SOLAR NOTES

Edited by Nick James

Activity was broadly comparable to last month but an increase in high-latitude spots indicates that the new cycle is now well underway. A rise in activity cannot be far away.

White light MDF, 1997 May

Observer	MDF				R		Q	
	North	South	Total	Days	Total	Days	Total	Days
J.G. Gissing	0.53	0.12	0.65	17	-	-	1.10	17
W. Heyes	0.70	0.20	0.90	10	-	-	1.90	10
E.H. Strach	1.00	0.29	1.29	24	17.00	24	3.29	24
P. Meadows	1.05	0.32	1.37	19	16.84	19	2.74	19
G.F. Johnstone	0.73	0.00	0.73	11	8.45	11	-	-
G. North	0.70	0.10	0.80	20	10.25	20	-	-
K.J. Medway	0.89	0.18	1.07	27	-	-	-	-
T. Tanti	1.15	0.50	1.65	26	22.20	26	3.30	26
CUAS	0.89	0.30	1.19	27	14.40	27	-	-
M. Götz	-	-	0.60	21	11.60	21	-	-
MEANS	0.88	0.25	1.08	202	15.10	148	2.65	96

MDF = Mean Daily Frequency of active areas, R = sunspot number, Q = mean quality estimate (JBAA 98,6,pp282-286)

Sunspot Activity, 1997 May

Overall activity was at the same level as in April but the dominant hemisphere was the N. Several high-latitude spots were seen during the month in keeping with the start of the new cycle. Strach reported that he recorded a total of seven groups during the month, only one of which was sufficiently near to the equator to be definitely of the old cycle.

The month began quietly and Meadows reports that the first four days were spotless. On the 5th an Hsx spot appeared around the E limb at N20/140. The spot was remarkably stable and it achieved a maximum area of 70 millionths. It crossed the CM on the 11th and by the 13th Strach reported that it had developed attendant satellite spots.

Meadows also reports a small Bxo group at N23/197. This was seen on the 6th but it was not observed on the 7th and 9th. It reappeared on the 10th only to disappear again on the 12th.

Strach reports that a low-latitude group at N5/14 approached the CM on May 20th as a bipolar group which spanned 8° of longitude. This distance had increased to 9.5° on the 23rd and a single spot was seen to the E of the group at N1.5/4. The whole group faded as it approached the W limb on May 26. On the 25th Meadows measured the position of this spot as N7/23

Two other groups were visible on the 25th at S34/306 and S26/269 and both were type Bxo. By the 26th Meadows reports that two additional groups had appeared, one at N2/9 of type Axx and the other at N29/3 of type Cro. Both had disappeared by the next day leaving an area of faculae near to the W limb.

On the 27th another small group was seen near to the E limb at N26/212. This developed into a Cro type when seen on the 29th and 30th. Heyes reports that this group lost its leader on the 31st and became a J-type group.

Strach reports polar faculae in the S on May 30.

Prominence MDF, 1997 May

Observer	All Latitudes				0-40°			40-90°		
	North	South	Total	Days	North	South	Total	North	South	Total
E.H. Strach	2.52	2.62	5.14	21	1.62	1.19	2.81	0.90	1.43	2.33
K.J. Medway	1.96	2.88	4.84	25	1.12	1.68	2.80	0.84	1.20	2.04

Prominence activity, 1997 May

Medway reports that the most notable display of the month was the row of pillars/arches seen on the SE limb on May 26. By the 27th the height of the arches had increased and the base had broadened. Strach observed many filaments throughout the month including a very dense example which accompanied the follower side of the spot at N26/209.

Flares, 1997 May

Date	Time	Lat	CMD	Type	Obs.
25	1347-1415	S26	E52	Sf	KJM
25	1432-1437	S20	E52	SB	KJM