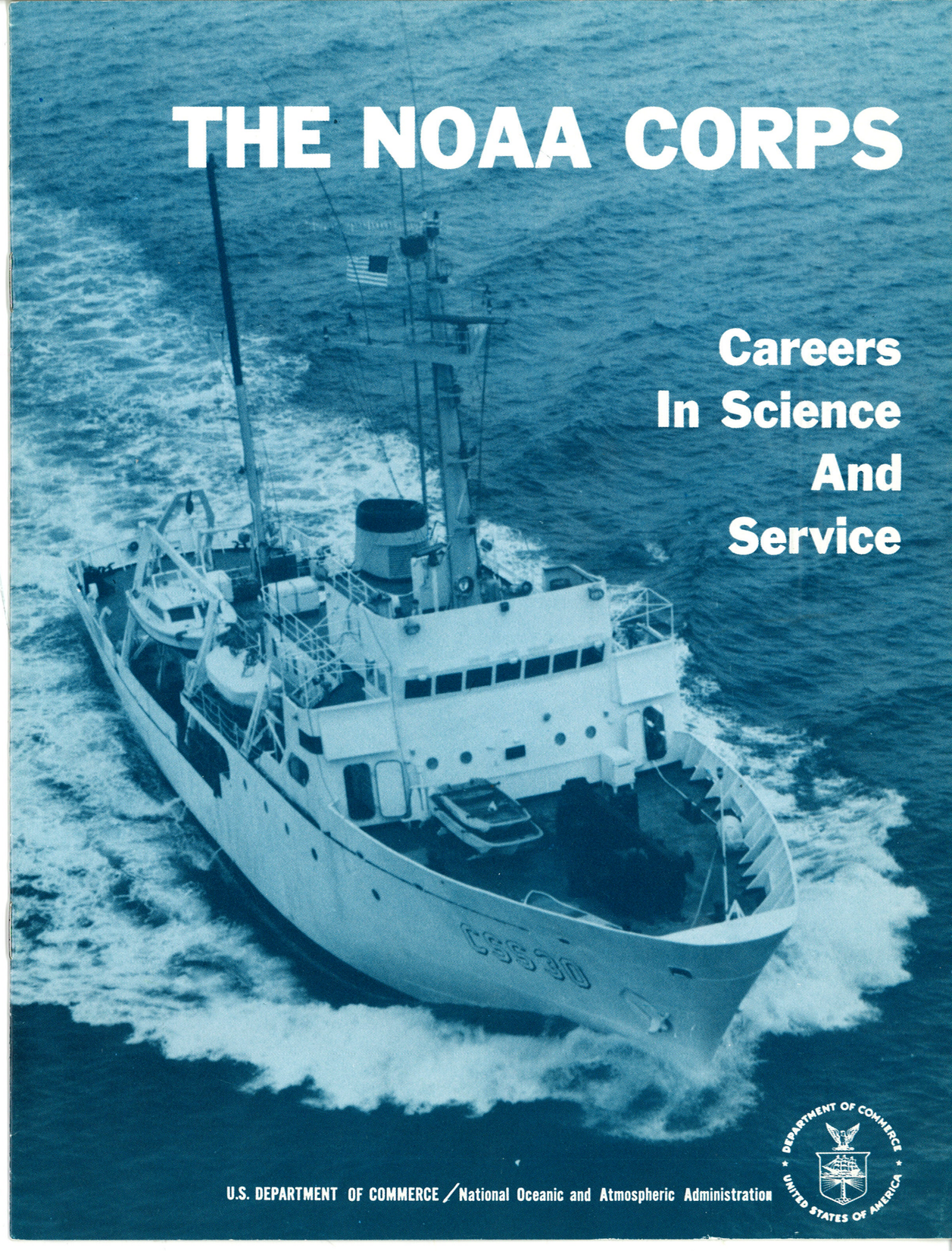
THE NOAA CORPS

Careers In Science And Service



U.S. DEPARTMENT OF COMMERCE / National Oceanic and Atmospheric Administration

SCIENCE AND SERVICE:

A Career in the NOAA Corps

Introduction

The NOAA Corps is one of the Nation's seven uniformed services. It combines aspects of a military service life with the scientific mission of the Commerce Department's National Oceanic and Atmospheric Administration. This combination provides an opportunity for engineering and science graduates to do technical work in the field and also to serve their country as commissioned officers. The Corps is especially oriented toward men and women who desire travel, variety of assignments, and meeting nature on her own terms.

NOAA ORGANIZATION

An understanding of the NOAA Corps requires, initially, an understanding of the organization of the National Oceanic and Atmospheric Administration (NOAA). NOAA was created in October 1970 within the U.S. Department of Commerce. Its formation brought together the functions of the Environmental Science Services Administration (of the Department of Commerce); the Bureau of Commercial Fisheries, Marine Game Fish Research Program, and Marine Minerals Technology Center (of the Department of the Interior); the National Oceanographic Data Center and the National Oceanographic Instrumentation Center (formerly administered by the U.S. Navy); the National Data Buoy Development Project (of the U.S. Coast Guard); the National Sea Grant Program (of the National Science Foundation); and elements of the U.S. Lake Survey (of the Army Corps of Engineers). The combination of these functions provides the technical talent needed to conduct a systematic study of the total physical environment of the Earth and to conduct research supporting that mission. Briefly, the basic functions of each component are as follows:

The National Ocean Survey (NOS) prepares nautical and aeronautical charts promoting safety and efficiency of marine and air navigation, and conducts surveys to develop and maintain the precise geodetic control network essential to mapping and engineering projects. The Survey's pro-

grams in geophysics include measurement of gravity, magnetics, and determination of the Earth's size and shape. Oceanic operations include hydrographic and oceanographic surveys, and measurements of tides and currents. The Lake Survey, now a part of NOS, produces charts and related material for the Great Lakes region as well as investigating the physical aspects of the Lake waters, basin and ice. The National Data Buoy Center, another segment of NOS manages the National Data Buoy Development project and is developing a national system of automatic ocean buoys for obtaining essentially continuous marine environmental data. The National Oceanographic Instrumentation Center provides the national focal point for technology related to instrument measurement, evaluation, and the reliability of sensing systems for ocean use.

The National Weather Service reports the weather of the United States and its possessions, provides weather forecasts to the general public, issues warnings against tornadoes, hurricanes, floods, tsunamis and other atmospheric and hydrologic hazards, and provides a broad array of special services to aeronautical, maritime, astronautical, and other weather-sensitive activities.

The National Marine Fisheries Service seeks to discover, describe, develop, and conserve the living resources of the global sea, especially as they affect the American economy and diet. The Fisheries Service conducts biological research on economically important species, analyzes economic aspects of fisheries operations, and develops methods for improving catches and, in cooperation with the U.S. Department of State, is active in international fisheries affairs. With the U. S. Coast Guard, the National Marine Fisheries Service conducts enforcement and surveillance operations on the high seas and in territorial waters. It also studies game fish behavior and resources, seeks to describe the ecological relationships between game fish and other marine and estuarine organisms, and investigates the effects on game fish of thermal and chemical pollution.

The National Environmental Satellite Service operates the national weather and environmental satellite systems. It develops new techniques for the acquisition of environmental data and the application of such data to atmospheric, solar, oceanographic, and other geophysical problems.

The Environmental Research Laboratories conduct fundamental investigations needed to improve man's understanding of the physical environment. Their programs include investigations of ocean and Great Lakes processes and their interactions with the atmosphere and solid earth; the upper atmosphere and space environments; severe local storms, hurricanes, and extratropical cyclones; weather modification; marine mining technology; remote sensing techniques; and the environmental effects of global pollution.

The Environmental Data Service acquires, processes, and disseminates environmental data collected by government agencies and private institutions, and develops improved methods of processing and presentation. It operates the national data centers for geodetic, geomagnetic, seismological, meteorological, aeronomic, and oceanographic data, and provides administrative support for the corresponding World Data Centers in the United States, which receive data from cooperative investigations and other international sources.

The Office of Sea Grant administers and directs the National Sea Grant program. This program provides support for institutions engaged in comprehensive marine research and development, and sponsors education of ocean scientists and engineers, marine technicians, and other specialists at selected colleges and universities.

PURPOSE OF THE NOAA CORPS

Why does NOAA have a commissioned officers corps? To find an answer, some background on the Corps is necessary.

The NOAA Corps was created in the Coast and Geodetic Survey (C&GS) in 1917 by Act of Congress. At that time, the major activity of that organization was hydrographic and geodetic surveying for which engineers qualified for marine command were needed. Originally this need was met by using Navy and Army officers. However, they were unavailable after 1898. After unsuccessfully trying other expedients the C&GS Commissioned Corps was established.

A uniform similar to that of the Navy and Coast Guard was adopted because of the large amount of nautical work involved. As the career plan developed, C&GS officers became involved with ship duty, mobile shore duty, and fixed shore duty assignments in geodesy, photogrammetry, hydrographic surveying, seismology, gravity, magnetics, tides and currents, and cartography. This, then was the status of the Coast and Geodetic Survey Commissioned Corps at the advent of Environmental Science Services Administration in 1965. The Corps, in its 48 years of existence, had provided a competent, professional group of officers within the Survey. Therefore, the President transferred the Corps to ESSA in order to utilize this diverse range of competence throughout the organization. A further reorganization of the United States' atmospheric and oceanographic effort was made by the President in 1970, which saw a transfer of the Corps to the newly formed NOAA. However, the role of the commissioned officer is in many ways unchanged under NOAA. Officers continue to rotate assignments among ship, mobile field and fixed shore duty.

THE NOAA CORPS AS A UNIFORMED SERVICE

Even though they are administered differently, civil service personnel and commissioned officers work together on NOAA projects. NOAA commissioned officers are subject to many of the same laws as the Department of Defense officer programs (Army, Navy, Air Force, Marines). Since the NOAA Corps is in many ways similar to other officer programs, a look at the similarities and differences is in order.

The NOAA Corps Has These Similarities:

a. NOAA officers wear uniforms resembling those of the U.S. Navy, U.S. Coast Guard, and U.S. Public Health Service. Grade structure is identical to Navy and Coast Guard.

b. NOAA officers receive the same basic pay and allowances and the same onbase privileges (PX, Commissary, etc.)

c. Medical care is provided for officers and their dependents at Public Health Service or Armed Forces medical facilities. A program of care in civilian medical facilities is also provided for dependents.

d. Leave is earned at the rate of 2½ days per month.

e. NOAA officers in travel status are governed by the Joint Travel Regulations of the Uniformed Services.

f. Retirement eligibility accrues after 20 years' active service. Roughly stated, you would have to put aside about $300 a month of civilian pay in order to establish an annuity equal to that of a officer who has 20 years of service. Social Security benefits are in addition to normal retired pay.

g. Survivor benefits, in the event of an officer's death of service-connected causes while on active duty include:

A gratuity payment equal of six months' basic pay or $3,000 whichever is the lesser;

Funeral and burial expenses for the officer;

Return of dependents and household effects to their home.

h. NOAA officers follow an analogous career pattern: outdoor work, travel, and a rotation of assignments.

i. NOAA officers may be transferred to the Department of Defense for duty as required in time of war or national emergency.

j. NOAA officers are covered by the provisions of the Soldiers' and Sailors' Civil Relief Act of 1940.

k. NOAA officers are covered by the benefits and services of the Veterans Administration, subject to their rules and regulations.

The Corps Has The Following Differences:

a. NOAA officers are not subject to the Uniform Code of Military Justice except when they are transferred to the Department of Defense.

b. There are no enlisted or non-commissioned personnel within the NOAA Corps as in the other services.

c. NOAA does not have military bases as such; therefore, normally, "base housing" is not available, and NOAA officers must travel to the nearest military base to use "base facilities" such as exchange, commissary, etc.

ASSIGNMENTS AND CAREER SEQUENCE FOR JUNIOR OFFICERS

The NOAA Corps, with a currently authorized strength of 358 officers, is the smallest of the uniformed services. At any one time, almost one-half of the Corps is assigned to sea duty aboard the ships operated by NOAA. Other officers are assigned to mobile shore duty, the remainder to fixed shore duty billets. Assignments average 1½ to 3 years in length.

An officer may expect the following breakdown of duty during a typical 30-year career with the NOAA Corps:

Sea Duty	9 years
Mobile Shore Duty	6 years
Fixed Shore Duty	15 years
	30 years

SEA DUTY

Sea duty is the common denominator for every NOAA officer and is normally the initial assignment for those newly appointed. Commissioned officers participate not only in the oceanographic or hydrographic surveying, but also in the management and navigation of the vessel. On any particular day at sea each officer may be called upon to perform in either or both of these areas. This provides maximum exposure to survey work, vessel management, and shiphandling for each officer.

Once aboard, an officer's duties will vary, depending upon many factors: size, location, mission of the ship; the officer's background, abilities, and special training; and finally, rank.

Overall length of the Administration's ships varies between 60 and 303 feet. The larger ships are designed for long cruises involving physical oceanographic and deep ocean surveying. The medium and smaller size ships do proportionately less oceanographic and more coastal work. A primary mission of NOAA's fleet is hydrographic surveying in order to gather data for nautical and bathymetric charts. Therefore, most officers may expect to be involved in this activity. The smallest ships are of special designs used for current studies, wire drag hydrography, or laboratory support.

Officer duties include shiphandling, navigation, hydrography, carrying out oceano-

graphic and geophysical investigations, as well as special scientific operations and administration. Officers become involved in all phases of ship activities and are expected to be both ship operators and engineer/scientists. Along with these duties an officer must fulfill such other duties as are required in the day to day operation of the ship.

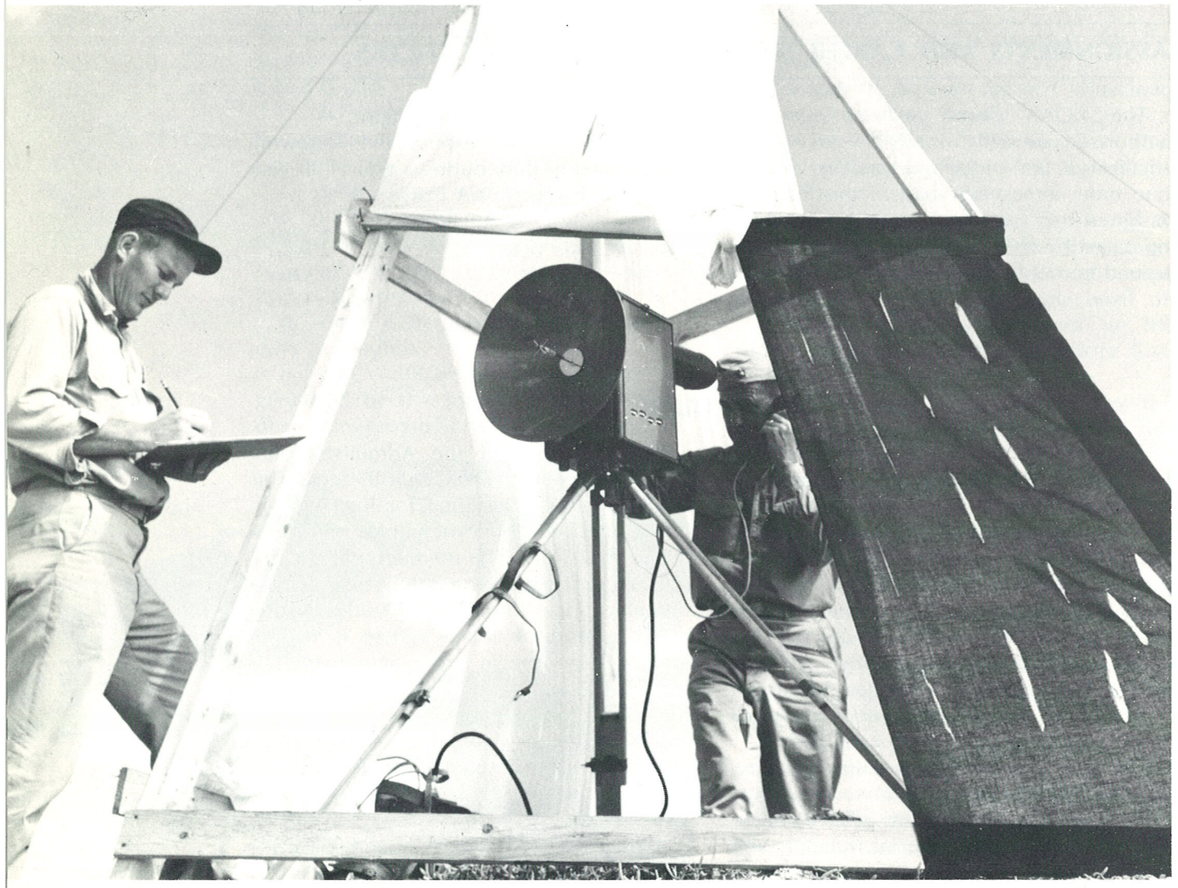
Officers may be separated from their families for periods of up to 8 or 9 months when the ships are away from their home ports on extended operations. However, NOAA's ships normally work about 4 months on a project, return to home ports such as Norfolk, Virginia; Seattle, Washington; or Miami, Florida, for brief periods and then go out for another extended period.

MOBILE SHORE DUTY

Mobile shore duty involves a great deal of travel. This duty may be from a fixed location, but generally it is on a field party working in geodesy (precise triangulation and/or leveling), photogrammetry, gravity, geodetic astronomy, hydrography, satellite triangulation, flight duty, or tides. These parties may move as frequently as every few days or as seldom as once or twice a year. A special per diem is paid to offset the increased expenses incurred.

FIXED SHORE DUTY

Fixed shore duty may be in any component of NOAA. It may be in operational, research, staff or administrative positions. The greater number of assignments are normally in the National Ocean Survey.



JUNIOR OFFICER TRAINING—

ASSIGNMENT OPPORTUNITIES

Classes of appointees to the NOAA Corps are formed several times a year. Initial training consists of a 10 week orientation course conducted at the NOAA Officer Training Center located at the U.S. Merchant Marine Academy, Kings Point, New York. The course includes classes in uniform protocol, NOAA orientation, seamanship, navigation, and piloting. New officers are appointed temporary ensigns prior to beginning the course. Upon completion of the orientation course, officers normally are assigned to a NOAA hydrographic or oceanographic survey ship for approximately twenty-four months.

Upon completion of the sea duty assignment, officers are assigned to mobile or fixed shore billets. While the needs of the service are paramount in any officer assignment, the shore assignment is usually one of three requested by the officer. Officers continue to work on different assignments throughout their careers. Career patterns may be interrupted at any time if conditions necessitate a change of assignment.

Because few people enter the NOAA Corps prepared to apply their academic knowledge directly to NOAA's activities, much of the officer's early career is learning. As in any learning process, this often means long working hours, rigorous physical activity, and the repetitious, sometimes tedious, activity associated with becoming adept at mobile field and ship duty operations. However, junior officers are given increasing amounts of responsibility throughout their early years to build self-confidence and leadership ability. These traits are utilized to a maximum, for example, in the performance of duty as the Commanding Officer of a NOAA survey ship.

After 4 to 6 years' service, graduate study is available for a limited number of officers. One or two officers with over three years' service, meeting the high physical requirements and exhibiting a previous interest in aviation, are selected each year for pilot training. Advanced training requires an additional obligation of service to ensure the government a proper return on its in-

vestment. Many other opportunities are made available to officers who wish to improve their qualifications. A number of assignments are available within the Environmental Research Laboratories. These assignments are very popular and are filled only by officers with exceptional qualifications. This means that most junior officers will spend their initial five or six years on sea and mobile shore duty. Many mobile shore assignments include a short orientation period at National Ocean Survey Headquarters.

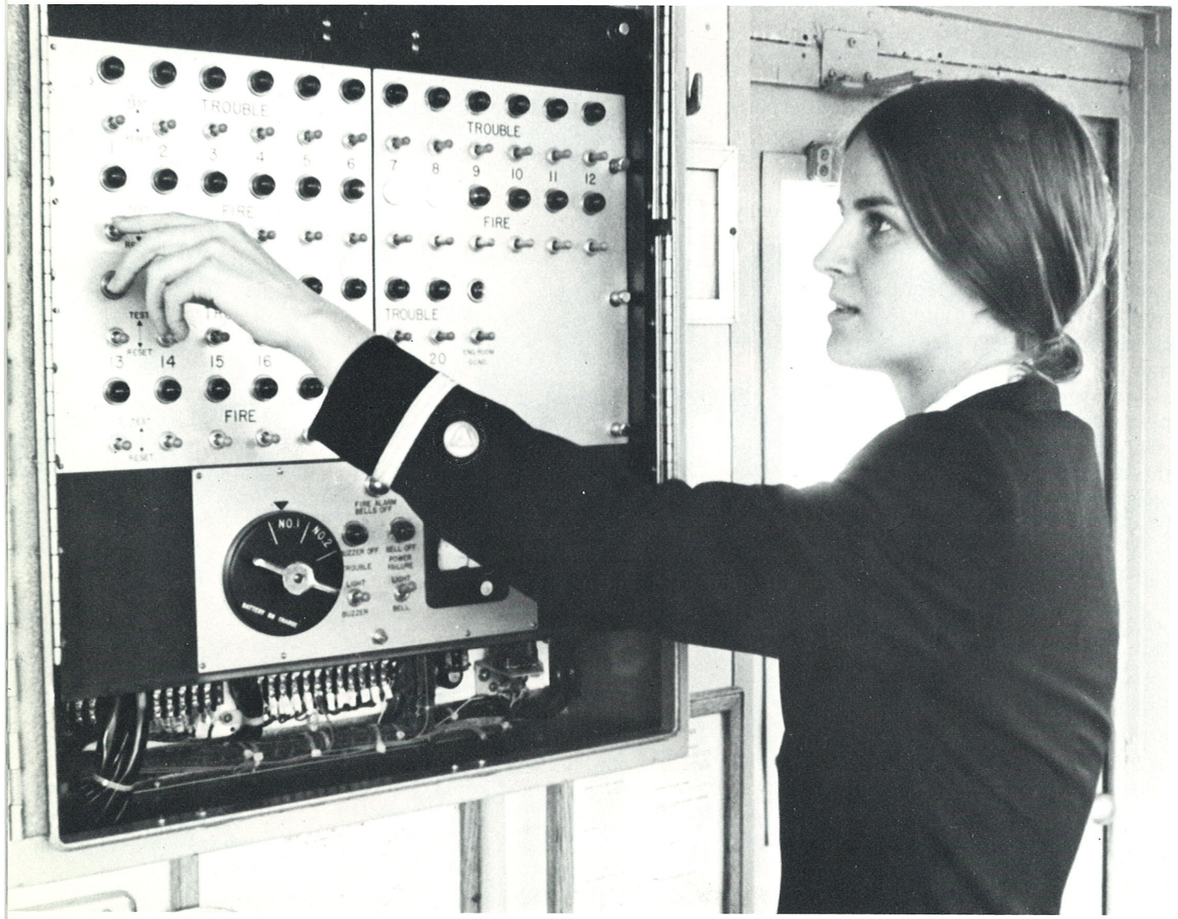
A junior officer may expect to advance in grade from ENSIGN to LIEUTENANT (JUNIOR GRADE) after 15 months and to LIEUTENANT after an additional 24 months.

An officer who remains on active duty two years will satisfy the Selective Service obligation.

QUALIFICATIONS REQUIRED

Candidates for appointment to the NOAA Corps must hold a baccalaureate or higher degree in engineering, mathematics, physics, oceanography, meteorology, or other physical, geophysical, or biological science discipline from an accredited college, maritime academy, or university. Regardless of the academic field of specialization, an applicant for appointment must have completed at least 48 semester (72 quarter) hours of NOAA related science, including a minimum of 24 semester (36 quarter) hours of mathematics and physics with a minimum of 6 semester (9 quarter) hours in either subject. This should include mathematics through differential and integral calculus. An applicant must be a citizen of the U.S. between the ages of 20 and 26. In some cases the age limit may be extended for candidates with experience related to NOAA.

Physical standards are high. Uncorrected vision of 20/20 in each eye is prescribed, but waivers may be granted for visual acuity not less than 20/70 in each eye if corrected to 20/20. Color blindness is disqualifying.



APPLICATION PROCEDURES

A personal interview with a NOAA recruiting officer is a required part of the application procedure. If application forms were not included with this literature, they may be obtained from your nearest recruiting office (list at right). After completing the application you should arrange to be interviewed by contacting the recruiter in your area. Interviews are conducted at the recruiting offices and in college placement services when recruiters visit a campus.

Remember, you must be interviewed before your application can be fully processed and you must arrange the interview.

Students in ROTC are eligible to apply, but may not be appointed in the NOAA Corps without permission of their parent service. NROTC Regular students (midshipmen) will not be interviewed nor will applications be accepted from them.

No paper required in the application is binding unless the applicant is selected for a commission and he formally accepts. Applicants are subject to the draft until appointed in the NOAA Corps, although selective service boards may postpone induction for those selected for appointment. Applications will not be accepted from persons who have already received induction notices unless these persons are college students with a 1-SC classification. Since the training classes are dependent upon changing personnel needs, interested and qualified applicants should be interviewed and begin application at least six to eight months prior to graduation and/or availability date.

RECRUITING OFFICES

General questions on the NOAA Corps and arrangements for a personal interview should be directed to the appropriate NOAA office listed below.

NOAA Corps Recruiting Officer
Atlantic Marine Center
National Ocean Survey, NOAA
439 West York Street
Norfolk, Virginia 23510
804-441-6201

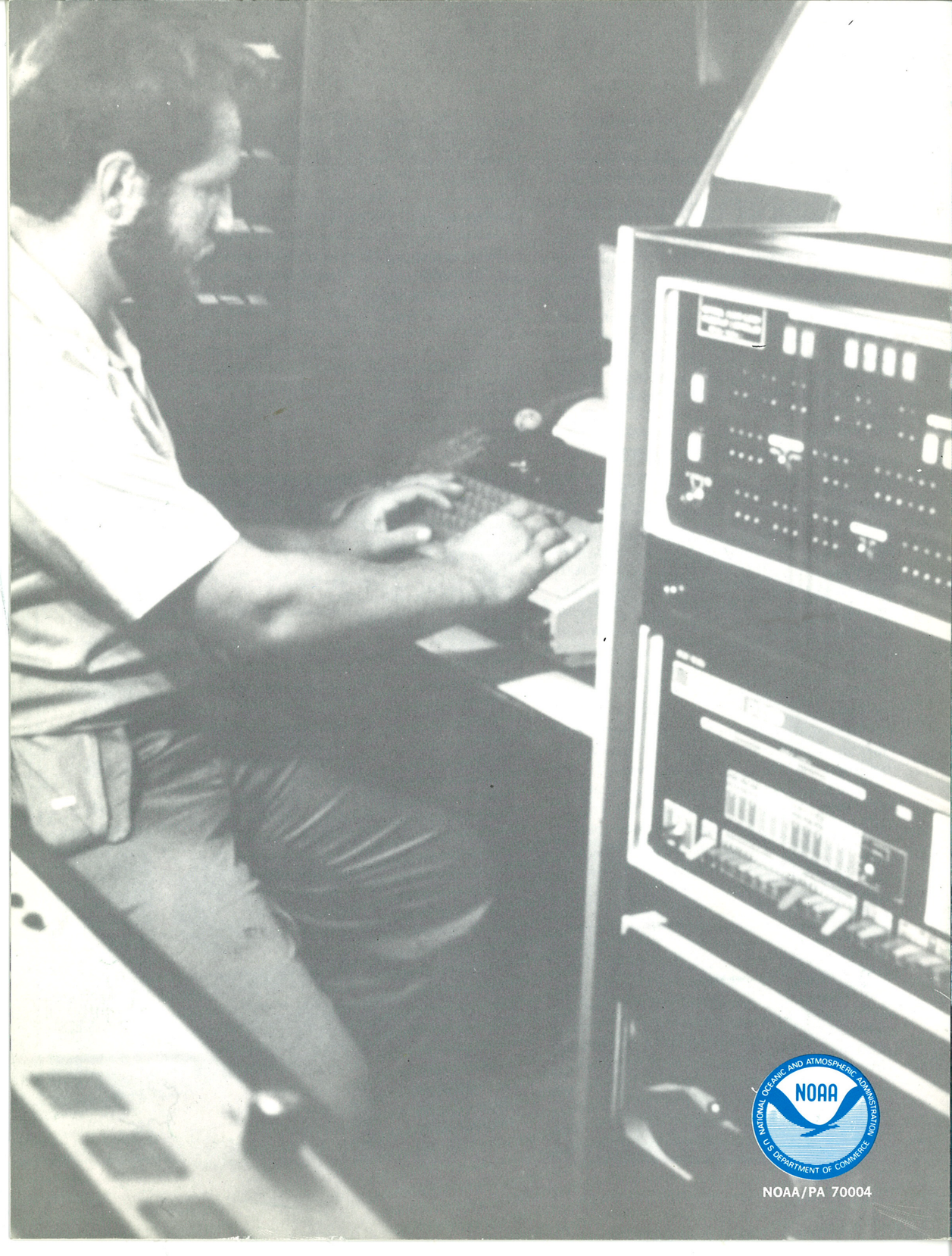
NOAA Corps Recruiting Officer
Pacific Marine Center
National Ocean Survey, NOAA
1801 Fairview Avenue, East
Seattle, Washington 98102
206-442-7656

NOAA Corps Recruiting Officer
Environmental Research Laboratories (R58)
Boulder, Colorado 80302
303-499-6280

Officer-in-Charge
Miami Ship and Ocean Engineering Facility
1600 Port Blvd.
Miami, Florida 33132

Recruiting Officer
Commissioned Personnel Division
NOAA (CC1)
Rockville, Maryland 20852
301-496-8616

★ GPO 626-562



NOAA/PA 70004