Required Underway Drill Checklists

Introduction:
This section provides required underway drill checklists and capabilities used by inspection team
The following codes are found within the drill checklists:

B - Boat Handling	P - Procedures
E - Electronics	S - Standard
N - Navigation	T - TCT/ORM
O - Operate	

Exercise: Day/Night Navigation and Piloting Performance

Objective: Pilot an Auxiliary facility and arrive at a given position within standards.

Conditions: Given an Auxiliary facility with up to date electronic chart (if used as primary), radio, compass, corrected chart of the operating area, and a certified crew operating within the prescribed limitations.

Standards: Units shall conduct a pre-brief. Plot course and destination accurately using applicable electronic navigation system/paper charts. Energize navigation lights, as needed. Set watertight integrity. Conduct own vessel in accordance with Rules of the road. Departure made within 30 minutes of notification that exercise commences. Arrive at position within 5 minutes of ETA, accurate to within 100 yards. Radar and Chart Plotter (if so equipped) must be displayed at all times and a corrected chart of the operating area must be on board. Waypoints shall be entered into the chart plotter with at least one turn. On paper charts all shall be accurately plotted to within 100 yards). Note: ETA updates are acceptable up to/until 5 minutes of reaching stated ETA. Wear and use crew safety and survival equipment properly. Do not jeopardize safety of vessel and crew.

ENABLING OBJECTIVES

	SAT	UNSAT	REMARKS
1. Preparations:			
a. Boat Crew utilized GAR/SPE. Update as necessary. (S)			
b. Plot course and destination accurately using applicable electronic navigation system/paper charts. (N/S)			
c. Factor variation and deviation in course. (N)			
d. Calculate and label all DR times and ETA. (N)			
e. Corrected chart on board. (N/S)			
f. State depth at destination. (N)			
g. State distance to destination from shore and entrance. (N)			
h. State weather and tidal conditions. (N)			
i. State sea and bar conditions. (N/P)			
j. State direction and velocity of current. (N)			
k. Energize navigation lights, as needed. (P/S)			
l. Open windows, if necessary. (P)			
m. Set watertight integrity. (S)			
n. Ensure night vision is not compromised. (P/N)			
o. Make departure within 30 minutes. (S)			

	SAT	UNSAT	REMARKS
2. Underway Navigation:			
a. Utilize sound signals. (P)			
b. Conduct own vessel in accordance with Rules of the Road. (P/B/S)			
c. Identify and utilize Aids to Navigation. (P/T)			
d. Consider/compensate effects of set and drift. (P/N)			
e. Provide course guidance to helm. (P)			
f. Safe speed for mission and/or conditions. (P/B)			
g. Post additional lookouts, if needed. (P)			
h. Electronic Charting System			
(1) Electronic chart data is current, if used as primary (N/S)			
(2) Command promulgated standard waypoints and routes used. (N/S)			
(3) Depth alarms set to navigational draft. (N/S)			
(4) Cross track error (XTE) alarms set. (N/S)			
(5) Radar and chart plotter displayed at all times. (N/S)			
(6) Use course to steer/XTE to maintain track line within .05 NM. (N/P/E)			
(7) Utilize SOG/ETA function. (N/P/E)			
(8) Enter a minimum of three waypoints into Navigation system. (N/P/O/S)			
i. Radar used to supplement Chart Plotter. (N)			
(1) Radar tune. (P)			
(2) Check accuracy of course. (N)			
(3) State speed over ground. (N)			
(4) Use ranges and bearings. (N)			
(5) Display waypoint information on radar screen. (P/O/E)			
(6) Optimum use of radar functions/capabilities. (N)			
j. Use fathometer/sounder to verify depth. (N/S)			
k. DR navigation (coxswain demonstrate application of time/distance/speed relationship). (N)			
l. Accuracy of final position within 100 yards. (N/S)			
m. Arrive at final position within 5 minutes of ETA. (N/S)			
3. Crew Teamwork and Coordination:			
a. Coxswain brief crew of specific job and mission responsibilities. (T)			
b. Crew communicate effectively and assertively during evolution. (T)			
c. Crew assists each other as needed. (T/P)			
d. Crew always aware of others' location(s). (T)			
e. Coxswain provide appropriate and timely guidance throughout evolution. (T)			

	SAT	UNSAT	REMARKS
f. Wear and use crew safety and survival equipment properly. (P/T/S)			
g. Do not jeopardize safety of vessel and crew. (S)			
h. Utilize kill switch. (S)			
i. Coxswain keeps unit/Operational Commander informed during evolution. (P/T)			

Exercise: Towing Performance

Objective: Pilot to a disabled vessel, take disabled vessel into stern tow, transit to a safe harbor, shift to an alongside tow and moor.

Conditions: Given an Auxiliary facility with required towing equipment, an operational GPS, radar, radio, compass, a certified crew operating within prescribed limitations, and a scenario of a disabled vessel; make approach with bow into the predominant force.

Standards: Units shall conduct a pre-brief. Ensure that all available navigational equipment is energized. Plot the position of disabled vessel on corrected chart. Plot or electronically determine track lines to position of disabled vessel. Navigation lights should be utilized as appropriate. Wear and use crew safety and survival equipment properly. Do not jeopardize safety of vessel and crew. Make approach, take disabled vessel in tow safely moor disabled vessel to the unit or safe haven/harbor.

ENABLING OBJECTIVES

	SAT	UNSAT	REMARKS
1. Preparations:			
a. Boat Crew utilized GAR/SPE. Update as necessary. (S)			
b. Coxswain/crew gathers following information:			
(1) Position of vessel in distress. (P)			
(2) Number of POB. POB wearing PFDs? (P)			
(3) Nature of distress. (P)			
(4) Amplifying information as listed on SAR card. (P)			
c. Energize all navigational equipment. (N)			
d. Plot position of disabled vessel on corrected chart (optional). (N/S)			
e. Enter disabled vessel's position into GPS/Chart Plotter as waypoint. (N)			
f. Plot or electronically determine track lines to position of disabled vessel. (N)			
g. Energize navigation lights and sound signal (night & restricted visibility). (N/S)			
2. On Scene (O/S) Evaluations and Preparations:			
a. Establish communications between disabled vessel and response unit. (O)			
b. Perform on scene assessment of disabled vessel. (P)			

	SAT	UNSAT	REMARKS
c. Brief crew on procedures:			
(1) Equipment to be passed (as req			
(2) Assign tasks and positions. (T/P)			
(3) Determine type, make approach. (T/P)			
(4) Passing the towline (consider bridle). (T/P)			
(5) Discuss emergency breakaway p			
d. Brief disabled vessel on emergency procedures:			
(1) Equipment to be passed (as required). (P/T)			
(2) Towing procedures. (P)			
(3) Emergency communications (P/T)			
3. Stern tow:			
a. Pass equipment as required (e.g., pump, radio). (P)			
b. Make safe approach. (B/P)			
c. Station keeps in optimal position. (O/B/T)			
d. Safely pass towline using appropriate method. (P)			
e. Pay out line and tend away from screws. (B)			
f. Set initial course and adjust towline. (B)			
g. Make up tow bit/towing bridle. (O/S)			
h. Set and maintain tow watch. (P/T)			
i. Change navigation lights, if neede			
j. Change sound signals, if needed. (N)			
k. Install chafing gear, if needed. (P)			
l. Maintain safe towing speed. (B/P)			
m. Check disabled vessel status. (P)			

4. Alongside Tow:	SAT	UNSAT	REMARKS
a. Brief crew on procedures. (T)			
b. Brief disabled vessel on procedures. (T)			
c. Prepare deck for alongside tow (i.e. rig fenders			
and make alongside lines ready). (O)			
d. Break tow bit/pull in bridle. (P/O)			
e. Consider set and drift of both vessels before			
making approach. (P)			
f. Make approach. (B)			
g. Properly execute drop tow approach or back			
down approach. (P/O)			
h. Pass alongside lines to disabled v			
i. Adjust alongside lines and establish control of			
vessel. (P/O/S)			
j. Change navigation lights, if required. (N)			
k. Discuss mooring instructions with disabled			
vessel. (P/T)			
l. Brief/ post bow pointer in effective location. (T)			
m. Safely moor vessels. (B/T/S)			

5. Crew Teamwork and Coordination:	SAT	UNSAT	REMARKS
a. Coxswain brief crew of specific job and mission responsibilities. (T)			
b. Crew communicate effectively and assertively during evolution. (T)			
c. Crew assists each other as neede			
d. Crew always aware of others' location(s). (T)			
e. Coxswain provide appropriate and timely guidance throughout evolution. (T)			
f. Wear and use crew safety and survival equipment properly. (P/T/S)			
g. Do not jeopardize safety of vessel and crew. (S)			
h. Coxswain keeps unit/Operational Commander informed during evolution. (P/T)			

Exercise: Man Overboard (MOB) Recovery Performance

Objective: Recover a simulated crewmember fallen overboard.

Conditions: Given an Auxiliary facility with an operational GPS or DGPS, radio, certified crew operating within prescribed limitations, and a scenario of one crewmember (life-like OSCAR) fallen overboard and unconscious in the water.

Standards Units shall conduct a pre-brief. Establish electronic position using GPS/DGPS MOB Event or save function. MOB must be safely recovered within 3 minutes and in accordance with the above references. Wear crew safety and survival equipment properly. Do not jeopardize safety of vessel and crew.

ENABLING OBJECTIVES	SAT	UNSAT	REMARKS
1. Execution:			
a. Boat Crew utilized GAR/SPE. Update as necessary. (S)			
b. Pass report of man overboard to coxswain. (T)			
c. Assign and position pointer/lookout watch. (P)			
d. Discuss life ring/datum deployment. (P)			
e. Discuss sound signals. (P)			
f. Establish electronic position using GPS/DGPS MOB Event or save function. (N/S)			
g. Use spotlight or deck lighting. (P)			
h. Brief crew on pickup. (T)			
i. Determine general set and drift for approach based on prevailing weather. (N)			
j. Execute approach to MOB. (B)			
k. Execute pick-up of MOB. (P/B)			
l. Safely recover MOB within 3 minutes. (S)			
m. Crewmembers demonstrate appropriate first aid. (P/T)			
n. Notify unit/Operational Commander. (P/O)			

	SAT	UNSAT	REMARKS
2. Crew Teamwork and Coordination:			
a. Coxswain brief crew of specific job and mission responsibilities. (T)			
b. Crew communicate effectively and assertively during evolution. (T)			
c. Crew assists each other as needed. (T/P)			
d. Crew always aware of others' location(s). (T)			
e. Coxswain provide appropriate and timely guidance throughout evolution. (T)			
f. Wear and use crew safety and survival equipment properly. (P/T/S)			
g. Do not jeopardize safety of vessel and crew. (S)			
h. Coxswain keeps unit/Operational Commander informed during evolution. (P/T)			

Exercise: Search Patterns (Drifting Pattern) Performance

Objective: Pilot an Auxiliary facility and execute a search pattern.

Conditions: Given an Auxiliary facility an operational GPS, up-to-date electronic chart (if used as primary), radar (if equipped), radio, compass, corrected chart of the operating area and a certified crew operating within prescribed limitations. The Coxswain will be given a SAR scenario with a position to commence a search pattern.

Standards: Units shall conduct a pre-brief. The search pattern shall be commenced within 5 minutes of arrival at given position. Coxswain shall determine set prior to starting pattern within 45 degrees of actual set. Boat shall commence all turns within 15 seconds of stated DR time. Wear crew safety and survival equipment properly. Do not jeopardize safety of vessel and crew.

Sector Search Pattern, Single Unit (VS)

Standards: Units shall conduct a pre-brief. The VS pattern will be run in its entirety with track spacing between 200 to 500 yards. The first leg shall be the direction of drift with all turns made 120 degrees to the right. All turns shall commence within 15 seconds of their DR time. On the third, sixth, and ninth legs, steer toward the datum marker. The third, sixth and ninth legs shall end at the datum marker regardless of time run, the fourth and seventh legs are run as individual legs.
Wear crew safety and survival equipment properly. Do not jeopardize safety of vessel and crew.

ENABLING OBJECTIVES

	SAT	UNSAT	REMARKS
1. Preparations:			
a. Boat Crew utilized GAR/SPE. Update as necessary. (S)			
b. Plot or establish electronically CSP position accurately, determine safe area. (N/P)			
c. Calculate all courses (compass) and turns accurately within 3 degrees. (P/N/S)			
d. Calculate and state DR times and total time to run. (N)			
e. Brief crew on initial SAR check sheet items. (P)			

	SAT	UNSAT	REMARKS
f. Coxswain pass search plan to comms watch. (T/P)			
2. Search Pattern Execution:			
a. Advise unit/Operational Commander of O/S WX and start time of pattern. (P/O)			
b. Crewmember drop datum overboard at CSP (P/S)			
c. Coxswain determine direction of drift accurate to 45 degrees. (P/N/S)			
d. Start pattern within 5 minutes of arrival at CSP. (P/N/S)			
e. First leg of pattern in direction of drift (000ºC if drift cannot be determined). (P/N/S)			
f. Third, sixth, and ninth legs end at datum marker. (P/S)			
g. Utilize sound signals IAW rules of the road. (P)			
h. Conduct of AUXFAC IAW the rules of the road. (B/N/S)			
i. Identify and utilize aids to navigation. (N)			
j. Use illumination. Do not compromise night vision. (P/O)			
k. Provide course guidance to helm. (N)			
l. State speed over ground. (N)			
m. Base course and speed on engine RPM and compass course, do not adjust to counter set and drift. (P)			
n. Commence turns within 15 seconds of their stated DR time. (N/S)			
o. On the third, sixth, and ninth legs, steer toward the datum marker (VS only). (P/N/S).			
p. Use GPS as follows:			
(1) Use MOB button to fix position of datum marker. (O)			
(2) Use SOG function to verify initial speed. (O)			
(3) Use fathometer to verify depth. (N/S)			
q. Pass final position of datum marker to SMC (to determine set and drift of datum). (P)			
3. Crew Teamwork and Coordination:			
a. Coxswain brief crew of specific job and mission responsibilities. (T)			
b. Crew communicate effectively and assertively during evolution. (T)			
c. Crew assists each other as needed. (T/P)			
d. Crew always keeps aware of others' locations. (T)			
e. Coxswain provide appropriate and timely guidance throughout evolution. (T)			
f. Wear and use crew safety and survival equipment properly. (P/T/S)			
g. Do not jeopardize safety of vessel and crew. (S)			
h. Coxswain keeps unit/Operational Commander informed during evolution. (P/T)			