



# Chelmsford Amateur Radio Society

Established 1936

Affiliated to the RSGB Club Call Sign: G0MWT  
President: Carl Thomson, G3PEM Chairman: John Bowen G8DET  
Treasurer: Brian Thwaites G3CVI Vice Chairman Martyn Medcalf G1EFL



Newsletter No 551

Web Address: [www.g0mwt.org.uk](http://www.g0mwt.org.uk)

February 2012

This Month's Meeting – Tuesday, 7<sup>th</sup> February, 7.30pm at the Marconi Club

## “Amateur Radio Self Build Kits”

By Mark Sanderson, M0IEO

How many of you realise that we are only six meetings away from the *CARS Constructors Competition for 2012*, time does fly and it seems the older I get, the faster it seems to go! With that in mind, this month we are going to have a look at some of the commercial kits that are available for Radio Amateurs to build.

I know many of you will be scratch builders when it comes to radio, preferring to specify and source your own designs for radio kit, but for those who are just starting out in building radios or who feel that more practice is needed with the soldering iron, we will be having a look at the likes of *Softrock*, *Bitex* and some of the other kits you can buy quite cheaply and construct yourself.

Don't forget, you only have six months left in which to construct something and enter the CARS Constructors Competition, so why not make Carl G3PEM's day and have a go, you never know, you may just win!

CARS will have its Famous Raffle run by Peter Graves, G0KSJ. Please purchase a Raffle Ticket (or two!) - You may win a prize.

### Dates for your Diary

Sun 5th February 2012	Canvey Rally at The Paddocks, Canvey Island. CARS, ERG & RSGB have Tables.
Tues 14, 21 & 28 <sup>th</sup> Feb	CARS Net Nights starting at 8.30pm local.
Wed 15 <sup>th</sup> February	Committee Meeting, Danbury Village Hall, 7.30pm. All welcome.
Thursday 16 <sup>th</sup> February	CARS Foundation Course Examination.
Tuesday 6 <sup>th</sup> March	CARS Meeting – Antenna Testing by Andy Tyler, G1GKN
Saturday 14 <sup>th</sup> April	CARS Operating from Oaklands Museum for the RMS Titanic Centenary Event
Saturday 21 <sup>st</sup> April	CARS Operating from Sandford Mill for International Marconi Day (IMD)
Sat 12 <sup>th</sup> & Sun 13 <sup>th</sup> May	CARS operating GB5SM from Stock Windmill – Mills On The Air weekend.

To be/remain a Member of CARS, send a Cheque for £12 – Adult Membership (16s and under are FREE) to:- Mr Brian Thwaites, 118 Baddow Hall Crescent, Great Baddow, CHELMSFORD, CM2 7BU. If you would like a receipt, please enclose a stamped addressed envelope with a 2<sup>nd</sup> class stamp. May we remind you that if you have NOT paid your Subscription for this year you may be deemed to NOT be a Member of CARS and NOT entitled to a Newsletter etc.

Thanks to Geoff, G7KLV for sending the postal Newsletters – could it go by E-Mail? Please inform Geoff, G7KLV by E-Mail of any changes to your callsign, postal or E-Mail address, etc. E-Mail him on [g7klv@g0mwt.org.uk](mailto:g7klv@g0mwt.org.uk) Only by YOU sending Geoff your E-Mail address, can we ensure WE get it right!

Club Nets: Tuesdays 8.30pm: (2nd) GB3DA: (3rd) GB3ER: (4th) 1.947/50: (5th) 28.375. All MHz +/- QRM.  
**Net Controller for February – Geoff, G3EDM. Thanks to John and Colin for January.**

## Last Month's Meeting:-

### “What is NOT covered on the Foundation Course” by CARS Members.

Chairman John opened the Meeting with the usual announcements and then CARL explained his *80 Metre Activity Event* on 14<sup>th</sup> and 21<sup>st</sup> January. The Rules had been circulated with the January Newsletter and more were available tonight. Mark, M0IEO was then introduced who explained that the idea that evening was called 'What is NOT covered on the Foundation Course'. It was aimed at the many newly licensed amateurs, who want to find out more about the hobby, as well as those licenced some time ago but who have not operated for a while.

The meeting attracted many new faces and was a practical, educational and fun evening that provided the opportunity to ask questions, try something new and get some friendly advice.

The first talk, “*Foundation to Full Licence*”, was from Pete Sipple, M0PSX, who gave the audience a brief overview of his 14 month journey starting as a newcomer to hobby in late 2010, as he progressed through the three licence stages with the help of the CARS Training Team. Pete then discussed a number of modes that he has been using, starting off with a demonstration of the PSK31 data mode, and the weak signal propagation reporting software WSPR.

This was followed by a summary of Pete's experiences of receiving audio, text and images from the *ARISSat-1* amateur radio satellite, complete with an audio recording and SSTV images received from space, plus a QSL card confirming reception of the satellite's signals. Sadly ARISSat-1 has now re-entered the atmosphere, and can be heard no more. Pete finished with a brief demonstration of the *AMSAT-UK FUNcube Dongle Software Defined Radio*, which offers access to the spectrum from 64MHz to 1.7GHz.

Mark Sanderson, M0IEO, then gave an overview of some of the essential tools of amateur radio, notably dummy loads (including the use an incandescent 40 Watt light bulb), low-pass filters, and ATUs. As well as explaining the "dos and don'ts" of how to set up a station correctly. Mark explained the benefits of correct filtering, and some common 'gotchas', such as ensuring that you remember to modulate when tuning your antenna on SSB.



Peter Bridgeman, G3SUY with his RF-lit tube from his Home-Built Mobile Aerial.

Later in the evening, attendees were able to watch and take part in various demonstrations. Brian Thwaites, G3CVI, set up a station to illustrate the use of an artificial ground and the use of counterpoises with well-insulated remote ends where high voltages can exist. John Bowen, G8DET, tuned a 2M magnetic mount antenna with an *MFJ259 Aerial Analyser*, while Carl Thomson, G3PEM, explained how to build a dummy load. The most eye-catching practical session was an impressive 'light sabre' demonstration using RF and a fluorescent tube, given by Peter Bridgeman, G3SUY, together with a display showing the current distribution on a long wire antenna. The ever popular Raffle, organised by Peter Graves, G0KSJ, featured a wide selection of prizes which was drawn by Luke Halsey, M6LNT.

During a Question and Answer session Brian, G3CVI made the following point: “*LPFs are coax-in and coax-out hence they cannot be connected last of all units feeding to a single ended aerial or an open wire or ladder line feeder as it is sometimes called. If the last unit is an ASTU with built-in SWR meter its output can be coaxial and a LPF could be inserted at that point. Diodes in the SWR circuit can cause Spurii.*”

Thanks to all who contributed to such a good evening”.

**Peter Sipple, M0PSX** – copy assisted by Trevor, M5AKA and Brian, G3CVI.

## To All CARS Members

I have been trying to update my list of CARS Members and anyone who has ever had a go at doing something like this will know it is a difficult job. PLEASE, if you do not, or you know someone who does not get a Newsletter or gets TWO, – please tell Geoff or at least someone connected with CARS. Some Members like to receive the Newsletter by E-Mail only while others like to receive the occasional CARS E-Mail about wireless items etc from time to time. Please tell me if you would like to receive more information, or you would like just the Newsletter once per Month.

By the same token if you have not paid for a couple of years, please do not expect to receive a Newsletter !! £12 is all it takes to join/continue your CARS Membership – details are on Page One and the CARS Web Site.

Everyone is encouraged to look at the CARS Web Site. It does contain a lot of information including tremendous slides on all the Courses CARS run – these are so good they are used by many Clubs, and Countries, yes Countries throughout the World. They are NOT however allowed to copy them onto their Web Sites. Thanks for belonging to CARS and reading my plaintiff cry.

**John G8DET Chairman.** E-Mail me at: - [g8det@g0mwt.org.uk](mailto:g8det@g0mwt.org.uk)

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## This Month's Radio Sport (Contests) - All in BST (Local times)

<b>05 February</b> – 432MHz AFS – 09:00 to 13:00 UTC	<b>06 February</b> – RSGB Club – SSB – 20:00 to 21:30 UTC
<b>11/12 February</b> – CQ WW WPX – RTTY – 48 hours	<b>15 February</b> – RSGB Club – Data – 20:00 to 21:30 UTC
<b>18/19 February</b> – ARRL DX CW – 48 hours	<b>23 February</b> – RSGB Club – CW – 20:00 to 21:30 UTC
<b>25/26 February</b> – CQ WW 160m SSB – 48 hours	

For further information please email Steve G4ZUL [contests2012@g0mwt.org.uk](mailto:contests2012@g0mwt.org.uk)

**Steve, G4ZUL**

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## CARS Propagation Forecast for this Month.

<b>Asia: Dhahran</b>	around 16:00 on 24.9 MHz for 97 percent of days, with fair signals.
<b>Oceania: Marshall Isles</b>	around 22:00 on 10.1 MHz for 90 percent of days, with poor signals.
<b>Africa: Johannesburg</b>	around 22:00 on 10.1 MHz for 90 percent of days, with fair signals.
<b>S. America: Lima</b>	around 08:00 on 10.1 MHz for 80 percent of days, with poor signals.
<b>N. America: Saskatoon</b>	around 08:00 on 10.1 MHz for 79 percent of days, with poor signals.

Reports are reaching CARS that some Bands are going great guns at the moment.

**Gwyn, G4FKH**

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## CARS Training in 2012

CARS started the New Year with a full Foundation Course that is running until 16th February. This Foundation course is CARS 25th (yes a Silver Jubilee) and also marks 10 years since we began!

CARS next Intermediate Course is due to begin on the 8 or 15 of March (TBC). Following a summer break another Foundation course is scheduled to begin on 30th August for six weeks

More information at: <http://www.g0mwt.org.uk/training/> which also has the dates for all courses in 2012. Please register your interest with Clive G1EUC.

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## QRP to the ISS

Read the article at: [http://www.work-sat.com/Work-Sat/Sat\\_Skeds\\_files/QRP-ISS\\_2.pdf](http://www.work-sat.com/Work-Sat/Sat_Skeds_files/QRP-ISS_2.pdf)  
See a Video at: - <http://www.youtube.com/watch?v=HdS3EqRooN8>

**Trevor M5AKA**

## **President Jottings – February.**

I am composing this note just after our second activity hour on 80m, the Band did not have very good propagation for that hour. It made for a disappointing hour with only four qso's in the log, but that's the vagaries of HF and should keep the communicators discussing why it should be! Band conditions and the related propagation issues are such a fascinating topic that they always keeps interested Amateur's wondering about the theory. For those that took part can I have the logs by the March Meeting.

Last month the topic was "*What the Foundation Licence did NOT tell you*" and our thanks to all that contributed to make the evening so enjoyable.

### **Carl, G3PEM. President**

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#### **CARS - Net Controllers for 2012 (As they say somewhere – For the Third Time of Asking....)**

Patrick, M0XAP was Net Controller for December, with Colin, G0TRM Controller for January, (with help from John, G8DET). Geoff, G3EDM is listed for February and August, and Colin again for July with Patrick in June. Mark has kindly said he will be a Relief Net Controller for VHF and UHF but lives too far from some Members to manage HF.

#### **Colin, G0TRM**

Offers to control the other Months would be welcome. Come on, please – put something back into YOUR Society. Just try doing ONE week. You can contact The Editor or any Committee Member.

#### **John, G8DET**

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#### **Nick has another Special Offer**

Nick has contacted The Editor with a Special Offer regarding Power in the Shack and Home. If you are interested please contact his Web site or him directly.

The site is <http://www.ixcg.com/shop> or E-Mail [nbown@ixcg.com](mailto:nbown@ixcg.com).

**Nick Bown, M6BWN**, Managing Director IXCG Limited. Tel: 020 3051 1787

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#### **27<sup>th</sup> Canvey Rally - Sunday 5<sup>th</sup> Feb 2012**

CARS and ERG are pleased to support SEARS and to be invited to attend the 2012 Canvey Island Rally on Sunday, 5<sup>th</sup> February at: The Paddocks, Long Road, Canvey Island, SS8 0JA. Open at 10.30am.

Don't forget that ALL roads on Canvey are 30mph.

Patrick is co-ordinating items from CARS to be sold there. Contact him on: [xaps@aol.com](mailto:xaps@aol.com)

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#### **RSGB and Ofcom - Special Callsigns for Radio Amateurs and Clubs during 2012**

For the Queen's Diamond Jubilee, all UK amateur stations will have the option of applying for a variation to their licence if they wish, to use a special prefix for a five week period. This will add or substitute the letter "Q" in the place of the Regional identifier in the Callsign. Period: 00.00 BST 5th May 2012 to 23.59 BST 10th June 2012.

For the period of the Olympic Games and Paralympic Games, a similar facility will exist for a seven week period, using the letter "O". Period: 00.00 BST 21st July 2012 to 23.59 BST 9th September 2012. There is expected to be quite a range of Special Event Stations as well.

Read the full details at

<http://www.rsgb.org/news/articlelinks.php?id=0263>

#### **Trevor M5AKA**

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## RadCom - New Band Plans show Substantial Changes

The latest edition of RadCom features the 2012 RSGB Band Plans and a background article on the substantial changes that have occurred. This information is now also available to all Radio Amateurs online at [www.rsgb.org/operating/bandplans](http://www.rsgb.org/operating/bandplans)

In particular, please note that there have been major changes in the 40m, 10m, 6m, 4m and 23cm bands, so please ensure that any older editions are discarded.

**Murray, G6JYB**

### CARS Merchandising for 2012

CARS Merchandising Manager, Martyn Medcalf, G1EFL has put together a coloured brochure for the available clothing, cap and mug available for 2012.

Light and Dark Blue are the options generally available but only Dark Blue in the Fleece, Cap, Lapel Badge, Car Sticker and Mug.

Note that half sizes are available in the Short and Long Sleeved Shirts.

See the display to the right.

Please note that once ordered, the items unfortunately are made to order and therefore not generally returnable if they do not fit – make sure not to order an incorrect size.

Martyn does not generally keep any stock of clothing – always worth asking in case two persons ordered a too big and a too small item and could swap!

You can contact Martyn on **01245 469008**  
E-Mail [m3vammartyn@supanet.com](mailto:m3vammartyn@supanet.com)

Mr Martyn Medcalf, G1EFL  
47 Paddock Drive, Springfield  
CHELMSFORD, CM1 6UX

**CARS MERCHANDISE**

**EASY CARE SHORT SLEEVE SHIRT**  
COLLAR SIZES 14.5 TO 19.5  
£20

**POPLIN LONG SLEEVE SHIRT**  
COLLAR SIZES 14.5 TO 19.5  
£18

**POLAR FLEECE FULL ZIP**  
S - XXL £19

**SWEATSHIRTS**  
XS 34" S 36" £15  
M 38"-40" L 42"-44" £16  
XL 46" XXL 48" 3XL 50" £18

**T SHIRTS**  
S 38" M 40" L 42" £10  
XL 46" XL 48" £10

**POLO SHIRTS**  
34" 36" 38" 40" £15  
42" 44" £16  
46" 48" 50" £17  
52" 54" £21

**LAPEL BADGE**  
£2

**MUGS**  
£5

**BASEBALL CAPS**  
£5

**CAR STICKERS**  
£2

**Order Form** – See CARS Web Site for a Down Loadable Form Martyn will arrange with you to pick up the items.

Item Name	Qty	Size	Colour	Cost Each	Total Cost
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Name Address	Call Sign	Telephone (With STD Code)
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**Please make the Cheque payable to:** - "C.A.R.S." The Dots are important between the letters.  
Sent a copy filled out accordingly to Martyn, Address above. Enclose a SAE for conformation of your order.

### And Finally:-

John G8DET edited this edition. Material by Trevor M5AKA; Steve G4ZUL; Gwyn G4FKH; Murray G6JYB; Nick, M6BWN; Martyn, G1EFL with Val; Pete, M0PSX and Carl G3PEM.

Closing date for the next Newsletter – Friday 17<sup>th</sup> February 2012.