

Harbor Safety Committee

of the San Francisco Bay Region

*Mandated by the California Oil Spill
Prevention and Response Act of 1990*

Harbor Safety Committee of the San Francisco Bay Region

Thursday, November 10, 2011

Port Commissioners Room, Port of San Francisco, San Francisco, California

Capt. Lynn Korwatch (M), Marine Exchange of the San Francisco Bay Region (Marine Exchange), Chair of the Harbor Safety Committee of the San Francisco Bay Region (HSC), called the meeting to order at 1004. **Alan Steinbrugge** (A), Marine Exchange, confirmed the presence of a quorum of the HSC.

Committee members (M) and alternates (A) in attendance with a vote: **Capt. Esam Amso** (A), Valero Marketing and Supply; **Jim Anderson** (M), California Dungeness Crab Task Force; **Margot Brown** (M), National Boating Federation; **Ron Chamberlain** (M); Port of Benicia; **Capt. Andy Cook** (M), Chevron Shipping; **Capt. John Cronin** (M), Matson Navigation; **Lt. Col. Torrey A. DiCiro** (M), US Army Corps of Engineers (USACE); **Capt. Noapose Fotu** (A), National Cargo Bureau; **Aaron Golbus** (M), Port of San Francisco; **Carol Keiper** (A), Oikonos Ecosystem Knowledge; **Capt. George Livingstone** (A); San Francisco Bar Pilots; **Jim McGrath** (M), Bay Conservation and Development Commission, (BCDC); **Capt. Jonathon Mendes** (M), Starlight Marine Services; **Capt. Pat Murphy** (M), Blue & Gold Fleet; **Chris Peterson** (M), Port of Oakland; **Capt. Ray Shipway** (A), International Organization of Masters, Mates, and Pilots; **Rich Smith** (M), Westar Marine Services; **Capt. Cynthia L. Stowe**, United States Coast Guard (USCG); **Gerry Wheaton** (M), National Oceanic and Atmospheric Administration (NOAA).

Alternates present, and those reporting to the HSC on agenda items: **Bob Chedsey**, California State Lands Commission (State Lands); **Capt. Jeff Cowan**, California Office of Spill Prevention and Response (OSPR); **Steve Danscuk**, USCG; **Derrick T. Dunlap**, USACE; **Jessica Burton Evans**, USACE, **Lt. Cmdr. DesaRae Janzen**, USCG; **Rob Lawrence**, USACE; **William Needham** (A), National Boating Federation; **Bill Nickson** (A), Transmarine Navigation; **Scott Schaeffer**, OSPR; **Linda Scourtis** (A), BCDC; **Lt. Cmdr. Jason Tama**, USCG.

The meetings are always open to the public.

Approval of the Minutes

A motion to accept the minutes was made and seconded. It passed without discussion or dissent. There was one abstention.

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Comments by the Chair – Capt. Korwatch

- **Capt. Korwatch** noted that she had previously served as chair of the HSC, and thanked **Schaeffer** for the opportunity to serve again. She said that she had big shoes to fill replacing **Joan Lundstrom**, past chair of the HSC.

Coast Guard Report – Capt. Stowe

- **Capt. Stowe** welcomed **Capt. Korwatch** back to the chair and said she was thrilled to have her there.
- There had been no breaches of security during the Occupy Oakland march on the port of Oakland that shut it down. The Area Maritime Security Committee will be discussing the topic at its next meeting.
- A kayaker had recently died after his craft was capsized by propeller wash from commercial operations. **Capt. Stowe** reminded commercial operators to remain vigilant for recreational boaters that sometimes seem to pop up out of nowhere. She also asked the Prevention Through People work group to see what they could do in the way of educating recreational boaters.
- The radar had been down at Yerba Buena Island but was expected to be back in service soon. **Capt. Stowe** thanked mariners for their cooperation during the outage.
- A Notice of Proposed Rule Making was being drafted to create the race control zone for the America's Cup events in 2012 and 2013. It was expected to be published in January and there would be a minimum thirty day comment period. The Marine Event Permit process continues.
- **Capt. Stowe** asked **Lt. Cmdr. Tama** to report on two items of interest:
- **Lt. Cmdr. Tama** said that the cause of the exploding refrigerated containers had been tracked to contaminated refrigerant used by a service facility in Vietnam. The Coast Guard was working with industry to track down the contaminated containers and isolate them for remediation. At the time of the meeting there were about one hundred containers in isolation at the Port of Oakland where they would remain until made safe.
- **Lt. Cmdr. Tama** said that the Vessel Traffic Service (VTS) had queried about five hundred ships on their fuel-switching tests and procedures. Sixty-five percent of the vessels contacted were conducting tests with low-sulfur fuel. Most ships were switching two hours before check-in with VTS. Of the ten ships that had lost propulsion during the query period all had tested with low sulfur fuel two and a half hours before check-in with VTS.

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John Hummer, Maritime Administration (MARAD), asked about whales. **Capt. Stowe** said there had been a lot of activity in Monterey with warning to recreational boaters to keep their distance. So far there had been little trouble with whales in the shipping lanes in Northern California.

West Coast Offshore Vessel Traffic Risk Management Project (WCOVTRM) – Danscuk

- Reviewed the history of the WCOVTRM which can also be found at http://www.oilspilltaskforce.org/notesreports/wcovtrm_report.htm. It had always be intended that there would be follow ups studies on the effectiveness of the WCOVTRM, and Automated Identification Systems (AIS) and Low Rate Information Transmission (LRIT) technology had finally made it possible to easily track the ships. Of the three to four percent of ships coming within the voluntary bounds most were doing so off headlands and off Half Moon Bay

Capt. Stowe asked whether any more reviews were scheduled. **Danscuk** said that none were but that it was possible that they could be.

Capt. Korwatch asked whether changes in technology since the WCOVTRM might bring new recommendations. **Danscuk** said that would be up to the British Columbia/Pacific States Task Force.

Anderson said that the areas where the ships were within the recommended distance was where commercial fishermen lost a lot of expensive fishing equipment.

- **Lt. Cmdr. Janzen** read from the Prevention/ Response report that is attached to these minutes.
- **Lt. Cmdr. Janzen** said that America's Cup events would be scheduled for the month of August in 2012 and would start Jul 4, 2013 and be over by September 22, 2013.
- **Lt. Cmdr. Janzen** encouraged everyone to attend the next briefing on fog sensor technology. She said that it would be very helpful to the Coast Guard to know whether or not the HSC would support the technology.

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US Army Corp of Engineers Report – Lt. Col. DiCiro

- USACE remains short of funds under existing budget conditions. They were attempting to adjust fiscal budgets and environmental dredge windows so that the Oakland channel could be dredged to fifty feet.
- Speed bumps in the channels had been discussed at their last value engineering meeting. Knock-down contracts to remove the bumps are an option being looked at.
- **Lawrence** read from a report that is attached to these minutes.
- **Dunlap** said that the debris removal program would run out of funds in March. There would be no more debris removal after the funds run out.

Capt. Shipway asked how debris removal was then funded. **Lt. Col DiCiro** said that the USACE was operating under a continuing resolution.

Peterson said that he would seek help from the Port of Oakland's Director of External Affairs. **Capt. Korwatch** said that the HSC would do what it could to support full funding. She said a chair for the Dredge Work Group would need to be found as soon as possible.

Wheaton asked how dredging for America's Cup facilities had been permitted. Lawrence said that the dredging was normal maintenance dredging at Pier 27. **Wheaton** expressed concern over the accuracy of the soundings. Lawrence said they were working with the Bar Pilots to get them timely pre- and post-dredge surveys to keep them aware of conditions.

Clearing House Report – Steinbrugge

- **Steinbrugge** read from a report that is attached to these minutes.

OSPR Report – Schaeffer

- **Schaeffer** said it was his policy to try to visit the HSC's a couple of times a year. He thanked **Capt. Korwatch** for volunteering to chair the HSC again. He thanked John Berge (M), Pacific Merchant Shipping Association; for serving as acting chair.
- **Charlton H. Bonham** had been appointed Director of California Fish and Game, OSPR's parent agency. **Bonham** had previously been director of the California chapter of Trout Unlimited. **Dr. Julie Yamamoto** is Acting Deputy Administrator of OSPR.

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- OSPR staff had participated in the response to the Montana pipeline oil spill under the terms of the Emergency Mutual Assistance Compact (EMAC). While there had been initial problems with implementing the Unified Command structure, those problems had been resolved with help from OSPR staff and the arrival of oil company responders from SeaRiver Marine who understand the practice.
- Global Diving and Salvage had been contracted to survey the sunken vessel *Montebello*. They were paid out of the Oil Spill Trust Fund. There was no oil remaining on board the vessel.
- OPSR continues to work the California Air Resources Board and the Coast Guard to resolve and prevent loss-of-propulsion incidents due to fuel switching. **Capt. Cowan's** paper on best practices had been reprinted twenty times and he had been invited to speak at an industry conference in Denmark.
- The West Coast Summit of California HSC's with invitations to the representatives of HSC's from Washington, Oregon, and Hawaii will become an annual event.
- Assembly Bill 1112 which had recently become law will require audits of OSPR. OSPR had last been audited in 2008. At that time fifteen recommendations were made for OSPR to become more efficient and OSPR had subsequently met all fifteen recommendations. The new audits will be conducted by the California State Auditor and the California Department of Finance. The goal is to make sure that taxes are spent efficiently.
- Under AB 1112 OSPR will increase monitoring of transfers at anchorage and require more drills for bunker companies as well as for responder companies.
- The British Columbia/Pacific States Oil Spill Task Force has agreed to participate in the update of the training video on best practices for fuel transfers. Face to face meetings have been identified as a very important best practice. OSPR will monitor industry adoption of best practices before considering regulations or legislation.
- The amount of money available for the Oiled Wildlife Care Network is declining as interest from the Oil Spill Response Fund declines.
- OSPR has an inland spill response mandate, but no funding to respond.
- OPSR has been an active participant in EMAC for the Deepwater Horizon and Montana spills. Many other states did not. It can't be known who would participate if California needed help.

Capt. Korwatch asked about the status of proposed changes to escort regulations in Los Angeles/ Long Beach. **Schaeffer** said that **Mike Coyne**, OSPR, could brief the HSC at its next meeting.

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State Lands Report – Chedsey

- Read from a report that is attached to these minutes.
- A customer service meeting was scheduled for late November.
- The biennial Prevention First symposium has been scheduled for October 2012.

NOAA Report – Wheaton

- NOAA has mandated that the National Ocean Service and Geodetic Survey work together to create new products for users. Among the ideas that have been suggested for Bay Area users are studies of marine debris circulation, examination of the effect of sea level rise on bridge clearances, and the combination of Coast Pilot information with chart information in an internet product. NOAA is very interested in product ideas from users.
- The weather was expected to be cold and rainy.

Capt. Korwatch said that the eastward movement of debris from the Japanese tsunami had been raised at the HSC summit. She requested NOAA to provide a briefing on the eastward progress and possible impact of the debris.

Tug Work Group – Capt. Mendes

- **Capt Mendes** said that a great deal of effort had gone into the Bunkering Best Maritime Practices proposal that the HSC was considering. He said that as a part of the Harbor Safety Plan it could be updated or amended yearly based on lessons learned.

McGrath asked whether lessons learned had been factored into the proposal and whether the work group had coordinated with the Water Quality Control Board. **Capt. Mendes** said that the lessons learned were from the examination of the *Dubai Star* spill where it was determined that the spill would likely not have happened had existing regulations been followed. **Capt. Mendes** said there was no coordination with the Water Quality Control Board.

Capt. Korwatch asked for a motion to approve the Bunkering Best Maritime Practices for inclusion in the *Harbor Safety Plan*. The motion was made and seconded. It passed unanimously.

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Capt. Korwatch thanked **Capt. Mendes** and all participants in the process for their effort and said they should be proud of the job they had done. **Capt. Mendes** offered his thanks and said that it had been a great experience.

Navigation Work Group – Livingstone

- There was nothing to report.

Ferry Operation Work Group – Capt. Murphy

- There was nothing to report.

Dredge Issues and Physical Oceanographic Real Time System (PORTS) Work Groups –

- There was no report.

Prevention through People Work Group – Brown

- **Brown** asked for as many details as the Coast Guard could provide on the death of the kayaker described in the Coast Guard report. She said it would be useful if they could talk to any witnesses. **Capt. Stowe** said that they would comply to the limits of the regulations. **Lt. Cmdr. Tama** said that the witnesses could be informed of the work group's interest but that their cooperation would be entirely up to them.

PORTS Report – Steinbrugge

- Two buoy-mounted sensors were scheduled for service in November.
- Sites were being surveyed for a wind sensor in the Oakland Inner Harbor turning basin.
- Introduced **Mark Bailey**, NOAA, who oversees the Bay Area PORTS program. **Capt. Korwatch** thanked **Bailey** for attending.

Public Comment

Nickson announced a symposium on enhancing marine diesel engine efficiency to be held at the California Maritime Academy November 14.

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Old Business

There was none.

New Business

There was none.

Next Meeting

Capt. Korwatch said that the next meeting of the HSC would commence at 1000, Thursday January 12, 2012 at the Port of Richmond's Harbormaster's Office.

Adjournment

A motion to adjourn was made and seconded. It passed without discussion or dissent. **Capt. Korwatch** adjourned the meeting at 1135.

Respectfully submitted:



Capt. Lynn Korwatch

PREVENTION / RESPONSE - SAN FRANCISCO HARBOR SAFETY STATISTICS

October-11

PORT SAFETY CATEGORIES

1. Total Number of Port State Control Detentions for period:	0
SOLAS (0), MARPOL (0), ISM (0), ISPS (0)	
2. Total Number of COTP Orders for the period:	4
Navigation Safety (4), Port Safety & Security (0), ANOA (0)	
3. Marine Casualties (reportable CG 2692) within SF Bay: Allision (0), Collision (0), Fire (0), Grounding (0), Sinking (0), Steering (0), Propulsion (5), Personnel (0), Other (0), Power (0)	5
4. Total Number of (routine) Navigation Safety related issues / Letters of Deviation: Radar (2) Gyro (0), Steering (0), Echo sounder (0), AIS (1), AIS-835 (0), ARPA (0), SPD LOG (0), R.C. (0), Other (0)	3
5. Reported or Verified "Rule 9" or other Navigational Rule Violations within SF Bay: None	0
6. Significant Waterway events or Navigation related cases for the period: None	0
7. Maritime Safety Information Bulletins (MSIBs): None	0
Total Port Safety (PS) Cases opened for the period:	12

MARINE POLLUTION RESPONSE

* Source Identification (Discharges):

TOTAL VESSELS	
U.S. Commercial Vessels	1
Foreign Freight Vessels	0
Public Vessels	2
Commercial Fishing Vessels	1
Recreational Vessels	6
TOTAL FACILITIES	
Regulated Waterfront Facilities	0
Regulated Waterfront Facilities - Fuel Transfer	1
Other Land Sources	0
Mystery Spills - Unknown Sources	
Total Oil/Hazmat Pollution Incidents within San Francisco Bay for Period	
14	
1. Spills < 10 gallons	7
2. Spills 10 - 100 gallons	5
3. Spills 100 - 1000 gallons	0
4. Spills > 1000 gallons	0
5. Spills - Unknown	2
TOTAL OIL DISCHARGE AND HAZARDOUS MATERIALS RELEASE VOLUMES BY SPILL SIZE CATEGORY:	
1. Estimated spill amount from U.S. Commercial Vessels:	2
2. Estimated spill amount from Foreign Freight Vessels:	0
2. Estimated spill amount from Public Vessels:	11
3. Estimated spill amount from Commercial Fishing Vessels:	2
4. Estimated spill amount from Recreational Vessels:	74
5. Estimated spill amount from Regulated Waterfront Facilities:	0
6. Estimated spill amount from Regulated Waterfront Facilities - Fuel Transfer:	1
7. Estimated spill amount from Other Land Sources:	0
8. Estimated spill amount from Unknown sources:	10
TOTAL OIL DISCHARGE AND/OR HAZARDOUS MATERIAL RELEASE VOLUMES (GALLONS):	
100	
Civil Penalty Cases for Period	0
Notice of Violations (TKs)	1
Letters of Warning	4
TOTAL PENALTY ACTIONS:	
5	

SIGNIFICANT PORT SAFETY AND SECURITY CASES (October 2011)**MARINE CASUALTIES - PROPULSION/STEERING**

Reduction of propulsion, 07 Oct: While a foreign flagged tank vsl was departing berth, it experienced a momentary reduction of propulsion. The cause was determined to be a faulty puncture valve on the main engine #6 cylinder. The o-ring on the puncture valve was faulty, allowing for fuel leakage which created a temperature differential amongst the cylinders. The resulting alarm automatically reduced the propulsion from the speed requested to 'slow ahead' to prevent damage to the main engine. Reduction of propulsion may be attributed to fuel switching. Case pends.

Loss of propulsion (LOP), 09 Oct: A foreign flagged tank vsl lost both auxiliary generators due to water in the fuel oil day tank. The presence of water in the system resulted in the equipment shutting down causing a short black out until the emergency generator came online and supplied power to the vsl. It was determined that one of the two fuel oil purifiers was not properly removing the water from the fuel oil. Incident was not attributed to fuel switching. Case pends.

Loss of propulsion (LOP), 16 Oct: A foreign flagged tank vsl's main engine failed to properly respond to bridge orders. A technician attended the vsl and determined that the set points for the main engine were not properly positioned. Technician replaced the encoder, manually changed the set points, and tested main engine with satisfactory results. Incident was not attributed to fuel switching. Case pends.

Loss of propulsion (LOP), 26 Oct: A foreign flagged bulk carrier failed to respond to a dead slow ahead bell upon anchoring in Anchorage 9. It was determined that automation shut down the MDE due to a lube oil pressure alarm. The lube oil pressure alarm was caused by the failure of a retention spring in a pneumatic valve on the main lube oil system. The retention spring was replaced and satisfactory engine tests conducted. Incident was not attributed to fuel switching. Case pends.

Loss of propulsion (LOP), 29 Oct: A US flagged passenger ferry experienced a loss of propulsion in its port main engine. The 282 passengers on board were safely transported to the pier utilizing only the starboard engine. It was determined that the strut bearing for the port propeller shaft (between the hull and support strut) was missing. Approximately 15 feet of shaft was hanging down with the strut supporting shaft and propeller. Cause is under investigation. Case pends.

VESSEL SAFETY CONDITIONS

NONE

GENERAL SAFETY CASES

23 OCT 11- A group of three kayakers attempted to cross the prop wash of two tugs pushing a deepdraft M/V into Pier 80. Two of the kayakers made it safely across, the third was pushed up against an adjacent drydock and then capsized. The kayaker is missing and presumed deceased. Investigation pends.

Ongoing- USCG and industry reps received information regarding four incidents of reefer container explosions during routine refrigeration system maintenance. Three of these explosions resulted in fatalities. Preliminary findings indicate the cause of the explosions was the use of contaminated refrigerant at a particular reefer container servicing facility in Vietnam. The Coast Guard is working closely with PMA and local lines/terminals to identify "suspect" containers, segregate them, and ensure they are handled and remediated safely. The Coast Guard presently has approximately 100 reefer containers on hold in the Port of Oakland.

NAVIGATIONAL SAFETY

Letter of Deviation (LOD) Inop S-Band Radar, 06 Oct: Vsl issued an inbound LOD.

Letter of Deviation (LOD) AIS Speed Log, 17 Oct: Vsl issued an inbound LOD.

Letter of Deviation (LOD) Inop S-Ban Radar, 19 Oct: Vsl issued an inbound LOD.

SIGNIFICANT INCIDENT MANAGEMENT DIVISION CASES

2 OCT 11- A mystery sheen was reported in Richmond Harbor near two tug boats. Upon inspection of the vessels, they were deemed a potential pollution threat. The sheen source was never identified, pending sample results. The case was federalized, and fuel is expected to be removed 7-11 November. Case pends.

2 OCT 11- An abandoned vessel sank near the mouth of the Petaluma River near light marker 18. The case was federalized; no fuel was on board, batteries and propane were removed. Case closed.

10 OCT 11- A public vessel discharged approximately 10 gallons of oily-water mixture. Vessel took actions to clean up the discharge; rain and wave action quickly dissipated the observed sheen. Case closed.

16 OCT 11- A fishing vessel grounded on Stinson Beach; 460 gallons of diesel, 35 gallons of lube oil, and 5 gallons of miscellaneous oils were removed. The community was concerned about the structure after the oil was removed and held a Town Hall meeting to address the issue. The community and NOAA raised money to remove the vessel off the beach. Case closed.

17 OCT 11- During a transfer at a regulated facility approximately 1 gallon of Jet Fuel discharged into the water due to failure to follow transfer procedures by not properly blanking off transfer hose after the transfer. Facility boomed off the vessel within 30 minutes of the discharge. Product was light jet fuel oil and dissipated quickly. Case closed.

21 OCT 11- A pleasure craft sank in the Brisbane Marina, the owner had recently inherited the vessel and was unsure what products were on board. The case was federalized and 125 gallons of diesel and water mixture were removed. Case closed.

24 OCT 11- A pleasure craft grounded near Baker Beach; the owner had the fuel removed but the vessel remains on the beach pending removal. Removal operation will be overseen by the Parks Service. Case closed.

26 OCT 11 - A US flagged container ship noticed a black oil sheen while bunkering from an alongside tug/barge in the Oakland Estuary and made arrangements with NRC to boom off both vessels. The source was a pin-hole leak above the waterline in one of the M/V's wing tanks. IMD estimates that 1-2 gallons of HFO entered the water. The hole resulted from localized pitting/corrosion and was repaired. Case Closed.

**Harbor Safety Committee
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**Report of the
U.S. Army Corps of Engineers, San Francisco District
November 10, 2011**

1. CORPS FY 2012 O&M DREDGING PROGRAM

The following is this years O & M dredging program for San Francisco Bay.

- a. **Main Ship Channel (55+2)** –Dredging work complete. (No change)
- b. **Richmond Outer Harbor (and Richmond Long Wharf)** – Dredging work is complete, survey posted. (No change)
- c. **Richmond Inner Harbor** –Dredging work ongoing and is expected to be complete by the end of November. The project is being dredged to -37 or -38 feet MLLW.
- d. **Oakland O & M Dredging** –Dredging is ongoing. Work will not be completed by the end of November. Corps is requesting of the resource agencies to work past the end of the work window since the work is being done with a clamshell dredge and taken to an upland location.
- e. **Suisun Bay Channel (and New York Slough)** – Dredging work is complete, survey posted. (No change)
- f. **Pinole Shoal (35+2)** – Dredging work is complete, survey posted. (No change)
- g. **Redwood City/San Bruno Shoal** –Dredging of Redwood City Channel is ongoing and is expected to finish by the end of November. This project is being dredged to -28.5 MLLW.
- h. **San Rafael Across the Flats and Inner Canal Channels:** (NOTE - SHALLOW DRAFT PROJECT) Dredging work began on November 10 and is expected to be complete by the end of November. This project is being dredged to -5ft MLLW.

2. DEBRIS REMOVAL – Total for October 2011 was 89 tons -- 49 tons by the Dillard, and 35 tons by the Raccoon, 5 tons by other means.

BASEYARD DEBRIS COLLECTION TOTALS:

MONTH	GRIZZLY	RACCOON	DILLARD	MISC	TOTAL
2011	TONS	TONS	TONS	TONS	TONS
JAN	21	59	5	3	88
FEB	11	55	33.5	0	99.5
MAR	8.5	134	92.5	5	240
APR	3.5	65	39	5	112.5
MAY	0	30.75	22	3	55.75
JUN	5	0	30.5	0	35.5
JUL					0
AUG	0	0	36	5	41
SEP	0	25.7	33.5	0	59.2
OCT	0	35	49	5	89
NOV					0
DEC					0

YR TOTAL
820.45

3. UNDERWAY OR UPCOMING HARBOR IMPROVEMENTS

None to report.

4. EMERGENCY (URGENT & COMPELLING) DREDGING

The emergency dredging in Bullshead reach was completed on July 3, 2010.

5. OTHER WORK

San Francisco Bay to Stockton - This project is on hold waiting for new funding. **No change.**

Sacramento River Deep Water Ship Channel Deepening - The Corps is scheduled to award the first construction contract in September, 2012. The Corps is actively coordinating with resource agencies and stakeholders to address comments to the DSEIR/EIS (February 2011). **No change.**

HYDROGRAPHIC SURVEY UPDATE

Address of Corps' web site for completed hydrographic surveys:

<http://www.spn.usace.army.mil/hydrosurvey/>

Main Ship Channel: Post-dredge survey completed August 1-2, 2011 has been posted.
Pinole Shoal Channel: **Condition survey of October 18-20** has been posted.
Suisun Bay Channel: Post-dredge survey of mid-August 2011 has been posted.
New York Slough: Post-dredge survey of August 11-12, 2011 has been posted.
Bull's Head Channel: March 10, 2011 condition survey has been posted.
Redwood City: Condition survey completed May, 2011 has been posted.
San Bruno Shoal: Condition survey completed in June, 2011 has been posted.
Oakland Entrance Channel: Surveys completed in August and September 2009 have been posted.
Oakland Inner Harbor Turning Basin: Survey completed April 2010 has been posted.
Oakland Inner and Outer Harbors – Condition surveys dated May 19-25, 2011 have been posted.
Oakland Outer-Outer Harbor: The special Delta-Echo survey of May 5, 2010 has been posted.
Oakland Inner Harbor - South Brooklyn Basin: November/December 2010 survey posted.
Southampton Shoal and Richmond Long Wharf: **Post-dredge survey of Aug 31-Sept 2, 2011** has been posted.
Richmond Inner Harbor: **Pre-dredge survey completed in Sept., Oct., Nov. 2011** has been posted.
Richmond Outer Harbor: **Condition survey of Oct. 17, 2011** has been posted.
Northship Channel: Condition survey of June 2011 has been posted.
San Rafael Creek and San Rafael Across-the-Flats: Condition surveys completed Feb. 2011.
Alameda Naval Station Survey (Alameda Point Navigation Channel): Survey completed in June 2011 has been posted.

Disposal Site Condition Surveys:

SF-08 (Main Ship Channel Disposal Site): Survey completed in April 2011 has been posted.
SF-09 (Carquinez): **Oct 4, 2011**;
SF-10 (San Pablo Bay): **Oct 4, 2011** survey has been posted;
SF-11 (Alcatraz): Survey of **Nov 1, 2011** has been posted;
SF-17 (San Francisco Harbor or Ocean Beach Disposal Site): August 2011 survey has been posted.

PROPOSED O&M DREDGING PLAN FOR FY12

Project	2011			2012									2013			Volume	Placement Site
	OCT FY12	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT FY13	NOV	DEC		
Humboldt Bar&Entrance				ESSAYONS 18.5 DAYS												1mcy	HOODS
Humboldt Channels																300kcy	HOODS
SF Main Ship Channel						ESSAYONS 13 DAYS										350kcy	SF-17
Richmond Inner Harbor	█								/ / / / /						200kcy	SFDODS	
Richmond Outer Harbor							ESSAYONS 13 DAYS									200kcy	SF-11
Pinole Shoal							ESSAYONS 10 DAYS									150kcy	SF-10
Suisun Bay Channel									Y AQUINA 30 DAYS						175kcy	SF-16	
Oakland Inner Harbor	█ *											/ / / / /			300kcy	SFDODS	
Oakland Outer Harbor	█ *											/ / / / /			300kcy	SFDODS	
Redwood City Harbor	█																
San Rafael	█ *																

			
Complete & Ongoing Contracts	Government Hopper	New Dredge Contract	Environmental Window

* Requires resource agencies' approval of Work Window Extension



Harbor Safety Committee of the
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San Francisco Clearinghouse Report

November 10, 2011

- ✎ In October the clearinghouse did not contact OSPR regarding any possible escort violations.
- ✎ In October the clearinghouse did not receive any notifications of vessels arriving at the Pilot Station without escort paperwork.
- ✎ The Clearinghouse contacted OSPR 3 time in 2011 regarding possible escort violations. The Clearinghouse called OSPR 6 time in 2010, 8 time 2009; 4 times 2008; 9 times in 2007; 9 times in 2006; 16 times in 2005; 24 times in 2004; twice in 2003; twice in 2002; 6 times in 2001; 5 times in 2000.
- ✎ In October there were 98 tank vessel arrivals; 4 Chemical Tankers, 20 Chemical/Oil Tankers, 21 Crude Oil Tankers, 27 Product Tankers, and 26 Tugs with Barges.
- ✎ In October there were 310 total arrivals.

San Francisco Bay Clearinghouse Report For October 2011

San Francisco Bay Region Totals

	<u>2011</u>		<u>2010</u>	
Tanker arrivals to San Francisco Bay	72		72	
Barge arrivals to San Francisco Bay	26		32	
Total Tanker and Barge Arrivals	98		104	
Tank ship movements & escorted barge movements	320		322	
Tank ship movements	216	67.50%	208	64.60%
Escorted tank ship movements	111	34.69%	93	28.88%
Unescorted tank ship movements	105	32.81%	115	35.71%
Tank barge movements	104	32.50%	114	35.40%
Escorted tank barge movements	40	12.50%	57	17.70%
Unescorted tank barge movements	64	20.00%	57	17.70%

Percentages above are percent of total tank ship movements & escorted barge movements for each item.

Escorts reported to OSPR 0 0

Movements by Zone	Zone 1	%	Zone 2	%	Zone 4	%	Zone 6	%	Total	%
Total movements	195		298		0		150		643	
Unescorted movements	143	73.33%	215	72.15%	0	0.00%	86	57.33%	444	69.05%
Tank ships	90	46.15%	111	37.25%	0	0.00%	48	32.00%	249	38.72%
Tank barges	53	27.18%	104	34.90%	0	0.00%	38	25.33%	195	30.33%
Escorted movements	52	26.67%	83	27.85%	0	0.00%	64	42.67%	199	30.95%
Tank ships	23	11.79%	34	11.41%	0	0.00%	24	16.00%	81	12.60%
Tank barges	29	14.87%	49	16.44%	0	0.00%	40	26.67%	118	18.35%

Notes:

1. Information is only noted for zones where escorts are required.
2. All percentages are percent of total movements for the zone.
3. Every movement is counted in each zone transited during the movement.
4. Total movements is the total of all unescorted movements and all escorted movements.

San Francisco Bay Clearinghouse Report For 2011

San Francisco Bay Region Totals

	<u>2011</u>		<u>2010</u>	
Tanker arrivals to San Francisco Bay	646		699	
Barge arrivals to San Francisco Bay	270		371	
Total Tanker and Barge Arrivals	916		1,070	
Tank ship movements & escorted barge movements	2,952		3,528	
Tank ship movements	1,916	64.91%	2,070	58.67%
Escorted tank ship movements	973	32.96%	925	26.22%
Unescorted tank ship movements	943	31.94%	1,145	32.45%
Tank barge movements	1,036	35.09%	1,458	41.33%
Escorted tank barge movements	406	13.75%	683	19.36%
Unescorted tank barge movements	630	21.34%	775	21.97%

Percentages above are percent of total tank ship movements & escorted barge movements for each item.

Escorts reported to OSPR 3 6

Movements by Zone	Zone 1	%	Zone 2	%	Zone 4	%	Zone 6	%	Total	%
Total movements	1,837		2,829		0		1,240		5,906	
Unescorted movements	1,294	70.44%	1,894	66.95%	0	0.00%	745	60.08%	3,933	66.59%
Tank ships	760	41.37%	963	34.04%	0	0.00%	396	31.94%	2,119	35.88%
Tank barges	534	29.07%	931	32.91%	0	0.00%	349	28.15%	1,814	30.71%
Escorted movements	543	29.56%	935	33.05%	0	0.00%	495	39.92%	1,973	33.41%
Tank ships	238	12.96%	368	13.01%	0	0.00%	202	16.29%	808	13.68%
Tank barges	305	16.60%	567	20.04%	0	0.00%	293	23.63%	1,165	19.73%

Notes:

1. Information is only noted for zones where escorts are required.
2. All percentages are percent of total movements for the zone.
3. Every movement is counted in each zone transited during the movement.
4. Total movements is the total of all unescorted movements and all escorted movements.



CALIFORNIA STATE LANDS COMMISSION

HARBOR SAFETY COMMITTEE MONTHLY REPORT - OCTOBER COMPARISON

VESSEL TRANSFERS

	Total Transfers	Total Vessel Monitors	Total Transfer Percentage
OCTOBER 1 - 31, 2010	226	88	38.94
OCTOBER 1 - 31, 2011	200	99	49.50

CRUDE OIL / PRODUCT TOTALS

	Crude Oil (D)	Crude Oil (L)	Overall Product (D)	Overall Product (L)	GRAND TOTAL
OCTOBER 1 - 31, 2010	14,939,600	0	18,607,000	8,091,011	26,698,011
OCTOBER 1 - 31, 2011	10,299,917	0	15,495,507	6,139,159	21,634,666

OIL SPILL TOTAL

	Terminal	Vessel	Facility	Total	Gallons Spilled
OCTOBER 1 - 31, 2010	0	0	0	0	0
OCTOBER 1 - 31, 2011	0	1	0	2	1 gallon Diesel 1 gallon Jet Fuel

*** Disclaimer:

Please understand that the data is provided to the California State Lands Commission from a variety of sources; the Commission cannot guarantee the validity of the data provided to it.



CALIFORNIA STATE LANDS COMMISSION

HARBOR SAFETY COMMITTEE MONTHLY REPORT FOR YEAR 2010

VESSEL TRANSFERS

	Total Transfers	Total Vessel Monitors	Total Transfer Percentage
JANUARY 1, 2010 to DECEMBER 31, 2010	2631	1139	43.29

CRUDE OIL / PRODUCT TOTALS

	Crude Oil (D)	Crude Oil (L)	Overall Product (D)	Overall Product (L)	GRAND TOTAL
JANUARY 1, 2010 to DECEMBER 31, 2010	147,016,955	300,000	205,374,688	93,651,082	299,025,770

OIL SPILL TOTAL

	Terminal	Vessel	Facility	Total	Gallons Spilled
JANUARY 1, 2010 to DECEMBER 31, 2010	*** PLEASE SEE ATTACHED. ***				

*** Disclaimer:

Please understand that the data is provided to the California State Lands Commission from a variety of sources; the Commission cannot guarantee the validity of the data provided to it.

A. GENERAL INFORMATION

1. The marine waters of California are environmentally sensitive and a precious environmental and economic resource. Bunkering operations, while routine in many parts of the country, do in fact pose risks different than those normally expected of standard shore to ship oil transfer operations. The California Department of Fish and Game (DFG), Office of Spill Prevention and Response (OSPR), and representatives of the shipping and petroleum industry have jointly developed the following guidelines to address those risks and ensure safe bunkering operations in the State of California. They recognize that the *safe* transfer of fuel oil into a vessel requires diligence, safety consciousness and the use of proper procedures. Safe bunkering is the product of good communication, proper crew training and compliance with international, federal, state and local laws including but not limited to;

"Any owner, operator, or person-in-charge of an onshore or offshore facility or vessel over which the U.S. has jurisdiction (i.e., a U.S. vessel or a facility or foreign vessel in U.S. waters) from which oil or an EPA designated hazardous substance is discharged in "such quantities as may be harmful" into navigable waters of the U.S., upon the adjoining shorelines, into contiguous zone waters, in connection with activities under the OSCLA or the DPA, or that may affect natural resources under exclusive U.S. management authority, is subject to a civil penalty assessment separate from any other civil or criminal penalty or liability imposed by the Federal Water Pollution Control Act (FWPCA) (except in the case of certain EPA permit related discharges). This act prescribes that a civil penalty of not more than \$5,000 for each offense shall be assessed. The FWPCA also requires that the person-in-charge of the vessel or facility must, as soon as acquiring knowledge of any discharge of "such quantities as maybe harmful" of oil or reportable quantity of hazardous substance, immediately notify the appropriate agency (the Coast Guard). The NRC has been identified as the primary location for receiving reports of oil discharges or hazardous substances releases. When the NRC cannot be contacted, 33 CFR 153.203 lists other agencies that may be notified. Failure to give immediate notice makes the responsible person subject to criminal penalties of not more than \$10,000 or a year's imprisonment, or both. Masters, licensed officers and operators, and other persons certificated by the Coast Guard may also be subject to suspension and revocation (S&R) proceedings conducted under the authority of 46 U.S.C. Chapter 77 and 46 CFR 5. Discharges may also result in other civil penalty and criminal fine provisions under Section 309 of the FWPCA, the Rivers and Harbors Act 99 (the Refuse Act), and the APPS 1980."

(Marine Safety Manual COMDTINST M16000.6, 1.E.7 p. 1-24-25)

Asterisks (*) denotes a Regulation that is already in place and not a best practice.

2. Bunkering Operations within California waters are subject to U.S. Coast Guard regulations, Title 33 Code Federal Regulations, Parts 155 and 156, and California Code of Regulations (CCR) *, Title 14, Chapter 3, Subchapter 6. These regulations are listed in paragraph 7 below. Beyond the regulations, the guidelines below represent the cooperative efforts of OSPR and stakeholders to develop the best way to further mitigate risks to the environment during bunkering operations. As such, it is expected that industry members follow them, educate and enforce them among industry groups and make recommendations to OSPR, and the appropriate local Harbor Safety Committees as changes are needed. Vessels intending to conduct bunkering operations while at anchor should also carefully review the guidance in the following additional best maritime practice.
3. Some bunkering operations are conducted alongside vessels at berth and, in the case of container vessels, may be conducted simultaneously with container operations. This adds some additional risk to bunkering operations and the personnel involved for which additional precautions are necessary. The procedures associated with these bunkering operations are covered in the Harbor Safety Plans.
4. The OSPR and the U.S. Coast Guard inspectors frequently monitor fuel/oil transfer operations throughout all of California's harbors and bays based on the level of risk, amount of fuel/oil, familiarity with company operations, procedures and track records. Either agency may stop any bunkering operation or prohibit planned operations due to safety concerns or unacceptable risk.
5. The OSPR will periodically review the safety record of bunkering operations and work with the Harbor Safety Committees to determine if changes are needed to promote safety. Changes could include additional best maritime practices or a formal regulatory initiative.
6. **Definitions:** In addition to the terms defined in applicable federal regulations, the following definitions apply:
 - a. Bunkering: The transfer of petroleum base products from one vessel to another vessel for the purpose of replenishing fuel for vessel propulsion, hotel services or machinery lubrication while at anchor or dockside.
 - b. Receiving Vessel: The vessel receiving the fuel or lubes in a bunkering operation.
 - c. Delivering vessel: The vessel delivering the fuel or lubes in a bunkering operation.
 - d. Moderate Weather: Sustained winds from 21 to 33 knots or higher gusts (Small Craft Advisory).
 - e. Heavy Weather: Sustained winds from 34 to 47 knots or higher gusts (Gale Warnings).
7. **Regulations:** Bunkering operations must be conducted in strict accordance with the letter and intent of all regulations. If there is a conflict, real or perceived, between the regulations and the guidelines in this document, then the regulations shall take precedence. However, any such

Asterisks (*) denotes a Regulation that is already in place and not a best practice.

conflict should be reported to the applicable Harbor Safety Committee. In the state of California Bunkering operations fall under following regulations:

- a. 33 CFR 152 Notice of Discharge and Removal of Discharged Oil*
- b. 33 CFR 155 Oil or Hazardous Material Pollution Prevention Regulations for Vessels*
- c. 33 CFR 156 Oil and Hazardous Material Transfer Operations*
- d. 46 CFR 30-40 Tank Vessels*
- e. CCR Title 14 , Chapter 3, Subchapter 6 Oil Transfer and Vessel Operations*

Additionally, bunkering activities may also be subject to local regulations and terminal requirements and or guidelines. As laws and regulations may change from time to time, a vessel operator should check with his/her agent and/or local authorities for the most current regulations and requirements.

B. Best Maritime Practices – BUNKERING

Maritime safety is a people process. Virtually every marine accident or oil spill is the result of human error. The below Best Maritime Practices have been developed to further mitigate the risk of spills to deck and or water. It is well-trained people working conscientiously together that make safe seamanship a reality.

1. Prior to Arrival of the Receiving Vessel

a. Pre-Arrival Information (Receiving Vessel)

Prior to bunkering, the following information will be provided to the delivering barge company by the receiving vessel:

- Estimated time of arrival.
- Location in port where bunkering will take place.
- Name and Contact information for the vessel's QI (Qualified Individual).
- Copy of California Vessel Oil Spill Contingency Plan Approval Letter.
- Confirmation of Federal and State Certificates of Financial Responsibility ('COFR').
- Verification of the OSPR required spill kit onboard the ship.
- Location of bunker station
 - distance forward from the vessel's stern.
 - distance of bunker connection from water line to rail.
 - distance of bunker connection from rail.
 - bunker manifold flange size and bolt configuration.
 - Side of vessel, port or starboard.
- Complete the Pre-Arrival Check List.
- Acknowledgement that Hot Work and other restricted activity will not be conducted until the delivering vessel has departed.

Asterisks (*) denotes a Regulation that is already in place and not a best practice.

b. Notifications *

The bunker barge operator shall make delivery notification to the U.S. Coast Guard, OSPR representative and to their contract rated Oil Spill Response Organization (OSRO) noting location, time, and expected duration of the bunker delivery, with the amount being delivered. The ship will make notification to their OSRO and their twenty-four hour shore side QI, noting location and time of delivery.

c. Identify Person-In-Charge*

The first step in safe bunkering is to identify the vessel's Person-In-Charge ('PIC'), who is responsible for the bunkering operation. They must be a licensed or authorized master, mate or engineer.

d. Identify the Oil Transfer Procedures

The PIC must identify and be familiar with the vessel's oil transfer procedures.

Oil Transfer Procedures shall be prominently posted for easy reference!

▪ Transfer Procedures shall include;

- The location of pipelines, valves, vents and overflows,
- The numbers and duties of people assigned to the transfer operation,
- All relevant procedures before, during and following oil transfer,
- Detail critical steps for communication,
- Steps for topping off tanks, and
- Steps for initiating an emergency shutdown.
- Weather and sea state limits that require transfer shutdown.

e. Designate Key Transfer Personnel *

The Person-In-Charge is responsible for ensuring an adequate number of personnel are ready and available to safely execute the transfer process. While the number may vary with the ship, weather, and port there shall be no less than 3 individuals on the receiving vessel assigned to the operation, and these individuals shall have no other assigned duties during the transfer process.

f. Develop a Pre-Loading Plan (Receiving Vessel) Pre-Loading Plan Includes;

- **Tanks and Capacities**
- **Oil Level and Type**
- **Expected Final Tank Gauges and Percentage of Tank Capacity**
- **Tank Loading Sequence**

Asterisks (*) denotes a Regulation that is already in place and not a best practice.

- **Monitoring Procedures**
monitoring includes the fuel oil transfer as well as tank levels and valve alignments.
- **Post a Completed Load Plan**
- **Max pressure at ship's manifold**
- **Max rate of transfer**

- Personnel shall include:
 - Person-In-Charge (PIC) – Responsible for the transfer operation.*
 - Point-of-Transfer Watch – This person remains at the connecting point between the transferring and receiving vessels throughout the transfer process.
 - Deck Rover Watch – Responsible for monitoring the deck and over the sides for spills; should be aware of all the source locations for a potential release of oil.
 - Additional Personnel – Good seamanship dictates that there will be circumstances that require the receiving vessel to assign additional personnel. They may include but are not limited to the following.
 - Monitoring of multiple tank levels at different locations.
 - Topping of tanks.
 - Need for an anchor watch.
 - Rain or other environmental circumstances that affect the operation.

- The PIC will ensure that all personnel on their vessel assigned to the transfer operation are well rested and within their work hour limitations. Even a crewmember within their work hour limitations can be fatigued due to a number of circumstances. A fatigued crewmember should be relieved by a rested crewmember.

g. Pre-Arrival Training

A good bunkering operation begins with proper preparation. Everybody who is involved in the training session should be told everything about the bunker operation. Not more than 48 hours prior to arrival, all members of the crew that may be called upon to participate in the loading operation shall attend a training session. Training shall include:

- Review Bunkering -- Best Maritime Practices (BMP)
- Review Vessel Specific Transfer Procedures
- Review Crew Roles and Responsibilities
- Review Pre-Loading Plans
- Communication Procedures

Asterisks (*) denotes a Regulation that is already in place and not a best practice.

- Stop the Transfer Responsibility

Ensure everyone involved in the bunkering operation knows he or she has the responsibility to stop the transfer process at any time, should anything appear to be out of order.

If watches will change during the bunkering operation, include relief personnel in training session and the pre-loading plan.

A log entry shall be made of the crewmembers, their rating and the time of the training session.

2. Bunkering Operations *

a. Prepare Deck and Receiving Areas

To include, but may not be limited to the following:

- Close and secure all required hatches, doors and portholes.
- Seal all scuppers and drains from which overflowing oil might spill over the side of the vessel.
- Ensure a well-lit receiving area to provide for efficiency, safety and crew alertness.
- Post all proper warning signs and signals.
- Make a visual inspection of all the applicable equipment on both the receiving and delivering vessels.

b. Mooring Equipment *

The delivering vessel shall be responsible for the safe mooring of their vessel alongside the receiving vessel. They shall use fenders of sufficient size and type to prevent steel to steel contact between the two vessels. Mooring lines will be of sufficient size and type to hold the delivering vessel alongside the receiving vessel during the maximum expected tidal, wave, and wind conditions.

c. Provide Safe Access Between Vessels

The receiving vessel must provide safe access to and from the barge utilizing a gangway or an appropriate accommodation ladder, in order to facilitate face to face communications between the receiving and the delivering vessels for purposes of a pre-transfer conference and other required communications.

Where safe access cannot be provided an alternate method of facilitating a face to face conference must meet the following guidelines and a notification will be made to OSPR and USCG by the delivering vessel;

- Both the receiving vessel and delivering vessel's PICs will still execute a conference in sight of each other with a clear method of communication in

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order to cover all items outlined in the pre-transfer document as well as the Declaration of Inspection.*

- Direct communications between PIC's will be made in order to alert the delivering vessel when the receiving vessel is topping off, or switching between tanks.*
- Reiterate the need for a 10 minute standby notice before any tank switches.
- Direct communications between both PICs no less than every 20 minutes.

d. Establish Communications *

The receiving vessel and delivering vessel shall agree on the communications to be used during the process. These include:

- Coordinating radio frequencies,
- Common English phrases,
- Proper hand signals, and
- Use of air horns.

Ensure everyone involved knows he or she has the responsibility to stop the transfer process at any time, should anything appear to be out of order

e. Conduct a Pre-Transfer Conference

Each pre-transfer conference is unique. Different people, different languages, different fuel requirements, different conditions all play a role in determining the content and structure of the conference. Out of these differences, a common understanding must be established and a common process used. The pre-transfer conference must include the following:

- Be conducted in English.
A vessel agent can arrange for a translator or interpreter. If one is necessary they must remain for the duration of the transfer operation.
- Be conducted face to face. (Except as allowed for in Section c.)
- Thoroughly review the Declaration of Inspection (DOI) and Load Plans, with both PICs discussing and initialing each item including:.*
 - Products, Sequence and Flow rate of Oil*
 - Key Procedures*
 - Identify Key Personnel*
 - Watch Changes*
 - MSDS information for the product(s) to be transferred*
 - Notification of Shutdown or topping off procedures.*

f. Connect Oil Transfer Hose*

Be sure to handle the hose carefully. It may still contain oil from a previous transfer. The receiving vessel shall:

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- Check the hose for obvious defects.
- Check the hose support and lead. The weight of the hose should not put undue strain on the manifold, rail or other fittings.
- Use a new unused gasket.
- Tighten all bolts, evenly, with a matching bolt in every hole.
- Double check alignment of all valves.
- Ensure containments are kept free and clear of debris and rain water.

g. Complete and Sign the Declaration of Inspection (DOI)*

Both vessels must keep a copy of the DOI for 30 days, along with a copy of the vessels load plan.

h. Begin Fuel Delivery

- Fuel flow should commence at a slow rate.
- ***All tanks should be sounded to ensure fuel is loading into the designated tanks and not into the wrong tanks.***
- The pressure should be monitored on the delivering and the receiving vessel's manifold. A high pressure reading could signal a blockage or improper alignment.
- Receiving vessel must alert barge crew at least 10 minutes before changing tanks, topping off tanks, or securing the loading operation.
- The delivering vessel and receiving vessel should compare the amount of fuel transferred between each vessel and at regular intervals. If upon comparison in the amount of fuel transferred, a discrepancy of concern is identified, the transfer should be secured until the discrepancy is rectified.
- Bunker transfer rate should be compared at regular intervals. This practice will help to avoid tank overfills and enable a PIC to estimate the time for topping off tank(s) or stripping of tank(s), tank switching and time of completion.
- Maintain constant communication. A regular schedule of communications should be established. Not to exceed 20 minute intervals, a status report exchange between the receiving vessel and delivering vessel shall take place*. This is in addition to the notifications above. **Failure to receive a response from any effort to communicate shall result in an immediate shutdown of operations.**
- Verify operation and accuracy of gauging systems.
- Test and verify bunker tanks alarm, settings and overflow alarm units.*
- Bunker tanks which have been secured should be checked frequently during the remaining loading operations to avoid an overflow.

i. Securing Bunker Operations and Disconnecting Transfer Hose

Upon securing of bunker operations;

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- Check to make sure there is no flow at the manifold before closing the bunker manifold valve.
- The PIC's on both vessels should check fuel tank levels and verify all valves are securely closed.
- The receiving and delivering vessel's crews should verify that the hose is depressurized and drained back into the barge.
- The hose connection shall be blanked and bolted with a matching bolt in every hole. * It should be cleaned of any surface oil before being passed back to the delivery vessel.
- Hot Work and other restricted activity should remain secured until the delivering vessel has departed.

j. Number of Vessels Involved

A receiving vessel may receive bunkers and lubricating oils from two separate delivering vessels at the same time, provided:

- Each transfer has a separate Person in Charge ('PIC') unless otherwise approved by the Coast Guard Captain of the Port.
- That each system is completely separate from the other or is otherwise effectively isolated or segregated by means of blank (spectacle) flanges which may be visually verified.

3. Should a Spill Occur

a. STOP THE PRODUCT FLOW

- **Notify the barge immediately to Shut Down and inform the barge of what happened and whether or not the flow has been stopped.**
- Delivery vessel to inform receiving vessel when transfer is stopped.
- Bunker manifolds to be shut.
- When shut down, advise delivery vessel if outflow has stopped.
- Barge to commence deploying boom. (Even if release is not believed to have reached the water).

b. WARN PERSONNEL

- Ensure the personnel on the ship, barge and shore are aware of the spill and are taking the necessary precautions to remain safe and secure the vessel.

c. SHUT OFF IGNITION SOURCES

- Motors, electrical circuits, open flames, welding, etc.

d. CONTAIN / CONTROL SPILL

- Ensure the barge is deploying their boom
- Check ship's containment to ensure it is effective and sufficient

e. MAKE APPROPRIATE NOTIFICATIONS AS PER VESSEL OIL SPILL CONTINGENCY PLAN*

Asterisks (*) denotes a Regulation that is already in place and not a best practice.

- CCR, Title 14, Chapter 3, §817.03(g) and §827.02(d), Shall make notification within 30 minutes, after discovery of a discharge or threatened discharge of oil into marine water. Required notifications shall not be construed as requiring notification before response.
- Communicate the incident to your company QI/OSRO*
 - Injuries
 - Damage
 - Extent of release
 - Resources required
- State of California's CalEMA*
- National Response Center*

f. **Notify U.S. Coast Guard Vessel Traffic Service (VTS)**

4. **Port Specific Items**

a. **Heavy Weather**

- **Wind**: Vessels will not come alongside in preparation for bunkering at anchor or pier side if sustained winds are at or exceed 34 knots. If bunkering operations have already begun when sustained wind reach 28 knots personnel in charge of bunkering operations will continuously monitor environmental conditions and take any additional measures necessary to reduce risk of injury, vessel damage or pollution, and prepare for worsening weather. When sustained winds reach 34 knots bunkering operations will cease and hoses will be drained and disconnected.
- **Seas**: For bunkering operations from one vessel to another vessel while at anchor, operations will cease, and hoses drained and disconnected when waves or swells reach 5 ft. The wind and sea conditions criteria have been developed with industry input and are used by operating companies in California. These standards are based on historical observations and experience in handling these vessels under the above prevailing conditions. Heightened safety and precaution should be taken during short interval wave periods.
- **Electrical Storm**: When an electrical storm is anticipated in the vicinity of a bunker transfer, shutdown and secure transfer operations. All tank openings and ventilation valves must be closed, including any bypass valve fitted on the tank venting system.*
- **Sheltered Waterway**: The aforementioned wind and sea guidelines may not be applicable when a receiving vessel is being bunkered at a wharf or pier in a sheltered waterway. The criteria for securing a bunkering operation in these types of locations would be dependent upon adverse movement of either the receiving vessel or delivering vessel caused by the prevailing wind or sea conditions.
- **Tug Availability**: During bunkering operations with the potential to have adverse weather conditions involving vessels at anchor, at least one tug will remain ready to render assistance during the entire bunkering operation. The attending tug(s) must have

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sufficient horsepower to maneuver and control at least the delivering vessel involved in the bunkering operation under all conditions.

5. Ongoing Compliance and Continual Improvement

a. Drills and Exercises:*

Equipment deployment drills shall be conducted twice a year by each bunker delivery company in each port. . These drills shall be conducted in an environment and under conditions similar to those that would be encountered during an actual oil transfers operation.

- The ability to deploy oil spill boom shall be drilled to demonstrate proficiency to the Administrator.
- At least one of these drills will be monitored by OSPR staff, and any documentation generated, including the list of the crew participating in the drill, will be submitted to OSPR. OSPR's Drills and Exercises Unit must be contacted in advance to schedule these monitored equipment deployment drills.
- If oil spill boom has been successfully deployed during a transfer operation, this may be counted toward the twice a year equipment deployment requirement. Any relevant documentation generated, including the list of the crew participating in the deployment, will be submitted to OSPR.
- Vessel transfer units that utilize the services of an OSRO for standby booming, that have been rated to deploy the containment equipment, are not required to meet the twice yearly equipment deployment drills.
- In addition to these scheduled equipment deployment drills, the Administrator may also require the successful completion of an announced or unannounced equipment deployment drill.

The vessel owner/operator shall maintain adequate records of drills and exercises, for a period of at least three years, to include records of any off-vessel drills and exercises (i.e., drills and exercise not held aboard the vessel) of the spill response organization and resources identified in the contingency plan. These records shall be maintained at the United States location of either the Qualified Individual or the vessel owner/operator. Contingency plans should indicate the location of these records. All exercises conducted aboard the vessel shall be documented in the vessel's log.

When the owner/operator possess like boom deployment systems on their vessels, it is adequate to run a drill on one system, as a representative of the entire company.

b. Inspections and Monitoring:*

The OSPR Administrator should carry out an inspection program which shall include the following:

- The Administrator shall conduct a system safety inspection of each delivery vessel engaged in transfer operations in the marine waters of California. Such an

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inspection should determine whether the vessel is in compliance with equipment, procedures, and other requirements as specified in this Plan.

- Monitoring transfer operations at the transfer site, including monitoring pre-booming requirements.
- Additionally, twice a year equipment deployment drills shall be conducted by the bunker delivery companies in each port to meet the booming requirements.
- The bunker company has successfully demonstrated to the Administrator their ability to deploy and maneuver boom through deployment drills demonstrating the following: sufficient boom, trained personnel and equipment, maintained in a stand-by condition at the point of transfer, such that at least 1200 feet of boom, or an amount sufficient to meet the containment requirements, whichever is greater, can and will be deployed for the most effective containment immediately, but no longer than 30 minutes, after discovery of a spill.

Prior to each transfer operation, the transfer unit shall provide, for the duration of the entire transfer operation, either pre-booming or standby booming if the aforementioned requirements are not met. These standards may not reflect the exigencies of actual spill response. However, these standards must be used to determine the amount of equipment and personnel that must be available, in such cases pre-booming may be required.

c. **Pre-Booming**:*

Transfer units must carry or provide at the point of transfer appropriate equipment and supplies for the containment and removal of both persistent oil, and #1 and #2 grade oil spills in water adjacent to the transfer site. For pre-booming, the transfer unit shall deploy boom so as to enclose the water surface area adjacent to the receiving unit which will provide common containment area for:

- Either of the following:
 - The entire receiving unit and the point of transfer; or
 - Those portions of the receiving unit or seawall from which oil may spill into the water.
- Where the hull of the transfer unit or seawall is capable of acting as an effective barrier on the side of the receiving unit, the boom on that side may be deployed so that it provides containment of the receiving unit and the transfer unit or seawall.
- The boom shall be periodically checked and the boom position shall be adjusted as necessary throughout the duration of the transfer; especially during tidal changes and significant wind or wave events, to maintain maximum containment in the event that oil is spilled into the water.

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