



A Member of the SARL



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# Newsletter

# 111

May 2015

## Reflections:

Here we are already in the 5th month of the year and it seems like it was only January such a short while ago.

I suppose it is the same with most of us, I can remember how long it took for days to go by when I was a youngster in school. We used to live for the weekends to come and they always took so long to get there.

Spending the majority of my youth in boarding school in Queenstown, the holidays could just not come soon enough and always seemed to take so long to get there. Now, as an adult, the months just fly by. Maybe it has something to do with "coming of age" that they forgot to tell us about. You know, something like "When you get older, weeks will be like days".

Now of course, every week I

have an ache or a pain in another place, and the body just seems to be degenerating so quickly these days.

No more can I bend down as easily as I could to tie my shoe laces. You should see me trying to fold myself in half to get behind the wheel of my wife's car.

In the morning when I get out of bed, I first have to sit on the edge and get my knees in to position to take the strain after having being rested the whole night.

Fortunately, my teeth are still mine and don't have to sleep in a glass next to my bed, and I can still see when I get up half way through the night to go to the loo without putting my glasses on.

Somebody said to me the other day "Getting old is not for sissies", and I can

only but agree with them.

There is of course the brighter side of all this, and that is that one day soon I will be able to retire and spend more time doing what I want to do, like sleeping in every morning, playing radio when I want to and of course getting stuck in to all the projects I have lined up on, under and over my workbench.

Of course I can dream, because at my age I am allowed to. It comes with the territory.

My only regret is that no one will be able to take this old body of mine and refurbish it to the state it was in 30 years ago, like we can do with the boat anchors we so lovingly repair and refurbish, unless I become a bionic man.

Best 73

DE Andy ZS6ADY

## WIKIPEDIA

### MORSE CODE SPEED:

All Morse code elements depend on the dot length. A dash is the length of 3 dots, and spacing's are specified in number of dot lengths. An unambiguous method of specifying the transmission speed is to specify the dot duration as, for example, 50 milliseconds.

Specifying the dot duration is, however, not the common practice. Usually, speeds are stated in words per minute. That introduces ambiguity because words have different numbers of characters, and characters have different dot lengths. It is not immediately clear how a specific word rate determines the dot duration in milliseconds.

Some method to standardize the transformation of a word rate to a dot duration is useful. A simple way to do this is to choose a dot duration that would send a typical word the desired number of times in one minute. If, for example, the operator wanted a character speed of 13 words per minute, the operator would send a dot rate that would send the typical word 13 times in exactly one minute.

The typical word thus determines the dot length. It is common to assume that a word is 5 characters long. There are two common typical words: "PARIS" and "CODEX". PARIS mimics a word rate that is typical of natural language words and reflects the benefits of Morse code's shorter code durations for common characters such as "e" and "l". CODEX offers a word rate that is typical of 5-letter code groups (sequences of random letters). Using the word PARIS as a standard, the number of dot units is 50 and a simple calculation shows that the dot length at 20 words per minute is 60 milliseconds. Using the word CODEX with 60 dot units, the dot length at 20 words per minute is 50 milliseconds.

Because Morse code is usually sent by hand, it is unlikely that an operator could be that precise with the dot length, and the individual characteristics and preferences of the operators usually override the standards.

For commercial radiotelegraph licenses in the United States, the Federal Communications Commission specifies tests for Morse code proficiency in words per minute and in code groups per minute. The Commission specifies that a word is 5-characters long. The Commission specifies Morse code test elements at 16 code groups per minute, 20 words per minute, 20 code groups per minute, and 25 words per minute. The word per minute rate would be close to the PARIS standard, and the code groups per minute would be close to the CODEX standard.

While the Federal Communications Commission no longer requires Morse code for amateur radio licenses, the old requirements were similar to the requirements for commercial radiotelegraph licenses.

A difference between amateur radio licenses and commercial radiotelegraph licenses is that commercial operators must be able to receive code groups of random characters along with plain language text. For each class of license, the code group speed requirement is slower than the plain language text requirement. For example, for the Radiotelegraph Operator License, the examinee must pass a 20 word per minute plain text test and a 16 word per minute code group test.<sup>[1]</sup>

Based upon a 50 dot duration standard word such as PARIS, the time for one dot duration or one unit can be computed by the formula:

$$T = 1200 / W$$

Where: T is the unit time, or dot duration in milliseconds, and W is the speed in [wpm](#).

## HF Happenings:

### Conference Recommendation

Recommendation VA14\_C4\_REC\_08 at the IARU Region 1 Albena Conference last year read, "C4 recognises the use of different HQ call signs per band mode in the IARU World Championship is required in some countries and requests the Executive Committee to ask the Administrative Council to investigate if this is possible within the scoring software."

Proposed by: URE

Seconded by: REF

The motion was carried with one vote against and five abstentions.

I can now report that, following discussions with ARRL, which administers the IARU HF Championship, the following change has been made. The new rules are available on the contest website. There has been some re-numbering of rules to accommodate the new single op (assisted) category, but the clauses relevant to the Conference recommendation now read:

**4.3.3.** Only one HQ station call sign per member society per band mode is permitted.

The term "band mode" is explained in 4.3.1.:

**4.3.1.** May have only one transmitted signal per band mode (160 CW, 160 Phone, 80 CW, 80 Phone, 40 CW, 40 Phone, 20 CW, 20 Phone, 15 CW, 15 Phone, 10 CW, 10 Phone) at the same time.

I hope this resolves the concerns of those Societies wanting to see a change.

73, Don Beattie, G3BJ, President IARU Region 1

### SOTA Lessons Learnt

Lessons learnt you ask? Yes. Over the weekend of 24 to 27 April, Carina and I went to visit our sons and their wives in Harrismith. Moreover, 28 April is the birthday of Carina.

Now I had plans of activating Mount Paul, ZS/FS-012, and Platberg ZS/FS-004, during the weekend. Saturday was out; the children had arranged something for us.

Sunday morning, Shaun and I (Dennis) made it to Mount Paul and we set-up the Buddipole and FT-817. Eight QSOs were made on 40 metres with ZS4, ZS5 and ZS6.

Monday I had everything ready for Platberg - mist covered the mountain. Therefore, we waited! Then a session at the hair salon was arranged (my one daughter-in-law owns the salon) for Carina. After that, I was told "no suitable shoes for mountains!" and "we are celebrating Carina's birthday this evening, it will

take too long!" Me against three women - what chance have I of winning.

So Platberg will have to wait until our next visit to Harrismith. And there is a geo-cache on Platberg I need to find.

### Diary for May

1 - Worker's Day

2 - Open day at Leeuwberg "The Fall of Berlin"

3 - ZS3 Sprint

9 and 10 - AWA Valve QSO Party

10 - Mother's Day

14 - Ascension Day

15 to 17 - Dayton Hamvention

21 - Radio Amateur Examination

30 and 31 - CQ WPX CW Contest

31 - SARL Digital Contest; Comrades Marathon

### History this week

Starting Monday 27 April 2015

1770 - Captain Cook lands at Botany Bay, Australia

1780 - William Herschel discovers the first binary star, Xi Ursae Majoris

1789 - Mutiny on the "Bounty" occurred and the ship sailed to the Pitcairn Islands

1791 - Samuel Morse was born in Charlestown, Mass. USA

1813 - A patent for rubber was given to JF Hummel of Philadelphia, PA

1830 - The first regular steam train passenger service starts

1837 - England issues its first stamp, the 1 penny Queen Victoria

1849 - A telegraph register was patented by Samuel FB Morse

1865 - SS Sultana exploded, 1 450 - 2 000 people die. The worst in US history

1878 - The phonograph shown for first time at Grand Opera House

1879 - Electric arc lights used for the first time - in Cleveland, Ohio

1880 - The first US patent for an electric hearing aid was issued to Francis D. Clarke and MG Foster

1884 - Lismore's first telephone, Royal Hotel to the Post Office

1904 - Hulse Meyer, Germany, patents first 'radar' system. Governments are not interested

Thanks to Dennis Green for the HF Happenings.

Should you want a full copy you will find it at :

<https://xa.yimg.com/kq/groups/20889973/2039562905/name/hfhappenings653.pdf>

## CW Corner

### This and that de ZL2AIM Ian

Thinking out loud today.... I have been trying to obtain Worked All States (WAS) on CW for quite some time now. It seemed as if I had cracked the nut when I had a QSO with the last remaining state, Nebraska a few weeks ago. Working a state is all very well, but one needs to have confirmation either with a paper QSL card or via Logbook of the World (LoTW).

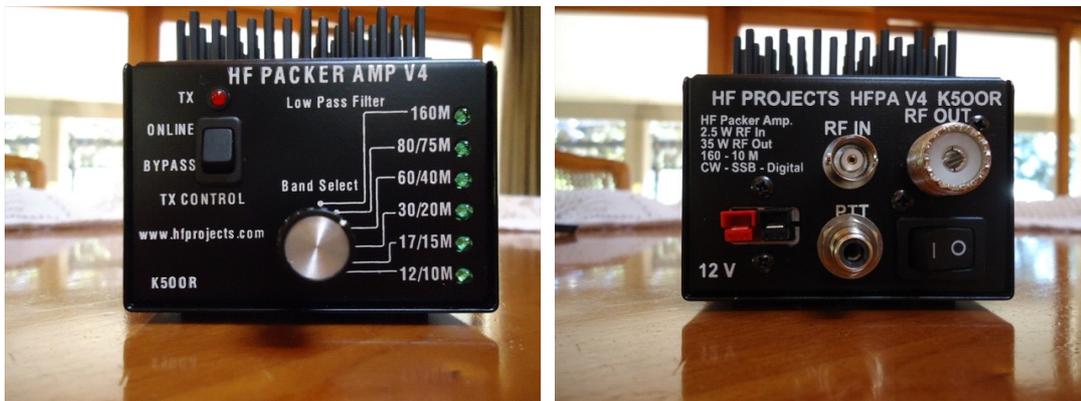
LoTW is of course the easiest way of confirming a QSO but I believe that many stations have difficulty in getting their heads around using the facility. I did have an initial hurdle in logging on but on reading the instructions again I have found it extremely easy to use and update my latest QSO's from Ham Radio Deluxe on a daily basis. I have been using it for 4 years now. eQSL is also easy to set up but I feel it is not fool proof.

One of the great things about using HRD is that it has a great search facility to see where one stands in any award. So that was where I went after putting in the Nebraska qsl in my log. It showed that I had worked 50 states but only had confirmation from 47. I had sent QSL cards to those missing confirmed states but had got nothing back in return. So I sent off a few emails as reminders. Sure enough, a station from two of the states said they would send one off in the mail. But I heard nothing from the station I had worked in North Dakota. That station had worked me when he was mobile (probably stationary!) but was not based in North Dakota. I am not sure if he would have even kept a log of our exchange as he may well have been operating whilst driving (dangerous!).

WIAW has got stations working from each state during this year – their centennial year. But unfortunately I have already missed out on North Dakota and that would have been easy to confirm via LoTW. Whilst I know that I have worked all states, the confirmation thereof is the problem!

I have since had written confirmation that I have got the WAS award, but as the ARRL are redesigning their certificate it will take a bit longer for it to be awarded officially. It will have been worth the long wait!

#### HF Packer Amp



I have taken the plunge and ordered a 35 watt amplifier kit for my QRP stations. I have been playing with the idea of boosting the power of my QRP rigs for many a year. There are some very cheap ones on the market from the Far East, but reading reviews on them one finds that their filtering is not very good. The Tokyo HP ones were excellent but a bit expensive. As that company is in liquidation, I don't foresee anything being manufactured there in the near future.

Virgil K5OOR makes up a kit called the HF Packer amp which is a great favourite with back packers and SOTA folk and that is what I decided to order. I have watched his site over the years and he continues to improve on an already proven design. I think he makes up the kit in batches of 15 or so and I ended up paying via PayPal NZ\$404 including all charges of freight etc. The latest change he has made is putting in LEDs to inform you of what band the amp is set on. One doesn't want to set the amp on one band and transmit the rig on another one! However the two IRF510 MOSFETs are easily obtainable and are less than a few dollars each. I doubt if I will have a use for the linear amp in the shack, but will be good to take out when operating /P. With 5 watts in, you get 30 – 35 watts out. The power out will depend on what band you are using. I have tabled later on the power out for various bands. Apparently the amp is very tolerant of low voltages and whilst designed for 12 volts input can still be operated on voltages as low as 9 volts. So a 12 volt 7 amp hour battery should be enough to power my rig and amplifier for quite a few hours of continuous QSO's.

I guess that some of you QRP purists will not go along with my thoughts of using an amp to boost my signal. I admit also to having these same feelings, but having spent a very cold morning at the Tairua Estuary with a bitterly cold wind coming off the sea and only working one DX station with my FT817 and my fingers getting stiff with cold, my thoughts went to extra power! Maybe if I had been able to work a few extra DX stations I might have shrugged off the cold, but my 5 watts was just not



structions. After a total of about 26 hours populating the two boards, the time came to do the tests before stuffing it all into the enclosure.

Once again I followed Virgil's advice and set up my Fluke multimeter with a special cable for measuring the current drawn by the two MOSFETS and setting the bias.



FT817 set at 5W output (9.7 v)		
Band (m)	In (W)	Out (W)
160	5	45
80	5.2	45
40	5	40
30	5	30
20	4.5	38
17	4.4	25
15	4.4	22
12	4.3	23
10	4	15

I won't go into the technicalities here of the advantages of using the packer amp other than to say that you can use the amp (and your FT817) at reduced voltages and still get the output you require. Therefore you can use your set up being driven by a 7 amp hour battery for long periods as the FT817 is quite happy to put out its 5 watts with a supplied voltage of down to 9.5 volts and the packer amp will also perform well at low voltages.

I have done tests with my IC703 coupled with the HFPacker amp and the combination performs well. Just remember that you must set the power output to be 5 watts as the 703 can put out 10 watts which would be a disaster for the HF Packer amp.

I use an automatic cw memory keyer for doing all the hard work and I attached it to the amp/FT817 set up. After calling for about 20 mins I noticed that the heat sink got pretty hot. Whilst I realise that this is what the heat sink is designed to do, I decided to mount a fan on to a sheet of acrylic and fashioned a mount that would keep the fan above the heatsink. I connected it via an on/off switch and an Anderson Power Pole connector. It looks a bit ugly but it does the job of cooling the heatsink. It only needs to be on for about 1 minute and the heatsink returns to room temperature.

I have used it for 1 hour ragchews on 80m and 40m with favourable remarks on my signal. The cherry on the top were two qso's with JA stations on 15m and receiving a 559 and a 599 report.

So if you want to add a bit more power to your QRP rig give a thought to the HF Packer amp. I am sure you won't be disappointed!

## J S STREETER A1A, A4Z, ZS1W SOUTH AFRICA'S MOST ILLUSTRIOUS RADIO AMATEUR by Richard ZS6TF AWA Historian

There are rare times in one's life when a unique opportunity presents itself to do a service for the benefit of those who follow. Such an opportunity occurred to me on 27th April 2015 when I took custody of John Streeter's two valve receiver from George Latsky, founder of the Van Rhynsdorp radio museum .



This immensely important and valuable amateur radio artefact has been acquired by the SAIEE museum in Observatory Johannesburg to be conserved and displayed alongside relics and exhibits from the earliest period of radio history just after World War 1.

The receiver can be seen in the bottom right hand corner of the picture.



The 2 valve receiver was constructed by Streeter probably in early 1920 and may have been improved along the way until 1926. It is made on a teak base with the front panel works constructed out of mahogany, its notable features are the long extension rods to obviate hand capacity effects, the high Q air wound tuning inductor with variable antenna coupling coil operated by a mahogany rod from the front panel, the two variable condensers for tuning and for reaction, and a single vane fine tuner. Little is known of its previous whereabouts until it was bought on an auction in Cape Town by a Mr Dollie, from whom it was acquired by George Latsky when he founded his museum 23 years ago.

What kind of a person was John Samuel Streeter? He was born in Hackney, a district of London in 1884. As a youth he began to be interested in wireless telegraphy which developed into a passion for wireless (radio) when restrictions on amateur radio activities were lifted after WW1. By this time he was resident in Bernard House on Main road in Sea point in the Cape, having emigrated from England to take up a job of works manager at the motor engineering firm of Benjamin & Lawton. At this time he began weekly broadcasts of music. In late 1919 he moved to a new house called "Myrtle Grove" at number 2 Irwell Street in Observatory Cape Town where he installed his radio equipment in a shack in the garden. The building still exists today.

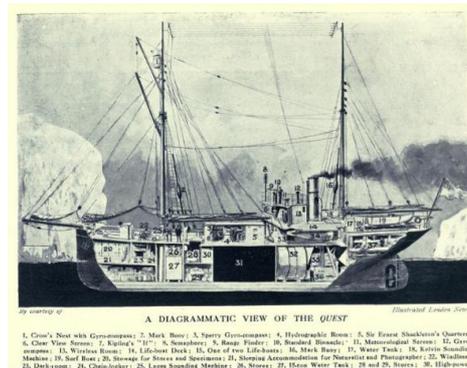


Next door to him in Irwell Street lived the grandparents of Dennis Wells ZS1AU together with their son Len, Dennis's father, who was a Boy Scout.

Streeter needed someone to listen at "the other end" & asked Dennis's Grandfather, Mr James (Jimmy) Wells, if Len could & would like to help him with his wireless experiments. He made a wireless receiver for Len and a Boy Scout friend out of bits & pieces including a pair of headphones. The local Post Office got to hear about this & the fact that 2 Boy Scouts were involved in the experiment. A senior PO official ruled that as the experiment could be of a possible unknown danger to the young teenagers, Mr Wells was required to take responsibility & was required to have a license in his name as Len was seen as being too young.

By 1922 radio amateurs were required to be licenced, the 1st call-sign A1A going to Streeter and the second A1B to Jimmy Wells, later the first ZS1AU. Streeter began regular local contacts with Reginald Hopkins in Wynberg who followed Streeter's example and began experimentation. His broadcasts of gramophone recordings and live concerts attracted a wide listenership and the signals from his 50 watt transmitter were heard as far away as Pietersburg on cat's whisker crystal receivers.

During June & July 1922 Streeter rendered great service to the crew of the Quest, the ship used by Sir Earnest Shackleton on his last voyage. Shackleton died on January 5th 1922 a day after arriving on South Georgia Island. Frank Wild the captain of the Quest and deputy to Shackleton, decided to continue the exploration. The return journey commenced from South Georgia on 8th May 1922 and after scientific visits to Tristan da Cunha, and Gough Island, the Quest headed for Capetown where it arrived on June 18th 1922 and stayed until July 13th. The ship had 2 naval pattern transmitting and receiving sets. The larger of the two was problematic and its use abandoned, but the smaller unit proved entirely satisfactory for transmitting at distances up to 250 miles. Power was supplied from a steam driven generator, alternatively from a paraffin internal combustion engine. The Quest was a wooden ship and earthing was to two copper plates which were attached to either side of the ship below the water-line. The receiver was chiefly of value in obtaining time signals, sent out nightly from nearly all the large wireless stations, and which could be received at distances up to 3,000 miles.



Sponsored by the Argus newspaper, Streeter began transmitting to the ship. As it neared Cape Town the Argus editorial team were able to talk over the radio with Frank Wild and in return the Argus staff had prepared a summary of important world events designed to bring up to date the crew of the Quest, who had been out of touch with mankind for many months. The good press stemming from his public spirited actions stood Streeter in good stead for the expansion of amateur radio activities. He turned his attention to operating over longer distances and was in regular contact with Toby Innes and Dixon Bennett in Johannesburg, and George Walker in Uitenhage.

In May 1923 he joined the ARRL, two years before the SARL was formed bringing his activities to the attention of the Americans.



In 1924 he ceased transmitting music when the Cape Town radio station commenced broadcasting. He was involved as technical Director and was accorded the honour of switching on the new 10kW transmitter on 15<sup>th</sup> September when the station went on air for the first time.

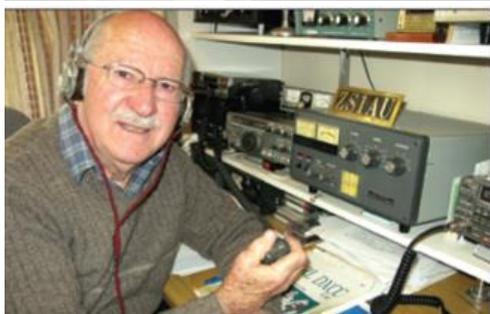
In 1925 using the allocated call-sign A4Z and a transmitter upgraded to 200 watts, he broke intercontinental barriers on 6<sup>th</sup> April 1925 by first contacting a Brazilian station CB8 operated by a Mr Braggio of Buenos Aires. On 18 September 1925 he became the first South African amateur to link up with an American ham 1CMX, J Borden of Fall River, Connecticut. This was fully reported in the American Christian science monitor newspaper of 31<sup>st</sup> October and in QTC, the precursor to Radio ZS, John Streeter commented "I was using a reverse feed-back circuit, working my aerial on third harmonic, and a Philips Z4 valve with rectified A.C. from two MR1 rectifying valves. The aerial was 86 feet long, the top portion 40 feet high and a single-gauge wire counterpoise being a six wire fan 60 feet long. The QSO commenced at 22:06 GMT and lasted 45 minutes, I was on 36 metres and 1CMX replied on 37 metres." He achieved "Worked all Continents" by the end of 1925, by his example igniting a veritable bush-fire of DX activity by South African radio amateurs. The SARL (then SARRL) was formed in May 1925 and John Streeter was Vice-President until 1927. He was also an inventor and patented a timing device for horse racing in South Africa and the USA in 1929.



Len Wells the first ZS1AU, one of the Boy Scouts and neighbour who helped John Streeter was inspired by his example to take up amateur radio.



The SAIEE have erected a plaque on the wall of 2 Irwell street to commemorate John Streeter's contribution to the advancement of radio.



In a very nice touch, Dennis Wells, the second ZS1AU, was approached at a Post Office pensioners reunion in 1990 by an old gentleman by the name of Bill Bryington who presented him with a pair of headphones, the same ones given by John Streeter to the Boy Scouts and used to listen to his first transmission. Bill turned out to be Len's Boy Scout chum who participated in the Streeter experiments and the headphones are one of Dennis's most cherished possessions which he still uses from time to time.

From 1929 the trail goes cold and your historian hopes that more information about Streeter's later life will be forthcoming.

Acknowledgements to Dennis Wells ZS1AU and Hans van de Groenendaal ZS6AKV. Material sourced from publications by Mervyn Emms, Eric Rosenthal and Frank Wild.

## Antique Wireless Association Valve QSO Party

### Aim:

The aim of the AWA Valve QSO party is to create activity on the 40 and 80 meter bands. It is a phone only contest. Preferably, valve radios, or radios with valves in them may be used.

### 2. CONTEST PERIOD

The contest period will be run from 15:00 to 19:00 hours SAST on Saturday 09 May 2015 and 15:00 to 19:00 hours SAST on Sunday 10 May 2015

### 3. BANDS MODES & CONTACTS:

BANDS: 80 and 40 meters.

MODES: AM (Saturday) and SSB (Sunday).

CONTACTS: The same station may be contacted once on each band. It is thus possible to make 4 valid point-scoring contacts with the same station if worked on each of the 2 permitted bands and on each of the two permitted modes.

### 5. Power:

The output power may not exceed 100 w, unless the rig itself has a higher output power. (FTDX400, etc)

### 6. Exchange:

Call sign, RS and consecutive serial numbers starting at 001, plus type of radio used, eg HT37 Tx.

### 7. Scoring:

All valve radio - 3 points per contact;  
Hybrid (valve & transistor) - 2 points per contact;  
All Transistor Radio - 1 point per contact

Multiplier: (Your Radio)  
All valve radio - 3 points per contact;  
Hybrid (valve & transistor) - 2 points per contact;  
All Transistor Radio - 1 point per contact

### 8. Awards:

Certificates will be awarded to the first three places in each category. (AM/SSB)

### 9. Sponsor:

The Antique Wireless Association of Southern Africa (AWA)

### 11. Logs:

The following details are to be logged:

Date, Time (CAT), the Station worked, Sent and Received exchanges plus Serial number, and Band. Additionally the name of the transmitter (not a linear) used by the Station contacted should be recorded

The Operator's name, callsign and his/her Transmitter used must be shown as well as a contactable email, cellphone number and/or postal address be included.

Contest logs may be submitted as attachments via email and as hard copy. Files may be in Excel or Word files with one QSO on every new line.

### 12. Deadline:

All logs must be mailed to reach the local co-coordinator and envelopes must be date stamped no later than the last day of the month in which the contest is held

Logs may be sent directly to the contest committee organizer at the following address

The AWA Contest Committee

PO Box 12320

Benoryn

1504

South Africa

Or emailed to Andy Cairns ZS6ADY andyzs6ady@vodamail.co.za

The Contest Committee will communicate the results to the SARL and publish them in the AWA Newsletter.

13. Logs that do not comply with the foregoing requirements will not be considered and will be rejected. Radio amateurs are expected to operate within the rules of their respective licenses and unsportsmanlike activity is to be discouraged. Actions and decisions of the Contest Committee are official and final.

**CONTACT US:**

P.O. Box 12320  
Benoryn  
1504

Mobile: 082 448 4368  
Email: andyzs6ady@vodamail.co.za

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**Antique Wireless Association  
of Southern Africa**

**Mission Statement**

Our aim is to facilitate, generate and maintain an interest in the location, acquisition, repair and use of yester-days radio's and associated equipment. To encourage all like minded amateurs to do the same thus ensuring the maintenance and preservation of our amateur heritage.

Membership of this group is free and by association. Join by logging in to our website: [www.awasa.org.za](http://www.awasa.org.za)

**Notices:****Net Times and Frequencies:**

Saturday 06:00—AM Net—3615  
Saturday 07:15—Western Cape SSB Net— 7140 (Alternate 3630)  
Saturday 07:00—KZN SSB Net—7145  
Saturday 08:30— National SSB Net— 7140; relayed on 14140  
Saturday 14:00— CW Net—7020  
Wednesday 19:00— AM Net—3615, band conditions permitting.

**AWA Mid Year Swop Meet:**

Our Mid-Year meeting has been arranged in conjunction with the Kempton Park Amateur Radio Technical Society (KARTS) once again at the Venue in Kempton Park for Saturday 06 June 2015. More details on directions will be posted at a later stage, or visit the KARTS website for directions.

**AWA KZN:**

On Sunday 28th June 2015, there will be a KZN AWA Gathering at Baynesfield Museum hosted by Bert ZS5MQ at his Wireless Shack. Gates open at 09:00 to the public and Bert has suggested they could also have a bring and braai as well as bringing any rigs for display. Directions will be posted on the AWA website as well as in the Newsletter.

**AWA WESTERN CAPE**

We are arranging a Bring and Braai at the farm QTH of John ZS1DI on the 20th June 2015, it has been a while since we had a good braai and flea market and this will be an ideal time. This will coincide with the Overberg Club meeting who are also invited. There will be a flea market (boot sale).

To make this event an interesting meet it would be great if those attending bring along a piece of Antique equipment - either restored Or being restored- so that members can see what we are all about.

The event will be the whole day starting at about 10:00 or earlier until you are tired and want to go home.

The Venue is at Lochinvar on the Stanford road.

It will be great to see all members again and enjoy some eyeball QSO's with friends from the past.

Please try to attend and should you require any further info please send an e-mail to me with your query.

Thanks to John and Judy for affording us this opportunity looking forward to seeing you all there plus Xyl's and friends.

73 to all,

John ZS1WJ