

ASA Registered Bareboat Examination

### **IMPORTANT: Read Prior To Opening This Booklet**

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REMOVE THE BACK PAGE OF THIS EXAM AND FILL IN ALL OF YOUR CONTACT INFORMATION – THEN WAIT FOR YOUR INSTRUCTOR TO ADVISE YOU BEFORE OPENING THIS BOOKLET.

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## Instructions for Taking This Examination

1. This examination is a prerequisite for Certification to the Bareboat Chartering Standard. Your examination consists of two parts: Part A: Written Examination of Sailing Knowledge and Part B: Examination of On-the-Water Sailing Skills. Both parts must be satisfactorily completed prior to awarding Certification. If there is a delay in completing one of the two parts, the remaining part must be fully completed within 12 months of the date the first part was completed.

2. Part A consists of 100 questions. Tear the back page from this test booklet, complete the information block and use the answer sheet to indicate your answer. Please fill in the circle completely and erase any changed answers. Read each question carefully, take your time and use your best judgment in marking the correct answer. A passing score of at least 80% is required. All test materials must be turned in at the completion of this examination.

3. Part B contains 35 items of boat handling skills you must demonstrate to your ASA instructor. Your instructor will place a checkmark in the appropriate box when you have satisfactorily performed the task required. To achieve Certification you must attain 100% on Part B.

4. To enhance your educational experience you are entitled to review the questions and your answers with the instructor. If you choose to do so, inform your instructor so that a mutually convenient time can be arranged.

5. Should you fail either or both parts of your examination, you may arrange for retesting. Consult your instructor or school for details.

## Part A: Examination of Sailing Knowledge (ASHORE KNOWLEDGE)

## Section 1 True/False

- 1. After taking at least 3 turns around the winch drum, lines are fed over the metal line guide/feeder, then into the self-tailing jaws on a self-tailing winch.
- 2. Lifelines offer a handy, safe, two step ladder for climbing a few feet above deck level.
- 3. A seacock with the handle at right angles to the body is in the open position.
- 4. In general, boats without overboard head discharge will have a "Y" valve in the system.
- 5. An automatic bilge pump submersed in a wet bilge should be switched off at the main breaker panel to avoid electrical short-circuiting.
- 6. Switches on the electrical panels of most modern cruising sailboats act as circuit breakers.
- 7. Diesel engines use diesel spark plugs for ignition.
- 8. A primary fuel filter is not useful on diesel engines equipped with a separator.
- 9. A lift pump is a fuel pump used for priming a fuel system.
- 10. Fuel exiting the injector pump is under considerably higher pressure than fuel exiting the fuel pump.
- 11. Any available lubricant can be used in place of transmission fluid.
- 12. The closed cooling system is pressurized when the engine heats up.
- 13. It is only necessary to use the solenoid shut-off valve on a gas stove in an emergency.
- 14. Two stroke outboard engines use fuel that combines gasoline and oil.
- 15. A plastic clip on a modern outboard engine's kill button must be off to start the engine.
- 16. The raw water intake through-hull must be closed before the strainer can be serviced.
- 17. A serviceable impeller circulates water in the closed cooling system.
- 18. A tricolor light can be used instead of running lights (side lights and stern lights) at any time you would use running lights on vessels under 20 meters.

- 19. Navigation lights should only be used after dark.
- 20. The proper sound signal indicating danger is 5 or more short blasts of a horn or whistle.
- 21. Racing sailboats have the right-of-way under the inland rules of the road.
- 22. Boats traveling to a foreign country should plan to clear in at ports of entry.
- 23. Boaters have a legal obligation to render assistance that can be safely offered to others in need.
- 24. NOAA Radio broadcasts weather information 24 hours a day.
- 25. Radiation fog occurs over land and can spread over a body of water.
- 26. Advection fog cannot exist with wind.
- 27. Airports may provide weather information that is valuable to mariners.
- 28. Channel 16 cannot be used to contact commercial towing companies.
- 29. Recreational vessels should have a designated skipper to ensure all know where responsibilities lie.
- 30. Crew members are required to follow orders.
- 31. Pleasure boaters file float plans with the Coast Guard.
- 32. The first boat in an anchorage establishes the method of anchoring to be followed by others who anchor nearby later.
- 33. Additional scope should be added to hold the extra weight of rafted boats.
- 34. Asking permission to board a boat is an archaic tradition that is no longer observed.
- 35. Anchoring is prohibited in most channels.
- 36. Intentional grounding may be a proper response to engine failure in a channel.
- 37. Turning the propeller shaft by hand might help free a line accidentally wrapped around the propeller.
- 38. The charter skipper has no responsibility for the boat and crew while not on deck.
- 39. Always use a winch if a roller furling headsail becomes more difficult during the furling process.
- 40. An anchor windlass should be used to pull a boat forward and break an anchor free of the bottom.
- 41. A prudent skipper always chooses to act as helmsman and lookout at the same time.
- 42. A separation zone may be entered by a pleasure boat if it intends to cross.
- 43. An overtaking pleasure vessel must give way regardless of whether it is sail or power.
- 44. The powerboat which has another powerboat crossing from starboard shall keep out of the way of the other.
- 45. Variation is the difference between true north and magnetic north.
- 46. The stand-on vessel must hold its course and speed unless the give-way vessel fails to take action to avoid collision and a collision appears imminent.
- 47. When two powerboats meet bow to bow they should both alter course to port.

In each of the paired sequences of marine head operating procedures, answer "T" if in proper sequence or "F" not in proper sequence.

- 48. Pump wet/clear waste Close through-hull valves
- 49. Open intake through-hull valve Prime the head
- 50. Pump dry with head mounted intake valve closed Use the head

# **Multiple Choice**

- 51. Which of the following items will never be found leading from the aft section of a main masthead?
  - A. Main halyard
  - B. Backstay

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- C. Jib halyard
- D. Boom topping lift
- The "house" electrical system operates from the\_\_\_\_\_.
  - A. A/C circuit
  - B. D/C circuit
  - C. Shore power
  - D. Generator
- 53. The \_\_\_\_\_ may require occasional removal to clear marine life.
  - A. Knot meter transducer
  - B. Depth sounder
  - C. GPS
  - D. Auto-helm controls
- 54. Holding tanks must be used within \_\_\_\_\_\_ of the coastal U.S. and everywhere on lakes and rivers.
  - A. 3 Miles
  - B. 5 Miles
  - C. 10 Miles
  - D. 25 Miles
- 55. A macerator may be used for discharge of raw waste a minimum of \_\_\_\_\_\_ from the United States coast.
  - A. 2 Miles
  - B. 3 Miles
  - C. 5 Miles
  - D. 10 Miles
- 56. Which of the following could cause the raw water system to fail?
  - A. Cracked filler cap
  - B. Intake obstruction
  - C. Low coolant
  - D. Inoperable thermostat
- 57. Propane systems usually have a \_\_\_\_\_\_ for emergency shut-off.
  - A. Injector system
  - B. A/C switch
  - C. Solenoid switch
  - D. Check valve
- 58. Which of the following is not commonly used as a fuel source for cooking aboard?
  - A. Alcohol
  - B. Propane
  - C. Kerosene
  - D. Compressed Natural Gas (CNG)
- 59. Which of the following conditions could aggravate seasickness?
  - A. Alcohol consumption
  - B. Excess sleep
  - C. Fresh air
  - D. Contact Lenses
- 60. Gas tank vents should be \_\_\_\_\_ prior to starting an outboard engine.
  - A. Opened
  - B. Closed
  - C. Removed
  - D. Sealed

- 61. An emergency tiller fits into the:
  - A. Steering column
  - B. Rudder post extension
  - C. Rudder
  - D. Outdrive
- 62. What would be the best first response if the starter fails to crank the engine?
  - A. Check the battery switch
  - B. Check water in the batteries
  - C. Jump the batteries
  - D. Check terminal tightness
- 63. The purpose of a fuel separator is to:
  - A. Remove water and sediment from the fuel
  - B. Separate fuel from oil
  - C. Moderate fuel consumption
  - D. Precisely mix fuel with air
- 64. Illuminating the white all around light at the top of the mast indicates a sailboat is:
  - A. Under power
  - B. Under sail
  - C. At anchor
  - D. Distressed
- 65. Which of the following signals is not an officially recognized distress signal?
  - A. Gun fired at intervals of one minute
  - B. Wave arms
  - C. Code flag November Charlie
  - D. 2 black squares against an orange background
- 66. The flag of the boat's country of registry should be flown \_\_\_\_\_\_.
  - A. Off of the stern
  - B. From the port spreader
  - C. From the starboard spreader
  - D. From the forestay
- 67. When traveling in waters of another country, the flag of the host country should be hoisted \_\_\_\_\_\_.
  - A. Off of the stern
  - B. From the port spreader
  - C. From the starboard spreader
  - D. From the forestay
- 68. The proper sound signal for a sailboat sailing through fog is:
  - A. Three prolonged blasts
  - B. Two prolonged blasts
  - C. One prolonged blast followed by two short blasts
  - D. Two prolonged blasts and two short blasts
- 69. The proper length of a "prolonged" blast is:
  - A. 2 to 3 seconds
  - B. 4 to 6 seconds
  - C. 5 to 8 seconds
  - D. Greater than 10 seconds
- 70. When using a dinghy at night you should have the following:
  - A. A flashlight
  - B. A PFD for each person aboard
  - C. Oars or paddles
  - D. All of the above

- 71. Fuel consumption rate is expressed in:
  - A. Miles per day
  - B. Gallons per hour
  - C. Nautical miles per hour
  - D. Liters per day
- 72. Returning from a day trip to a nearby island anchorage we found that 2.7 gallons of fuel had been used. Our log indicated that we had motored for 1 hour and 45 minutes. What was our approximate fuel consumption rate?
  - A. 1.9
  - B. 1.5
  - C. 0.5
  - D. 1.0
- 73. Another boat we sail uses 3/4 gallon of fuel per hour at a cruising speed (power only) of 5.5 knots. Our 20-gallon tank is 3/4 full. We plan a cruise from Home Port to Whaler Island, then to Old Port then on to Terra Ferma Island and back to Home Port creating four legs. Leg one is 35.5 NM, leg 2 is 29.6 NM, leg 3 is 33 NM and leg 4 is 21 NM.

We will return after the fuel dock closes and leave for another voyage the next morning before we can get fuel. Therefore, we want to leave the tank as full as possible tonight but must not allow the tank to go below 1/8 before re-fueling. There are no factors present that would reduce or increase our range.

Where should we re-fuel?

- A. Whaler Island
- B. Old Port
- C. Terra Ferma
- D. None of the above
- 74. The emergency channel on the VHF is:
  - A. Channel 7
  - B. Channel 16
  - C. Channel 72
  - D. Channel 87
- 75. Plastic may be legally dumped:
  - A. Beyond three miles from the U.S. coast.
  - B. Beyond 10 miles from the U.S. coast.
  - C. Nowhere on oceans or lakes.
  - D. If in a sealed container

Sea breezes occur when the (76) heats up drawing cooler air from over the (77):

- A. Water
- B. Mountains
- C. Coastline
- D. Land
- 78. What actions should be taken when navigating in fog?
  - A. Reduce speed
  - B. Make proper sound signals
  - C. Hoist a radar reflector
  - D. All of the above
- 79. Which of these anchoring methods requires most swinging room?
  - A. Bahamian mooring
  - B. Two anchors 45° off the bow
  - C. Bow only
  - D. Bow and stern

- 80. In windy conditions, a motorized dinghy should approach an anchored sailboat:
  - A. From up-wind
  - B. From down-wind
  - C. With the wind across the beam
  - D. At the sailboat's bow
- 81. In most cases what is the correct first response to dragging anchor?
  - A. Re-anchor
  - B. Select another anchor
  - C. Increase scope
  - D. Reduce scope
- 82. What would be the first response to a serious leak?
  - A. Radio for help
  - B. Fire visual distress signals
  - C. Close all through-hulls
  - D. Activate bilge pumps
- 83. What is dead reckoning?
  - A. The course a boat travels over the ground
  - B. The process of plotting a position based on advancing from a known position using speed, course, and time
  - C. Using two fixes to determine your position
  - D. Navigating without using a compass
- 84. Your boat has run aground on a falling tide and attempts to free it have failed. Tide tables are checked and the location will dry at low tide. Which of the following would NOT be appropriate?
  - A. Pad the side of the hull to prevent damage
  - B. Take an anchor out to deeper water to prevent drifting when the boat is refloated
  - C. Radio "May-Day"

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- D. Close the hatches to prevent water from coming in as the boat refloats
- Which of the following documents may be required by Customs and Immigration?
- A. Ship's registration or documentation papers
- B. Ship's most recent survey
- C. Crew's passports
- D. Both A and C may be required
- 86. Which of the following actions would NOT be appropriate when setting a breast anchor to hold a vessel off a wall? (Assume there is a danger of damaging the boat.)
  - A. Tie the anchor rode to a bridle between the bow and stern cleats
  - B. Tie the anchor rode to a stanchion
  - C. Secure a float and flag to mark the anchor rode
  - D. Tie the anchor rode to a midship cleat
- 87. Most inboard equipped sailboats with a right-handed screw (propeller turns to the right while forward is engaged) will behave in which manner while in reverse?
  - A. The boat will back straight with the rudder centered
  - B. The stern will tend to pull to port with the rudder centered
  - C. The boat will only move backward with the engine running at full speed
  - D. The stern will tend to pull to starboard with the rudder centered
- 88. When calling another vessel on the VHF radio which would you do first?
  - A. Identify your vessel by name twice
  - B. Call "May Day" four times to attract attention
  - C. Call the name of the other vessel three times
  - D. Identify yourself by stating the radio's call letters

#### ASA Bareboat Examination • T-104 B

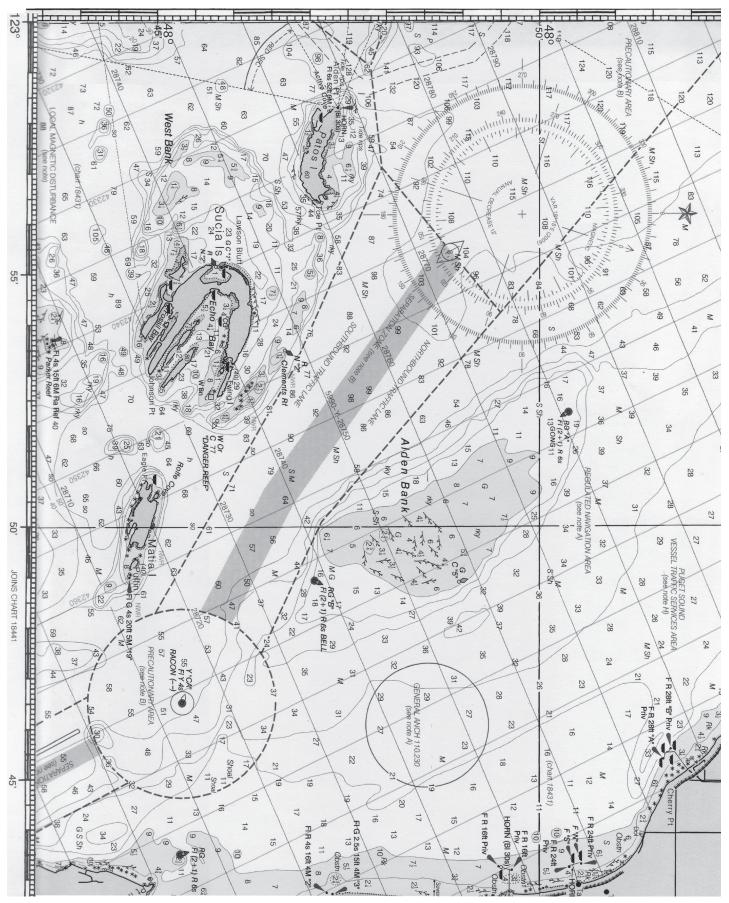
89. Positions east and west of the Prime (Greenwich) Meridian are expressed in degrees of \_\_\_\_\_?

- A. Latitude
- B. Longitude
- C. Variation
- D. Soundings

90. Positions north and south of the Equator are expressed in degrees of \_\_\_\_\_?

- A. Latitude
- B. Longitude
- C. Variation
- D. Soundings
- 91. A \_\_\_\_\_\_ is equal to one nautical mile.
  - A. Degree of longitude
  - B. Degree of latitude
  - C. Minute of latitude
  - D. Minute of longitude
- 92. A meter is approximately:
  - A. 2.75 feet
  - B. 50 inches
  - C. 1/3 fathom
  - D. Between 3 and 3.5 feet
- 93. Chart No. 1 lists \_\_\_\_
  - A. Locations of obstructions
  - B. Radio beacons and their frequencies
  - C. Chart symbols and their meanings
  - D. Locations of weather buoys
- 94. Which of the following vessels is excluded from the Navigation Rules?
  - A. Fishing boat
  - B. Row boat
  - C. Sailboard
  - D. None of the above
- 95. What would be the best first response to a grease fire in a fry pan on a propane-fueled galley stove?
  - A. Throw water on the fire
  - B. Reach for the fire extinguisher and apply using the P.A.S.S. method
  - C. Radio a Mayday for fire fighting assistance
  - D. Immediately turn off the propane solenoid
- 96. On the chart on page 10, draw a course between (A) *RG Fl* (2+1) *R* 6s (approx Lat 48° 45.3' N, Lon 122° 43.5' W) and (B) the *Clements Reef Danger Buoy W* or *"DANGER REEF"* (approx Lat 48° 45.8' N, Lon 122° 52.0' W). The magnetic course from (A) to (B) is 256, and the distance is 5.6 nautical miles. You plan to travel at a speed of 4.0 knots. Select the proper notation to label your course line.
  - A. <u>S4.0kts C256M</u>
  - D5.6kts
  - B. <u>C256M</u> <u>S4.0</u>
  - C. <u>C256M S4.0</u> D5.6
  - D. <u>C256M</u> D5.6kts

- 97. Established on course immediately abeam of (A) at 1512, what would be your ETA at destination (B)?
  - A. 1648
  - B. 1715
  - C. 1612
  - D. 1636
- 98. Due to unforeseen currents, you actually reach your next waypoint (B) at 1704. What was your average SOG between (A) and (B)?
  - A. 3.9 knots
  - B. 3.5 knots
  - C. 3.0 knots
  - D. 2.6 knots
- 99. After spending the night on anchor in Echo Bay, Sucia Island, cooperative winds allow you to plan to proceed under sail from the *Clements Reef Danger Buoy* (B) to (C) *RG "B" Fl (2+1) R 6s BELL* (approx Lat 48° 47.0' N, Lon 122° 48.9' W) and thence return direct to (A). Measure the distance from (B) to (C) to (A). Traveling at 4.0 knots, if you depart (B) at 1152, what will be your ETA at (A)?
  - A. 1328
  - B. 1350
  - C. 1314
  - D. 1404
- 100. At the same time that you passed abeam the *Clements Reef Danger Buoy* (B) northbound at your planned 4.0 knots enroute to (C), a 550-foot tanker passed abeam the radio reporting point 8 (approx Lat 48° 48.4' N, Lon 122° 56.3' W) southbound at a speed of 18 knots on the traffic lane centerline. Which of the following statements is most correct?
  - A. No potential right-of-way situation exists, as you will be well clear to the north prior to the approach of the tanker.
  - B. As a sailing vessel, the Navigation Rules say you are the stand-on vessel, and the approaching tanker must give way.
  - C. As you are seen from the tanker as approaching from the right, the Navigation Rules say you are the stand-on vessel, and the approaching tanker must give way.
  - D. Because you are a sailing vessel, the Navigation Rules say that you shall not impede a vessel required to follow a traffic lane, and you must give way.



NOT FOR NAVIGATIONAL USE

ΤF	ΤF	ABCD	ABCD	
100	26 00	51 0000	76 0000	
2 0 0	27 0 0	52 0 0 0 0	77 0 0 0 0	
3 0 0	28 0 0	53 0 0 0 0	78 0 0 0 0	
4 0 0	29 0 0	54 0000	79 0 0 0 0	
5 0 0	30 🔾 🔾	55 0000	80 0000	
6 0 0	31 00	56 0000	81 0 0 0 0	
700	32 0 0	57 0000	82 0 0 0 0	
8 0 0	33 0 0	58 0000	83 0 0 0 0	
9 0 0	34 0 0	59 0000	84 0 0 0 0	
10 00	35 0 0	60 0000	85 0 0 0 0	
11 00	36 0 0	61 0000	86 0 0 0 0	
12 00	37 0 0	62 0 0 0 0	87 0 0 0 0	
13 00	38 0 0	63 0 0 0 0	88 0 0 0 0	
14 00	39 0 0	64 0 0 0 0	89 0000	
15 00	40 0 0	65 0000	90 0 0 0 0	
16 00	41 00	66 0 0 0 0	91 0 0 0 0	
17 00	42 0 0	67 0000	92 0 0 0 0	
18 00	43 0 0	68 0000	93 0 0 0 0	
19 00	44 0 0	69 0 0 0 0	94 0 0 0 0	
20 0 0	45 0 0	70 0000	95 0 0 0 0	
21 00	46 0 0	71 0000	96 0 0 0 0	
22 00	47 0 0	72 0000	97 0 0 0 0	
23 00	48 0 0	73 0000	98 0 0 0 0	
24 00	49 0 0	74 0000	99 0 0 0 0	
25 00	50 0 0	75 0000	100 0 0 0 0 0	

PART B: EXAMINATION OF SAILING SKILLS	N OF SAILING SKILLS
BAREBOAT EXAMINATION	AMINATION
Each of the following items must be properly performed before this examination can be considered to be satisfactorily completed. A check mark in the corresponding box below signifies that the ASA Instructor has witnessed the Candidate's successful performance of the following sailing skills, minimally one time or continuously as specified. All sailing skills are to be performed in moderate wind and sea conditions, demonstrating proper safety precautions.	e this examination can be considered to be satisfactorily iffies that the ASA Instructor has witnessed the Ils, minimally one time or continuously as specified. conditions, demonstrating proper safety precautions.
TO BE COMPLETED BY THE ASA INSTRUCTOR INDICATED TO THE RIGHT	RUCTOR INDICATED TO THE RIGHT
CHECK OUTS	ANCHORING
□ 1. Engine Daily/Checklist	Demonstrate Techniques:
□ 2. Engine Weekly/Checklist.	□ 23. One Anchor
□ 3. First Aid Kit	□ 24. Two Anchors
	□ 25. Bow and Stern
	TOWING DINGHY
□ 6. Electronics □ 7. Hull	$\Box$ 26. Demonstrate Safety and Efficiency Techniques
□ 8. Rigging	SOUNDINGS
□ 9. Sails	□ 27. Make Electronic and Manual Depth Checks
SAILING EFFICIENCY	
Demonstrate:	
□ 10. All Points of Sail	L 26. 10 and From Desunations
□ 11. Tacking	PERSON OVERBOARD
□ 12. Jibing	Demonstrate:
□ 13. Sailing to Weather	□ 29. Two Return Methods
MANEUVERING UNDER POWER	□ 30. Two Recovery Methods
Demonstrate:	NAVIGATION
□ 14. Docking	□ 31. Lay Course Line
□ 15. Turning in Confined Space	□ 32. Determine ETA
□ 16. Stop Within 4 Feet of Marker	🗆 33. Identify Landmarks
□ 17. Bow-To or Stern-To Docking with Anchor	34.
COLLISION AVOIDANCE REGULATIONS	□ 35. Obtain Depth Using Chart
□ 18. Demonstrate Situations as Opportunities Arise	PILOT INTO UNFAMILIAR HARBOR
VUTE	$\Box$ 36. Use Chart and Natural Surroundings
v III □ 19. Send and Receive Calls	ROPE WORK
OPERATING THE STOVE	□ 37. Rolling Hitch
Demonstrate:	
□ 20. Proper Safety Checks	L 39. Bowline
🗆 22. Proper Extinguishing Techniques	

3. First Aid Kit
4. Tool Kit
5. Stove
6. Electronics
7. Hull
8. Rigging
9. Sails