

FLYING HIGH



NEWSLETTER OF THE **PALM BEACH RADIO CONTROL ASSOCIATION**



+500 MEMBERS - AMA GOLD LEADER CLUB - LARGEST CLUB IN THE USA

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"THE ONE O WONDER"
(PART II)**



The "ART" of the
"Hand Launch"

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UAV's
(Part III)

**Name Our
Newsletter**

see page 6
**Contest ENDS
June 30, 2013**



The Presidents Message



Changes in the internet tax laws may seem unfair to the consumer, especially in the RC hobby markets. What it does do is make the local hobby shops more competitive in the market but the change in the tax laws may have happened a bit too late in Palm Beach County. Local hobby shops provide a services that internet shops cannot, like providing “just in time” parts and service. Hobby items at the local shop might cost a bit more but would you make an order for a pack of 4-40 fasteners or a glow plug? Without changes in the internet tax laws, you may have to.

On a different note, we will be scaling back on the clubs activities for the summer. We will not hold regular general membership meetings for the summer. Look for meetings to commence again in September. The Board of Directors will continue to meet regularly through the summer to conduct club business. Enjoy your summer!

As Always, please be safe. Airspeed, Altitude and Luck, you need at least two,

**Doug Christensen,
President**



2013

Club Officers

President

Doug Christensen
doug@palmbeachrc.com

Vice President

Michael Abraira
mike@palmbeachrc.com

Treasurer & Past President

Dave Rettig
dave@palmbeachrc.com

Secretary/Webmaster

Walt Dreyfus
walt@palmbeachrc.com

Chief Flight Instructor

Jay Eichler
jay@palmbeachrc.com

Safety Coordinator

Paul Rich
paul@palmbeachrc.com

Director

Seth Sterling
seth@palmbeachrc.com

Director

Arty Mundell
arty@palmbeachrc.com

Director

**Public Relations/
Newsletter Editor**
'Brooklyn Joe' Mannino
bklynjoe@palmbeachrc.com

UPCOMING CALENDAR OF EVENTS - CLUB “EVENTS” IN BOLD

NO GENERAL MEETINGS IN JUNE, JULY & AUGUST

September 12, 2013 - General meeting 7:30 PM South County Civic Center

For more information and our Full Calendar go to: <http://www.palmbeachrc.com/CALENDAR.htm>

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As Always, A Special Thank You goes out to our Club Photographer - **Arty Mundell**

Check out all the great photos at: <http://www.palmbeachrc.com/photo>



CLICK HERE FOR VIDEO

CLICK HERE FOR CLUB SAFETY VIDEO



**PALM BEACH RADIO CONTROL ASSOCIATION
GENERAL MEETING MINUTES**

May 9, 2013

PLEASE NOTE THAT THERE
WAS NO OFFICIAL MEETING
IN MAY DUE TO LACK OF
ATTENDANCE.

RESPECTFULLY SUBMITTED
Walt Dreyfus

**REMEMBER SAFETY FIRST
DO NOT GO LOOKING FOR A
PLANE BY YOURSELF!**

Renew Your 2013 Club Dues Now - Annual Dues are \$25.00

Brooklyn Joe's Place

Newsletter Editor



We continue to sign new members up and our flight instructors have been busy. Let's share our knowledge, tips and tricks with some of the many new members we signed up.

Many of our members have been in the hobby for a long time and you can share your **knowledge, tips, tricks and stories** with the entire membership by submitting it to be included in a future newsletter. Pictures, picture stories and articles are all welcome.

Send your submission to:
bklynjoe@palmbeachrc.com

FLIGHT SAFETY

PAUL RICH - SAFETY COORDINATOR



REMEMBER

SAFETY FIRST !

! ALWAYS !



Chief Flight
Instructor
Jay Eichler

From the Flight Line

The Palm Beach Radio Control Association has instructors offering **NO CHARGE** lessons to [members](#) interested in learning how to fly radio controlled airplanes.

INSTRUCTOR/TRAINERS:

Charlie Craft 561-707-0197
 Mark Drogowitz 561-676-3120
 Dave Rettig 561-703-8730
 Seth Sterling 561-859-2494
 Bob Thompson 561-628-9460 doesnt

If you would like to volunteer to be a trainer contact Jay Eicher 561-391-7833

If you require training, please call one of the instructors to arrange to meet.

TRAINERS ARE NOT RESPONSIBLE FOR DAMAGE TO YOUR AIRCRAFT

Everyone is eligible for
“Picture of the Month”

This month’s picture is from
“Brooklyn Joe”

Another Great
“Picture of the Month”

If does not hurt,
does not hurt,
does not hurt . . .



Send your submission for “Picture of the Month”
to: bklynjoe@palmbeachrc.com
Pictures should be sized to 640 x 480,
your name, e-mail address and some
information about the picture.
Photos must be related to our club, the PBRCA.

Name OUR Newsletter Contest !

It’s time to name our newsletter and all current club members are encouraged to submit an entry.

The winner will receive a FREE (annual) club membership for 2014.

The name should be one or two words so that we can display it in large, bold letters on the cover of our newsletter. The contest will be open (to submit entries) for the month of May & June **cut-off for entries is June 30.**

The Board of Directors will vote on the final selection and the winner will be announced in our September issue of the newsletter. Take some time to think about what name would best represent **OUR** club newsletter.

Please send your entry to: bklynjoe@palmbeachrc.com

I will send a confirming e-mail within 48 hours. Only one entry per member.

TIPS & TRICKS

New Guys, Old Guys & Everyone in Between!

C'mon Modelers & Builders,

You have many tips and tricks up your sleeve, it's time to shake some loose!

A note for users of Spektrum/JR receivers with satellite receivers.

It may be a good idea to keep an eye on the lights in all your receivers to ensure they are not blinking, both on startup and also after a flight before shutting them off.

You may find that the cable connecting them has developed an intermittent connection. Sometimes just unplugging it then reconnecting may help. But if you need them, replacement cables are also available.

A faulty cable may also make it difficult to bind.

Submitted by: Seth Sterling

Don't forget to WEAR your membership card or AMA card when in the pits. Displaying proper identification is necessary for the Safety Officers to distinguish those that should not be allowed in our restricted areas. Thank you for wearing your badge. Stay Safe!

VIDEO'S/VIDEO REVIEWS

PBRCA Intro Slide Show:

<http://youtu.be/aobdLFefWIQ>

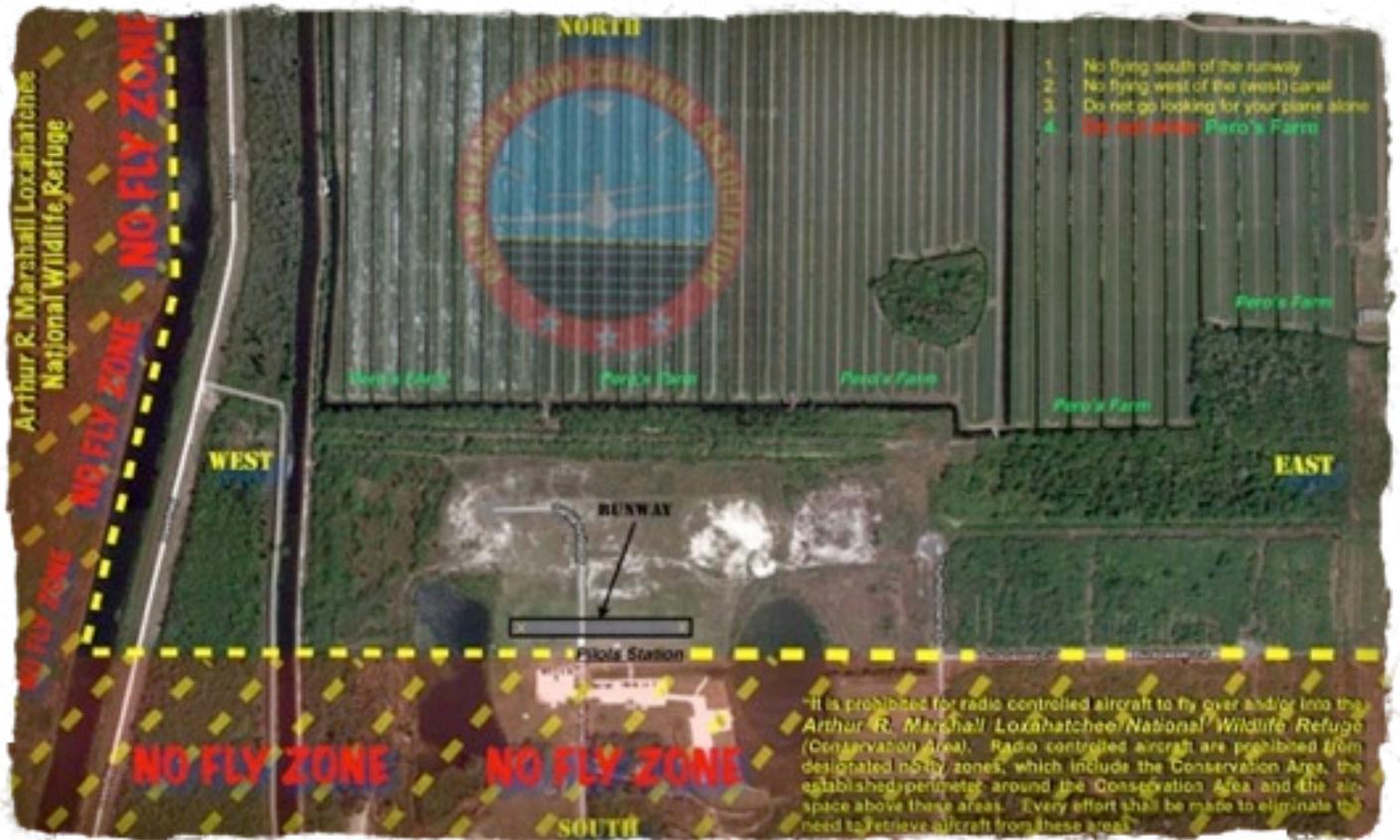
Field Rules /Field Comments/Suggestion Box

Please keep your feet off the picnic BENCHES when sitting on the table tops"

There is **No Smoking** allowed beyond the fence separating the spectator area from the flying field. **This is a Palm Beach County Park Requirement.**

ALL aircraft must **face north** on the taxiway or start up stands when starting the engine (electric, gas, nitro; no exceptions).

Palm Beach County has previously established "flying" boundaries and we need to adhere to those restrictions. There is an aerial map showing the boundary lines for west & south flying and it is posted in the bulletin board located at the "impound". Our club has already been warned about flying over the Everglades by a Federal Wildlife Officer. You must fly within the designated boundaries!



Modified Field Safety Rules have been approved by the membership; read the rules here:

<http://www.palmbeachrc.com/>

SAFETY FIRST!



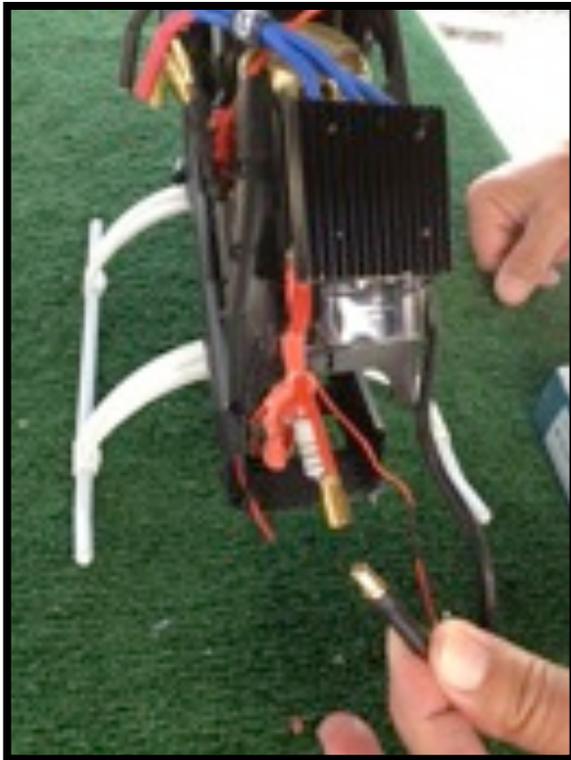
As the park gets more and more popular, we are going to see more and more patrols by the Sheriff's Department. The park speed limit is **25 mph and stop signs, mean STOP!** Do not risk an expensive ticket by becoming complacent. Save your money for a new plane, battery, servo or radio. **Slow Down & Stay Safe!**

PBRCA

OUR HELI WORLD



Located just south of the RC Flying Field is our recently completed "Heli Field"



Make sure to check your battery connectors for tightness! This was the probable cause of an unplanned return-to-earth. The tail blades survived, though not much else!



New club member Mitchell Reiman



Photos by: Seth

PBRCA



OUR HELI WORLD

Located just south of the RC Flying Field is our recently completed "Heli Field"

Photos by: Wayne Pelz



The "ART" of the "Hand Launch"



PICTURE THIS!

ARTIE and Joe's May Field Pictures



Submitted by: Mike A

"Joe Nall 2013"

As you can see, PBRCA was well represented by JoJo Rodriguez, Pablo Fernandez, Mike Abraira and our friend and Team Horizon pilot Mike Milos in the back.



PICTURE THIS!

More of **ARTIE** and **Joe's** Field Pictures



Jet Event in North Carolina
 "First in Flight"
 Looks like Mike A. made a deal
 on a new TRAILER!

Photos by: Michael Abraira



CONGRATULATIONS



Congratulations to
Andy Alamia
the club's newest
"JET JOCKEY"
to pass the turbine waiver
test with
FLYING COLORS



WHAT'S SO FUNNY ?



Dennis, Boston Joe & Steve !
Look like its still a little cold up in Rhode Island !
(Early May 2013)

VOODOO:

PART II

*A story from one of our own members;
LtCol. Robert (Bob/Tommy) Thompson
(Master Aviator - Retired-USA)*

AKA - THE ONE O WONDER



We were sent to the very high altitude chamber at Mac Chord A.F.B. where we were fitted with the pressure suit, used by the first astronauts. The one with inflatable tubes and lacings located on the outside of limbs and torso. The tubes inflate in the event of sudden loss of cabin pressure, thus squeezing all of your parts to keep you functional. The airplane could operate above 50,000 ft. so the pressure suit was considered necessary. This would allow you to bring the airplane back to the base. The airplane, with weapons aboard, cost almost 2 million dollars in 1959 so the Air Force was thinking ahead.

Perhaps of interest, the suit had an inflatable bladder that went over your head; the gloves had inflatable bladders on the back of them. The helmet attached to the suit in a way that retained pressure. The suit required a helper to put on and it was a 30 minute operation. A bit of trivia, the tee shirt was worn inside out. When the suit inflated, the seams, outside, minimized bruising. Once the suit was adjusted we went into the pressure chamber individually. This was done to check for "hot spots" which means your skin was pinched, requiring an adjustment of the lacings. The chamber took us up to 100,000ft. Well, that was what they told us. We sat on a chair and moved all the parts that were used to fly an airplane, No hot spots, ok, use the ice pick to puncture the membrane on that Mason jar filled with water they gave you. Wow, the chamber, instantly went to a total fog condition and then slowly returned to normal. I guess I did need that suit, although we never used them in flight operations. On occasion we would exceed 50,000ft., but not by much.

The Genie missile was an unguided rocket that had a small nuclear warhead. The plan was to take out as many bombers as possible with one shot. The tactic used was to approach the target from a quartering stern position and about 4,000ft, below the target. When I flew the Voodoo we did not have the heat seeking missiles. I know that there was no training in their use, but understand that what I am relating here is from a 50 year old memory.

Well, now that you are somewhat familiar with the airplane would you like to take a ride? All of the training in the ejection seat, physiological information etc. has been completed: you are ready to go.

The engines are running and all preflight checks are complete. The crew chief shows us the landing gear safety pins and we show him our ejection seat safety pins. A bit of power to get us moving and here we are at the run up area. Each engine is brought up to 100% separately to check the pressure ratios and so forth. The engines were not run up at 100% together, as that would result in the tires sliding on the hardstand or the tires rotating on the wheels. We are cleared for takeoff so here we go.

VOODOO

This evening we are flying as number two on a practice intercept; lead aircraft precedes us onto the runway. We stop and run both engines up to 80% while holding the brakes. We are to his right and we are lined up with his wing.

Lead releases his brakes and we hear the roar of his engines as he goes to 100% power to begin the takeoff run. We are going to fly what is called radar trail so we delay our takeoff by 20 seconds. I release the brakes and our engines go to 100%. Lead went into after burner about 3 seconds after his brake release and we can see the white and blue flames of his engines. We do the same thing, the burners kick in and the acceleration presses us back into the seat. Within 4 to 5 seconds I bring the nose up at 150 kts. A second or two later we are at 170kts and we lift off. The gear handle comes up and I keep increasing the pitch attitude; flaps up, we are still pressed back into the seat. We cross over the far end of the runway at about 1400 to 1500 ft. altitude and approaching 350kts. By now the vertical speed indicator is at its limit of 11,000ft per minute, telling us that we are climbing much faster than that. We keep increasing the pitch attitude until we are at 350kts. The climb profile has us hold 350 kts until we reach .8 mach, we then use the mach number for airspeed reference. We have now turned to the initial heading and we are in radar trail with lead, our radar "paints" him. He is about 5 miles ahead of us.

From now on we will be controlled by the folks on the ground. They will direct us to a position so that we can lock on to the target in a quartering stern attack that was mentioned earlier. The attack will simulate firing the Genie nuclear warhead rocket. Once we lock on to the target, that is your job, we follow the information provided by our attack radar that is displayed on both scopes.



The information is in the form of a steering dot, azimuth angle to the target, rate of closure, and distance remaining to the target. The target altitude is indicated by the steering dot. The attitude indicator information is also displayed on the scope. It gives me basic information regarding bank angle and pitch attitude. A rubber hood extends from the face of the scope and the basic flight instruments are grouped around the hood. I refer to them as needed by lifting my head slightly away from the hood in order to see what they are indicating.

Our target is another Voodoo simulating a bomber at 44,000ft. and .9 mach. We are climbing in after burner to 40,000ft., where we will level off and maintain 1.2 mach as directed by ground control. The voodoo has afterburners that can be throttled to control our airspeed. We close in to the target and the search radar picks him up. Our heads are now pressed into the rubber hood that I just mentioned. The hood is there to exclude outside light as the electronic glow on the scope would be extremely hard to see without it. Not that this is a big deal as there is no moon tonight. Cockpit lighting is a dull red to enhance night vision. You lock the radar on to him so the attack computer now directs the approach and exactly when the weapon will fire, all I have to do is squeeze the trigger at the proper time. My work is now pretty demanding; the steering dot is the size of a small pin head and very sensitive. As we close in to the target my main task is to keep the steering dot centered in azimuth on the scope, but as we are maintaining our altitude the dot will be high in elevation. The scope displays a circle about 2 inches in diameter and located in the center of the scope. The circle has a gap in the perimeter that



displays the closure speed to the target just as the hour hand of a clock displays the time. Twelve o'clock is zero closure, one o'clock we are sneaking up on him, six o'clock, everything is fine, ten o'clock, he is attacking us.

Back to the attack, we are closing rapidly, the circle starts shrinking indicating that there is 20 seconds to go until the weapon fires. I now have to raise the nose to center the steering dot in the circle so that the dot is centered in an x that appears when the circle disappears. The x indicates that the weapon has fired. I immediately roll the aircraft inverted, come out of afterburner and pull two Gs or so to maximize the distance between us and the fireball that will occur in a couple of seconds. We want the belly of the aircraft to shield us from the light of the nuclear explosion that would blind us immediately, if not sooner. Sorry, I forgot to tell you about the mild aerobatics, even though it is a night intercept and we are still supersonic. Military flying requires one to do some strange things at times, but we play the game as though it is the real thing. We stay upside down in a shallow dive for five or six seconds, we then roll back to normal flight attitude.

We are going to join up with lead and fly his wing for the return to base. He banks his aircraft to about 30 degrees; we approach him from inside the turn and close the distance to him so that we will be staggered at about a 30 degree angle to the rear and slightly below him. Wingtip clearance will be maintained, but not by much. The weather is a solid overcast with tops at 30,000 ft., We should break out at about 4,000ft. A.G.L. We will then make a standard visual pattern and land. The GCI site will give us vectors while we are descending so that we will be at 3,500ft. and 5 miles out from the runway and lined up with the runway.

Notice that, now we have entered the overcast, all of leads control inputs are very gradual and smooth. We are on the same radio frequency, of course, so we hear the conversation with GCI, and I can still glance at my instruments, but 98% of my effort is to maintain position on the lead aircraft. Visibility in cloud can reduce to 30 feet or less at times so it is necessary to stay tucked up tight at all times.

We break out into clear air and the runway is dead ahead at 5 miles. We descend to initial pattern altitude of 1500 ft. and 350kts. As we cross over the end of the runway lead breaks left, we break left 3 seconds later. As I break, I roll the aircraft to about 80degrees of bank, the throttles are pulled to idle; the speed brakes are extended and I pull about two G s in the turn. Return to level flight occurs after a 180 degree turn; air speed is now 250 kts, we are still at 1500ft. We are now parallel to the runway on downwind, landing gear and flaps are lowered and I look over my shoulder at the runway to determine when to start the turn to final. That point is reached and we now descend so that we roll out on final approach at about 400 ft. above the ground. During the turn I bring the power back up to the minimum engine percent that will insure immediate power response if more power is needed. 172 knots will be our speed until the landing is assured. The power is now reduced to idle, we cross the runway threshold at about 50 ft. high. The nose is raised to the landing attitude which is maintained until the tires touch the runway. I pull the handle that releases the drag chute, we feel the tug of the deployed chute and we are back, safe and sound. Lead is ahead of us on the left half of the runway and we take the right half. After we make the turn off the runway, the chute is released and I raise the canopy a few inches. The night air is refreshing; we can now unhook our oxygen masks. I always rub my face a bit, to remove the effects of wearing the mask for the past hour or so.

After a quick debriefing we are now cleared to transition to the Officers Club bar for a toddy or two of our choice. You buy.

I hope you have enjoyed this time spent on the introduction to the F 101b Voodoo. It was a great airplane to fly and writing this has brought back many pleasant memories.

Where in the World are We ?

This should be easy; just look up the name of the stadium!



A well known mall in the USA, it's the largest mall in the United States. Not sure, ask your wife or girlfriend !



Last Issue (May 2013) Answers:

Los Angeles International, CA - http://en.wikipedia.org/wiki/Los_Angeles_International_Airport

Golden Gate Bridge, CA - http://en.wikipedia.org/wiki/Golden_Gate_Bridge

PBRCA

CLICK 'IT' PAGE

Click the "blue" words to find out what it's all about!

Want to learn more, click on any of the "blue" words for a direct link to "Wikipedia" (you must have an active internet connection).

Unmanned Aerial Vehicle (UAV's)

Unmanned aircraft system

An unmanned aircraft system (UAS) includes ground stations and other elements besides the actual aircraft, the term was first officially used by the FAA in early 2005 and subsequently adopted by DoD that same year in their Unmanned Aircraft System Roadmap 2005–2030.[31] Many people have mistakenly used the term Unmanned *Aerial* System, or Unmanned *Air Vehicle* System, as these designations were in provisional use at one time or another. The inclusion of the term [aircraft](#) emphasizes that regardless of the location of the pilot and flightcrew, the operations must comply with the same regulations and procedures as do those aircraft with the pilot and flightcrew on board. The official acronym *UAS* is also used by the [International Civil Aviation Organization](#) (ICAO) and other government aviation regulatory organizations.



[Predator](#) launching a Hellfire missile

The military role of unmanned aircraft systems is growing at unprecedented rates. In 2005, tactical- and theater-level unmanned aircraft alone had flown over 100,000 flight hours in support of [Operation Enduring Freedom](#) and [Operation Iraqi Freedom](#), in which they are organized under [Task Force Liberty](#) in Afghanistan and [Task Force ODIN](#) in Iraq. Rapid advances in technology are enabling more and more capability to be placed on smaller airframes which is spurring a large increase in the number of Small Unmanned Aircraft Systems (SUAS) being deployed on the battlefield. The use of SUAS in combat is so new that no formal DoD wide reporting procedures have been established to track SUAS flight hours. As the capabilities grow for all types of UAS, nations continue to subsidize their research and development leading to further advances enabling them to perform a multitude of missions. UAS no longer only perform intelligence, surveillance, and reconnaissance missions, although this still remains their predominant type. Their roles have expanded to areas including [electronic attack](#), strike missions, suppression and/or destruction of enemy air defense, network node or communications relay, [combat search and rescue](#), and derivations of these themes. These UAS range in cost from a few thousand dollars to tens of millions of dollars, with aircraft ranging from less than one pound to over 40,000 pounds.

When the Obama administration announced in December 2009 the deployment of 30,000 new troops in Afghanistan, there was already an increase of attacks by pilot-less Predator drones against Taliban and al-Qaeda militants in Afghanistan and [Pakistan's tribal areas](#), of which one probably killed a key member of al-Qaeda. However, neither [Osama bin Laden](#) nor [Ayman al-Zawahiri](#) was the likely target, according to reports. According to a report of the [New America Foundation](#), armed drone strikes had dramatically increased under President Obama – even before his deployment decision. There were 43 such attacks between January and October 2009. The report draws on what it deems to be "credible" local and national media stories about the attacks. That compared with a total of 34 in all of 2008,

PBRCA CLICK 'IT' Page (continued)

President Bush's last full year in office. Between 2006 and 2009, drone-launched missiles allegedly had killed between 750 and 1,000 people in Pakistan, according to the report. Of these, about 20 people were said to be leaders of al-Qaeda, Taliban, and associated groups. Overall, 66% to 68% of the people killed were militants, and 31% to 33% were civilians. U.S. officials disputed the percentage for civilians.[32] The U.S. Air Force has recently begun referring at least to larger UAS like Predator, Reaper, and Global Hawk as Remotely Piloted Aircraft (RPA), to highlight the fact that these systems are always controlled by a human operator at some location.

However, artificial intelligence is advancing to the point where the aircraft are easily capable of taking off, landing, and flying themselves. Then they simply have to be instructed as to their mission. The military distinguishes between "man *in* the loop"[piloted] and "man *on* the loop" [supervised] systems, with "fully autonomous"[issued orders] growing organically from the second into a third category. A.I. systems have been capable of making decisions and planning sequences of actions for decades; as of 2013, few fully autonomous systems have been constructed, but this is more a matter of convenience and technical implementation rather than any fundamental barrier.

To distinguish UAVs from *missiles*, a UAV is defined as a "powered, aerial vehicle that does not carry a human operator, uses aerodynamic forces to provide vehicle lift, can fly autonomously or be piloted remotely, can be expendable or recoverable, and can carry a lethal or nonlethal payload".[33] Therefore, [cruise missiles](#) are not considered UAVs, because, like many other guided missiles, the vehicle itself is a weapon that is not reused, even though it is also unmanned and in some cases remotely guided.



Uses

UAVs perform a wide variety of functions. The majority of these functions are some form of [remote sensing](#); this is central to the [reconnaissance](#) role most UAVs fulfill. Less common UAV functions include interaction and [transport](#).

Remote sensing

UAV remote sensing functions include [electromagnetic spectrum](#) sensors, gamma ray sensors, biological sensors, and chemical sensors. A UAV's [electromagnetic sensors](#) typically include [visual spectrum](#), [infrared](#), or [near infrared](#) cameras as well as radar systems. Other electromagnetic wave detectors such as microwave and ultraviolet spectrum sensors may also be used, but are uncommon. Biological sensors are sensors capable of detecting the airborne presence of various microorganisms and other biological factors. [Chemical sensors](#) use [laser spectroscopy](#) to analyze the concentrations of each [element](#) in the air.

Commercial aerial surveillance

Aerial surveillance of large areas is made possible with low cost UAV systems. Surveillance applications include: livestock monitoring, wildfire mapping, pipeline security, home security, road patrol and anti-piracy. The trend for use of UAV technology in commercial aerial surveillance is expanding rapidly with increased development of automated object detection approaches.

PBRC CLICK 'IT' Page (continued)

Domestic policing

Drones are increasingly used for domestic police work in Canada and the United States[35][36] (a dozen US police forces, including Seattle and Miami, had applied for drone permits by March 2013[18]). Texas politician and commentator [Jim Hightower](#) has warned about potential privacy abuses from aerial surveillance.

Oil, gas and mineral exploration and production

UAVs can be used to perform geophysical surveys, in particular geomagnetic surveys[39] where the processed measurements of the differential Earth's magnetic field strength are used to calculate the nature of the underlying magnetic rock structure. A knowledge of the underlying rock structure helps trained geophysicists to predict the location of mineral deposits. The production side of oil and gas exploration and production entails the monitoring of the integrity of oil and gas pipelines and related installations. For above-ground pipelines, this monitoring activity could be performed using digital cameras mounted on one, or more, UAVs.[40] The [InView Unmanned Aircraft System](#) is an example of a UAV developed for use in oil, gas and mineral exploration and production activities.



[Fulmar UAV](#), developed by [AeroVision](#) for civilian applications.

Transport

UAVs can transport goods using various means based on the configuration of the UAV itself. Most payloads are stored in an internal payload bay somewhere in the airframe. For many [helicopter](#) configurations, external payloads can be tethered to the bottom of the airframe. With [fixed-wing](#) UAVs, payloads can also be attached to the airframe, but [aerodynamics](#) of the aircraft with the payload must be assessed. For such situations, payloads are often enclosed in aerodynamic pods for transport.



[InView UAV](#) for use in scientific, commercial and state applications.

Scientific research

Unmanned aircraft are uniquely capable of penetrating areas which may be too dangerous for piloted craft. The [National Oceanic and Atmospheric Administration](#) (NOAA) began utilizing the [Aerosonde](#) unmanned aircraft system in 2006 as a [hurricane](#) hunter. AAI

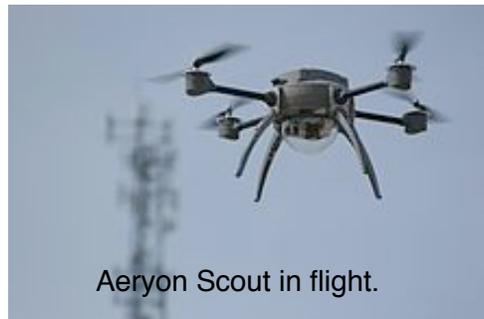
Corporation subsidiary [Aerosonde Pty Ltd.](#) of [Victoria](#), Australia, designs and manufactures the 35-pound system, which can fly into a hurricane and communicate near-real-time data directly to the [National Hurricane Center](#) in [Florida](#). Beyond the standard barometric pressure and temperature data typically culled from manned hurricane hunters, the Aerosonde system provides measurements far closer to the



[IAI Heron](#), Unmanned Aerial Vehicle developed by the Malat (UAV) division of [Israel Aerospace Industries](#).

water's surface than previously captured. Further applications for unmanned aircraft can be explored once solutions have been developed for their accommodation within national airspace, an issue currently under discussion by the [Federal Aviation Administration](#). UAVSI, the UK manufacturer also produce a variant of their Vigilant light UAS (20 kg) designed specifically for scientific research in severe climates such as the Antarctic.

There have also been experiments with using UAVs as a construction and artwork tool. [41] at locations such as the ETH Zurich.



Aeryon Scout in flight.



The [RQ-7 Shadow](#) is capable of delivering a 20 lb (9.1 kg) "Quick-MEDS" canister to front-line troops.

History

In contrast to the [Predator](#), which is remotely piloted via satellites by pilots located 7,500 miles away, the [Global Hawk](#) operates virtually autonomously (Singer, 2009b). The user merely hits the button for 'take off' and for 'land', while the UAV gets directions via GPS and reports back with a live feed. [Global Hawks](#) have the capability to fly from San Francisco, and map out the entire state of Maine, before having to return (Singer, 2009b). In addition, some UAVs have become so small that they can be

launched from one's hand and maneuvered through the street (Singer, 2009a). These UAVs, known as [Ravens](#), are especially useful in urban areas such as Iraq, in order to discover insurgents and potential ambushes the next block up (Carafano & Gudgel, 2007). Incidentally, UAVs are useful because that they can float around for days at a time. According to Carafano & Gudgel, insurgents are loathe to stay in the open for more than a few minutes at a time for fear of UAVs locating them (2007).and the British [Civil Aviation Authority](#) (CAA). The term used previously for unmanned aircraft system was unmanned-aircraft vehicle system (UAVS).

NEWBIES OLD TIMERS, LISTEN UP!

THIS COULD HAPPEN TO YOU !

25. MAY 2013 • STORE • MANIACS NEWS

MANIACS HOBBY COMPLEX BLOG

HOME NEW POSTS EVENT CALENDAR VIDEO CHANNEL PHOTO GALLERY STORE

Maniacs News Maniacs Events Unboxing Product Demo How To Radio Control Tactical

Maniacs Hobby Blog Maniacs News **Robbie Lynch becomes a Maniac!**

ROBBIE LYNCH BECOMES A MANIAC!

WRITTEN BY ROBBIE. POSTED IN MANIACS NEWS

Hey Maniacs,

My name is Robbie Lynch and I recently joined the team here at Maniacs Hobby Complex. I have over 23 years of Hobby Retail experience. I enjoy helping others by getting them started in our wonderful hobby, or helping a seasoned pilot with a problem that may come up. I have flown just about every type of aircraft configuration out there.

I started flying in 1979 with the help of my dad and I have flown in numerous RC airplane events for Jets, Pattern, IMAC, and Scale. I enjoy competition to better my own personal skills and to keep up to date on the constantly changing technology in our field. I am also a Team Horizon member as well as a Team Thunder Power, BVM field representative and the east coast representative for EvoJet Turbines.

I look forward to meeting new people and new challenges!

Yes, sooner or later, it will happen to all of us !

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Vaterra Helicopters
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