

CALIFORNIA ENERGY COMMISSION

A)New Agreement # ZVI-22-020 (to be completed by CGL office)

B) Division	Agreement Manager:	MS-	Phone
Fuels and Transportation	Taiying Zhang	27	916-903-4241

C) Recipient's Legal Name	Federal ID #

American Lithium Energy Corp

94-3039474

#### D) Title of Project

Scaling Manufacturing of High-Performance Battery Cells to Accelerate ZEV Transportation

#### E) Term and Amount

Start Date	End Date	Amount
1/25/2023	5 / 31 / 2025	\$ 10,220,285

#### F) Business Meeting Information

ARFVTP agreements \$75K and under delegated to Executive Director

Proposed Business Meeting Date 1 /25 / 2023 🗌 Consent 🖂 Discussion

Business Meeting Presenter Taiying Zhang Time Needed: 5 minutes

### Please select one list serve. Clean Transportation Program.

## Agenda Item Subject and Description:

American Lithium Energy Corp. Proposed resolution approving Agreement ZVI-22-020 with American Lithium Energy Corp(ALE) for a \$10,220,285 grant, and adopting staff's determination that this action is exempt from CEQA. This project will expand battery manufacturing capacity at ALE's existing facility by setting up a fully-automated battery cell assembly line capable of producing 1,500,000 high performance electric vehicle battery cells per year. (General Fund Funding) Contact: Taiying Zhang (Staff Presentation: 5 minutes)

## G) California Environmental Quality Act (CEQA) Compliance

1. Is Agreement considered a "Project" under CEQA?

Yes (skip to question 2) No (complete the following (PRC 21065 and 14 CCR 15378)):

Explain why Agreement is not considered a "Project":

Agreement will not cause direct physical change in the environment or a reasonably foreseeable indirect physical change in the environment because

- 2. If Agreement is considered a "Project" under CEQA:
  - a) 🛛 Agreement **IS** exempt.
    - Statutory Exemption. List PRC and/or CCR section number:
    - Categorical Exemption. List CCR section number: 15301 and 15303
- Common Sense Exemption. 14 CCR 15061 (b)
- (3) Explain reason why Agreement is exempt under the above section:

Work under this project consists of installation of small production and quality control equipment at an existing plant for prototyping and production and falls under both Class 1 and Class 3 CEQA exemptions.



#### CALIFORNIA ENERGY COMMISSION

Class 1 consists of the operation, repair, maintenance, permitting, leasing, licensing, or minor alteration of existing public or private structures, facilities, or mechanical equipment, , involving negligible or no expansion of existing or former use. Although battery output will increase, the land use will not change and the square footage of the existing building will not increase. All new equipment will be installed at an existing plant and placed on existing concrete. For these reasons, work under this project will have no significant impact on the environment and falls within 15301.

Class 3 consists of construction and location of limited numbers of new, small facilities or structures; installation of small new equipment and facilities in small structures; and the conversion of existing small structures from one use to another where only minor modifications are made in the exterior of the structure. The project pertains to two production lines and one dry room. First, a new electrode manufacturing line will be installed. The new electrode manufacturing line includes mixing, coating, and calendaring machines. The new unit will be placed on existing concrete and will be approximately 500 square feet. Second, a new 18,650 cell assembly production line will be installed next to an existing cell assembly room. The new 18,650 cell assembly line will include jellyroll winding, cell beading and crimping, and electrolyte filling, which will occupy approximately 300 square feet. Third, the drying room will be installed to protect the electrolyte filling station from the water in the air. The result of these upgrades and additions of small, new equipment will be to increase throughput without changing use, while simultaneously enhancing the output and quality of the products. For these reasons, work under this project will have no significant impact on the environment and falls within 15303.

The project will not impact an environmental resource of hazardous or critical concern where designated, precisely mapped, and officially adopted pursuant to law by federal, state, or local agencies; does not involve any cumulative impacts of successive projects of the same type in the same place that might be considered significant; does not involve unusual circumstances that might have a significant effect on the environment; will not result in damage to scenic resources within a highway officially designated as a state scenic highway; the project site is not included on any list compiled pursuant to Government Code section 65962.5; and the project will not cause a substantial adverse change in the significance of a historical resource. Therefore, none of the exceptions to categorical exemptions listed in CEQA Guidelines section 15300.2 apply to this project, and this project will not have a significant effect on the environment.

b) Agreement **IS NOT** exempt. (consult with the legal office to determine next steps)

Check all that apply

- Initial Study
- Negative Declaration
- Mitigated Negative Declaration
- Environmental Impact Report
- Statement of Overriding Considerations

H) List all subcontractors (major and minor) and equipment vendors: (attach additional sheets as necessary)



CEC-270 (Revised 12/2019)	CALIFORNIA ENERGY COMMISSION
Legal Company Name:	Budget
See attachment.	

I) List all key partners: (attach additional sheets as necessary)

Legal Company Name:		

## J) Budget Information

Funding Source	Funding Year of Appropriation	Budget List Number	Amount
General Funds	FY 2021-2022	601.129 MGA	\$10,220,285
Funding Source			\$

R&D Program Area: Select Program Area TOTAL: \$10,220,285

Explanation for "Other" selection

Reimbursement Contract #: Federal Agreement #:

#### K) Recipient's Contact Information 1. Recipient's Administrator/Officer

Name: Jiang Fan

Address: 2261 Rutherford Road

City, State, Zip: Carlsbad, CA

92008

Phone: 760-559-7388

E-Mail: jfan@americanlithiumenergy.com

# L) Selection Process Used

- Competitive Solicitation Solicitation #: GFO-21-605
- First Come First Served Solicitation Solicitation #:

## M) The following items should be attached to this GRF

- 1. Exhibit A, Scope of Work
- 2. Exhibit B, Budget Detail
- 3. CEC 105, Questionnaire for Identifying Conflicts
- 4. Recipient Resolution

- Attached
  Attached
  Attached
  Attached
  Attached
- N/A

2. Recipient's Project Manager

Name: Jiang Fan Address: 2261 Rutherford Road City, State, Zip: Carlsbad, CA 92008

Phone: 760-559-7388

E-Mail:

jfan@americanlithiumenergy.com





Agreement Manager

Date

**Office Manager** 

Date

**Deputy Director** 

Date

#### **CEC-270** Attachment

## List of Subrecipients (subrecipients, equipment vendors, and materials and miscellaneous vendors) ZVI-22-020 (American Lithium Energy Corp.)

Legal Company Name:	Budget	
Creative Electron Inc.	\$ 99,300	
CASCADE THERMAL SOLUTIONS, LLC	\$ 237,864	
Agilent Technologies, Inc.	\$ 30,862	
CIS Co., Ltd. (or TBD)	\$ 1,540,800	
Shenzhen Zhongji Automation Co., Ltd. (or TBD)	\$ 1,250,000	
AIR-VAC SYSTEMS, INC.	(\$5,000 match only)	
OKAYA (U.S.A.), INC.	(\$619,000 match only)	
Umicore Sustainable Materials USA, LLC	(\$220,000 match only)	
Jiujiang Defu Technology Co., Ltd. (or TBD)	(\$8,170 match only)	
Blueglow Nano Technology Limited (or TBD)	(\$4,820 match only)	
FUJIFILM Ultra Pure Solutions, Inc. (or TBD)	(\$32,947 match only)	
Capchem Technology USA Inc. (or TBD)	(\$32,000 match only)	

## Exhibit A SCOPE OF WORK

## **TECHNICAL TASK LIST**

Task #	CPR	Task Name
1		Administration
2	Х	Expand Production Facility
3		Conduct Production Trials and Set Up Quality System
4		Expand Existing Workforce
5		Data Collection and Analysis
6		Project Fact Sheet

#### KEY NAME LIST

Task #	Key Personnel	Key Subcontractor(s)	Key Partner(s)
1	Jiang Fan (ALE)		
2	Jiang Fan (ALE)		
3	Jiang Fan (ALE)		
4	Jiang Fan (ALE)		
5	Jiang Fan (ALE)		
6	Jiang Fan (ALE)		

## GLOSSARY

Specific terms and acronyms used throughout this scope of work are defined as follows:

Term/ Acronym	Definition
CAM	Commission Agreement Manager
CAO	Commission Agreement Officer
CEC	California Energy Commission
СТР	Clean Transportation Program
CPR	Critical Project Review
FTD	Fuels and Transportation Division
Recipient	An applicant awarded a grant under a CEC solicitation
ALE	American Lithium Energy Corp.

#### Background

The Budget Act of 2021 (AB 128, Ting, Chapter 21, Statutes of 2021, as amended by Senate Bill (SB) 129, Skinner, Chapter 69, Statutes of 2021 and SB 170, Skinner, Chapter 240, Statutes of 2021) appropriated \$785,000,000 from the General Fund to support infrastructure deployments and manufacturing projects for zero-emission light-duty and medium- and heavyduty vehicles. The Budget Act of 2022 (SB 154, Skinner, Chapter 43, Statutes of 2022, as amended by AB 178, Ting, Chapter 45, Statutes of 2022) appropriated an additional \$255,000,000 from the General Fund to support infrastructure deployments and manufacturing projects for zero-emission light-duty and medium- and heavy-duty vehicles.

On March 30, 2022, the California Energy Commission (CEC) released a Grant Funding Opportunity (GFO) entitled "Zero-Emission Transportation Manufacturing." This competitive grant solicitation was to fund in-state manufacturing of zero-emission vehicles (ZEV), ZEV components and batteries, and ZEV charging or refueling equipment. In response to GFO-21-605, the Recipient submitted application #1 which was proposed for funding in the CEC's Notice of Proposed Awards on August 24, 2022. GFO-21-605 and Recipient's application are hereby incorporated by reference into this Agreement in their entirety.

In the event of any conflict or inconsistency between the terms of the Solicitation and the terms of the Recipient's Application, the Solicitation shall control. In the event of any conflict or inconsistency between the Recipient's Application and the terms of CEC's Award, CEC's Award shall control. Similarly, in the event of any conflict or inconsistency between the terms of this Agreement and the Recipient's Application, the terms of this Agreement shall control.

#### **Problem Statement:**

California's zero-emission transportation goals require substantial scaling of manufacturing to support existing and new technologies that advance electric and alternative fuel mobility. This includes electric vehicle (EV) batteries capable of improving EV performance, safety, and affordability. Currently, the majority of Li-ion EV batteries are manufactured in China, in part because it has access to key raw materials (lithium and graphite) and substantially more manufacturing capacity. To increase economic competitiveness in the U.S. and achieve ambitious electrification goals, state and Federal agencies must support innovative EV battery companies with the potential to rapidly scale manufacturing.

California continues to lead the country in both technology innovation and manufacturing; however, many companies are finding other states less costly in which to operate a business. This threatens the potential to achieve statewide electric transportation goals, reducing overall economic competitiveness through loss of intellectual capital and well-paying jobs. Thus, it is critical for California to invest in key innovators who produce EV batteries to achieve its statewide electrification goals and compete in the global market.

#### Goals of the Agreement:

The goals of this Agreement are to scale manufacturing of high-performance EV battery cells, create well-paying jobs, and advance statewide zero emission transportation goals.

### **Objectives of the Agreement:**

The objectives of this Agreement are to 1) expand manufacturing capacity at the Recipient's existing facility to produce 1,500,000 units of high performance battery cells per year; 2) hire a workforce to support production; and 3) increase use of U.S. and California-based raw materials and equipment suppliers.

January 2023

## TASK 1 ADMINISTRATION

#### Task 1.1 Attend Kick-off Meeting

The goal of this task is to establish the lines of communication and procedures for implementing this Agreement. The Commission Agreement Manager (CAM) shall designate the date and location of this meeting and provide an agenda to the Recipient prior to the meeting.

### The Recipient shall:

- Attend a "Kick-Off" meeting with the CAM, the Commission Agreement Officer (CAO), and a representative of the CEC Accounting Office. The Recipient shall bring their Project Manager, Agreement Administrator, Accounting Officer, and any others determined necessary by the Recipient or specifically requested by the CAM to this meeting.
- Provide a written statement of project activities that have occurred after the notice of proposed awards but prior to the execution of the agreement using match funds. If none, provide a statement that no work has been completed using match funds prior to the execution of the agreement. All pre-execution match expenditures must conform to the requirements in the Terms and Conditions of this Agreement.
- Discuss the following administrative and technical aspects of this Agreement:
  - Agreement Terms and Conditions
  - Critical Project Review (Task 1.2)
  - Match fund documentation (Task 1.7) No reimbursable work may be done until this documentation is in place.
  - Permit documentation (Task 1.8)
  - Subawards needed to carry out project (Task 1.9)
  - The CAM's expectations for accomplishing tasks described in the Scope of Work
  - An updated Schedule of Products and Due Dates
  - Monthly Calls (Task 1.4)
  - Quarterly Progress Reports (Task 1.5)
  - Technical Products (Product Guidelines located in Section 5 of the Terms and Conditions)
  - Final Report (Task 1.6)

### **Recipient Products:**

- Updated Schedule of Products
- Updated List of Match Funds
- Updated List of Permits
- Written Statement of Match Share Activities

## **Commission Agreement Manager Product:**

• Kick-Off Meeting Agenda

## Task 1.2 Critical Project Review (CPR) Meetings

CPRs provide the opportunity for frank discussions between the CEC and the Recipient. The goal of this task is to determine if the project should continue to receive CEC funding to complete this Agreement and to identify any needed modifications to the tasks, products, schedule or budget.

The CAM may schedule CPR meetings as necessary, and meeting costs will be borne by the Recipient.

Meeting participants include the CAM and the Recipient and may include the CAO, the Fuels and Transportation Division (FTD) program lead, other CEC staff and Management as well as other individuals selected by the CAM to provide support to the CEC.

### The CAM shall:

- Determine the location, date, and time of each CPR meeting with the Recipient. These meetings generally take place at the CEC, but they may take place at another location or remotely.
- Send the Recipient the agenda and a list of expected participants in advance of each CPR. If applicable, the agenda shall include a discussion on both match funding and permits.
- Conduct and make a record of each CPR meeting. Prepare a schedule for providing the written determination described below.
- Determine whether to continue the project, and if continuing, whether or not modifications are needed to the tasks, schedule, products, and/or budget for the remainder of the Agreement. Modifications to the Agreement may require a formal amendment (please see section 8 of the Terms and Conditions). If the CAM concludes that satisfactory progress is not being made, this conclusion will be referred to the Lead Commissioner for Transportation for his or her concurrence.
- Provide the Recipient with a written determination in accordance with the schedule. The written response may include a requirement for the Recipient to revise one or more product(s) that were included in the CPR.

### The Recipient shall:

- Prepare a CPR Report for each CPR that discusses the progress of the Agreement toward achieving its goals and objectives. This report shall include recommendations and conclusions regarding continued work of the projects. This report shall be submitted along with any other products identified in this scope of work. The Recipient shall submit these documents to the CAM and any other designated reviewers at least 15 working days in advance of each CPR meeting.
- Present the required information at each CPR meeting and participate in a discussion about the Agreement.

#### **CAM Products:**

- Agenda and a list of expected participants
- Schedule for written determination
- Written determination

#### **Recipient Product:**

• CPR Report(s)

#### Task 1.3 Final Meeting

The goal of this task is to closeout this Agreement.

#### The Recipient shall:

• Meet with CEC staff to present the findings, conclusions, and recommendations. The final meeting must be completed during the closeout of this Agreement.

This meeting will be attended by, at a minimum, the Recipient and the CAM. The technical and administrative aspects of Agreement closeout will be discussed at the meeting, which may be two separate meetings at the discretion of the CAM.

The technical portion of the meeting shall present an assessment of the degree to which project and task goals and objectives were achieved, findings, conclusions, recommended next steps (if any) for the Agreement, and recommendations for improvements. The CAM will determine the appropriate meeting participants.

The administrative portion of the meeting shall be a discussion with the CAM about the following Agreement closeout items:

- What to do with any equipment purchased with CEC funds (Options)
- CEC request for specific "generated" data (not already provided in Agreement products)
- Need to document Recipient's disclosure of "subject inventions" developed under the Agreement
- "Surviving" Agreement provisions
- Final invoicing and release of retention
- Prepare a schedule for completing the closeout activities for this Agreement.

### Products:

- Written documentation of meeting agreements
- Schedule for completing closeout activities

#### Task 1.4 Monthly Calls

The goal of this task is to have calls at least monthly between CAM and Recipient to verify that satisfactory and continued progress is made towards achieving the objectives of this Agreement on time and within budget.

The objectives of this task are to verbally summarize activities performed during the reporting period, to identify activities planned for the next reporting period, to identify issues that may affect performance and expenditures, to verify match funds are being proportionally spent concurrently or in advance of CEC funds or are being spent in accordance with an approved Match Funding Spending Plan, to form the basis for determining whether invoices are consistent with work performed, and to answer any other questions from the CAM. Monthly calls might not be held on those months when a quarterly progress report is submitted, or the CAM determines that a monthly call is unnecessary.

## The CAM shall:

- Schedule monthly calls.
- Provide questions to the Recipient prior to the monthly call.
- Provide call summary notes to Recipient of items discussed during call.

### The Recipient shall:

- Review the questions provided by CAM prior to the monthly call
- Provide verbal answers to the CAM during the call.

## Product:

• Email to CAM concurring with call summary notes.

## Task 1.5 Quarterly Progress Reports

The goal of this task is to periodically verify that satisfactory and continued progress is made towards achieving the objectives of this Agreement on time and within budget.

The objectives of this task are to summarize activities performed during the reporting period, to identify activities planned for the next reporting period, to identify issues that may affect performance and expenditures, and to form the basis for determining whether invoices are consistent with work performed.

### The Recipient shall:

• Prepare a Quarterly Progress Report which summarizes all Agreement activities conducted by the Recipient for the reporting period, including an assessment of the ability to complete the Agreement within the current budget and any anticipated cost overruns. Progress reports are due to the CAM the 10<sup>th</sup> day of each January, April, July, and October. The Quarterly Progress Report template can be found on the ECAMS Resources webpage available at <a href="https://www.energy.ca.gov/media/4691">https://www.energy.ca.gov/media/4691</a>.

### Product:

Quarterly Progress Reports

### Task 1.6 Final Report

The goal of the Final Report is to assess the project's success in achieving the Agreement's goals and objectives, advancing science and technology, and providing energy-related and other benefits to California.

The objectives of the Final Report are to clearly and completely describe the project's purpose, approach, activities performed, results, and advancements in science and technology; to present a public assessment of the success of the project as measured by the degree to which goals and objectives were achieved; to make insightful observations based on results obtained; to draw conclusions; and to make recommendations for further projects and improvements to the FTD project management processes.

The Final Report shall be a public document and limited to 25-pages. If the Recipient has obtained confidential status from the CEC and will be preparing a confidential version of the Final Report as well, the Recipient shall perform the following activities for both the public and confidential versions of the Final Report.

In addition to any other applicable requirements, the Final Report must comply with the Americans with Disabilities Act (ADA) of 1990 (42 U.S.C. 12101 et seq.), which prohibits discrimination on the basis of disability; all applicable regulations and guidelines issued pursuant to the ADA; Cal. Gov. Code sects. 7405 and 11135; and Web Content Accessibility Guidelines 2.0, or a subsequent version, as published by the Web Accessibility Initiative of the World Wide Web Consortium at a minimum Level AA success criteria.

### The Recipient shall:

- Prepare an Outline of the Final Report, if requested by the CAM.
- Prepare a Final Report complying with ADA requirements and following the latest version of the Final Report guidelines which will be provided by the CAM. The CAM shall provide written comments on the Draft Final Report within fifteen (15) working days of receipt. The Final Report must be completed at least 60 days before the end of the Agreement Term.
- Submit Final Report in Microsoft Word format or similar electronic format as approved by the CAM.

### Products:

- Outline of the Final Report, if requested
- Draft Final Report
- Final Report

### Task 1.7 Identify and Obtain Matching Funds

The goal of this task is to ensure that the match funds planned for this Agreement are obtained for and applied to this Agreement during the term of this Agreement.

The costs to obtain and document match fund commitments are not reimbursable through this Agreement. Although the CEC budget for this task will be zero dollars, the Recipient may utilize match funds for this task. Match funds must be identified in writing and the associated commitments obtained before the Recipient can incur any costs for which the Recipient will request reimbursement.

## The Recipient shall:

- Prepare a letter documenting the match funding committed to this Agreement and submit it to the CAM at least 2 working days prior to the kick-off meeting. If no match funds were part of the proposal that led to the CEC awarding this Agreement and none have been identified at the time this Agreement starts, then state such in the letter. If match funds were a part of the proposal that led to the CEC awarding this Agreement, then provide in the letter a list of the match funds that identifies the:
  - Amount of each cash match fund, its source, including a contact name, address and telephone number and the task(s) to which the match funds will be applied.
  - Amount of each in-kind contribution, a description, documented market or book value, and its source, including a contact name, address and telephone number and the task(s) to which the match funds will be applied. If the in-kind contribution is equipment or other tangible or real property, the Recipient shall identify its owner and provide a contact name, address and telephone number, and the address where the property is located.
- Provide a copy of the letter of commitment from an authorized representative of each source of cash match funding or in-kind contributions that these funds or contributions have been secured. For match funds provided by a grant a copy of the executed grant shall be submitted in place of a letter of commitment.
- Discuss match funds and the implications to the Agreement if they are reduced or not obtained as committed, at the kick-off meeting. If applicable, match funds will be included as a line item in the progress reports and will be a topic at CPR meetings.
- Provide the appropriate information to the CAM if during the course of the Agreement additional match funds are received.
- Notify the CAM within 10 days if during the course of the Agreement existing match funds are reduced. Reduction in match funds must be approved through a formal amendment to the Agreement and may trigger an additional CPR meeting.

## Products:

- A letter regarding match funds or stating that no match funds are provided
- Copy(ies) of each match fund commitment letter(s) (if applicable)
- Letter(s) for new match funds (if applicable)
- Letter that match funds were reduced (if applicable)

### Task 1.8 Identify and Obtain Required Permits

The goal of this task is to obtain all permits required for work completed under this Agreement in advance of the date they are needed to keep the Agreement schedule on track.

Permit costs and the expenses associated with obtaining permits are not reimbursable under this Agreement. Although the CEC budget for this task will be zero dollars, the Recipient may budget match funds for any expected expenditures associated with obtaining permits. Permits must be identified in writing and obtained before the Recipient can make any expenditure for which a permit is required.

## The Recipient shall:

- Prepare a letter documenting the permits required to conduct this Agreement and submit it to the CAM at least 2 working days prior to the kick-off meeting. If there are no permits required at the start of this Agreement, then state such in the letter. If it is known at the beginning of the Agreement that permits will be required during the course of the Agreement, provide in the letter:
  - A list of the permits that identifies the:
    - Type of permit
    - Name, address and telephone number of the permitting jurisdictions or lead agencies
  - The schedule the Recipient will follow in applying for and obtaining these permits.
- Discuss the list of permits and the schedule for obtaining them at the kick-off meeting and develop a timetable for submitting the updated list, schedule and the copies of the permits. The implications to the Agreement if the permits are not obtained in a timely fashion or are denied will also be discussed. If applicable, permits will be included as a line item in the Progress Reports and will be a topic at CPR meetings.
- If during the course of the Agreement additional permits become necessary, provide the appropriate information on each permit and an updated schedule to the CAM.
- As permits are obtained, send a copy of each approved permit to the CAM.
- If during the course of the Agreement permits are not obtained on time or are denied, notify the CAM within 5 working days. Either of these events may trigger an additional CPR.

### Products:

- Letter documenting the permits or stating that no permits are required
- A copy of each approved permit (if applicable)
- Updated list of permits as they change during the term of the Agreement (if applicable)
- Updated schedule for acquiring permits as changes occur during the term of the Agreement (if applicable)
- A copy of each final approved permit (if applicable)

#### Task 1.9 Obtain and Execute Subawards

The goal of this task is to ensure quality products and to procure subrecipients required to carry out the tasks under this Agreement consistent with the Agreement Terms and Conditions and the Recipient's own procurement policies and procedures.

#### The Recipient shall:

- Manage and coordinate subrecipient activities.
- If requested by the CAM, submit a draft of each subaward required to conduct the work under this Agreement to the CAM for review.
- If requested by the CAM, submit a final copy of the executed subaward.
- If Recipient intends to add new subrecipients or change subrecipients, then the Recipient shall notify the CAM.

#### Products:

- Letter describing the subawards needed, or stating that no subawards are required
- Draft subcontracts (if requested)
- Final subcontracts (if requested)

### **TECHNICAL TASKS**

#### TASK 2 EXPAND PRODUCTION FACILITY

The goal of this task is to set up a fully-automated battery cell assembly line capable of producing 1,500,000 high performance EV battery cells per year.

#### The Recipient shall:

- Purchase required production equipment including:
  - Electrode production line consisting of mixers, coater, calendar machine, and slitters;
  - Cell assembly line consisting of automatic winder with electrode tabbing capability; electrolyte filler; cell beading and crimping machines; and the cell formation and grading machines;
  - Quality control equipment including x-ray machine and leakage detector;
  - Production supporting equipment including electrical breakers and switches, and air compressors; and
  - Production supporting facility including dry room machine.
- Complete inspection (on-site or virtually) of new equipment prior to delivery
- Install new equipment, including electric and compressed air systems
- Document installation of new equipment and manufacturing workflow (e.g., photos, diagrams, etc.) and provide a copy to the CAM
- Produce training materials for equipment operation and provide a copy to the CAM

January 2023

• Train engineers and technicians on machine operation and repair

## Products:

- Documentation of new equipment installed and manufacturing workflow
- Training materials

## [CPR WILL OCCUR DURING THIS TASK. See Task 1.2 for details.]

## TASK 3 CONDUCT PRODUCTION TRIALS AND SET UP QUALITY SYSTEM

The goal of this task is to: 1) optimize and freeze the cell production and processing conditions for cylindrical, pouch and prismatic batteries and 2) establish an effective quality management system in line with AS9100D, the international standard for the aerospace industry.

### The Recipient shall:

- Complete trials for the following systems:
  - Electrode coating system
  - Electrode calendaring system
  - Jellyroll winding
  - Cell beading and crimping
  - Electrolyte filling
  - Cell formation and grading
- Produce test reports for the above systems and provide copies to the CAM
- Establish AS 9100 quality system for the electrode coating and cell assembly
- Produce quality system documentation and provide a copy to the CAM

### Products:

- Test Reports
- Quality System Documentation

## TASK 4 EXPAND EXISTING WORKFORCE

The goal of this task is to hire new staff to support the expanded production volume.

### The Recipient shall:

- Advertise job openings through workforce partners and online channels
- Interview, hire, and onboard new staff
- Track and report new hiring (e.g., number, job titles, starting salary, benefits)
- Prepare a Hiring Report
- Provide training on Standard Operating Procedures (SOP) and equipment

#### Products

• Hiring Report (in Final Report)

## Task 5 DATA COLLECTION AND ANALYSIS

The goal of this task is to collect operational data from the project, to analyze that data for economic and environmental impacts. **The Recipient shall:** 

- Develop a data collection outline and plan.
- Identify key project issues encountered and resolution of the issues.
- Collect a minimum of 6 months of project and operations data.
- Identify the number and description of units produced from product beta testing and validation through commercial production. The Recipient shall also characterize the use of these products after the project.
- Describe the market(s) for the manufactured products and compare the market status from the time of the original project proposal to the time of the project's completion.
- Provide a projection of the number of units to be manufactured per year, for the products identified in the original application, 3 years after the completion of the project. The Recipient shall also provide assumptions for projected growth.
- Compare project performance and expectations provided in the original project proposal with actual project performance, results, and accomplishments.
- Provide data on specific jobs and economic impact as a direct result of the project, including:
  - Number and type of short-term jobs created or retained by the project
  - Number and type of sustained, long-term jobs created or retained by the project
  - Estimates and descriptions of future jobs resulting from the project
  - Estimates of local economic impacts and revenues to state and local governments
  - Number of employees participating in training programs, and types of training programs
  - Number of indirect jobs resulting from the project

#### Products:

• Data collection information and analysis

## TASK 6 PROJECT FACT SHEET

The goal of this task is to develop an initial and final project fact sheet that describes the CECfunded project and the benefits resulting from the project for the public and key decision makers.

#### The Recipient shall:

- Prepare an Initial Project Fact Sheet at start of the project that describes the project and the expected benefits. Use the format provided by the CAM.
- Prepare a Final Project Fact Sheet at the project's conclusion that describes the project, the actual benefits resulting from the project, and lessons learned from implementing the project. Use the format provided by the CAM.
- Provide at least (6) six High Quality Digital Photographs (minimum resolution of 1300x500 pixels in landscape ratio) of pre and post technology installation at the project sites or related project photographs.

#### Products:

- Initial Project Fact Sheet
- Final Project Fact Sheet
- High Quality Digital Photographs

## STATE OF CALIFORNIA

### STATE ENERGY RESOURCES CONSERVATION AND DEVELOPMENT COMMISSION

#### **RESOLUTION:** American Lithium Energy Corp. (ALE)

**RESOLVED**, that the State Energy Resources Conservation and Development Commission (CEC) adopts the staff CEQA findings contained in the Agreement or Amendment Request Form (as applicable); and

**RESOLVED**, that the CEC approves Agreement ZVI-22-020 with ALE for a \$10,220,285 grant. This project will expand battery manufacturing capacity at ALE's facility by setting up a fully automated battery cell assembly line capable of producing 1,500,000 high-performance EV battery cells per year; and

**FURTHER BE IT RESOLVED**, that the Executive Director or their designee shall execute the same on behalf of the CEC.

### **CERTIFICATION**

The undersigned Secretariat to the CEC does hereby certify that the foregoing is a full, true, and correct copy of a resolution duly and regularly adopted at a meeting of the CEC held on January 25, 2023.

AYE: NAY: ABSENT: ABSTAIN:

Dated:

Liza Lopez Secretariat