THE SIX AND TEN REPORT

September 2005

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Analysis of 28 MHz reports from the UK

28 MHz reports and logs for September 2005 from G2AHU, G3HBR, G3IMW, G3USF, G3YBT, G4JCC, G4TMV, G4UPS, G0AEV, G0IHF and packet cluster reports. Compilation and commentary by G0AEV.

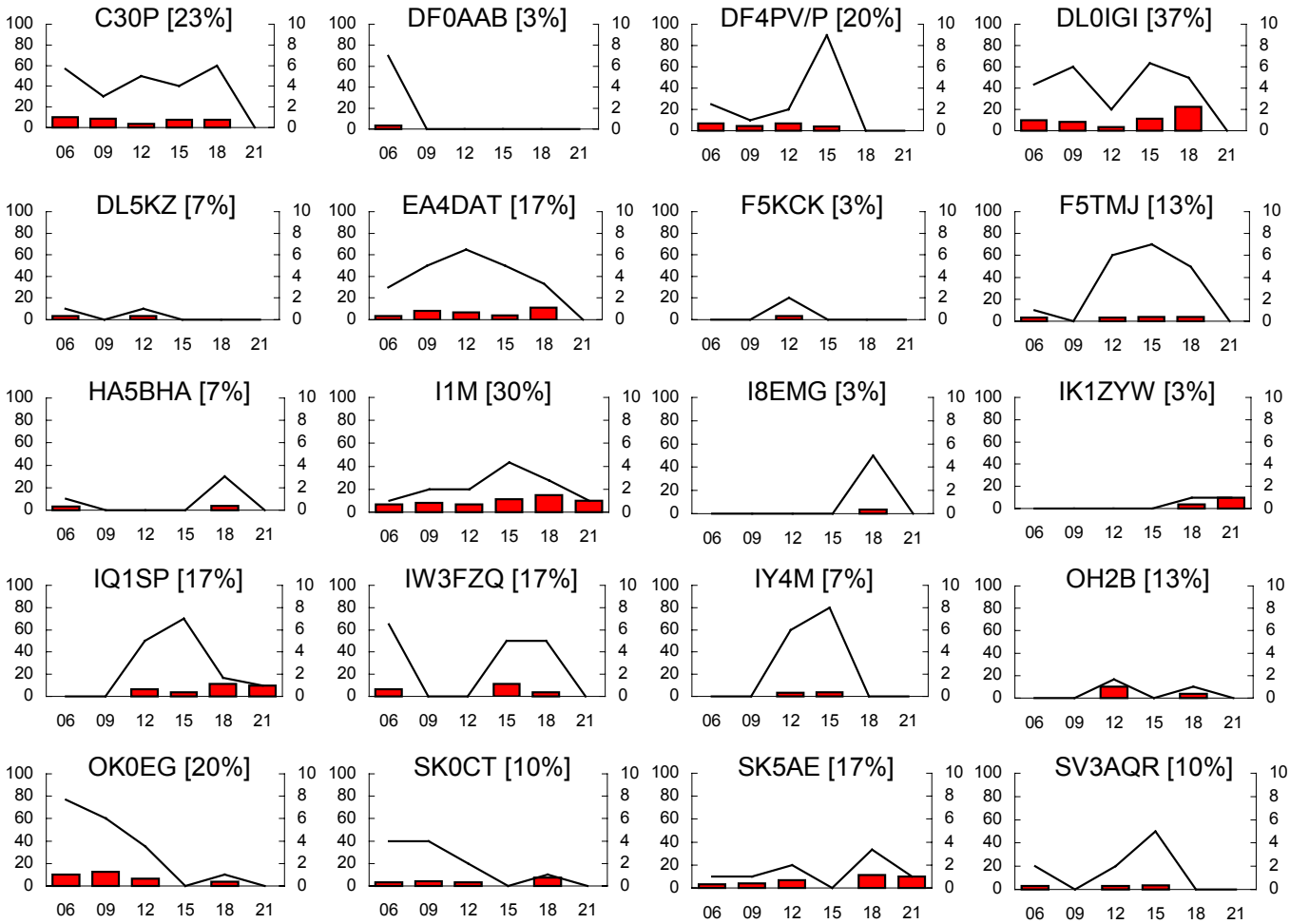
Although sporadic E was in decline during September, this mode still accounted for the majority of the 28 MHz propagation experienced by UK stations. In fact, Es was quite good at times on 10m during the first half of the month and was good again in the last two days, and in both periods Es was reported considerably more often than for equivalent propagation on 6m. F-layer propagation improved after the summer doldrums and was best in the days either side of the autumnal equinox, though propagation was never particularly good and was apparently restricted to the Middle East, Africa and South America. No openings to North America were reported.

Beacon graphs legend

Legend for all beacon graphs in this Section: - graph bars (left Y-axis): beacon reliability as the percentage of days a beacon was heard by any UK observer within each time band. Graph lines (right Y-axis): Signal Strength as the average of the daily maximum Signal reported by any observer in each time band. Time band codes (X-axis): 6=0600-0900, 9=0900-1200, 12=1200-1500, etc. Callsigns are followed by daily reliability figures, the percentage of days per month when the beacon was reported.

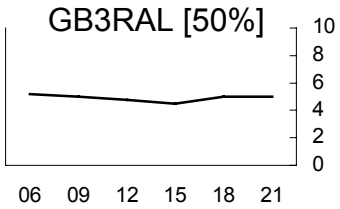
Forms for reporting beacons on paper are at http://www.explore.plus.com/6and10/beacon_forms.htm.

European Propagation / Beacons



Propagation modes for European beacons.

Propagation by Sporadic E brought reports from 30 different European beacons, though reliabilities were low on most of these. DL0IGI was heard on over a third of days, although on one of these days the beacon was heard by F-layer backscatter not Es and meteor scatter was the reported mode on several other days. I1M was heard on just under a third of days, all via ES. No short skip was reported – but this would not be expected during the tail of the season. SV3AQR was heard via Es at the beginning of the month and by F2 at the end of the month, which was the only direct F-layer inter-European propagation noted from beacon monitoring – this might have been different if there were beacons active in Russia.



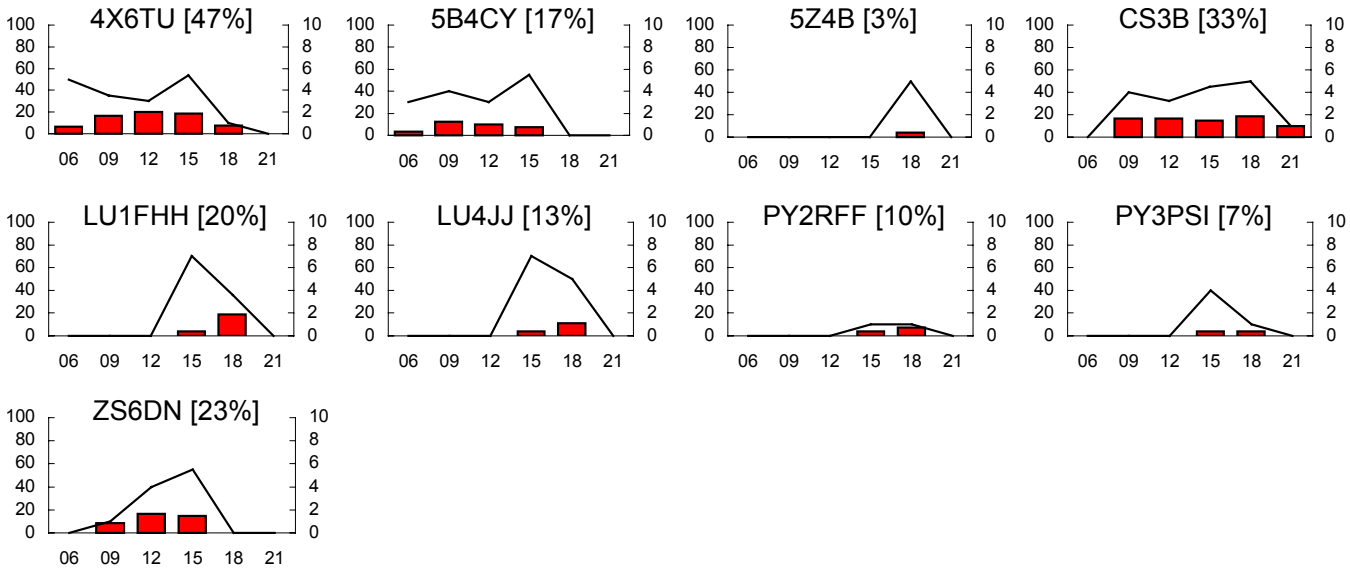
The graph opposite shows the results of monitoring of GB3RAL via troposcatter propagation at G0AEV. These graphs (of received signal strength) range from more-or-less flat to trends such as that opposite that depict “enhancements” in early morning and mid-evening.

European Beacon Notes.

There was no known change in the status of European Beacons in September.

Propagation to Asia, Africa, Oceania, South and Central America

Beacon Graphs.



Suggested propagation modes for beacons in Asia, Africa, Oceania, South and Central America.

There was a distinct improvement in F2 propagation in the latter part of the month but even with the advantages of proximity to the equinox conditions were often only marginal. 4X, 5B and CS3 were mainly via F2, except for CS3 at the beginning of the month, which appears to have been sporadic E (an interpretation based on contemporaneous Es opening to the south at times of general absence of F2 propagation elsewhere). Of the most reliable paths and indicators ZS6DN returned a daily reliability of only 23% (but this beacon was off air for part of the period) while 4X6TU was heard on almost half of September days.

Beacon Notes.

LU4AA and OA4B are still QRT. ZS6DN was reported (from ZS) to be off from 22nd September, but several 6&10 observers reported hearing this beacon again on 25th September. 5Z4B has a minor problem with a broken transmission of the callsign but was presumably active all month. From next month the Six and Ten Report will also present results of monitoring of the IARU/NCDXF beacon transmissions on 14 MHz, which should help identify outages not apparent at 28 MHz under current conditions.

10m DX in September 2005

The following list of DX countries worked or heard in the UK comes from packet cluster Spots (DX Summit: http://oh2aq.kolumbus.com/dxs/) and from the logs of Six and Ten reporters. This list shows only very minor improvement in numbers of DX countries reported in the previous month – however about half of the August list is due to sporadic E whereas the September offering is (probably) all the result of F-layer propagation.

DX in September: 7P, 7Q, A6, CE, CX, D4, EA8, HZ, LU, PY, TI, ZD7, ZS.

DX in August for comparison: 4L, 4X, 7X, CE, CX, EA8, LU, PY, TI, TZ, UN.

Propagation to North America

One again there is nothing to report under this heading. This will change next month as there were a few 10m openings to USA and Canada in October during which a few beacons were heard in the UK.

Analysis of 50 MHz reports from the UK

UK 50 MHz reports for September 2005 from G2ADR, G3HBR, G3IMW, G4UPS and via packet cluster spots. Compilation and commentary by G0AEV.

Despite regular visits to the band by our reporters and the attention paid to the band by users generally, only a very little Sporadic E was found on Six in September. Openings, when present, were very restricted, and no Es at all was detected on two-thirds of days. Stations in GM and, to a lesser extent, in northern G, had some auroras to help enliven things a little – but even these were mostly weak affairs. It was just as well that band-aficionados have access to digital modes for MS contacts or there would have been very little to report this month! Unfortunately this pattern of activity is likely to be the norm until the start of the 2006 summer Es season.

Sporadic E

Sporadic E results tabulated below ordered alphabetically by country prefix. Percentages following the country name are the daily reliability values (the number of days when propagation was reported). The first row of each table, "D" is the day of the month, subsequent rows give the maximum signal strength reported from the UK in each of three hour time bands ("06" for the band 0600 - 0900, "09" for the band 0900 - 1200, etc.). A figure of "0" indicates that signal strength was not reported.

Es Propagation Summary.

The table below displays total counts of country/areas heard/worked via sporadic E by UK amateurs, a summary of the detailed tables presented above.

	CN Morocco (17%)	CT Portugal (10%)	DL Germany (3%)	EA Spain (7%	EA9 Ceuta/Mel. (3%)
D	3 15 28 29 30	2 28 29	9	3 15	3
06			7		
09	4 5	7 9		9	9
12		5			
15	7				
18	0 9 0 5	9		5	
21	7				

	HB Switzerland (3%)	I/IS/IT Italy (17%)	LY Lithuania (3%)	OK/OM Czech/Slovak Reps (7%)
D	9	1 3 15 29 30	2	10 15
06	6			
09		3 9 9	0	3 9
12				
15		0		
18		7 4		
21				

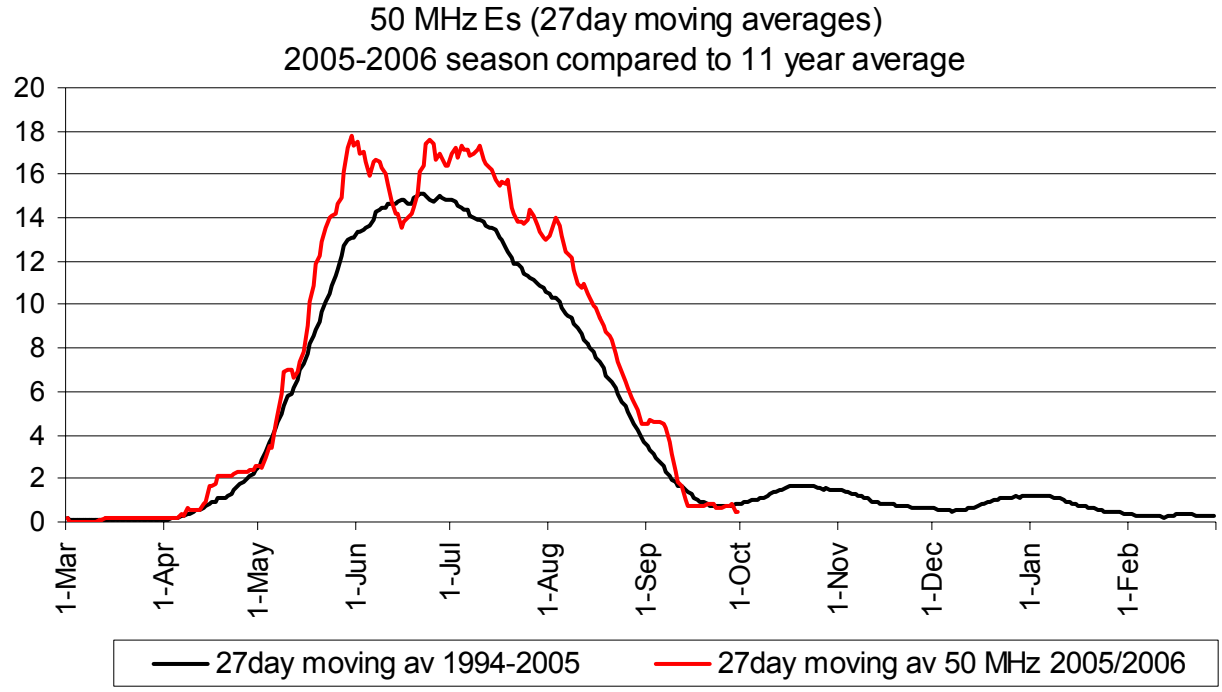
	OY Faeroes (3%)	OZ Denmark (3%)	SP Poland (3%)	YU/9A/S5/T9/Z3 Ex-Yugoslavia (7%)
D	9	9	15	9 15
06	3	9		9 9
09			9	
12				
15				
18				
21				

Es Summary

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30
06									5						1															
09		2	4							1					3														3	
12																													1	
15																														2
18	1														2													2	1	1
21															1															

No days can really be considered as "best" for sporadic E in a month when openings were so few. 5 country areas were worked via Es on 9th, and perhaps this was the best of the available openings. Marginal Es events were detected at the start, middle and end of the month and no trends in activity levels are apparent. The events at the start represent the tail of the summer season but it isn't clear yet if the events at the end of the month have some statistical affinity with "autumnal" Es or the distal tail to the summer season distribution.

The 27-day moving average trend of Es data in the graph below shows the 2005 summer season "bottoming out" in September but provides no indication whether there will be a small October peak this year. The 11 year moving average on this graph indicates that such a feature is usually present and – rather surprisingly – appears, on average, to be of greater "magnitude" (in terms of the number of country/areas available to UK observers) than the winter seasonal peak.



This graph, although updated and printed each month, is only occasionally explained. It presents 27-day moving averages of the daily country/area counts calculated directly from the data reported each month in the *Six and Ten Report*. The upper (red or paler) line is the moving average data for 2005 - actually the year March 2005 to February 2006, a period chosen so that the "Es year" starts and ends at the "Es minimum". The lower (black / darker) line is the 11 year (1995-2005 inclusive) moving average of the same measure.

It is worth noting that while the "areas" counts are excellent for showing the distribution of Es activity over periods of months they are not so good for comparing years. This is because the numbers of countries available and the quantity and quality of listener reports is not the same year-on-year. The absolute values of "magnitude" mean less than the relative patterns shown by the data.

DX Propagation

No DX propagation noted (EME excluded!)

Tropospheric propagation

There was a dearth of "tropo" activity in September: the inter-G activity spotted on the cluster was all semi-local stuff. The paucity of "tropo" data is probably as much to do with a reduction in band occupancy following the end of the main sporadic E season than especially poor tropo conditions. Most activity 6m activity was aimed at making JT6M contacts via meteor scatter. It may be that some JT6M contacts (as reported below) were actually via the troposphere but none were explicitly identified as such.

The only long distance reports again come from DH6JL who spotted enhanced tropo propagation on the GB3BUX beacon (646km) on the morning of 3rd. At the same time he also reported GB3LER over a considerably further distance. As discussed before, is not clear (to me) is this is type of occurrence really represents "tropo" propagation or meteror/ionospheric scatter. In this case the contemporaneous probable tropo enhancement to GB3BUX makes a tropospheric explanation for DH6JL to GB3LER more plausible.

3 0703 DH6JL > GB3LER 549 more than 5 min "small QSB".
3 0704 DH6JL (JO31) > GB3BUX 539 "normally 419". 646 Km

Aurora

Aurora were reported on 8 days in September: all but 3 of these the events were restricted to stations in the north of Britain. On 2nd, 11th and 15th auroral propagation extended a bit further south but were still predominantly aurora of "Scottish Type". Auroras were disappointing considering the number of days in September when there were significant geomagnetic disturbances.

2nd	15z	1622	MM0AMW (IO75) > GB3LER 54A
		1633-1641	G8LHT (IO93) > GB3LER 42A; MM0AMW > OY6SMC 53A
		1653	PE1M (JO23) > GB3LER "aurora" QTF 000
		1710-1725	LA6PV > GM7PBB (IO68) 55A; GM7PBB > 2E0KBJ 57A
	18z	1934	LA8HGA (JO58) > GB3LER 51A
6th	15z	1626	MM0DQP (IO88) > GB3LER 53A
9th	21z	2204	MM0AMW > GB3LER 54A
10th	15z	1615-1616	MM0AMW > GB3LER 52a; GM7PBB > GB3LER 59A
	21z	2318	G4FVP > GB3LER "still auroral" 52A
11th	12z	1256	MM0BSM (IO86) > GB3LER 52A
		1337	MM0AMW > GM8OEG 55A
		1450	MM0DQP > OZ7NB (*assumed auroral*)
	15z	1517-1521	MM0AMW > GM4ILS 55A; G4IFX (IO91) > GM4ILS (IO87) 57A QTF 015
	18z	2046	MM0BSM > GB3LER 52A "building"
	21z	2103	MM0AMW > OY6SMC 53A
12th	15z	1505	MM0DQP > GB3LER 53A
	18z	1938	MM0BSM > GB3LER 51A
		2035-2049	MM0BSM > GB3LER 53A; GM4JYB (IO88) > OY6SMC 51A
13th	12z	1340-1343	GM4JYB > OY6SMC 51A; OZ1DJJ (JO65) > GB3LER 55A
15th	12z	1442-1450	G8VHI (IO92) > GB3LER 57A QTF 020; OZ3ZW (JO54) > G4DEZ 52A
		1503	OZ1DJJ (JO65) > G4DEZ (JO03) 57A
		1522-1524	GW3HWR (IO71) > GM3XOQ (IO87) 56A; GM7PBB > GB3LER "599" QTF 040 (*presumably via aurora – too close for Auroral E?*)
		1543-1558	SWL report (IO93) of GM4NFC (IO75) "weak aurora"; G1SDX (IO80) > MM0AMW 57A; MM0AMW > GB3LER 53A

Auroral E

10th	18z	1932	GM4JYB (IO88) > JW9SIX 57
12th	21z	2217	MM0AMW (IO75) > JX7SIX 559 QSB

Meteor Scatter

JT6M activity levels picked up in September – obviously is the absence of Es more operators spent more time using digital modes for MS work. Although JT6M activity was higher, fewer reports explicitly identified meteors as the propagation mode – so the proportion of certain MS contacts is lower. Also ast month included the Perseids meteor shower, and there were no significant showers this month, so the total number of MS contacts is also less this month than last.

MS heard/worked (mostly via JT6M) in September by day. Weekend days (when activity is likely to be greater) are highlighted.

Date	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30
MS QSOs			2	1				1	2	2						1	2	2		2	2		1		1		2	1		
All JT6M	2	5	6	5		3	2	5	7	7	7	1	1	1		1	5	11	3	9	3		5	3	2	2	4	1	2	

MS QSOs = all QSOs where MS mode indicated or inferred: mainly digital modes.
All JT6M = all JT6M QSOs/reception reports less those explicitly identified as tropo or Es

MS heard/worked (presumed mainly via JT6M) in September 2005 by hour

Hour	QSOs	Countries	Hour	QSOs	Countries
05z	0		15z	1	OZ
06z	0		16z	1	SM
07z	5	SM, SP	17z	0	
08z	2	EA, SP	18z	1	SM
09z	4	9A, OE, SM, SP	19z	1	OZ
10z	1	OZ	20z	2	F, LA
11z	0		21z	0	
12z	0		22z	0	
13z	1	OZ	23z	0	.
14z	3	G<>GM, SP			

EME

For the record, these are the September (JT65A) moon-bounce reports from the DX cluster.

1	1703	G4PCI > EH3AXV –27 dB
3	1611	W7GJ > M0BCG
4	1800	G4PCI > W7GJ –24 dB
5	1618	G4PCI > W7GJ –27 dB
5	1622	G4PCI > W1JJ –25 dB
5	1703	G4PCI > K7AD –28 dB
6	1901	M0BCG > K7AD
7	1704	G4PCI > W1JJ –27 dB
11	1520	M0BCG > G8PL
18	0434	G4PCI > K7AD –23 dB
24	1152	G4PCI > W7GJ –26 dB

Solar and Geomagnetic Data for September 2005

Data supplied by G0CAS (Sun Mag[1]) and from Internet sources. Compilation by G0AEV.

Sunspot numbers (SEC)	Mean 39.2	Max 101 (11th)	Min 11 (7th)
Solar Flux (28 MHz)	Mean 90.8	Max 119 (15th)	Min 72 (30th)

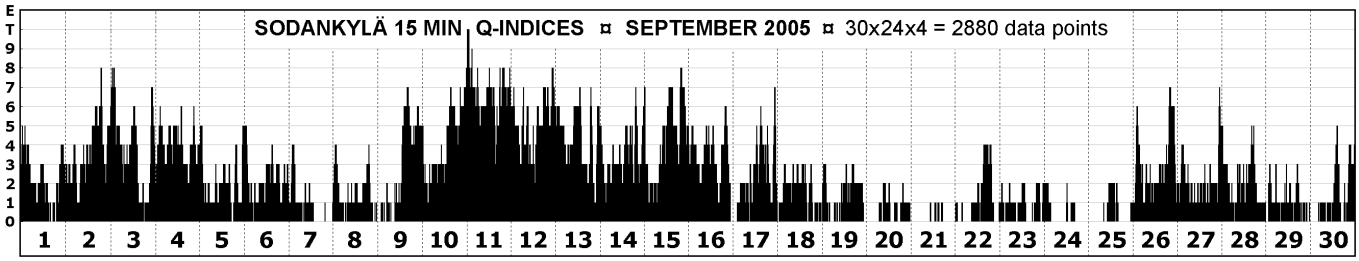
Solar data for September 2005 are presented in the table at the end of this section. Numbers in the 28 and 50 MHz columns of this table are the total daily "areas" worked/heard from the UK for each of several propagation modes and are a summary of the data presented in the first sections of this Report. On 28 MHz "areas" refer to the number of beacons reported via Es and F-layer; on 50 MHz the number of countries via Es, F-layer modes (including TEP), Aurora and Auroral E. F2 critical frequencies are from Chilton in Oxfordshire. SIDC spots are from SIDC, and other solar data from the joint USAF/NOAA daily summaries or directly from SEC.

Energetic Events.

There were 37 M or X class X-ray solar events in September, of which 12 were X-class – peaking at X17.

7th	1717-1803	**X17.0**3b
	1932-0044	M1.4
8th	1649-1711	M2.1
	2023-2041	M2.1
	2052-2117	**X5.4** 2b
9th	0233-0239	M1.1 2f
	0243-0307	**X1.1**
	0446-0512	M1.8 Sf
	0532-0600	M6.2 1f
	0942-1008	**X3.6** Sf
	1732-1810	M1.9 Sf
	1913-2036	**X6.2** 2b
10th	0606-0617	M3.7 2n
	0859-0931	M1.9
	1634-1651	**X1.1**
	1910-1950	M4.1 1n
	2130-2243	**X2.1**
11th	0229-0240	M3.4 Sf
	1244-1353	M3.0 1f
	2029-2049	M1.3
	2130-2243	**X2.1**
12th	0449-0527	M1.5
	0656-0705	M1.3 1f
	0837-0920	M6.1 2f
	2005-2011	M1.5 1n
13th	1041-1124	M1.3
	1919-2057	**X1.5** 2b
	2315-2330	**X1.7**
14th	1005-1054	M4.6
	2315-2330	**X1.7**
15th	0152-0218	M1.3
	0830-0846	**X1.1** 2n
	1855-1926	M1.0 Sf
16th	0141-0156	M4.4 1b
	1735-1810	M1.3 Sf
	1918-1948	M3.5 1f
17th	0558-0615	M9.8 2n

Q-indices from Sodankylä, Finland (Thanks to OH2LX)



Geomagnetic data from the Finnish observatories for September are:

Monthly averages
Sodankylä: monthly Ak average = 31.7 (21.0 in Aug)
Nurmijärvi: monthly Ak average = 18.0 (17.7 in Aug)

Most disturbed September days:
Sodankylä: 11th, Ak = 183 (Aug 24th Ak = 89)
Nurmijärvi: 11th, Ak = 100 (Aug 24th Ak =127)

[1] Sun Mag: Sunspot and Magnetic data compiled by Neil Clarke G0CAS. Email neil@g0cas.demon.co.uk

K-indices.

The following four tables present the Kp index (from SEC) and the Lerwick ("KL"), Eskdalemuir ("KE"), and Hartland ("KH") K-indices (from the British Geological Survey). Each table is set out with the day of the month in the top row followed by rows containing the K-values or each 3-hour period. The bottom row of each table is the sum of the K-values for the day. Pale (yellow) shading indicates K = 5, darker (grey) when K > 5. There were xx days in September when Kp or the UK K-indices reached 5 or higher.

Planetary K (Kp)

KP	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30
00	5	3	6	4	4	3	4	3	1	2	5	6	6	3	3	4	2	1	2	1	1	2	1	1	1	4	3	3	2	1
03	5	4	6	4	2	2	3	2	2	2	7	4	5	3	2	4	2	3	2	2	1	2	3	1	0	3	4	3	1	2
06	3	5	4	5	3	0	2	1	0	5	9	6	6	5	3	3	1	4	2	2	2	2	3	1	0	2	2	4	1	1
09	3	4	5	5	4	2	3	1	1	3	7	6	6	5	5	4	3	4	2	2	2	1	1	0	2	3	3	2	2	3
12	4	4	3	3	2	2	2	1	4	4	6	5	5	5	6	3	3	3	2	2	2	2	2	1	3	4	2	2	2	4
15	2	5	3	3	3	3	4	2	4	5	5	6	3	3	7	2	3	2	2	1	1	3	2	1	2	2	2	3	2	3
18	2	5	2	2	3	1	4	2	4	5	5	5	4	3	5	3	3	2	2	2	1	2	2	1	0	2	1	2	1	2
21	2	4	4	3	2	2	1	3	4	5	4	6	4	2	4	2	3	1	1	1	1	1	2	1	2	3	3	2	1	2
Σ	26	34	33	29	23	15	23	15	20	31	48	44	39	29	35	25	20	20	15	13	11	15	16	7	10	23	20	21	12	18

Lerwick K (Shetlands)

KL	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30
00	4	2	4	3	3	3	3	2	1	2	6	4	5	3	2	3	0	1	2	1	1	0	2	1	0	3	3	2	3	0
03	3	3	4	3	2	2	3	1	2	2	7	4	3	2	1	3	1	2	0	1	0	1	2	0	0	2	3	2	2	1
06	1	2	3	3	1	1	0	1	0	2	7	5	2	2	2	3	1	2	1	1	1	0	2	0	0	1	1	2	1	1
09	1	2	3	4	2	1	0	0	1	2	5	3	4	2	4	2	2	2	1	1	0	0	0	0	1	1	1	2	1	1
12	3	4	4	3	2	2	1	1	4	4	6	4	5	3	5	3	3	3	2	1	0	1	1	1	2	3	1	2	1	3
15	1	5	1	3	2	2	2	1	4	5	5	4	2	3	7	2	4	1	2	1	1	2	0	1	2	2	1	3	2	2
18	1	6	2	2	3	1	2	2	3	5	6	5	4	3	5	3	3	2	1	1	0	2	1	0	0	4	2	2	1	2
21	3	2	3	2	1	2	0	1	3	5	3	5	3	1	3	3	2	1	1	1	0	0	1	0	1	3	4	1	0	3
Σ	17	26	24	23	16	14	11	9	18	27	45	34	28	19	29	22	16	14	10	8	3	6	9	3	6	19	16	16	11	13

Eskdalemuir K (southern Scotland)

KE	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30
00	3	2	5	3	3	3	3	3	1	1	6	3	5	3	3	3	0	1	2	1	1	1	2	1	0	3	3	2	3	0
03	3	2	4	3	2	2	3	1	2	2	5	4	3	2	1	3	1	2	0	1	0	2	2	0	0	2	3	2	2	1
06	1	3	4	4	2	1	1	1	0	3	6	5	3	3	3	3	1	2	1	1	1	1	2	0	0	2	1	2	1	1
09	2	3	3	4	2	1	1	1	2	3	4	4	4	2	4	3	3	2	1	1	1	0	1	0	2	2	1	2	2	1
12	3	4	3	4	2	2	2	2	4	4	6	3	4	4	5	3	3	3	2	1	1	2	1	1	3	3	2	2	1	3
15	2	5	2	3	3	3	2	2	4	6	5	5	2	3	6	3	3	2	2	1	0	2	0	1	2	2	1	3	2	2
18	1	6	2	3	3	1	3	2	4	4	6	6	5	4	5	4	3	2	2	1	0	2	1	0	0	4	1	2	1	2
21	3	4	3	3	2	2	0	2	3	4	4	6	4	2	4	3	3	1	1	1	0	0	2	0	2	4	4	2	1	3
Σ	18	29	26	27	19	15	15	14	20	27	42	36	30	23	31	25	17	15	11	8	4	10	11	3	9	22	16	17	13	13

Hartland K (SW England)

KH	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30
00	4	3	5	4	4	3	3	3	1	1	6	4	5	3	3	3	1	2	2	1	1	1	3	1	1	3	3	3	3	1
03	3	3	4	4	2	2	4	2	2	2	5	4	3	2	2	3	1	2	1	2	0	2	2	0	0	3	3	3	2	1
06	1	4	4	4	2	1	1	1	1	3	5	5	4	3	3	3	2	3	1	2	1	1	2	0	1	2	2	3	1	1
09	1	3	3	3	3	2	1	1	2	3	4	5	4	3	5	3	3	2	1	2	1	1	1	0	2	3	1	2	2	1
12	3	4	3	3	2	2	2	1	4	4	6	4	4	4	5	3	2	2	2	1	1	2	1	1	3	3	2	2	1	3
15	1	5	1	3	3	3	2	2	4	5	5	5	2	3	6	2	2	1	2	1	0	2	1	1	2	3	1	4	3	2
18	1	6	2	3	4	1	3	2	4	4	5	6	5	4	5	4	3	2	2	1	0	3	1	1	0	4	1	2	1	2
21	3	4	3	3	2	2	0	2	3	4	4	6	4	2	4	3	3	1	1	1	0	1	2	0	2	4	4	2	1	3
Σ	17	32	25	27	22	16	16	14	21	26	40	39	31	24	33	24	17	15	12	11	4	13	13	4	11	25	17	21	14	14

Sept.	28 Areas		-- 50 Areas --				2800	- Spots -		Max			X-ray	Max foF2		Min foF2		-- Particle Fluences --		
2005	Es	F	Es	DX	A	AE	Flux	SEC	SIDC	Kp	Ap	Aa	b.gnd	MHz	Hour	MHz	Hour	2MEV Elec	1MEV Prot	10MEV Prot
01-Sep	8	1	1	0	0	0	79	24	17	5	21	23	A4.4	4.9	12	2.3	06	5.7E+06	2.1E+06	4.9E+04
02-Sep	8	1	2	0	5	0	77	28	14	5	33	56	A3.7	7.3	11	2.5	05	4.3E+07	2.8E+06	6.6E+04
03-Sep	10	0	4	0	0	0	74	14	9	6	32	37	A2.7	5.7	20	1.9	02	2.1E+08	1.7E+06	1.7E+04
04-Sep	2	1	0	0	0	0	75	12	9	5	26	42	A3.2	6.8	19	2.2	02	4.3E+08	3.2E+06	1.5E+04
05-Sep	1	0	0	0	0	0	75	12	8	4	14	23	A7.6	5.6	15	1.9	04	1.8E+09	1.8E+06	1.7E+04
06-Sep	6	1	0	0	1	0	83	12	8	3	9	17	B3.4	5.8	14	2.3	03	1.3E+09	1.2E+06	2.1E+04
07-Sep	5	1	0	0	0	0	100	11	14	4	15	16	C1.0	5.5	20	2.4	05	4.2E+08	1.9E+06	3.2E+04
08-Sep	4	0	0	0	0	0	94	36	20	3	8	12	C1.0	5.7	12	2.3	04	6.3E+08	1.9E+07	3.3E+06
09-Sep	12	1	5	0	1	0	99	59	28	4	17	33	B8.3	7.3	19	2.6	05	2.6E+08	2.6E+08	1.8E+07
10-Sep	2	0	1	0	2	1	100	59	35	5	30	50	C1.9	6.2	20	2.3	23	1.3E+06	5.8E+08	7.4E+07
11-Sep	0	0	0	0	4	0	110	101	34	9	105	120	C1.8	5.6	19	1.9	03	1.2E+08	1.1E+09	5.4E+07
12-Sep	2	7	0	0	2	1	118	62	37	6	66	102	B4.9	7.7	19	1.9	05	4.0E+08	2.2E+08	6.4E+06
13-Sep	0	0	0	0	2	0	114	95	50	6	51	65	B5.2	5.9	12	1.8	03	4.1E+08	4.9E+07	5.9E+05
14-Sep	1	0	0	0	0	0	117	86	44	5	25	34	B5.2	7.0	19	2.3	05	9.8E+08	8.4E+07	8.5E+06
15-Sep	7	3	6	0	4	0	119	77	39	7	43	76	B3.5	5.8	13	2.1	23	4.6E+08	1.7E+08	6.1E+06
16-Sep	1	0	0	0	0	0	112	51	33	4	18	34	B3.3	5.2	13	1.9	03	1.2E+09	3.5E+07	4.1E+05
17-Sep	1	0	0	0	0	0	104	59	35	3	12	22	B3.7	6.5	19	n.a.	n.a.	2.6E+09	1.1E+07	1.4E+05
18-Sep	0	0	0	0	0	0	102	50	33	4	12	17	B2.8	5.3	18	2.0	05	3.1E+09	6.9E+06	1.1E+05
19-Sep	0	0	0	0	0	0	91	43	26	2	8	10	B1.8	5.5	17	2.4	05	3.3E+09	5.0E+06	6.0E+04
20-Sep	0	1	0	0	0	0	88	23	18	2	6	9	B1.7	5.8	13	2.1	05	2.6E+09	3.1E+06	3.6E+04
21-Sep	0	2	0	0	0	0	86	19	13	2	5	6	B1.1	6.5	14	2.1	05	2.6E+09	2.6E+06	2.0E+04
22-Sep	0	6	0	0	0	0	84	28	14	3	8	12	A5.9	6.9	19	3.1	05	1.5E+09	3.9E+06	1.9E+04
23-Sep	0	0	0	0	0	0	83	49	19	3	8	11	A3.8	5.8	14	2.5	05	5.0E+07	1.0E+06	1.5E+04
24-Sep	0	1	0	0	0	0	81	33	17	1	4	4	A2.7	6.2	15	2.9	05	5.5E+07	1.2E+06	1.6E+04
25-Sep	1	3	0	0	0	0	81	28	16	3	5	13	A2.2	6.8	15	2.9	03	3.7E+07	2.1E+06	1.7E+04
26-Sep	0	8	0	0	0	0	81	25	22	4	14	31	A2.5	8.8	14	3.4	03	4.3E+06	1.3E+06	1.6E+04
27-Sep	0	3	0	0	0	0	77	23	16	4	13	21	A2.6	6.4	15	2.6	05	3.0E+06	8.6E+05	1.6E+04
28-Sep	1	1	2	0	0	0	75	22	15	4	12	22	A1.3	6.3	12	2.5	05	6.5E+06	7.6E+05	1.6E+04
29-Sep	9	4	3	0	0	0	74	22	14	2	6	16	A1.4	7.4	18	2.9	05	1.7E+07	5.6E+05	1.6E+04
30-Sep	6	2	2	0	0	0	72	13	7	4	11	19	A1.8	6.9	16	2.6	05	1.6E+07	1.1E+06	1.6E+04
Sum	87	47	26	0	21	2														
Average	2.9	1.6	0.9	0.0	0.7	0.1	90.8	39.2	22.1	4.1	21.2	22.1	B3.5	6.3	19	2.4	06	8.2E+08	8.6E+07	5.7E+06
Maximum	12	8	6	0	5	1	119	101	50	9	105	50	0	8.8	20	3.4	23	3.3E+09	1.1E+09	7.4E+07
Minimum	0	0	0	0	0	0	72	11	7	1	4	7	A1.3	4.9	11	1.8	23	1.3E+06	5.6E+05	1.5E+04

50 MHz Outside Britain

Compilation and Commentary by G3USF

Europe, Africa and the Middle East

Auroral-Related Propagation

Sep 1 0050-0140 Au>OH5IY

Sep 2 16-1700 GB3LER>PA(JO23 000) 49750(UA)>PA(58a) OH0>SP2(JO94 355 55a) 1620-1700 Au>OH5 1630-50 AuFM>OH5 17-1800 GM>LA(55a) SP2(JO93)>SM1 1850-1910 Au>OH519-2000 SM5,SM0>OH3 JX7SIX>OH2(549 AE) 1920-40 Au>OH5

Sep 3 0050-0310 Au>OH5 1300-40 Au>OH5 1350-1420 Au>OH5 1418 OH1>SM5(55a)

Sep 9 1420-30 Au>OH5 1630-1710 Au>OH5 2123-8 JW9SIX>OH6(AE) OH8>OH6(mode?)

Sep 10 1657 SM5>DL 17-1800 DL>OZ(57a) JW9SIX>SM5(mode?) LY>SM4(JO7(55a) 1933-5 JX7SIX>OH2(579 AE) OH1>OH2(33a) 2100-20 Au>OH5 2140-50 Au>OH5 2310-40 Au>OH5

Sep 11 0020-0200 Au>OH5 0250-0450 Au>OH5 0520-0650 Au>OH5 1100-10 Au>OH5 1100-30 AuFM>OH5 1120-1220 Au>OH5 1230-1350 Au>OH5 13-1400 ES6(KO27)>SM1(JO97 59a) SM1(JO97)>OZ(JO65 55a) LY(KO24)>SM1(JO97 53a) OZ(JO65)>DL(JO31 55a) LY(KO24)>OZ(JO65 55a) OZ>DL(JN58 57a) 14-1500 SM0>SM1 OZ>DL559 050 mode?) OZ(JO45)>DL(JO31) LY>SM0(53a) OH1(KP10)>SM1(JO97 56a) OZ>SM5(JO99 55a) 1440-1520 Au>OH5 1830-40 Au>OH5 1940-2130 Au>OH5 2320-40 Au>OH5

Sep 12 0000-10 Au>OH5 1440-1530 Au>OH5 15-1600 OZ>SM0(51a) OH7(KP52)>SM5(JO99 020) OZ>SM0(55a) OH1>SM0(55a) 16-1700 LA>SM0(55a) ES1>SM0(55a) ES6>SM0(53a) ES1)KO29)>SM1(59a) ES6(KO27)>SM5(JO99 030) JX7SIX>SM5(JO99 mode?) OH7>OH2(jt mode?) 1800-20 Au>OH5 2130-2210 Au>OH5 22-2300 JX7SIX>OZ(JO45 55) 2230-2300 Au>OH5

Sep 13 1020-1410 Au>OH5 1343 GB3LER>OZ(JO65 55a) 1750-1800 Au>OH5 1830-50 Au>OH5

Sep 14 1420-30 Au>OH5 1800-20 Au>OH5

Sep 15 1310-1500 Au>OH5 14-1500 G>OZ(JO54 52a) OH4>SM0(55a) ES1>SM0(55a) 15-1600 SM0(JO89)>OZ(JO65) G(JO03)>OZ(JO65 57a) OZ(JO45)>OZ(JO65 57a) OZ(JO65)>DL(JN58 57a 000) OZ7IGY>DL(JN58 56a 010) OZ(JO55)>DL(JN58 59a 010) OZ>SM1 LA(JO59)>SM1 1510-30 Au>OH5 1600-20 Au>OH5 1940-2050 Au>OH5 2057 OH5RAC>SM5(JO99 53a)

Sep 17 1420-40 Au>OH5

Sep 26 2130-40 Au>OH5

Sep 27 2230-40 Au>OH5

Sep 28 1640-1720 Au>OH5

Sep 29 1720-30 Au>OH5 1740-1800 Au>OH5

Sep 30 1320-30 Au>OH5 1710-30 Au>OH5 1740-50 Au>OH5 1900-20 Au>OH5

Other Modes

After the wealth of activity right through to the end of August, September brought Europe down to earth with the sort of propagation we can expect, summer apart, for at least the next couple of years. Sadly, there is no need to collect the highlights into text 'boxes', for highlights were disappointingly few. The 5T5DUB beacon was copied in CT and/or EA on the 12th and 14th, and the new ZD7VC beacon was received in the same area on the 11th, 14th, 20th and 22nd. There was a report of a PY7 to I8 contact on the 30th, but this is not confirmed. Even Costas', SV1DH's, report mentions no two-ways outside Europe, although he did receive West African TV signals every day but one from the 15th onwards.

Within continental Europe sporadic-E was reported, though the 28th and 29th were the only days when the openings were reasonably sustained and widespread. Otherwise, a substantial proportion of reports related to JT6M working, usually indicating MS, although occasionally combined with Es and even, in one instance, tropo. Where details are followed by '(ms)' this was the indication given by the reporter.

There is at least one form of 50MHz working that is not dependent on the vagaries of the solar cycle: EME. Reports are probably no more numerous than usual but they stick out more obviously in an otherwise barren landscape…

Callisigns given in full relate to DX and/or beacons.

Sep 1 0913 OH5RAC>I4 1142 LX0SIX>PA 14-1500 OD5SIX>HA3 I0>I2 18-1900 SV1SIX>I2 I0>5B 5B>OM7,I1,EA3 OD5SIX>I519-2000 4X,GW>I5 LX0SIX>PA

Sep 2 1818 SP8>HA2

Sep 3 07-0800 GB3LER,GB3BUX>DL(t) I1>HB(t) CT0SIX>I5 08-0900 EH1DVY>I5 IQ1SP>I2 CN8MC>I5 09-1000 G>CN(jt) G>OE5(ms) 10-1100 OE5>SM5(jt) EH1DVY>DL(Es) GB3MCB>I4 1352 DL>OZ(t) 1446 I5>S5

Sep 4 1000 EA3>CN(jt) 1751 ZB2>EA7

Sep 5 0812 LX0SIX>PA 1454 SP3>LX(jt)

Sep 6 no reports

Sep 7 1948 LA>OE5(ms)

Sep 8 0757 OE5>YO7(ms) 17-1800 SK6>LA OH3>SM0(t) SK4>LA 18-1900 SM6,OZ>LA SM4,OH0,SM0,SM5,SM7>SM1 OH0>I5 19-2000 SM6>OZ OH6>OH8 SM1>I5 OH6>I4 20-2100 SQ6>I4 I4>SM5 G>DL YT1>EI

Sep 9 0723 GB3RMK>DL(Es) 1338 G>OZ(ms) 1947 JW5SIX>LA(mode?)

Sep 10 0649 SP9>YO7(jt) 0855 I5>F(jt) 1020 S5>YO7(jt)

Sep 11 0645 YO7>S5(jt) 07-0800 YO7>LY(jt) SP9>S5(jt) LY>ON(jt) 08-0900 I0,SP9>ON(jt) aurora 1855 ZD7VC>EA7KW

Sep 12 aurora. 1939 5T5DUB>CT1AXS

Sep 13 no reports

Sep 14 1249 7X>UR 1942-3 5T5DUB,ZD7VC>EA7KW

Sep 15 07-0800 LX0SIX>SM5 SV9SIX>PA 09-1000 GB3LER>I4(ES) I4>OZ 14-1500 SV1SIX,SV9SIX>I8 aurora 1927 GB3MCB>EA7 2059 GB3BAA>CN 22-2300 CN8MC>PA

Sep 16 12-1300 CN8MC>IS0,I4 1407 9Ltv>SV1

Sep 17 0657 SP9>OZ(Es,jt) 07-0800 SP9>I2(jt) OZ>I2(jt)

Sep 18 0528 K7AD>PF7M(eme) 0645 SP9>OH2(jt) 07-0800 I3>OH2(jt) SP9>I3(jt) SM6>LY(jt) 0853 S5>9A 09-1000 G>9A(ms) S5>9A I5>I1 10-1100 I2>I5 1129 I2,I3>I4 12-1300 I5>I1 1338-9 I5>ON(t) DL>I5(ms) I4>DL(t) F>I5(ms) 1458 LY>PA(jt) 16-1700 9Ltv>SV1 1709 OH2>OH3 1837 PA>DL

Sep 19 15-1600 I0>YO7(jt) 1718 SM5>LY(jt)

Sep 20 15-1600 9L,3Ctv>SV1 GW>S5(jt) 1559 G>S5(jt)

Sep 21 15-1600 GM>OZ(jt) LX0SIX>ON(t) 16-1700 SP9>ON(jt) 17-1800 9Ltv>SV1

Sep 22 1126 SV1>F(jt) 1509 9Ltv>SV1 1958 LX0SIX>PA(t)

Sep 23 07-0800 PI7SIX,LX0SIX>DL 1739 EA3>PA(jt) 1830 SP9>SM5(jt)

Sep 24 1925 I7>I8

Sep 25 0857 HB9SIX>DL 1244-9 S5>I5 I6>S5

Sep 26 1808 SP3>SM5(jt)

Sep 27 1721 G>PA 19-2000 SP9>LY(jt) 2055 I7>I8

Sep 28 1443 HB9SIX>DL(t) 16-1700 LZ1JH>I4,I5 YO3KWJ>I0 LZ2CM,LZ4>I5 17-1800 I9>SQ8,DL(Es),I1,LZ2 IT9X>DL(Es),EA4 I9,SP9>CT SV9SIX>DL(ES),SP6 UT5G>IS0,LZ1YO3KWJ,YO9>IS0 I8,I9>EA4 SV1SIX>SP6,I1.I2 I9>SP2,SP9,EA4,EA2,S5,I2,F LZ1>I5 LZ4>I0 9H>F,I1 18-1900 SV2>I4 SV9SIX>SP8 9H>DL,I1 SV1>I1 19-2000 EA5>I7 EH9,ZB2,EH1DVY>EI IZ1EPM,GB3BAA>CT I9>OE5 20-2100 9H>Z3 CN8MC>EI

Sep 29 09-1000 F>LZ2 CT0SIX>I5 10-1100 I0>OK1 11-1200 SV1SIX>SP6,DL(Es) EH9>PA G>I5 12-1300 EH9>OE5,PA EH1DVY>OK1,SP6 F>DL(Es),OE5(Es),OK1 EA4>DL(Es),PA GU,GB3IOJ>I5 I5,IZ1EPM>F 13-1400 EI>I5 CT0SIX>DL F1GTU>DL 16-1700 UU5SIX>I5 SV9SIX>ER1,9A SV1SIX>ER1 17-1800 UR>SV1 UT5G(Es),IQ4AD,I0JX, IZ1EPM, SV1SIX>EI LZ1JH>EA5 SV9SIX>YO7,EI LZ2CM>YO7 CN8MC>I5 IT9X>LZ1 18-1900 I9>YO7 GB3MCB>I5 SV1SIX,SV9SIX>I4

Sep 30 1159 LZ2CM>YO7 1244 CN8MC>I5 1611 SV9SIX>IS0 17-1800 PY7ONM>IK8MRA(?) CN8MC,SV9SIX>EA3 SV1SIX>EA3,EA4 18-1900 SV9SIX>EA5 1926 YU1>EA3

50MHz PROPAGATION REPORT FOR SEPTEMBER 2005 BY SV1DH

1. Data for all days (30)
2. Relatively good days on: 28,29
3. 48 MHz AF video (3C+9L) on:15-28,30 (ND<15th) all A-TEP (R=94%)
4. 55 MHz AF video (5N) on: NIL
5. Opening to F on: 28 (E)
6. " to I on: 1,3,28,29 (E)
7. " to YU on: 15 (E)
8. " to 9A on: 29 (E)
9. " to EI on: 29 (2E!)
10. " to DL on: 28,29 (E)
11. " to HB on: 28 (E)
12. " to OK on: 28 (E)
13. " to SP on: 28,29 (E)
14. " to UR on: 28,29 (E)
15. " to ER on: 29 (E)
16. " to EH on: 30 (E)

17. Special events on:
    3 (0930 W8 to EA+CT 48Mhz video)
    4 6(3C+1M flares)
    7 (4C+1X flares, 1740 X17!! flare+Xray bgn C1)
    8 (5C+2M+1X flares, 2106 X5.4 +Xray C1)
    9 (7C+5M+3X!! flares, 0243 X1.1+0959 X3.6+2004 X6.2, Xray B8)
    10 (3C+3M+2X flares, 1643 X1.1+2211 X2.1, Xray C2 +ZS6 to 5B)
    11 (5C+3M flares , Xray still C2, 06Z K=9!)
    12 12(9C+4M flares, Xray B5)
    13 (9C+1M+2X flares, 1925 X1.5+2322 X1.7 flares)
    14 (8C+1M flares+1730 9J to SV9/B+1945 EH7 to 5T/B+ZD7/B)
    15 (12C+2M+1X flares, 0838 X1.1 flare+2000 FM to EU video direct)
    16 (6C+3M flares)
    17 17(6C+1M flares, 0605 M9.8! flare)
    20 (1945 EH7 to ZD7/B)
    21 22(1930 CT to ZD7/B)
    26 (1430-1600 foF2>10, max 10.8, MUF=38Mhz at 1530, first of season)

18. DXCC entities heard/worked during Sept 2005 : 12 on 1 cont
19. DXCC entities heard/worked on 28th Sept 2005 : 7 on 1 cont.

73 COSTAS

The Americas

Auroral-Related Modes

North American operators were able to make better use of the event on the 11th than the Europeans, with peak propagation occurring during their evening. The event was notable for rare reports of coast-to-coast contacts credited to auroral-E at ranges in the region of 5,000km. If the attribution is correct - and these are experienced operators - this would imply two hops or even three. Note that, more or less simultaneously, there were reports of AE contacts with mid-point areas. And, at similar times, there was working from W7 up to KL7 and VE8, although for only one of the contacts was a propagation mode suggested.

Sep 2 1908 K0KP>W9(EN44) 1938 W8>W9(EN44 52a)

Sep 4 06-0700 VE4VHF>W9(EN44 51a) W8>W9(EN44 55a) K0GUV>W9(EN44 52a) 0839 VE7(CO70)>W7(CN87 41a)

Sep 11 0150-8 W8>W9(55a) N0UD>W0(DN87 51a) W9(EN54)>W9(EN44 52a) 03-0400 N0UD>W9(EN44 53a) W7(DN84)>W0(DN70 53a) VE7(CN88)>W7(CN85) 04-0500 W0(DM69)>W7(CN85) 05-0600 VE5(DN59)>W7(CN87) W2>W0 06-0700 K1TOL(FN44)>W0RLI/7(CN85 AE) K1WHS(FN43)>W0RLI/7(AE) K0AWU(EN37)W0RLI/7(AE) K0MVJ(EN36)>W0RLI(AE) KB0CIM(EN37)>W0RLI/7(AE) VE4QZ(DO90)>W0RLI/7(AE) VE8NSD(DP20)>W0RLI/7(AE) N0KE(DM69)>W0RLI/7(AE) W7>KL7R(CO28) VE8JL>K7HRT 07-0800 VE5UF>W0RLI/7 W0>VE3(mode?) 10-1100 W2>W1(58a) W9(EN52)>W1(57a) 1107 W1>VE2 12-1300 W9>W4 19-2000 K0KP>W9(60% au!) W9>W9(EN52 55a) W1>VE2(FN46 52a) W3>VE2(FN46 52a) W9(EN50)>W9 W8(EN84)>W9 W2>W4(AE/59a) 21-2200 VE3>W9

Sep 12 0821 VE6EMU>W7(CN87 51a) 2355 K0KP>W8(EN82)

Sep 13 0858 VE6EMU>W7(CN87 51a)

Sep 16 1009 VE4ARM>W9(EN44 52a)

Other Modes

For once, reports from the other side of the Atlantic were both more numerous and more interesting than those from Europe. Most notably, the western hemisphere enjoyed a tep season, where Europe did not - though this may have been due to lack of activity rather than propagation failure. Whatever the explanation, there were four days when South American stations were worked from the States and, unlike the earlier summer months, the contacts were deep into South America rather than by multiple-hop Es into the northern fringe. All the reported contacts were into W4 and all or most were with Florida, which approximates to the 'high water mark' for 'normal' tep. At the southern end, most reports related to PY2 and PY8, with ZP on one day, but on the 18th, signals reached right down to Patagonia, around 55 degrees South - not unprecedented but not all that frequent either.

On 17 days propagation was reported between South America and Central America or (much more frequently) the Caribbean islands. The 22nd and 23rd were particularly productive days. With just one or two 50MHz operators on any island except KP4 the collective results are more significant than reports for any individual country. This is also the area where tep is more to be expected than anywhere in the continental US.

South America<>Central and North America

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30
C. Am						+	+	+			+		+	+	+		+	+	+		+	+	+			+	+	+	+	
USA																		+			+	+	+							

South America<>Central and North America

PY 17 days	6(9Y) 7(FM,PJ,V4,9Y) 8(V4,9Y) 11(9Y) 13(9Y) 14(FJ,FM,TI,V4,9Y) 15(KP4,9Y) 17(9Y) 18(KP4) 19(KP4) 21(FM,PJ,W4) 22(FG,FJ,FM,HI,KP4,TI,W4,9Y) 23(FG,KP4,V4,W4,9Y) 26(9Y) 27(KP4,9Y) 28(9Y) 29(V4,9Y)
LU 5 days	13(FM,KP4) 14(KP4) 18(W4) 23(HI,KP4,W4) 26(KP4)
CX 2 days	14(KP4,TI) 22(9Y)
ZP 2 days	17(9Y) 21(FJ,W4,9Y)
OA 2 days	21(W4) 23(W4)

The detailed listings that follow also record contacts between stations in the US and TG, HI, V4, VP5, VP9, C6 and TI. These presumably were attributable to occasional Es openings. In addition, more unusually, there were a number of openings within South America, in contrast with recent months when South America rarely featured, apart from PP5AR reporting his own CQs. Here, the propagation medium has to be uncertain. Finally, a solitary but credible report of the 5T5DUB in Martinique on the 15th and a no less solitary, but not so credible, one of JA8CES into W5 on the 25th.

Sep 1 0052 VE8BY>W2 01-0200 VE8BY>W3 K0KP>W2 VA2MGLVA2YKT>W8 W0>W3 0403 VE5>VE6 08-0900 W3DOG,W3CCX>W3

Sep 2 1543 ES6RQ>K1SG(eme) 22-2300 K5AB>W4 W3DOG,W3CCX>W3

Sep 3 00-0100 W4>W5 W4>W0 C6AFP>K0GU 01-0200 W3>W3 W6>W6 1234 W4>W4 1300 W8>W9 1611 M0BCG>W7GJ(eme)

Sep 4 12-1300 W1,W2>W1 W2>W4

Sep 5 12-1300 VE2>W9 W4,W8>W4 16-1700 K1SG,SM7BAE,ES6RQ>W7GJ(eme) 1852 W5>W9 19-2000 KF4ODI>W3 W1,W2>W4 W4>W0,W3 20-2100 W1,W2>W4 W4>W0 W5>W4,W3 XE1>W5 21-2200 W0,W9>W3 W4,W9,W0,W1>W1 K0UO>W2 TG9AFX>N4CC XE2>W5 22-2300 W3>W3 XE2>W0 XE1>W5 2358 W1>W4

Sep 6 00-0100 W4>W0 W0>W9 W3>W3 01-0200 XE1>W5,W7 9Y4AT>PY2SRB W5>W3,W5 02-0300 XE1,W5>W5 XE1>W7 1323 W9>W9 23-2400 9Y4AT>PY2SRB,PP5XX

Sep 7 00-0100 FM5JC>PY2SRB,PP5XX V44KAU,YV4AB>PY2SRB 01-0200 PJ2BVU>PY2SRB 9Y4AT>PP5JD,PP5AR,PY2NQ PJ2BVU>PY2SRB

Sep 8 0127-8 V44KAI,YV4AB>PY2SRB 02-0300 PR8ZX>PY2SRB 9Y4AT>PP5JD

Sep 9 no reports

Sep 10 0333 W2>W2 1116 W2>W1 1238 W4>W4 1348 W8>W4(ms) 14-1500 W4>W1 VP9/WA4PGM>WJ4VA W3<W0 TI0SO>TI8CBT 15-1600 W4>W4 W1>W1 1606 W7>W6 18-1900 W4, W1,W2>W4 W6>W6 W7>W7 W5>W5 19-2000 W9,W6>W6 W1,W2>W2 W1,W3>W4 W1>W1 20-2100 W6>W6 W1,W3>W1 W2>W3,W0 21-2200 W2,W4>W0 W9>W9 W4>W4 22-2300 W1>W1 W9>W9 W2>W0,W1 W4>W0 23-2400 W5>W5 VE3,W2,W8,W3>W0 W3>W4 W2>VE2

Sep 11 00-0100 W5>W5 W2,W3,W9>W0 W8,W4,W1>W4 W2>VE2 02-0300 W6>W6 W4>W4 03-0400 W2>W1,W4 W3,W4>W0 W1>VE2 VE7>W9 04-0500 W8,W1>VE2 W2,W8,W3>W8 05-0600 W4>W4,W8 W2,W9>W9 W0>W0 aurora 08-0900 W8>W9 W1>W0 10-1100 W9>W4 W8>W1 11-1200 W8,W3>VE2 W2>W1 12-1300 W2,W3,W1>W1 V44KAI>KE4WBO XE2,W5>W4 13-1400 W2>W1 W8>W3 W4>W4,W1,W3 W3,W2,W8>W3 W4,W5>W0 14-1500 W1>VE2,W4 W3>W0

W4>W3,W4 W2,W3>W3 W8>W4 W2>W1 W0>W016-1700 W4>W0 W2>VE2,W1 HI3TEJ>K4QL 17-1800 VP5KE>N3DB,KS4S,W3SO W4,W3>W0 W3,W2,W1>W1 VP9./WA4PGM> NW5E/4,WE2N, N3DB XE1>W2 W1>VE2 W6>W6 18-1900 VP9/WA4PGM>N3DB,KR1ST/4 W6>W6 VP5KE>N3DB,KA3DQD W8,W1>W1 W2>W0,W4 19-2000 W4>W0 W1,W2>W1 W4,W8,W9>W4 aurora 20-2100 W4>W1 W6>W6 W2,W8>W4 W9>W9 21-2200 W0,W8,W4>W0 W2,W3>W4 W2>W2,W1 W9>W9 22-2300 W2>W1,W5 W4>W9,W3 W8,W5,W2>W4 W4,W5>W1 W4>W3 W0>W2,W4 TI0SP>K3LP W8,W5>W5 C6AFP>K8LEE 23-2400 W4>W5,W3 W3>W5,W1 W9,W0,VE3,W6>W4 W5,W4,W2>W1 VP9/WA4PGM>K4UTE,W4OV VE3>VE3

Sep 12 00-0100 W4,XE1>W4 W5>W3,W8 W4>W0 W1>W1 W3,W8>W9 01-0200 XE2>W8 W3,W9>W5 W0,W2>W1 W0,W6>W4 W0>W0 02-0300 W3>W1 W8,W2>W0 W4,W9>W8 W6>W6 W3>W1 05-0600 KL7>KL7 W6>W6 0839 K8PLF>W4

Sep 13 0056 OA4B>PY2SRB 0251 XE2>W6 0427 XE1>W7 2237 LU5EGY,LU2DKX>WP4NIX LU8YD,LU2DKX>FM5JC NP4JA>PP5JD 9Y4AT,OA4B>PP5XX

Sep 14 00-0100 KP4YI>PP5XX,PY2SRB HP3XUG>PP5XX,PY2EJ 9Y4AT,OA4B>PP5JD CE3RR,LU8MB>PY2SRB KP4YV>PP5JD NP3H>PP5JD,CX4CR,PP5XX,PP5AR TI8CBT>PY2OC,CX4CR EA3RRD>PP5XX TI9SO>PY2OC 01-0200 CE3RR,NP3CW>PP5XX LU8DCH,V44KAI>PY2SRB XE1>W7 FM5JC>PP5XX PR8MZ>ZZ3KDS 02-0300 NP3CW>PP5JD FM5JC>PP5XX FJ5DX,PR8ZX>PY2SRB K5UO>HP1CL 0320 PR8ZX>PP5XX 1739 W1>W1 2248 W9>W4 23-2400 W4>W4 W3>W3

Sep 15 0051 W1>W3 01-0200 W3,W1>W3 OA4B>PP5XX 0431 W3>W3 0613 K2ZD>W3 19-2000 YV4AB,9Y4AT,KP4EIT>PR8ZX 20-2100 WP3UX,WP4NEG,WP4NIX>PR8ZX 9Y4AT,5T5DUB>FM5JC 2321 PY0FF>PR8ZX

Sep 16 0220 W4>W5

Sep 17 01-0200 9Y4AT>PY2SRB,ZP6CW 0257 OA4B>ZP6CW 0402 OA4B>ZP6CW(still 599) 1138 W1>W4 1210 W4>W4 1307 XE2>W5(t) 14-1500 W1>W1,W5 15-1600 W1>W8 N0LL>Wo(t) 1634 W1>W1 2333 W0>W4

Sep 18 0024 W3>W8 01-0200 W3CMP>W3 02-0300 W0,W1>W8 0341 W1>W9 0421 W7GJ>K7AD(eme) 1428 W4>W4 19-2000 LU1VD>K4RX LU7YS(Patagonia beacon)>KE4WBO LU1VD>KE4WBO 20-2100 LU1VD>WP4NIX,WP3YM LW3EX>K4RX LU7YX>KE4WBO

Sep 19 0104-12 OA4B,HK3BVD>ZP6CW 0317 4X/ZL1RS>W7GJ(eme) 19-2000 NP3H,KP4ED>PR8ZX 20-2100 KP4>W4

Sep 20 1855 W5>W5 2330 W8>W4

Sep 21 00-0100 9Y4AT,FJ5DX>ZP6CW OA4B>PP5XX 2057 TI0SP>TI8CBT 22-2300 OA4B>KE4WBO 23-2400 ZZ1JJD,PY1NB>FM5JC PY2BT>K4UTE FJ5DX>AA5VU

Sep 22 00-0100 PR8ZX>PP5XX ZP6CW>PR8ZX FM5JC>PP5XX PY2CX,PY2BT,CX3AN,LW4HBN>FM5JC HK3BVD>PP5XX,PP5JD,PP5AR,PY2CX,PR8ZX TI8CBT>PP5XX,PP5AR OA4B>PP5XX 01-0200 PY1RO>FM5JC OA4B>PP5JD,FM5JC FG5FP>PP5JD PY3EAM,LU6HPY,PY2MEM>PR8ZX 02-0300 PP5JD>PR8ZX FG5FP>PP5JD PT9PA,YV4AB>PR8ZX 03-0400 YV5IAL,9Y4AT>PR8ZX 0402 4X/ZL1RS>K7BV/1(eme) 1509 JH2COZ>K7AD(eme) 2159 KP4>W4 22-2300 9Y4AT>PR8ZX PR8ZX>PY5EW,PP5XX HI8ROX>PR8ZX ZZ2TUA>PR8ZX ZZ1JDR>FM5JC FM5JC>PP5XX,PY2BRZ FM5WE>PP5AR NP3H,FM5WE,PY7VG>PP5XX NP3H,K4RX>PP1CZ 23-2400 PY5IP>FG1GW PY3OG>FM5JC FM5JC,PY8ELO>PP1CZ HI8ROX>PP1CZ,PP5XX,PP5AR N4NN,FG1GW>PP5XX,PP5AR AC4TO>PP5AR,PP5XX FM1HM>PY2BRZ W5>W5 PJ2BVU>PR8ZX ZP6CW>K4UTE FJ5DX>PY3OG LW3EX>K4UTE ZP5EG>PP1CZ PY1NB>FG1GW

Sep 23 00-0100 PY1NB>N4NN KP4YI>PP1CZ NP3H>PY2N,PP5JD YV4AND>PR8ZX LU3HR>K4RX 9Y4AT,OA4B>PP5JD LW3EX>K4RX 01-0200 LU6QI>K4RX HI8ROX>N4NN V44KAI,YV4AB,PR8ZX>PY2SRB 02-0300 9Y4AT,YV4AB,LU5EGY>PR8ZX HK3BVD>PR8ZX,PP5AR 22-2300 LW5EE,LU1VD,LU7WW,LW1DZ,LU7FA,PP5AR>HI3TEJ HI3TEJ>PP5AR LW1DZ,LU5DIT,LU7WW,LU5VV>WP4NIX WP4KJJ>PP5AR FG5GP>PP5JD OA4B>KE4WBO

Sep 24 00-0100 WP4LUU>PP5AR PY1NB>WP4NIX WP4KJJ,YV4DYJ,KP4YI,OA4B >PP5JD LU3HR>PR8ZX,WP4NIX YV4DYJ>PR8ZX 0127 YV4DYJ>PP5JD 02-0300 OA4B>PP5JD LU1AYZ,LU2NI>PR8ZX 0318 HK3BVD>PR8ZX 1329 JM1DTF>W7GJ(eme) 1408 W4>W4 2118 47.8(CE)>PR8ZX

Sep 25 01-0200 YV4DYJ>PY2EJ,PP5AR LU4OO>PR8ZX 02-0300 ZP4KFX>PR8ZX JA8ECS>K5GUS(?) 2050 CEbc>PR8

Sep 26 00-0100 WP4LUU>LU2NI 9Y4AT>PP5XX LU6HPY>PR8ZX 01-0200 YV4DYJ>PY2EJ HK3BVD>PR8ZX 0332 HK3BVD>PY2EJ 2209-43 W8,W9>W4

Sep 27 0127 9Y4AT>PR8ZX 22-2300 PY5>PY2 PR8>PY2

Sep 28 0008 9Y4AT>PR8ZX 01-0200 YV4AB,9Y4AT,CEbc,LU1HK>PR8ZX 02-0300 LU8DCH,LU5EGY,PT9PA>PR8ZX WP4LUU>LU2NI 0818 PY1RO>K1SG(eme) 1821 W3>W3

Sep 29 00-0100 FJ5DX>PP5JD 9Y4AT>PY5EW,PP5JD V44KAI>PY5EW PR8>PP5 WP4LX>PP5JD 01-0200 9Y4AT,LW3EX>PR8ZX

Sep 30 no reports

Asia/Pacific

Japan

6m DX results in JA during September from JA1VOK

Decidedly a thin month, lifted a little by openings to VK4 on three days - compared with six days in September 2004 (plus 10 days to VK6 and 7 to VK8).

Sep 4	0950-1010 DU1EV/B (JA3-6)
8	0650-0830 DU1EV/B, VK4RTL/b, VR2SIX/b
11	0325-0330 VR2XZK
24	0720-0900 T88EM, V73SIX
25	1110-1120 VK4ABW
26	0410-0900 DU1EV/B, KG6DX, V73SIX/B, VK4BLK, XV1AA
28	0720-0730 XV1AA

Elsewhere

Sep 4 0908 VR2SIX>KG6DX

Beacon News and 28 MHz Worldwide

Compilation and Commentary by G3USF

Beacon News

Entries below may be out of synch with nominal publication date of the Report.

1810.5	OK0EV will QSY 1853. Does not operate nights or during major contests (OK1FHH Jan.)
28196	VA2MGL QRT (VA2MGL Jan. 06)
28209	EI0TEN returned to service 1 Jan 2006 (EI5FK)
28214	N4LEM frequency change (WB4JHS)
28217.9	W6GY moved to Star, Idaho (DN13), with 1 watt to 5/8 vertical A1a 24/7. Reports to garyponte@msn.com (W6GY Jan. 06)
28237.5	LA5TEN returned to service in November from new location nr Oslo (JO59JP) with 15 watts to Moonraker 1/2 wave.
28300	VK2RS with 5 watts to 3/4 vertical reported here from Bathurst NSW (QF46SN) may be temporary for Es season down under? (Dec.) . Was on 28485 for a time.
50003	VE2TH thought to be QRT (K1TOL)
50015	VA2MGL QRT (VA2MGL Jan. 06)
50038	VA2MGL QRT (VA2MGL Jan. 06)
50047	VA2ZFN Mt Kanasuta QC (FN08IE) 4 watts to halo (VE2XK Dec.)
50055.6	VA7SIX (CN89) is reported to have returned to service (K1TOL Dec.)
50061	AE3J/b+N3CJM/b currently operating part-time, later full-time. FT817 with 5 watts to 5/8 GP at 8m. AE3J is Bill; N3CJM XYL Robin, Location Aston Township PA (FM29GU). Email ae3j@comcast.net. (AE3J Dec.)
50120	VR2RS with 5 watts to 6-el Quagi beaming JA/VK4/VK8, possibly temporary for Es (Dec.)
50315	VK5RBV revised details: Barossa Valley (PF95MK) runs 12 watts to horizontal halo 24/7

28 MHz Worldwide

Compilation and commentary by G3USF

A combination of cyclical decline and a greater incidence of geomagnetic activity not surprisingly produced results below September 2004 levels for the majority of inter-continental paths. Added to this, however, were indications that the results were affected by declining activity levels as patchy propagation discouraged some operators. A reminder, therefore, that both the following tabulation and commentary reflect only what is reported, and therefore provide a minimum record of the state of the band.

Overall, there were reports of propagation from, to, or within Europe on every day of the month, although on several days - notably the 1st, 13th, 14th 19th, 20th and 23rd, they were very scanty. Reported propagation between Europe and Africa fell from 29 days in 2004 to 19 this year. South America was down from 28 days to 23, though there was one particularly good opening on the (European) evening of the 12th. Openings between Europe and North America were reported on 8 days (11), all during the European evening. These included strong signals from the Caribbean and Central America on the 15th and reception of the low-power K4AIF and N4HLF beacons on the same evening. TI0SP and KH2RU/KP4 were worked from EA4 between 2016 and 2033 on the 10th. Asia, mainly the Middle East/Gulf area, was down only one day to 18 days. However, there was one good opening to VU, BV and YC around noon on the 11th. There were three days with propagation to Australia (all VK6), compared with thirteen in 2004.

Paths between North/Central America and South America held up well, with openings every day, with the noon, afternoon and evening periods particularly consistent. Oceania was reported in North America on 14 days, compared with 23 in 2004 when there was a higher level of expedition activity. Africa was worked on only three days as was Asia (2004 five days.) The most notable contact was between JG2TKH - one of the sharpest-eared JA ops - and NP4A at 2307 on the 19th over a skewed path. The evening path between South America and Asia (essentially Japan) held up reasonably well, with openings reported on thirteen days (16), mostly during the second half of the month as F2 critical frequencies increased. As has so often been the case most reports related to beacon reception, suggesting that many possibilities of contacts may have been lost to low activity. South America also worked into Oceania on ten days - all during local evening. At this stage of the cycle long-path reports are rare. However 5Z4DZ reported JA1DDH calling a C21 station long-path at 2212 on the 26th.

Sporadic-E was still the major factor in northern hemisphere propagation, though some intra-continental F-layer openings were noted during the second half of the month on days when the geomagnetic field was inactive. Working within Europe was noted on 25 days, including some by aurora. These included SK5AE heard by SM2LIY at 1618 on the 2nd, reception of OH9TEN, also by SM2LIY, 53a at 1421 on the 6th and OH5RAC, again heard by SM2LIY 53a at 2142 on the 12th. DK0KG copied DL0IGI 43a on the 9th at 0930. Working within North/Central America was reported on every day in the month by a mix of Es and F2. As usual, there were no reports of auroral signals.

28 MHz Worldwide - September 2005