



Department of
Environmental
Conservation

Save the USS The Sullivans DEC's Role

Michael Emery, P.E., Regional Emergency Response Coordinator, DEC Region 9

Niagara Frontier Section of the Air & Waste Management Association
Annual Enrichment Seminar
January 26, 2023

Agenda

- USS The Sullivans
- Incident Command System (ISC)
- Incident stabilization
- Environmental factors
- Refloat
- Decontamination

USS The Sullivans (DD-537)

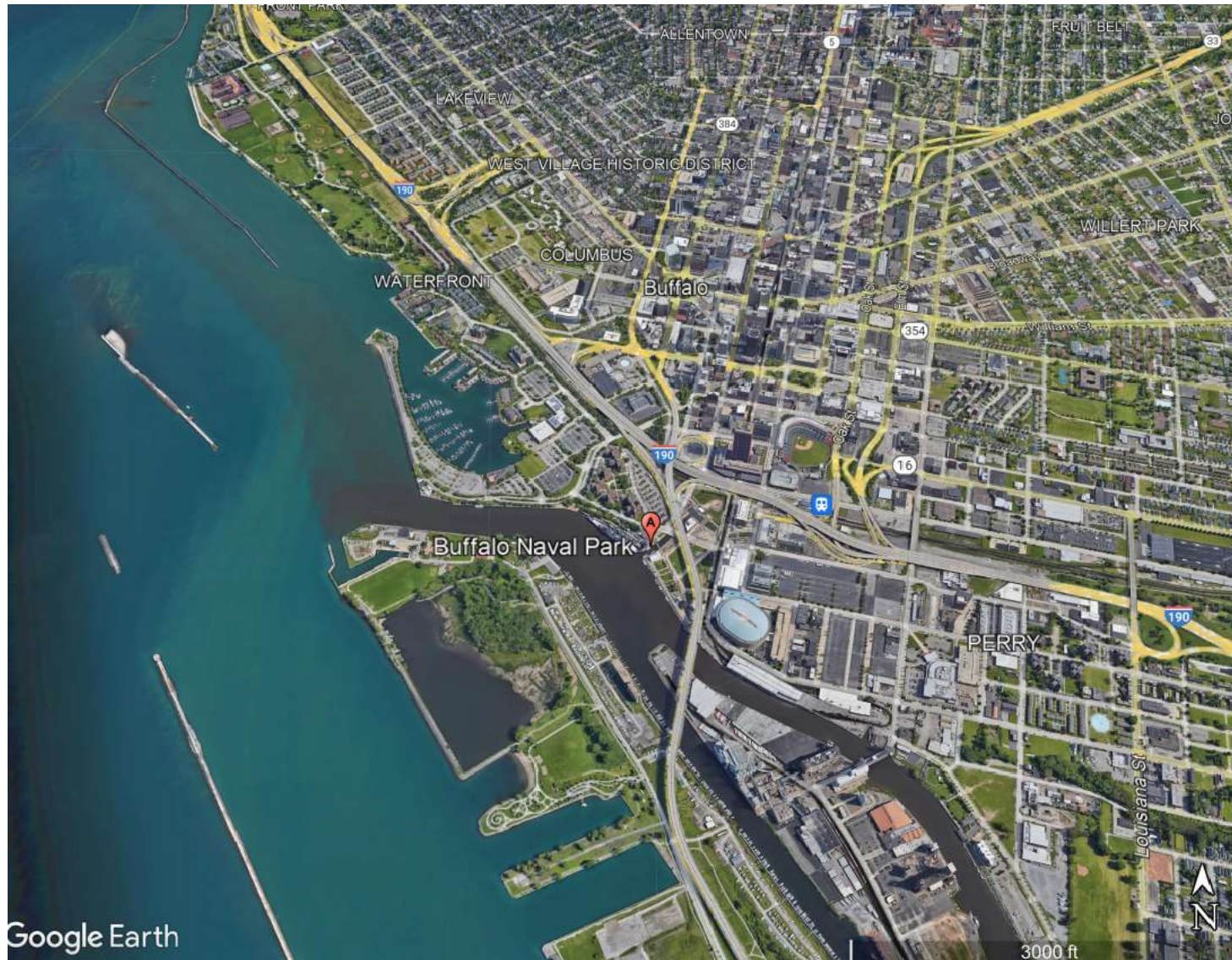
- Fletcher class destroyer (1 of 4 left)
- Commissioned September 30, 1943
- Decommissioned January 7, 1965
- Namesake: The Sullivan Brothers
- 1977 Joined the USS Little Rock at the Buffalo and Erie County Naval & Military Park as a memorial and is open to the public.



The Sullivan Brothers

- USS Juneau (CL-52)
- Atlanta class light cruiser
- Sank November 13, 1942
- 687 men lost at sea
- 10 survived
- Siblings no longer serve together





Current
location



Buffalo Naval Park

Back story:
2021

- Campaign to raise
\$1 million dollars

- Raised \$530,000

- Patching holes in hull

Fast Forward:
April 13, 2022

Incomplete repairs to hull

Loss of electrical power

Hull breaches

Day 1: April 14, 2022

- Spill 2200442 received, 10:00AM
- Ship is partially submerged
- Sheen is present
- Day #1 of incident

NEW YORK Department of Environmental Conservation		NYSDEC SPILL REPORT FORM		NEW YORK Department of Environmental Conservation			
DEC REGION:	9	SPILL NUMBER:	2200442				
SPILL NAME:	SAVE THE SULLIVANS	DEC LEAD:	TDJOHNSO				
CALLER NAME:	COREY LEHMAN	NOTIFIER'S NAME:					
CLR'S AGENCY:	NYSDEC	NOTIFIER'S AGENCY:					
CALLER'S PHONE:		NOTIFIER'S PHONE:					
SPILL DATE:	04/14/2022	SPILL TIME:	8:00 am	DISPATCHER:			
CALL RECEIVED DATE:	04/14/2022	RECEIVED TIME:	10:00 am				
SPILL LOCATION							
PLACE:	SAVE THE SULLIVANS	COUNTY:	Erie				
STREET:	BUFFALO NAVAL PARK	TOWN/CITY:	Buffalo (c)				
		COMMUNITY:	BUFFALO				
CONTACT:		CONTACT PHONE:					
CONT. FACTOR:	Equipment Failure	SPILL REPORTED BY:	DEC				
FACILITY TYPE:	Vessel	WATERBODY:					
CALLER REMARKS: CALLER STATED THAT USS SULLIVAN DOCKED AT THE PARK WAS LISTING FROM TAKING ON WATER.							
MATERIAL	CLASS	SPILLED	RECOVERED	RESOURCES AFFECTED			
POTENTIAL SPILLERS							
COMPANY	ADDRESS		CONTACT				
Tank No.	Tank Size	Material	Cause	Source	Test Method	Leak Rate	Gross Failure
DEC REMARKS: 04/14/2022 TDJ WENT TO NAVAL PARK WHERE SULLIVAN SHIP DOCKED NEAR BREAKWALL WAS PARTIALLY SUBMERGED. EFFORTS WERE BEING MADE TO PUMP WATER FROM SHIP. AFETR APERIOD OF TIME PETROLUUM SHEEN BEGAN TO SHOW ON WATER.							







INCIDENT COMMAND SYSTEM (ICS)

- Designed by local, State, and Federal fire protection agencies to improve the management of emergencies. (U.S. Forest Service)
- It is a generic, enables any company or organization to function in a multi-organization environment no matter the incident
- Many emergency-service organizations use ICS.
- ICS command structure can be expanded or contracted as an incident dictates

ICS COMMAND STRUCTURE

Incident Commander / Unified Command

General staff that work within four functional areas:

- Operations Section
- Planning Section
- Logistics Section
- Finance/Administration Section

Who is in charge? Who is paying?

Naval Park

Insurance

Hull

Pollution

Umbrella

City of Buffalo



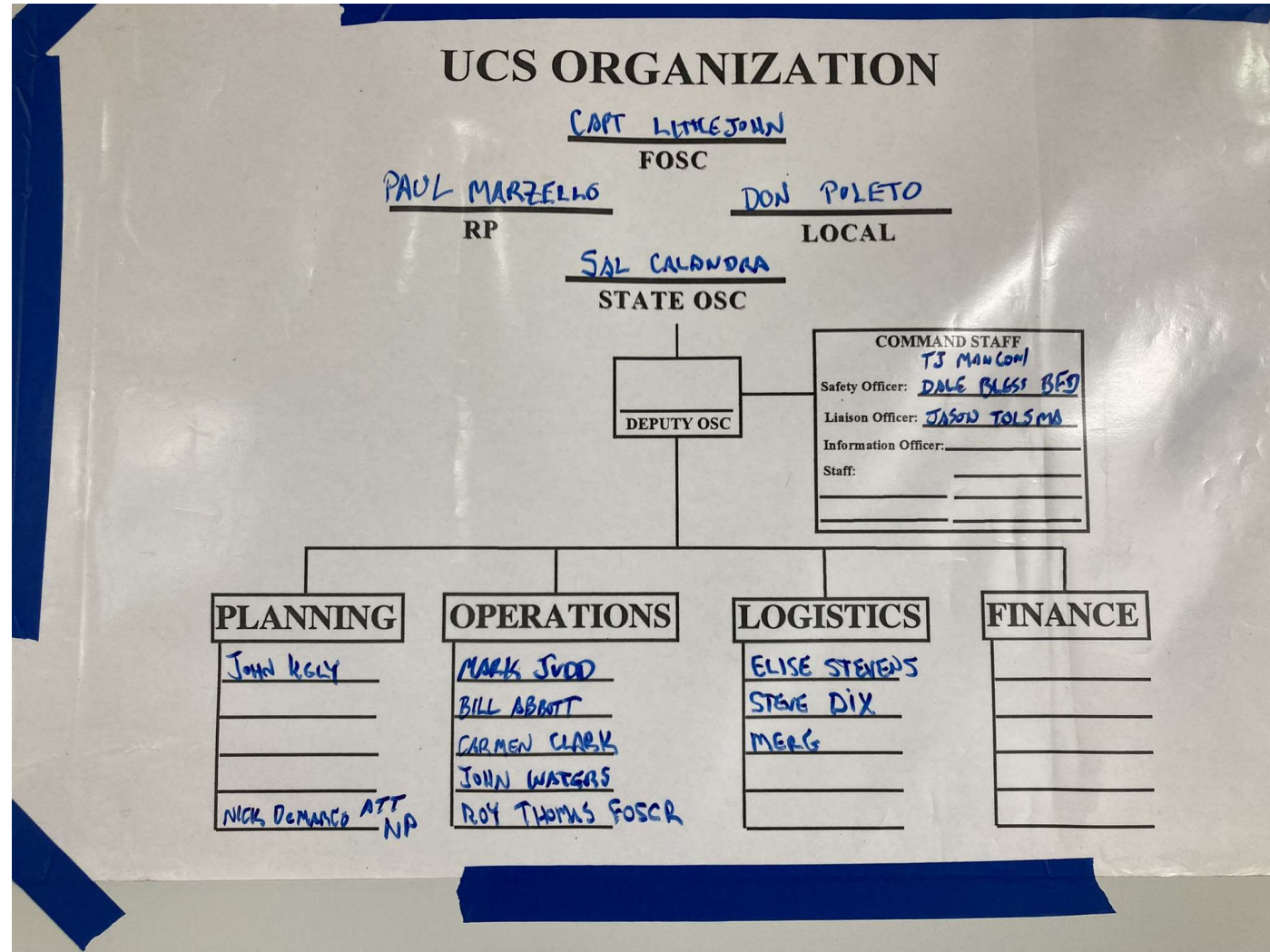
UNIFIED COMMAND

Unified team effort which allows all agencies with jurisdictional responsibility for the incident, either geographical or functional, to manage an incident by establishing a common set of incident objectives and strategies. This is accomplished without losing authority, responsibility or accountability.

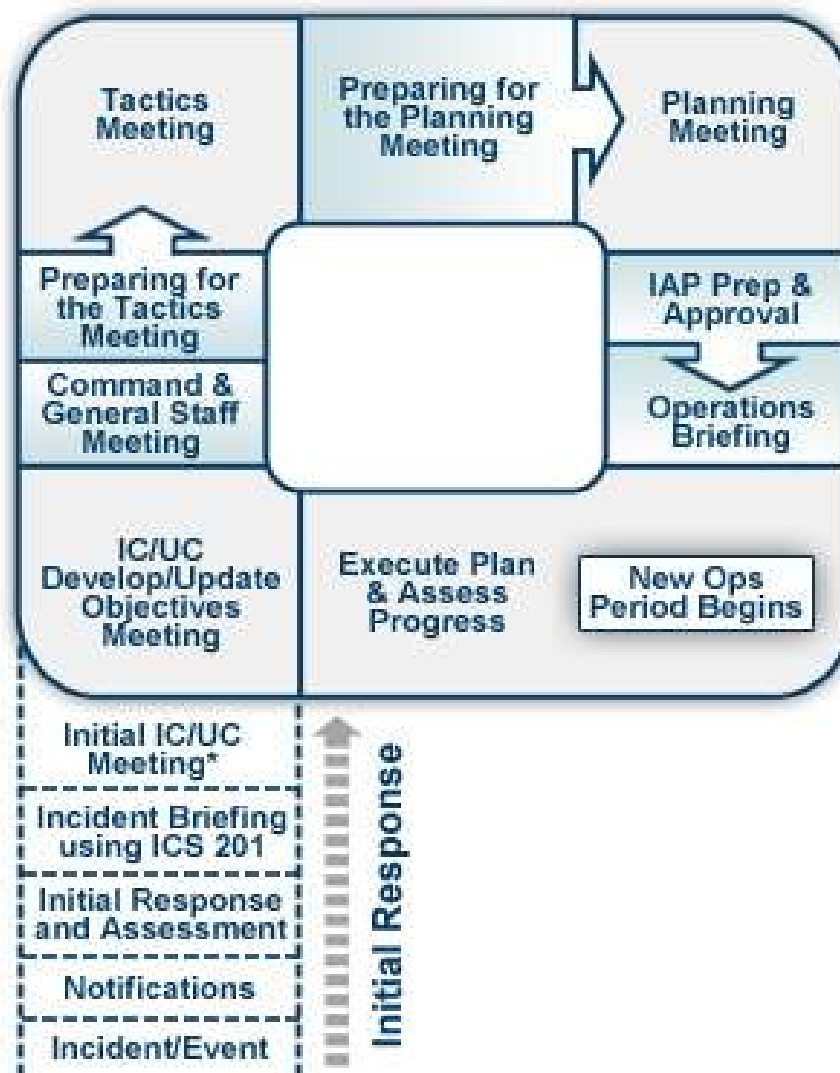


Incident name:
Save The USS the Sullivans
Response

- NYSDEC
- US Coast Guard
- City of Buffalo
- Naval Park
- NYS DHSES
- Buffalo Fire Dept.
- Erie County Sheriffs
- BIDCO
- Miller Environmental Group
- Insurance providers
- And many more



ICS Planning “P”



Priorities from the Incident Action Plan (IAP)

- Safety of responders & public
- Incident stabilization
- Environmental Impact
- Information management
- “Save the ship” and artifacts



The response:

- Booms
- Sweeps
- Absorbent pillows





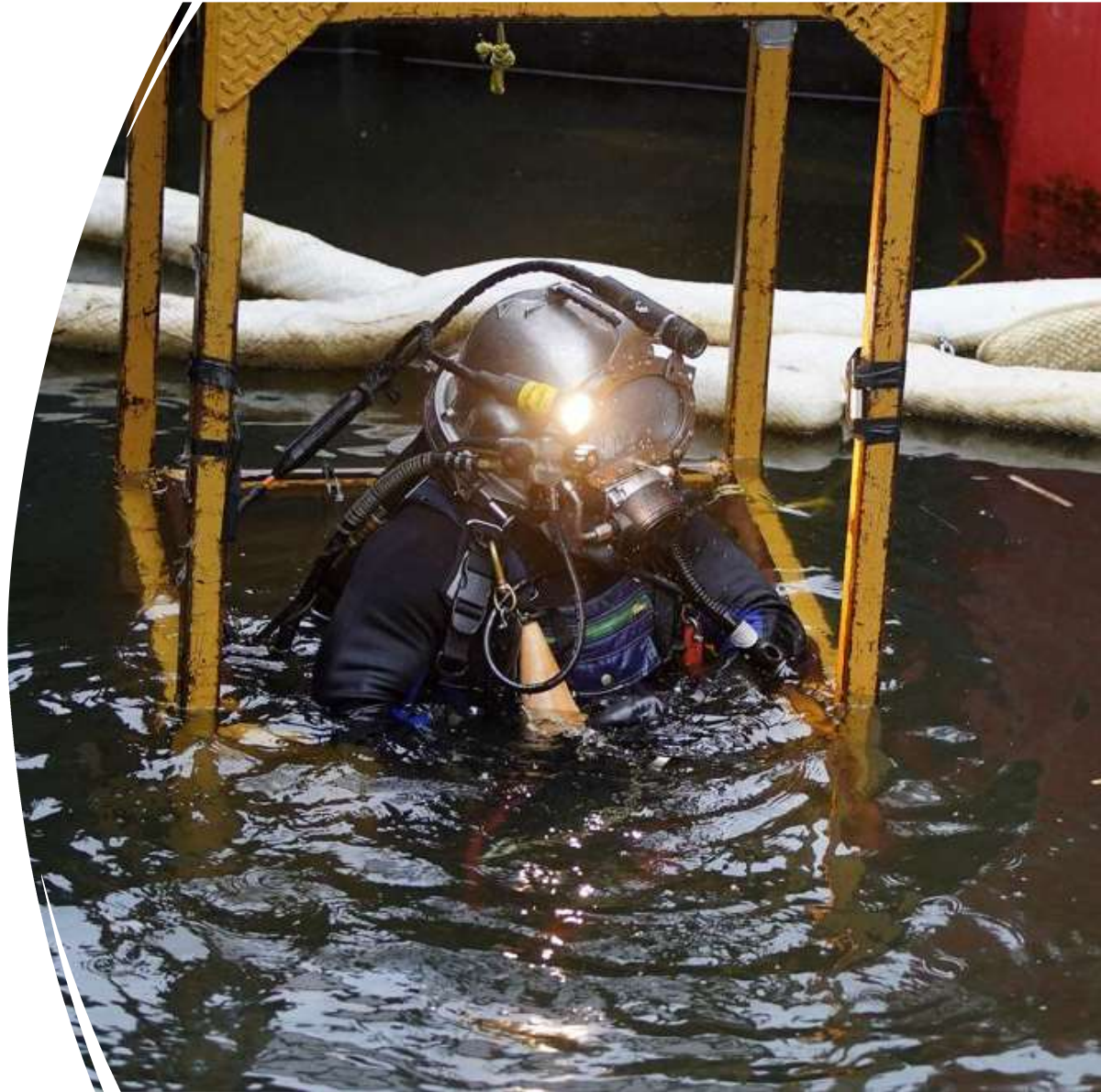
How did DEC participate?

- Provided key technical assistance and oversight through each phase of the incident.
 - Division of Environmental Remediation (Spills)
 - Division of Water
 - Emergency Management
 - Public Relations
 - Division of Law Enforcement
 - Regional Management
 - Executive Staff – Commissioner
 - Central Office staff



Incident stabilization

- Days 1-12
 - Pumping water
 - Oily debris
 - Containment
 - Patching holes in hull





Site Survey

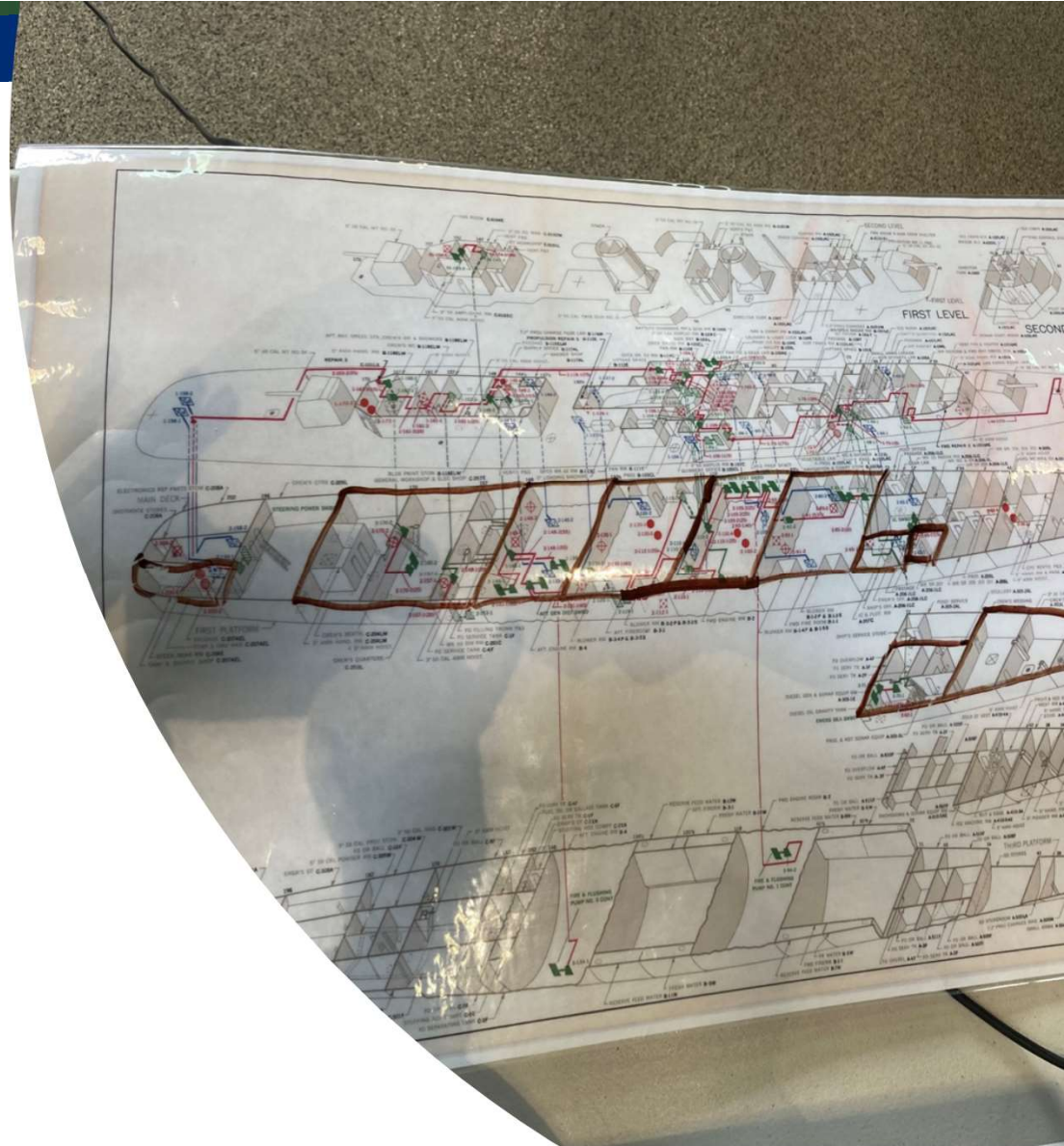




Salvage Team

- **T & T Salvage, TX**

- Naval Architect & Salvage Master
- Hull integrity
- Ship was at risk
- Pump tests (A, B, C)
- Refloat Plan - 15 stages
- Risk management
- Health and Safety
- Seiche vs tides





Day 13 - update

Refloat plan is submitted for UC approval

207,535 gallons have been pumped from ship

15 holes plugged

28 cu yd of oily debris removed

Ship listing at 14.1 degrees

7,510-gal of oily water in frac tank.



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Days 16-19

Addition breaches plugged – 57 in total

Dewatering begins as per refloat plan.

Deck is above the waterline

Booms and sweeps manage a minor amount of petroleum

Ship is listing 8 degrees



Water Discharges

- Pump intakes below the water surface, below floating oil
- Oil from lines, compressors, small sources
- Fuel tanks emptied previously

Air Monitoring

The Liberty Hound patio

Environmental Chemist
evaluated air quality
inside ship as sections
became accessible







Day 20 - May 3, 2022

- Ship is afloat and stable
- 24-hour operations will stop
- Response changes from Emergency to Decontamination phase
- DEC OSC roll transferred from Mike Emery to Francine (Spills).



Vessel Dewatering Plan

The current phase of the work is repair/maintenance and decon.

The plan is to dewater and decontaminate

The water on board per compartment:

A Compartments 31,509 Gallons

B Compartments 17,637 Gallons

C Compartments 74,978 Gallons

Decontamination Phase

- USCG to prepare “how clean is clean” memorandum for Unified Command approval
 - Interior
 - Exterior
- BIDCO to submit a decontamination plan
- Safety zone around ship will end





Day: 22-28

- Ship begins to take on water – again
- T & T Salvage consulted - corrective actions taken
- Day 26 – ship is stable
- Decontamination begins

The End

Update – \$7.5 million for the USS The Sullivans is in the Federal Spending bill passed in January 2023

Professional Development Hour (PDH) questions follow:

PE Questions

1 – Where was Incident Command System (ICS) developed?

- A. U.S. Army
- B. U.S. Coast Guard
- C. U.S. Forest Service
- D. EPA

PE Questions

1 – Where was ICS developed?

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- B. U.S. Coast Guard
- C. U.S. Forest Service
- D. EPA

PE Questions

2 – Who designs ships?

- A. Boat Engineer
- B. Navy Seaman
- C. Naval Architect
- D. Marine Engineer

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PE Questions

3 – What is a Seiche?

- A. A French Swiss word meaning dry
- B. The 'bathtub' effect of wind blowing across a water body
- C. Elevation of Lake Erie in Buffalo increases due to wind
- D. Elevation of Lake Erie in Buffalo decreases due to wind
- E. None of the above
- F. All of the above

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PE Questions

4 - What was NOT used to during the stabilization of the USS The Sullivans?

- A. Underwater drone
- B. Gas monitor
- C. Inclinator
- D. Hammer
- E. Magnets
- F. Oil absorbent pigs and wipes
- G. None of the above

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PE Questions

5 – What does it mean when the water was communicating?

- A. It was calling a friend for help
- B. It was flowing freely between the inside of the ship and the river
- C. It was indicating how level the ship was
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Questions ?

Thank you