OXTALES

First published 1980

Newsletter of the Oxley Region Amateur Radio Club Inc.,
PO Box 712 Port Macquarie 2444
Club e-mail address: vk2bor@orarc.org
Club Website: http//www.orarc.org

Club Nets on VK2RPM
146.700MHz
(CTCSS 91.5Hz)
Sundays
(during EADST at 0900)
(during EAST at 0830)
Every Thursday at 1930

ORARC's Forty-fifth Anniversary Year

January 2016

Compiled by VK2AYQ & VK2TT

PRESIDENT: Lyle Smith	VK2SMI	6585 2497
VICE PRES: Richard Court	VK2CHC	6584 6872
TREASURER: Larry Lindsay	VK2CLL	6587 1155
SECRETARY: Henry Lundell	VK2ZHE	6582 0534

President's Report

At November's Meeting it was decided to sell off our remaining 2015 call books at the reduced price of $12.50 before the 2016 books come into stock. If you are after one please contact Henry or Lyle.

Discussions were made around the idea of whether we can utilise the soon to be decommissioned Telstra mobile phone tower on top of Bago Bluff Wauchope. Peter,VK2MPK, will follow up with enquiries to Telstra, Forestry (land holder) and the other relevant authorities to find out the plans for this site.

Bago is definitely a 4WD access location but the views are magnificent from there, covering Wauchope, north to Telegraph Point, east to the ocean and south, nearly as far as the eye can see.

The Committee discussed the repeater upgrades and recent repairs to the Middle Brother Site (VK2RPM) and plans are now going forward with the second stage of work which is linking VK2RPM and VK2RCN.

The Spring VHF/UHF Field Day, held on the 14th of November, started with clear weather against all the speculated reports for the day.

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ORARC VHF/UHF Repeaters

MIDDLE BROTHER
VK2RPM 2 metre (Voice - CTCSS 91.5Hz)
O/P 146.700MHz - I/P 146.100MHz

VK2RPM 70 cm (Voice - CTCSS 123Hz)
O/P 438.525MHz - I/P 433.525MHz
C4FM digital mode capability

VK2RPM-1 (APRS Digipeater)
SX 145.175MHz 1200bps

TELEGRAPH POINT
VK2RCN 2 metre (Voice)
O/P 147.000 MHz - I/P 146.400 MHz

VK2RCN 70 cm (Voice - CTCSS 123 Hz)
O/P 438.425MHz - I/P 433.425MHz

VK2RCN-1 (APRS Digipeater)
SX 145.175MHz 1200bps

In This Issue :

Down The Coax

Ross Hull Memorial Contest 1 to 31 January 2016

ORARC meetings held in the S.E.S. Building Central Road, Port Macquarie.

Monthly General Meeting
Saturday 2 January 2016 2:00 pm

ORARC Foxhunt Practice Day
Summer VHF-UHF Field Day
Saturday 9 January 2016 Start 10.00 am
John Downes Park

Summer VHF-UHF Field Day Saturday 9 & Sunday 10 January 2016

Friday Night Get-Together
Friday 15 January 2016 7.00 pm

Monthly General Meeting
Saturday 6 February 2016 2:00 pm

ORARC Antenna Shootout and Foxhunt Day
Sunday 14 February 2016 Start 10.00 am
Venue to be announced at 2 January Meeting

Friday Night Get-Together
Friday 19 February 2016 7.00 pm

Wyong Field Day Wyong Racecourse
Sunday 28 February 2016

Monthly General Meeting
Saturday 5 March 2016 2:00 pm

Friday Night Get-Together
Friday 18 March 2016 7.00 pm

John Moyle Memorial Field Day
Saturday 19 & Sunday 20 March 2016

Monthly General Meeting
Saturday 2 April 2016 2:00 pm

Net Controllers' Roster

*** Sundays** (00900 AEDST) VK2RCN 147.000		****Thursdays** (1930 AEDST) VK2RPM 146.7000	
January 2016			
VK2TT	**Jan - 03**	**VK2ZHE**	**Jan - 07**
VK2CHC	**Jan - 10**	**VK2ICQ**	**Jan - 14**
VK2TT	**Jan - 17**	**VK2EM**	**Jan - 21**
VK2CHC	**Jan - 24**	**VK2ZHE**	**Jan - 28**
VK2TT	**Jan - 31**		
February 2016			
VK2CHC	**Feb - 07**	**VK2ZHE**	**Feb - 04**
VK2TT	**Feb - 14**	**VK2ICQ**	**Feb - 11**
VK2CHC	**Feb - 21**	**VK2EM**	**Feb - 18**
VK2TT	**Feb - 28**	**VK2ZHE**	**Feb - 25**
March 2016			
VK2CHC	**Mar - 06**	**VK2ICQ**	**Mar - 03**
VK2TT	**Mar - 13**	**VK2EM**	**Mar - 10**
VK2CHC	**Mar - 20**	**VK2ZHE**	**Mar - 17**
VK2TT	**Mar - 27**	**VK2ICQ**	**Mar - 24**
		VK2EM	**Mar - 31**

Please Note: * and **

As a trial whilst the problems with the Middle Brother Repeater are being sorted out:

- The Sunday Morning net will be conducted on the Telepoint Repeater VK2RCN.
- The Thursday evening net will be conducted on the Middle Brother Repeater VK2RPM

(Cont'd from front cover)

At 8am, the Club's Communications Caravan arrived, towed by Peter, VK2MPK. I arrived shortly afterwards, after picking up the 2 metre and 70cm Yagi from Bill's (VK2ZCV) place and while Richard, VK2CHC, attended to the BBQ preparation for the morning's bacon and egg sandwiches.

The members present went about the usual setup for the day, including erecting the two portable masts with 2M and 70cm antennae and my trailer tower with the 3-element beam for 6 Metres.

After checking the VSWR of the antennae and a quick check with some distant beacons, we were ready for the contest.

The countdown to the contest start-time passed with conversations both face to face and over the air. Thanks to those stations that confirmed our operational readiness.

Noon arrived and all hands were at the ready for the many contacts to be made. We called and called on all three bands but there was no answer and we called and listened and still no answer. This went on until around 3:30 pm when the weather started to turn on us and the decision was made to call it a day and retire to our homes away from the impending storm.

By 4.00 pm we were packed and ready to travel, slightly damp and dejected from the lack of contacts and the weather that had turned on us.

Although we made no contacts for the day (probably due to the expected storms) and there were indications on contestradar.com that there was very little activity out there as we were the only station listed between Sydney and the VK4 border.

We still achieved the desired result of working a portable station away from our QTH's and had a great get together and some good food in the process.

Thirteen members attended the day. Thanks Arthur VK2ATM, Mark VK2FMGM, Barry VK2LBG, Stuart VK2FSTU, Henry VK2ZHE, Peter VK2PMK, Lyle VK2SMI, Bill VK2ZCV, Larry VK2CLL, Dennis VK2DAM, Richard VK2CHC, Rob VK2CRF, Bob Small VK2FBOB, and Paul VK2ICQ.

The White Ribbon Coastal Walk from the Tacking Point Surf Club to the Town Green was on the 22nd of November and the Oxley Region Amateur Radio Club assisted with communications for the event. The day started early, with volunteer briefing at 7am and then deployment to our allocated checkpoints.

Henry VK2ZHE was set up at the town Green with his trusty radios and a dual band antenna mounted at the top of his six metre "flag pole".

With Henry all ready to go, I proceeded south to Town Beach to fill-in Stuart, VK2FSTU, on the day's plans. Stuart was set up with his vehicle-mounted-radio. This unfortunately involved him having to walk back and forth to the checkpoint to update the volunteers working there.

Mayor Peter Bessling

Henry's Flagpole

Henry VK2ZHE's check point.

I left Stuart and travelled to Arthur, VK2ATM, located at Flynns Beach. Arthur was ready with his IC-706 and his offsider, Mark, VK2FMGM, was ready to do the hard work of updating the checkpoint on foot because parking was at a premium and taken early.

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Next stop was Dennis ,VK2DAM, located at Shelly Beach with a parking spot within 3 metres of the checkpoint equipped with a covered table and chairs just in case the weather turned bad. Well done Dennis on that location!

I proceeded to the Surf Club & found the place nearly packed out with what looked like 150 people… volunteers and onlookers.

Due to the distance, and the few minor hills between Henry and myself, I had to fallback to operating via VK2RPM but found it necessary to use the cross-band feature on my vehicle-mounted-radio to communicate with the hand held I was using.

The walk started on time and reports were fed back to the base at Town Green until the area was vacant of everyone except myself and the few volunteers.

After confirmation of the checkpoint closing, I moved up to John Downes Park to operate as relay for the lower beach checkpoints. Messages of arriving-walkers were passed to Henry and progressively each checkpoint closed as the final end of the procession had passed. Finally the last walker has passed Town Beach and I moved to Town Green for the end of the event.

Henry and I packed away his setup and after a round of thanks from the organisers, Mayor Peter Besseling and the multitude of volunteers Henry and I left for the day around 12:30 and headed home. A great day for all of us, a professional display of our Club and its member's ability and a feather in the cap for Amateur Radio, we have already been asked if we would be available next year. My thanks to everyone that helped that day.

The December Meeting, as usual, was a BBQ at Settlement Point Reserve.

Peter VK2MPK towed the Club's Communications Caravan, arriving around 8am to "claim" the parking spot, BBQ and shelter for the day's event.

Peter VK2MPK, Richard VK2CHC and John VK2KHB serve up breakfast

Bacon and egg muffins were the reward to the early arrivals who set up the site and prepared us for the day's events.

A short meeting started after 11am. With little to discuss, except for final calls for the 2016 Call Books, it was back to the festivities of the BBQ.

Richard, VK2CHC, had as usual, cooked up a storm with the sausages and everyone present was then fed.

Several members took the opportunity to show off their new gadgets. Bill, VK2ZCV, had an electronic component tester that supplied relevant information for any component regardless of how it was connected; Bruce VK2EM, had several members envious (and others excited) with his Yaesu FT-2DR C4FM dual-band handheld radio.

(Ed Note please see additional photographs of the December meeting at the end of the President's report)

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VK2RCN at Telegraph Point was visited by a working-bee in December. Nine members carried out the usual maintenance tasks which involved checking/topping-up battery water-levels, sweeping the floors and a general tidying-up of the inside of the repeater building. Outside of the building, much effort was put into clearing the ever-growing grasses, and bushland. Long grasses were brush-cut, and saplings were removed, all of which reduced the fire-risk to our repeaters for the coming fire season.

A formidable group of workers. Richard VK2CHC looks positively lethal with his scrub cutter!

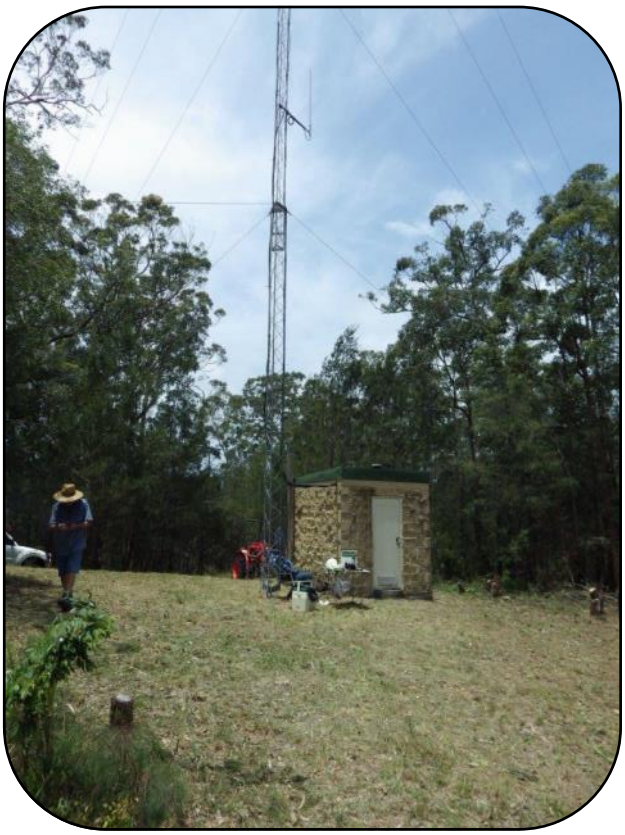
From left to right Steve VK2ZSW Rob VK2CRF Lyle VK2SMI, Arthur VK2ATM, Larry VK2CLL and Richard VK2CHC.

An impressive amount of hazard reduction was achieved as seen in photograph below

Measurements of the tower rigging were taken in order to finalise the planning for the forthcoming replacement/upgrade when the 6-Metre repeater arrives. This will be a fairly large project to install the repeater and antenna and for the relocation of all the antennae on the tower.

Those who attended and put in the hard work were Rob VK2CRF, Arthur VK2ATM, Richard VK2CHC, Steve VK2ZSW, Larry VK2CLL, Dennis VK2DAM, Henry VK2ZHE, Tim VK2ZTM and Lyle VK2SMI. I would like to say, on behalf of the Club and myself, a big Thank You! for the hard work that was put in during that day.

Lyle - VK2SMI (President)



Tower Measurements

Lyle VK2SMI Steve VK2ZSW and Larry VK2CLL pointing out some of the clearing.

December Meeting and Christmas Get together

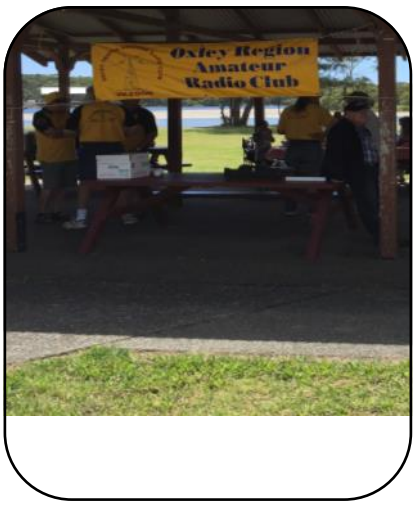
Bill VK2ZCV, Peter VK2MPK Arthur VK2ATM VK2FSTU and Paul VK2ICQ at the meeting.

Sue and Nora having a chat.

Above, Bruce VK2EM and Bob VK2ZRE enjoy the moment.

Below Stuart VK2FSTU and Jennifer in thoughtful pose.

Top Larry VK2CLL, Tim VK2ZTM and Richard VK2CHC listen to the meeting.



Lyle VK2SMI, and Peter VK2MPK Bill VK2ZCV Gordon VK2GFC

Below John VK2AYQ and John VK2KC discuss an Oxtales Article.

John VK2KHB

Helping with the cooking.

Left John VK2KC Dennis VK2DAM and Arthur VK2ATM enjoy a talk.

Right Bruce VK2EM, Paul VK2ICQ and Gordon VKGFC discuss a point.

White Ribbon Walk

Technical Report

Henry VK2ZHE

The comms for the White Ribbon Coastal Walk went well. We used 146.5 MHz simplex on 2 metres for the net.

Mayor Peter Besseling at the White Ribbon Walk.

I set up on the Town Green at the finish with 50 watts on 2 metres and 70cm into a VHF/UHF base station antenna (the same one that I use at the Field Day each year) on my 6 metre tall flag pole tied to one of the park light poles in front of the CWA. I set up my operating table under the building overhang in front of the CWA so I had shelter in case it rained. This installation gave good comms direct to the Town Beach and Flynns Beach check points. My 50 watts could be heard at the Shelly Beach checkpoint

The station is dry despite the light shower

Dennis at the Shelly Beach Check Point

Dennis VK2DAM at the Shelly Beach checkpoint only had his 5 watt hand held into a magnetic base whip and he was just too noisy for me to copy but Arthur VK2ATM at Flynns Beach was able to relay.

Lyle VK2SMI operated from the Tacking Point Surf Club for the start of the walk. We couldn't hear each other direct but we had good comms on the Middle Brother VK2RPM 2 metre repeater. I ran one of my hand helds on the repeater and whenever he called I used my 50 watt radio access the repeater. While Lyle was transmitting back to me via the repeater I listened to him on my hand held and switched my 50 watt radio back to 146.5 MHz simplex so there was minimal disruption to the simplex net.

We used 439.0 MHz FM simplex on 70 cm as a back channel but that only worked between the Town Green and Town Beach. Even though 2 metre simplex signals were noise free between the Town Green and Flynns Beach, there was no signal at all on 70 cm. Just goes to prove the 70 cm line of sight limitation.

Once all the walkers had left the Tacking Point Surf Club, Lyle VK2SMI went to John Downes Park so that he could relay Shelly Beach back to the Town Green if required. Interestingly, again the comms between John Downes Park and the Town Green was marginal on 70 cm simplex despite the 2 metre signals being noise free.

We ended up with just enough operators on

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the day as we were down a couple of operators Stuart VK2FSTU at the Town Beach check point and myself at the Town Green finish operated on our own. Lyle had rostered two people at each point so that one person could man the radio while the second person liaised with the officials.

Fortunately, the weather was overcast but pleasantly cool so there weren't any medical emergencies and radio traffic consisted of just routine status and progress reporting. We had a light sprinkle of rain on the Town Green while we were setting up. It remained dry at all the other check points. There was no rain during the walk itself.

Lyle VK2SMI came to the briefing at the Town Green prior to the event and then kindly helped me set up before he went to the start at the Tacking Point Surf Club. He also came back to the Town Green after the walk was finished and helped me pack up. I was most grateful for his assistance.

The Oxley Region Amateur Radio Club was formally thanked during the speeches for providing safety communications.

Henry
VK2ZHE

Two Stage Method of Building a Wire Dipole for HF

A wire dipole for HF frequencies simply consists of two lengths of wire, each a quarter of a wavelength, connected to either side of a transmission line. Usually 50 ohm coaxial cable is used for the transmission line between the antenna and the radio. Coaxial cable is inherently unbalanced so a 1:1 balun is often used at the feed point to connect the unbalanced coaxial cable to the balanced antenna. At higher frequencies the coaxial cable may be wound into a coil of several turns adjacent to the feedpoint to form a choke to provide a high impedance to preserve the balance of the antenna. This is often done for antennas designed for 20 metres and higher frequency bands.

A dipole antenna may be connected directly to the coaxial cable feedline without a balun but this will result in some current flowing on the outside of the coaxial cable. This unbalance will distort the radiation pattern and will make the antenna more susceptible to noise pick up. In practice, many dipoles are fed this way, and still provide quite satisfactory performance.

The length of each half of the dipole will be an electrical quarter wavelength at the operating frequency. A half wave dipole in free space has a feed point impedance of 73 ohms but when a dipole is mounted a quarter of a wavelength or less above the ground the feedpoint impedance will be lowered and the resonant frequency of the antenna will also be lowered. This will be the case for most of the 80 or 40 metre dipoles that Amateurs erect in typical suburban locations. One side benefit of this compromise is that the resultant antenna will be a good match to a 50 ohm feed line and the user will see a low VSWR

.

It is very simple to calculate the length of a wavelength at a given operating frequency. Most people will remember the formula: Free space wavelength in metres = 300 divided by the frequency in MHz.

(continued on next page)

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A half wave dipole is simply half of this length, and thus each half of a dipole is a quarter of a wavelength long. When cutting wire for a dipole you will measure out two lengths of wire, each a quarter of a wavelength long. There are a couple of practical consideration to take into account. When cutting the wire remember to leave enough extra length to attach the wire to the feedpoint insulator and then to the feedpoint connection itself, and also enough extra length to attach the wire to the insulator at the outside ends of the dipole. It seems pretty obvious but it is very hard to lengthen a wire after it has been cut! It's no problem to shorten a wire, though. It is usual to allow 5% for end effect so each half of the dipole will be approximately 5% shorter than the calculated free space length.

The calculated length of each quarter wave wire for a half wave dipole will thus be: Physical quarter wavelength in metres = 75 x 0.95 divided by the frequency in MHz. Remember to allow enough extra length to attach each end to its insulators when cutting the wire.

Having cut the wire for each half of the dipole, simply build the antenna and connect the feedline. The next step is to temporarily erect the antenna in its final location. Then use an antenna analyser to determine the frequency at which the VSWR is lowest. Normally, the VSWR will be very close to unity at this frequency. This frequency will hopefully be a little too low. The next step is to calculate a real world value for the 75 x 0.95 factor. Real world factor for the quarter wavelength = measured resonant frequency in MHz multiplied by the actual physical length of the wire in metres. The next step is to calculate the required quarter wavelength in metres = real world factor divided by desired frequency in MHz. Lower the antenna and adjust each half of the dipole to the newly calculated quarter wavelength. Raise the antenna and the centre frequency of the dipole will be very close indeed to the desired frequency.

The above method works because the recalculated actual value of the 75 x 0.95 factor will take into account all the variables associated with the actual installation. For this reason, it is necessary to go through the above exercise for each band that a dipole is being built for. The factor obtained for 40 metres for example will be different for the factor obtained for, say, 10 metres.
Happy dipole building.

Submitted by Henry Lundell VK2ZHE

Available Callsigns facility back online
Date :
02 / 01 / 2016

Author : Robert Broomhead - VK3DN

The Available Callsigns List facility on the WIA website relies on an automated nightly data feed from the ACMA Spectra database.

Recently the ACMA Spectra system experienced a technical fault, as a result the available callsign listing service on the WIA website was temporarily suspended.

The problem has been resolved and the WIA are pleased to announce the available callsign listing has been reinstated on the WIA website.

Silent Key: Claude William (Bill) Brooke VK2ZCW

Bill Brooke VK2ZCW passed away in hospital in Port Macquarie at 7:30 am on the morning of Thursday the 17th of December 2015, aged 82 years, after a long illness.

Bill was born in Dargaville, New Zealand, on the 23rd of February 1933 to Claude and Nina Brooke. He was the eldest of 5 children, his siblings being Pam, Ann, Bessie (dec) and Paul. Despite his given names being Claude William, he was always known as Bill to avoid confusion with his father, Claude.

Bill had an isolated childhood on Waiheke Island in Auckland Harbour where his family lived in the Island's School House. Bill enjoyed fishing and loved the sea. Very early in his life he decided that he wanted to join the New Zealand Navy.

Bill had to leave home to attend High School in Auckland where he learned to play the trumpet. This started his lifelong love of music.

Bill enlisted in the New Zealand Navy in 1951 and served in Korea and Malaysia.

During his Navy service Bill came to Australia for training at the Flinders Naval Depot. He loved dancing and it was at a dance in Melbourne that he met Ailsa. They married in Perth on the 8th of January 1955. They celebrated their 60th Wedding Anniversary in 2015.

In their first years of marriage Bill was often away at sea until he secured a land based posting to the Naval Communication Station at Waiouru in New Zealand. Bill and Ailsa's daughter Fiona was born in Waiouru. Their son Robert was born in Auckland.

Bill left the Navy in 1960 and the family moved to Perth in Western Australia. Bill joined the Tracking Stations and worked at Carnarvon in Western Australia, followed by Toowoomba in Queensland, and then Canberra.

In 1990 Bill began work in space stations linked to Intelligence which first took Bill and Ailsa to England for 4 months followed by a posting to Hong Kong for 2 years. With the handover of Hong Kong the Tracking Station moved to Geraldton in Western Australia.

Bill retired in 2001 and he and Ailsa moved to Port Macquarie.

Bill took out his VK2 callsign of VK2ZCW in which the CW had the significance of standing for his given names, Claude William. As soon as he moved to Port Macquarie he joined the Oxley Region Amateur Radio Club and remained a very active member until his final days of serious ill health. Bill had a very professional approach to his hobby. He could always be relied on to enthusiastically participate in club working bees and always made valuable contributions to club projects. Bill was a past Vice President and repeater officer of the club. And also operated the EchoLink node for the VK2RPM two metre repeater on behalf of the club for many years.

Bill was an active volunteer with Port Macquarie SES until recently.

Amongst his retirement activities, Bill was an active member of Probus

(Continued from the previous page)

where he and Ailsa had a wide circle of friends. He had an excellent singing voice and both Bill and Ailsa were very popular entertainers at local retirement homes. His last outstanding performance as an RSL member was when he sang the New Zealand National Anthem at the 2015 ANZAC Service on the Port Macquarie Town Green.

The Funeral service for Bill was held in the Chapel of the Innes Gardens Memorial Park Crematorium in Port Macquarie on Tuesday the 22nd of December 2015. A large number of Bill's friends, including a great many from Probus, the RSL and the Amateur Radio fraternity, joined Bill's family for the service.

The Amateur Radio fraternity extends its deepest sympathy to Ailsa, and to Fiona and Robert and their families.
Vale : Bill Brooke VK2ZCW

Submitted by Henry Lundell, VK2ZHE on behalf of the Oxley Region Amateur Radio Club Inc. with acknowledgement to the family Eulogy.

Amateur Radio Around the World

Surprise activity from North Korea

From The Radio Society of Great Britain | December 23, 2015

The world's most-wanted entity, North Korea, was briefly on the air on 20 December.

Polish DXer Dom Gryzb, 3Z9DX worked several hundred stations as P5/3Z9DX on 20, 15 and 10m.

He reported very high noise levels in Pyongyang, from where he ran 100W to a vertical just above ground level.

The site was amid many government high-rise buildings.

Many officials visited the station whilst it was on the air, keeping a close watch on the amateur radio operation.

Dom was in the country as part of preparations for a proper DXpedition to P5, planned for February 2016.

From the ARRL (American Radio Relay League)

Palmyra, South Sandwich/South Georgia Will Help Kick Off 2016 DXpedition Calendar

Two major January DXpeditions will be undertaken. With other smaller expeditions. Look for the Palmyra Island and South Georgia Island/South Sandwich Islands activations, starting around mid-month.

The Pacific Islands DX Group's **K5P** DXpedition to Palmyra hopes to be on the air on January 12 and will continue until January 25. Palmyra ranks among the Top 10 most-wanted DXCC entities. Initially a 12-member team was set to depart and activate K5P. Due to a change of aircraft that will transport the team to the island, the team has been trimmed to nine operators. The team is planning to leave Hawaii for Palmyra on January 11. The Pacific Islands DXpedition Group has been awarded permission to activate Cooper Island in the Palmyra Atoll.

The DXpedition's co-leaders are Craig Thompson, K9CT, and Lou Dietrich, N2TU.

Meanwhile, the 14-member Intrepid-DX Group **VP8 DXpedition** team to the South Sandwich Islands and South Georgia will set out on January 9 from the Falkland Islands on the R/V (research vessel) *Braveheart* for a 37 day voyage. Both entities are rare. The team will use VP8STI from South Sandwich and VP8SGI from South Georgia. *(continued page 14)*

WICEN

New Radio Amateurs may have heard of the acronym WICEN and may have wondered what the organisation . The following has been put together from the WIA and WICEN websites. (Editors note).

WICEN is the emergency service arm of Amateur Radio, providing communications support during times of civil emergency (eg fire, flood and storms) to primary emergency services such as the Police and SES, as well as providing safety communications to public events (eg car rallies, bike rides etc.).

What is WICEN?

WICEN's full name is Wireless Institute Civil Emergency Network In each state WICEN is composed of volunteer operators from the Amateur Radio service who are trained in communications and message handling techniques.

WICEN can rapidly establish communication networks within a State or territory, and has the capability to extend these communications throughout Australia and overseas through the use of various equipment and operating frequencies.

In most states, WICEN is run by a sub-committee of the Wireless Institute of Australia. In NSW and Victoria, WICEN are separately incorporated organisations.
The trained WICEN operator core is available to the appropriate authorities and, in a larger emergency, would act as a nucleus allowing the total Amateur Radio population to be put to use in a coordinated manner.

Training is assisted by WICEN involvement in the provision of safety communications for Public Sporting events such as the various Car Rallies throughout the State (including Rally Queensland), Cycle Events such as the Bicycle Qld.Ride, Horse Endurance Rides and many other community events. In this way WICEN members maintain an involvement in community service.

WICEN is moving towards a national training syllabus designed to set standards for operating procedures and for operations management.

WICEN and ER (Emergency Response) Communications Agencies

The control and coordination of all emergency operations depends on adequate and reliable communications. In times of emergency an agency's usual communication facilities, particularly telephone systems and mobile phones, require supplementation. In most state and territory Disaster Plans, the police are responsible for coordinating the emergency response of all other agencies, and are the primary provider of support communications to other agencies in an emergency.

WICEN is one of the several agencies responsible for supporting and assisting the Police with the provision of communications systems to other emergency agencies. In each state, although largely volunteer based, the emergency service organisations are very professional. In most cases these volunteers must meet training standards accredited by the states.
(to be continued in future Oxtales editions)

Equipment from the Past

Kenwood TS-830S

The Kenwood TS-830S was a very popular amateur transceiver introduced about 1981. It is interesting to compare its "state of the art" functions with that of the club's Yaesu FT991 recently purchased transceiver.

The **Kenwood TS-803S** was a solid state amateur band transceiver with **three vacuum tubes**. Operating on HF amateur bands between 1.8 and 29.7 MHz The TS-830S included VOX, 25 kHz calibrator, RIT, RF attenuator and noise blanker. **Automatic Gain Control** (ACG) and **Automatic Level Control** (ALC) and semi break-in CW are also included.

Specifications
Frequency range RX 10-160 m + WARC
TX 10-160 m + WARC
Modulations CW / SSB
Sensitivity
0.25 µV at 10 dB S+N/N
Receiver system Double Conversion
Image rejection > 60 dB
Audio output 1.5 W @ 8 ohm
Transmitter RF-output 100 W max
Dimensions (w×h×d)
333 × 133 × 333 mm Weight 13.5 kg.
Manufactured First 1981
Features

- VOX
- ACG
- ALC
- RIT
- Attenuator
- Noise blanker

Yaesu FT-991 (Present)

The FT-991 is an solid state all mode, all band MF/HF/VHF/UHF transceiver with C4FM (System Fusion) Digital capability operating on HF, VHF and UHF amateur bands.

Specifications
Frequency Ranges:
RX 30 kHz - 56 MHz, 118 MHz - 164 MHz, 420 MHz - 470 MHz (specified performance, amateur bands only) TX 1.8 MHz - 54 MHz, 144 MHz - 148 MHz, 430 MHz - 450 MHz (amateur bands only)

Circuit Type:
Triple-Conversion Superheterodyne: SSB/ CW/AM Double-Conversion
Superheterodyne: FM/C4FM

Modulations Type:
A1A(CW), A3E(AM), J3E(LSB, USB), F7W(C4FM), F3E(FM), F1D(PACKET), F2D(PACKET)
Power Output: SSB/CW/FM AM Carrier 160- 6 Meters: 100 W 25 W

Power Output:
SSB/CW/FM AM Carrier 160- 6 Meters: 100 W 25 W 2 Meters/70 Centimetres: 50 W 12.5 W
Dimensions (W x H x D): 228 mm x 81 mm x 236mm Weight 4.5 kg
Manufactured 2015

Features all of the TS830 built in plus:
High-resolution full colour 3.5" TFT Touch panel High Speed Spectrum scope with ASC (Automatic Spectrum-scope control) built in.

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Digital Signal Processing
The FT 991 features balanced receiver circuit configuration with a high-speed floating point TMS320C6746 DSP chip (3000 MIPS / 2250 MFLOPS) ..

Automatic Spectrum-Scope (ASC)

USB Capable
The FT-991 can be connected to a computer using a USB cable for CAT control and firmware updates,

Internal Automatic Antenna Tuner
Internal High Speed Automatic Antenna Tuner. The antenna tuner uses a LC switching network that has a 100 channel memory. The tuning data is automatically memorized.

High Accuracy TCXO
+/-0.5PPM High Resolution DDS/PLL local Oscillator included as part of the standard package.

Purchase price of the Kenwood TS830S in 1981 was approximately $930 USD ($1,300 AUSD).

The Yaesu 991 was purchased by the club last year for under $1,700 AUSD (approx. $1,190 US).

Editors note: The features of the current FT991 are really quite remarkable for the price point and illustrate the immense technical innovations and advances in the past 35 years. It would be interesting to speculate what features of amateur equipment will be considered to be 'normal' by members of the Oxley Amateur Radio Club in 35 years time!!

Radio Amateur activities from around the World continued from page 11

"Our plans have us activating South Sandwich Island first, as it is the #3 most-wanted DXCC [entity] in ClubLog," the group said on its website. "We will be active on South Sandwich for 8 full days, weather and sea conditions permitting. We expect to start our activation of VP8STI on January 17." South Georgia is the 8th most-wanted DXCC entity, according to the ClubLog ***Most Wanted DXCC List***.

The DXpedition's website describes the South Sandwich Islands as "a cold and inhospitable place" and Southern Thule Island, where the group will operate, as "one of the most remote places on Earth."

Following the South Sandwich operation, the team will voyage to South Georgia and activate it for 8 days starting on or about February 1. Altogether, the VP8STI/ VP8SGI team plans to spend 10 days on each island, including setup and teardown.
"Our goals are to operate fast and efficiently and to provide as many all-time new contacts with these rare entities," team co-leader Paul Ewing, N6PSE, said on December 31. "We will make the extra effort to work the most remote and difficult regions." Upon returning to Stanley in the Falklands, the team will operate as VP8IDX for 5 days with an emphasis on 160 meters, he added.

Individual team members are covering much of the DXpedition's $425,000 estimated cost, with the rest coming from club, foundation, and individual donations.

South Georgia and the South Sandwich Islands is a British overseas territory in the southern Atlantic Ocean. It is a remote and inhospitable collection of islands, consisting of South Georgia and a chain of smaller islands known as the South Sandwich Islands. South Georgia is 165 kilometres long and 1 to 35 km wide

Blast from the Past

The above photograph was taken at a Christmas meeting some years ago. Your challenges are:

Who is the member? What is he holding for show and tell? And what year was this taken in?

All of the answers can be found on the club's excellent website www.orarc.org.

Club members are urged to check into the club's website maintained by Paul VK2ICQ on a regular basis to keep informed on Amateur Radio Issues. Paul reposts many of the current Wireless Institute of Australia (WIA) posts regarding matters of Amateur Radio Importance.

The website also has a section which members may use to advertise the sale of equipment.

Meeting notes summary from the 2 January 2016 Club Meeting.

Reproduced from the Club's website www.orarc.org.

Some members missed out on the initial allocation of 2016 WIA Callbooks, and expressions of interest are being sought for a second batch – please contact Henry VK2ZHE as a matter of priority to register your interest if you'd like to be included in this (final) order.

In the wake of the continued interference that plagues the VK2RPM Middle Brother repeater (which was particularly bad this last Thursday evening), a motion was passed to temporarily move the Sunday Morning Net to the VK2RCN Telegraph Point repeater until the interference is rectified. The move is slated for evaluation at the February meeting where member input will be welcome.

ORARC will participate in the Summer VHF/UHF Field Day on the 9th of January at John Downes Park. The Fox Hunt Practice day (that was to occur at Sancrox Reserve) has been rolled in with this event. See here for details.

The Valentine's Day Fox Hunt / Antenna Shootout is to be held at the Tuffins Lane Sports Fields. Council permission is currently being sought and the event page will be updated as soon as we know which of the 26 fields we'll be using!

Published by Paul VK2ICQ, in Club News.

The ground is cleared to the repeater shack at Telegraph Point