

# QUARTERLY ACTIVITIES REPORT

Li-S Energy Limited (ASX: LIS) (“Li-S Energy” or “the Company”) is pleased to provide the following activities report for the quarter ended 30 June 2023, pursuant to Listing Rule 4.7C



AutoFlight's cutting-edge eVTOL aircraft Prosperity I was one of a number of electric aircraft on display at the Paris Air Show.

## CONTENTS

---

CEO'S Report | Highlights, Material Developments and Changes | Phase 3 Facility Update  
Paris Air Show Report | Summary of Expenditure | Use of Funds | Payments to Associates or  
Related Parties | Corporate Directory

# CEO'S REPORT

The June quarter has been eventful for Li-S Energy, with significant progress in three key areas – improving cell production performance on Phase 2, building our Phase 3 facility, and expanding our reach into international markets.

Our scientific team has been scaling up the Phase 2 production rate and has commissioned the first production processes for the Phase 3 line. Of particular note is the scale-up of our cathode materials production and roll-to-roll coating, with the commissioning of larger ball mills and a large slurry mixer to increase cathode material production by an order of magnitude to meet Phase 3 production rates.

Meanwhile, the cell assembly team has enhanced its cell production rate and cell quality control while continuing to optimise a range of parameters in the cell assembly process.

The Phase 3 facility is on track for commissioning later this year, with the construction of the Dry Room well advanced following the installation of the dehumidifier and a range of new equipment now ordered. Completion of the facility will allow us to make more cells available to potential clients so they can undertake meaningful, commercial testing of their products with our batteries.

In addition, we have placed orders for an extensive battery cell test facility, including a shipping container-sized explosion-proof cell test chamber which we will use for test cycling large cells, plus a comprehensive range of test equipment for environmental and abuse testing. We anticipate this will be one of Australia's most advanced battery test facilities.

Last month we were honoured by a visit from His Excellency Abdulla Alsabousi, Ambassador Extraordinary and Plenipotentiary of the United Arab Emirates. The Ambassador was keen to understand our technology and scale up process with the view of how the UAE could assist Li-S Energy to expedite our progress establishing and developing international partners in the UAE.

During the quarter, we commenced developing a collaborative program to design and build a high endurance solar UAV with two pioneering Australian companies, [Halocell](#) and [V-TOL Aerospace](#), targeting dawn-til-dusk flight times.

I also visited the Paris Air Show in June. This is one of the largest events in the Aviation and Defence industry calendar. While there I met the CTO of magniX and her team as part of our continuing collaboration project on eAviation battery development. Across the four days I also met dozens of other companies in the electric aviation industry, and we are now engaging with many of them as we expand our reach into this important sector of Li-S Energy's future.

Subsequent to the end of the June quarter, I had the honour of welcoming Bob Galyen and Isobel Sheldon OBE onto our global advisory panel. Before he retired Bob was the CTO of CATL, the world's largest battery manufacturer. Isobel received her OBE for long service to EV battery development, with more than 20 years pioneering the industry. Together they are a *tour de force* who will be instrumental in driving forward our strategy for international partnerships and global commercialisation.

Dr Lee Finniear  
Chief Executive Officer



# Highlights, Material Developments and Changes - June Quarter 2023

The company announced a 45% improvement in the volumetric energy density of its 20-layer lithium sulfur pouch cell. This was achieved by developing novel, semi-solid-state lithium sulfur battery chemistry.

Significant progress on battery cell production, including scaling up and optimising output and quality control in roll-to-roll sulfur cathode coating, slurry material manufacture and pouch cell fabrication using the Phase 2 micro-production line.

Appointed a highly experienced cell test manager, Justin Holloway as Cell Test and Battery Systems Manager. Justin joins Li-S Energy from the Warwick Manufacturing Group, one of the UK's leading battery R&D institutions.

Construction of the Phase 3 facility Dry Room is nearing completion. Electrical switchboard upgrades have been completed, wall and roof panels installed and sealed, and the Italian-manufactured dehumidifier system has been delivered and installed.

Orders were placed for production equipment and robotic systems for the Phase 3, 2MWh production facility, with the final supplier selection process including an inspection of competing manufacturers' factories and an assessment of equipment designs.

Orders were placed for an extensive suite of purpose-built battery cell test equipment, including nail penetration, crush, vibration and thermal testing, plus a high altitude (low pressure) testing chamber to test cells targeted at eAviation and drone markets.

The CEO visited the Paris Air Show, a key industry event in aviation and defence industries, and established dialogue with a number of eAviation, drone and defence companies that have a keen interest in high energy density batteries for their products.

The Company had \$33,450,000 in cash at 30 June 2023.

# PHASE 3 FACILITY TAKES SHAPE

Li-S Energy's critical Phase 3 2MWh automated production facility in Geelong, Victoria, continues to progress towards full commissioning in late 2023, opening the way to produce large numbers of commercial-sized cells to allow potential customers to undertake more detailed testing and trials.

On completion, it will be one of Australia's largest and most advanced battery production and testing facilities, capable of producing more than 1,000 commercial-sized cells each week.

Assembly of the 220sqm Phase 3 Dry Room is now well advanced, with the most critical component, the dehumidifier, delivered in late June after its long journey from Europe. The dehumidifier is key to creating the ultra-dry, low-humidity conditions required for the production of cells.

Equipment selection for the Phase 3 facility has been a significant and involved process, with most orders finalised in the quarter. Site visits with competing manufacturers and extensive discussions with their design engineers assisted with the final selection.

In addition, we placed orders for an extensive battery cell test facility, including a shipping container-sized explosion-proof cell test chamber which we will use for test cycling large cells, plus a comprehensive range of test equipment for environmental and abuse testing.

This equipment will allow us to confirm our Phase 3 cells can meet the requirements for UN38.3 – (UN Manual of Tests and Criteria, Part III: subsection 38.3) required for the transport of lithium-ion batteries by land, sea or air.



# E-AVIATION TAKES CENTRE STAGE AT PARIS AIR SHOW

After more than four years on hold due to COVID, the Paris Air Show returned in June with sustainability and the emergence of electric aviation dominating conversations as more than 300,000 visitors attended the biennial event.

For more than a century, the Paris Air Show has showcased global aerospace and defence industry developments, including new orders, partnerships and technologies.

This year's show highlighted manufacturers' serious investment in developing solutions to support the goal of net zero carbon emissions before 2050.

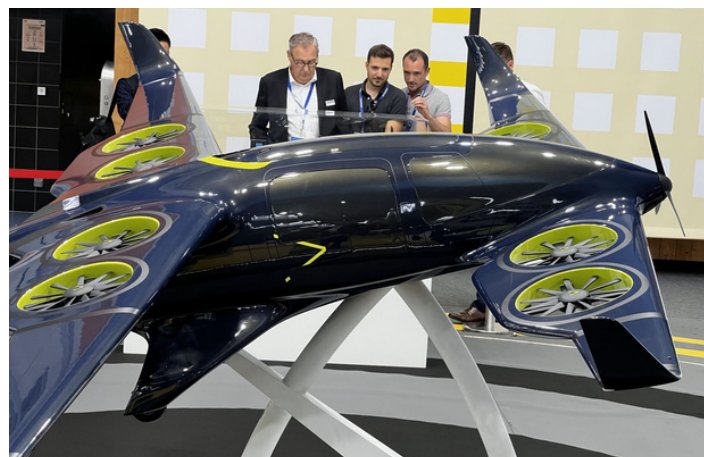
Numerous electric vertical takeoff and landing (eVTOL) aircraft makers attended the show, with German developer Lilium announcing a deal to sell 100 of its aircraft to China's HeliShenzhen and flying electric taxi maker Volocopter announcing it is on track to make services available to the general public in time for the Paris Olympics next year.

Li-S Energy CEO Dr Lee Finniear attended the show to meet key companies and executives in the electric aircraft industry as well as other in aviation and defence industry representatives.

"If anyone doubts the existence or viability of electric aviation, I recommend attending this show," he said. "I met literally dozens of electric aircraft manufacturers displaying their vehicles, including the biggest names in the aviation industry and many well-funded start-ups, some of which were performing flight demonstrations."

"Critical to all these aircraft is the battery's performance, and it places Li-S Energy in an excellent position to capitalise on the opportunities offered by this rapidly emerging industry."

Following the show, Li-S has established dialogue with a number of eAviation, drone and defence companies that have a keen interest in the company's high energy density batteries for their products.



# SUMMARY OF EXPENDITURE

Please refer to Appendix 4C below for the detailed quarterly cash flow report, including a summary of the Company's expenditure on the above activities.

Net cash outflows used in operating activities during the quarter were \$266,000. This was primarily driven by:

- total staff costs of \$305,000, of which \$180,000 were reallocated to investing activities and capitalised against intellectual property and property, plant and equipment;
- payments for administration and corporate costs of \$685,000, consisting of payments for management support services to a subsidiary of PPK Group Limited of \$180,000, and other administration and corporate costs of \$505,000; and
- partly offset by interest income of \$395,000 and a GST refund received of \$170,000.

The net cash outflows used in investing activities during the quarter were \$2,547,000, consisting primarily of:

- payments for intellectual property of \$648,000, reflecting payments to Deakin University for development activities of \$535,000, as well as the capitalisation of employee costs against the development activities undertaken of \$113,000;
- payments for property, plant and equipment of \$1,299,000, primarily related to equipment purchases and deposits for the phase 3 production facility.
- net cash outflows from loans to other entities of \$600,000, consisting of:
  - payment for a secured loan advanced to PPK Group Limited of \$2,000,000; and
  - partly offset by proceeds received from the repayment of a loan by PPK Mining Equipment Group Limited of \$1,400,000.



# USE OF FUNDS

Pursuant to Listing Rule 4.7C.2, the Company provides in Table 1 below, a comparison of its actual expenditure on the individual items in the “use of funds” statement since the date of admission to the official list against the estimated expenditure on those items in the “use of funds” statement in the IPO prospectus and an explanation of any material variances.

\$'000	Use of funds estimate (per Prospectus)	% of Funds	Cash payments to 30 June 2023	% of actual funds expended against Cash Payments to 30 June 2023
Project Expenditure	29,113	85.63%	9,518	55.62%
Costs of the Offer	3,582	10.53%	2,236	13.07%
Other Working Capital	1,305	3.84%	5,359	31.31%
<b>TOTAL</b>	<b>34,000</b>	<b>100.00%</b>	<b>17,113</b>	<b>100.00%</b>

Table1 – Comparison of “use of funds” statement per prospectus to cash payments since the date of admission to the official list of the ASX to 30 June 2023.

For the purposes of the above “use of funds” table, the Company has allocated significant administration and corporate costs to the ‘Other Working Capital’ category. Per section 5.11 of the Prospectus, the Company held additional funds from pre IPO capital raisings for the purpose of funding working capital requirements. The ‘Other Working Capital’ cash payments to 30 June 2023 includes the secured loans advanced as disclosed in the Appendix 4C. The total cash at the date of IPO was \$50,563,000. Total cash at 30 June 2023 was \$33,450,000.

The material variances above are a result of the Company listing at the end of the September quarter 2021, giving 21 months of comparative cash payments versus a 2-year use of funds period estimate. Furthermore, expenditure does not occur in a linear manner, with actual spend evolving as the Company progresses towards the completion of the construction and fitout of the phase 3 facility.

# PAYMENTS TO ASSOCIATES OR RELATED PARTIES

In accordance with Listing Rule 4.7C.3, the Company advises that it paid \$2,933,000 to related parties of the Company during the quarter, consisting of:

- payments to Deakin University of \$627,000, broken down between payments relating to project activities undertaken in relation to the Research Framework Agreement of \$535,000, and payments under the lease agreements for production bays at Deakin's ManuFutures advanced manufacturing hub in Geelong, Victoria of \$92,000.
- payments to a subsidiary of PPK Group Limited of \$180,000 for management support services provided in accordance with the relevant agreement, and as disclosed in section 12.6 of the Prospectus.
- payments to a subsidiary of PPK Group Limited of \$118,000 for purchase of two gloveboxes at cost, and a further \$8,000 for the installation of IT infrastructure in the Company's Phase 3 facility.
- payment for a secured loan advanced to PPK Group Limited of \$2,000,000, for a period of up to 2 years at an interest rate of 10.0% per annum.



Dehumidifier installed at Li-S Energy's Phase 3 facility in Geelong.



# Corporate Directory

Li-S Energy Limited ABN 12 634 839 857

A public company incorporated in Queensland and listed on the Australian Securities Exchange (ASX Code: LIS)

Chief Executive Officer	Dr Lee John Finniear
Chief Financial Officer	Ms Sarah Price
Board of Directors	Mr Benjamin Spincer Mr Robin Levison Mr Anthony McDonald Ms Hedy Cray
Company Secretaries	Mr Will Shiel Mr Liam Fairhall
Registered Office	Level 27, 10 Eagle Street Brisbane QLD 4000, Australia Telephone: + 61 7 3054 4555 Email: <a href="mailto:info@lis.energy">info@lis.energy</a> Web: <a href="http://www.lis.energy">www.lis.energy</a>
Stock Exchange Listing	Australian Securities Exchange ASX Code: LIS
Auditor	Ernst & Young
Share Registry	Automic Share Registry Level 5, 126 Phillip Street Sydney NSW 2000 <a href="http://www.automicgroup.com.au">www.automicgroup.com.au</a>
Media enquiries	Ben Ready RGC Media + Mkting <a href="mailto:ben@rgcmm.com.au">ben@rgcmm.com.au</a>



## Appendix 4C

### Quarterly cash flow report for entities subject to Listing Rule 4.7B

**Name of entity**

Li-S Energy Limited

**ABN**

12 634 839 857

**Quarter ended ("current quarter")**

30 June 2023

<b>Consolidated statement of cash flows</b>	<b>Current quarter \$A'000</b>	<b>Year to date (12 months) \$A'000</b>
<b>1. Cash flows from operating activities</b>		
1.1 Receipts from customers	-	-
1.2 Payments for		
(a) research and development	-	-
(b) product manufacturing and operating costs	-	-
(c) advertising and marketing	-	-
(d) leased assets	-	-
(e) staff costs	(125)	(527)
(f) administration and corporate costs	(685)	(3,892)
1.3 Dividends received (see note 3)	-	-
1.4 Interest received	395	1,283
1.5 Interest and other costs of finance paid	(21)	(61)
1.6 Income taxes paid	-	-
1.7 Government grants and tax incentives	-	-
1.8 Other – GST refunds	170	677
<b>1.9 Net cash from / (used in) operating activities</b>	<b>(266)</b>	<b>(2,520)</b>

Consolidated statement of cash flows	Current quarter \$A'000	Year to date (12 months) \$A'000
<b>2. Cash flows from investing activities</b>		
2.1 Payments to acquire or for:		
(a) entities	-	-
(b) businesses	-	-
(c) property, plant and equipment	(1,299)	(2,800)
(d) investments	-	-
(e) intellectual property	(648)	(2,913)
(f) other non-current assets	-	-
2.2 Proceeds from disposal of:	-	-
(a) entities	-	-
(b) businesses	-	-
(c) property, plant and equipment	-	-
(d) investments	-	-
(e) intellectual property	-	-
(f) other non-current assets	-	-
2.3 Cash flows from loans to other entities	(600)	(2,000)
2.4 Dividends received (see note 3)	-	-
2.5 Other (provide details if material)	-	-
<b>2.6 Net cash from / (used in) investing activities</b>	<b>(2,547)</b>	<b>(7,713)</b>

<b>3. Cash flows from financing activities</b>		
3.1 Proceeds from issues of equity securities (excluding convertible debt securities)	-	-
3.2 Proceeds from issue of convertible debt securities	-	-
3.3 Proceeds from exercise of options	-	-
3.4 Transaction costs related to issues of equity securities or convertible debt securities	-	-
3.5 Proceeds from borrowings	-	-
3.6 Repayment of borrowings	(58)	(170)
3.7 Transaction costs related to loans and borrowings	-	-
3.8 Dividends paid	-	-
3.9 Other (provide details if material)	-	-
<b>3.10 Net cash from / (used in) financing activities</b>	<b>(58)</b>	<b>(170)</b>

Consolidated statement of cash flows	Current quarter \$A'000	Year to date (12 months) \$A'000
--------------------------------------	----------------------------	--

<b>4.</b>	<b>Net increase / (decrease) in cash and cash equivalents for the period</b>		
4.1	Cash and cash equivalents at beginning of period	36,321	43,853
4.2	Net cash from / (used in) operating activities (item 1.9 above)	(266)	(2,520)
4.3	Net cash from / (used in) investing activities (item 2.6 above)	(2,547)	(7,713)
4.4	Net cash from / (used in) financing activities (item 3.10 above)	(58)	(170)
4.5	Effect of movement in exchange rates on cash held	-	-
<b>4.6</b>	<b>Cash and cash equivalents at end of period</b>	<b>33,450</b>	<b>33,450</b>

5.	Reconciliation of cash and cash equivalents at the end of the quarter (as shown in the consolidated statement of cash flows) to the related items in the accounts	Current quarter \$A'000	Previous quarter \$A'000
5.1	Bank balances	33,450	36,321
5.2	Call deposits	-	-
5.3	Bank overdrafts	-	-
5.4	Other (provide details)	-	-
<b>5.5</b>	<b>Cash and cash equivalents at end of quarter (should equal item 4.6 above)</b>	<b>33,450</b>	<b>36,321</b>

6.	Payments to related parties of the entity and their associates	Current quarter \$A'000
6.1	Aggregate amount of payments to related parties and their associates included in item 1	280
6.2	Aggregate amount of payments to related parties and their associates included in item 2	2,653

*Note: if any amounts are shown in items 6.1 or 6.2, your quarterly activity report must include a description of, and an explanation for, such payments.*

## Quarterly cash flow report for entities subject to Listing Rule 4.7B

<b>7. Financing facilities</b>	<b>Total facility amount at quarter end \$A'000</b>	<b>Amount drawn at quarter end \$A'000</b>
<i>Note: the term "facility" includes all forms of financing arrangements available to the entity. Add notes as necessary for an understanding of the sources of finance available to the entity.</i>		
7.1 Loan facilities	-	-
7.2 Credit standby arrangements	-	-
7.3 Other (please specify)	-	-
7.4 <b>Total financing facilities</b>	-	-
7.5 <b>Unused financing facilities available at quarter end</b>		-
7.6 Include in the box below a description of each facility above, including the lender, interest rate, maturity date and whether it is secured or unsecured. If any additional financing facilities have been entered into or are proposed to be entered into after quarter end, include a note providing details of those facilities as well.		
N/A		

<b>8. Estimated cash available for future operating activities</b>	<b>\$A'000</b>
8.1 Net cash from / (used in) operating activities (item 1.9)	(266)
8.2 Cash and cash equivalents at quarter end (item 4.6)	33,450
8.3 Unused finance facilities available at quarter end (item 7.5)	-
8.4 Total available funding (item 8.2 + item 8.3)	33,450
8.5 <b>Estimated quarters of funding available (item 8.4 divided by item 8.1)</b>	125.8
<i>Note: if the entity has reported positive net operating cash flows in item 1.9, answer item 8.5 as "N/A". Otherwise, a figure for the estimated quarters of funding available must be included in item 8.5.</i>	
8.6 If item 8.5 is less than 2 quarters, please provide answers to the following questions:	
8.6.1 Does the entity expect that it will continue to have the current level of net operating cash flows for the time being and, if not, why not?	
Answer: N/A	
8.6.2 Has the entity taken any steps, or does it propose to take any steps, to raise further cash to fund its operations and, if so, what are those steps and how likely does it believe that they will be successful?	
Answer: N/A	
8.6.3 Does the entity expect to be able to continue its operations and to meet its business objectives and, if so, on what basis?	
Answer: N/A	
<i>Note: where item 8.5 is less than 2 quarters, all of questions 8.6.1, 8.6.2 and 8.6.3 above must be answered.</i>	

**Compliance statement**

- 1 This statement has been prepared in accordance with accounting standards and policies which comply with Listing Rule 19.11A.
- 2 This statement gives a true and fair view of the matters disclosed.

Date: 31 July 2023

Authorised by: .....The Board.....  
(Name of body or officer authorising release – see note 4)

**Notes**

1. This quarterly cash flow report and the accompanying activity report provide a basis for informing the market about the entity's activities for the past quarter, how they have been financed and the effect this has had on its cash position. An entity that wishes to disclose additional information over and above the minimum required under the Listing Rules is encouraged to do so.
2. If this quarterly cash flow report has been prepared in accordance with Australian Accounting Standards, the definitions in, and provisions of, *AASB 107: Statement of Cash Flows* apply to this report. If this quarterly cash flow report has been prepared in accordance with other accounting standards agreed by ASX pursuant to Listing Rule 19.11A, the corresponding equivalent standard applies to this report.
3. Dividends received may be classified either as cash flows from operating activities or cash flows from investing activities, depending on the accounting policy of the entity.
4. If this report has been authorised for release to the market by your board of directors, you can insert here: "By the board". If it has been authorised for release to the market by a committee of your board of directors, you can insert here: "By the [name of board committee – eg Audit and Risk Committee]". If it has been authorised for release to the market by a disclosure committee, you can insert here: "By the Disclosure Committee".
5. If this report has been authorised for release to the market by your board of directors and you wish to hold yourself out as complying with recommendation 4.2 of the ASX Corporate Governance Council's *Corporate Governance Principles and Recommendations*, the board should have received a declaration from its CEO and CFO that, in their opinion, the financial records of the entity have been properly maintained, that this report complies with the appropriate accounting standards and gives a true and fair view of the cash flows of the entity, and that their opinion has been formed on the basis of a sound system of risk management and internal control which is operating effectively.