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Bend Aero Modelers

Flight Report

August, 2016

Next Meeting

August 24, 2016
6:30pm At Black Bear Diner
Food Available
Come early to visit and eat!

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From the Editor

By Bob Ingram

August

As the BAM editor I greatly appreciate the contribution of pictures and articles that I have been provided … so continue to feel free to submit pictures and stories during 2016.

REMINDER

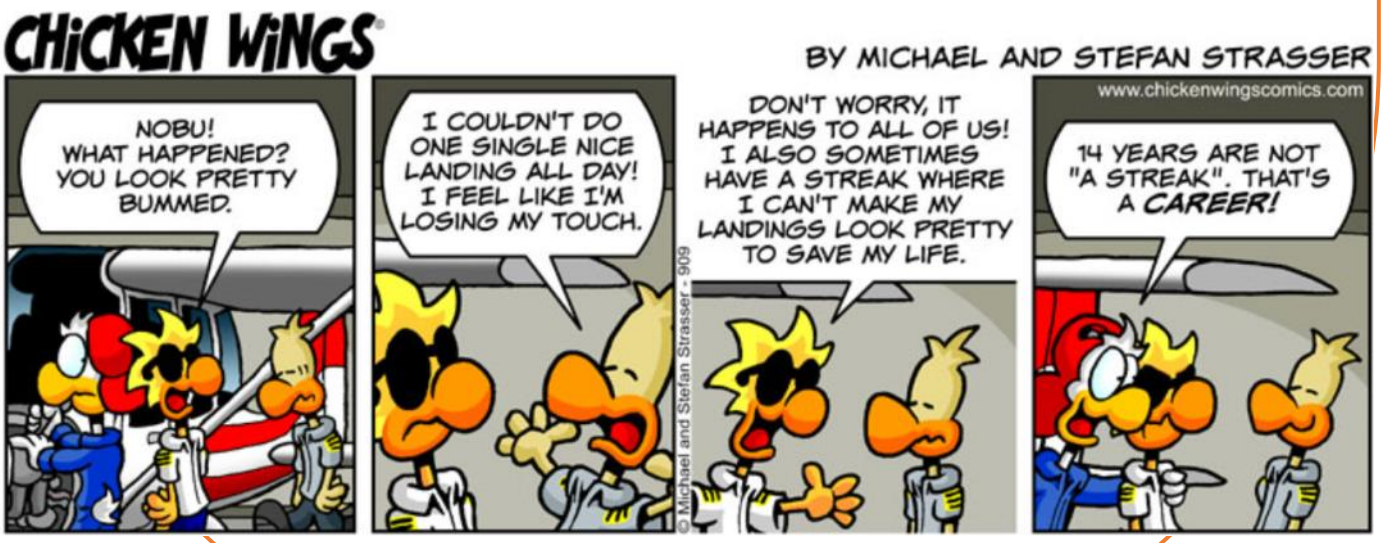
Each issue of the BAM Flight Report includes:

(1) Yearly Calendar of events (those that have been scheduled)

(2) BAM Field Safety Guidelines

(3) Fly / No Fly Zone Map

(4) AMA Safety Code



Welcome to BAM

Let's give a **BIG WELCOME** to our latest new BAM member— .

Bill Ryan joined BAM as a retirement hobby. Bill is a retired machinist from Auburn, Wa. He currently flies an 'Apprentice' and is beginner to intermediate in skills.

Welcome to BAM … all of us look forward to seeing you and your planes at Popp's Field.

A contribution to Flight Report …

POPP'S FIELD HOME OF LOST RC PLANES?

Sunday, Aug. 7, 2016, the temperature was right, the sun was shining and, as usual, the wind was blowing from the southwest. Wind sock at times was horizontal, but never limp.

Then it happened. "It's gone, I lost it" yells Bill Hand as his Hobbyzone Sport Cub S with SAFE technology disappears toward the hills northeasterly of the field. "Last I saw of the plane was just above the ridge as it was at full throttle, SAFE system turned off, and the plane was flying backwards", says Bill.

Members there wanted to do a search, but with the plane being so small and light in weight, who knows how far it was carried on the wind. Bill called it a loss and decided to go home. But, Tom Rainwater volunteered to scour the hills to see if he could find the little lost Cub S.

So far, this author does not know if Tom was successful.

PILOTS MEETING

On July 2, 2016 three BAM members got together to discuss the day's events. They are left, Chris Shaker an accomplished private pilot and RC pilot. Center, Dave Lawler (out of uniform), an accomplished RC pilot. Right, Chris Rankin, an accomplished commercial pilot, private pilot and RC pilot. Lawler and Rankin were toasting Shaker as he was married earlier in the day. Congratulations to Chris Shaker and his lovely new bride Lori for many, many years of happy bliss.

Show & Tell

James Fredericks brought in his FlightWorks Edge 540 in Red Bull Graphics. The plane has a 47" wingspan and on 820KV motor. James said these are these are available on Tower Hobbies website for $159. Nice plane James!

Crash Trophy

The crash trophy for July was a fairly easy decision. Mark Benavente not only executed the crash of his Vought F4U Corsair but also photographed and advertised the event. No one could compete with such a complete and well thought out presentation.

And BEFORE the BIG event … Mark B. was doing so well … maybe he should NOT have taken the picture of his own plane in flight!!!!

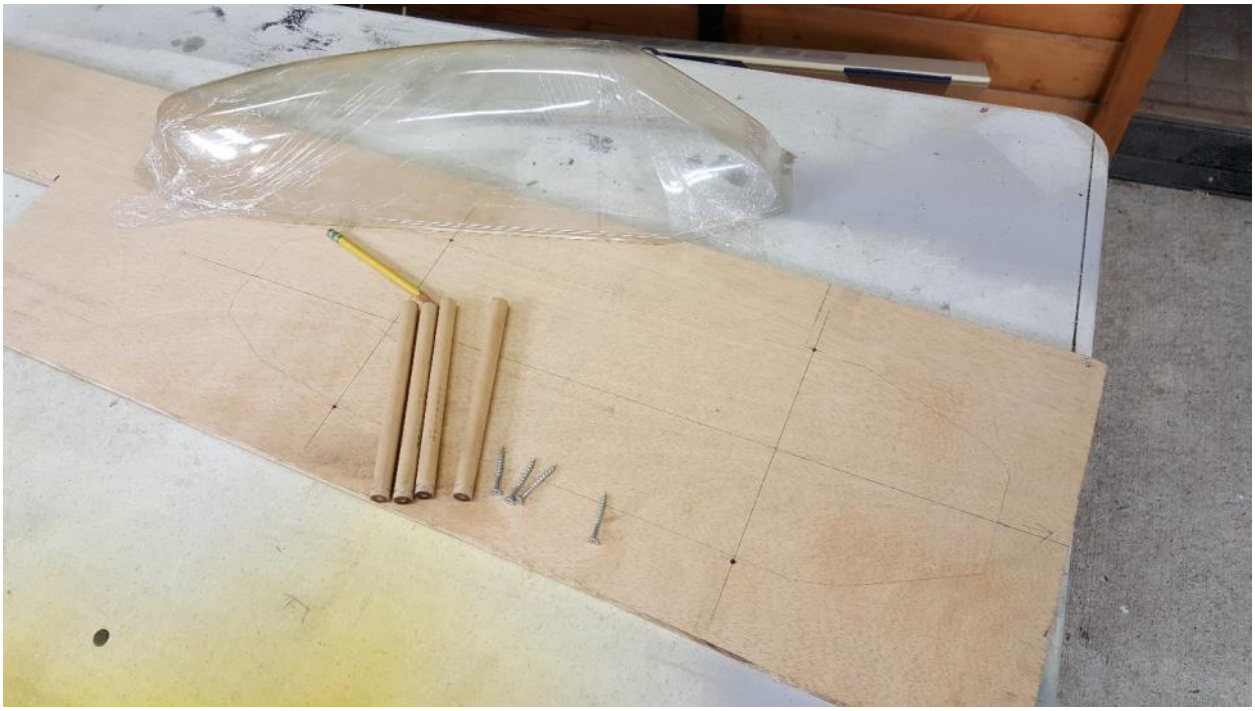
July Club Meeting

Tom Rainwater contributed this article as he wanted to share how to take an existing good canopy and make a ‘plug of one because he realized that the one he had may be the only canopy left in existence. If you believe there is a need to duplicate a canopy for your plane then this is how it is done and I am sure if you call Tom Rainwater he would be happy to help you.

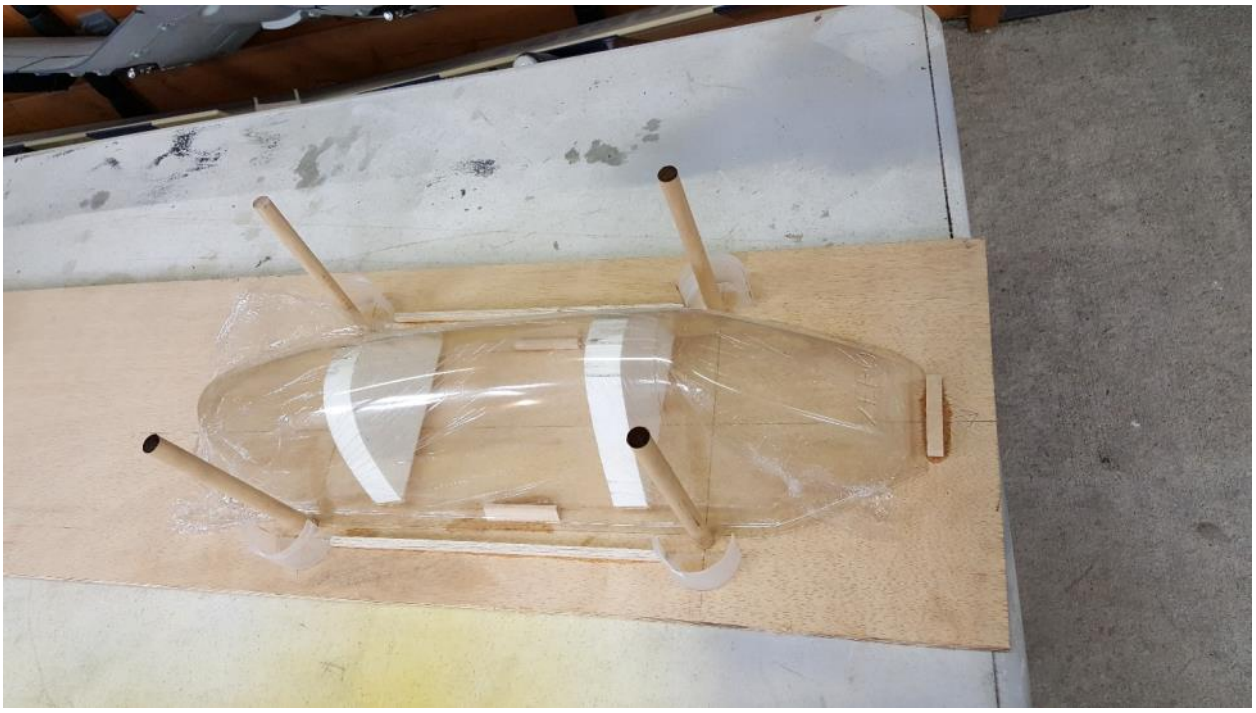
Making a Positive Canopy Plug from an Existing Canopy

While repairing my Yellow Aircraft A6M Zero I was unable to locate a replacement canopy anywhere in the USA. I was able to find one in Birmingham England and it was the last one they had. Because Yellow Aircraft has been out of business for several years I thought this canopy might be among the very last of these uncut canopies in existence. I decided to make a plug from the canopy so they could be reproduced in the future. I took some pictures and agreed to write this article outlining my process. I am NOT an expert in this area but these are the steps I took and I am happy with results:

I wanted to eventually pour casting cement into the inside of the canopy to form a plug. However the canopy was just thin plastic and would not hold its shape if liquid was poured inside. I needed something to hold the canopies natural resting position. I decided to use the outside of the canopy to make a saddle to hold the canopy shape while I poured the casting cement into the canopy.

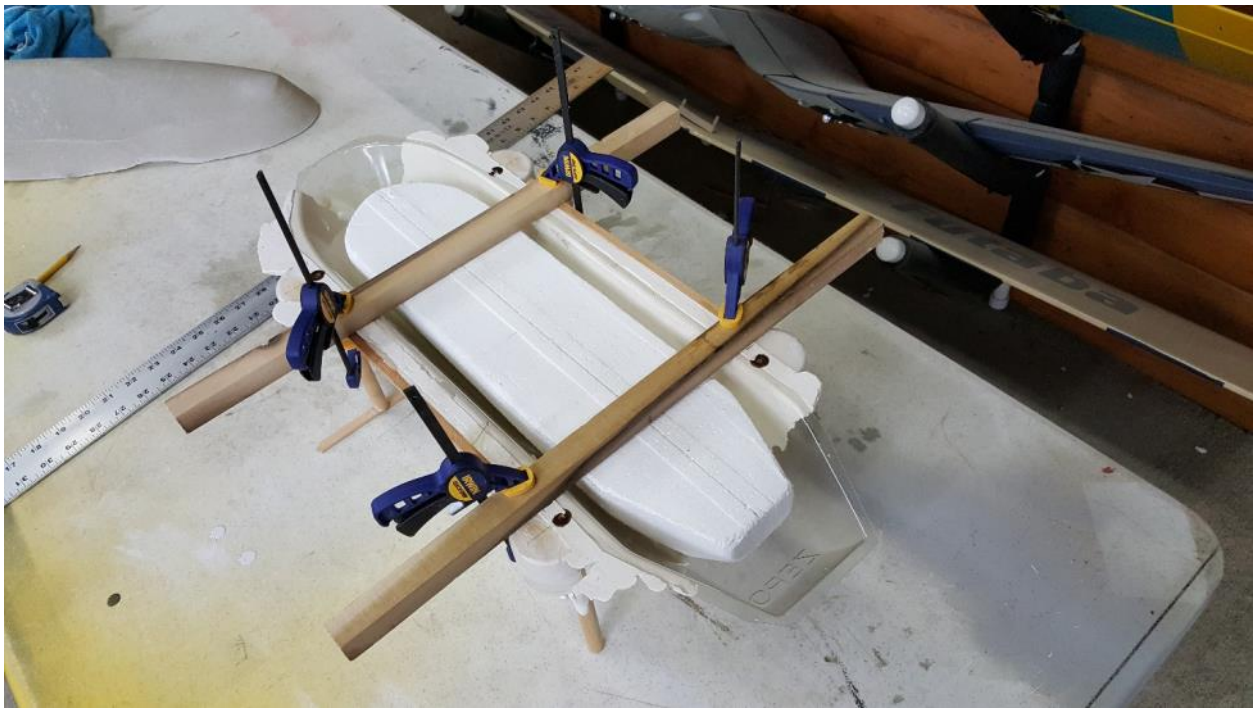


I placed the canopy on a piece of plywood and drew the outline of the canopy. I then drilled holes just outside the canopy outline to secure dowel legs to the board with screws from the bottom. These legs not only held the canopy down but also prevent the canopy from flexing outward.



After attaching the legs I added supports inside the canopy to prevent it from flexing in, I cut two spray can lids in half to provide a dam to hold more cement around the legs supports. I also cut two foam bulkheads to help the canopy maintain its shape while applying the casting cement to the outside of the canopy.

Next I applied a liberal amount of Hydro-Cal casting cement to the outside of the canopy. I didn't need to cover it all as this material would only form a saddle to hold the canopy shape and hold the opening level so I can pour liquid casting cement on the inside of the canopy.



After the outside cement had set I turned the saddle over on its legs. I shaped a piece of foam to consume the majority of the volume inside the canopy to reduce weight of the plug and to reduce the amount of casting cement required. I used hot glue to attach the wooden cross braces to the foam and positioned it in the canopy to leave an about a 3/4” minimum gap between the foam and the canopy sides. The clamps are necessary to prevent the foam center section from floating up when the casting cement is poured in.


LIFETIME

Next I mixed up the UltraCal-30 casting cement and poured in directly into the canopy. I did not use any release agent on the canopy. A previous attempt using PAM cooking oil left a rough finish on the final plug.

So after the cement set up it popped right out of the canopy without any problems resulting in a pretty smooth plug to work with. This plug will need to be sanded and filled in some areas before it can be used for pulling a replacement canopy. In order to get a “good” plastic canopy you need a “perfect” plug. Any imperfections in the plug will transfer to your canopy.

Vintage R/C Society

Northwest Fly-In

September 2 and 3, 2016

~ Friday and Saturday ~

Agate Field, Medford, OR

~ Home of the Rogue Eagles ~

OPEN FLYING FOR R/C MODELS THAT WERE DESIGNED, PUBLISHED, KITTED, OR FLOWN IN 1980 OR EARLIER.

Free Registration! Bring as Many Models as You Like
Free Coffee, Donuts, Snacks, and Sodas
Free Pilots Only Raffle - Earn Tickets by Flying
Awards & Prizes for Pilot's Choice & Vintage Spirit
SAM R/C Assist Models are Welcome
No Competition, Just Open Flying
Dry Camping Available at Field, Bring Your RV
Visit www.rogue-eagles.org for Directions

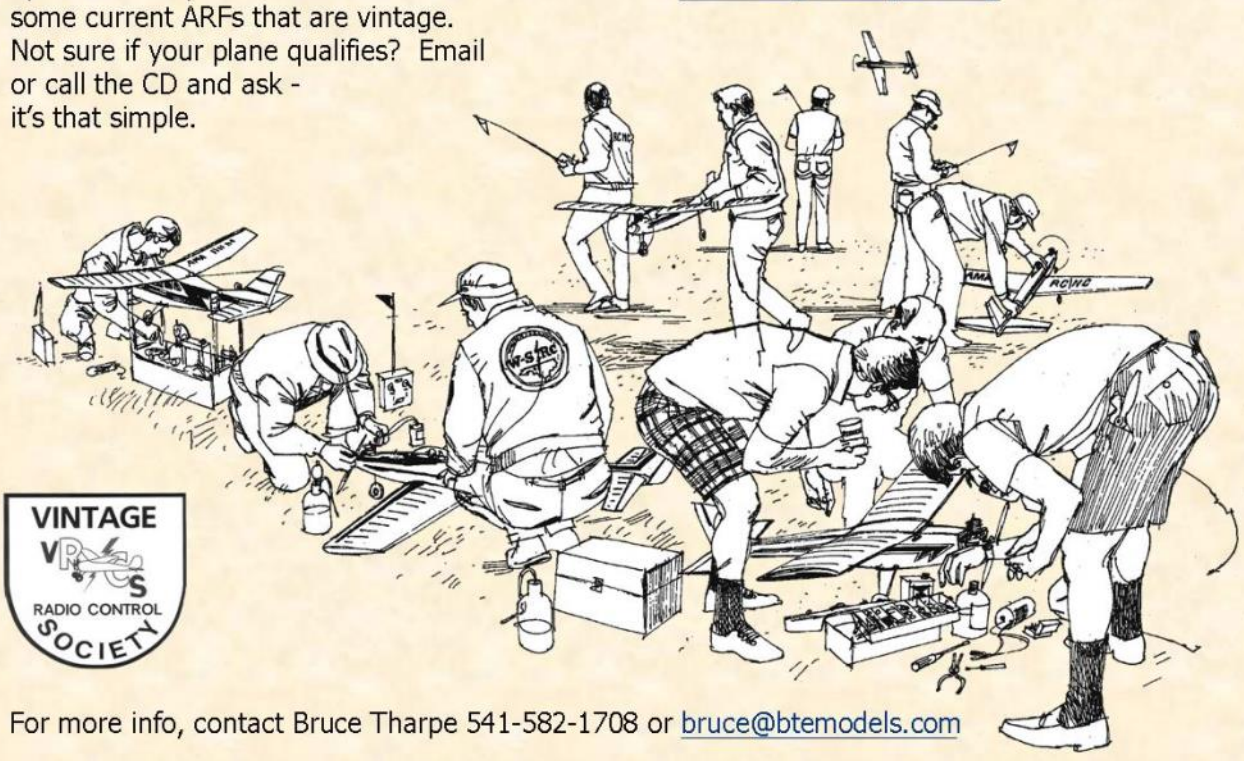
Join Us for Our

~ 7th Annual ~

Trip to the Good 'ol Days

This gathering is all about getting back to the roots of radio control.

Entries can be brand new as long as the original, basic model design dates back to 1980 or earlier. Planes can be scaled up or down if you wish. There are even some current ARFs that are vintage. Not sure if your plane qualifies? Email or call the CD and ask - it's that simple.



VINTAGE RADIO CONTROL SOCIETY

For more info, contact Bruce Tharpe 541-582-1708 or bruce@btemodels.com

What else is happening

Bend Aero Modelers - 2016 Event Calendar

Last Update: 1/24/2016

Club Meeting
Pylon Race Practice
Contest Pylon Race
BAM Renewal Deadline
Last Chance to Renew
Pine Nursery Park Fun-Fly
National Holiday
BAM Christmas Party
Family BBQ & Scale Fun-Fly
Annual National Model Aviation Day

January

Week	Sun	Mon	Tue	Wed	Thu	Fri	Sat
1						1	2
2	3	4	5	6	7	8	9
3	10	11	12	13	14	15	16
4	17	18	19	20	21	22	23
5	24/31	25	26	27	28	29	30

January 1st - New Year's Day

February

Week	Sun	Mon	Tue	Wed	Thu	Fri	Sat
6		1	2	3	4	5	6
7	7	8	9	10	11	12	13
8	14	15	16	17	18	19	20
9	21	22	23	24	25	26	27
10	28	29					

March

Week	Sun	Mon	Tue	Wed	Thu	Fri	Sat
10			1	2	3	4	5
11	6	7	8	9	10	11	12
12	13	14	15	16	17	18	19
13	20	21	22	23	24	25	26
14	27	28	29	30	31		

April

Week	Sun	Mon	Tue	Wed	Thu	Fri	Sat
14						1	2
15	3	4	5	6	7	8	9
16	10	11	12	13	14	15	16
17	17	18	19	20	21	22	23
18	24	25	26	27	28	29	30

April 5th - Easter Day

May

Week	Sun	Mon	Tue	Wed	Thu	Fri	Sat
18	1	2	3	4	5	6	7
19	8	9	10	11	12	13	14
20	15	16	17	18	19	20	21
21	22	23	24	25	26	27	28
22/23	29	30	31				

May 10th - Mother's Day / May 25th - Memorial Day

June

Week	Sun	Mon	Tue	Wed	Thu	Fri	Sat
23				1	2	3	4
24	5	6	7	8	9	10	11
25	12	13	14	15	16	17	
26	19	20	21	22	23	24	25
27	26	27	28	29	30		

June 21st - Father's Day

July

Week	Sun	Mon	Tue	Wed	Thu	Fri	Sat
27						1	2
28	3	4	5	6	7	8	9
29	10	11	12	13	14	15	16
30	17	18	19	20	21	22	
31	24/31	25	26	27	28	29	30

July 4th - Independence Day

August

Week	Sun	Mon	Tue	Wed	Thu	Fri	Sat
31		1	2	3	4	5	6
32	7	8	9	10	11	12	13
33	14	15	16	17	18	19	20
34	21	22	23	24	25	26	
35/36	28	29	30	31			

September

Week	Sun	Mon	Tue	Wed	Thu	Fri	Sat
36					1	2	3
37	4	5	6	7	8	9	10
38	11	12	13	14	15	16	17
39	18	19	20	21	22	23	24
40	25	26	27	28	29	30	

September 7th - Labor Day

October

Week	Sun	Mon	Tue	Wed	Thu	Fri	Sat
40							1
41	2	3	4	5	6	7	8
42	9	10	11	12	13	14	15
43	16	17	18	19	20	21	22
44	23/30	24/31	25	26	27	28	29

November

Week	Sun	Mon	Tue	Wed	Thu	Fri	Sat
45			1	2	3	4	5
46	6	7	8	9	10	11	12
47	13	14	15	16	17	18	19
48	20	21	22	23	24	25	26
49	27	28	29	30			

November 24th - Thanksgiving Day
NOTE: Due to Thanksgiving the November meeting is a week earlier.

December

Week	Sun	Mon	Tue	Wed	Thu	Fri	Sat
49					1	2	3
50	4	5	6	7	8	9	10
51	11	12	13	14	15	16	17
52	18	19	20	21	22	23	24
53	25	26	27	28	29	30	31

December 24th - Christmas Eve
December 25th - Christmas Day
December 31st - New year's Eve
January 1st - New Year's Day

Bend Aero Modelers

Bend, Oregon | AMA District XI

Field Safety Guidelines

A. GENERAL

1. All pilots shall be current members of AMA. Proof of current AMA membership is required prior to flying at BAM.
2. Visiting AMA pilots and new members of BAM shall receive a safety orientation by one of BAM's members prior to their first flight.
3. Pilots shall ensure flight operations in accordance with AMA's Safety Code and these Field Safety Guidelines at all times.
4. Pilots are responsible for the safe operation of their aircraft at all times.
5. All guests, spectators, children, and pets shall be supervised by a BAM member at all times while inside the flying field (fenced area) and are encouraged to remain behind the pit tables.
6. Pilots shall always secure/restrain running or armed aircraft.
7. R/C cars and other surface vehicles are prohibited anywhere inside the flying field (fenced area) during active flight operation.
8. Smoking is prohibited anywhere inside the flying field (fenced area).
9. The consumption of alcoholic beverages before or during flight is prohibited.

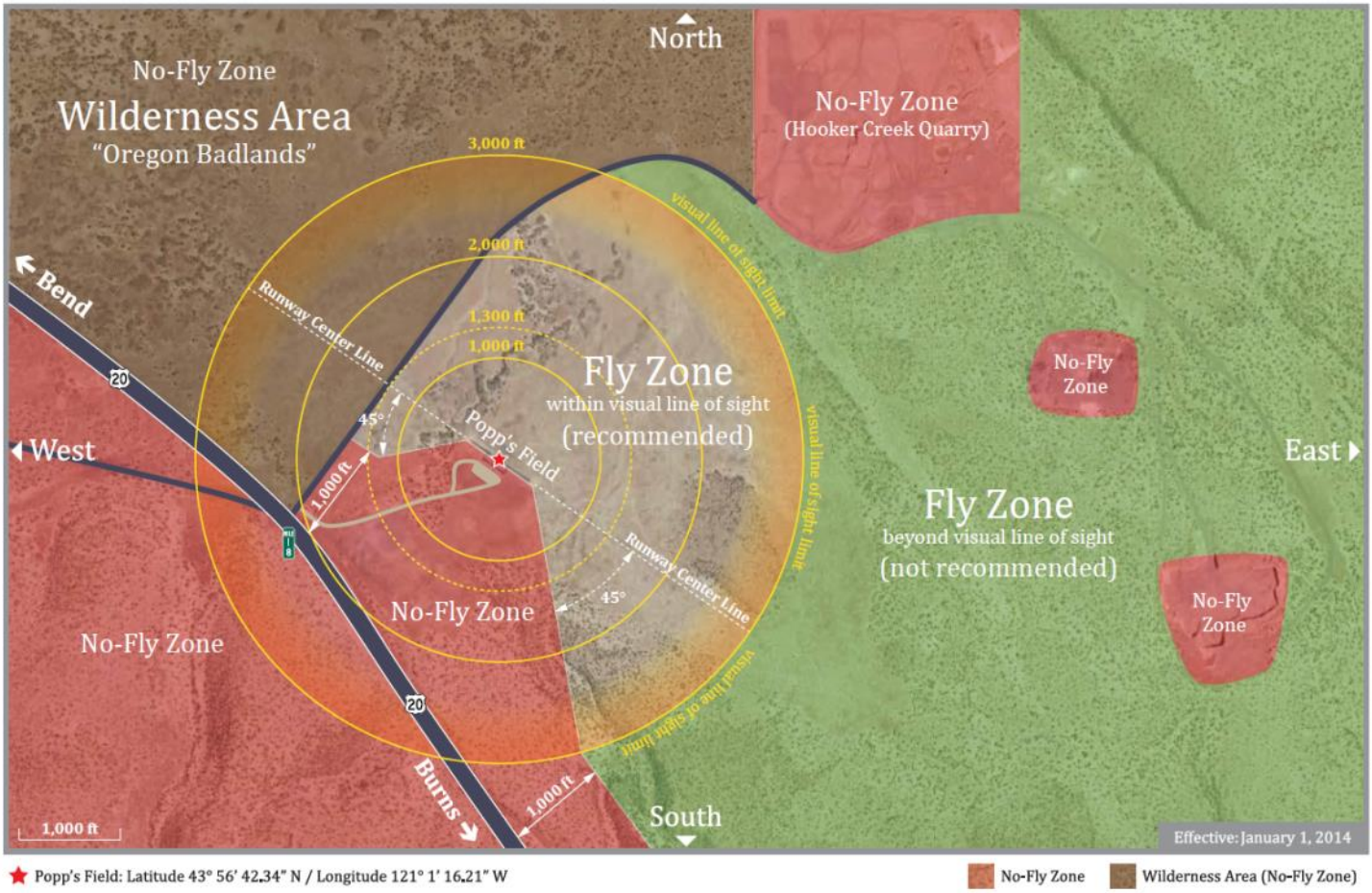
B. PRE-FLIGHT OPERATION

1. Pilots that use AM/FM radio equipment (50 MHz, 53 MHz, and 72 MHz) shall possess the appropriate frequency pin.
2. Pilots shall place their AMA card on the respective channel pin on the frequency board. This does not apply to pilots using 2.4 GHz transmitters.
3. Pilots shall not start/run their aircraft in the pit area.
4. For extended engine tuning and troubleshooting procedures (e.g., more than usually needed to start the engine), pilots shall use the marked areas designated for tune-ups, break-in and troubleshooting.
5. Pilots shall never leave their aircraft unattended while the aircraft is running or armed even if it is secured and restrained.

C. FLIGHT OPERATION

1. Pilots shall only taxi aircraft on the taxiways and runway. No taxiing is permitted in the pit area.
2. While flying, pilots must remain behind the safety fence.
3. Pilots shall verbally communicate their intentions during takeoffs, landings, low passes, touch-and-gos, and emergencies.
4. Pilots shall always fly their aircraft north of the centerline of the runway and remain within the approved fly zones (see fly zone map for details).
5. Only pilots and a supervised helper are permitted beyond the safety fence (e.g., to retrieve an aircraft).
6. Landing aircraft have the right of way. Dead-stick landings shall be called as such and given immediate right of way.
7. Aircraft shall not take off from the taxiways south of the safety fence.
8. Aircraft shall not land on the taxiways at any time.
9. Pilots shall call all maiden flights prior to flight. All other aircraft shall be grounded until the maiden flight has been completed.

Fly / No Fly Zone's for Popp's Field



Academy of Model Aeronautics National Model Aircraft Safety Code

Effective January 1, 2014

A. **GENERAL**: A model aircraft is a non-human-carrying aircraft capable of sustained flight in the atmosphere. It may not exceed limitations of this code and is intended exclusively for sport, recreation, education and/or competition. All model flights must be conducted in accordance with this safety code and any additional rules specific to the flying site.

1. Model aircraft will not be flown:
   (a) In a careless or reckless manner.
   (b) At a location where model aircraft activities are prohibited.
2. Model aircraft pilots will:
   (a) Yield the right of way to all human-carrying aircraft.
   (b) See and avoid all aircraft and a spotter must be used when appropriate. (AMA Document #540-D.)
   (c) Not fly higher than approximately 400 feet above ground level within three (3) miles of an airport without notifying the airport operator.
   (d) Not interfere with operations and traffic patterns at any airport, heliport or seaplane base except where there is a mixed use agreement.
   (e) Not exceed a takeoff weight, including fuel, of 55 pounds unless in compliance with the AMA Large Model Airplane program. (AMA Document 520-A.)
   (f) Ensure the aircraft is identified with the name and address or AMA number of the owner on the inside or affixed to the outside of the model aircraft. (This does not apply to model aircraft flown indoors.)
   (g) Not operate aircraft with metal-blade propellers or with gaseous boosts except for helicopters operated under the provisions of AMA Document #555.
   (h) Not operate model aircraft while under the influence of alcohol or while using any drug that could adversely affect the pilot's ability to safely control the model.
   (i) Not operate model aircraft carrying pyrotechnic devices that explode or burn, or any device which propels a projectile or drops any object that creates a hazard to persons or property.
   Exceptions:
   - Free Flight fuses or devices that burn producing smoke and are securely attached to the model aircraft during flight.
   - Rocket motors (using solid propellant) up to a G-series size may be used provided they remain attached to the model during flight. Model rockets may be flown in accordance with the National Model Rocketry Safety Code but may not be launched from model aircraft.
   - Officially designated AMA Air Show Teams (AST) are authorized to use devices and practices as defined within the Team AMA Program Document. (AMA Document #718.)

   (j) Not operate a turbine-powered aircraft, unless in compliance with the AMA turbine regulations. (AMA Document #510-A.)
3. Model aircraft will not be flown in AMA sanctioned events, air shows or model demonstrations unless:
   (a) The aircraft, control system and pilot skills have successfully demonstrated all maneuvers intended or anticipated prior to the specific event.
   (b) An inexperienced pilot is assisted by an experienced pilot.
4. When and where required by rule, helmets must be properly worn and fastened. They must be OSHA, DOT, ANSI, SNELL or NOCSAE approved or comply with comparable standards.

B. **RADIO CONTROL (RC)**

1. All pilots shall avoid flying directly over unprotected people, vessels, vehicles or structures and shall avoid endangerment of life and property of others.
2. A successful radio equipment ground-range check in accordance with manufacturer's recommendations will be completed before the first flight of a new or repaired model aircraft.
3. At all flying sites a safety line(s) must be established in front of which all flying takes place. (AMA Document #706.)
   (a) Only personnel associated with flying the model aircraft are allowed at or in front of the safety line.
   (b) At air shows or demonstrations, a straight safety line must be established.
   (c) An area away from the safety line must be maintained for spectators.
   (d) Intentional flying behind the safety line is prohibited.
4. RC model aircraft must use the radio-control frequencies currently allowed by the Federal Communications Commission (FCC). Only individuals properly licensed by the FCC are authorized to operate equipment on Amateur Band frequencies.
5. RC model aircraft will not knowingly operate within three (3) miles of any pre-existing flying site without a frequency-management agreement. (AMA Documents #922 and #923.)
6. With the exception of events flown under official AMA Competition Regulations, excluding takeoff and landing, no powered model may be flown outdoors closer than 25 feet to any individual, except for the pilot and the pilot's helper(s) located at the flightline.
7. Under no circumstances may a pilot or other person touch an outdoor model aircraft in flight while it is still under power, except to divert it from striking an individual.
8. RC night flying requires a lighting system providing the pilot with a clear view of the model's attitude and orientation at all times. Hand-held illumination systems are inadequate for night flying operations.
9. The pilot of an RC model aircraft shall:
   (a) Maintain control during the entire flight, maintaining visual contact without enhancement other than by corrective lenses prescribed for the pilot.
   (b) Fly using the assistance of a camera or First-Person View (FPV) only in accordance with the procedures outlined in AMA Document #550.
   (c) Fly using the assistance of autopilot or stabilization system only in accordance with the procedures outlined in AMA Document #560.

C. **FREE FLIGHT**

1. Must be at least 100 feet downwind of spectators and automobile parking when the model aircraft is launched.
2. Launch area must be clear of all individuals except mechanics, officials, and other fliers.
3. An effective device will be used to extinguish any fuse on the model aircraft after the fuse has completed its function.

D. **CONTROL LINE**

1. The complete control system (including the safety thong where applicable) must have an inspection and pull test prior to flying.
2. The pull test will be in accordance with the current Competition Regulations for the applicable model aircraft category.
3. Model aircraft not fitting a specific category shall use those pull-test requirements as indicated for Control Line Precision Aerobatics.
4. The flying area must be clear of all utility wires or poles and a model aircraft will not be flown closer than 50 feet to any above-ground electric utility lines.
5. The flying area must be clear of all nonessential participants and spectators before the engine is started.