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CCCWA/EDF Exhibit 1

**A SALINITY STANDARD TO MAXIMIZE
PHYTOPLANKTON ABUNDANCE
BY POSITIONING THE ENTRAPMENT ZONE IN SUISUN BAY**

by

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II. CONCLUSIONS

- A. Phytoplankton are the base of the estuarine food chain in Suisun Bay, and directly affect the abundance of many other organisms, including shrimp, striped bass, and many resident fish. Maintenance of phytoplankton abundance is critical to maintaining populations of higher-level organisms in Suisun Bay.
- B. The abundance and distribution of key zooplankton species, including Neomysis and Eurytemora, are controlled by the phytoplankton abundance in the channels of Suisun Bay.
- C. The abundance of phytoplankton, particularly diatoms, in the channels of Suisun Bay is controlled by the positioning of the entrapment zone adjacent to the shallows of Suisun Bay.
- D. The abundance of phytoplankton in Suisun Bay is also affected by the intrusion of marine benthos, such as soft-shelled clams, or marine worms during periods of higher salinity.
- E. The positioning of the entrapment zone is dependent on the location of the null zone, which is directly affected by Delta outflow.
- F. The entrapment zone is located adjacent to the shallows of Suisun Bay when the null zone is located adjacent between Port Chicago and Chipps Island.

- G. In order to maximize phytoplankton abundance in Suisun Bay throughout the year, the entrapment zone should be located adjacent to the shallows of Suisun Bay for the period April through September, except when higher flows are required for phytoplankton and for beneficial uses in other parts of the San Francisco Bay-Delta estuary.
- H. A tidally averaged bottom salinity standard should be adopted that will locate the entrapment zone adjacent to the shallows of Suisun Bay. The recommended standard is a 28-day tidally averaged mean bottom salinity at Chipps Island, not to exceed 2 ppt. total dissolved solids for the period April through September, except in a one-in-20 dry year.