWh contract. We are working with developers on many other projects

U.S. Presence

We are well under-way with our 2GWh cell and module plant in Clarksville. Capacity additions will be made to meet the expected increase in demand. We can deliver "US content" which has a clear financial value to our customers

Govt. Demand Push

The U.S. market alone has tremendous government incentives lasting until 2032, perhaps beyond

Innovation & Commercialization

We are already developing our new product launch for 2025-2026. We have a 16-year history of repeated innovation and commercialization

The Right Team

We have one of the most experienced teams in the energy storage sector, with a proven track-record in product development, product/project launch, and managing high growth operations

TEAM SNAPSHOT

MICROVAST LEADERSHIP TEAM

YANG WU
Founder, CEO

Onboard Since: 2006

Profile Summary

- Previously founded Omex, sold to Dow Chemical in 2006, 50x ROI in 5 years
- BA, Southwest Petroleum University

SASCHA KELTERBORN
CRO

Onboard Since: 2016

- 20+ years in international BD
- 7+ years experience in e-Mobility VP, Vossloh AG & member of the Supervisory board in CN & RU
- Head of international sales, Murpo
- BA, University of Applied Sciences Kiel, Germany

ZACH WARD
President, Energy Division

Onboard Since: 2022

- 16 years in energy industry (Sungrow, Array Technologies, Advanced Energy)
- 15 years in semiconductor industry
- Executed more than 20 GW of utility and distributed generation solar and 2GWh of energy storage projects
- BS DeVry University

DR. WENJUAN MATTIS
CTO

Onboard Since: 2013

- 11+ years experience in lithium-ion battery business
- Board of Director, IMLB
- VP, International Automotive Battery Lithium Association
- Ph.D. Materials Science & Eng., Penn State
- 22 publications & 81 patents

CRAIG WEBSTER
CFO

Onboard Since: 2012

- Director of Microvast, Inc. since 2012
- 14 years at Ashmore Group - Senior Portfolio Manager, Global Head of Special Situations Funds and General Counsel
- BA (Hons) Marketing, University of Stirling

SHANE SMITH
COO

Onboard Since: 2019

- 23+ years at Roper & Qorvo (semiconductor)
- U.S. Navy (7 years)
- Certified U.S. Navy Nuclear Engineer
- MA, John Hopkins University
- BA, U.S. Navy Academy

Q1:23 Overview

$47M
Q1 revenue
28.1% increase
year over year

>3x
Year over year increase in backlog position
=
$486.7M
driven by energy storage business in the U.S and strong demand in Europe

13.5%
adjusted gross margin
an increase of 8.3 percentage points year over year

270%
Year over year European revenue growth
increased from 7% to 22% of revenue

2GWh
Huzhou 3.1 expansion for HpCO-53.5Ah cell is completed
remaining milestone payments fully funded from project finance facility

2GWh
Clarksville, TN expansion for HpCO-53.5Ah cell
on track for Q4 production

2023 Outlook

Strong Backlog & Technology Supports Multi-Year High Growth Phase

70%-80%
revenue growth
from 2022

$486.7M backlog
supported by energy storage business in the U.S. and strong demand in Europe

HpCO-53.5Ah cell accounts for
>75%
backlog due to superior technical performance

Clarksville, TN location **benefits from IRA at $45/KWh** on its domestic battery cell and module production
2GWh=$90M
Annual IRA potential

$63-67M
Q2 revenue guidance

Anticipate significant uptick in orders and backlog
supported by new commercial vehicle and energy storage projects

New
2GWh ✓
Cell, module and pack facility in Huzhou in trial production in Q1

New
2GWh
U.S. cell and module facility in Clarksville, TN Q4 production target

Exit 2023 New Capacity
4GWh = $1B
Annual Revenue Potential
And a 10m sqm pilot line for polyaramid separator

Mgmt believes path to profitability is within the next 2-3 years

PRODUCTION CAPACITY EXPANSIONS

What Sets Us Apart

China Manufacturing Plant Expansion

capacity expansion completed Q1 2023

- 2.0 GWh per annum new manufacturing capacity – fully automated production line
- New building can be expanded up to 12 GWh per annum (additional utility infrastructure required)
- In trial production in Q1 2023
- 50% capacity already reserved by customers

Clarksville plant under renovation

estimated completion Q4 2023

- 2.0 GWh per annum new manufacturing capacity (utility setup will support 4+ GWh per annum)
- Ramp-up expected to begin late Q4 2023
- Direct beneficiary of Section 45X production credits under the Inflation Reduction Act
- Expected to meet USMCA requirements

THE INFLATION REDUCTION ACT'S IMPACT TO MICROVAST

The battery production tax credit **$35/kWh** for cells and **$10/kWh** for modules, both will be produced in Clarksville, TN

10-year IRA duration-2032 – with first five years of direct pay credits

Phase 1A of Clarksville (SOP Q4 2023) has 1.78GWh of productive capacity PA

$80.1M

TAX CREDITS

The battery energy storage plants are standalone assets

Over the next 10 years, the IRA will lead to 69% more solar deployment than would otherwise be expected under a no-IRA scenario

Phase 1B (SOP est Q1 2025) increases total available capacity to **3.56GWh = $160.2M**

TAX CREDITS

Energy storage ITC bonus **10%** to our customers

Every GWh of cell and module production generates

$45M

TAX CREDITS

At Clarksville alone (4GWh capacity) IRA offers a potential of up to **$1-1.2B**

IN TAX CREDITS TO 2032

microvast

THANK YOU

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