

ENTRIX**MEMO**

ENTRIX, Inc.
590 Ygnacio Valley Rd., Suite 200
Walnut Creek, CA 94596
(925) 935-9920

To: Dennis Saito
From: Joan Duffield *J.Duffield*
Date: October 1, 1998
Re: *Survey Results of Red-footed Boobies (Sula sula) at Kilauea Point*

The U.S. Fish and Wildlife Service has raised concerns that the possible extent of oil on red-footed boobies at Kilauea Point has not been adequately assessed. To address these concerns, Kathleen Viernes, a local biologist, was contracted by ENTRIX, with approval from Tesoro, to conduct surveys of red-footed boobies at Kilauea Point. The purpose of these surveys was to document the presence or absence of oiled red-footed boobies and identify the need and feasibility of additional rescue efforts of oiled birds. These surveys were not intended to be exhaustive, particularly since there was a potential margin of error due to double counting and to adequately accessing the entire colony.

This field assessment included two morning surveys conducted on September 29th and 30th. The results of the morning surveys indicated that there were oiled red-footed boobies at Kilauea Point. On September 29th, 412 adult red-footed boobies were observed, of which 13 birds were oiled. One of these adults were heavily oiled, two birds were moderately oiled, and eleven individuals were lightly oiled. During this same survey, 355 subadult red-footed boobies were observed, including 24 oiled birds. Three, two and nineteen of these birds were heavily, moderately and lightly oiled, respectively.

On September 30th, a different portion of the colony was surveyed. A total of 221 adults were observed, including 12 individuals that were oiled; eleven were lightly oiled and one was moderately oiled. Additionally, 162 subadults were surveyed, of which nine birds were lightly oiled.