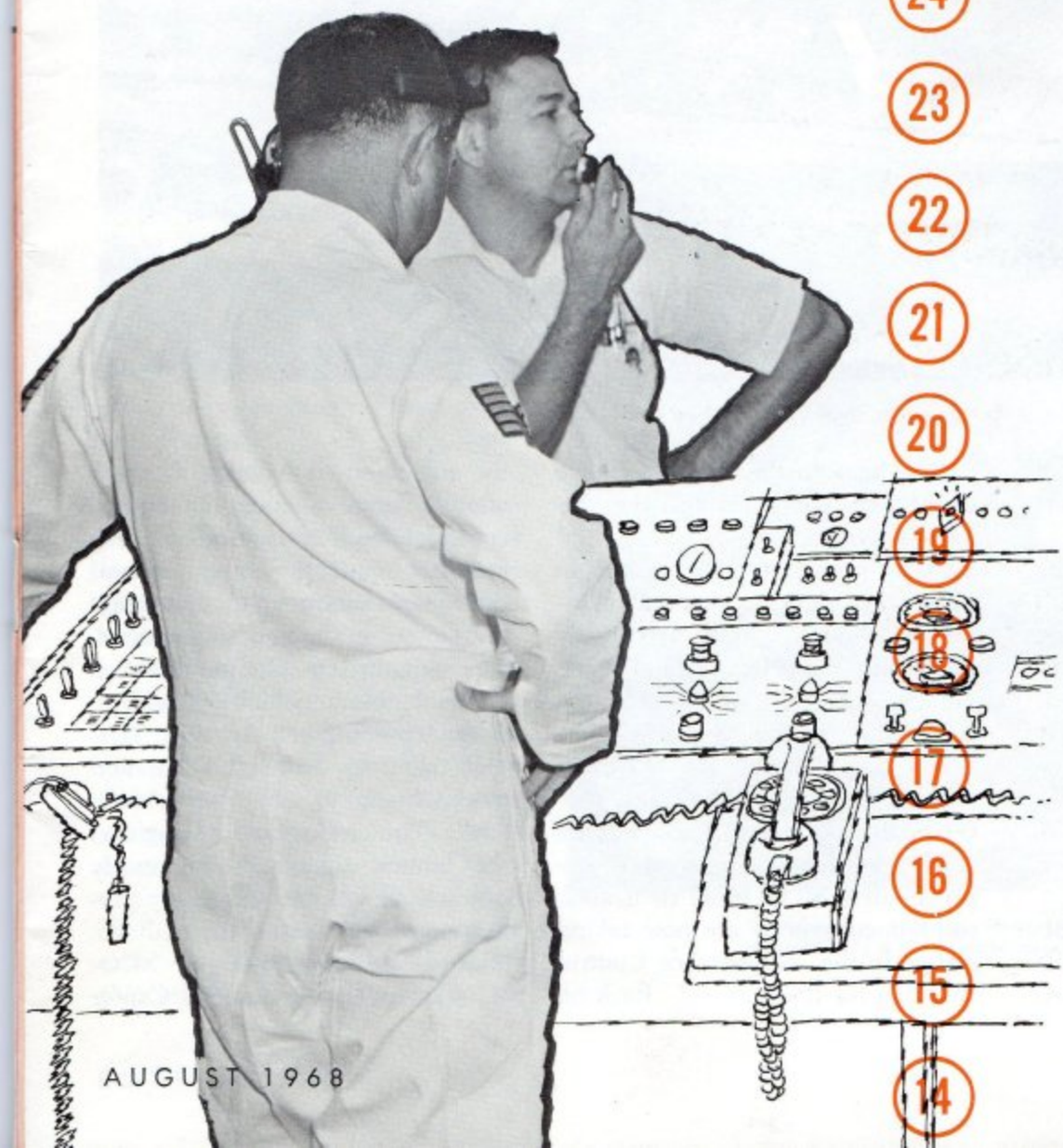
Interceptor

AUGUST 1968

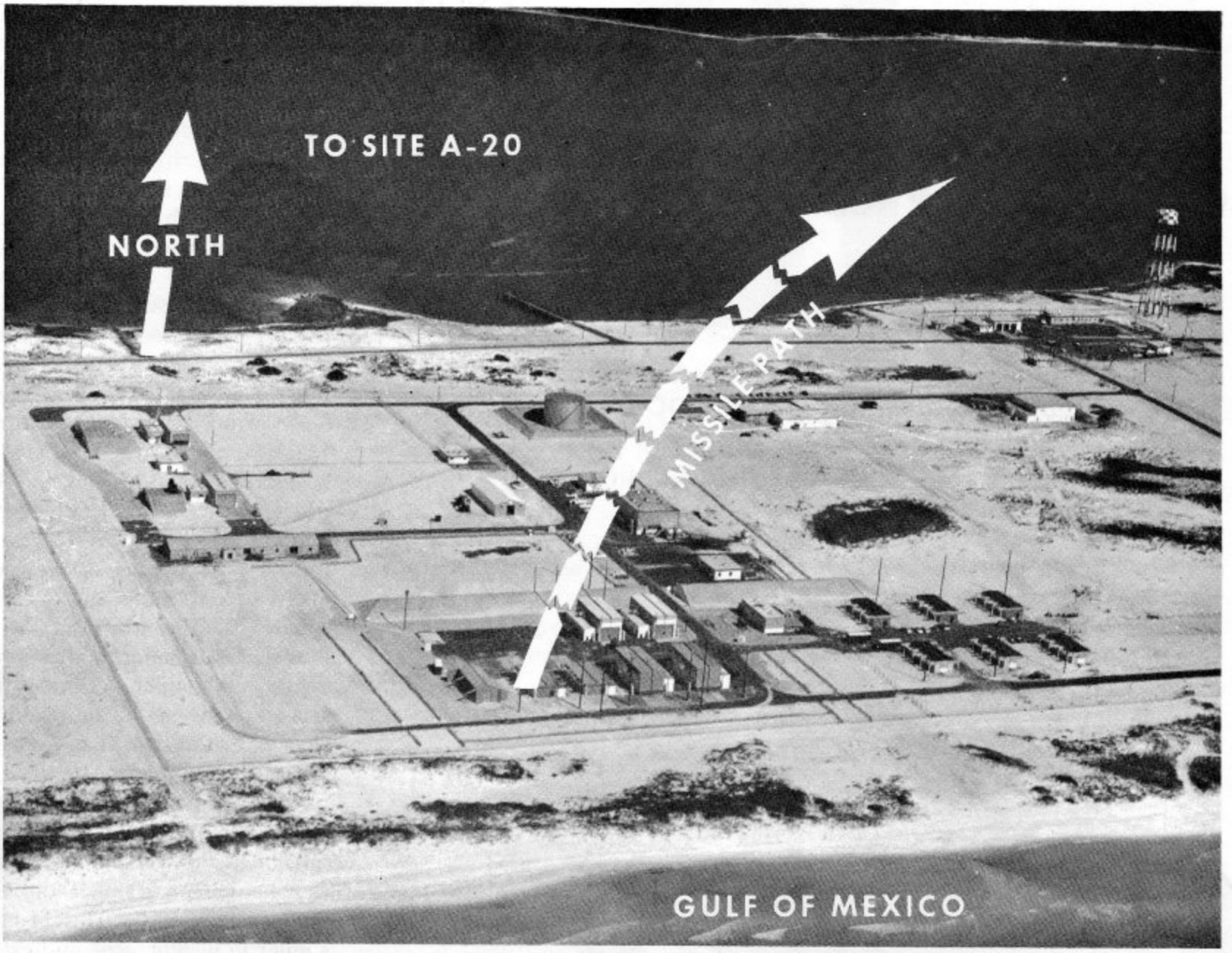
T minus 30 & COUNTING

Part of the mission of the 4751 Defense Squadron is the evaluation launch program of ADC's Bomarc missiles that provide an important part in the defense of the North American Continent.



"T minus thirty and counting!" . . . and thus begins another launch of the CQM-10A, fifteen thousand pounds of supersonic sophistication booming out over the Eglin Test Range. Within 25 minutes or less, the Tyndall fighters will be attempting intercepts against this "target" which will be travelling in excess of mach two above 50,000 feet. This is ADC's supersonic drone, CQM-10A, or Bomarc-A. It's slightly obsolete by today's standards of Aerospace Defense, but has served its role well in the defense of our country since January 15, 1959 when the first big bird scored a direct hit on a QF-80 jet drone some 87 miles out over the Gulf of Mexico. The "A" is outmoded now by the newer, faster, and fantastically more capable Bomarc-B. We are using the "A" models for training, both for interceptors and launch personnel. They serve as part of the four-fold mission of ADC's 4751st Aerospace Defense Squadron located at Hurlburt Field (Eglin Aux #9), Florida.

Another interesting part of their mission is, as we said, the evaluation launch program of the CIM-10B, or Bomarc-B. This beauty is similar in weight, size, and exterior appearance — but there the similarity ends. With speeds in excess of 2.5 above 75,000 feet and a range of over 400 miles, the "B" boost rocket motor contains solid propellant fuel as opposed to the liquid red fuming nitric acid of the "A" (ugh!) and with a reaction time of less than 30 seconds! Aerospace Defense Squadrons equipped with "B"s and located strategically throughout our country and Canada are at this very moment "cocked" and ready, if needed, to provide their part in the Aerospace Defense of the North American Continent, just like our fighter squadrons, both ANG and regular,



Bomarc testing facilities, Santa Rosa Island, Florida

24 hours per day, seven days a week—forever! (Just ask an alert troop.)

The 4751st provides two of the supersonic "A" drones per month for Tyndall fighters and training launch personnel and they additionally operate a Ground/Air transmitter site 24 hours per day in support of the 32nd Air Division. They also conduct SAGE/Bomarc school at Gunter AFB, Alabama. They're busy people, proud people, and successful people, as two recent concurrent Outstanding Unit Awards and a Missile Safety Plaque will bear testimony.

But, back to the launch . . . the countdown continues and the various activities and launch control areas at Hurlburt begin to tick in time with their clocks and computers. About a mile across the inlet from Santa Rosa Island is the launch control site which relays the information to the missile. On the island the "Drone" stands ready, having been prepared and processed by the Santa Rosa (or Site A-15) maintenance personnel. Approximately 80 of these dedicated, sun-tanned experts are now taking refuge in the Maintenance Control Building for the blast-off. Back on the mainland at Mission Control, another area adjacent to launch control Site A-20 is located. This building houses the computers and the civilian contract technicians and the Squadron Operating personnel. The Squadron's Mission Launch Director, his technician assistant, range coordinator, and the Veriplot monitors (for altitude and track) begin to get a little more tense. The clocks keep ticking and the launch time gets ominously nearer—all systems and safety precautions check out — it's still go. SSgt Ronald I. Langston, the NCOIC of the Bomarc Control Center

monitors his crew of two, SSgt Nebit and Sgt Howard. They wait now for the last six minutes of countdown, and the final directions from the Computer Building Launch Control.

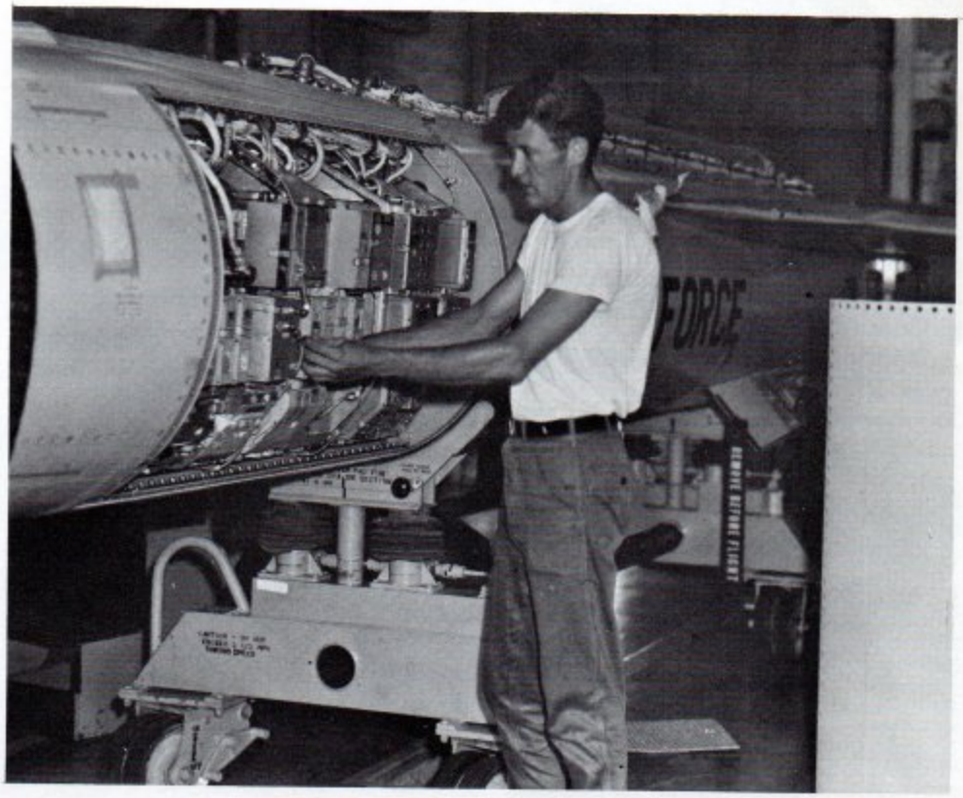
To date, over 160 Bomarc missiles have been launched against targets flown over the Eglin Gulf Test Range. The excitement and tension here may not quite reach the level prior to and during a space shot, but is exciting, nevertheless.

The countdown reaches within two minutes and personnel whose duties do not require them to stay at their posts, step outside to watch for the missile as it rises one mile away on the island. Time's up, and so is the missile. You can see it, of course, before the sound of the liquid fueled rocket boosters boom —the Bomarc "A" is away within seconds and accelerates to above mach 2 where the ram jets kick in and accelerate to about mach 2.4. It levels as commanded at 56,000 feet and is then directed into a slight left turn down the Test Range Corridor where the fighters have a go at it. Within minutes the missile is approaching the down range point and in this case was given the "self destruct" command at approximately 175 miles from launch point.

So ends another supersonic target and in its wake are more and better trained missile launch people, and more and better interceptor crews, more experience, more know how, and more defense.

The 4751st Air Defense Squadron initiated the Bomarc Combat Evaluation Launch Program in November of 1963. Under this program, each of the Bomarc Tactical Squadrons, including those in Canada, annually send a tactical Bomarc to Hurlburt Field and deploy a firing team to process and launch this missile. During the period of

Personnel responsible for maintaining CQM-10A Launch and Control facility, SSgt Dennis A. Neish (L), Sgt Harry S. Howard (C), SSgt Ronald L. Langston (R)



Sgt Steven H. Beckman, Missile Maintenance technician, accomplishing a little "brain surgery" on CIM-10B missile

CIM-10B Bomarc shelters at Site A-15, Santa Rosa Island

Canadian Air Force low cost visual tracking computer at work on Santa Rosa Island

deployment, these personnel are assisted by members of the 4751st Air Defense Squadron and each missile launched is fully instrumented to provide in-flight data on the various subsystems of the missile. This program provides the Aerospace Defense Command the means of constantly evaluating the men and equipment composing one of the most effective weapons available for defense of our Continent. The men who man the Tactical Units look back on Hurlburt as their "Alma Mater."

HISTORY

The idea of a Surface-to-Air missile is not new. German scientists developed their famous V-2 rockets early in the 1940s. Although the V-2 was surface - to - surface, they were beginning an era, taking the first faltering steps toward the Missile Age. The United States, impressed by V-2 capabilities, began its own accelerated research in the missile field shortly after World War II. It was then that the Bomarc, now a vital element in our command and our defense, began to take form.

The Boeing Company of Seattle, Washington, launched Project GAPA with the goal of developing a surface-to-air guided missile with a range of 25 NM; their research in the field of missile technology was soon joined by the Michigan Aeronautical Research Center, producing from this union the first experimental models of the CIM-10A, hence, Boeing-Michigan Aero Research Center, BOMARC, and with capabilities of intercepting enemy aircraft not at the initially planned 25 miles, but at a range of over 200. Bomarc testing continued at Cape Canaveral, beginning in 1951, until the quest for bigger and better space shots began to dwarf the Bomarc program there. Envisioning the need for a

Assembly and maintenance hangar at Hurlburt

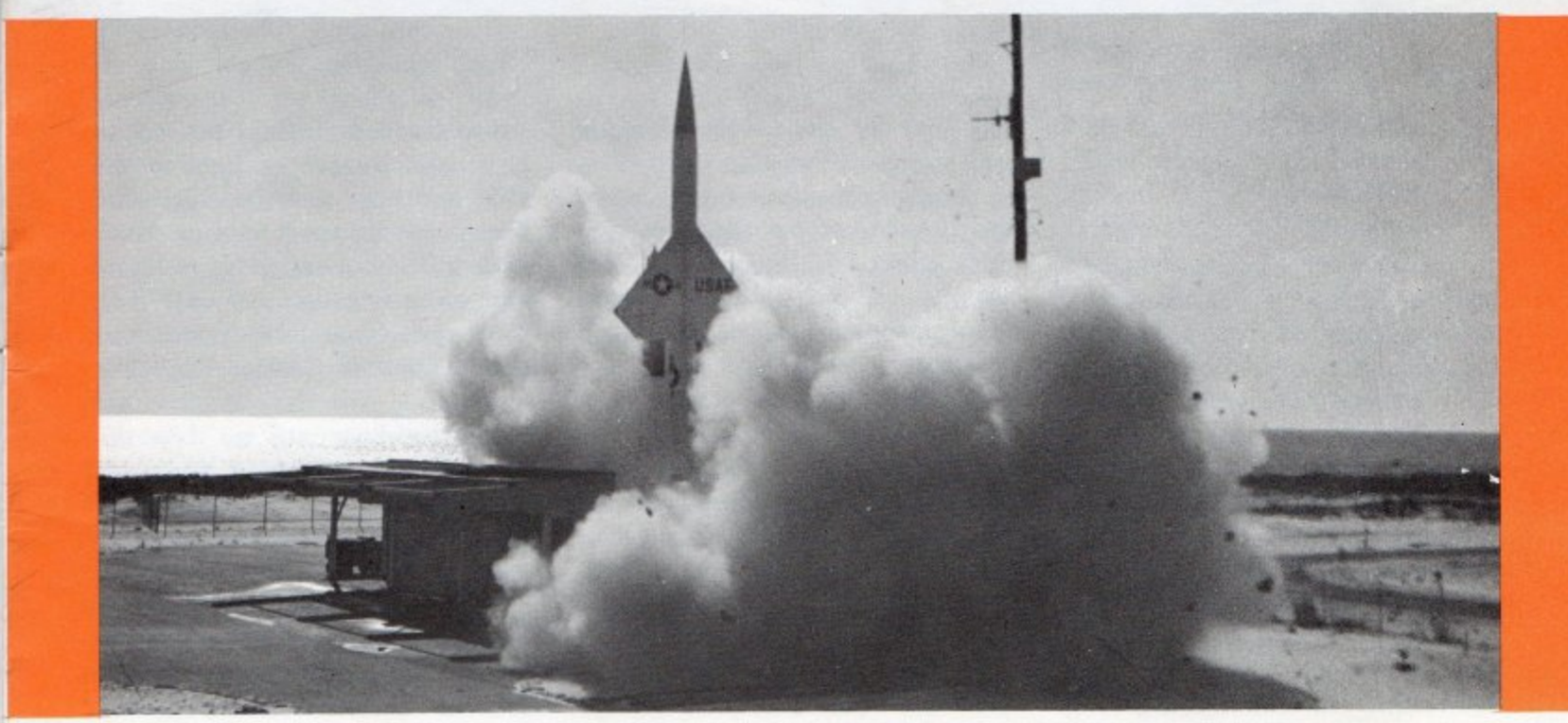
more fully developed area defense weapon, the Bomarc planners sought a location for a multi-million dollar missile complex to include facilities for training crews to man Bomarc squadrons throughout the nation. Such a site would require a climate permitting year round tests and space for a 200-mile corridor through which the missiles would fly. They found such a site on the Gulf Coast of Northwest Florida — Hurlburt Field.

By 1958, the 4751st Air Defense Wing was organized and on 10 July that year, the first Bomarc was delivered to Hurlburt from the Boeing plant at Seattle, Washington.

Since that time, a few other wars have occurred with the most recent highlighting the Surface-to-Air missiles, or "SAMs" as our newsprint says, utilized by the Viet Cong. The SAM is similar in mission to Bomarc and designed, developed, and produced in the Communist corner of the world. All too many American pilots have had recent personal knowledge of the Russian-built SAMs or "Flying Telephone Poles" as they're sometimes called in the skies around Hanoi and Haiphong — they've accounted for a "few" of our airplanes although much inferior in performance and capabilities than our Surface-to-Air missiles. Our fighter pilots seek out and destroy the VC SAM sites wherever possible.

The 4751st Aerospace Defense Squadron Commander is Colonel "Nat" King. His people are dedicated people and work long hours to provide their part in Aerospace Defense. We're happy to know that they are a proud and growing member of our team.

Sleep well tonight, because ADC is awake! ★



B model on the rise