



SURREY RADIO CONTACT CLUB

MARCH 2010 — No: 810

CLUB NET 1.905 MHz Sunday 9:30am
 CLUB NET 145.35 MHz +/- 25kHz Friday 8.00pm

Hon. Sec. Ray Howells G4FFY
 16 Handel Walk
 TONBRIDGE
 Kent TN10 4DG
 01732 357474

CLUB Internet WEB Site: <http://www.g3src.org.uk>

E-Mail: secretary@g3src.org.uk

MONTHLY MEETINGS 1ST AND 3RD MONDAYS 7.30 FOR 7.45pm

Meetings at Trinity School, Shirley Park, Croydon CR9 7AT

"A" MEETING 1st Mar 2010 Spring Surplus Equipment Sale

"B" MEETING 15th Mar 2010 FIX-IT, ADVICE, CHIN-WAG, CLUB STATION + "MOVE-IT-ON"

Chairman & Club Meetings	G4FDN Pat McGuinness	020 8643 0491
Vice-Chairman & Publicity	G4WAY Roger Holyoake	020 8689 7089
Treasurer, Liaison & Equipment	G4DDY Maurice Fagg	020 8669 1480
Secretary, Membership & Communications	G4FFY Ray Howells	01732 357474
VHF Co-ordinator	G8IYS John Simkins	020 8657 0454
Committee Member	G3MCX John Kennedy	020 8688 3322
Committee Member (Co-Opted) - Technical	G4XAT Gareth Evans	020 8462 2837
Recycling	G4DDY Maurice Fagg	020 8669 1480

Dear Members & Friends

Hello and welcome to the March 2010 Newsletter which is being edited Ray G4FFY. Well tax return was done, Kempton Show planning is well under way, and have also been working on the SRCC Web site. Will be adding a member's only area, as well as a discussion board, so kept checking the site

73 Ray G4FFY

This month's meetings:

For the "A" meeting on Monday 1st March 2010 we are holding the regular Spring Surplus Equipment Sale, with the regular "Fix-It" and "Move-It On" Meeting on Monday 15th March 2010

70th ANNUAL GENERAL MEETING

I HEREBY GIVE NOTICE that the Annual General Meeting of the SRCC will be held on Monday 12th April 2010 at Trinity School 7.30 for 7.45pm. Following our usual practice this notice is over a month ahead, but this is to comply with club rules. It allows time if there are any proposed alterations to the rules, or to give you an opportunity to raise any points at the AGM, the committee would like notice of important ones.

We also ask for nominations for committee, with such nominations (and acceptances) to be received by the committee prior to the opening of the AGM.

With the next newsletter I will include the minutes of the last AGM, the full agenda and a nomination slip for proposing members for the new committee and Secretary (nominated separately).

NEXT "A" MTG: Monday 1st Mar 2010 - 7.45pm Spring Surplus Equipment Sale

We hope there will be a good turnout for this **Spring Sale**, when members can bring along items for sale and also items to be donated to the club.

It is very helpful, as in the past, for sellers to be in the meeting room by 7:30pm, and no boxes of "rubbish" please. All members and visitors they have brought along must sign the attendance book and all must be conversant with the rules.

Note that the club accepts no responsibility for goods sold at this private sale, and the purchasers buy on the understanding that they are capable of determining the usability, fitness for purpose and SAFETY of goods obtained. The following also applies:

1. Only SRCC members are permitted to sell.
2. All items not donated must be marked with the name or Call-sign of vendor, brief description and details of any reserve price.
3. Bids to start at 50p and should be in steps of 10p up to £1 and 25p thereafter (may be revised on the night)
4. Visitors are welcome but must be introduced by a member who is responsible for informing them of the rules.
5. All members and VISITORS must sign the attendance book.
6. Sellers will not be paid until all buyers have settled up.
7. The club levies 15% on all transactions.
8. Please try and arrive early to allow start by 7.45pm
9. **PLEASE KEEP THE DOORWAY CLEAR FOR FIRE PRECAUTIONS.**
10. The school premises are NO-SMOKING - thank you for adhering to this.

Chairman's Blog - March 2010



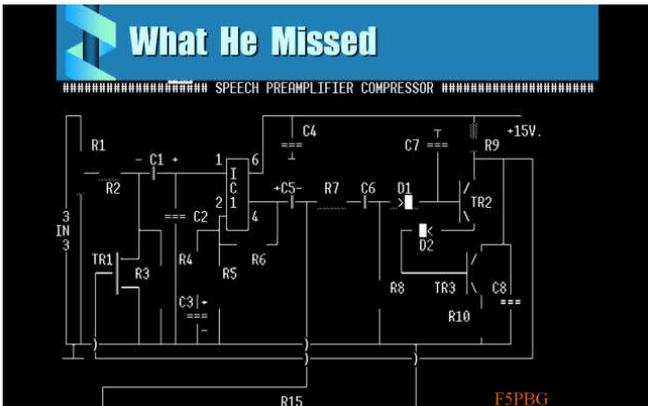
My apologies that I didn't make it to the last 'B' meeting on the 15th February, but this co-incided with an extended family jaunt to Germany via EuroTunnel, and then driving up through France, Belgium and Holland and then into the Ruhrgebiet before our destination of the little village of Boekenforde, that is located in between

the larger cities of Paderborn and Muenster, where we have friends. Snow awaited us in Germany, in fact a snowstorm, which rendered the driving conditions to a treacherous state, but luckily we made it safely to our destination and back home again.

Last 'A' Meeting: This was a well attended presentation and talk on Packet Radio by John G8MNY.



The talk, while covering the general aspects of packet radio and the equipment needed to access, gave emphasis to why 8-bit ASCII graphics are much more suitable and efficient as a way of carrying circuit diagrams over packet networks compared to PDFs, GIFs or JPEGs. Using 8-bit ASCII a circuit diagram might only take up 1 or 2k bytes but easily 100k in PDF or more in GIF in JPEG. An example of such a diagram is shown below:



John is a prolific author of many technical bulletins over a wide range of topics, that use 8-bit ASCII graphics, and these are accessible over packet and also via an internet mirror at:

<http://skywaves.demon.co.uk/technical/>

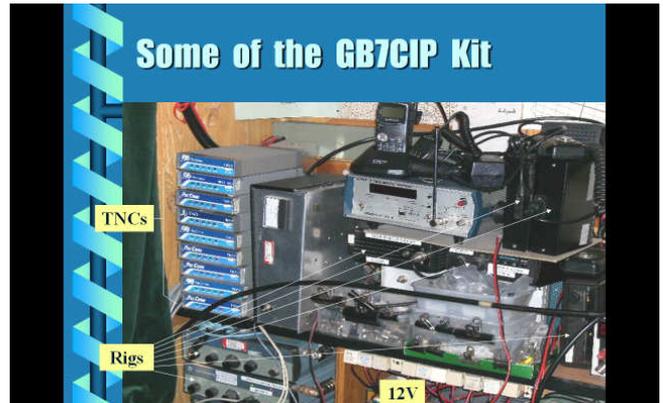
John reminded us of the local packet nodes GB7CP and GB7CIP which between them support a wide variety of access ports from 40m to 70cm, and as a reminder these are reproduced in the slide below.

Local Packet Nodes & BBS GB7CIP via GB7CP
Both Nodes at Caterham on the hill
 See www.theskywaves.net

24/7 HF Pactor 7.0515 14.096 14.110 50.650V 70.3125V 432.625H(9k6) 432.625V 433.625V(9k6) 433.675V 439.825H(9k6) Internet link	GB7CIP (CATA) NODE + CONV, BBS, & TELNET Apps. sysop Paul G4APL	439.675 + 430.475 H(19k2) Inter- Node Duplex Link	GB7CP (CATB) NODE CIPBBS CRCHAT CRNODE sysop Bryan G0SYR	50.670H (144.800 APRS) 144.8875V 432.625V(9k6)
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Caterham Radio Group nodes have RF links to other nodes ⁷

Notice the stack of 9 Pacomm TNC's on the left hand side!



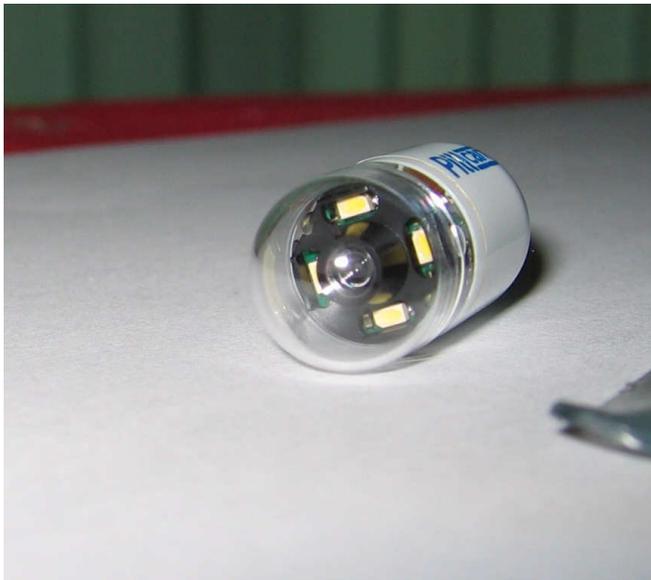
All in all a very informative and well presented talk and the club are very grateful to John for arranging this at short notice.

Miniature TV camera with LED lighting: Given the recent talks on ATV and LED lighting this may be of interest. I recently had a medical test which involved swallowing a TV camera and transmitter in a capsule so my digestive system could be checked out.



PillCam 11mm x 26mm

The body of the pill hosts the following components: an optical dome, a lens holder, a short focal length lens, LEDs, CMOS (Complementary Metal Oxide Semiconductor) image sensor, silver oxide batteries, and a ASIC radio-frequency transmitter. The PillCam was made by an Israeli company called Given Imaging, Ltd, of Yoqneam. The transmitter was thought to be on 860MHz and I wore for 8 hours a small receiver and data recorder. During that time the camera took 2 pictures a second – a total of 57600 pictures. In the picture below the white LEDs surrounding the camera lens can clearly be seen.



PillCam showing lens & LEDs

I'm told that the US military have TV cameras and transmitters smaller than this, but this is the smallest that I have personally come across.

2M FM Net Friday evenings at 8pm on 145.35MHz (+ or – 25kHz if busy or QRM): The participation in this has been up and down. On the 5th February we had 7 stations participating including G8MNY/M, G3ENG, G6JXA, G4DAC, G4STD, G3GHI, and myself. The following week G7PWV was also on, but on the 19th February there were no responses to my CQ SRCC call. We will keep this going for a few more weeks to determine whether there is a consistent level of support.

Project for Construction Evening: A show of hands was taken for this at the last 'A' meeting with a small majority being in favour of the LED table/inspection lamp proposed by Gareth G4XAT. Accordingly, Gareth will have some more details on this in a forthcoming newsletter.

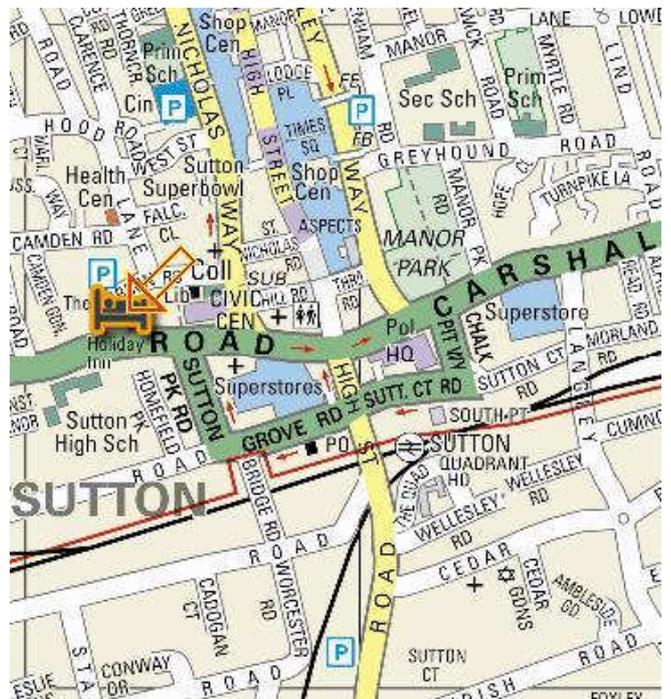
75th Anniversary Lunch: As most members will know by now this will be held on the afternoon of Sunday 10th October 2010 (10/10/10 – an easy date to remember) at the Holiday Inn Hotel, Sutton, between the Civic and Secombe Centres, and a short walk from Sutton railway station.

As some people have expressed concerns about travelling to Sutton we are reproducing below a map showing the Holiday Inn's location with respect to Sutton railway station – literally a short walk of a few hundred yards.

Sutton has direct trains to Horsham, Guildford, Epsom, Central London and West Croydon and direct bus services to many areas: 820 or 420 Redhill, Reigate, Kingswood, Tadworth, Banstead; 470 Epsom, Ewell, Merton, Colliers Wood; 407 Caterham, Whyteleafe, Kenley, Purley, Croydon, Waddon, Beddington; 213 Kingston, Norbiton, New Malden, Motspur Park, Worcester Park, North Cheam; X26 Heathrow Airport, Hatton Cross, Teddington; plus several services going towards London via Morden and Wimbledon (164), Mitcham and Tooting (280), etc.

{Editor's Note: This TFL Bus map may be of use: <http://www.tfl.gov.uk/tfl/gettingaround/maps/buses/pdf/sutton-2248.pdf> and this Travel Card Map: http://www.tfl.gov.uk/assets/downloads/lon_con.pdf }

The committee requests any member who would like to attend this important event, but has travel constraints, to contact John G3MCX.



The hotel also has free designated disabled parking for those attending. The time of the event and its location has been particularly chosen to facilitate participation by 'country members'.

Request for old photographs of club interest: For the 75th anniversary can I request members to dig out old photos of club interest that can be included in the commemorative newsletter and displays? These will be carefully copied and then returned to owners, so please start looking!

Operating: John G3BFP, as usual, has been busy on the bands with the recent ARRL contest giving plenty of opportunity to work stateside. 15m was his band of choice, working KT3Y, KM1W, K3CR, AA1K, K1KI, W2FU, N1LN, N3RI, K4TD, K1RX, W1WEF, KZ5D, VX3AT, K1TTT, N1UR, W3LPL, W1EQ, VE3TA, N8AA, KC2TA, ND9E, K1RM, W4NZ, K2AX, N7BV, N5PO, K0EX, K0HA, & NN3W, -all worked in a 2½ hour session.

Next 'A' Meeting: This will, as usual be the Spring Surplus Equipment Sale. Members should understand that the proceeds from this and similar events are, apart from membership subscriptions, the main source of club revenue. The committee therefore requests all members to support this event by bringing along items for sale or donation to the club and purchasing items put up for sale. A good analogy would be a church cake sale where one not only donates cakes but buys those others have brought along. So please dig out those bits of gear or components that you haven't used and bring them along!

I'm looking forward to seeing you all next Monday 1st March.

Pat G4FDN

22nd Feb 2010

THE CALENDAR SECTION

SRCC and Local Club Meeting Dates:

1st Mar	Spring Surplus Equipment Sale
4 th Mar	Sutton & Cheam RS – 'Natter Night' @ Vice Presidents Lounge, Sutton United Football Club, Gander Green Lane, Sutton –8pm. Sec: John GOBWW 020-8644 9945 www.scrs.org.uk
5 th Mar	Crystal Palace: A History of Power Supplies Part II @ All Saints Church Parish Rooms, Beulah Hill from 7:30pm. Bob G3OOU 01737 552170 (Meet normally monthly on 1 st Friday) http://www.g3oou.co.uk/
8 th Mar	CATS: Film and Video Evening – Meetings normally held @ St. Swithun's Church Hall, Grovelands Rd, Purley 8pm 2 nd Monday's. Contact Andy Jackson G8JAC on 020-8651 2727 g8jac@btinternet.com
12 th Mar	W&DARS: On Air (Digimodes) @ Martin Way Methodist Church, Buckleigh Avenue, MERTON PARK SW20 9JZ – 7.30 for 8pm 2 nd & last Friday's Details: Jim M0CON on 020-8874 7456 http://www.gx3wim.org.uk/
15th Mar	Fix-It, Advice, Chin-Wag, Move-It-On
16 th Mar	Bromley & District – Meeting Programme Planning. Meetings normally on 3rd Tuesday's @ Victory Social Club, Kechill Gardens, Hayes – 7.30 for 8. Paul M3PGW bdars@greenwand.net or www.bdars.org.uk
18 th Mar	Reigate Amateur Transmitting Society – Main meeting 3 rd Thursday's at RNIB, Redhill College, Philanthropic Road, Redhill 7.30pm. www.qsl.net/rats or rats@qsl.net
18 th Mar	Sutton & Cheam RS – Operating Digital Modes on HF with Evan Duffield - MØTJU (This meeting in the upstairs room) @ Vice Presidents Lounge, Sutton United Football Club, Gander Green Lane, Sutton – 7.30 for 8pm. Sec: John GOBWW 020-8644 9945 www.scrs.org.uk
23 rd Mar	Dorking & District Radio Society How many radials? - Understanding the quarter wave vertical - Garth Swanson G3NPC. Meetings normally @ Friends Meeting House, Butterhill South Street, Dorking – opp. Spotted Dog. Details: David Smith M0SXD on 07808 579501, http://www.ddrs.org.uk or ddrs.secretary@yahoo.co.uk
26 th Mar	W&DARS: Commercial Satellite Communications with Peter Beardow G1SHV @ Martin Way Methodist Church, Buckleigh Avenue, MERTON PARK SW20 9JZ – 7.30 for 8pm 2 nd & last Friday's Details: Jim M0CON on 020-8874 7456 http://www.gx3wim.org.uk/
12th Apr	AGM
10th May	Project Constructing Project Evening
7th Jun	Construction Contest
5th Jul	Summer BBQ

SRCC Meetings indicated in BOLD at venue of Trinity School

Rally Calendar, etc:

7 th Mar	Cambridge and District ARC Rally Wood Green Animal Shelter, King's Bush Farm, A1198 London Road, Godmanchester, Cambs PE29 2NH. Contact David, M0GUM, 01954 203080 Web: www.cdarc.co.uk e-mail: rally2010@cdarc.co.uk
7 Mar	Bournemouth RS 21st Annual Sale Kinson Community Centre, Pelhams Pk, Millhams Rd, Kinson, Bournemouth, BH10 7LH. Open 09:30. Free parking, trade stands, catering, disabled facilities. Contact John GOHAT 07719 700 771. http://brswebsite.org.uk/

18 th Apr	Spring West London Radio & Electronics Show at Kempton Park – www.radiofairs.co.uk – Lecture stream – Opens 10am - £4
23 rd May	Dunstable Downs RC National Amateur Radio Car Boot Sale. Stockwood Park, Luton, M1 J10 Open 09:00. Talk in on S22 www.ddrcbootsale.org
25 th -27 th Jun	Hamtronic Show, Friedrichshafen Messe Friedrichshafen, Germany http://www.hamradio-friedrichshafen.de/ham-en/index.php
Rally List	http://www.rsgb.org/events/index.php

Web-Site of the Month

From Charles MOBIN this month take a look at:

International QRP Club:

<http://www.qrparci.org/>

G3SEK's List of Component Suppliers:

<http://www.ifwtech.co.uk/g3sek/in-prac/components.htm>

HF Radio in Aviation Ruthann O'Connor EI8JY



Pat has sent me this contribution which should have been published last November as Part 2 of Ruthann's series on HF aeronautical radio, but he mistakenly sent in Part 3, and then part 4 for December. This Part covers the period up to the end of WW2.

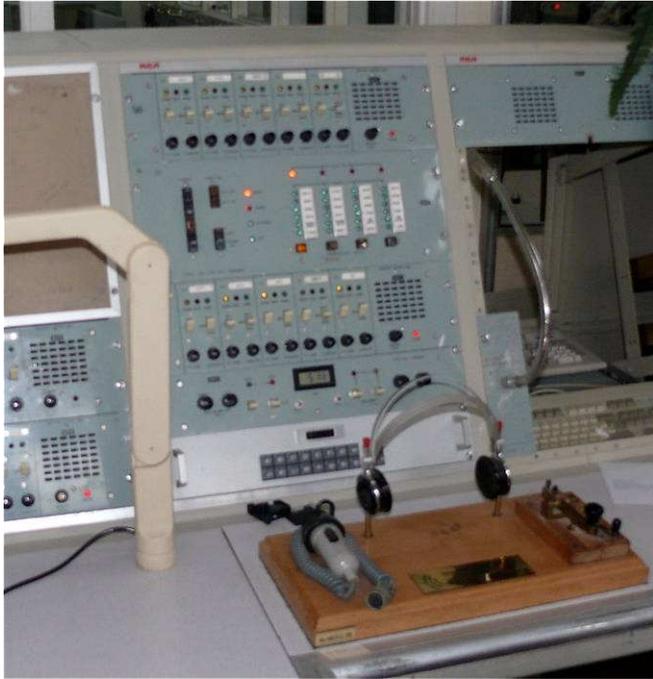
"The first receiving equipment at Shannon Aeradio consisted of two Marconi RG34 shortwave receivers, and a DFG10 medium-wave direction finder.

A Marconi DFG12 shortwave direction-finding receiver was later established, with four 30 foot masts erected north, south, east and west of a direction finding hut.

All aeronautical communications were originally conducted through CW, with Ballygirreen's callsign designated as 'EIP'. The first experimental CW messages were tapped out on the 28th of October 1936 to Valentia Radio (callsign EJK), the marine station off the Kerry coast. On this occasion, the EIP radio operator was stationed in a different hut to the receiving equipment and was unable to monitor the frequency. He was ordered to give a good, long call on full power, but unknown to him, EJK were less than interested in having a QSO. As soon as EIP finished sending, EJK replied with "QRT DISTRESS" but only those in the EIP receiving hut were able to hear this message; Valentia were trying to work a ship emergency.

In the following months, 'EIP' began communicating with aircraft conducting test flights up and down the west coast of Ireland. The flights were being conducted to test the radio direction finding stations at both Foynes and Ballygirreen, and their ability to communicate with Ballygirreen.

The tests continued with daily contact being established between the Irish stations, and Botwood in Newfoundland. Occasional contact was also made with Port Washington, USA.



Operating position with headset and Morse key

The first Transatlantic survey flights were carried out on the 3rd of July 1937; coincidentally this was the same day that the US Coast Guard was searching for a missing Amelia Earhart and her crew.

In March of 1938, construction of a transmitter site began at Ulanmore, three miles from Ballygirreen. Ballygirreen would then house the radio officers, and be used as the receiver site.

A Canadian Marconi Company HF Transmitter with 3KW output, and six spot frequencies, was installed at Ulanmore. A cable was run along the roadside from Ulanmore to Ballygirreen, allowing the transmitter to be selected by remote control at Ballygirreen. There was a full-time watchman positioned at the transmitter in case of possible faults, and a receiving hut set up at the transmitter site in case of failure of the remote control cable from Ballygirreen.

The test flights at Foynes continued through 1938 and 1939, as the communication and navigational equipment was further evaluated. Aircraft were successfully maintaining radio contact with Ballygirreen and Botwood from overhead Foynes.

The test flights concluded in 1939 and a scheduled Transatlantic flight service was established, and this service would continue through the war. That same year, the communications system received a boost with the introduction of teletype equipment connected by the landline. This increased the speed of point-to-point communications. The ground-to-air communications would continue to be conducted through CW for many years to come, but it would no longer be used when the radio station communicated with other ground control centres. Messages were now typed on the teletype machine, sent to the appropriate destination as directed and the message would be typed out automatically at the other end.

In 1944, the shortwave transmitter was mainly being used for long distance point-to-point communications with terminal airports at Botwood, New York and Bermuda. The traffic comprised of weather reports, navigation directions and operating companies messages.

Strict security was necessary during the war, and all CW communications were conducted through a coded language, with the exception of transmissions with landing and departing aircraft, where plain language CW or speech were permitted. Security also required an armed man carrying a revolver to be on duty 24/7 at Ballygirreen, and from midnight to 8 a.m. two men carried out a 13 mile patrol of the surrounding area by car. The Ulanmore facility required constant military protection as this was the backup station should Ballygirreen go out of commission.

The medium wave transmitter was mainly used for meteorological information and communications with aircraft arriving and departing at Foynes and Rineanna."

SIGNING OFF:

That's it for this month, apologies if I have missed anything while compiling this newsletter. Our main meeting on Monday 1st March is the Spring Surplus Equipment Sale and we look forward to seeing you all then, with the "B" meeting on Monday 16th March. Don't forget we now start at 7:45pm and for the Sale can sellers be at Trinity School by 7:30pm.

Many thanks for the Newsletter contribution from Pat G4FDN – more always welcomed.

Ray G4FFY

73 and 88

Posted: 25th Feb 2010