# BRISBANE VALLEY FLYER MARCH - 2016



Watts Bridge Memorial Airfield, Cressbrook-Caboonbah Road, Toogoolawah, Q'ld 4313.



Powered parachute at Boonah – these can go up as well as down.

#### Flying the Classics – the ubiquitous Stearman

Legends are often gossamer entities based upon hearsay or half-remembered acts of long past heroism. Legends are composed of facts and non-facts that have been polished and re-shaped by the erosion of the passing years and, because the subjects of the legends are gone or are widely scattered, it's difficult to separate fact from fiction.



The Army PT17's used the Continental 220 while most Navy N2S's used the 225 hp Lycoming R-780 Aeroplanes such as Mustangs, Thunderbolts, Messerschmitts live on and in the never-never land of remembrance because there are so few of us who actually have a chance to get close to the legend. So the majority must content themselves with the few tidbits of information that come rolling down off Mt. Olympus.

There are very few legends around to be tested and prodded each day, and fewer still manage to come through with their halo intact. One of these is the Stearman Kaydet. Known under a dozen different designations and flown by as many countries, the Kaydet has earned its spurs as a legend in three completely different life styles: as a military trainer it was a standout; as a crop-duster, it battled bugs for three decades; and, today, as a premier antique it still maintains the legend status.

The sacred crypt of the Stearman Legend is continually being opened and re-evaluated in the hard light of present day. One reason the Stearman is continually being poked and prodded is that there are so many of them around. Any fly-in of any size is bound to have several restored or customized examples on the flight line. Nearly half of the 8,585 built are still on the registry (it has often been quoted that the number produced was 10,346 but that includes nearly 2,000 equivalent Aeroplanes of spare parts). Also, just for the record, the Stearman is not a Stearman. It's a Boeing. Prior to World War Two, Boeing Aircraft absorbed the Stearman Airplane Company and continued to operate it as a separate facility. Still, you never hear the big-boned biplane being referred to as a Boeing.

It should be understood that there were quite a large number of different Aeroplanes built under the Stearman umbrella, dating back to 1927. These Aeroplanes included a tremendous variety of open cockpit biplanes, multi-engine military bomber-trainers and several variations of innovative and good looking civilian designs such as the Stearman-Hammond Y-1S and the Stearman Aerial. A fascinating piece of literature which traces all the Stearman products is the Stearman Guidebook, published by Flying Enterprise Publications (3164 Whitehall, Dallas, Texas 75229). If you flip through enough pages in this guide book you'll find the Stearman that has become the object of so many aficionados' affections is officially known as the Model 75, the final design in a long line of basically similar military trainers.

Every time I hitch up my britches to climb up on the lower wing of a Stearman, I am always impressed by its sheer size. The lower wing is nearly waist high and, as you lower yourself into the cockpit, you can't help but notice how much room there is available. There probably isn't a person alive that can't fit into the rear pit of a Stearman. This eliminates any fatso's excuses. Obesity no longer keeps them out of the cockpit.

Of the other three most popular World War Two trainers, the SVA Stamp, the de Havilland Tiger Moth and the Bucker Jungmann, none come close to the Stearman in sheer size. At 1,936 lbs empty, the basic Stearman weighs as much as the Jungmann (836 lbs) and either one of the other two combined. Also, when you saddle up any of the other three and close the little cockpit doors, you are conscious of being, if not scrunched, then at least very well contained. This is certainly not the case with the Stearman, since you literally rattle around in the flight deck.

The Stearman is your basic man-size airplane and everything you see in the cockpit is equally healthy. The big cast aluminium rudder pedals hang from a massive structure, the control stick is bigger than the landing gear leg in a Jungmann and everywhere you look are forgings and castings.

To fully appreciate the incredible strength built into a model 75 Stearman (PT-13, 17, 27, N2S, 1, 2, 3, etc.) you have to see one stripped naked. All of the fuselage tubing is the size of gas pipe. The tail wheel shock strut and support assembly is heavier than the main gear on many medium size light aircraft. The landing gear is a marvel in



Compared to other WWII trainers, the Stearman was HUGH.

rugged over design. The gear legs do not flex at all. They are part of a rigid, one piece system that bolts to the bottom of the airplane. The wheels are mounted in axle/strut assemblies that slide up and down in the bottom end of the landing gear legs. If you feel an overwhelming urge to crash an airplane, this is obviously the one to do it in, since the Kaydet will poke a hole in anything you decide to hit. The average cost of the military PT-13/17 was between \$9/10,000 and looking at the structure it is hard to see how Boeing could to do it at that price, even in pre-inflation dollars.

Saddling up, the first move is to adjust the rudder pedals and pick one of the eleven vertical seat positions that fit you. You can range anywhere from 5 ft 6 in to 7 ft and still find some combination that works. Fuel on, mixture rich, mags on; the next step depends on the aircraft in which you're sitting. The majority of today's Stearmans have normal electric starters so you just reach over and punch a button. But a majority of the original PT-13/N2S trainers with R-680 Lycomings (PT-17's had 220 hp Continentals) had inertia starters. Someone stood up by the left gear leg, cranked his brains out until the flywheel on the inertia starter was



On a good day you'd get 100 mph (87 knots) cruise. screaming. He then jerked out an engagement lever and the big Lyc coughed into life. Today, many find it simpler just to grab a hold of the bottom prop blade and yank that big old radial.

I've always been impressed with the Stearman's ability to taxi with ease, considering that the aircraft has remained virtually unchanged since the Navy first placed its order in 1934 (the USAAC bought PT-13s in 1936). It has none of the pain-inthe-tail characteristics often associated with Aeroplanes of the time. The tail wheel is steerable through 35 degrees, at which point it kicks out and goes full swivel and the big drum brakes are, assuming they are properly maintained, perfectly matched to the airplane's size and use. Granted, you may not see as well as you would like around all the windshield framing and sheet

metal that's in front of you, but the aircraft responds beautifully to S turning for straight-ahead visibility.

I don't fly Stearmans as much as I would like to, so maybe I'm more conscious than I should be of at least one peculiar sensation during takeoff. As the power comes up, you can bring the tail up just about any time, but, in so doing, I have always been extremely aware of the airplane's size and bulk. This feeling runs head on into the fact that the Kaydet seems to get off the ground a long time before it really should. Keeping the machine straight in the middle of the runway is no problem at all, even in a crosswind, and the four big panels were designed to get off the ground long before you can get yourself into serious trouble.

Climb performance with an airplane that grosses out very nearly 3,000 lbs and has only 220 horses up front is going to be leisurely. You don't have any choice. Naturally, the 450 horse R-985 conversions change that story quite a bit and 600 horse airshow machines and sprayers are a different tune altogether. Those with the R-1340 up front seem to hunker down at the end of a runway and leap straight up.

As you come up to altitude in the Stearman, it's helpful if you mentally shift gears. Try to remember why and when the airplane was built. When a Model 75 and its predecessors were brand new, front line equipment for the Army Air Corps consisted of Boeing P-12s and P-26s while the Navy was still working with F4B-4s. It was built to train an air force that was going to climb into cantankerous little anachronistic bumblebees and go off to fight an enemy that didn't exist. The Stearman soldiered on until, when it was finally cashiered out of the service, the P-51 had been obsoleted by the whine of Lockheed's P-80. Other air forces used it well into the period during which Stearman graduates would eventually find themselves at the controls of Century Series jets. The Stearman is, and was, a "trainer." In fact, it may just have been "the" trainer.

A casual glance through the Stearman's training manual shows just what type of pilot the Army expected to be sitting straddle of the rear stick. It has such profundities as "... avoid crosswinds." Or an even more prosaic "aileron controls are operated by control stick in either cockpit." You don't get much more basic than that.



The aircraft was designed to be maintained by a 19 year old Crew Chief

One part of the manual I especially like is the admonishment on the cover that says "this publication shall not be carried on combat missions or when there is a reasonable risk of it falling into the hands of the enemy." I guess it makes sense not to take any chances, but not too many Army pilots went out to battle FW-190s in Stearmans. Besides, the manual on the Stearman is as basic as the airplane, which means you could have Hitler on its mailing list and still not give him any information that would tip the balance of victory.

Certainly one of the factors that makes the Stearman such a marvellous trainer is its demand for absolute coordination at all times. The need for coordination is both necessary and obvious. You sit well aft in the airplane and any slipping and sliding can be seen and felt immediately. Also, the control movements are large enough that you know you are actually moving your hand. It's not a question of a gentle pressure this way or that way. You know the control stick has moved

left or right and that one foot has followed it in an effort to cancel out the airplane's noticeable adverse yaw. If trainers still flew that way, we wouldn't be cursed with the current generation of raglegs who think the only purpose for their feet is to keep their socks separate and to activate the brakes on landing.

In messing around doing aerobatics, I suppose I have stalled the Stearman just about every way you can. Straight up, straight down, sideways, etc., I've always found it to be a gentleman. If you force and yank real hard, yes, the stall will break. But when it does break, it doesn't go anywhere. The Kaydet gives you plenty of time to correct. In a normal stall series, the plane simply drops the nose and mushes ahead until flying speed has been reached.

If you stall it and slide the ball about three widths off of one direction or another, the airplane will break into one of the nicest spins of any airplane around. Absolutely textbook in nature, it goes around at a moderate speed, almost talking to you all the way around about what the handbook says concerning opposite rudder and forward stick. In doing spins in the bird, I've always been conscious of the naked feeling that such a big, wide open cockpit gives to those of us more accustomed to tinier flight decks.

The roll rate is not exactly sparkling, but it is certainly adequate for the intended purpose. I've always enjoyed doing aileron and barrel rolls in the airplane but you must start nose high because to keep it positive you are going to wind up fairly nose low. It's easy to see why all the airshow performers have converted theirs to feature an extra set of ailerons in an effort to jack-up the roll rate:

Anything that requires going up also requires a lot of going down. If I have a complaint about the Stearman, that is it. You spend an awful lot of time going downhill trading altitude for speed. In doing loops, you poke the

nose down to get a good number on the airspeed, pull the nose up and work over the top of a loop in time to find that you have to spend another three or four minutes climbing to regain your lost altitude. Again, this is something the 450 Stearman doesn't have to worry about.

Certainly one of my more memorable moments in the Stearman was being shown how to do an English bunt. The single most unnatural movement that a pilot can make in an airplane is pushing the stick forward from level flight and watching the nose curl under. It was a simple matter of working the nose around until it felt like my intestines were going to extrude through my eardrums, and then rolling out on the bottom as if it were an Immelmann in reverse. This is one area where the Stearman's high drag certainly works favorably.When you push the Kaydet over to an outside maneuver like that, the plane takes time gaining speed and you have plenty of time to make the corner.



Every basic skill a pilot would need was instilled by the Stearman

Speaking of gaining speed going downhill, there's a Stearman folk tale that tells of a couple of bored instructors at some place like Hondo, Texas, who are supposed to have climbed it up to 10 or 12,000 feet and pointed the nose straight down and let her rip to see how fast they would go. The placarded red line is 186 mph and it's damned difficult to reach even that speed. Part of the Stearman Legend says those instructors had it up to nearly 300 mph with no damage. I don't doubt that the airplane would stand up under that kind of speed, but I doubt

if you could climb high enough to make a downhill run long enough to get those number on the ASI.

One of my most memorable moments in the Stearman was being shown how to do an English bunt. The single most unnatural movement that a pilot can make in an airplane is pushing the stick forward from level flight and watching the nose curl under. It was a simple matter of working the nose around until it felt like my intestines were going to extrude through my eardrums, and then rolling out on the bottom as if it were an Immelmann in reverse. This is one area where the Stearman's high drag certainly works favourably. When you push the Kaydet over to an outside manoeuvre like that, the plane takes time gaining speed and you have plenty of time to make the corner.

Several years ago at the Oshkosh Airshow, an aerobatic performance with a 220 Stearman really impressed me. The pilot showed what could be done with the minimal amount of power and absolutely zero outside capability. Most of the crowd, already glassy-eyed from watching various Pitts, Lasers and 450 Stearmans didn't appreciate what they were watching. Those of us who have tried to do the same thing in a stock Stearman appreciated the hell out of it. (Ed Note: That would be John Mohr, the airshow pilots' airshow pilot).

If there are Stearman horror stories, they almost always concern landings. In actuality the Stearman's landings are anything but horror stories, but you do have to keep in mind it has several unusual characteristics. Sixty to 65 mph is about the minimum approach speed, although it doesn't seem to make any difference since the minute you bring the nose up, all those wings and wires burn off speed in a heck of a hurry. If you're high on final, just put the stick on one corner and the rudder on another and the Stearman comes down in one of the nicest, most civilized slips known to mankind.

Every time I come into land a Stearman, I hear myself saying, "long gear, long gear, long gear . . ooops!" You sit so high off the ground in this airplane that nine times out of ten my first landing is actually two, or maybe even three, because I hit the main gear before I am actually ready and get a little hop out of it. Many pilots chicken out and land it on the main gear in a wheel landing. There's no real reason for that procedure. A

good three-point puts you on the ground so slowly that, as long as you hit straight and keep going straight, you'll have no problem. However, let the Kaydet start swerving one direction or another and you'll find that high centre of gravity works with the narrow landing gear, making it easy to catch a wing tip

I've been told by old military instructors that they taught their students not to try to pick up the down wing in a groundloop with opposite stick because, in so doing, the outside aileron would be down and would get crunched in the groundloop. The crew chiefs preferred them to go ahead and drag the wing tip but save the aileron, since the wing tips were nearly indestructible. Of course none of this is a problem on grass where the airplane is a real pussy cat. On pavement all you have to remember is what your feet are for and keep looking at both sides of the runway to make sure you are actually straight before touch down.

I'll have to admit to being disappointed with my first flight in a Stearman because I was imbued with "The Legend." I had been watching too many folks like the Cole brothers and Bill Adams with their big engine four aileron airshow birds. During my first flight I thought I had my hands on a real turkey. As I've gotten older, I've come to judge the Stearman for what it is: A classic example of the way to build a trainer that will transform students into pilots and do so day after day with a minimum of upkeep and repair.

Although the days are long gone when you could pick up a surplus Stearman for a few thousand dollars, in terms of pure practical antique aviating the Stearman probably represents the pinnacle in the crossover between anachronisms and practical flying. The parts are plentiful but seldom needed. The appearance is antique, but the handling and approach is modern. Yes, it is deserving of the legendary status. What's more, we will be several dozen generations of pilots down the line before Stearmans even approach becoming extinct. When we are busy colonizing outer space, we will probably be relaxing by restoring Stearmans.

#### SPECIFICATIONS MODEL 75

Span	32 ft 2 in
Length	24 ft 9 in
Height	9 ft 8 in
Wing area	297.4 sq ft
Empty weight	1,931 lbs
Loaded weight	2,635 lbs
Maximum speed	124 mph
Cruise speed	. 106 mph
Initial climb	. 840 ft per min
Range	. 505 miles
Engine	. Continental R-670-5 220 hp, Lycoming R-680, 225 hp



----- 000000 ------

#### The Rans S4 Coyote

Modified from article by Flavio Giacosa

Rans is one of the American companies that, right from its beginning, has enjoyed a very rapid growth, especially in terms of market share. This is owed to the ability founder Randy Schlitter (hence the acronym RanS) has always had in understanding what the market needs and in providing products which would satisfy those needs more than adequately. One of Randy's great ideas has been to offer kit aeroplanes which need hardly any covering or painting work (and



any homebuilder knows what that means). The quality of the kits made up for the rest. The Rans Coyote I, S-4, was one of the first aircraft conceived by Schlitter's fervid and ingenious



mind in 1983. At the time it was powered by a KFM, soon to be replaced by a Rotax 277. It is a classic single-seat tube and fabric aircraft with a double-strut high wing, front engine, conventional tail and tail-dragger configuration (there is a trigear version called S-5).

All the structural parts are in 6061 anodized aluminium alloy, with the cabane struts, the engine mount and part of the landing gear in 4130 steel. The dacron covering is prefabricated and just needs to be slipped on. The wings are made up of two tubular spars (one forms the leading edge

and the other the trailing edge) joined by other tubes of smaller diameter. The ribs are replaced by about ten simple curved battens which are inserted in suitable sleeves obtained in the dacron covering, giving the wing its proper shape. Indeed, looking inside the wing you can see much more open space than in a traditional wing. It all combines to produce a very light and easy to build structure. The real backbone of the entire aircraft is the keel, consisting of a large diameter tube located on the upper portion of the fuselage, in between the wings. The keel truly holds everything

together: the wings, the cabane, the cockpit, the engine mount and landing gear as well as the remaining portion of the fuselage and the tail planes. The front gear is equipped with classic Piper Cub style bungees as shock absorbers.

The cockpit is quite roomy, yet it is not quite suitable for tall pilots who will find themselves touching their heads on the keel tube. The seat is adjustable front and back as well as in height, while all controls are within easy reach and in a natural position. The stick has a typical curved shape and controls the elevator by



means of two rigid tubes connected to the ailerons using two bowden cables. Flaps are operated through a cable and pulley system, just like the rudder. The flap lever, which is located on the left beside the seat, is the only control that is somewhat difficult to activate as it forces the pilot to bring his or her arm to the back and very close to the door.

Actually, as far as doors are concerned, the Coyote I has none in its standard version. They are an option which is quite recommended for colder climates. The fact that they can be removed in a few minutes allowing one to fly almost open air is, in my opinion, one of the most attractive features of this ultralight. In this configuration, visibility is exceptional; not to the front, of course, but this is

something most pilots who do not fly trikes are used to. Another peculiar characteristic of the S-4 is the possibility to remove, without any tool, the front canopy and side windows, which can be quite simply forced in place through a clever system of snap joints. The version of the Coyote that I tested (built in 1992) originally had a Rotax 447 as standard engine, later to be replaced by the more powerful 503.

The Rotax 503 has become a standard engine on the '98 model of the S-4. The engine mount and the cowlings have been slightly modified as well and allow for the engine to be mounted in an "upright" position. This avoids the typical inconveniences of engines mounted upside down: difficulties in starting up and plugs clogging up easily. No other major modifications have been made, with the exception of a few minor details. For example, the new trimming system, now a standard feature, has been obtained with the typical tab attached to the elevator, while on the model I tested it consisted of a simple system for regulating the tension in a bungee chord attached to the control stick.

The fuel tank is located behind the seat inside the fuselage, and holds 18 litres. One can add an additional 20-litre tank between the two wings, on top of the keel. In this manner, maximum flight duration is increased to approximately 2.5 hours, assuming an hourly fuel consumption of 14 litres. Pre-flight checks are quite straightforward, thanks to the tube and fabric construction. To check the engine, one needs to undo about fifteen screws and remove the top cowling. Starting the engine (by hand) is not as simple as it may seem. One needs to be careful with primer and throttle and, even so, it is rather easy to dirty-up spark plugs. The fact that the pilot has to pull the starter chord from within the cockpit complicates things even more. Once the engine is started, one begins to appreciate the good qualities of the Coyote, commencing with the great ease of handling on the ground. The Rans almost does 360's just by using the rudder pedals; if you then apply the (differential) brakes you can literally turn the aircraft about one of the front wheels. Taxiing is simple even though the tail-dragger configuration requires one to perform the usual s-turns.

Take off requires just a few dozen metres. A notch of flaps, throttle, stick forward and the aircraft starts to jump upwards in its natural tendency to leave earth. The Rotax 503 provides plenty of power and a climb rate of 800-1000 fpm at a speed of 50 mph. It is absolutely necessary to fly with ear plugs or a headset due to the high noise level, especially with the doors on. Cruise speed varies between 55 and 65 mph. This depends on how many rpms one likes to fly at. Personally, I find it somewhat disturbing to fly at 5500 rpm with an engine that redlines at 6200. This measures up to about 90% of maximum rpms. Yet, even the Rans manual talks of an ideal cruise speed of 65 mph at a "comfortable" 5500 rpm. Indeed, at about 5000 rpm you get no more than 55 mph, and for a faster cruise (and higher fuel consumption!) one needs necessarily to push more rpm. Turns are



entirely conventional. Adverse yaw is minimal and consequently little rudder is required. Among the manoeuvres that the manual indicates as suitable, we find: all types of stall, chandelles, falling leaf (with engine rpm below 4000), Cuban eight, spins (at low rpm and no flaps). During cruise one can feel the decreasing fuel load and as the tank gets progressively emptier one must work on the trim system to allow for a truly pleasant flight, in non-turbulent conditions. Controls are very homogeneous and all it takes is a little stick or rudder to bring the aircraft back to level and straight flight.

Stall without flaps is preceded by a fair amount of shaking, made even more obvious by the dacron covering. The Coyote finally lowers the nose at about 29-30 mph; it just takes a little forward stick to return to controlled flight. The approach is done at 50 mph, down to 45 on short final. A three-point

landing will bring the aircraft to a complete stop in a few dozen metres and, as is routine on this type of aircraft, a lot of time is spent taxiing to the nearest parking spot!

In any case, leaving all raw performance figures behind (I am not a test pilot), I can say that flying this aircraft is truly a pleasant experience, thanks to its excellent visibility, precise controls and comfortable seat. When I bought this small airplane I flew it for about a half hour, doing a few touchand-go's, and after careful pre-flight checks, I brought it home on a 5-hour flight, with two full hours flying over the Appenines. This just to tell you how familiar and secure the airplane feels. A feeling which is further confirmed by the S-4's good reputation.

**Technical Details** 

Model	Coyote   S-4	Standard fuel tank 18 Litres
Wingspan	8.96 M	Cruise speed @ 5000 rpm 50 knots
Wing surface	11.8 M2	Vne 82 knots
Length	5.2 M	Engine Rotax 447-503
Gross weight	266 kg	Fuel consumption 14 lit/h
Empty weight	142 kg	Take-off roll 30 M
Stall speed	30 knots	Landing roll 50 M
Stall speed w. flaps	23 knots	Manufacturer RANS Co.



#### **FLY-INS Looming**

Sunday March 6	Gympie Aero Club	Breakfast Fly in
Sunday March 13	Clifton, QLD	Annual Clifton Fly-In
Saturday March 19	North Stradbroke Island, QLD	Straddie Breakfast Fly-In
Saturday March 19	Chinchilla, QLD	One Long Table Event
Sunday March 20	Chinchilla, QLD	YCCA The Vintage Experience Breakfast

#### Mystery Aircraft (March Issue)





#### Mystery Aircraft (Last Issue)



The Miles Master, built in wartime as an advanced military trainer, it was also used as an emergency fighter during the Battle of Britain.

No examples of this aircraft exist today.

Congratulations to Nick Maylor, DH82 Pilot extraordinaire of Caboolture for his intimate knowledge of historic aircraft.

The light at the end of the tunnel is another aeroplane's landing light coming down finals, head-on to the runway you are taking off on.

Aircraft for sale. Skydart - \$5000



Done 233 hours and running smooth. A 447 Rotax engine swinging a 3 bladed prop. Instruments: ASI, VSI, ALT, COMP, HR METRE, RPM, EGT, CHT. Fuel lines recently replaced and continuing to give it some well deserved TLC. ROC on a good day around 800 fpm. 654 total landings. An unprecedented panoramic view that even beats a Drifter without ruffling your hair and a very comfortable semi reclined seat which gives it a very enjoyable flying experience.

Skins serviceable. The fuel burn is 12 L/hr. at 5200 rpm and it cruises at around 65 knots.

Currently based at Lynfield, contact Bob Hyam. Tel: (07) 5426 8983

### Aircraft for sale.

### Rans S4 Coyote - \$4000 ono.



I am reluctantly offering for sale my Rans S4 Coyote. It has about 275 hours in its logbook and resides in the BVSAC hangar at Watts Bridge airfield.

I am selling because I have relocated to a new employment position in Perth and it's neither practicable to commute nor is it possible to bring the aircraft out here in view of my limited experience.

It is currently registered but, as it hasn't flown for some time, it will require some TLC before it leaves the ground again.



Interested people should contact Bill Oates to view it or for further details as the logbook is in the aeroplane. Ivan Scott.

Contact Bill Oates, Tel: 0418 779 360

### Keeping up with the Play (Test yourself - how good are you, really?)

TAF AMD YAMB 281902Z 2819/2912 VRB03KT 9999 BKN006 FM282200 32008KT 9999 SCT030 BKN040 FM290200 36008KT 9999 -SHRA SCT030 SCT040 INTER 2903/2912 3000 SHRA BKN010 PROB30 TEMPO 2903/2912 VRB25G40KT 1000 TSRA BKN008 BKN045CB

#### From the AMBERLEY TAF details above, please answer the following general questions.

- 1. To what AEST time is this FCST valid?
  - A. 1200 hrs.
  - B. 1000 hrs.
  - C. 1700 hrs.
  - D. 1300 hrs.
- 2. At what AEST is the worst forecast weather expected to arrive at this station?
  - A. 0300 hrs.
  - B. 1300 hrs.
  - C. 1200 hrs.
  - D. 0900 hrs.
- 3. What cloud base is forecast to exist over the station at 1100 hrs. AEST. (1100 AEST = 2100z on prev day)
  - A. 800 ft AMSL.
  - B. 4000 ft AMSL.
  - C. 1000 ft AMSL
  - D. 3000 ft AMSL.
- 4. What is the earliest AEST time the predicted weather is expected to fall below VFR minimums?
  - A. 1100 hrs.
  - B. 1200 hrs.
  - C. 1300 hrs.
  - D. 1400 hrs.
- 5. If you planned to pass through this station at 1330 AEST, what is the worst weather predicted at this time? (1330 AEST = 0330Z)
  - A. .3 to 4 oktas at BOTH 3000 ft and 4000 ft AMSL, with showers and 999 m visibility
  - B. 5 to 7 oktas cloud at 1000 feet AMSL with showers and 3000 metres visibility.
  - C. 5 to 7 oktas cloud at base 800 feet, 1000 m visibility, wind variable at 25 kts but gusting to 40 Kts.
  - D. Wind variable at 3 kts, 999 m visibility, and 5 to 7 oktas cloud at 600 ft AMSL.



If you have any problems with these questions, call me(in the evenings) and let's discuss it! Ed.

--000000-

### **BRISBANE VALLEY SPORT AVIATION CLUB Inc.**

MINUTES OF THE 6.02.2016 GENERAL MEETING

MEETING LOCATION:	Watts Bridge Memorial Airfield – BVSAC Clubrooms	
MEETING DATE:	6 <sup>th</sup> February 2016	
MEETING OPENED:	10:18AM	
MEMBERS PRESENT:	15	
APOLOGIES:	Mark Purdie, Neil Bowden, Wayne Petty, Liz Cooke, Scott Meredith, Danny Fowler, Rob Knight	
VISITORS:	Nil	
NEW MEMBERS:	Brian Fitch	
MINUTES:	November 2015 meeting of the BVSAC Inc.	
	Proposed: Sandy Walker Seconded: Peter Ratcliffe. Acceptance motion carried.	
PRESIDENT'S REPORT:	Wayne Petty offered his apologies to the meeting and provided a written report. There has been good progress with getting the clubrooms extension underway. The engineer's drawings and plans for the Watts Bridge BoM and Somerset Regional Council have been obtained. The assistance from lan Ratcliffe is greatly appreciated. Thanks also to Richard for keeping the process moving.	
	Welcome to our newest member – Brian Fitch who has purchased an existing air chalet at Watts Bridge. Looking forward to catching up with everyone at the next meeting.	
SECRETARY'S REPORT:	Richard Faint detailed the inward and outward correspondence for the last few months.	
	This included emails to members regarding flying events in the district, the Amberley Airspace report and the distribution of the newsletter.	
	There has been correspondence with the Watts Bridge BoM getting the approvals for the clubroom extensions underway. Questions from several members were addressed.	
	Welcome to new member Brian Fitch.	
TREASURER'S REPORT:	Priscilla Smith provided a financial statement summary and advised that the BVSAC ING account balance is \$554.38 and that the BVSAC NAB account balance is \$4,602.16	
WBMA REPORT:	Bruce Clarke advised that the planning process for the Gathering of Eagles 2016 is well underway with some momentum already building, promising a bigger and better fly-in than last year.	
	Peter Freeman noted that the mowing season is upon us, there is plenty to do on the airfield.	

	Some repairs to fences in the chalet area are required. Peter also reported that the fence on Silver Leaves Road where it crossed Runway 12/30 has been hit and damaged twice in the last month. Perhaps something more substantial is required?
GENERAL BUSINESS:	Mike Smith reported progress on the repairs to be undertaken on the BVSAC Hangar's tank and stand. A Camel tank from Dalby has been selected. Price is \$1040.00 which includes GST, delivery and several fittings. Work will commence shortly.
	Richard Faint reported upon the success of the newest flying event on the Watts Bridge calendar – Watts for Breakfast?? The January WfB was well attended with in excess of 40 aircraft attending and over 100 breakfasts served. He noted that there was a market for soft drinks which could be provided and sold by BVSAC.
	Richard also updated the meeting on the progress with the clubrooms extensions. The plans and engineering drawings have been obtained and the IDAS Forms have been completed pending one item of information which is now to hand. The forms will now be submitted to Watts Bridge for approval along with the required processing fee.
NEXT MEETING:	The next meeting will be 05.03.2016 in the BVSAC Clubrooms Watts Bridge at 10:00AM A BBQ lunch will follow the meeting.
MEETING CLOSED:	There being no further business, the meeting was declared closed at 10:55AM A BBQ lunch was held after the meeting.

This is a true and accurate record of the meeting.

Dated: / /

--000000--