

Tuning tests made during the occasion of the bursts indicated broad band emission.

The next occasion when conspicuous solar noise was recorded was on April 6, again with the appearance of a very large sunspot group. This was followed by a similar occurrence on April 15. In the interim, the sensitivity of the recording apparatus had been improved and at the same time the scale extended, thus avoiding any off-scale readings and making possible records of equivalent CW reception between 2 and 3 microvolts. A graphical exhibit of the burst of April 6, again at 45 mc, with the control records of April 5 and 7, is shown in Fig. 3.

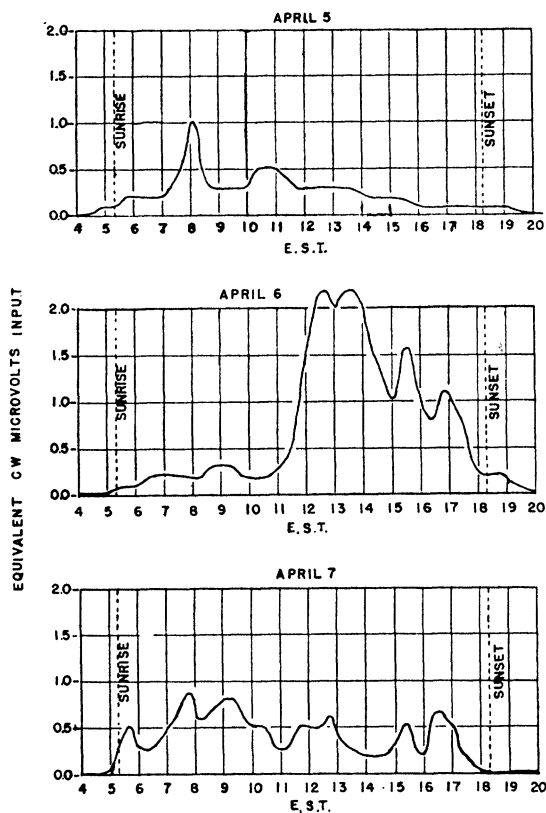


FIG. 3. Solar emission at 45 mc accompanying large sunspot of April 5-6-7, 1947.

With the return of the same active area on the sun early in May, noise bursts were again noted. On May 20, these were coincident with certain solar fade-outs on our recorders of WWV at 5-, 10-, and 15-mc frequencies.

It had been anticipated that, with the continuation of solar activity, other bursts of comparable magnitude would be recorded. However, although the dipole and the recorder have since been in continuous operation, no bursts of such magnitude as those accompanying the sunspot of March 8 and 9 and of April 6 have been recorded.

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Beta-Glucuronidase

In conjunction with studies on beta-glucuronidase activity, interesting data were obtained from newborn infants. Infant cord blood was found to possess less beta-glucuronidase activity than maternal venous blood, thus confirming an earlier report (Donald F. McDonald and Lester D. Odell. *J. clin. Endocrinol.*, 1947, 7, 535-542). However, within 10 days the activity of infant venous blood (jugular puncture) had increased several fold. In fact, these levels were in excess of those found in normal pregnant patients near term. There was no differentiation as to sex, nor was breast feeding responsible. This observation may relate to the susceptibility of newborn infants to the formation of edema. It is known, for example, that pregnant women who develop preeclampsia, a syndrome associated with edema and difficulty in excreting NaCl, likewise exhibit an increased activity of beta-glucuronidase in the blood serum (Lester D. Odell and Donald F. McDonald. *Amer. J. Obstet. Gynec.*, July 1948).

BETA-GLUCURONIDASE ACTIVITY

Infant and Maternal Blood Serum			
Identification	Maternal	Cord	Infant 10 days
260680	372	159	734
397239	466	204	921
296090	429	101	501
352344	367	283	379
422196	619	269	845
426787	408	39	945
392237	562	174	920

Infant Urine Day of life										
0	1	2	3	4	5	6	7	8	9	10
8	111	555	155	670	157	232	136	74	525	845
28		520	1,000	182	84			93		703
9					577					298
2										
4										

(Single determinations on different infants.)

Amniotic Fluid				
Identification	Maternal serum	Amniotic fluid	Infant urine*	Cord serum
392237	562	391	9	174
434537	530	157	2	

* Within 10 min of birth. Figures express gamma-phenolphthalein liberated/100 cc of serum or urine/hr. The method of analysis was that described by W. H. Fishman and B. Springer (to be published), which employs phenolphthalein glucuronide as substrate and which is an improvement over a previously reported method (P. Talahay, W. H. Fishman, and C. Huggins. *J. biol. Chem.*, 1946, 166, 757-771).

The activity of beta-glucuronidase in infant urine was also of interest. At birth there was little activity, but this again increased during the first 10 days of life. There was no differentiation as to sex, nor was breast feeding responsible. The amniotic fluid was considerably higher in enzyme activity than the urine of newborns but less than maternal blood serum. Therefore, it is assumed that the beta-glucuronidase contained in amniotic fluid does not originate from fetal urine. Whether this

also implies that amniotic fluid originates from maternal rather than fetal sources is worth consideration. The probable influence of antiglucuronidase (inhibitor) (W. H. Fishman, K. J. Altman, and B. Springer. *Fed. Proc.*, 1948, 7, 154) on these changes is under investigation by one of us (W. H. F.).

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More About Ridgway's *Color standards and color nomenclature*

The account in *Science* (June 11, pp. 626-628) by Illman and Hamly on the unreliability of Ridgway's classic volume was very interesting. The authors seem not to have realized, however, that there is more than one edition of Ridgway's work. Some of the data they tabulate appear to concern copies of different editions and hence give somewhat false criteria by which to judge the imperfections of the book. The particular copy that they call the "good copy" is almost certainly one of the reprints, and perhaps others of the series examined are of the same sort.

Presumably because of the continuing demand for Ridgway's work, after the edition was exhausted, the printers of that volume undertook to reissue the work about 1937, using an undetermined number of leftover sheets and preparing new ones to fill the gaps—without the benefit of Ridgway's personal attention, since he had died some years previously. Still later, about 1940, an entirely new set of plates was projected, but whether they were issued or not I am unable to say. Unfortunately, no indication was given on the title page or in the letterpress that the new books were different from the originals, although there are minor distinctions that are apparent on comparison with an original, other than those found in the colors themselves. The colors in a great many cases are far from accurate counterparts of those of Ridgway's own preparation.

Of two original copies immediately available, one has been very little used, while the other has seen continuous service for the last 18 years. Although both show some spotting and discoloration—much more evident in the heavily used copy—the unaffected portions are identical in both or so nearly alike that a colored object matched in one set would find the same place in the other. On the other hand, a relatively new copy of the reissued work is decidedly different from the others. The differences, I am sure, are due not to deterioration of the older examples but to faulty preparation of the reissue.

I have no wish to criticize the *Mursell book of color* of which Illman and Hamly speak so highly. It is indeed a

fine work, and one may hope that the pigments used in its preparation will prove to be more permanent than some of those available to Ridgway in 1912. I maintain, however, that Ridgway's *Color standards and color nomenclature* has not deteriorated so much and is not so useless as we are asked to believe. The problem is one of keeping references restricted to the original work, which I admit is difficult, since the printers have given no unequivocal clue to the reprints as they should have done. Whether the reprints are uniform among themselves also remains to be determined by someone with access to a number of copies. At any rate, they should not enter into a judgment of the original work.

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A Method for Recovery of Platinum From Potassium Iodoplatinate

In attempts to recover platinum from potassium solutions derived from the chloroplatinate colorimetric procedure (C. Hurwitz and H. W. Batchelor. *Soil Sci.*, 1947, 63, 351-359), it was found that recovery of the platinum from the chloroplatinate excess was fairly easy when the zinc-hydrochloric acid method was used. However, after the potassium chloroplatinate precipitate was converted to potassium iodoplatinate by buffering to pH 1.5 with potassium chloride and hydrochloric acid and adding potassium iodide, recovery of the platinum from the iodoplatinate solution was found to be extremely difficult, if not impossible. A search of the literature revealed no clues regarding possible methods of recovery of iodoplatinates.

Since a considerable volume of iodoplatinate solution was on hand, it was decided to try to find some method of reclaiming the platinum. Addition of a base followed by heat and subsequent addition of zinc and hydrochloric acid yielded no platinum precipitate, nor were substitutions of other acids for hydrochloric acid successful. Replacing the iodine in the iodoplatinate by passing chlorine gas through the solution yielded a solution from which a platinum precipitate could be obtained if the iodine were sublimed and removed in the gaseous state or separated out by filtration. However, this method of recovery would probably be as costly as the amount of platinum recovered and would be dangerous to the worker if there should be a chlorine leak. The iodoplatinate solution was found to yield a platinum precipitate upon addition of hydrochloric acid and zinc only if it had stood for a week or more before the zinc and acid were added. It was not found possible to do this with freshly developed potassium iodoplatinate. Further study of this problem is in progress.

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