







30/06/2023



# Pharus Electric Mobility Value Niche

### Portfolio Update 31<sup>st</sup> March 2023 – 30<sup>th</sup> June 2023



Launch date: 10.06.2019

Total Net Asset as of 30.06.23: € 20,431,125.94

Currency: EUR

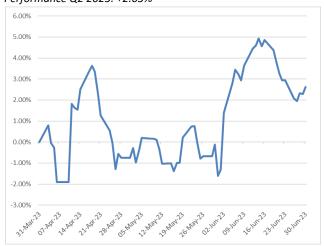
Net Asset Value per share as of 30.06.23:

Class A – ISIN: LU1867072149	€ 157.39
Class B – ISIN: LU1867072222	€ 169.84
Class Q – ISIN: LU1867072495	€ 169.66
Class A GBP – ISIN: LU2526377374	£ 99.06

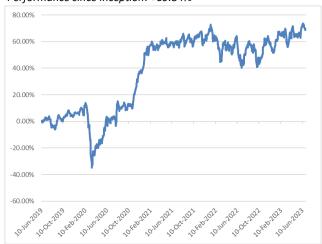
	Q2	Year to Date	1 Year	Since inception
Performance (Class B)	+2,63%	+12,03%	+18.31%	+69.84%

#### Net Asset Value per share

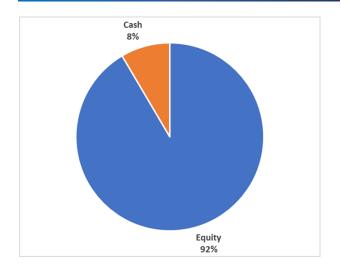
Performance Q2 2023: +2.63%



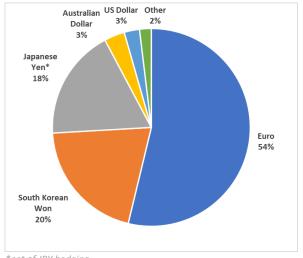
#### Performance since inception: +69.84%



#### Portfolio breakdown by asset class



#### Portfolio breakdown by currency



\*net of JPY hedging

#### **Quarterly Comment**

The Fund appreciated 2.63 percent during the second quarter, ending the six-month period with a 12.03 percent advance.

The period was supported by strong electric vehicle sales in China, some European countries and the United States, where expectations are growing about the expected acceleration resulting from the Inflation Reduction Act (IRA), which will make this country a global hub for electric car production.

In May, global sales of electric cars were more than 1 mln, up 50 percent from the previous year (16 percent market share).

The fund's performance was supported by the Lithium Cells (+15.5%) and Powertrains & Ultracapacitors (+9.1%) niches. The Lithium cells niche benefited from the good performance of Japanese and Korean manufacturers exposed to IRA. In fact, since the introduction of the IRA, electric car manufacturers have already announced investments of more than \$60 billion, and a significant share of these have just been announced by operators from Japanese and Korean players. They are in fact the main beneficiaries of the U.S. choice to create a supply chain no longer dependent on China, given their accumulated know-how and experience in large-scale battery production.

The biggest contributor to the positive performance has been Panasonic, the historic battery supplier for Tesla, which will significantly increase its U.S. presence with new gigafactories. We took advantage of this strong phase to take partial profit on the stock, as well as on LG Chemical, the controlling holding company of LG Energy Solutions, the world's third largest player in the industry. SK Innovation, on the other hand, suffered, following the announcement of a capital increase aimed at supporting the growth plan of the new green energy business, which improves the already solid growth profile. We will therefore assess a rise on potential weakness phase on this stock.

Negative contributors, however, include the niches Commodities (-15.2%) and Cathodes (-13.4%). The former niche suffered from the general decline in commodities, lithium in the first place, but also other commodities related not only to electric cars, but to the macroeconomic cycle, such as nickel and graphite. Indicatively, the drop in the cost of raw materials for electric cars has fallen by about 30 percent since the beginning of the year, setting the stage for a lowering of list prices (already implemented by Tesla and Chinese manufacturers) that will only accelerate their diffusion.

In this context, Syrah, a major producer of graphite in Mozambique and precursor materials for the production of electric battery anodes in the US, has been boosted. This operator represents one of the few alternatives to Chinese producers and is also a beneficiary of the IRA. The Cathodes Niche, on the other hand, suffered from the decline of Toda Kogyo, Basf's partner in the production of cathode precursors, which is experiencing a negative moment for the other divisions in which it operates.

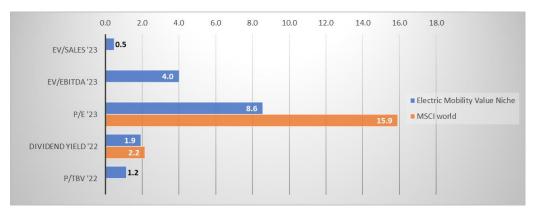
New stocks were added to the portfolio during the month, including two Japanese small caps exposed to separators and cathodes, as well as other players in the Satellites niche, especially players exposed to the growth of assembly lines for EVs and thermal management systems again for electric cars.

The fund offers exposure to mass adoption of EVs at attractive valuations (P/E 8.6x, P/BVT 1.1x) due to its deep value approach.

### Niche Performance Q2 2023

NICHE	Performance
Lithium Cells	+15.47%
Cathodes	-13.37%
Anodes	+1.52%
Electrolytes & Elecfoils	+0.04%
Separators	-5.20%
Commodities	-15.16%
Powertrains & Ultracapacitors	+9.12%
Satellite Areas	+0.57%

### Portfolio valuation



Source: Niche AM, Thomson Reuters, MSCI

### Top holdings

ISIN	SECURITY	%	NICHE	SUB-NICHE
JP3866800000	Panasonic	7.24%	Lithium Cells (LC)	NCA
KR7051911006	LG Chemical Pref	5.03%	Lithium Cells (LC)	NMC
JP3402600005	Sumitomo Metal Mining	4.74%	Cathodes (CM)	NCA
FR0013176526	Valeo	4.04%	Power Trains & Ultracapacitors (PTU)	Power Trains
JP3544000007	Teijin	3.98%	Separators (SM)	WET
JP3627400009	Toda Kogyo	3.85%	Cathodes (CM)	NCA
JP3368000000	Resonac Holdings	3.34%	Anodes (AM)	Anodes
KR7096771001	SK Innovation	3.27%	Lithium Cells (LC)	NMC
KR7005490008	Posco Holdings	3.04%	Anodes (AM)	Artificial Graphite
FR0000131757	Eramet	2.83%	Commodities (C)	Nickel Sulphate

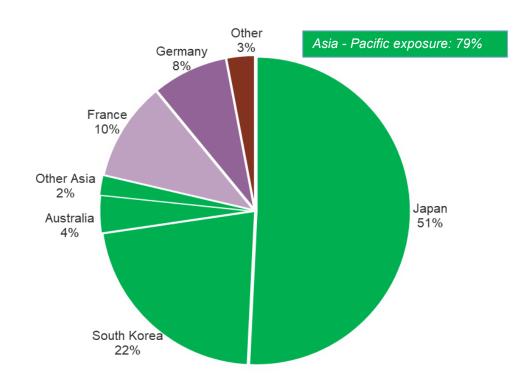
#### Main increases in weight

Holdings	Weight at 31/03/23	Weight at 30/06/23
W-Scope	0.0%	0.7%
Volkswagen Pref Shs	1.8%	2.5%
Duerr	0.0%	0.5%
Kureha	0.0%	0.4%
NORMA Group	0.0%	0.3%

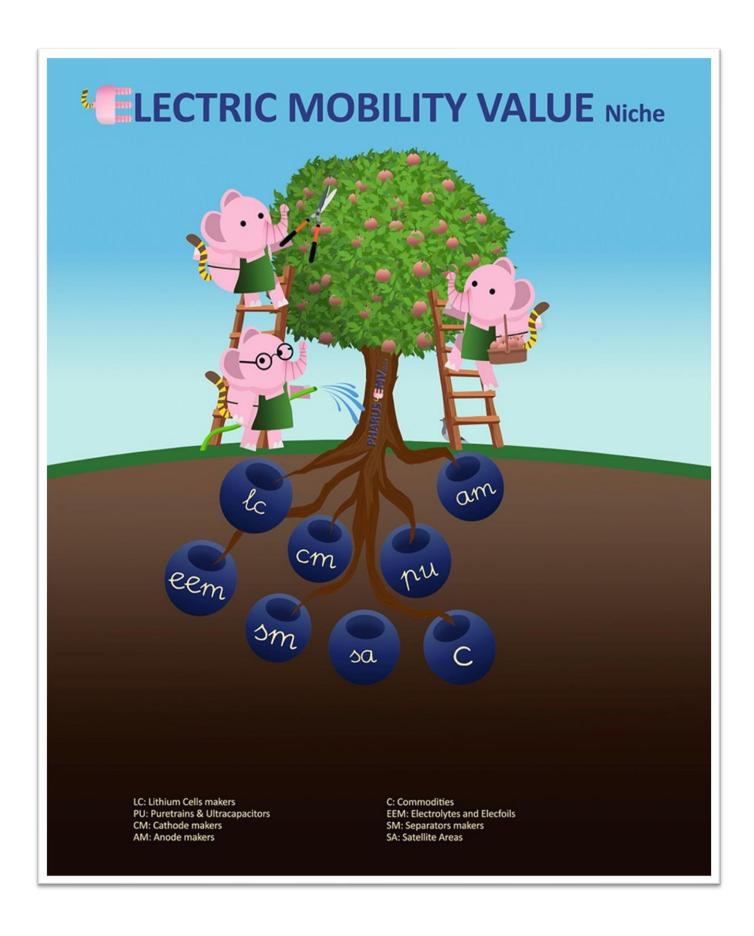
#### Main decreases in weight

Holdings	Weight at 31/03/23	Weight at 30/06/23	Total Return
LG Chem Preferred Stock	7.3%	5.0%	+35.10%
Posco Holdings	4.3%	3.0%	+64.49%
Panasonic Holdings	7.3%	7.2%	+30.86%

#### Equity breakdown by geographical exposure



Source: Niche AM



# **Lithium Cells**



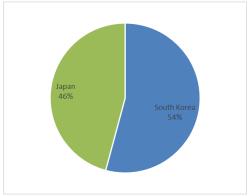
# stocks: Average Market Cap (mln €) 25.6198 Median Market Cap (mln €): 6.038

#### Lithium cells – segment breakdown

		EM Fund	Lithium Niche
Lithium Cells	LC	17.1%	100.0%
Nickel Manganese & Cobalt	NMC	9.8%	57.6%
Nickel Cobalt & Aluminium	NCA	7.2%	42.4%

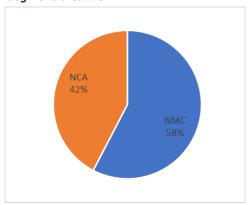
Source: Niche AM

#### Geographical breakdown

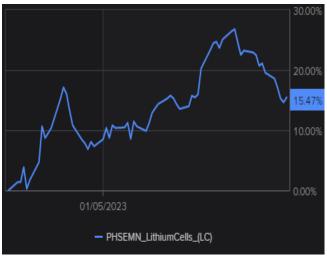


Source: Niche AM

#### Segment breakdown

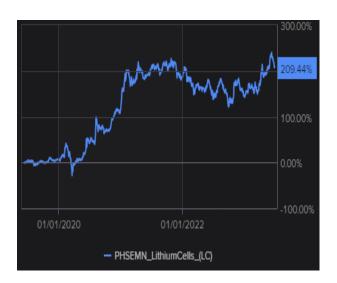


Performance Q2 2023 (31/03/23-30/06/23)



Source: Niche AM, Thomson Reuters

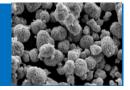
#### **Performance since inception (10/06/19 – 30/06/23)**



#### Niche description

Electric mobility will grow dramatically in the next few years, with a speed still unexpected by most and changing the world for good. The electric mobility will be pervasive, affecting land, air and water transportation. At the base of the electrification of mobility we found the lithium batteries that are made up of several lithium cells bundled together. Each lithium cell is a small battery with a cathode, an anode, a separator and filled with electrolyte solution. There are different kinds of lithium cells, depending on the chemistry used, although the NCA and NCM will be those by far most used in the electrification of mobility.

### **Cathodes**



260

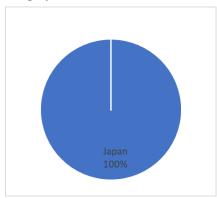
# stocks: 8 Average Market Cap (mln €): 3.150 Median Market Cap (mln €):

#### Cathodes – segment breakdown

		EM Fund	Cathodes Niche
Cathodes		14.6%	100.0%
Nickel Manganese & Cobalt	NMC	1.5%	10.0%
Nickel Cobalt Aluminium	NCA	9.0%	61.7%
Cathode Materials	CM	4.1%	28.3%

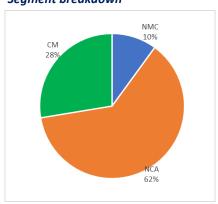
Source: Niche AM

#### Geographical breakdown

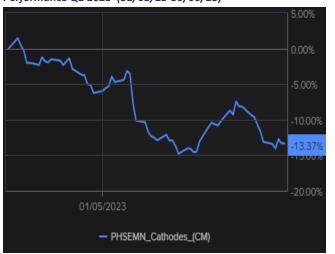


Source: Niche AM

#### Segment breakdown

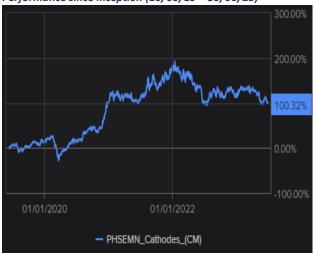


Performance Q2 2023 (31/03/23-30/06/23)



Source: Niche AM, Thomson Reuters

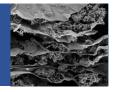
#### **Performance since inception (10/06/19 – 30/06/23)**



#### Niche description

Cathodes represent the most valuable component of EV batteries (making up about 1/4 of the whole cost of the cell) and their chemistry is pivotal in determining energy density and capacity of the battery. Cathodes composition for EVs, for at least the next 5/7 years, will be mainly based on two different chemistries, NCA (nickel, cobalt and aluminium) and NMC (nickel, manganese and cobalt), as they provide the energy density needed to drive the electrification of mobility mass market. Lithium cells are normally named after the chemistry of their cathodes (NCA, NMC, LFP, etc).

### **Anodes**



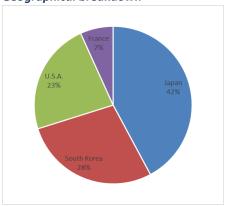
# stocks: 6 Average Market Cap (mln €) 7.863 Median Market Cap (mln €): 2.374

#### Anodes – segment breakdown

	EM Fund	Anodes Niche
Anodes	10.9%	100.0%
Coating	0.7%	6.8%
Anodes	3.8%	35.4%
Artificial Graphite	3.8%	34.7%
Needle Coke	2.5%	23.1%

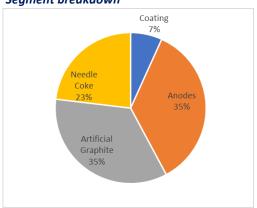
Source: Niche AM

Geographical breakdown

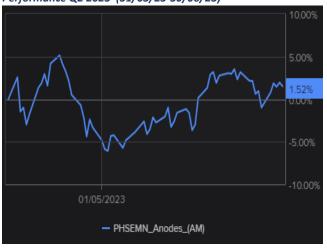


Source: Niche AM

Segment breakdown

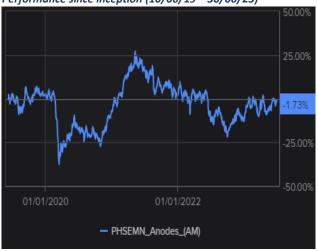


Performance Q2 2023 (31/03/23-30/06/23)



Source: Niche AM, Thomson Reuters

**Performance since inception (10/06/19 – 30/06/23)** 



#### Niche description

Anodes play an important role in determining the energy capacity and density of a battery, as they perform the role of storing and emitting Li-ions to and from the cathode. The anodes are coated on top of a copper foil, a metallic foil which acts as a current collector for the anode. Selecting a high-quality active material for anodes allows Li-ion battery cells to deliver both higher capacity retention and greater power. The selection of materials used in anodes plays a significant role in determining a battery's transmission and lifespan, which is the most important criteria in the material selection process.

# **Separators**



# stocks: 5

Average Market Cap (mln €): 2.313

Median Market Cap (mln €):

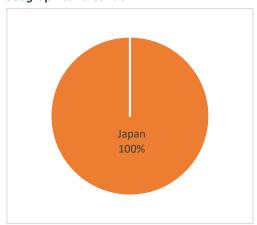
1.809

#### Separators – segment breakdown

	EM Fund	Separators
Separator Maker	5.3%	100.0%
Wet Separators	4.4%	82.6%
Dry Separators	0.9%	17.4%

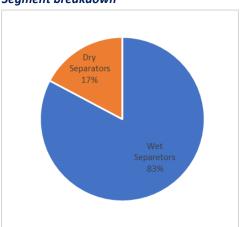
Source: Niche AM

#### Geographical breakdown

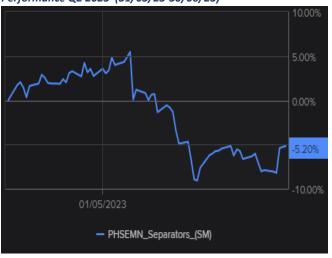


Source: Niche AM

#### Segment breakdown



Performance Q2 2023 (31/03/23-30/06/23)



Source: Niche AM, Thomson Reuters

**Performance since inception (10/06/19 – 30/06/23)** 



#### Niche description

Separators determine the safety of a Li-ion battery as they act as an absolute barrier between the cathode and anode. Although separators account for only 5% of the battery cell content, they are the second-most significant raw material in terms of cost (about 10% of a Li-ion battery cost). The automotive separator market was worth some USD600m in 2015, and in the same year totalled 0.5bn sqm on a surface-area basis. This figure could grow to 20bn sqm by 2025, in line with the growth of the EV battery market. However, there is a risk in the future for this component as separators would be unnecessary if all solid-state batteries replace Li-ion batteries from 2030.

# **Electrolytes & Electrofoils**



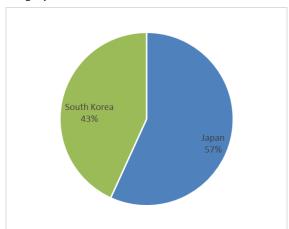
# stocks: 3 Average Market Cap (mln €): 338 Median Market Cap (mln €): 358

#### Electrolytes & Elecfoils - segment breakdown

	EM Fund	Electrolytes Niche
Electrolytes & Electro foils	3.3%	100.0%
Electrofoils	0.0%	0.0%
Electrolytes	3.3%	100.0%

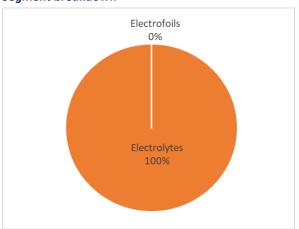
Source: Niche AM

#### Geographical breakdown

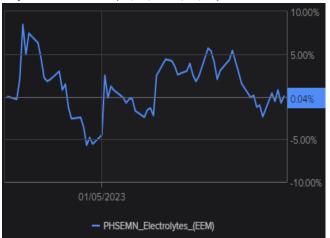


Source: Niche AM

#### Segment breakdown



Performance Q2 2023 (31/03/23-30/06/23)



Source: Niche AM, Thomson Reuters

#### Performance since inception (10/06/19 - 30/06/23)



#### Niche description

Electrolytes play a key role in enabling the use of electricity as they promote the movement of Li-ions between the cathode and anode. Electrolytes consist of solvents, salts and additives. Solvents act as dissolvers of the conducting salts. Salts are used as the passage for Li-ions to move and determine the ion conductivity. Additives serve a specific purpose and are usually added to the electrolyte to modify its properties. Materials with high ionic conductivity are essential so that lithium ions can freely move between the anode and the cathode. Therefore, the type of electrolyte used affects the speed of movement of Li-ions and the overall performance of the battery.

# **Commodities**



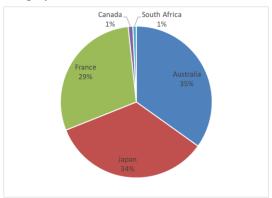
# stocks: 10 Average Market Cap (mln €): 1.555 Median Market Cap (mln €): 474

#### Commodities – segment breakdown

	EM Fund	Commodities Niche
Commodities	9.6%	100.0%
Natural Graphite	1.9%	19.4%
Cobalt	1.1%	11.1%
Nickel Sulphate	3.8%	39.2%
Lithium	1.4%	14.2%
Copper	1.5%	15.4%
Vanadium	0.1%	0.7%

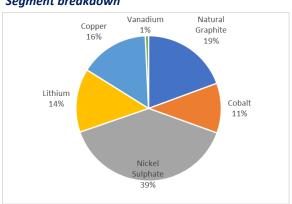
Source: Niche AM

#### Geographical breakdown

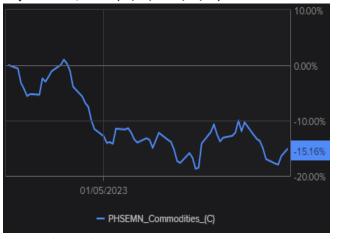


Source: Niche AM

#### Segment breakdown



Performance Q2 2023 (31/03/23-30/06/23)



**Performance since inception (11/06/19 – 30/06/23)** 



Source: Niche AM, Thomson Reuters

#### Niche description

Commodities are vital to electric mobility. The need for cobalt, lithium and graphite will increase many times by 2025 while the need for nickel will almost double. Today the world looks unprepared for such a change and a gradual increase in the price of these commodities is likely. The path will be volatile but potentially highly rewarding.

# Powertrains & Ultracapacitors



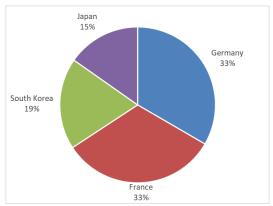
#stocks: 6 Average Market Cap (mln €): 6.205 Median Market Cap (mln €): 3.894

#### PTs & UTs - segment breakdown

	EM Fund	Powertrains & UT
Powertrains & UTs	12.5%	100.0%
Powertrains	10.6%	84.8%
Ultracapacitors	1.9%	15.2%

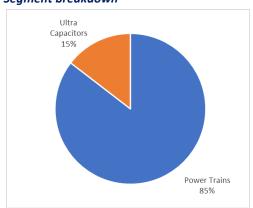
Source: Niche AM

#### Geographical breakdown

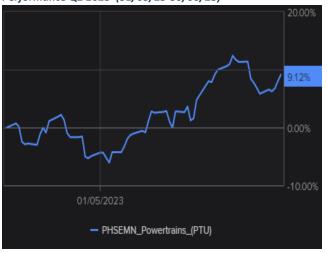


Source: Niche AM

#### Segment breakdown



Performance Q2 2023 (31/03/23-30/06/23)



*Performance since inception (10/06/19 – 30/06/23)* 



Source: Niche AM, Thomson Reuters

#### Niche description

Powertrains will have to adapt to the electrification of mobility and many players are already active in providing new solutions to optimise the functioning of the EVs. Those better equipped to master the change could be able to gain market share and increase margins. At the same time ultracapacitors could become an important complement of the electric powertrain, providing high power when needed, and in doing so increasing the performance and lengthening the life of the batteries.

# **Satellite Areas**



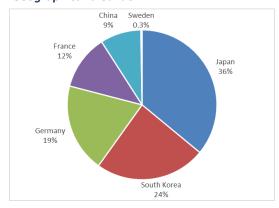
# stocks: 18 Average Market Cap (mln €): 13.725 Median Market Cap (mln €): 719

#### Satellite Areas – segment breakdown

	EM Fund	Satellite Areas Niche
Satellite Areas	17.1%	100.0%
Sensors	2.1%	12.1%
Cars	6.3%	36.9%
Forklifts	0.0%	0.2%
Assembly Lines	3.2%	18.8%
Electric Airplanes	0.6%	3.5%
Electrodes Cutting Equipment	2.7%	15.8%
Charging Stations	0.8%	4.8%
New Materials For Mobility	0.4%	2.6%
Lithium Batteries Assembly Machinery	0.5%	2.9%
Thermal Management Systems	0.4%	2.3%

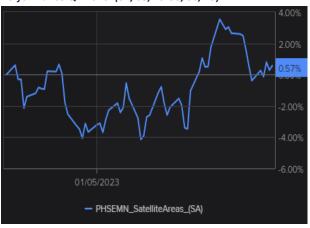
Source: Niche AM

#### Geographical breakdown



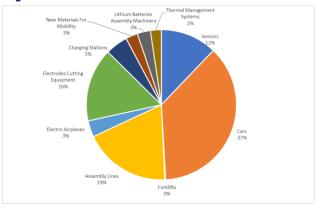
Source: Niche AM

#### Performance Q2 2023 (31/03/23-30/06/23)

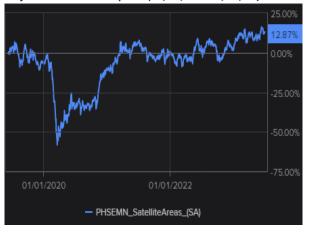


Source: Niche AM, Thomson Reuters

#### Segment breakdown



#### **Performance since inception (10/06/19 – 30/06/23)**



#### Niche description

The passage from the internal combustion powered vehicles to battery powered vehicles will a seismic shift. The underlining market for batteries is likely to multiply by more than 30 in less than ten years by value, reaching that of semiconductors. One billion of cars and hundreds of millions of other vehicles will be affected. The spillover effect will be massive and many sectors will morph radically. This niche tries to pick the companies that could indirectly benefit from this historical shift.

#### **DISCLAIMER**

This document, any presentation made in conjunction herewith and any accompanying materials are preliminary and for information only. They are not an offering memorandum, do not contain any representations and do not constitute or form part of an offer or invitation to subscribe for any of Niche's funds (each, the "Fund"). Further they do not constitute or form part of any solicitation of any such offer or invitation, nor do they (or any part of them) or the fact of their distribution, form the basis of, or can they be relied on, in connection with any contract therefor. The information contained in this report has been compiled exclusively by Niche Asset Management Ltd which is authorised and regulated by the Financial Conduct Authority (RN783048) and is registered in England & Wales 10805355. The information and views contained in this document are not intended to be complete and may be subject to change at any time. No representation, warranty or undertaking, stated or implied, is given as to the accuracy of the information or views in this document and no liability for the accuracy and completeness of information is accepted by Niche Asset Management Ltd and/or its partners. The investment strategy of the Fund is speculative and involves a substantial degree of risk of losing some or all of the capital invested. Market, political, counterparty, liquidity and other risk factors may have a significant impact on the investment objectives of the Fund, while past performance is not a guide or otherwise indicative of future results. The distribution of this document and the offering of the Fund's shares in certain jurisdictions may be restricted by law and therefore persons into whose possession this document comes should inform themselves about and observe any such restrictions. The Fund is not yet available for distribution in all countries, it will be only subject to registration with the local supervisory Authority. Potential investors are invited to contact Niche Asset Management Ltd, in order to check registration countries. Any failure to comply with these restrictions could result in a violation of the laws of such jurisdiction. Any reproduction of this information, in whole or in part, without the prior consent of Niche Asset Management Ltd is also prohibited. This document may only be communicated or passed to persons to whom Niche Asset Management Ltd is permitted to communicate financial promotions pursuant to an exemption available in Chapter 4,12 of the Financial Conduct Authority's Conduct of Business Sourcebook ("COBS") ("Permitted Recipients"). In addition, no person who is not an authorised person may communicate this document or otherwise promote the Fund or shares therein to any person it the United Kingdom unless such person is both (a) a Permitted Recipient and (b) a person to whom an authorised person is permitted to communicate financial promotions relating to the Fund or otherwise promote the Fund under the rules in COBS 4,12 applicable to such authorised person. The securities referenced in this document have not been registered under the Securities Act of 1933 (the "1933 Act") or any other securities laws of any other US jurisdiction. Such securities may not be sold or transferred to US persons unless such sale or transfer is registered under the 1933 Act or exemption from such registration. This document is intended for professional investors only. Potential investors are recommended to carefully read the Prospectus and the Key Investor Information Document (KIID) before subscribing.