BULLETIN

OF THE

U.S. ANTARCTIC PROJECTS OFFICER

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Three Commanders, U.S. Naval Support Force, Antarctica, meet in Christchurch at farewell for Admiral Tyree. Left to right - Rear Admiral David M. Tyree, USN, 1959-62; Rear Admiral George J. Dufek, USN, (Ret.), 1955-59; and Rear Admiral James R. Reedy, USN, current commander. (Official U.S. Navy Photograph by PHC Frank Kazukaitis, USN.)

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CONTENTS

The Bulletin of the United States Antarctic Projects Officer appears eight or nine times a year. Its objective is to inform interested organizations, groups, and individuals about United States plans, programs, and activities. Readers are invited to make any suggestions that will enhance the attainment of this objective.

Material for this issue of the Bulletin was abstracted from official United States Navy press releases, the National Science Foundation press kit and press releases, the New York Times, Operational Plan CTF-43 No 1-62, the Australian Department of External Affairs press releases, the Board on Geographic Names release, and the United States Naval Oceanographic Office Specifications.

The United States Antarctic Projects Officer and staff are indebted to the Arctic Institute of North America and to Mr. Palle Mogensen for furnishing the article on page 11.

Greenwich Mean Time is used in the Bulletin unless otherwise noted. No information or events are presented in this issue after 12 December 62.

All inquiries should be directed to the United States Antarctic Projects Officer, 718 Jackson Place, N.W., Washington, 25, D.C. Telephone: STerling 3-0860, extension 3795.

MONTH IN REVIEW

"Ice," as Rear Admiral Thomas once wrote, "is where you find it". This year, the ship group consisting of three ice breakers, a cargo ship, and a tanker, found 63 miles of it, the fast bay variety, blocking the approach to Hut Point. No previous DEEP FREEZE expedition encountered anything like this much, the largest previous amount having been 38 miles on DEEP FREEZE I. The enormous task of breaking a channel delayed the arrival of the ships within unloading distance of the station. As a result, there was rationing of water and heat and some curtailment of air operations to conserve fuel. Delays also occurred in construction programs because of the unavailability of equipment and material. By the end of the period, the icebreakers had fought their way in close to Hut Point, and unloading was proceeding rapidly.

As the ships were working their way into McMurdo Sound, aircraft were busy bringing cargo and passengers in and out of the area. Among those on the planes were many distinguished visitors, including the Secretary of Commerce, Mr. Hodges, the first Cabinet member to visit the area. While trade, even in the form of tourism, is not yet a feature of Antarctic life, the Secretary could visit and inspect the activities of representatives of the Weather Bureau, Bureau of Standards, and Coast and Geodetic Survey, all three of which are in his Department.

How much things have changed in the last few years was indicated not only by Secretary Hodges' visit, but also by the change of command ceremony. On 26 November, Rear Admiral James R. Reedy, USN, relieved Rear Admiral David M. Tyree, USN, at the South Pole. When the previous change of command took place in 1959, this choice of location would have been almost unthinkable. In those days, with transportation of people mainly dependent on C-47 aircraft, only individuals with the most relevant business went to the inland stations.

SURVIVAL TRAINING FOR ANTARCTICA

The Federated Mountain Clubs of New Zealand have provided, this year, at the request of the United States Antarctic Research Program, instructors to teach Americans who are going into the field the techniques of mountain climbing, rescue work, and cold-weather survival skills.

The forty Americans undergoing this training are scientists and naval teams who will be in the Antarctic for various reasons. The six New Zealand instructors were provided through the cooperation of the Antarctic Division of the New Zealand Department of Scientific and Industrial Research.

CHANGE OF COMMAND CEREMONY

Rear Admiral James R. Reedy and Rear Admiral David M. Tyree shake hands on their 26 Nov 62 changing of command at the U.S. Amundsen-Scott South Pole Station in Antarctica. (Official USN photograph by Photographer's Mate, Chief (PHC) Frank Kazukaitis).

Rear Admiral James R. Reedy assumed command from Rear Admiral David M. Tyree of the U.S. Navy Operation DEEP FREEZE on 26 November 62 in an historic ceremony at the United States Amundsen-Scott South Pole Station. The ceremony, attended by United States dignitaries and press representatives, was as brief as it was unique. The entire ceremony, shortened considerably because of the bitter 33°F below zero, took just 25 minutes to complete. Both Admirals, their faces virtually obscured by huge parka hoods, read their respective orders, saluted the United States Flag flying from a flag pole marking the location of the South Pole, and turned and walked the 800 yards back to the warmth of the South Pole Station.

Among those witnessing this historic change of command were Doctor Laurence Gould, Chairman of the Committee on Polar Research, National Academy of Sciences, and a noted educator, the Reverend Theodore Hesburgh, President of Notre Dame University.

Following the change of command, Admirals Tyree and Reedy returned by air to McMurdo Station. Shortly thereafter, both admirals left for

Change of Command Ceremony at the United States Amundsen-Scott South Pole Station on 26 Nov 62. (Official USN photograph by Photographer's Mate, Chief (PHC) Frank Kazukaitis, USN).

New Zealand to attend farewell ceremonies in honor of Admiral Tyree. Admiral Tyree will return to Washington, after an extended leave, to continue as United States Antarctic Projects Officer until approximately 1 Jul 63. Admiral Reedy, after going over multiple problems at the Christchurch staging center, returned to Antarctica.

In the course of Admiral Tyree's remarks, during the change of command ceremony, he mentioned his appreciation of the loyal support and cooperation given him while he was Commander, U.S. Naval Support Force, Antarctica.

To Rear Admiral Reedy, he said, "...it is fitting that I turn over this command to you at ninety degrees South, for it is here that scientists and navy men have worked together for six continuous years in the most difficult environment inhabited by man. I wish you every success in the years ahead."

Admiral Reedy, in accepting command of Task Force 43, said, "I am proud to be taking command of Task Force 43... I volunteered for this duty, and consider myself lucky to have been so assigned."

On the nature of the command, Admiral Reedy stated that "it is not like an ordinary straightforward Navy evolution." He reminded the men that they were there to support a scientific effort of international

scope and must give the best and most efficient support to the scientists who are down there searching for answers to the many unknowns of Antarctica.

Admiral Reedy continued, "This Antarctic is not tolerant of laziness of body or mind. To get the satisfaction of accomplishment that we will find so rewarding we must develop, if we haven't already done so, the attitude that drives us to take on tasks just because they need doing. I have not yet met anyone down here who doesn't have this attitude - and that is another tribute to my predecessor."

HONORABLE LUTHER H. HODGES VISITS ANTARCTICA

Secretary of Commerce Luther H. Hodges, the highest ranking United States official ever to visit Antarctica, arrived at the Amundsen-Scott South Pole Station on 20 Nov 62 for a brief inspection tour of the facility.

Bracing a temperature of 33°F below zero, winds of 12 knots, and an altitude of 9700 feet, Secretary Hodges, in company with Rear Admirals David M. Tyree and James R. Reedy, walked 800 yards from the station to the flag-pole which marks the location of the South Pole, where in a brief ceremony, he raised the flag of his home state, North Carolina, along with the United States flag.

The party of distinguished visitors which toured United States installations in Antarctica included, in addition to Secretary Hodges, Congressman Chet Holifield (D.Cal.), Chairman, Joint Atomic Energy Committee, and Congressman Craig Hosmer (R.Cal.) member of the Committee, to make an on-the-spot inspection of the nuclear reactor now in operation at McMurdo Sound; also in the group were Congressmen William R. Poage (D.Tex.) and Roy A. Taylor (D.N.C.). Others were Dr. Gerald Johnson and Mr. Carl Fisher of the Office of the Secretary of Defense; Lt. Gen. James H. Doolittle, USAF (Ret.) and Mr. Lowell Thomas, noted news commentator. The Secretary of Commerce was accompanied by Mr. Voit Gilmore. Dr. James E. Mooney, Deputy United States Antarctic Projects Officer, also accompanied the distinguished visitors.

Secretary Hodges also visited McMurdo Station, New Zealand's Scott Base, and Byrd Station. After the inspection tour, the Secretary returned to Christchurch, New Zealand.

At the conclusion of his visit to Antarctica, Secretary Hodges made the following statement:

"My visits with United States Navy and civilian scientific personnel at South Pole, Byrd, and McMurdo bases in the Antarctic have increased my respect for early explorers; but equally true, I respect the courage and resourcefullness of Americans in this most hazardous environment, and I

want to express my appreciation for the skill and dedication with which our scientific investigation is being pursued. I took particular interest in the research work of the three agencies of my own Department of Commerce represented here - Weather Bureau, National Bureau of Standards and the Coast and Geodetic Survey.

In my 8,000-mile Antarctic tour, I have seen such remarkable polar achievements as the 'Underground City' at Byrd Station and the nuclear power plant at the United States headquarters base, McMurdo. Living beneath the snows in tunnels more than a mile in length, the men of Byrd Station are engaged in a survival experiment which may revolutionize future polar living. It was my pleasure to present to these hardy Americans a National Geographic Society plaque commemorating the five Antarctic expeditions of Rear Admiral Byrd and to deliver a flag of his native state of Virginia, which I presented on behalf of the late Admiral's brother, Senator Harry F. Byrd.

The expense of living and working in the Antarctic is appallingly high. It costs millions to keep a few score scientists 'on ice'. For this reason I am naturally interested in the economics of the United States Antarctic Program. So expensive a national effort demands a close correlation between scientific objectives and primary national interest - a master plan to assure that our program has long-range value to government and taxpayer, that any luxury frills are avoided and that other countries properly share the cost of Antarctic investigation where results are shared with them and which will benefit all mankind.

Our navy and scientific leaders have admirable ambitions for the United States program in Antarctica. They see nuclear power as a way to 'warm up' the icy continent for possible human habitation and reduce the present fuel costs which are staggering. They want more ski-equipped cargo planes to help reduce the large cost of keeping in shape ice runways each year for wheeled aircraft.

The Antarctic's future is difficult to predict because it still is too remote and too frigid to be within economic reach of major populations. Yet exploration of its geography and its resources is a meritorious national goal which can pay us dividends.

The trip to the South Pole from McMurdo was an unforgettable experience. The scenery, consisting of mountains of ice and snow, giant crevasses, and glaciers of enormous size and beauty, was breathtaking. It was nearly 40 degrees below zero when we landed our ski-equipped plane, and the sight of the stars and stripes flying at the bottom of the earth was a thrill.

I admire greatly our courageous Americans, including Admirals Tyree and Reedy and all those under their command, as well as the United States scientists who are all doing such a good job in our DEEP FREEZE Project."

OPERATION DEEP FREEZE 63 SHIPBOARD OCEANOGRAPHIC PROGRAM

As a continuing step in filling in the many gaps in the knowledge of Antarctica, a program of recognized importance is being carried out again this year in support of Operation DEEP FREEZE. This particular program consists of obtaining all possible oceanographic, navigational, and hydrographic data from TASK FORCE 43 ships and other sources. The entire southern hemisphere and the Antarctic-Subantarctic regions in particular have large "holiday" areas in basic geophysical data, including bathymetry and oceanography.

During the United States Navy Antarctic Expedition of 1954-1955, one oceanographer was provided to USS ATKA. During Operations DEEP FREEZE I, II, III, and IV, four oceanographers participated annually at the request of the Chief of Naval Operations. The immediate problems of establishing bases, reconnaissance, and other operational problems required the oceanographic work to be maintained on a secondary basis. It was conducted primarily from the icebreakers, as these ships presently are equipped with oceanographic winches and laboratories. Hydrographic and navigational observations were made from all ships of the task force. During DEEP FREEZE 60, 61, and 62, shipboard oceanography was supported by the National Science Foundation, and was conducted by the U.S. Navy Hydrographic Office.

During DEEP FREEZE 63, the United States Naval Oceanographic Office (formerly the Hydrographic Office) will implement the oceanographic program both in personnel and equipment, and the program is again sponsored and supported by the National Science Foundation. This sponsorship reflects the broader scientific base for the program and increases the responsibility of the naval support forces to promote accomplishment of a definite and integrated program. The major oceanographic operations this year will be conducted in the Western Ross Sea mainly aboard USCGC EASTWIND where four oceanographers from the Naval Oceanographic Office will be stationed. Hydrographic and topographic programs will be accomplished aboard all ships of the task force.

The oceanographic program will consist of temperature and salinity measurements at the predetermined oceanographic stations and continuous surface temperature measurements recorded by USCGC EASTWIND while crossing the Antarctic Convergence; bathythermograph observations at hourly intervals; current observations to permit surface currents calculations for the preparation of pilot charts, current atlases, and other publications; biological collection of representative samples of specimens available in the Antarctic or other regions; bottom sampling to give a general description of the bottom conditions in the operating areas; sub-bottom profile studies to record the structure of the unconsolidated and semi-consolidated marine sediments; bottom photography to be used in conjunction with the marine biological program and the marine sediments

and geological program; transparency and color readings; meterological observations; sea and swell observations; and ice observations.

In addition to the oceanographic data obtained, bathymetric data will be collected throughout the voyages. Soundings will be taken by all ships when underway.

The results of this survey will represent a major portion of the scientific program accomplished by the United States Navy and Coast Guard on Operation DEEP FREEZE 63.

THE WEATHER BUREAU STUDIES ENERGY ABSORPTION OF ANTARCTIC ICE

The United States Weather Bureau, under a grant from the National Science Foundation, is conducting a study designed to determine the amounts of energy absorbed by the extensive belt of sea ice around Antarctica. The first phase of the study has just been completed by flying approximately 9,000 miles in 10 flights over the Ross Sea. Work included aerial photography of the ice cover and measurement of incoming and reflected solar radiation. Results of the work are expected to contribute to the knowledge of the heat budget of the region and the role of the sea ice in the delay of the lowest surface temperatures in Antarctica to the latter part of winter or early spring.

Each year around Antarctica, a considerable portion of the sea goes through a cycle of freezing and melting. As the albedo (reflecting of solar radiation) of the pack ice is greater than the reflectivity of the open ocean, the presence or absence of pack ice determines to a large extent the amount of solar energy that is reflected upward into the atmosphere.

In early winter, the atmosphere over Antarctica cools more rapidly than that over the partially ice-covered seas, since the darker seas absorb more solar energy. Cyclones along the border of the two temperature zones move masses of the relatively warm, maritime air over the continent, retarding and sometimes reversing the normal seasonal decline of surface temperature in late summer and early winter.

As winter proceeds and the ice-edge and the relatively warm surface air move progressively farther north, the continent becomes continually cooler and becomes coldest in late winter or early spring with the maximum northern extension of the ice belt. During this period pack ice frozen from sea water reaches northward to the 60th parallel and doubles the size of the ice continent.

SPECIAL PROJECTS FOR THE DEPARTMENT OF DEFENSE
OPERATION DEEP FREEZE 63

Each year, in addition to the work performed under the auspices of the National Science Foundation, certain special projects are carried out in Antarctica. During Operation DEEP FREEZE 63, there are five such special projects for the Department of Defense. The special projects are very briefly described below.

Ice Potential Predictions

The Navy Oceanographic Office will provide detailed specifications, personnel, and equipment for this project. Essentially, this project will entail the taking of oceanographic stations in the western Ross Sea late in the season. USCGC EASTWIND will obtain the oceanographic data requested in the specifications.

Permanent Air Facility for McMurdo, Antarctica

Experimental snow compaction work to develop a 2000-foot runway will be carried out by personnel from MCB-8 under the direction of engineers from the Naval Civil Engineering Laboratory.

Radioligical Environmental Surveys

Personnel of the Public Health Service will continue an environmental sampling program at McMurdo and at Byrd Stations to determine the natural radioactivity in the Antarctic environment and the changes therein resulting from the operation of nuclear power plants.

Polar Automatic Weather Station

The Bureau of Naval Weapons has arranged for the funding of a study to evaluate the nuclear powered automatic weather station as an operational weather station in the Antarctic. The Navy Research Laboratory provided the automatic weather station, the Atomic Energy Commission provided the nuclear power source, and the Martin Company constructed the nuclear generator and station container. Task Force personnel are conducting this project.

Antarctic Cloud Study

Task Force personnel will collect cloud data by time lapse photography for use in studying the correlation of changing cloud conditions with variation in operational weather. The Navy Weather Research Facility will evaluate the data.

DEEP FREEZE 63 USARP SUMMER PERSONNEL

Summer in Antarctica is a busy season. Each year, men from various agencies with varying backgrounds converge on Antarctica as U.S. Antarctic Research Program (USARP) personnel to accomplish their specific work in the short summer season. This year, 119 men comprise the USARP summer party. They are from 26 different universities and government and other agencies, and they represent 13 scientific fields of work. The listing below presents a breakdown of the 119 men comprising the 1962-63 USARP Summer Party.

Of the total, 93 men are in the following fields of work:

17 in Biology
29 in Geology
21 in Glaciology
4 in Meteorology
1 in Radioscience
1 in Geomagnetism
1 in Photogrammetry
2 in Ionospheric Physics
2 in Limnology
8 in Topographic Engineering
4 in Traverse Engineering
1 in Gravity
2 in Seismology

In addition to the 93 men, the following are also considered 1962-63 USARP Summer Party personnel.

4 on USCGC EASTWIND
2 on USS EDISTO
2 from the Board of Geographic Names at McMurdo
2 from the National Science Board at McMurdo
1 representing the National Science Foundation at McMurdo
1 representing the U.S. Weather Bureau at McMurdo
14 Staff members

The men of the 1962-63 Summer Party are affiliated with the following organizations:

8 from the University of Minnesota
11 from the U.S. Weather Bureau
4 from the U.S. Army Cold Regions Research and Engineering Lab
1 from the Pacific Naval Lab
16 from Ohio State University
14 from the U.S. Geological Survey
1 from the U.S. Coast and Geodetic Survey
1 from the National Bureau of Standards
4 from the U.S. Naval Oceanographic Office
8 from the National Science Foundation
2 from the Arctic Institute of North America
1 from the U.S. Department of Interior
19 from the University of Wisconsin

1 from Catholic University
1 from Texas Western College
2 from Rutgers University
4 from the Bishop Museum
2 from Johns Hopkins University
1 from the University of Alaska
3 from the University of California
2 from the National Science Board
3 from Texas Technological College
1 from the Douglas Aircraft Company
1 from Bowling Green University
2 from Stanford University
6 from the University of Michigan

The men will be conducting their programs at the following locations:

4 at Byrd Station	1 at Christchurch, N.Z.
5 on Byrd Station Traverse	1 at Eights Station
3 at Hallett Station	4 at TOPO East and West
36 at McMurdo Station	7 on South Pole Traverse
5 at Mt. Weaver	7 at Pensacola Mountains
8 at Roosevelt Island	6 at Ross Ice Shelf
10 at Sentinel Mountains	2 at South Pole Station
6 on EASTWIND and EDISTO	14 others for Staff duties

MR. HAROLD I. JUNE

Mr. Harold I. June, a member of two Byrd expeditions to Antarctica, died in Hartford (Conn.) Hospital on 22 November 1962 at the age of 67.

As second pilot and radio mechanic, Mr. June made the first flight over the South Pole with the late Rear Admiral Richard E. Byrd in 1929. He was a member of the second Byrd expedition to Antarctica in 1933-35. On this second expedition, Mr. June was chief pilot and transportation officer, making several exploratory trips through the Antarctic by tractor, sled, and airplane. For his work with the two Byrd expeditions, Mr. June was awarded the Distinguished Flying Cross and two special medals authorized by Congress for expedition leaders. A peak in Antarctica bears his name.

Between the two Byrd expeditions, he was a Navy test pilot. In the Navy, Mr. June obtained the rank of Chief Aviation Pilot, the highest that could be obtained by an enlisted man.

At the time of his death, Mr. June was connected with the Pratt and Whitney Company of Hartford and was residing in Windsor, Conn.

SUPPORT OF THE UNITED STATES ANTARCTIC RESEARCH PROGRAM

BY THE ARCTIC INSTITUTE OF NORTH AMERICA

The Arctic Institute of North America has been conducting, since 1959, a program of related scientific support of the United States Antarctic Research Program under contract to the National Science Foundation. Two of the major tasks carried out involved the development of cold weather environmental clothing to meet the specialized needs of the United States Antarctic Research Program scientists and the development, evaluation, and procurement of special field equipment covering such items as shelters, vehicles, camping and trail gear.

CLOTHING

The purpose of the clothing study and development program is to develop and procure clothing for the Antarctic scientists. In addition to cold protection, the Institute places emphasis on function, safety, simplicity, weight, and personal comfort. The cold weather clothing resulting from the program, when properly worn, affords adequate protection and mobility to the individual engaged in scientific work in dry-warm, cold-wet, and cold-dry weather conditions. Three major Antarctic environmental conditions were considered in the selection and development of clothing:

INDOOR, DRY, WARM: The United States Antarctic Research Program scientist is, to some extent, subjected to a routine of indoor life, especially during the winter months when uncomfortably high temperatures frequently are maintained in quarters and laboratories, coupled with ventilation problems and limited space. This results in high head-level temperatures while floor temperatures are often below freezing. The indoor ensemble (Figure 1) is worn over a two-piece thermal underwear suit which consists of a long sleeved shirt and a pair of ankle length drawers. The shirt is made of an attractive "Challa" fabric imported from Switzerland. It features large notebook pockets, double elbow pads, a long tail and is provided in plain colors and plaids. The trouser fabric is a ten-ounce green wool serge, constructed with reinforced seams, two side pockets, two hip pockets, zipper fly closure, and belt loops. Thermal socks are worn inside a pair of orlon fleece lined suede shoes which feature a heavy non-skid rubber sole and heel.

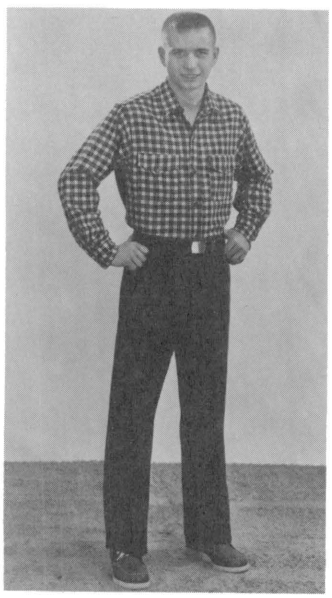


Figure 1

OUTDOOR, MODERATE: All United States Antarctic Research Program personnel, during their term of

Figure 2

duty, are called on to perform outdoor tasks in temperatures of 0°F and above. Included in this category are the wet-cold underfoot conditions which exist at coastal stations during the summer. This environment includes most of the summer field conditions experienced by the biologists and geologists working around McMurdo Sound and at the mountains inland from the coast. The moderate outdoor garments consist, among other things, of a light weight, sleeveless vest with kidney warmer insulated with a layer of six-ounce fiber bonded dacron batting which is sandwiched between two layers of quilted nylon-cotton fabric. A 20-ounce wool shirt is provided in plain colors and multi-checked patterns. These two garments are worn over the indoor ensemble. To provide protection against wind for these layers of clothing, an anorak and a pair of field trousers are used. (Figure 2). The anorak is an eskimo-type garment made of cotton and nylon wind-proof fabric. The hood is trimmed with dynel pile. It has a full gusset with zipper closure at the neck. The ruff is wolverine fur, which can, for maximum face protection, be secured in a tunnel position by loop and toggle. Waist and bottom drawstrings allow for ventilation control. Notebooks and mittens can be carried in a zippered kangeroo and a large cargo pocket.

The field trousers are made of the same material as the anorak. This item has large cargo pockets and drawstring cuffs which provide for ventilation controls and snow closure. The waist is adjustable and is fitted with suspender loops at each side.

Figure 3

OUTDOOR, EXTREME DRY-COLD: All United States Antarctic Research Program personnel may be subjected to temperature ranges below 0°F, whether in the performance of normal duties or as the result of an emergency situation. An investigator participating in a traverse party may encounter an emergency situation miles away from a base camp. The environmental condition "extreme dry-cold" prevails in these situations as well as at the permanent inland stations.

For investigators who are exposed to extreme dry-cold temperatures below 0°F, a windproof parka coat with a button-in liner is used. (Figures 3 and 4). As additional protection, a pair of button-in liners are worn under the field trousers.

The head gear is a pile cap, the hands are protected by a pair of mitten gauntlets, and the feet by a combination of thermo-socks, shearling lined pacs and socks, and a pair of mukluks.

The parka is a finger-tip length insulated coat which opens in front. The insulation is a

To meet such specific design and transportation requirements as ease of erection, lightness of materials with maximum thermal properties, capability of elevation allowing adjustment to the accumulation of snow, and capability of being air-transportable, the Arctic Institute of North America developed one seven-man and one three-man structure. The development, construction and related logistical data for the seven-man shelter are covered in the Institute's report "Polar House", 1960. The shelter is located at Lake Bonney at the head of Taylor Valley where it is being used in support of summer field parties.

The three-man house was planned for use in conjunction with the Auroral Heights Program at Byrd Station. This structure is designed so that it can be erected in a trench with the roof level with the surface. The house which supports an aurora tower can, by help of a series of jacks, be elevated to allow for the accumulation of snow.

Structural sandwiched types of stressed skin systems have been developed offering maximum strength-to-weight ratios with such core materials as Hetrofoam, Styrofoam, Dylite and other expandable polyurethanes and Polystrene products sandwiched between exterior plywood, hardboards, aluminum and asbestos sheets, to mention a few. These cores possess a high resiliency and excellent thermal insulation, are fire retardant, and have a high resistance to water vapor transmission and water absorption. Recent tests have revealed that Polyurethanes have K values as low as 0.12. The usual range of K for insulating material is 0.25 to 0.35 with the lower numbers indicating better insulating ability. Depending on the stressed skin material and core, a finished panel ranges in price from 40 cents to 80 cents per square foot.

The house was built basically to serve a dual purpose as a shipping container, and as a polar shelter. It consists of ten prefabricated units shaped as inverted trapezoids each measuring eight feet high, eight feet long, and six feet wide. The inverted trapezoid construction is the most effective shape for sub-surface structures where side pressure from the snow results in an upward moving force on the unit. This force, in turn, tends to aid in the elevation process when the jacking devices are used. They are secured to the extreme end of each "I" beam. (Figure 6). The panels are constructed of one and one-half inch Styrofoam sandwiched between one-fourth inch exterior plywood sheets. An aurora tower is made of the same material as the basic units with the exception that a three and one-half inch Styrofoam insulation is used. The assembled units hang suspended from seven "I" beams which in turn are supported by 14 foundation pads. The ten units were shipped containing such major utility items as an electric stove, kitchen cabinets, a refrigerator, cooking and messing utensils, emergency gear, two furnaces, a snow melter. and two generators. The building is located approximately 45 miles from new Byrd Station. A team of technicians is currently preparing the station for occupancy during the 1963 austral winter.

VEHICLES

Several types of vehicles have been procured in support of the United States Antarctic Research Program. The Ambulitter's Pole Cat Model 910 is

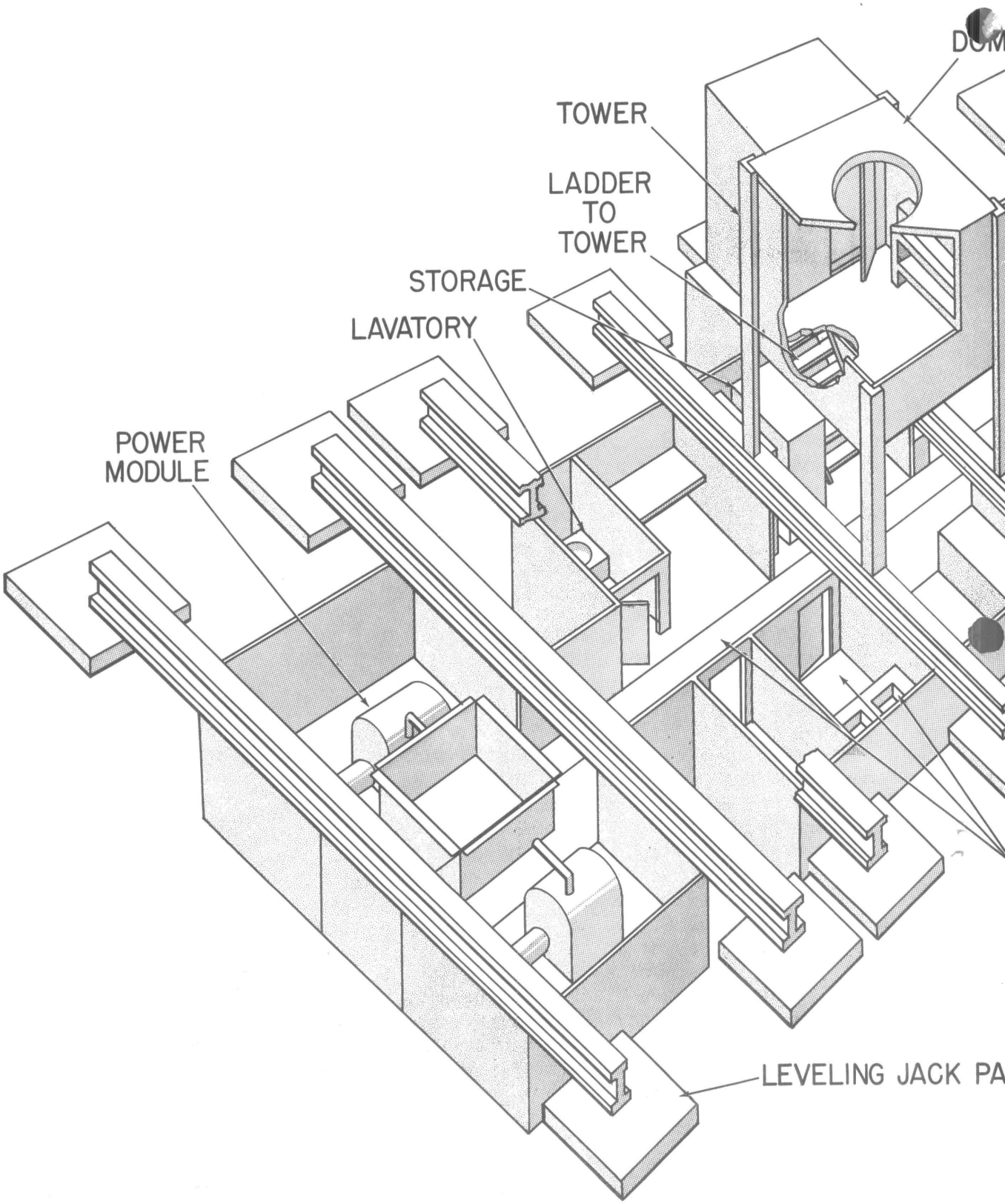
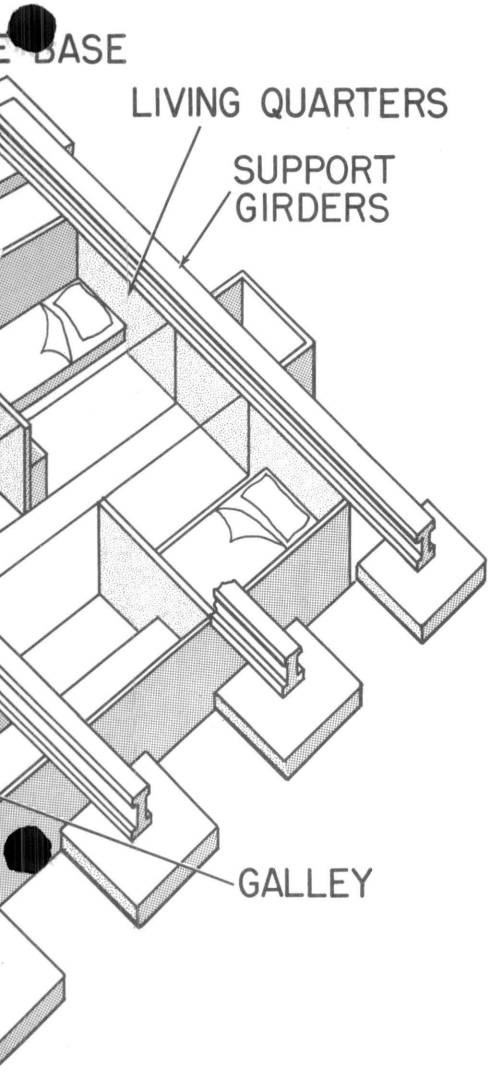

TOWER
LADDER
TO
TOWER
STORAGE
LAVATORY
POWER
MODULE
LEVELING JACK PA

Figure 6



DARKROOM, SINKS,
AND WORK SPACE

S

an articulated vehicle with 5,000 pounds capacity. Outfitted with specially designed cold weather tracks intended to operate in -60°F temperatures, this vehicle has rendered valuable support for various scientific programs conducted in the McMurdo Sound area during the past three years.

Three types of Robin-Nodwell tracked vehicles were procured by the Arctic Institute of North America, the R-N 21, three axles with 2,100 pounds capacity, the R-N 50, three axles with 5,000 pounds capacity, and the R-N 110, four axles with 11,000 pounds capacity. These vehicles are in use at McMurdo and Byrd Stations.

Two Dodge Power Wagons with 16.00 x 16 low pressure tires are successfully being used in short haul operations mainly in support of the summer activities at NAF McMurdo. Both vehicles are the standard military type W300-M. One vehicle is modified with a detachable personnel cab capable of seating eight men. To contribute to more efficient and safe operations, and common to all vehicles, are such modifications as escape hatches, search lights, mounting steps, hand holders, and special cold-weather starting equipment.

A comparative newcomer in the field is the motor toboggan which has almost made the dog team journeys a thing of the past. These machines are ideal for use in support of small traverse parties. Both the Eliason made in Canada and the Polaris manufactured in the United States are used in Antarctica. A detailed report covering both vehicles is printed in The Polar Record, Vol. II, Number 72, September, 1962.

CAMPING AND TRAIL GEAR

Camping and trail gear consists normally of items available from hunting, winter sport, mountaineering and other suppliers. However, in order to serve more adequately the needs for efficient cooking facilities for the man in the field, the Institute designed and developed a six-man portable kitchen. (Figure 7). It is fueled by one-pound refillable propane cylinders.

Figure 7

The container is made of a resin impregnated paper sandwiched between one-sixteenth inch fiber glass skins. The cover is detachable and constructed so that it can be used as a serving table. The exterior, as well as the interior, is covered with a protective hand-rubbed green laquer finished coating. The unit measures 27" x 21" x 24 1/2" and weighs 125 pounds.

One set served a nine-man motorized Arctic expedition during the summer of 1961. Its clean, efficient operation contributed greatly to a successful journey. Several units are currently being used in Antarctica.

Two smaller sets have been developed, one four-man set which also operates on one-pound refillable propane cylinders and one two-man set which is fitted with a two-burner optimus gasoline stove. This unit will operate with any type of gasoline product. These sets are scheduled for field tests during the current season.

Also, to provide emergency protection for airborne investigators, a survival bag was designed and several club and guide bag prototypes have been developed using cotton, canvas and waterproof fabrics. Both types have two compartments, a top one which will hold the user's normal overnight articles, a camera, extra film, etc., and a bottom compartment which contains a pull-on sleeping bag insulated with six-ounce bonded Kodel, a pair of mitten gauntlets, Polaroid sunglasses, shearling pacs and "Meat Food Bar" for several days survival.

A number of these emergency bags are currently being evaluated in Antarctica.

Among tasks which have progressed beyond the blueprint stage are the further development and construction of semi-permanent type shelters, a back-packing two-man tent, and a multi-purpose sleeping bag. It is planned to have these items available for use during the 1963-64 season.

EDITORIAL NOTE

The Department of Defense has responsibilty for the logistic support of United States Antarctic programs, including the construction of station buildings and other facilities. The Navy's Bureau of Yards and Docks conducts an extensive program for the development of new, and the improvement of existing structures. Examples of recent innovations are an all-purpose building, using an insulated steel sandwich panel, and an aluminum stress-skin panel building with polyurethane insulation. The first is being installed at McMurdo, while the second is being tested at the South Pole. The Naval Civil Engineering Laboratory at Port Hueneme, California, also carries on research with various types of cold weather equipment and utilities. An article on the Navy's work in these fields will appear in a future issue.

INTERNATIONAL COOPERATION

A round flight of nearly 2000 miles was made in Antarctica early in November by a USAF 9th Troop Carrier Squadron Globemaster to drop tractor fuels to an Australian tractor party travelling from the Australian National Antarctic Research Expedition's (ANARE) station at Wilkes to the Russian Station at Vostok. Wilkes Station was built in 1957 as part of the United States program for the International Geophysical year. As a result of an agreement between the two governments, Australia assumed custody of the station in February, 1959.

The Australian party departed Wilkes Station on 17 September 1962 for the 900-mile journey to measure, by seismic soundings, the depth of the ice every 20 miles along the route and to determine, by gravity readings at 5 mile intervals, a picture of the rock surface thousands of feet below.

The six-man team was lead by Mr. Robert Thompson of New Zealand who is officer-in-charge at Wilkes Station. The other members included Mr. Donald Walker, geophysicist; Mr. Alistair Battye, glaciologist, who was the Australian exchange representative with the United States in 1961; Mr. Danny Foster, weather technician, a United States scientist at Wilkes Station; Mr. Neville Collins, senior diesel mechnaic; and Mr. Desmond Evans, mechanic driver.

Although the small six-man party and its tractor train were only visible from the air as a small spot on a vast plateau, the aircraft had no difficulty locating it. The party was 572 miles inland and supplied the aircraft by radio with information on weather conditions and an accurate determination of latitude and longitude.

In all, 39 drums, containing a total of 1364 gallons, were dropped in three runs. On each run, the aircraft released three canopy parachutes each carrying four drums. One parachute failed to open and its load of four drums, bursting on impact, plunged many feet into the snow.

As the party approached their goal at Vostok, the men were thrilled to see the radio antennae of the Russian Station protruding from the ice 12 miles away. The rest of the station was beneath the snow. The men had overcome bad weather, heavy snow, hard wind-packed snow ridges, and temperatures as low as 114°F below freezing.

The party rested at Vostok for a few days prior to the return trip to Wilkes where they are due back by 15 January 1963.

OFFICIAL FOREIGN REPRESENTATIVE EXCHANGE PROGRAM

Beginning with Operation DEEP FREEZE I (1955-56), the United States Government has invited the other governments active in the area, or since 1959, signatories of the Antarctic Treaty, to exchange official representatives on the summer relief and resupply expeditions.

This year, the following representatives of foreign governments have gone to Antarctica with Operation DEEP FREEZE 63.

COUNTRY	REPRESENTATIVE	SPECIALTY
Argentina	LT Dario J. Goni Argentine Navy	Ship Operations
Australia	LT Michael W. Hudson Royal Australian Navy	Navigation
Belgium	Prince Antoine De Ligne Belgium Air Force Reserve	Aviation
Chile	LT Hernan Pacheco Chilean Navy	Meteorology
Japan	Dr. Hiroshi Fukushima Yokohama Marine University	Biology
United Kingdom	Mr. Peter R.T. Dain British Foreign Office	Toponomy

Official United States representatives have joined the following Antarctic expeditions of other countries:

EXPEDITION	REPRESENTATIVE	SPECIALTY
Argentina	LTJG Leonard A. LeShack United States Navy	Geophysics
Australia	Dr. Madison E. Pryor National Science Foundation	Biology
Chile	Major Martin Selinfreund United States Air Force	Geodesy
South Africa	Mr. George Baggley National Park Service	Conservation
United Kingdom	LT Robert B. Smith United States Air Force	Geology

GEOGRAPHIC NAMES OF ANTARCTICA

The United States Board on Geographic Names and the Secretary of the Interior have adopted the following Antarctic names and name changes for official use. The names supplement decisions included in BGN Gazetteer No. 14, Geographic Names of Antarctica, January 1956; Supplementary List No. 1, November 1960; and name lists included in March and September 1961 and February 1962 issues of the Bulletin.

The names are drawn from virtually all parts of Antarctica, with some emphasis on the Tucker Glacier area, Victoria Land, the Palmer Peninsula area and the general area of West Antarctica. New nomenclature predominates, but the list includes a number of amended names and reports the vacating of two decisions.

NAMES APPROVED

Aaron Glacier	85°08'S,	90°40'W	Buffer Ice Rise	69°09'S,	67°18'W
Absalom, Mount	80 24 S	25 24 W	Burks, Cape	74 45 S	136 50 W
Adare Peninsula	71 40 S	170 30 E	Bypass Hill	72 28 S	168 28 E
Adare Saddle	71 43 S	170 12 E	Cadwalader Beach	76 59 S	166 58 E
Ahlmann Ridge	71 50 S	2 30 W	Calypso Cliffs	68 48 S	64 13 W
Airy Glacier	69 12 S	66 20 W	Casey Inlet	69 00 S	63 35 W
Aldaz, Mount	76 03 S	124 25 W	Castro, Mount	69 20 S	66 06 W
Anchor Crag	69 12 S	66 12 W	Chang Peak	77 04 S	126 38 W
Andersen Escarpment	85 08 S	91 37 W	Charity, Mount	69 54 S	64 34 W
Anderson Summit	85 03 S	90 53 W	Chastain Peak	85 10 S	94 35 W
Angus Nunatak	85 22 S	124 14 W	Coalseam Cliffs	79 10 S	28 50 W
Annexstad Peak	76 41 S	125 52 W	Colburn, Mount	74 25 S	132 22 W
Aphrodite Glacier	68 53 S	64 32 W	Cole Glacier	68 42 S	66 06 W
Apollo Glacier	68 50 S	64 45 W	Compton Valley	85 01 S	91 20 W
Archer Peak	71 52 S	171 10 E	Confluence Cone	68 56 S	66 39 W
Ark, The	80 43 S	24 47 W	Copper Cove	72 09 S	170 00 E
Arneb Glacier	72 25 S	170 02 E	Coral Sea Glacier	72 33 S	168 27 E
Athene Glacier	68 56 S	64 07 W	Cornwall Glacier	80 44 S	26 30 W
Baker Nunatak	85 23 S	124 40 W	Cortes, Mount	68 29 S	66 06 W
Behaim Peak	68 47 S	66 44 W	Counts Icefall	85 13 S	90 48 W
Benes Peak	76 02 S	124 07 W	Crabeater Point	68 45 S	64 08 W
Beney Nunataks	80 19 S	27 16 W	Crater Cirque	72 38 S	169 22 E
Bennett Nunataks	84 47 S	116 25 W	Crescent Scarp	69 39 S	66 20 W
Bennett Saddle	85 05 S	126 26 W	Cronus Glacier	68 51 S	64 04 W
Bermel Escarpment	85 17 S	89 30 W	Crossover Pass	80 38 S	26 30 W
Blaiklock Glacier	80 35 S	29 40 W	Darling Ridge	84 46 S	115 54 W
Borg Massif	72 45 S	3 30 W	Davies Escarpment	85 32 S	89 48 W
Borg Mountain	72 42 S	3 30 W	Davies Top	69 24 S	64 56 W
Bornmann Glacier	72 20 S	170 13 E	Davis Promontory	84 41 S	96 30 W
Boudette Peaks	76 50 S	126 02 W	Dee Ice Piedmont	68 40 S	66 58 W
Bowditch Crests	68 30 S	65 22 W	Deschanel Peak	68 55 S	67 14 W
Breccia Island	68 22 S	67 01 W	Diaz Rock	63 15 S	58 39 W
Brecher, Mount	85 24 S	124 22 W	Doggo Defile	68 44 S	66 18 W
Bridgman Glacier	72 23 S	170 05 E	Doumani Peak	77 07 S	126 03 W
Briggs Peak	68 58 S	66 41 W	Dragons Teeth	63 15 S	58 41 W
Bristly Peaks	69 23 S	66 15 W	Drake Nunatak	85 17 S	89 20 W
Buckeye Table	84 49 S	114 45 W	East Antarctica	80 00 S	80 00 E

Edisto Glacier	72°27'S,	169°53'E		Heave-ho Slope	72°32'S,	170°10'E	
Edisto Inlet	72 20 S	170 05 E		Hedgehog Island	72 12 S	170 00 E	
Eldridge Peak	84 51 S	116 50 W		Heftye Island	71 59 S	171 06 E	
Elliott Nunatak	85 16 S	89 43 W		Helm Point	72 11 S	170 00 E	
Ellsworth Land	77 00 S	80 00 W		Herbert Mountains	80 20 S	25 30 W	
Elton Hill	68 50 S	66 36 W		Hermes Glacier	68 59 S	65 15 W	
Eternity Range	69 46 S	64 34 W		Higgins Canyon	84 47 S	114 41 W	
Faith, Mount	69 37 S	64 29 W		Hogmanay Pass	69 15 S	64 07 W	
Fanfare Island	65 13 S	64 11 W		Homard, Mount	80 40 S	29 50 W	
Felsite Island	72 26 S	169 49 E		Honeycomb Glacier	72 07 S	169 52 E	
Feyerharm Knoll	77 00 S	125 46 W		Honeycomb Ridge	72 05 S	169 58 E	
Fid, The	68 39 S	65 57 W		Honnywill Peak	80 31 S	29 08 W	
Fin Nunatak	69 03 S	64 03 W		Hopalong Nunatak	81 33 S	28 45 W	
Flinders Peak	69 16 S	66 40 W		Hoskins Peak	67 46 S	67 36 W	
Football, The	72 30 S	169 42 E		Ironside Glacier	72 08 S	169 40 E	
Football Mountain	72 31 S	169 42 E		Iversen Peak	84 37 S	111 26 W	
Football Saddle	72 31 S	169 46 E		Janulis Spur	85 07 S	90 27 W	
Ford Massif	85 05 S	91 00 W		Jeffries Glacier	79 02 S	28 05 W	
Forrester Island	74 09 S	132 12 W		John Nunatak	81 00 S	86 30 W	
Forster Ice Piedmont	69 22 S	67 00 W		Johnson Nunataks	85 02 S	92 30 W	
Fowler Knoll	84 47 S	99 14 W		Kelvin Crests	69 10 S	66 35 W	
Foyn Island	71 56 S	171 04 E		King Peak	85 21 S	88 12 W	
Fuchs Dome	80 36 S	27 50 W		Kirwan Escarpment	73 25 S	3 30 W	
Galla, Mount	75 56 S	125 52 W		Knack Point	85 15 S	118 50 W	
Garcie Peaks	69 31 S	66 45 W		Knox Peak	84 49 S	116 39 W	
Garczynski Nunatak	85 24 S	124 51 W		Lackey Ridge	84 49 S	116 15 W	
Gass, Mount	80 27 S	29 30 W		Lagrange, Mount	80 18 S	28 56 W	
Gertrude Rock	71 17 S	170 11 E		Lauff Island	73 06 S	124 50 W	
Giaever Ridge	72 00 S	5 00 W		Lavris Peak	76 49 S	125 56 W	
Gibbs Glacier	68 28 S	66 00 W		Leander Glacier	71 58 S	167 36 E	
Gilbert, Mount	69 16 S	66 17 W		LeFeuvre Scarp	69 22 S	63 15 W	
Gjelsvik Mountains	72 08 S	2 38 E		Lenton Bluff	79 00 S	28 13 W	
Glen Glacier	80 42 S	25 20 W		Leo, Mount	69 29 S	66 58 W	
Glossopteris, Mount	84 45 S	113 43 W		Lepley Nunatak	73 03 S	90 06 W	
Godfrey Upland	68 44 S	66 23 W		LeSchack, Mount	85 25 S	123 57 W	
Goldsmith Glacier	78 57 S	27 30 W		LeVaux Peak	76 40 S	125 43 W	
Gordon Glacier	80 25 S	26 10 W		Lewis, Mount	80 25 S	26 50 W	
Grand Chasms	78 35 S	39 30 W		Lewis Nunatak	85 40 S	88 05 W	
Gray Spur	85 10 S	90 29 W		Lister Heights	80 31 S	28 35 W	
Greenfield, Mount	80 46 S	27 36 W		Long Hills	85 18 S	118 45 W	
Green Valley	85 04 S	90 30 W		Lorentzen Peak	71 45 S	2 48 W	
Grimley Glacier	69 09 S	64 40 W		Lowe, Mount	80 33 S	30 16 W	
Gunter, Mount	68 59 S	66 33 W		Maher Island	73 05 S	125 08 W	
Hadley Peak	85 01 S	90 40 W		Manhaul Glacier	72 24 S	169 45 E	
Hadley Upland	68 29 S	66 24 W		Maranga Island	65 11 S	64 22 W	
Hag Pike	68 57 S	66 59 W		Marks Peak	76 30 S	125 45 W	
Hallett Peninsula	72 30 S	170 10 E		Marø Cliffs	79 04 S	28 30 W	
Hallgren, Mount	73 22 S	3 22 W		Mathewson Point	74 23 S	132 18 W	
Hamilton Cliff	85 01 S	90 18 W		Mayer Hills	69 35 S	67 07 W	
Hariot Glacier	69 00 S	66 20 W		McCarthy Valley	85 18 S	119 20 W	
Hart Hills	83 43 S	89 05 W		McClary Glacier	68 05 S	67 00 W	
Haslop, Mount	80 36 S	30 16 W		Medina, Mount	68 27 S	66 14 W	
Hatch Outcrop	72 35 S	93 22 W		Mendenhall Peak	85 24 S	87 19 W	
Havola Escarpment	84 45 S	98 10 W		Mercator Ice Piedmont	68 37 S	65 30 W	
Hayes Peak	85 20 S	89 18 W		Mercer Ridge	84 50 S	113 45 W	

Meridian Glacier	68°44'S,	66°37'W		Ruseski Buttress	85°29'S,	124°23'W	
Midnight, Mount	71 56 S	167 22 E		Salmon Cliff	72 22 S	170 06 E	
Mintz Peak	76 53 S	126 03 W		Schopf, Mount	84 48 S	113 25 W	
Mirsky Ledge	84 37 S	111 40 W		Schulthess Buttress	84 47 S	115 00 W	
Morris Nunataks	80 23 S	27 27 W		Schumacher, Mount	71 55 S	2 58 W	
Moubray Glacier	71 52 S	170 18 E		Schytt Glacier	71 35 S	3 40 W	
Moubray Piedmont Glacier	71 57 S	170 20 E		Seilkopf Peaks	72 41 S	4 00 W	
Moulton Escarpment	85 10 S	94 45 W		Seller Glacier	69 21 S	66 07 W	
Napier Ice Rise	69 14 S	67 47 W		Shadow, Mount	71 56 S	167 25 E	
Neny Glacier	68 15 S	66 25 W		Shadow Bluff	71 57 S	167 31 E	
Nob Island	65 12 S	64 19 W		Sheffield, Mount	80 10 S	25 42 W	
Noble Nunatak	85 13 S	121 26 W		Sherrell Point	63 18 S	58 43 W	
Nolan Pillar	85 27 S	86 52 W		Shimizu Ice Stream	85 16 S	121 50 W	
Norwood Scarp	68 50 S	65 23 W		Skinner Peak	84 46 S	112 53 W	
Nostoc Lake	80 24 S	30 05 W		Smith Knob	85 25 S	87 15 W	
Obiglio, Mount	74 27 S	131 49 W		Smooth Island	65 13 S	64 16 W	
Ohio Range	84 45 S	114 00 W		Snowshoe Glacier	68 19 S	66 30 W	
Omega Nunatak	81 55 S	29 12 W		Solus, Mount	68 50 S	65 27 W	
Oread Spur	72 35 S	168 53 E		Sonntag Nunatak	84 52 S	86 40 W	
Otter Pass	80 37 S	23 00 W		Spencer Nunatak	85 21 S	122 11 W	
Pagano Nunatak	83 41 S	87 40 W		Staircase Glacier	72 17 S	168 37 E	
Pan Glacier	68 51 S	64 24 W		Stephenson Bastion	80 47 S	27 05 W	
Parks Glacier	77 08 S	125 50 W		Stewart Buttress	79 07 S	28 30 W	
Parry Point	79 30 S	30 20 W		Stewart Hills	84 12 S	86 00 W	
Patuxent Mountains	85 15 S	60 00 W		Stratton Glacier	80 25 S	28 50 W	
Pearl Harbor Glacier	72 15 S	167 40 E		Streitenberger Cliff	85 03 S	92 07 W	
Peeler Point	72 35 S	93 25 W		Sumner Glacier	68 52 S	65 40 W	
Peregrinus Peak	69 08 S	65 55 W		Sunfix Glacier	69 16 S	64 30 W	
Perkins Canyon	85 27 S	124 20 W		Sverdrup Mountains	72 20 S	1 00 E	
Peters Butte	85 19 S	119 32 W		Tabor Spur	85 15 S	90 14 W	
Petersen Peak	80 27 S	27 57 W		Tailend Nunatak	78 49 S	27 25 W	
Petinos, Mount	74 24 S	132 32 W		Taylor Outlier	85 13 S	90 19 W	
Pivot, Mount	80 41 S	30 10 W		Terrace Ridge	84 49 S	113 45 W	
Pointer Nunatak	80 37 S	29 00 W		Thiel Mountains	85 15 S	91 00 W	
Poseidon Pass	68 48 S	63 45 W		Timosthenes, Mount	69 08 S	65 57 W	
Possession Island	71 51 S	171 12 E		Todd Ridge	85 16 S	119 19 W	
Powell, Mount	85 21 S	87 56 W		Transantarctic Mountains	85 00 S	160 00 W	
Pratt Peaks	80 24 S	29 36 W		Treves Butte	84 43 S	114 20 W	
Provender, Mount	80 23 S	29 55 W		Trey Peaks	80 36 S	28 52 W	
Ptolemy, Mount	68 34 S	65 55 W		Trigon Bluff	72 29 S	169 09 E	
Pup Rock	69 22 S	67 03 W		Triune Peaks	69 08 S	66 52 W	
Quarterdeck Ridge	72 27 S	170 17 E		Tuning Nunatak	84 44 S	115 58 W	
Quartermain Point	72 03 S	170 08 E		Turnpike Bluff	80 44 S	30 04 W	
Quest Nunatak	81 31 S	28 10 W		Tusing Peak	76 51 S	126 00 W	
Read Mountains	80 42 S	24 45 W		Urbanak Peak	84 38 S	111 55 W	
Redcastle Ridge	72 27 S	170 00 E		Usas Escarpment	76 00 S	125 00 W	
Reed Ridge	85 02 S	91 40 W		Vann Peak	84 50 S	116 43 W	
Relay Hills	69 29 S	67 57 W		Vesconte Point	68 31 S	65 12 W	
Ricker Canyon	84 47 S	115 18 W		Victor Cliff	85 20 S	119 12 W	
Roberts Cliff	72 24 S	170 05 E		Victory Nunatak	68 45 S	64 22 W	
Roberts Knoll	71 27 S	3 15 W		Vittoria Buttress	69 23 S	71 47 W	
Roer, Mount	72 18 S	0 21 E		Wakefield Highland	69 20 S	65 10 W	
Rogers, Mount	80 33 S	29 26 W		Walcott, Mount	85 21 S	87 23 W	
Rose Rock	71 17 S	170 11 E		Walker Spur	85 01 S	91 12 W	
Rotz Glacier	69 17 S	65 43 W		Wedge Ridge	80 38 S	29 12 W	

Weiss Amphitheater	77°04'S, 126°06'W	Williams Ridge	80°30'S, 29°20'W
Werner Peak	68 43 S 65 14 W	Wisconsin Range	85 45 S 125 00 W
West Antarctica	80 00 S 110 00 W	Woolam Peak	76 41 S 125 49 W
Weston, Mount	80 28 S 29 10 W	Wrather, Mount	85 23 S 87 14 W
Whitehall Glacier	72 43 S 169 25 E	Wyatt Glacier	68 18 S 66 10 W
Whitney Peak	76 26 S 126 03 W	Yule Peak	68 31 S 65 37 W
Widich Nunatak	85 21 S 121 23 W		

NAMES AMENDED

Curie Island	formerly Curie Islet	66°39'S, 140°03'E
Curzon Islands	formerly Curzon Islets	66 46 S 141 35 E
Dépôt Island	formerly Dépôt Islet	66 37 S 140 05 E
Derby Island	formerly Derby Islet	66 38 S 140 05 E
Double Islands	formerly Double Islets	66 45 S 141 11 E
Dumoulin Islands	formerly Dumoulin Islets	66 37 S 140 04 E
Empereur Island	formerly Empereur Islet	66 48 S 141 23 E
Finley Heights	formerly Finley Ridge	69 13 S 63 20 W
Fram Islands	formerly Fram Islets	66 38 S 139 50 E
Gouverneur Island	formerly Gouverneur Islet	66 40 S 139 57 E
Hélène Island	formerly Hélène Islet	66 37 S 139 44 E
Hitchcock Heights	formerly Hitchcock, Mount	68 47 S 64 50 W
Hope, Mount	formerly Wakefield, Mount	69 46 S 64 34 W
Houle Island	formerly Houle Islet	66 42 S 141 12 E
Ifo Island	formerly Ifo Islet	66 38 S 139 44 E
Lavoisier Island	formerly Nansen Island	66 12 S 66 44 W
Manchot Island	formerly Manchot Islet	66 49 S 141 24 E
Moltke Nunataks	formerly Moltke Nunatak	77 58 S 35 30 W
Pasteur Island	formerly Pasteur Islet	66 37 S 140 06 E
Prospect Glacier	formerly Prospect Pass	69 35 S 67 25 W
Ressac Island	formerly Ressac Islet	66 42 S 141 14 E
Ronde Island	formerly Ronde Islet	66 47 S 141 15 E
Scripps Heights	formerly Scripps Ridge	69 10 S 63 52 W
Sentinel Islands	formerly Sentinel Islets	66 47 S 141 42 E
Traffic Circle	formerly Traffic Circle, The	68 37 S 66 03 W
Triple Islands	formerly Triple Islets	66 46 S 141 12 E
Tristan Island	formerly Tristan Islet	66 44 S 140 54 E
Verte Island	formerly Verte Islet	66 44 S 141 11 E
Yseult Island	formerly Yseult Islet	66 44 S 140 56 E

NAMES VACATED

Neny Trough	68°22'S, 66°15'W	Wiedenmann Glacier	78°05'S, 36°00'W

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BEAR TO BECOME A MUSEUM

Bear at West Base - January 1941

The 89-year-old Bear that took Admiral Richard E. Byrd to Antarctica in 1933 and again in 1939 is scheduled to be restored and converted to a restaurant and a maritime museum.

The wooden auxiliary ship will be drydocked for rerigging as a barquentine, which it was originally before being altered by the late Admiral Byrd.

The ship will be towed to Philadelphia where the restoration and conversion will take place.

EDUCATORS DECLARE RESEARCH PROGRAM SUCCESSFUL, GROWING

Two widely known educators, both members of the National Science Board, said at a Press Conference at McMurdo Station, that the U.S. Antarctic Research Program is successful and growing.

Dr. Laurence M. Gould, Chairman of the Polar Research Committee of the National Academy of Sciences, and Dr. Theodore M. Hesburgh, President of the University of Notre Dame were in Antarctica to examine operation of the scientific program and to confer with USARP and U.S. Navy personnel about the conduct of the program and its logistic support.

Emphasizing that the scientific research program in Antarctica was not a short-term project, Dr. Gould said, "There is definitely a coherent long-range plan for scientific study here. The Polar Research Committee, which acts in an advisory capacity to the National Science Foundation, has mapped out general research goals for the Antarctic program for the next five years." He added that scientific work in the Antarctic is due to increase in the next few years.

ANTARCTIC CHRONOLOGY

16 Nov - USS DURANT relieved of Ocean Station duty at 1520 hours.

16 Nov - Camp Gould in Sentinel Mountains established.

17 Nov - Two air-drops completed to Eights Station as of this date.

18 Nov - COMNAVSUPPFOR ANTARCTICA, RADM David M. Tyree, USN, Secretary of Commerce Luther H. Hodges, and RADM J.R. Reedy, USN, arrived at McMurdo Station at 2020 hours.

21 Nov - The LC-117D (R4D-8) at Byrd Station collapsed its gear on landing in the Sentinel Mountains. No injuries reported. Aircraft believed to be badly damaged.

21 Nov - A LH-34D crashed on landing in the Wright Dry Valley, McMurdo area, apparently disintegrating by vibration caused by ground resonance. Minor injury to pilot but condition good. No others injured.

21 Nov - Honorable Secretary of Commerce Luther H. Hodges returned to Christchurch, New Zealand from an inspection of the Antarctic Stations.

25 Nov - COMNAVSUPPFOR ANTARCTICA, RADM David M. Tyree, USN, and his relief, RADM J.R. Reedy, USN, arrived at the South Pole Station at 0525. They will remain for the change of command ceremony.

25 Nov - At 2315 hours, RADM J.R. Reedy, USN, relieved RADM D.M. Tyree, USN, as commander, U.S. Naval Support Force, Antarctica, in ceremonies at Amundsen-Scott South Pole Station.

25 Nov - An LC-47J aircraft accident reported happening at 0430 at Davis Glacier. No persons injured.

25 Nov - USS DURANT departed Dunedin, N.Z. at 2000 enroute to Campbell Island.

26 Nov - RADM Tyree returned to Christchurch aboard a C-121J at 2247 hours.

26 Nov - USNS MERRELL assigned to CTF-43 at 1600 at Port Hueneme.

27 Nov - USS DURANT assumed duties as Ocean Station Vessel at 1615.

27 Nov - HMNZS ROTOITI departed Ocean Station for Campbell Island.

28 Nov - TOPO WEST completed.

29 Nov - HMNZS ROTOITI operational control reverted to New Zealand at 2330 hours.

2 Dec - Eighteen air-drops completed to Eights Station as of this date.

3 Dec - USNS CHATTAHOOCHEE arrived McMurdo and commenced off-loading.

3 Dec - USS ARNEB assigned to CTF-43 at 1800 hours.

3 Dec - USNS MIRFAK arrived McMurdo and commenced off-loading on 4 Dec.

3 Dec - The Shackleton Glacier party was sighted by a special search aircraft and temporary radio communication was established for the first time since 22 Nov. Due to the short range of the field party communication equipment, a special search is required every five days, weather permitting, to check on status of party.

3 Dec - Commander, Task Group 43.1 transferred from USS GLACIER to USS STATEN ISLAND.

3 Dec - USS GLACIER departed McMurdo Sound at 2200 hours for Wellington, New Zealand.

4 Dec - Hallett Station closed to air operations due to unsafe ice conditions.

6 Dec - RADM J.R. Reedy arrived in Christchurch, N.Z. from McMurdo.

6 Dec - USS ARNEB arrived in Wellington, N.Z. at 2130 hours.

7 Dec - Eights Station air-drops completed.

7 Dec - USNS MIRFAK completed off-loading supplies at McMurdo at 1000 hours.

9 Dec - Byrd Station air-drops completed.

9 Dec - USS ARNEB arrived in Port Lyttelton at 2028 hours.

11 Dec - RADM Tyree departed Christchurch, N.Z. for Wellington at 0130 hours.

11 Dec - U.S. Air Force DEEP FREEZE 63 mission completed.

11 Dec - All air-drops to inland stations have been completed.

12 Dec - USS GLACIER arrived in Wellington, N.Z.