SB 3394
MAKING AN APPROPRIATION FOR
A DEMONSTRATION OTEC PLANT AT KEAHOLE POINT

Senate Committee on
Sciences Technology and Economic Development
Public Hearing - February 3, 1992
3:00 pm, Room 504

By
John T. Harrison, Environmental Center
Hub Hubbard, Hawaii Natural Energy Institute

SB 3394 would appropriate funds from the general revenues of the state
for the operation of a demonstration closed cycle OTEC plant at Keahole
Point, Hawaii.

Our statement on this bill does not represent an institutional position
of the University of Hawaii.

SB 3394 is a companion bill to HB 3640, and our testimony reflects
opinions we provided at the House hearing on that bill. We strongly support
the vigorous pursuit of renewable energy implementation in Hawaii,
particularly those methodologies such as OTEC which are ideally suited to
Hawaiian environments. However, operation of a demonstration closed cycle
OTEC plant at this time is superfluous. This technology already has been
demonstrated locally with the successful deployment and operation of the
Mini-OTEC barge off of Keahole Point in July of 1979. Since that time, most
effort locally has been devoted to development of open cycle OTEC technology
and improvement of ancillary systems for OTEC deployment.

A 50 MWe closed cycle OTEC plant was proposed in the early 1980s for
emplacement adjacent to HEI's Kahe Point generating station on Oahu. A
substantial amount of the environmental and engineering survey and
development work needed for site specific OTEC deployment already exists for
this site. Furthermore, evolution of new technologies utilizing slant
drilling techniques to avoid intake and discharge pipeline logistic problems
is nearly mature. We suggest that a more productive use of these funds
might be the demonstration of slant drilling at Kahe Point, leading to
implementation of a commercially significant OTEC facility.