

**CONTRACT REQUEST FORM (CRF)**

CEC-94 (Revised 5/11)

CALIFORNIA ENERGY COMMISSION


 New Contract 600-12-002     Amendment to Existing Contract:     -    -        Amendment Number:     

Division	Contract Manager:	MS-	Phone	CM Training Date
600 Fuels and Transportation Division	Sarah Williams	27	916-651-9866	

Contractor's Legal Name	Federal ID Number
Bay Area Air Quality Management District	-

Title of Project
The Bay Area eTaxi Program

Term	Start Date	End Date	Amount
New/Original Contract	2012 / 11 / 16	2015 / 12 / 31	\$ 3,000,000

Line up the Amendment information as best as possible in the following boxes

Amendment #	End Date (mm/dd/yy)	Amount

Business Meeting Information			
Proposed Business Meeting Date	10/10/12	<input type="checkbox"/> Consent	<input checked="" type="checkbox"/> Discussion
Business Meeting Presenter	Sarah Williams	Time Needed:	5 minutes

**Agenda Item Subject and Description**  
Possible approval of a contract with the Bay Area Air Quality Management District (BAAQMD) for \$3 million for the Bay Area eTaxi Program. BAAQMD will demonstrate zero-emission battery electric taxis with switchable batteries that give the vehicles essentially unlimited range within the area covered by the taxi company. This project will deploy two battery switch stations and 6 battery-switchable electric taxis.

**Business Meeting approval is not required for the following types of contracts:** *Executive Director's signature is required in all cases.*

- Contracts less than \$10k (*Policy Committee's signature is also required*)
- Amendment for a no-cost time extension. Must be first extension, less than one year and original contract less than \$100k.
- Contracts less than \$25k for Expert Witness in Energy Facility licensing cases and amendments.

**Purpose of Contract or Purpose of Amendment, if applicable**  
Deploy 2 battery switch stations and 6 battery-switchable electric taxis, and collect data about operation of the eTaxis and switch stations.

California Environmental Quality Act (CEQA) Compliance
<p>1. Is Contract considered a "Project" under CEQA?  <input checked="" type="checkbox"/> Yes: skip to question 2    <input type="checkbox"/> No: complete the following (PRC 21065 and 14 CCR 15378):            Explain why contract is not considered a "Project":            Contract will not cause direct physical change in the environment or a reasonably foreseeable indirect physical change in the environment because _____.</p>
<p>2. If contract is considered a "Project" under CEQA:  <input checked="" type="checkbox"/> a) Contract <b>IS</b> exempt. (Draft NOE required)  <input type="checkbox"/> Statutory Exemption. List PRC and/or CCR section number: _____  <input checked="" type="checkbox"/> Categorical Exemption. List CCR section number: <u>New Small Structure 15303</u>  <input type="checkbox"/> Common Sense Exemption. 14 CCR 15061 (b) (3)            Explain reason why contract is exempt under the above section:            The proposed project would be co-located within established fueling stations and would not affect circulation</p>
<p><input type="checkbox"/> b) Contract <b>IS NOT</b> exempt. The Contract Manager needs to consult with the Energy Commission attorney assigned to their division and the Siting Office regarding a possible Initial Study.</p>

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Budgets Information								
Contract Amount Funded		Breakdown by FY			Funding Sources			
Funding Source	Amount	FY	Amount	Approved ?	Funding Source	FY	Budget List No.	Amount
ARFVTF	\$3,000,000	11/12	\$2,840,000	No	Funding Source	11/12	601.118 D	\$2,840,000
ECAA	\$		\$	No	ARFVTF	12/13	601.118 E	\$160,000
State- ERPA	\$		\$	No	Funding Source			\$
Federal	\$		\$	No	Funding Source			\$
PIER - E	\$		\$	No	Funding Source			\$
PIER - NG	\$		\$	No	Funding Source			\$
Reimbursement	\$		\$	No	Funding Source			\$
RRTF	\$		\$	No	Funding Source			\$
Other:	\$		\$	No	Other:			\$
TOTAL: \$3,000,000		TOTAL: \$3,000,000			TOTAL:			\$2,840,000
Reimbursement					Federal Agreement #:			

Contractor's Administrator/ Officer		Contractor's Project Manager	
Name:	Damian Breen	Name:	Damian Breen
Address:	939 Ellis St.,	Address:	939 Ellis St.,
City, State, Zip:	San Francisco, CA 94109	City, State, Zip:	San Francisco, CA 94109
Phone/ Fax:	(415) 749-5041	Phone/ Fax:	(415) 749-5041
E-Mail:	dbreen@baaqmd.gov	E-Mail:	dbreen@baaqmd.gov

Contractor Is
<input type="checkbox"/> Private Company (including non-profits)
<input type="checkbox"/> CA State Agency (including UC and CSU)
<input checked="" type="checkbox"/> Government Entity (i.e. city, county, federal government, air/water/school district, joint power authorities, university from another state)

Selection Process Used
<input type="checkbox"/> Solicitation Select Type Solicitation #: _____ - _____ # of Bids: _____ Low Bid? <input type="checkbox"/> No <input type="checkbox"/> Yes
<input type="checkbox"/> Non Competitive Bid (Attach CEC 96)
<input checked="" type="checkbox"/> Exempt Interagency

Civil Service Considerations
<input checked="" type="checkbox"/> Not Applicable (Contract is with a CA State Entity or a membership/co-sponsorship)
<input type="checkbox"/> Public Resources Code 25620, et seq., authorizes the Commission to contract for the subject work. (PIER)
<input type="checkbox"/> The Services Contracted:
<input type="checkbox"/> are not available within civil service
<input type="checkbox"/> cannot be performed satisfactorily by civil service employees
<input type="checkbox"/> are of such a highly specialized or technical nature that the expert knowledge, expertise, and ability are not available through the civil service system.
<input type="checkbox"/> The Services are of such an:
<input type="checkbox"/> urgent
<input type="checkbox"/> temporary, or
<input type="checkbox"/> occasional nature
that the delay to implement under civil service would frustrate their very purpose.
<b>Justification:</b>

Payment Method
<input checked="" type="checkbox"/> A. Reimbursement in arrears based on:
<input checked="" type="checkbox"/> Itemized Monthly <input type="checkbox"/> Itemized Quarterly <input type="checkbox"/> Flat Rate <input type="checkbox"/> One-time
<input type="checkbox"/> B. Advanced Payment
<input type="checkbox"/> C. Other, explain:



<b>Retention</b>			
1. Is contract subject to retention?	<input type="checkbox"/> No	<input checked="" type="checkbox"/> Yes	
If Yes, Do you plan to release retention prior to contract termination?	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes	

<b>Justification of Rates</b>	
The rates in this contract are from BAAQMD, an public agency, and their subcontractors who went through BAAQMD's contracting process.	

<b>Disabled Veteran Business Enterprise Program (DVBE)</b>	
1. <input checked="" type="checkbox"/> Not Applicable	
2. <input type="checkbox"/> Meets DVBE Requirements	DVBE Amount:\$ _____ DVBE %: _____
<input type="checkbox"/> Contractor is Certified DVBE	
<input type="checkbox"/> Contractor is Subcontracting with a DVBE:	_____
3. <input type="checkbox"/> Contractor selected through CMAS or MSA with no DVBE participation.	
4. <input type="checkbox"/> Requesting DVBE Exemption (attach CEC 95)	

<b>Is Contractor a certified Small Business (SB), Micro Business (MB) or DVBE?</b>	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes
If yes, check appropriate box:	<input type="checkbox"/> SB	<input type="checkbox"/> MB <input type="checkbox"/> DVBE

<b>Is Contractor subcontracting any services?</b>	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes
If yes, give company name and identify if they are a Small Business (SB), Micro Business (MB) and/or DVBE:		
Better Place Mobility Services, and Inc.	<input checked="" type="checkbox"/> No	<input type="checkbox"/> SB <input type="checkbox"/> MB <input type="checkbox"/> DVBE
FEV, Inc.	<input checked="" type="checkbox"/> No	<input type="checkbox"/> SB <input type="checkbox"/> MB <input type="checkbox"/> DVBE
CODA of Silicon Valley	<input checked="" type="checkbox"/> No	<input type="checkbox"/> SB <input type="checkbox"/> MB <input type="checkbox"/> DVBE

<b>Miscellaneous Contract Information</b>			
1. Will there be Work Authorizations?	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes	
2. Is the Contractor providing confidential information?	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes	
3. Is the contractor going to purchase equipment?	<input checked="" type="checkbox"/> No	<input type="checkbox"/> Yes	
4. Check frequency of progress reports	<input checked="" type="checkbox"/> Monthly <input type="checkbox"/> Quarterly <input type="checkbox"/> Other... _____		
5. Will a final report be required?	<input type="checkbox"/> No	<input checked="" type="checkbox"/> Yes	
6. Is the contract, with amendments, longer than a year? If yes, why?	<input type="checkbox"/> No	<input checked="" type="checkbox"/> Yes	

<b>The following items should be attached to this CRF</b>		
1. Scope of Work, Attach as Exhibit A.	<input type="checkbox"/> N/A	<input checked="" type="checkbox"/> Attached
2. Budget Detail, Attach as Exhibit B.	<input type="checkbox"/> N/A	<input checked="" type="checkbox"/> Attached
3. CEC 96, NCB Request	<input checked="" type="checkbox"/> N/A	<input type="checkbox"/> Attached
4. CEC 30, Survey of Prior Work	<input checked="" type="checkbox"/> N/A	<input type="checkbox"/> Attached
5. CEC 95, DVBE Exemption Request	<input checked="" type="checkbox"/> N/A	<input type="checkbox"/> Attached
6. Draft CEQA Notice of Exemption (NOE)	<input checked="" type="checkbox"/> N/A	<input type="checkbox"/> Attached
7. Resumes	<input checked="" type="checkbox"/> N/A	<input type="checkbox"/> Attached
8. CEC 105, Questionnaire for Identifying Conflicts		<input checked="" type="checkbox"/> Attached
9. CEC 106, IT Component Reporting Form		<input checked="" type="checkbox"/> Attached

\_\_\_\_\_  
Contract Manager                      Date                      Office Manager                      Date                      Deputy Director                      Date

The following signatures are only required when contract approval is delegated to the Executive Office and not approved at a Business Meeting. See Business Meeting Information Section.

\_\_\_\_\_  
Presiding Policy Committee                      Date                      Associate Policy Committee                      Date                      Executive Director                      Date

**Exhibit A**  
**SCOPE OF WORK**

**TASK LIST**

<b>Task #</b>	<b>Task Name</b>
1	Agreement Management
2	Planning and Execution Management
3	Develop
4	Procurement
5	Deployment

**ACRONYMS/GLOSSARY**

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

<b>Acronym</b>	<b>Definition</b>
ARO	After receipt of order
BSS	Battery Switch Station
CCM	Commission Contract Manager
EV	Electric Vehicle
GHG	Green House Gas
ICE	Internal Combustion Engine
XBEV	Switchable Battery Electric Vehicle, including its battery

**BACKGROUND/PROBLEM STATEMENT**

Conventional transportation technologies and strategies pollute the air, degrade health, and export money from the local economy among other things. Therefore, in order for California to achieve its air quality, greenhouse gas emissions reductions, petroleum reduction and economic goals, the State needs to look at new and alternative forms of transportation including electric vehicles.

The Bay Area Air Quality Management District (Air District) believes that Better Place's business model, technology and business practices may represent an economically viable solution to these problems. Their technology is currently being deployed in other regions around the globe (Denmark and Israel most notably) and is showing excellent promise as a solution to reducing emissions from transportation.

The proposed Bay Area eTaxi program will demonstrate a solution to address the region's long-standing need to reduce criteria and greenhouse gas (GHG) emissions from transportation; a sector that accounts for nearly 40% of the region's total GHG emissions. The program demonstrates a strategy for mass market electrification of light duty vehicles powered by renewable and clean California electricity that would allow the State to continue its leadership as "the electric vehicle (EV) capitol of the United States."

**GOALS AND OBJECTIVES OF THE AGREEMENT**

## **Goals of Resulting Agreement**

The e-Taxi Program is designed to achieve 3 goals in building a scalable, replicable and cost-effective GHG emissions reduction strategy for the Bay Area:

1. Create the first North American eTaxi Corridor, providing unlimited range for participating vehicles in less time than it takes to fill a tank of gas
2. Operate a fully functional zero emission switchable battery EV taxi fleet
3. Raise awareness on EVs with a million consumers through the EV taxi experience over this and future phases

## **Objectives of the Agreement**

1. Demonstrate that the battery switchable vehicle (XBEV) taxis can serve customers at a rate similar to that of the comparable hybrid taxi service within the corridor
2. Show the battery switch concept's robustness by demonstrating a minimum "down time" for the equipment that is on the order of that for the comparable internal combustion engine (ICE)/hybrid taxi average
3. Demonstrate commercial-intent XBEVs without any range or use restrictions within the travel corridor
4. All objectives listed above to be achieved within a program duration of three (3) years

## **FORMAT/REPORTING REQUIREMENTS**

### **Deliverables/Reports**

When creating reports, the Contractor shall use and follow, unless otherwise instructed in writing by the Commission Contract Manager (CCM), the latest version of the Consultant Reports Style Manual published on the Energy Commission's web site:

[http://www.energy.ca.gov/contracts/consultant\\_reports/index.html](http://www.energy.ca.gov/contracts/consultant_reports/index.html)

Each final deliverable shall be delivered as one original, reproducible, 8 ½" by 11", camera-ready master in black ink. Illustrations and graphs shall be sized to fit an 8 ½" by 11" page and readable if printed in black and white.

### **Electronic File Format**

The Contractor shall deliver an electronic copy (CD ROM or memory stick or as otherwise specified by the CCM) of the full text in a compatible version of Microsoft Word (.doc).

The following describes the accepted formats of electronic data and documents provided to the Energy Commission as contract deliverables and establishes the computer platforms, operating systems and software versions that will be required to review and approve all software deliverables.

- Data sets shall be in Microsoft (MS) Access or MS Excel file format.
- PC-based text documents shall be in MS Word file format.
- Documents intended for public distribution shall be in PDF file format, with the native file format provided as well.

- Project management documents shall be in MS Project file format.

### **Software Application Development**

If this scope of work includes any software application development, including but not limited to databases, websites, models, or modeling tools, contractor shall utilize the following standard Application Architecture components in compatible versions:

- Microsoft ASP.NET framework (version 3.5 and up) Recommend 4.0
- Microsoft Internet Information Services (IIS), (version 6 and up) Recommend 7.5
- Visual Studio.NET (version 2008 and up) Recommend 2010
- C# Programming Language with Presentation (UI), Business Object and Data Layers
- SQL (Structured Query Language)
- Microsoft SQL Server 2008, Stored Procedures Recommend 2008 R2
- Microsoft SQL Reporting Services Recommend 2008 R2
- XML (external interfaces)

Any exceptions to the Electronic File Format requirements above must be approved in writing by the Energy Commission Information Technology Services Branch.

## **TASK 1- AGREEMENT MANAGEMENT**

### **Task 1.1 Kick-off Meeting**

The goal of this task is to establish the lines of communication and procedures for implementing this Agreement.

#### **The Contractor shall:**

- Attend a “kick-off” meeting with the CCM, the Contracts Officer, and a representative of the Accounting Office. The meeting will be held via Web-Ex or teleconference. The Contractor shall include their Project Manager, Contracts Administrator, Accounting Officer, and others designated by the CCM in this meeting. The administrative and technical aspects of this Agreement will be discussed at the meeting.
- If necessary, prepare an updated Schedule of Deliverables based on the decisions made in the kick-off meeting.

**The CCM shall:**

- Arrange the meeting including scheduling the date and time.
- Provide an agenda to all potential meeting participants prior to the kick-off meeting.

**Deliverables:**

- An Updated Schedule of Deliverables (if applicable)

**TASK 1.2 Invoices**

**The Contractor shall:**

- Prepare invoices for all reimbursable expenses incurred performing work under this Agreement in compliance with the Exhibit B of the Terms and Conditions of the Agreement. Invoices shall be submitted with the same frequency as progress reports (task 1.4). Invoices must be submitted to the Energy Commission's Accounting Office.

**Deliverables:**

- Invoices

**TASK 1.3 Manage Subcontractors**

The goal of this task is to ensure quality products, to enforce subcontractor Agreement provisions, and in the event of failure of the subcontractor to satisfactorily perform services, recommend solution to resolve the problem.

**The Contractor shall:**

- Manage and coordinate subcontractor activities. The Contractor is responsible for the quality of all subcontractor work and the Energy Commission will assign all work to the Contractor. If the Contractor decides to add new subcontractors, they shall 1) comply with the Terms and Conditions of the Agreement, and 2) notify the CCM who will follow the Energy Commission's process for adding or replacing subcontractors.

**Task 1.4 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.

**The Contractor shall:**

- Prepare progress reports which summarize all Agreement activities conducted by the Contractor for the reporting period, including an assessment of the ability to complete the Agreement within the current budget and any anticipated cost overruns. Each progress report is due within 15 calendar days after the end of the reporting period. The CCM will provide the format for the progress reports.

**Deliverables:**

- Monthly Progress Reports

**Task 1.5 Final Report**

The goal of this task is to prepare a comprehensive written Final Report that describes the original purpose, approach, results and conclusions of the work completed under this Agreement. The Final Report shall be prepared in language easily understood by the public or layperson with a limited technical background.

The Final Report must be completed before the termination date of the Agreement in accordance with the Schedule of Deliverables.

The Final Report shall be a public document. If the Contractor has obtained confidential status from the Energy Commission and will be preparing both a public and a confidential version of the Final Report, the Contractor shall perform the following subtasks for both the public and confidential versions of the Final Report.

#### **Task 1.5.1 Final Report Outline**

**The Contractor shall:**

- Prepare and submit a draft outline of the Final Report for review and approval. The CCM will provide written comments to the Contractor on the draft outline. The Contractor shall review the comments and discuss any issues with the recommended changes with the CCM.
- Prepare and submit the final outline of the Final Report, incorporating CCM comments.

**Deliverables:**

- Draft Outline of the Final Report
- Final Outline of the Final Report

#### **Task 1.5.2 Final Report**

**The Contractor shall:**

- Prepare the draft Final Report for this Agreement in accordance with the approved outline.
- Submit the draft Final Report for review and comment. The CCM will provide written comments to the Contractor. The Contractor shall review the comments and discuss any issues with the recommended changes with the CCM.
- Prepare and submit the Final Report, incorporating CCM comments.

**Deliverables:**

- Draft Final Report
- Final Report

#### **Task 1.6 Identify and Obtain Required Permits**

The goal of this task is to verify 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. While the budget for this task will be zero dollars, the Contractor may show match funds for this task. Permits must be identified in writing and obtained before the Contractor can incur any costs related to the use of the permits for which the Contractor will request reimbursement.

**The Contractor shall:**

- Prepare a letter documenting the permits required to conduct this Agreement and submit it at least 2 working days prior to the kick-off meeting. 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
- A schedule the Contractor 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. 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.
- If during the course of the Agreement additional permits become necessary, then provide the appropriate information on each permit and an updated schedule to the CCM.
- As permits are obtained, send a copy of each approved permit to the CCM if requested.
- If during the course of the Agreement permits are not obtained on time or are denied, notify the CCM within 5 working days.

**Deliverables:**

- A letter documenting the permits and schedule
- Updated list of permits and schedule (as necessary)
- A copy of each approved permit (if requested)

**TECHNICAL TASKS**

***Task 2 – Contracting***

The goal of this task is to define the contractual relationships between the Bay Area Air Quality Management District (Air District) and the contractors and subcontractors associated with the project.

**The Contractor or its subcontractors shall:**

- Develop a contract with Better Place Mobility Services, Inc., to deliver the scope of work contained in this contract and submit to the CCM.
- As part of contracting, Better Place Mobility Services, Inc. will be required to execute all subcontracts necessary to complete the scope of work under this agreement and submit all of them to the CCM.

**Deliverables:**

- Contract between Air District and Better Place Mobility Services, Inc.,
- All necessary subcontracts between Better Place Mobility Services, Inc., and selected vendors

***Task 3 - Planning***

The goal of this task is to develop and manage the integrated program plan, budget, and risks.

**The Contractor or its subcontractors shall:**

- Develop and maintain a program schedule and submit to CCM.
- Develop and maintain a program budget and spending plan that reflects specific detail about subcontractor labor, fringe, travel and milestone payments and submit to CCM.
- Develop and maintain a program risk management plan and submit to CCM.
- Develop plans to ensure that all work:
  - Complies with contract terms and conditions
  - Executes program tasks on time and within budget and
  - Executes reporting requirements
  - Manages subcontracting process and subcontractors within the constraints of this agreement
  - Maintains program stakeholder engagement plan to ensure all program stakeholders are informed adequately to facilitate performance to the requirements of this agreement.

**Deliverables:**

- Program schedule
- Program budget/spend plan
- Program risk management plan

***Task 4 - Development***

The goal of this task is to develop the different systems, equipment, programs and processes required by the program: the charging architecture for the battery switch station (BSS), the final design for the XBEVs and their batteries, the spare parts and maintenance plan, the program operations plan, and the related processes/training requirements, safety plan and systems. It is also to develop the education and outreach program.

**The Contractor or its subcontractors shall:**

- Develop XBEV battery charge architecture and protocol by evaluating charger and battery management system characteristics, defining charge objectives, developing charging system design and evaluating the resulting design.
- Develop BSS charging architecture and performance evaluation plan and submit to CCM.
- Finalize evaluation and validation plan for XBEVs and submit to CCM.
- Finalize top level design schematics for XBEVs and batteries having a 3 year or 200,000 mile lifetime, whichever occurs first and submit to CCM..
- Develop the spare parts and maintenance plan for the XBEVs
- Develop the operations plan for taxis and submit to CCM.
- Develop the operations plan for very important persons (VIP) vehicles and submit to CCM.
- Develop safety plan for program and submit to CCM.
- Develop quality plan for program and submit to CCM.
- Develop job descriptions and draft contracts for staff and contractors
- Finalize risk management plan for program
- Develop training program and training modules
- Develop operating manual for XBEVS and batteries and submit to CCM.
- Develop education and outreach plan and submit to CCM.
- Develop on-going evaluation plan for program and operational staff

**Deliverables:**

- BSS charging architecture and performance evaluation plan
- Evaluation/validation plan for XBEVs

- Safety plan
- Quality plan
- Education and outreach plan
- XBEV and battery top level design schematics
- Taxi and VIP operations plan
- Operating manual for XBEVs and batteries

### ***Task 5 - Procurement***

The goal of this task is to procure the equipment and systems necessary to the execution of the program, including: BSS equipment and Lane Cover (the lane cover is the structure over the battery switch lane that includes mechanical, electrical and other systems) and the XBEV donor cars and batteries.

#### **The Contractor or its subcontractors shall:**

- Procure BSS subsystems, peripheral systems and related equipment including the Lane Cover, charging equipment and critical spare parts and submit to CCM evidence of delivery and acceptance.
- Procure material for XBEVs and batteries including spare parts and submit to CCM evidence of delivery and acceptance.
- Develop:
  - BSS bill of materials/procurement requirements and submit to CCM.
  - XBEV and battery material procurement requirements and submit to CCM.

#### **Deliverables:**

- BSS bill of materials/procurement requirements
- XBEV and battery material procurement requirements
- Evidence of BSS component delivery and acceptance
- Evidence of XBEV and battery material delivery and acceptance

### ***Task 6 - Deployment***

The goal of this task is to manage the deployment of the station and its integration with the broader Better Place technology solution; to build, deliver, integrate and validate the cars/batteries with the balance of the Better Place systems; and to implement the Bay Area eTaxi program operations plan, related processes/training requirements, safety plan and systems, to implement the education and outreach program. The goal is also to show the number and length of fares per day, the overall and individual car and BSS availability for use (up-time), and validate that there are no restrictions on use.

#### **The Contractor or its subcontractors shall:**

- Provide technical support for machine/subsystem integration
- Provide technical support for the installation of the BSS and integration with the car

- Build XBEVs and batteries
- Integrate batteries with XBEVs
- Factory test integrated XBEVs
- Ship XBEVs and batteries to final destination
- Develop acceptance test report for six (6) XBEVs including one (1) battery per vehicle and nine (9) additional XBEV batteries for switch station use and submit to CCM.
- Integrate XBEVs with BSS
- Validate performance of XBEVs and interaction between XBEVs and BSS
- Develop acceptance test report for installed, integrated and validated BSS equipment and submit to CCM.
- Hire and contract staff and partners
- Train staff and partners
- Dry run operations, education and outreach
- Launch operations, education and outreach
- Track training and certification status

**Deliverables:**

- Acceptance test report for installed, integrated and validated BSS equipment
- Acceptance test report for XBEVs and batteries

***TASK 7 - Data Collection and Analysis***

The goal of this task is to collect and analyze operational data and include that analysis in the Final Report.

**The Contractor shall:**

- Collect 6 months of throughput, usage, and operational data from the project including, but not limited to:
  - Number of battery switches per day per station
  - Number of days per year BSSs are open and in operation
  - Maximum capacity of each BSS
  - Estimated gallons of gasoline and/or diesel fuel displaced (with associated mileage information)
  - Identify the specific jobs and economic development resulting from this project.
- Identify any current and planned use of renewable energy at the BSS.
- Describe any energy efficiency measures used with the BSS and XBEVs that may exceed Title 24 standards in Part 6 of the California Code of Regulations.
- Provide a quantified estimate of the project's carbon intensity values for life-cycle greenhouse gas emissions.
- Provide any other data collected that is not confidential
- Provide additional data that may be requested by the Energy Commission during the term of this Agreement, as is reasonably available.

**Deliverables:**

None. The data collected and information generated will be evaluated and described in the final report.

## SCHEDULE OF DELIVERABLES AND DUE DATES\*

Task Number	Deliverable	Due Date
<b>1</b>		
1.1	An Updated Schedule of Deliverables	If applicable
1.2	Invoices	With progress report
1.4	Monthly Progress Reports	Monthly
<b>1.5.1</b>	<ul style="list-style-type: none"> <li>• <b>Draft Outline of the Final Report</b></li> <li>• <b>Final Outline of the Final Report</b></li> </ul>	<b>6/15/15</b> <b>9/30/15</b>
1.5.2	<ul style="list-style-type: none"> <li>• Draft Final Report</li> <li>• Final Report</li> </ul>	<b>10/30/15</b> <b>11/31/15</b>
<b>1.6</b>	<ul style="list-style-type: none"> <li>• <b>A letter documenting the permits and schedule</b></li> <li>• <b>Updated list of permits and schedule</b></li> <li>• <b>A copy of each approved permit (if requested)</b></li> </ul>	<b>12/10/12</b>  As necessary As requested
<b>2</b>	<b>Contracting</b>	
	BAAQMD contract with Better Place Mobility Services, Inc.	11/15/12
	Better Place Mobility Services, Inc., subcontracts	8/10/13
<b>3</b>	<b>Planning</b>	
	Program schedule	2/10/13
	Program budget/spend plan	2/10/13
	Program risk management plan	3/10/13
<b>4</b>	<b>Development</b>	
	Safety plan	6/10/13
	Quality plan	6/10/13
	Education and outreach plan	6/10/13
	BSS charging architecture and performance evaluation plan	6/10/13
	Evaluation/validation plan for XBEVs	6/10/13
	XBEV and battery top level design schematics	7/10/13
	Taxi and VIP operations plan	9/10/13
	Operating manual for XBEVs and batteries	11/10/13
	Education and outreach plan	6/10/13
<b>5</b>	<b>Procurement</b>	
	BSS bill of materials/procurement requirements	8/10/13
	XBEV and battery material procurement requirements	8/10/13
	Evidence of BSS component delivery and acceptance	11/10/13
	Evidence of XBEV and battery material delivery and acceptance	11/10/13
<b>6</b>	<b>Deployment</b>	
	Acceptance test report for installed, integrated and validated BSS equipment	3/10/14
	Acceptance test report for XBEVs and batteries	3/10/14
<b>7</b>	<b>Data Collection and Analysis</b>	
	None. The data collected and information generated will be evaluated and described in the final report.	N/A