The Mission of the Association of Air Force Missleers -

Support today’s Missleers, inform our membership and educate the general public on the enduring role Air Force nuclear missiles play while preserving the long and rich history of Air Force missile systems and the people involved with them.
We lose Missileers every month, as witnessed by the Taps section in our newsletter and on our website, but one hit close to home this month with the loss of a member of our board of directors, Chief (Ret) Hank Habenick. While some of us knew Hank had been diagnosed with cancer, we all thought he had enough time left that we would see him in Salt Lake City. Sadly, that was not to be. While Hank can’t be replaced, I’ve asked Chief (ret) Mark Silliman to nominate a strong retired Chief to fill the vacant position. At the National meeting in October, we’ll pay tribute to Hank and announce our newest board member.

On the brighter side, we have a lot of great articles in this month’s issue from a Sentinel update to an update on our Air Force Missileers Hall of Fame to a humorous tale of a “Murder at Golf 01” and much more. I hope you enjoy what we put out each time and that you are finding our monthly updates between newsletters just as interesting and informative. As always, if you have anything you want to comment on or share, please reach out to me at director@afmissileers.org

As promised in the July 2022 email update, we have made some big changes to our national meeting in Salt Lake City that we hope will interest you. First and foremost, we are working to have a guest speaker at each of our dinners. Thursday will feature Air Force Global Strike Command Chief Melvina Smith. We are still working on an event for Friday night. We have asked 20th Air Force Commander Maj Gen Mike Lutton to join us on Saturday night but are still waiting confirmation. We are working to host a panel of active duty missileers at our general meeting on Saturday to talk about what’s happening at our Minuteman bases. Finally, Air Force Global Strike Command is considering our national meeting as the place for an official naming ceremony for Sentinel. Details are still in works on when that will happen during our event but most likely Saturday. Our tour events have changed too. Thursday was supposed to be a “city tour” and Friday a Hill AFB tour. Sadly, due to COVID the city tour was proving difficult to plan. So now, Thursday will be a Minuteman tour at Hill sponsored by the 309th Missile Maintenance Group with support from the Minuteman Program Office and a special lunch time dedication of the new Intercontinental Ballistic Missile (ICBM) exhibit at the Hill Aerospace Museum. Friday will be devoted to Sentinel with a briefing by the Program office at the new Northrop Grumman Roy Innovation Center and then a ride up to Promontory Point to see all the work NG is doing for Sentinel. For those of you who have already registered and want to change your plans based on what will happen instead of what was advertised, please do so before 5 September. After that, all reservations will be locked down and changes will not be permitted.

After 25 years and big changes in the graphics business, the Board thought it was time to update our logo. So, we hired a graphics artist to “modernize” and clean up our logo and out patch. You’ll see an explanation behind the colors within this edition.

Finally, I’d like to bring the subject of membership to the forefront. As I briefed the Board of Directors last month, our membership roles appear to be almost stagnant - the continual pace of new members is not being matched by members that we lose touch with, fail to renew, or sadly pass. I’d ask each of you to reach out to those you served with and encourage them to join our organization. I believe this organization is doing good things to continue our ICBM heritage, inform the public and support our current missileers but we need a steady source of “income” to continue our efforts.

Jim Warner, AAFM Executive Director
New AAFM Patch

AAFM Emblems Gets Makeover

On 23 Jul 2022, the Board of Directors of the Association of Air Force Missileers (AAFM) voted to adopt new branding images that maintain AAFM’s heritage logo developed by our Founders while modernizing both the logo and the patch to represent the current nuclear deterrence mission of our Active-Duty force. Designed by new AAFM member and Northrop Grumman employee, Jesse Larsen, the layout maintains our classic look and is instantly recognizable as AAFM, communicating our commitment to advocacy for Missileers.

The original silver and blue AAFM logo has been updated with modern graphics with brighter colors, but retains the missile badge. The patch still has the Missile Badge as central focus, superimposed above a globe representing the worldwide assignments of Missileers and the global reach and impact of the weapon systems we operated, maintained, secured, engineered and supported. The white color of the parallels and meridians symbolize purity of our intent for stability and peace via our strong defensive posture. Two stylized ballistic arcs depict re-entry through the white and yellow glow of weapons destined for any chosen target. Bordering the emblem is a blue braid binding our Association in unity mission focus for all who served as Missileers and is reminiscent of the current US Strategic Command (USSTRATCOM) emblem’s periphery.

Versions of our logo and patch will make their debut on our website, documents, communications and logo items in the coming months. We hope you enjoy our new look as we share pride in our past and look toward the future of AAFM.

CMSgt (Ret) Hank Habenick

Sadly, on 29 July 2022, CMSgt Henry (Hank) Habenick lost his fight with leukemia. Hank was a mentor to so many young maintenance and trainer technicians; he will be truly missed. Hank’s missile career spanned 7 decades, from Technical Engineering at 341st Strategic Missile Wing (SMW) to 3901st Strategic Missile Evaluation Squadron in the 60s and back to the 341 SMW where he was presented the Strategic Air Command’s Maintenance Man of the Year award, then on to 15th Air Force assisting five of our six Minuteman missile wings. Upon retiring from the Air Force, Hank was an Intercontinental Ballistic Missile (ICBM) contractor with TRW/Northrup where he was instrumental in developing and implementing the Rapid Execution and Combat Targeting (REACT) modification and the Peacekeeper weapon system. Hank was an active lifetime Association of Air Force Missileers (AAFM) member and on AAFM’s Board of Directors for the past 13 years! There is an old saying, there are Chiefs and there are E-9s. Hank was definitely a Chief! Rest in peace, Hank!

Hank Habenick at our last National Meeting and as a Master Sergeant
Sentinel Impacts Goes Public – Jim Warner, AAFM Executive Director

In previous newsletters over the last year, we have highlighted the work of the requirements and acquisition teams working to field the replacement for Minuteman III, the Ground Based Strategic Deterrent (GBSD) now called Sentinel. The work started in 2008 with the initial requirements process and then went into overdrive last year when the GBSD Program Office awarded the Engineering Manufacturing and Development contract (EMD) to Northrop Grumman (NG) to develop the weapon system. As the Program Office and NG work at breakneck speed to meet EMD requirements and get ready for deployment, there are other government agencies working critical deployment issues. When Minuteman was deployed in the 1960’s, many of the laws impacting construction projects, including the Occupational Safety and Health Act (OSHA) and the National Historic Preservation Act (NHPA), simply did not exist. Launch Control Facilities (LCFs), now called Missile Alert Facilities (MAFs), and Launch Facilities (LFs) were built and thousands of miles of Hardened Inter Site Cable (HICS) were laid without regard to historic impact. Sentinel construction will be different.

The Air Force is charged to develop a Programmatic Agreement (PA) required for Sentinel deployment. A PA ensures compliance with Section 106 of the National Historic Preservation Act, and is developed in consultation with federal agencies, Tribes, state agencies, county and local governments, and advocacy groups. Over the last six months, the Air Force conducted a series of consultation meetings focused on working with interested parties. Each meeting was two days long and designed to get consulting parties involved in developing the PA for Sentinel deployment. Meetings were held in Layton, UT, Cheyenne, WY, Rapid City, SD, and Great Falls, MT. The Association of Air Force Missileers (AAFM) participated in two meetings as an advocacy group.

As part of this effort, the team is tasked with identifying Areas of Potential Effects (APEs) which are areas that might have historic properties that could be potentially affected by the Sentinel deployment. This includes identifying where new construction might have a visual, auditory, or atmospheric element into an historic property setting. The construction area around a communication tower that might be within the sight lines of an historic site is one example of an APE.

The Sentinel project covers 7 states and includes acquiring rights to lands administered or owned by nine federal agencies, one Tribe, multiple state agencies and local governments, and over 7,700 private landowners. The PA will cover issues regarding a phased approach to identification and evaluation of historic properties and assessment of specific effects for the Sentinel Project for the Environmental Impact Statement. The PA will provide consistent processes and procedures to follow through the entire project. A final version of the PA is scheduled for finalization by the end of 2022.

The goal of the PA is to set up consistent practices and processes that can endure through the entire program. As noted above, the PA is designed to address concerns of consulting organizations including landowners, Federal agencies, Tribal organizations, as well as state and local organizations. Archeologists and Tribal Cultural Specialists will be on site whenever ground is disturbed outside of the MAFs and LFs (MAFs and LFs were backfilled during initial construction with a processed aggregate that was “clean” of historical items). However, utility right of ways were not. Additionally, communication towers are new and, in some locations, will be the tallest structure for miles (where there aren’t already windmills). The team will work to ensure that viewpoints from existing national historic trails (such as the Lewis and Clark trail) are not impacted.

The team conducted physical on site biological and wetland surveys of 492 miles for new utility corridors and fieldwork sessions for Tribal Cultural Specialists of project areas at all three missile fields that are located on lands controlled by other federal agencies in the summer and fall of 2021. At Malmstrom Air Force Base (AFB), a survey team (including 6 archaeologists and Tribal Cultural Specialists from 5 Tribes) looked at utility corridors on Bureau of Land Management, Bureau of Reclamation, and Helena-Lewis and Clark National Forest land. Minot’s survey included utility corridors on U.S. Fish and Wildlife Service and U.S.
Army Corps of Engineers with a survey team that included 6 archaeologists and 12 Tribal Cultural Specialists from 8 Tribes. F. E. Warren AFB’s survey included utility corridors on U.S. Forest Service land on the Pawnee National Grasslands with a survey team that included 6 archaeologists and 12 Tribal Cultural Specialists from 8 Tribes. The team also conducted field inspections of 1,648 miles of utility corridors on non-federal lands, which will help determine which side of the road that utility corridors will have the least impact for upcoming work.

During the presentations, participants were given some insight into work necessary to deploy Sentinel. On base, the project will construct or modify facilities and infrastructure as necessary to support maintenance, training, storage, testing, and support at F.E. Warren Air AFB, Malmstrom AFB, Minot AFB, Hill AFB, Utah Test and Training Range, and Camp Guernsey. Temporary workforce hubs and centralized staging areas will be established at each base and throughout the missile field. Across the missile fields over 5000 miles of new and existing utility corridors will be added/upgraded at the three bases, some of which may require new easements. Existing launch facilities will be refurbished to a like new condition. Of the 15 MAFs/LCCs at each wing, up to eight per missile wing will be made like new and the remainder will be decommissioned or repurposed. Approximately 62 communication towers will be constructed (18 at Warren, 31 at Malmstrom, and 13 at Minot) as part of the weapon system communication capabilities which will also require new land acquisition by the federal government. If you have spent time in the field at any of these locations you know how important this upgrade in communications is needed for continual field wide communications!

A draft of the environmental Impact Statement was released on July 1, 2022 for public comment. For additional information on the PA process, you can visit the Sentinel Project website at www.gbsdeis.com.

**Sentinel Will be a Mega Project – Jim Warner, AAFM Executive Director**

The task of deploying a new weapon system while maintaining current system readiness is not normally a problem for the Air Force. The runways may need reinforcing, new hangars may need to be built, personnel will need to be trained, and supply points will need to be stocked, but you can usually do it with little to no mission impact. Deploying Sentinel, just like deploying Peacekeeper, while maintaining Minuteman III readiness is completely different. Some have compared it to changing an engine on an airplane while in flight......impossible, right? Well, that’s exactly what the Air Force will strive to do over the next 14 years.

Sentinel has been referred to as a mega project. In civil engineering terms, a mega project is a rare event that only happens once in every other generation and defined by a series of criteria: 1) size of project - $80+ Million qualifies; 2) Timeline - 14 plus years qualifies; and 3) Size - multiple sites and locations qualifies.

The current deployment plan calls for construction to start at F. E. Warren Air Force Base (AFB) (it has the most weather friendly construction days among other reasons for its selection) followed by Malmstrom AFB and then Minot AFB. The early draft deployment schedule identifies five concurrent construction lines of effort (LOE), each significant in its own right, and that doesn’t even include work being done at Vandenberg Space Force Base and Hill AFB ahead of most deployment actions.

Pending environmental impact review and continued funding, the first LOE will start in 2024 and address Missile Alert Facilities (MAF) and Launch Facilities (LF) at F. E. Warren. MAF and LF footprints will remain the same with plans to rebuild up to 8 MAFs per wing and refurbish/modify all 450 LFs. The current MAFs will be torn down and rebuilt and a communications support building will be added within the fence line. The second LOE involves upgrading 4,892 miles of existing utility corridors. The third level of effort involves the construction 3,080 miles of new utility corridors. The fourth LOE involves the addition of 62 new communication towers, each approximately 300 feet tall. The fifth LOE involves the construction or renovation of base facilities (without impacting mission requirements), and the last LOE involves building construction work camps for the construction crews and laydown areas for storing equipment and supplies.

The Northrop Grumman workforce hubs will support the transient work force and will be established in or near Great Falls, MT and Lewiston, MT, Kimball, NE, and Minot, ND. The hubs will house up to 3,000 temporary workers and support personnel each. Northrop Grumman will also establish 19 centralized construction laydown areas in or near Stoneham, CO; Augusta, Belt, Denton, Judith Gap, Lewistown, Standford, Vaughn, and Winifred, MT; Kimball and Sydney, NE; Balfour, Bowbells, Garrison, Mohall, Ruso, Stanley, and Wabek, ND; and Albin, WY. While there would be no construction at Camp Navajo, the proposed Sentinel deployment activities would include use of the existing missile storage area during Minuteman III decommissioning and disposal activities. At Warren and Minot with two at Malmstrom due to the size of the wing area. Wach workforce area will be about 60 acres. The Sentinel program will work with the local communities on the disposition of the camps.

**Sentinel Facts**

- First Vandenberg LF construction: 2023
- First test launch: 2024
- First missile wing on base construction: 2024
- First LF turned over for modification: 2026
- Initial Operational Capability: 2029
- Full Operational Capability: 2036
Peacekeeper LF U-02 Will Be Used for Sentinel

One of the “losses” to our Intercontinental Ballistic Missile heritage as part of Sentinel deployment will be the Peacekeeper missile trainer at F. E. Warren Air Force Base, WY, the launch facility (LF) designated as Uniform-02 (U-02). While discussions were held with the 90th Missile Wing, the Wyoming State Historic Preservation Office (SHPO), and the Wyoming State parks concerning ways to keep U-02 as an historic item and a public display, the ultimate decision made by Air Force Global Strike Command and the Sentinel Program office came down to timing and funding. As Uniform-01 (the Minuteman trainer) will be required until the last Minuteman is pulled and a Sentinel trainer is needed from the beginning, the least costly and most expedient option was to give up U-02 for the Sentinel training program. The program office will work with the Wyoming SHPO and the Wyoming State parks to capture items inside U-02 for future displays.

Strategic Deterrent Symposium -by
Jim Warner, AAFM Executive Director

Military, Civilian, Civic leaders, and Industry members supporting the Nuclear Triad gathered in Groton, CT, 27-28 April, hosted by the Strategic Deterrent Coalition (SDC) with a focus on “Strategic Deterrence in the Face of Evolving Threats”. The SDC’s purpose is to inform decision makers and thought leaders on how America’s nuclear weapons contribute to our strategic position, in a world where potential adversaries are modernizing, innovating, and gaining in almost every way. SDC focuses on the nation’s strategic deterrent – why it works, why it must be maintained, and how it contributes to global stability.

The group was welcomed by US Navy Captain Kenneth Curtin, Jr., Commander, Naval Base Submarine, New London. The naval base is not only the home of all submarine training and an attack submarine base home but the new home for the construction of the Columbia class submarine set to start next year. In the first block of the symposium, attendees gained some insight into the perspectives of young nuclear enterprise professionals from across the Department of Defense (DoD) and Industry. DoD professionals represented Navy SSP, Air Force Nuclear Weapons Center (warhead team), Minuteman III program office and the Sentinel program office. Industry was represented by Northrop Grumman, BAE Systems, Lockheed Martin, General Dynamics Mission systems, Collins Aerospace, and Boeing. To the person, each panel member was excited about the opportunities being provided to them in their respective programs.

Most of those interviewed lucked into their position or got involved by an “accident”. One panel member noted that “the average college student has no clue about the exciting opportunities and technologies that we are exposed to in the defense industry.” Another noted that “growth potential in the nuclear enterprise is fast paced and wide open.” Both the Air Force and Navy have a retiring workforce...
issue and are developing a track to develop technical subject matter experts that don’t have a desire to work program management. A key to success for each of the professionals on the panel has been networking and partnerships. A key fact noted was that most of these professionals have little to no previous military systems experience and would welcome more exposure to an operational system.

Rear Adm Scott Pappano, Navy Submarines Program Executive Officer and Maj Gen John Nichols, SAF/AQP shared a panel on the Acquisition Community Roadmap. It was noted that word is definitely getting out on the importance of Strategic Deterrence within the Air Force, within DoD, and most importantly within Congress. Maj Gen Nichols noted that the FY23 budget tells a good story in support of the Nuclear Triad — “the services are in a good place today”. It was noted that cost, schedule, and performance are critical to keeping support within Congress and is often the best excuse for cutting funds when one of the three are not met. Industry must always keep this in mind. When asked about the future of the Triad, the two panel members agreed that nuclear weapons will need to be managed until the next big thing comes along that makes nuclear weapons irrelevant (whatever that might be). Until then, Maj Gen Nichols noted that the Sentinel program office is moving forward with its first flight test next year and working towards a schedule that will deliver one launch facility a week for nine years starting in 2028. When asked about the upcoming bow wave for nuclear certification, Maj Gen Genatempo, Air Force Nuclear Weapons Center Commander (CC), is working to resolve the issue. Nuclear Communications, Command and Control (NC3) was included in the discussion of what we need to focus on for the Triad to be successful. Maj Gen Nichols noted that “NC3 stitches is all together - on our worst day, it must work.” Nichols finished with an invitation to all: “If you want to work on wicked hard problems, come to work at DoD”.

Maj Gen Mike Lutton, 20th Air Force (AF)/CC, and Maj Gen Andrew Gebara, 8 AF/CC, contributed to a panel discussion led by Col Cathy Barrington, 90th Missile Wing/CC, on Developing Combat Ready Forces across the TRIAD. Maj Gen Lutton noted that ICBMs are fulfilling the mission day to day along with their Navy submarine counterparts. Maj Gen Gebara noted that “we have America’s best working in the Air Force today. They are hardworking people who want to make a difference.” Maj Gen Gebara, in referring to the earlier young professionals, quoted former Chief of Staff of the Air Force, Gen Mike Mosely, it is important that we “recruit the airman and retain the family.” Gebara also noted that we should focus on what is important as there is “more to worry about than there is time to worry.”

Gary Ashworth, a former 44th Strategic Missile Wing crewmember and current Deputy Assistant Secretary of Defense, Strategic, Space, and Intelligence Portfolio Management, Office of the Under Secretary of Defense for Acquisition and Sustainment, along with Vice Admiral Johnny Wolfe, Director, Navy Strategic Systems Programs talked about building one team to a Safe, Secure, and Reliable Nuclear Deterrent. Adm Wolfe noted that the Navy has a Sea Based Strategic Deterrent plan that goes out to 2084 as a sister the Ground Based Strategic Deterrent plan that goes to 2075 and beyond. Two key messages were the need to educate our young professionals and to educate the public on the importance of the Triad.

Strategic Air Command and Aerospace Museum - Introduction by Col (Ret) Ed Burchfield, AAFM MbrNo A0069, Bellevue, NE, Article by Clayton C. Andersen, President & CEO. US Astronaut, (Ret)

Introduction

It’s hard to believe but it has been almost 53 years since I pulled my first alert tour at D-01 on the dusty, windswept plains of western Nebraska. It seemed like a forever drive to get there heading east out of F E Warren Air Force Base (AFB), Cheyenne, WY, in an underpowered government blue station wagon they called a crew vehicle that had a hard time overcoming any significant headwind. My deputy normally did the driving…and I did the complaining.

As a brand new Missile Combat Crew Commander crew dog in the 319th Strategic Missile Squadron, one of four Minuteman (MM) I-B squadrons in the 90th Strategic Missile Wing, my trusty (and very smart) deputy and I were pulling six-eight 24-hour alerts a month; most times at Delta, but we often found ourselves at Launch Control Facilities.
(LCF) throughout the entire wing that covered about 8,300 square miles in Wyoming, Nebraska, and Colorado. The bottom line is we spent a lot of time on the road just to get to the Launch Control Center (LCC)…until they started flying us out to the sites via USAF Huey airlines. Those rides got a lot more exciting when the returning Vietnam pilots joined the wing. Instead of an uneventful, boring landing, the guys would “attack” the LCF with an up-and-over maneuver that put us on the ground PDQ. They also liked to chase antelope on the way back!

In retrospect, it’s hard to imagine the MM system was only a little over seven years old when I pulled alert. The first MM-A missile had come on alert on 27 October 1962 at Malmstrom AFB, MT. Today, crews are pulling alerts in a system that is now six decades old! Although the equipment has gone through many significant changes and upgrades, those are still the same LCCs thousands of crew dogs have manned for scores of years to ensure that America’s strategic nuclear deterrence capability remains strong - and clearly visible - to any potential enemy. Every crew dog was proud to be a part of this critical mission…a mission that was embodied in the fabric of the Strategic Air Command (SAC) and the men and women who made it possible.

There is only one museum in the United States that is dedicated to preserving and telling the story of the SAC… and the dedication and sacrifices of the men and women who served in the command. The Strategic Air Command and Aerospace Museum is located between Omaha and Lincoln in Nebraska just off I-80. The museum has evolved from a small facility on Offutt AFB to a modern, multi-media facility with numerous exhibits, including the aircraft, missiles, and stories that made SAC the greatest deterrent force in the world.

The Strategic Air Command and Aerospace Museum has embarked on a major expansion that includes additional emphasis on the Intercontinental Ballistic Missile (ICBM) leg of the deterrent Triad as well as new exhibits focused on aerospace contributions to America’s strategic deterrence capabilities. The museum is proud to announce National Aeronautics and Space Administration (NASA) Astronaut Clayton Anderson has assumed command as the new President and CEO. For us MM missile guys, we consider Clayton a real “rocket guy” and therefore, one of us. In the article that follows, Clayton tells you more about the very cool ICBM things that will be happening in the exciting years ahead at the museum. Please welcome Clayton Anderson, a member of the Association of Air Force Missileers, to our ranks.

From the President and CEO

Exciting times are ahead for the Strategic Air Command and Aerospace Museum, and I am honored to have the opportunity to lead its amazing staff of dedicated workers in this challenging undertaking. We have bold plans to grow the museum’s mission and find new, innovative, and interactive ways to tell the SAC story to the next generation of Americans.

As a retired astronaut, I often hear the pun “well…it’s not rocket science.” Actually, it is rocket science. It was rocket science that put me in space twice and rocket science that developed the many ICBMs operated by SAC. Our nation, through the dedicated Air Force Missleers who operated the Atlas, Titan, and Minuteman weapons systems through the years, counted on that rocket science. And that’s a story we want to expand upon at the museum: how rocket science and resulting innovations led to the most powerful deterrent ICBM force the world has ever known. But we want to do that while also relating it to how it simultaneously energized a NASA Space Program that would make America the pre-eminent leader in space exploration.

So, just how are we going to do that? Our master plan – currently in development - for the next 15-25 years includes the addition of new galleries that seek to integrate these diverse rocket science systems and show how both the SAC ICBM force and the NASA Space Program provided a combined deterrent force structure through the years of the Cold War and beyond. The legacy SAC built now lives on in the Air Force Global Strike Command, US Strategic Command, and the US Space Force, and the story we hope to tell explores the synergism between that storied past and
our nation’s burgeoning space future. In this new SAC Aerospace Museum, we look to “entertain, educate, and inspire.” We want every single museum visitor to envision what is possible in their future. Whether one dreams of a military career or becoming an astronaut, our mission is to present entertaining and educational scenarios that inspire them to explore possibilities where perhaps, no one has gone before. And guess what? That’s rocket science!

The SAC Museum

Tracing its beginning back to 1959 on a little-used tarmac at the northeast end of a runway inside Offutt AFB, the SAC Museum began with one single aircraft. A Convair B-36 Peacemaker, set to welcome VIPs and incoming airmen, would invigorate a plan for an airpark to showcase the powerful SAC bomber force. Growing considerably over the next thirteen years, and operated by SAC, the collection added ballistic missiles to help complete the deterrence history story. Between 1959 and 1972, the museum added SM-62 SNARK, PGM-17A Thor, HGM-16 Atlas, and HGM-25A Titan missiles. As the collection grew, so did the curiosity of the general public. In 1972, SAC turned over the collection to the State of Nebraska Department of Economic Development. The new museum was able to continue to increase the size of its collection, add full-time staff and construct a brand-new building.

By 1995, it became clear the museum needed to expand and move to a more accessible location; one that would offer more protection for the impressive – and growing - collection. On Armed Forces Day in 1998, the museum opened its doors at a new home in Ashland, NE. Halfway between Omaha and Lincoln, with nearly 300,000 square ft of enclosed space, the new facility housed…under cover…most of its valuable collection and afforded the opportunity to expand its exhibits in many new and exciting directions.

AAFM Grants

We are deeply grateful to the AAFM for the grants made to the museum through the years. Over the life of the museum (1959-2022), we have gathered a broad collection of missiles and missile technology. We currently hold twenty missiles and missile parts (engines, shrouds, launch consoles, etc.). Through the support and the generosity of the AAFM, we have been able to restore and repaint our HGM-16 Atlas, PGM-17A Thor, and SM-62 SNARK as well as certain aircraft systems including the AGM-20B Hound Dog, ADM-20 Quail, AGM-86B ALCM (Air Launched Cruise Missile), and AGM-129A ACM (Advanced Cruise Missile). We also have plans to acquire a Minuteman Missile LF (MMLF) Trainer, create new interactive displays, update outdoor lighting, and increase our collection of uniforms, manuals, equipment, crew items, etc. Recent donations include those all-important SAC Missile Combat Competition uniforms, programs, pins, and coins.

Over the past several years, we have been enhancing a more consolidated exhibit dedicated to the USAF Missleer. Through several grants since 2018, we have added new lighting, restored an interactive diorama of a Minuteman Launch Site, and created a display of manuals, models, and equipment. This year we are adding a new multi-mannequin display to showcase the missile launch crew’s working uniform and the SAC Combat Competition uniform. This display case will also include smaller artifacts that crews used in their daily operations and competitions. The addition of digital TV screens, scrolling through the history and heritage of these critical missile programs, will better engage our visitors. With appropriate funding, we will complete specific updates to enhance the total experience.

Vision for the Future

Our larger vision for specifically telling the ICBM story and heritage preservation rests within plans for a dedicated Missile Gallery addition to the museum. This gallery will allow us to bring most of our missile collection indoors, safe from the elements, while also keeping one or more of our missiles outside the main entrance as a visitor attraction. We also have plans for a similar Space Gallery addition, enabling us to expand our focus to current and future space operations (think SpaceX, Artemis, Blue Origin, Virgin Galactic, etc.) while telling the story of how the past links to the future through the constant thread of deterrence and innovation. These projects are of such magnitude that it requires long-term planning and a phased development approach. In
the interim, the museum seeks to develop a more immersive and engaging design methodology to encapsulate our current missile and space exhibits. For example, we are actively seeking to acquire significant new pieces for the collection, including items representing the Minuteman III and myriad of NASA programs. As we look toward growth and expansion in the museum, we also look to the future of missile and space technology development. These concepts are important to our engagement and education of public understanding and as we seek—along with other anticipated focus areas—more specific appreciation of the Air Force Missileer, and the role ICBMs play in our country’s nuclear deterrent mission. As the museum grows in the years ahead, we very much look forward to our continued collaboration with the AAFM.

**To Infinity and Beyond…**

The future of the SAC Aerospace Museum is only limited by the imagination and creative wherewithal of our very talented staff of technicians and volunteers. The new Missile and Space Galleries will greatly expand our ability to tell the story of America’s vast deterrent power made possible by the ICBM force (in conjunction with our Triad partners in the SLBM and bomber legs) and NASA’s storied Space Program. Together, it is an unbeatable combination and a story that absolutely needs to be told repeatedly. We hope the members of the AAFM will join us in carrying out this incredible mission.

And, yes, it definitely is rocket science.

**Update on Air Force Missileers Hall of Fame Program** – by Col (Ret)Linda Aldrich, AAFM Board member and Recognition Committee Chair

The Association of Air Force Missileers Board of Directors voted to establish an Air Force Missileers Hall of Fame (AFM HOF) to recognize individuals who significantly contributed to success of this enduring mission in the areas of operations, maintenance, security, supply, engineering, services, and special duty assignments. The idea came into being in 2016 and is just now beginning to develop into an actual program.

Early in 2022, we sent out press releases to the missile bases and affiliates to see what kind of initial response we would get. We received numerous nominations for a variety of outstanding individuals in all aspects of the missile business. However, the AFM HOF committee was concerned that the nominations received, while worthy of consideration, did not establish the foundation needed for such an important program. The committee believes the initial cadre of inductees into the Hall of Fame should represent the history of our mission, the individuals who were the groundbreakers and those individuals who had a vision of how critical nuclear deterrence would be to the nation. Our nomination committee will take a closer look at our history and seek out those founders and legends who most deservedly should be the first faces representing the Air Force Missileer Hall of Fame.

All nominations already received will be held over for future consideration as inductees into the Hall of Fame. The committee, appreciates of the effort that went into sending these nominations to us for consideration. There are so many amazing individuals in our missile business and we will be building our Hall of Fame over time once we have established the foundation by recognizing the groundbreakers of this vital national mission.

If you have any questions or additional nominations based on the criteria above, you can reach us at AFMHOF@afmissileers.org.

**When a Tiger is Your Mascot** - By Lt Col (Ret) Gene Williams, AAFM MbrNo L134, Madison, AL

The tiger was sort of a mascot image from the 446th Strategic Missile Squadron (SMS) emblem. Over the years, various pictures were posed with the tiger. The couple that ran a carpet store in Grand Forks owned the tiger and they would, when asked would bring “Keshia” out to the base for a photo op. I took the pictures and Steve Knowles was the 446 SMS Commander. There is a photo of the squadron formed up, but the tiger decided she didn’t want to go in front of the group. Instead, she chewed on my right shoulder, knee and ankle, and rolled around in the dirt with the owner’s leg in her mouth, we put her back on the trailer that was used to transport her to the base and took photos of the squadron there.

I had gotten two of my largest 2 Lts to hold the tiger’s lead (a chain) and I walked on the opposite side of the Lts trying to “herd” the cat to where we wanted her. But, as you can imagine, a 400 pound tiger pretty much goes where she wants. Fortunately, we weren’t damaged or injured; my shoulder, elbow and knee had teeth mark bruising. I understand that the tiger has since died and the owners had her stuffed and she still adorned the carpet store. I don’t know who would have done the taxidermy but there was a Capt Bill Violet in the 446 MS when I was on crew and he did the eagle for the 448 SMS display.
O-0 Museum Grants - Rob Branting, AAFM member and Ronald Reagan Minuteman Missile Site Supervisor

Over our 13 years of operation, grants provided by the Association of Air Force Missileers (AAFM), along with the generous support of missile field veterans themselves, have transformed the Ronald Reagan Minuteman Missile State Historic Site from a simplified guided tour of former Minuteman facilities into a modern interpretive center.

AAFM grants have supported both the basic infrastructure of the site (helping in replacement of our worn-out garage doors with newer, but historically accurate types), and brought modern technology for educational outreach to Oscar-Zero (O-0). In 2020, a grant from AAFM allowed the site to purchase three iPad tablets. One of them is used in our virtual tour program, allowing students from around the world to journey down into the capsules of Oscar-Zero. Two more are earmarked for interactive, touch screen information kiosks in two of our bedrooms to help explain the stories of Facility Managers and maintainers in their own words. Except for our site opening in 2009, perhaps our biggest project to date is the HH-1H Huey helicopter homecoming to O-0 planned for summer 2022. A 2021 grant went towards transportation costs in bringing the helicopter back from Arizona to North Dakota where it will be put on static display. As of late May, we’re getting the details needed for painting and restoration, but hope to have that Huey on the helipad at O-0 by September. This could not have been done without the much-appreciated support of AAFM.

We here at O-0 wish to express our fond thanks to AAFM for their encouragement, guidance, and support. While we’re a little “off the beaten path” up here in North Dakota, know that your support has brightened the days of many schoolchildren learning about the Cold War’s frontlines 50 feet below the soil. Along with this, your investment will help ensure the continued preservation and interpretation of Minuteman in North Dakota for generations to come.

National Museum of Nuclear Science and History Grants – by Olivia Gannon Grant Writer

The National Museum of Nuclear Science and History recently completed the Minuteman I restoration project funded in part by AAFM. The generous grant helped support the restoration of the LGM-30 Minuteman I Intercontinental Ballistic Missile for permanent display. With the support of the Association of Air Force Missileers (AAFM), the Museum was able to sand, repaint, and make minor repairs to the body of the Missile to return it to its former glory.

On 3 Friday 2022, the Minuteman I Missile was erected in the far Northwest corner of the Museum’s nine-acre outdoor exhibit space, Heritage Park. It is now located adjacent to the Jupiter and Thor Missiles. The missile was previously stored in semi-display status, laid horizontally on metal stands, and exposed to the southwestern elements. The Museum’s Minuteman was received from the city of San Bernardino, California, where it was previously on display at the San Bernardino Valley Municipal Water District to represent the mission of nearby Norton Air Force Base (AFB). In 1972, Norton AFB personnel coordinated the airlift of the missile to Kirtland AFB for the Museum. The resto-
ration of the Minuteman I Missile represents the living history of the Cold War that will be preserved and on display for many years to come.

The restoration of the Minuteman I was completed by a team of volunteers, museum staff, and outside contractors.

Volunteers - Tom St. Aubin, Sam Finch, Don Holly and Mark Soo Hoo
Museum Staff - John Boyle, Exhibition Technician, Michael Brock, Facility Operations Coordinator, Ryan Painter, Director of Exhibits and Facilities
Outside Contractor - Efren Candelaria, Enterprise Builders, Mountain State Cranes and JB Henderson

Winter Driving - By Lt Col (Ret) Gene Williams, AAFM

The drawing of Calvin and Hobbes below was in response to my comments after we had two crew vehicle roll-overs in so many weeks. Really bad weather with freezing fog created “black ice” conditions but no severe cold or freezing. The first was on a flat stretch between Delta-0 and Echo-0 where the crew basically was driven off the road by the Suburban being on fast idle. The driver lost control of the steering on the ice and the shoulder was not frozen, so the truck rolled several times before stopping on the top. Neither crew member was hurt. The second was on a road going to Charlie-0. The driver was a prior enlisted crew member who had served as an Alert Response Team (ART) member at Ellsworth AFB, SD, for approximately 8 years, so he was familiar with the usual winter driving conditions. This winter was abnormal in that common features of North Dakota roads, specifically frozen shoulders, were absent. The soft shoulders made leaving the roadway treacherous, especially with the loss of control and skidding on ice. Fortunately, no one was injured and no careers were damaged as a result of the accidents.

Both the Wing and 20th Air Force Commanders were very ungracious towards me when my reaction was to conduct “Report of Survey” investigations, which prevented the lieutenants from facing non-judicial punishment for incidents which were incidental to their mission requirements. I had to do a Quality Improvement analysis of the situations that accompanied these accidents and after the third accident involving a 448th Strategic Missile Squadron crew, the Wing Commander was adamant that we find a “cause” besides the weather. We found a couple. First the tires that the transportation squadron put on the crew vehicles were retreaded with a hay-wagon tread. The tread was like a steel wheel with no flexibility like you would find on common radial tire. Then we discovered that the transportation maintenance required the tires to be inflated to 85 pounds per square inch (psi). The factory recommendations for fully loaded vehicles was only 45 psi.

Space Command and the Brown Paper Bag – by Col (Ret) Quentin Thomas, AAFM

During the mid to late 1970s, I had the opportunity to serve as the executive officer for three 1st Strategic Aerospace Division (1 STRAD) Commanders at Vandenberg Air Force Base (AFB), CA. The first commander was Brig Gen Stuart H. Sherman, Jr. The second was Maj Gen Dave L. Gray, and the third was Maj Gen Edwin A. Coy. Of the three, one was among the youngest Brigadier Generals in the USAF. Gen Sherman was steeped in missile culture, so his
Therefore, he was a perfect fit for the team. Eventually a Force Systems Command and Headquarters U.S. Air Force. Strategic Air Command, Electronic Systems Division of Air the command and control systems field at Headquarters, to June 1979 General Herres served in various aspects of T. Herres actively entered the picture. From March 1974 soon after this project started at Vandenberg, Gen Robert available for manning a proposed Space Command. Very the individual Air Force Specialty Codes (AFSCs) that were man I ever met, and it was during his tenure at Vandenberg that USAF Space command found its origins.

Gen Russell Dougherty was the Commander in Chief, Strategic Air Command (CINCSAC) at that time. During one of the SAC Busy Giant Commanders’ Conference, Gen Dougherty announced his plans for retirement. He told his commanders that he was a willing advocate for any worthy projects in his final months should any of his field commanders have ideas he needed to carry forward to the Corona (four star) Conference. In discussion with Gen Dougherty, Gen Sherman identified the need for Space Command. Gen Dougherty gave him the go-ahead.

I did not realize it, but Gen Sherman, by education and involvement, had a long standing relationship with the 4000th Aerospace Application Support Group at Offutt AFB, NE. Obviously, they were deeply involved in space activities. Additionally, Gen Sherman had worked at levels that gave him the necessary insight for the need for increased space efforts. His career and education had given him a clear understanding of the prerequisites and benefits for a space presence with the USAF in a leadership role.

On our return from Offutt after the Busy Giant conference and Gen Dougherty’s offer of support, we had an ops stop at Peterson AFB, CO. As the T-39 was being refueled, we were greeted in the DV lounge by a Colonel friend of Gen Sherman’s. During the course of their conversation the Colonel handed Gen Sherman a brown paper bag. Gen Sherman immediately handed it to me and said, “Make sure this gets home with us.” I tucked it under my arm, and we were soon headed home for Vandenberg. When we arrived the General identified a room adjacent to the command section as a “project” work room. He put in a classified safe and posted a “No Entry” sign on the door. He also identified Lt Col Wells Hunt to start dissecting the paperwork in the brown bag. As it turned out the bag held a stack of computer shred-outs about a foot tall that must have weighed 5-6 pounds. Upon inspection, that stack of computer paper contained the manning documents for several Major USAF Commands. They were to eventually provide the manpower nucleus of the United States Space Command. Lt Col Hunt was tasked with dissecting, identifying and listing the individual Air Force Specialty Codes (AFSCs) that were available for manning a proposed Space Command. Very soon after this project started at Vandenberg, Gen Robert T. Herres actively entered the picture. From March 1974 to June 1979 General Herres served in various aspects of the command and control systems field at Headquarters, Strategic Air Command, Electronic Systems Division of Air Force Systems Command and Headquarters U.S. Air Force. Therefore, he was a perfect fit for the team. Eventually a colonel in the computer world from SAC headquarters also entered the key team. With this working group a Space Command began to take shape. Once the project got the okay from Gen Dougherty, the commanders that might be impacted with manpower shifts had to be briefed-in on the project. In some cases the brief was well received; however, by others it was greeted with less than a warm reception. Dissecting missile warning, communications, and space operations into the original space command format created more than a little ripple through the system and some commanders were very resistant to giving up anything to the proposed command.

Somewhere in 1976, the development task was completed and all of the briefings to commanders were done. The entire project went on the shelf. Eventually, on, 1 September 1982, Air Force Space Command was activated as an Air Force Major Command, with headquartered at Peterson. Even at that, it wasn’t until April 2002 that Gen Lance Lord, a true missileer, became Commander, Air Force Space Command.

We owe many thanks to these original visionary leaders for their diligence and their ability to see a need for a Space Command and then to move against many senior Air Force officer objections. These men were the same kind of pioneers as Gen Bernard Schriever and those who advocated for a stand-alone Air Force in the mid-20th century. Interestingly, both Gen Sherman and Gen Herres were US Naval Academy Graduates... Just think it all started in a brown paper bag.

![Figure 1](image1.png)

**Our Patch Gallery: No End In Sight!** by Greg Ogletree, AAFM Life Member and AAFM Patch Gallery Curator

A year ago, the "new and improved" gallery of missile patches made its debut on the Association of the Air Force Missleers (AAFM) website. Have you visited it? Even if the answer is yes, hundreds of images of new (and old) patches have been added in recent months. As of this writing, the most recent find of an early patch, just added,
is displayed across the top of this article (Figure 1, a huge backpatch). Also, information has been added for patches that were already posted in the gallery as a result of viewers writing in with additional tidbits of info and as new sources have been discovered. The gallery is a work in progress, always evolving and expanding--like Disneyland. My visit there in 1995 was a completely different experience than my visit in 1957, and I have no doubt that a visit today would be nothing like my last one. The venue is the same but what is offered there is always changing and being improved upon. And so it is with the patch gallery.

When I was doing missile duty long ago, patches were sewn onto uniforms, not Velcro, and most were official, meaning that somewhere there was something written down about the patch and filed for future reference. The name of the unit I was assigned to had not changed in over 30 years. The squadron’s operations officer, Maj Mark Little, handed me three identical unit patches, one for each uniform I was issued; there were no flight patches or unit morale patches. That is the way it was for the enfive years I was there - people came and went, but for uniforms, status quo was the norm.

But today, so far as units and patches are concerned, it seems to be status chaos rather than status quo. Some units have been redesignated several times in just a few years, meaning a new patch with each name change. And not only do many squadrons have flight patches - especially missile, maintenance, and security units--but some flights seemingly change their patch with every new moon! This influx of new patches is not limited to squadrons and flights. There were no class patches for missile operators or maintainers way back in the Dark Ages of missiles when I went through formal training to learn my new job. Nowadays, not only do most classes for Missile Initial Skills Training (IST - it was Initial Qualification Training in my day) have a patch, some even have two - one approved by the higher-ups and the other falling short of the established standards (e.g., dissing the weather on the Northern Tier is definitely frowned upon, and even using the term “Northern Tier” is verboten). The “Freezin’s the Reason” class patch for Minot IST Class 21-06 (Figure 2) is a prime example of a design that is discouraged. Patches are also made for other reasons too, like test launches, Simulated Electronic Launch, Minuteman, code change, and even current events. A good example of the latter is the pandemic, which has resulted in the creation of more than just vaccines--countless patches have been produced referring to COVID-19, and quite a few of them pertain to missiles. The ICBM (Intercontinental Ballistic Missile) Maintenance patch (Figure 3) is just one example. All of these morale patches are important reminders of what missileers have experienced, coped with, and yes, even conquered. Do you have one of the aforementioned patches? Have you checked to see if it is illustrated in the gallery? If it’s not, it should be! Vital to the success of this archive of missile-related artifacts is YOUR input! Each patch has a story, but not all those stories have yet been recorded for posterity. Please, help AAFM preserve our unique heritage by sending us what you have and telling us what you know about patches that are missing from the gallery, or about patches posted without an accompanying story.

I encourage you to think of the patch gallery as sort of a diary of missile history, with each familiar patch sparking a memory. As missileers grow “long in the tooth,” a diary can be an important tool to help counter a fading memory. One writer summed it up nicely this way:

There are no more precious possessions than memories; no greater pleasure than the remembrance of past happiness. Yet Father Time, who throws an enchantment over remembered yesterdays, is a bit of a thief, too. He steals memories, if you don’t watch him. He is especially fond of stealing the little details that make memories vivid. How often have you, thinking back upon some happy day, been surprised to find you could not recollect it as clearly and completely as you would like? … A diary is a friend … sharing your thoughts and experiences, remembering them for you…. It guards against the thieving of Father Time all the details that call back memories so vividly and brightly….

Don’t remember what the emblems on that patch you wore symbolized? Hopefully, you will find their significance recorded in the gallery - AAFM’s patch diary! Unfortunately, there are still pages with no entries, patches about which little or nothing is known. And even some missing pages (i.e., patches). I am not naïve enough to believe the gallery will eventually contain every missile-related patch ever made, but I do believe the members of this organization, their friends and acquaintances, and casual visitors to the gallery, have the potential to get us very close. Take another look at your shadow box, check that shoebox containing your old uniform badges and patches, call your former crew partner, teammate, or co-worker and ask about the patch you remember seeing on his or her pocket or sleeve. Let’s find those missing gems and add them to the treasure trove illustrated in the AAFM patch gallery! Who knows, someone might even discover they have one of the original, elusive “Holy Grail” missile patches from the 706th or 389th Strategic Missile Wing! Emblems were designed and approved, but no vintage patches have yet been found. Remember, if you would like to give your patch a new home by letting it join its family of fellow missile patches, you can donate it to either Greg Ogletree, AAFM Patch Gallery Curator, or Monte Watts, AAFM Collections and Donations Curator. Just contact AAFM and let us know. Either one of us will be very happy to make more room in our collection. In fact, we are continually buying additional binders to accommodate our ever-expanding collections as both units and individuals continue to create new patches. Until the last missile is decommissioned and the last missile unit is inactivated, for new missile patches, there is no end in sight!
Remembering Gen Goldsworthy
From The Editor: ÆTHER: A Journal of Strategic Airpower and Spacepower

The journal recently learned of the February 2022 passing of its oldest subscriber, Lt Gen (Ret) Harry E. Goldsworthy. Goldsworthy, 107 years old, was preceded in death in 2010 by his wife of 73 years, Edith Kathryn. Goldsworthy, born in Spokane, WA, graduated from Washington State College with a reserve commission as a second lieutenant in 1936 and went on to Army Air Corps pilot training in 1939. Goldsworthy flew submarine patrols and B-25 strafers in World War II, holding squadron and group commands. He later flew B-29s and was promoted to brigadier general while commander of the task force that activated the first Minuteman Intercontinental Ballistic Missile wing at Malmstrom Air Force Base (AFB), MT. Before retiring in 1973, he held positions including director of production, headquarters US Air Force, commander of the Aeronautical System Division at Wright-Patterson AFB, OH, and deputy chief of staff for systems and logistics, headquarters, US Air Force.

We included an article on Site Activation in the May 2008 issue of the AAFM Newsletter.

AmazonSmile is a simple way for you to support the Association of Air Force Missileers (AAFM) every time you shop, at no cost to you. When you shop with AmazonSmile, you’ll find the exact same low prices, vast selection and convenient shopping experience as Amazon.com, with the added benefit that AmazonSmile will donate 0.5% of your eligible purchases to the charitable organization of your choice. If you use Amazon Prime, please go to smile.amazon.com on your web browser and select AAFM as your charity.

Minuteman III Shoes and Water Bottle

I Love a Hangar - New Sponsor

This Australian based company carries shoes and water bottles in the color scheme of the Minuteman III missile. A percentage of sales will go to AAFM. For more information, click on the link and chose the Museums and Collections tab for more information.

https://iloveahangar.com/collections/association-of-air-force-missileers

Comiso Reunions - Past and Future

Over 60 veterans of the Carabinieri who served with the Ground Launch Cruise Missile (GLCM) at Comiso Air Starion, Sicily, along with their families gathered in June for a reunion in the Comiso area. They were joined by a few US personnel who were at Comiso as part of the 487th Tactica Missile Wing (TMW), as well as a few of the former local national base personnel. The Carabinieri shared security responsibilities for the GLCM Alert and Maintenance Area (GAMA) as well as 30-50% of each flight security during dispersal operations. During training dispersals they provided real world security as well.

Generals Corbinelli and Guglielmi, at the time Commanders of the Security Department of the Carabinieri, attended. A video conference from Rome featured the Deputy Commander of the Carabinieri of Italy, General Mezzavilla, who was the first commander of the Comiso Carabinieri unit when it began operation in 1983.

It was an event full of emotions among those who had not met since 1991, but, when the base closed, left with the promise to meet again. Reunion events included a luncheon on Saturday at Al Pontile in the Scoglitti marina, and a dinner there Saturday night. Sunday morning included a group photo at the headquarters building at Comiso, a speech by the mayor of Comiso covering her plans for renovating and using the facilities and then a tour of the abandoned base. Sunday afternoon included a return to Scoglitti for the main event at Kapari Scoglitti, including recogniae those who ser a memorial for served in the Carabinieri at Comiso and have since died.

Thanks to Giorgio Falco, who served at Comiso in the Carabinieri and Peter Whittlesey, there 1987-88 as a 411X0C weapons control systems technician.

487th TMW Comiso 40th Anniversary Reunion

A 487 TMW Reunion is being planned 15-18 September 2023 in the Comiso area. Proposed activities include bus tours of the local area, a wine tasting, access to tour to the American part of the base, and a Sunday reunion luncheon. Special hotel rates are being arranged. Contact Peter Whittlesey at (865) 603-4920 or Whittlesey.peter@gmail.com for details or visit the Comiso Air Station Italy Facebook page.
308 SMW Reunion - by Col (Ret) Linda Aldrich, AAFM Board Member, AAFM MbrNo A1145, Estes Park, CO

From California to Massachusetts and everywhere in between, Cold War Warriors descended on North Little Rock, AR, for a Reunion commemorating the 35th Anniversary of Titan II Deactivation. For two and a half days the personnel from every aspect of the Titan II system swapped stories and memories, their pride still so very evident in the work they performed maintaining and monitoring the systems until all the sites were closed.

156 people heard about the Herculean effort put forth by Mr. GT Hill to salvage deactivated site 3-9, full of water and rust, turning it into a one of a kind Bed and Breakfast (B&B). Level 1 sports a king-size luxury bed and even a fireplace for ambiance. Level 2 accommodates more guests, and everyone can gather on Level 3 in the spacious den and first rate kitchen facilities. Mr. Hill was first class entertainment as he explained the hazards of opening a blast door while perched precariously on a lift and then being met with the deluge of water in the face, when the door was finally opened. Renovating the site was a "learn by doing" event in many cases, including figuring out how to eliminate methane gas from Level 1. This absolutely amazing site is now entered in an Airbnb contest for most unique B&B, and we believe Mr. Hill is as competitive as it gets to achieve recognition for "most unique B&B!"

Guests were also treated to a visit to the Jacksonville Museum of Military History. The displays at the Museum cover all eras of American military service and is well worth a stop in Arkansas for anyone who happens to be traveling cross country. The visit was arranged through the efforts of SMSgt (Ret) Jack Meadows, who is affiliated with the museum and loves to share his historical knowledge with visitors. Jack was the original Missile Facilities Technician (MFT) on 374th Strategic Missile Squadron Crew 119 in 1963. After nine years as an aircraft mechanic, he came to the 308th Strategic Missile Wing (SMW). As he said, "I found a home and served with true professionals." Thank you Jack, for being "the first" and showing us how to do it right.

The Saturday evening banquet at the Wyndham honored special guests, Mrs. Sandy Greene and Mrs. Doras Johnson. Sandy Greene is the spouse of Col Albert R. Greene, the final 308 SMW Commander, who passed away 7 January 2022. Sandy is definitely an honorary missileer due to having been a part of Col Greene's long career in missiles and being with us for the shutdown of Titan II at the 308 SMW. Doras Johnson is the spouse of CMSgt William Johnson, who was the Senior Enlisted Advisor of the 308 SMW until deactivation. Chief Johnson served in the missile field for 30 years, and passed away in January 2021. In addition to the impeccable dinner service by the Wyndham Riverfront Hotel, we were treated to a slide show of photos collected from all the years of Titan service at Little Rock AFB.

There is no doubt that the After Action Report for the 35th Anniversary Reunion would definitely say "A good time was had by all!"

Lost Members

Over the years we have lost contact with members. If you have information on any of these folks, please let us know - we’ve provided names and last known locations:

- Col Ralph Angel, Alvarado, TX
- Thomas "Tim" Armstrong, Tampa, FL
- Major Sam Ayars, Falcon, CO
- MSgt Robert Bailey, Fresno, CO
- Capt Jorge Barriere, San Francisco, CA
- Col Phil Benjamin, Fairfax, VA
- Col Richard Biggs, Spokane, WA
- Capt Dennis Cain, Louisville, KY
- Col John Chambers, Arlington, VA
- Donald Greer, Albuquerque, NM
- Lt Col Phillip Diehl Gulfport, MS
- SMSgt Billie Donaldson, Clinton, UT
- BGen Jerry Drennan, Colorado Springs, CO
- Major Sam Dunkin, Rosburg, WA
- Lt Col Joel Funk, Woodbridge, VA
- Sgt Scott Glush, Tallahassee, FL
- MSgt Bernard Hautula, Tucson, AZ
- Major Donald Hofstra, Seafood, VA
- Lt Col Robert Kem, Spokane, WA
- CMSgt Ronald Lavigne, Glen Carbon, IL
- Capt Barbara Leavitt, San Fransisco, CA
- Sgt Don Luther, Plymouth, IN
- Capt William Madison, Providence Forge, VA
- CMSgt David Manning, Fairmont, MN
- TSgt Charles McGilvray, Washington, DC
- MSgt Martin Norton, New Braunfels, TX
- Neal Padbury, Stanwood, WA
- Capt John Patterson, Fresno, CA
- Col Edmund Robert, Fort Collins, CO
- Capt James Spreight, Montgomery, AL
- Lt Col Sherry Stearn-Boles, Great Falls, MT
- A1C Jerry Strong, Oklahoma City, OK
- Lt Col Eddie Walker, Clinton, MD
- Capt Sally Whipple, Buzzards Bay, MA
- SMSgt Raymond Worden, Fowler, CO
Letters to AAFM

Address letters to AAFM, 17714 Cherokee St, Broomfield, CO 80023, or send by email to director@afmissileers.org. Letters may be edited, content/meaning will not be changed.

No Letters this issue.

Taps for Missileers

Lt Col (Ret) S. Woodruff Bentley, an AAFM Member, served in Atlas E in the 548 SMS, Minuteman in the 321 SMW and 4 ACCS, and lived in Vienna, VA.

CMSgt (Ret) Robert E. Dunn, an AAFM Member, served in Titan I in the 568 SMS and 395 SMS, and Minuteman in the 44 SMW and 394 SMS, and lived in Las Cruces, NM.

Lt Gen (Ret) Harry Goldsworthy was Site Activation Task Force Commander at Malmstrom AF, MT, and lived in Riverside, CA.

CMSgt (Ret) Henry “Hank” Habenick, AAFM Life Member and longtime Board Member, served in Minuteman in 341 SMW, 15 AF, 3901 SMES, and BMO, and Peacekeeper, and lived in Cottage Grove, OR.

Lt Col (Ret) James Hastings, an AAFM Life Member, served in Minuteman in the 321 SMW and 351 SMW, and 4 ACCS, and lived in Rapid City, SD.

Col (Ret) Jim Hegarty served in Minuteman in the 341 SMW and at AFPC, and lived in Melbourne, FL.

Rod Hinek, an AAFM Member, served in Mace in the 71 TMS and lived in Hot Springs, SD.

Former A1C Gary Hoselton, an AAFM Member, served in Titan I in the 569 SMS and lived in Portland, OR.

Col (Ret) Deb Kirkhuff, an AAFM Member, served in Titan II in the 381 SMW, Minuteman in the 91 MW and GLCM 303 TMW and 487 TMW and lived in Kaysville, UT.

Lt Col (Ret) Jack Mann, an AAFM Member, served in Minuteman in the 321 SMW and lived in Comfort, TX.

Col (Ret) David McLennon, an AAFM Member, served in Minuteman in the 321 SMW and 4315 CCTS, and at SAMSO, and lived in Cerritos, CA.

Lt Col (Ret) Gerald Miller, an AAFM Member, served in Atlas D and E in the 389 SMW, 549 SMS and 566 SMS, Minuteman in the 44 SMW and 90 SMW, Peacekeeper, and in the 4315 CCTS and 3901 SMES, and lived in Surprise, AZ.

Lt Col (Ret) Jack Nicklas, an AAFM Life Member, served in Titan II in the 308 SMW, Minuteman in the 44 SMW and 90 SMW, in GLCM and Peacekeeper, in 1 STRAD, and lived in Burke, VA.

CMSgt (Ret) Jimmie E. Prentice, an AAFM Member, served in Atlas D and Minuteman in the 3901 SMES, 1 STRAD, Hq SAC, BMO, SACSO and AETC, and USAFE, and lived in Redlands, CA.

CMSgt (Ret) James L. Rash, an AAFM Member, served in Titan II in the 381 SMW and lived in Galt, MO.

Col (Ret) James Rudy, an AAFM Life Member, served in Minuteman in the 44 SMW, 91 SMW and 351 SMW, and lived in Warrensburg, MO.

CMSgt (Ret) Robert Quay, an AAFM Life Member, served in Minuteman in the 341 SMW and GLCM, 487 TMW and lived in Great Falls, MT.

Lt Col (Ret), Neil D. Sanders, an AAFM Member, served in Atlas in the 566 SMS and lived in Pensacola, FL.

Capt Andrew Stuckhoff served in Minuteman in the 351 SMW and GLCM in the 485 TMW and lived in Washington, MO.

Lt Col (Ret) C R (Wes) Westfall, an AAFM Member, served in Titan I in the 851 SMW and lived in Louisville, KY.

Col (Ret) Gerald J Winchell served in Atlas and lived in Bellevue, NE.

New Members

We continue to welcome new members to our Association, as well as those longtime members who have decided to convert from annual memberships to lifetime memberships. New members can learn more about Member benefits by visiting AAFM at www.afmissileers.org or by reviewing our newsletter Archives that are part of the web page.

New members since 31 March 2022

Life Members
Harry Birmingham Jr.
Stephen Chick
Raymond Coughlin
Frank Gallegos
Richard Jee
Mohammed Kahn Jr.
Donald Kniesche
William Raffield
Jim Rutledge
Keith Tonnies
Robert Vercher

Annual Members
Carl Amoscato
Clayton Anderson
David Bohan
Alexander Chumpitaz
Samuel Cooperman
Lina Digiacomo
Gary Gagnon
Alan Geller
Otis Harrison
Adrian Hayes
Dustin Jacobs
Shane Knowles
Lucas Lagenderfer
Jesse Larsen
Dwayne Mayberry
John Mayer

Daniel Moore
John Pawlek
David Rathgeber
Leonard Ramirez
Chad Searle
Stamford Smith
Jason Soles
Rhett Stesing
Michael Stewart
James Willis
Derrick Woolaston
Michael Yamzon
**AAFM Sponsors for 2022**

- Aero Thermo Technology, Inc.
- Jacobs
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- Summit Technical Solutions

I Love a Hangar
AmazonSmile
**AAFM National Meeting in Salt Lake City 5-9 October 2022**

**Registration:** On line at [www.afmissileers.org](http://www.afmissileers.org) or complete the form below. Closeout date is 5 Sept 22.

**Reservations:** We will be using the Courtyard Marriott and the Hyatt House which are side by side in downtown. Hospitality Suite and all dinners and meetings will be in the Courtyard. Make your hotel reservations directly with the Courtyard or the Hyatt House (see links on our web site). Rate is $139, including breakfast for two each morning. Rate is available days on either side of your visit. While there is no airport shuttle for the hotel, there is a train from the airport to downtown.

**Not Staying at the Hotel?** - If you are staying in a motor home, other hotel or with friends, or live in the area, you can attend any or all of the events. Complete the reservation form for the events you would like to attend. Check with the front desk for parking permits.

**Hospitality Suite** - Open every day when no other activities are scheduled, with snacks and refreshments and some items from the AAFM store. Registration fee covers suite operation.

**Attire** - Casual dress for all events except for the Banquet: business casual (open collar shirts, coats optional, no jeans)

**Special Needs** - Let us know of any special diet needs, handicapped access, etc.

**Schedule of Events –**

**Wednesday, 5 October 2022**
1300 - Registration, Hospitality Suite open   Early Bird $30 until August 15th; then $35
1800 - Welcome Reception and pay as you go bar, $25 per person.

**Thursday, 6 October 2022**
0700 - Breakfast (included in room rate)
0830 - Depart hotel for Minuteman tour-bus and lunch $48 per person
1800 - Dinner at the hotel pay with as you go bar - $30 per person.

**Friday, 7 October 2022**
0700 - Breakfast (included in room rate)
0830 - Depart hotel for Sentinel tour- $48 for bus lunch
1630 - Return to hotel
1800 - Dinner at the hotel pay as you go bar - $35 per person

**Saturday, 8 October 2022**
0700 - Breakfast (included in room rate)
0730 - 0830 - AAFM Board of Directors Meeting
0900 - General Membership Meeting
1200 - Lunch $20
1800 - AAFM Banquet w/ speaker - $62 per person, choice of Steak, Chicken, or Vegetarian and pay as you go bar

**Sunday, 9 October 2022**
0700 - Breakfast (included in room rate)
1100 - Depart hotel

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**Registration Form - 2022 National Meeting**

On line registration at AFMissileers.org or via Mail with check to AAFM, 17714 Cherokee St, Broomfield, CO 80023

<table>
<thead>
<tr>
<th>Name __________________________________________________________</th>
<th>Registration fee-$30 each</th>
<th>Number</th>
<th>Amount</th>
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<tbody>
<tr>
<td>Address ______________________________________________________</td>
<td>Late registration (23 Jul) $35</td>
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<tr>
<td>City, State, Zip ________________________________</td>
<td>Wednesday Reception- $25 each</td>
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<tr>
<td>Phone_________________ Number Attending_________________</td>
<td>Thursday Tour $48 each</td>
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<td>Spouse/Guest Name__________________________</td>
<td>Thursday Dinner $30 each</td>
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<td>Arrive_________________ Depart_________________</td>
<td>Friday Tour $48 each</td>
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<tr>
<td>Special Requirements_______________________________________</td>
<td>Friday Dinner $35 each</td>
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<td>(Enter names as preferred on name tags)</td>
<td>Saturday lunch $20 each</td>
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<td>Banquet $62 each</td>
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<td></td>
<td>Circle one per person: Steak Chicken Vegetarian</td>
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<td>Total Amount</td>
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For Base Tour for Active/Retired Military or spouse with ID card - Full name and SSN:

Member: ___________________________SSN _________________________________

Guest: ____________________________ SSN _________________________________

For those without active/retired ID cards, Full Name, State Driver’s License No and last four digits of SSN:

Member: ___________________________DL No: ____________________State: _______SSN Last four: ______

Guest: ____________________________DL No: ____________________State: _______SSN Last four: ______
Reunions and Meetings

487 TMW Reunion - 15-18 September 2023 in the Comiso area. Contact Peter Whittlesey at (865) 603-4920 or email Whittlesey.peter@gmail.com or visit the Comiso AS Italy Facebook page.

Association of Air Force Missileers 2022 National Meeting - 5-9 October 2022 in Salt Lake City, UT.

Plan your unit reunion in conjunction with our National Meetings and let AAFM take care of all the details. Get your reunion notices in early so we can help spread the word. Keep in mind that a significant number of our members do not use Facebook or email, so include a telephone contact number in your announcement.

Keep your mailing address, email address and dues current with AAFM. Email us at aafm@afmissileers.org, call 719-351-3962, or mail to AAFM, 17714 Cherokee St, Broomfield, CO 80023

AAFM is a non-profit, tax-exempt organization under section 501c(3) of the IRS Code.
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Association of Air Force Missileers, 17714 Cherokee St Broomfield, CO 80023 719-351-3962
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