



AMA Chapter #3798

# Chino Valley Model Aviators

## Official News



November 25, 2019

Volume 22 Issue 11

www.chinovalleymodelaviators.org

*"To create an interest in, further the image of, and promote the hobby/sport of radio controlled aircraft"*

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### Aviation Thought:

**The scientific theory I like best is that the rings of Saturn are composed entirely of lost airline luggage.**

*Mark Russell*

### Support our Local Hobby Shop



**Valley Hobby**  
Prescott Gateway Mall

## Ray Landry III & Ray Landry Sr. Father and Son Glider Duo



## Albuquerque 2019 Balloon Festival



Photo by Bob Noulin



# Bill Gilbert: CVMA President's Message



### President's Column

As the year heads to a close, marked by our last club meeting of the year in November, it may be a good time to reflect: This past year we experienced healthy club growth with the addition of 9 new members over last year.

We crack-filled and then re-sealed and striped the runway. The safety fence was replaced, assembly stands were all replaced. We added a new glo tuning stand, a break-in stand was added next to the shed. Volunteers helped clear the parking area of weeds and tumble weed. Volunteers also mowed around the runway and the driveway into the field. Our facility looks very, very good.

Our Flight Training capacity has also increased in quality and quantity. We now have three club flight instructors, more buddy boxes, and two Apprentices and

one Senorita. We are in a good position to help train our new members needing basic flight training.

Our annual Steve Crowe Fun Fly was a big success; we had a good turnout from the community, *John Meyers* made a grand entry and then departure in his Quicksilver Ultralight.

The club pilots put on a good showing with a lot of open flying. We were fortunate to have excellent demos with Dan Avilla's jet, two very, very talented 3D pilots (*Andrew Grant and Casey Buggeln*) put on a duet of 3D flying, and *Chris Corbitts'* and his helicopter put on a good show as well.

We also had a club Fun Fly day with a build and fly competition, as well as a delta wing class full-contact combat! It was a very fun day for all the participants and spectators alike. We may bring those events, among others, for a repeat in the coming

year.

We had several pro-level and competition-level pilots from the Valley join us as associate members this summer.

These fellow pilots wanted to beat the heat and altitude restrictions at their home fields. They practiced some very advanced and spectacular IMAC and 3D maneuvers at our field. Two of them, Spencer Nordquist, and Bryant Mack went on to win 1st and 2nd Place at the Tucson Aerobatic Shootout in Invitational and Freestyle classes!

Craig Guest placed #9 in Advanced IMAC. Congratulations to them, and we were glad to have them at our field!

As the weather turns adverse for the season, let's be thankful for our good fortune to have such a great facility and such a good group

of pilots to enjoy our beloved hobby with. As flying conditions are reduced, it may be a good time to explore new projects to keep the RC fires burning! Happy Holidays to all and your families. See you at the field!

*Bill*



## CVMA NEWSLETTER

AMA Chapter #3789  
Published Monthly

President — *Bill Gilbert*



Vice President — *Doug McBride*



Treasurer — *Harold Ellis*



Secretary — *Bob Steffensen*



Safety Officer — *Steve Shephard*



At Large Member — *Dan Avilla*



At Large member—*Dennis O'Connor*



Newsletter Editor — *Bob Shanks*



## What Plane is This?



See Page Ten



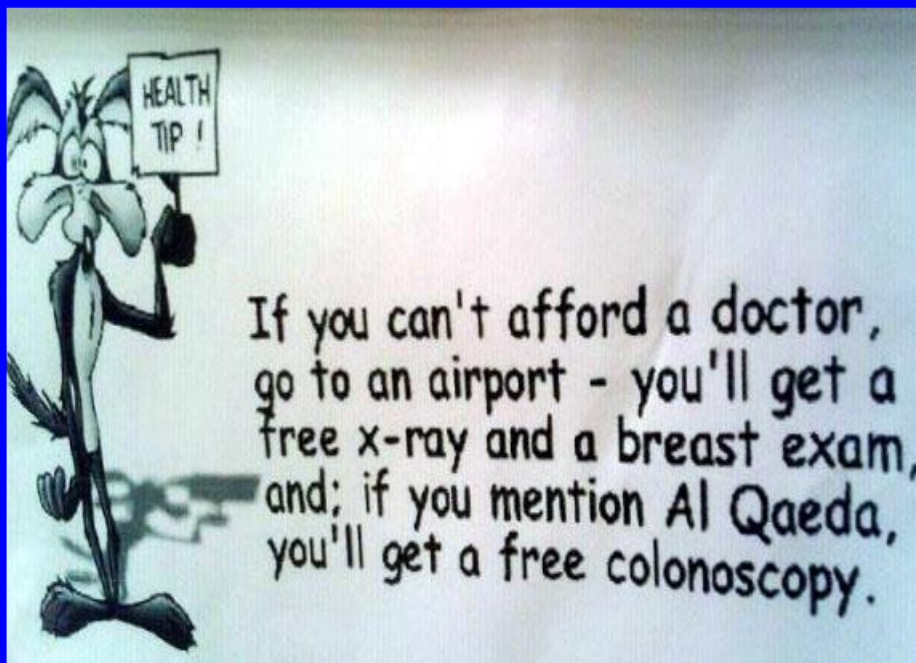
**2019 — MARK YOUR CALENDARS**

**Dec. 6 — Christmas Banquet**



**Club Meetings:**

**Third Wednesday of Each Month—7 PM  
Prescott Airport Executive Building.**



## BORN IN A BARN?

**IF YOU ARE THE LAST ONE TO LEAVE THE FIELD:  
PLEASE REMEMBER TO LOCK THE GATE.**



## SAFETY: ALWAYS A CRITICAL ISSUE

The PROPOSED change by the FAA may lead us to a 700' ceiling as a maximum altitude we can reach and fly. While this has not yet been approved or finalized it further underscores how much the government has encroached onto our hobby. It appears, and your editor has heard this from different sources and opinions that our AMA has not really done the job they should've on tackling this issue. There of course is politics involved to some extent so many opinions are out there.

There is a host of issues surrounding an altitude limit. Many problems immediately surface such as the size of the airplane and how to judge a reasonable altitude under 700 feet. The power and size of turbine models can have them accelerating past 700' in just a matter of seconds after take off. This is also a concern with larger glow and gas models as well.

The issue of gliders is a big

problem. Your editor flies gliders a lot and once a good thermal is found the model can ride it to altitudes far above 700 feet very quickly!

At our last meeting, President *Bill Gilbert* put up an aviation sectional chart for our area followed by a lot of discussion. One item discussed was the need for a spotter when flying to help guard against too high an altitude. Again with out some of the newer electronics available in some of our radios knowing the AGL (altitude above ground level) is strictly a matter of judgement. So what eventually gets finalized by the FAA is still a matter of conjecture.

Your editor has a "See How High" electronic sensor he can plug into an open channel and then after landing get a read out of how high he has flown. This then allows him the ability to get an idea of just how high he

should fly his glider. Unfortunately that device is no longer available.

We know the AMA is working on the altitude rule with the FAA and hopefully together some good judgement will prevail and rules that allow for specific field location, air traffic control of the area of an RC field and other local needs can be resolved equitably that will allow this great hobby to continue to flourish. More information is coming on this issue, If you have ideas or comments, get involved by contacting our AMA area representative with your thoughts.

Our club has grown significantly over the last couple of years so on busy flying days it is always a good idea to have a spotter. It's not uncommon to see upwards of five or six models flying at once so a spotter is always a good idea.

**FLY SAFE members.**

# Club Members Flying Machines



Dan Avilia's F-16 Thunderbird

Clint Manchester's nice DY-PLZ biplane.



Shel Liebach's cool turbine.



Overhead shot of Dennis O'Connor's Corsair.



Dennis O'Connor's DLE20 powered Corsair.

Jack Potter's futuristic design electric blue foam wonder.



Bob Shanks' Helium EP glider.



Bob Wurth's custom fuel tank.

Clint Manchester's little PT-19.







*Tanner Pacini's Russian Trainer*



**Bob DeNoyelles** launches his delta at left.

At right is a **Don Ferguson's** runway crash!



# Planet Mercury's Transit of the Sun November 11

<https://lowell.edu/november-11-mercury-transit/>

*On November 11, Mercury and Earth will partner with the Sun in a celestial swing dance known as a transit of Mercury, when this planet will pass directly in front of the Sun as seen from Earth. From northern Arizona, the event will be visible (most easily with the aid of filtered telescopes) for about 4 hours. Beginning at 7am MST on Nov 11*

Nearly every year, the Moon crosses in front of the Sun, partially or completely blocking it from view in what is commonly called a solar eclipse. The Moon isn't the only celestial object that crosses in front of the Sun, however. The positioning of

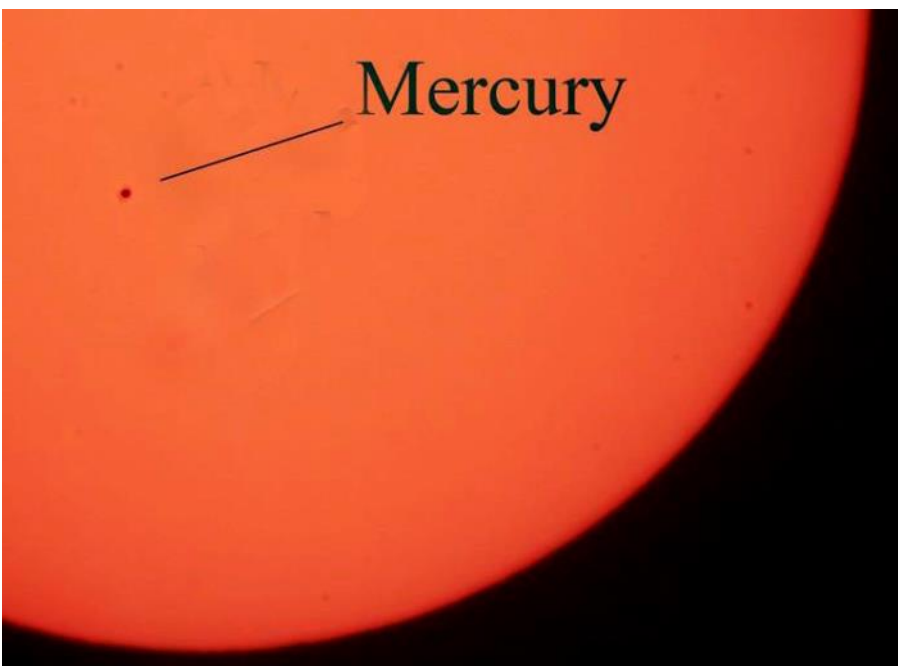
the orbits of Mercury and Venus between Earth and the Sun means these bodies also occasionally move in front of, or transit, the Sun's face, as seen from Earth.

Compared to solar eclipses, these planetary transits are rare. Transits of Venus, for instance, generally happen a little less than twice per century. The last one occurred in 2012 but the next one won't happen until 2117.

Partly because Mercury is closer to the Sun than Venus and thus orbits the Sun more rapidly and frequently, Mercury transits are more common than those of Venus, occurring 13 or 14 times per century—most recently in 2016. After the November 11 event, the next Mercury transit will happen in 2032.

German mathematician and astronomer Johannes Kepler was the first person to predict Mercury and Venus transits but never observed one, dying a year before a Mercury event in 1631. But thanks to Kepler's calculations, Frenchman Pierre Gassendi will forever serve as a footnote in the study of transits. A priest and scientist, Gassendi also taught philosophy courses and purportedly one of his students was Cyrano de Bergerac, the real-life author on which Edmond Rostand's 1897 play was based. Gassendi used Kepler's predictions to observe the 1631 Mercury transit, becoming the first person to document a planetary transit of the Sun.

For North America, the transit began in the early morning hours on November 11. The eastern part of North America could see the start of the transit after sunrise, whereas the western part saw the transit already in progress as the sun rises on November 11.





# Have Blue (For F-117 Development) Maiden Test Flight

By AN Unknown Lockheed Engineer

On Dec. 1, 1977, just after sunrise at Groom Lake, Nev., Have Blue (HB1001) made its maiden flight, and history, as Lockheed test pilot Bill Park took it through its maiden flight. Ben Rich, the former head of Lockheed's Skunk Works that built many of the nation's most advanced aircraft said, "This flight will be every bit as important to the nation's future and the future of the Skunk Works as the first test flight of the U-2 spy plane."

This came after the prototype was flown disassembled, via a C-5 Galaxy, from the Lockheed Plant in Burbank, CA, to the classified Nevada base. The crew who made that historic flight in the middle of the night Nov. 16, 1977, never knew they had the first Experimental Survivable Testbed prototype in their cargo hold until years later after the F-117A came out of "the black."

The Have Blue prototypes, or XST, were the first fixed-wing aircraft designed from an electrical engineering (rather than an aerodynamic) perspective and, while similar to the later F-117, were smaller with greater wing sweep and inward-canted vertical tails.

Weighing only 8,950 pounds empty, the Have Blue aircraft topped out at a max takeoff weight of only 12,500 pounds. Lockheed engineers exploited as much off-the-shelf technology as practical to reduce design risks and keep costs and design turnaround times to a minimum.

The production aircraft used an environmental control system adapted from the C-130 Hercules; flight controls from the F-16 Fighting Falcon; brakes from the F-15 Strike Eagle; an ACES-2 ejection seat common to the F-15, F-16 and A-10 Warthog; and comm/nav equipment used in other Tactical Air Command aircraft. The ground support equipment used for the aircraft was common to 95 percent of other aircraft, thus facilitating deployments and cutting life cycle/logistical costs.

Have Blue had only three objectives:

- In-flight validation of the four low-observable signatures the program had previously identified.
- Demonstrate acceptable flying qualities and performance.
- Demonstrate modeling capabilities that accurately predict low-observable characteristics of an aircraft in flight.

Additional variations of Have Blue included the absence of flaps, a speed-brake and weapons bays on the XSTs. With regard to the inward-canted vertical tail section, initial beliefs that the inward-canted tails would help shield the hot exhaust from infrared detection proved exactly the opposite; it funneled the hot exhaust straight down beneath the aircraft, increasing its infrared signature. The F-117A also employed a targeting Forward Looking Infrared, or FLIR, system mounted in a recess below the windshield. Target acquisition and weapon delivery is carried out with a ventral FLIR/laser turret, to the right of the nose wheel bay. Due to the absence of radar for ranging to bomb release, the laser provided both range finding and designation for weapons, its ventral position providing a similar field of view to established FLIR/laser targeting systems.

Sadly, on May 4, 1978, HB1001 met its demise on its 37th test flight, when landing gear trouble resulted in a decision for Park to eject. Park was injured in the incident and never flew again. As a result of his injuries and the subsequent removal from flight status, Lockheed named him their director of flight operations.

A short 13 months later HB1002 met the same fate when Air Force test pilot Ken Dyson ejected from it after experiencing engine and hydraulic failure. By this point, the program was within a few sorties of its planned completion and had achieved all of the Have Blue program's objectives. Considered an overwhelming success, the Air Force closed the doors on Have Blue. Both of the prototypes are buried at Groom Lake.

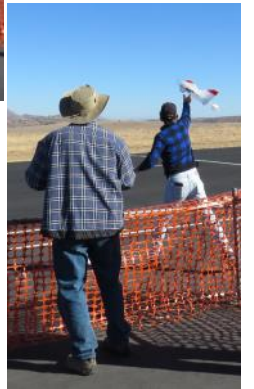
As a result of the testing on Have Blue, numerous changes were made from the prototypes to the final F-117 design. Designers ultimately moved the tails back on the F-117 so they weren't directly over the exhaust.

For the trivia minded, the windowless Skunk Works hangar where the Have Blue prototypes were engineered, fabricated and assembled is the same building that produced the F-104 Starfighter, U-2 Dragon Lady and SR-71 Blackbird aircraft. Alan Brown, former director of engineering at Lockheed, said there couldn't be an F-22 Raptor without the F-117; however, without a test flight on Dec. 1, 1977, in a dry lake bed in Nevada, neither aircraft might have made it to the Air Force inventory.



# Club's 3rd Annual Build & Fly Challenge and Combat October 26

*Photos by Paul Gendarme and Bob Steffensen*

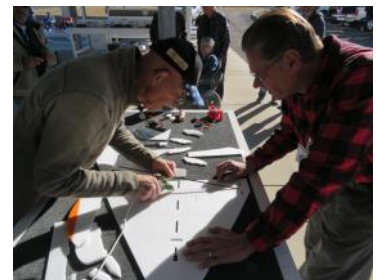


Our 3rd annual Build and Fly Challenge on October 26 had two man teams to build and fly the "Zingali" foam project plane he laser cut for all teams. The club footed this expense. Each team member attempted to fly for at least 2 minutes. 1st Place went to: [Don Crowe/Harold Ellis](#); 2nd Place to: [Larry Parker/Riley Harley](#) and 3rd Place to [Terry Steiner/Bob Steffensen](#).

The Build & Fly event featured some combat as well and the winners for that fun activity were: 1st [Jack Potter](#); 2nd [Jean Greear](#); and 3rd [Bill Gilbert](#). Combat is always an exciting event. Pictured below is [Randy Meathrell](#) and [Don Crowe](#) after Randy's mid air "shoot down" of [Don's](#) plane.



Randy Meathrell, collided with Don Crowe at right







# October 2019 General Membership Meeting



The General Membership meeting on November 20, 2019 began at 7pm as our new President **Bill Gilbert** swung the gavel for the first time. We opened with Pledge of Allegiance.

Club membership stands at 163. There were 33 members present including new member **Jim Downey**.

Minutes of October meeting were approved unanimously with no corrections noted.

President **Bill Gilbert** conducted a brief discussion of the FAA ceiling for the airfield based on local general aviation charts. Additional sidebar discussion reached a consensus of 700 ft AGL for our field...if and when the FAA rules become law. If you are flying at this altitude employ a spotter to watch for other full size aircraft passing through "our airspace". Weigh in with your members of Congress and pitch a fit for a little common sense for recreational model flying.

A brief discussion of training and certification of flight instructors, student pilots, and new members was discussed. There are some AMA insurance provisions that would apply to

students (who have not yet joined the AMA) working with an AMA certified flight instructor. Further discussion will take place at the next Board meeting.

We are proposing to put up a new field sign to replace the existing one. It will cost about \$220. **Bill** provided pictures of the existing and new signs. Members concurred and said to proceed.

The Build and Fly Challenge on October 26 drew several two man teams to build and fly the "Zingali" project plane. Each team member attempted to fly for at least 2 minutes. 1<sup>st</sup> Place went to: **Don Crowe/Harold Ellis**; 2<sup>nd</sup> Place to: **Larry Parker/Riley Harley** and 3<sup>rd</sup> Place to **Terry Steiner/Bob Steffensen**.

If have not yet received your new **Steve Zingali** designed and manufactured name badge, come to a meeting to pick up yours. (They will not be mailed.)

Among the nominees the monthly Horse's Ass trophy award for the best crash were: **Shel Liebach, Don Ferguson, Jeremy Beck** and others. **Don Ferguson** took home the trophy for this month.

Treasurer **Harold Ellis** presented his first Treasurer's report. The report was approved unanimously. **Harold** suggested that we might want to do a CD ladder with some or all of our savings. This will be discussed at the January Board meeting and Harold will bring a proposal to the membership in January meeting.

Secretary **Bob Steffensen** stated that we have 32 member registered for this year's Christmas party. Set the date on your calendars for Friday December 6 at the Centennial Center. The reservation sheet has been emailed to each member. Send your reservation sheet with check or cash for \$39.75 per person to the CVMA mailbox...the deadline has been extended to Friday the 29<sup>th</sup>. Get them in the mail if you want to join us! The evening schedule and directions to the venue will go out next week.

**Dave Bates** along with **Steve Zingali**, suggested an instant replay of the combat competition. It will be considered.

We broke about 7:30pm for coffee and no cookies...Rick Nichols apologized for forgetting the goodies this month. (We still love you Rick). We resumed the meeting at about 7:45pm.

## Planes and Projects

**Bill Gilbert** showed off his new SAB Helicopters Black Nitro chopper.

**Bob Steffensen** talked about his recently completed Sig 1/6 scale J-3 Cub. **Rick Nichols** displayed nearly complete Javelin. **Steve Zingali** showed his latest foam build: a larger version of the **Matt Mrdeza** designed F-23 Arrowhead. **Matt Mrdeza** brought in a foam MXM-C acrobat; and **Lloyd Oliver** showed a retro SkyLark 56.

**Door Prize/Raffle:** **Dave Domzalski** won the door prize consisting of a Christmas ornament, a bag of velcro, and an aircraft crash bag.

**James Cowley** won the twin engine Dynam BF-110, in tonight's raffle. **Dave Domzalski** also won the **Steve Zingali** donated Delta Wing We adjourned about 8:20pm. Respectfully, **Bob Steffensen** Club Secretary

**Dave Domzalski** at right won the door prize.



Bob Steffensen's Cub.



Steve Zingali and his Arrow Head

**Matt Mrdeza** at right, is a retired aeronautical Northrup engineer and helped design the Arrow Head in the 1970's. At left Steve Zingali built one and it flies well. Matt gave him a flyer of the plane that was never picked. The F-117 won that selection and of course that is history.



Matt Mrdeza's MXM acrobat



Rick Nichols' Javelin



Lloyd Oliver brought his SkyLark 56

## Don Ferguson: Crash of the Month



Flying Horses' Butt designed by treasurer **Harold Ellis** he also awards the trophy.

## October Raffle Winner: James Cowley



A Dynam BF-110

## Name the Plane: *"The Hell"*

This is a fictional RC model designed by member *Dave Domzalski*. It has a tail gunners top turret Gunner and side gunners. When your editor first saw it at the field he was really scratching his head. The four bladed prop is actually two propellers. The name is appropriate as the first thought that comes into mind is "What the Hell is this Plane". Dave put retracts in it and a bomb bay as well.

So just what is the background on this really great looking RC model?

According to *Dave*:

"The Hell!" is a fictitious and whimsical design of a WWII naval dive bomber. I affectionately refer to as the "Lumbering Moose" for its handling qualities."

"I combined elements from a number of dive bombers including lots of guns! The design became so complex and conflicted that it never reached production in time for the war. It probably would have been a Douglas design as they were wing purists. The wing is clean with all the armament on the fuse or in the Bomb bay. The green house canopy is extra long including an "office" in the aft



most portion. There would have been a crew of 6 with room for those rescued. It would have been the worlds largest single engine bomber. As an RC airplane it resembles an old pattern plane in proportion."

"The tall profile enhances knife edge capability. The gun turrets add drag to help it slow down. The bomb bay is functional and used to drop a variety of stuff including parachutists."

"The model is made from all pink Foamular covered in glass and

finished with craft paint. Its been a good plane for several years and earned a new wing equipped with retracts and flaps."

*Dave Domzalski.*



Gun turrets on the fuselage side and a bomb bay.

