2A-2, #25

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-11-66
FOR RELEASE: Immediate

Jan. 21, 1966

KENNEDY SPACE CENTER, FLA.- Contracts totaling over $2.5 million dollars have been awarded by NASA's John F. Kennedy Space Center for support of the Center's space programs.

A variety of activities were covered by the contracts which affected firms located in several states.

Under provisions of the Government's policy to encourage small business participation, a contract was awarded to Miller Trailers, Inc., 333 6th Ave. W., Bradenton, Florida.

The Miller Trailer agreement provides $14,886 to supply three semi-trailer vans to house lightning warning instrumentation to be used in the Launch Control Center at Complex 39, launch site for the forthcoming Apollo/Saturn V lunar landing program.

A second Florida firm to receive a contract award was the Climate Conditioning Corp., Green Cove Springs.

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Climate Conditioning received $15,321 to furnish all personnel, facilities, tools, equipment and materiel, as well as perform all work necessary to fabricate, install and check out the air conditioning system at the automatic ground control station building at Complex 34 which is programmed for the Apollo/Saturn IB program.

The largest single contract award was given to Heyl and Patterson, Inc., 55 Fort Pitt Blvd., Pittsburgh, Pennsylvania.

Heyl and Patterson received $1,465,075 to fabricate, install and erect two refractory-lined flame deflector assemblies, one steel flame deflector and two hydraulic test stands for Complex 39.

A second Pennsylvania firm to receive a contract from the space center was Amp, Inc., Harrisburg. The firm received $13,373.74 to supply programming components for the telemetry ground station located in the Information Systems facility.

Rosemount Engineering Company, 4900 W. 78th St., Minneapolis, Minnesota, was awarded a $24,007 pact to supply specially designed thermometers used to provide ground and environmental measurements at Complex 39.

General Monitors, Inc., 205 E. Franklin Ave., El Segundo, Calif., was awarded $12,556.50 to furnish a remote control panel needed to supplement a hydrogen gas detection system.

Another California firm, Ampex Corp., 401 Broadway, Redwood City, received $20,910 to furnish amplifiers for use by the Instrumentation Section at Complex 37, which is currently being modified for the Saturn IB program.

Two contract awards were made to Western Electric Company, 222 Broadway, New York. First of Western's two awards was for $709,095.14, to furnish hardware items necessary for equalized wideband circuits to be installed in launch facilities at Complex 39.

An additional $317,525.44 was awarded to Western Electric for similar hardware items to be installed at various locations for wideband terminal transmission equipment used for data and television distribution of launch information.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #23

RELEASE NO: KSC-16-66
FOR RELEASE: Immediate

Feb. 16, 1966

KSC TO CONSTRUCT SOLAR ARRAY TEST FACILITY

KENNEDY SPACE CENTER, Fla. - Construction of a new Solar Array Test Facility at Cape Kennedy will begin soon.

"We'll use the building in support of spacecraft that need checkout of solar panels, such as anchored Interplanetary Monitoring Platforms and Surveyors," said Grady Thomas of the Kennedy Space Center's Unmanned Launch Operations.

The structure will have a retractable roof over its test area so solar panels on unmanned spacecraft can be exposed to the sun for calibrating their voltage output.

In space, the panels convert the sun's energy into power for the spacecraft, Thomas explained.

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The building, which is to be completed by May 1, will be located in the Cape Kennedy industrial area. It will provide 1,213 square feet of space for the test area, an air-conditioned control room and a mechanical room.

The retractable roof will be manually operated.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2#25

RELEASE NO: KSC-17-66
FOR RELEASE: Immediate

Feb. 16, 1966

KSC's NORM CARLSON -
FROM SATURN I TO IB

KENNEDY SPACE CENTER, Fla. - Surrounding the dome-shaped room are banks of television monitors, flashing scenes of the pad area, the launch vehicle and ground support sites.

Underneath these are rows and rows of computers and electronic machines with winking red and green lights. Lined across the main floor are long columns of consoles. Everywhere in the great room are knobs, dials, switches, panels, indicators, buttons, countdown clocks, microphones and heatsets.

This is the day-to-day world of Norm Carlson.

The description covers the interior of the blockhouse at Launch Complex 34, Cape Kennedy. Outside, a few hundred feet away, NASA's Saturn IB rocket is being groomed for the maiden flight of the Apollo program.

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Carlson, as launch vehicle test conductor, will play a key part in the flight operations.

"I work closely with the three stage operations engineers representing the major contractors on IB," Carlson said from his post in the center of the blockhouse.

"My job is to coordinate all work on the launch vehicle, and the major task is to conduct integrated tests with inputs from Chrysler (first stage contractor) Douglas (second stage) and IBM (instrument unit)."

Carlson's responsibilities pick up tempo through countdown demonstration tests, sequence malfunction checks, overall plugs in and plugs out tests and flight readiness reviews, then culminate with the actual count leading to launch.

"We're working longer hours for this flight because we're breaking in a lot of new ground support equipment and a lot of new people too.

"Basically the procedures of operation are much the same as on Saturn I in regard to the launch vehicle," Carlson said. "We are taking more time to solve ground support equipment problems as they crop up because this equipment will be the stepping stone to the automatic checkout of Saturn V, and every problem we solve now will be one less to solve later."

Carlson has unique qualifications to draw such a comparison. He is the only man to have served as launch vehicle test conductor on both a Saturn I and a IB flight. He was on the successful SA-8 (Saturn I series) launch last year.

A native of Enid, Oklahoma, Carlson is a graduate of Oklahoma State University where he majored in mechanical engineering.

His rocketry apprenticeship began at the Marshall Space Flight Center in 1960. He was first in the design group, test division on the Saturn I, and later transferred to systems tests where he participated in the static firings of all 10 Saturn I vehicles. He also became involved in sound suppression test engineering.

He transferred to the Kennedy Space Center and moved into the Technical Planning and Scheduling Office -- from which launch vehicle test conductors are drawn.

"The only real way to learn this job," Carlson said, "is through experience. But I don't think anyone can know all of it; there's just too much. I learn something new everyday."

Carlson admits there is pressure during a launch operation.

"I guess it's always there, but the only real pressure is the big push to get the bird off. As for the count itself, the last 30 minutes are the most hectic because so many checkoff items are pressed together as close to liftoff time as possible.

"If we run into any problems late in the count, we call in the systems engineer in the area involved for a quick consultation. Then we work out the best and fastest solution in the time we have, declaring a hold if necessary."

Carlson lives at 720 Forrest Road, Indian River City, with his wife, Bobbie, and their three children, Chris, 7; Jodi, 4; and Bobbie, 2. But, as the count on Saturn IB flight 201 nears, he is spending less and less time with his family and more and more in his home away from home -- the blockhouse at Complex 34, the room full of flashing lights, switches, consoles and computers.

-end-

2A.2,#25

KSC news release

KENNEDY SPACE CENTER
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

Jan. 17, 1966

RELEASE NO: KSC66-22
FOR RELEASE: IMMEDIATE

KENNEDY SPACE CENTER, FLORIDA--NASA Administrator James E. Webb was greeted by Dr. Kurt H. Debus, Kennedy Space Center Director, shortly after Webb arrived at the skid strip on Cape Kennedy Thursday.

The NASA Administrator addressed the Senior Council of the Office of Space Science and Applications (OSSA) which met at the Space Center on January 13 and 14.

The Council is made up of OSSA Program Directors and the participating NASA Center Directors. The officials meet every two months to discuss management and progress of the OSSA programs.

Attending the January meeting was Dr. Homer E. Newell, Dr. John E. Naugle, Mr. Robert J. Gutheim, Mr. Bernard Sisco, Mr. Leonard Jaffe, Mr. Benny B. Hall, Mr. Vincent L. Johnson, Mr. Oran W. Nicks, Mr. Willis B. Foster, Dr. Morris Tepper, Mr. Jesse L. Mitchell, Dr. John T. Holloway, Mr. J. Allen Crocker, and Mr. Edgar M. Cortright from NASA Headquarters in Washington.

Dr. Robert R. Gilruth of the Manned Spacecraft Center in Houston attended, and Mr. Robert M. Crane represented Ames Research Center. Representing Langely Research Center was Dr. Floyd L. Thompson. Dr. Abe Silverstein represented Lewis Research Center.

Jet Propulsion Laboratory was represented by Dr. William H. Pickering and General Alvin R. Luedecke. Mr. Robert L. Kreiger attended from Wallops, and Dr. John F. Clark represented Goddard Space Flight Center.

Dr. Kurt H. Debus and Mr. Robert H. Gray represented the Kennedy Space Center.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #25

RELEASE NO: KSC-24-66
FOR RELEASE: Immediate

Jan. 27, 1966

KENNEDY SPACE CENTER, - Should it be possible to watch the coming Saturn IB launch from the ocean side, it might appear to the observer that half the Cape had caught fire.

Ferocious flames would, on occasion, leap to heights of 30 and 40 feet, and then abruptly subside.

What would be seen, however, would not be the ignition of the launch vehicle -- rather it would be burning gas fumes from Complex 34's "burn pond," located within a fenced area several hundred feet due east of the pad itself.

Here, in a 60 foot square concrete basin filled with water, gaseous hydrogen -- the vapor that boils from liquid hydrogen -- is burned. Liquid hydrogen is the propellant used in the S-IVB stage of the Saturn IB.

Chrysler is responsible for the propellant handling operation under NASA supervision. Kennedy Space Center technical representative LeRoy Sherrer explained that hydrogen is maintained in a liquid state at a temperature of minus 423 degrees fahrenheit.

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"When hydrogen gas mixes with air it becomes highly explosive," Sherrer said, "so we can't just vent it into the atmosphere as we do liquid oxygen. We pipe it from the S-IVB stage down the umbilical tower, then route it through cross-country lines to the burn pond, which is in a safely controlled area. Here, igniters set it off and it burns harmlessly."

At the Complex, the liquid hydrogen is kept in a 125,000-gallon vacuum-jacketed storage tank. When it is transferred through lines to the vehicle during fueling tests or during the actual launch preparations, a certain percentage of the liquid "boils" off. Sherrer said as many as 38,000 gallons could be changed to gas during a normal launch operation. The S-IVB stage holds some 63,500 gallons of liquid hydrogen for Saturn IB flights.

"It puts on quite a show when the gas burns during night operations," Sherrer noted. "This is a tremendous release of energy."

The hydrogen flame itself is virtually colorless. What makes the spectacular fire is the impurities in the air which burn with the gas.

Sherrer said gaseous hydrogen is so flammable and explosive if released in the air that it can be set off just by the high velocity particles in the venting system. This is one reason why the piping system must be surgically clean.

-end-

2A2, #25

KSC

KENNEDY SPACE CENTER , FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-25-66
FOR RELEASE: Immediate

Jan. 27, 1966

KENNEDY SPACE CENTER, - Colonel Robert E. Snetzer has been appointed Chief of the Facilities Engineering and Construction Division at the Kennedy Space Center.

In this position, he directs and manages all development of basic facilities and construction programs except for certain items of ground support equipment and instrumentation.

His responsibilities encompass studies of new facility technology and preparation of criteria for all new NASA facilities and modifications. Supervision of construction contracts, configuration control and documentation management are part of Colonel Snetzer's responsibility.

The Facilities Engineering and Construction Division is under the Assistant Director for Engineering and Development.

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24.2 #25

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-26-66
FOR RELEASE: Immediate

Jan. 24, 1966

WASHINGTON, D.C. - The National Aeronautics and Space Administration has converted one of its major contracts from a cost-plus-fixed-fee type to a cost-plus-incentive-fee agreement.

The contract with the North American Aviation Space and Information Systems Division, Downey, Calif., is for development of the Apollo spacecraft command and service modules and the adapter which houses the lunar excursion module.

The conversion covers the contract period from October 1965 to Dec. 3, 1966. Estimated cost is $671,300,000. Additional negotiations will be held for subsequent periods.

The contract provides profit incentives for outstanding performance, cost control and timely delivery as well as potential profit reductions when performance, cost and schedule requirements are not met.

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North American was selected by NASA in November 1961 to develop the command and service modules of the spacecraft for the Project Apollo manned moon exploration program. The work includes manufacture of the spacecraft, LEM adapter, spare parts, ground support equipment and extensive ground testing. Cost of the work, including the new agreement, is $2.2 billion.

The Apollo mission calls for three astronauts to be in the command module when the spacecraft is launched from Cape Kennedy, Fla. and when they return to earth. The service module, unmanned throughout the mission, contains the main propulsion system for operations in space and other equipment to support the command module.

A third segment of the spacecraft, the lunar excursion module, is being developed for NASA by the Grumman Aircraft Engineering Corp., Bethpage, N.Y. When the three-module vehicle is orbiting the moon, two astronauts will enter the LEM from the command module, detach the LEM from the mother ship and descend to the lunar surface.

The spacecraft development contracts are managed by NASA's Manned Spacecraft Center, Houston, Texas.

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24.2, #25

KSC news release

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-27-66
FOR RELEASE: Immediate

Jan. 27, 1966

KENNEDY SPACE CENTER - Ordinarily a fellow the age of Claude Moses -- he's 31 -- might expect to be building a solid apprenticeship foundation with an organization, looking forward to moving up as the years progress.

Moses, however, like a number of young Kennedy Space Center employees, finds himself already high in the KSC structure, despite his youthfulness.

He is chief of the Center's Operations Section, Complex Operations Branch. NASA supervisors at Launch Complexes 12, 13, 17, 19, 34, 36 and 37 report to him. It is his responsibility to oversee the maintenance and operation of facilities at these complexes.

Like his new breed counterparts, Moses served his years of apprenticeship at the same time the space age was suffering through its early stages of growth. He literally grew up with the young rocketry programs. Thus, via hard-earned experience, he is today as qualified to direct operations as are industrial managers in other fields who are many years his senior.

-more-

Moses began his career rather inauspiciously as a private E-1 assigned to the Army Ballistic Missile Agency's Missile Firing Laboratory (headed then by Dr. Kurt H. Debus, KSC Director) in November 1957. He was assigned to the electrical engineering and support section under Bailey Stimson, the man he still works for.

He entered the Army equipped with an electrical engineering degree from the University of Florida. He has also studied at Georgia Tech.

To say he was pleased with the assignment -- at a time when other soldiers were being shipped to Korea, the Arctic, and similar remote sites -- is understating the fact.

To Moses it was like coming home. He was born in Orlando and raised in Daytona Beach.

Under the skillful guidance of veteran Missile Firing Lab members, many of whom hold key management positions at the Center today, Moses began work on the Redstone and Jupiter programs, and later made the transition to the Pershing and Saturn projects.

When his two-year Army tour of duty was up in August 1959, he simply switched from olive drab to charcoal grey and kept working.

As the years went by, Moses began acquiring a reputation at the complexes for his agility high in the service structures. In the days before convenient elevators and accessable cat walks, he scaled the highest towers and crossed the narrowest steel beams to get at trouble areas.

"If you're on a construction job it's the normal way of doing things," he shrugged. Today, however, with construction completed at the complexes, he uses more conventional means of transportation.

Of all the launches he has worked on -- and they number nearly 100 -- Moses best remembers Explorer I, the first American satellite in space, and the initial United States manned flight of Alan Shepard aboard a Mercury-Redstone.

On the Saturn IB program, he has responsibility for coordination of all support that comes under the jurisdiction of the Assistant Director for Support Operations.

For the upcoming Saturn IB flight, he will man a console in the launch control center and be available to the test supervisor and test conductors for any assistance they require.

If problems arise late in the count, Moses could be occupying a real hot seat in the blockhouse.

But that's the way this young NASA supervisor likes it. He's a mover.

-end-

2A.2, #25

KSC news release

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-28-66
FOR RELEASE: Immediate

Jan. 27, 1966

KSC DIRECTOR RECALLS FIRST U.S. SATELLITE LAUNCH

KENNEDY SPACE CENTER, FLA. - Had high winds that grounded the launch of Explorer I for several days persisted another 24 hours, the flight of America's first satellite might have been postponed a week or longer.

This little known fact was brought to light this week by Kennedy Space Center Director Dr. Kurt H. Debus as he recalled the circumstances surrounding that historic launch which took place eight years ago next Monday.

"The shot had originally been scheduled for January 27, 1958," Dr. Debus said, "and we were using a new fuel that was so highly corrosive it could only remain in the tanks five days before we would have to replace the seals in the fuel system.

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"Upper air currents in the jet stream increased to over 200 knots, and we had to scrub the flight day after day. It would have been too dangerous to fly under those conditions."

By January 31st Dr. Debus, then Director of the Army Ballistic Missile Agency's Missile Firing Laboratory, got word from a young Air Force meteorological officer that there were indications of the winds decreasing. Hourly checks verified these indications, and Dr. Debus called Major General J.B. Medaris, then Commanding General of ABMA, at his hotel and asked for one more day to launch. Permission was granted.

The rest is history. The liftoff occurred at 10:48 p.m., and the tiny satellite was sent into Earth orbit where it discovered the now-famous Van Allen radiation belt.

Perhaps more important, Explorer I also gave a prestige shot-in-the-arm to the budding United States space program, the absence of which was glaringly apparent following the launch of Sputnik I.

"Had we not launched on the 31st," Dr. Debus said, "the flight would have been postponed, for the winds picked up again the next day, and by then we would have had to defuel and replace the tanks' seals.

"We knew from the telemetry readings we received that the shot looked good, but we didn't get orbital confirmation until an hour or so later."

Dr. Debus calls the successful flight a team effort. There were 52 men in the blockhouse that night, and most of them are in key launch positions at the Center today.

"I wouldn't say there was apprehension during the countdown," the KSC Director recalls, "but there was a tone of excitement, of eagerness. This was mixed with fatigue for we had been working for days without rest. I think we were all aware that this wasn't just another mission --that perhaps the entire world was watching this one."

Congratulatory messages poured in from all over, and Dr. Debus and his fellow ABMA laboratory directors were presented the Civilian Exceptional Service Award by the Army.

"The launch was a great satisfaction to everyone who worked on it," he said. "Our future in space was very uncertain then and there was a need for the nation to realize we couldn't afford to ignore such a field with the impact on prestige and knowledge that could be gained. Explorer I helped open this door of realization."

Comparing the Jupiter C to today's giant Saturn vehicles, Dr. Debus said, "at that time things were complex, but today we have another level of complexity, and of a multiplicity of components and automation.

"Today's programs raise new challenges, but the problems we overcame eight years ago are contributing to the solutions in 1966.

"I would like to congratulate everyone who participated on the Explorer I mission, and wish them good luck on future projects," Dr. Debus said.

"I think we did a pretty good job on that first satellite. It's still in orbit."

-end-

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #25

RELEASE NO: KSC-33-66
FOR RELEASE: Immediate

Feb. 3, 1966

JOHN ATKINS NAMED CHIEF OF KSC SAFETY DIVISION

KENNEDY SPACE CENTER, FLA. - John Atkins, who has been involved in area aerospace programs since 1957, has been named Chief of the Kennedy Space Center's Safety Division.

The division develops safety standards, criteria and policies pertaining to spacecraft, launch vehicles and related activities covering all fields of safety, including industrial, operations, explosives, etc.

A native of Detroit and an electrical engineering graduate of Notre Dame, Atkins served two tours with the Navy, one during the Second World War and one in Korea.

He later headed the electrical test procedures branch of the Navy's Bureau of Ordnance for the Talos missile program at Misawaka, Indiana. There he organized, staffed and trained personnel for a new quality assurance division.

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He first came to work in this area in 1957 with the Air Force Missile Test Center's (now the Eastern Test Range) operations analysis office. He was soon named chief of the missile handling branch, where he set policies covering the entire Air Force safety program at Cape Kennedy and on the range.

In December 1960 he joined Aerospace Corp., and as chairman of the pilot safety active review team, it was his responsibility to review checkout and acceptance of the Atlas booster that launched John Glenn into orbit in February 1962.

Later in 1962, he transferred to Space Technology Laboratories where he had charge of reliability on the Minuteman program. He also conducted a number of studies including one that established precedents on setting up launch windows and built-in holds during countdowns.

In June 1964, Atkins entered the Gemini program in NASA's spacecraft test conductor's office at the Kennedy Space Center.

He was test conductor for the first manned altitude chamber runs made by Gemini 3 pilots Gus Grissom and John Young in St. Louis.

He has published a number of technical papers, reports and studies on rocketry programs, reliability and safety.

Atkins lives at 119 NE First St., Satellite Beach, with his wife, Betty, and their two children, Becky, 14, and Doug, 12.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #25

RELEASE NO: KSC-34-66
FOR RELEASE: Immediate

Feb. 3, 1966

HANDICAP NO HANDICAP FOR RCA's PHIL POTTER

KENNEDY SPACE CENTER, FLA. - Phil Potter has one of the busiest phones at the Kennedy Space Center. It rings incessantly.

On an average day, he handles 125 or so calls. Some days it runs over 200.

An RCA employee, he is a paging operator for KSC calls at areas ranging from Hangars D, R and S at Cape Kennedy to Launch Complex 39 at the Spaceport.

Not only must Potter answer the calls, he also must log each one individually and broadcast the message to the specific area asked for. To do this he must manipulate phone, microphone and a complex panel of toggle switches, each one keyed to a section of the Center.

"It took Phil about a week to learn the ropes here," says his boss, William Fetterman. "But once he did, he's been on his own ever since and handles the job well."

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Normally, such a statement isn't particularly newsworthy in itself, but in this case it is -- for Phil Potter is blind.

He lost his sight about 15 months ago when blood vessels in his head hemorrhaged. Operations in a New York hospital failed to correct the condition.

For Phil it was a near-shattering experience at first. He had been an active "doer" all his life. Since 1956 he had been in launch operations for Douglas Aircraft at Complex 17 and worked up to the position of lead man.

At home he tinkered with radio and stereo equipment and coached baseball for area youngsters.

"It took quite a period of time for me to accept the blindness," Phil admits. "But then, after awhile I just made up my mind I was young enough to go back to work."

He then contacted the Florida Council for the Blind and went to Daytona and Jacksonville on a ten-week vocational guidance program designed to train applicants for jobs at vending stands in the state.

Phil's counselor, Bob Hager, had other ideas. He decided Phil's past experience and attitude might qualify him for a job in the KSC area.

KSC Communications Project Manager Ed Sears of RCA learned of the situation and called his section managers at the Center to see if there were any openings which Phil could man. Fetterman, manager of the services section, said there was, and Phil began work last December. Everyone has benefited.

"You don't know what this means to me, to be useful again," Phil explained. "I wasn't positive I could handle the job at first. I was a little scared. But I had confidence in myself and things have worked out fine." Fetterman agrees.

Phil works in an office in the KSC telephone building with a roomful of women -- switchboard operators and supervisors.

"They've been wonderful to me," he says. "And I might make a point here. A lot of people don't know how to act around a handicapped person. They feel self-conscious or they try to be overly helpful. We don't want this. Treat us just as you would any other fellow employee -- that's what we want!"

A world without sight even has its advantages. Phil has developed his other senses to a point never imagined before.

He loves baseball, for instance, and goes to "see" his son Errol play. By the sound, he can tell where a ball has been hit.

"It's amazing," Phil says. "I hear the bat hit the ball, and I say it's a grounder to the shortstop -- and sure enough it is."

He also can distinguish between people by their footsteps. "Women are hard to identify, though, "he admits, "because they change shoes so often." He has noted that women, for some reason, seem to step down harder with their right foot.

At home, Phil is as active as ever. Using his wife, Myra, and Errol as his eyes, he putters around the house, works on his car, and builds and repairs radio and stereo equipment.

"If there is any advice I could give to someone who has recently suffered a handicap, it would be to accept it. It's a tough thing to do, not to feel sorry for yourself, but it must be done. Once you conquer this, the rest is a lot easier."

-end-

2A.2, #25

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-35-66
FOR RELEASE: Immediate

Feb. 3, 1966

FLORIDA COUNCIL FOR THE BLIND TO OPERATE SNACK BARS AT KSC

KENNEDY SPACE CENTER, FLA. - The Florida Council for the Blind will operate three snack bars at the Kennedy Space Center beginning possibly in April.

One will be located in the Vehicle Assembly Building area, near the entranceway between the Launch Control Center and the VAB. The other two will be opened in the new additions to the Manned Spacecraft Operations Building, one in the west wing and one in the east wing.

In a letter to Deputy KSC Director Albert F. Siepert, R.J. Kates, district supervisor of the Florida Council for the Blind, said, "we would like to express our appreciation for the permission granted to locate three snack bars at the Spaceport.

"These will be seen by many individuals who in turn are in places of management and leadership. Thus, we feel that many doors in industrial plants, etc., could be opened to us because the right people will be able to observe blind people operating efficiently at the Kennedy Space Center."

The Council is a state agency which trains blind people for jobs.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #26

RELEASE NO: KSC-36-66
FOR RELEASE: Immediate

February 1, 1966

NASA TO LAUNCH FIRST UNMANNED APOLLO/SATURN IB

KENNEDY SPACE CENTER, FLA.--The National Aeronautics and Space Administration announced plans today to launch the first unmanned Apollo/Saturn IB mission from Cape Kennedy, Fla., February 22.

The first Saturn IB launch vehicle will boost production-model Command and Service Modules of the Apollo spacecraft from Launch Complex 34.

The cone-shaped command module, 12 feet high and 13 feet in diameter at its base, is the segment of the spacecraft in which three astronauts will leave the Earth and return during the Apollo manned lunar landing mission before the end of this decade.

The 22,000-pound-thrust rocket engine contained in the service module will provide propulsion enroute to the moon, braking into lunar orbit, return to Earth and other operations in space. The service module also contains the electrical power system and other equipment to support the command module.

Principal objectives of the first Apollo/Saturn IB mission are evaluation of launch vehicle performance and test of the spacecraft command module heat shield.

The heat shield is an ablative coating on the outer surface of the spacecraft. During reentry into the Earth's atmosphere this coating ablates or burns off.

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This action dissipates heat and therefore prevents destructive high temperatures from reaching the metal surface of the spacecraft. The ablative material on the Apollo command module is an epoxy resin. Similar ablative heat shield materials were used on Mercury and Gemini spacecraft.

Other mission objectives include verification of spacecraft propulsion system performance, including restart capability of the service module main engine; performance of the spacecraft environmental system reaction and stabilization systems, and partial performance of the communications and power systems.

The spacecraft will be launched on a suborbital flight over the South Atlantic Ocean of about 39 minutes duration. About half-way into the mission a peak altitude of approximately 300 statute miles is to be achieved.

During the descending flight the main rocket engine of the service module will be fired twice. After the second engine burn, the service module will be jettisoned. The command module will reenter and impact about 5,300 statute miles from the launch pad. The planned point of impact is in the Atlantic Ocean approximately 200 miles east of Ascension Island.

Department of Defense recovery units will recover the spacecraft for technical evaluation by NASA and North American Aviation engineers.

The two-stage Saturn IB vehicle is an improved version of the Saturn I which was a 100% success. There were 10 launches from October 1961 to July 30, 1965. These included unmanned tests of Apollo command and service module "boilerplate" spacecraft (engineering test models) and three Pegasus meteoroid technology satellites.

The Saturn IB first stage is almost identical to that of Saturn I, employing a cluster of eight H-1 kerosene liquid oxygen propellant engines. However, the Saturn IB engines have been uprated to produce 200,000 pounds of thrust each, for a total booster thrust of 1.6 million pounds. (The Saturn I engines were 188,000 pound thrust).

Saturn IB will utilize a new second stage (S-IVB) which is propelled by a single 200,000 pound thrust, liquid hydrogen/oxygen J-2 engine. (The S-IV, second stage of Saturn I, was powered by a cluster of six 15,000 pound thrust RL10A-3 liquid hydrogen/oxygen engines.)

Saturn IB, with a combined thrust of 1.8 million pounds in its two stages, is capable of placing more than 18 tons in Earth orbit.

-end-

2A.2, #26

KENNEDY SPACE CENTER, Fla. -- Kennedy Space Center Director Dr. Kurt H. Debus is shown receiving a Treasury Certificate of Honorary Junior Astronaut from Floyd W. Hessler, Brevard County School Savings Stamp Chairman.

The Junior Astronaut Award is symbolic of the savings program installed in the Brevard County school system whereby students are permitted to buy savings stamps in small denominations, such as 10¢, 25¢, 50¢, etc., and in time purchase a savings bond.

Dr. Debus is co-chairman with Maj. Gen. Vincent G. Huston, commander of the Air Force Eastern Test Range, for the 1966 Brevard County Treasury Savings Bond Campaign.

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KSC-37-66
For Release: Immediate

February 3, 1966
Please Credit: KSC/NASA

2A.2, #26

KSC news release

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-38-66
FOR RELEASE: Immediate

Feb. 3, 1966

SATURN IB SCHEDULED FOR 4-DAY COUNTDOWN DEMONSTRATION TEST

KENNEDY SPACE CENTER, Fla. - NASA's first Saturn IB rocket is scheduled to be launched Sunday -- on paper.

A countdown demonstration test -- the full dress rehearsal for the coming flight scheduled for Feb. 22 -- is set to begin today (Thursday). It will terminate sometime Sunday when the practice count reaches T-minus zero.

Paul Donnelly, Kennedy Space Center test supervisor for the flight, said today's part of the four-day operation will involve functional checks of the launch vehicle which will be in a "power-on" condition.

-more-

Ordnance items will be checked and access doors and hatches will be put back on for the actual flight once they are tested.

More functional checks, dry and wet run-throughs with fueling operations, will be done Friday and Saturday. The dry run will be tomorrow.

"What we'll be doing is making a time study of the procedures," Donnelly said. "If we plan certain steps for X number of hours and we find during this practice that we can do it in two hours less, then we'll cut the clock on the real countdown by two hours.

"Yet, if we run into any problems we can take the time to stop and correct them. That's the reason for this demonstration test, to iron out anything that might develop."

During the wet run-through, the S-IB booster and S-IVB second stage will be fueled. Hypergolics in the spacecraft and S-IVB stage and RP-1 in the booster will not be added because this is done prior to the beginning of the actual count.

On Sunday the terminal portion of the count will be undertaken. Following the countdown demonstration there will be a flight readiness test.

AS-201 is the first of the IB series, which explains why procedures and time allocations are being firmed up at this point.

-end-

2A.2,#26

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-44-66
FOR RELEASE: IMMEDIATE

February 10, 1966

VICE ADMIRAL LYLE
VISITS KSC/CAPE

KENNEDY SPACE CENTER, FLA.--Vice Admiral J. M. Lyle and Commander R. C. Stubbs toured Cape Kennedy and the Kennedy Space Center yesterday. Admiral Lyle is Director of the Defense Supply Agency.

DSA provides all common supplies for the military services and NASA and is taking over administration of a number of military supply contracts.

Admiral Lyle and Commander Stubbs came to the Space Center from Orlando where they were attending a conference of DSA Regional Managers.

The DSA Director was briefed by the Air Force on the Titan III, by NASA on the Saturn IB/Apollo and Saturn V/Apollo, and by Captain Chimiak on Navy Programs at the Cape.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

24.2,#26

RELEASE NO: KSC-55-66
FOR RELEASE: Immediate

Feb. 23, 1966

THREE KSC EMPLOYEES MARK 25th ANNIVERSARY of GOVERNMENT SERVICE

KENNEDY SPACE CENTER, Fla. - Three key Kennedy Space Center employees were honored in quiet ceremonies last week for marking their 25th anniversary of government service.

They were Bud McLearn, John Mace and Billie Smith.

McLearn, KSC Printing Officer, began his civil service career in 1939 at the Edgewood Arsenal in Maryland. He later spent 17 years in printing operations at the Aberdeen Proving Grounds in that state.

In 1958 he transferred to the Redstone Arsenal in Huntsville, Alabama, and came to KSC four years later.

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McLearn lives at 1085 Samar Road, Cocoa Beach, with his wife, Agnes. They have three children and seven grandchildren.

Mace, Administrative Officer, Photo Systems and Publications Branch, began his government career in 1937 when he joined the Army.

He retired from military service in 1962 as a major, and became a NASA employee a year later. Mace spent 15 months with KSC's field office in Daytona before coming to the Center five months ago.

He lives in the Twin Tower Apartments, Cocoa Beach, with his wife, Mary.

Smith, Chief of KSC's Communications Branch, enlisted in the Army in 1936. During the war he piloted B-17 bombers in the European Theatre, and later participated in the Korean conflict before retiring from the military in 1960.

Prior to transferring to NASA in June 1963, he served in the communications field at Patrick AFB.

He lives with his wife, Marion, at 3650 Laurette Road, Merritt Island. They have three children.

-end-

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #26

news release

RELEASE NO: KSC-56-66
FOR RELEASE: Immediate

Feb. 23, 1966

EMPLOYEE SUGGESTIONS CUT COSTS AT KSC

KENNEDY SPACE CENTER, Fla. - Suggestion awards at the Kennedy Space Center more than doubled during 1965, according to figures released by the Personnel Office.

Seventy-three NASA employees shared $5,321 in cash prizes as a result of money-saving suggestions they submitted during the year.

These figures compare to 32 awards for $2,325 in 1964.

Last year suggestions approved saved the Center more than $100,000. This nearly tripled the amount saved the previous year.

-more-

Suggestion awards are granted for a constructive idea that accomplishes a job better, faster, or cheaper. It may be honorary - - a certificate - - or include cash ranging from $15 to $1,000, depending on the benefits derived from use of the idea.

Suggestions may concern job operations, equipment, administrative procedures or production. They may save materials or property, promote health, increase safety, improve morale, or they may relate to material or services furnished the Center under contract.

The largest single cash award in 1965 - - $845 - - went to KSC employee Robert Sibert for an idea he submitted concerning the shipment of cleaning fluid to the Center for the purging of rocket fuel lines.

It is estimated the government will save $39,838 a year as a result of his idea.

Not everyone who sends in a suggestion wins an award. In fact, the competition is keen. The winners in 1965 were selected from 498 ideas that were submitted.

Bill Martin, KSC Incentive Awards Officer, emphasized that employees shouldn't become discouraged if one idea is turned down, since their next one may be approved.

He listed a few hints for those with prospective suggestions:

-- Think the idea through. Don't dash it off before it has been worked out in detail.

-- Write it down. Make sure it is clear enough to be quickly understood by the people who will decide on it.

-- Above all, don't give up. Even experts can't hit with every suggestion. Keep trying. You will improve with experience.

-end-

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #26

RELEASE NO: KSC-57-66
FOR RELEASE: Immediate

Feb. 23, 1966

NATIONAL ENGINEERS WEEK CELEBRATED AT KSC

KENNEDY SPACE CENTER, Fla. - Thousands of NASA and contractor engineers at the Kennedy Space Center are currently celebrating National Engineers' Week.

Center engineers support the nation's various space programs in a wide variety of fields, ranging from spacecraft activities to instrumentation techniques.

NASA alone has 1,036 engineers at the Spaceport, and the mission and stage contractors have thousands more.

The work involves present operations and future planning. Hundreds of engineers, for instance, participated in the preparation of the Saturn IB-Apollo vehicle. These included specialists in such areas as radio frequency, telemetry, measuring, electrical systems, gyroscope and stabilizer systems, guidance and control, computer systems, flight control, mechanical structures, propulsion, propellants, oxidizers and gases.

-more-

Hundreds more are busy in the Launch Complex 39 area preparing for the day of the Apollo/Saturn V and lunar landing missions.

These engineers are today transforming the designs of yesterday into the operational hardware of tomorrow. The engineering contributions to the advancements of the rocketry state-of-the-art made at KSC, are, in fact, immeasurable.

A number of KSC engineers come to the Center directly from campuses across the country -- attracted by the interest and glamour of the space program.

Warren Kicklighter is one of them.

He graduated last month from the University of South Carolina (BS - electrical engineering), and is now working on radio frequency tracking systems at KSC.

"I chose a career here mainly because of the programs that are being worked on. I believe space is a young field and it's something I know will hold my interest," Kicklighter said.

He was interviewed on campus by Center personnel representative Charles Francois.

"I felt there not only would be a great opportunity for advancement here, but also that there would be a continuing challenge in the work from a professional standpoint," Kicklighter explained.

"Space is a young field and we are in it on the ground floor here. Thus the chance for advancements, both personal and professional, is about as limitless, I think, as space exploration itself."

Kicklighter, a bachelor, lives at the Flagler apartments in Cocoa Beach. He is a native of Savannah, Georgia.

In addition to launch operations, there are a number of other areas in which the KSC engineering colony is acting in a vital capacity. Among them:

-- Facilities -- Dozens of engineers are helping direct the completion of the Spaceport, one of the largest construction jobs in the nation.

-- Instrumentation -- In tracking and data analysis NASA and contractor specialists keep up to date on the latest developments in this rapidly progressing field.

-- Quality Assurance -- Engineers insure NASA that work of the highest standards is carried out on government projects.

-- Program Management -- Industrial and systems engineers cut through excess cost and time to see that KSC fulfills its mission in the most efficient manner possible.

-end-

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

24.6, #26

RELEASE NO: KSC-58-66
FOR RELEASE: Immediate

Feb. 23, 1966

ENGINEER HUGH WESTON KEPT BUSY ON DELTA LAUNCHES

KENNEDY SPACE CENTER, Fla. - Hugh Weston is one of the busiest launch team members at the Kennedy Space Center.

While the period between most flights, such as Saturn IB and Gemini, is usually measured in months, Weston works on launches that are more often separated by a few short weeks, sometimes even less.

As Delta Operations Manager for Unmanned Launch Operations, he's involved in two major missions this month--both concerning flights of the TIROS operational weather satellite at Complex 17.

"We're primarily technical people," Weston says, explaining the functions of the team he supervises.

-more-

Delta launches involving NASA spacecraft are carried out by contractor personnel under the supervision of Robert H. Gray, Assistant ULO Director at the Center, and John Neilon, Deputy Assistant ULO Director.

Weston and his team get involved in most missions long before the rocketry hardware arrives at KSC. Often they go to contractor plants in California to participate actively in design reviews and configuration control.

Major Delta contractors are Douglas, Aerojet-General and Rocketdyne. Western Electric is responsible for airborne radio guidance systems.

The work tempo for Weston picks up with the arrival here of Delta stages. From then through receiving and inspection and endless checkout tests leading ultimately to countdown and launch, there is virtually no letup.

"We have specialized groups," Weston says, "for guidance controls, electrical systems, propulsion, etc."

During the count Weston is in the blockhouse while other ULO-Delta people man a telemetry laboratory, monitoring final launch preparations via a radio frequency link. He leans on them for technical evaluations, and, if trouble is detected, they report it to him.

Born in Washington, D. C., Weston has an aeronautical engineering degree from the University of Oklahoma. It was during military service that he got into the rocket business - - on the Vanguard program with the Naval Research Lab.

At Cape Canaveral, he became leader of the guidance and control group, transferred from the Navy to NASA, and when Vanguard phased out, he switched to the then-budding Delta program.

In 1960 he split his working hours between Delta and the Orbiting Geophysical Observatory program at Goddard Space Flight Center in Greenbelt, Maryland. He returned south two years later to assume his present role. Weston and his wife, Claire, live in the Twin Towers Apartments, Cocoa Beach.

He believes one reason for the remarkable success of the Delta program is that, essentially, well-proven hardware has been used. The booster was thoroughly tested on the Thor program. The second stage was a direct evolution from the Vanguard program. Also, he believes that Delta's program of repeated integrated systems testing (or simulated flights) on each vehicle provides maximum assurance of launch readiness. "We do not believe it possible to over-test our flight hardware," he said.

"We also have a very small turnover of personnel on the launch team," he notes. "And I believe this experience and continuity has helped."

To date there have been 36 NASA-Delta flights. The 37th vehicle is on the pad now. This clearly marks the launch vehicle as the workhorse of NASA's stable.

There was a time when Weston wasn't sure the now-reliable Delta would reach such a plateau. The very first flight, in 1960, failed.

"There was a lot of apprehension then," he admits, "but we went to work and instituted an extra high reliability semiconductor program - - one that others have since followed."

From that initial failure evolved 22 successful launches in succession, an unprecedented string.

"The flights never get montonous, however," Weston points out. "Take the most recent TIROS launch. We fired it through 150 knot winds at the 40,000-foot level. This was a tough test of the vehicle's structural strength, and it performed flawlessly. We're proud of it."

As for Delta's future, he says: "We don't see an end to its missions. We'll be adding new third stages for more payload capability soon, and later there are plans to double booster strength. So, it looks like the program is picking up rather than slowing down."

-end-

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #26

news release

RELEASE NO: KSC-77-66
FOR RELEASE: Immediate

March 23, 1966

KENNEDY SPACE CENTER, Fla. - Contracts worth over $328,000 have been awarded by NASA's John F. Kennedy Space Center.

The Center, which operates the nation's spaceport at Merritt Island, Florida and conducts major space launches from Cape Kennedy, made the awards for support of its widespread space activities.

The contracts cover a variety of operations and affect companies in several states.

In conjunction with the Government's policy to encourage small business participation in the nation's space programs, a $12,338 pact was awarded to Lo Dal, Incorporated, East Boulevard, Kingsford, Michigan.

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Lo Dal will supply the space center with refuse collection units which will be used at various locations on Merritt Island and Cape Kennedy.

Other contracts were awarded as follows:

3M Company, 5315 Peachtree Boulevard, Chamblee, Georgia -- $12,941.25 to provide instrumentation tape in support of the Gemini manned space flight program. The tape will be used to validate recording equipment prior to Gemini launches.

Astro Communication Laboratory, 801 Gaither Road, Gaithersburg, Maryland -- $19,650 for common use radio frequency equipment used to receive telemetry data from Apollo spacecraft which will carry American astronauts to the moon and back before the end of this decade. Included in the contract are telemetry checkout receivers and spectrum displays.

Eidal International Division Southwest Factories, Incorporated, Box 1299, Albuquerque, New Mexico -- $224,119.32 for equipment to be used for transporting high pressure gases to Launch Complex 39 areas.

Ramcor Incorporated, 270 East Pulaski Road, Huntington, New York -- $17,970 for electronic equipment used in connecting operational data receivers to antennas and signal generators in support of the Apollo/Saturn lunar landing program.

Brush Instruments, 37th and Perkins Avenue, Cleveland, Ohio -- $15,201 for supplying and assembling equipment used in preflight checkout of Apollo spacecraft biomedical flight equipment at Downey, California.

Franklin Electronics, East 4th Street, Bridgeport, Pennsylvania -- $14,093.12 for high speed digital printers used in the processing and recording system at the Central Instrumentation Facility. The facility receives, monitors, processes, displays, and records signals and information from space vehicles.

Ruska Instrument Corporation, 6121 Hillcroft Avenue, Houston, Texas -- $11,900 to supply a pressure calibration system for calibrating measurements and performing tests in support of Apollo/Saturn launch operations.

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2A.6, #26

KSC news release

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-79-66
FOR RELEASE: Immediate

March 30, 1966

LAUNCH COMPLEX 37 MODIFICATIONS NEARLY COMPLETED

KENNEDY SPACE CENTER, Fla. - Construction crews at the Kennedy Space Center are putting the finishing touches to modifications at Launch Complex 37 this week in preparation for the arrival and erection of Saturn IB/203 at Pad B by mid-April.

Joe Crawford of KSC's Plans, Programs and Resources, a member of the site activation group, said work on major components of the complex has been going on since the launch of Saturn I SA-10 last July. Most modifications for the Saturn IB program are expected to be completed sometime next month.

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"We'll be ready when the 203 stages arrive," said Crawford.

To prepare for the Saturn IB, contractors have relocated and reinforced the silo gates on the service structure and reworked the hurricane gates.

"Actually, the entire structure has been strengthened by wrapping metal around it," Crawford explained.

Additional "trucks" (heavy frames supported on railroad wheels) were installed to the undercarriage of the service structure which moves on railroad tracks between Complex 37's two launch pads.

Extensive work on electrical cabling and the addition of new ground support equipment runs throughout the complex.

An Environmental Control System building similar to the one at adjacent Complex 34 has been added at the base of the umbilical tower, and a high-speed elevator for the ingress-egress system has been installed.

Additional major modifications have been made to Complex 37's propellant systems according to Crawford. A new gaseous hydrogen facility has been built about a quarter mile east of the pad area.

The inside of the Launch Control Center blockhouse has an entirely new face. Panels have been removed and new ones installed, and RCA 110 and other computers were added. Only the outside structural appearance of the blockhouse remains the same.

Overall, Crawford said, the changes at Complex 37 are comparable to the ones made at Complex 34.

With the completion of modifications, KSC will have a dual launch site capability for the Saturn IB program.

The first four Saturn I vehicles were launched at Complex 34 and the remaining six went from Complex 37. Saturn IB/201, the first in the program, was flown from Complex 34, and 202 is scheduled there next. Saturn IB/203 will be the first to fly from Complex 37.

-end-

2A.2, #26

KENNEDY SPACE CENTER, Fla. - A century of Government service is represented by four veteran Kennedy Space Center employees. The four were presented their 25-year awards during recent ceremonies by Aldo H. Bagnulo, left, Assistant KSC Director for Engineering and Development. Left to right are Bagnulo, William Earley, Sherrod Magness, Emanuel Ciener and James Deese.

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KSC-80-66
For Release: Immediate

March 30, 1966
Please Credit KSC/NASA

2A.2 #26

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-81-66
FOR RELEASE: Immediate

March 30, 1966

KSC'S LIBBA JOHNSON HANDLES CENTER'S FUNDS

KENNEDY SPACE CENTER, Fla. - As a wife, Libba Johnson of the Kennedy Space Center should be a wizard with the family budget.

As a financial program specialist at the Center, she annually receives and distributes millions of dollars. This includes all program authority and funds from NASA Headquarters and field centers for KSC. She receives this on behalf of Lewis E. Melton, Chief of KSC's Financial Management Division.

Her official job description is a bit more specific. She is involved in the collecting, analyzing, projecting and reporting on the status of appropriated funds for administrative operations, research and development and construction of facilities at KSC.

-more-

"Actually, I perform a liaison function between the Financial Management Office and operating officials at KSC," Libba said.

Additionally, she is responsible for various analyses on resources consumption as opposed to what is allocated for spending here.

To reach such a responsible position, Libba has taken a roundabout route that began with a career in social work. She criss-crossed nine states before coming to the Center in 1962.

A native of Darlington, South Carolina, she graduated from Furman University with a BA degree in Sociology.

"I was first employed by the South Carolina Department of Public Welfare," Libba recalls. "We handled old age assistance, aid to dependent children and a number of other cases. As you can guess I love to work with people."

In 1951, her husband Bill, who works in KSC's Personnel Division, joined the Air Force, and for the next four years they moved to bases in several states, including Kentucky, Illinois and Maine. Libba began her civil service career at Camp Breckinridge, Kentucky in 1952.

Following service, she and Bill worked at the Atlanta General Depot, the Philadelphia Quartermaster Depot and the Redstone Arsenal in Huntsville, Alabama before moving to Florida.

At Huntsville, she received a sustained superior performance award for her work as a program budget analyst.

Libba has been active locally in a number of civic and social projects. For two consecutive terms, she served as president of the NASA Women's Social Club.

"We're real proud that we were able to raise several hundred dollars during that time and contribute it to our charity -- the Brevard Training Center for Retarded Children," Libba said.

She is also one of the few women members of the Federal Government Accountants Association, Canaveral Chapter.

But she doesn't find her sex either an advantage or hindrance on the job.

"I'm accepted solely for the work I do, and I'm happy for that," she comments. "I'm also grateful for the opportunities here. They are better than at anyplace I've been before.

"In fact, I wouldn't trade my job - it's so interesting."

-end-

2A.2, #27

KSC news release

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-82-66
FOR RELEASE: Immediate

March 30, 1966

FULL SIZE MODEL OF SATURN V LUNAR ROCKET ERECTED IN KSC'S VERTICAL ASSEMBLY BUILDING

KENNEDY SPACE CENTER, Fla. - The first operational elements of Launch Complex 39, designed and constructed under the supervision of the Kennedy Space Center's Engineering and Development Division, are nearing operational readiness for erection of the first Apollo/Saturn V flight vehicle.

Technicians in the Vehicle Assembly Building topped off the Saturn V/500-F facilities checkout model of the lunar launch vehicle today by installing IBM's Instrumentation Unit.

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This vehicle will never be launched. It is used as a tool to test the ground support and electronic support equipment and verify that all interface requirements have been met between the space vehicle and the launch facilities.

Launch Complex 39 elements to be certified include firing room one in the Launch Control Center, high bay area one in the VAB, corresponding low bay areas, and mobile launch tower one.

John Galbraith, EDV's Chief of the VAB Assembly and Test Facilities Section, said, "As far as the facilities at the VAB are concerned, we envision nothing that will prevent the transporter from taking the launch tower and the completely assembled facilities checkout model of the Apollo Saturn V space vehicle to Pad A for tests to verify the pad's operational readiness."

Only 16 days ago activity in the VAB centered around Boeing's S-IC stage, as it was raised and positioned on the Mobile Launcher in the VAB's high bay area. Ten days later, North American's S-II stage took its position atop the S-IC.

The Douglas built S-IVB stage joined the assembly on March 29. Next came IBM's Instrumentation Unit which was mated the following day, leaving only North American's Apollo spacecraft to be mated in early May.

Key to maintaining this schedule rests in the results of tests to be conducted with the facilities checkout vehicle.

One objective that will be accomplished prior to transporting the space vehicle to the launch pad is the installation of all nine swing arms for mobile launch tower one.

Dick Hahn, Chief of EDV's Pneumatics Section, pointed out that the last swing arm is scheduled to arrive late in May and will be immediately installed.

-end-

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

24.2, #27

RELEASE NO: KSC-91-66
FOR RELEASE: Immediate

April 6, 1966

KSC'S JIM DEESE PLANS FOR TOMORROW'S SPACE PROGRAMS

KENNEDY SPACE CENTER, Fla. - Jim Deese will mark his 30th anniversary of service with the Federal Government on Friday (4/8). More than half of that time has been spent in the immediate Spaceport area.

Deese, today, is Chief of the Kennedy Space Center's Facilities Technologies Studies Office, Engineering and Development.

In essence, his job is to assess today's technology for its ability to meet present and future KSC programs.

Deese, it seems, has been thinking and planning in the future ever since he first arrived in the Brevard area in September 1950.

-more-

Then, as Chief of Equipment and Design for what was once called the Joint Long Range Proving Ground, he developed a master plan for Cape Kennedy that included all technical facilities, many of which are still in existence.

"You ask me what it was like here back in those days," Deese says today with a chuckle. "It was nothing but palmettos, mosquitoes and rattlesnakes with fangs like 20-penny nails.

"I remember one time in 1953 when we had 17 inches of rain in less than a week. We had to cut a ditch from northeast of the lighthouse to the ocean so the water could run off. It poured out at the rate of 150,000 to 200,000 gallons a minute for five days. You can imagine the condition the Cape's roads were in."

Deese uses this and other experiences on his job at the Kennedy Space Center. One of the studies being monitored by his office, for instance, concerns beach erosion and shore hydrology at Launch Complex 39.

Other areas of interest Deese and his staff are closely following include:

-- Coast & Geodetic high order mapping and control systems.

-- The description and history of meteorological conditions at KSC, particularly with effects on corrosion and structural loading.

-- Structural designs and concepts and systems on reclining mobile service structures for possible application to the Saturn V program.

-- Acoustics and seismology relating to launches and aborts of all KSC vehicles.

-- Flame resistant materials and propellant disposal methods and decontamination processes.

-- Clean room techniques.

Normally, these and other subjects end up in study contracts awarded to other government agencies or contractors under the supervision of Deese and his associates.

"We direct the technical effort under these contracts," he explains. "What our job requires is technological capability to understand and to check the validity of a study's approach and development."

A native Floridian (from Graceville in the northwestern panhandle of the state), Jim Deese studied electrical engineering at Georgia Tech and marine engineering at the U.S. Naval Academy.

He began his civil service career in October 1935 with the old Works Progress Administration (WPA). He was chief of the engine test laboratory at the Engineer Research and Development Labs, Fort Belvoir, Va., just prior to transferring to this area.

In 1956, at Dr. Kurt H. Debus' request, Deese joined the Jupiter program at the Cape. He was instrumental in the facilities design of a number of sites used for Jupiter, Pershing and Saturn I vehicles.

"The old "A" frame service structure - symbol of Redstone/Jupiter Programs- was one of my babies," he recalls with fondness.

He had a hand in the development of five service structures all mounted on railroad tracks, and he emphasized that all of them moved as planned on schedule.

"Dr. Debus thought I had a lot of way out ideas back in those days," Deese said. "But a lot of them worked out just the way I said they would."

Deese and his wife, Mary Catherine, live at 207 North Oak Street, Melbourne. They have nine children.

"I knew this was going to be a second Wright Field when I first came here," he remarked.

How has he liked the work? Deese compares it to childbirth: "There's a lot of pain at the time of delivery, but when you look back in retrospect, it has been well worth the effort."

-end-

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #27

RELEASE NO: KSC-92-66
FOR RELEASE: Immediate

April 6, 1966

ASTRONAUTS BLOOD: RED OR BLUE?

KENNEDY SPACE CENTER, Fla. - Dr. John E. Boysen, TWA Director of Medical Services at the Kennedy Space Center, got an interesting letter the other day from a young lad in the Bronx.

"Our teacher tells us we have blue blood," the nine-year-old wrote.

"When the blood goes through the veins, it reaches the skinline, and when we cut outselves the atmosphere of the Earth changes the color to red," he continued.

"I would like to know if in outer space, where the atmosphere is not like ours, should an astronaut accidentally cut his finger what color blood would come out?"

-more-

Dr. Boysen answered this way:

"Actually, I think that you will find the color of everyone's blood is red. It is true that it is a brighter red as it leaves the heart to go out to the tissues in your arms. And it becomes a litter deeper red, perhaps somewhat bluish, as it leaves the tissues to go back to the heart.

"This is because some of the oxygen has been left in the tissues and is exchanged for carbon monoxide.

"If an astronaut were to accidentally cut his finger, the color of the blood would be exactly the same as it is here on Earth because the atmosphere which is provided for him in his space capsule is essentially the same as our atmosphere here."

-end-

2A.2, #27

KSC news release

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-93-66
FOR RELEASE: Immediate

April 13, 1966

MARY DRIVER: "WOMEN HAVE A PLACE IN THE SPACE PROGRAM."

KENNEDY SPACE CENTER, Fla. - According to the dictionary, the word driver ('drī-ver) can be defined as an individual who "imparts and provides the means for an onward or forward motion." Relative to the space program, one Kennedy Space Center employee not only fulfills the definition, she even has the name to go with it.

Mrs. Mary Driver, ('drī-ver), Personnel Staffing Specialist at KSC, recruits and places a wide range of professional level employees, whose total contributions truly "provide an onward motion" to KSC missions and operations.

Included in Mary's diverse responsibilities is staffing for the Assistant Director for Administration, Assistant Director for Spacecraft Operations, NASA Daytona Beach Operations and Manned Spacecraft Center Florida Operations.

-more-

In the course of an average year, Mary will evaluate and recommend personnel for about 300 NASA positions. This is no small undertaking when one considers that KSC's lady staffing specialist must relate applicant experience to job requirements in highly technical positions such as those in the areas of guidance control, cryogenics, radio frequency test and hypergolics, to mention only a few.

Outside of the technical and engineering fields, Mary staffs KSC with accountants, secretaries, procurement specialists...and once even a patent attorney.

Reporting to Harry Smith, Chief of the KSC Professional Staffing and Examining Branch, Mary also processes more than 500 employment queries a year, speaks before student groups on career opportunities and (don't miss this one!) evaluates personnel for merit review promotions.

When asked how she keeps tabs on the ever expanding diversification in space age jobs, Mary modestly mentions her twelve years of experience in the space program.

But it is obvious that her qualifications extend far beyond experience to such qualities as a filing cabinet memory, a commendable grasp of technical terms and a shrewd capability to read character.

Mary, who is a native of Staunton, Virginia, started her career with a personnel position at the American Safety Razor Corporation, where she searched out "sharp" people for the blade industry.

After her "people-picking" abilities were honed to a fine edge, Mary moved into the space program, joining the National Advisory Committee for Aeronautics at Langley Research Center in 1956.

After the formation of NASA, Mary joined the MSC Florida Operations at Cape Kennedy, and then a year ago took her present position at KSC Headquarters.

When asked about career opportunities for women, Mary expressed the strong conviction that feminine capabilities are basically equal to those of men.

"But women all too often don't take full advantage of the opportunities that are available," says Mary. "Women are sometimes their own worst enemies when it comes to career advancement. They fall back on the old belief that women just won't be given a chance in competing with men, but this is less true with every passing day."

To illustrate the point, Mary refers to the recent placement of a female employee in a highly responsible contract administration position, and to the recruitment of a female engineer now doing electron microscopy work in reliability investigations on spacecraft systems.

"The coming years, and a growing need for professional people, will offer more and more career opportunities for women," Mary states. "In talking to women students, I stress the fact that by the time they have finished their education, the positions will be there. All they have to do is prepare for them."

Mary, who resides at 1580 Glen Haven Drive, Merritt Island, takes her active personality with her when she leaves her daily duties at KSC. She works to increase her own career potential by taking public speaking courses at Brevard Junior College, and fills in her spare time serving as social chairman of the NASA Women's Social Club.

Mary Driver, on or off the job, provides an answer to the old question, "What's in a name?" Her own personal energy is reflected in her approach to a highly responsible job, and the career wheels she sets in motion provide considerable impetus to our advancing space program.

-end-

2A-2, #27

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-94-66
FOR RELEASE: Immediate

April 13, 1966

LAUNCH TIME MONITORED BY KSC TIMING AND COUNTDOWN BRANCH

KENNEDY SPACE CENTER, Fla.- One of the most frequently heard questions at NASA'S John F. Kennedy Space Center prior to a launch is: "What's the count?"

This inquiry captures the attention of persons ranging from an engineer in the blockhouse to the secretary who, after hearing the "count," bolts from her desk to catch a fleeting glimpse of a launch vehicle as it roars aloft.

To answer this and other pertinent questions about time as it relates to launch operations, KSC maintains a Timing and Countdown Systems Branch, directed by Darol Varnado.

This branch serves as a central distribution point, monitoring prelaunch and launch data and passing it along to any NASA installation requesting it.

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Housed within the Central Instrumentation Facility at KSC, the 35 NASA and contractor personnel of the branch keep tabs on the countdown of a launch vehicle and its spacecraft, as well as accumulated holding time and predicted launch time.

Looking like a scene from a Buck Rogers movie, the two rooms used by the timing section are packed with sophisticated electronic equipment, covered with an assortment of multi-colored electronic tubes and dials.

The KSC Timing and Countdown Systems Branch bases its official "time hacks" on information monitored from the Air Force Eastern Test Range, the Naval Observatory and the Bureau of Standards. These installations employ Greenwich Mean Time, the international system which maintains a uniform system regardless of specific time zone.

Since Greenwich Mean Time does not portray a completely accurate measurement of the earth's rotation, KSC engineers have been considering a new time scale which more appropriately describes this phenomenon with reference to orbital mechanics, translunar and planetary trajectories.

Currently, there are about 80 countdown clocks spread throughout KSC and NASA-sponsored projects at Cape Kennedy. Within the next two years, 400 additional countdown clocks will be installed in areas ranging from blockhouses to building lobbies and auditoriums.

The timing branch also maintains a lunar countdown clock, geared to tick off the days, hours, minutes and seconds until the United States sends its first manned Apollo spacecraft on a roundtrip voyage to the moon.

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2A.2, #27

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-95-66
FOR RELEASE: P.M. Apr. 17 and after.

April 13, 1966

INTELSAT REPRESENTATIVES TO VISIT KENNEDY SPACE CENTER

KENNEDY SPACE CENTER, Fla. - The Interim Communications Satellite Committee will visit the Kennedy Space Center tomorrow (April 18) having completed a tour of the Marshall Space Flight Center at Huntsville, Ala.

The Committee is the representative body of the international organization consisting of public and private organizations in 48 countries which are parties to agreements for the joint development, ownership and operation of a global communications satellite system.

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The organization is called International Telecommunications Satellite Consortium or INTELSAT. Its member countries are outside the Communist bloc and include five countries in South America , eight in Africa, eight in the Middle East, eight in the Asiatic-Pacific area, and all of western Europe, Canada and the United States. The Communications Satellite Corporation (COMSAT) is the U.S. participant.

John A. Johnson, vice president-international of COMSAT, will lead the delegation. The Committee membership is as follows:

Algeria, representing 12 Arab States
Argentina
Australia
Brazil
Canada
France, representing Monaco
Germany
Italy, representing Vatican City
Japan
The Netherlands, representing Belgium
Scandinavia, Denmark, Norway and Sweden
Spain, representing Portugal
Switzerland, representing Austria
United Kingdom, representing Ireland
United States

COMSAT, acting as manager on behalf of INTELSAT, contracts with NASA for the launching of INTELSAT satellites.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2,#27

RELEASE NO: KSC-97-66
FOR RELEASE: Immediate

April 20, 1966

FROM REDSTONE TO SATURN - A DECADE OF PROGRESS

KENNEDY SPACE CENTER, Fla. - By today's standards, when high energy propellants, enormous boosters and complex, multi-stage vehicles are becoming commonplace, the Redstone was a peashooter.

Compared to the towering, 224-foot Saturn IB, now on the Kennedy Space Center's launch pads, the 69-foot-tall Redstone would look like one lone tank in the Saturn's booster.

At liftoff, its 75,000 pounds of thrust would be lost today in the thunderous roar of the 20-times more powerful IB. It was a single engine prop rocket in what is fast becoming the jet age of aerospace.

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And yet it has been just over a dozen years ago that the first shiny-new Redstone was transported to Cape Canaveral, assembled under what would now be termed adverse conditions, and launched.

It has been less than a decade ago that the Redstone stood alone as the most formidable weapon in the U.S. military arsenal. On September 20, 1956, a Jupiter C -- a three stage rocket which used a modified Redstone as the booster -- made the first successful long-range ballistic missile flight from the Cape. It went a record 3,300 miles at an altitude of 682 miles in a test that proved design and capabilities of the system and led to its operational status.

The basic launch team that fired that Jupiter C and the total of 46 Redstones, 34 Jupiters, eight other Jupiter Cs and 6 Juno IIs from 1953 through 1962 was led by Kennedy Space Center Director, Dr. Kurt H. Debus.

Crew members were part of the Army Ballistic Missile Agency's Missile Firing Laboratory.

The bulk of that team is still intact and today forms the core of supervision for Saturn IB Flights, and directs the planning and preparation for the coming launch of the Apollo/Saturn V lunar landing mission.

Among the historic milestones in rocketry set by these veterans were:

--Launch of the first American satellite -- Explorer I -- into space on January 31, 1958.

--First launch of two monkeys, Able and Baker, aboard a Jupiter, May 28, 1959.

They were recovered in excellent condition 92 minutes later, following a 1,965 mile flight through space.

--Launch of the first two American astronauts Alan Shepard and Virgil Grissom in Mercury capsules atop modified Redstone rockets, May 5 and July 23, 1961.

Within a span of 12 days during the summer of 1958, Dr. Debus and the launch crew fired two Redstones from Johnston Island in the Pacific with specially equipped payloads.

The vehicles carried live nuclear devices for a test program called "Project Hardtack." Although many details of these missions are still classified, the Atomic Energy Commission called them highly successful.

Key members of the Redstone launch crew who are still actively involved in operations today include:

Dr. Hans Gruene, Assistant Director for Launch Vehicle Operations; Karl Sendler, Assistant Director for Information Systems; Albert Zeiler, Launch Vehicle Operations Coordinator for Mechanics and Propulsion; Grady Williams, Chief,

Electronic Engineering and Instrumentation Systems Division; Ike Rigell, Chief, Electrical Engineering, Guidance and Control Systems Division; Andy Pickett, Chief, Mechanical and Propulsion Systems Division; Bob Moser, Chief, Supervision Office, Launch Operations Directorate and Bob Gorman, Chief, Launch Support Operations Division.

Dozens of other Kennedy Space Center personnel, now in key supervisory positions, also took part in the development of the Redstone, and have worked together as a unit for years.

Conditions at the Spaceport during the early Redstone days are much different from the modern outdoor scientific laboratory that has evolved today.

"At the time the first Redstone arrived at the Cape in 1953," Dr. Debus recalls," we didn't even have a service structure to put it in. We worked on it in a hangar we shared with people readying a Snark missile for launch. The service tower had to be assembled on the pad."

Remembers Bob Gorman: "We had to ship a lot of our equipment -- eight flat cars of it -- from Huntsville, Alabama by rail. It was quite a caravan."

"At T-minus zero," Andy Pickett says, "Albert Zeiler would watch the Redstone from a periscope in the blockhouse. If the color of the flame looked just right to him, he would shout 'main stage,' and we would fire away."

Gorman added that the facilities here then left a lot to be desired. "All our instrumentation was housed in trailers. Our motor pool consisted of an ambulance, a jeep, a two and a half ton truck and a five ton tractor."

On "Project Hardtack," measuring, transmitter, telemetry and shop trailers, blockhouse command equipment, recorder and telemetry racks, communications and control systems and checkout equipment had to be shipped halfway around the world to the Eniwetok Proving Grounds in the Pacific. There it had to be assembled, and launch pads and blockhouse bunkers had to be built.

But despite such conditions, the launch crews scored a remarkable number of important successes, as evidenced by the list of milestones. Those early-day Redstone missions were, perhaps more importantly, the spawning grounds for the Saturn family of vehicles that today are undergoing flight tests.

Everything was done manually then, as opposed to automated operations, and if something went wrong during checkout, it taxed the ingenuity of Dr. Debus and his staff of versatile experts to "jury-rig" improvisions on the spot.

Such hard-earned savvy, gained by years of assembling and firing more than 100 vehicles, has given this crew the ability to diagnose almost instantly any troubles and immediately take corrective action.

This ability was instrumental in the record-setting launch score sheet for the Saturn I program: 10 flights and 10 unqualified successes.

This same inherent knowledge and experience is being absorbed today through association by hundreds of major NASA contractors at the Kennedy Space Center as the day of the first Apollo three-man flight nears.

It all began just a few years ago, in the early days of the Redstone program.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #27

RELEASE NO: KSC-98-66
FOR RELEASE: Immediate

April 20, 1966

KSC's STEVE TUCKER - HE "MEASURES" LAUNCH VEHICLES

KENNEDY SPACE CENTER, Fla. - "Measurements," said Steve Tucker, "are the vital statistics of a launch vehicle's performance."

It is the job of Samuel Stevens Tucker to insure that on-board measuring devices and systems for Saturn IB launch vehicles function properly.

"Some 1,200 separate measurements are sampled a number of times per second during a IB flight," said Tucker. These readings-temperatures, pressures, liquid levels, and hundreds of others- spell the difference between flight success or failure.

Tucker is proud of the fact that the successful Saturn 201 flight in February was also "perfect from an instrumentation standpoint."

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Measurements of flight performance indicate which components and systems worked well, which parts failed, and help pinpoint any causes of failure.

As Chief of Saturn IB Measuring Operations, Tucker has an office in the E and L Building on Cape Kennedy. But his real home-at-work is at launch pads 34 and 37. Instrumentation to check out Saturn IB measuring systems is located in the service structures and blockhouses at the two pads.

This kind of job requires that the holder be "schedule oriented," said Tucker. "Before a launch, we may lose some sleep. But the measuring equipment has to be right. We simply work until the job is done."

The youthful NASA engineer and his measurements team work closely with contractors who build the Saturn IB stages.

Tucker calls the "operations outlook" an important element of success in measurement engineering. "Does it work? Is it practical? It not, repair or replace it. These are our primary considerations."

Nevertheless, his seven-man team of engineers and inspectors finds time to recommend changes and modifications which result in lighter, more compact measuring devices.

During a Saturn IB flight, measurement data is fed into an on-board telemetry transmitting system. The data is received by the Information Systems Facility at KSC and other ground stations. The miles of collected data are forwarded to user-personnel for study and evaluation.

Tucker has worked here since he graduated from the University of Florida in 1958. He holds bachelor's degrees in electrical and industrial engineering, and is presently earning credits toward a masters degree in research and development management.

Among previous assignments with NASA and Cape contractors, Tucker worked in the field of telemetry, other areas of instrumentation, and served as a technical advisor for the Polaris program. He joined Launch Vehicle Operations in 1963, and has since served in the vehicle measuring section.

The native Pensacolan finds relaxation in the surf near his Cocoa Beach home at 1049 South Atlantic Ave. "I'm a surfing bug," he admits.

Tucker and his wife, Clara, are the parents of a son and twin girls.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #27

news release

RELEASE NO: KSC-100-66
FOR RELEASE: Immediate

April 22, 1966

NASA EMPLOYMENT TO INCREASE

KENNEDY SPACE CENTER, Fla. -- NASA employment at this Center, Cape Kennedy Air Force Station and other locations related to the launch operations conducted here, will increase by approximately 1,350 between now and July 1.

This estimate was made public today by Center Director Dr. Kurt H. Debus as a guide to community and business organizations.

Most of the increased employment will occur in the payrolls of support and stage contractors in the manned space flight area. Employment in unmanned launch programs will continue at about the present level.

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The heightened tempo on the NASA Merritt Island installation where Saturn V facilities test vehicle stages have been arriving will require more support personnel.

Build-up in stage contractor rolls is related principally to the Saturn IB/Apollo launches which began with the recent successful flight of AS 201 and the Saturn V program, for which the first launch is slated in 1967.

Total employment by KSC and its contractors April 25 was approximately 16,850. The overall total will reach approximately 18,200 by June 30. This does not include construction employment.

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2A.2, #27

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-104-66
FOR RELEASE: Immediate

May 4, 1966

EMPLOYEE SUGGESTION MEANS SAVINGS FOR NASA CENTERS

KENNEDY SPACE CENTER, Fla. -- NASA field centers will save approximately $96,500 a year, thanks to the recommendation of a Kennedy Space Center employee.

Mrs. Kathryn Tate, a contract negotiator in KSC's Procurement-Purchasing Branch, pointed out that NASA could receive the maximum discount of 31 per cent in purchasing logic modules for computers by ordering a minimum of $800,000 worth of this equipment per year.

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Previously, NASA received a graduated discount on the basis of cumulative orders, boosting the overall cost per unit. Mrs. Tate's idea, however, based the discount on total orders.

A logic module is a 4 to 5-inch-square printed circuit that contains electrical components used to store information within a computer and also aid in the instrument's reasoning processes.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #27

news release

RELEASE NO: KSC-105-66
FOR RELEASE: A M , May 5, 1966

May 3, 1966

KSC's JACK HUMPHREY RECALLS FIRST MANNED SPACE FLIGHT

KENNEDY SPACE CENTER, FLA. -- It was five years ago today that Alan Shepard climbed into a Mercury spacecraft atop a modified Redstone rocket at Cape Canaveral and was successfully launched on a historic, sub-orbital flight that blazed the trail for NASA's manned flight programs of today and tomorrow.

Although there have been too many changes and advances in the intervening years to enumerate, time has failed to erase the memory of that epic moment in the minds of those who participated in the launch.

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One such person is Jack Humphrey, Chief, Saturn IB Mechanical and Propulsion Systems Branch, Launch Vehicle Operations.

He manned the firing panel and pushed the button that set off the Redstone's automatic sequencing system on the Shepard flight.

"I'll have to admit, with a man aboard, there was a lot of excitement," Humphrey recalls. "The blockhouse was smoky and crowded and everyone was tense."

He pushed the sequencer button during the final two minutes or so of the count, and he did it with a positive attitude.

"I looked at it this way," Humphrey says. "Initiating the automatic sequencing system is something anyone can do. It's only after everyone has checked their systems thoroughly and made sure everything is 'go' that the button can be pushed.

"Shepard's launch, like all the others that have taken place here over the years, was a result of this coordinated teamwork. No one man or one button does the job."

Humphrey did a lot more than push the button, though. He worked with Ed Fannin and others for months during pre-flight mechanical and propulsion checks.

After triggering the sequencer, he monitored panels the final few seconds until liftoff, after which "there was a whole lot of hollering going on in the blockhouse."

He also remembers no one left the area after launch until Shepard had splashed down and been picked up. "We had radio contact with him most of the way," Humphrey says.

A graduate of the University of Kentucky, he has been with the KSC launch team, headed by Center Director Dr. Kurt H. Debus, for nine years, and in that period has participated in well over 100 flights.

"One thing that was amazing to me at the time, was how well they kept the secret of who would be the first astronaut. We worked on the pad for months before we knew it was to be Shepard. I always thought it would be John Glenn," Humphrey added.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #27

news release

RELEASE NO: KSC-106-66
FOR RELEASE: PM May 4, 1966

May 3, 1966

KENNEDY SPACE CENTER, Fla. -- Groups or individuals desiring information concerning public bus tours, which will be inaugurated July 15, 1966, may address queries to "NASA Tours, P. O. Box 2122, Kennedy Space Center, Florida."

The telephone number for information concerning tour schedules at the NASA Spaceport and Cape Kennedy Air Force Station will be 269-3000.

The Kennedy Space Center has contracted with Trans World Airlines to operate the bus fleet and provide escorts who will accompany visitors on the daily tours.

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KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #28

news release

RELEASE NO: KSC-110-66
FOR RELEASE: Immediate

May 11, 1966

COLLEGE STUDENTS RECRUITED FOR SUMMER JOBS AT KSC

KENNEDY SPACE CENTER, Fla. -- The Kennedy Space Center will hire 89 students from colleges and universities across the nation for summer jobs.

The collegians, already selected, will work in all major KSC elements from May through September. Most of them will work in engineering, physics, mathematics, and administrative assignments.

The 89 were selected from 460 applicants, according to Charles Francois, KSC summer employment coordinator. Students were given a federal service examination and those hired were screened from the highest scorers.

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Women students are included in the summer employees who will work at the Spaceport. Betsy White, for instance, scored 98 out of 100 on the test.

Collegians with at least two years of undergraduate study have been hired for summer work at KSC for the past several years. This year's total of 89 is the highest ever employed. Last year 78 workers were selected from 300 applicants.

Francois said the program allowed NASA an opportunity to evaluate the students on the job for possible career offers. Likewise, the students get a first-hand exposure to working conditions with NASA at the Spaceport.

KSC supervisors were anxious to get the collegians because others have proved to be excellent workers in past summers.

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KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #28

news release

RELEASE NO: KSC-111-66
FOR RELEASE: Immediate

May 11, 1966

KSC DONATES LAND
FOR RECREATIONAL USE

KENNEDY SPACE CENTER, Fla. -- Anticipating the subsequent development of a recreation area for personnel of the John F. Kennedy Space Center, NASA, a tract of 230 acres bordering the Banana River has been set aside by KSC for the Activities and Welfare Association's use.

Dr. Kurt H. Debus, KSC Director, granted the Association's request for the tract subject to its recall in the event the area should be required for mission purposes. Any improvements must be financed by the Association, which is a branch of the NASA KSC Exchange.

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Lewis Melton, Chairman of the Exchange Council, said the Association will proceed to prepare plans for the phased improvement of the tract. It will be available for picnics and similar family and group affairs.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #28

RELEASE NO: KSC-118-66
FOR RELEASE: Immediate

May 18, 1966

DAYTONA BLIND PATIENTS VISIT

KENNEDY SPACE CENTER

KENNEDY SPACE CENTER, Fla. -- They came, and they saw the Spaceport.

But they saw it with their fingers, not their eyes.

Some visitors from the Daytona Rehabilitation Center for the Blind were guests of the Kennedy Space Center last week, and they thoroughly enjoyed their tour of Spaceport facilities.

"We took them to the Cable Storage Building first," said Protocol officer Bill Taylor.

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"There they felt the spacecraft and launch vehicle models, and when we told them what scale they were, they had a quick understanding and appreciation for the tremendous sizes involved," Taylor said.

Then they were taken to the Vehicle Assembly Building area, and by feeling the huge treads on the crawler-transporter, they got a good mental impression of the vehicle's size.

"They were tremendously impressed," Taylor added, "and got a lot out of the tour. "You'd be surprised how much they can see, even without eyesight."

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #28

news release

RELEASE NO: KSC-123-66

FOR RELEASE: April 29, 1966 PM

April 29, 1966

KENNEDY SPACE CENTER - A new organizational structure to meet the expanding responsibilities of the John F. Kennedy Space Center was announced today by the Center Director, Dr. Kurt H. Debus.

The changes are the outgrowth of the rapid buildup of KSC in the past three years, characterized by increasing interfaces between expanding Government and contractor organizations, the assumption of both manned and unmanned launch program responsibilities, and the quickening tempo of site activation for Apollo/Saturn launches.

The new organization will be achieved in specific stages with gradual implementation to be completed by July 31, 1966. Staffing will be completed by September 30, 1966, in all key positions.

The primary KSC organization will consist of the Director, a Deputy Director for Center Management, a Deputy Director for Center Operations, the Apollo Program Manager, a Director of Administration, and four operational directors for Launch Operations, Technical Support, Design Engineering, and Installation Support.

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Release No: KSC-123-66

April 29, 1966 PM

Commenting on the new organization, Dr. Debus observed that "NASA is very proud of KSC's accomplishments in manned and unmanned launches, and the concurrent planning and construction of the Spaceport without disrupting present launch operations. However, achieving all of this has heavily taxed our available staff and especially our senior levels of management. With the new organization, we expect to be able to develop additional management capability sufficient to handle any of the new operational problems we know will arise in the months just ahead. The facilities preparation phase is rapidly nearing completion and a sharp increase in Apollo/Saturn launches is projected in the immediate future. Because of these trends, this was the proper time to reappraise where the current functions could be realigned or strengthened in order to assure that each element of KSC's overall management responsibility is adequately covered."

Dr. Debus pointed out that KSC relies more heavily upon support from industrial contractors than any other NASA center. Civil Service staffing will level off at about 3,000 for the next several years. Meanwhile, contractor manpower will build up to approximately 18,000. The preparations for operations under this ratio have required gradual development over the past three years of new Government/contractor relationships. One objective of the revised organization is to simplify for each support and mission contractor his working contacts and formal lines of accountability to the Government.

Release No: KSC-123-66

April 29, 1966 PM

At the senior levels of management, the new organization includes the following:

The present Deputy Director, Mr. A. F. Siepert, will fill the position of Deputy Center Director, Management. The new position of Deputy Center Director, Operations, is open at this time. An Executive Staff will be created which will be responsible for management status and review, and the operation of an executive communications system.

The management of center-wide resources will be transferred from the Apollo Program Manager to the Director of Administration. Col. Rocco Petrone, USA, presently the Director of Plans, Programs and Resources will continue in charge of the Apollo program management. Mr. George Van Staden will continue as Director of Administration.

A special site activation function will be established in the Apollo Program Office to continue managing the completion of facilities and installation of equipment in Launch Complex 39.

The Directorate of Launch Operations will be streamlined by transferring its design engineering and information systems function to other directorates. Present leadership in this area will continue unchanged with the position of Director of Launch Operations temporarily held in dual capacity by the Center Director, Dr. Debus.

Release No: KSC-123-66

April 29, 1966 PM

Mr. G. Merritt Preston, the Deputy Director for Launch Operations, will continue in his present responsibilities including that of KSC Launch Director for all Gemini flights. Launch vehicles, spacecraft, and unmanned launch operations will be directed by their present heads, Dr. Hans Gruene, Mr. John Williams and Mr. Robert Gray, respectively.

Center design and engineering will be concentrated under a single Director of Design Engineering and provide for a more simplified direction of contractor effort through five project managers. Col. Aldo H. Bagnulo, USA (Ret.), at present in charge of engineering and development, will be Deputy Director of Design Engineering.

All test support requirements, control of test support operations, and information systems will be centralized under the Director of Technical Support. Mr. Raymond L. Clark will fill this position. Mr. Robert Gorman has been designated Acting Director for Support Operations, which is Mr. Clark's present position.

Mr. Karl Sendler will continue in charge of information systems under the Directorate of Technical Support rather than Launch Operations.

All installation type housekeeping services from the present Support Operations and Administration areas will be transferred to a new organizational element, the Director of Installation Support. The Director has not yet been selected.

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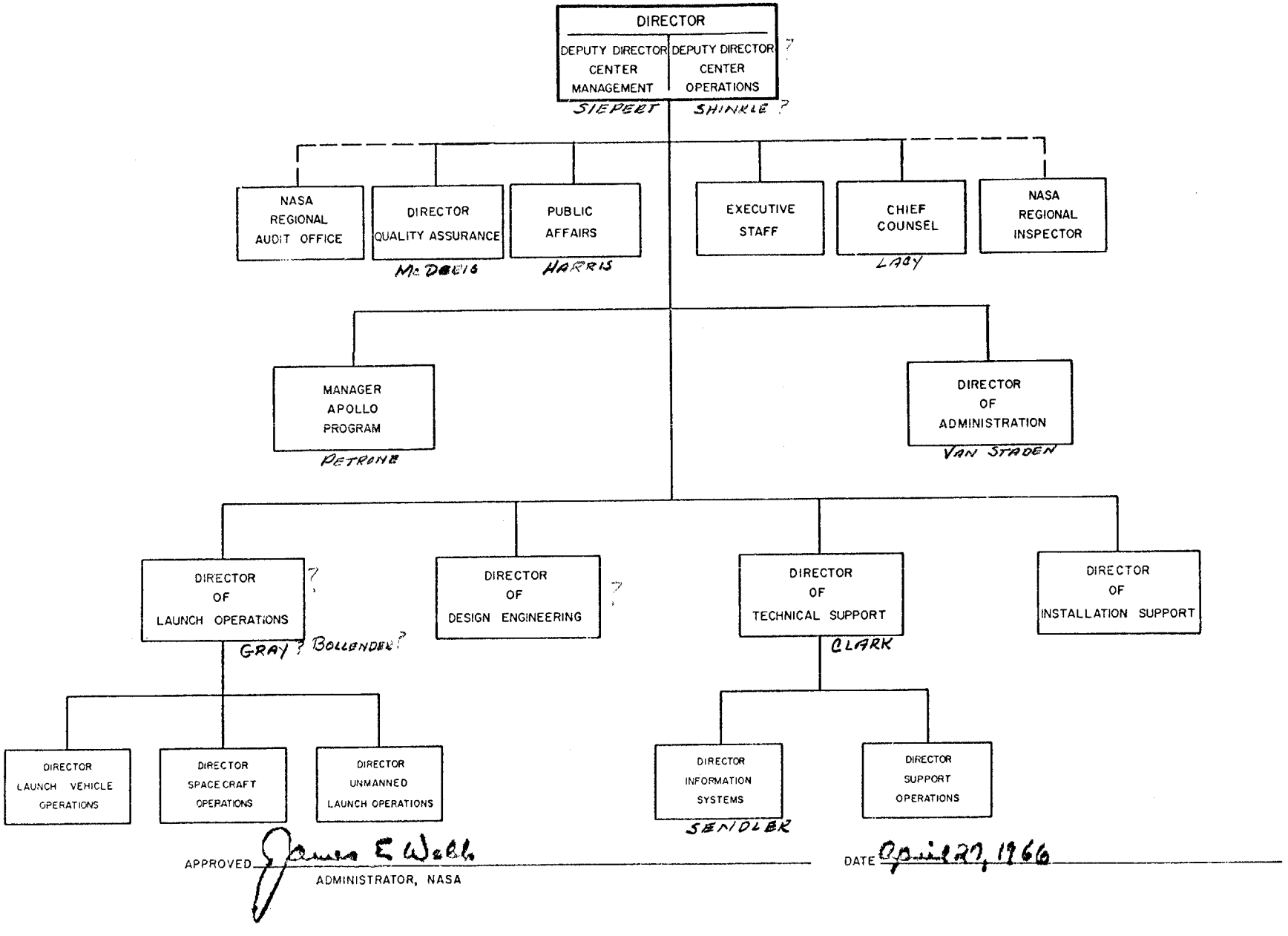
DIRECTOR
DEPUTY DIRECTOR CENTER MANAGEMENT
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SHINKLE ?
NASA REGIONAL AUDIT OFFICE
DIRECTOR QUALITY ASSURANCE
Mc DAVIS
PUBLIC AFFAIRS
HARRIS
EXECUTIVE STAFF
CHIEF COUNSEL
LAGY
NASA REGIONAL INSPECTOR
MANAGER APOLLO PROGRAM
PETRONE
DIRECTOR OF ADMINISTRATION
VAN STADEN
DIRECTOR OF LAUNCH OPERATIONS
GRAY ? BOLLENDER ?
DIRECTOR OF DESIGN ENGINEERING
DIRECTOR OF TECHNICAL SUPPORT
CLARK
DIRECTOR OF INSTALLATION SUPPORT
DIRECTOR LAUNCH VEHICLE OPERATIONS
DIRECTOR SPACECRAFT OPERATIONS
DIRECTOR UNMANNED LAUNCH OPERATIONS
DIRECTOR INFORMATION SYSTEMS
SENDLER
DIRECTOR SUPPORT OPERATIONS
APPROVED James E Webb
ADMINISTRATOR, NASA
DATE April 27, 1966

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #28

RELEASE NO: KSC 124-66
FOR RELEASE: May 3, 1966

JOHN F. KENNEDY SPACE CENTER----Escorted bus tours of the national Spaceport will become available to the public July 15, 1966, it was announced today by Dr. Kurt H. Debus, NASA Center Director.

Now that major facilities constructed for the Apollo/Saturn V launch mission are nearing operational status, it is possible to afford visitors the opportunity to see the structures, equipment, and some of the space vehicles which will be used for the future extension of the space exploration program. The tour of the new Merritt Island facilities will take about 1-1/2 hours.

To enhance understanding of the manned and unmanned space missions and the historical significance of America's space activities, the center and the Air Force Eastern Test Range (AFETR) have arranged an optional and longer tour of three hours to include Cape Kennedy Air Force Station. Dr. Debus and Major General Vincent G. Huston, AFETR Commander, have agreed that controlled public access in tour buses to both installations will contribute to these objectives.

Detailed bus schedules will be worked out in the next 60 days. Daily tours are planned Monday through Saturday, except when a major launch or other safety considerations may require cessation for a period usually not more than 24 hours.

"We want to provide the public with as meaningful a tour as can be permitted without interference with mission operational requirement," Dr. Debus said. "The public will continue to have the option of the free drive-through

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of the Center and Cape Kennedy Air Force Station Sundays in private vehicles. However, the new bus tours will also be available Sundays if the public desires."

General Huston noted, "The bus tours are a major step forward in our common and continuing effort to provide the tourist and visitors every opportunity to see the actual launch areas where America's greatest missile and space accomplishments take place."

Bus tours will begin at Gate 3, the main approach to the Center, which is located near US Highway 1, two miles south of Titusville, Florida. The itinerary on Merritt Island will include at least two stops where passengers may leave the vehicle. One will be a photo stop outside the Vehicle Assembly building at Launch Complex 39. The other will be a stop inside the VAB. Here the visitor can see stages of the Apollo/Saturn V lunar exploration vehicle and some of the massive ground support equipment.
Bus driver-escorts will receive special training in order to provide accurate space information to patrons while enroute and at stops. Fees for the tours will be announced shortly. These will be set at a moderate level sufficiently only to cover operating costs. The Sunday drive-through tour in the visitor's own vehicle will continue without charge.

The tour bus operation will be conducted by Trans World Airlines. TWA is the base support contractor for KSC, NASA.

Three years ago when the spaceport construction began, NASA outlined a basic objective to open its Spaceport to public visitors insofar as this

could be arranged without interference or hazard during critical tests or launches. The late Dr. Hugh Dryden, then Deputy NASA Administrator, informed the Congress that public access via escorted buses would be permitted as soon as major Apollo launch facilities were completed and in operation; the first Apollo/Saturn V configuration is being utilized for training purposes. Stages of the first flight version of Apollo/ Saturn V will begin to arrive at KSC in late summer.

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2A.2 #28

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-119-66
FOR RELEASE: PM, May 20, 1966

May 20, 1966

KENNEDY SPACE CENTER, Fla. -- A 365-foot-tall Apollo Saturn V lunar rocket will be picked up from its assembly site and carried 3.5 miles to the launch pad on May 25, just five years after the late President Kennedy set the goal of sending American astronauts to the moon by the end of this decade.

This test vehicle, designated the Apollo Saturn 500-F, will never make the journey to the moon, however. It is being used to verify launch facilities, train launch crews, and develop test and checkout procedures. The first flight vehicle is scheduled to arrive later this year.

Following the procedures which will be used during preparation for the actual lunar launch, the 500-F was assembled on a Mobile Launcher in the Vehicle Assembly Building at NASA's John F. Kennedy Space Center. Assembly and checkout in the VAB began in late March 1966.

-more-

A 3,000 ton crawler will move under the Mobile Launcher, lifting the launcher and the assembled rocket off its support pedestals. The combined weight of the launcher and space vehicle will be almost 6,000 tons. The journey to the launch pad is scheduled to begin about 9:00 a.m.

In a short ceremony before the event, Dr. George Mueller, Associate Administrator for Manned Space Flight; Dr. Wernher Von Braun, Director of Marshall Space Flight Center; Dr. Robert R. Gilruth, Director of the Manned Spacecraft Center; and Dr. Kurt H. Debus, Director of the Kennedy Space Center, will speak briefly. Master of ceremonies will be Albert F. Siepert, Deputy Director of Kennedy Space Center. Colonel Rocco A. Petrone, Director, Plans, Programs and Resources of Kennedy Space Center, will explain the functions of the 500-F vehicle.

Some 500 guests will attend the ceremony and witness the event. They will include representatives of the many companies who built the Launch Complex, representatives from the Department of Defense and the Army Corps of Engineers, who supervised much of the construction, officals of the National Aeronautics and Space Administration, the Brevard County Commission and Brevard Mayors.

P.S. IT MOVED!!!

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KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #28

news release

RELEASE NO: KSC-120-66
FOR RELEASE: Immediate

May 25, 1966

BREVARD YOUTHS EMPLOYED AT KSC UNDER PRESIDENT'S YOUTH OPPORTUNITY CAMPAIGN

KENNEDY SPACE CENTER, Fla. -- Nineteen Brevard area youngsters are working at the Kennedy Space Center this summer under the President's Youth Opportunity Campaign.

George English, deputy KSC personnel compliance officer for the campaign, said the youths, mostly high school juniors and seniors, were serving as aides in such Center functions as Launch Vehicle and Spacecraft Operations, Information Services, Support Operations and Engineering and Development.

Most of the youngsters have been working at KSC year-round on a part-time basis, and will work full-time through the summer.

-more-

Under the program, employees working part-time are limited to 16 hours per week. For the summer they will work 40 hours weekly.

English emphasized that the 19 spaces for summer work at the Kennedy Space Center under the YOC program have already been filled by local students.

The hirings were in addition to normal summer employment levels of NASA.

NASA has been authorized 505 Youth Opportunity Campaign spaces for the full-time summer employment program, more than 200 of which are in the manned space flight program either at KSC, the Manned Spacecraft Center in Houston, or the Marshall Space Flight Center in Huntsville, Alabama.

The remaining jobs are distributed among NASA's several field centers throughout the United States, including 45 job opportunities under the program at NASA Headquarters in Washington.

Some 37,500 young people -- aged 16 to 21 -- were employed by the Federal Government under the program last summer.

-end-

Taken from 2A.2, #28

JOHN F. KENNEDY SPACE CENTER,
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION,
KENNEDY SPACE CENTER, FLORIDA 32899
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105B-KSC-366-229/15 UNCL. 5-20-66

NASA/PIO W/O 162421P
RICHARD BIVANS, LEFT, CHIEF OF KENNEDY SPACE CENTER'S SCHEDULING AND PROGRAMMING SECTION, INSTRUCTS JAMES FORBES ON HOW TO MAKE A WORKING PROGRAM TAPE FROM A MASTER TAPE. FORBES IS ONE OF NINETEEN BREVARD AREA YOUTHS EMPLOYED HERE FOR THE SUMMER UNDER THE PRESIDENT'S YOUTH OPPORTUNITY CAMPAIGN.
(MY) (106)

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #28

news release

RELEASE NO: KSC-121-66
FOR RELEASE: Immediate

May 25, 1966

KENNEDY SPACE CENTER, Fla. -- Playalinda Beach, which is open to the public under joint agreement of NASA's Kennedy Space Center and Brevard County Commission, will be closed at 6 P.M. Monday, May 30, 1966.

Closure is necessary due to the Gemini 9A launch tentatively scheduled for Tuesday, May 31, 1966.

The beach will be open for public use at sunrise May 31.

-end-

PUBLIC INFORMATION OFFICE, COCOA BEACH - 783-7781, KSC - 867-2467

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-127-66
FOR RELEASE: Immediate

May 26, 1966

APOLLO/SATURN ON DISPLAY

KENNEDY SPACE CENTER, Fla. -- Visitors to this Center driving through the installation May 28, 29 and 30 (Memorial Day) will have opportunity to view the first Apollo/Saturn V rocket mounted on Pad A.

The 365-foot tall vehicle will be used to check out ground launch facilities and for training the launch crews who will prepare the later vehicles for flights to the Moon.

Tour hours are 9 A.M. to 3 P.M. Saturday, Sunday, and on the holiday.

The Apollo/Saturn V will be visible to drive-through tourists for the next two months.

-End-

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-129-66
FOR RELEASE: Immediate

May 31, 1966

PORTRAIT OF DR. DEBUS UNVEILED IN DALLAS

DALLAS, TEXAS -- A life-size portrait of Dr. Kurt H. Debus, Director, John F. Kennedy Space Center, NASA, was unveiled last night (June 1) at a dinner meeting of the Dallas-Fort Worth Council of Scientific Societies.

The work of Dmitri Vail, well-known portrait artist, the painting will be hung in the Dallas Health and Science Museum in the Vail Gallery in which noted men of space and science have been painted by the artist.

They include Dr. Edward Teller, Dr. Wernher von Braun, General Bernard Schriever, Admiral I. J. Galantin, Dr. Randolph Lovelace, and Lt. Gen. L. I. Davis.

-more-

The dinner was co-sponsored by the Museum, the Dallas Council of World Affairs, the Graduate Research Center of the Southwest, Fort Worth Children's Museum, and the Council of Scientific Societies.

Dr. Debus spoke on "The Impact of Space Technology."

-end-

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-131-66
FOR RELEASE: Immediate

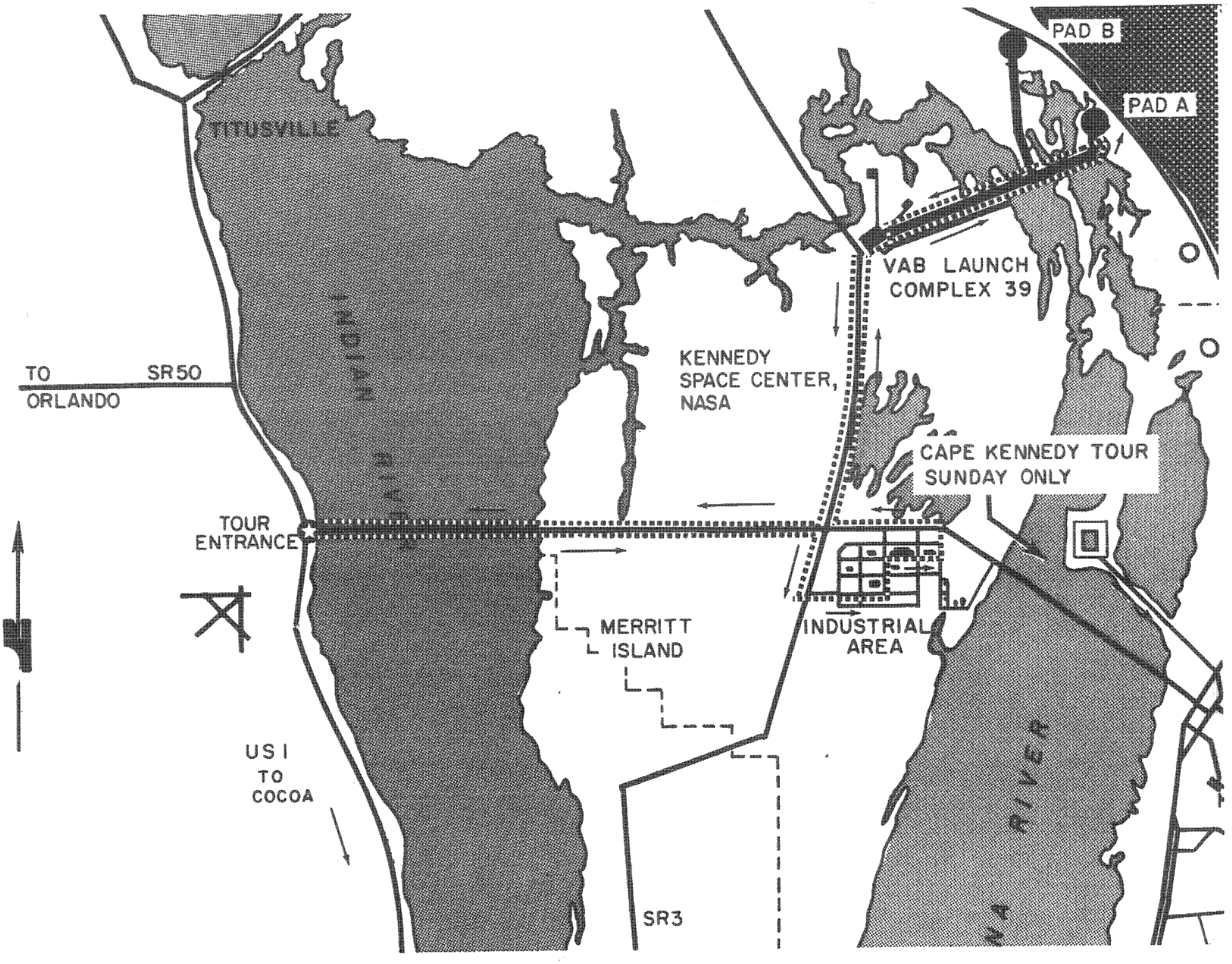
June 2, 1966

KENNEDY SPACE CENTER, Fla. -- Visitors to the Kennedy Space Center will have their first opportunity this weekend to view close up the Apollo/Saturn V moon rocket mounted on Pad A at Launch Complex 39.

The 365-foot-tall vehicle will be used to check out ground launch facilities and to train launch crews who will prepare the later vehicles for flights to the moon.

Tour hours are 9 a.m. to 3 p.m., Saturday and Sunday. Temporary extension of the normal tour route in the Launch Complex 39 area will allow visitors to drive near Pad A to view the vehicle at close range.

-end-


PAD B
PAD A
TITUSVILLE
INDIAN RIVER
VAB LAUNCH
COMPLEX 39
KENNEDY
SPACE CENTER,
NASA
TO
ORLANDO
SR50
CAPE KENNEDY TOUR
SUNDAY ONLY
TOUR
ENTRANCE
MERRITT
ISLAND
INDUSTRIAL
AREA
US I
TO
COCOA
SR3
INDIAN RIVER

Taken from 24.2, #28

JOHN F. KENNEDY SPACE CENTER,
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105E-KSC-66-51P UNCL. 6-2-66

NASA/PIO W/O 162794P
SUNDAY TOUR ROUTE, INCLUDING DRIVE AROUND LC 39 PAD, LOCATION OF APOLLO/SATURN V.
(GB)

2A.2, #28

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-130-66
FOR RELEASE: A.M. June 5, 1966

June 2, 1966

KSC/NASA EXHIBIT

KENNEDY SPACE CENTER, Fla. -- An exhibit describing the national space program and the launch operations here will be available to the public beginning July 15, 1966 at the KSC entrance near U.S. Highway 1.

On that day also, NASA will provide escorted bus tours at modest fees to persons desiring to visit the national Spaceport on Merritt Island. Tours will be conducted daily including weekends.

There will be no charge to view the exhibit which will consist of illustrated panels, models and actual spacecraft. Since November 1965, the same exhibit has been available to visitors driving through the Center weekends and national holidays. It will be relocated to the entrance in early July, thus making it available every day in the week.

-more-

Attendants will be on duty to answer visitors' questions or provide additional information concerning the NASA launch operations.

The visitor facility is an interim operation pending construction of a permanent Visitor Information Center on Merritt Island.

Trans World Airlines is bus tour contractor.

-end-


MOBILE SERVICING STRUCTURE
SIGNIFICANT LAUNCHES OF U.S. SPACE PROGRAMS
USA
USA
USA

Taken from 2A.2, #28

JOHN F. KENNEDY SPACE CENTER,
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION,
KENNEDY SPACE CENTER, FLORIDA 32899
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1658-4E6-65-- 26876 UNCL. 12-27-65

NASA/PIO w/o 16819P
VISITORS VIEWING EXHIBITS AT KENNEDY
SPACE CENTER. (ab) (144)

2A.2, #28

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-132-66
FOR RELEASE: Immediate

June 8, 1966

GEMINI 10 PREPARATIONS UNDERWAY AT KSC

KENNEDY SPACE CENTER, Fla. -- With the Gemini 9 mission concluded, NASA, Air Force and contractor teams at the Kennedy Space Center have turned their attention to the upcoming Gemini 10 flight.

NASA's Kennedy Space Center, directed by Dr. Kurt H. Debus, is responsible for preflight preparations and launch of all Gemini spacecraft and target vehicles.

Gemini launch operations are under the direction of G. Merritt Preston, KSC's Deputy Director for Launch Operations, and are conducted for KSC/NASA by the 6555th Aerospace Test Wing of the Air Force's Space Systems Division.

-more-

The launch vehicle for mission 10, a modified Air Force Titan II booster, was erected Tuesday at Complex 19 on Cape Kennedy. Systems tests of the vehicle are now in progress. Test conductor is Don Striby of the Martin Company. The two-stage Titan vehicle, assembled at the Martin Company's Baltimore plant, arrived last month.

The Gemini 10 spacecraft, built by McDonnell Aircraft Company, St. Louis, arrived last month also. It was taken to the Center's Pyrotechnic Building for receiving inspection and installation of pyrotechnic devices and the spacecraft fuel cell which provides onboard electrical power during flight.

The Agena target vehicle for the mission, manufactured by Lockheed Missiles and Space Company, Sunnyvale, California, and the McDonnell-built target docking adapter (TDA), arrived in May. After receiving inspection and individual checkout, the two components joined the spacecraft this past weekend atop the Center's Radio Frequency Systems Test Facility. Radio compatibility tests between the spacecraft and target vehicle components were conducted by NASA and contractor teams.

Following the RF systems tests, the Agena and TDA were returned to Hanger E at Cape Kennedy for mechanical mating and combined interface tests.

The spacecraft will be hoisted above the Complex 19 white room Thursday. It will undergo electrical mate and integrated systems tests with the launch vehicle in about 10 days. Mechanical mate of the spacecraft and launch vehicle will be accomplished early next month.

Spacecraft test conductor for the Gemini 10 mission in KSC's Don Cromer. Don Marchetti of Lockheed serves as test conductor for the Agena target vehicle.

The Atlas booster used to propel the Agena target vehicle into orbit is scheduled to arrive later this week from the Convair Division of General Dynamics Corporation, San Diego, California. It will be erected at Cape Kennedy Complex 14 later in the month. Shortly afterward, launch crews will conduct electrical and mechanical mate of the Atlas and Agena vehicles. Jack Miller of General Dynamics Corporation is test conductor for the Atlas booster.

Gemini 10 will be a rendezvous and docking mission similar to Gemini 9. Extra-vehicular activity is planned. The prime crew for the mission consists of John Young, command pilot, and Mike Collins, pilot. Al Bean and C. C. Williams, Jr., will serve as backup crew.

-end-

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #29

RELEASE NO: KSC-133-66
FOR RELEASE: Immediate

June 15, 1966

HURRICANE ALMA TESTS

KSC EMERGENCY PLAN

KENNEDY SPACE CENTER, Fla. -- It was a few minutes before 1 p.m., Wednesday, June 8th.

Many Kennedy Space Center employees were just finishing their lunches.

Outside, the wind was brisk and the rain fell intermittently, as the unseasonable Hurricane Alma began climbing the southwest Florida coast.

Kennedy Space Center Director, Dr. Kurt H. Debus, had made a decision. He was reasonably sure, after getting detailed weather briefings, that Alma would continue its northward trek, posing no serious danger to the Spaceport, but, he thought, what better time would there be for a simulated emergency operation.

-more-

Debus passed the word exactly at 1 p.m. He wanted the Saturn 500F facility model, which was bolted down atop its mobile launcher at Launch Complex 39's Pad A, moved back into the Vehicle Assembly Building, more than three miles away.

According to operation plans, personnel had 12 hours to do the job.

Debus' surprise order triggered a chain reaction. Key personnel were alerted, including test planning operations manager Bob Moser and test supervisor Chuck Henschel, both from the Office of the Director of Launch Operations.

Test Conductor Dewey Childs of Launch Vehicle Operations was called, as were Complex Controller Ed Smith of Support Operations and Instrumentation Controller Viron Payne of Information Systems. They, in turn, collected their respective personnel. D. D. Buchanan represented Engineering and Development.

Stage Contractors quickly mobilized, including Boeing (first stage), North American (second stage and spacecraft), Douglas (third stage), and IBM (instrument unit). Bendix people were alerted for the actual move, and Federal Electric for instrumentation duties.

All crews involved received the message and were assembled within one hour. Their first task was disconnecting the cables at the pad and securing the crawler-transporter, mobile launcher and 500F for the move. This included warming up the moving vehicle's engines.

At 2:01 p.m. the winds had reached 23 mph at the 200 foot level of the mobile launcher.

Disconnecting and securing took two hours to complete, and by 3:52 p.m., all stages were ready for the run. Winds now were gusting at 57 mph, with a steady blow of 32 mph.

The transporter's first motion occurred at 5:33 p.m. Traveling at the snail's pace of a quarter mile an hour, it reached the bottom of the pad's slope by 6:32.

A half hour later winds were gusting at 60 mph peaks and the rain was coming down in horizontal sheets.

By 7:25, the transporter was revved up in high gear and was moving down the straight stretch to the VAB at 1.1 mph.

Enroute, two stops were made -- for instrument readings and bearing lubrication. In a real emergency such tasks would be done while the vehicle was in motion.

The wind and rain continued, reaching a peak gust of 68 mph at 9:47 p.m.

At 11:43, the rocket was in front of its bay and the lightning mast was taken down. Fifty-four minutes later -- at 12:37 -- the 500F was safely secured in the VAB. The move was completed.

The operation, even under adverse conditions, had taken 11 and a half hours -- well within the 12 hour deadline.

Analysis showed the driving wind and rain did not constrain the movement. Strain guages registered no appreciable wind deflection on the Saturn vehicle.

Dr. Debus commended all involved for a splendid job. It was a simulated operation, nevertheless, it was carried out under realistic conditions.

Everyone was pleased, but they weren't overly content. The next day meetings were held and the operation was dissected. Plans were drawn up to cut the run even under 11 and a half hours. Ways were discussed to shorten the time of alerting personnel. Minutes were sliced here, seconds there.

The next time -- perhaps with a flight model Apollo/Saturn V on the Pad -- the emergency might be real.

-end-

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A-2, #29

news release

RELEASE NO: KSC-134-66
FOR RELEASE: Immediate

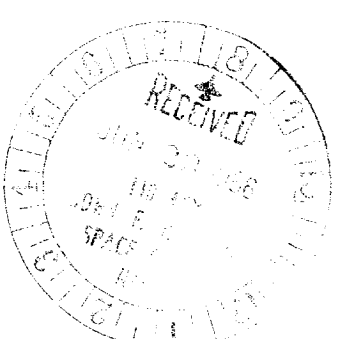
June 15, 1966

KSC EMPLOYEES HONORED

KENNEDY SPACE CENTER, Fla. -- Nineteen Kennedy Space Center employees have received cash awards or letters of commendation for suggestions they submitted for improving work operations that will result in an annual savings of thousands of dollars at the Center.

The largest single award - - $300 - - was made to four Engineering and Development employees, Francis Griffin, Keith Jenkins, Edwin Morgan and Barney McCullar. They jointly suggested the automatic check out of cable assemblies with special wiring and shielding. This will save NASA nearly $4,000 a year.

-more-



Tom Ewouds of Support Operations won $90 for his idea to delete manhole racking drawings from NASA outside plant-communications cable "plant in place" records. This will save the government $1,771 annually.

Other employees, with the amount of their award, include:

Phyllis Williams, Quality Assurance and Safety, $50; George Foye, Engineering and Development, $50; Donald T. Burr, Support Operations, $36; Harlow Powers, Financial Office, $35; Elmer Hatter, Plans, Programs and Resources, $30; Richard Woods, Information Systems, $25; Edward West, Launch Vehicle Operations, $25; Lowell Frasure, Launch Vehicle Operations, $15; and Louise Goodman, Administration and Transportation Services, $15.

Letters of commendation were sent to the following employees:

Shirley Fortier, Procurement; Kathryn Tate, Procurement; George Hughes, Launch Vehicle Operations; James Cobb, Launch Vehicle Operations; and Leerella Holland, Launch Vehicle Operations.

-end-

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #29

RELEASE NO: KSC-135-66
FOR RELEASE: Immediate

June 15, 1966

KSC EMPLOYEES RECEIVE SUPERIOR PERFORMANCE AWARDS

KENNEDY SPACE CENTER, Fla. -- Sustained superior performance awards, including $1,700 in cash presentations, have been received by five Kennedy Space Center employees.

Vincent T. Parr of Quality Assurance and Safety got the top cash award -- $500.

Others honored for outstanding service, included: Douglas Ahrens ($450) and John Zeman ($350), Unmanned Launch Operations; Margie Persson ($200) Administration and Transportation Services; and Harriett Springer ($200) Personnel.

-end-

2A.2, #29

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-136-66
FOR RELEASE: Immediate

June 15, 1966

LIGHTNING DETECTION SYSTEM PROTECTS KSC FACILITIES

KENNEDY SPACE CENTER, Fla. -- There is an old saying that lightning never strikes the same place twice, but it's quite another matter to prove or disprove it.

One man who can is Ralph Jones, Chief of Kennedy Space Center's Geophysical Measurements Branch, who states with scientific certitude that: "The fact that lightning strikes a place one day does not make it more or less probable that it will strike the next day."

Proving that lightning strikes a place once is difficult enough, but with the equipment that Jones uses in his job, lightning detection is becoming a more exact and accurate science.

-more-

In addition to detecting the occurrence of a lightning strike, the system records the number and peak current of the discharge that hits an instrumented location.

Equipment making up this system seemingly belies its sophistication, since there are only three relatively uncomplicated main parts. The first is a whip antenna, 102 inches long, that is attached to the lightning rod, making it the highest point on any given structure . The second part is a magnetic link assembly extending at right angles from the rod and measuring the peak current of the discharge. The final main part is a stroke counter recording the number of hits.

At Kennedy Space Center such systems are strategically located at all the highest points, including launch towers, service structures and weather towers. The importance of this equipment is paramount for there is virtually no other way to ascertain where, or even whether, a strike has occurred.

Without such knowledge, valuable time during a launch could be lost while a tower or service structure is checked out as to the cause of possible damage.

On one of the earlier Gemini flights, in fact, a delay of almost a month was incurred while just such a problem was checked out. Fortunately, with this launch detection equipment now in operation, such problems are a thing of the past.

The Spaceport area is second only to the Tampa area in registering the highest number of thunder storms per year in the United States. Last year one of the highest readings of peak current ever recorded in the U.S. was registered on the Service Structure at LC-37.

With conditions such as these existing, the need for a detection system becomes clearly evident, especially when coupled with the fact, as Jones puts it, "that even visual sightings of lightning are very inaccurate as to their point of contact. On numerous occasions many people have positively reported lightning striking various structures, but when our equipment was checked, they have been proven to be in error."

No matter how many times lightning may strike the Space Center, Ralph Jones and his crew will have scientific records to determine the frequency of occurrence of lightning striking launch facilities.

- end -

2H.2,#29

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-139-66
FOR RELEASE: Immediate

June 20, 1966

O'KEEFE APPOINTED DIRECTOR OF INSTALLATION SUPPORT AT KSC

KENNEDY SPACE CENTER, FLA. -- Keith T. O'Keefe, city engineer of Troy, N. Y., has been appointed Director of Installation Support of John F. Kennedy Space Center, NASA.

Dr. Kurt H. Debus, Center Director, said Mr. O'Keefe will organize and direct the logistics elements of KSC including supply, transportation, security, documentation, administrative services, quality control, and plant engineering and maintenance. Under O'Keefe's overall management, these functions are performed primarily by the two major support contractors, Trans-World Airlines, and Ling-Temco-Vought. Some 350 civil service and 3,400 contractor employees are engaged in providing installation services to NASA's new spaceport on Merritt Island, Florida.

-more-

A retired Army Officer, Mr. O'Keefe is a former commander of Lordstown Ordnance Depot, Ohio; Redstone Arsenal, Alabama; the Army Overseas Supply Agency, Brooklyn, New York, and Watervliet Arsenal, Watervliet, New York.

Before entering the military service he was an engineer with Interborough Rapid Transit Company in New York City in charge of car equipment and mechanical rolling stock of the subway system.

A native of New York City, he is a graduate of the College of the City of New York where he received a bachelor's engineering degree and of Polytechnic Institute of Brooklyn where he was awarded a masters degree in mechanical engineering. He also was graduated from the Army War College and the Army Logistics Management School.

While in college he earned letters in football, track and boxing and was Eastern Intercollegiate Boxing Champion. He has also been a member of the executive board of Fort Orange-Uncle Sam Council, Boy Scouts of America and was general chairman in 1965 for the United Community Services drive in the Mohawk-Hudson area.

Mr. O'Keefe is a registered professional engineer and member of Pi Tau Sigma, the American Society of Mechanical Engineers, and American Ordnance Association. He has published articles in American Management, Ordnance, and the Army, Navy, Air Force Journal. He was adjunct instructor at the Polytechnic Institute prior to joining Interborough Transit.

Mr. and Mrs. O'Keefe have a family of five children.

-end-

KSC news release
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-138-66
FOR RELEASE: Immediate

June 22, 1966

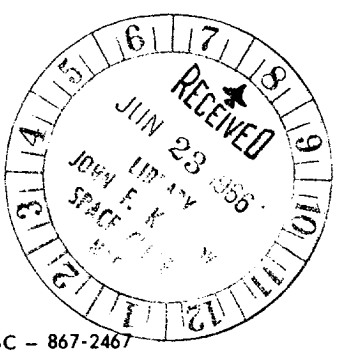
SUMMER STUDENTS AT KSC

KENNEDY SPACE CENTER, Fla. -- Eighty-nine students from college and university campuses across the nation are working at the Kennedy Space Center this summer in a wide variety of fields ranging from launch vehicle operations to information systems.

Dale Hering, for instance, is a student at Brevard Junior College, and plans later to transfer to the University of Florida to further his studies in mathematics.

At KSC, he is serving as an engineering aid, and he says of his work: "I enjoy it very much and feel that it fits perfectly for the field that I am planning to go into after graduation."

-more-



Virginia Heine is also majoring in math. She just graduated from Florida Atlantic University and plans to get her Master's Degree at the University of Florida.

Virginia works in programing and analysis at the Manned Spacecraft Operations Building. "It seems anymore," she said, "you have to have experience for most jobs, and working summers is a good way to gain it. I feel this summer will be valuable to me in gaining this, in applying the mathematics I have learned thus far, and also in enabling me to continue my education with a better idea of future goals."

Oliver "Pete" Martin, a senior at Clemson majoring in Physics, is employed for the summer in KSC's advanced telemetry technique station, doing research.

"I find the work a great opportunity to apply and increase my knowledge in the field," he says.

Iowa-born Susan Meyer, a junior at the University of Florida, is a clerk in the Quality Assurance Division stationed at the Vehicle Assembly Building. She is majoring in liberal arts and hopes to later study political science, aiming for a career in the diplomatic service.

Of her job at the Spaceport, Susan says, "I find it very interesting because of the people I am working with. I think it will be beneficial to me in any job I hold after graduation. It is also exciting to be a part of the space program."

-end-

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-144-66
FOR RELEASE: Immediate

July 6, 1966

KENNEDY SPACE CENTER, Fla. -- At the Kennedy Space Center Wiley Williams is a man who must work in two fields -- the present and the future.

As Manager of the new Test and Operations Management Office (Spacecraft Operations), he is daily involved with the physical checkout of such vehicles as Gemini 10.

But this is only half the story. He is also responsible for applying streamlined techniques and procedures into the spacecraft operations of tomorrow, although he admits, in his case, tomorrow (Apollo) is pushing today (Gemini) hard.

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Williams' work begins long before a specific spacecraft arrives at the Center.

"You might say we are responsible for the entire planning effort," he explains, "defining checkout operations, outlining the tests to be performed, describing our facility requirements and site activation, and implementing all this with the various spacecraft contractors.

"In summary, this is the total planning for the handling of the spacecraft here prior to launch. The products of this planning are sound test procedures and realistic schedules."

Williams and his staff of specialists not only plan these operations, but they also directly see that they are carried out. The spacecraft test conductors assigned to each Gemini and Apollo launch, as a result of the recent KSC reorganization, are also under Williams.

"We are," he says, "the only KSC element that gives technical direction to the spacecraft contractors."

Born in Winter Haven, the 37-year-old Williams worked his way through Georgia Tech, gaining a degree in electrical engineering in 1952. Two years of Army service followed.

In 1954 he went to work in Panama City, Florida, as a systems and later a project engineer with the U.S. Navy Mine Defense Laboratory. This involved research on mines and torpedo countermeasure systems.

Interest in the burgeoning space program led Williams to Cape Canaveral in 1960. He joined the Army Ballistic Missile Agency as a systems engineer on the Pershing project.

Two years later he switched to NASA, joining the Manned Spacecraft Center's Prelaunch Operations Division -- the forerunner to KSC's Spacecraft Operations -- at the Cape.

He began his work as a networks power and sequential engineer, in time to support all manned Mercury orbital shots, from John Glenn's through Gordon Cooper's.

Promotions followed, and in January 1964, Williams took a team of engineers to St. Louis, where McDonnell was building the Gemini spacecraft. He stayed for nine months, applying experience gained from Mercury to streamline the checkouts. He was chief engineer for spacecraft operations on the Gemini 2 mission, which paved the orbital way for the successful manned flights that have followed.

"We were a little conservative in the early days of Mercury," Williams recalls. "For instance, we felt it necessary to run a complete checkout here, down to taking out the components and checking them individually, after all this had been done once in St. Louis.

"We have found, on Gemini, that by thorough planning and close work with the contractor, we could substantially reduce the operations here.

"This resulted in a streamlining of checkout steps even though Gemini is a much more complicated piece of machinery."

Williams says this emphasis will increase on Apollo. "We are depending more and more on in-place testing," he pointed out. "We used to ship the guidance systems separately, for instance. Now we leave them in the spacecraft, and this saves us more time."

Two Apollo spacecraft have already been run through the checkout cycle at Merritt Island. Airframe nine, which flew on uprated Saturn I 201 earlier this year, was fully instrumented except for a guidance system and fuel cells. Airframe 11, which will go on the upcoming 202 flight, is virtually a full-scale Apollo.

The first manned Apollo, Airframe 12, is due at the Center next month. On later missions, using Command and Service Modules and a Lunar Module, Williams will have three test conductors, one for the lunar module, one for the command and service modules, and a chief test conductor who will integrate the overall Apollo testing.

Williams, who lives at 1312 Indian River Avenue, Titusville, with his wife Sara, and their 14-year-old daughter, Teresa, predicts the experience we are gaining on today's space programs will accelerate future progress.

"As I look at these new proposals, say for Mars programs, etc., it's sometimes difficult to grasp the fact that this is going to happen soon. But then I remember a few years ago I thought the same thing about landing on the moon."

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-140-66
FOR RELEASE: Immediate

June 22, 1966

KSC REORGANIZATION

KENNEDY SPACE CENTER, Fla. -- Re-structuring of the Kennedy Space Center's organization and most of the personnel assignments at divisional level were approved this week by the Director, Dr. Kurt H. Debus, as KSC moved towards full implementation of a revised organization. The basic structure was previously approved by NASA Administrator James E. Webb and announced April 29, with the implementation to be accomplished in stages by July 31, 1966.

Announcement was made last week of the selection of Keith T. O'Keefe, city engineer of Troy, N. Y., as Director of Installation Support, one of the four operational directorates established in the new Center organization.

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Several of the new key positions have not yet been filled, including that of the Deputy Director, Center Operations; Director, Launch Operations; Director, Executive Staff and Director, Design Engineering.

However, the operating directorates will begin immediately to transfer or realign existing branches and offices to fit the revised division structure.

At the Center staff level, John P. Lacy, who has been Acting Counsel, will become the Chief Counsel reporting to the Director. R. A. McDaris will become Director of Quality Assurance while the safety function, presently in his office, will be placed under the Installation Support Directorate.

Rocco A. Petrone becomes Manager of the KSC Apollo Program, with John G. Shinkle continuing as his deputy. His immediate assistants in the Apollo Program Office will consist of the following:

Complex 39 Site Activation, Lt. Col. Donald Scheller, USAF; Program Control, Bert Greenglass; Apollo Spacecraft, H. E. McCoy; and Operations Support, E. P. Bertram.

In addition R. C. Hock will head up the Advanced Programs Office for Col. Petrone, and R. L. Body continues as head of Apollo Reliability and Quality Assurance. J. C. Wooten, presently with George Washington University and formerly part of the Navy's Polaris management organization, will report July 5 as Assistant for Systems Engineering in the Apollo Program Office.

E. R. Mathews, now in charge of Saturn I program matters, has been detailed to head up a new Saturn Systems Office because of the common stages and procedures present in both the uprated Saturn I and Saturn V launch vehicles.

George A. Van Staden will become Director of Administration as earlier announced, responsible for manpower and space allocations, the administrative budget, and other administrative management functions, as follows:

Procurement, M. E. Haworth; Personnel, B. W. Hursey; Labor Relations, O. E. Kearns; and Accounting, L. E. Melton. In addition, the Management Systems function has R. L. Fairman detailed as Acting Chief, and the Chief for Resources Management has not yet been selected.

Mr. Van Staden will co-locate resources personnel from his directorate in new offices within the operating organizations to work directly with them in their management of KSC financial, manpower and space resources.

In the Launch Operations Directorate, G. Merritt Preston will continue as the Deputy Director, as previously announced, as well as Gemini Launch Director. Yet to be named is the Chief, Requirements and Resources Office. The new Test and Operations Management Office has Robert E. Moser in charge of operational planning and Paul C. Donnelly in charge of actual operations.

Dr. H. F. Gruene will continue as Director, Launch Vehicle Operations, with I. A. Rigell designated as Deputy Director, LVO. A. J. Pickett is Chief of the new Test and Operations Management Office within LVO. The post of Chief, Planning and Technical Support Office, has not yet been announced.

The LVO Engineering Divisions are being headed up by M. P. Edwards in Instrumentation Systems; L. E. Fannin in Mechanical and Propulsion Systems; and D. R. Oswald continues in charge of Quality Surveillance. The Chief of the Electrical Guidance Control Systems Division will be announced later.

John Williams continues as Director of Spacecraft Operations, with W. R. Durrett as Deputy. Wiley Williams will be Chief, Test and Operations Management Office. E. N. Sizemore will serve as Chief, Planning and Technical Support Office.

Also in Spacecraft Operations, a Flight Systems Division will be set up by A.M. Busch; and G. T. Sasseen will organize the Guidance Systems Division. J. M. Bobik continues as Chief, Quality Surveillance Division.

There is no change in leadership in the Unmanned Launch Operations area. Robert H. Gray is the Director and J. J. Neilon, Deputy. As in the past, Mr. Gray and Mr. Neilon also function as chiefs of medium launch vehicles and operations support, respectively. Joseph Schwartz is the acting chief of the Western Test Range Operations Division. A Chief for a new Planning and Technical Support Office will be named later.

As previously announced, A. H. Bagnulo is the Deputy to the Director of Design Engineering. J. F. Burke becomes Chief, Requirements and Resources Office in this directorate, while J. P. Claybourne continues as head of the Future Studies Office. Otherwise, there are major realignments in this area as follows:

Three Divisions of engineering design specialists will be organized as follows:

Mechanical Systems, T. A. Poppel; Electrical and Electronics Systems, J. R. White; and Civil Engineering, R. P. Dodd.

Four Engineering Managers have been selected to be responsible for technical management of contractor work on KSC-developed facilities and ground support hardware: Complex 39, D. D. Buchanan; Complexes 34 and 37, C. T. Wasileski; Electrical and Electronics, G. F. Williams; and Facilities, Col. R. E. Schnetzer, USA.

Ray Clark will be the Director of Technical Support as earlier announced. His Deputy has not been selected. Within this Directorate, J. J. Keith will head up a new Contractor Management Assistance Office and J. E. Thomas will organize the TSO Resources and Requirements Office. The position of Chief in the new office of Test and Operations Management has not been filled.

Karl Sendler continues as Director, Information Systems, in the Technical Support directorate. W. F. Barney is his Chief, Planning and Technical Support Office; and R. H. Bruns, Chief, Data Systems Division; and R. L. Wilkinson, Chief, Measurement Systems Division, both continue in their present posts. P. A. Minderman will assume the duties of Chief, Telemetric Systems Division. The Chief of a new Quality Surveillance Office has not been selected.

The other major element within Technical Support is Support Operations with R. E. Gorman as Director and D. O. Black as Deputy. J. B. Gayle will head up a new Quality Surveillance Office and E. J. Manton serves as Chief, Planning and Technical Support Office.

Support Operations Divisions will be organized with the following leaders: Technical Services, B. E. Stimson; Technical Laboratory and Shops, H. E. Johnson; and Launch Support Systems, C. D. Sweat.

C. C. Parker becomes Deputy to Mr. O'Keefe, as Director of Installation Support. O'Keefe will report in mid-July. S. E. Carlson has been selected as Chief, Contractor Management Assistance Office. The post of Chief, Requirements and Resources Office has not been filled.

Charles L. Buckley will continue as Chief, Security Office, while J. R. Atkins is Chief of the Safety Office in the Installation support organization. The position of Chief, Center Administrative Services Office is filled by J. R. Russo.

Four technical divisions are also being established: Plant Engineering and Maintenance, R. C. Daley; Quality Engineering and Control, R. A. Gramer; Logistics; and Documentation, for which Chiefs have not been announced. Transfers of functions from Administration to the Logistics Division will include transportation, supply management and direct purchases.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-141-66
FOR RELEASE: A.M., June 25

June 24, 1966

KENNEDY SPACE CENTER, Fla. -- Three veteran members of NASA's launch team and a Chrysler Corporation employee have been cited by the Government for outstanding performance during the February 26th launch of the Apollo/Saturn 201 space vehicle.

The awards were made Friday during a ceremony in the offices of Dr. Kurt H. Debus, KSC Director. Andrew J. Pickett, John T. Humphrey and Lionel E. Fannin, members of the Launch Vehicle Operations team, received Superior Achievement Awards for their quick and effective reactions to an emergency situation during the final countdown of the first flight test of the new uprated Saturn I vehicle.

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Galoino Salvador, Manager of the Propulsion and Vehicle Mechanical Group for Chrysler's Space Division, received a KSC Certificate of Appreciation for his contribution in effecting the successful launch.

In addition to the commendations, the three NASA employees each received $500 cash awards. Salvador has been recommended for a special bonus award by the Chrysler Corporation.

The situation that resulted in the awards occurred when an unacceptable pressure indication threatened to scrub the launch of AS-201. The four recipients conceived an alternate test that proved the vehicle capable of sustaining a successful mission.

The critical test was performed under extreme restrictions of time, since the acceptable launch window was minutes away from closing.

The significance of the NASA employees' contribution was reported to Headquarters. The report stated, in part, "With this country's space prestige at stake, it was of vital national concern than an unblemished Saturn launch record of eleven successful launches remain intact."

The report pointed out that a scrub would have required draining propellants from the vehicle, overtime work, and an undetermined waiting period for down-range support units. A delay also would have created conflict with the Gemini 8 mission and a minimum postponement for the Saturn launch of at least two weeks.

The report called the actions of Pickett, Fannin and Humphrey "an extraordinary performance even for a capable and experienced operations team."

In a letter of acknowledgement to the Chrysler Corporation, Dr. Debus cited Salvador for playing "a particularly commendable part" in solving a difficult problem in the emergency.

The three NASA employees have been a part of the government/industry launch team throughout the Saturn program which completed its first mission in October, 1961. They have worked together in launch operations since the early development period of the Redstone rockets, which were employed in the first American manned space flights.

Pickett is KSC's Chief of Mechanical and Propulsion Systems Division. Fannin heads the Center's Propulsion and Vehicle Systems branch, and Humphrey is Chief of the Saturn Operations team.

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2A.2, #29

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-143-66
FOR RELEASE: Immediate

July 5, 1966

KENNEDY SPACE CENTER INAUGURATES DAILY BUS TOURS OF THE NATIONAL SPACEPORT

KENNEDY SPACE CENTER, Fla. -- For the first time since the advent of the national space program in 1958, bus tours will be available to the public beginning July 15 at this Center.

At present, the public may visit the Center holidays and weekends. Adjacent Cape Kennedy Air Force Station is open to drive-through tours only on Sundays.

NASA will inaugurate the tours on a seven-day-per-week schedule. Moderate fees will be charged to cover the operating costs of the buses. On Sundays only, the visitor will have the option of driving through the installation in his own vehicle, at no charge, or of boarding a bus.

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One tour lasting 1 1/2 hours will cover the Spaceport and include a visit to the Vehicle Assembly Building, one of the world's largest structures in volume, in which the Apollo/Saturn V lunar rockets are prepared.

With the cooperation of the Air Force, the other tour of about 3 hours will include the Spaceport and Cape Kennedy, site of NASA's launches of Gemini, Saturn, and the unmanned scientific spacecraft such as Surveyor, Ranger, Mariner, Tiros and other satellites.

Trans World Airlines will conduct the tours for NASA. Buses will be equipped with public address systems through which visitors will hear recorded commentaries during their trips. Escorts will brief them at scheduled stops.

Prior to boarding the buses, visitors may view NASA exhibits at a facility being constructed near U.S. Highway 1, two miles south of Titusville, Florida, at the main entrance to the Space Center.

As the buses travel about the Spaceport, the visitor will see major structures including the Manned Spacecraft Operations Building, where astronauts reside while in final training for flight and where the Gemini and Apollo spacecraft undergo final preparations.

They will also see the heavy transporters, weighing 6 million pounds, which transport the Saturn V launch vehicles from the assembly building to the launch site 3 1/2 miles away. The transporters support the combined weight of mobile launchers, 440-foot-tall steel structures, and the empty rockets, 365 feet tall, which weigh 7 million pounds when fueled for launch.

On Cape Kennedy the tour route includes the early launch pads from which Alan Shepard became the first U.S. astronaut to complete a trip in space and from which the first U.S. earth satellite was launched January 31, 1958.

The buses will also transport the visitors to the launch complexes employed for the 220-foot-tall uprated Saturn I configuration, which will carry three astronauts into earth orbit in 1967.

Advance reservations for groups of 20 or more for weekday and Saturday tours may be obtained by contacting NASA Tours, PO Box 21222, Kennedy Space Center, Florida. All Sunday bus tours and those for families and small groups are on a non-reserved basis.

On days of major launches, tours will be conducted when traffic conditions return to normal after launches. For this reason, reservations are not accepted for dates of manned launches, Apollo/Saturn launches or Titan III launches. Visitors will be accepted on a first come, first served basis at these times.

Groups arriving on private charter buses will pay a reduced fare and have an escort placed aboard to conduct the tour. Arrangements for escorts should be made in advance with the NASA Tours Office.

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2A, 2, #30

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-145-66
FOR RELEASE: Immediate

July 6, 1966

KSC SEWAGE AND DISPOSAL SYSTEM HAS UNUSUAL REQUIREMENTS

KENNEDY SPACE CENTER, Fla. -- Water pollution is no problem at the Kennedy Space Center.

Facilities as advanced and modern as the rockets that soar into space from the Center are more than capable of handling sewage, excess fuels and oxidizers and industrial wastes.

"We have unusual disposal requirements here," admits Richard Suratt, Aerospace Technology/Experimental Facilities and Equipment. "But we presently have adequate plants to handle everything without causing any problems of pollution or contamination at the Center or in the Brevard area, and are budgeting for additional future facilities to handle industrial wastes, fuels and oxidizers as volumes tend to increase.

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"We have three major sewage plant systems, one in the Center's industrial area, one in the Vehicle Assembly Building area, and one that covers both Pads A and B at Launch Complex 39," Suratt explained.

These are regular sewage treatment facilities, and, combined, they are capable of handling well over half a million gallons daily; an amount in excess of present requirements.

Additionally, Suratt states, there are septic tanks and drainfields for outlying areas not serviced by the major plants.

Contaminated fuels and oxidizers -- such as hydrazine and nitrogen tetroxide -- which are used by NASA at spacecraft preparation sites on Merritt Island and at Cape Kennedy launch pads, are disposed of at Air Force facilities on the Cape.

Cryogenics, including liquid oxygen and liquid hydrogen, are dumped into Spaceport disposal points and discharged into the Indian River. Suratt was quick to point out, however, that these liquids cause no problems, quickly dispersing in the water without any pollution or contamination effect.

Excess RP-1 fuel, used in the Saturn IB vehicle, is dumped in "ponds" at the Center and burned off by the fire department for training excerises.

Industrial wastes, Suratt says, include reproduction fluids, propellant cleaning wastes and cooling water used in air conditioning systems.

Reproduction wastes are presently handled in the Center's sewage system. Propellant cleaning fluids, used to purge rocket ground support equipment, are dumped into relief tanks and disposed of by the Air Force at their facilities.

Cooling water, which is not normally re-circulated due to blowdowns, overflows and drainage for maintenance purposes, flows into drainage ditches and is no problem.

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KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #30

news release

RELEASE NO: KSC-146-66
FOR RELEASE: Immediate

JULY 7, 1966

KSC'S DR. HANS GRUENE RECEIVES NASA EXCEPTIONAL SERVICE MEDAL

KENNEDY SPACE CENTER, Fla. -- The NASA Exceptional Service Medal was presented today to Dr. Hans F. Gruene, Director for Launch Vehicle Operations, by Center Director Dr. Kurt H. Debus.

Dr. Gruene received the NASA award, the highest which the agency confers, in October 1964 for his outstanding work in launch operations of Saturn and other space vehicles.

Since that time NASA authorized medals in addition to the certificates presented to recipients by the NASA Administrator, James Webb. It was this medal which Dr. Debus presented.

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Dr. Gruene is responsible for preflight testing, preparation, and launch of the Saturn vehicles as well as operation and maintenance of launch support systems.

He began his rocket work in the United States in 1945 with the U.S. Army at Fort Bliss, Texas. In 1951 he became chief of guidance, control and networks in the Missile Firing Laboratory of the Redstone Arsenal and in 1956 was transferred in the same capacity to the Army Ballistic Missile Agency.

Dr. Gruene joined NASA July 1, 1960, serving as Deputy Director of the Launch Operations Directorate. He became Assistant Director in August 1964 and Director of Launch Vehicle Operations July 1, 1966.

He resides in Cocoa Beach with his wife, Edith and son, Peter. Their daughter, Mrs. John Evans, lives in Huntsville, Alabama.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-147-66
FOR RELEASE: Immediate

July 7, 1966

LT. COL. ROCCO PETRONE RETIRES FROM ARMY; WILL CONTINUE AS APOLLO PROGRAM MANAGER AT KSC

KENNEDY SPACE CENTER, Fla. -- Lt. Col. Rocco Petrone, manager of the Apollo Program Office of the Kennedy Space Center, has retired from the Army and will retain his position as a member of the National Aeronautics and Space Administration.

As manager, Col. Petrone is responsible for management and development of the program which has as its goal the landing of U.S. astronauts on the moon and their safe return.

Col. Petrone was assigned to the center by the Army in 1960 and was selected by Dr. Kurt H. Debus, the director, to supervise Apollo.

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Col. Petrone, 40, a native of Amsterdam, N. Y., was graduated in 1946 from the U.S. Military Academy where he played football on Army's famous teams which boasted Felix (Doc) Blanchard and Glenn Davis.

During 20 years of military service, Col. Petrone served in the Army of Occupation in Germany from 1947 to 1950 and was assigned to the Army General Staff in Washington from 1956 to 1960.

He received a master's degree in mechanical engineering in 1951 from Massachusetts Institute of Technology and the following year received his professional engineering degree.

In 1952 he was sent to the Army's Redstone Arsenal at Huntsville, Ala., where he participated in the Redstone Program, which developed the first U.S. ballistic missile. He was a member of the launch team at Cape Canaveral when the first Redstone was launched in 1953.

- end -

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-148-66

FOR RELEASE: Immediate

July 8, 1966

KENNEDY SPACE CENTER, FLORIDA--Contracts totaling $768,408 were awarded by NASA's John F. Kennedy Space Center for support of the Center's space activities. The contracts covered a number of operations and affected firms in several states.

In keeping with the government's policy of encouraging small business participation, a contract was awarded to Symetrics Engineering Corporation, 225 South Patrick Drive, Satellite Beach, Florida. The pact totaled $20,250 for recorder filter units used in the Saturn program at the Space Center.

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Four other Florida companies received contract awards. Ampex Corporation of 1980 North Atlantic Avenue, Cocoa Beach, will modify tape recorders and supply associated spare parts and operation manuals under a $16,119 pact.

Components for a vibration data analysis system was the subject of a $27,245 contract awarded to Electro-Mechanical Research Incorporated of 1325 North Atlantic Avenue, Cocoa Beach. The equipment will be used in the Apollo/Saturn V program which is scheduled to land American astronauts on the moon and return them safely to earth before the end of this decade.

Under the terms of a $89,600 contract, United Mobile Leasing Corporation of 601 North Fern Creek, Orlando, will lease 28 trailers to the Space Center. The trailers will be suitable for use as offices and will be located at Launch Complex 39, the launch site of the Apollo/Saturn V space vehicle.

The final Florida contract was received by TRW Systems Group, TRW Incorporated, Florida Operations, 7001 North Atlantic Avenue, Cape Canaveral. The $249,997 pact calls for the firm to supply all necessary personnel, facilities and materials required for a study for the Saturn Apollo Applications Program Definition, an investigation of the application of present Apollo program technology to future space programs.

Other contracts were awarded as follows:

Brown Engineering Company Incorporated of 300 Sparkman Drive, Huntsville, Alabama received $66,764 for closed circuit television systems and safety monitoring equipment that will be used to detect equipment and personnel hazards at NASA's Launch Complex 34 at Cape Kennedy. The uprated Saturn 1B space vehicle is launched from Complex 34.

A photographic laboratory will be furnished by Radio Corporation of America under a $73,333 contract. The equipment will provide audio and visual recordings of space vehicle flights. The company is located at 2700 West Olive Street, Burbank, California.

Georgia Tech Research Institute, Atlanta, Georgia, will conduct training sessions for Kennedy Space Center personnel under two contracts totaling $49,677. The programs will study certain aspects of radio frequency signals and launch complex signal distribution improvements as related to NASA launches.

A contract for $58,128 was received by the International Harvester Company of 10400 North Avenue, Melrose Park, Illinois for diesel driven tractors which will be used for general earth moving tasks at the spaceport.

Data display equipment will be supplied by Bryant Computer Products division of Ex-Cello Corporation, 850 Ladd Road, Walled Lake, Michigan. Included in the $26,121 pact are amplifyers and drivers which will support launches of the uprated Saturn 1 and Saturn V space vehicles.

Applied Research Incorporated of 76 South Bayles Avenue, Port Washington, New York will supply telemetry equipment under a $15,800 pact. The equipment will be used in retransmission of real-time VHF telemetry data from antenna sites to the Central Instrumentation Facility at the spaceport.

A contract for $39,289 was received by Monitor Systems, Incorporated of 401 Commerce Drive, Fort Washington, Pennsylvania. The contract calls for the company to furnish a digital-to-analog system used for processing telemetry data connected with the flights of uprated Saturn 1 and Apollo/Saturn V space vehicles.

The final contract award went to Kaiser Aluminum & Chemical Sales Incorporated of 500 Wood Street, Bristol, Rhode Island. The terms of the $36,085 pact call for Kaiser to supply the Space Center with 10,560 feet of electrical cable that will replenish the electrical shop's stock of cable.

The Kennedy Space Center operates the nation's spaceport at Merritt Island, Florida, and conducts major space launches from Cape Kennedy.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #30

RELEASE NO: KSC-155-66
FOR RELEASE: Immediate

July 21, 1966

ASSISTANT APPOINTED TO APOLLO PROGRAM MANAGER

KENNEDY SPACE CENTER, Fla. -- Dr. Kurt H. Debus, Director of the John F. Kennedy Space Center, has announced the appointment of James C. Wootton to the key position of Assistant for Systems Engineering in the Apollo Program Office.

In his new position, Wootton will be responsible to the Manager of the Apollo Program for support on systems engineering aspects of program management.

Wootton comes to the Space Center from George Washington University, where he was Associate Professor of Engineering and Director of the Center for Measurement Science. Prior to his teaching assignment, he completed a Naval career, retiring in the rank of Captain in July, 1965.

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Wootton, a native of Virginia, completed grade and high schools in Burkeville, and attended college at Virginia Polytechnical Institute, Lynchburg Division. In 1935 he took a position with the National Advisory Committee for Aeronautics (forerunner of NASA) at Langley Field, Virginia.

In 1938 Wootton completed naval flight training and was commissioned an Ensign, U.S. Navy. He was assigned to the carrier, USS Yorktown, and flew with Torpedo Squadron 5 until August 1940 when he became an instructor at the Naval Air Station, Pensacola. A year later he was transferred to the Naval Air Station, Norfolk, Virginia, where he assumed the position of Project Officer and Test Pilot at the Aircraft Armament Unit.

In July, 1943, he became head of the Aircraft Turret Section, Armament Test Division at Patuxent River, Maryland. Subsequently, he served as Aviation Ordnance Materiel Officer on the staff of the Commander, Air Force, U.S. Pacific Fleet, and later was assigned as a member of an Aviation Technical Intelligence Unit in occupied Japan.

In 1945 Wootton returned to the United States to become head of the Aircraft Turret Branch with the Bureau of Aeronautics, Naval Department, Washington, D. C..

From 1946 until 1949 he studied at the U.S. Naval Postgraduate School at Annapolis and at Massachusetts Institute of Technology, earning degrees of Bachelor of Science and Master of Science. After completing his advanced schooling, he was made Deputy Director of Armament Division with the Bureau of Aeronautics, where he served until 1952.

After a course of study at the Naval War College and several other assignments, Wootton was made Deputy Technical Director of the Navy's Polaris project and later served as Assistant Chief of Naval Research.

For his work on the Polaris project, Wootton was awarded the Legion of Merit.

In April 1963 he was designated Commanding Officer, Naval Avionics Facility in Indianapolis, Indiana. He remained in that position until his retirement.

Wootton is an Associate Fellow of the American Institute of Aeronautics and Astronautics, a member of the American Geophysical Union, and a member of the U.S. Naval Institute.

Wootton and his wife, the former Jean Speers Lorimer of New Smyrna Beach, Florida, plan to locate their family in that area.

The Woottons have three children. Son, James, is on military duty with the Navy. Their other children are Janice, a student at Shenandoah College, Virginia, and son, Joel, thirteen.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #30

RELEASE NO: KSC-156-66
FOR RELEASE: Immediate

JULY 22, 1966

CONGRATULATORY MESSAGES FOR NASA TOURS

KENNEDY SPACE CENTER, Fla. -- Dr. Kurt H. Debus, Director, John F. Kennedy Space Center, received the following congratulatory messages on the initiation of NASA Tours.

From: Governor Haydon Burns

It is my extreme pleasure in behalf of all of Florida, to convey our heartiest congratulations on the beginning of regular operational bus tours at the Center on July 22. I know the new facilities will have a great impact on our tourist industry by providing a more adequate means of better informing our many interested visitors of the overall operations of the Space Center. Best wishes for continued growth and success in all of your activities.

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From: William H. (Bill) Roundtree
State Representative Brevard County, Florida

Congratulations to you upon the institution of the daily bus tours of the John F. Kennedy Space Center and Cape Kennedy. The public will truly appreciate your wisdom and interest in making possible for them a personal visit through the marvelous Space Center and Base. You and NASA are to be commended for your awareness of the importance of such tours in enhancing the understanding and support of the public for your future space efforts.

From: Stanley I. Hand, Executive Director
Florida Council of 100

On behalf of all members of the Florida Council of 100, it is my sincere pleasure to wholeheartedly congratulate the Kennedy Space Center on the occasion of offering daily bus tours of the Space Center and the Cape to the good citizens of the United States of America. Please accept the Council's best wishes and God's speed in your daily endeavors.

From: Percy L. Hedgecock, President
Astronaut Trail Association

On behalf of the Astronaut Trail Association which represents VIP's from all of Brevard County, we congratulate you on opening the Kennedy Space Center enabling the public to see the Space Center of the world by the bus tours that you have approved. We of the Association feel that the public of America deserve this opportunity and we deeply appreciate it and will work with you in any way possible to help make these tours a success.

From: Charles W. Campbell, Chairman
Florida Development Commission

Congratulations to you and your associates on the inauguration of scheduled bus tours through the Kennedy Space Center on July 22. The citizens of our country will be gratified with this new addition which will enable them to become better acquainted with space operations and the fine job you are doing. We are indeed appreciative of the contribution the John F. Kennedy Space Center is making to Florida and wish you continued success in this new program.

From: Gene Roberts, President
Greater Titusville Chamber of Commerce

Our sincere congratulations on your official opening of daily escorted tours of Kennedy Space Center and Cape Kennedy. We pledge our full cooperation to NASA and TWA to help make this a successful endeavor.

From: B. W. Simpkins, President
Cocoa Rockledge Area Chamber of Commerce

Congratulations we commend you for making it possible for the general public to make daily bus tours of Cape Kennedy and the Kennedy Space Center, and offer our full support and cooperations for the success of the Spaceport Tours.

From: Jack Hurck, President
Cape Canaveral Chamber of Commerce

Congratulations on the inauguration of the Kennedy Space Center Tour program. It's success will be a great step toward public understanding of NASA and will make Brevard County one of the greatest tourist attractions in the world.

From: R. P. Murkshe, Mayor
City of Cocoa Beach

Congratulations on the commencement of the daily Space Center bus Tours. This is a practical and foresighted move of great value to every U.S. Citizen and to Brevard County. We are greatful for your continued interest in the public awareness of the Space program and the benefits that accrue to our area as a result of your open door policy.

-end-

2A.2, #30

KSC

KENNEDY SPACE CENTER
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC 164-66

FOR RELEASE: IMMEDIATE

KENNEDY SPACE CENTER, FLORIDA---The National Aeronautics and Space Administration has extended its contract with the Boeing Company, Cocoa Beach, Florida, for continued work on the Apollo/ Saturn V Launch Complex 39 at Merritt Island.

The cost-plus-fixed-fee contract extension for $11,259,221 provides for site-activation, design engineering and operational support as well as pre-launch, launch, and post-launch preparations at the Saturn V Launch Complex. The extension brings the total effort under this contract to $32,368,430.

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KSC
KENNEDY SPACE CENTER
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #30

RELEASE NO: KSC-165-66
FOR RELEASE: IMMEDIATE

LUNAR ORBITER-A SPACECRAFT DELIVERED TO NASA

KENNEDY SPACE CENTER, FLA.---The National Aeronautics and Space Administration has accepted delivery from the Boeing Company of the Lunar Orbiter-A spacecraft which NASA plans to put into a near-orbit of the moon next month.

After accepting the Orbiter, NASA immediately fueled the spacecraft and loaded its camera system and began last-minute checkouts in preparation for its launching between August 9-13.

The Kennedy Space Center's Unmanned Launch Operations Division, headed by Robert H. Gray, will launch the Orbiter on a mission to photograph the lunar surface from a height of about 28 miles.

The photos, to be taken along a narrow belt on the moon's equator, will help determine suitable landing sites for Apollo manned missions and for unmanned Surveyor spacecraft.

Lunar Orbiter-A will attempt to photograph the Surveyor I spacecraft which landed on the moon last June 2 and returned to earth thousands of clear photos of the lunar surface before contact was lost with it on July 13.

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2A.2, #30

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-166-66
FOR RELEASE: Immediate

7-28-66

NASA - TOURS

KENNEDY SPACE CENTER, Fla. -- The opening of the John F. Kennedy Space Center to public tours has been tremendously successful in the first week. Indications are that the NASA Tours will draw steadily larger crowds.

In the first week, more than 12,000 visitors saw the NASA Spaceport and Cape Kennedy, site of Manned Gemini launches. People from Peru, South Africa, Australia, England, Germany and Argentina and from 40 states as far away as Maine and North Dakota toured the area.

Until last week, tours were limited to drive throughs by private autos on week-ends and through Cape Kennedy only on Sundays. Since July 22nd, the National Aeronautics and Space Administration has operated a regular schedule of guided tours. Visitors are briefed on the mission of the Kennedy Space Center and on the various facilities while en route. A special briefing is provided in the giant Vehicle Assembly Building on the Merritt Island Spaceport. There are several stops at which visitors may take pictures.

- more -

The response has been enthusiastic. Visitors expressed awe at the size of the various rocket launch complexes. The highlight is the site from which three American astronauts will begin their historic flight to the moon. Visitors were allowed to take pictures of the 364-foot tall Apollo/Saturn V space vehicle. Comments range from "I can't believe it'll ever get off the ground," to such remarks as "It's just too big to comprehend." One man from Hollywood, California, who is accustomed to seeing the colossal and the spectacular, told the briefer at the Vehicle Assembly Building, "This is the best attraction I have ever been to, and I've seen most of them."

Even NASA officials were surprised at the number of the turnout, but steps are being taken to handle crowds. Originally 15 air-conditioned buses were used, but attendance was such that more were pressed into service.

Trans-World Airlines conducts NASA Tours. Projected figures for tourist attendance vary, but probably more than three million people a year will visit the Kennedy Space Center by 1970. If this past week's record is any kind of indicator, that figure may be too conservative.

- end -

2A.2, #30

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-158-66
FOR RELEASE: Immediate

August 4, 1966

25,000th VISITOR

KENNEDY SPACE CENTER, Fla. - - Ivan Sepwerda of 3208 Raynell St., Lansing, Michigan, became the 25,000th person to tour the Kennedy Space Center today in the escorted bus tour program inaugurated July 22, 1966.

Mr. Sepwerda was greeted by G. L. Harris, Public Affairs Officer of the Center, and Byron Jackson, tour manager for Trans World Airlines which conducts the program for the National Aeronautics and Space Administration. He was presented a color photograph of the Vehicle Assembly Building, the world's largest structure, signed by Dr. Kurt H. Debus, Center Director.

A school teacher in the Lansing public schools, Mr. Sepwerda was accompanied by his wife, Helen, also a teacher in Lansing, and their three children: Rae Ann,9; Brian, 7 and Jean, 4.

The Sepwerda family spent last night in Daytona Beach and stopped at the Space Center, on Merritt Island, Florida adjacent to U.S. Highway 1, for the escorted tour of the national Spaceport and Cape Kennedy.

They were enroute to Miami where they will fly to Jamaica to visit Mrs. Sepwerda's parents who are on missionary service.

- end -

2A-2, #31

KENNEDY SPACE CENTER, Fla. -- Visitors using the mail box at the NASA Kennedy Space Center get an extra bonus -- and proof of their visit to the Space Center -- as the sign on the box indicates.

Bill Schossler picks up 1,700 cards, a typical day's batch of mail left by the thousands of visitors taking advantage of the daily bus tours of the national Spaceport and Cape Kennedy.

Tours are conducted by Trans World Airlines.

Release No: KSC-160-66
For Release: Immediate

August 4, 1966
Please Credit KSC/NASA

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #31

RELEASE NO: KSC-161-66
FOR RELEASE: Immediate

August 5, 1966

TRAFFIC COUNT INCREASES

KENNEDY SPACE CENTER, Fla. -- Vehicular traffic entering and leaving via KSC access gates on Merritt Island has reached a new high of more than 30,000 daily.

A recent midweek count, which included access gates to the Cape Kennedy Air Force Station, tallied 39,948 vehicles of all types. Of that number, 16,420 entered or left the South Gate of the Air Force Station.

The NASA gate count was as follows:

Gate 2, via SR-3, South, 6,649

Gate 3, via U.S. 1, 10,651

Gate 4, via Titusville Causeway, 4,940

Gate 5, via SR-3, North, 1,288

The NASA Causeway over the Banana River connecting Cape Kennedy Air Force Station and the NASA installation carried 10,000 vehicles on the day of the count.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #31

RELEASE NO: KSC-159-66
FOR RELEASE: Immediate

August 9, 1966

NASA TOURS

KENNEDY SPACE CENTER, Fla. - - The nation's Spaceport--Kennedy Space Center--has been discovered by the public.

Practically overnight, America's gateway-to-the-moon has become a must for thousands of visitors to Florida.

Escorted bus tours began July 22. In the first two weeks 25,000 people toured the Space Center. Most also saw Cape Kennedy, launch site for manned Gemini flights as well as Surveyor, Tiros, Syncom and other unmanned space exploration missions.

The visitors' guest register at U.S. Highway 1, where tours begin, contains names and addresses from all 50 states and many foreign countries. Reaction has been overwhelmingly favorable.

- more -

The most impressive part of the tour for James Sanders of Crystal, Illinois, was the six-million pound Transporter and the Crawlerway. It is along this dual roadway, as wide as an eight-lane turnpike, that the huge Transporter will carry the 36-story-high Apollo/Saturn V space vehicle to its launch pad for the flight to the moon.

Space enthusiasts also view a full scale model of the Apollo/Saturn V, 364 feet tall. "It may never fly, but just seeing that rocket is a tremendous experience," said Herman Ruthenberg of Baltimore. "I've seen history in the making."

Mr. and Mrs. James Bell of Durham, N. C., liked the Vehicle Assembly Building best. This is the world's largest building in terms of volume--standing 52 stories high and containing 129 million cubic feet of space. Here the Apollo/Saturn V vehicles are assembled.

"The VAB was just fantastic," said Essie Hulburt of Hopewell, Virginia. "I'll recommend the tour to everyone back home."

The lady from Virginia summed up the reaction of most visitors.

Escorts report that children and adults alike are quiet and attentive during the tours which last one-and-a-half hours or three hours. "The people are extremely interested in the space program" said escort Richard Pack. "They want to learn everything they can about it."

Two questions which visitors ask most are "When will we go to the moon?" and "How do astronauts go to the bathroom?"

The answer to the first is "sometime before 1970."

Escorts have a frank reply for the second question. Astronauts use a relief tube for liquid waste. Solid waste is stored in a sealed plastic container.

Visitors ride in air conditioned buses operated by Trans World Airlines, under contract with the Space Center. Several photo stops are included in the tours. A running commentary explains facilities and operations.

To visitors, the astronauts are heroes. They seem to feel a personal warmth for these daring pilots who have made manned space flight a reality.

"What is Alan Shepard doing now?" asks a lady from Iowa. (He is still an astronaut.)

"Where is John Glenn?" a Washingtonian wants to know. (He is vice president of a soft drink firm and a NASA advisor.)

The people ask these and a thousand other questions. Escorts have the answers--or get them.

News of the bus tours has spread fast though the service has been operational less than a month.

Orville Elford and his wife included a stop at the Spaceport in their vacation plans before leaving Oshawa, Canada. So did the Robert Beyers of Huntington Valley, Pennsylvania, and Mr. and Mrs. William Carr of Fairfield, Connecticut.

Elford heard about the tours on television. Beyers read a story in his local newspaper. Carr saw an article in a magazine.

Traffic at Gate 3, jumping off point for the tours, resembles that in a large shopping center during rush hour. Campers share parking places with compacts and luxury cars. Casual clothes and walking shorts are most popular but more formal attire is also seen.

Most people bring the youngsters along. The reason is soon quite evident. "I want to be an astronaut," the kids quickly respond when asked why they have come to the Spaceport.

In the Display Building at Gate 3, throngs of tourists view models and displays of spacecraft, satellites, rockets and Spaceport facilities.

"The majority of the people are from out of state," reports TWA employee Charles Shaw, whose duties include announcing the arrival and departure of buses. Thousands of Floridians, from Key West to Tallahassee, also include Kennedy Space Center and Cape Kennedy on their list of things to see.

"The people are here before we open at 7:30 in the morning and ask for tickets after we close at 4:00 in the afternoon," said Shaw. "All of our escorts are busy. The buses are full. It looks like we are going to have to add more employees and more buses."

This, as well as anything, expresses the response of the public to the initiation of bus tours at NASA's Kennedy Space Center--America's gateway to the moon.

- end -

2A.2, #31

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-167-66
FOR RELEASE: Immediate

August 9, 1966

CONTRACTS AWARDED

KENNEDY SPACE CENTER, Fla. -- Contracts totaling more than $1,280,000 were awarded recently by NASA's John F. Kennedy Space Center for support of the Center's space activities.

Among the contract recipients was the Florida firm of Astro Cleaning & Packaging Corporation, 649 South Industrial Road, Cocoa. Under terms of the pact, the company will supply all necessary services and materials to hydrotest, clean and validate approximately 1,275 feet of gaseous nitrogen and approximately 1,150 feet of gaseous helium stainless steel distribution lines. The contract totaled $24,520.

The other contract awards were:

- more -

A $289,000 pact was awarded to Southern Research Institute, 2000 Ninth Avenue South, Birmingham, Alabama. The firm will provide the services for operational support of the Materials Analysis Branch Laboratories at the Space Center, including malfunction investigation, cross training and special operations.

The Arizona firm of Motorola, Incorporated, 8201 East McDowell Road, Scottsdale, will furnish command receivers and operational manuals under a $28,014 pact. The equipment will monitor command frequencies in support of the Apollo/Saturn lunar landing program.

Two California companies were awarded contracts. The largest award went to Astrodata, Incorporated, 240 East Palais Road, Anaheim, for a camera control timing and sequencing system which will be fabricated under a $123,730 contract.

Vacu-Blast Company, Incorporated, of Blemont, California, received an $18,201 pact for sandblast and spray painting equipment to be used by the maintenance department at the Spaceport.

A fault detector and recorder system will be supplied by Hathaway Instruments, Incorporated, 5250 East Evans Avenue, Denver, Colorado. Costing $115,271, the system will record electrical disturbances on the Spaceport's hi-voltage electrical distribution system.

Contracts totaling $36,400 were awarded to two Illinois companies. The first for $16,000 went to Sangamo Electric Company, Springfield, to provide non-personal services of one full time, factory trained service engineer over a period of one year. The pact also includes spare parts for company-manufactured equipment used at the Spaceport.

The second contract was awarded to American Cryogenics, Incorporated, O'Fallon, Illinois. The provisions of the $20,400 pact call for the firm to supply necessary labor, material and equipment for testing and rehabilitation of four tube banks of compressed gas cylinders that supply gaseous nitrogen and helium to Apollo/Saturn and Gemini facilities at the Spaceport and Cape Kennedy.

Two New Jersey firms also received contracts. Resistoflex Corporation, Woodland Road, Roseland, will supply various types of hose that will replenish stock used in manned space flight programs under a $299,958 contract.

Clark Brothers Company, 520 Westfield Avenue, Elizabeth, New Jersey, will fabricate four-inch vacuum diffusion pumping systems and a blower-mechanical pumping system for the maintenance of liquid oxygen and liquid hydrogen systems. The equipment,costing $20,440, will be located at Launch Pads A and B and Mobile launchers 1, 2 and 3 at the Spaceport.

More than $200,000 was awarded to two firms located in New York City. TNT Electronics Division of Theatre Network Television, Incorporated, was awarded a $186,084 pact to fabricate and install video projection equipment that will be used in large screen projection of real-time telemetry data in support of Apollo/Saturn projects. The firm is located at 575 Madison Avenue.

Infotran, Incorporated, 860 Fifth Avenue, New York, will conduct a study on multiplexing techniques for data transmission on equalized wideband circuits under a firm, fixed price contract amounting to $28,297.

Hobart Brothers Company, Troy, Ohio, will conduct a study under a $99,627 contract. The subject of the study will be development of automatic welding methods for field fabrication of critical launch support equipment. The purpose of the investigation is to improve reliability of critical Apollo project hardware.

The final pact was received by Texas Instruments, Incorporated, Houston, Texas. Under a $14,054 pact, the firm will provide spare parts for company-built strip chart recorders.

The Kennedy Space Center operates the nation's Spaceport at Merritt Island, Florida, and conducts major space launches from Cape Kennedy, including the current manned Gemini series.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #31

RELEASE NO: KSC-171-66
FOR RELEASE: Immediate

August 19, 1966

KSC EMPLOYEE'S INVENTION SAVES GOVERNMENT DOLLARS

KENNEDY SPACE CENTER, Fla. -- "I'm a firm believer in the simple way."

Herbert E. Cribb's simple modification of the helix antenna promises to improve spacecraft communications and save the government thousands of dollars.

Cribb, an electronic development technician who works for NASA's Kennedy Space Center, has applied for a patent to cover his invention. It is one of eight patent applications being processed for this "practical engineer."

The helix antenna, as Cribb explains it, is used in telemetry and microwave communications. A major NASA application for the helix is to send and receive data from orbiting spacecraft.

- more -

The NASA technician's primary job is to develop special electronic equipment for space applications. "The helix is an expensive piece of gear with high maintenance requirements," Cribb explains. "I had an idea about simplifying it."

NASA had been paying "about $1,000 on the average" for a helix before Cribb went to work. The Cribb-modified helix does the same job at a cost of about $18. As a bonus, the modified equipment resists salt corrosion.

The spiral-shaped helix is a high frequency directional antenna. The diameter, pitch and length of the helix determine the antenna's characteristics.

Previously, helix elements were formed from soft copper tubing. A special mandrel or die had to be machined for each configuration. Additionally, to weatherproof the copper tubing, it was silver-plated and painted.

Cribb's helix is made from commercially available weatherproof transmission line. Elements of the antenna are easily altered to vary frequency. Weatherproofing practically eliminates maintenance.

The modified helix antenna has wide application. Armed forces and communications networks around the world use this type equipment.

Cribb has been in electronics work for more than 20 years. He served as an electronics technician in both the Army and the Navy, later worked at the White Sands Missile Range before coming to KSC.

The father of two boys and two girls, Cribb and his wife live in Satellite Beach.

The KSC technician considers the helix development as "simply a part of my job."

As for the future, Herb Cribb has some ideas about simplifying other electronic equipment used in the space program. He's working on them now.

- end -

2A.2, #31

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-179-66
FOR RELEASE: Immediate

August 19, 1966

2,000 SPACEPORT VISITORS A DAY

KENNEDY SPACE CENTER, Fla. -- A daily average of 2,000 visitors was recorded in the first month of NASA Tours, the program by which the public is escorted through the Center seven days per week.

From July 22, when the tours began, through August 18, 56,348 persons toured in buses operated by Trans World Airlines, under contract with the National Aeronautics and Space Administration.

Tour operations are based at the Center's main entrance, just off US Highway 1, two miles south of Titusville, Florida. Buses operate between 8:00 A.M. and 3:30 P.M., or later if demand warrants.

- more -

The Center has revised the tour route frequently to cope with space launch operations, but on most days the visitor has an option to spend 90 minutes touring the national Spaceport or two hours and a half touring the Spaceport plus Cape Kennedy Air Force Station.

During the fourth week, visitors were permitted inside the Apollo astronauts' training facility. Here, they see the large simulator in which crews rehearse long duration flights in outer space.

They also view the interior of the giant Vehicle Assembly Building, world's largest in terms of volume, and a 364-foot tall Apollo/Saturn V rocket on the launch pad.

At Cape Kennedy they drive by the launch sites of Surveyor, Lunar Orbiter, Gemini and other internationally famous spacecraft.

- end -

2A.2,431

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-172-66
FOR RELEASE: Immediate

August 24, 1966

KSC EDUCATION OFFICER BRIEFED ON PLANETS

KENNEDY SPACE CENTER, Fla. - - Education officer Hal Mehrens of NASA's Kennedy Space Center has a funny story to tell about a six year old first grader.

Mehrens was visiting a Brevard classroom and the youngsters were giving a presentation on space.

They were using fruit for the planets -- a grapefruit for Jupiter, a grape for Mercury, and so on.

In the spot for the asteroid belt there was no fruit. The first grader went through his spiel, reeling off the names of the planets and pointing to the appropriate piece of fruit.

He failed to include the asteroid belt, and the teacher called his attention to this.

"Where is the asteroid belt?" she asked.

"I ate it," the lad replied without blinking an eyelid.

Mehrens nearly fell off his seat.

- end -

2A.2, #31

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-173-66
FOR RELEASE: Immediate

August 24, 1966

KSC RESCUE SQUADS STAND READY

KENNEDY SPACE CENTER - - On the average of once every 24 hours, a highly skilled team of professionals -- dedicated to the purpose of aiding anyone in trouble -- are called upon at NASA's Kennedy Space Center.

When a call comes in to this team, it may mean there's been a serious auto accident, or someone has capsized in a boat in the Banana River -- or any of a hundred other emergency situations.

Members of the KSC Fire Department's Rescue Squads must be ready to cope with just about anything.

"When we get an emergency call," cites NASA Fire Protection Officer Norris Gray, "two rescue men are immediately dispatched to the scene, and we send another truck behind them with four more men. We can be at any site on the Spaceport within minutes."

Gray and Fire Chief Bill Eldredge stressed the importance of close cooperation between the rescue squads, security patrolmen and medical personnel at the Center.

"If we receive a call first," Gray says, "we alert them, and they do the same for us if they are the first to be contacted."

Chief Eldredge pointed out that training is a big factor in the success of rescue work. Wackenhut employees go through a rigorous cycle of simulated exercises ranging from astronaut egress training at Launch Complex 39's Pad A

- more -

to drills using self-contained breathing units for entering toxic environments.

Training Officer Roy Terry has set up a realistic program that teaches Rescue/Fire Personnel how to rescue persons trapped in cars submerged in canals, and how to aid personnel at the top levels of launch service structures.

Tony Russo of TWA instructs rescue teams in first aid procedures. The training has paid handsome dividends.

When a fisherman capsized in the Banana River, security patrolmen and rescue/fire personnel teamed up to bring him in. The man couldn't swim.

The squads are on call 24 hours a day and stand ready to help their fellow KSC employees during any emergency -- be it on the launch pad, highway or the river.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2,#31

RELEASE NO: KSC-190-66
FOR RELEASE: August 31, 1966

CAPE TOURS ATTRACT FOREIGN TRAVELERS

KENNEDY SPACE CENTER, Fla. -- Guided bus tours of Cape Kennedy and the Kennedy Space Center have attracted foreign travelers as well as thousands of U. S. tourists.

Overseas visitors have availed themselves of the tours which were begun July 22 by the National Aeronautics and Space Administration.

From India, France, Japan, West Germany, Mexico, England, the Philippines, Central America, South America, and the Scandinavian countries, the visitors come to view the launch complexes that dot Cape Kennedy and the Spaceport here.

Most are family groups. Many of them say they had not yet heard about the newly-instituted tours in their countries. Once they get over their initial astonishment that tourists -- especially foreign visitors -- are permitted to see the facilities from which Americans will go to the moon, their enthusiasm matches or exceeds that of the domestic visitors.

They unsling their cameras to photograph the Mercury and Gemini launch pads; Nimbus, Tiros, Ranger, and Surveyor launch sites as well as the Vehicle Assembly Building and Launch Complex 39 where an Apollo/Saturn V vehicle -- the giant that will carry our astronauts to the moon -- sits on its pad near the Atlantic Ocean.

- more -

Many of the foreign visitors say that the tour of the space base was the high spot of their entire trip.

"This visit to Cape Kennedy and the Spaceport made our trip to America complete," said Mrs. Carlos Frost of Santiago, Chile.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #31

RELEASE NO: KSC-198-66
FOR RELEASE: Immediate

August 31, 1966

RUSSO NAMED DOCUMENTATION CHIEF

KENNEDY SPACE CENTER, Fla. -- James F. Russo, a 19-year career civil service veteran, has been named Chief of the Kennedy Space Center's Documentation Division.

The appointment was announced Wednesday by Keith T. O'Keefe, Director of Installation Support.

As Division Chief, Russo will have supervision of the Center's Publications, Photographic and Reproduction branches. This involves direction of approximately 37 civil service employees and monitoring more than 700 contractor personnel of Ling-Temco-Vought, Technicolor and McGregor Werner.

Russo has been with the original KSC launch team, led by Center Director, Dr. Kurt H. Debus, since March 1958, when the organization was then known as the Missile Firing Laboratory of the Army Ballistic Missile Agency.

A native of Trenton, New Jersey, Russo holds a BS degree in education from Teachers College in Trenton, and a master's degree in education from Rutgers University.

He also graduated from the U. S. Merchant Marine Academy, Engineering and Navigation School in January 1944, and served in the Navy until October 1945.

Following teaching positions at the elementary, high school and college levels, Russo began his civil service career at Ft. Monmonth, New Jersey, in 1948 as a military instructor.

He later became an electronic engineer and equipment specialist, a publications writer and a training officer at Ft. Monmonth, then was assigned to Ft. Huachuca, Arizona, as a Chief of a Technical Writing Branch.

In December 1956 he transferred to the Pentagon in Washington, D. C. as an administrative officer, and was subsequently promoted to an operations research officer before moving to Florida.

He joined the Debus team as Chief of the Publications and Editorial section. In July 1960 he was named Photographic Systems and Publications Chief, and prior to his new appointment, Russo was serving as Chief of the Kennedy Space Center's Administrative Services Office.

For the past several years he has been active in area civic affairs and is currently serving as chairman of the Brevard County district two

recreation board. He is also keenly interested in amateur athletic union swimming activities in the state, and formerly was closely involved with local boy scout programs.

Russo and his wife, Georgiana, live at 129 Bahama Boulevard, Cocoa Beach. They have five children: Jim, 15; Gigi, 14; Rosemary, 13; Donna, 10; and Richard, 6.

2A.2, #32

KSC

KENNEDY SPACE CENTER, FLORIDA

NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-174-66

FOR RELEASE: Immediate

September 1, 1966

KENNEDY SPACE CENTER LAUNCH EQUIPMENT SHOPS EMPLOY SKILLED CRAFTSMEN

KENNEDY SPACE CENTER, Fla. -- The skilled craftsmen in the KSC Launch Equipment Shop (LES) can do anything from machining a tiny bolt to modifying one of the big Saturn V holddown arms at Pad A.

"Our job," says Technical Shop Chief Jay T. Campbell, "is to provide support for launch vehicles and vehicle operations at the Spaceport and Cape Kennedy."

The shop's 458 employees complete an average of 700 jobs a month. A job may take one hour or 2,000 hours. It may require building a console for use in the Launch Control Center at Complex 39 or fabricating several hundred yards of special cable for Complex 34 on the Cape.

Campbell describes his operation as a complete "job shop" with four separate operations. The machine and electrical shop operations are located in the LES Building just south of the Vehicle Assembly Building. The electronics and mechanical shop operations are in Hangers D and R on the Cape.

- more -

The LES machine shop is one of the most modern in this part of the state. It houses more than 40 pieces of equipment including jig bore, boring mill, cylindrical grinder and hollow spindle lathe.

"In 1962 we had 950 feet of machine space," said Campbell. "Today we have a total of 45,000 square feet of machine space. This gives you an idea of how the operation has grown."

Machine shop workers have re-ground valve seats for a high pressure gas system to ten-thousands of an inch tolerance. They have also modified a helium receiver 20 feet in diameter and weighing several tons.

"The more challenging the project, the better we like it," Campbell added.

Teams from the four shop branches perform on-the-spot services for contractors at Complex 39 and at other NASA launch areas. This may mean welding a section of the cryogenics tubing system near the top of a mobile launcher or modifying an electronic panel on the side of the 364-foot-high facilities checkout vehicle at Pad A. A fear of heights is not recommended.

The Launch Equipment Shop is staffed by 35 Civil Service employees and a complement of 423 contractor personnel employed by the Bendix Corporation.

- end -

2A.2, #32

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-180-66
FOR RELEASE: Immediate

September 1, 1966

SECOND TRANSPORTER UNDERGOING TESTS AT KENNEDY SPACE CENTER

KENNEDY SPACE CENTER, Fla. -- The Kennedy Space Center's second transporter is undergoing final checkout tests in the Launch Complex 39 area, prior to NASA's acceptance.

This acceptance could come early this month, giving the Spaceport two operational transporters for hauling mobile launchers and Saturn V rockets between the Vehicle Assembly Building and the pad areas and for transporting the Mobile Service Structure from its parked position to the pad.

Mechanical and electrical installation on the three mobile launchers, meanwhile, is basically complete. Mobile Launcher Number One is virtually operational, Number Two is more than 90 percent complete mechanically and electrically, and Number Three is about 85 to 90 percent complete.

Mechanical and electrical equipment includes lighting, power, air conditioning, etc.

- more -

More work is required in the installation and checkout of mobile launcher ground support equipment. This includes such items as swing arms, pneumatic and hydraulic equipment.

- end -

2A.2, #32

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-181-66
FOR RELEASE: Immediate

September 1, 1966

KSC EMPLOYEE BOASTS OF THE ONE THAT "DIDN'T GET AWAY"

KENNEDY SPACE CENTER, Fla. -- Talk about fish stories!

KSC travel cashier Pauline Rudolph Muncrief has a whopper -- fish and story.

Seems she went fishing off Riveria Beach with her husband recently. She put her rod and reel down for a second to light a cigarette, and a fish struck at that instant.

Pauline grabbed for the rod, but it disappeared overboard before she could reach it.

The Captain shook his head and pointed sadly at a sign on the boat. It read, "rods and reels lost overboard -- $35."

Pauline felt like crying.

Then, her husband, Jim, jumped up.

"I've got a strike!"

- more -

He reeled in Pauline's rod and reel. It had gotten tangled up in his line. Then she began reeling in her line and was amazed to find that the fish which had started all the trouble was still on the end of it.

She boated a whopping 10-pound king mackeral.

"Lady, I'll give you $5 for that mackeral," a man said.

"You've just bought yourself a fish," Pauline answered, without hesitation.

Back at the dock the Captain was talking to some people.

"See that lady," she heard him say as she walked by. "She catches fish the hard way."

- end -

2A.2, #32

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-182-66
FOR RELEASE: Immediate

September 1, 1966

DESIGN CERTIFICATION REVIEW BOARD CONCERNED WITH ASTRONAUTS' SAFETY

KENNEDY SPACE CENTER, Fla. -- In March 1965, prior to the first manned Gemini launch, a distinguished panel of NASA and Air Force personnel met in Washington. Their purpose was to review the design of the Gemini spacecraft, launch vehicle and all items of support equipment and the tracking network which could be termed critical to the safety of the Gemini astronauts.

This was the first meeting of the Gemini Design Certification Review Board.

During this initial meeting, all elements of the Gemini 3 were declared ready for manned flight. Since that time, the board has met before each manned flight in which major new elements of flight or ground hardware were introduced.

New flight suits have been used to support the different EVA assignments, spacecraft power supplies have differed depending on the duration of the mission, and other pieces of hardware have changed to meet different mission objectives.

- more -

The design of each of these new elements has had to pass the rigid safety requirements of the Design Review Certification Board.

To date, the Board has met four times.

Chairman of the Board is Associate NASA Administrator for Manned Space Flight, Dr. George E. Mueller. Other NASA representatives are Dr. Kurt H. Debus, Director of Kennedy Space Center; Dr. Robert R. Gilruth, Director of the Manned Spacecraft Center; and Dr. Wernher von Braun, Director of Marshall Space Flight Center.

Representing the Air Force is Brigadier General Harry L. Evans.

Assisting the Board are numerous technical specialists from contractor organizations and NASA Centers who give detailed presentations to the Board on all new systems.

Before the first manned Apollo mission, scheduled for early next year, a new Design Certification Review Board will be formed.

Drawing on the knowledge and experience gained from Gemini, this board will continue the task of certifying the design of all new systems used in manned space flights.

- end -

2A.2, #32

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-183-66
FOR RELEASE: Immediate

September 1, 1966

COMPLEX 39 PAD "TURNAROUND"
NO PROBLEM SAYS KSC VETERAN

KENNEDY SPACE CENTER, Fla. -- Pad "turnaround" time at Launch Complex 39 should be no problem to Saturn V flight schedules, according to Bob Moser of KSC's Test and Operations Management Office.

Turnaround refers to the time and effort required to refurbish a pad following a launch.

"Essentially, the pad area is very clean, "Moser said, "and the refurbishing work done there shouldn't take long at all."

The Apollo/Saturn V vehicle will generate 7.5 million pounds of thrust during launch -- five times that of the Saturn I.

"Our current predictions are for six weeks of refurbishing on the mobile launchers," Moser continued. "Of course this will be subject to a number of factors. Wind direction, for instance, plays an important part in how much fire and blast damage occurs on a launch."

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"Also, we expect to cut down this cleaning up period as we get into the Saturn V 500 series. After the first Saturn I flight, it took two months to turnaround. We worked that down, through a learning curve after several missions, to where we can launch one day and put up another booster the next if we need to.

Moser pointed out, however, that such a quick turnaround is not called for in the present Saturn V schedule.

- end -

2A.2, #32

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-184-66
FOR RELEASE: Immediate

September 1, 1966

DANIEL BLAND TRAINS ASTRONAUTS IN APOLLO MISSION SIMULATOR AT KSC

KENNEDY SPACE CENTER, Fla. -- Daniel A. Bland, Jr. of Raleigh has leaped from the North Carolina State University campus right into an important role in the nation's moon project.

He is training astronauts for their voyage to the Moon.

Bland instructs the astronauts in the use of an Apollo mission simulator which simulates, here on earth, many of the conditions the spacemen will encounter on their voyage to the Moon.

He also trains personnel to operate the big instrument consoles that help "track" the astronauts as they fly the mission simulator.

Bland, 22, gained his bachelor of science degree in aerospace engineering at North Carolina State last June and joined NASA on July 5. He was assigned to KSC's Flight Crew Operations Branch.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #32

RELEASE NO: KSC-185-66
FOR RELEASE: Immediate

September 1, 1966

KSC OFFICIALS-CONTRACTOR REPRESENTATIVES DISCUSS NEW COST REDUCTION METHODS

KENNEDY SPACE CENTER, Fla. -- Hard cash savings--they can and are being achieved at the Kennedy Space Center.

This was the consensus at a recent meeting between NASA and contractor representatives at the KSC Headquarters Building.

The purpose of the meeting, called by KSC cost reduction officer Tom Hammond, was to exchange ideas which will further increase savings by both NASA and contractors.

Those at the meeting found they had much in common. They agreed that continued employee motivation is the biggest single factor in a successful cost reduction program. There was also accord in the belief that constant impetus by top management is a "must" in keeping employee motivation high.

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William A. Carter of North American Aviation, Inc., suggested finding a way to account for savings that cut across NASA-contractor lines. Hammond said that the suggestion would be considered.

He noted that many of the contractors made good use of the same ideas and programs. In the exchange of information at the meeting, most representatives said they had learned something new.

Among the awards tended by contractors for reducing costs are cash and savings bonds, letters of commendation, engraved plaques and recognition in company publications.

Here are some of the ideas and programs being implemented by contractor representatives:

John Tanner, LTV Range Systems Division: A two-week work simplification program for all supervisory personnel was beneficial.

James Lynn, Boeing Co: A plan to combine the zero defects, cost improvement, and suggestion programs looks promising.

John A. Mazza, Convair Division of General Dynamics Corp: The practice of explaining cost reduction in various work areas brought good results. From a work force of 600 persons, 120 suggestions were submitted in a period of a month and a half.

Robert I. Griffis, TWA: Tight organization pays off, as does presenting cost reduction packages to all new employees.

L. J. Cervellino, Grumman Aircraft Engineering Co., and Wallace E. Bailey, General Electric Co: Subcontractors are included in cost reduction programs.

Contractor representatives at the meeting included Rupert F. Parks, McDonnell Aircraft; Lloyd C. Wright, Dow Chemical Co.; George W. Gaudy, Chrysler Corp.; Carson E. Baldwin, Aeroject-General Corp.; and James D. Taylor of Boeing.

- end -

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KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-186-66
FOR RELEASE: Immediate

September 1, 1966

EARLY MORNING WORKOUTS RELAX KSC'S R. P. DODD

KENNEDY SPACE CENTER, Fla. -- The 47-year-old engineer ran the last lap of his daily workout and left the beach to prepare for another kind of endurance test--the 40-minute bumper-to-bumper ride to KSC.

R. P. Dodd, Chief of the Civil Engineering Division, said that his early morning workouts relax him and "help take the edge off of things during the day." He added that he usually walks for 20 minutes and runs for at least 10 minutes, between 5:30 and 6 a.m.

A glance at Dodd's varied and busy schedule may account for his self-styled physical fitness program. He and his 35-man staff may be called upon to investigate everything from a seemingly bottomless hole in a Spaceport roadway to a possible structural deficiency in a work platform in one of the four high bays in the Vehicle Assembly Building.

- more -

Specifically, the Civil Engineering Division provides technical consultation on design, development, construction, testing and modification for civil engineering-related projects at the Space Center. The unit also advises the NASA Facilities Engineering Manager and the Design Engineering Directorate.

The native Bostonian is no stranger to the space field, having worked for the Army Ballistic Missile Agency both at the Redstone Arsenal in Huntsville, Ala. and at Cape Canaveral during the early 1950's.

He worked on the Redstone missile's electrical system and later specialized in facilities, an area in which Dodd has concentrated since the middle 1950's.

He first came to the South during World War II and was stationed with the Army at Fort Benning, Georgia. During the war he married the former Peggy Shands of Columbus, Georgia. Following World War II he entered Auburn University and used to commute about 35 miles each day from Columbus to Auburn, Alabama, and he's been commuting to work ever since that time.

After receiving his bachelor's degree in electrical engineering in 1949, he worked two years with the Tennessee Valley Authority, undergoing his training at Wilson Dam in Alabama. His electrical engineering work with TVA brought him into contact with the "missile people" at Huntsville, and he decided to enter this new field.

Dodd transferred to Cape Canaveral with the ABMA complement in 1954 and branched off into facilities about a year later.

He noted that support facilities have come a long way here at the Spaceport since the Redstone days and said he and his department must keep up on all new structural innovations.

Last May Dodd and his wife toured Europe by car for 18 days, visiting a nephew stationed with the Army in Germany. The trio stopped off in several countries and Dodd related they saw considerably more by "roughing it."

Commenting on life in Florida, Dodd said he wouldn't trade living in the Sunshine State to move to any other part of the U.S.A. He attributes this in part to the fact that his 18-year-old son Richard is a devoted surfer and lifeguard during the summer in between semesters at the University of South Florida.

A veteran in the space field, Dodd said his Civil Engineering Division is a team effort, with everyone doing his share to further this nation's space program.

- end -

2A.2,#32

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-187-66
FOR RELEASE: Immediate

September 1, 1966

HISTORICAL EXHIBIT LINKS SPACEPORT TO PAST

KENNEDY SPACE CENTER, Fla. -- The first missile launches at the Kennedy Space Center occurred more than 3,000 years ago!

They were the flint arrowheads used by primitive Indians to kill wildlife.

History, it seems, has always been in the making on the Merritt Island property where NASA's Spaceport is now located.

As an educational feature for KSC and contractor employees, NASA has set up an interesting historical exhibit in the lobby of the Center's Headquarters Building.

The paneled display features important artifacts found on Spaceport property that link the area to its rich past. Many of the items have been loaned to KSC from former residents and pioneer citizens on Merritt Island.

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One of the most interesting features is a fine collection of Indian flint arrowheads. Archeologists estimate the first Indians to inhabit this region lived before the year 1,000 BC.

Some pre-historic Indian sites are composed of mounds called "middens," or veritable islands of clamshells -- mealtime refuse piles from that long ago era.

Another feature of the exhibit is clay pottery, and tools made from shells. The earliest pottery was made by Indians here around the year 1,000 BC -- a time which is referred to as the Orange Period.

Spaceport sites dating to this era are not numerous. One is in the Launch Complex 39 area near Pad A and others are scattered along the shores of the Banana River.

This period lasted for about 1,000 years and evolved into the St. John's Period, during which burial mounds came into being. Several such large mounds are at the northernmost boundaries of the Center near Oak Hill. One site is 25 feet high, 150 feet in diameter and is full of skeletons at varying levels of depth.

Archeologists contend Indians thrived in this region from the year 1 to 800 AD. Later, they devised new pottery techniques, incorporating "check stamp" patterns on their work. Several examples of this type pottery are included in the display.

The first recorded arrival of white men in the area was in 1513 when Ponce de Leon reportedly cruised by the mouth of the St. Johns River and then came back to Cape Kennedy and anchored offshore.

There are a number of artifacts of 16th and 17th century Spanish origin in the exhibit. Included are silver pieces of eight, bronze pins, hinges, spikes and handles, a square wooden block from a galleon, ballast stones from Spanish ships, a silver cup and the gold framework of a goblet.

Of equal interest is an array of old bottles, some barnacle encrusted, of various sizes and shapes belonging to bygone eras.

There is also a brown gallon jug that might have come from one of the area's once booming sugar mills. The ruins of one 18th century English sugar mill have been located at a site on the Spaceport a few miles north of the Vehicle Assembly Building.

All that remains of it today is a six foot high wall-like structure. It was constructed of small slabs of broken stone held together by crude mortar. Crumbled brick ruins lie nearby, and most of the area is well concealed under centuries of foilage growth. Historians believe this mill was built between 1763 and 1783.

Today, every major activity at the Kennedy Space Center is documented in headlines around the world. But, as the exhibit proves, history at the Spaceport far pre-dates the space age.

Meanwhile, NASA has taken steps to insure that these sites are protected, and will not be destroyed in the path of progress.

- end -

2A,2, #32

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-188-66
FOR RELEASE: Immediate

September 2, 1966

13TH SATURN LAUNCH NO JINX

KENNEDY SPACE CENTER, Fla. -- Last week's 202 flight was the 13th here for a Saturn vehicle.

Was anyone superstitious in the launch control center?

Dr. Hans Gruene, Launch Vehicle Operations Director, reminded Launch Operations Director Rocco Petrone moments before scheduled liftoff that this was the 13th Saturn.

"I know it's the 13th, and you know it," Petrone answered, "but thank goodness the vehicle doesn't know it!"

- end -

2A.2, #33

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-189-66
FOR RELEASE: Immediate

September 2, 1966

KSC TOURISTS AN INQUISITIVE LOT

KENNEDY SPACE CENTER, Fla. -- Visitors taking the KSC bus tours -- more than 2,000 per day -- are an inquisitive lot.

The two most frequently asked questions are: "When will we go to the Moon?" and "How do astronauts go to the bathroom?"

The answer to the first is "sometime before 1970."

Escorts have a frank reply for the second question. Astronauts use a relief tube for liquid waste. Solid waste is stored in a sealed plastic container.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2,#33

RELEASE NO: KSC-199-66
FOR RELEASE: Immediate

September 8, 1966

LUNAR MODULE MOCKUP COMPLETES FIRST TESTS

KENNEDY SPACE CENTER, Fla. -- A mockup of the Lunar Module which will land American astronauts on the moon has successfully completed its first checkout tests at the Kennedy Space Center.

Its recent arrival here precedes that of the first flight Lunar Module Test Article which is expected to arrive in mid-September. Designated LTA-10R, it is scheduled to fly on the first Saturn V next year.

The mockup, called a Facility Verification Vehicle (FVV), was shipped to the Center by the Grumman Aircraft Engineering Corporation, Bethpage, New York, which is building the Lunar Module for the National Aeronautics and Space Administrations' Manned Spacecraft Center in Houston, Texas.

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The FVV is made of wood and metal and is about the same size and shape as the actual flight vehicle. Its main function is to assure compatability of the spacecraft with Kennedy Space Center checkout facilities.

It consists of a descent stage for descending to the lunar surface and an ascent stage in which the astronauts will leave the moon and return to their orbiting Apollo spacecraft. Mating of the mockup's ascent and descent stages, and landing gear checkouts have been completed at the Kennedy Space Center.

- end -

2H.2, #33

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-195-66
FOR RELEASE: Immediate

September 9, 1966

TOUR VISITORS SEE ASTRONAUTS' TRAINING SITE

KENNEDY SPACE CENTER, Fla. -- Opportunity to view the Gemini astronauts' training devices, operated by NASA's Manned Spacecraft Center here, is being provided to patrons of the NASA escorted bus tours.

Bus tours are conducted daily, every day in the week, from the main KSC entrance off US Highway 1, two miles south of Titusville. Scheduled hours are from 8 A.M. to 4 P.M.

A mock Gemini spacecraft and an Agena Target Vehicle can be seen from a glass-walled balcony. These are utilized by Gemini crews for rehearsing docking maneuvers they are scheduled to perform during their missions.

Later, a simulator will also be installed on the Lunar Module, the spacecraft in which the crew selected for the exploration of the Moon will descend to its surface and then return to rendezvous and dock with the Apollo spacecraft orbiting about the Moon.

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Other tour stops include the Vehicle Assembly Building, Pad A of Complex 39 where the visitor can see a fully assembled Apollo/Saturn V rocket 365 feet tall, and points on Cape Kennedy Air Force Station.

- end -

2A.2, #33

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-201-66
FOR RELEASE: Immediate

September 15, 1966

KSC'S MORGAN JONES SUPERVISES TRANSPORTER OPERATIONS

KENNEDY SPACE CENTER, Fla. -- A man who does not particularly care to do jigsaw puzzles has helped supervise assembly of two of the nation's most complicated and important pieces of machinery--the huge transporters that will carry Saturn V rockets from the Vehicle Assembly Building to the launch pads.

Morgan Jones, former chief of the Transporter Section under the Kennedy Space Center's Launcher-Transporter Systems Branch, was involved in all phases of design, awarding of contracts, construction and testing of what has been called one of the most important pre-launch links in the Apollo program.

What is the personal feeling attached with overseeing the endless, often frustrating details of assembling this all-important facet of NASA's Apollo program?

- more -

Jones summed it up when he commented on the recent roll-out of the Saturn V test vehicle from the VAB to Pad A. "It marked the beginning of a new era, giving one both a definite feeling of personal satisfaction while filling him with awe."

The impressive statistics of the six-million-pound transporters speak for themselves, but there also is a human factor which should be noted, Jones pointed out. Hundreds of persons, working in cities throughout the United States, provided the technical know-how which eventually took the transporters from the drawing boards to the Kennedy Space Center.

There is an axiom that the larger the piece of machinery the greater the possibility of something's going wrong. And the transporter is no exception. Jones said that while both transporters are functioning properly, he still receives calls reporting problems ranging from minor lubrication jobs to more involved maintenance situations. "Anyone who has ever taken his car's engine apart can appreciate the feeling that accompanies making those so-called minor repairs," he added.

Between 1962 and 1965 the Kennedy Space Center transporter section was based at Huntsville, Ala., and Jones shuttled between there and Marion, Ohio, where Marion Power Shovel Company fabricated the transporters.

Commenting on the logistics of transferring a six-million-pound vehicle piecemeal more than 1,100 miles during a six-month period, Jones said that everything arrived in an orderly fashion and crews were able to fit the pieces together in much the same way a prefabricated house is assembled.

Transporter Number One underwent its rigid testing programs about one year after the first parts arrived at the Space Center. Personnel subjected it to a number of working conditions both at its parking area adjacent to the VAB and along the specially-built roadway leading to the launch pads.

Jones said the transporter underwent fit checks with one of the three mobile launchers, the service structure and eventually the Saturn V test vehicle which it successfully carried to the launch pad last May. Transporter Number Two is nearly completed and is expected to be accepted by NASA in the near future.

"We learned a tremendous amount from the early testing, knowledge which we have later applied to making the second transporter run more smoothly," Jones noted.

A native of Hammond, Louisiana, he worked in the structures laboratory with the National Advisory Committee for Aeronautics, the forerunner to NASA, in 1942 at Langley Field, Va., following graduation from high school. After attending college for two months, he enlisted in the Army Air Corps and flew light reconnaissance aircraft in the Pacific. He had received his private pilot's license at 18 before entering the service.

Jones, who has a pleasant voice and pleasing personality, was a radio announcer in Jackson, Miss., following three years with the Air Corps and entered that state's university in 1949. He received a civil engineering degree in 1952, having concentrated in structural design courses.

Before joining NASA in 1962 he worked as a structural engineer for several space-related companies and also perfected prefabricated porcelainized buildings which are used by major oil companies for their service stations.

In his new position as Deputy Chief for the Area Integration Branch at the Space Center, the 42-year-old engineer is responsible for overseeing all major ground support equipment at Launch Complex 39, including the two transporters, mobile launchers and pad facilities.

Jones is married to the former Jean Lewis Boggan of Memphis, Tenn.,and the couple has four children.

When not preoccupied with the transporters, Jones enjoys refinishing antique furniture at his Titusville home.

As the man in charge of the transporters Jones has probably received more kidding about his vehicles than any other man. When asked what is the most common remark, Jones said: "It'll never get off the ground."

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #33

RELEASE NO: KSC-202-66
FOR RELEASE: Immediate

September 15, 1966

TRANSPORTER'S LEVELING SYSTEM BALANCES LOADS PRECISELY

KENNEDY SPACE CENTER, Fla. -- Balancing a 12-million-pound load of any kind calls for precise engineering.

When that load is a 46-story-high Mobile Launcher and an Apollo/Saturn V space vehicle--perched atop a moving Transporter--the job is truly awesome.

The Transporter weighs some five million pounds and has more topside room than a baseball infield. It carries the Mobile Launcher and Apollo/Saturn V from the Vehicle Assembly Building to the lunar launch pad.

The Transporter also moves the 40-story, nine-million-pound Mobile Service Structure to and from the launch pad. These are slow paced journeys which may begin in the morning and end after dark.

- more -

During a move, several factors combine to throw the Transporter's cargo off balance: The motion of the Transporter, the height and weight of the load, variance in the grade level of the Crawlerway, wind, and other factors.

The Transporter's crew must keep a skyscraper load level despite these variables. The job is, in effect, a kind of Space Age ballet requiring perfect coordination between men and machinery.

The leveling system on the Transporter is keyed to two manometers, or pressure measuring devices, located just under the topside deck. The manometers are mercury-filled tubes, each about 135 feet long.

They stretch diagonally from corner to corner across the Transporter, crisscrossing like a large X.

Changes in the level of the Transporter's load create a pressure which is sensed by the manometers. The JEL (for jacking, equalization, leveling) engineer notes changes in pressure and keeps the load level by raising or lowering any of the Transporter's four corners.

He does this through the use of up-down controls which activate a hydraulic servo system. The servo system lifts or lowers any corner of the Transporter, thus keeping the load level.

In addition to up-and-down leveling, JEL engineer Jerry Soper of Bendix Corporation corrects for twisting forces on the bed of the Transporter. A second set of manometers, which intersect those used for leveling, measure these forces.

"One-half inch" is an important measurement for Soper. If the Transporter chassis is out of level as little as one-half inch, the engineer takes corrective action. During a move from the VAB to the launch pad, he may make hundreds of corrections.

"A major problem is gusty winds which tend to throw the load off balance," said Bruce Dunmyer, Bendix supervisory engineer for the Transporter. "When this happens, decisions by the JEL engineer become critical. He must make the right decisions, to adjust level, and make them quickly."

If there is a serious malfunction such as a ruptured hydraulic line, the load is automatically locked in place before it becomes imbalanced. Additionally, the Transporter is equipped with duplicate operating systems. Should a component of one system fail for any reason, the backup system is available.

The guages for indicating level and twisting forces are located in the Transporter's instrument-filled control room. Here, also, are displayed other important measurements such as JEL cylinder pressures, voltage and current levels, and engine speeds. The control room is the operations center for the Transporter.

The interior of this mammouth tracked vehicle--a maze of steel, motors, pipes and hydraulic fluid lines--resembles that of a large ship. Like a ship it is a complex product of precision engineering, and can be operated only by a skilled, highly trained crew.

The crew of the Transporter ranges from 15 to 19 men, depending on weather and other operating conditions.

"We spend a lot of time cross-training," reports Dunmyer. "Our men must be able to do several jobs. Cross-training is our insurance against an unscheduled delay which would hold up a launch."

There are two Transporters. Transporter Number 1 has been accepted by NASA and is currently being used to check out Saturn hardware. Marion Power Shovel Company, prime contractor for the Transporters, has virtually completed work on Transporter Number 2.

A Bendix Corporation crew will operate both Transporters for NASA.

- end -

2A.2,#33

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-203-66
FOR RELEASE: Immediate

September 15, 1966

AUDIO-VIDEO COMMUNICATIONS SYSTEM LINKS NASA CENTERS

KENNEDY SPACE CENTER, Fla. -- A sophisticated communications system called LIEF allows a rapid exchange of information between the Kennedy Space Center and the Marshall Space Flight Center.

Using the Launch Information Exchange Facility, NASA and contractor personnel at Huntsville (Ala.) monitor Saturn launches in "real time"--as they occur.

LIEF incorporates several forms of communication including voice, teletype, fascimile, one-way television transmission to Huntsville, real time relay of launch and booster information, and a computer tape data exchange.

- more -

The terminal facility for LIEF is the Huntsville Operations Support Center. There, via television, MSFC personnel view launch activity at Complexes 34 and 37. LIEF is being incorporated in the Launch Control Center at Complex 39.

A computer-to-computer hookup provides a visual display of Saturn measurements--pressures, temperatures, flow rates, etc.--at Huntsville. Design engineers at MSFC can "call up" specific measurements from the real time computer at KSC.

From his blockhouse console, LIEF communicator Marv Williams maintains contact with the Huntsville Operations Support Center. Williams "patches" voice conversations between KSC and Huntsville personnel, routes requests for special information, selects the operational TV cameras which transmit to Huntsville, and provides status reports of test progress.

Acting as LIEF communicator is one of many assignments for Williams, Chief of the Requirements and Technical Support Branch, Launch Vehicle Operations.

Members of his staff provide back-up support as LIEF communicators and assist in coordinating test schedules between KSC and MSFC.

The LIEF computer tape data exchange, located in the Central Instrumentation Facility, is operated under the direction of Dr. Rudolf H. Bruns. Operators use this facility to draw on the bank of data in computers at the Spaceport and Huntsville.

Prior to a Saturn launch, the tape data exchange relays weather information from KSC and the Eastern Test Range to Huntsville. Using this data, MSFC personnel conduct wind simulation missions to determine whether winds exceed the structural limits of the launch vehicle. If wind speeds are too high, the mission is rescheduled.

Another important link in LIEF, located in the CIF, is the real time computer. By providing a visual readout of Saturn measurements, this computer tells design engineers in Huntsville how a launch vehicle is performing. The real time computer operation at KSC is directed by Pete Minderman.

Fascimile and teletype equipment for LIEF is in the KSC Headquarters Building communication center.

- end -

2A.2, #33

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-204-66
FOR RELEASE: Immediate

September 15, 1966

ACCURATE WEATHER FORECASTING
A MUST FOR ROCKET LAUNCHES

KENNEDY SPACE CENTER, Fla. -- From his fourth floor office in the Kennedy Space Center's Manned Spacecraft Operations Building, Ernie Amman can see two-thirds of the south Merritt Island horizon in a panoramic view that includes Launch Complex 39.

As KSC staff meteorologist, Amman's office prepares all the forecasts for the area and advises mission officials of the weather in the launch zone as well as weather conditions in recovery areas throughout the world in the case of manned flights.

Lightning, thunderstorms, winds and tropical storms present the greatest danger. During this time of year, tropical storms form in the Atlantic and must be closely watched.

The KSC office is a branch of the Weather Bureau and thus constantly receives the latest information available through Washington.

- more -

"The greatest bugaboo," said Amman recently, "is lightning. We can't really protect from lightning, only try to ground it. When the service structures are rolled back, and the space vehicle is left standing alone, that is the time of greatest danger.

"It doesn't have to be a direct hit to cause damage. Lightning causes surges in power and raises havoc with electronic circuits. There are occasional cases of lightning-induced damage at the pads."

Lightning also poses a danger to those working on service structures.

"If lightning strikes within five miles, the safety rule is to clear the service structure. There are gradient devices on each pad for measuring potential lightning," he said. Because of his view from the MSOB, Amman can visually assess the storm situation and advise the pads by telephone.

Wind gusts are another big worry when the service structures are pulled back. While winds, both ground and aloft, can be a factor affecting launches, Amman pointed out that no manned launch ever has been postponed by winds. However, several unmanned flights have been delayed due to wind conditions.

Wind tolerances of the various configurations vary from vehicle to vehicle. For instance, Amman said, the maximum tolerance for a Gemini manned shot at release time is 35 knots, while for the Uprated Saturn it is 28 knots, depending upon the configuration.

The ground rule, according to Amman, is that if the wind reaches its maximum tolerances during the last 15 minutes before the countdown goes on automatic sequence, the count is recycled.

During this time of year, winds aloft, between 25,000 and 40,000 feet, pose no danger, but during February and March the jet stream shifts southward putting its trough between here and Jacksonville.

"This is a belt of maximum winds perhaps 10 miles wide and extending 150 to 200 miles upward," said Amman. "Jet stream winds are critical when they are 150 to 200 knots. During February, they average about 100 knots. However, the critical maximum aloft for Gemini is 250 knots and about 100 knots for the Uprated Saturn.

"These high winds could place undue pressure on a vehicle which is attempting to fly a true course and cause it to crab in flight. There also is a danger of putting pressure on the nose of the vehicle which could cause it to shake apart.

"It is generally believed that this happened to MA-1, which flew in July of 1960," recalled Amman. "It carried a boilerplate of a Mercury spacecraft. The vehicle went through a wind storm, was lost in clouds and apparently shook apart at about 10,000 feet."

Weather balloons are sent up by Pan American from the Cape to check winds. RCA, using radar, tracks the balloons up to 100 miles. The information is computated by Information Systems almost instantaneously.

- end -

2A.2, #33

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-206-66
FOR RELEASE: Immediate

September 15, 1966

LATIN AMERICAN OFFICIALS VISIT KSC

KENNEDY SPACE CENTER, Fla. -- Ministers of Agriculture of a number of Central and South American countries are touring the Kennedy Space Center today as guests of Center Director, Dr. Kurt H. Debus.

The delegates have been meeting at a Latin American conference in Miami. They will view major KSC facilities, including the Vehicle Assembly Building area, and will be briefed on Center operations.

Among the dignitaries are delegates from the following countries: Argentina, Bolivia, Brazil, Chile, Colombia, Costa Rica, Dominican Republic, Ecuador, El Salvador, Guatemala, Haiti, Honduras, Mexico, Nicaragua, Panama, Paraguay, Peru, Uruguay and Venezuela.

- end -

2A.2, #33

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-208-66
FOR RELEASE: Immediate

September 15, 1966

VIBRATION AND ACOUSTICAL LABS LISTEN TO SATURNS' "FOOTSTEPS"

KENNEDY SPACE CENTER, Fla. -- Pulsating lights, oscillitating oscilloscopes, and the wildest sound this side of the "far out" greet visitors entering either the Vibration Analysis Lab or the Acoustical Analysis Lab in the Central Instrumentation Facility at Kennedy Space Center.

"Our output and efforts here represent the end result of the Measurement Systems Division's work in the area of ground and environmental measurements," explained Wilson Timmons, Chief of the Wave Analysis Section, who has charge of these two labs.

"In essence we are the final link between the division and the design and planning elements of Design Engineering, Spacecraft Operations and Launch Vehicle Operations, providing them with an analysis of the vibrations and sound pressure levels recorded at every Saturn Launch.

- more -

"It is most important to these design people," continued Timmons, "that we define and break down the ground and environmental noises of a launch. Such information enables them to confirm design requirements and to project the sound pressure level that vehicles on the drawing board will generate, and, if need be, to alter these designs accordingly."

Before the data can be analized it must be recorded on magnetic tape. This is done by other sections in Measurement Systems which set up the necessary equipment.

In the case of finding the sound pressure level and its distribution, microphones are strategically placed around the Space Center as well as in the surrounding towns. On the Saturn 202 launch, 20 stations were used, some with "mikes" as close as 20 to 30 feet from the pad and others as far away as the First Federal Building in Cocoa Beach.

Vibrations, on the other hand, are measured by accelerometers which are placed around the launch tower and inside the Automatic Ground Checkout Station.

Connected by hardline to tape machines, the accelerometers measure the "G" forces present during a launch.

"The tapes are returned to the labs where they are played back through our systems providing us with results that we compile into reports for dissemination to the requestors," said Timmons.

Technical services in the two labs are performed by Federal Electric personnel, under a NASA contract.

Timmons has been with Measurement Systems for three years. Prior to this, he was with Pratt & Whitney Aircraft in West Palm Beach as a senior experimental engineer. A graduate of the University of Florida in electrical engineering, he resides with his wife and four boys in Lake Pointsette.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #33

RELEASE NO: KSC-209-66
FOR RELEASE: Immediate

September 15, 1966

SECOND SURVEYOR, ESSA WEATHER SATELLITE SET FOR LAUNCH

KENNEDY SPACE CENTER, Fla. -- The Kennedy Space Center's Unmanned Launch Operations personnel have a busy few days ahead of them. Plans at presstime called for two major ULO launches, one on each coast of the United States, over a two-day span.

A second Surveyor spacecraft is atop its Atlas-Centaur vehicle at Complex 36B, ticketed for a lunar bound flight next Tuesday. A day later an ESSA weather satellite is set to be orbited via a Delta from KSC facilities at the Western Test Range in California.

"It will be a real busy time for us," explained John Neilon, Deputy ULO Director.

"This will be our first Delta launch from WTR," Neilon said. "Previous missions there have called for the Thor-Agena, but the pad has been modified to handle Delta, also. This establishes a polar orbit capability for Delta from the west coast."

- more -

ULO and Douglas employees -- veterans of numerous successful Delta flights from the Cape -- have been helping to set up operations at WTR for this initial launching there.

Either Neilon or ULO Director Robert H. Gray will serve as launch director, depending on how the Surveyor flight goes. Charles Hines will be test controller and T. A. Eastland will serve as mission coordinator. Larry Lebanoff is Delta operations chief at WTR.

Gray will be launch director for the Surveyor mission and John Gossett will be assistant launch director. Test controller is Dick Mazurkiewicz. The Atlas-Centaur's job is to put Surveyor on a precise course for a soft landing on the moon's surface following a flight of 61 to 65 hours.

Cameras aboard the spacecraft will take closeup photos of lunar features. Surveyor I, launched earlier this year, was an outstanding success, and transmitted back to earth much information useful to Project Apollo planners. The spacecraft landed on target after a highly successful launching that put it into an extremely accurate trajectory enroute to the moon.

ESSA is a weather satellite, and will photograph Earth cloud covers and transmit the pictures to ground stations around the world.

- end -

2A.2, #34

KSC news release

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-210-66
FOR RELEASE: Immediate

September 16, 1966

GROUPS ALLOWED DISCOUNT ON NASA TOURS

KENNEDY SPACE CENTER, Fla. -- A 25 percent discount for groups of 20 or more visitors traveling in charter buses who tour the Center was announced today.

NASA inaugurated a program of daily bus tours July 22, open to the public, which are conducted by Trans World Airlines as the contractor. Fee charged for the escorted tours range from 50 cents for children to $2.50 for adults who travel 60 miles through Cape Kennedy Air Force Station and the NASA Spaceport on adjacent Merritt Island.

A shorter tour, of 1 1/2 hours, covers the Spaceport and adults pay $1.75 for this option. Fees for children and teen-agers are the same for both tours. Air-conditioned buses equipped with public address systems are utilized by TWA.

- more -

In the case of charter buses, TWA will provide an escort who will conduct the tour. Portable equipment is placed on the charter bus so that patrons hear the same commentary as that provided to those touring in the TWA operated vehicles.

The tours give visitors an opportunity to see the launch sites of the Mercury and Gemini manned flights, those from which the three-man Apollo astronauts will be launched next year, and the facilities constructed by NASA for launching astronauts to the Moon.

A special rate of $1 is available for student groups accompanied by teachers who receive the tour plus an illustrated lecture on the national space program.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A, 2, #34

RELEASE NO: KSC-211-66
FOR RELEASE: Immediate

September 16, 1966

IS THERE AN ASTRONAUT IN THE FAMILY?

KENNEDY SPACE CENTER, Fla. -- Astronaut flights have captured the fancies and imaginations of people the world over, particularly among the younger set.

When most of us were toddlers, our ambitions were to become a fireman, a policeman or perhaps a cowboy. Not so today. Kids want to become spacemen.

With this in mind, an inquiring photographer asked eight employees at NASA's Kennedy Space Center if they would want their children to become astronauts. Here are the frank replies:

Frank Harelik, Chrysler: "Yes. It would be a rewarding experience, and possibly help us move deeper into the mysteries of space."

George Page, KSC Launch Operations: "Yes. The training, experience and special education required would be of great benefit to my son."

Tom Brotsch, IBM: "Yes. If my boy was an astronaut, I feel he would be making a real contribution to the advancement of science."

- more -

Richard Fritz, Douglas: "If my son chooses to be an astronaut, that's okay with me."

John Sims, General Electric: "No, not particularly. Being an astronaut is not an end in itself. The whole space program is a team effort, and there are other careers that are just as important."

Michael Hooks, KSC: "Yes. It would challenge my son to bring out the best in him."

Billie Miller, Chrysler: "Yes. To be an astronaut one must be tops in everything he does. This would make any mother proud."

Jack Cole, North American: "Yes. If that's what he wants, and if he makes it, I hope I'm on the team that launches my son into space."

- end -

2A.2,#34

KSC news release

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-213-66
FOR RELEASE: Immediate

September 20, 1966

ASTRONAUTS' PARACHUTES PACKED AT KSC

KENNEDY SPACE CENTER, Fla. -- "What a beautiful sight."

That's how Gemini astronauts have described the opening of the main spacecraft parachute that deploys when they are two miles up enroute to splashdown.

Millions of people around the world were equally thrilled with the sight on the recent Gemini 11 reentry of astronauts Charles Conrad and Richard Gordon. The spacecraft landed near enough to recovery ships for TV cameras to pick up the bright orange and white parachute.

That chute, and all others used on manned Gemini flights, was packed at the Kennedy Space Center.

"The nylon chutes are made by the Northrup Ventura Corporation in California and are shipped here several weeks before each flight," says Sam Beddingfield, chief of KSC's Mechanical and Ordnance Branch, Spacecraft Operations -- the organization which supervises work on the parachutes.

- more -

"We run the chutes through quite thorough receiving inspections at the Center," Beddingfield pointed out. "We literally check them stitch by stitch."

The man who actually packs the chutes is Larry Richardson of Northrup Ventura. He is assisted by Elmer Newsome of Bendix. It would be hard to find two more qualified men for the job -- which explains the astronauts' complete confidence in this phase of the program.

Richardson has a master riggers license and holds the highest degree of sky diving awarded. He has jumped at altitudes up to 22,500 feet and has free fallen for 16,500 feet. He always packs his own parachutes.

Newsome has over 20 years experience in this specialized field, and formerly was in charge of a parachute test center for the Air Force in California.

Beddingfield explains that five chutes are actually packed for every Gemini flight. The main one is 84 feet in diameter. Prior to its opening, an eight-foot drogue chute -- for stabilizing the spacecraft -- deploys, usually at an altitude of 40,000 feet.

At approximately 10,000 feet, the drogue is released and pulls an 18-foot "pilot" chute out. Two and one-half seconds later, the main parachute unfolds. Should the drogue fail -- and no parachute has yet failed on any U.S. manned mission -- the pilot chute can be deployed by explosives.

In addition to this, each Gemini astronaut has an individual rig, should they have to eject from the spacecraft.

All chutes are packed under pressure so they are compressed into as small a space as possible.

Work at the Kennedy Space Center is done in the one story Parachute Building located in the industrial area. Actual packing is performed on a special table, four feet wide and 185 feet long.

"It takes a full eight hour day just to pack the main chute," Richardson says. Meticulous care is given every fold, and to each of the 72, 110-foot-long suspension lines.

Prior to the packing, weeks are spent insuring there are no tiny rips or holes in the nylon. Small repairs can be made in the building. Beddingfield once found a beetle in a chute that just arrived from the West Coast. Bug extermination measures were subsequently taken at the factory.

The main Gemini parachute is 154 feet long and weighs about 110 pounds.

"When you consider it brings down a 5,000-pound spacecraft, that's a pretty good weight differential," Richardson says. By comparison an individual chute for a pilot weighs about 17 pounds.

Beddingfield says Richardson and Newsome both take great pride in their work, and they are fully aware of the importance involved in it.

"I don't have any qualms during a mission when the time comes for chute deployment," Richardson says. "We ran tests for over two years and we trained hard for this, so we're confident things will work as planned."

The building itself, Beddingfield adds, is air conditioned and humidity controlled to protect the nylon. "We also make an effort to keep the chutes from any sort of sunlight, as it has a tendency to weaken the nylon."

While Conrad and Gordon were floating down under the canopy of their chute, Richardson and Newsome were busy packing rigs for the Gemini 12 mission. Such is the tempo of operations at NASA's Kennedy Space Center.

- end -

KSC news release
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

IA.2, #34

RELEASE NO: KSC-216-66
FOR RELEASE: Immediate

September 21, 1966

CREWS LOX SATURN V FACILITY STAGE

Kennedy Space Center, Fla. -- Launch crews at the Kennedy Space Center successfully filled the liquid oxygen tanks of the Saturn V 500 F facility vehicle's S-IC first stage at Complex 39's Pad A early today with approximately 340,000 gallons of LOX.

The LOX lines, which run 1,450 feet to the pad from the 900,000 gallon storage tank, were opened shortly after noon, yesterday. The lines were initially precooled by a small LOX flow.

Then with a 300-gallon-per-minute replenishing pump, LOX was fed to six and a half percent capacity into the S-IC's tanks. Following this, main fill pumping was begun, reaching a maximum flow rate of 10,000 gallons per minute. When the tanks were 98 percent full, the replenishing pump was used to "top off" the LOX.

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It was the first time a Saturn V has been filled with LOX at KSC.

Tanking tests will continue this week.

-end-

2A.2, #34

KSC news release

KENNEDY SPACE CENTER
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-234-66
FOR RELEASE: Immediate

October 5, 1966

1,270 Foreign Visitors Tour Space Center

KENNEDY SPACE CENTER, Fla. -- The public bus tours of the Kennedy Space Center and Cape Kennedy have drawn visitors from 53 countries, according to a count compiled by the National Aeronautics and Space Administration.

Since July 22, when the public tour service was begun, 1,270 persons from foreign lands availed themselves of the tours through October 2. There was a total of 95,931 visitors through that period.

The tours are conducted for NASA by Trans World Airlines.

The heaviest foreign visitor flow was from Canada, with 592 persons -- nearly half the foreign total -- taking the tours. England was next with 121 tourists. Among the other leading countries, there were 90 from Germany, 82 from France, and the Scandinavian nations of Sweden, Denmark, Finland and Norway combined for a total of 104 visitors.

The other countries represented were: Argentina, Australia, Austria, Bahamas, Belgium, Bolivia, Brazil, Chile, Colombia, Costa Rica, Cuba, Czechoslavakia, Ecuador, Greece, Holland, India, Monaco, Mexico, Malaya, Lebanon, Kenya, Ireland, North Ireland, Israel, Italy, Jamaica, Japan, Jersey Channel Islands, New Zealand, Nigeria, Peru, Philippines, Poland, Puerto Rico, Rhodesia, Saudi Arabia, Scotland, South Africa, Spain, Switzerland, Thailand, Turkey, Uruguay, Venezuela, and Zambia.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

IA.2, #34

RELEASE NO: KSC-229-66
FOR RELEASE: October 11, 1966

100,000TH VISITOR TOURS KENNEDY SPACE CENTER

KENNEDY SPACE CENTER, Fla. -- The 100,000th visitor to tour the National Aeronautics and Space Administration's Kennedy Space Center -- Lawrence Brown, and his wife Gail, of Merrick, New York -- passed through the Spaceport's gates Tuesday morning.

Brown, a New York Telephone Company employee, was greeted by Deputy KSC Director Albert F. Siepert. He presented the young couple an enlarged color portrait of NASA's Apollo/Saturn V lunar rocket, autographed by Center Director, Dr. Kurt H. Debus.

"I had heard about the Spaceport bus tours from a friend, and I had seen an article on them in a New York paper," Brown said. He added this was his first visit to Florida.

Mrs. Brown said they were quite surprised and delighted at being the 100,000th visitors to the Center, and they were quite impressed with what they saw.

Since the NASA tours, began last July 22, they have proven extremely popular with the public. Visitors from every state in the Nation and 53 foreign countries have viewed NASA facilities on Merritt Island and historic launch sites at Cape Kennedy.

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The National Park Service, in a survey made last year, projected an average daily tour attendance of 12,000 persons as likely by 1970. Nearly 1,500 persons a day is the average for the first few months the tours have been available.

Visitors at the Center enter the world's largest structure in volume -- the Vehicle Assembly Building -- where the lunar rockets are assembled and checked out.

They also view the launch pads where the 36-story-tall Apollo/Saturn V will lift off for the moon, and they see the training simulators used by the astronauts to make realistic flights into space without getting off the ground.

Tour routes pass the Cape Kennedy launch sites of the Mercury, Gemini and Apollo manned spaceflight programs, and the launch pads for earth orbiting weather, communications and scientific satellites, and unmanned spacecraft such as Surveyor and Lunar Orbiter that probe the vastness of our solar system.

Historic and current information about activities at the Kennedy Space Center is provided by recorded commentaries and briefings by escorts of Trans World Airlines, operating the tours under contract to NASA.

Tour operations are based at the Center's main entrance, just off U.S. Highway 1, two miles south of Titusville, Florida. Buses operate between 8 a.m. and 4 p.m.

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The tours are made in air conditioned buses and there are several photo stops included on the route. There is a nominal charge to help cover operational expenses.

Two tours are offered. One covers NASA's Spaceport on Merritt Island and runs for an hour and a half. The second tour is two and a half hours and takes in the Spaceport and adjacent Cape Kennedy.

Simon J. Burttschell is NASA's manager for the tours, and Byron Jackson is Tour director for TWA.

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2A.2, #34

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-230-66
FOR RELEASE: Immediate

October 12, 1966

EDUCATORS TO BE BRIEFED AT SPACE SEMINAR

KENNEDY SPACE CENTER, Fla. -- The Kennedy Space Center will host 225 college and junior college educators Thursday as the National Aeronautics and Space Administration takes part in the National Clinic for Technical Education.

NASA, in cooperation with the U.S. Office of Education and the National Education Association will present a seminar on "The Space Age, The Age of New Dimensions in Education," and take the educators on a tour of the Spaceport and Cape Kennedy.

The program will mark the conclusion to a two day conference of professors and instructors, to be held at the Carriage House on Cocoa Beach, that seeks an improved curriculum for college and junior college level technical students.

First part of the program will be a panel discussion by eight space industry firms that are participating in the Apollo/Saturn V Project.

Representatives of the eight companies are technicians who were selected by NASA's Manned Flight Awareness Department, which rewards contractor employees for excellence of effort and performance.

- more -

The panel will be moderated by James V. Bernardo, Chief, Educational Programs Division, NASA Headquarters, Washington, D. C., He will also deliver a statement on "NASA's Role in Education".

Panel members are R. C. Beagley, The Bendix Corporation; G. E. Bennett, North American; H. D. Hester, International Business Machines Corporation; P. D. Elliot, Douglas Aircraft Corporation; Madeline J. Moore, General Electric Corporation; W. Speake, The Boeing Company; R. H. Weis, Chrysler Corporation; and A. Winckel, Grumman Aircraft Engineering Corporation.

The panel discusses the role of the technician in this Nation's goal of landing men on the lunar surface this decade.

The program will be opened by H. E. Mehrens, a KSC Education Specialist. The educators will be welcomed to the Center by P. O. Siebeneichen, Chief, Education and Community Services Office.

After the seminar, the educators visit the facilities at the Spaceport and Cape Kennedy. They will enter the Vehicle Assembly Building, a massive structure that houses Apollo/Saturn V rockets during preparation and assembly for lunar flights. They also will view the Launch Control Center for the Apollo/Saturn V, and Launch Complex 39 where an actual-size lunar vehicle is mounted on a mobile launcher at Pad A.

Following this, they will tour the KSC Industrial Area and drive through Cape Kennedy where they will view launch complexes for the Manned Gemini Program, and sites for such unmanned projects as Surveyor, Lunar Orbiter and various weather, communication and scientific satellites.

- end -

KSC
KENNEDY SPACE CENTER
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A-2, #34

RELEASE NO: KSC-235-66
FOR RELEASE: October 13, 1966

18,000 SIGN GUEST BOOK ON SPACE CENTER TOURS

KENNEDY SPACE CENTER, Fla. -- Nearly 18,000 visitors from every state in the Nation and the District of Columbia have signed the visitors' log at Kennedy Space Center since the public bus tours of KSC and Cape Kennedy were inaugurated last July 22.

More than 100,000 visitors have taken the Space Center tours but not every one signs the guest log at the Visitor Information Center where the tours begin and end.

Floridians led the signers with 3,052 of them inscribing their names in the logbook. Other leading states were Ohio, 2185; Pennsylvania, 1369; Georgia, 1084; and Illinois, 1076.

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2A.2,#34

KSC news release

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-237-66
FOR RELEASE: October 20, 1966

October 14, 1966

NEW SPACE MATERIALS AID HI-FI BUILDERS

KENNEDY SPACE CENTER, FLA. -- A successful search for a new family of protective coatings for space electronics has given an assist to do-it-yourself builders of home hi-fi sets.

The National Aeronautics and Space Administration has successfully capped a long hunt for better materials to protect vital and expensive electronic equipment from the corrosive sea air and wind-blown sand around the Kennedy Space Center and Cape Kennedy launch areas.

Even in relatively protected buildings, where sand can be eliminated and humidity reduced, the air still contains enough salt and moisture to corrode sensitive equipment.

Since a little corrosion can cause a lot of damage to the delicate copper circuitry of printed circuit boards, it was long realized that a suitable protection had to be found.

Previously, a heavy coating of epoxy or polyeurethane material was applied to the boards. But these had several disadvantages.

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Among them was a difficulty in repairing burned out components through the thick coating, and the inability to cool the boards sufficiently during operation to prevent overheating.

In order to eliminate these and other similar problems, two NASA men from Kennedy Space Center -- quality engineer Mike Fisher and quality specialist Norman Perry -- and a pair from NASA/Marshall Space Flight Center, Huntsville, Ala. -- engineers Raymond Flack and William Fussell -- a year ago began the development of a new family of coatings.

They knew that the cut edges of the printed circuit boards, made of glass cloth and epoxy resin, were the main channels of moisture penetration. It was necessary to seal these edges as well as coat the components and faces of the boards.

Normally, the edges are masked to allow the boards to slide into the narrow tracks in the electronic consoles. The new coatings were thin enough to coat the edges and still allow the boards to slide in their tracks.

This eliminated the expensive process of masking the edges. The thin coatings cut the amount of the material required and this also reduced the cost and cut the problems of repair.

Only 2 mils (two one-thousandths of an inch) of the new coating is required to hold the components on the board while operating under a vibration of more than 50 Gs (50 times the force of gravity).

--more--

Coatings of 2 mils or less affect the electrical properties very little.

These new thin-film polyeurothane coatings can be applied by dipping, brushing, spraying or air-brushing.

The new materials are being manufactured according to NASA's needs and specifications and are also on the market for the home kit builder who wants to protect his hi-fi or radio from the damaging effects of humidity.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #34

news release

RELEASE NO: KSC-238-66
FOR RELEASE: Immediate

October 27, 1966

SATURN BOOSTER
MARKS ITS FIFTH BIRTHDAY

KENNEDY SPACE CENTER, Fla. -- Five years ago today the first Saturn I was successfully launched from the Cape, opening a new era in rocketry for the United States.

The flight gave the nation, for the first time, a heavy booster capability that could push sizable payloads into Earth orbit or more distant goals, such as the lunar surface.

The rocket was called SA-1, and it lifted off at 9:06 a.m. -- four seconds after ignition -- before more than 100 newsmen, thousands of spectators and a national television audience in the millions.

With a thrust from eight booster engines of 1.3 million pounds, it was by far the most powerful vehicle ever launched by NASA. During its eight minute flight, the rocket reached a peak velocity of 3,607 mph and an altitude of 84 miles before impacting 215 miles downrange.

- more -

SA-1 was the first in an unprecedented series of 13 successful Saturn flights -- 10 Saturn I and three uprated Saturn I vehicles.

Many lessons were learned from that historic first mission. There have been in the intervening years numerous changes both in rocket design and in launch philosophy.

SA-1 was, basically, a one-stage vehicle -- only the booster was fueled. The second inert stage was filled with water. While the uprated Saturn I vehicles today, such as AS-204 now on the pad at Complex 34, closely resemble SA-1 in outside appearance, there are many differences. For instance, 204 carries all live stages. The same will be true on the first Apollo/Saturn V flight next year.

Instead of building up, one stage at a time, as was done in 1961, the Kennedy Space Center now uses the "all up" theory of launches -- that is, all stages are flight tested in the first mission.

One of the major changes in operations between SA-1 and AS-204 is the percentage of mission contractor participation. The first Saturn launch operation was almost a complete NASA in-house task, with Chrysler acting in a support role.

Today, however, NASA's job on launches is almost exclusively supervisory management, and actual mission operation is performed by the stage contractors.

How did the countdown and launch of SA-1 fare five years ago? One man who remembers it well is Bob Moser, Manager of KSC Test Planning. Moser was launch vehicle test conductor for the initial Saturn flight.

"The terminal countdown operation went very well," he says. "I don't recall any real problems that developed. There was, of course, a certain amount of anxiety, both from our launch crews here and from the design people at the Marshall Space Flight Center, because this was the first time this configuration was to fly, validating dynamic studies.

"But," Moser continued, "we had confidence in the hardware. There were static tests at Marshall and we weren't worried about the engine ignition system."

He explained that although there were no problems during the final countdown leading to launch, a number of minor things had to be worked out in the weeks of checkout preceding liftoff, including the incorporation of many last minute changes, but, overall, things went comparatively smooth for a first time flight.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2,#35

RELEASE NO: KSC-244-66
FOR RELEASE: Immediate

October 26, 1966

CHILDREN'S SPACE SCIENCE TOURS PROVE POPULAR

KENNEDY SPACE CENTER, Fla. -- More than 2,000 school children will have toured this Center by Thanksgiving Day under the new NASA Space Science Lecture demonstration program.

Advance reservations for the bus tours, which include a 45-minute presentation by a NASA educator, have come from students in 13 Florida communities and from Dairen, Georgia.

Largest group thus far booked will be 387 elementary pupils of the John F. Kennedy Junior High School on Merritt Island, who will tour November 3.

During the daily tours, conducted for NASA by Trans World Airlines, the students visit launch sites for manned and unmanned space missions and the world's largest building in which the Apollo/Saturn V lunar exploration rockets are assembled.

- more -

Reservations for October and November booked through the KSC Educational Office include:

Rockledge Elementary School, 4th and 5th grades

W. J. Creel Elementary School, Eau Gallie, 6th grade

Christ The King School, Jacksonville, 7th grade

Golfview Elementary School, Rockledge, 5th grade

Ocean Breeze Elementary School, Indian Harbor Beach, 5th grade

Cambridge Elementary School, Cocoa, 6th grade

Harbor City Elementary School, Eau Gallie, 6th grade

DeLand Junior High School, DeLand, 6th, 7th and 8th grades

Seventh Day Adventist School, Orlando, 7th and 8th grades

Mims Elementary School, Mims, 6th grade

Oak Hill Public School, Oak Hill, 1st thru 6th grades

Spring Park Elementary School, Jacksonville, 5th and 6th grades

Fleagle Elementary School, Brooksville, 3rd thru 8th grade

MILA Elementary School, Merritt Island, 4th grade

Pineda Elementary School, Cocoa, 3rd grade

Rimes Elementary School, Leesburg, 5th grade

Douglas Anderson High School, Jacksonville, 11th and 12th grades

Todd Grant High School, Darien, Ga., 9th thru 12th grades

Highland Lakes Jr. Academy, Avon Park, 5th thru 10th grades

Seventh Day Adventist School, Orlando, 5th and 6th grades

Leesburg High School, Leesburg, junior and senior high school

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #35

news release

RELEASE NO: KSC-240-66
FOR RELEASE: Immediate

October 27, 1966

KSC LIBRARY DOUBLES ITS SIZE IN A YEAR

KENNEDY SPACE CENTER, Fla. -- There are more than 5,000 signed-up patrons of the Kennedy Space Center Library. However, Mrs. Librada Russell, Librarian, says there are still employees who are not aware of the information available to them from this source.

"I suppose this is due to the impression that the reading and circulation room on the first floor of the headquarters building is the library," she says. "Not so, for our documentation area across the hall occupies a space almost two times as large as the reading room."

While the size of the library has not increased in floor space, the number of holdings has grown tremendously. Mrs. Russell said, "in the past year alone we have more than doubled our holdings."

At present the Library contains over 13,000 technical books and bound journals, more than 125,000 titles of technical reports on microfiche, 35,000 titles of cataloged documents, 1,000 periodical subscriptions, and 67,000 specifications and standards.

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Keeping pace with the rapidly changing aerospace field has necessitated automating some of the library functions. Microfiche, for example, is similar to microfilm and contains as many as 84 document pages reduced in size and placed on small (4 x6) plastic cards for easy accessibility and storage.

Information from the microfiche is stored on magnetic tapes which are used by a computer to conduct organized literature searches on specialized subjects.

To meet the increasing demands for material other than technical, the library has expanded into specialized non-technical areas. This has meant obtaining books on subjects that range from the field of mythology to methodology.

"For instance," continued Mrs. Russell, "we have a number of books on management that are used in support of the various management programs conducted by both contractors and NASA."

Today's librarian is a far cry from yesteryear. As Mrs. Russell explained, "our staff of 24 has a diversity of backgrounds with various capabilities gained from positions in research organizations, service, public, and university libraries. In addition, they all have at least one university degree, some as many as three. The technological work we do demands it."

In addition to the main library, there are two branches, one located in Room 387 of the Central Instrumentation Facilities Building and the other in the E & L Building on the Cape, Room 1143. Contractor Librarian in the main library is V. A. Rapetti of Ling-Temco-Vought.

"We would like to remind everyone," added Mrs. Russell "that our job here is to help them in their work in every way we can. If we don't have a requested item, we'll certainly try to get it."

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

21.2, #35

RELEASE NO: KSC-241-66
FOR RELEASE: Immediate

October 27, 1966

ASTRONAUTS WORKLOAD EASED -- THANKS TO KSC TEAM

KENNEDY SPACE CENTER, Fla. -- Because of the inventive skill of five Kennedy Space Center employees, astronauts do not have to spend long, laborious hours checking out bio-medical systems and equipment.

During a mission such equipment is used to monitor the physical condition of the astronauts.

Simulator devices originated by members of the Bio-medical Systems Section save NASA $13,000 and more than 1,700 man-hours each year, while freeing the astronauts for more important duties.

The five men are electronics engineer Virden M. Mitchell, chief of the section; electronics engineer James A. Thomas; and electronics technicians Roscoe R. Turvy, John P. Wise and John M. Keefer. They work in the Manned Spacecraft Operations Buildings.

- more -

Before Mitchell and his men went to work, the astronauts usually participated in checking out bio-medical equipment. This involved attaching a "pressure cuff" to measure blood pressure, taking cardiogram readings, and the use of other sensor devices to record respiration and temperature.

It was tiresome work.

Now most of this work is done by a simulator about the size of a shoe box. Presence of the busy astronauts is not required.

Mitchell and his assistants saw a need and set out to fill it.

He and technicians Turvy and Wise turned their attention to the development of a blood pressure simulator. In effect they had to design an electronic device that would respond like a pressure cuff on a man's arm and "fool" a telemetry transmitter.

An electrocardiogram simulator had already been developed within the section. Keefer went to work on a phonocardiogram simulator.

Whereas an electrocardiogram measures the miniscule electric current which stimulates heartbeat, a phonocardiogram measures the sound or strength of the heartbeat. Both measurements tell doctors a lot about the physical well-being of an astronaut.

Thomas began the search for a simulator to measure respiration rate and depth.

The men worked on the simulator devices between manned missions, "whenever we had a little spare time." Because the section supervises checkout of bio-medical systems and medical experiments for all manned flights, spare time was scarce.

Gradually, though, experience and experimentation paid off. Workable simulator devices began to emerge.

"We would design a circuit, try it, and redesign if necessary," said Mitchell. "We know a capacitor acts in a certain way, what a particular wave shape means on an oscilloscope--and how to modify electronic components until we get what we want."

As each circuit or device was completed, it was incorporated in a comprehensive bio-medical simulator. The present simulator can "duplicate" two electrocardiograms, respiration rate, blood pressure, body temperature, and a phonocardiogram.

KSC's cost reduction office determined that the blood pressure simulator developed by Mitchell, Turvy and Wise will save $5,000 and 600 man-hours per year. Keefer's phonocardiogram simulator will save $4,600 and 570 man-hours a year. The respiration simulator originated by Thomas represents an annual savings of $4,000 and 525 man-hours.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A, 2, #35

news release

RELEASE NO: KSC-242-66
FOR RELEASE: Immediate

October 27, 1966

SPACEPORT UNITED FUND GOAL -- $32,000

KENNEDY SPACE CENTER, Fla. -- "If you can't make a donation now, please sign a pledge," suggests John W. Donovan, Kennedy Space Center Community Relations Specialist who is tracking NASA's climb towards its highest ever United Fund quota -- $32,000.

The 1966 drive is off to a good start. Quality Assurance, Robert McDaris, Director, is the first KSC element to pledge 100 percent participation.

"Donations are rolling in, but we will need a lot more," says Donovan. Individual donations were kicked off by Robert Gray, Director, Unmanned Launch Operations. He presented a check to Richard Nunimaker, Chief of Administration, who is ULO's Key Solicitor for the drive.

"Although donations are desirable," Donovan added, "pledges are also satisfactory because they are much easier to fulfill and less troublesome since the United Fund will bill pledges either quarterly or semi-quarterly."

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Donovan noted NASA will have to give 100 percent this year because the quota of $32,000 is $7,000 above last year's with only an increase of 100 or so people on the NASA payroll over the 1965 figure.

This higher quota is due to an effort of the Brevard County United Fund Campaign leaders to raise the level of the county's contributions to the national level.

Donovan said, "though the 1966 goal is a high one, I feel sure with an all-out effort, NASA will go over the top as it has in every past year."

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #35

RELEASE NO: KSC-243-66
FOR RELEASE: Immediate

October 27, 1966

TECHNOLOGY USES SPURRED BY SPACE CENTER

KENNEDY SPACE CENTER, Fla. -- Technology Utilization celebrated its first anniversary at the Kennedy Space Center recently, and Jim Harrell, chief of the program here, commended the past year's achievements. He also made a call for more intensified efforts, especially in the area of contractor participation.

Technology Utilization is a nation-wide NASA program designed to ensure that new knowledge resulting from space work, is channeled, if applicable, into everyday uses.

Examples of significant contributions are the artificial heart and the new non-stick cooking utensils which evolved from the space age innovations.

During its first year at KSC the program has registered considerable growth. "But," says Harrell, "to be completely successful and make the contributions to our economy that the Center is capable of making, there are some basic problem areas that require close attention."

- more -

He feels the number one problem is a lack of understanding as to what constitutes new technology.

"Most innovators are tempted to think only in terms of patents or inventions," explains Harrell, who is also KSC's Chief Patent Counsel.

"But a large percentage of new technology that eventually results in better products for the general public comes from what began as small ideas -- not merely from patentable inventions."

An item of new technology might seem insignificant by KSC standards,for instance, and yet be just the solution needed by an industrial firm , and might furnish an idea that could result in a complete new product line for tomorrow's consumers.

Harrell paid tribute to the outstanding effort some KSC contractors have given this national goal, but says more attention is needed in this area.

"If each of our contractors would emphasize the reporting of new technology by following the examples set by such companies as Boeing, Federal Electric, RCA, and TWA, the second year of KSC's Technology Utilization Program would be a banner one."

Benefits to innovators in reporting new technology are twofold. In addition to monetary rewards, which range from cash awards presented by NASA to Congressional awards that could exceed $100,000, the TU program offers one of the most effective ways for individuals and contracting companies to receive professional recognition.

As each item is reported, Harrell submits a file to NASA Headquarters, recommending that it be published as a "Tech Brief." These briefs summarize the items of new technology, identify both the individual who introduced the idea and the company or NASA organization he works for, and convey the ideas to the Regional Dissemination Centers responsible for "spreading the word."

Tech Briefs are read by more than 10,000 people primarily concerned with research and development.

The NASA TU program also reached an important milestone recently -- publication of 1000th Tech Brief.

In a letter to Dr. Kurt H. Debus, KSC Director, commending this Center's participation, Administrator James E. Webb said, "this achievement is significant to me because it means that 1,000 useful inventions, innovations, and discoveries resulting from NASA work have been channeled into the mainstream of the U.S. economy, a potentially important contribution to economic growth that might not have occurred without the Technology Utilization Program."

President Johnson, during his recent visit to the Center, paid special tribute to new technology contributors when he said, "your people here are helping endow all of human life with your new inventions and accomplishments."

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #35

news release

RELEASE NO: KSC-245-66
FOR RELEASE: Immediate

October 27, 1966

TRAFFIC INCREASE

KENNEDY SPACE CENTER, Fla. -- The volume of vehicular traffic passing through the Kennedy Space Center's access gates daily has increased slightly over January 1966, according to the latest count.

By late October, the number of vehicles entering and leaving KSC had reached 23,944. Of this total, 6,583 were counted at Gate 2 on State Road-3, Merritt Island; 11,189 at Gate 3, off US Highway 1 south of Titusville; 4,835 at Gate 4, located on the Merritt Island approach to the Titusville Causeway on State Road-402; and 1,067 at Gate 5, located on Kennedy Parkway (formerly State Road-A1A) south of Haulover Canal on Merritt Island.

Latest figures available for Gate 1, Cape Kennedy Air Force Station, indicated a daily average of 16,420 vehicles through that point in August.

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Compared to January counts, the daily volume had increased by 400 at Gate 2 and 1,700 at Gate 3, while there were 1,200 fewer vehicles at Titusville Causeway and 600 fewer at Gate 5.

The tally also reflected a daily average of 10,935 vehicles utilizing NASA Causeway connecting Cape Kennedy and the Space Center on Merritt Island.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A-2, #35

RELEASE NO: KSC-249-66
FOR RELEASE: Immediate

November 10, 1966

WEST GERMAN SCIENCE STUDENTS VISIT KENNEDY SPACE CENTER

KENNEDY SPACE CENTER, Fla. -- Miss Ruth Schuller of West Germany, recent winner of a space research contest held in that country, arrived at Kennedy Space Center November 8.

Miss Schuller was among thousands of entrants in the contest sponsored by the West German Ministry of Science. The contest, open to the general public, was held in conjunction with the annual Cologne Science Fair.

Her first prize included a week in Miami in addition to the Space Center visit.

At the Space Center, Miss Schuller and her escort A. Hieronymi, were greeted by KSC Director Dr. Kurt H. Debus and other top management officials. Dr. Hans Gruene, Director of Launch Vehicle Operations briefed the two visitors on operations and facilities at the Spaceport.

- end -

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-253-66
FOR RELEASE: Immediate

November 16, 1966

WESTERN TEST RANGE GIVES KSC LAUNCH CAPABILITY FROM TWO COASTS

KENNEDY SPACE CENTER, Fla. -- The Kennedy Space Center's launch facilities extend more than 2,500 miles.

In addition to the long-familiar sites that rim the Atlantic Ocean, KSC also launches a variety of unmanned satellites from launch pads at the Western Test Range in California, bordering on the Pacific.

Recently, the facility there was modified to include a Delta launch capability in addition to the Thor-Agenas which have been flown into polar orbits from there for some time.

KSC's site on the West Coast is at Vandenberg AFB, near Lompoc, California, about 125 miles northwest of Los Angeles.

About 50 people assigned to KSC work there. Personnel are divided, organizationally, into seven offices and branches under Henry R. Van Goey, chief, WTR Operations Division, and J. B. Schwartz, deputy chief.

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They are: Administrative Operations Office, headed by Richard Nash; Technical Support Office, N. Klitz; Range Operations Support Office, W. H. Evans; Agena Operations Branch, W. S. Cortwright; Delta Operations Branch, Larry Lebanoff; Spacecraft and Vehicle Support Operations Branch, G. E. Schlimmer; and Range Operations Branch, Tim Eastland.

As at Cape Kennedy, KSC launches NASA vehicles from facilities located on Air Force property.

From these facilities, KSC has the capability to launch a variety of satellites and spacecraft into a polar orbit.

The first NASA flight at WTR occurred on September 29, 1962, when a Thor Agena orbited Alouette I -- a joint U.S. - Canadian satellite designed to study electron density in the ionosphere.

Other memorable launches have included:

-- Echo A-12, January 25, 1964: passive communications satellite.

-- Nimbus I, August 28, 1964: first of a series of advanced cloud-mapping weather satellites.

-- OGO II, October 14, 1965: An orbiting Geophysical Observatory, carrying 20 separate experiments.

-- ISIS-X, November 28, 1965: International Satellite for Ionospheric Studies.

-- PAGEOS, June 24, 1966: Passive Geodetic Earth Orbiting Satellite.

-- ESSA III, October 2, 1966: U. S. Weather Bureau - TIROS Operational System weather satellite. This was the first Delta launch at WTR.

For every major flight from the West Coast, ULO representatives from KSC here travel cross country. NASA launches at WTR are directed by Robert H. Gray, Unmanned Launch Operations Director, and John J. Neilon, Deputy ULO Director.

With the dual vehicle launch capability at WTR -- for both Thor Agenas and Deltas -- the schedule of flights there will pick up in coming months.

- end -

2A.2, #35

KSC

KENNEDY SPACE CENTER, FLORIDA

NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-252-66

FOR RELEASE: Immediate

November 16, 1966

PROJECT GEMINI ...

WHAT WE'VE LEARNED

KENNEDY SPACE CENTER, Fla. -- Gemini 12 was the last in a program, closing out one of the most successful series of launches in space history.

G. Merritt Preston, Deputy Launch Director for the Kennedy Space Center and Deputy Gemini Mission Director for Launch, reflected on some of the program's highlights, reasons for success and lessons learned.

"First, I think you'd have to say we achieved a number of advantages in Gemini from detailed planning. When problems did occur we were able to take corrective action.

"No one can say," Preston explained, "that Gemini was not fraught with problems. It had its share. There were three flights that took three attempts to get them off, and there were a couple of abortive engine shutdowns.

- more -

"However, in every case we had planned long before for such occurrences and had an alternate plan ready. You'll recall, for instance, when Gemini 6 didn't go as planned, we worked it right into the Gemini 7 mission and had a successful dual launch and rendezvous.

"Planning like this really takes a conscientious effort on the part of all involved," Preston said. "Normally, people don't like to plan around failure modes, but in doing so -- in considering every possible contingency -- we were ready for anything in Gemini, and it paid off.

"Another point worth reviewing has been the crews' ability to launch from such precise windows. This, I believe, basically resulted from their overall knowledge of the systems involved, so when trouble occurred during a countdown, instantaneous action could be taken, often without calling a hold.

"On these dual launches, particularly, precise timing and meticulous planning was required -- and carried out. On Gemini 11, for instance, we got the Agena off within a 16 minute window and then the Gemini went on time. That meant both vehicles, and all their complex systems, had to be ready, and despite a problem in the count, we did make it."

Preston said proper spacecraft checkout at KSC and at the plant before it arrived here also minimized problems.

"This is one point where our Spacecraft Operations people and McDonnell, the prime Gemini contractor, benefitted from experience on Mercury, and applied it to a very fruitful end. Checkout at the factory on Gemini was considerably different from Mercury. The participation of KSC and McDonnell people with the personnel at the plant contributed significantly in developing checkout procedures there leading to the eventual delivery of 'cleaner' spacecraft to KSC."

Preston said, too, the design of Gemini helped operations. From experience gained on Mercury, McDonnell designed the two-man spacecraft so separate systems could be tested or taken out without disrupting other systems.

"Cooperation between the Air Force, NASA and the contractors, including McDonnell, Martin (Gemini launch vehicle), General Dynamics Convair (Atlas launch vehicle) and Lockheed (Agena target docking vehicle) was better on Gemini than ever before. It was a real pleasure to work with these people."

Preston regretted that many members of the team would be dispersing following this last Gemini launch, but said many others, including all KSC personnel associated with the program would move on into Apollo with much valuable experience.

"I have great respect for all crew members associated with Gemini," he added. "Although the launch phase was highly successful, we had many obstacles along the way, and the team showed flexibility and perseverence to overcome the hardships and get the job done."

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-250-66
FOR RELEASE: Immediate

November 16, 1966

KSC's HAROLD KUGEL RECALLS CAREER HIGHLIGHTS

KENNEDY SPACE CENTER, Fla. -- The 30-year Federal Service pin that Harold Kugel received on October 14 measures more than time and appreciation for a job well done.

It also traces a journey from Washington in 1936, when Kugel worked as an elevator operator in a Federal building, to the Spaceport in 1966 and a "multi-million dollar" job as general supply specialist.

Today, this Winter Park resident controls more than 21,000 items of Government equipment used by Kennedy Space Center. The price tag on all of this equipment exceeds $43 million.

Kugel worked for six Government organizations and "saw a lot of the country" before he arrived in the Cape area in 1958. There was an important detour from 1942 to 1945, when in uniform, he served with the Navy in the South Pacific and saw action in two major battles.

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The Chicago native now spends most of his working hours as advisor to a KSC supply section which controls personal property -- mostly items valued at more than $200 for which employees are accountable.

Personal property includes office equipment, electronic test gear, even two airplanes. With 21,000 items to account for, this is a big job.

"Automation is the answer," says Kugel, who has witnessed a big change from manual to automated procedures since he joined NASA in the Project Mercury days.

Kugel has two attributes which help explain his success as a supply officer -- a good memory and a "bird dog" instinct. The memory helps him remember the obscure serial number of a missing typewriter or office machine. The facility for finding lost items has taken him from launch pad to laboratory -- just about everywhere at KSC.

He usually finds what he is looking for.

His office in the Central Supply Building is a world-at-work of accounts, inventories, transfers, survey and salvage reports. It's a job where a good memory pays off, along with an instinct for finding things.

For Harold Kugel, it is a job far removed from that elevator in Washington 30 years ago.

- end -

2A.2,#36

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-251-66
FOR RELEASE: Immediate

November 16, 1966

MAINTENANCE MANAGERS MEET

KENNEDY SPACE CENTER, Fla. -- The Third Annual NASA Facilities Maintenance Conference, with the theme "Better Maintenance with Fewer Dollars", was held at the Kennedy Space Center during a three-day period.

Attending were 27 top maintenance management people from the major NASA space flight centers that include KSC, Marshall Space Flight Center, NASA Michoud, Mississippi Test Facility, Manned Spacecraft Center, and the White Sands Test Facility.

The conference was held under the auspices of the Office of Manned Space Flight, NASA Headquarters, represented by the keynote speaker, Rod A. Diaz, Chief of the Manned Space Flight Program Control Office. Diaz outlined the progress made during the past year in the Manned Space Flight Facility Maintenance Program.

- more -

K. T. O'Keefe, Director of Installation Support, welcomed the group on behalf of Dr. Debus and the KSC management. V. L. Jansen, Executive Assistant to the Chief of KSC's Plant Engineering and Maintenance Division, coordinated the overall program.

"The purpose of this conference," explained Jansen, "was to assimilate all the maintenance ideas presented, to enable the participating Centers to select the best viewpoints and ideas expressed and to adopt an approved plan of action for those particular areas of interest."

One of the principal speakers was R. C. Daley, KSC's Chief of Plant Engineering and Maintenance Division. His talk centered on the establishment of a uniform equipment management program for all manned space flight centers.

"The reaction and general comments of the attendees," said Jansen, "was that this third conference was an unqualified success. The amount of hardware and vast utilities and facilities available here certainly aided in the technical presentations. Since KSC is the ultimate objective for all the efforts of the other Centers, it is where the program actually flies or dies."

- end -

2A.2, #36

KSC news release

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-263-66
FOR RELEASE: Immediate

November 22, 1966

Gemini/Titan Launch Team Wins Awards

KENNEDY SPACE CENTER, Fla.---Key members of the highly-successful Gemini/Titan launch team, both NASA and Department of Defense, are among those who will receive awards tomorrow at the Manned Spacecraft Center in Houston.

NASA's Outstanding Leadership Medal will be presented to John J. Williams, Director of Kennedy Space Center Spacecraft Operations, and Major General Vincent G. Huston, Commander of the Air Force Eastern Test Range. NASA Administrator James E. Webb will make the presentations.

The two-man Project Gemini series is the intermediate step between the Mercury flights and the Apollo moon missions. It was closed out with the recent Gemini 12 mission. Kennedy Space Center is the major NASA launch organization for manned and unmanned space missions.

(more)

In all, about 80 NASA, Air Force and contractor awards will be presented.

Exceptional Service Medals will go to Gemini 12 astronauts James Lovell and Buzz Aldrin, and to Lt. Colonel Jack Albert, Chief, Gemini/Titan Division, Air Force 6555th Aerospace Test Wing, among others.

Dr. George E. Mueller, NASA's Associate Administrator for Manned Space Flight, will receive the Distinguished Service Medal.

Superior Achievement Awards will go to the following KSC spacecraft operations employees: Wiley Williams, Manager of Gemini Operations; Joseph Bobik, Chief of Quality Surveillance Division; George Page, former chief test conductor for the Gemini spacecraft; Arthur Busch, Chief of Flight Systems Division; and John Janokaitis, Deputy Manager of Gemini Operations.

G. Merritt Preston, Deputy KSC Director for Launch Operations and Deputy Gemini Mission Director for Launch, will accept a NASA Group Achievement Award for the KSC Gemini launch team.

Colonel Otto Ledford, Commander of the 6555th, and Colonel McLean Elliott will accept a similar award for the Air Force launch operations and range support team.

Certificates of appreciation will go to: Colonel Elliott and Chief Warrant Officer Elmer Barton of the Air Force Eastern Test Range; Lt. Colonels Joseph Henry, Walter Flagg and LeDewey Allen and Majors Charles Bowdish and James Cooper of the 6555th; Kenneth Newton of General Dynamics Convair (Atlas contractor); Bud Zeller of Lockheed (Agena contractor); Joseph Verlander and Frank Carey of Martin (Gemini/Titan contractor); H. H. Luetjen, William Mosley, Guenter Wendt, Tom Turner and Raymond Hill of

McDonnell (Gemini spacecraft contractor); and James O'Brien of Pan American (Eastern Test Range contractor support).

John Williams was cited for "technical direction of spacecraft operations at KSC, and for his significant contributions from the beginning of manned space operations to the completion of the Gemini Program."

General Huston's award was for "his significant contributions in directing the efforts of the Eastern Test Range in providing the critical launch and range operations support and in the coordinating and directing the total efforts of the Department of Defense operational support forces for the Gemini program."

Lt. Colonel Albert's medal was for "directing the checkout and launch operations of Gemini launch vehicles, especially for directing launch vehicle operations in support of Gemini missions 7-6, during which two spacecraft were launched within a period of 11 days, thereby enabling the U.S. to achieve the first rendezvous of two manned spacecraft."

The KSC Group Achievement Award was for "outstanding team effort in conducting spacecraft test and checkout activities for all Gemini flights to insure systems reliability and astronaut safety, within the constraints of tight schedules and short launch intervals."

The Air Force Group Achievement Award was for "outstanding teamwork by the 6555th in conducting launch operations and to the Eastern Test Range team for range support for Gemini space flight missions. They exhibited exceptional technical competence and dedication to duty in successfully launching and coordinating range support operations."

(more)

The Superior Achievement Awards to Williams, Bobik, Page, Busch and Janokaitis were for outstanding service to the manned space program in their specific fields.

Albert F. Siepert, Deputy Center Director, will present the KSC awards.

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KSC news release
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A-2, #36

RELEASE NO: KSC-269-66
FOR RELEASE: Immediate

December 6, 1966

2,408 FOREIGN VISITORS TOUR

KENNEDY SPACE CENTER

KENNEDY SPACE CENTER, Fla. - More than 2,408 foreign visitors from some 50 countries have toured the Kennedy Space Center and Cape Kennedy Air Force Station on public bus tours since they began July 22.

As of December 5, the visitor attendance reached 140,505. About half of the foreign visitors, 1,202, were Canadians, with 208 from Great Britain and 157 from West Germany.

Other countries represented were: Argentina, Australia, Austria, Belgium, Bolivia, Brazil, Chile, Colombia, Costa Rica, Denmark, Ecuador, Finland, France, Greece, Guatamala, Haiti, Holland, Honduras, India, Ireland, Israel, Italy, Jamaica, Japan, Jordan, Kenya, Lebanon, Malaya, Mexico, Monaco, Norway, New Foundland, New Zealand, Nigeria, Norway, Pakistan, Peru, Philippines, Portugal, Rhodesia, Saudi Arabia, Scotland, South Africa, Spain, Sweden, Switzerland, Thailand, Trinidad, Turkey, Uruguay, Venezuela and Zambia.

The tours are conducted for NASA by Trans World Airlines.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #36

RELEASE NO: KSC-273-66
FOR RELEASE: Immediate

December 7, 1966

DUCK HUNTING GOOD AT SPACEPORT

Duck hunters at the Merritt Island National Wildlife Refuge are finding game plentiful this season, and many are bagging their limit of ducks and coots within a few hours.

In the first three days that the 25 Refuge blinds located on NASA property at the Kennedy Space Center were open, hunters bagged 239 ducks and 70 coots -- an average of more than 100 waterfowl per day.

The Merritt Island National Wildlife Refuge, managed by Curtis Wilson, covers 38,700 acres of land acquired by NASA for the Spaceport, and was set up in August 1963 under terms of an agreement between the Department of the Interior and NASA.

The action was in keeping with the Bureau of Sport Fisheries and Wildlife's program to develop the recreational potential of refuges where such use is compatible with the management objectives of each area.

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The program also furthers KSC's policy of affording controlled public access to the area without interference with operations.

Both NASA and the Bureau recognized that a portion of the Refuge, particularly land fronting the Indian River, was an exceptionally good duck hunting area.

So provisions were made in 1964 to set up blinds and allow local hunters limited access for hunting privileges during each season. This is the third consecutive year this plan has been in effect.

During the season, hunting is permitted from one-half hour before sunrise until noon, five days per week, Tuesday through Saturday, during the period November 24 through November 27 and December 3 through January 8, 1967.

Hunters desiring advanced reservations should apply in writing to the Refuge Manager, Merritt Island National Wildlife Refuge, P. O. Box 956, Titusville, 32780.

Fees are $3 per blind per day.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #36

RELEASE NO: KSC-274-66
FOR RELEASE: Immediate

December 7, 1966

BOND'S '007' APPLIED TO SPACE INVENTION

KENNEDY SPACE CENTER, Fla. -- An '007' ground support equipment has been invented by a Kennedy Space Center employee.

Herb Cribb, a Ground Support Equipment technician in the Manned Spacecraft Operations Building, has designed a device -- GF-E-007 -- for detecting and testing signals of tracking beacons on C-Band systems in boosters and spacecraft.

The C-Band is a frequency used for spacecraft beacons, launch pad antennas, transmission lines, radar MSO building transmit and receive facilities, range radar interrogate and beacon reply facilities and other facilities of this radar operation.

The device was created by Cribb to replace eight cumbersome and weighty pieces of equipment that were previously used by Spaceport technicians to run the same tests.

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"I built the '007' because it saves a lot of time and effort," he explains. "Now, rather than lugging over 400 pounds of assorted expensive equipment onto and around the pads, we can easily and more effectively check the C-Band systems in one fifth the time with a light-weight, 45-pound device."

The GF-E-007 will also save NASA a large sum of money. It only costs $1,000, whereas the eight pieces of equipment run around $20,000.

It has already been used by NASA on the past Gemini program and will be the method for checking interrogating and system testing signals in the Saturn and Apollo programs.

Cribb made his first GF-E-007 out of old Mercury beacon parts. A beacon is a radar tracking mechanism used in spacecraft. He built it "behind the racks in the MSO building."

The GF-E-007 can also be used by the technicians as a detector of malfunctions. It can be inserted anywhere in a C-Band system for troubleshooting purposes.

Cribb has submitted three other inventions for patents since he came to the Kennedy Space Center in 1959, among them were a Low Loss "C" Band Parasitic Probe and a VHF/UHF Parasitic Probe Antenna. Both were improvements in prelaunch testing methods. All four inventions have been used by NASA at one time or another.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #36

news release

RELEASE NO: KSC-290-66
FOR RELEASE: Immediate

December 8, 1966

RAGUSA RECALLS GEMINI SUPPORT

KENNEDY SPACE CENTER, Fla. -- For Jim Ragusa, the job was interesting and varied.

As Gemini complex engineer, he was responsible for coordination of all on-site spacecraft support operations at Pad 19 (Gemini), Complex 14 (Agena Target Docking Adapter), and the astronauts' suiting facility at Complex 16.

Ragusa also served as NASA systems engineer for all television, motion picture and still photography coverage of spacecraft operations at the pads, both for technical personnel and dissemination to the news media.

In addition, he was called upon to provide technical briefings on space-craft operations to visiting VIPs and well-known media representatives.

Ragusa also chaired the 25-man Gemini Egress Committee, assuming responsibility for developing procedures and techniques to ensure the safety of the astronauts at the launch pad. He conducted a school on pad safety and egress procedures for all flight crews in the Gemini Program.

- more -

"Providing for the safety of the flight crews was the most nerve-racking part of the job," he confesses. "We had to plan ahead, to anticipate every possible type of emergency, then come up with a solution.

"This involved setting up and coordinating on-site recovery of the astronauts should ejection from the spacecraft become necessary, as well as proper use of the spacecraft ejection system, erector egress elevator and slide wires and the cherry-picker (a truck-driven, extendable platform capable of reaching the spacecraft from the ground)."

The Committee's safety techniques paid off during the Gemini 5 wet mock test. Astronauts Cooper and Conrad were in the Gemini and the booster was fueled. The erector was lowered but refused to come back up after completion of the test.

"We got Cooper and Conrad out with the cherry-picker," said Ragusa. "It was an authentic test and proved the value of this type rescure method."

A native of Chicago, Ragusa, 28, earned a B.S. degree in mechanical engineering from the University of Illinois in 1961. He served with the Air Force at Vandenburg AFB, California,as a first lieutenant and received commendation for being the youngest ICBM site commander in the Free World. Ironically, he commanded a Titan-2 site.

He joined KSC in May 1964, and one month later was phased into the Gemini Program. His spare time is spent collecting coins and studying for a master's degree in management from Florida State University. He resides with his wife, Barbara, and two children, Sally, 4, and Mark 2, at 1600 Oriole Court, Titusville.

Ragusa is proud of his role in the Gemini Program, but is looking forward eagerly to the Apollo flights. He is now serving as a management staff assistant to Bailey Stimson, Chief of the Support Operations Management Office.

He also represents the Technical Support Operations Office on the Apollo Egress Committee, a role he is well suited for, and is working on problems and their solutions for all NASA launch complexes.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A-2, #36

RELEASE NO: KSC-298-66
FOR RELEASE: Immediate

December 13, 1966

DATA SYSTEMS PROVIDED "MEANINGFUL INFORMATION"

KENNEDY SPACE CENTER, Fla. -- "It's our job to provide meaningful information to systems engineers whose job it is to always know how a particular space vehicle system is functioning."

Thus, Dr. Rudolf H. Bruns, Chief of the Data Systems Division, and Peter A. Minderman, Chief of the Telemetric Systems Division, described the function of the Information Systems Directorate.

"This function", they continued, "was of great importance in the Gemini program when we were dealing with manned space vehicles.

"Prior to this, in the early Saturn 1 program, we had a very short post-launch interest. With Gemini, we were receiving data as much as four weeks after mission completion."

The first Gemini flight to be supported by the equipment in KSC's Central Instrumentation Facility was Gemini 5. Prior to that launch, equipment housed in Hangar R at the Cape was used.

- more -

The newer equipment in the CIF was designed for the Apollo program, but proved to be flexible enough to handle data from Gemini launch vehicles and spacecraft as well as from the Atlas-Agena target vehicles.

In layman's terms, "providing meaningful information" means translating or reducing electronic signals from a space vehicle into intelligent data. This is accomplished by coupling a network of highly sophisticated instrumentation with a crew of skilled specialists.

For example, several hundred measuring instruments were built into the Gemini spacecraft and launch vehicle. These strategically placed transducers transmitted electronic signals -- "bloops, bleeps, cleeps" -- that were then electronically translated into charts familiar to engineers.

Among the types of data reduction are quick-look reduction and real time reduction. Both are essential from pre-launch tests through oribital activity. Real time provides instant information and quick-look provides information within a few hours.

"Actually, it's not too difficult to understand", Dr. Bruns said, "if we think of this in common references. Every car has transducers", he continued, "that transmit electronic signals, a gas or temperature gauge, for instance. A good example for real time reduction in a car is the speedometer, which tells the driver just how fast the car is travelling at that time."

With Gemini, the task of gathering, reducing and distributing data began approximately four weeks before launch. It continued through all major tests, checkout, launch and orbital activities.

The CIF facilities received data from the world-wide tracking network for reduction and distribution. This reduced data was recorded on magnetic tapes, strip charts, microfilm, etc., and then forwarded to using agencies such as KSC Spacecraft Operations, the Manned Spacecraft Center in Houston and the Air Force.

Another function of the Directorate was processing weather information received from the Air Force weather balloons. Since wind direction and velocity can critically affect a launch vehicle's performance, this data has to be reduced and distributed very quickly, often determining the "go-no go" for a launch. Reuben L. Wilkinson's Measurements Systems Division recorded sound intensities around the Titan pad during launch.

What might be the most significant aspect of the CIF support provided in the Gemini program?

As summarized by Karl Sendler, Director of Information Systems, "this gave us a fine opportunity to become familiar with the very complicated instrumentation which permits our data systems to function. Gemini was on a smaller scale than Apollo will be, and we have learned much from Gemini that will apply to Apollo."

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #36

news release

RELEASE NO: KSC-297-66
FOR RELEASE: Immediate

December 13, 1966

GEMINI PROGRAM AIDED BY SUPPORT OPERATIONS

KENNEDY SPACE CENTER, Fla. -- Among the many Kennedy Space Center elements that contributed much to the overall success of the Gemini Program was Support Operations, directed by Robert E. Gorman.

"It was our people's job," said Gorman, "to obtain and coordinate all support for the spacecraft activities at Pad 19.

"We performed as a catch-all group, responsible for the spacecraft support operations, with an overseeing function to fill in the gaps that occurred and to make the operation run smoothly."

Bendix employees, under Support Operations supervision, provided such services as ordnance, propellants and gases, astronaut ventilation and transportation, and the test facility operations support for Gemini testing.

- more -

Other types of support included fabrication, cleaning and gas and material analysis via shop and laboratory support. Contractors involved were Technicolor, RCA, Ling-Temco-Vought, Federal Electric, TWA and McGregor-Werner.

Gorman and his people are particularly proud of the fact that during the entire Gemini program their operations never caused a hold in a count or major test, or a slip in the schedule.

And their work did not end with Gemini 12.

"As a matter of fact," Gorman said, "we are already deeply involved in the Apollo program, providing similar services."

- end -

2A.2, #36

KSC news release

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

RELEASE NO: KSC-330-66
FOR RELEASE: Immediate

December 20, 1966

NO SPACEPORT TOURS ON CHRISTMAS DAY

KENNEDY SPACE CENTER, Fla.-----The Cape Kennedy Air Force Station and the Kennedy Space Center will be closed to all public tours Christmas Day, the Air Force and NASA jointly announced today.

The regular Sunday automobile drive-through tours of the Cape and KSC will not be held on Christmas Day. Instead, auto tours of only the KSC facilities will be permitted on Monday, December 26.

NASA's daily escorted bus tours of the Spaceport and Cape will be open through the holidays except for December 25.

Public drive throughs of Cape Kennedy and the Space Center on Merritt Island --for visitors in private vehicles--will be open on Sunday, New Year's Day.

Additionally, free space films will be shown in NASA's Public Information Office Auditorium on the 10th floor of the Cape Royal Office Building, from December 27 through 30. The Cape Royal Building is at Cocoa Beach, Florida.

Films will include "The Gemini-12 Mission," "Spaceport, USA," and "Shelter of the Giants." Showings of the 45 minute presentation will be at 8:30 a.m., 9:30, 10:30, 12 noon, and 1, 2 and 3 p.m.

The daily bus tours begin at the Kennedy Space Center's Gate 3, located off U.S. 1 between Titusville and Cocoa. Hours are 8:30 a.m. to 3:30 p.m.

On Sundays, motorists may enter the Cape and Spaceport either at Gate 3 or at the south gate to the Cape, located just north of Port Canaveral.

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PUBLIC INFORMATION OFFICE, COCOA BEACH - 783-7781, KSC - 867-2467

2A.2, #37

KSC

KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-318-66
FOR RELEASE: Immediate

December 21, 1966

A BANNER YEAR AT SPACEPORT

KENNEDY SPACE CENTER, Fla. -- Successful completion of the Gemini Program.

-- Near-perfect performance of first three uprated Saturn I flights, and preparation for initial manned Apollo launch.

-- Surveyor soft-landing on the moon, and fantastic close-up photos from Lunar Orbiter.

-- Spaceport tour of President Lyndon B. Johnson and German Chancellor Ludwig Erhard.

These were some of the bannered headlines that featured Kennedy Space Center news events of 1966 -- the most fruitful single year here ever.

- more -

It was, in fact, a year so chock-full of front page stories, it was hard to choose any one over another. 1966 saw the roll-out ceremonies of the mobile launcher, transporter and Saturn V 500F facilities vehicle. It was the year when bus tours of the Spaceport were opened to the public and the initial response was overwhelming.

Launch-wise alone it was a highly productive 12 months, with more than 30 major flights taking place at KSC facilities here and at the Western Test Range in California.

Internally, the Center took a streamlined step ahead with a reorganization geared to prepare everyone for the increasing responsibilities of the Apollo Program.

And, the year closes on a high note, with launch vehicle and spacecraft crews preparing the first manned Apollo flight and the first Apollo/Saturn V shot for the first part of 1967.

Here's a month-by-month checklist of the 1966 top stories at the Kennedy Space Center:

JANUARY: Transporter One passed a number of critical acceptance tests by successfully hauling a mobile launcher a mile to the Vehicle Assembly Building.

FEBRUARY: ESSA 1, a meteorological satellite was launched on the 3rd - - the first NASA flight of 1966. On the 26th, the first uprated Saturn I was successfully test flown, making it 11 in a row for the Saturn family.

MARCH: The second ESSA was orbited. Gemini 8, astronauts Neil Armstrong and David Scott aboard, was launched. Although the mission was shortened due to technical troubles, Gemini 8 made the first docking in space.

MAY: Center Director Dr. Kurt H. Debus announced a reorganization as an outgrowth of the rapid buildup of KSC in the past three years. "With the new organization, we expect to be able to develop additional management capability sufficient to handle any of the new operational problems we know will arise in the months ahead," Dr. Debus said.

Nimbus II was launched under the direction of a Unmanned Launch Operations team from KSC facilities on the west coast. It was the 50th satellite flight for ULO.

On the 25th - - the fifth anniversary of the late President Kennedy's setting of the lunar landing goal this decade - - the Apollo/Saturn V 500F facility vehicle was transported from the VAB to Pad A to begin a series of tanking tests. This milestone event was given wide national coverage, and signaled a major step forward in the development of the mobile launch concept at Complex 39.

JUNE: Astronauts Tom Stafford and Gene Cernan flew Gemini 9 on a three-day orbital journey that included a two-hour space walk by Cernan. The third Orbiting Geophysical Observatory was launched.

The Kennedy Athletic Recreation and Social organization announced plans to develop a 230-acre tract of land into a recreational area for KSC employees.

JULY: Uprated Saturn I vehicle 203 made it 12 in a row for the Saturn family. Rocco Petrone was named KSC Launch Director and John Shinkle was appointed Manager of the Apollo Program at KSC.

On the 22nd, the Kennedy Space Center inaugurated daily escorted bus tour service to the public. Response was immediate and enthusiastic, with nearly 2,000 visitors per day. In five months, nearly 150,000 people from the United States and more than half a hundred foreign countries toured the Spaceport.

AUGUST: Lunar Orbiter, following a near-perfect countdown and launch, went into an orbit around the moon's surface and began taking closeup photos to help NASA choose landing sites for Apollo astronauts later this decade.

Uprated Saturn I 202 became the 13th consecutive successful launch vehicle in a series of flights dating back to October 27, 1961. So fine was the performanc that officials later decided to man the next vehicle - - AS-204.

SEPTEMBER: Gemini 11 astronauts Pete Conrad and Dick Gordon came back to KSC for debriefings and physical examinations following their successful flight in which they set a new world altitude record of 850 miles. KSC-Air Force-contractor launch crews met a two second window to get Gemini off in time for a first revolution rendezvous.

On the 27th, President Lyndon B. Johnson and German Chancellor Ludwig Erhard visited KSC and were briefed on launch operations here.

In the transfer aisle of the Vehicle Assembly Building, President Johnson told employees, "I want each man and woman associated with this endeavor to know how much your country appreciates your efforts here. Five years ago the moon was far beyond our reach. Today it is near. What you are doing here is opening up vast new possibilities for men of science.

"You people here are helping endow all of human life with your new inventions and accomplishments. To each employee I say thank you. We appreciate you and we admire you."

Surveyor II was successfully launched.

OCTOBER: KSC received two top national awards at formal presentation ceremonies in Washington. The 1966 Outstanding Civil Engineering Achievement Award was made for Launch Complex 39, and Peter Minderman, Chief of Telemetric Systems, was presented the NASA Exceptional Service Medal for his part in the design and development of a Data Core System and a Real Time Data Display System.

An ESSA weather satellite was launched from KSC facilities at the Western Test Range in California. It was the first Delta flight there.

ULO crews launched Atlas-Centaur 9 on a flight to test the Centaur upper stage capability to restart the two high-energy hydrogen-oxygen engines in space. They also launched a spacecraft for the Communications Satellite Corporation.

NOVEMBER: A second Lunar Orbiter was successfully sent to photograph the moon's surface, and sent back spectacular pictures.

Gemini 12, with astronauts James Lovell and Buzz Aldrin, was a resounding success, capping the program. It was complete with record setting space walks, rendezvous and docking and completion of a number of experiments.

A number of key KSC employees were honored at Gemini award ceremonies in Texas, including John Williams, who received NASA's Outstanding Leadership Medal.

Fifty United Nations ambassadors, delegates and representatives of 22 countries visited the Spaceport and were awed by what they saw.

"This gives us such a new respect for what men can do when they work together," one delegate said.

DECEMBER: ULO directed the launch of an Applications Technology Satellite and a Biosatellite -- to further man's knowledge in space communications, meteorology and on the effects on living organisms under weightless conditions.

- end -

2A.2,#37

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-317-66
FOR RELEASE: Immediate

December 21, 1966

LBJ HEADED VIPS AT SPACEPORT IN 1966

KENNEDY SPACE CENTER, Fla. -- President Lyndon B. Johnson and Vice President Hubert Humphrey led a distinguished list of visitors to the Kennedy Space Center in 1966.

Other VIPs who toured the Spaceport included Chancellor Ludwig Erhard of Germany; Prince and Princess Gholam Reza Pahlavi of Iran; Chief Justice and Mrs. Earl Warren; Secretary of Defense Robert McNamara; and ambassadors, delegates and representatives from 22 countries in the United Nations.

In all, the KSC Protocol Office conducted more than 800 official tours during the year for approximately 24,000 visiting dignitaries.

These were in addition to the hundreds of thousands of tourists who drove through the Center or took escorted bus tours for the public.

- more -

Among the many distinguished visitors in 1966 were a number of United States senators and congressmen, including ranking members of Congressional space committees.

Internationally, there were representatives from about 100 foreign countries, including, Algeria, Argentina, Austria, Australia, Afghanistan, Belgium, Brazil, Canada, Chad, China, Costa Rica, Congo, Cyprus, Chile, Denmark, Dubai, Dahomey, Dominican Republic, Ethiopia, El Salvador, Ecuador, Columbia, and Finland.

Also France, Germany, Ghana, Greece, Guatemala, Guyana, Honduras, India, Iran, Italy, Ireland, Israel, Iraq, Iceland, Japan, Jordan, Korea, Laos, Liberia, Libya, Lebanon, Malawi, Malta, Maurintania, Mexico, Morocco, Netherlands, Nigeria, New Zealand, Norway, Panama, Pakistan, Peru, Philippines, Poland, Portugal, Republic of South Africa, Romania, Saudi Arabia, Sierra Leone, Scotland, Spain, Sweden, Sudan, Switzerland, Syria, Thailand, Taiwan, Tunisia, Turkey, United Arab Republic, United Kingdom, Venezuela, Viet Nam, Yemen, Yugoslavia, and Zambia.

Among other dignitaries who toured the Center in 1966 were, Cardinal Seper of Yugoslavia, Cardinal Conway of Ireland, and members of the London Symphony Orchestra.

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2A.2, #37

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-319-66
FOR RELEASE: Immediate

December 21, 1966

KSC PROCUREMENT DIVISION PLANS STATEWIDE INDUSTRIAL EXPOSITIONS

KENNEDY SPACE CENTER, Fla. -- The Kennedy Space Center Procurement Division is planning to participate in three industrial expositions in the state during the coming weeks -- one locally, one in Orlando and one in Tampa-St. Petersburg area.

"Our mission in these expositions will be to acquaint industry and the community at large with the space program, and to assist firms desiring to learn how they can do business with the Center," said Procurement Chief M. E. Haworth.

"It is expected that more than 100,000 people will be contacted at these three meetings," Haworth said.

The Spaceport Procurement Office was also visited by 2,555 industry representatives for individual counselling with the NASA industry advisor and individual buyers in the past three months.

- more -

These visitors checked NASA's bid boards, checked bid specifications and picked up bid packages.

KSC maintains three bid boards for industry representatives - - one at each main entrance to the Spaceport and one in the Procurement Lobby of the Center's Headquarters Building.

Haworth also said 422 bidder's source register application forms were distributed in the last three months to firms interested in doing business with NASA.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

RELEASE NO: KSC-316-66
FOR RELEASE: Immediate

December 21, 1966

CHRISTMAS AT THE SPACEPORT

KENNEDY SPACE CENTER, Fla. -- Not all Kennedy Space Center employees will be spending their Christmas at home. Some will be tending the Spaceport while observing the yuletide.

At support areas, including the Fire Department, the KSC Patrol, the Maintenance Department and the Medical Center, crews will be on hand night and day during the three day holiday period.

The Fire Department will have three shifts working over the long weekend, according to Chief W. F. Eldredge.

The KSC patrol will have normal security operations. A standard force will be on duty for all three days, revealed George E. Morford, Chief, Launch Operations and Physical Security Branch for NASA.

- more -

Hangars 'S', 'AE' and 'AO' on the Cape will have air conditioning mechanics on duty checking the temperatures of the clean rooms. Tom Bryant, supervisor of NASA Clean Rooms, said that NASA will have air conditioning mechanics on duty around the clock only as long as spacecraft are in the rooms.

Clean rooms supply a controlled, uncontaminated environment for the assembly of unmanned spacecraft.

The Medical Center will have a minimum contingent of corpsmen and nurses at KSC for emergencies, but no doctors.

Reduced staffs will maintain the water and waste, the electrical and air conditioning and heating facilities for the Spaceport over the holidays, according to H. Brunke, Chief, Utilities, Engineering and Operations Branch.

Launch support operations will have a 'baby sitter' for the Apollo command module in the Manned Spacecraft Operations building. C. D. Gay, Deputy Operations Manager and Chief Test Conductor for Spacecraft 12 -- Apollo 204, pointed out that a North American inspector will monitor the spacecraft with a NASA inspector throughout the three days.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A, 2, #37

news release

RELEASE NO: KSC-275-66
FOR RELEASE: Immediate

December 21, 1966

SPACE HAS OPENED DOORS FOR QUALIFIED WOMEN

KENNEDY SPACE CENTER, Fla. -- "The Space Program has really opened the doors of opportunity in the technical field, as far as women are concerned," says Janie Callahan, a mathematician in the Kennedy Space Center's Flight Safety Office.

She maintains that as a result of the program outside industry is just now realizing that women can, and are, playing positive roles in research and other technical areas.

Janie further contends that women have now been afforded the opportunity to prove themselves in fields that were once considered a man's domain.

"However," she adds, "I don't think it was prejudice so much as a lack of work that kept women out. The demands were just not critical enough. But this has all changed now, and, as a matter of fact, it is continuing to change almost on a daily basis."

- more -

Since 1947, after graduating from Texas Christian University where she holds two degrees in mathematics, Janie has been involved in advanced fields of technology: first, with a geological exploration crew combing the oil fields of Texas, then with General Dynamics in Fort Worth as an associated engineer concerned with the performance of the B-58, and now with her present position at KSC.

A four year veteran at the Spaceport, she works for A. H. Moore, Chief of Flight Safety, conducting orbit and trajectory studies on all the Saturn launch vehicles.

Janie says of her work, "it is an honor in itself to be part of the Government-industry team in the space program, but doubly so to be here at KSC where all the programs either fly or die."

Working in complex and technical areas at KSC has not dulled her tastes for the more refined and feminine activities. Most of her spare time, for example, is spent in making her own clothing and working needle-point on fine tapestries and linens.

"But, to see the bird lift off and perform exactly as expected -- that's still the biggest thrill for me."

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A.2, #37

RELEASE NO: KSC-323-66
FOR RELEASE: Immediate

December 27, 1966

RECORD NUMBER OF PERSONS TOUR KENNEDY SPACE CENTER

KENNEDY SPACE CENTER, Fla. -- The Kennedy Space Center recorded its greatest single daily attendance today for bus tours when ~~3,000~~ 3,580 persons visited the Nation's Spaceport.

This figure topped a previous record of 2,615 visitors established only the day before.

More than 150,000 persons have taken these guided bus tours since they began last July, and the National Park Service estimates that the daily average attendance will reach 12,000 by 1970.

An average of 2,000 persons per day visited during the first two months of operation, but daily attendance declined after the reopening of schools in September.

The winter tourist season and the special school Space Science Lectures have boosted attendance to new highs. (Since October 1, more than 3,500 students participated in the Space Science Lectures and tours.)

- more -

Commenting on today's record number of visitors, Byron G. Jackson, director of NASA tours for Trans World Airlines, which conducts the tours under contract to NASA, said that it was necessary to double their schedules. They dispatched buses every seven minutes instead of every 15 minutes. Jackson went on to note that all available personnel and buses were pressed into service to accommodate the unprecedented record attendance.

While awaiting their turn to tour the Spaceport, visitors examined the aerospace exhibits housed in NASA's display building. A new refreshment area and souvenir stand, opened the day before, provided additional facilities.

The visitor log indicated that every state in the Nation and several foreign countries were represented. (Since the tours began last July, persons from more than 50 foreign nations have seen the Spaceport.)

Today's comments about the tour were most favorable, with visitors citing the Vehicle Assembly Building (VAB) and the Complex 39 Moonport as highlights of the tour. Visitors are allowed to photograph the inside of the VAB through protective glass and also leave their bus at the Complex 39 launch pad.

Ten-year-old Robert Bunting, of Ottawa, Canada, summed up the tour by saying it "was neat."

- end -

Mr. and Mrs. David Porter, of Bethesda, Maryland, noted that the tour captured the attention of their children, who ranged in age from 8 to 15 years.

"I was delighted that NASA allows visitors to the Kennedy Space Center," said James Taylor, of Dayton, Ohio.

Miss Barbara Zust, of Zurich , Switzerland, declared that everyone visiting Florida should stop at the Kennedy Space Center, regardless of their destination.

Mr. and Mrs. Larry Dorzback, of River Edge, New Jersey, noted that the tour goes beyond one's imagination.

Tourists were not the only ones to comment--Bud Clark, a TWA tour guide--said that most persons ask sensible and stimulating questions during the course of the bus tour, which are good enough to make him keep up on his aerospace current events.

Tour operations are based at the Kennedy Space Center's main entrance, just off U.S. Highway 1, two miles south of Titusville, Florida. Buses operate between 8:00 A.M. and 3:30 P.M.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

news release

2A,2,#37

RELEASE NO: KSC-325-66
FOR RELEASE: Immediate

December 29, 1966

KENNEDY SPACE CENTER MANPOWER STRENGTH TO INCREASE

KENNEDY SPACE CENTER, Fla. -- Personnel strength at the Kennedy Space Center is expected to increase from a present figure of 21,700 to more than 24,000 during the first six months of 1967.

Most of the buildup will be for the Apollo/Saturn V program, with the first launch of this vehicle scheduled for late spring.

NASA employees at the Center number over 2,650 and this figure is expected to increase to 2,800 over the next few months.

Spaceport support contractor now total about 8,600, and will number over 9,750 by June 30, the end of the fiscal year.

Largest single employer is Trans World Airlines, with 2,665, including about 350 Wackenhut security patrol and fire department members. TWA provides a variety of maintenance and operational support services at KSC. Their employee level will reach 2,800 by June 30, 1967.

- more -

Bendix has over 1,900 people providing launch operations support to NASA, and this number will reach approximately 2,250 in the next six months.

RCA has 500 employees in communications support and will have about 530 by June 30. Federal Electric figures will jump from a present strength of 475 to 800. The company is engaged in instrumentation data and tracking support.

Boeing, with 600 employees in a site activation and launch support equipment mission, expects to build up to 950. Chrysler, currently at 280 employees, performing launch support, will decrease slightly.

Ling-Temco-Vought and its sub-contractors, Technicolor and McGregor-Werner, presently have about 980 employees providing administrative, writing, photographic and reproduction services. This figure will not change much.

General Electric has 970 people at the Spaceport in a variety of support activities.

Dow Chemical and the Bechtel Corporation both work for KSC Design Engineering and have 230 and 430 employees, respectively. Their numbers will increase to 270 and 540. Computer Applications Inc., personnel will move from 260 to 300 during the next six months in providing electronic data support.

Stage, or hardware, contractors now are at 8,900 and will go to 10,000.

North American, contractor for both the Apollo spacecraft and second stage of the Saturn V, has 1,500 employees here now, and will increase to 1,750 by next June 30.

Boeing, which builds the Saturn V booster, will go from current 1,400 to 1,550. Others will increase as follows:

Chrsyler, (uprated Saturn I booster), 655 -- 850; Douglas (Saturn upper stage and Delta booster) 1,230 -- 1,325; IBM (Saturn instrument unit) 700 -- 850; Gruman (Lunar Module) 650 -- 1,100; Lockheed (Agena) 465 -- 465; General Dynamics Convair (Centaur, Atlas) 465 -- 430.

Gemini contractors Martin (Titan booster) and McDonnell (spacecraft) are phasing out in the local area now that the program has been completed.

- end -

KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #37

news release

RELEASE NO: KSC-324-66
FOR RELEASE: Immediate

December 30, 1966

KENNEDY SPACE CENTER

TO CONSOLIDATE TWO MAJOR CONTRACTS

KENNEDY SPACE CENTER, Fla. -- The National Aeronautics and Space Administration announced today that its John F. Kennedy Space Center is soliciting proposals for two major contracts to become effective July 1, 1967.

Requests for proposals were released Friday for the two contracts, one covering communications and instrumentation support services, and the other facilities support services.

The communications and instrumentation support services contract will consolidate support now provided by the Federal Electric Corp., a division of International Telephone & Telegraph Corp., and Radio Corp. of America Service Company. The tasks to be performed include timing and launch countdown, administrative intercommunications, public address and paging systems, fire reporting systems, security police communications, point-to-point telephone, mobile radio, operational inter-communications, television systems, test and switching center, communications centers, cable systems, prototype tracking, calibration and standards, facility and environmental measurements, data transmission, main telemetry, data display, electromagnetic compatibility, data storage and retrieval, operational planning, computer operations, scientific and administrative programming, data reduction and test support.

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Both the Federal Electric Corp. and RCA Service Company contracts expire June 30, 1967.

The facilities support services contract will replace those being performed by Dow Chemical Company in facilities engineering and the Bechtel Corp. in facilities modifications, both of which expire June 30, 1967.

The new contract will cover selected facilities engineering services such as documentation, configuration management, planning, engineering studies and investigations, development of design criteria, review of plans and specifications, preparation of design drawings and specifications, estimating, preparation and review of PERT networks, fabrication, assembly and installation of equipment; repair, minor construction and modification of industrial and launch complex facilities.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

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news release

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FOR RELEASE: Immediate

December 30, 1966

FACILITIES EXPANSION AT KENNEDY SPACE CENTER TO CONTINUE

KENNEDY SPACE CENTER, Fla. -- During 1966, many key facilities essential for future manned space missions became operational at the Kennedy Space Center.

These include the vast Vehicle Assembly Building in which 364-foot-high Apollo-Saturn V space vehicles will be assembled, and Pad A of Launch Complex 39, the lunar launch complex.

During the new year Pad B of Complex 39 will become operational. The addition of two wings to the KSC Headquarters Building is another major construction project for 1967.

Two of the four assembly areas, or high bays, in the 52-story VAB were activated this year. It is in one of these high bays that the first unmanned Apollo-Saturn V, scheduled for launch in 1967, is being assembled.

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The outfitting of a third high bay begins in 1967 with the scheduled completion date set for 1968.

Work in firing room 1 of the Launch Control Center at Complex 39 was completed in 1966, and a second firing room will become functional in 1967. Launches of Apollo-Saturn Vs will be controlled from these firing rooms. The launch pads are over three miles from the Launch Control Center.

The two launch pads, A and B, are "hardstands" designed to support a giant Apollo-Saturn V space vehicle and its mobile launcher - - a combined weight of 17 million pounds.

Some 68,000 cubic yards of concrete went into each of the pads, which are as high as a five-story building. With the completion of Pad B during the new year, KSC will have two operational Saturn V launch sites.

Currently under construction at Complex 39 is a large support operations complex. This will be a service and storage facility for rocket propellants, high pressure gases and associated equipment. More than 3,000 persons will eventually work at the complex which should be functional by the summer of 1967.

KSC took a giant step forward in preparation for upcoming Apollo missions with the completion of the Flight Crew Training Building in 1966. An Apollo mission simulator in the building, located in the KSC industrial area, duplicates instrumentation used by the astronauts during an actual flight.

The Flight Crew Training Building operated by NASA's Manned Spacecraft Center will be modified in 1967 to accommodate a Lunar Module simulator. Astronauts will descend to the moon's surface in a Lunar Module.

The planned addition to the KSC Headquarters Building calls for the addition of two new wings, at the east and west ends of the building. The extra space will be used as offices and working areas for the KSC staff. At present, some staff members are located in temporary offices.

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KSC
KENNEDY SPACE CENTER, FLORIDA
NATIONAL AERONAUTICS AND SPACE ADMINISTRATION

2A.2, #38

news release

RELEASE NO: KSC-328-66
FOR RELEASE: Sunday, January 1

January 1, 1967

SHIFT MADE IN KSC BUS TOURS

KENNEDY SPACE CENTER, Fla. -- As a result of experience acquired in the conduct of public bus tours since July 22, 1966, the Space Center has decided to operate over one tour route, instead of two, effective January 9, 1967.

The single tour will require approximately 2 hours, 15 minutes subject to some variation due to test schedules and traffic conditions. It will include Cape Kennedy Air Force Station and the NASA Spaceport on Merritt Island. Buses will depart from Gate 3 near US Highway 1, south of Titusville, from 8 A.M. to 3:30 P.M. every day in the week.

Seventy percent of the more than 160,000 visitors who have taken the tours chose the longer route which included Cape Kennedy and the Merritt Island installation. A shorter tour of 90 minutes duration covered only the NASA Spaceport.

Fares for the streamlined, single tour will be the same as those charged for the Cape Kennedy-Spaceport route:

- more -

Adult, $2.50; youths 12 to 18 years old, $1.25; under 12, $.50; under 3, free.

Students in groups of 20 or more with escort pay $1.00 for those above Junior High School, or $.50 each for those through Junior High School.

A special rate of $1.25 will be instituted for active duty military personnel only.

Students touring in groups receive a 45-minute space science lecture demonstration conducted by a professional educator.

The single tour plan will continue into May, 1967. The Space Center will then reexamine the attendance statistics and decide whether to reinstate the short tours during the Summer months when children comprise a substantial percentage of those participating.

A new Visitor Information Center located on the NASA installation on Merritt Island is expected to open July 1, 1967.

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