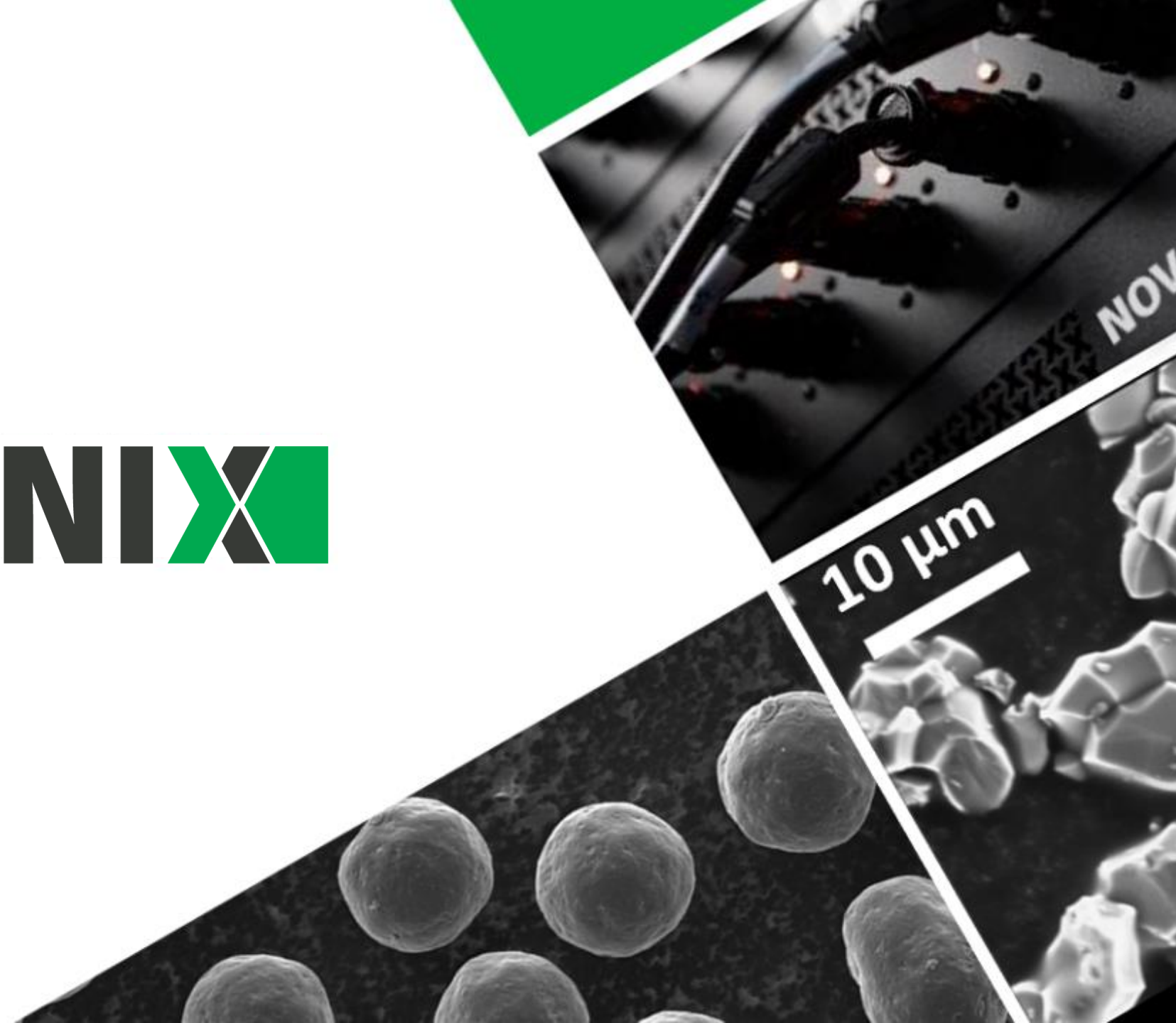
NOVONIX

- Set for Growth



Important Notice and Disclaimers

The information contained in this presentation (the "**Presentation**") has been prepared by NOVONIX Limited (ACN 157 690 830) ("**the Company**" or "**NOVONIX**") solely for information purposes and the Company is solely responsible for the contents of this Presentation. It is intended to be a summary of certain information relating to the Company as at the date of the Presentation and does not purport to be a complete description of NOVONIX or contain all the information necessary to make an investment decision. Accordingly, this Presentation is not intended to, and should not, form the basis for any investment, divestment or other financial decision with respect to the Company. Any reproduction or distribution of the Presentation, in whole or in part, or the disclosure of its contents, without prior consent of the Company, is prohibited.

Not an Offer

This Presentation does not constitute, nor does it form part of an offer to sell or purchase, or the solicitation of an offer to sell or purchase, any securities of the Company. This Presentation may not be used in connection with any offer or solicitation by anyone in any jurisdiction in which such offer or solicitation is not permitted by law or in which the person making the offer or solicitation is not qualified to do so or to any person to whom it is unlawful to make such offer or solicitation. Any offering of securities will be made only by means of a registration statement (including a prospectus) filed with the U.S. Securities and Exchange Commission (the "**SEC**"), after such registration statement becomes effective, or pursuant to an exemption from, or in a transaction not subject to, the registration requirements under the U.S. Securities Act of 1933, as amended. No such registration statement has become effective, as of the date of this Presentation.

Forward-Looking Statements

This Presentation contains forward-looking statements about the Company and the industry in which it operates. Forward looking statements can generally be identified by use of words such as "anticipate," "believe," "contemplate," "continue," "could," "estimate," "expect," "intend," "may," "plan," "potential," "predict," "project," "should," "target," "will," or "would," or other similar expressions. The Company has based such statements on its current expectations and projections about future events and trends that it believes may affect its financial condition, results of operations, business strategy and financial needs. Such forward-looking statements involve and are subject to known and unknown risks, uncertainties and other factors which may cause the actual results, performance or achievements of the Company and/or its subsidiaries to be materially different from any future results, performance or achievements expressed or implied by the forward-looking information. Such factors include, among others, regulatory developments in the United States, Australia and other jurisdictions, the continuation of the Company's partnership with the Research Group of Dr. Mark Obrovac at Dalhousie University for the development of the Company's technology, the Company's ability to scale-up production of its anode or cathode materials and the Company's ability to attract and retain key management and technology personnel. Forward-looking statements are not guarantees of future performance or outcomes and that actual performance and outcomes may differ materially from those made in or suggested by the forward-looking statements contained in this Presentation. Accordingly, recipients of this Presentation should not place undue reliance on forward looking statements. The Company disclaims any obligation to update any forward-looking statements made in this Presentation to reflect events or circumstances after its date or to reflect new information or the occurrence of unanticipated events, except as required by law.

Industry and Market Data

This Presentation contains estimates and information concerning our industry and our business, including estimated market size and projected growth rates of the markets for our products. Unless otherwise expressly stated, we obtained this industry, business, market, and other information from reports, research surveys, studies and similar data prepared by third parties, industry, and general publications, government data and similar sources. This Presentation also includes certain information and data that is derived from internal research. While we believe that our internal research is reliable, such research has not been verified by any third party.

Estimates and information concerning our industry and our business involve a number of assumptions and limitations. Although we are responsible for all of the disclosure contained in this Presentation and we believe the third-party market position, market opportunity and market size data included in this Presentation are reliable, we have not independently verified the accuracy or completeness of this third-party data. Information that is based on projections, assumptions and estimates of our future performance and the future performance of the industry in which we operate is necessarily subject to a high degree of uncertainty and risk due to a variety of factors, which could cause results to differ materially from those expressed in these publications and reports.

Trademarks, Service Marks and Trade Names

Throughout this Presentation, there are references to various trademarks, service marks and trade names that are used in the Company's business. "NOVONIX," the NOVONIX logo and other trademarks or service marks of NOVONIX appearing in this Presentation are the property of NOVONIX or its subsidiaries. Solely for convenience, the trademarks, service marks and trade names referred to in this Presentation are listed without the ® or ™ symbol, as applicable, but such references should not be construed as any indicator that their respective owners will not assert, to the fullest extent under applicable law, their right thereto. All other trademarks, trade names and service marks appearing in this Presentation are the property of their respective owners.

TOC

Who We Are

NOVONIX is a battery materials and technology development company. We develop and supply what we believe to be the most accurate battery testing technology in the world. We are a leading US-based supplier with plans to scale significant domestic volumes of battery-grade synthetic graphite anode material.

NOVONIX

Better Performance, Longer Life, Lower Cost

Most Accurate Battery Testing Technology

NOVONIX
BATTERY TECHNOLOGY SOLUTIONS

Leading Supplier with Plans to Scale Significant Domestic Volumes of Synthetic Graphite Anode Material

NOVONIX
ANODE MATERIALS

Developing New Applications and Partnerships

NOVONIX Cathode Materials | Emera

Our Leadership and Board of Directors

Leadership Team

Dr. Chris Burns
Chief Executive Officer

Nick A. Liveris
Chief Financial Officer

Rashda Buttar
Chief Legal and Administrative Officer

Suzanne Yeates
Financial Controller and Co Secretary

Danny Deas
President | NAM

Darcy Macdougald
President | BTS

Scientific & Technical Advisors

Dr. Jeff Dahn
Chief Scientific Advisor

Dr. Mark Obrovac
Sponsored Researcher

Board of Directors

Admiral Robert J. Natter
Chairman & Non-Executive Director

Tony Bellas
Deputy Chairman & Non-Executive Director

Andrew N. Liveris AO
Non-Executive Director

Zhanna Golodryga
Non-Executive Director

Robert Cooper
Non-Executive Director

Jean Oelwang
Non-Executive Director

Key leadership and technical experience:

TESLA · DALHOUSIE UNIVERSITY · McKinsey & Company · FORESIGHT ENERGY · 3M · ERGON ENERGY · DOW · IBM · Saudi Aramco · PHILLIPS 66 · HESS · BHP · unite

We Play a Critical Role in the Lithium-Ion Battery Value Chain

NOVONIX
BATTERY TECHNOLOGY SOLUTIONS

Battery Raw Materials

VALE
NOUVEAU MONDE GRAPHITE
SYRAH RESOURCES
Seadrift Coke L.P.
Livent
GanfengLithium
TOKAI CARBON
PHILLIPS 66
SQM

Battery Material Refining

Livent
ALBEMARLE
GanfengLithium
NOUVEAU MONDE GRAPHITE
SQM
CGG
MATRASS C-GRAPHENE
umicore

Primary Focus

Specialty Battery Materials

NOVONIX ANODE MATERIALS
NOVONIX Cathode Materials
Hitachi Chemical
Johnson Matthey
NOUVEAU MONDE GRAPHITE
MATRASS C-GRAPHENE
BASF
SILA NANOTECHNOLOGIES

Battery Cell and Pack Production

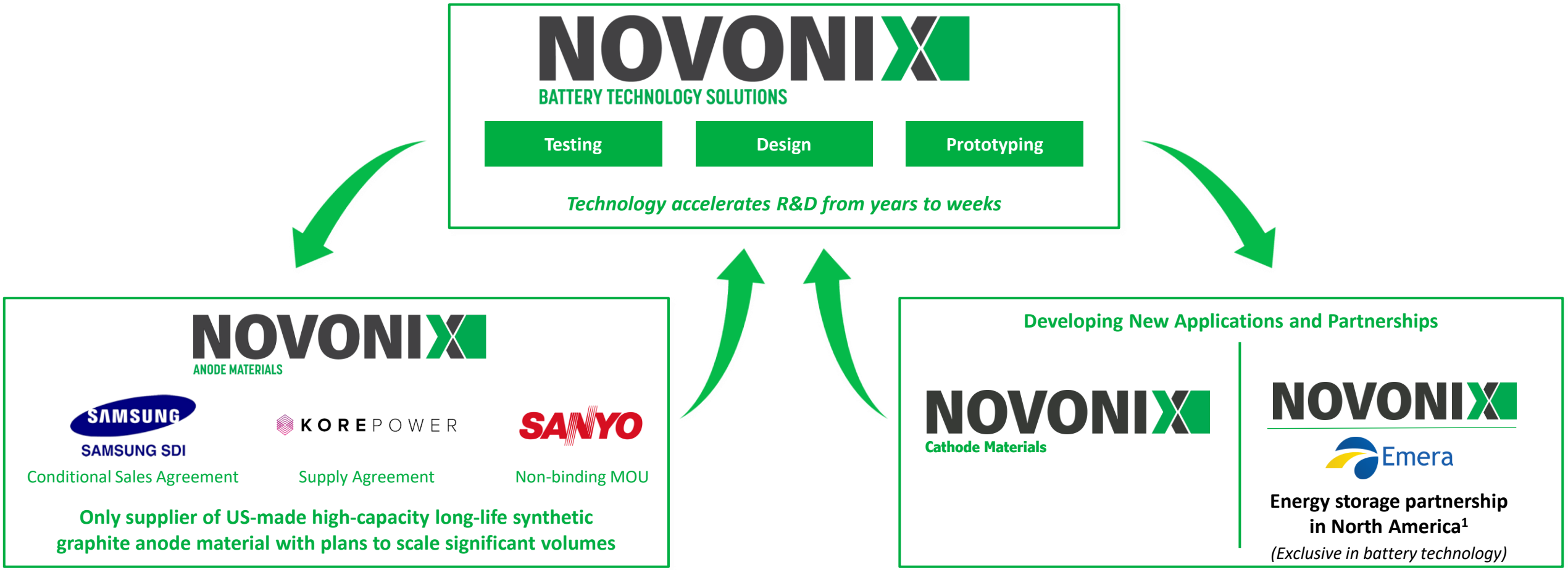
NOVONIX Emera
Energy Storage Partnership
SAMSUNG SDI
SANYO
Panasonic
LG Chem
ROMEO POWER TECHNOLOGY
QuantumScape
SK innovation

EV & ESS OEMs

TESLA
gm
TOYOTA
HONDA
Ford
LUCID

Note: Companies presented above are for indicative purposes only and not a representation of customer relationships.

NOVONIX Battery Development and Material Technology



Battery Technology Solutions serves as the pillar for innovation across the NOVONIX ecosystem, creating a positive feedback loop to drive technological advancement and deliver best-in-class products and services for customers

(1) We are currently collaborating with Emera to design a battery pack including innovative designs, custom manufacturing and control systems to support Emera Technologies' BlockEnergy microgrid.

NOVONIX Notable Milestones

19 Jan 2021: Leading researcher, Dr. Jeff Dahn appointed as Chief Scientific Advisor, effective July 2021

12 Feb 2021: NOVONIX entered a new five-year research sponsorship agreement with Mark Obrovac's Research Group of Dalhousie University

26 Feb 2021: Completion of ASX equity raise of A$115m to support growth of NOVONIX Anode Materials with an additional ~A$16m from directors

09 Aug 2021: Phillips 66 announced US$150m strategic investment in NOVONIX, advancing NOVONIX's production of synthetic graphite for high-performance lithium-ion batteries

23 Nov 2021: Ceremonial opening of NOVONIX's new Riverside facility attended by US Secretary of Energy, Jennifer Granholm

31 Jan 2022: Executed supply and investment agreements for ~12,000 tonnes with US-based KORE Power to advance and strengthen the domestic lithium-ion battery supply chain

January 2021 → **Today**

21 Jan 2021: NOVONIX Anode Materials selected to receive US $5.57mm grant from the US Department of Energy

19 Feb 2021: Emera and NOVONIX partner on innovative residential energy storage technology

Apr 2021: Completed installation of first Generation 2 furnace system built by Harper under our strategic partnership program and initiated build of first Gen 3 furnace

20 Oct 2021: Zhanna Golodryga joins the Board of Directors as Phillips 66 right to nominate a Director. Ms. Golodryga is the SVP, Chief Digital and Administrative Officer for Phillips 66

19 Jan 2022: Phillips 66 and NOVONIX sign Technology Development Agreement to advance the production and commercialization of anode materials for lithium-ion batteries

01 Feb 2022: American Depositary Receipts commenced trading on the Nasdaq and celebrated the milestone by ringing the Closing Bell

Phillips 66 Announces Strategic Investment in NOVONIX

Phillips 66

- Phillips 66 is a diversified energy manufacturing and logistics company.
- Phillips 66, with a portfolio of Midstream, Chemicals, Refining, and Marketing and Specialties businesses, the company processes, transports, stores and markets fuels and products globally
- Phillips 66 is a global producer of petroleum needle coke, the key precursor material for synthetic graphite
- Headquartered in Houston, the company has 14,000 employees committed to safety and operating excellence
- Phillips 66 had $57 billion of assets as of June 30, 2021
- Phillips 66 produces the precursor for synthetic graphite at advanced facilities located in Lake Charles, LA and Humber, UK

Announcement

Phillips 66 Announces Strategic Investment in NOVONIX

Investment will expand Phillips 66's presence in the battery supply chain and advance NOVONIX's production of synthetic graphite for high-performance lithium-ion batteries

August 09, 2021 10:00 AM Eastern Daylight Time

HOUSTON & BRISBANE, Australia--(BUSINESS WIRE)--Phillips 66 (NYSE: PSX) today announced it has entered into an agreement to acquire a 16% stake in NOVONIX Limited (ASX: NVX, OTC: NVNXF), a Brisbane, Australia-based company that develops and supplies in-demand materials for lithium-ion batteries.

"This strategic investment enables Phillips 66 to directly support the development of the U.S. battery supply chain," said Greg Garland, Chairman and CEO of Phillips 66. "It advances our commitment to pursue lower-carbon solutions while leveraging our leadership position and expertise in the specialty coke market and supporting NOVONIX's emerging position in U.S.-based anode production."

Phillips 66 is a leading global manufacturer of specialty coke, a key precursor in the production of batteries that power electric vehicles, personal electronics, medical devices and energy storage units. NOVONIX, a leading producer of synthetic graphite, processes specialty coke to make high-performance anode material for these batteries. The investment supports the development of a fully domestic supply chain for sales into the U.S. electric vehicle and energy storage system markets.

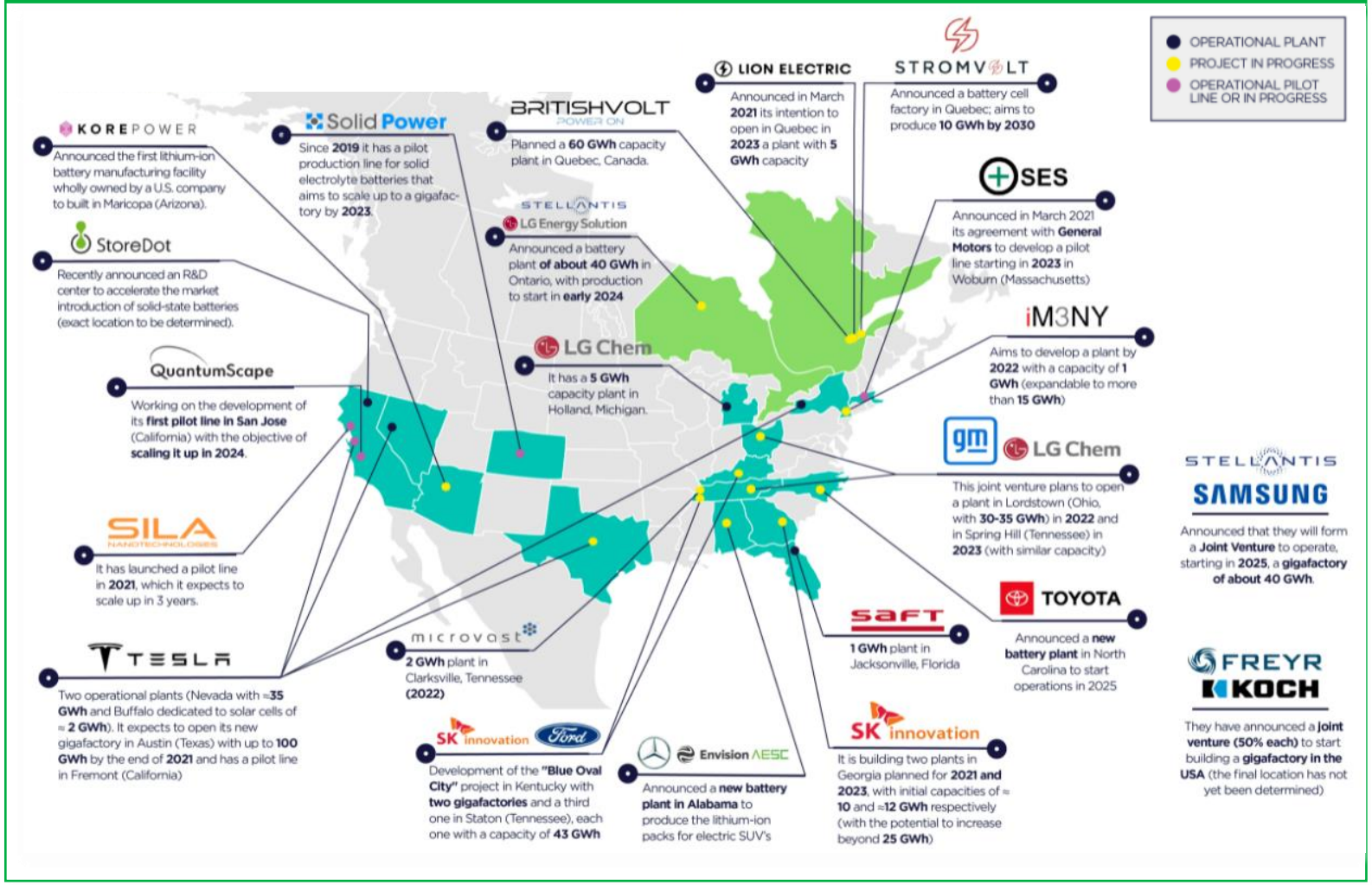
"We're excited by Phillips 66's vision for a sustainable future and confidence in our business plan and management team," said NOVONIX CEO and co-founder Chris Burns, Ph.D. "Phillips 66's investment will provide us with the capital needed to support growth and ongoing R&D as we continue to scale our synthetic graphite production and develop new technologies for higher-performance energy storage applications. We look forward to continuing to build our relationship with Phillips 66 as both a strategic partner and investor."

Deal Highlights

- Phillips 66 subscribed for 77,962,578 ordinary shares of NOVONIX for a total purchase price of US$150 million
- Phillips 66 will nominate one director to NOVONIX's Board of Directors
- This investment is driven by Phillips 66's Emerging Energy organization, which is tasked with building a lower-carbon business platform and shares a similar long-term vision and focus on sustainability as NOVONIX
- The investment by Phillips 66 will help support capacity towards 40,000 mt/year, which is expected to be completed by 2025
- The transaction closed September 30, 2021
- No financial advisors, brokers or other intermediaries were used by NOVONIX in this strategic investment

Battery Manufacturers and Auto OEMs Have Announced New Gigafactories to Support North American EV and ESS Growth

North American Battery Initiatives



Key Observations

- Over 500 GWh planned by the major OEMs alone in North America
  - Current capacity ~50 GWh
- Over 1,500 GWh planned in North America and Europe
- Announcements for new plants with clusters in the Midwest, Southeast and Ontario
- Graphic doesn't include potential CATL $5 billion 80 GWh plant in North America

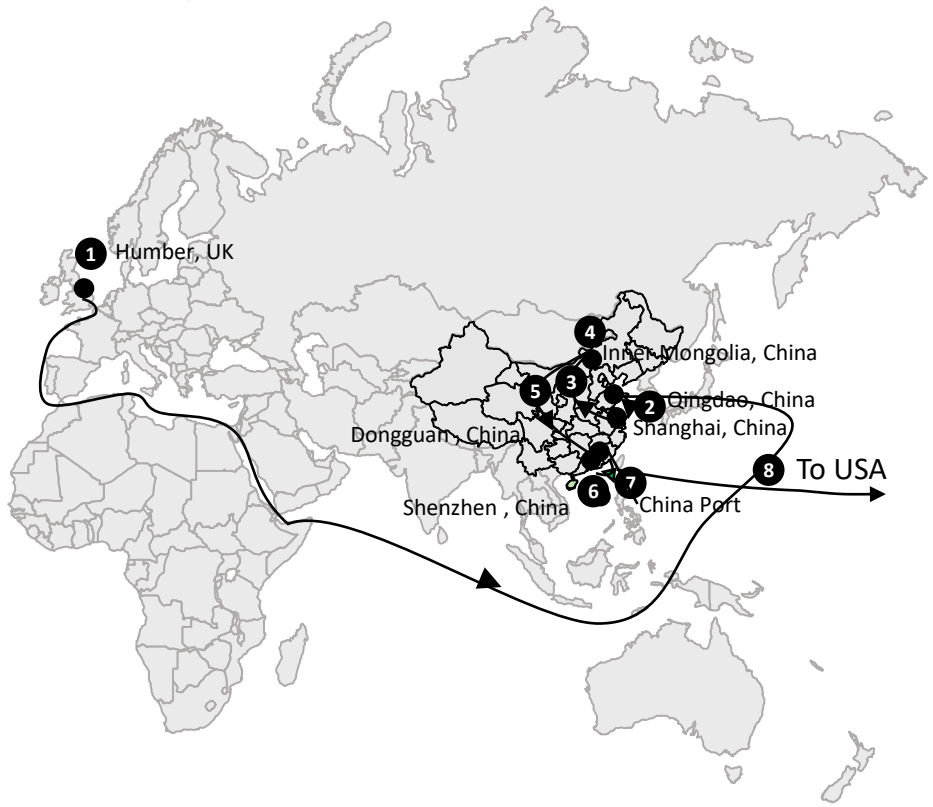
Source: CIC energiGune – March 2022

NOVONIX Enables the Only Fully Domestic US Supply Chain of EV Battery Anode Material (BAM)

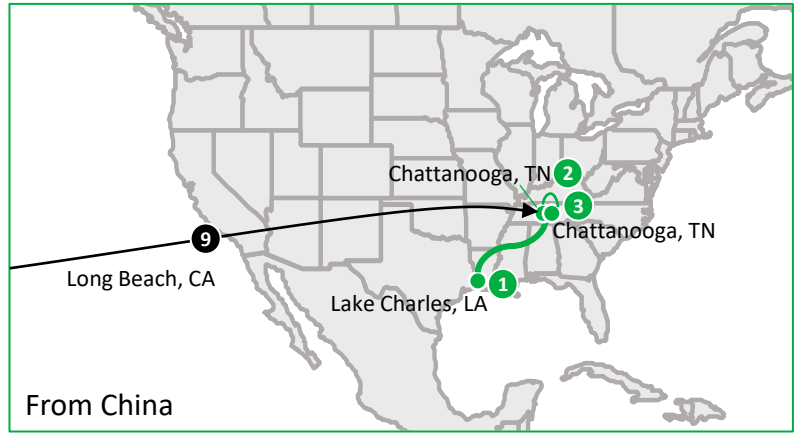
Chinese Synthetic Graphite Supply Chain

1. Needle coke ships to Qingdao from Humber, UK **(12,500 miles)**
2. Road transport of precursor to grinding site near Shanghai **(450 miles)**
3. Road transport of ground needle coke to Inner Mongolia **(1,050 miles)**
4. Graphitization in Inner Mongolia powered by brown coal with no environmental standards or emissions controls
5. Road transport of graphite to southern China **(1,500 miles)**
6. Processing of graphite into BAM
7. Land transport of BAM to China port **(50 miles)**
8. BAM ships to US port in CA **(7,300 miles)**
9. Land transport of BAM to end-user in TN **(1,800 miles)**

24,650 Total Miles



NOVONIX Supply Chain



1. Needle coke transported from Lake Charles, LA to Chattanooga, TN **(670 miles)**
2. All processing of precursor to BAM in Chattanooga under strict environmental standards
3. Delivery of BAM to end-user in Chattanooga, TN **(34 miles)**

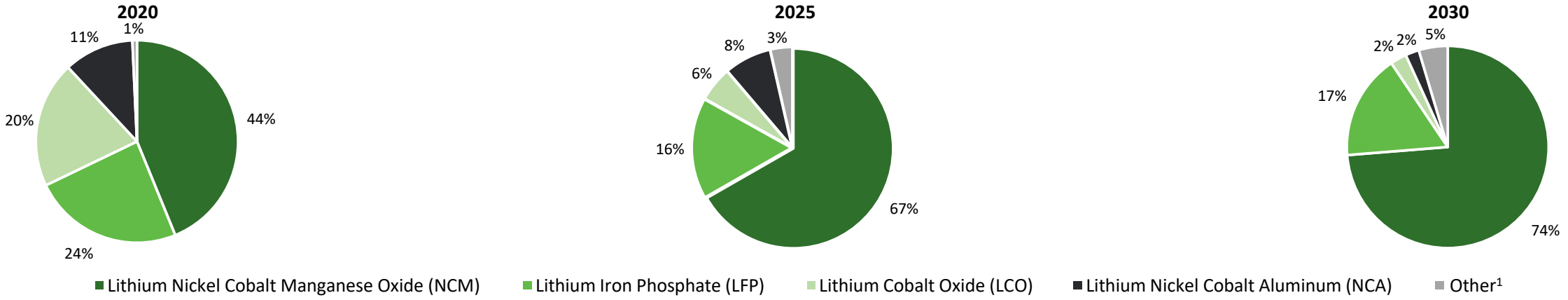
VW, for illustrative purposes

704 Total Miles

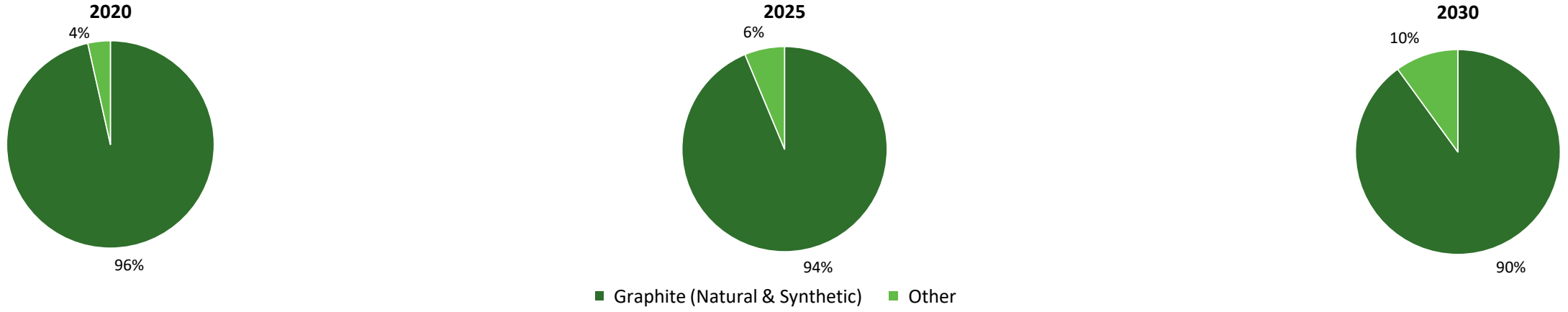
NOVONIX facilitates a cleaner, more secure, supply chain of high-quality synthetic anode material to the North American market vs. Chinese competitors

NCM is Expected to be the Leading Cathode Chemistry with Graphite Remaining the Dominate Anode Technology

Cathode Market Share by Chemistry



Anode Market Share by Material Type



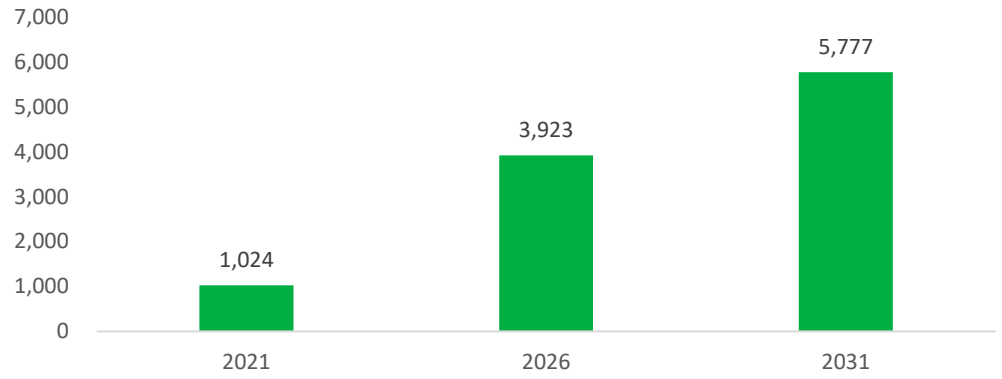
Source: Benchmark Mineral Intelligence Q1 2021 Report
(1) Other Includes lithium manganese nickel oxide (LMNO) and lithium-ion manganese oxide (LMO) batteries

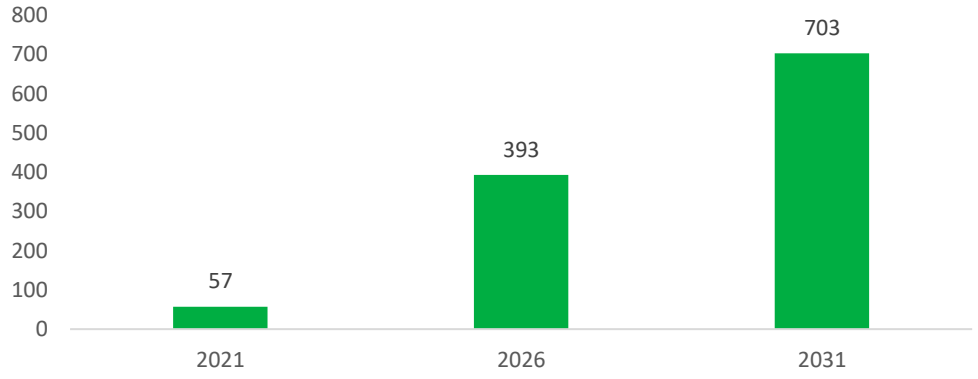
Global and Local Battery Growth is Driving Demand for Domestic Graphite Production

Global

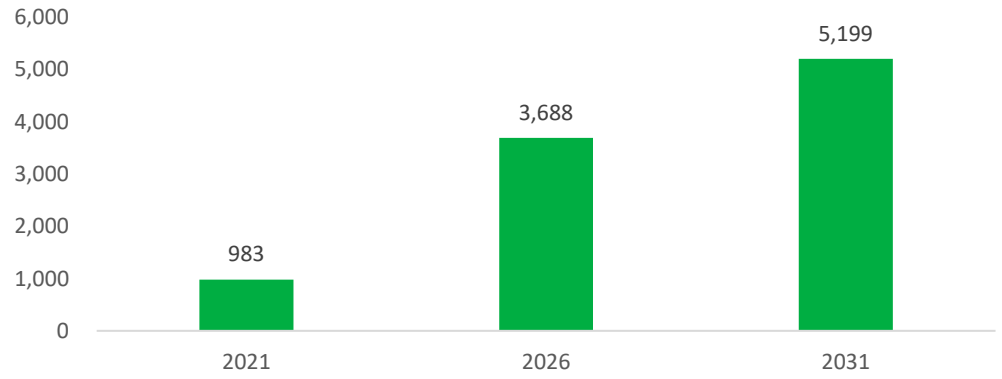
North America

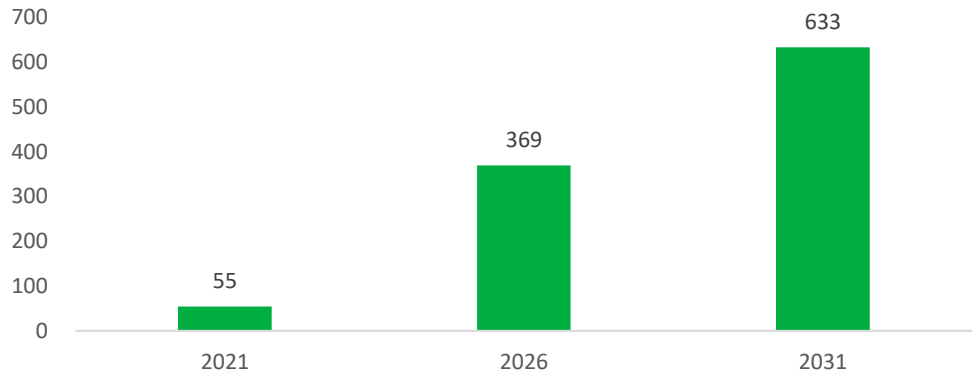
Battery Capacity (GWh)[1]





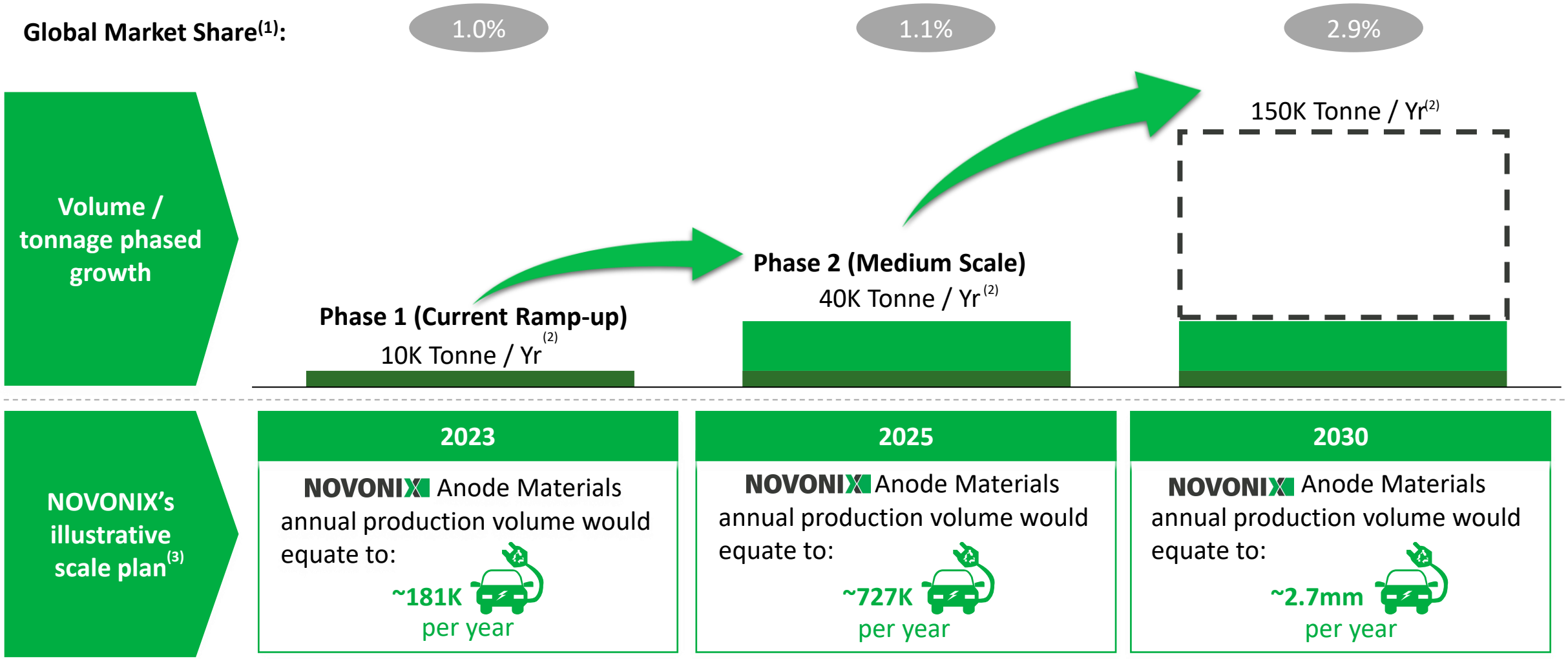
Implied Graphite Anode Demand (Kt) [2]





(1) Source: Benchmark Mineral Intelligence Gigafactory Assessment – March 2022. Based on announced capacity.
(2) Assumes 1 tonne of graphite required per GWh. Assumes graphite's market share of anode demand is 96% in 2021, 94% in 2026, and 90% in 2031.

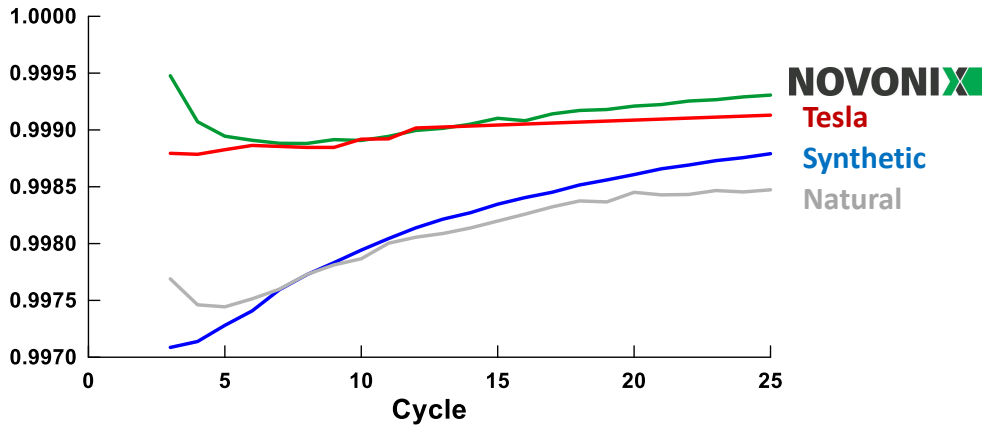
Phased Growth Plan for NOVONIX Anode Materials



(1) Market share based off implied global graphite demand in 2021, 2026, and 2031. Source: Benchmark Mineral Intelligence Gigafactory Assessment – March 2022. Based on announced capacity.
(2) Company expectations, which may or may not materialize.
(3) Assumes 55kg of graphite per EV.

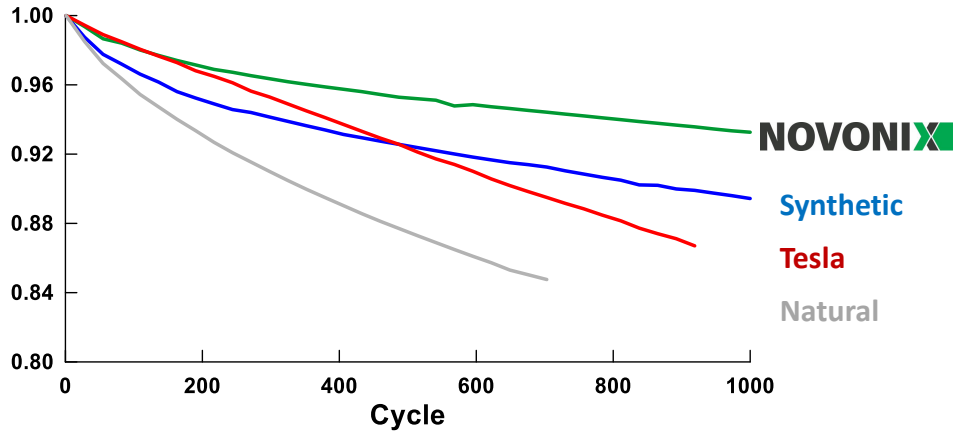
NOVONIX Anode Material Outperforms In Head-to-Head Testing

Improved Coulombic Efficiency (CE)[1]



- NOVONIX offers improved Coulombic Efficiency (CE) compared to industry leading materials (including a Tesla Model S cell used as a reference benchmark)
- CE measures the electrochemical stability of the materials in the battery
- The higher the CE, the longer the battery life

Improved Capacity Retention[1]



- NOVONIX offers improved capacity retention compared to industry leading materials (including a Tesla Model S cell used as a reference benchmark) as expected from higher coulombic efficiency
- Better capacity retention means less range loss over time for an electric vehicle

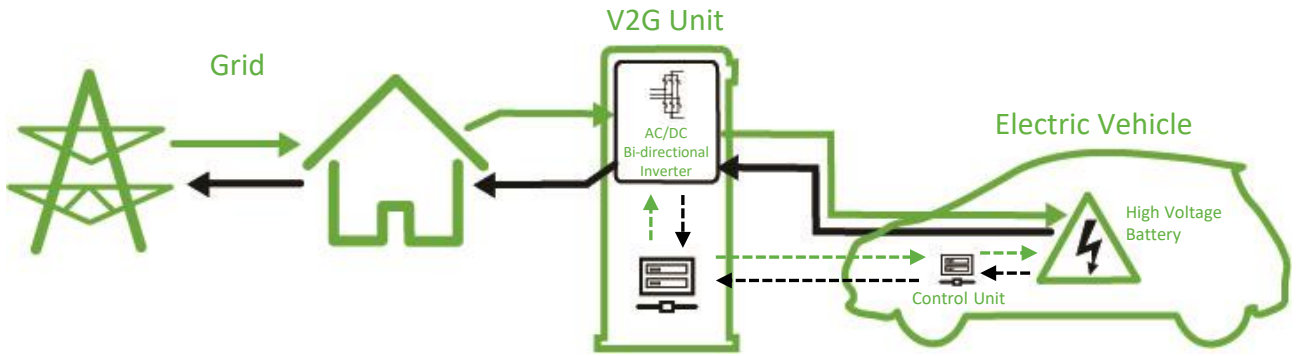
1. Data based on internal measurements taken as part of verification process.

V2G is Expected to Further Drive Demand for High Battery Cycle Life

Vehicle to Grid Provides Two Key Advantages

Enables fleets and individuals to reduce cost of ownership by charging at non-peak times and discharging to buildings or selling to grid at peak times

Ability to provide power to buildings or national grids during peak hours provides stability to grids



Several Key EV OEMS Have Announced V2G Plans

- All VW MEB-based electric cars will be V2G capable beginning in 2022, includes cars from Audi, Skoda, and Seat-Cupra
- Currently testing DC-Wallbox with bi-directional DC charging stations in Germany

- Integrating vehicle-to-grid technology in electrical architecture of Model 3
- Tesla's system could power up to 22kW at any one moment – more than enough to power the dryer, heater or A/C.

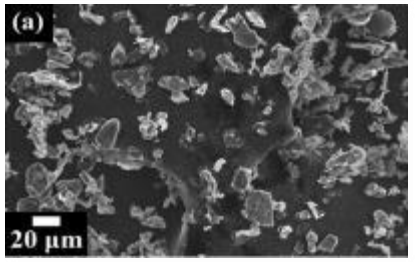
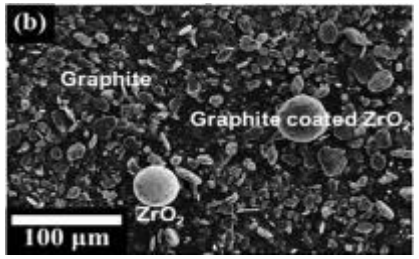
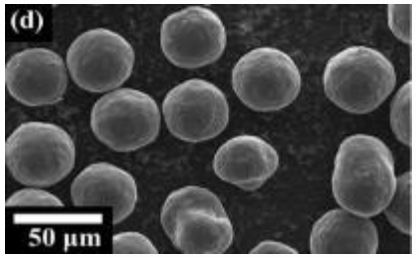
- Currently conducting V2G project "i-rEzEPT", utilizing Nissan LEAF and temporary storage systems to power homes
- Produces the Nissan Leaf, the only mass production EV on the market with bi-directional capability

- 2022 F-150 Lightning will be one of the first EV's to take advantage of bi-directional charging in the U.S. market
- The Lightning will offer a solar option that will provide more energy independence and grid contribution

DPMG: New Manufacturing Method for Anode and Cathode

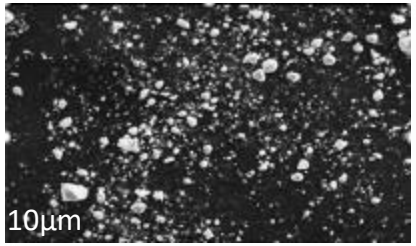
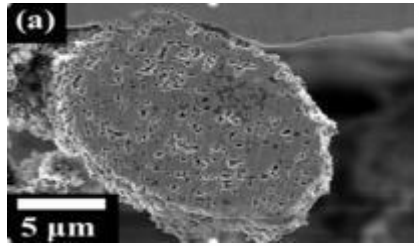
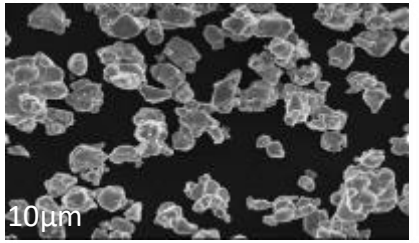
With multiple patent applications filed, NOVONIX's Dry Particle Microgranulation (DPMG) technology delivers higher yields at lower costs

Graphite Materials

Input Material	In-Process	Product
		

100% Yield (recovery of waste fines to high value product) | Relatively lower cost | Flexible precursor inputs

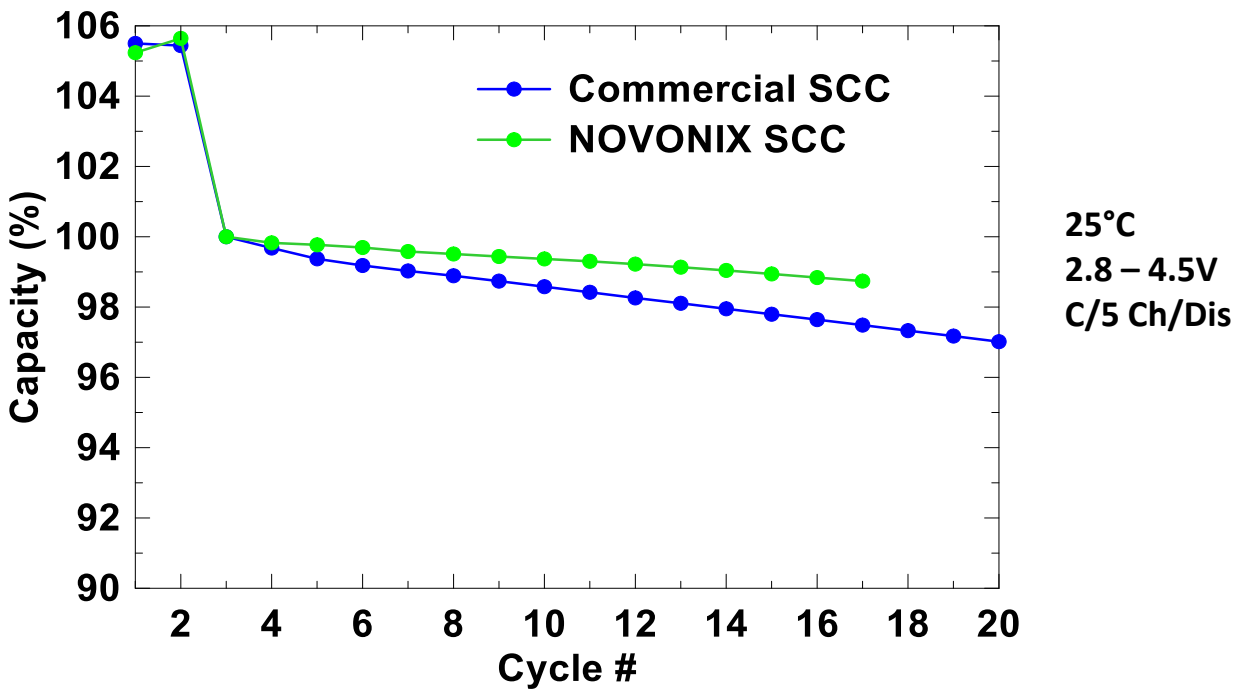
Cathode Materials

Input Material	Polycrystalline Product		Single Crystal Product
		Or	

100% Yield (recovery of waste fines to high value product) | No water waste | Relatively lower cost | High Nickel cathode materials

Early Cathode Synthesis Technology Results Demonstrate Results Better or Comparable with Long Life Commercial Single Crystal Cathode (SCC)

Normalized Electrochemical Results (Coin Cell)



25°C
2.8 – 4.5V
C/5 Ch/Dis

Product:	Commercial SCC	NOVONIX SCC
Reversible Capacity:	100%	104%
First Cycle Efficiency:	100%	101%

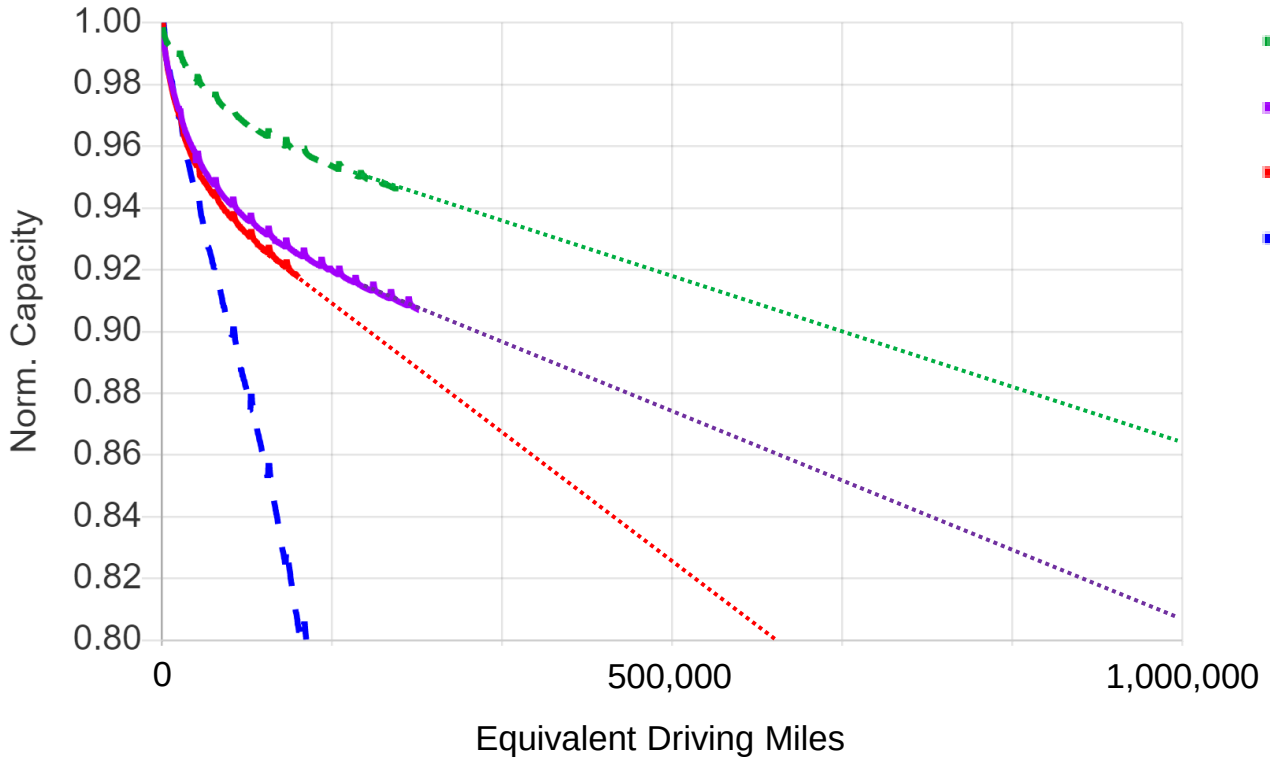
Key Observations

- Normalized electrochemical results in coin cell tests show NOVONIX outperforming in reversible capacity, first cycle efficiency, and cycling performance
- NOVONIX continues to optimize material through processing as well as through the use of coatings and dopants to further improve performance
- Polycrystalline cathode comparative performance test work also ongoing, with polycrystalline cathodes having some advantages over SCC

NOVONIX's Complete Battery Cell Technology is Leading the way for Next Generation EV Batteries

Demonstrated and Projected Performance Predicted to Exceed 1 Million Miles[1]

- SC NCM622 shown here is the same Commercial SCC reference material shown in previous slide
- Next step to build full cells for performance testing to include in this data set and demonstrate NOVONIX anode, cathode and electrolyte technologies in a single cell

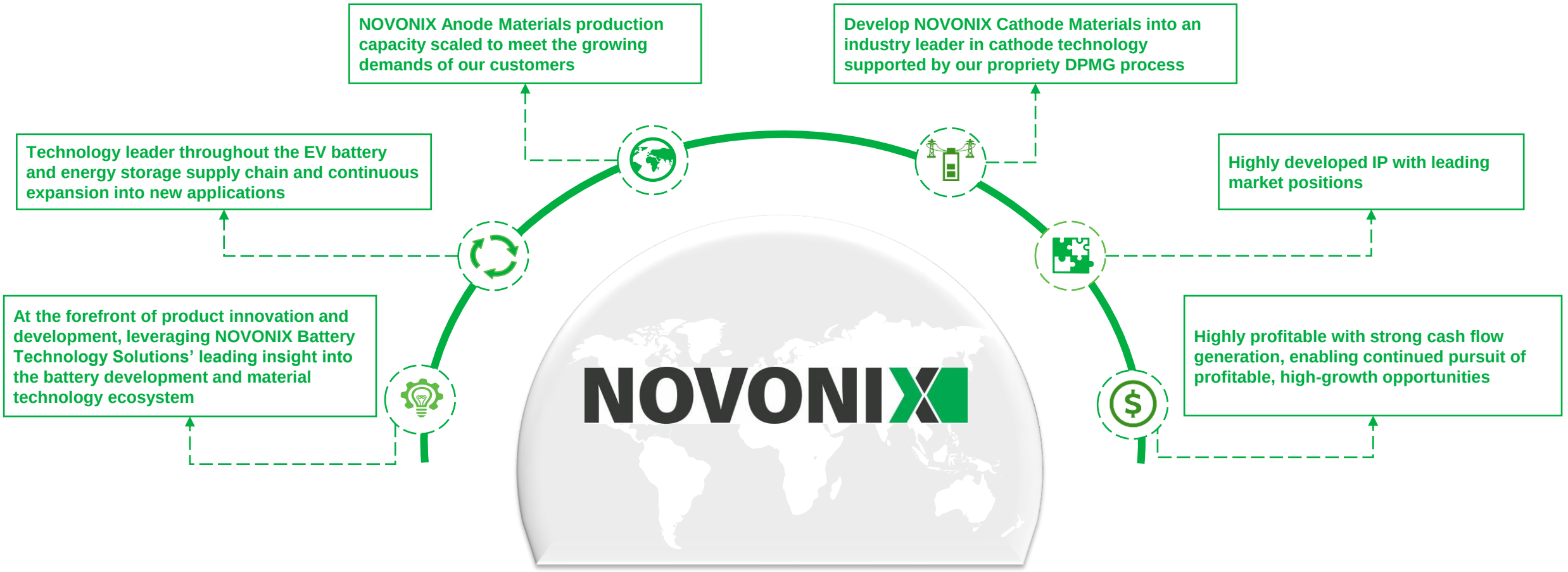


- SC NCM622 / NOVONIX Anode Material + Adv. Electrolyte
- SC NCM622 / Gr + Adv. Electrolyte
- SC NCM622 / Gr
- NCM622 / Gr (Commercially Available Reference Materials)

- 40°C full depth of discharge cycling
- Assumed 330 mile range
- Projection lines shown for guidance

1. Data based on internal measurements taken as part of verification process.

Our Goals for the Future of NOVONIX



Contact Information

NOVONIX Anode Materials

1029 West 19th Street, Chattanooga, TN, 37408, USA

353 Corporate Place, Chattanooga, TN, 37419, USA

NOVONIX Battery Technology Solutions

177 Bluewater Road, Bedford, NS B4B 1H1, Canada

110 Simmonds Drive, Dartmouth, NS B3B 1N9, Canada

Send all investor queries to: ir@novonixgroup.com

This announcement has been authorised for release to the ASX by the Chairman, Admiral Robert J Natter