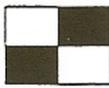


- 9r(3). The environmental impact due to the movement of natural resources is beyond the scope of this document. However, pertaining to the funding support for dredging, new work dredging costs are currently cost shared by the local authorities for ports and harbors which routinely pass this cost directly to the facility users. For the maintenance of existing channels, dredging costs are covered by the Harbor Trust Fund, composed of fees paid by shippers using those channels.
- 9r(4). Most recreational marinas must conduct and pay for their own dredging. In a few specific cases, channels leading to recreational marinas are federally maintained, as stipulated by Congress. LTMS is working to reduce existing inequities by finding ways to finance beneficial use alternatives that benefit the entire region (see Chapter 7).
- 9s. The transition and approach to achieving the preferred placement volumes is outlined in new discussions in Chapters 5, 6, and 7, and will be provided in more detail in the Management Plan.
- 9t. Comment noted. This section is meant to address changes in regulatory policy leading to the financing of federal wetland restoration projects which use dredged material. As shown during the LTMS process, policy changes have increased awareness of the availability of dredged material for beneficial reuse purposes.
- 9u. Please see the response to DOI comment 251.
- Once a wetland restoration site has been established (i.e., fill material in place, tidal channels designed and constructed, re-vegetation initiated), the site may require monitoring and adaptive management techniques to ensure that all components of the ecosystem are functioning properly. Monitoring may continue for several months to many years. Thus, although all of the components of a restored wetland may be in place or "established" early in the process, the determination of whether a site is functioning properly is often ongoing.
- Every disposal or reuse site for dredged material will be operated under a site management and monitoring plan. Compliance with such plans will be addressed on a project-specific basis as required by federal and state laws and in the LTMS Management Plan.
- 9v. This was simply one of a number of options listed to elicit preliminary public comment. The LTMS agencies have no specific plans to propose or institute a joint powers district. In any event, fines are not set by the LTMS agencies as a group. Instead, each agency with enforcement authority must follow its established regulations in determining appropriate penalties for violations of statutes and regulations under its jurisdiction. In many cases, the agency has no ability to direct where any fines collected may be spent. Exceptions, such as Supplemental Environmental Projects discussed in Chapter 7, must also be appropriate under the agency's relevant guidelines, and must be agreed to by both the agency and the violator.
- 9w. The LTMS agencies agree that an electronic bulletin board could be useful in helping dredgers and those needing dredged material to coordinate with each other.
- 9x. The LTMS agencies agree in general with the comment. For example, in the case of the SF-DODS, monitoring is a mandatory condition of site use. EPA will not authorize disposal at the site unless funding for monitoring is in place. To date, site monitoring has been funded by the large COE civil work projects using the site. However, it is true that ongoing, dedicated government funds to conduct mandatory monitoring in future years cannot be guaranteed. Unless some overall financing system is implemented, it is possible that the high cost of the monitoring requirements could render ocean disposal not practicable for some specific projects. This would increase the pressure for continued higher levels of in-Bay disposal, unless alternative beneficial reuse sites are available and practicable for such projects at that time.

- 9y. Statement noted. For the purpose of discussion in Chapter 7, it was assumed that under a fee system, any fee would have to be paid prior to disposal being authorized. Independent of this, the idea of a fund to support other LTMS goals (such as underwriting beneficial reuse) is also discussed in Chapter 7.



DOUGLASS S. LATHROP

Maritime Consultant

Ms. Karen Mason, LTMS Coordinator
U.S. EPA, Region IX
75 Hawthorne Street
San Francisco, CA 94105

July 19, 1996

Dear Ms. Mason:

First, let me introduce myself. I am currently an independent maritime consultant. Prior to becoming an independent consultant, I was Senior Vice President of Manalytics, Inc. until the company changed ownership in 1992. As a result, I have served as a consultant to the maritime industry for almost forty years. During that time, I have worked for most of the major carriers and most of the ports on the west coast. I have worked on dredging studies, competition studies, and cargo diversion studies. I was the principle author for the 1988 update of the Bay Area Seaport Plan. Accordingly, I believe I am well qualified to make the following comments regarding the LTMS Draft EIS-EIR.

Ports are in competition with one another. Bay Area ports are not only in competition with each other, they are in direct competition with other ports along the west coast and, to a lesser degree, other ports in North America. The partners in the "port business" (port authorities, stevedoring companies, intermodal companies, etc.) must provide competitive facilities and services at competitive prices. Failure to do so will inevitably result in the loss of business to other ports with the attendant loss of jobs and economic viability in the community. The goals put forth in the LTMS could potentially place the Bay Area ports at a severe competitive disadvantage. 1

Both the Corps and BCDC have publicly stated that they want to move from the current disposal practices (the so-called "do nothing" alternative) to Alternative #3 where 20 percent of the dredged material will be placed at in-bay sites, 40 percent at off-shore sites and 40 percent at upland sites. In the broad sense, everyone is in favor of these goals -- it's like being for motherhood, apple pie and baseball. The problem as I see it is "how do we get there from here."

The Draft EIS-EIR does not indicate who will pay any additional costs associated with the significantly greater reliance on upland disposal and it is silent on when Alternatives #1, #2 and #3 will be implemented -- these issues apparently will be addressed in the next or implementation phase. It is conceivable that dredging costs in the Bay could increase dramatically with so much of the material going to upland sites. It is also conceivable that unit costs could vary significantly from project to project as different upland sites are opened and closed. There have been some suggestions that small projects such as marinas would be allowed to dispose of 100 percent the material "in bay" but what classifies a project as small? 2

The average dredging cost for the Port of Oakland's current deepening project is about \$6.40 per cubic yard. Included in this average is the cost if disposing some material at upland sites.

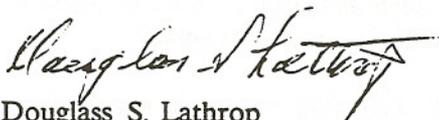


3 About 15 percent of the material is unsuitable for ocean disposal and is being placed at the Galbrath golf course site. About a quarter of the material is suitable for ocean disposal but is being placed at the Sonoma Baylands site. It is my understanding that there is no tipping fee associated with the Sonoma Baylands site and the cost of depositing material there is not too different than the cost of ocean disposal. These upland sites will be closed at the competition of the current deepening project. The only upland site that I am aware of that will be available in the near future is Montezuma Slough. I have heard that the tipping fee at Montezuma Slough will be about ten dollars per cubic yard. Therefore, the tipping fee plus the additional costs associated with moving the material from the dredging site to the upland site could easily increase the total project cost twenty five to forty percent.

4 Under current law, the local sponsors must pay all of the additional costs associated with upland disposal when federal channels are deepened. Admittedly, proposed legislation in Washington will require the federal government to pay 75 percent of the additional costs associated with upland disposal but the local sponsor's share of costs could still increase 25 to 40 percent under Alternative #3 even with this legislation. The local sponsors at the Port of Richmond probably would not have approved the upcoming deepening project if their share of project costs were 25 to 40 percent higher than the current estimate. Further, the local sponsor's maintenance dredging costs for everything except federal channels potentially could increase 25 to 40 percent if Alternative #3 were implemented.

5 In summary, the goals presented in the LTMS Draft EIS-EIR could significantly increase dredging costs for Bay Area users, thereby adversely affecting their competitive position. When competitive positions are jeopardized, jobs and economic viability are also jeopardized. Obviously, something must be done to make the playing field level -- to make sure that the competitive positions of the Bay Area ports vis-a-vis other west coast ports and other Bay Area ports are not jeopardized. But the Draft EIS-EIR does not address this issue in a satisfactory manner. In fact, the issue will not be addressed until the development of the implementation plan after the EIS-EIR is approved. By that time it may be too late. Are the ports expected to "grin and bear it?" Is there some sort of cost sharing plan to equalize costs? Will the implementation of Alternatives #1, #2 and #3 be delayed until suitable, low cost upland sites become available? Since the potential inequities associated with Alternative #3 could be economically disastrous and since the steps the Corps, BCDC and others will take to minimize or avoid these inequities are unknown at this time, I believe it would be foolish to approve the Draft EIS-EIR at this time. I believe the only logical approach would be to postpone approval of the Draft EIS-EIR until the implementation plan has been developed and approved. I urgently urge the Corps, BCDC, EPA and the other involved agencies to adopt this course of action.

Sincerely,



Douglass S. Lathrop

Responses to Douglass S. Lathrop, letter dated July 19, 1996

1. Please see the response to Oakland comment 12, GGAS comment 27, and TMG comment 1. Please see also the response to CBFA comments 3 and 4. See also the new discussion of the transition to Alternative 3 (Chapter 6) in the Final EIS/EIR (Chapter 6).
2. Under WRDA '96, the local sponsor still pays for Lands, Easements, Rights-of-Way, Relocations, and Disposal Sites (LERRDS), and can receive a credit of up to 10 percent of total project cost. Construction on the upland disposal area (under WRDA '86, 100 percent paid by local sponsor) is now considered part of total project cost, and is cost-shared between the federal and non-federal entities (who pay between 20 and 60 percent of the total cost based on the depth of the dredging project). Unfortunately, according to COE regulations, the upland disposal area would have to be considered part of the NED plan, unless specifically authorized otherwise. If neither ocean nor in-Bay disposal were available due to opposition by regulatory agencies, then the COE would be forced to use upland disposal and any additional costs would be the responsibility of the local sponsor if this is not the NED plan.

The Sonoma Baylands Wetlands Demonstration Project was specifically authorized and directed by Congress to be built for "aquatic habitat restoration (i.e., restored tidal marsh) purposes where it can be justified." This type of environmental restoration project involves cost-sharing of 75 percent federal/25 percent non-federal, and it did not depend on the depth of a specific dredging project to determine the costs. It was determined later that suitable dredged material from the Oakland Harbor 42-foot deepening project could be placed there for environmental restoration purposes. Congressionally-authorized restoration projects help make UWR more practicable for the non-federal entity, but are often hard to find. LTMS is working on ways to make UWR more practicable to implement. The implementation of the "transition to Alternative 3" for LTMS will be addressed in the Management Plan.

Please see section 4.6.2.1 of the EIS/EIR for a definition of small dredgers and section 6.5.7 for a discussion regarding the LTMS small dredger policy.
3. Table 6.2-2 provides unit cost estimates for testing, mobilization, dredging, transport, placement, and rehandling activities for the in-Bay, ocean, and upland/wetland reuse alternatives. Transport for upland/wetland reuse is estimated to cost between \$2.12 and \$5.99 per cubic yard. The costs depend on whether the dredged material is intended for use in tidal, levee, or landfill projects, and whether the dredging work is considered maintenance, new work, or small dredge. Transport for in-Bay and Ocean disposal is estimated to cost between \$1.21 and \$6.62. However, there are placement and rehandling costs for upland/wetland reuse options that are not a factor for the in-Bay and ocean disposal alternatives.
4. This is a possibility if no other financial mechanisms are in place. However, the brief economic analysis in the Draft EIS/EIR is a "relative" analysis to compare the potential differences between the alternatives is not an estimate of any specific project's actual costs. It is likely that as more UWR sites become available, the costs for upland disposal will decline with increased experience in upland site development and management. In addition, the small dredger policy, which is intended to reserve some of the available capacity at the least expensive disposal sites or UWR sites, is expected to minimize economic impacts on small dredgers. The "practicability test" in the Clean Water Act 404(b)(1) Guidelines (40 CFR Part 230) would be used to determine the economic impacts of the various alternatives.
5. Please see the response to CBFA comments 3 and 4. Please see also the response to Oakland comment 12, GGAS comment 27, and TMG comment 1.

Chapter 6 has been expanded to include more discussion about how the “transition” from current conditions to partial, and then full, implementation of Alternative 3 can occur. Please see the response to Oakland comment 12 and TMG comment 1.



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY

REGION IX

75 Hawthorne Street
San Francisco, CA 94105-3901

October 16, 1996

MEMORANDUM

Subject: Additional Comment Received on LTMS draft EIS/EIR

From: Brian D. Ross 
EPA Dredging & Sediment Management Team

To: LTMS Management Committee

Dear Management Committee Member:

Please add the enclosed comment letter to your binder of comments on the LTMS draft EIS/EIR, under the heading "Other Groups and Individuals". This comment letter proposes beneficial reuse of dredged material to construct an island in South San Francisco Bay, for the dual purpose of shelter for boaters and habitat for birds and other wildlife.

Although this comment letter was received well after the formal close of the comment period, we have advised the sender that it would still be accepted and addressed in the response to comments section of the final LTMS EIS/EIR.

TO BRIAN ROSS.
E. P. A.

JOHN PADNEY
211 B W 36 AVE.
SAN MATEO
CA 94403.

15 OCT 96.

REF TELECON 15 OCT 96.

Dear Mr Ross,

I would like to
introduce the following comments
& attachments for the requests
in DRAFT NTMS EIS/EIR.

1 It concerns the South Bay
Boating community & the South
Bay Yacht Club seeing a need
for some form of a Shelter
Island in the South Bay.

Angel Island - the only "Boat in"
Park is way overcrowded &
South Bay boaters after a long
vail find no space available.

We also think that
such an Island could comprise
a Bird Refuge & Wetland Area.

With modern thinking
it should help to solve the
Redwood City Harbour dredge
disposal.

Sincerely John Padney

SEE ATT.

R-728



PORT OF REDWOOD CITY
San Francisco Bay

175 E. 34th Avenue
Redwood City, California 94063
415-306-4150 FAX 415-369-7636

September 27, 1996

Mr. John Padley
211 B W 36 Avenue
San Mateo, CA 94403

Dear Mr. Padley:

Commissioner Smith has shared your communication regarding "San Bruno Island" with me and the other Commissioners.

The Port of Redwood City is acutely aware that there are no convenient beneficial reuse sites in the South Bay to accommodate dredged spoils from Redwood City dredging projects. We have expressed our concern in this regard to the various agencies which comprise the Long Term Management Strategy for the Placement of Dredged Material in the San Francisco Bay Region (LTMS), and hope that establishing such sites in the South Bay will become a priority for the LTMS.

The Port would enthusiastically support projects such as the one described in your letter and enclosed article. It is unfortunate, however, that a myriad of Federal, State and local environmental regulations make undertaking such projects very difficult, timely and costly -- other issues which the Port has addressed in its LTMS comments. If you have not already done so, I would recommend that you contact Steven Goldbeck at the Bay Conservation and Development Commission (BCDC) at 415-557-3686, and Brian Ross at the Environmental Protection Agency (EPA) at 415-744-1979 to discuss the San Bruno Island project. I think you will find them both to be excellent resources. Furthermore, Brian Ross, the key LTMS contact person on this issue, advises that the LTMS comment period is still open, and that the San Bruno Island project could be considered under LTMS.

We would very much like to be kept aware of any developments. Please contact me at 415-306-4150 if you would like to discuss this further.

Sincerely,

Michael J. Gari, Executive Director

cc: Steven Goldbeck, BCDC
Brian Ross, EPA

Our Annual Marine Swap Meet and Cruiser's Party

will be held on
Sunday October 18.

Only about 80 swap meet spaces so book yours early. I spend \$1,000s advertising this event and those of you that have been to my other swap meets know what a success this swap meet is. The cruiser's party is for those of you that are OUTWARD-BOUND. Come by car or anchor at the free anchorage and dinghy to our dock. We'll cook up a couple 100 pounds of pork and maybe set a new record for kegs of beer consumed. Meet fellow cruisers, swap radio call letters and sea stories. Space at Josh Slocum's Restaurant limits us to about 200 so call the store cuz reservations are a MUST. Summers slipping by and soon many of you will be Mexico bound. We stock Mexican charts and all the good cruising guides. Trade in what you don't need for MINNEY MONEY and then purchase the items you want. Thanks to you we're having a great year.

— Ernie Minney

MINNEY'S YACHT SURPLUS

2537 West Coast Highway, Newport Beach, CA 92663
(714) 548-4192 • (714) 548-4191

Latitude 38 Presents:

Jim & Diana Jessie	Sat., Sept. 12	1 pm - 4 pm
Shimon Van Collie	Sun., Sept. 13	12 pm - 3 pm
Pam Healy	Mon., Sept. 14	10 am - 12 pm
Russell Long	Wed., Sept. 16	12 pm - 2 pm
John Jourdane	Wed., Sept. 16	2 pm - 6 pm
Carl Schumacher	Sat., Sept. 19	12 pm - 3 pm
Peter Hogg	Sat., Sept. 19	3 pm - 6 pm
Harry Braun	Sat., Sept. 20	12 pm - 3 pm

All at our booth (#171, near the exit to the marina)
at the Fall In-the-Water Boat Show

Also: Compete to be the Bay Area's fastest
team on a 'coffee grinder' winch —
with the Mount Gay Rum grinding machine.

(At Scott's Seafood Rum Hut)

Jack London Square • September 12 - 20

(for more information see "Sightings")

LETTERS

so claims Lin Pardey." Lorraine and I have spent the last 14 ...ths refurbishing our Angleman Seawitch ketch *Southern Cross*. We used at least 30 sleeves of ...aper, the majority of which was 220 grit. Whether adding a second coat of paint or another coat of varnish, all that is needed is what we call "scuff and wipe". Thoroughly dull the surface with 220 — we used 280 in the cabin — and wipe with a tack rag. Heavier grit, such as 180, leaves deep scratches and is too coarse for most primers. Further, many modern products like the Pettit EasyPoxxy we used throughout *Southern Cross*, are better if applied in multiple thin coats, and 180 may cut right through. Incidentally, we prefer frecut, the 'white stuff', to 'production' sandpaper.

P.S. If all goes perfectly, we hope to be unplugged from the system and cruising again (finally) by next spring. We hope to make San Francisco Bay our first destination before heading for the South Pacific.

Robert J. Coleman
San Diego

Readers — Rob and Lorraine Coleman sailed out of Berkeley Marina aboard their Columbia 30 Samba Pa Ti about 10 years ago, cruised Mexico for a couple of years, and then returned to San Diego to rebuild the cruising kitty. In the meantime they sold their relatively low maintenance Columbia for the very high maintenance Angleman ketch. Someday we're going to get around to asking them why.

↓↑ ISLAND IN THE STORM

During a recent trip to Treasure Island, I visited the Navy's Marine Museum. In the small cinema I saw a film about the creation of Treasure Island as a site for the 1939 World's Fair.

The United States was in the Great Depression then, but even so, both the country and San Francisco must have been in a ... mood. For it was during this same era that the Golden Gate ... Bridges were built.

I think we need to regain a little bit of that can-do spirit. For a start, how about creating an island in the South Bay? At San Bruno Shoal, for example. It would give us South Bay boaters a destination for short day trips. It would also give the dredgers a place to dump spoils until the government figures out where to dump them next.

On the north side of the island there would be a salt marsh and nature preserve. The southeast side would offer a lee for anchoring and 'boat-in' park — like the old Mandaville Tip. Such an island would help relieve the crowding at Angel Island.

I'm sure you can think of lots of other advantages.

J. Padley
Sea Star
San Mateo

J. — It makes no difference whether or not your idea might have ultimate merit or not, as it's politically incorrect to even voice such a suggestion. The minute you proposed it, you'd be required to run the gauntlet of 350 government agencies, battle scores of 'ecological' groups and spend years in court fending off lawsuits. This is particularly true since your idea includes an aspect that might afford some pleasure to 'rich yachties' — a notion that would drive a small but vocal segment of the population berserk with hatred.

If you're going to retain your sanity, you've got to realize that this is the 'can't do' era, in which individuals and small groups derive orgasmic pleasure from thwarting all large dreams and aspirations. You can't even fart anymore without filing an environmental impact report, submitting samples to the BCDC staff and spending a year in court.

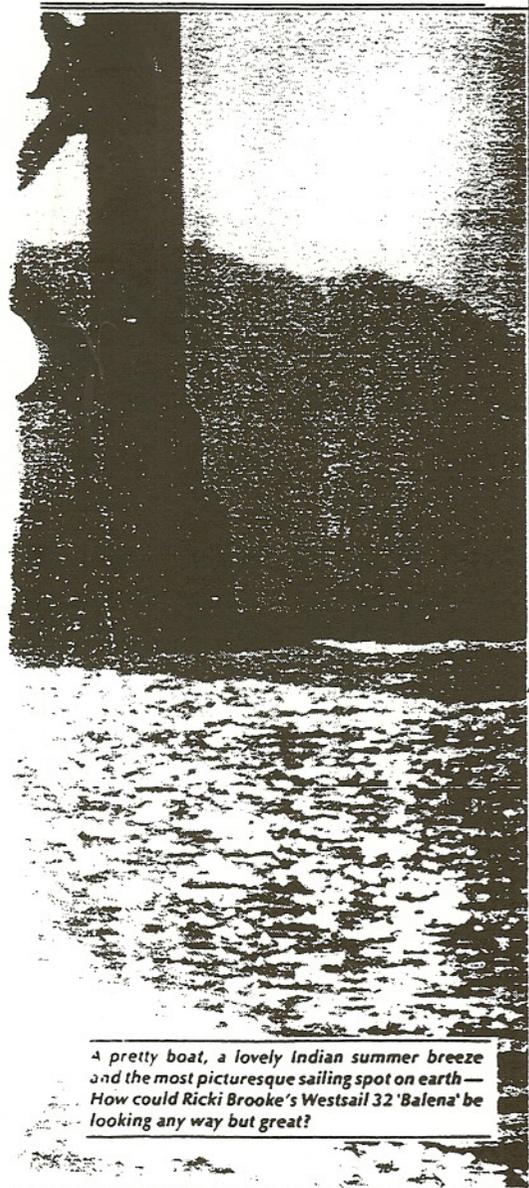
The Golden Gate Bridge, the Bay Bridge, Treasure Island University of California, Stanford — as beneficial as they all are ... could be built today.

It's really a shame, because we think ideas like yours are worthy of at least serious consideration.

— cont'd

response to the report of a small private aircraft ditching into the ocean halfway between Catalina and the mainland. The cutter *Tybee* recovered one of three people aboard the plane.

October 7 — Two speedboat operators, apparently thinking no one else would be around just before dawn, came speeding around a bend in the Delta and slammed into each other. One person was killed, three others were injured, one critically. The two with lesser injuries were transported to shoreside ambulances by good samaritan boats, while the critically injured person was medevac'ed out by Coast Guard helicopter.



A pretty boat, a lovely Indian summer breeze and the most picturesque sailing spot on earth — How could Ricki Brooke's Westsail 32 'Balena' be looking any way but great?

LATITUDE

shorts — cont'd

surge inundated the low-lying delta areas of that impoverished country. Because people quickly returned to the area, subsequent cyclonic typhoons have taken thousands of additional lives.

ALEXANDRIA, EGYPT — Battling high winds and waves, a team of French and Egyptian archaeologists managed to haul a 2,000-year-old statue from the depths off this ancient port. The group hopes to recover hundreds of other Egyptian and Greek statues which are in pieces off the coast of the city built by Alexander the Great. The holy grail of the project: recover at least part of the gigantic white marble Pharos Lighthouse that was one of the seven wonders of the world.

Extra credit quiz: What are/were the Seven Wonders of the Ancient World?

SAN DIEGO — As hideous a thought as it might be, we might as well face up to the fact: 1996 is an election year. Steel yourself now for the onslaught of lies, slander, mudslinging and hollow, puppet promises that pass for campaigning these days.

A bright spot in the madness has to do with sailing. As an adjunct to the Republican National Convention, which will be held in San Diego in August of 1996, the city's tallship *Star of India* will set sail once again.

The steel-hulled *Star*, which celebrates her 132nd birthday about a week after election day next November, has sailed only six times since she was towed to San Diego in 1927. The first time was in 1976 as part of the bicentennial celebration. The *San Diego Union* reported that half a million people turned out to see the spectacle.

Since then, *Star* has spread her 17 or so sails in 1984, 1986, 1989 and twice in 1993. The tentative schedule for 1996 is for the ship to sail on August 10 and 18, pending the success of fundraising now in progress. It costs roughly \$100,000 to sail the ship, about half of which has already been pledged. If you feel compelled to help them meet the goal, send donations to "I Want to Help Sail *Star*", c/o San Diego Maritime Museum, 1306 Harbor Dr., San Diego, CA 92101. For more information, contact, the Maritime Museum at (619) 234-9153.

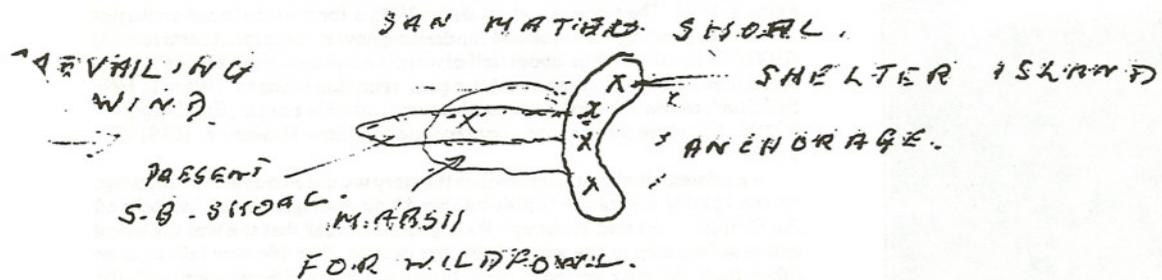
In a related bit of news, remember the story we did a couple of months ago on the ignoble end of the British tallship *Maria Asumpta*, which hit rocks off the Cornish coast and broke up? If so, you may recall that she was the oldest active sailing ship in the world. With her demise, that title now falls to none other than the *Star of India*. And how's this for a tidy wrapup with the presidential election: *Star* was launched on the Isle of Man in 1863, just five days before Abraham Lincoln gave the Gettysburg address.

SAN BRUNO ISLAND — If that landmark has you scratching your head and pulling out your charts, don't bother. There is no San Bruno Island — yet. But if boaters in the South Bay have anything to say about it, there may one day be a recreational destination island on what is now the San Bruno Shoal.

The idea, proposed most audibly in the past few years by members of the Peninsula YC, has a lot of merit. In its present state, the shoal isn't useful for much. But as an island, it could feature a natural salt march habitat on the north side, and a boat-in park on the protected side, where sailors could anchor and picnic ashore. As well as relieving crowding on Angel Island, the place would offer South Bay boaters a destination for short day trips. Materials to 'build' the island could easily come from dredging spoils.

The idea for the island has actually been around for a number of years, but John Padley and a core support group at the Peninsula YC think its time to give it a little publicity again. This time, they're hoping to spur enough interest from other South Bay yacht clubs and other boating-oriented organizations to get the project, well, 'off the ground' so to speak.

We think this is a great idea and wish them the best of luck. However, as we noted in response to a letter on this very subject in our September, 1992, issue, the hoops that would have to be jumped through to see a project like this through to completion are many. To underline the ridiculousness of the current situation, if planners had to go through the same rigamarole in the late '30s that they had to today, San Francisco Bay would almost surely not have Treasure Island, the Bay Bridge or the Golden Gate.



CHANGES
MARKERS

5

6

Responses to John Padley, letter dated October 15, 1996

1. Statement noted. Developing a wildlife refuge and boaters' shelter island on San Bruno Shoal with dredged material has not been proposed as an in-Bay disposal site. A site-specific EIS/EIR would be required to implement this proposal and a variety of environmental concerns would be associated with its development.

W-3-3
Rec'd 5-28-96
LTM S
-BR

20 May 1996

U.S. Environmental Protection Agency
75 Hawthorne
San Francisco, Calif. 94105

Subject: San Francisco Bay Dredging Options

I would like to suggest an option for consideration that would add to the wildlife habitat living area while meeting the goals of silt removal from channels within the Bay. | 1

As the channels are cleared of silt this excess material would be dumped onto extremely shallow areas "in" the Bay, as opposed to the edges of the Bay, to create islands for marine wildlife. Grasses and plants would grow on the islands providing cover in which bird and marine mammals could raise their young unmolested by humans or domesticated pets. | 2

The islands would also be a signal to all sailing vessels that they were leaving the deeper channels and were approaching very shallow areas. Areas in which their boats might become stuck during all but high tides.

By charting the flow of tides in the Bay, models can be constructed which would allow the islands to not inhibit nor impede the flow of moving water which cleanses the Bay. In fact, the channeling and placement of islands in strategically located shallow areas might improve the flow of water from the entry point of the ocean to the farthest reaches in the south Bay. | 3

I would like this suggestion to be included in the Public Comments and would like to hear from you should you require further clarification.

Sincerely
Karl J. Schiavo
Karl J. Schiavo
15145 San Pablo Ave.
San Jose, Calif. 95127

Responses to Karl J. Schiavo, letter dated May 20, 1996

1. Statement noted.
2. Statement noted. Please see the response to Padley comment 1.
3. Statement noted. Please see the response to Padley comment 1.

1512 Fair Oaks Court
Santa Rosa, CA, 95404

LTMS EIS/EIR Coordinator
c/o U.S. Environmental Protection Agency
Region 9 (W-3-3)
75 Hawthorne St. San Francisco CA, 94947

July 17, 1996

Dear LTMS EIS/EIR Coordinator:

I am grateful for this chance to comment on the "Long Term Management Strategy for the Placement of Dredged Material In The San Francisco Bay Region Draft EIR/EIS".

There are many omissions and flaws in the draft EIS/DEIR and should be re-written before finalizing the document, such as:

1. Seasonal Wetlands are desperately needed by waterfowl + other wildlife. The birds need these - in addition to tidal wetlands. To destroy over 7,000 acres of seasonal wetlands is totally unacceptable. The document does not discuss any mitigation measures for this loss.

2. Spring and Fall Salmon runs were not discussed in the DEIS/DEIR. These runs are declining in alarming numbers and should be considered along with the declining winter run salmon.

3. The in-bay dredge disposal effect on breeding birds has not adequately been discussed. Since dredge disposal cause fish to leave an area during the disposal, what can breeding birds feed on? More study is needed.

I strongly request you to rewrite this DEIS/DEIR and respond to the above concerns as well as many others.

Sincerely,

Ernestine J. Smith

Responses to Ernestine J. Smith, letter dated July 17, 1996

1. Statement noted. Please see responses to specific comments below.
2. In regard to compensatory mitigation, please see the responses to DOI comments 10a and 10b, and OAS comment 7 regarding mitigation for seasonal wetland habitat loss. Please note that the Final EIS/EIR has been revised to include provisions for compensatory mitigation for lost seasonal wetland habitat functions not augmented by tidal wetland restoration efforts (see section 5.1.2.1 and Table 5.1-4).
3. Please see the response to MAS comment 18c.
4. Statement noted. Please see the response to DOI comment 24.
5. Statement noted. The Final EIS/EIR contains text changes, where appropriate, and additional information is provided in the responses to comments.

July 17, 1996

LTMS EIS/EIR Coordinator
c/o U.S. Environmental Protection Agency
Region 9 (W-3-3)
75 Hawthorne Street
San Francisco, CA. 94947

Subject: Long term management strategy (LTMS) for
dredge disposal DEIR/DEIS

Dear LTMS EIS/EIR Coordinator:

Included herein are my comments on subject.

Introduction

About 40 years ago the people of the San Francisco Bay Area began the battle to protect the integrity of the Bay, its tidelands and marshlands (including diked former tidelands and associated marshes). Some of the Goals were, 1) to decrease or stop the filling of the Bay's marshes and tidelands, 2) to increase the tidal prism of the Bay, 3) to increase the surface area of the San Francisco Bay-Estuary, and 4) to improve water quality for all beneficial uses.

The State's tide and submerged lands and beds of San Francisco Bay are held in trust for commerce, navigation and fisheries for all the people of the state (Mark V. Whitney, (1971) 6 Cal. 3d. 251). This held in trust extends to the full extent of tidal flow. This was true when California entered the Union on September 9, 1850. Courts have held that reclamation of sovereign lands does not terminate the sovereign title or trust interests (City of Long Beach v. Mansell, 1970, 3 Cal. 3d 426). In addition the sale of tidelands to private parties or Legislative grants of tidelands does not eliminate trust interests or the obligation of public trust protection.

Specific Comments

The DEIS/DEIR is a reasonable start, however, because of the many major issues that are either ignored or in adequately treated, the document should be redone and then sent out for public comment. It also may be time to rethink the totality of the undertaking and what is to be accomplished. The next 2 to 3 generations of Bay Area residents need to be guaranteed that the entire Bay-Estuary ecosystem will be protected and not turned over to the navigation industry as a cheap location to dump spoil of any type.

2 | The DEIS/DEIR violates the intent of CEQA and NEPA by not including compensatory mitigation for the proposed impacts to seasonal wetlands. The values of such areas are viable components of the Bay-Estuary ecosystem and should not be written off or traded away. Presently the LTMS does not propose compensatory mitigation for lost seasonal wetlands. Mitigation of values lost must be a part of the overall equation. Providing mitigation is a cost of doing business.

3 | The difference between upland disposal and wetland disposal must be clearly described and type locations identified. Using spoil to improve agricultural lands in the Delta may be reasonable under selected conditions. Using the material to cap landfill may be reasonable. But to use spoil to improve diked Baylands is difficult to swallow. Diked Baylands are wetlands.

I have great difficulty understanding that before restoring diked marshlands to tidal action, one has to destroy them to save them. An adequately sized breach in several dikes to match the drainage patterns and then let tidal currents and natural deposition do the restoration, is the logical way to go. The fine sediments and nutrients will gradually collect in low spots and root masses. As these materials collect, the marsh plants will gradually expand their own root mass and tidal currents will work at restoring drainage patterns. Invertebrate communities will follow with the sediment and nutrients to colonize the area.

4 | The overall restoration effort must be to develop an integrated tidal marsh having ecological functions that can benefit as many species and have as many values as possible, i.e. a diversity of fish, mammals, birds, and invertebrates as well as increasing the surface area and tidal prism of the San Francisco Bay-Estuary.

5 | The LTMS is based on a 50 year planning period. While this grants some certainty to the dredge spoilers, it puts an awful lot of the Bay ecosystem at risk. Local planning is usually for a 10 to 20 year period. Review points are made a part of the plans (Bay-Delta standards are reviewed every 3 years). Technological advances, a better understanding of biological / chemical interactions, new biological information, economics and port competition outside the area could seriously alter the LTMS process.

6 | The DEIR/DEIS must consider all fish and wildlife species found or known to utilize the Bay ecosystem. Anadromous fish such as the 4 races of chinook salmon (the winter run is listed as Endangered under the Federal ESA) must be considered. For example water quality impacts at the

dredging location and at the location of the decant can impact the seaward migration of such species.

↑ 6

The LTMS suggests that only clean material will be spoiled on such areas. Bottom materials (muds and sands) from the Oakland or Richmond Harbors are almost sure to contain materials that are above reasonable safety standards. For example, the old United Heckathorn site, (now a Super Fund site) was located along the Richmond Inner Harbor, once processed DDT for shipment. Where are the contaminated spoil to be dumped or processed? Are the spent hydraulic fluids to be sampled for chemicals, metals or other contaminants harmful to water quality or aquatic life?

7

Ocean disposal should be used for as much of the dredged spoil as reasonably possible. While there may be many unknowns to what happens in the ocean when this material is dispersed over a wide area, it is better there (30 to 50 miles off shore than building landfill monuments with all the known and unknown liabilities in our backyards.

8

In the past restoration/mitigation areas along with their maintenance and associated costs became a tax payer burden as entities pawned such locations off to local, regional or state agencies to manage. A mitigation/restoration project is a perpetual obligation of the project sponsor. It is not to be pawned off to an entity without ample funds (start up funds and a trust account) to cover long term costs. The project sponsor retains responsibility for the site into perpetuity. Other information is needed so the public is not stuck with the bill. For example, 1) What are the long term management plans for this property?, 2) Who or what agency will be responsible for this activity?, 3) Who is to provide the funds to cover the long term operation and maintenance of this property?, 4) What is the present and long term monitoring program for this restoration activity? 5) Who or what agency will be responsible for clean up or other remedial action?

9

General Comments

Without dikes the Bay's tidal wetlands would be flooded to the fullest extent of tidal flow and drained by the next receding tide. Land subsidence, drying and oxidation has resulted in the land inboard of the dikes being lower than the wetlands bayward of the dikes. Many of the areas behind dikes were farmed for a long time. They also provided valuable environmental amenities. There was little or no complaint from the public about such use. Complaints came when the land was sold for uses not compatible or consistent with trust uses. In *People v. Kerber* the California Court

stated "The public is not to lose its rights through the negligence of its agents, nor because it has chosen to resist encroachment by one of its own number, whose duty it was, as much as that of every other citizen, to protect the state in its rights" (People v. Kerber (1908) 152 Cal. 731, 732-736, 93 Pac. 878) in Cal Trout v. State Water Resources Control Board (1989) 207 Cal App. 3d 585.

- 10 | The Sonoma Baylands restoration project has been described as a demonstration project for using dredge spoil to restore wetlands. It has been described by some as a forerunner of things to come under LTMS. What is the status of the Sonoma Baylands demonstration project? The degree of success or failure should be documented and reported. For example, where are the reports documenting the progress of revegetation and recolonization by invertebrates? What was the rate of sediment deposition? What plants were first to establish? What animal species were first to establish in the area? What is the rate of recolonization. For example sterile or contaminated sand may actually work against restoration, i.e. slow it down. What is the duration of the studies to document the viability of any marsh established at Sonoma Baylands or any other location? Does anyone have any idea when stability of the marsh ecosystem is attained? The Odum brothers (Howard and Eugene) have indicated that this may take 10 to 18 years depending on site, sediment and nutrient inflow, colonization rates, etc..

Marsh restoration projects (Mother Nature plus failed local action) has resulted in at least one notable marsh restoration. The location is the White Slough area of the Napa River near the City of Vallejo. This area was behind dikes. It was a heavily degraded pasture that was strewn with debris of organic and inorganic origin. Dikes along the Napa River protected the area from tidal inundation. The area was proposed for urban development. During the middle 1970's (about 1976) the levee was breached in several locations by a storm event and tidal flow was restored to the area. There was much hue and cry about the need to restore the levee to protect the valuable land from flooding. There were people who said this area would never amount to much of a tidal or brackish marshland.

Today, without the help of dredge spoil, but with the help of the rise and fall of the tide, natural sediment deposition and the natural processes of plant and animal colonization, this once degraded environmental setting is now a viable brackish tidal marsh. Drainage patterns have re-established at their former locations. It should not come as a surprise to anyone what nature can do with little

help. The White Slough marsh has been a viable and diverse brackish marsh ecosystem for the last 12 to 14 years.

The gradual recovery of the White Slough area, including not just visible vegetation, but the marsh flora and fauna communities, which really make a marsh viable and an ecologically valuable component of the San Francisco Bay ecosystem. This recovery did not cost the tax-payer a direct penny, natural processes did all the work.

According to the report Sonoma Baylands Enhancement project: Technical Studies (Table A

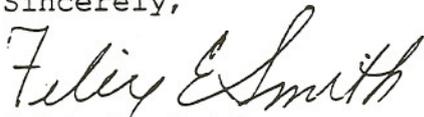
1) 3 or more feet of sediment has been deposited in the basins of the Port of Sonoma in just a couple of years. The rapid sedimentation of the Port of Sonoma indicates that there is a great supply of suspended materials looking for a place to sit and become the base for a viable marsh. Clearly the addition of sterile, sandy or contaminated dredged sediments to bring some of the site up to grade is not necessary.

Is the LTMS and its marsh restoration activity a project to see how many tax dollars can be spent or how many tax dollars can be saved through the initiation of such marsh restoration projects using dredged spoils, other waste materials and by natural processes? | 11

All the above considerations lead me to believe in letting natural tidal, ecological and biological processes do most of the marsh restoration work is the most cost effective way to go. It provides the best least costly way to accomplish marsh / wetland restoration. The engineering tasks associated with assuring that adequate tidal action and the sediment load is sufficient to accelerate the restoration process, are critical to the overall process. | 12

Thank you for allowing me to provide these comments.

Sincerely,



Felix E. Smith
4720 Talus Way
Carmichael, CA 95608

cc:Interested parties

c:ltmseisx.doc 7/17/96

Responses to Felix E. Smith, letter dated July 17, 1996

1. In response to the comment that the EIS/EIR is inadequate, the LTMS agencies believe that the discussions and evaluations presented in the EIS/EIR are adequate and appropriate for the programmatic decisions being made at this time.

In response to the comment that the whole premise of the LTMS needs to be rethought, please see the new discussion of the transition to Alternative 3 (Chapter 6), specifically regarding the fact that the LTMS agencies have incorporated Management Plan reviews. Revisions to the Management Plan will be made, as needed, every 3 years. Every 6 years a major programmatic review of and revisions to the Management Plan will be undertaken. In addition, on a 6-year cycle, any necessary amendments to the San Francisco Bay and Basin Plans will be initiated.

Please see the response to GGAS comment 27. The LTMS agencies believe that a revised Draft EIS/EIR is not necessary.

2. In regard to compensatory mitigation, please see the responses to DOI comments 10a and 10b, and OAS comment 7 regarding mitigation for seasonal wetland habitat loss. Please note that the Final EIS/EIR has been revised to include provisions for compensatory mitigation for lost seasonal wetland habitat functions not augmented by tidal wetland restoration efforts (see section 5.1.2.1 and Table 5.1-4).
3. Section 4.4.5 discusses the potential benefits and impacts of using dredged material for habitat restoration; please also see Table 5.1-4. The need to use dredged material in specific restoration projects will be evaluated on a case-by-case basis. Some projects will not use dredged material in the restoration process. Also see the response to DOI comment 13.
4. Statement noted. Section 5.1.3.2 briefly outlines policies and guidelines for wetland restoration. This section notes that restoration should provide for a diversity of habitat values and enhance, as well as restore, the natural resources of the Bay Estuary.
5. Statement noted. Please see the response to BayKeeper comment 2a.
6. Statement noted. Please see the responses to DOI comment 24p and MAS comment 18c.
7. As section 3.2.6 explains, disposal opportunities for contaminated dredged material are currently limited to upland disposal in landfills, discharge into a confined upland site arranged for by the individual project sponsor (e.g., one that can be established on the sponsor's property) or, in some cases, reuse as fill in an otherwise approved construction project. Approaches to manage contaminated dredged material that have been used less frequently, or may be promising approaches for the future, include confined aquatic disposal (CAD), a variety of other confined upland disposal options, and treatment processes that would allow beneficial reuse or less restrictive disposal options of the contaminated materials.

As section 3.1.1.2 of the EIS/EIR explains, hydraulic dredges remove and transport sediment in liquid slurry form. The dredge equipment is usually barge-mounted and carries diesel- or electric-powered centrifugal pumps with discharge pipes ranging in diameter from 6 to 48 inches. The pump produces a vacuum on its intake side, which forces water and sediments through the suction pipe. The slurry is transported by pipeline to a disposal area. Hopper dredges are also included in the category of hydraulic dredges, although the dredged material is simply pumped into the self-contained hopper on the dredge or adjacent barge rather than through a pipeline.

Water quality at the dredging and disposal sites is a particularly important consideration in the choice of dredging equipment. Hydraulic dredging can virtually eliminate disturbance and resuspension of sediments at the dredging site. It is often the first choice when dredging in enclosed bodies of water or

near aquatic resources that would be especially sensitive to temporary increases in suspended solids or turbidity. However, because hydraulic dredging typically entrains additional water that is many times the volume of sediment removed, water management and water quality must be controlled at the disposal site.

Section 3.2.5 of the EIS/EIR outlines the testing of sediment that occurs for in-Bay, ocean, and upland disposal. Testing is required for a dredging project; once test results are reviewed, the appropriate disposal site is determined. More detail on the testing of sediment and review process for results is provided in section 3.2.5. Allowing overflow of hydraulic fluids (i.e., the dredged material slurry that results from hydraulic dredging methods) is determined on a project-by-project basis. In areas where water quality is a concern, overflow is not allowed at the dredging site. Instead, the slurry is transported with the dredged material to the approved disposal site and disposed. In areas where overflow may be acceptable, the slurry is tested on-site and discharged, if appropriate.

8. The basic trade-off of how much material should be placed in which environment is the main issue in the EIS/EIR. We believe Alternative 3 is the best mix overall. It includes the greatest amount of ocean disposal of any of the final alternatives retained for evaluation and also the greatest amount of upland/wetland reuse (UWR). It calls for the least amount of in-Bay disposal. This alternative reflects our findings that ocean disposal has less risk and fewer potential impacts than in-Bay disposal. However, UWR is a better choice than disposal as long as it is practicable and other significant adverse impacts can be avoided.
9. Properties that have benefited from environmental restoration projects (as well as some properties that have not been restored) are often turned over to governmental agencies or other public interest groups as a way of ensuring that they will stay in the public domain in perpetuity, and/or to satisfy other mitigation requirements. It is true that, when this happens, questions about the adequacy of the initial funding and the long-term responsibility for performance, operation, and maintenance and, if necessary, remediation must be carefully evaluated. Appropriate agencies (or other groups) may continue to accept such properties when they are satisfied that the completed "deal" is in the overall public interest or to its overall benefit.
10. Please see the response immediately above to Felix Smith comment 9.

Stability of the marsh ecosystem can be defined in a variety of ways. When such stability occurs will differ from site to site based on numerous factors, including the amount and physical properties of dredged material initially placed, consolidation rates of the dredged material, natural sedimentation rates at the site, and the design of the site (type of habitat being restored). The Sonoma Baylands Wetland Restoration Project site continues to develop. Additional information (e.g., monitoring reports) has been added to the Final EIS/EIR in regard to Sonoma Baylands (see Appendix K.2).
11. LTMS supports wetland and other habitat restoration using dredged material where appropriate, as an opportunity to both reduce cumulative risks and impacts of disposing of dredged material as a waste, and at the same time accelerate the restoration of important ecological values that have been severely reduced by human development activities over the last century. In so doing, the overall costs to society may often be less than if both activities (habitat restoration, and dredging and disposal) were undertaken independently. Natural processes can also be pursued for habitat restoration and, in fact, have been and continue to be used in the Bay Area. LTMS is not evaluating or pursuing the use of "other waste materials" for habitat restoration.
12. Based on the LTMS goal of reducing impacts to the environment associated with in-Bay dredged material disposal and the potential environmental benefits gained through the reuse of dredged material for wetland restoration, it is difficult to determine the relative value or cost-effectiveness of wetland restoration projects. For example, some of the potential large-scale environmental restoration projects (centered on the diked historic baylands) represent an opportunity to enlarge the Bay and its wetlands.

These types of projects may prove to be the most "expensive" projects, but they would also be able to accommodate millions of cubic yards of dredged material.

The Final EIS/EIR contains a description of the Sonoma Baylands Wetland Restoration Project, one example of a large-scale wetland restoration project (see Appendix K.2). Further analysis of this project and others will allow the LTMS agencies to continue to assess the success of restoration projects and potentially their cost-effectiveness in furthering the LTMS goals.

Informal or Related Informational Comments

Note: Since the following letters do not comment specifically on the LTMS Draft EIS/EIR, there are no responses to the comments in these letters.

Bancroft Library, University of California, Berkeley, letter dated May 15, 1996

Bay Planning Coalition, letter dated May 9, 1996

Historical Resources Information System, Northwest Information Center, Sonoma State University, letter dated May 24, 1996

San Francisco Bay Conservation and Development Commission, letter dated May 23, 1996



The Bancroft Library

UNIVERSITY OF CALIFORNIA BERKELEY, CALIFORNIA 94720-6000

TEL: 510 642-3781

FAX: 510 642-7589

May 15, 1996

United States Environmental Protection Agency
Region IX
75 Hawthorne Street
San Francisco, California 94105-3901

Dear United States Environmental Protection Agency:

We have received your gifts of the L.T.M.S. draft report for the placement of dredged material in the San Francisco Bay Region and the accompanying status report for July 1995. It is a welcome addition to the holdings of The Bancroft Library, and we appreciate your interest and generosity.

In accordance with an Internal Revenue Service ruling effective January 1, 1994, this letter certifies that the donor has received neither goods nor services in consideration for this gift.

Once again, we thank you for your support of Bancroft and its collections.

Sincerely,

D. Steven Black
Head, Acquisitions Division