

# NASA's Satellite Tracking Station Herds Over 20 Orbiting Satellites

Nestled in the quiet hills 11 miles northwest of Fairbanks technicians observe and chart the dozens of earth circling satellites that pass over Alaska in their orbits over the North Pole.

Here in Fairbanks, the National Aeronautical and Space Administration operates an advanced satellite tracking station.

Spread out to avoid unnecessary noise, isolated from the city by intervening hills, giant circular antennas follow the passage of the 20 odd satellites which fall into its observation range each day.

Computers pick up information from the satellites, transmit course changes and orders, transmit information to Goddard Missile Base and Vandenberg Air Force Base. There, scientists take environmental data and turn it into weather forecasts, utilize the thousands of bits of scientific information drawn from the satellites.

Fairbanks boasts NASA's only satellite tracking station, one of, if not the largest, in the world. RCA Service contracts to operate the site, employing over 200 personnel to man their round-the-clock watch into space. Other sites are as widely scattered as Australia, South Africa, Hawaii.

There has been a satellite tracking station near Fairbanks since 1958, when the College Minitrack station opened in College. Too close to the growing town of Fairbanks for its needs, the site moved out to 12 mile on the Steese Highway in 1961.

Among the over 200 employees manning the site's several shifts, are about 20 Alaskan Natives. Many of them participated in an RCA training program in 1963. This program, which the BIA paid for, trained two dozen Alaskan Natives at the RCA Institutes in California and New York.

The electronics technicians then went to work at various RCA operations in Alaska, the majority going to the NASA tracking site.

Among the original technicians trained in the RCA course were several well known figures in Alaskan politics—Morris Thompson, present Area Director of the Bureau of Indian Affairs spent close to 2 years at the NASA site after his training.

Emil Notti, former president of the AFN also worked at the NASA site as did Sam Kito and Sterling Johnson of the Fairbanks Native Association.

In current years, the BIA has paid for Native students to attend the two year course in electronics technology at the University of Alaska. The course leads to a two year Associate of Arts degree and its graduates are eagerly sought by government and industry.

Edward Eisele, NASA station director at the site, showed the Tundra Times around the many and varied data collection and control areas in the main administrative buildings.

Equipment, he explained, is always changing. The NASA site is a major research and development outpost for satellite tracking and associated equipment.

It is a constant challenge, he says, for the technical personnel who must keep abreast of the latest advances in their fields—constantly retraining to understand and operate new equipment.

The NASA site here is the biggest and busiest in the country, maybe the world, according to the station directors. RCA Service Company, which contracts to run the station, draws

upon all the manpower pools available to the huge company for its experienced technical personnel.

Technical staff at a lower level are drawn mainly from the electronics technology course at the University today.

The company prefers Alaskans, since they are less liable to leave Fairbanks after one winter. Jobs for electronics specialists open up all the time at the site, with RCA actively recruiting from various technical and mechanical programs.

Even with a cutback in the U.S. space effort, the NASA site in Alaska is apparently immune from extinction. The satellites it researches and develops are being adopted eagerly by industry, which adapts them for such uses as communications satellites.

The environmental observations made by the satellites are

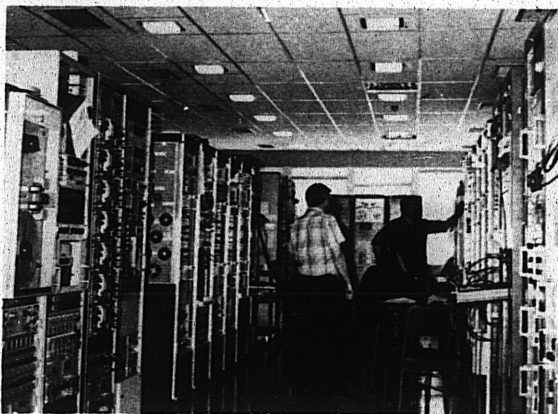
a vital part of the weather predicting process, constantly transmitting data on the earth's cloud cover.

Satellites are also being developed, according to Eisele, which will monitor the minutest movements on the ground—tracking tiny radio transmitters hundreds of miles below.

One problem which worries the RCA employed technicians, Natives and non-Native, is the upcoming decision on whether RCA will retain its contract to operate the NASA station.

If RCA goes, many may have to leave Alaska if they wish to retain their retirement and seniority benefits with the company.

However, the highly trained technical personnel will have no problems if they wish to remain in Alaska. Whatever company operates the NASA site will need people trained to use its space age equipment.



INTO THE SPACE AGE—Electrical technicians at the NASA tracking station near Fairbanks monitor the movements of 20 or more earth satellites each day with these banks of computers. Several of the technicians employed here by RCA are Alaskan Natives who received training funded by the BIA.

Photo by MADELYN SHULMAN