

T-Craft Aero Club

May 2013



Photo by: John Baglien

Featured Photo
Next month have your photo here!
Email db5477@gmail.com with
your photo

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DENSITY ALTITUDE – TURNS BOLD PILOTS INTO OLD PILOTS IF YOU SURVIVE !!

Safety - Membership Director

Its that time of the year as the temperatures warm up to review the nemesis to us pilots– **Density Altitude**. It won't be long before were in the 90's and a couple years ago it had almost reached 100°F in early June. At that time, Caldwell was reporting a Density Altitude of 5200'. McCall reached 77°F at 6 PM, resulting in a DA of 7150'. Many of you have seen the effects of DA (along with some poor decision making) in the Bruce Meadows accident last year on YouTube. If you want to see a great example of the effects of DA, watch this video: <http://www.youtube.com/watch?v=yDu0jYiz-v8>

Here are some things to keep in mind as Density Altitude goes up:

- Power is Reduced.
- Lift is Reduced.
- Prop performance is reduced.

Resulting in:

- Longer Take off Distance.
- Climb performance reduced.

- Longer Landing distances.
- Lighter loads.

Club Meetings/Training

◆ Board Meeting

June 11, 2013 7:00 PM

@ the T-Craft Hangar

◆ Safety – Stall/Spin Awareness

June 22, 2013 9:00 AM

@ U70 Cascade, ID

◆ General Membership Meeting

Next Meeting September 24

...Continued

A normally aspirated engine loses approximately 3.5% BHP per 1000' increase in DA from Sea Level. So yesterday if you were leaving McCall at 6 PM, the 230HP C182 would be putting out 75% available HP on takeoff or 173HP. Our new powerful 160HP C172's would be at 120HP. That assumes that you are leaned for maximum performance.

Takeoff Rules of Thumb:

A 10% increase in gross weight results in 20% increase in takeoff distance.

A 10 % decrease in power will increase takeoff distance by 20%

At a given gross weight, each 1000' increase in DA will cause a 10 % increase in takeoff distance.

If you have not reached 70% of Vx IAS by 50% of the runway - ABORT

Landing Rules of Thumb:

A 10% increase in IAS will cause a 20% increase in landing distance.

Landing distance increases approximately 5 % per 1000' increase in DA above Sea Level.

Don't be fooled by what looks to be the "right" ground speed for rotating on takeoff and fairing on final. As DA goes up, true air speeds/ ground speeds go up and can be deceiving and possibly result in a stall if you do not pay attention to IAS – Indicated Air Speed. You need to take off and land at the appropriate IAS.

Vx and Vy change as DA goes up and change with weight. Some POH's indicate this in their performance tables, some do not. For every 1000' increase in altitude Vx increases approximately 0.5 mph and Vy decreases 0.66 mph. Also

remember Vx & Vy speeds decrease as weight decreases. Vx and Vy can be reduced ½ of the percent of weight reduction. If weight is reduced by 5% from gross weight, Vx and Vy can be reduced 2½ %. Consult the respective POH for exact numbers when published.

The Vx and Vy numbers in the checklists are for Sea Level and Gross weight conditions. Performance will be affected if you do not use the appropriate Vx and Vy for the respective weight and DA conditions. When pitching for Vx – don't focus on the air speed indicator – it lags actual airspeed – know the pitch attitude that results in Vx

The weight and balance program on the club computers (and available to download from the T-Craft web page) have tables at the bottom for each bird that show the Vspeed changes with respect to take off and landing weight, and at different density altitudes.

Don't forget to lean properly for maximum power and also proper tire inflation – every little bit helps. We have a compressor in the hanger and a tire gauge near the key lock box.

This is the time of the year to dig out the POH and review takeoff, rate of climb and landing performance numbers and the appropriate takeoff and landing procedures and speeds, especially at higher elevation strips. We're all getting old enough – let's not be bold also.

Fly Smart, Fly Safe, Have Fun, and – Don't do anything Stupid!

Jim Hudson
Safety – Membership Director



Solo Flight by Kevin Bentley!

Congratulations to Kevin Bentley in Soloing in just after a month of being a member. Also thank Kevin for his contribution of putting KMAN CTAF on LiveATC.org. Great Job, keep up the good work.

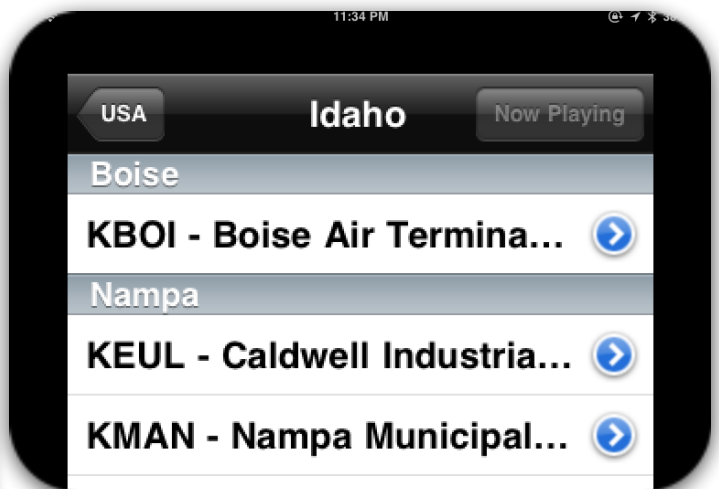
Welcome our Newest Member Nik Jones!



Join T-Craft on Facebook!

<https://www.facebook.com/groups/164768522373/>





LiveATC App allows you to listen to Live ATC and can be accessed on the web as well. We can now listen to Nampa CTAF Live!

May was plane wash Month. Below are a few photos of the festivities. Remember to come and participate on October 2nd.



"It is possible to fly without motors, but not without knowledge and skill."

-Wilbur Wright

ADDITIONAL MEMBERSHIP INFORMATION:

BOI ATC Presentation:

A video was made of the presentation by Andy Marosvari. Two copies of this video are in the club library in DVD format. Unfortunately the TV monitor of this presentation is not very clear, but the audio is good. The powerpoint presentation that was shown is on our web page in News! Tab. You can watch the video and listen to Andy's presentation while following the PowerPoint presentation on a computer. Also of note, the new BOI tower is due to open this fall.

Thanks to one of our new members, Kevin Bentley, KMAN 122.7 is now on Live ATC, sponsored by T-Craft. Another way to get some free publicity.

Membership Status:

Good news. We gained another member, Nik Jones. Nik earned his pilot certificate about 10 years ago and took a leave from flying for a while. He is getting back in the air and looks forward to the benefits of the club. Welcome Nik.

Unfortunately we lost a member, so our membership count remains at 69.

I believe we'll break the 70 barrier soon, with several folks expressing interest in the club.

Club Meetings/Events:

Saturday June 22nd : Stall/Spin Awareness & Live Spin Demonstration - Rich Stowell at 9:15 AM, live spin demonstration at 10:30 am, Optional Breakfast \$5.00 at 8:00 AM Location: Hanger #30, Cascade Airport - U70 Register at: http://www.faasafety.gov/SPANS/event_details.aspx?eid=50188

Family Membership:

Great news for you and your family! After approval by the general membership and finalized by the board we now have an additional membership type. Now in

addition to the Individual Membership there is a family membership.

Family memberships are available to the immediate family of a club member in good standing. Family memberships are limited to 3 total members, the primary or sponsoring member and 2 additional family members. A family member is defined as the spouse, child or

sibling of a club member in good standing. Family Membership members must meet the same obligations as an individual member. The basic Fee structure when adding a family members requires that the additional family member pay the onetime fee for the class of membership desired for that new member (Class I \$500, Class II \$800). The Individual (Sponsor) member continues to pay the \$70.00 monthly fee

while the new family member pays a reduced fee of \$25.00 per month. The use is or lose it applies to each member of the family membership. Each member is invoiced separately and a copy of each invoice is sent to the sponsor member. During high use months June 1st to September 30th, members associated through the family membership option follow the 90 day advance reservation policy of the first aircraft reserved for a specific time period but may only reserve an additional aircraft for the same time period 7 days in advance. For additional information and actual language please consult the information packet for new members that can be found at [http://www.t-craft.org/reference/T-Craft Information Packet.pdf](http://www.t-craft.org/reference/T-Craft%20Information%20Packet.pdf).

In other news we received some national exposure form AOPA thanks to Jim H. and Dean B. See the attached link. http://www.aopa.org/News-and-Video/All-News/2013/May/8/T-Craft-Aero-Club-Putting-wings-on-your-dreams?WT.mc_id=&wtmclid;&WT.mc_sect=gan

Membership

Our Membership count remains at 69 Members

◆ Sponsor a new member and receive 1 hour of flight credit (C152)

Squawks/Status

****Always check current squawks on Schedule Master and hangar wall****

N67375 - \$57 per hour

Check Schedule Master for Current Status

N13686 - \$81 per hour

Check Schedule Master for Current Status

N4464R - \$79 per hour

Check Schedule Master for Current Status

N1891X - \$117 per hour

Check Schedule Master for Current Status

N7593S - \$121 per hour

Aircraft currently certified for VFR flight Only

Check Schedule Master for Current Status

N9989E - \$121 per hour

Check Schedule Master for Current Status

ALL BIRDS

Water buckets are available in the hangar for cleaning the leading edges of our birds following each of your flights.

Please clean the leading edges, windscreens and interiors so that the planes are clean and ready for the next member.



Mark your Calendar for the annual T-Craft Garden Valley Fly-in July 19th and 20th. Breakfast will be served.

Fuel Reimbursement
\$4.87

News Letter Contributions
Please send photos and your Flying Stories to dbs477@gmail.com for inclusion on future issues.
Thanks