

**UNITED STATES POWER SQUADRONS
BOC-OTW TRAINING COMMITTEE**

**INLAND NAVIGATOR
GUIDE**

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For information regarding insurance coverage of United States Power Squadrons sanctioned events, please refer to the insurance information on the USPS.org website.

In the event of an accident, call for medical help and provide care to the extent of your training (CPR, First Aid). After rendering aid, contact the proper authorities based on your state law. As soon as possible, contact, in this order (until you are able to reach one), the Regional Director, BOC Rear Commander, ANEO, or NEO for further directions. In addition the USPS Headquarters Director must be notified at 800-367-8777 (800-FORUSPS)

GENERAL

The following guide has information for both the Inland Navigator Candidate and Certifier.

Terms and Conditions

- 1.** It is a condition of taking this course that the candidates acknowledge the fact that there are inherent dangers involved in on water activities. These dangers range from simple inconvenience to serious injury and even death. Conditions can change rapidly, unexpectedly putting even the best planned situation at risk. To this end, safety is of paramount importance. Candidates must at all times wear a properly sized and fitted personal floatation device on the docks or the boat. Furthermore Candidates agree to comply with all regulations and safety instructions given by the instructor. Failure to comply will lead to student's immediate expulsion from the course. This decision is at the sole discretion of the instructor.
- 2.** Boating is physically demanding. Normal access to marina and docks is required. Candidates are required to board a small, open boat unassisted. The student needs to be able to safely support their own weight and have sufficient flexibility and balance while entering and moving around in a boat on their own. Candidates must have sufficient upper body strength to secure themselves during high-speed maneuvers. Candidates must have vision sufficient to see water, boats, hazards and navigational aids at reasonable distances and lighting conditions. Hearing must be adequate to hear and understand instructions, audible warnings and sound signals.
- 3.** Certifiers will decide how all courses are to be conducted. This includes whether or not to go on the water and when to terminate and/or reschedule on the water portions of the course in the interest of safety. Candidates are to observe all requirements, provisions, regulations and orders made by any competent authority relating to or affecting the use of the craft (such as law enforcement). If the student is using their own craft they are to inform the instructor of any special requirement, provision, regulation or order pertaining to the specific vessel. Candidates will at all times obey and carry out all lawful commands and instructions given by Certifiers necessary to complete the coursework. This shall apply regardless of who owns the vessel being used. The instructor's decision in these matters will be final.
- 4.** All craft used in instruction, regardless of ownership, shall carry all equipment required by state, federal and local law, be legal to operate in the waters the instruction is given, and carry a current Vessel Safety Examination sticker.
- 5.** If a candidate's craft is being used for training purposes they must maintain at their own cost a comprehensive policy of insurance covering all usual risks.
- 6.** The student warrants that all representations made in the enrollment process are true and correct.
- 7.** Anyone 18 or under must have a parent or guardian sign all paperwork.
- 8.** The student warrants that they have made full disclosure of all material circumstances, including health, physical limitations, issues of vessel limitations, and of everything respecting the providing of this instruction.
- 9.** If any of these conditions is held to be invalid or unenforceable that will not affect the validity and enforceability of the rest.
- 10.** This agreement cannot be assigned without prior written consent. Any variation to any of these conditions is invalid unless accepted in writing, and the terms and conditions of this agreement shall prevail over any sought to be enforced.

For the Candidate

Welcome

Welcome to Inland Navigator. This is the first step in the United States Power Squadron On-The-Water (OTW) certification program. During this certification process, you will be asked to demonstrate some basic boating handling skills to an Inland Navigator Certifier (IN Certifier). Upon successful completion of these on-the-water demonstrations, and the required course work, you will be granted your Inland Navigator Certification.

What is in it for you?

Since its inception, the USPS Certification program has been regarded as the leader in on the water boat training and certification. Not only within USPS, but also by the USCG and other boating organizations. Our certifications have already been valuable in assisting members in chartering boats in the United States and Europe. Recently, the USPS Boat Insurance program has recognized the USPS Boat Operators Certification program (BOC) and is now offering discounts on insurance policies based on the BOC level achieved. As the program develops, we will be adding many more partners to our growing list.

Candidate Requirements

To receive the Inland Navigator certificate, candidates are required to have visual and auditory acuity (drivers license is acceptable) and complete the following courses, seminars, and skill demonstrations:

Required Courses:

- NASBLA approved boating course
- Seamanship
- Engine Maintenance
- Marine Electrical Systems (or ME101)

Required Seminars:

- How to Use a Chart (or Piloting, or Chart Smart)
- Basic Weather and Forecasting or Onboard Weather (or Weather course)
- GPS (or P or AP after 2004/2005)
- VHF Radio/VHF DSC (or MCS)

Skill Demonstrations (detailed below)

- Basic Powerboat Handling or US Sailing Safe Powerboat Handling
- Fire Extinguishers (FE)

When your IN Passport is complete contact your Regional Director and tell him/her you have accomplished all the requirements. The RD will check and if correct will credit you with IN. Your certificate and wallet card will be mailed to you and your new rating will show up in DB2000 and BOC Tools.

Equivalencies

For boaters with extensive on the water experience or education covering any of the requirements for certification, we will offer a process to determine if your experience in our opinion is equivalent. Equivalencies will be considered for individual certification requirements by following the policy in the certifier's manual.

How to accomplish the OTW Basic Powerboat Handling Skill Demonstration

What to do before the day of the skill demonstration?

In addition to this guide book, your Inland Navigator Kit contains your passport and a copy of the US Sailing book “Start Powerboating Right.” You should obtain the IN Kit and fill out all the information at the top your passport. Your education achievements are automatically provided to the certifier via BOC Tools, so obtaining signatures in these blocks on the Passport is not necessary. You should have the IN Certifier sign each skill upon successful completion. You should also have read through the “Start Powerboating Right” book before the day of your on-the-water skills demonstration.

If you have taken USPS courses and/or seminars, it is necessary that they be properly recorded in the National USPS Education Database (DB2000). Our BOC program databases collect information regarding course and seminar completion from this national education database and are displayed for the IN Certifier and RD, so it is incumbent on you, and your squadron SEO, to assure that these records are complete. The BOC system will not allow certification to be completed unless the candidate’s education meets the requirements and is recorded in DB2000.

What should I bring with me?

Inland Navigator Passport
 Proof of visual and audio capability (drivers license)
 Life Jacket (required to be worn by everyone aboard during all USPS OTW exercises).
 Personal gear (hat, sun glasses, water, appropriate clothing).

What to Expect?

The OTW program has two steps. When you first arrive, you will be given a seminar explaining the program and what is expected. This will either be a PowerPoint presentation (if facilities are available) or a lecture. This is much like the seminars in our seminar program, except it is usually completed in less than one hour. The second part is the actual on-the-water skills demonstration, the time varies depending on the number of people being OTW certified at the time.

How will the skills demonstration be conducted?

The IN Certifier will board the boat with you and possibly two or three others (depending on the size of the boat and who is present). You will then proceed to the Inland “course.” There you will see a slalom course consisting of six or more buoys and possibly two additional buoys set as a range (however in many areas an actual range or a natural range will be used). You will then proceed to go through the maneuvers as explained further in this guide.

How are the skills demonstration “graded?”

The goal of the BOC program is your success as an Inland Navigator. The IN Certifier is not only a “grader” but also an instructor if necessary. If you have difficulties accomplishing any task, the IN Certifier will work with you so you can accomplish what is required (within reason). You must complete all tasks. If not able to complete all tasks the IN Certifier marks off those skills accomplished and signs the ED-C6 form which is the **Candidates** responsibility to keep and present to the next IN Certifier when planning to complete his skill demonstration. When successful the final IN Certifier enters the accomplishment into the BOC database.

Safety

Safety of the crew and boat are the first concern. At all times it is mandatory that all practices on board are conducted in a manner approved by USPS. A USPS member is in control of the vessel. Others can be at the helm but the USPS member is on board and in control. If, at any time you consider an act or routine dangerous, you should stop and discuss it with your IN Certifier.

Inland Navigator Certification Definition

The following is intended to be a guide for Certifiers to use as they are evaluating Inland Navigator candidates during On-the-Water (OTW) exercises. Certifiers may deviate from the expected demonstrations if the water conditions or vessel used do not reasonably allow the candidate to meet the Evaluation Criteria as written, provided the alternate demonstrations provide objective evidence the candidate has the skills to meet the criteria.

Certifier may explain the skill to be demonstrated and may teach or coach the candidate. The candidate must demonstrate OTW skills consistent with the ability to safely operate a vessel in inland waters and conditions as described in the activity Reference book "Start Powerboating Right!"

- Use a boat up to 7M (23 ft.) LOA, provided by member; must have current VSC sticker and have all required safety equipment aboard.
- Boat must have a rigid bottom and wheel steering. Boat can be inboard, outboard, or I/O drive but must only have a single engine.).
- Boat must be able to get on plane.
- Conduct exercises during daylight hours with good visibility, conditions and fair weather

For the On-The-Water Certifier

The certifier shall:

- Follow all policies specified in the BOC Certifier's Manual.
- Verify that the boat is seaworthy and equipped with the proper safety equipment. A current Vessel Safety Check sticker is required on non-commercial vessels. Commercial vessels must meet all USCG and Local law Enforcement regulations.
- Work with the candidate to ease tension and make the process enjoyable. There is a need for both the IN Certifier and the Candidate to be flexible in the planning and the execution of the certification. There is no required order for the procedures to be performed (this should be discussed during the planning discussion).
- Ensure that skill demonstrations are held in a safe manner. (Inland Navigator, certification should be done in good weather and daylight.) While all parties on the boat need to keep safety first and foremost, it is the boat owner (or person in command) who is ultimately responsible for the safe operation of the vessel.
- The IN Certifier should, using the BOC Tools, fill out the candidate's passport and give credit for a successful skill demonstration.
- Equipment: Required: Life Jacket (to be worn by everyone onboard at all times when on the water), VHF (preferred) or Cellphone,
Suggested: Boat hook, Cleat Board, Line, Tide/Current Table, GPS

Skill: BPH – Safe Power Boat Handling

SKILLS	EVALUATION CRITERIA
GENERAL – Discuss or demonstrate before and during skill demonstrations	
Determine Wind & Current Direction	Candidate can determine the wind and current direction(s) and explain in at least basic terms what impact the wind and current will have on the boat.
Point out Nav aids, explain local regulations	Candidate understands the meaning of the navigation aids and regulations for the water in the area that skills are being demonstrated.
Board a Boat	Candidate boards the boat, maintaining reasonable personal and boat stability. Passing items being carried in lieu of carrying them on board is preferred but not mandatory.
Systems, Equipment and Starting Checks	Candidate orients themselves with the vessel controls and systems. Required safety equipment is confirmed to be onboard. Proper ventilation times and checks are observed. Vessel fuel level is checked. Boat is verified to be in neutral. Once engine is running, gauges and alarms, as applicable are checked to verify proper system functionality (temperature, charging and oil pressure, etc.). Outboard water flow is verified if visible. Specific vessel or generic checklist should be a part of the validation process.
PFD & Use of Kill Switch	All persons on board shall wear PFDs while the boat is underway. Candidate understands the purpose of a kill switch and if the boat is so equipped, securely attaches it to themselves while in command of the boat.
Shifting Gears: Use of Throttle/Gear Shift	Candidate is able to appropriately use forward, neutral, reverse and throttle of the boat during OTW exercises.
Safe Transition from Slow to High Speed	Candidate properly alerts crew prior to a power up, and takes boat from slow speed to on plane smoothly.
DOCKING	
Leave a dock or slip	Candidate communicates intent to depart dock and what their role is to others onboard and nearby boats. Candidate can depart from the dock with minimal contact and demonstrates or understands how to use bow, aft and spring lines to assist departure. Fenders are removed from the exterior of the boat once safely away from dock or slip. Appropriate departure signals shall be demonstrated or simulated.

Return to a Dock or Slip	Candidate appropriately deploys fenders prior to approaching dock or slip. Candidate correctly uses the wind and current to assist docking to the extent possible and is able to safely bring the boat into a dock or slip. Speed during docking is judged to be the minimum required to maintain control of the boat. Boat forward progress is stopped by the candidate using the boat controls (F, N, R, throttle, as needed) such that lines can be safely secured to the dock by people on the boat.
Secure a Boat: Systems and Docking	Candidate uses bow, stern and spring lines to secure boat to a dock or slip in a manner appropriate to the area. Fixed and floating dock variables are either demonstrated or discussed.
Knots: Cleat Hitch, Bowline, Round Turn w/ Two Half-hitches, Sheet Bend, Coiling & Heaving a Line	Candidate uses appropriate knots for securing the boat under the 'Secure a Boat' criteria above. Others may be discussed or tied onboard the boat or on the dock. A simple un-weighted heaving line should be demonstrated by the Candidate, assuring effective safety precautions, and appropriate throwing techniques and distances including describing options and when the need for a weighted heaving line exists.
LOW SPEED SKILLS	
Back a Boat	Candidate is able to control the boat during simple backing maneuvers Candidate should demonstrate situational awareness, including care regarding no significant water shipped over the transom.
Pivot Turn	Candidate can perform a pivot turn so that within 1 ½ boat lengths, the boat is facing the opposite directions (about 180 degree turn)
Minimum Control Speed	At minimum forward speed, candidate can maintain course with little deviation or overcorrecting, including use of F, N, and R control.
Low-Speed Turns/ Collision Avoidance	During low speed operations, candidate makes adjustments to direction to maintain a safe course and distance from other vessels. Communication with other vessels should include demonstrations as appropriate, of course or speed change visual cues, sound signals, VHF Radio contact including directives for use of appropriate ship-to-ship working channels. Typically, this should include describing or demonstrating an understanding of the purpose for use of channels 16, 9, 13, 6, as well as routine working channels as appropriate.
Hold Position: Stern into the Wind	Candidate turns the stern to the wind and can maintain position. Selecting a marker in safe water to maintain close abeam may assist the candidate in performing and the evaluator in evaluating the Hold Position skills. (F,N,R)
Hold Position: Bow into Wind	Candidate points the bow to the wind and can maintain position. (F,N,R)

Steer a Range	Demonstrates the ability to use a natural or established Range both forward of, and astern of the boat while remaining within the established channel. Candidate should identify the beginning and end of the Range on a chart, and call out “MARK” when visually precisely on the Range.
Anchor a boat	Candidate directs or performs deployment of anchor. Positive anchor hookup & set is achieved. Proper scope is used or described for conditions. Anchor line is secured to the bow area. Candidate should describe protocol in occupied anchorages and an understanding of multiple anchor deployment techniques and appropriate application thereof.
ON PLANE SKILLS	
Slalom slow	Candidate demonstrates the ability to operate through the standard slalom course, avoiding buoys/markers and not taking on significant amounts of water. Buoys/Markers should be of a soft material so as not to damage boat if hit.
Slalom Astern	Candidate demonstrates the ability to operate astern propulsion through the standard slalom course, avoiding markers and not taking on significant amounts of water
Slalom (controlled, on plane turns)	Candidate demonstrates the ability to operate through the standard slalom course while on plane, avoiding buoys/markers and not taking on significant amounts of water. Buoys/Markers should be of a soft material so as not to damage boat if hit.
Departure from & Return to a Mooring	Candidate approaches a mooring or marker used to simulate a mooring and bring boat to a stop with the bow at or immediately adjacent to the mooring such that a person on the bow can retrieve the mooring line on a mooring ball. Repeat demonstrating proper departure procedures. Candidate should demonstrate appropriate awareness of wind and current effects.
Constant Radius Turn	Candidate maintains a constant turn radius. Skill may be performed a slow speed or on plane. Ideally, the candidate will circle a marker, maintaining the same approximate distance from the marker as they circle it. Candidate understands a boat steers from the stern, which moves in the opposite direction of the turn.
Use of Bearing to Avoid Collisions	Candidate evaluates the bearing of approaching boats, knows if they are on a collision course and makes speed and/or course corrections to avoid potential collisions. Candidate demonstrates an understanding of bearing change to predict a bow or stern crossing, and understands the need to use the bow or stern of vessels as the bearing sighting point.
High Speed Stop (performance optional)	Candidate makes a high speed stop by making an abrupt turn to port or starboard and at the same time reducing the throttle/shift to neutral.

Overboard and PIW Recovery	Using a floating dummy, life jacket or fender thrown overboard; the Certifier announces “man overboard”. The candidate directs someone onboard to maintain visual contact and point to the MOB. Candidate reduces speed and executes a modified Williamson Turn by turning 60 degrees to your course, turn back steering a reciprocal course (180 degrees opposite of your original course). Candidate briefs crew on method to be used for recovery, approaches the MOB and brings the boat to a stop with the MOB within reaching distance (boat hooks may be used). When the MOB is reached, the engine is turned off. Candidate demonstrates awareness of tether or recovery line hazards if used.
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Use ED-C6 Skills Evaluation Checklist for Inland Navigator to document progress during skill demonstrations.

Skill: FE – Using Fire Extinguishers

Location: Area where there are no people not involved with the demonstration nearby and no combustibles on the ground. (E.g., a beach or desert area) This demonstration is most efficiently done with a group, perhaps at a squadron or district event, allowing multiple candidates to be certified at once. It could be combined with the pyrotechnic distress signal skill demonstration.

Boat: Not applicable – **skill demonstration should be conducted ashore.**

Certifier's Qualifications: Should have experience using a fire extinguisher. (The certifier may wish to ask a local fireman or volunteer fireman or other qualified personnel to assist.)

Conditions: Fair weather; light or no wind; daylight.

Caveats:

- **Check regarding local fire ordinances** to be sure lighting and extinguishing the fires required does not violate any local ordinances.
- **Obtain any necessary permits from local government.**

Crew: Not applicable; each person is certified separately.

Certifier's Role: The certifier (or assistant) should demonstrate proper use of each extinguisher and then observe that the candidate uses it properly. If at any time or for any reason the certifier feels a dangerous situation is developing, the certifier has the authority to terminate the demonstration.

Materials Needed: Heavy fire resistant gloves, safety goggles; one or more dry chemical fire extinguishers. The extinguishers must be USCG and/or UL approved. A pan filled with a flammable (but not explosive) liquid such as oil. (Gasoline must **not** be used.) An igniting device that allows the ignition of the liquid from a safe distance. (E.g., a butane lighter for lighting gas grills or charcoal grills.)

An electronic fire extinguisher system (BULLEX) is approved for this exercise. USPS headquarters has these units available to check-out for large events. While these devices teach the correct method of using a fire extinguisher, they don't give the individual the sense of heat involved when dealing with a real fire.

Criteria for Success: The candidate must put out a fire using at least one of the fire extinguishers. Any accident or manifestly dangerous action or repeated inability to accomplish a step results in an unsuccessful demonstration. If this occurs, the certifier should offer advice on correcting or avoiding the problems and reschedule.

Directions: The certifier should ask the candidate being certified to perform the step listed below. The certifier should have a sign up list with all the information required on the skills form. The certifier then checks off each candidate as they complete the skill. Each person must use the safety equipment (goggles and gloves) when using the extinguishers or lighting the fire. When a candidate completes the skill demonstration, the certifier signs the candidates BOC Passport.

Component Skill 1: Use a hand held fire extinguisher.

Procedure: The certifier dons goggles and gloves and ignites the pan of liquid. Using each type of extinguisher, the certifier extinguishes the fire and then relights it and demonstrates the use of another type of extinguisher until all types have been demonstrated. The certifier cautions the candidates about the danger of very cold CO₂. The certifier then relights the pan for each candidate to be certified.

Expected Results: Each candidate puts out the fire with at least one type of extinguisher.