

Accreditation and Credentialing Division 10370 Richmond Ave., Suite 760 www.iadc.org Houston, Texas 77042

8 September 2014

Docket Management Facility (M–30) U.S. Department of Transportation West Building Ground Floor, Room W12–140 1200 New Jersey Avenue SE. Washington, DC 20590-0001

Re: Training of Personnel and Manning on Mobile Offshore Units and Offshore Supply Vessels Engaged in U.S. Outer Continental Shelf Activities (USCG-2013-0175)

To whom it may concern:

The purpose of this letter is to respond to the Coast Guard's 14 April 2014 ANPRM, proposing the expansion of the maritime safety training requirements to cover "all persons other than crew" working on Offshore Supply Vessels (OSVs) and Mobile Offshore Units (MOUs) engaged in activities on the U.S. OCS.

The opinions offered in this letter are intended to supplement the detailed comments submitted by IADC on 5 September 2014. All comments submitted by IADC are separate from and without partiality to any comments that may be offered by IADC members or by the individual companies represented in IADC committees.

Our Members and Their Mission

The **Accreditation and Credentialing Division** of the International Association of Drilling Contractors (IADC), a nonprofit organization, seeks to improve safety for the upstream oil and gas industry by providing an international, industry-wide forum for setting safety training standards and focusing on specific safety issues.

This forum includes IADC's Workforce Development Committee, Well Control Committee, and HSE (Health, Safety, and Environment) Committee, as well as the many workgroups that these committees support. These three committees alone comprise several thousand members representing hundreds of companies worldwide, many of which are currently operating mobile offshore drilling units in the areas subject to the jurisdiction of the United States. (IADC provides a similar forum for at least 17 additional committees that function outside the general purview of the Accreditation and Credentialing Division.)

We are successful in securing the buy-in of participating companies because they understand that safety belongs in the "noncompetitive space" of our industry. The safety record of every company affects every other company. Our members also believe that they are on the front lines of safety in this industry and are, therefore, in the best position to develop and promote the training standards.

We support significant industry involvement in any standards adopted by the US Coast Guard, and we support voluntary conformance to these standards, which will accomplish the intended results because the people who participate can communicate the importance of and reasons for compliance.

Recognition of Existing Training Standards and Accreditation Programs

Before new regulatory requirements are imposed, IADC's Accreditation and Credentialing Division believes the Coast Guard (in consultation with BSEE) should carefully assess the industry's existing training and certification systems to ascertain if they can be incorporated by reference through either Coast Guard or BSEE regulations.

In this regard, we would note that, contrary to the Coast Guard's assertion that there is no overlap with BSEE regulations, BSEE's SEMS regulations (30 CFR 250.1915) require that the lease holder's SEMS program "establish a training program so that all personnel are trained in accordance with their duties and responsibilities to work safely and are aware of potential environmental impacts." The regulation goes on to specify that, in addition to other subjects, this training must address "emergency response and control measures." Vessels attached to the seabed and engaged in OCS activities are subject to BSEE's SEMS regulations.

A variety of IADC industry-based offshore safety training standards already meet the objectives of the ANPRM and have been implemented. Some of these standards meet many, if not all, of the elements of A.1079(28), as well as the other categories of training addressed by the ANPRM. Through the work of its committees, IADC's Accreditation and Credentialing Division has developed guidelines for and currently accredits the following:

- Well Control Training (WellCAP)
- Offshore Basic Personal Safety Orientation (RigPass/SafeGulf)
- **HUET** (Helicopter Underwater Escape Training, including water survival, with separate training for warm and cold water)

IADC also offers a **Competence Assurance Program** (including industry recommendations for setting up a successful competence program) that accredits company-specific programs, which by nature benefit from and influence job-specific training.

As the authoritative body in the drilling space, IADC encourages the USCG to recognize the programs described in this letter for the purposes of fulfilling the regulatory intent of this ANPRM. Training modules/content, course delivery, and other parameters for these programs are provided in appendices to this letter:

- Appendix A: A summary of IADC's Well Control Training (levels, curriculum, instructor requirements, industry participation, etc.)
- Appendix B: IADC's RigPass/SafeGulf curriculum (offshore orientation for personal safety)
- Appendix C: The HUET curriculum, course-delivery, simulation, instructor, and other requirements
- Appendix D: Requirements for accreditation under IADC's Competence Assurance Program

In addition to providing criteria for implementing and maintaining these programs, IADC's Accreditation and Credentialing Division holds training providers and in-house company programs accountable by periodically auditing the programs to ensure that they conform to the requirements consistently. IADC's Quality Assurance and Quality Control Division follows up on nonconformance findings, as well as any complaints received from trainees and their employers.

Additional Training Standards and Related Programs in Development

IADC's Accreditation and Credentialing Division has made significant progress toward developing several new programs that we expect to fit well with our existing programs and to further improve safety offshore:

- **Crane Operator and Rigger Training Accreditation** (Phase I completion by the end of 2014)
- The Workforce Attraction and Development Initiative, designed to recruit, screen, and train "pre-hires" for the industry, primarily through community colleges nationwide (Phase I implementation by the end of 2014)
- The Knowledge, Skills, and Abilities (KSA) Database (now available free of charge and undergoing updates)
- **Train-the-Trainer** (applicable to multiple programs and slated for implementation in 2015)

Phase I of the Crane-Rigger Accreditation Program includes curriculum for crane operator and rigger training, as well as the accreditation criteria. This program will help to ensure that such training is appropriate and consistent and that instructors are qualified to teach the material. The industry workgroup finalizing these requirements aims to exceed API's RP-2D. In Phase II, the workgroup will complete the curriculum for crane inspectors and will finalize the requirements for the Crane Operator and Rigger Competence Program. The Workforce Attraction and Development Initiative began with a "pilot" program involving three Houston community colleges and now comprises more than 40 college systems, some of which have an international reach. Phase I of this program is slated for completion by the end of 2014 with a curriculum and screening criteria for the pre-hire course ready for implementation. Participants are planning several events to recruit new candidates, including returning veterans, to the oil and gas industry. In future phases of this project, the colleges plan to develop additional courses, such as Leadership and a variety of career pathway/advancement courses. This program is significant to the offshore industry because the intent is to systemically improve the industry's safety culture from the ground up by screening and preparing new hire candidates more effectively.

IADC's KSA Database was launched in June 2014, and new material is continuing to be uploaded. This database provides the baseline competency requirements for 73 rig-based positions and will remain evergreen as the competencies continue to be improved and updated. The intent of this database is to assist companies in developing their competence programs and to measure their existing programs against the baseline competencies set by the industry. The database is also expected to help educate the public on the requirements of oil and gas positions.

Development on the Train-the-Trainer Program was initially launched as a means of ensuring quality and consistency among well control instructors, as well as consistent delivery of the material. (Well control instructors will be required to successfully complete this training.) IADC contracted SMEs in adult learning to help create a curriculum and performance outcomes for the training, and work is now beginning on accreditation criteria. Training providers who choose to seek this accreditation will be expected to meet the minimum requirements and submit to audits of their program. IADC anticipates this program to reach beyond the well control training providers and benefit additional trainers in the oil and gas industry in the future.

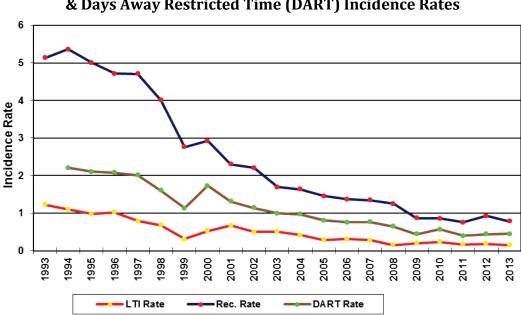
There is also work in various stages of completion on a number of new programs that will support the US Coast Guard's efforts to optimize offshore training for all workers in their jurisdiction. These new programs will be introduced as they become more well defined.

Practicality of Additional Regulatory Requirements

IADC's Accreditation and Credentialing Division urges the Coast Guard to avoid any regulatory approach that would require OCS workers to obtain additional U.S. governmentissued credentials. While the costs associated with implementing such requirements would be objectionable, the delays and uncertainties associated with such a program would be intolerable, particularly for entry-level employees, those employees already possessing credentials for training obtained overseas that meets the objectives of this ANPRM, and those foreign workers who are authorized to be employed on the U.S. OCS.

Evidence of Progress through Safety Training

IADC tracks incident statistics submitted by its member companies both onshore and offshore. The following chart shows clear progress toward improving the safety of industry personnel, which IADC attributes to the focus on safety at committee meetings and efforts to provide consistent training and application of competence guidelines.



U.S. Water Total Lost Time (LTI), Recordable (Rec.), & Days Away Restricted Time (DART) Incidence Rates

IADC's Accreditation and Credentialing Division appreciates the opportunity to provide comments regarding this ANPRM and requests that our comments be given due consideration. If you have any questions about any portion of this correspondence, please contact IADC's Accreditation and Credentialing Division at 713.292.1945.

Sincerely,

Breuda Lelly

Brenda Kelly Senior Director – Program Development



Appendix A:

IADC's Well Control Training

WellCAP

Currently three training levels are in use:

- 1. Introductory
 - Provides an overview of well control equipment and basic well control principles.
 - Recommended for Floorhands, Derrickhands
- 2. Fundamental
 - Designed for personnel with direct well control responsibilities.
 - Required for Drillers and above.
- 3. Supervisor
 - Level focuses on all aspects of well control to include kick detection and shut in as well as principles of killing a well.
 - Recommended for Toolpushers and above.

Changes to WellCAP:

WellCAP is in the process of being completely overhauled to address the changing needs of the industry. The new WellCAP will comprise 5 levels and will be focused on learning and retention with emphasis on training design specific to job roles and responsibilities.

Primary goal of the new standard is improved kick detection and shut in.

In addition to updates to the curricula structure and content, instructor qualifications and assessment requirements are being updated. New Instructor requirements will improve the quality of instruction and provide clear paths for the development of instructors.

In response to a need for improved knowledge assessment an electronic centralized testing system is being developed. The new system will standardize WellCAP's knowledge test globally.

The new standard is in the late stages of development and will be launched in 2015.

New Level Requirements

- 1. Awareness
 - Replaces the existing Introductory course.
 - Meant for personnel without well control responsibilities
- 2. Introductory
 - Increased from a one day to a two day course. Increased level of understanding of well control principles and kick detection.
 - Recommended for Floorhands, Derrickhands
- 3. Driller
 - Will replace the Fundamental level
 - Designed for personnel with direct well control responsibilities.

- Primarily focused on kick detection and shut-in.
- Required for Drillers and above.
- 4. Supervisor
 - Level focuses on all aspects of well control to include kick detection and shut in as well as principles of killing a well.
 - Recommended for Toolpushers and above.
- 5. Engineer
 - Level will focus on well design and construction.
 - Required for personnel involved in the initial design of well programs.



Appendix B:

IADC's Offshore Orientation for Personal Safety

RigPass Curriculum

The following 13 pages comprise the full RigPass curriculum, which is endorsed by SafeGulf.

	Торіс	WHERE PROVIDED	How Instructed	How DOCUMENTED OR MEASURED	Time Allotted
Ι.	GENERAL SAFETY	-	-	-	
Α.	Principles				
1.	Employee safe work practices are a condition of employment				
2.	Workplace injuries are preventable				
3.	Lead through example				
4.	Safety is important both on and off the job				
5.	Each individual's safety performance has a direct bearing on his/her employer's ability to work in the industry				
6.	Workplace injuries are costly				
7.	Benefits of safe behavior r/ Attitude is contagious				
8.	Fatigue and regulated rest periods				
В.	Alcohol and Drug Policies				
1.	Government regulations / Company requirements				
2.	Defined / where posted				
	a. Contractor				
	b. E&P operator (if different)				
3.	Supervisor responsibilities, training, reasonable suspicion				
4.	Employee awareness: effects and consequences				
5.	Searches and seizures				
6.	Testing				
7.	Reporting of prescription medications				
8.	Prohibit drug paraphernalia				
C.	Firearms, Weapons and Other Prohibited Items	• • • • • • • • • • • •			
	Firearms, ammunition, clubs, illegal drugs, alcohol, lighters/matches, explosives				
2.	Stolen items, contraband, cell phones				
D.	Personal Conduct				
1.	No horseplay or practical jokes				
2.	Observe smoking restrictions				
3.	Practice respect for co-workers a. No ethnic, racial, religious or sexual harassment or jokes				
	b. No profanity				
	c. No excessive noise				
	d. Proper dress on and off duty				
	e. Attend to personal hygiene				
4.	Workplace violence				
	a. Recognition of				
	b. Responsibility to report				
	Items that may be prohibited (stolen items, contraband, cell phones, highly caffeinated energy drinks)				

Ε.	General Worksite Safety				
1.	Worksite hazards - types				
	a. Electric (shock)				
	b. Mechanical (caught between/struck by)				
	c. Gravity (dropped objects)				
	d. Pressure (air, drilling mud, gas)				
2.	Behavior-based safety				
	a. Overview				
	b. Roles and responsibilities				
3.	Intervention / Stop work				
5.	•				
	a. Management support of intervention				
-	b. Employee authority and responsibilities				
	c. Examples of intervention				
4.	Job Safety Analysis/Job Hazard Analysis (JSA/JHA)				
	a. Roles and responsibilities of hazard identificationb. JSA Elements (job steps, hazard identification,				
	mitigation)				
5.	Pre-job planning meeting				
6.	Site and unit specific orientation				
7.	Simultaneous operations/communications				
8.	Globally Harmonized Safety Signage & Placards				
9.	When operator and contractor rules differ				
	Chain of command / reporting structure				
	· ·				
F.	Manual Hand Tool and Power Hand Tool Safety Inspect before use, including electrical cords, GFCI	•••••	·····	· · · · · · · · · · · · · · · · · · ·	
1.	or welding leads				
2.	Take unfit tools out of service				
3.	Use appropriate tools for the task (Do not alter tool or				
	use cheater bar, pipe or other unapproved device to increase torque of a tool.)				
4.	Alternative cutting tools (pocket knife, machete, bush				
_	knife, hatchet)				
5.	Proper use of hand and power tools				 ••••
G.	Housekeeping				
1.	Importance				
2.	Proper housekeeping practices				
	a. Proper storage				
	b. Walkways and aisles				
<u> </u>	c. Spills and trip hazardsd. On the job				
	e. Signs, cones, barriers and barricades				
Н.	Walking Working Surfaces				
1.		1	1	1	1000
	Overview				
2.	Overview Guarding floor and wall openings and holes				
2. 3.					

Ι.	Reporting and Investigating Incidents		<u></u>
1.	Causes of incidents		
2.	General procedures		
	a. When and how to report an incident		
	b. Bodily injury and first aid		
	c. Property damage		
	d. Vehicle accidents		
	e. Near miss events		
	f. Uncontrolled and/or unauthorized release to the environment		
	g. Potential hazardous conditions		
3.	Purpose of incident investigation		
4.	Employee responsibility in incident investigation		
	Les IT serves at the	000000000000000000000000000000000000000	
J.	Land Transportation		
1.	Overview/Statistics		
	a. Valid driving licenses, certifications, endorsements		200000000
	b. Journey management (trip planning)		
	c. Load securement, offloading		
2.	Vehicle condition/Inspection		
3.	Driving practices		
	a. Motor vehicle laws		
	b. Defensive driving		
	c. Vehicle safety restraints (seat belts, airbags)		
	 Road hazards/adverse weather – (road conditions – wildlife) 		
	e. Parking (back in, location hazards)		
	f. No cell phone use while driving/Driving distractions		
	g. Driving under the influence		
	h. Fatigue		
	i. Texting-while-driving		
То	tal Time Allotted for Section I		

	Торіс	WHERE PROVIDED	How Instructed	How Documented or Measured	Time Allotted
11.	PERSONAL PROTECTIVE EQUIPMENT (PPE)				
Α.	PPE Overview				
1.	Eliminate, control, protect				
В.	Determining What PPE Is Needed				•
F.	Employee orientation				
G	Job planning orientation				
н	Site specific orientation				
Ι.	Operator's and Contractor's safety policies				
Í.	Personal preferences				
6.	Elimination of uncertainties asking co-workers or supervisors				
C.	Head Protection				
1.	Туреѕ		T		
2.	Inspection				
3.	Care and use				
D.	Face and Eye Protection]
1.	Types a. Protection				
	a. Protection b. Limitations				
	c. Use in combination				
2.	Inspection				
3.	Care and use				
E.	Hearing Protection	* * * * * * * * * *			
1.	Types		T	Τ	
	a. Protection				
	b. Limitations				
	c. Use in combination				
2.	Inspection				
3.	Care and use				
F.	Foot Protection				
1.	Туреѕ				
2.	Inspection				
3.	Care and use				
G.	Hand Protection				
1.	Causes of hand injury				
	Hand protection PPE				
	a. Types		1	1	
	b. Inspection		1		
-	c. Care and use				
	c. Gare and use				

Н.	Respiratory Protection	
1.	Medical Questionnaire/test	
2.	Fit testing	
3.	Types of respirators	
4.	Types of canisters	
5.	Inspections	
6.	Care and use	
١.	Fall Protection	
1.	Types	
2.	Inspection	
3.	Care and use	
J.	Other PPE	
1.	Specialty protective clothing	
2.	Care and use	
То	tal Time Allotted for Section II	

	Торіс	WHERE Provided	How Instructed	HOW DOCUMENTED OR MEASURED	TIME ALLOTTED
III .	HAZARD COMMUNICATION AND MATERIALS HAN	IDLING	-	-	-
Α.	Types of Hazards				
1.	Hazard communications				
2.	Written plan				
3.	Chemical inventory hazardous materials				
4.	Container labeling				
5.	Safety Data Sheet (SDS)				
	a. Definition				
	b. Location				
6.	Safety equipment and employee responsibilities				
7.	Training requirements				
В.	Transportation of Hazardous Materials				•••••
1.	Must be accompanied by safety data sheet or a copy of the emergency response guidebook or equivalent.				
2.	Container must have proper labeling, marking or placarding				
3.	Must be accompanied by a properly completed shipping paper				
C.	Uncontrolled/Unauthorized Release of Hazardous Materials				
1.	Report the incident to the person in charge				
2.	Do not respond to the release unless properly trained				
Tin	ne Allotted for Section III				

	Торіс	Where Provided	How Instructed	HOW DOCUMENTED OR MEASURED	TIME ALLOTTED
IV.	OCCUPATIONAL HEALTH	-	-	-	-
Α.	Overview				
В.	Employee's Roles and Responsibilities in Dealing with Industrial Hygiene Hazards				
1.	Do not handle or dispose of health hazards unless specifically trained or certified				
2.	Report any suspicion of a health hazard to the person in charge				
3.	Exposure Types (skin contact, inhalation, radiation, [ionizing & non-ionizing], noise, etc.)				
4.	Monitoring for and Mitigating of hazards				
C.	Potential Hazards at the Work Site				
1.	Hydrogen sulfide (H2S)				
2.	Respirable Crystalline Silica				
3.	Diesel mist (oil-based mud)				
4.	Noise				
5.	Others (benzene, lead, CO ₂ , NORM, mercury, diethanolamine, hexavalent chromium, methanol, welding fumes, N ₂ , fibers [asbestos, mineral, etc.], fumes, liquids, weather, dust, biological, etc.)				

Total Time Allotted for Section IV

	Торіс	WHERE PROVIDED	How Instructed	HOW DOCUMENTED OR MEASURED	TIME Allotted
V.	SPECIALIZED WORK PROCEDURES				
Α.	Hazardous Energy				
1.	Types (electrical, kinetic, potential, thermal and chemical)				
2.	Energized vs. de-energized				
3.	Control of Hazardous Energy				
B.	Lock-out/Tag-out				
1.	Overview and definitions				
2.	Roles and responsibilities				
3.	Procedures				
	a. Placing lock and/or tag Lockout, tag-out, verify				
	b. Group lockout (multiple workers)				
	c. Removing lock(s) or tag(s)				

C. \	Work Permits		 •••••
1. 0	Overview		

2. Types		
a. Confined space		
b. Hot work		
c. Other (critical lifts, etc.)		
3. When work permits required		
4. Employee roles and responsibility		8888888888

D. Confined Space	
1. Examples of confined space	
2. Hazards	
3. Roles and responsibilities	888888888888888888888888888888888888888
4. Procedures	
5. Training is required	

Е.	Working at Heights		
1.	Overview		
2.	Only work to your level of training		
3.	Responsibilities – Prevention of dropped objects and falls		
4.	Equipment for working at heights (manlifts, fall protection systems)		

F. Hoisting and L	ifting		
1. Overview			
2. Personnel Hois	ing		
3. Critical equipme	ent/material lifts		

Total Time Allotted for Section V

Торіс	WHERE PROVIDED	How Instructed	HOW DOCUMENTED OR MEASURED	TIME ALLOTTED
VI. FIRE SAFETY	-	-	-	
A. Overview of Fire Protection, Prevention, and Detection				
1. Fire triangle				
2. Storage of flammables & combustibles				
a. Ignition sources				
b. Classes of fires				
c. Extinguishing methods/Types of extinguishers				
B. Employee Responsibilities				

6.	Observe all precautions and procedures	
7.	Participate in site specific fire drills	
8.	Be aware of location and position of exit routes	
9.	Know your responsibilities, station bill (muster list) and/or emergency evacuation plan	
	and/or emergency evacuation plan	

Total Time Allotted for Section VI

Торіс	WHERE PROVIDED	How Instructed	HOW DOCUMENTED OR MEASURED	TIME ALLOTTED
VII. MATERIALS HANDLING				
A. Mechanical Equipment				
 Rules to follow when working around cranes/cherry pickers/forklifts 				
a. Do not stand/walk under a suspended load				
 b. Do not position yourself between a suspended load and an immovable object 				
c. Always maintain communication with the operator				
d. Always stand clear of lines and rigging				
e. Never ride on a load				
 Be aware of your surroundings and always have a way out 				
g. Pay attention to backup/movement alarms				
 h. Understand dangers associated with electrical lines in close proximity 				
i. Never operate a crane or forklift unless you are certified and authorized to do so				
j. Always use tag lines				
k. Inspect slings & rigging before each use				
B. Manual Material Handling				
1. Personal Lifting Techniques and Back Protection				
2. Why back injuries occur/back injury prevention				

a.	Review of lifting techniques
b.	Alternatives to lifting

Total Time Allotted for Section VII

	Торіс	WHERE PROVIDED	How Instructed	HOW DOCUMENTED OR MEASURED	TIME ALLOTTED
VIII. HEALTH & FIRST AID					
Α.	General				
1.	In the event of injury, call for help and report injury to the person in charge				

2.	Be familiar with site specific first aid station locations		
3.	Know location of emergency phone numbers		
4.	Respond to the extent that you are trained		
5.	Fit for duty		

В.	Blood-borne Pathogens		
1.	Definitions		
2.	Precautions		
	a. Avoid contact with blood or bodily fluids	ž i kali kali kali kali kali kali kali ka	
	i. Use latex gloves or CPR barrier kits		
	 Use care when handling used razor blades, needles or other sharp objects 		
	 iii. Contaminated first aid materials (biohazards) must be properly handled in accordance with the site specific plan 		
	b. Report all exposures immediately	X X X X X X X X X X X X X X X X X X X	

C. Health & Adverse Weather	
1. Lightning	
2. Windstorms	
3. Hurricanes/Typhoon	
4. Tornados/Cyclone	
5. UV Exposure	
6. Snow & Ice	
7. Flooding	888888888
 Thermal Stress (heat stress, heat exhaustion, hypothermia, frostbite) 	

D. Health & Wildlife, Insects, & Snakes	
1. Snakes	
2. Insects (e.g., wasps, bees, mosquitoes, etc.)	
3. Spiders, scorpions	
 Wildlife (e.g., alligators, moose, bears, cougars, wolves, etc.) 	
5. Rabid animals	

Total Time Allotted for Section VIII

	Торіс	WHERE PROVIDED	How Instructed	HOW DOCUMENTED OR MEASURED	TIME Allotted
IX	IX. RIG/PLATFORM ENVIRONMENT				
Α.	A. Platform or Location Arrival Procedures				
1.	Use caution when using walkways (maintain good footing and balance)				

2.	Keep one hand free to hold handrails		
3.	Get help with baggage or make multiple trips		
4.	Sign in at checkpoint with person in charge or dispatcher		
	diopatoriol	l	

В.	Home Away From Home			
1.	Be prepared for unexpected extended stays			
2.	Bring sufficient quantities of personal items			
C.	Understand the Site-specific Orientation (Ask Questions if You Do Not Understand)			

D.	Simultaneous Operations	
1.	Examples	
2.	Precautions	
Е.	Security Awareness	

Total Time Allotted for Section IX

	Торіс	Where Provided	How Instructed	HOW DOCUMENTED OR MEASURED	TIME ALLOTTED
Х.	EMERGENCY RESPONSE				
Α.	Planning for Emergencies				
1.	Plans and contingencies				
2.	Short service employees				

B. When to Evacuate

C. Alarms	
1. Types	
a. Fire	
b. Blowout	
c. Abandon rig	
d. H ₂ S	
e. Combustible gas	
f. Man overboard (if applicable)	
g. All clear	
2. Actions to take	
a. Evacuation routes	
 b. Locations of emergency equipment and muster areas 	
c. Location of emergency contact information	
Total Time Allotted for Section X	

Торіс	WHERE Provided	How Instructed	How Documented or Measured	Time Allotted
XI. WELLSITE ENVIRONMENTAL PROTECTION				
A. Overview				
1. Regulations and compliance				
B. Waste Management				
1. Types of waste				
2. Properly store waste (all waste go into designated containers)				
a. Minimize waste				
b. Employee responsibilities				
C. Leaks, Spills, Releases	• • • • • • • • • • • • •			
1. Response and reporting				
D. Overview of HAZWOPER				
 Only properly trained employees should respond to a hazardous material release/spill 				
Total Time Allotted for Section XI				
Total Time Allotted for Sections I through XI				

NOTE: The program self-study for Section XII and XI	E ENDORSEMEN V is required or Endorsement		ograms seeking	to qualify for
Торіс	WHERE Provided	How INSTRUCTED	How DOCUMENTED OR MEASURED	TIME ALLOTTED
XII. TRANSPORTATION	-	-		
A. Arrival at Shorebase				
1. Check in with dispatcher or person in charge				
2. Inquire as to site specific orientation				
 Identify carry-on baggage (weight, quantity, hazardous materials) 				
4. Stand-by in designated waiting area until instructed to proceed by dispatcher or person in charge				
B. Helicopter Transportation				
1. The Pilot is in command and has complete authority				
2. Helicopter boarding and unboarding				
a. Board only when instructed to do so by pilot				
b. Avoid the main rotor and tail rotor				
c. Secure loose items and hats				
d. Keep all objects over 4 feet in the horizontal position				
e. Secure personal baggage in the baggage compartment. Never go aft of the baggage compartment.				
3. No smoking in and around helicopter				
4. Wear seat belt and the PFD provided in the helicopter				
5. Alert the pilot to anything unusual inside or outside the craft				
6. Be attentive during helicopter orientation				
C. Boat Transportation				
 The captain is in command and has complete authority 				
2. Wear your PPE when boarding or leaving the vessel				
 Report to the vessel crew for seating assignment and baggage storage 				
 Study the vessel station bill and know your responsibilities in case of an emergency 				
D. Swing Ropes				
1. Locations				
2. Types				
3. Use				
E. Personnel Baskets				
1. Description				
2. Procedures				

F.	Arrival at the Rig/Worksite		

Total Time Allotted for Section XII

Торіс	WHERE PROVIDED	How Instructed	HOW DOCUMENTED OR MEASURED	TIME Allotted
XIII. WATER SAFETY			-	
A. Personal Flotation Devices & Donning PFD				
B. Survival Craft				
C. Standby Rescue Vessel				

Total Time Allotted for Section XIII

Торіс	WHERE Provided	How Instructed	HOW DOCUMENTED OR MEASURED	TIME Allotted
XIV. MARINE DEBRIS	-	-	-	-
A. Identification				
B. Reporting				
Total Time Allotted for Section XIV				

Total Time Allotted for Sections XII through XIV	
--	--



Appendix C:

IADC's Helicopter Underwater Escape Training

HUET

Curriculum and Other Requirements



A Challenge from the Oil and Gas Operators

IADC accepted the challenge, presented by a group of Operators, to build a HUET course customized for the Gulf of Mexico (GoM). The Operators (e.g., Anadarko, BP, Chevron, Hess, Marathon, and StatOil) approached IADC with their idea to develop a new HUET course that focuses on the most critical aspects of helicopter safety and provides the most realistic experience possible. They envisioned that such training, if accredited and audited for quality and consistency, would enhance safety for personnel traveling by helicopter to offshore locations in the GoM. IADC formed a team of experts from industry to answer that question and, based on their findings, to recommend requirements for a new, improved course.

Why HUET Matters

According to statistics from 13 helicopter operators in the GoM from 2008 to 2012, there were between .9 and 1.25 million individual flights transporting as many as 3 million passengers per year to offshore work locations (Helicopter Safety Advisory Conference [HSAC], April 2013). There were 23 helicopter ditchings and 15 resulting deaths in the GoM between 2008 and 2012.

Based on incidents recorded by the Bureau of Labor Statistics, a 2013 report by the US Centers for Disease Control concluded that "transportation events (specifically helicopter crashes) were the most frequent fatal event in this industry." One of the recommendations of this report was to ensure that all pilots and passengers complete helicopter underwater escape training.

Survivor Accounts

Research on the topic of offshore helicopter transport, as well as news stories and anecdotal accounts of accidents, support what we already know: HUET training pays off. In several recent helicopter ditchings, the survival of the passengers and crew was attributed to the extensive training they had received before transport.

A survivor from a helicopter ditching in 2002 provides his perspective on the importance of training: "My advice would be to take the training seriously and, when you're flying, play over and over in your mind what you're going to do if there is an emergency. Visualize yourself egressing, opening hatches, look at EVERYTHING in the cabin, and memorize as best you can the shapes of things and landmarks because you will probably have to escape by feel."

Designing the Training to Maximize Survival

IADC's HUET training is a 1-day course designed based on the best approaches to improving training transfer and muscle memory. Training providers will be accredited only after their programs have been fully vetted and audited to ensure that they consistently meet the high standard established for the course. This course, built by the industry for the industry, focuses on the specific knowledge and skills needed to prepare personnel for helicopter transport to warm-water work locations.

The HUET Development Team researched standards and programs developed by other organizations, such as the US Coast Guard; API; BSEE/SEMS; the US, Australian, and Canadian aviation authorities; and the IADC North Sea HUET program.

The curriculum consists of 6 training modules and 21 practical exercises that correspond to the training modules:

- General Helicopter Safety and PPE
- Onboard Emergency Equipment
- Immediate Response to an Emergency
- Escape from a Surface or Submerged Helicopter
- Survival at Sea
- Rescue Procedures

Based on research into the use of simulators, the HUET Development Team determined that highfidelity simulators should be required for course accreditation because these simulators provide the trainee with the most realistic experience possible. Most of the practical exercises involve escape from the simulator and water-survival techniques.

One crash survivor supported these course requirements as follows: "I personally would recommend as much pool time as possible. Talking about it is good to get the concepts into one's head, but being blindfolded and tossed around like a rag doll in the simulator while submerged is where confidence is built and real understanding happens."

For More Information

Requirements of the program are specified in the *HUET Handbook of Accreditation* (Document HUE-01) and the curriculum document (HUE-02), available on the IADC website: <u>www.iadc.org/huet</u>. The program is now accepting applications, which can be obtained from IADC's Accreditation and Credentialing Division through the email address <u>huet@iadc.org</u>.



Appendix D:

IADC's

Competence Assurance Accreditation Program

Requirements for Accreditation

IADC's Competence Assurance Accreditation Program is a voluntary system open to all companies operating in the oil and gas industry.

Competence: An individual's combination of training, knowledge, and experience that enables the person to perform the job required in a safe and efficient manner.

Competence Assurance Accreditation: A structured and documented method of managing the competence of company personnel.

Accreditation Criteria

IADC's Competence Assurance Accreditation Program assists industry professionals in developing and delivering their own programs using consistent, effective, and well-managed processes for achieving employee competence.

IADC established this international program to help companies develop more effective ways to achieve and maintain employee competence consistently on a scope determined by the company. Companies in the oil and gas sector are encouraged to join this effort by developing programs in conjunction with the goals of CAA.

- Competence policy and program procedures defined, documented, and implemented
- Positions, tasks, or categories for which employees' competencies will be assessed
- Method of defining competencies
- Assessment System—a means to assess an employee's competence
- Resources to support the competence development process
- Recordkeeping System—a means of documenting all aspects of competence assessments
- Quality Assurance—a formal means of self-directed review and auditing for adherence to the published policies and procedures; reporting of results

Accreditation Decision

The decision to accredit a program is made by IADC and is based on application documents submitted for review, a program site visit, and the recommendation of the site visitor.

Resources

IADC workgroups have developed a Knowledge, Skills, and Abilities Database that provides the competence requirements for at least 73 rig positions. Companies are free to use this database in building their own competence programs, and they can customize the list of competency line items to match the needs and requirements of their company.

Another IADC workgroup has developed a document called the Competence Guidelines, which provides best practices for developing a competence program.