Wythall Radio Club Newsletter Spring 2004

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Wythall Radio Club meets from 8pm every Tuesday evening at Wythall House, Wythall Park, Silver Street, Wythall near Birmingham. Visitors are very welcome.

Club callsigns: G1WAC, G4WAC, G7WAC, G0WRC and M5W

Wythall Radio Club is affiliated to the Radio Society of Great Britain

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Editorial

Welcome to the first newsletter of 2004. This should be an interesting year for the club with new members, a new venue for the rally and various talks and activities planned for later in the year.

I would especially like to welcome Peter G4KQU and Steve M1KQU who run the GB3DX repeater which proves very useful to some of the local club members.

This issue is somewhat technical with 3 articles of a constructional nature and more planned for future issues.

The big events this quarter include the Rally on March 14th, and the GB2ME special event station at the Tolkien Weekend at Sarehole Mill. Please keep these dates free.

Alban G7UGC

Contest News

December was quite a busy month for contests, with the 144MHz AFS contest producing 11 logs, the ARRL 10m and a very lively Christmas Contest in which 28 members took part. The result was a close finish, with Mike, G4VPD, being the eventual winner. Unfortunately, the Christmas Fox Hunt didn't have the same support but was enjoyed by the 3 teams that entered.

January was also busy; the 80m AFS contest produced 6 logs, enough for 2 teams and the new Club Championship Contests on 80m and 2m created some interest and look like being a popular addition to the contesting calendar.

Lee, G0MTN, again the most prolific contester, gained some very good results for his efforts, the best being a 1st place and a trophy in the IOTA contest.

There are several major contests to look out for over the next few months including the CQ WW WPX Contests, SSB, CW and RTTY and the RSGB Commonwealth contest. The Backpacker series starts again in May for those that like short, portable contests, and the 80m and 2m Club Championships continue until July, giving an opportunity to those new to contesting to try their hand at short contests covering SSB, CW and Data modes.

Peter M0COP

Contest Calendar

Activity nights each month:
First Tuesday: 144MHz, Second Tuesday: 432MHz, Third Tuesday: UHF, Fourth Tuesday: 50MHz, Fifth Tuesday: 70MHz.

March

HF

1	Mon 2000 - 2130	80m Club Championship - Data
6-7	Sat 0000 - Sun 2400	ARRL Inter. DX Contest
6-7	Sat 2200 - Sun 0159	Open Ukraine RTTY Championship
7	Sun 1100 - 1700	DARC 10-Meter Digital Contest
10	Wed 2000 - 2130	80m Club Championship - CW
13-14	Sat 1000 - Sun 1000	RSGB Commonwealth Contest - CW
14	Sun 0700 - 1100	UBA Spring Contest - CW
18	Thu 2000 - 2130	80m Club Championship - SSB
20-22	Sun 0200 - Mon 0200	BARTG Spring RTTY Contest
20-21	Sat 1200 - Sun 1200	Russian DX Contest
27-28	Sat 0000 - Sun 2400	CQ WW WPX Contest - SSB

VHF

6-7	Sat 1400 - Sun 1400	144/432 MHz
14	Sun1000 - 1200	70 MHz Cumulatives

April

HF

3-4	Sat 1500 - Sun 1500	SP DX Contest
3-4	Sat 1600 - Sun 1600	EA RTTY Contest
4	Sun	RSGB RoPoCo 1 - CW
5	Mon 2000 - 2130	80m Club Championship - CW
10-11	Sat 0700 - Sun 1300	JIDX CW Contest
10	Sat 1500 - 1859	EU Spring Sprint - SSB
11	Sun 0600 - 1000	UBA Spring Contest - SSB
14	Wed 2000 - 2130	80m Club Championship - SSB
17	Sat 0000 - 2359	Holyland DX Contest
17-18	Sat 1200 - Sun 1200	YU DX Contest
17	Sat 1500 - 1859	EU Spring Sprint - CW
22	Thu 2000 - 2130	80m Club Championship - Data
24-25	Sat 1200 - Sun 1200	SP DX RTTY Contest
24-25	Sat 1300 - Sun 1300	Helvetia Contest

VHF

11	Sun 0900 - 1300	1st 70 MHz
25	Sun 0900 - 1300	50 MHz

May

HF

1-2	Sat 2000 - Sun 2000	ARI Int. DX Contest - CW/SSB/DIGI
3	Mon 2000 - 2130.	80m Club Championships - SSB
8-9	Sat 1200 - Sun 1200	Volta RTTY DX Contest - RTTY
8	Sat 1230 - 1330	SL Contest - SSB
8	Sat 1700 - 2100	FISTS Spring Sprint - CW
8- 9	Sat 2100 - Sun 2100	CQ-M Int. DX Contest - CW/SSB/SSTV
12	Wed 2000 - 2130	80m Club Championships - DATA
15-16	Sat 1800 - Sun 2100	Anatolian WW RTTY Contest - RTTY
15-16	Sat 1800 - Sun 1800	H. M. The King of Spain Contest - CW
20	Thu 2000 - 2130	80m Club Championships - CW
22-23	Sat 2100 - Sun 0200	Baltic Contest - CW/SSB
29-30	Sat 0000 - Sun 2400	CQ WW WPX Contest - CW

VHF

1- 2	Sat 1400 - Sun 1400	432 MHz - 248 GHz
1	Sat 1400 - 2200	10 GHz Trophy
1	Sat 1400 - 2200	432 MHz Trophy
9	Sun 0900 - 1200	70 MHz CW
15-16	Sat 1400 - Sun1400	144 MHz
16	Sun 1100 - 1500	144 MHz Backpackers #1

June

HF

5-6	Sat 1500 - Sun 1500	National Field Day 1.8-28MHz
5- 6	Sat 1500 - Sun 1459	IARU Region 1 Field day - CW
7	Mon 2000 - 2130	80m Club Championships -DATA
12-13	Sat 0000 - Sun 2400	ANARTS WW RTTY Contest - DIGI
12	Sat 0000 - 2400	Portugal Day DX Contest - SSB
12-13	Sat 0000 - Sun 1600	WW South America CW Contest - CW
12	Sat 1100 - 1300	Asia-Pacific Sprint Contest - SSB
12-13	Sat 1600 - Sun 1600	DDFM 50 MHz Contest - CW/SSB
16	Wed 2000 - 2130	80m Club Championships - CW
19-20	Sat 0000 - Sun 2400	All Asian DX Contest - CW
24	Thu 2000 - 2130	80m Club Championships - SSB
26-27	Sat 1200 - Sun 1200	SP QRP Contest - CW
26-27	Sat 1400 - Sun 1400	MARCONI Memorial Contest HF - CW
26-27	Sat 1800 - Sun 2100	ARRL Field Day - All
26-27	Sat 1800 - Sun 1800	H. M. The King of Spain Contest - SSB

VHF

13	Sun 0900 - 1300	144 MHz Backpackers #2
13	Sun 0900 - 1600	Practical Wireless QRP contest.
19-20	Sat 1400 - Sun 1400	50 MHz Trophy
20	Sun 1100 - 1500	50 MHz Backpackers #1

Contest Results

WPX RTTY 2003		G0MTN	18/422 SO AB LP
UBA 2003 SSB		G0MTN	54/110
UBA 2003 CW		G0MTN	43/168
144MHz Backpackers Champs 2003		G1WAC/P	42/54
RSGB VHF NFD Open Section	Wythall Radio Club		11/15
	6m	G0WRC/P	10/14
	4m	G4WAC/P	12/12
	2m	G1WAC/P	7/17 (Best ODX)
	70cm	G7WAC/P	7/9
2nd 50MHz Contest 2003		G7UGC	10/10 SO
AGB New Year Snowballs		G0MTN	1/1 UK
RSGB 144/432MHz		M0COP	11/11
Canadian Winter Contest 02		G0MTN	2nd G AB LP
Croatian CW		G0MTN	2nd G SOAB
RSGB First 50MHz Contest 03		M0COP	5/15
ROPOCO 2003		G0MTN	3/46
RSGB 432MHz AFS 2003		G4VPD	18/25 Single Op Fixed
	G1WAC (M0COP, G0MTN, M0AEJ)		4/4 Multi-op

HF Championships	G0MTN	51/90
Wythall ARC Fox Hunt	M1EOQ / G6KMQ	
EU Sprint	G0MTN	16/97
IOTA Island-Single-Operator-Mixed Mode (12 Hour High Power)		
	G0MTN	1/12 (Trophy)
Island-Single-Operator-SSB (24 Hour Low Power)		
	M0COP	19/21
Backpackers Championship	G1WAC/P	43/55
EUHFC	G0MTN	15/78 Low power mixed
SCC RTTY	G0MTN	51/207 Low power
RSGB 160m Club Calls 2003	M0COP	44/99
	G0ICJ 53	G8MYK 75
RSGB 80m Club Championship CW	Wythall ARC (currently 22nd)	
RSGB 144 UKAC/Club Championship	G1WAC (currently 1st)	

Wythall Radio Club Christmas Contest

1st	Mike G4VPD	Trophy & Certificate
2nd	Pete M0COP	Certificate
3rd	Chris G0EYO	Certificate
4th	G0MTN	
5th	2E0KEG	Certificate, Leading Intermediate license
6th	M3JKZ	Certificate, Leading Novice license
7th	MW5HOC	
8th	G0NES	
9th	M1EOQ	
10th	2E0PPH	
11th	M0AEJ	
12th	M3MCX	
13th	G0ICJ	

Contests Entered

November

RSGB 160m Club Calls	M0COP 45 qsos	G0ICJ 38 qsos
	G8MYK 23 qsos	
Ukrainian RTTY	M0COP 30 qsos	

December

RSGB144 AFS	G1WAC (G0MTN, G0ICJ, M0COP) 91 qsos			
	M0COK 37	G0NES 35	G7UGC 26	G0EYO 24
	G7OJO 10	G1KEA 9	M0AEJ 6	
	G6KMQ 4	M5DUO 3	M1EOQ 1	
ARRL 10M	G0MTN 194 qsos			
	G0EYO 38 qsos			
	G7UGC			

OK RTTY		M0COP 153 qsos G0MTN 140 qsos
Croatian CW		G0MTN 188 qsos
DARC Christmas Contest		G0MTN 65 qsos
Stew Perry		G0MTN 51 qsos
RAC Winter Contest		G0MTN 51 qsos
Wythall ARC Fox Hunt		M5DUO M1EOQ / G6KMQ M0COP
Wythall Radio Club Christmas Contest		

January

RSGB 144 Club Championship		G1WAC 25 qsos
RSGB 80m Club Championship CW		G0MTN 77 qsos
RSGB 80m Club Championship SSB		G0MTN 14 qsos M0COP 10 qsos M0MCX 4 qsos
RSGB 80m Club Championship DATA		G0MTN 22 qsos M0COP 14 qsos
RSGB 80m AFS CW		G0MTN 245 qsos M0COP 51 qsos
RSGB 80m AFS SSB	TEAM A	M0COP 170 qsos M0AEJ 70 qsos G0EYO 60 qsos
	TEAM B	G0NES 49 qsos M0MCX 21 qsos G6KMQ 13 qsos
BARTG Sprint		G0MTN 471 qsos M0COP 94 qsos
SARTG New Year RTTY		G0MTN 64 qsos
AGCW		G0MTN 45 qsos
REF CW		G0MTN 4 qsos
ARRL RTTY Roundup		G0MTN 704 qsos M0AEJ 30 qsos
UKARS SSB		G0MTN 10 qsos

Contest Calendars and Rules

HF: www.blacksheep.org/HFCC/
www.hornucopia.com/contestcal/contestcal.html
www.sk3bg.se/contest/

VHF: www.vhfcc.freeserve.co.uk

Lee goes Voodudes with 5U5Z

For the 2003 CQ WW DX CW Contest I was lucky enough to be part of the "Voodudes" Contest Group team and their expedition to Niger. 5U5Z was operated in the Multi/Multi category, resulting in 16,000 QSOs and a little over 40 million points. However, the contest itself is only half the story...



The Voodoo CG has participated in the CQWW CW contest for many years, most recent operations having been from West Africa in TY, 5V, 9G and XT. This was my second trip with the group. Part of the ethos of the team is to try new locations, and normally after 2 years in a country a new location is sought out.

This year the team comprised Don G3XTT, Fred G4BWP, Andy G4PIQ, Mike KC7V, Vince K5VT, Lee KY7M and myself Lee G0MTN. There had been a few problems for different people trying to obtain visas. Andy received his passport back only 3 days before flying out direct to Niamey. Vince K5VT's passport was not returned in time and he was not able to travel as planned, and was only able to fly in direct to Niger on the day before the contest. The rest of the team met up in XT for the overland trip to 5U. Don G3XTT took a 970km trip by bus from 9G just to get to XT!



I flew from London to Paris, and then to Ouagadougou in Burkina Faso, which was the home of XT2DX in 2001 and 2002. Although the team members bring several radios and laptops with them by air, there is a large stockpile of antennas, towers, feeders and other hardware that remains in storage. Each year somewhere needs to be found to keep it safely, and when moving from one country to the next some way of transporting it needs to be found.

We had hired a 30 seater bus and a driver to take us to Niger. On the Monday morning before the contest we set off on the 380km trip, first making two stops in Ouagadougou to pick up our equipment from Hugo XT2HB, who has been a huge help to the group's

previous XT operations. We soon became used to the regular stops from local and national police, customs etc., where a fee of 1,000 Central African Francs (CFA) was normally handed over. Fortunately this is equivalent to less than 2 USD / Euro so we weren't too worried.



None of the guide books on Niger recommend driving after dark. Unfortunately, due to the extra time it took to pick up all of the equipment, and the slow speed on some of the poorer pot-holed roads, it was getting dark before we'd even reached the Niger border. All we could see surrounding us was the occasional fire from local settlements. Another potential problem was that the border itself might also be closed after dark! We kept our fingers crossed — and fortunately we weren't too late. Although we got some officials out of bed, and almost ran out of fuel, we were very pleased to arrive at our hotel in Niamey safely, sit down and have a nice cold beer.

Fred G4BWP and Roger G3SXW had done a recce trip earlier in the year and found our operating hotel, so we knew what to expect upon arrival. We had booked a series of chalets with flat roofs that look down onto the river Niger, with a great take off along the river to North America and Europe, so we had high hopes of big signals. In the next few days 4 HF monoband Yagis from 10m to 40m were built, and mounted on 20 or 30 foot tower sections on the chalet roofs. For 80m we had a delta loop and a vertical dipole. For 160m we used a loaded vertical antenna. Finally, a K9AY loop was put up, as well as a 400 foot long beverage, and a C4 yagi as a "multiplier" antenna. Sometimes this was not fun at all when the temperatures approached 40 degrees C.

One evening we were invited to visit Jim 5U7JB and his wife for a meal. Jim is the Director of the Peace Corps in Niger, which has several hundred volunteers living in the villages working on many projects. Jim has an excellent antenna farm of mostly wire antennas, with bamboo poles used as supports.

Another day, the Prime Minister of Niger visited the hotel for a meeting. Suddenly the hotel car park was full of police cars and limousines, and there

was red carpet rolled out in the hotel. Fortunately this visit didn't affect us — we just waited from a safe distance (in the bar!)

Inside our shacks, we used 3 TS930s, a K2, an IC756, and a TS850. We had a CT network running, but despite our efforts to locate an Internet Service Provider, no Internet cluster connection this year.

The contest itself went by smoothly. The team were pleased to be ahead of schedule with the number of QSOs made, although our reduced multiplier hunting capability was impacting the zone and country total. Passing of multipliers between bands became very, very important. There were two short power cuts which were frustrating, but things could have been a lot worse.

Being closer to the equator, there are far longer openings on HF — we would man 10, 15 and 20m 24 hours a day. It seemed strange to me as a European to be working people on 10m at 3am local time! The downside is the LF bands, where it's difficult to be heard being so remote, and normally there is a problem of noise.

After the contest, everything was quickly packed away. We are thankful to Jim 5U7JB who was able to arrange some local storage for our equipment. Then it was time for another return journey by bus, and then a little bit of pile-up operating from the hotel in XT whilst waiting for our return flight home.

From the claimed scores we should be in second place in the multi-multi category. Considering this was a 100% field-day style operation, and with a medium sized team, this is a pleasing enough result. Whilst winning would be nice, for the Voodudes it should not be at the expense of having fun on the trip. Next year will see a return to 5U, and then perhaps on to a new country and new adventures.

Lee G0MTN



Simple Radio PTT To Computer Interface Circuits

SSTV, PSK31, RTTY, CW, EchoLink, eQSO etc. by Peter G4KQU

Digital communication modes represent one of the fastest growing areas of interest in amateur radio, with the past decade seeing many developments. Over the past few years data modes like SSTV and PSK31 have become popular.

In digital transmissions such as SSTV, PSK31 or even RTTY, the ability of your own computer and radio to send and receive various digital modes is a real plus.

An interface unit allows one to transmit and receive these modes without the expense of purchasing separate TNC or DSP device. A regular sound card, as found in most of today's computers, can easily handle DSP functions. Conveniently, these interfaces are designed to operate without an external power supply.

There are various circuits to enable you to build your own interface. I have included here some simple designs that I have built and tested, and which work very well considering their simplicity and economy. These circuits will also perform well if you intend to run an Internet gateway using eQSO or EchoLink software. Software for these modes is freely available via the Internet, especially on the links page of www.g4kqu.co.uk!

Other PTT techniques make use of the vox for PTT — but don't forget to disconnect it or the inevitable Microsoft beep or late night mp3 might create a surprise or two. It is best to avoid VOX switching but many new PCs have no RS232 so I think we are soon going to have to find another way to drive our radios.

Digital modes can have a long transmitter duty cycle. Try to keep your output power to 10-20% of the max rated power. Disable all the rig compressors, DSP noise reduction etc.

Isolated Interface

Circuit 1 incorporates two 600-ohm audio transformers (T1&T2) and an RS232 powered optocoupler IC1. Preferably use an IC socket for IC1, for possible quick replacement!

The purpose of the transformers and an optocoupler is to isolate the transceiver from the computer, keeping the interference from the PC to a minimum. Ensure that the screening on the radio and the screening on the PC are not connected together.

Stereo 3.5 mm plugs connect the line in and out on the computer soundcard. Use the tip and earth only as in this application the sleeve is not used.

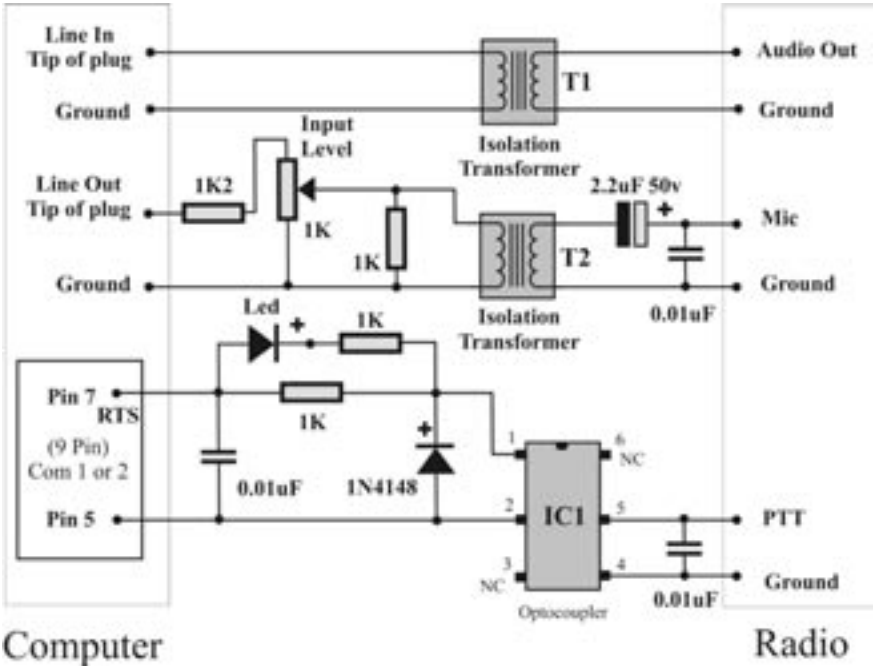
- To control the radio PTT an isolated signal from the computer's RS232 RTS line is used.
- If you have an available DB9 connector on your computer, use RTS, which is Pin 7 and ground, which is Pin 5.
- If you have a DB25 connector on your computer, use RTS, which is Pin 4 and ground, which is pin 7.

VR1 is a 1K linear potentiometer used to control the amount of audio going to the mic and is adjusted for correct audio drive to the radio, usually converting line (0.5v) to mic (10mV) levels. The 1.2k resistor (from the Line Out) can be changed to a greater value if you are troubled by the pot always being at the bottom or top of the range or alternately by adjusting computer's audio out slider till the correct level is achieved.

Operationally, audio levels are adjusted by the computer level controls or are incorporated in the software you will be using.

The LED (high sensitivity type) is used as an indicator when the interface is in the transmit mode.

It is suggested that the finished interface is put in a metal box and that the grounding is taken from the radio side of the circuit.



Circuit 1

Component List

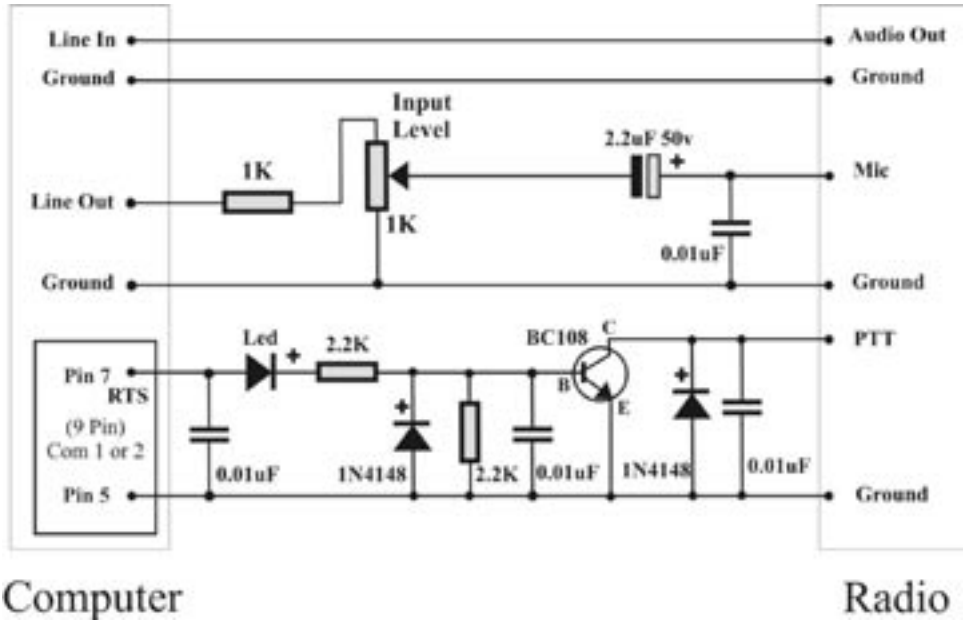
3 x 1k ¼ watt resistors
1 x 1.2k ¼ watt resistors
1 x 1k Potentiometer lin
1 x 2.2µF 50v capacitor
3 x 0.01µF capacitors
2 x 600 ohm transformers
(type 9000 RS Number 208-822)
1 x IC1 optocoupler 4N25
(RS Number 597-289)
1 x Red LED (High sensitivity type)
1 x Diode 1N4148
2 x 3.5mm Stereo plugs
1 x 9 Pin D plug & cover
(Com port 1 or 2)
Screened cable
Project Box

Simple Interface

This circuit is very similar to Circuit 1 except it does not use audio transformers or the optocoupler, but performs splendidly.

In this circuit RTS drives an open collector for the PTT.

You can use any general NPN transistor instead of a BC108.



Circuit 2

Component List

1 x 1k ¼ watt resistors
2 x 2.2k ¼ watt resistors
1 x 1k Potentiometer Lin
1 x 2.2µF 50v capacitor
4 x 0.01µF capacitors
1 x Red LED (High sensitivity type)
2 x Diode 1N4148
2 x 3.5mm Stereo plugs
1 x BC108 Transistor
1 x 9 Pin D plug & cover
(Com port 1 or 2)
Screened cable
Project Box

All the components can be obtained from Mode Components
(www.modecomponents.co.uk)

Links

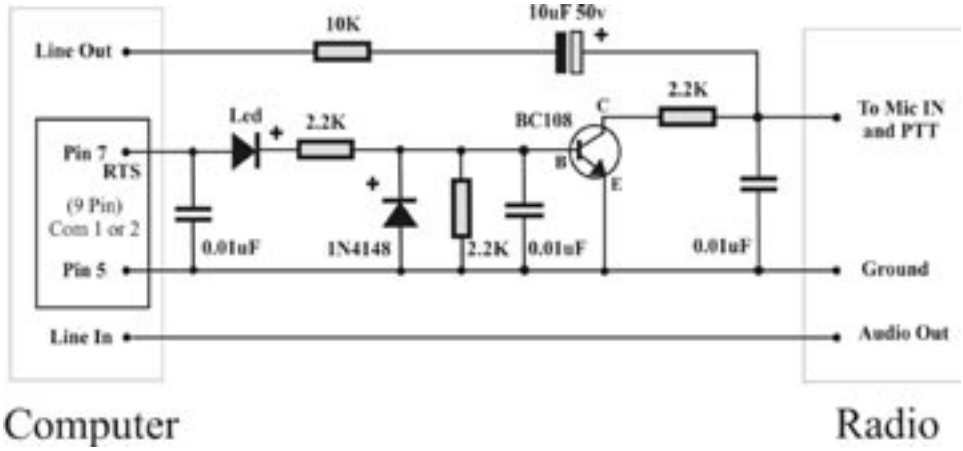
Peter G4KQU	www.g4kqu.co.uk
EchoLink	www.echolink.org
eQSO	www.eqso.org

Simple Interface for Handheld Radios

A handheld's mic and PTT are normally combined, hence circuit 3 was designed and works admirably.

Audio levels can only be adjusted by the computer's level control.

Stereo 3.5 mm plugs connect the line in and out on the computer soundcard. Use the tip and earth only as, in this application, the sleeve is not used.



Circuit 3

Component List

3 x 2.2k ¼ watt resistors
1 x 10k ¼ watt resistor
1 x 10µF 50v capacitor
1 x 2.2µF 50v capacitor
3 x 0.01µF capacitors
1 x Red LED
1 x Diode 1N4148
2 x 3.5mm Stereo plugs
1 x BC108 Transistor
1 x 9 Pin D plug & cover
(Com port 1 or 2)
Screened Cable
Project Box

Glossary

DB9	9 pin connector (Found on computer COM ports)
DSP	Digital Signal Processing
Echo Link	Internet radio linking software
EQSO	Internet conference by radio software
PSK31	Phase Shift Key 31
RTS	Ready to Send
RTTY	Radio Teletype
SSTV	Slow Scan Television
TNC	Terminal Node Controller

Chairman's Report

Well quite a few things have been happening at the club since the publication of the last newsletter which had the AGM report rather than a Chairman's report.

Our Christmas Social on 12th December went off very well. The Horse Race Night proved as popular this year as it did last year. Some 73 members, friends and family attended and we ran 8 races, had our fish and chip supper and ended up making about £180 for club funds. Thank you to everyone who came and a very particular thanks to those who made the evening possible, Anita and Peter for organising the grub, Imogen and Stewart for the setting up the equipment, and running the tote with David ICJ, Lee for the loan of the projector and Martin for the loan of the amplifier. Following problems with the PA last year, Martin's amplifier made all the difference, although Peter DUO felt that I needed a new microphone which he kindly provided. Thanks also to all those who contributed to the raffle prizes — it was very much appreciated. Although the Horse Race night was a big success, perhaps we need to think of something different next Christmas. Suggestions so far are Camel Racing, Casino Night, and Guinea Pig Roulette. Let us have your ideas.

The Christmas Contest turned out to be a rather exciting affair with Mick, who on previous years performance would have been ranked an outsider, and Pete COP fighting it out right to the end. Some 28 members participated which is a record and we had some rare calls being worked. In the end one multiplier made the difference in the score which was 7 points in 1482. Phew! What a surprise. Some of us are still convinced that Mick must have had some silent keys in his multipliers but none-the-less well done to Mick G4VPD for winning this year's contest.

Lee went off to Africa again to participate in the CQ W CW contest with the Voodoo team, this time from Niger. He gave us an excellent account of his adventures one Tuesday evening. It's good to know that we have one of the world's top CW contest operators in our club.

The foxhunt just after Christmas had a slight improvement on participants this year, even though your Chairman and his lovely XYL were prevented from joining in due to car problems that day. Three foxes were hunted, two being declared and the third won by Vaughan and Chris KMQ.

The two AFS contests (2m and 80m) were well supported by members and as a result two teams have been submitted for both contests. We are also participating in the clubs contests that the RSGB have recently announced and at the time of writing we seem to be leading the 2m one.

Financially the club is in good condition with no major equipment expenditure planned at the moment. We will continue with the shack refurbishment now that Christmas is over, and hope to have the radio rooms painted and new floors down by the summer. The trailer, which was damaged by vandals last summer, will be repaired with new running gear lights and we also have plans to refit and paint the club's caravan.

We did the Bring and Buy for MARS at Kings Heath in November but as usual this was only a very modest

money earner. MARS have informed us that they intend to drop the B&B at Drayton this year as the costs of providing the marquee space and tables far outweighs anything the club earn as commission. Given last year's poor results this is an understandable decision.

A number of social events are being considered and planned for this year. One in particular is a visit to the BBC's World Service Transmitting Site at Wooferton which hopefully we will be able to arrange on a Saturday or Sunday at the end of May. We intend to run another Special Event station at the Tolkien event in May and also a Mills on the Air station the weekend before. Other activities such as learning to fly fish, drag racing, quad biking are also being looked into.

The next big event, of course, is the Wythall Rally on March 14th. Please try and give us some of your time to help run this event. All of the activity will take place on the Sunday because we are using a new venue and there will be no marquees to put up or Scout Hut to prepare. We will need to take delivery of the tables on Saturday, but really we need lots of people on Sunday morning to lay out the tables and marshal the traders and visitors. We will run the talk-in from the Park as usual and probably need someone on the gate at the Park to redirect traders and visitors to the new site. Which is Woodrush Sports Centre, Shawhurst Lane, Hollywood, about a ¼ mile away from Silver Street on the other side of Alcester Road.

Well, that's all from me.

73s

Chris G0EYO

Rally Time

Rally time,
And de Hall is now fillin'
Martin's sweating,
But de takings are high
Catering man
Go get yo burgers cooking
Da punters are hungry so it's time to fry.

On a March Sunday Morning
We will all be there helping
You'll climb out of bed
And you'll look to da sky
But 'till dat morning
Start sorting yo stuff out
Get it ready for the bring and Buy.

And when it's over
And de money is counting
We'll all be thinking
Do we smile or sigh
Just how much money
Has de new venue made us
Was da move worth it
Or is it now time to cry?

Darren GW7HOC

Wythall Radio Club 19th Annual Radio and Computer Rally

Sunday 14th March at Woodrush Sports Centre, Shawhurst Lane, Hollywood, Birmingham

- Loads of Radio and Computer Traders
- Massive Bring and Buy
- Refreshments
- All under cover in Sports Halls
- On-site Parking
- Open 10-3pm
- Admission £1.50

Club members — volunteer your time. Please come and support your radio club on this important day and make the move to the new venue a real success.

Details of the rally and traders can be obtained from
Rally Organiser, Martin Moyes, G8VXX,
3, Gedney Close, Solihull Lodge, Solihull, B90 1LJ,
e-mail: wrcrally@legendjsm.net
Tel: 0121 474 2077. 24 hour Answer Phone
Fax 0121 742 3471 (office hours only 9.00am to 6.00pm Week days)

Directions to the rally for visitors.
Approaching from South
M42 junction 3 take A435 towards Birmingham. At the first Island (Becketts farm island) take the 3rd exit which will have signposts to the rally site itself.

Approaching from Birmingham or North
Take the A435 out of Birmingham toward Redditch at the Maypole/ Sainsbury's Island take the 2nd exit. Signposted from there to the rally site.

The M0VRR Self-build Shack Part 2

A trilogy in 19 or so parts

Hi and welcome to part two of this trilogy. There has been quite a lot of progress since part 1. The first of many changes you will note is the name of the trilogy — after many years of good service M1EOQ has been retired. I have a new call sign, M0VRR, which is the call sign that I intended to get when I passed my Morse test. Due to the licensing changes I was able to apply for the new call sign.

Ok actions from part 1 "the site should be cleared" — well this has happened and I would like to thank my wife Sherryn for doing this. She did seem to enjoy ripping the washing machine to bits so it would fit in her car so she could take it to the tip. Thanks Sherryn. Next "the plans drawn up" — well I have a good Idea in my head but I am yet to put this down on paper, so in the great Wythall tradition I will carry this over until the next part J

Most of my time has been taken up with breaking the rules of self build. Yes, I couldn't wait. I had to get back on air with more than 5 watts. I needed a temporary shack. The corner of the conservatory seemed to be the ideal place, next to the opening window for easy feeder access. I unpacked my Icom 706MkIIG and the Auto ATU the Icom AH-3 (this is the one that's not supposed to do 6 meters but mine does). I had had problems with the tuner before I moved so this was a good opportunity to have a good look inside. After getting my tool box out and clearing a space to work I removed the lid. Only to find that where I had soldered the braid on the PL259 plug there was a very bad connection. I have now adopted a method of folding the braid back over the outer insulation of the coax and screwing this into the plug. I have heard that many amateurs don't use this method because its not soldered and will fail. This may well be true but from my experience (and I use this on the car installation) I have not had any problems so far.

With the tuner now repaired I needed to get a small antenna in the air. The half size G5RV was unpacked and uncoiled, great no bad kinks. One end was attached to the top of the pole I use for my 2 meter colinear in the back garden the other end was…Fun. I spent about 3 hours trying to throw a small weight with telephone cable attached over the top of a tree in the front garden. When this was achieved the half size G5RV was pulled up to the top of the tree, see fig 1(not to scale and house not shown).

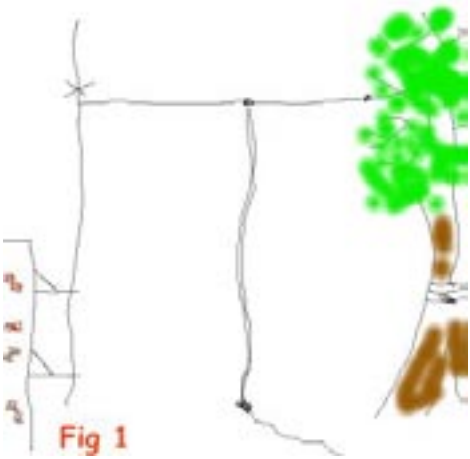


Fig 1

The next issue was that the tuner is designed to feed a long wire. However I needed it to feed out of the shack on coax. So what I did was use the center feed point thingy for a dipole and connected the two outer contacts to the hot and cold outputs of the tuner, I think this would be better if I show you. I'll just get the crayons back out and draw fig 2.

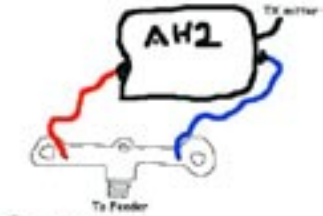


Fig 2

I have now found a mod on the web to do a better job, but my dipole thingy will do fine for a temporary shack.

In the photo you can see the finished temporary M0VRR shack, complete with PSU and power distribution box. Next to this you can see the AH-3 including the "thingy" mod.

Actions for part three – finish actions from part 1 i.e. the plans. Start to cost out materials.



Oh yes I nearly forgot, I have a new email address for your comments or helpful suggestions, wackyshacks@m0vrr.co.uk

So until part three, thanks for your time.

73s

Vaughan M0VRR

Going Mobile

In the previous issue of the newsletter I did promise an account of the hands-free fitting of the FT-8100 in my car.

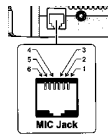
Despite the fact that the new mobile phone legislation does not apply to Amateur Radio, I decided I would not use a radio in the car unless I could make it hands-free and wire it in properly. I also did not wish to damage the car by drilling extra holes in it.

With this in mind I modified the mounting plate of the radio to match existing holes in the car and fixed the radio in the boot. I found a cable duct and ran the separation cable, positive power and speaker extender along

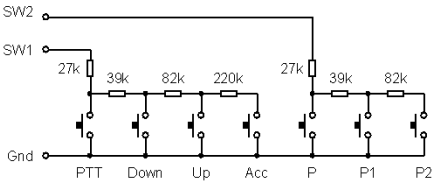


this to the front of the car. The only hole I needed to drill was through the bulkhead into the engine compartment for the power.

I convieniently have a car phone bracket fitted, which provided a mounting point for the remote head (by way of a bent strip of aluminium). The speaker fits neatly behind the head in a hollow in the dashboard.



Pin 1: SW 2
Pin 2: N.C.
Pin 3: + 9 V
Pin 4: GND
Pin 5: Mic
Pin 6: SW 1



The microphone connector on the FT-8100 and a few others is a 6 pin RJ11 wired as shown above. Most functions are controlled by SW1 and SW2 using a resistor chain. A length of flat telephone cable runs from the mic input to a box under the dashboard where the mic and PTT are connected. This box also contains a 1k resistor to provide phantom power to the microphone and a 4k7 for the PTT/Tone burst. The microphone is from a mobile phone car hands-free kit and attaches to the roof panel with velcro.





I bought a spare blanking plate for one of the switches on the dashboard and fitted a small toggle switch. One direction latches for PTT and the other is momentary, with a 360k resistor for the tone burst.

The antenna is currently a 5/8 whip on a magmount in the centre of the roof. The cable runs in the drain channel as far as the hatchback where it does a loop over the rubber seal and down behind the lining to the radio.

This configuration seems to work very well.

Alban G7UGC



Members List

Colin	Baker	G6ZDQ	Ken	Miller	M1DJG
Lawson	Bant	G7DCM	David	Morgan	M3EUN
Roy	Bartlam	G0HDF	Martin	Moyes	G8VXX
Frank	Breedon	G3MZU	Christopher	Pettitt	G0EYO
Reginald	Brown	G7OJO	Dryden	Phillipson	G4ISP
Don	Bryant	G0NES	Mick	Pugh	G4VPD
Les	Champion	M0COK	Vaughan	Ravenscroft	M1EOQ
Tracey	Champion		Anita	Richards	
David	Dawkes	G0ICJ	Peter	Richards	M5DUO
Alban	Fellows	G7UGC	Golsby	Roger	
Mark	Garton	M0CZE	Nigel	Rollason	G4NRR
Peter	Green	G4LWF	Alan	Rowley	G8MYK
Betty	Hawkins		Alan	Sammons	G0HBC
Jack	Hawkins	M3JKZ	Richard	Speak	M1RJS
Marie	Hawkins	G7OKF	David	Stanton	N/A
Simon	Hawkins	G4TVR	Kenneth	Stone	2E1KEG
Ray	Heath		Vic	Trend	M0AEJ
Alf	Hemming	G1MJO	Lee	Volante	G0MTN
David	Hillyer	G0RQO	Carol	Warburton	
Chris	Holmes	G0SAW	Darren	Warburton	GW7HOC
Peter	Homer	G4KQU	Peter	Wesley	M0COP
Steve	Homer	M1KQU	Lew	Williams	
Paul	Huband	2E0PPH	**Overseas Members**		
Andrew	Hughes	G4KOR			
Peter	Jones	G4EQV	Dana	Colbert	
Callum	McCormick	M3MCX	Giorgio	Romanin	IV3-57306
Christopher	Meadows	G6KMQ	Greg	Tuby	PE2GRT

Next issue: Tuesday June 1st 2004
Material to the editor by: Tuesday May 4th 2004