

Library Research Guides: Maritime History of Navigation

Page 1 of 7

Navigation, "... the art or science of conducting a vessel from one port to another both by means of landmarks and by observation of celestial bodies, or by electric beacons..." is defined in the Mariner's Dictionary, by Gershom Bradford, 1952, page 178. Vessel steering and piloting along coastlines, harbors and roadsteads was technologically enhanced by aids to navigation such as the compass, chart or map, and measuring devices and instruments in wide-spread use after World War II. Reliance on celestial navigation, also in common use before radar technology, is much older, extending back to the first millennium B.C. with the Phoenicians who "... planned voyages ... using a wind-rose and the stars...", from the Oxford Companion to Ships and the Sea, by Peter Kemp, 1976, page 578.

In a broader sense the term navigation applies to use of the oceans for transport. For works in that category, please see the link to Histories of Sailing and Steam-Powered Vessels on the Library collections page, at <http://www.lamaritimemuseum.org/libcollection.htm>. Books on navigation in the Library represent historical material. The following list of books is selected exclusively for the technology of the 20th century, and are only partially represented here. For pilot charts and maps of coastlines, seas, islands and oceans, or, if you do not see what you are looking for here, please call the Library at 310-548-7618, x 215.

Navigation

History:

1. A history of marine navigation. / by W. E. May, 1973.
2. A history of the practice of navigation. / Brown, Ferguson & Son, 1951.
3. History of navigation & navigation improvements on the Pacific coast. / by Anthony F. Turhollow, Benjamin F. Gilbert, and K. Jack Bauer, 1983.
4. A short history of navigation. / by W.J. V. Branch and E. Brook-Williams, 1942.

Reference works:

1. The American practical navigator : an epitome of navigation / originally by Nathaniel Bowditch ; published by the United States Hydrographic Office under the authority of the Secretary of the Navy, 1931
2. Navigation and nautical astronomy. A textbook on navigation and nautical astronomy, prepared for use at the United States Naval Academy by Captain Benjamin Dutton, 1932.
3. Navigation afloat : a manual for the seaman. / by Alton B Moody ; foreword by M.W. Richey, 1980.
4. The Oxford Companion to ships and the sea. / edited by Peter Kemp, 1976.
5. Piloting, seamanship, and small boat handling / Charles F. Chapman ; with revisions by Elbert S. Maloney ... [et al.].
6. A select bibliography of British and Irish university theses about maritime history, 1792 to 1990 / compiled by David M. Williams and Andrew P. White, 1991.

Library Research Guides: Maritime History of Navigation

Page 2 of 7

General Works:

1. Delaney's illustrated rules of the nautical road. / by L.E. DeLaney, 1948.
2. Dutton's Navigation and piloting. Fourteenth Edition by Elbert S. Maloney, 1985.
3. Elements of navigation; a complete exposition of the newest methods as used in the Navy and Merchant Marine. / by W.J. Henderson ... , 1918, c1895.
4. The Key to the thirteenth edition of Reed's new guide book containing the working of the questions and the quantities from the nautical almanac and admiralty tide tables. / Revised by C.M. Swainston, 1899.
5. Mariner's notebook. / by William P. Crawford, 1971; 1968, 1966, 1962.
6. Navigation. / by the editors of Time-Life Books, 1976.
7. Navigation prepared by the naval training command./ prepared by Saul Lapidus-Courier Book 1972, c1966.
8. Navigation second edition with a chapter on compass adjusting, and a collection of miscellaneous examples./ by Harold Jacoby, 1918.
9. Reed's seamanship and nautical knowledge, compiled for candidates preparing to pass the examinations for certificates of competency as mates and masters, including answers to shipbuilding, stability, meteorology, deviation of the compass, cargo works and ships maintenance. / Thomas Reed & Company, 1931.
10. "Wrinkles" in practical navigation. / by S.T.S. Lecky..., 1887.

Aids to navigation

1. The ABC of compass adjustment being a thorough explanation in simple language of a complex problem. / by E.W. Owens, 1913.
2. How to adjust your own compass. / K.W. David, 1961.
3. Magnetic compass adjustment simplified. / Bureau of Ships, 1944.

Aids to navigation---Light Lists

1. Complete list of lights and other marine aids. Vols. I-IV. / Treasury Department. / United States Coast Guard, 1953.
2. List of lights and fog signals. / United States. Defense Mapping Agency, Hydrographic / Topographic Center. 1974, 1971, 1953.
3. Light list. Pacific Coast, United States, Canada, and Hawaiian Islands. / U.S. Coast Guard. 1948, 1945.
4. Light list. Pacific Coast and Pacific Islands. / compiled by U.S. Treasury Department, U.S. Coast Guard. 2006, 1995, 1964.

Aids to navigation---Lighthouses:

The significance of aids to marine navigation. / United States Coast Guard, 1943.

Library Research Guides: Maritime History of Navigation

Page 3 of 7

Biography:

Carry on, Mr. Bowditch; illustrated by John O'Hara Cosgrave, II, 1983, c1955.

See Reference Works for Nathaniel Bowditch as author.

Boating:

See Sailing and Yachting.

California:

1. Harbors and navigation code of the State of California, adopted May 25, 1937, with amendments up to and including those of the first extraordinary session of the legislature, 1954. Annotated and indexed by the publisher's editorial staff, 1954, c1944.
2. International port of call : an illustrated maritime history of the Golden Gate. / by Robert J. Schwendinger ; pictorial research by Justine Hume ; produced in association with the Marine Exchange of the San Francisco Bay region, 1984.

Celestial navigation:

1. Celestial navigation step by step. / by Warren Norville, 1975.
2. Celestial navigation : Captain Joe Thompson's cookbook method. / by Joseph E. Thompson, 1981.
3. Celestial navigation; a quick, easy, and thorough explanation, with realistically worked examples, of the practice of celestial navigation at sea, using simple and inexpensive equipment and requiring only the ability to add and subtract figures, by Frances W. Wright, 1969.
4. Commonsense celestial navigation. / by Hewitt Schlereth, 1982, c1975.
5. Manual of celestial navigation. / by Arthur A. Ageton ... , 1944.
6. Practical celestial navigation. / by Susan P. Howell, 1987.

Charts:

Nautical charts and publications public sale Region 1 United States and Canada 4th edition. / National Imagery and Mapping Agency, 2000, c1998.

Coastwise navigation:

Advanced coastal navigation. / U.S. Coast Guard Auxiliary, 1987.

Dead reckoning:

Piloting and dead reckoning / by H. H. Shufeldt and G. D. Dunlap.

Distances:

1. Table of distances between ports, via the shortest navigable routes / as determined by the Hydrographic Office, United States Navy Dept, 1936.
2. Distances between United States ports / published by the Defense Mapping Agency, Hydrographic Center, 1978.

Library Research Guides: Maritime History of Navigation

Page 4 of 7

Electronics in navigation:

1. Guide to marine electronics./ By The National Marine Electronics Association, 1983.
2. Radar and electronic navigation. by G. J. Sonnenberg, 1970, c1951.
3. Radar for safer boating : what it is; how it works; when and how to use it for navigating and increasing safety./ Jack West, 1967.
4. Radar plotting manual. / U.S. Navy Hydrographic Office, 1960.
5. The use of radar at sea. / edited by F. J. Wylie, 1978.

Education, examination, questions for Ship captains' licenses in the United States:

1. The Coast Guard license : from six-pac to ocean operator / by Budd Gonder, 1984.
2. Crawford Nautical School information. / Crawford Nautical School, 1969.
3. Cugle's Practical navigation. / by Charles H. Cugle, 1943.
4. Navigation. Introduction, Lessons 1, 2 & 3. / Captain L.E. Delaney, 1947.
5. Ocean and inland operator book 1 and book 2 license preparation course. / Richard A. Block, editor, 1982.
6. Problems & answers in navigation & piloting. / Elbert S. Maloney, 1978.
7. Pugsley's new guide to the United States local inspectors examination of masters and mates : of ocean-going steam and sailing ships, containing all useful information and explaining how to find latitude and longitude by observation, and many other useful calculations not included in the examination, / by Capt. R.M. Pugsley, 1920.

Gyro-compass:

Gyro-compasses, publication 17-20. / Sperry Gyroscope, 1945.

Inland navigation:

1. Code of Federal Regulations 33 Navigation and navigable waters. / Office of the Federal
2. Register, various dates.
3. Deep water. / New York Marine News Company, Inc, 1952.

Los Angeles Harbor (California):

See California.

Marine meteorology:

Mariners weather log. / National Oceanic and Atmospheric Administration, Environmental Data and Information Service./National Oceanographic Data Center (U.S.), 2008.

Mathematics:

1. Mathematics for navigators a supplement to Dutton's Navigation and nautical astronomy. / by Bennett M. Dodson and Delwyn Hyatt, 1944.
2. Mathematics used in navigation. Lessons 1, 2, 3 & 4. / by Captain L.E. Delaney and E.W. Tinsely, 1948.

Library Research Guides: Maritime History of Navigation

Page 5 of 7

Mathematics, continued:

3. Navigational applications of plane and spherical trigonometry / by Carol A. Congleton; illustrated by Sal R. Garcia, 1980.
4. Piloting/navigation with the pocket calculator. / by Jack Buchanek & Ed Bergin, 1976.
5. Short, easy and improved method of finding the apparent time at ship. / D. M'Gregor & Co., Ltd., 1929.
6. The danger angle and off-shore distance tables with a table of natural sines, tangents, etc./ by S.T.S. Lecky, 1941.
7. Using electronic calculators to solve problems in navigation a supplement to Slide rule for the Mariner. / by H. H. Shufeldt, 1977.

Nautical astronomy:

1. A complete epitome of practical navigation, and nautical astronomy, containing all necessary instructions for keeping a ship's reckoning at sea... new edition. / By J.W. Saul, 1917, c1852.
2. A treatise on navigation and nautical astronomy, including the theory of compass deviations, prepared for use as a textbook at the U.S. Naval Academy. / by Commander W.C.P. Muir ..., 1918,
3. Basic problems in celestial navigation. / by Barton Roth, 1944.
4. Navigation and nautical astronomy / by Prof. J.H.C. Coffin ; prepared for the use of the U.S. Naval Academy, 1902, c1898.

Polynesians, Micronesians:

1. The voyaging stars : secrets of the Pacific island navigators / David Lewis, 1978.
2. We, the navigators; the ancient art of landfinding in the Pacific. / David Lewis, 1975.

Oceanography and ocean engineering:

Science and the sea. / U.S. Naval Oceanographic Office, 1967.

Pilots and pilotage:

1. Coastal navigation step by step. / by Warren Norville, 1976.
2. The new-skipper's Bowditch : piloting from here to there, and home again, with maximum pleasure and minimum trauma. / by James Louttit, 1984.

Royal Navy--Handbooks, manuals:

1. Manual of seamanship, volume 1, 1908. / By authority of the Lords Commissioners of the Admiralty.
2. Manual of seamanship, volume 2, 1909. / By authority of the Lords Commissioners of the Admiralty.

Rule of the road at sea for Inland navigation, Law and legislation in the United States:

1. Rules of the nautical road. Farwell's Rules of the nautical road. / Raymond James Farwell, 1977.
2. Rules to prevent collisions of vessels and pilot rules for certain inland waters of the Atlantic and Pacific coasts and of the coast of the Gulf of Mexico. / no date.
3. A mariner's guide to the rules of the road. / William H. Tate, 1982.

Safety measures:

1. Particularized navigation: how to prevent navigational emergencies. / by Frances W. Wright, 1973.
2. Navigation rules, international-inland / U.S. Department of Transportation, United States Coast Guard, 1983.

Sailing and Yachting:

1. Kindergarten of celestial navigation. / by Joseph Sellar, 1964 .
2. Practical navigation for the yachtsman. / by Frederick L. Devereux, Jr. Illustrated by Richard Mikulski, 1972.
3. Sailing in the fog. / by Richard Henderson, 1986.
4. Sailing at night. / by Richard Henderson, 1987.
5. Sailing in windy weather. / by Richard Henderson, 1988.
6. World cruising routes / Jimmy Cornell.
7. The yachtsman's guide to coastwise navigation. / by Stafford Campbell, 1979.
8. World cruising routes. / by Jimmy Cornell, 1987.
9. Navigation for offshore and ocean sailors. / by David Derrick, 1981.

Tables:

1. Self-contained celestial navigation with H.O. 208. / by John S. Letcher, Jr. ; illustrated by the author, 1977.
2. Astronomical navigation tables. Volume A. Latitudes 0 - 4 North and South... / Great Britain Hydrographic Office, 1941.
3. Dead reckoning altitude and azimuth table. / by Arthur Ageton, 1943.
4. Lecky's general utility tables; for the quick solution of many every day problems in navigation... / by T.S. Lecky, 1911.
5. Cugle's two-minute azimuths, volume 1 and volume 2 / by Charles Hurst Cugle, 1945.
6. Tables of computed altitude and azimuth latitudes 0 to 9 inclusive volume 1. / United States Navy Department Hydrographic Office, 1941.
7. Noon-interval tables. / United States Hydrographic Office, 1943.

Library Research Guides: Maritime History of Navigation

Page 7 of 7

8. Distances between United States ports. / United States Department of Commerce, 1978.

United States Navy:

1. Quartermaster 1 & C. / U.S. Navy Training Publications Center, 1949.
2. Quartermaster 3 & 2. / U.S. Navy Training Publications Center, 1963, c1951.

Weather:

1. Admiralty list of radio signals volume 3 1988. Hydrographer of the Navy (Great Britain), 1988.
2. Navigation of ships in a fog. / by C.D. Wilkinson and J.T. Douglas, 1908.
3. On finding the latitude and longitude in cloudy weather and at other times. / By A. C. Johnson, 1916.
4. Radio weather aids to navigation. Radio weather broadcasting ... 1941- ./ United States Navy Department Hydrographic Office, 1941