**ATTACHMENT 3**

**Scope of work and budget for Cosco Busan Auklet box restoration on Southeast Farallon Island**

To provide the background for the development of new, permanent seabird nesting habitat on the Farallon National Wildlife Refuge, Point Blue Conservation Science will lead in the design phase of development of auklet nesting boxes.

To develop temperature constraints for new nest box designs, Point Blue will write a report summarizing five years of data from temperature loggers in existing Cassin’s Auklet nesting boxes. The report will compare mean and maximum temperatures between unshaded boxes, shaded boxes, and natural auklet sites, compared to local control sensors. Recommendations of temperature goals for newly designed sites will be made.

In addition, Point Blue will begin researching prototype designs for testing in the field with Cassin’s Auklets. We will contact other researchers working in this field to inform the design of prototypes. We will research material and select choices most appropriate for the Farallon system, which meet research, habitat, and temperature regulation goals. After initial development of 2-3 different prototype boxes, we will construct and deploy ~10-20 nest boxes of each prototype design in fall 2014 for more wide scale testing – assessing temperatures and use and breeding success by auklets in summer 2015.

**Deliverables and Timelines**

Temperature logger Report and initial prototype background research– March 30, 2014

Development of prototypes – July 30, 2014

Installation of new prototypes for testing – October 30, 2014

**Budget**

Design Phase = Temperature Logger Report and Prototype planning, consultation with partners, research, and design

Trial Implementation = Prototypes development (materials, staff time for construction, and installation of test units) – from implementation budget

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Design Phase** |  |  |  |  |
| **Name** |  | **Time needed (months)** | **Monthly Salary** | **TOTAL (w/benefits)** |
| BRADLEY, Russ | Farallon Program Manager | 0.5 | $ 5,814 | $ 4,148 |
| JAHNCKE, Jaime | California Current Director | 0.05 | $ 7,776 | $ 555 |
| WARZYBOK, Pete | Farallon Biologist | 0.75 | $ 4,410 | $ 4,720 |
|  | Design Phase Subtotal |  |  | $ 9,423 |
|  | Design Phase Indirect costs |  |  | $ 3,157 |
|  | **DESIGN PHASE TOTAL** |  |  | **$ 12,580** |
| **Trial Implementation** | |  |  |  |
| BRADLEY, Russ | Farallon Program Manager | 0.1 | $ 5,814 | $ 830 |
| WARZYBOK, Pete | Farallon Biologist | 0.5 | $ 4,410 | $ 3,147 |
|  | Equipment costs |  |  | $ 2,500 |
|  | Trial Implementation Subtotal |  |  | $ 6,476 |
|  | Trial Implementation Indirect costs | |  | $ 2,170 |
|  | **TRIAL IMPLEMENTATION TOTAL** |  |  | **$ 8,646** |
|  | **GRAND TOTAL** |  |  | **$ 21,225** |