SB 561
RELATING TO REMOVAL OF SAND

Statement for
Senate Committee on
Ecology, Environment and Recreation
Public Hearing - 25 February 1982

By
Doak C. Cox, Environmental Center

SB 561 would amend HRS 205-33(a), the section of the Shoreline Setback Law that deals with the removal of sand, coral and other materials in near shore areas. Notice of the committee's hearing on the bill reached the Environmental Center too late to permit preparation of this statement in time for submission at the hearing, but it is submitted late in the hope that it will provide useful guidance to the committee nevertheless. The statement is based in large part on statements the Center has made on this and similar bills in several previous legislative session. It has been submitted for review to the Center's Legislative Subcommittee, but does not represent an institutional position of the University.

The amendment of HRS 205-33(a) proposed in SB 561 would result in three changes, all relating to controls of sand mining:

1. Deletion of a provision "grandfathering" mining operations until a date several years ago.
2. Deletion of a provision for an experimental mining program completed several years ago.
3. Provision for certain exceptions to the present prohibition against sand mining within a defined area.

For obvious reasons, this statement need be concerned only with the third change.

In the present law sand mining is prohibited within the shoreline setback area, which may extend 20 to 40 feet inland from the shoreline (defined essentially as the vegetation line at the top of the beach), or from offshore deposits that are either less than 1000 feet from the shoreline or at depths of less than 30 feet. The reasons for prohibition against mining of sand from beach faces are so obvious that their elucidation here is unnecessary. The prohibition was extended beyond the beach faces in recognition of the facts that: a) beaches are but parts of systems in which sand is moved back and forth...
by natural processes, and b) removals of sand from any parts of these systems may affect
the beaches just as much as removals from the beaches themselves. The 1000-foot distance
and 30-foot depth limitation were introduced as reasonable general representations of
limits to the offshore zone from which the sand may be moved by natural processes to
a beach. However:

1. With advances in the understanding of the processes of sand movement, it
is now possible to determine more precisely the limits of beach systems;

2. More is now known about the distribution of offshore deposits of sand; and

3. It is clear that at some places these are mineable offshore deposits of sand
that lie less than 1000 feet from the shore, in water less than 30 feet in depth,
or both, but from which sand cannot naturally move to the beach.

Although it is the value of sand in place on beaches and in beach systems that led
to the restrictions on sand mining in the present law, it is clear that sand also has a value
removed for use in various ways, in construction for example, and also for beach replenishment.
It is also clear that problems of beach retreat along some parts of the coast may be dealt
with effectively by beach replenishment.

SB 561 would make it possible for to mine sand from deposits whose mining is now
prohibited for the sole purpose of replenishment of public beaches, subject to certain constraints.
The appropriateness of the change proposed depends on the appropriateness of the constraints.

The constraints proposed in SB 561 are: a) that the mining is subject to the permission
of all agencies having jurisdiction, and b) that an environmental impact statement (EIS)
should be filed on the mining operation accordance with the State EIS law.

A workshop on "Beach Erosion and Offshore Sand-Mining" was held in 1981 under
the sponsorship of the Sea-Grant program, the Hawaii Institute of Geophysics, and the
Environmental Center, that was attended by persons representing groups concerned with
beach conservation, sand conservation, and the environmental effects of sand mining.
One of the recommendations adopted at this workshop dealt with legislation concerning
sand mining. This recommendation reads as follows:

Provide for exceptions to 1000 feet and 30 feet criteria for permissible
offshore mining in the case of state or county beach replenishment
projects, providing that, for the exception to apply, it must be
demonstrated that no substantial environmental detriment will
result from the project, and the project has been the subject of
both an informational meeting and a public hearing.

Demonstration that "no substantial environmental detriment will result" from a
sand mining operation, may best be made in an EIS, but the constraint proposed in the
recommendation is more extensive than the mere requirement of an EIS. Significant
interference with the natural movement of sand from sand deposit to a beach would,
of course, be a substantial detriment banning the mining of the deposit, but the possible
substantial detriments that would have to be considered, if the recommendation were
adopted, are not restricted to that interference. They would include, for example, detrimental
biological effects and changes in wave patterns resulting from the changes in position
topography that might have detrimental effects at the shoreline or shore.
It would be desirable to substitute the language recommended for the simple requirement of an EIS in SB 561. With this revision, SB 561 would appropriately combine sand conservation, beach conservation, and general environmental concerns.

There has been opposition in the past to the passage of SB 561 or similar bills from some persons concerned with the possible impacts of the mining of sand from a deposit in Kaneohe Bay for replenishment of a beach at Kualoa Beach Park. The concerns of those persons should be allayed by the inclusion of the recommended constraint in the amendment of HRS 205-33a.
February 25, 1982

Senator Ann Kobayashi, Chair
Committee on Ecology, Environment
and Recreation
State Capitol
Honolulu, Hawaii 96813

Dear Senator Kobayashi:

SB 561-82

I regret greatly that we did not learn of the hearing held by your committee on SB 561-82 in time to prepare a statement on this bill for presentation at the hearing. In accordance with our telephone conversation, we have prepared a statement which we are submitting now in the hope that it will still be of use.

I am also sending you a copy of a letter I have addressed to the head of the City Parks and Recreation department concerning the sand mining project prepared at Kualoa, Oahu.

Opposition to the passage of SB 561 has in the past, I understand, been based on concerns with possible environmental effects of the Kualoa project. I hope that the combination of the letters and the constraint on sand mining that has been recommended for incorporation in SB 561 will help allay those concerns.

Sincerely,

Doak C. Cox
Director
Dear Mr. Masuda:

Proposed Kualoa Beach Project

This letter concerns the proposal for artificial replenishment of sand on the ocean facing beach bordering Kualoa Beach Park using sand mined from a sand bar lying off the Kaneohe Bay-facing beach bordering the Park. It is my understanding that the proposed project would already have been undertaken except for a court finding that the removal of sand from the sand bar is prohibited by subsection 33a of the Shoreline Setback Law, Chapter 205 of Hawaii Revised Statutes.

In my opinion: a) the court finding was entirely appropriate; b) the law was intended to prevent removal of sand from any deposits within a littoral cell where the removal would decrease the rate at which sand is moved to a beach by natural processes; but c) the present prohibition is overprotective.

Two points are of concern here: the first is the recognition of the need for appropriate changes in the statute restricting sand mining; the second relates to the specific problems and needs of Kualoa Beach.

Statutory change

With regard to the first, I served as one of the discussion leaders for a group discussion on legislation in the "Beach Erosion and Sand Mining Workshop" recently held by the UH Sea Grant Advisory Service and other institutions at which the following recommendation was adopted with respect to the existing sand mining statute:

Provide for exceptions to the 1000 ft. and 30 ft. criteria for permissible offshore mining in the case of state or county by each replenishment projects, providing that, for the exception to apply, it must be demonstrated that no substantial environmental detriment will result from the project, and the project has been the subject of both an informational meeting and a public hearing.

The recommendation resulted from unanimous recognition of statewide beach erosion and maintenance needs. The discussion that led to it was not limited to the Kualoa Beach project which is the second point to be discussed here.
Kualoa Beach problems

It has been and remains my opinion that the proposed Kualoa project, has distinct merits. There has been an extensive discussion of the expectable environmental effects in the Environmental Impact Statement (EIS) on the project produced by the Corps of Engineers and accepted in September 1977. However, since that time a number of possible environmental impacts of the project not addressed in the EIS have been suggested, and additional information bearing on impacts discussed in the EIS has come to light. In my opinion an EIS is the most appropriate vehicle through which the benefits and detriments of any sand mining project may be disclosed. However, I believe that it will be necessary to prepare a supplemental Kualoa Beach EIS to address the additional possible impacts that have been suggested and incorporate the additional information that is available.

I urge that preliminary steps in the EIS system be taken toward the preparation of the supplemental EIS, specifically the publication of an assessment and preparation notice, or the equivalent, in the Environmental Quality Commission Bulletin, so that those who have pertinent concerns and information will have the opportunity to contribute to the EIS revisions.

A specific need in assuring that available information is compiled in useful form is suggested by a meeting I recently had with Francis S. Morgan and members of his family, the former owners of the land now occupied by the City's Kualoa Beach Park, and still the owners of adjacent land. The Morgan family has a good deal of information pertinent to the Kualoa beach problem. The need is for a map with overlays showing all easily recognized features, beach and submarine topography and geology, archaeological sites, certain biological distributions, waves, currents, sand transport directions, and comparable historical changes in these features and the positions of the beaches. Much of this information is available from government agencies or may be contributed by the public.

The spacial accuracy of the historical information, may be slight compared with current information, however, comparative analysis will be facilitated if all of the information is plotted on a uniform, large scale. A recent aerial photograph or photomosaic would be a useful base. Overlays may then be plotted as information becomes available. The map should cover, not only the Beach Park and the part of Kaneohe Bay including the sand bar whose mining is proposed, but also adjacent areas that may be affected by the proposed project or where there is evidence of beach changes related to the beaches bordering the Park.

Maps of part of the area have been published in the original EIS. However they do not show all of the significant kinds of pertinent information, nor, of course any information not available when the EIS was prepared, and differences in scale impair their utility.
I would appreciate your consideration of these comments and would welcome any response to them. If our Environmental Center can be of any assistance to your department in its further planning to cope with the Kualoa Beach problem please let us know.

Yours truly,

Doak C. Cox
Director

cc: Corps of Engineers
    State Department of Transportation
    Senator Ann Kobayashi