British Association for the Advancement of Science.

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I. General Notes on Registers from Similar Horizontal Pendulums (Milne Type).

THE following registers are continuous with those published by the Seismological Investigation Committee in their first thirteen circulars and in the Reports of the Association, 1896 to 1899.

If observers at these and other places will kindly send a copy of their register, together with copies of their more important seismograms, to the Secretary of the Seismological Investigation Committee, British Association, Burlington House, London, W., as early as possible after June 30, and again after December 31 of each year, the interval of time which must elapse before they receive copies of the registers of co-workers in various parts of the world will be considerably reduced.

The time employed is Greenwich mean time (civil), expressed in hours, minutes, and in decimals of minutes. 24 or 0 hours = midnight.

Amplitude indicates half of the complete range of the maximum motion, and is expressed in millimetres. Values less than 1 millimetre refer to the thickening of the line and indicate half its width.

As 1° turn of the calibrating screw in the bed-plate of the instrument causes a tilt of 1".9, and as this is accompanied by a measurable displacement of the outer end of the boom, it is easy to determine the angular value corresponding to a 1 millimetre displacement. This quantity should be stated at the end of each register.

II. Registers.

The Register from Shide, Newport, Isle of Wight, England. Director, JOHN MILNE; Assistant, SHINOBU HIROTA.

The following entries refer to records obtained from three pendulums, A, B, and C. The periods and "sensibilities" or deflections for 1° turn of the calibrating screw were as follows :--

A. Period 17 seconds. 1° turn = 4 mm.
B. Period 25 seconds. 1° turn = 9 mm.
C. Period 20 seconds. This pendulum records N.S. motion and is without a calibrating screw. A and B record E.W. motion.

$P_i =$ Preliminary tremors. $p_i =$ maximum period. $d_i =$ duration. a = amplitude. Ats. = Air tremors.

No.	Date	Commence- ment	Max.	Max. Ampli- tude	Dura- tion	Remarks
		1	1906.			· · · · · · · · · · · · · · · · · · ·
1105	Jan. 2	н. м. 4 33 [.] 7	н. м.	мм. 0.2	н.м. 03 05	B. C. Not on A.
1106	,, 2	$13 49.9 \\ 13 56.0$		$0.5 \\ 0.2 \\ 0.2$	$\begin{array}{c} 0 & 10 \\ 0 & 3 \end{array}$	C. Not on A. B. ,, ,, ,, C.
$1107 \\ 1108$,, 3, 4	$\begin{array}{ccc} 3 & 12.9 \\ 3 & 47.4 \end{array}$		$0.3 \\ 0.2$	$\begin{smallmatrix} 0 & 18 \\ 0 & 5 \end{smallmatrix}$	C only. B .,
1109 1110	,, 4 ,, 10	$5 31.4 \\ 13 44.6$	_	$0.3 \\ 0.2$	$\begin{smallmatrix} 0 & 7 \\ 0 & 53 \end{smallmatrix}$	С " А.
1111	,, 21	$\begin{array}{ccc} 13 & 46\cdot 8 \\ 14 & 1\cdot 4 \end{array}$	$\begin{array}{ccc} 13 & 57 \cdot 1 \\ 14 & 11 \cdot 7 \end{array}$	$ \begin{array}{c} 0.5 \\ 2.0 \end{array} $	$\begin{smallmatrix} 0 & 23 \\ 1 & 23 \end{smallmatrix}$	B and C. A. $P_1 = 9.3m$.
1112	,, 24	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	2.0 2.0 0.3 0.5 0.5	$\begin{array}{cccc} 1 & 32 \\ 1 & 35 \\ 0 & 29 \\ 0 & 20 \\ 0 & 15 \end{array}$	p = 24s. B. $P_1 = 8.5m.$ C. $P_1 = 9m.$ A. B. C.

The Register from Shide, Newport, Isle of Wight, England-continued.

No.	Date	Commence- ment	Max.	Max. Ampli- tude	Dura- tion	Remarks
1113	Jan. 25	н. м. 2 0·0 2 0·9	н. м. 2 6·1	мм. 0·2 0·5	н. м. 0 1 0 10	A. C. B slight tre-
1114	,, 26	0 26.0	_	0.2	0 31	Mors. A. 3 groups 6m.
		0 27.3	_	0.1	05	B. For C a. \equiv 0.2.
1115	,, 27	10 19-3	10 45.0	1.0	2 30	A $P_1 = 6m 20s$
1116	,, 28	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$		$ \begin{array}{c} 0.2 \\ 0.1 \\ 0.2 \end{array} $	$ \begin{array}{ccc} 0 & 49 \\ 0 & 5 \\ 0 & 16 \end{array} $	p. = 16s. A. B. C.
1117 1118	,, 31 ,, 31	$\begin{array}{rrrr} 14 & 59\cdot7 \\ 15 & 48\cdot8 \\ 15 & 47\cdot3 \end{array}$	$ \begin{array}{r} 16 & 28.4 \\ 16 & 11.1 \\ 16 & 20.0 \\ \end{array} $	$0^{ 2}{>20 \cdot 0}{>17 \cdot 0}$	$ \begin{array}{r} 0 & 5 \\ 5 & 5 \\ 4 & 20 \end{array} $	B and C. A. B and C.
1119 1120	,, 31 Feb. 1	$\begin{array}{cccc} 22 & 14\cdot 2 \\ 2 & 51\cdot 9 \end{array}$		0.2 0.5 0.5	$\begin{array}{ccc} 0 & 5 \\ 1 & 45 \\ 1 & 30 \end{array}$	B and C. A. B.
1121 1122	,, 2	$\begin{array}{cccc} 2 & 51\cdot 3 \\ 0 & 2\cdot 0 \\ 0 & 3\cdot 1 \\ 17 & 8\cdot 0 \end{array}$		0.2	$0\ddot{5}7 \\ 0 5 \\ 1 48$	C. A. B. Not on C.
		17 21.0	$17 34 \cdot 3 \\ 17 34 \cdot 2$	$ \begin{array}{c} 0.2 \\ 0.5 \\ 0.3 \end{array} $	$ \begin{array}{c} 1 & 40 \\ 0 & 35 \\ 0 & 20 \end{array} $	A. B. C.
1123 1124	,, 3 ,, 5	23 0.0 abt. —	5 51.6	4.0	0 50	B and C. Ats. a. for B 0.3, for C 0.5. Ats. A
1125	,, 12	$14 \ 35^{.}2$		0.1	05	not working. B. Not on A or C.
1126	,, 16	$ \begin{array}{ccc} 16 & 56 \cdot 8 \\ 18 & 3 \cdot 4 \end{array} $	17 <u>5</u> 9·0	0·4 0·2	$\begin{array}{ccc} 2 & .0 \\ 0 & 20 \end{array}$	B. C. A not work- ing.
1127	,, 17	1 44.4	1 33·2 —	0.3	0 32	B. Ats. C. A not work- ing.
1128	,, 19	$\begin{array}{cccc} 2 & 22 \cdot 6 \\ 2 & 21 \cdot 9 \\ 2 & 21 \cdot 9 \end{array}$	$ 3 8.1 \\ 3 19.3 \\ 4 0.3 $	$0.2 \\ 2.5 \\ 2.0$	$egin{array}{ccc} 2 & 13 \\ 2 & 0 \\ 2 & 40 \end{array}$	A. B. C.
1129	,, 23	7 50.6	4 05	0.5	05	C. Not on B. A not working.
1130	,, 24	$ \begin{array}{ccc} 1 & 14.6 \\ 1 & 2.6 \end{array} $	1 9.6	$\begin{array}{c} 0.2 \\ 0.2 \end{array}$	$\begin{smallmatrix} 0 & 5 \\ 0 & 5 \end{smallmatrix}$	B. Slight Ats. C. """A has Ats.
1131	,, 26	14 4.4	-	0.1	03	B and C. A not working.
1132	,, 26	23 33.1	23 40.0	0.2	0 12	C. B just visible. A not work- ing.
1133	,, 27	$\begin{array}{ccc} 20 & 4\cdot 0 \\ 20 & 0\cdot 3 \end{array}$	$\begin{array}{ccc} 20 & 17 \cdot 0 \\ 20 & 16 \cdot 7 \end{array}$	$ \begin{array}{c} 0.5 \\ 1.0 \end{array} $	$\begin{smallmatrix}&&0&30\\0&45\end{smallmatrix}$	B. C. A not work- ing.
1134	,, 28 	$\begin{array}{rrrr} 13 & 49{\cdot}4 \\ 13 & 54{\cdot}1 \\ 13 & 54{\cdot}1 \\ 13 & 54{\cdot}1 \end{array}$		$0.3 \\ 0.2 \\ 0.3$	$\begin{array}{c} 0 & 44 \\ - & 8 \end{array}$	A. B. Ats. C.

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The Register from Shide, Newport, Isle of Wight, England-continued.

No.	Date	Commence- ment	Max.	Max. Ampli- tude	Dura- tion	Remarks
1135	March 2	н. м. 6 24 ⁻⁵ 6 34 ⁻⁴	н. м. 6 50 [.] 5 6 44.0	мм. 2·0 1·0	н. м. 124 025	A. B.
1136	,, 8	$\begin{array}{ccc} 6 & 32.0 \\ 17 & 36.5 \\ 17 & 52.1 \end{array}$	$\begin{array}{ccc} 6 & 42 \cdot 0 \\ 17 & 56 \cdot 2 \\ 17 & 53 \cdot 5 \end{array}$	$2.0 \\ 1.5 \\ 1.0$	$ \begin{array}{c} 0 & 30 \\ 1 & 8 \\ 0 & 38 \end{array} $	$\begin{vmatrix} C. \\ B. \\ C. & A not we ing. \end{vmatrix}$
1137	,. 9	20 43.7	-	0.2	040	C. For B a 0.2. A
1138	,, 10	—	8 6.5	1.2	0 35	working. C. B invisi A not work
$\frac{1139}{1140}$,, 10 ,, 11	$\begin{array}{cccc} 16 & 55\cdot 2 \\ 17 & 5\cdot 5 \\ 3 & 34\cdot 5 \end{array}$	$17 52.1 \ 3 38.6$	0.2 0.5 0.2	$\begin{array}{c} 0 58 \\ 1 25 \\ 0 18 \end{array}$	B.,,,,,,, C. B.,,,,,,,,,,,,,,,,,,,,,,,,,
1141	,, 11	$\begin{array}{cccc} 3 & 26 \cdot 2 \\ 10 & 46 \cdot 4 \\ 10 & 4 \cdot 0 \end{array}$	3 41.7	$0.3 \\ 0.2 \\ 0.2$	$ \begin{array}{c} 0 & 24 \\ 0 & 5 \\ 0 & 5 \end{array} $	I C. B. ,, ,, , C.
$1142 \\ 1143$,, 13 ,, 13	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	$13 \ 36^{\cdot}2 \ 13 \ 28^{\cdot}1$	0.2 0.5 0.7	$\begin{array}{c} 0 & 3 \\ 0 & 10 \\ 0 & 45 \end{array}$	C only. , B. ,, ,, ,, ,
1144	,, 16	$\begin{array}{cccc} 20 & 36.9 \\ 20 & 36.4 \end{array}$	_	0.2	0 13	A. C. B with A
1145	,, 16	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccc} 23 & 40.7 \\ 23 & 32.8 \\ 23 & 40.6 \end{array}$	2.0 2.0 2.6	$ \begin{array}{c} 1 & 14 \\ 1 & 20 \\ 1 & 21 \end{array} $	A. B with Ats.
1146	,, 19			$1.5 \\ 1.6$	-	B with Ats. C ,, ,, A working.
1147	,, 20	-	4 10.5	-		B with Ats. not working
1148	,, 20	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	$\begin{array}{ccc} 4 & 16.6 \\ 15 & 36.7 \end{array}$	0.5 0.2	030 05	C with Ats. B and C. A working. B thickeni to 16h.16n
1149	,, 24	1 46.4	—	0.5	03	B. A not wo ing.
1150	,, 26	$ \begin{array}{rrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrr$	4 28.0	$0.2 \\ 0.3 \\ 0.2$	$ \begin{array}{c} 0 & 3 \\ 0 & 54 \\ 0 & 5 \end{array} $	C. A. C. On B At
1151	,, 26	10 56.6	-	0.5	05	C. """"
1152	,, 27	550.0 522.8	$5^{}56.6$	$0.2 \\ 1.0 \\ 0.2$	$ \begin{array}{c} 0 & 30 \\ 1 & 25 \end{array} $	A. C. On B At
1153	,, 27	$ \begin{array}{cccc} 23 & 45 \cdot 6 \\ 23 & 43 \cdot 2 \end{array} $	_	$ \begin{array}{c} 0.2 \\ 0.2 \end{array} $	$\begin{array}{c} 0 & 9 \\ 0 & 5 \end{array}$	A. Band C. A on B.
1154	,, 28	$ \begin{array}{ccc} 19 & 17.0 \\ 19 & 41.0 \\ 10 & 18.6 \end{array} $	-	0.2	0 25	Α.
1155	" 28	$\begin{array}{c cccccc} 19 & 18.6 \\ 21 & 7.2 \\ 21 & 5.2 \\ 21 & 7.3 \end{array}$		0.3 0.2 0.2 0.2	$ \begin{array}{c} 0 \ 25 \\ 0 \ 10 \\ 0 \ 6 \\ 0 \ 6 \end{array} $	B. Not on (A. B. C.
1156	,, 29	$\begin{array}{cccc} 22 & 7.0 \\ 22 & 36.8 \end{array}$		$0.3 \\ 0.3$	$ \begin{array}{ccc} 0 & 37 \\ 0 & 5 \end{array} $	A. B. Not on (
1157	April 2	6 10.0	-	0.5	1 47	A. Intermitt tremors.

The Register from Shide, Newport, Isle of Wight, England-continued.

No.	Date	Commence- ment	Max.	Max. Ampli- tude	Dura- tion	Remarks.
		н. М.	н, м.	мм.	н. м.	ĺ
1158	April 4	15 5.0		0.2	0 31	A.
1159	, , 5	3 48.0	-	0.5	04	A.
		3 32.8		0.5	0 15	B.
	1	3 38.0		0.3	0 14) C.
1160	,, 5	23 35.0		0.5	0 20	A.
	,,, .	23 40.0	~	0.3	06	B.
		23 34.7		0.3	0 25	C.
1161	,, 6	17 8.0		0.2	0 34	A.
1101	,,, 0	17 3.1		$0.\overline{2}$	0 27	B.
		16 6 1		0.2	0 15	Č.
1162	7	23 32.0		0.2	0 19	A.
1102	,, (23 30.7		0.2	0 10	B.
			_	$0.2 \\ 0.2$	0 6	D. C.
1100			-	$0.2 \\ 0.2$	0 40	
1163	,, 8	18 16.0	-	0.2	040	A. B.
		18 22.5				
		18 24.6		0.7	0 38	C.
1164	,, 10	21 38.1	22 11.4	9.0	2 54	A.
		21 45.0	22 2.4	7.0	1 42	B.
		21 45.0	$22 \ 10.7$	6.0	1 42	C
1165	,, 12	15 59.0	17 11.0	0.5	2 2	A. Eqke.?
1166	,, 13	19 42.2	20 18.1	2.0	0 53	в.
		19 42.2	20 9.9	2.5	0 53	C.
1167	,, 14	0 42.2	$0 44 \cdot 2$	1.0	0 25	В.
		0 35.0	0 44.2	1.5	0 30	C.
1168	,, 14	4 27.8	_	0.5	-	B with Ats.
	,,,	4 20.6	5 52.2	1.5	_	С., ,,
1169	. 16	16 52.6		0.2	0.14	B only.
1170	10	13 23.7	$13 \ 58.2$	20.0	4 23	A. p. 20s. B
	,, 10	10 201	10 00 2			and C lost.
		13 25.0	13 58.0	70.0	2 30	N.S. component
		10 200	10 000	1		on smoked
		1				paper.
1171	. 19		1 15.0	0.5		A with Ats.
TT UT	,, 19	1 14.6	1 19.0	$0.0 \\ 0.2$	0 10	B and C.
1170			0 77.1	1.7	222	
1172	,, 25	9 30.9	9 57.1			A. D. Fan C.d.
		9 46.3	9 56.6	1.0	$0\ 25$	B. For C d. $=$
	0.5	17 05 0		0.0	0.0	22m., a.== 0.5
1173	,, 23	17 25.0		0.2	0 3	A only.
1174	,, 24	9 14.0		0'3	06	,, ,, A.
1175	,, 25	2 7.0		0.2	$1 \ 0$	
		2 33.0	$2 \ 45 \ 2$	0.3	0 20	B. Not on C.
1176	,, 25	9 5.0		0.5	0 30	A. Eqke.?
1177	,, 25	11 3.0	$11 \ 18.0$	0.2	0 28	Α.
1178	,, 26	11 11.4		0.5	05	Bonly. Eqke.?
1179	,, 27	9 49.0		0.5	06	A.
		9 49.3	—	0.5	05	B and C. ,,
1180	,, 27	15 10.0		0.2	03	A.
		15 11.4	- 144	0.2	0 5	B and C. ,
1181	,, 29	16 53.0		0.2	16	A.
	t ″ .	16 56.5	17 30-3	0.2	9 45	В.
		16 56.5	$17 \ 27.3$	1.0	0 52	c.
1182	May 2	1 51.0	2 14.0	1.0	0 55	Ă.
		2 4.1	2 13.3	$1.0 \\ 1.0$	0 24	В.
	l .	1 57.5	2 13.9	1.0	0 24	C.
1183	5	1 373 0 451		0.2	0 20	C. On B Ats.
1184	1 1 10	6 26.7	6 30.8	0.2	0 15	B.
	,, 12	0 20 /	0.00		0 25	. بهر ا

The Register from Shide, Newport, Isle of Wight, England-continued.

No.	Date	Commence- ment	Max.	Max. Ampli- tude	Dura- tion	Remarks
1185	May 12	н. м. 10 51·0 11 20·5	н. м. 11 36·0 11 32·8	мм. 0.7 0.7	н.м. 120 035	A. B and C.
1186	,, 14	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$		0·2 	0 18	A. Thickenings of B. Not on C
1187	,, 18	15 34.0 15 36.2		$0.2 \\ 0.2$	$\begin{array}{c}0 & 6\\0 & 3\end{array}$	A. B. Not on C
1188	,, 25	14 13.0	—		0 30	A. Intermit tremors.
1189	,, 26	$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$		$0.2 \\ 0.2$		B. B only.
Or	are show	light tremors, vn at the follow 25d. 7·35 and 1	ving times 23d	. 20.272	4d. 7*21, •34.	a. $= 0.2$ mm., 9.2, 11.46 and
1190	June 1	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	5 54.0 5 54.0 5 39.3	$3.0 \\ 0.5 \\ 4.0$	$>2 30 \\>1 50 \\>2 30$	A with Ats. B. C ,, ,,
1191	,, 2	$\begin{array}{ccc} 15 & 33 \cdot 0 \\ 15 & 6 \cdot 2 \end{array}$	$\begin{array}{ccc} 15 & 45 \cdot 0 \\ 15 & 37 \cdot 2 \end{array}$	$0.2 \\ 0.3$	$\begin{array}{c} 0 & 30 \\ 0 & 60 \end{array}$	A ", " C. Not on B.
1192	,, 6	4 4.1		0.2	0 3	B. Ats. on A.
1193	,, 7	$ \begin{array}{cccc} 3 & 3 \cdot 0 \\ 3 & 6 \cdot 2 \end{array} $		0.2 0.1	038	A. B. On C d. = $12, a. = 0.5$.
$\frac{1194}{1195}$,, 8	$\begin{array}{ccc} 7 & 32.5 \\ 21 & 11.9 \end{array}$	21 48.9	$0.1 \\ 0.2$	$ \begin{array}{c} 0 & 4 \\ 1 & 10 \end{array} $	A. A. Eqke.?
1196	,, 11	7 12 to 11 42			-	A. Intermit.tro mors.
	,, 13	$\begin{array}{cccc} 14 & 21 \ to \\ 14 & 29 \end{array}$	-	-		A. ", "
	,, 14	7 15 to 8 0	-	-	_	A. ""
	,, 15 ,, 16	7 14 to 8 0 12 43 to				A. ", "
	10	12 55			_	
1105	,, 18	15 9 to 16 33		_		A. ", "
$\begin{array}{c} 1197 \\ 1198 \end{array}$,, 19 ,, 19	11 5.7 11 25.7		$0.2 \\ 0.2$	$\begin{array}{c} 0 & 7 \\ 0 & 11 \end{array}$	A. A.
1199		$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	$\begin{array}{ccc} 12 & 20 \\ 12 & 20 \\ 12 & 20 \\ \end{array}$	$1.5 \\ 1.0$	$ \begin{array}{c} 2 & 10 \\ 1 & 0 \end{array} $	A. B. On C d. = 1h.15m., a. = 2.0.
$1200 \\ 1201$,, 19 ,, 19	$15 \ 41.0 \ 17 \ 22.2$			0 8	А.
$1201 \\ 1202$	[,, 19]	$\begin{array}{ccc} 17 & 22\cdot 2 \\ 18 & 14.7 \end{array}$	_	$0.1 \\ 0.2$	$ \begin{array}{c} 0 & 3 \\ 0 & 19 \end{array} $	B only. A.
		$18 \ 21.1$		0.5	0 7	В.
1203	,, 20	$\begin{array}{rrrr} 18 & 14 \cdot 0 \\ 2 & 45 \cdot 5 \\ 2 & 49 \cdot 6 \end{array}$	$3 18.5 \\ 3 15.3$	0.2 0.5 0.4	$\begin{array}{c} 0 & 19 \\ 1 & 13 \\ 0 & 54 \end{array}$	C. A. B. For C d. =
1204	,, 21	7 15.0	-	0.5	0 36	50m. A. Also at 8.2
1001				,	1	and 12.35 .

The Register from Shide, Newport, Isle of Wight, England-continued.

$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	No.	Date	Commence- ment	Max.	Max. Ampli- tude	Dura- tion	Remarks.
$ \begin{array}{c c c c c c c c c c c c c c c c c c c $			u M	u M	N/M	ни	
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	1206	June 22					A. Also 10.56
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	1200	Pune 12			01	1 00	
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$				_	0.5	$0 \ 5$	B. Not on C.
$ \begin{array}{ c c c c c c c c c c c c c c c c c c c$	1207	., 24			9.2	0 40	
$ \begin{array}{ c c c c c c c c c c c c c c c c c c c$							
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	1208	,, 24					
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$							
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$				12 4.5			
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	1209	,, 25	9 46.5		0.5	$0\ 12$	
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$							
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	1210	,, 26	7 39.6		0.5	0.13	
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	1011	20	10 50.4		0.0	0.14	
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	1211	,, 20	12 00.4	_	0.5	0 14	
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	1010	50	74 6.7		0.0	0.9	
1213 ,, 27 9 45.0 - 0.2 0 3 B and C. Origin South Wales. Slight shocks 11 5.9-12 20 3	1515	,, 20					
North Wales. Slight shocks 11 59-12 20 3	1213	97					
Slight shocks 11 5 9-12 20 3	1210	,, 2,			02	0 0	
11 5.9-12 20.3							
and 14 5.9.							
							and 14 5 9.
					!		

Register from National Physical Laboratory,	Kew	Observatory		Director,
R. T. GLAZEBROOK, D.Sc., F.R.S.;	Supe	rintendent,	C.	Chree,
LL.D., F.R.S.; Observer, E. G. CONSTA	ABLE.			

No.	Date		mence- ient	M	lax.	Max. Ampli- tude)ura- ion	Remarks.
					1906.				
661	Jan. 21	к. 14		н. 14	м. 39·8	мм. 1•6	н 1	м. 5	"Repetition" of max. at 14h. 48.5m.
$\frac{662}{663}$,, 24, 27, 27	$\begin{array}{c} 22\\10\end{array}$	$14.7 \\ 21.4$	22 10	$16.9 \\ 45.4$	$0.5 \\ 1.0$	C C		Commencement indefinite.
664	,, 28	15	31.0	(16	 25*0	0.5	0) 5	Ill-defined.
665	,, 31	15	48.9	16	26-5 29-0	>17.0	3	58	Colombian eqke.
666	Feb. 1	3	18.5		_	0.4	i (
667	,, 2	17	41.5	(·		0.2	0		Ill-defined.
668	,, 16	18	8.8			0.2	<u> </u>		
669	,, 19	2	21.5	· 3	48.3	2.0	2		
670	,, 26	14	30.7			0.2	0		Ill-defined.
671	,, 26	23	41.0	•	_	0.3	i U	0	; **

Register from National	Physical Lab	boratory, Kew	Observatory -continued.
,			countrating continuation.

No.	Date	Commence- ment	Max.	Max. Ampli- tude.	Dura- tion	Remarks.
$672 \\ 673 \\ 674 \\ 675$	Feb. 27 ,, 28 March 2 ,, 3	$\begin{array}{cccc} \text{H.} & \text{M.} \\ 20 & 13 \cdot 0 \\ 14 & 2 \cdot 7 \\ 6 & 36 \cdot 6 \\ 9 & 2 \cdot 8 \end{array}$	н. м. 20 20·5 14 6·0 6 48·7 9 30·1	MM. 0.6 0.4 1.1 1.6	н. м. 0 20 0 9 0 20 1 1	 Movements smal
676 677 678 679	,, 8,, 10,, 10	$\begin{array}{rrrr} 17 & 53\cdot 3 \\ 7 & 59\cdot 2 \\ 17 & 53\cdot 8 \\ 3 & 36\cdot 0 \end{array}$	$ \begin{array}{rrrr} 17 & 54 \cdot 3 \\ 8 & 14 \cdot 3 \\ \\ \\ \end{array} $	$1 \cdot 0$ $1 \cdot 0$ $0 \cdot 4$ $0 \cdot 4$	$\begin{array}{ccc} 0 & 8 \\ 0 & 42 \\ 0 & 11 \\ 0 & 12 \end{array}$	after 9h.36m. — — — —
Or wat	1 March 12 a er lying nea	and 13 the inst ur the Observat	rument was a ory from W.	ffected by to ESE.	a very hi Boom d	igh tide, flood effected 11mm.
$\begin{array}{c} 680\\ 681\\ 682\\ 683\\ 684\\ 685\\ 686\\ 687\\ 688\\ 688\\ 689\\ 690\\ 691\\ 692\\ 693\\ \end{array}$,, 16 ,, 19 ,, 27 ,, 27 ,, 27 ,, 18 ,, 10 ,, 13 ,, 14 ,, 14 ,, 18 ,, 23 ,, 23 ,, 29 May 2	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	0.8 0.4 0.4 0.6	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	Series of small movements. Californian eqke. Seismic charac- ter doubtful. Ill-defined. "
694 695 696 697 698 699 700 701 702 703	$\begin{array}{c} , , 5 \\ , , 12 \\ June 1 \\ , 7 \\ , 19 \\ , 20 \\ , 24 \\ , 24 \\ , 26 \\ , 27 \end{array}$	$\begin{array}{ccccc} 0 & 45 \cdot 0 \\ 6 & 30 \cdot 3 \\ 5 & 3 \cdot 2 \\ 3 & 17 \cdot 7 \\ 12 & 3 \cdot 5 \\ 3 & 6 \cdot 5 \\ 7 & 59 \cdot 0 \\ 11 & 42 \cdot 3 \\ 12 & 58 \cdot 2 \\ 14 & 20 \cdot 8 \end{array}$	$\begin{array}{cccc} & & & & & & & \\ & & & & & & \\ & 5 & & & &$	$\begin{array}{c} 0.4 \\ 0.5 \\ 2.0 \\ 0.3 \\ 1.5 \\ 0.5 \\ 0.2 \\ 1.3 \\ 0.2 \\ 0.2 \\ 0.2 \end{array}$	$\begin{array}{cccc} 0 & 43 \\ 0 & 20 \\ 2 & 19 \\ 0 & 7 \\ 0 & 59 \\ 0 & 19 \\ 0 & 16 \\ 1 & 0 \\ 0 & 6 \\ 0 & 5 \end{array}$	Series of very small movements Ill-defined. Ill-defined. Ill-defined.

Scale may be taken as 1mm. $\pm 0^{"} \cdot 55$ throughout.

Register from Liverpool Observatory, Bidston. Director, W. E. PLUMMER.

No.	Date	Com- mence- ment	L.W. Commence	Max.	End	Max. Ampli- tude	Duration	Remarks	
	1906								
733 734 735 736	Jan. 2 ,, 6 ,, 8 ,, 9	н. м. 22 8.0 —	н. м. 4 33-2 22 18-3 16 17-8 23 7-7	н. м. 22 35·5 16 21·2 23 16·2	н. м. 4 39°0 22 56°0 16 39°7 23 38°7	мм. — 0·3 0·4 —	н.м. 06 048 022 031	Small. Small. A.T.preva-	
$\begin{array}{c} 737\\738\\739\\740\\741\\742\\743\\744\\745\\745\\746\\747\\748\\749\\750\\751\\752\\\end{array}$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	14 5*5 	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{c} 14 & 16 \cdot 0 \\ 7 & 45 \cdot 0 \\ 23 & 17 \cdot 4 \\ 15 & 26 \cdot 0 \\ 16 & 31 \cdot 0 \\ \hline \\ 7 & 50 \cdot 0 \\ 8 & 27 \cdot 1 \\ 10 & 37 \cdot 0 \\ 22 & 35 \cdot 3 \\ 21 & 38 \cdot 3 \\ 0 & 42 \cdot 0 \\ 1 & 38 \cdot 3 \\ 0 & 42 \cdot 0 \\ 1 & 41 \cdot 7 \\ 15 & 55 \cdot 7 \\ 15 & 19 \cdot 1 \\ \hline \end{array}$		$\begin{array}{c} 0 & 40 \\ 0 & 9 \\ 0 & 35 \\ 1 & 21 \\ 0 & 13 \\ \hline \\ 0 & 33 \\ 0 & 5 \\ 0 & 27 \\ 0 & 29 \\ 0 & 30 \\ 1 & 40 \\ 0 & 22 \\ 0 & 27 \\ \hline \\ 0 & 22 \\ 0 & 27 \\ \hline \\ \end{array}$	lent, 	
753 755 755 757 758 759 760 761 762	Feb. 1 " 2 " 3 " 4 " 7 " 7 " 8 " 16 " 19 " 23 " 24	 2_21.7 	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccc} 0 & 9.7 \\ 16 & 38.0 \\ \hline 7 & 17.2 \\ 0 & 48.0 \\ 18 & 10.5 \\ 3 & 20.5 \\ 16 & 8.1 \\ 0 & 38.9 \\ \end{array}$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	0.2 0.2 0.6 1.5 0.5 0.3	1 22 0 56 0 11 0 16 0 13 0 20 0 44 2 54 0 45 0 49	under watch hand A.T. noticeable. — — — — — — — — — — — — — — — — — — —	
763 764 765 766 767 769 770 771 772 773 774 775 776 777 778 776 777 778 780 781 782 781 783 784	, 26 , 27 , 28 , 28 , 3 , 3 , 5 , 8 , 10 , 10 , 10 , 10 , 10 , 10 , 10 , 10		$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{c} 0.2 \\ 0.4 \\ 0.2 \\ 0.2 \\ 1.0 \\ 1.2 \\ 1.7 \\ 0.7 \\ 0.7 \\ 0.7 \\ 0.3 \\ 0.3 \\ 0.2 \\$	$\begin{array}{c} 2 \\ 0 \\ 2 \\ 0 \\ 5 \\ 8 \\ 0 \\ 3 \\ 1 \\ 3 \\ 1 \\ 3 \\ 1 \\ 3 \\ 1 \\ 3 \\ 1 \\ 3 \\ 1 \\ 3 \\ 1 \\ 3 \\ 1 \\ 3 \\ 1 \\ 3 \\ 1 \\ 3 \\ 1 \\ 2 \\ 6 \\ 1 \\ 1 \\ 2 \\ 6 \\ 1 \\ 1 \\ 2 \\ 6 \\ 1 \\ 1 \\ 2 \\ 6 \\ 1 \\ 1 \\ 2 \\ 6 \\ 1 \\ 1 \\ 2 \\ 1 \\ 1 \\ 2 \\ 1 \\ 1 \\ 2 \\ 1 \\ 1$	ly colnoided.	
785 786 787 788 789 790 791 792 793 794 795	April 5 " 5 " 7 " 7 " 8 " 10 " 13 " 13 " 14 " 18		3 43:3 21 56:0 5 40:7 23 27:0 18 22:2 21 55:5 23 50:2 18 11:5 20 0:0 0 37:8 1 34:4	$\begin{array}{c} 3 & 48 \cdot 8 \\ 5 & 52 \cdot 3 \\ 23 & 32 \cdot 4 \\ 18 & 30 \cdot 0 \\ 22 & 5 \cdot 9 \\ 23 & 54 \cdot 0 \\ 20 & 8 \cdot 2 \\ 0 & 42 \cdot 3 \\ 1 & 58 \cdot 0 \end{array}$	$\begin{array}{ccccccc} 4 & 1&2\\ 22 & 4&0\\ \hline & & & \\ 23 & 50&5\\ 19 & 2&0\\ 23 & 35&0\\ 0 & 13&5\\ 18 & 19&0\\ 22 & 33&5\\ 1 & 14&0\\ 5 & 30&0\\ \end{array}$	0-2 	$\begin{array}{c} 0 & 18 \\ 0 & 8 \\ 0 & 24 \\ 0 & 40 \\ 1 & 50 \\ 0 & 23 \\ 0 & 7 \\ 2 & 46 \\ 0 & 36 \\ 4 & 6 \end{array}$	20h. 25m. Doubtful. A.T. ? End uncertain. — — — — Disturbance at 2h. 8m. Exceeded width of paper.	

Register from Liverpool Observatory, Bidston-continued.

No.	Date	Com- mence- ment	L.W. Commence	Max.	End	Max. Ampli- tude	Duration	Remarks
$\begin{array}{c} 796\\ 797\\ 798\\ 709\\ 801\\ 802\\ 803\\ 804\\ 805\\ 806\\ 807\\ 811\\ 812\\ 814\\ 815\\ 818\\ 818\\ 818\\ 818\\ 818\\ 818\\ 818$	April 15 - 18 - 18 - 29 - 29 - 29 - 29 - 29 - 29 - 3 - 5 - 12 - 12 - 12 - 12 - 15 - 15 - 15 - 16 - 12 - 15 - 23 - 24 - 24	п. м. 	$\begin{array}{c} \textbf{r}, \ \textbf{N}, \\ \textbf{6} \ \ \textbf{i} + \textbf{5} \\ \textbf{8} \ \ \textbf{10} + \textbf{0} \\ \textbf{7} \ \ \textbf{13} + \textbf{8} \\ \textbf{8} \ \ \textbf{3} + \textbf{0} \\ \textbf{2} \ \ \textbf{3} + \textbf{3} \\ \textbf{7} \ \ \textbf{13} + \textbf{8} \\ \textbf{3} \ \ \textbf{5} \\ \textbf{8} \\ \textbf{9} \ \ \textbf{17} \\ \textbf{2} \ \ \textbf{3} \\ \textbf{3} \\ \textbf{5} \\ \textbf{8} \\ \textbf{9} \\ \textbf{17} \\ \textbf{2} \ \ \textbf{3} \\ \textbf{5} \\ \textbf{6} \\ \textbf{17} \\ \textbf{2} \\ \textbf{3} \\ \textbf{6} \\ \textbf{18} \\ \textbf{16} \\ \textbf{7} \\ \textbf{6} \\ \textbf{6} \\ \textbf{17} \\ \textbf{2} \\ \textbf{3} \\ \textbf{6} \\ \textbf{11} \\ \textbf{21} + \textbf{1} \\ \textbf{11} \\ \textbf{21} + \textbf{1} \\ \textbf{3} \\ \textbf{3} \\ \textbf{3} \\ \textbf{4} \\ \textbf{3} \\ \textbf{7} \\ \textbf{5} \\ \textbf{7} \\ $	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{c} {\rm H}, \ {\rm M}, \ {\rm W}, \ {\rm W}, \ {\rm M}, \ {\rm W}, \ {\rm W}$	MM. 	$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Repetitions.

Register from Royal Observatory, Edinburgh. Director, F. W. DYSON, M.A., F.R.S. Observer, THOMAS HEATH.

No.	Date	Com- mence- ment	L.W. Commence	Max.	End	Max. Ampli- tude	Duration	Remarks.
		.=		19	06			· · · · ·
$\begin{array}{c} 308\\ 309\\ 400\\ 401\\ 402\\ 403\\ 404\\ 405\\ 406\\ 407\\ 408\\ 409\\ 410\\ 411 \end{array}$	Jan. 1 , 8 , 21 , 24 , 24 , 27 Feb 1 , 19 Feb 1 , 19 March 2 , 8 , 8 , 8 , 21 , 24 , 24 , 27 , 27 , 31 March 2 , 8 , 8 , 8 , 8 , 9 , 10 , 10	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	16 18-5 16 19-5	H. M. 16 20.0 14 11.5 7 23.0 22 18.0 10 31.5 16 30.0 3 3.5 3 55.5 16 10.5 20 22.0 6 45.0 9 29.0 17 50.5	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{c c} \mathbf{M}, \mathbf{M}, \\ 0^{-8} \\ 0^{-8} \\ 1^{-6} \\ 0^{-5} \\ 0^{-7} \\ 0^{-5} \\ 0^{-7} \\ 0^{-3} \\ 1^{-1} \\ 0^{-3} \\ 0^{-8} \\ 1^{-2} \\ 1^{-6} \\ 1^{-6} \end{array}$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	Small zigzags.

Register from Royal Observatory, Edinburgh-continued.

N0.	Date	Com- menco- ment	L.W. Commence	Max.	End	Max. Ampli- tude,	Duration	Remarks
$412 \\ 113 \\ 414 \\ 415 \\ 416 \\ 417$	Mar.16-17 ,, 19 ,, 20 ,, 26 ,, 27 ,, 27	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	II. M,	H. M. 23 38:5 8 6:0 4 15:0 4 20:0 6 6:0 10 0:5	$\begin{array}{ccccccc} \text{H. M.} & 0 & 11^{+}5 \\ 8 & 45^{+}5 \\ 4 & 27^{+}0 \\ 4 & 28^{+}5 \\ 6 & 32^{+}0 \\ 10 & 5^{+}0 \end{array}$	MM. 3·2 2·5 0·2 0·2 1·1	U. M. 0 47:5 0 44:5 0 14:0 0 12:0 0 34:0 0 5:0	
$ \begin{array}{r} 418 \\ 419 \\ 420 \\ 421 \\ 422 \\ 423 \\ 423 \end{array} $, 28 April 8 , 10 , 13 , 14 , 14	$\begin{array}{cccccccccccccccccccccccccccccccccccc$		$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	0·25 4·0 1·7	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	Series of small
424 425 426	,, 18 ,, 19 ,, 19	13 23·5 1 10·5 8 27·0	13 50·0 — —	13 55·5 1 15·0	17 8.0 1 29.5 8 50.5	0+5	3 44.5 0 19.0 0 23.5	Slight tremor 18h. 46m, to 18h.30m. Very slight tre- mors.
427 428 429 430 431 432 433 434 435	, 23 May 2 ,, 5 June 1 , 7 , 19 , 20 , 24	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$ \begin{array}{c} - \\ 5 \\ 40.0 \\ - \\ 12 \\ 15.5 \\ 12 \\ 12 \\ 14.0 \end{array} $	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	0.3	$\begin{array}{c} 0 & 18 \cdot 0 \\ 0 & 14 \cdot 5 \\ 0 & 48 \cdot 0 \\ 0 & 15 \cdot 0 \\ 2 & 17 \cdot 0 \\ 0 & 3 \cdot 5 \\ 0 & 55 \cdot 5 \\ 1 & 34 \cdot 0 \\ 1 & 22 \cdot 5 \end{array}$	
436	,, 26	12 48.5		12 52.5	12 57.0	1.7 !	0 8.5	23.5m. Two tremors of unusual type.
	190)6, Jan. Feb. May 2 May 2	29.	footscrev "	w = 3.67 = 3.57 = 3.55 = 3.30	mm.	end of b	00m.

Mean = 3.04 mm.. · . 1 mm. displacement at end of boom = 0".54 tilt of pillar.

Register from the Coats Observatory, Paisley. Superintendent, DAVID CRILLEY.

No.	Date	Com- mence- ment	L.W. Commence	Max.	End	Max. Ampli- Duration tude	Remarks.
293 194 295 296 ;	Jan. 2 ., 2 ., 5 ., 8	н. м. 11 24 20 12	н. м. — —	H. M. 4 36 20 28 16 17.5	06 н. м. 12 31 21 23	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	Thickening.

Register from the Coats Observatory, Paisley-continued.

288 ,							_		
237 Jan. 21 14 1-5 14 10-5 15 44 1-6 1 43 Two remenses 238 "" 24 - - 7 21 - 0.5 - boff or 6h. Conserved. 290 " 26 - - 0 25 - - - Thickening. 301 " 27 10 10 18-5 - 11 50 5 14 " - - - - Thickening. - - - - Thickening. - - - - - - - - - - - Thickening. - - - - - Thickening. - - - - - - Thickening. - - - - - Thickening. - - - - - - - - - - - Thickening. - - - - - - Thickening. - - -<	No.	Date	mence-		Max.	End	Ampli-	Duration	Remarks
290 ,		, 24	н. м. 14 1 ^{.5} —		14 10.5 7 21	н. м. 15 44 —	1.6		Two abrupt shocks Wavy movement before 6h. Con- tinued after shock
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$,, 26		-	0 25	_			Thickening.
303 78 b. 1 - - 0 3 1 - Thickenings continued for hours 304 - - 6 22 - - - Fainter. 305 - - 22 20 - - - Very faint-continuous waves. 306 6 - 21 20 - - - Fainter. 306 6 - - 21 20 - - - Fainter. 307 3 - - 4 25 - - - Fainter. 308 6 - - 21 20 - 0.5 - Before and after. 311 23 16 9 16 10-5 - - - 0.0 0.0 - 1.36 Thickening. <td></td> <td>,, 27</td> <td></td> <td></td> <td></td> <td>11 50</td> <td></td> <td>1 49</td> <td>,, <u></u></td>		,, 27				11 50		1 49	,, <u></u>
304 6 22 Fainter. 305 - 22 20 Very faint-con 306 3 - 4 25 Very faint-con 307 6 - - 21 20 Very faint-con Very faint-con Very faint-con Very faint-con Very faint-con Very faint-con Faint. At inter 306 6 - - 20 9 Faint. At inter 309 16 - - 20 19 Faint. At inter 311 23 16 5 16 9 16 10.5 16 0 05 Thickening. Thickening. <t< td=""><td></td><td></td><td>-</td><td>10 46.0</td><td>$\begin{pmatrix} 0 & 3 \\ 1 & 42 \end{pmatrix}$</td><td>20 21</td><td>>1/ 0</td><td>•</td><td>Thickenings con- tinued for hours.</td></t<>			-	10 46.0	$\begin{pmatrix} 0 & 3 \\ 1 & 42 \end{pmatrix}$	20 21	>1/ 0	•	Thickenings con- tinued for hours.
305 <td< td=""><td>304</td><td></td><td>- </td><td>-</td><td>$\begin{array}{c} 6 & 22 \\ 7 & 12 \end{array}$</td><td></td><td>ĺ</td><td></td><td>Fainter.</td></td<>	304		-	-	$\begin{array}{c} 6 & 22 \\ 7 & 12 \end{array}$		ĺ		Fainter.
307 "," 3 - - 4 25 - - - Fint. Beginning and end doubtful. 306 "," 6 - - 20 19 - - - - Beginning and end doubtful. 309 "," 16 - - 20 19 - - - - Before and after. Thickening. Before and after. Before and after. Before and after. . Before and after. . Before and after. . Before and after. . . . Before and after. .	3 05		-	-	22 20	-	-	-	Very faint—con- tinuous waves.
307 ", 3 - - 4 25 - - - Faint. 308 ", 6 - - 21 20 - 0-5 - Beginning an. 309 ", 19 - - 4 1 - 0-6 - Before and after. 311 ", 23 16 5 16 9 16 16 - - - Thickening. 311 ", 23 16 5 16 9 16 - - - Thickening. 313 ", 27 - - 20 16'-5 - - - 0 9 9 10'-5 - - - 0 9 9 10'-5 13'-5 - 0 9 20'-5 - - - 0 9 11'-5 0 55 -	306	,, 2	11 5	—	12 0	-	-	_	Faint. At inter- vals to 16h,20m.
309 ", 16 - - - - Thickening. 310 ", 23 16 5 16 9 16 10-5 16 40 - 0 0.35 Thickening. 312 ", 25 - - 20 16-5 - - - - Thickening. Thickening. 313 ", 27 - - 20 16-5 - - - - Thickening. Thickening. 314 March 2 - - - 650 - 1-2 - Obsured by tre 315 ", 3 8 53.5 - 9 32 10 29 0.7 1 36 316 ", 8 16 53.(?) - 17 76 - - - - - - 0 0.7 1 36 Thickening. 50 76 13 - - - - - - - - - - - - - -		,, e	=	_			0.5	_	Faint. Beginning and
311 " 23 16 5 16 9 16 10-5 16 40 0 35 Thickening. 312 " 25 - - - 20 - - - "," 37 314 March 2 - - 20 16'5 - - - 0 35 Thickening. "," 315 ," 3 8 53'5 - 9 32 10 29 0'7 1 36 ". Thickening. "," Obseured by tre mors. - - - Distance Distance Thickening. Distance Distance <		1 10		_		_	0.6		Thickening.
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	311	,, 23	26 5	16 9	16 10.5	16 40			Thickening.
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	313	,, 27	_	_	$20 \ 16.5$			-	
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$						10 29		1 36	
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	317	., 10	16 53 (?)		18 7	18 52	3.8		Film cut before en
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$, 11	-		3 41	_	_	_	_
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$,, 13	10 18	_	14 22	12 0	-	1 42	
$\begin{array}{c c c c c c c c c c c c c c c c c c c $			23 26	- 1	—	24 21	1.2	0 55	continued to 17d.
$\begin{array}{c c c c c c c c c c c c c c c c c c c $		" 10	8 D-8	8 4.9		 8 55	2.6	0.54	Doubtful. Tremors
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$		" 00	-	-**		-			_
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$			т	remors larg	e and freq	uent from	23rd to 5	29th.	
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	326	Mar. 29			21 (?)	-	—		Obscured by tre-
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$				-	4 45	39 (1)	-	9 (2)	Thickening.
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	329	., 8	18 24	_				0 28	
Instrument out of adjustment. Thickening. Instrument out of adjustment.	331	., 13	_		20 (?)		1.0		"
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	332	,, 18	1 13 23-2					4 4	—
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	000 I	94		I			I	_	Thickening.
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	334	", 29					0.3	0 46	Beads,
338 , 19 12 8.5 - 12 21.7 12 43 0.6 0 35 - 338	336	,, 12		_		_	1:0	0 49	
000 1, 4T 11 TI 12 10 0 12 JI 10 20 10 121	338	,, 19	12 8.5	12 10-5	12 21.7	12 43	0.6	0 35	
	330	,, 24	11 71	12 100	12 -1	10 20	10		

A 4° turn of calibrating screw = 14 mm. displacement of boom. 1 mm. = 0".55.

Register from the Observatorio de Marina de San Fernando, Spain. Director, Capitán de Fragata Тома́s de Azcante.

	Date	Com- mence- ment	L.W. Commence	Max.	End	Total Duration	Max. Ampli- tude	Remarks.
				19	06			
47-1 47-5 476 478 478 478 478 488 488 488 488 488 490 490 490 492 492 494 495 496 490 492 495 497 493 494 495 502 502 503 504 505 507 509 511 512	Jan. 6 , 8 , 10 , 11 , 11 , 11 , 12 , 12 , 13 , 20 , 21 , 23 , 24 , 27 , 31 Feb. 1 , 23 , 5 , 6 , 7 , 15 , 27 , 31 Feb. 1 , 15 , 27 , 31 Feb. 1 , 15 , 16 , 7 , 17 , 15 , 27 , 31 Feb. 1 , 15 , 27 , 31 Feb. 1 , 15 , 16 , 7 , 19 , 21 , 23 , 31 Feb. 1 , 15 , 16 , 17 , 19 , 10 , 21 , 21	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{c} {\rm H. \ M.}\\ 0 \ 33^{15}\\ 0 \ 24^{15}\\ 0 \ 24^{15}\\ 1 \ 1 \ 80^{10}\\ 1 \ 2 \ 30^{-4}\\ 1 \ 18^{10}\\ 10 \ 0^{-0}\\ 0 \ 4^{-0}\\ 1 \ 10^{10}\\ 1 \ 30^{-1}\\ 1 \ 10^{15}\\ 0 \ 31^{15}\\ 1 \ 10^{15}\\ 0 \ 31^{15}\\ 1 \ 10^{15}\\ 0 \ 31^{15}\\ 1 \ 10^{15}\\ 1 \ 31^{15}\ 1 \ 31^{15}\ 1 \ 31^{15}\ 1 \ 31^{15}\ 1 \ 31^{15}\ 1 \ $	NAL 1 400 0 50 	Tremors. Small movements. " " " " " " " " " " " " " " " " " " "
513 514 515 516 517 518 519 520	,, 26 ,, 27 ,, 27 ,, 29 April 8 ,, 10 ,, 10	4 25.0 1 25.0 23 45.3 22 5.7 18 16.0 0 48.4 1 30.1 21 47.4	$ \begin{array}{c} - \\ 5 45 \cdot 3 \\ 23 50 \cdot 9 \\ - \\ 18 34 \cdot 1 \\ - \\ 22 5 \cdot 2 \end{array} $	$\begin{smallmatrix} & - & - & - \\ & 5 & 47 \cdot 9 \\ & 23 & 53 \cdot 5 \\ & - & - \\ & - & - \\ & - & - \\ & & - \\$	5 49·4 23 56·5 18 38·7 	0 16.3 6 40.7 0 21.4 0 44.7 0 40.5 6 30.5 6 10.1 2 20.3	1.50 0.50 9.00 9.00 10.75 3.50 3.50	ments. "" Small movements. Tremors. Tremors.
521 522 523 524	,, 13 ,, 13 ,, 14 ,, 14	1 31-1 19 56-6 0 42-4 1 56-6	$\begin{array}{c}\\ 20 & 15 \cdot 9\\ 0 & 48 \cdot 5\\ 2 & 3 \cdot 2 \end{array}$	$\begin{array}{cccccccc} & 20 & 18 \cdot 5 \\ 20 & 21 \cdot 0 \\ & 0 & 51 \cdot 5 \\ 2 & 4 \cdot 2 \end{array}$	$\begin{array}{c} - \\ 20 & 30 \cdot 2 \\ 0 & 56 \cdot 6 \\ 2 & 6 \cdot 8 \end{array}$	7 54.0 0 49.8 0 26.9 0 16.3	2·75 1·50 1·00 0·50	Tremors.
525	,, 14	3 35-3	4 42.4	$\left\{\begin{array}{ccc} 5 & 28 \cdot 1 \\ 5 & 42 \cdot 4 \\ 5 & 45 \cdot 5 \end{array}\right.$	5 50.5	3 6.1	1·25 1·50 1·00	} -
526	,, 18	13 25.1	18 85-3	14 42 15 42.9	16 10 [.] 9	4 35-6	>17.50 4.50	ň
527 528 529	, 18 , 19 , 21	23 27.6 	(1 8.8) (8 24.1)	1 13·4 1 13·4 8 28·1	$1 15.9 \\ 8 29.2 \\ -$	$ \begin{array}{c} 11 & 7.7 \\ 6 & 34.7 \\ 2 & 21.4 \end{array} $	1.20 1.00	California Eqke.

Register from the Observatorio de Marina de San Fernando, Spain-continued.

N0.	Date	m	om- ance- tent	L.W. Commence	Max.	End	Total Duration	Max. Ampli- tude	Remarks
		п	м.	н. м.	п. м.	н. м.	н. м.	MM.	
	April 2				- 1	_	2 8.7		Tremors.
531	5, 2			. 9 53 1	9 5516	10 0.7	0 36 5	2.00	· · · ·
532	., 2		25.1	. ~ .		_	4 49 8	—	Tremors.
533	., 2				— i		8 0.0		,,
534	,. 2				-	- 1	5 50.3	_	, ,,
535	., 2						5 37.6	- 1	,
536	,, 2			17 22.1	17 25/2	17 33.3	1 3.0	1.75	. –
537	$+$ $\frac{3}{May}$		15.9	·			10 2.1		Tremors.
558			32.7	2 10.8	2 13.9	2 20.0	6 22 9	0.70	
539			3.3		1 9.5 !	1 18.1	1 31.0	0.70	2h.31m. to 6h.37m.
1000		: °	00				* * * * 1	0.157	tremors.
540	,, 1	2 6	19.6	6 34 9	6 44.0	6 46.0	0 12.2	0.75	
541	., i		19.6		11 38.4	11 46.5		0.80	
				1	/ 5 46.6			6 5-10	
542	June	1.1	5316	5 13.8	5 48 6	6 35.7	2 29.6	4 60	_
		1			5 58-2		i	4.60	
543			15.4	8 19.5	3 21.0	3 24.5	0 17.8	0.50	_
544 i		5 I.					3 - 50.9	_	Tremors.
545	., 1						$6 - 5 \cdot 4$	-	
546	,. 1			· ·	-		0 47 8		Small movements
547	., 1		19-5	·			2 46 5	-	Tremors.
548	., 1		48.2	12 21-2	12 26.8	$12 \ 38^{\circ}0$	1 58.9	2.25	_
549	., 2		45.7	3 2.0	3 6.1	3 16.2	0 46 3	1.85	-
550	,, 2			· 12 11·8	12 18.4	$12 \ 31.6$		1.10	-
551	,, 31) - 4	37.2				3 8-3 '		Tremors.
	в	etween	200 h 7th 3 16th	anuary and February ar Jarch and 13 March and 13 April and 17	id 6th Mar 6th March 7th April		$0^{\prime\prime} = 0^{\prime\prime} \cdot 20,$ $0^{\prime\prime} \cdot 64,$ $0^{\prime\prime} \cdot 25,$ $0^{\prime\prime} \cdot 41,$ $0^{\prime\prime} \cdot 34,$	Period	$= \frac{21_{S}}{15}$ $= \frac{15}{20}$ = 18 = 19

Register from the Royal Observatory, Cape of Good Hope, South Africa. Director, Sir DAVID GILL, K.C.B., F.R.S.

$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	No.	Date	Com- mence- ment	L.W. Commence	Max.	End.	Max. Ampli- tude	Duration	liemarks.
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$		·	i		19	06	<u>.</u>		
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	340	., 31	14 10.3 15 56.0	·	16 34.0	14 42.0 18 20.0	5.0	$ \begin{array}{cccc} 0 & 31.7 \\ 2 & 24.0 \end{array} $	_
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	342	Apr. 6	9 30-0	. —	-1 0·0 		-		Watch stopped. Slight vibrations.
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	$\frac{344}{345}$,	$\begin{array}{ccc} 13 & 32.0 \\ 9 & 30.0 \end{array}$			10 30.0		1 0.0	_
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	347		22 20.0	'	16 51.0	4 30.0			Series of slight vi brations.
351 , 24 12 $5\cdot5$ - 12 $19\cdot0$ 12 $47\cdot0$ $0\cdot6$ 0 $41\cdot5$ _	849	June 1	5 0.0 8 36 0			5 45-0 8 39-0	0.2		Change of level, Vibrations,
	351	,, 24	12 5.5	·	12 19.0	12 47.0	0-6	0 41 5	
$\Delta r = 28$		1 2	une 16, une 16, une 30,	· · · · · · · · · · · · · · · · · · ·	**	0 ⁴ ·18, 0 ² ·14, 0 ⁴ ·15,	11 13 11 13 11 14 11 14	$12 \\ 13 \\ 18'5 \\ 20 $	

Register from Ponta Delgada, St. Miguel, Azores. Director, Major F. A. Chaves.

No.	Date	Commence- ment	Max.	Semi- Ampli- tude	Dura- tion	Remarks
				1906		
162	Jan. 21	н. м. 13 53•5	н. м.	MM.	н. м. 1 34·3	I. of the Mercalli's scale Thickening of line.
163	,, 24	$\begin{array}{c} 7 & 04.5 \\ 9 & 53.7 \end{array}$		-	${1\ 24\cdot 0\ 1\ 11\cdot 5}$	Idem—Idem.
$\begin{array}{c} 164 \\ 166 \end{array}$, 31 Feb.16	$\begin{array}{ccc} 15 & 47 \cdot 0 \\ 17 & 47 \cdot 7 \end{array}$	$15 59 \cdot 2$ 	8·1	$\begin{array}{c} 3 & 27.8 \\ 0 & 28.7 \end{array}$	Idem. Idem—Thickening of line.
168	,, 19, 19, 27	$\begin{array}{cccc} 2 & 24.0 \\ 20 & 05.0 \end{array}$	2 31·8 —	0.7	$\begin{array}{ccc} 2 & 04.6 \\ 0 & 30.1 \end{array}$	Idem. Idem—Thickening of
169	Mar. 2 ,, 3 ,, 8		9	$0.7 \\ 3.5$	${\begin{array}{c} 0 & 46\cdot 5 \\ 1 & 06\cdot 1 \\ 1 & 08\cdot 7 \end{array}}$	line. Idem.—Idem. Idem. Idem.
	,, 10 ,, 10	6 56.0 16 49.5	_	—	0 32.0 0 43.6	Idem—Thickening of line. Idem—Idem.
170	,, 10 ,, 11 ,, 19	$ 3 28.0 \\ 8 06.4 $	8 21.2	0.6	$ \begin{array}{c} 0 & 03 \cdot 0 \\ 0 & 46 \cdot 4 \end{array} $	Idem—Idem. Idem.
	Apr. 10 ,, 13	$\begin{array}{c} 21 \ 40.7 \\ 18 \ 05.0 \end{array}$	22 01.2	1.4	$\frac{1}{0} \frac{16.9}{15.7}$	Idem. Idem—Thickening of
175	,, 18 ,, 19	${13\ 23\cdot 6}\ 1\ 05\cdot 6$	13 54.6	7·3	$\begin{array}{c} 3 & 29 \cdot 4 \\ 0 & 09 \cdot 9 \end{array}$	line. Idem. Idem—Thickening of
$177 \\ 179$	May 5 ,, 14	22 11.6		_		line. Idem—Idem. Idem-Idem.
$\frac{181}{184}$,, 15 June 1 , 22	$\begin{array}{c cccc} 0 & 52 \cdot 0 \\ 4 & 49 \cdot 5 \\ 3 & 29 \cdot 0 \end{array}$	_		$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	Idem—Idem. Idem—Idem. Idem—Idem.
184	,, 23	14 28.0	$14 \ 32.0$	0.6	$0 \ 12.8$	I. of the Mercalli's scale.
185	,, 29	16 46.2	~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~~	-	0 03.3	Idem—Thickening of line.

Mean scale value $1 \text{mm} = 0^{\prime\prime} \cdot 49$.

Register from Toronto, Ont., Canada. Director, R. F. STUPART, F.R.S.C.

No.	Date	3	me	om- nce- ent	L.W. Commence	Max.	1	ind	Max. Ampli- tude	Dur	ution	Remarks
		• ••	·		/	19	06			• • •		
			H.	м. 17:7	н. м.	п. м.	н.	м.	MM.	н.	ы.	
$620 \\ 621$	Jan.	6 10	22 12	$\frac{17.7}{49.2}$			22	$21.4 \\ 50.2$	0.05	0 0	3.7	Slight thickening.
622	,,	10	13	31.7			14	22.7?	0.30	0	51.0	Very small.
623 624		$\frac{16}{18}$	20	$\frac{27 \cdot 5}{4 \cdot 5}$	- :		20	$\frac{38.0}{15.5}$	0.05	0	10.5	Thickening.
625		21	14	14.2	_	14 16.5	16	15.4	1.0	2	1.2	Very small but ex
			No	P.T., iden.			i l		1			tended.
626	,,	24	- Suc - 6	59.0	:	7 5.5	18	49.5	2.0	1	50.2	Small. Double di
627		24	10	18.0		7 42.0	10	3415	. 0.15	0	16.5	turbance. Slight thickening
626		24 24	21	5618	: _ `	21 59.5	22	53.7	1.80	0	56.9	Small and well de
								17.04	0.05		,	fined.
629	"	25	20 cur	Air rents.	_	20 49.3	21	15.0?	0.82		1	Very small.
630		27	10	5.8	$10 - 20^{+}3$	10 23.8	11 14	20·3 52·2	2.50	1	$\frac{14.5}{24.0}$	Medium.
631 632		S1 31	14	$\frac{28 \cdot 2}{44 \cdot 8}$	15 49.8	16 640	20	0.0	0-10 20 +	4	15.2	Marked thickenin Very large, off th
1							ì					 paper (Equador).
$633 \\ 634$		$\frac{31}{31}$	20 21	$\frac{55 \cdot 2}{40 \cdot 3}$	_	_	20 21	5519 5918	0.05 0.10	0	0.7 18.5	Thickening.
635	Feb.	1	2	49-2	_	-	; ±	0.2	0.30	i	11.0	Very small.
636 637	•,	$\frac{1}{1}$	6 i 23	55-5 38-5		23 49.5	24	3.5 7.5	0.15	0	8-0 29-0	Marked thickenin Very small. Thr
1	••					40 400	į.					distinct vibration
638 6 3 9	,,	$\frac{2}{3}$	17	9.3 9.3			18	25.0 ! 21.0	0.15	10	15.5	Marked thickenin Slight thickening.
640	,, ,,	3	L	ost.	Visitors.	_	21	22.0	—		_	
$641 \\ 642$	27	8 10	1 15	$\frac{15.0}{11.5}$	· –		15	$\frac{35 \cdot 5}{29 \cdot 5}$	0.05	0	$\frac{20.5}{18.5}$	Thickening.
643		11	3	16.0	_ '	_	· 3	19.0	0.02	0	3.0	Brief thickening.
644		13	13	17.0			$\frac{13}{15}$	$\frac{25.0}{58.0}$	0.02	0	8·0 3·0	Slight thickening.
645 646		13 16	15	55-0 53-0	Attending	inst.	18	27.0	0.10	0	34.0	West Indies.
647		19	2	20.8		3 37.3	5 16	$\frac{10.3}{23.5}$	2.0	2	$\frac{49.5}{24.0}$	Medium, extended
648	*1	23	15	59.53	-	_	10	20.0	0.0		27.0	Extended thicken ing.
C 10	,,	$\frac{26}{27}$	20	Air	current.		21	35.5	0-1	0	53-2	Thickening.
$649 \\ 650$		28	6	$\frac{42.3}{28.01}$		_	6	57.0	0.05	ŏ	29.0	-
651		28 2	_	Air	current.	13 35.0	7	32.3	0.10 0.10	0	17.0	
$652 \\ 653$	March	3	. 8	15.31 52.7	8 55.5	8 57.0	10	35.0	18 +	ĩ	42.3	Very large, over
		-	- 20		, I		20	43.0	0-10	0	2.9	scale limit.
$654 \\ 655$,, ,,	$\frac{3}{10}$	20	$\frac{40.1}{51.0}$	1 - 1	_	4	59.0	0.05	jõ	8.0	Thickening.
656	**	10	7	8.2) (8 3.2	8	37.2	0-30	1	29.0	Extended oscilla
657	. ,,	10	16	$38.2 \\ 50.0$	1		18	34.01		1	44.0	tions (India). May be air currer
658	,,	16	23	44.0	-	—	$\frac{24}{12}$	$\frac{5.0}{30.2}$	0·10 0·10	0	21^{-0} 24^{-0}	Thickening.
$659 \\ 660$,,	$\frac{17}{19}$	12 8	$\frac{6.5}{13.2}$	I, I	8 24.0	9	5.7	0.60	0	53.5	Very small and
			ļ	16-1	ji l		19	14.0	0.12	0	11.2	well defined.
$\frac{661}{662}$,, ,,	$\frac{22}{29}$	19 21	$\frac{2.8}{59.6}$	- 1	_	22	25.2	0.15	ő	25.6	May be air curren Very small and
							19	29.0	0.02	0	5.0	well defined.
663	April	5	19	24.0		21 41.0	28		1	1 1	33-6	onger - anononanig.
664 065	"	10	21	29.4	21 39.4	21 42.8	$ _{21}^{20}$	43.5	18 + 0.05		2.0	Very large, May be air ourren
$665 \\ 666$,, ,,	$\frac{11}{13}$	21 20	$\frac{41.5}{19.0}$	_	_	21	42.0	0.05	0	23.0	May be air curren Very small. Wel
	,,,				1		ā	33.0	0.02	1	14.0	defined.
667	*1	14	4	19.0		_	1 3	əə 0	0.09	1	14.0	Thickenings an sudden oscillation
668		18	13	19.3	$ \begin{array}{ccccccccccccccccccccccccccccccccccc$	(13 33-3	17	10.0	over 20+	3	5017	Very large (Cali fornia).
669		18	18	25.0		' -	18	32.0	0.20	0	7.0	Marked thickenin
670	. ,,	18	19	56.0	_	_	19	57.0	0.10	-0	1.0	Momentary thick

Register from Toronto, Ont., Canada-continued.

No.	Da	te	m	om- ence- ient	L.W. Com- mence	Max.	1	End	Max. Ampli- tude		ura- ion	Remarks
671	April		н. 0	м. 45°5	н. м.	н. м.	н. 1	м, 15°0{	мм. 0°40	н. 0	м. 29•5	Very small, b several rapid o cillations.
672	,,	19	7	54.0	-	-	8	58.0	0.50	ı	4.0	Prolonged thic chings.
673	12	20	18	25'0	_	l _	18	32.0	0.02	0	7.0	Thickening.
674	,,	23	9	21.0		9 31 6	10	11-3	1.0	Ó	50-3	Small and well d fined (Oregon).
675	May	5	0	39-8	_	-	1	14.0	0.80	0	34-2	Sudden vibratio gradually taper down.
676	June	1	4	53-0	-		7	6-0	0.30	2	13.0	Very small at extended.
677	.,	2 6	5	35.2	-		5	48.2	0.05	0	13.0	Thickening.
678	,,	6	15	18.2		—	15	25.5	0.10 '	0	7.3	
679	,,	- 7	3	0.2			3	19.0	0.15	0	18.3	
680	**	20	2	38.0	-	—	3	10.0	0.80	0	32.0	_
681	,,	22	. 3	26*2	-		3	50.2	0.20	0	24.0	—
682	,,	22	1	2.0			1	16.0	0.25	0	14.0	
688 684	,,	$\frac{22}{22}$	- 4	$\frac{32.0}{57.2}$	_	—	1 7	37:0	0.10	0	5.0	
685	,,	22	12	27.6	_		8 12	$9 \cdot 2 = 58 \cdot 4$	0.12	0	$\frac{12.0}{30.8}$	
686	"	26	12	33.0	12 35.0	$12 \ 36.2$	12	57.0	0.20	ő	24.0	_
687	"	30	16	44.0	, , , , , , , , , , , , , , , , , , , ,	200 a.	16	48-0	0.12	ŏ	4.0	

One millemetre displacement = $0^{\prime\prime}$.66,

Register from Victoria, B.C., Canada. Superintendent, E. BANNES REED.

No.	Da	te	m	om~ ence- nent	L.W. Commence	Max.	1	End	Max. Ampli- tude	Du	ration	Remarks
						19	906	i.				
			п.	м.	н. м.	н. м.	н.	м.	MM.	н.	м.	
$639 \\ 640$	Jan.	6 10	21 12	$\frac{50.5}{30.2}$	-	_	21	55-5	0.02	0	5·0	Slight thickening.
641	,,	10	12	30°2 14°0		13 16.0	12	35.2	0.10	0	5.0	
041	"	10	10	14.0	í –	13 16.0	14	16*0 /	1.30	1	0.0	Small and wel defined.
642		16	20	21.2		_	20	26.7	0.2	0	5.2	Very small,
643		18	7	3.9	-	-	7	9.7	0-2	0	5.8	Brief thickening.
644	"	21	13	59+5	14 8.5	14 8.5	16	0.0	1.0	2	0.2	Smail and pro longed.
645		24	6	$43 \cdot 5$	6 44.7	$6 + 45 \cdot 9$	8	43.5	8.0	2	0.0	Large double quak
646		24 :	9	56.7	_	_	10	9.5	0.12	0	12.8	Marked thickenin
647		24	21	38'5	21 39.5	21 41.4	22	48.5	4.0	1	10.0	Medium.
648	,,	25	20	40.9			20	52.9	0.5	0	12.0	Thickening.
649	,,	27	9	52'4	-	10 8.5	11	33-4	1-9	1	41.0	Medium and ex- tended.
650	,,	31	14	49.3	i	_	15	13.0	0.02	0	23.7	Thickening.
651		31	15	45.4	15 53.7	16 27.2	19	51.2	16.0	Ś	5.8	Very large. Begar
1		1							i	-		gradually. (Co
652		31	21	59.0			22	8.0	0.03	0	9.0	lumbia.)
653	Feb.	ŝ	21	48.0	_		- 3	40.0	0.02	ŏ	52-0	Minute thickening Very small.
654	100.	i	÷,	6-0			- ž	7.0	0.03	ŏ	1.0	Barely noticeable.
655	••	2 1	ò	1.0	_	_	ó	18.5	0.05	ŏ	17.5	Thickenings.
656 :	. ,,	2	17	13.0	_	_	17	55.0	0.2	ŏ	42.0	Very small.
657	••	3	21	22.5	_ !	_	21	30.0	0.05	ě	7.5	Very slight thicker
658		8	0	27.5			0	38·0 /	0.05	0	10.5	ing. Brief thickening.

Register from Victoria. B.C., Canada-continued.

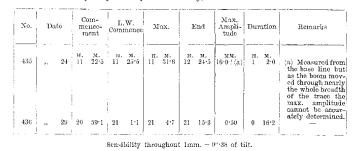
	1		· . · ·	•• • • •		i i ii	11]		1
No.	Da	te	m	Com- ence- nent	L.W. Com- mence	Max.		End	Max. Ampli- tude		ura- ion	Remarks
659		10	н		н. м.	н. м.		. м.	ММ.		. м.	
	"	10	15			· _	15	31-9	0~10	0		Began and ende gradually.
660	,,	11	2	55.9	· • • •	2 57.9	3	5.9	1.0	0	10.0	Small.
661	,,,	16	18	11.6		i . —.	18	4 6*6	0.15	- 0	35-0	Thickenings.
662	"	19	2	12.5	2 22.8	2 52.5	5	19.2	1.80	: 3 :	7.0	Medium and ex tended.
663	.,	23	15	51.5			16	2.5	0.2	0	24.0	Slight thickening
664	17	26	15	55.2	. —		16	$2 \cdot 2$	0•1	0	17.0	Very small.
665	,,	27	Att		inst.	20 49.0	20	57.0	0.2			Slight thickening
666			3 6	42.2		6 46.3	6	54.4	()·1	0	12.2	Marked disturbar
667		28	13	34.8	:		: 13	49.6	0.2	- 0	14.8	Well defined.
668	Marc	h 2	6	59.1	·	_	, 7	24.1	0.1	0	25.0	1 ronounced thick ening.
669	,,	3	8 8	50·8 57·0	{ —	9 12.0	10	32.0	1.0	1 1	$\frac{41.2}{35.0}$	Small and ex
670	,,	3	20	30.2	l'	_	20	32.7	0.3	ő		Three very sma
671		10	5	5.5			ō	9-5	0-10	0	4.0	oscillations.
672	,,	10	7	26.8			8	12.0	0.10	ő	45.2	Barely noticeable
	,,											Undulatory. (Indi
673	"	10	16	49.0			18	22.0	0.1	1	33.0	May be air c.
674	,,	16	9	29.4		9 32.8	.9	41.0	0.2	- 0	11.6	Ended gradually.
675	"	17	12	1.7	-		12	5.2	0.12	0	3.2	Very small vibra tions.
676	.,	19	8	13.6	-	8 28.4	8	50.0	1.1	0	$36 \cdot 4$	Small.
677		29	22	4.0			22	33.5	0.1	0	29.5	Thickening.
678	L	10	21	28.0	21 36.1	21 38.7)	23	39.0	7.0	2	11.0	I Large. Double
010	' April	10		20 0	21 30 1	21 41.6			1.0	4	11.0	j max.
679	,,	13	20	10.0		'	20	47.0	0.20	0	37.0	Very small,
680	,,	14	0	43.7	-		1	0.1	0-05	Ó	17.4	Thickenings at in tervals.
681	"	14	4	15.1		-	5	34.1	0.10	1	19.0	our rains
682	,,	18	13	14.2	13 14.7	13 17.1	17	15.0	20 + 1	4	0.8	Very large; acros
	,,	10				10 11 1	.,	10 0	••••	1	00	paper a numbe of times.
683	,,	18	18	8.2		18 12.0	18	20.4	0-8	0	11.7	Very small, bu will defined.
684	11	18	19	40.9			19	50-4	0.2	0	9.5	Thickening.
685		19	Ĩŏ	35.9	0 37.9	0 38.9	ĩ	37.9	4·0	ĭ	2.0	Moderate, tapere
000	"			00 0		00 5	•	01.0	10	-	20	off gradually.
686	,,	19	7	42.9	_	-	8	50-9	0.02	1	8.0	Extended thicken
687		23	9	12.0	9 12.9	9 14.6	10	7.7	7.2	0	55.7	ing. Modium (Oronom
688	"	25	1	58.8	5 149	0 14 0	2	8.8	0-05	ŏ	10.0	Medium. (Oregon
689	Nor	20	2	0 /	· - ·		4	, 0.0 .	0-05	U	10.0	Gradual thickenin
690	May	3	4	27.7		-	4	40.7	0.10	0	13.0	Minute thickening
691	,,	3 5	ő	42.7		0 43.7	1	19.7	0.30	0	37.0	Marked thickening
001	17	"	v	44.7		0 457	1	10.7	0.00	v	37.0	Very small bu decided.
692	June	1	-1	53.0		- 1	7	3-0	0.22	2	10.0	Very small and extended.
693		8	0	20.0			0	28.0	0.40	0	8.0	extenuea,
694	,,	20	2	41.0		_	3	5.0	0.20	ŏ	24.0	_
695	"	20	3			_	ų		V 20	v	410	_
696 ±	"	22	7	- !	Times un	certain.			1			
	,,	24	12	18.0			12	46.0	0.15	0	28.0	
697	,,											

One millemetre displacement = $0^{\prime\prime}.76$.

Register from Alipore Observatory, Calcutta. G. W. KÜCHLER, Assistant Meteorological Reporter.

No.	Date	1	Com- nence- ment	L.W. Commence	Max.	E	nđ	Max. Ampli- tude.	Du	ration	Remarks
					19	906					
394 395 396 397 398 399 400 401 402			5 6·9 36·8 56·6 54·1 31·8 59·9 59·9 53·8	н. м. 22 10:0 19 42:4 14 0:7 7 38:1 22 32:9 10 9:1 15 6:8	H. M. 22 12:0 16 7:9 19 44:4 14 9:9 7 40:2 22 31:9 10 18:2 15 9:9	н. 22 16 19 15 8 2 11 15 20	M. 21·2 21·2 57·6 11·9 31·0 45·1 23·1 44·4	MM. 1·25 0·75 1·00 5·50 0·50 5·00 0·50 	н 0 0 1 0 0 1 0 4	м. 36-7 14-3 21-3 15-3 56-9 13-3 15-3 19-3 49-6	As the boom moved out of range the times of the max. displacement and its max. ampli- tude cannot be
403 404 405 406	Feb. ,, 1 ,, 2 ,, 2	3 15	2.6 48.8	18 36·0 9 18·6 	$\begin{array}{cccc} 18 & 37\cdot 6 \\ 9 & 20\cdot 6 \\ 15 & 49\cdot 8 \\ 19 & 49\cdot 9 \end{array}$	$ \begin{array}{r} 18 \\ 9 \\ 16 \\ 20 \end{array} $	51·8 30·9 14·8 57·0	0.50 0.50 0.75 14.0 (a)	0 0 1	$24.0 \\ 28.3 \\ 26.0 \\ 11.2$	determined. — (a) Measured from the base line.
407 408	March	$ \begin{array}{c c} 2 & e \\ 2 & 13 \end{array} $		6 23.8	6 <u>2</u> 8-9	7 13	$27 \cdot 9$ 14 · 7	3·25 —	$1 \\ 0$	8·1 6·1	Thickening of the
409 410 411 412 413 414		$egin{array}{c c} 0 & 17 \\ 3 & 13 \\ 5 & 20 \\ \end{array}$	56.0 3.1 38.7 15.9	$\begin{array}{cccc} 9 & 56 \cdot 1 \\ 7 & 28 \cdot 6 \\ 13 & 50 \cdot 9 \\ 22 & 53 \cdot 0 \end{array}$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$ \begin{array}{c} 10 \\ 7 \\ 17 \\ 14 \\ 20 \\ 23 \end{array} $	56.1 58.1 44.8 19.4 25.5 52.0	$\begin{array}{c} 1.00\\ 0.50\\ 0.50\\ 1.25\\ 1.00\\ 12.00\ (a)\end{array}$	1 0 0 1	33.6 2.1 41.7 40.7 9.6 7.2	line. (a) Measured from the base line.
415	,, 1	7 19	4.2		-	19	12.3	-	0	8-1	Thickening of the line.
416 417 418	,, 19 ,, 20 ,, 21) 4	7.2		8 41·8 4 9·3 0 6·7	9 4 0	12·3 32·6 36·7	1.00 0.75 1.50	0 0 0	58·9 25·4 53·9	
419 420 421 422	$ \begin{array}{cccc} $	23	$29.1 \\ 32.6$	5 56.0 23 11.8 18 59.6 —		6 23 19 20	27.5 28.6 29.6 46.9	1.00 1.50 0.50 —	0 0 1 0	39.6 19.3 0.5 14.3	Thickening of the line.
423 424 425	April 8 ,, 13 ,, 13	18		18 4·2 18 30·6 23 10·3	18 7-2 18 37-7 23 11-3	18 19	27·5 32·6	1:50 3:50 2:00	0 1 ?	35.5 7.1 (a)	(a) Doubtful. The time of the ter- mination of the displacement can- not be determined, as the usual morn- ing air tremor commeuced before it ended.
426	,, 18	13	19-9	13 40.8	14 18.9		24.5	17·0 (a)	4	4.6	 (a) Measured from the base line.
427	,, 19		4.2	-	-		22.5	-	2	18.3	Thickening of the line.
$\frac{428}{429}$,, 29 May 12	5	47·9 37·7	16 57·0 5 53·5	16 58·1 5 54·0	6		1.00 10.20 (a)	0 0	44·7 57·0	(a) Measured from the base line.
430 431 432 433 434	", 17 ", 18 ", 20 June 1 ", 10	$ 21 \\ 10 \\ 4$	53.5 1.1 7.2 39.8 56.0	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccc} 10 & 45 \cdot 9 \\ 21 & 8 \cdot 2 \\ 10 & 22 \cdot 0 \\ 5 & 10 \cdot 3 \\ 21 & 3 \cdot 1 \end{array}$	$ \begin{array}{c} 21 \\ 10 \\ 6 \end{array} $	50.9 12.3 28.6 57.0 30.6	2·50 1·00 0·50 6·00 4·00	$1 \\ 0 \\ 0 \\ 2 \\ 0$	$57 \cdot 4$ $11 \cdot 2$ $21 \cdot 4$ $17 \cdot 2$ $34 \cdot 6$	Doubtful.

Register from Alipore Observatory, Calcutta-continued.



Register from the Government Observatory, Bombay. Director, N. A. F. Moos.

No.	Date	Com- mence- ment	L.W. Commence	Max,	End.	Max. Ampli- tude,	Duration	Remarks
				19	06	_		
18 34 43	Jan. 6 ,, 15 ,, 21	н. м. 22 9·9 19 44·3 13 58·8	н. м. — —	н. м. 22 13-3 19 46-0 14 8-2	н. м. 22 34:2 20 6 [.] 0	мм. 0·4 0·7 1·5	н. м. 0 24:3 0 21:7 —	End lost in shifting time.
$\begin{array}{c} 62\\ 78\\ 79\\ 149\\ 153\\ 167\\ 175\\ 188\\ 207\\ 227\\ 2236\\ 246\\ 2267\\ 273\\ 315\\ 3317\\ 326\\ 334\\ 336\\ 336\\ 426\\ 425\\ 464\\ 181\\ 481\\ 481\\ 816\\ 527\\ \end{array}$		6 25.0	19 47·2	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{c} 2\text{-}3\\ 15\text{-}2\\ 15\text{-}2\\ 16\text{-}5\\ 1\text{-}6\\ 0\text{-}5\\ 1\text{-}0\\ 0\text{-}5\\ 8\text{-}4\\ 2\text{-}6\\ 0\text{-}6\\ 2\text{-}5\\ 1\text{-}0\\ 0\text{-}6\\ 2\text{-}5\\ 1\text{-}0\\ 1\text{-}1\\ 0\text{-}8\\ 1\text{-}0\\ 1\text{-}1\\ 0\text{-}8\\ 1\text{-}0\\ 1\text{-}1\\ 1\text{-}0\\ 1\text{-}1\\ 0\text{-}8\\ 1\text{-}9\\ 1\text{-}0\\ 1\text{-}9\\ 1\text{-}0\\ 1\text{-}9\\ 1\text{-}0\\ 1\text{-}9\\ 1\text{-}0\\ 1\text{-}9\\ 1\text{-}0\\ 1\text{-}9\\ 1\text{-}0\\ 1\text{-}9\\ 1-$	$\begin{array}{c} 1 & 16^{+}6^{+}\\ 8, 8 \\ 0 & 57^{+}5 \\ 2 & 30^{+}3 \\ 0 & 24^{+}8 \\ 0 & 84^{+}8 \\ 0 & 84^{+}8 \\ 0 & 53^{+}6 \\ 0 & 34^{+}8 \\ 0 & 53^{+}6 \\ 0 & 31^{+}6 \\ 0 & 31^{+}6 \\ 0 & 31^{+}6 \\ 1 & 3^{+}1 \\ 0 & 48^{+}9 \\ 1 & 3^{+}1 \\ 0 & 48^{+}9 \\ 1 & 7^{+}8 \\ 0 & 31^{+}6 \\ 1 & 7^{+}8 \\ 0 & 31^{+}6 \\ 1 & 7^{+}8 \\ 0 & 31^{+}6 \\ 1 & 7^{+}8 \\ 1 & 53^{+}2 \\ 1 & 5$	

Between 1st January and 30th June, 1996, 1.0 mm. of amplitude = 0"47. Where no distinction of P.T. or L.W. can be made, the common comment of disturbance is entered in the column of "Commencement."

Register from the Royal Magnetical and Meteorological Observatory, Batavia. Director, DR. S. FIGER.

No.	Date	Com- mence- ment.	Duration of P.T's	Max.	Ampli- tude Double	Total Dura- tion	Remarks
				19	06.		
758 760 761 763 764 a 764 a 764 a 764 a 764 a 765 766 766 770 771 773 773 773 774 775 775	J. m. 15 m. 18 m. 20 m. 21 m. 22 m. 22 m. 27 m. 27 m. 27 m. 27 m. 30 m. 31 Feb. 10 m. 15 m. 12 m. 24 m. 24 m. 25 m. 24 m. 25 m. 24 m. 25 m. 24 m. 25 m. 25 m. 30 m. 31 Feb. 3 m. 3	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$		$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	$\begin{array}{c} 0.4 & 0.2 \\ 0.5 & 0.2 \\ \pm 11 & \pm 5.3 \\ 0.7 & 0.5 \\ 0.7 & 0.5 \\ 0.7 & 0.5 \\ 0.7 & 0.5 \\ 0.7 & 0.5 \\ 0.7 & 0.5 \\ 0.7 & 0.7 \\ 0.7 & 0.$	$\begin{array}{c} 0 & 23 \\ 1 \pm 0 & 50 \\ 0 & 3 \\ 0 & 5 \\ 1 & 3 & 28 \\ 0 & 34 \\ 0 & 34 \\ 0 & 34 \\ 0 & 21 \\ 1 & 16 \\ 1 & 20 \\ 1 & 20 \\ 1 & 20 \\ 1 & 23 \\ 1 & 23 \\ \end{array}$	Dubions. " Bad spot in paper, Thickening of line. " " " " " " "
779	6		h 4th, 8h., to	65th, 9h. 14 - 41	, small co: 0.6 0.3	ntinuous 1 0	tremors.
780 781 782 783 784 785 786 787 788 786 787 788 789 790 791	" 9 " 10 " 10 " 13 " 14 " 16 " 17 " 18 " 19 " 19	19 + 46.2 6 + 46.5	9.2	$ \begin{array}{ccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$ \begin{smallmatrix} & 0 & 43 \\ & 1 & 27 \\ & 1 & 36 \\ & 0 & 35 \\ & 0 & 3 \\ & 1 & 0 \\ & 0 & 8 \end{smallmatrix} $	Thickening. Soveral thickenings.
th Wi	Boom we s observate is stopped	ent off at i ory were st at 23h,435	3h.43°4m. (opped, save m.	a shock the electric	from SE.b ric one, th	. E. to N e astrono	W.b.W.; all the clocks at mical clock Hohwů No. 16
792 793 794 795 796 797 799 800 801 802 804 805 804 805 806 808 809 810 811	, 23 , 26 , 26 , 26 , 26 , 27 , 27 , 28 , 28 , 28 , 28 , 28 , 28 , 28 , 28	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$		$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\left[\begin{array}{cccccc} 1&1&0&5\\0&5&0&2\\0&5&0&2\\0&5&0&2\\0&5&0&2\\0&7&0&3\\1&2&0&5&0&2\\0&7&0&3\\1&2&0&5&0&2\\0&6&0&3&0&2\\0&6&0&3&0&3\\0&7&0&3\\0&6&0&3&0&3\\0&7&0&3\\0&1&4&0&6\\0&7&0&3\\0&8&0&3&0&3\\1&4&0&6\\0&8&0&3&0&3\\1&1&8&0&8\\1&1&3&0&6\\1&3&0&6\\0&1&3&0&0\\0&1&3&0&0\\0&1&3&0&0\\0&1&3&0&0\\0&1&3&0&0\\0&1&3&0&0\\0&1&3&0&0\\0&1&3&0&0\\0&1&3&0&0\\0&1&3&0&0\\0&1&3&0&0\\0&1&3&0&0\\0&1&0&0&0\\0&0&0&0&$	$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Thickenings. Thickening. Thickening. Thickening. Thickening. Thickenings.

Register from the Solar Physics Observatory, Kodaikânal, Madras. Director, C. MICHIE SMITH.

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No.	Date	Com- mence- ment	L.W. Commence	Max.	End	Max. Ampli- tude.	Dura- tion.	Remarks
				19	906			
$1 \\ 2 \\ 3 \\ 4 \\ 5 \\ 1 \\ 1 \\ 2 \\ 3 \\ 4 \\ 5 \\ 1 \\ 1 \\ 1 \\ 1 \\ 2 \\ 3 \\ 4 \\ 5 \\ 1 \\ 1 \\ 1 \\ 1 \\ 2 \\ 3 \\ 1 \\ 1 \\ 1 \\ 1 \\ 1 \\ 1 \\ 1 \\ 1 \\ 1$	Jan. 6 ,, 15 ,, 21 ,, 27 ,, 31	н. м. 22 15·8 19 32·0 13 58·7 10 05·0 15 56·7	м. н. 19 41-2 14 06-9 10 25-6 16 57-7	м. н. 19 42·4 14 08·0 10 28·7 17 11·0	н. м. 22 36 19 54 15 09 11 18	$\begin{array}{c} \underline{^{MM.}} & \underline{^{\prime\prime}} \\ \underline{^{0.8}} & \underline{^{0.4}} \\ \underline{^{2.0}} & \underline{^{1.1}} \\ \underline{^{1.1}} & \underline{^{0.5}} \\ \underline{^{22}} & \underline{^{10}} \end{array}$	н. м. 0 20 0 22 1 10 1 13 —	Widening of line.
6 7 8 9 10 11 12 13 14 15 16 17 8 19 21 22 23 22 24 22 24 22 26 27 28	Feb. 1 , 10 , 18 , 19 , 27 March 2 , 3 , 10 , 10 , 10 , 10 , 10 , 21-22 , 28 April 5 , 3 , 13 , 14 , 14 , 19 , 19	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{c} - \\ 2 & 48:3 \\ - \\ 3 & 01:5 \\ 19 & 52:6 \\ 6 & 35:3 \\ - \\ 22 & 10:0 \\ 4 & 06:0 \\ 22 & 40:0 \\ 18 & 54:7 \\ 22 & 48:5 \\ - \\ 19 & 38:2 \\ 0 & 13:7 \\ 4 & 21:3 \\ 14 & 24:6 \\ - \\ - \\ - \end{array}$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	0 57	yond scale. Widening of line. """"" Bashahr E.Q. Widening of line. """"" Formosa E.Q. Widening of line. Widening of line. Formosa. San Francisco. Widening of line. Bosnia Ih. 11m.
29 30	,, 25 ,, 29	? 16 44•0*	$ \begin{array}{ccc} 1 & 50.7 \\ 16 & 49.5 \end{array} $	$\begin{array}{ccc} 1 & 50.9 \\ 16 & 50.3 \end{array}$	$\begin{array}{rrr}2&10\\17&46\end{array}$	0·4 0·3 1·9 1·0	1 02	a.m. * Possibly second phase.
$31 \\ 32 \\ 33$	May 2 ,, 3 ,, 12	$\begin{array}{cccc} 1 & 44.6 \\ 8 & 31.5 \\ 5 & 53.4 \end{array}$			$ \begin{array}{ccc} 1 & 48 \\ 8 & 42 \\ 6 & 24 \end{array} $	$\begin{array}{ccc} & & & & \\ \hline 0.5 & & 0.2 \\ 0.8 & & 0.4 \end{array}$	$\begin{array}{ccc} 0 & 03 \\ 0 & 10 \\ 0 & 31 \end{array}$	Widening of line. Time slightly un- certain.
34 35 36	,, 19 ,, 27 June 1	$\begin{array}{cccc} 23 & 20 \cdot 9 \\ 6 & 11 \cdot 0 \\ 5 & 21 \cdot 3 \end{array}$	 lost.	lost.	$ \begin{array}{ccc} 23 & 38 \\ 6 & 28 \\ 7 & 35 \end{array} $	$\frac{-}{1.4}$ $\frac{-}{0.7}$	$egin{array}{ccc} 0 & 17 \ 0 & 17 \ 2 & 14 \ \end{array}$	Widening of line. Sheet marked Gh. 17m.
37 39 40	,, 10 ,, 19 ,, 24	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccc} 20 & 59 \cdot 0 \\ - & - \\ 11 & 56 \cdot 7 \\ 11 & 30 \cdot 0 \\ - & - \end{array}$	$\begin{array}{cccc} 21 & 00.8 \\ & 02.6 \\ 11 & 57.7 \\ 11 & 32.0 \\ & 42.8 \end{array}$	21 37 12 52 12 52 12 52 12 52 12 52 12 52 12 52 12 52 12 52 12 52 12 52 12 52 12 52 12 52 12 52 12 52 12 52 5	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	$ \begin{array}{r} 0 & 45 \\ 1 & 20 \\ 1 & 30 \end{array} $	

Register from the Royal Magnetical and Meteorological Observatory, Batavia -continued.

No. Date Correspondence of P.T.'s ment Max. Aunition boulde Duration bounde Remarks 812 April 14 4 7.6 9.8 4 1.05 27.212 1.40 — 812 April 14 4 7.6 9.8 4 1.05 27.212 1.40 — — 813 , 18 13 33.0 — 11 43.3 2.9 1.9 3 0 Sin Promeises carthquake. 813 , 2.2 1.10 - 1.2 1.9 2.9 1.5 Thickening. 814 , 2.2 1.6 2.6 7.7 1.16 4.5 1.9 - - 1.5 1.6 3.8 Sin Promeises carthquake. 813 , 1.6 3.8 1.9 1.9 - - 1.5 - 1.5 1.6 3.8 - - - - - - - - -									
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	No.	Date	nie	nce-		Max.	tude	Dura-	. Remarks
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	812	April 14	1			4 16.5	2.7 = 1.2	11 10	_
814 10 6 403 26 7 7 12 14 15 15 15 16 16 16 16 16 16 16 16 16 16 16 16 16 16 15 16 16 15 17 16 16 16 17 16 17 17 16 17 16 17 16 16 17 17 16 17 10 <t< td=""><td></td><td></td><td></td><td></td><td>No recor</td><td>d April 16</td><td>ith, 9h., to</td><td>17th, 8h</td><td></td></t<>					No recor	d April 16	ith, 9h., to	17th, 8h	
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$		10							San Francisco earthquake.
817	815	24	13	1.7 .		13 2.8	0.4 0.2	0 8	Thickening.
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$		an			_	$22 - 13 \cdot 7$	0.7 0.3		
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	818	., 29	16	38-1					-
No record May 2nd, 9h.44m., to May 3rd, 9h.58m. $\begin{array}{cccccccccccccccccccccccccccccccccccc$						$2 - 17 \cdot 2$	0.7 - 0.3		
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	580	, z			: 				-
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	0.01				record May			•	n.58m.
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	822a:		- i	1.8		1 5.1	0.2 0.3	0 2	
$\begin{array}{cccccccccccccccccccccccccccccccccccc$		·,, 5	18						Amplifudes measured from
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	020	j	18	53.8		18 53-8	4.8 2.4		b. seline; seismie origin
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	821 i				12.6				_
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	826	., 15	· +	44:3 :		$4 - 45^{\circ}3$	0.5 0.3	0 2	_
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$						1 22.4	0.6 0.3	. 17 2	
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$		10	3		1	1 30°5 3 21°8		1	
$\begin{array}{cccccccccccccccccccccccccccccccccccc$, 18	2	42.7	0.8	2 - 43.5	0.4 0.5	0 2	Thickening.
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	832	,, 19	3	29'3		3 29.7	0.2 - 0.3	0 1	Thickening.
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$						13 14.7	0.2 0.3		
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$., 22		2.8		13 21·4 5 8·5		· • ·	
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$		23	9			4 59*5 2 45*0	0.4 - 0.2 1.3 - 0.7		Thickening.
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	838	., 30	- 3	53-4	:	3 53.6	0.5 0.3	0 1	Thickening only.
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	840	June 1	-1	37-1	2.0 or 5.8	4 53.0	7.2 2.7	2 23	
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	842	2	8	53.9 .		8 51.4	0.5 0.2		
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$		·, 2							_
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$					ith from (-
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$			Νο τε	cord J	une 9th, 3	h.44m, to	5h.19m., a	nd 5h.45	m, to 6h,13m.
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$			20	53-8	6*0				
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	847	., 11	11	40.1		$11 - 48 \cdot 0$	1.0 0.4	0 18	-
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$. 10							
No record June 17th, 9h,3m., to June 18th, 0h,33m. 852 , 10 0 11.9 0 12.4 0.6 0.2 0 1 853 , 19 11 23.7 0 12.4 0.6 0.2 0 1 854 , 19 11 23.7 2.6 1.0 0 52 854 , 24 11 22.7 4.3 11 31.9 27.5 10.5 1 45 Amplitude measured from baseline. No record June 27th, 21h,8m., to June 28th, 0h,48. 855 , 29 20 51.6 - 20 53.4 1.0 0.4 0.7 856 , 20 23.4 10.0 0.4 0.2 2.7 - - 19 13.4 0.6 0.2 0.4 0.7 - - - 20 53.4 10.0 0.4 0.7 - - - <td></td> <td>., 13</td> <td></td> <td>30^{-8}</td> <td></td> <td></td> <td>1.1 0.4</td> <td></td> <td></td>		., 13		30^{-8}			1.1 0.4		
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	~~~	. ,,	1		ocord fano				- ,
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	0.5.0	10	0		contra diffe				
854 ,	853	, 19	11	23.0	0.0	11 35.7	2.6 1.0	0 - 52	
No record June 27th, 21h,8m., to June 28th, 0h,48, $ \begin{array}{ccccccccccccccccccccccccccccccccccc$	854	,, 24		22.7	4•3	11 31.9	27.5 10.5	1 45	Amplitude measured from baseline.
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$				No r	ccord June	e 27th, 21h	1.8m., to Ju	ine 28th,	0h.48.
$\begin{array}{cccccccccccccccccccccccccccccccccccc$				12-2	— :				_
		,, 29	$\begin{bmatrix} 20 \\ 8 \end{bmatrix}$	51.6		20 53.4	1.0 0.4	0 27	Thickening
		,							

Register	from	Helwan	Obser	rvate	ory,	Cairo,	Egypt.
		erintender					

No.	Date.	Com- mence- ment	L.W. Commence	Max.	End	Max. Ampli- tude.	Dura- tion.	Remarks
				19	06.			•
276	Jan. 2	н. м. 14 02	н. м. 14 11	н. м. 14-12	н. м. 15-18	мм. 2	н. м. 116	Sharp rise after preliminary tre mor.
277	,, 2 ,, 2		10 34	10 41	11 <u>26</u> —	1	$\begin{smallmatrix}1&21\\0&16\end{smallmatrix}$	Thickening. Seî mic origin doub
	,, 3	1 15 27	15 55	16 41		16	-	ful. By black side photo.
				16 47 Off 16 54	the scale. —	17	-	By black side photo.
277	Feb. 3	$ \begin{array}{cccc} 23 & 34 \\ 2 & 36 \end{array} $	2 42	3 02	3 51	0.2	$ \begin{array}{r} 4 & 44 \\ 0 & 19 \\ 1 & 15 \end{array} $	Slight thickenin For the most pa slight thickenin
278	"	0 35	-	0 36 0 50			0 18	Thickening only
279	» "	$ 18 4 \\ - \\ - \\ $	-	18 05		0·4 	0 38	Frequent sligh thickening, apparently seismi from about 1.3 to 7.30.
280	,, li	2 23.5	3 22.5	3 48·5 4 03 4 13	6 10	0·9 0·9	3 46.3	
281 282 283	,, 2 ,, 2 ,, 2 March 3 ,, 0	7 39 19 54·5 8 39·5	$20 & 6.5 \\ 8 & 51.25 \\ $		20 33 9 37 —	0.6 1.7 0.5	$\begin{array}{cccc} 1 & 01 \\ 0 & 4 \\ 0 & 38 \cdot 5 \\ 0 & 57 \cdot 5 \\ 14 & 0 \end{array}$	Thickening.
284 285 286 287	,, 16 ,, 20 ,, 27 April 10	23 14 3 48 5 36•5	$\begin{array}{c} 23 & 33 \\ 3 & 51 \\ 5 & 49 \\ 22 & 6 \cdot 5 \end{array}$	$\begin{array}{r} &$	23 56 4 31 6 49.5 23 19.5	0·9 2·0 1·5 0·6	$\begin{array}{c} 0 & 10^{\circ} \\ 0 & 42 \\ 0 & 43 \\ 1 & 13 \\ 1 & 23 \end{array}$	tremors. Thickening.
	,, 18	20 10	-		-	_	0 16	mor. Thickening, Or
	,, 1 4	4 20	-	_	- !	_	$2 \ 0$	gin doubtful. Thickening. Or gin doubtful.
288 289 290	, 18 May 8 , 12 June 1 , 10	$ \begin{array}{ccc} 1 & 25 \\ 6 & 12 \\ 4 & 59 \end{array} $		$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	17 00 	$ \begin{array}{c} 4 \cdot 5 \\ 1 \\ 1 \\ 1 \cdot 2 \end{array} $	$\begin{array}{c} 3 & 29 \\ 0 & 18 \\ 0 & 22 \\ 2 & 17 \\ 0 & 12 \end{array}$	Slight tremors. Distinct tremor. Slight tremors. Distinct tremor. Slight thickenin
291	,, 18 ,, 19 ,, 24 ,, 24	$ 12 03 \\ 7 44 $	 11 58	$ \begin{array}{c} - \\ 12 & 01 \\ 12 & 03 \end{array} $		 2·0	$\begin{array}{c} 0 & 16 \\ 0 & 22 \\ 0 & 21 \\ 1 & 17 \end{array}$	till 21h.48m. Slight thickening Slight tremors. Distinct tremor. Small carthquake
			17-6-206. 28-6-206.	21h. 10m.— 5h. 23m.—		Lamp out		

Register from Cordoba, Argentina. Director, W. G. DAVIS. Observer, A. DE ROTHE.

No.	Dat	se .		ence-	N	ľax.	Max. Ampli- tude	Du ti	ra- on	Remarks
						1904.				
$1039 \\ 1044 \\ 1045 $	July ,,	$1 \\ 17 \\ 18 \\ 29 \\ 29 \\ 30 \\ 30 \\ 30 \\ 30 \\ 30 \\ 30 \\ 30 \\ 3$	н. 4 4 4	15 15 30		. M.	мм. — —	н. 10 10 10		T. and C.I.M. ,, ,, slight Series of sligh
1047 1048	"	$\frac{23}{23}$	1 15	49 33·1	2	12.3 42.7	0.3	0		thickenings.
1048	., Ang	$\frac{25}{15}$	8	41	10	44 1	0.5			well defined. Minute thicker
1058	Aug.	10 20	19	58·5	20	0.8	11.0 8	0		ings, doubtfu Beginningabru
1055 1061 1062	19 73 19	24 24 24	1 21	15 18·8			0.7	4	30	strong E.Q exceeding th limits of pape C.I.M. Well define beads ; lat half minut
1065	,,	27	22	20.8	23	7.8	2.0	2	2	thickenings. Bead like ; we defined.
1074	Sept.	27	-				0.6 ?		-	True E.Q. Com menced be tween 101 and 1012 while chang ing paper;em 11h.40m.
1077	Oct.	3	4	24		-		0	11	Several thicken ings, followe by T.
1090	,,	25	9	42.6			1.6	1	11	Well defined Last part bea like.
1103	Nov.	19	9	22.8	9		2.9	0	32	Not beadlike No P.T.
1104	,,	19	13	49·1	13	53.4	1-1	0	12	Very similar No. 1103 form.
1111	Dec.	11	17	6.5	17	8.8	1.7	0	28	Well defined beadlike.
1114 1115	5 1 5 5	20 22	5 15	52·3 43·3	6 15	1.5 52.3	0.2	0		Violent and i regular swin to W. Ma deviatio 10mm.
						1905.				
1118	Jan.	10		42.3			-	0	3	Slight thicker ing; doubtfu
1122	,,	19	20	38-3			0.2	0	3	Carrot shaped.

86 Notes to Register from Cordoba, Argentina.

Sensibility of instrument lmm, of amplitude = 0"955, T. = Tremors, C.I.M. = Continuous irregular movements, D. = Dislocation or sudden displarement. From the 20th of November until the instrument was removed to Pilar there were many erratic movements at infervals but usually not of such a character as to m sk completely any important seismic disturbance. For the suke of brevity all these have been omitted from the register. Movements which commenced suddenly are marked >.

Register from Magnetic Observatory, Pilar, Cordoba. Director, W. G. DAVIS. Observer, A. DE ROTHE.

-			0									••	· · · ·
No.	Da	ite	m	om- ence- nent	L.W. Commence	, ?	lax.		End	Max Ampli- tude)ura- tion	Remarks
					:		-	1					
							19	05					
-1	Mar	ch 2	н. З	м. 38•8	н.м. 4 56*6	11	. м. —	8	м.	мм. 0-1	11	м. —-	2 small beadlike shocks. Dur.1m.
7		5			16 17.4		_			0.2	0	3.0	Small carrotshaped
11		9	22	47*4		23	02-2	23	17.9	0.5	0	3015	Ap. true Eqke. movt., slight.
12	.,	10	2	39.8	_	2	43-8	2	44.9	0.1	0	5.1	Same, very slight.
13	,,	10	4	53.5		5	18-4	5	26.4	0.2	0	32.9	Same.
14	,,	10	6	59*6						0.1	0	0.2	Same, beadlike, very slight.
24	••	17	2	55*6	-			1 4	29.6	0.4	1	34.0	Dur. of first movt. 3m., followed by T. and small
26		17	22	19-4	22 25.0	22	30-4	- 22	4714	1.0	Ð	28.0	Well defined Eqkc.
28	,,	19	0	22.0	-	0	33.7	2	08.8	0.2	1	46.8	True Eqke. movt., followed by T. whole morning, during which a possible shock; time lost,
29	,,	19	1		$\frac{13}{24.5}$					0.1	D	3.0	1
30	.,	19	13	46.9		14	30.6 31.6	14	10.8	0.6 0.6	0	53.8	True Eqke. movt., commencing with >; first max. beadlike, second >.
42	,,	20	11	03.7	-	11	12.9	11	28*6	0°6	0	24.9	Ap. true Eqke. movt., max. ind.
-1-1	,,	20	14	35.7	-	19	44.9	15	06^{-2}	1.0	Ű	30.2	Ap. true Eake. movt., max. >.
48	,,	21	19	08.3		19	18-4	19	2315	1.2	0	15-2	Ap. true Eqke. movt., max. >.
50	"	22	2	15-4	-	-1	01.7			0.2	U	5.0	Two slight > D., followed by T. and bending of line, between which a slight beadlike shock, ind, as max., dur. lm., ampl. 0.2.
51 53	•! !!	$\frac{22}{22}$	6 14	45+8 39+8	14 47-4	14	48·4 51·5	14	55.9	0.2 0.5 0.5	0 0	$\frac{2.0}{16.1}$	>. Ap. true Eqke. movt., second
54 55	,, ,,	$\frac{22}{22}$	$\frac{16}{16}$	42•8 53•5	17 09-8				-	$0.5 \\ 0.2$	0 eac	2.0 h 2.0	max. >. > slight. Two > D., first to W.,second bring-

Register from Magnetic Observatory, Pilar, Cordoba- continued.

No.	Da	te	m	om- ence- lent	L.W. Commenc	e 3	lax.		End	Max, Ampli- tude		ara- iou	Remarks
61	Apri	1 13	н. 16	м. 25 ⁻ 6	н. м.	и 16	. м. 26°6	Ц	, м. 	мм. 0-1	п. 0	м. 310	Slight but tru Eqke. movt.
64	•,	17	0	15.4							6	30.0	T.and slight bene ing of line.
$\frac{71}{72}$		25 26	16	$\frac{24\cdot 3}{14\cdot 3}$					-	$0.4 \\ 0.1$	0	$\frac{3}{2} \frac{0}{0}$	>. > very slight. Wall dafined Fals
73	.,	$\frac{10}{26}$	21	47-9		21	-48-9	22	50.0	3.0	ĩ	2.1	Well defined Eqk movt,
fo 13 76 81 85 87	W, be h, and	tw. C.I. 5 19h 30 5 9 11	(h. a .M. 1 .45m 14 16 6 : 13	nd 10 resemb .) begi 30.6 14.8 57.6 45.4	M. from 16 h. (max. 4) bling true in 18h.45m 16 18.9 	0h.450 .mm. Eqke . Mo .14 .3	n, to fi at 6h. 2. movt ovt, fin 32-7 07-8	nish ; wi at ishe 16 7 4	at 5h., hen mi 19h.45r s with 21°6 35°7 15°4	55m. on 2 yvt. finis) n. under strong T. 0.7 0.2 0.2 0.6	9th, nes. stroi at 5 0 0 0 14	during T. c ng ber 1.45m. 8*0 6*8 38*1 38*1 30*0	2. botw, 18 and 211 y new bond of lir ommonces again a on 30th. >> doubtful. Ap. true Eqk move, very slig True Eqke, movt slight. True Eqke, movt 2 curve, to E, a 186,29m, a 205,35m.
89		12	14	05.2	15 367	15	44-9	16	41·8	0.6	2	36.6	True Eqke, movt with bend 1mn E.
$^{98}_{100}$	· .,	$\frac{18}{20}$	10	 15-1	14 07·8	$\begin{array}{c} 14\\10 \end{array}$	$09.3 \\ 20.9$	$ 15 \\ 10 $	$43.3 \\ 27.0$	0-6 0-2	$\begin{bmatrix} 1\\ 0 \end{bmatrix}$	35°5 11°6	True Eqke, mov True Eqke, movt slight.
101	••	23	6	21.5	6 24.0	6	$\frac{29 \cdot 1}{31 \cdot 7}$	7	39.8	$\frac{3}{3}$ 0	1	18.3	Well-defined Eq movt.
108	12	25	3	27.6	3 35-2	3	$36 \cdot 2$	3	58.6	0.0	0	31.0	Well-defined Eq movt.
110	June	2	7	14.3	-					· ~ ·	0	6.0	Small thickenin of line.
$\frac{111}{112}$, ,, , ,,	$\frac{2}{3}$	16	21.0	8 16.4		_			0.5	0 0	$3.0 \\ 3.0$	>. Carrotshaped,vor
$\frac{114}{117}$		$^{6}_{12}$	2	$ \begin{array}{c} 06.8 \\ 46.4 \end{array} $	_	5	47.4			0-2 0-3	0 0	$2.0 \\ 8.0$	slight. > slight. 2 slight thicker
118		12	6	20^{15}	6 23.5	6	34.7			_		_	ings of line, 5 thickenings,ver
119	,,	12	8	29.6	$\begin{array}{ccc} 6 & 20.6 \\ 9 & 02.2 \end{array}$	6 9	41-8 48-9						slight. 4 thickenings,ve
124	,,	14	11	52.0	9 06-8	12	$\frac{15.9}{26.8}$		-	0.4 0.4			slight. True Eqke. movt end uncertain
131	! ,.	21	23	50*5		23	34-7 53-5	24	05·8	$0.4 \\ 0.2$	0	15-3	photo, indistine True Eqke, movt
133	July	9	10	01-7	-	10	264	П	47.4	0-2	3	45.7	eigarshaped, Slight movt. a 10h.42'9m.,char ging to strong T
135 136 139	34 13 77	12 14 23	9 3	21.9 05.6	3 09.6	6 3 -4	34·7 	10 5	26°0 45°1	0·1 0·6	0 1 2	$1.0 \\ -4.1 \\ 39.5$	nax.at 11h.14 4 Slight > doubth Thickening of lin True Eqke. movt well defined.
142 147 157	Aug. Sept.	12 31 8	$15 \\ 14 \\ 2$	16-4 27-6 09-9	2 27.7	: 1 14 2	$ \begin{array}{r} 17 \cdot 4 \\ 34 \cdot 3 \\ 46 \cdot 4 \\ 48 \cdot 4 \\ 53 \cdot 9 \end{array} $	15 14 3	23*4 54*4 04*5	0-7 0-1	0 U 0	7*1 26*8 54*6	Thickening of lin True Eqke. mov True Eqke. movt begin with sever thickenings
162	.,	15	-	- !	6 25.6	6	$34.2 \\ 43.0$	8	33.5	0.4	2	7.6	line. Calabria True Eqke, movt slight. Calabria
163	,,	18	-	-		12	$\frac{45.5}{20.5}$			0.6	0	8.0	> Belen, Chun bicha, Rioja,
168	"	30	-	-	20 25.6	20	33•4	20	50·4	0.3	0	32.8	True Eqke, movt
											long	series	very slight; of small undul:

Register from Magnetic Observatory, Pilar, Cordoba-continued.

No.	Da	te	m	om- ence- ent.	J.W. Commence	N.	lax.	1	ad	Max. Ampli- tude		ura- ion	Remarks
171	Oct.	15	н. 21	м. 56•3	н. м.	н. 22	м. 02·0 15·4	и. 22	м. 41.8	мм, 0-2	н.	м. 45.5	True Eqke. mov very slight,
172	1,	17	ĩ	16.4	-	9	10 4 30.6 36.8	10	15	0.3			At 7h.16m, con bending of 1i to E., comin buck to level 12 o'clock. A parently tr Eqke. mov very slight.
173	Nov.	4	1.1	48.7		15	01.8	15	22.5	0.5		33-8	Ap. true Eq. movt.,very.slig followed by thi enings to22h.15
175 -	,.	გ	21	42.8	22 03.2	22	15.4 17.4	23	02.4	0.5	1	19.6	True Eqke, mov well defined.
$\begin{bmatrix} 176 \\ 177 \end{bmatrix}$,,	$\frac{10}{24}$	21 5	$\frac{45.4}{28.6}$		$^{21}_{5}$	$47 \cdot 4$ $82 \cdot 7$ $35 \cdot 7$	22 5	$03.7 \\ 45.1$	$1^{\cdot 2}_{0^{\cdot 2}}$	Ì	$18.3 \\ 16.8$	Two slight ciga shaped shocks,
182	,,	25				15 16 17	23.6 26.4 59.6 06.8 28.4 84.4 21.4	17	45.1	0.4 10.0 9.0 10.0 8.0 7.5 10.0	2	21.5	All >. At 15 17'4m, and 15 52'5m.two sime cigarshape shocks of 0 ampl. and 3'5r duration.
185	Dec.	4	8	13-8	· – :	8	27.4 27.6	8	56-1	0.4	l	12.3	True Eqke. mov well defined.
187	"	10	14	3147	-	14	42.9	15	26*6	-		54.9	Series of sma shocks. Ap. tr Eqke. movt.
189	,,	17	5	45.0	—		-	7	45-0	0.3	2	0.0	Slight but ap. tr Eqke.movt. Tin uncertain.
192	,,	29	10	50-5				12	45.0	0.1	1	54.5	Thirteen thicker ings. Kingsto Trinidad ?

With Eqke, number 87 the magnetograph shows a disturbance for horizontal intensity but not for declination.

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Register from Baltimore, Md., U.S.A. Director, HARRY FIELDING REID.

No.	Dat	0	me	om- ence- ient	L.W. Commence	Ма	ax.	Ē	Ind j	Max. Ampli- tude	Dura- tion	Remarks
							190	6 .				
	Jan. .,	3 16 18 21 24	11. 2 23 14 6	м. 56·3 0·4 14 50·7	H. M. 3 04.0 20 27.6 	н. 3 	м. 09.5 58 7.5 28.0	н. 3 20 23 15	м. 19-0 31-1 15 33	MM. 1.0 0.3 0.4 0.5 3.2 1.0	п. м. 	E.Q. Swelling of line.
	3* 19	24 27	$^{21}_{9}$	58 / 50 /	$\begin{array}{ccc} 22 & 1.4 \\ 10 & 22.0 \end{array}$	$\frac{1}{22}$	$\frac{45.0}{1.6}$ 24.6	$\frac{22}{11}$	45-0 51-0	$\frac{1\cdot 5}{2\cdot 2}$ $2\cdot 0$	·) vals. Several equal maxima,
	,, ,, ,,	27 31 31	16 14 15	17*5 27*0 43*4	15 49·3	16	2.0	17 15 20	16-0 3-0 30-0	$0.2 \\ 0.2 \\ 16 +$		Beads. Columbian E.Q. Amp. more than 16mm.,off and on
		31	21	35-5		21	50.0	22	9-0	0.2	-	for 35m. Largest E.Q. so far recor- ded at Baltimore. Apparently an
	Feb. 	$\frac{1}{2}$	$223 \\ 123 \\ 17$	53-8 39-0 06-4		23 17	45.5 16.5	$\frac{23}{18}$	54·0 18·0	0-2 0-3 0-5		after shock. Beads for 12m. Beads. Beads. Times inaccurate.
		8 10	6	30-0	1_06.0	-	-	$\frac{1}{12}$	15-0 00-0	0.3 0.2	_	Swelling, Swelling, Perhaps A.C.
	·, ,,	16 19		$\frac{50}{20}$	\$ 01.2	15 3	57.6 14.1	4	53.0	2-0 5-7	_	E.Q. "

Register from Experiment Station, St. Clair, Trinidud, B.W.I. J. H. HART, F.L.S., Superintendent.

No. D	ite ! n	Com- ience- ment	L.W.	Max.	En	1 d : . 1	Max. Ampli- tude	Dura- tion	Remarks
				19	06.				
292 Jan 293 295 296 297 298 299 300 301 302 303 304 305 306 306 306 306	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	н. м. In one diagram — — — — — — — —	н. м. 14 25 15 41 21 37 25 35 17 5 19 7 1 47 17 45	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	м. 56 56 42 42 1 26 26 26 20 10 20 52 14 20 52 14 20	мм. 1 2 2'-5 3 2'-5 2 1'-5 2 - 3	II. M. 0 6 0 27 0 27 0 10 0 30 0 31 0 37 0 31 0 36 0 16 0 18 0 9 0 3 0 5 0 38	Thickening of line

Register from the Observatory (Syrian Protestant College), Beirût, Syria. Observer, Alfred H. Joy, M.A.

No.	Date	Com- mence- ment	L.W. Commence	Max.	End	Max. Ampli- tude	Dura- tion	Remarks
				19	06.			
$\begin{array}{c} 153\\ 154\\ 155\\ 156\\ 157\\ 156\\ 156\\ 166\\ 166\\ 166\\ 166\\ 166\\ 166$	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	10 30·5 16 1·5	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{c} {}^{\rm MM}_{\rm M}_{\rm M}_{$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	Thickening. " " " " " " " " " " " " " " " " " " "

Film from Feb. 13-20 spoiled in development.

Jan. 2 ,, 4 Ap, 18	$\begin{array}{c} 0 \\ 1 \\ 12 \end{array}$	$\begin{array}{c} 30 - 21 \\ 10 - 22 \\ 35 - 20 \end{array}$	$\frac{46}{10}\\06$] j	Lamp out.
Period =	15	sec.		I	mm. = $0^{\prime\prime}$ 38,

Register from Experiment Station, St. Clair, Trinidad, B. W.I.-continued.

No.	Date	Com- mence- ment	L, W, Commence	Max.	End	Max. Ampli- tude	Dura- tion	Remarks
308 309 310 311 312	Feb. 19 March 3 ,, 9 ,, 13	H. M. 2 21 8 43 ? 18 24 17 4 20 42	н. м. — 8 54 —	н. м,	H. M. 4 21 9 17 ? 18 34 17 7 20 45	мм. 4 	H. M. 2 0 0 34 (0 10 0 3 0 3	Series of thicken- ings. Merged in tremors Thickening of line
313 314 315 316 317 318 319	April 2 , 15 , 21 , 29 April 2 , 10 , 17 , 18	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	21 56 	$\begin{array}{c}\\ 21 & 58\\ 16 & 13\\ 21 & 58\\ 12 & 40\\ 13 & 53 \end{array}$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	1.5 3 1 2 4 10	0 7 0 1 0 35 0 14 J 19 0 8 3 16	Thickening of line
320 321 322 323 324 325 326	", 20 ", 21 ", 26 ", 27 ", 28 ", 30 May 3	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$			$\begin{array}{cccccccccccccccccccccccccccccccccccc$	1.5 17 2	$\begin{array}{cccc} 0 & 6 \\ 0 & 4 \\ 0 & 3 \\ 0 & 4 \\ 0 & 10 \\ 0 & 11 \\ 0 & 35 \end{array}$	Thickening of line """"""""""""""""""""""""""""""""""""
327 328 329 330 331 332	, 4 , 5 , 28 , 30 June 3	$\begin{array}{cccccccccccccccccccccccccccccccccccc$		$ \begin{array}{ccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	1 1 1	$\begin{array}{cccc} 0 & 10 \\ 0 & 4 \\ 0 & 13 \\ 0 & 4 \\ 0 & 7 \\ 0 & 3 \\ 0 & 3 \end{array}$	Thickening of line
833 334 335 536	$ \begin{array}{ccc} $	$ \begin{array}{rrrr} 19 & 25 \\ 2 & 39 \\ 7 & 55 \\ 17 & 3 \end{array} $		$ \begin{array}{cccc} 19 & 26 \\ 2 & 41 \\ 7 & 59 \\ $	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	0.5 1.5	0 9 0 22 0 8 0 3	Full swing.

Period of boom = 18 seconds. 1° turn of screw = 4mm, deflection.

turn of screw = 4mm, denection.

Register from C. and G.S. Magnetic Observatory, neur Honolulu, T.H. Observers, W. WEINRICH, JUN., and S. A. DEEL.

The period of the pendulum has been kept between 18 and 20 seconds, except during one or two short intervals. The sensitiveness has not been changed since September 23, 1903, when the instrument was readjusted. At the time the period was 20 seconds and a turn of one degree of the lever on the base serve produced a displacement in the end of the pendulum of 5⁻¹50mm, hence lumn, displacement in the end of the pendulum corresponds to a tilt of 0⁻³37; this was redetermined on April 14, 1904, and was found to be precisely the since. Since September 23 the period has varied only between 18 and 20 seconds, being 19 seconds in most cases.

The records of the instrument in its present location begin April 1, 1903, and the following table contains all carthquakes recorded up to June 30, 1904. All times given are Greenwich Mean Givil Time. The data are tabulated in essentially the same way as in Mine's circulars. As far as possible the following phases were identified and recorded, namely: the first preliminary tremor; second preliminary tremor; the explaining of large waves, or principal portion; the maximum; end of principal portion and the end of the carthquake.

The following abbreviations are used to indicate doubtful cases: D. doubtful; S.D. somewhat doubtful; V.D. very doubtful; Sw. mere swelling of the trace; D.M. diagrammatic maximum. Frofessor A. Imamura, in No. 16 of Publications of the Earbhquake Investigation Committee in Foreign Languages, has called attention to the fact that the Milne pendulum often records a maximum when waves of approximately its own period and small amplitude reach the pendulum; this artificial maximum is called "diagrammatic."

On page 94 will be found noted the times for which there is no record from the instrument.

The normal width of the trace is 0.3mm.

Register from C. and G.S. Magnetic Observatory, near Honolulu, T.H.-continued.

A disturbance which occurs almost every day, beginning about midnight and lasting until 7 or \$ a.m., L.M.T., or in G.M.T. from 10h.30m. to 1\$h.30m, is an effect ascribed to air tremors. The times of beginning and end vary on different day, and on some days the effect is wholly lacking. According to Professor Milne this effect is associated with a falling temperature.

These air tremory often begin or end with a few $(3\!-\!12)$ long waves of small amplitude and a period varying in different cases from 50 to 240 seconds.

1903.	April	24	10 19.1-10 29.1	Twelve waves, 50sec. period.
	, ,	24	10 33.6-10 43.6	Eleven waves of 55sec. period.
	May	7	10 07.3-10 15.0	Eight waves, 58sec. period.
	July	1	Aboat 12 00	Five waves, 73sec. period, followed for about an hour by waves
	•			19 5sec. period, superposed on similar long-period waves.
	Oct.	1	About 18 30	Eight waves, 90sec. period.
	,,	28	$13 \ 02 \ -18 \ 02$	Frequent waves, about 210sec. period.
	Dec.	16	$16 \ 02 \cdot 3 - 17 \ 01$	Waves, 240sec. period.
	,,	16	18 23 -19 12	Waves, 188sec, period.
1904.	Jan.	20	About 10 15	Five waves, 180sec, period, about 5hrs, previous to earthquake of
				Jan. 20.
	*,	22	., 20 00	Waves 120sec, period.
	Mar.	15	, 8 16	Four waves, 75sec. period.
	,,	15	,, 20 25	Ten waves, 84sec. period.
	,,	17	15 12.5-15 24	Seven waves, 98 6sec. period.

It is interesting to note that these waves occur at the beginning or ending of air tremors, except in the case of March 9, 1904.

No.	Dai	e	m	om- ence- ient		W. nence	N	lax.	F	nd	Max. Ampli- tude	Duratio	m	Remarks
								19	03					
1	April	3	ħ.	. м. —	n. 9	м. 50•0	н. 9	м. 51 б	н. 9	м. 55^2	мм. 0·7	н. м		Probably distan earthquake.
*2	,,	12	3	18.6	3	26.2	3	33-8 36-8	5	44.4		_	}	Typical sma earthquake.D.M
3 4 5 }	,, ,,	21 29 29	9 0 4	24·1 16·8 18·4	4	31.4	9 0 4	26.6 43.9 34.3	9 1	30;4 41·4	0-5 0-4 0-55	-)	D.M. Sw. Sw. Three disting
6	May	8	4	12-6	4	21.9	4	39·4 44·7 24·4	6	24·9 35·9	0-5 0-6 0-8	_	Ì	maxima. D.M.
7 8	,,	$13 \\ 15$	$\overline{6}$ 11	$\frac{12.0}{44.5}$ 57.3	6 12	59-5 04-1	7 12	10·8 04·7	9 12	$25 \cdot 3$ 58 \cdot 1	2.2	_	i	
*9 10 11	" June	$ \begin{array}{c} 16 \\ 23 \\ 2 \end{array} $	22 13	21·9 25·8	$\begin{smallmatrix}&2\\22\\13\end{smallmatrix}$	57·5 30·6 31·3	22 13 13	31·4 32·3 36·8		06-7 37-7 12-8	0.65 1.9 4.4		ł	mum. S.D. Sw. True max. Typical larg earthquake. Ra
12 13	11 11	7 8 10	9 7 16	12.5 20.4 59.7	9.	39·7	9 17	48-0	10 7 17	34·5 42·4 38·9	1.2	=)	pid period wave Sw. D.M. Taking time du
•14 •15	" July	2	21	23-4	21	35-9	21	37.8	17		1.1			ing P.T. Trace spoiled aft
16	Aug.	21	8	$02 \cdot 9$	-	_	8	$\frac{06 \cdot 2}{11 \cdot 9}$	8	18.2	0-6 0-8	_	}	21h.37 [°] .3m. S.D.
17 '	Sept.	7	7	21-1	-	_		<u> </u>	8	10.1	-	-	,	Trace poorly d veloped. S.D.
*18 19 20	oct.	10 10 -i	10 14 5	55-5 07-0 06-0	5	10.2	5	17.6	$ \begin{array}{c} 11 \\ 14 \\ 6 \end{array} $	04·0 27·7 04·2	0.5	Ξ		S.D. Sw. Max. doubtfu Very small.
21	"	17			1	46-3	1	51.8	2	16.8	0+5	-		Slight dist. 21 35.8m-2h.41.8r
22 23)	 	20 29	2 14	59•0 29•2	3 14	$12.0 \\ 42.0$	$3 \\ 14 \\ 14$	17·5 49·8 53·1	4 16	08-5		=		' D.M. Max.quite defini D.M.
24 '	"	30	4	05-3	4	13.0	4	25*8	5	13.0	2.2	-	,	Slight dist, 31 49.3m-3h.53.3n 6h, 35.5m61 44.0m.

Register from C. and G.S. Magnetic Observatory, near Honolulu, T.H.-continued.

	,		1.0. may			11070		1.—commucu,
No.	Date	Com- mence- ment	L.W. Commence	Max.	End	Max. Ampli- tude	Duration	Remarks
25	Nov. 10	н. м. 21 05·7	н. м. 21 10 [.] 5	н. м. 21 17.4	н.м. 22 04·5	мм. 1·5	н. м.	D.M. Maximum doubtful.
26 *27	, 17 , 24	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccc} 21 & 01 \cdot 3 \\ 14 & 17 \cdot 9 \\ 14 & 26 \cdot 4 \end{array}$	21 30·7 14 47·4	0·5 0·6 0·6	- 1	— D.M.
28 29 30	Dec. 1	$ \begin{array}{cccc} 6 & 58 \cdot 4 \\ 21 & 24 \cdot 2 \end{array} $	$\begin{array}{ccc} 6 & 59 \cdot 9 \\ 21 & 35 \cdot 0 \\ 15 & 28 \cdot 8 \end{array}$	14 20 1 7 05·9 	8 08·2 21 54·1	0·9 2·8		D.M. Sw. D.M. Beginning
31	10	_			19 29.3	20		by air tremors. Time break 18h.
32	,, 10	1 11.9	1 17.3	1 22.5	3 00.7	3.0	_	24.7m—18h.28.7m. Max.very distinct.
33 34	<i>,,</i> 23	23 41·3 21 31·3	23 46.3		23 57·5 22 10·7	-	—	No distinct maxi- mum. Sw.
35	,, 24 ,, 28	3 08-3	3 29.1	3 38.3	4 30.1	_	_	-
Ì				19	04			
36	Jan. 3	-	21 49•4	21 52-6	21 56.7	0*5	-	D.M. Sw. Dist. 21h.40.6m21h. 43.7m.
37 38 (,, 10 ,, 20	2 55·5 15 04·2	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	3 19·5 15 16·7	4 01.5	3·0 1·65	= ,	D.M. Typical earth-
39	29	0 19.0	0 41.3	15 31-3 0 44-8	$ \begin{array}{cccc} 17 & 41 \cdot 4 \\ 1 & 25 \cdot 0 \end{array} $	4·4 0·7	Ξ }	quake.
40	Feb. 4	-	21 23.8	21 26-9	_	-	-	Air tremors at beginning and end.
41 42	., 8	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	=	6 19.8	$\begin{array}{ccc} 10 & 25 \cdot 4 \\ 6 & 25 \cdot 5 \end{array}$	0.5	=	S.D. Sw. Sw.
43	March 1	15 19-7	15 27.7	15 30.1	—	0.62	-	Air tremors at end.
44 45	,, 1 ,, 4	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$		16 36-5	17 00·3 0 32·7	4.0	-	V.D. Sw.
*46	" 4 " 9	10 46 ·1 —	11 03·1 —	11 08.0	11 24-0 —	0•5 —	_	Distinct long pe- riod waves from
 	10		7 52.8	7 55.0		0.75	ļ	13h. 31 ⁻ 1m. to 14h.05 ⁻ 2m. First max. in-
47 }	,, 16	-	7 92'8	7 55·8 7 57·3	-	1.0	= }	First max. in- stantaneous, sec- ond is D.M. No P.T. Air tre-
48 1	<u>,</u> , 16	_	22 08-8	22 10.3	_	0.22]	mors at end.
49	,, 18	14 00.2	14 10.0	$\begin{array}{cccc} 22 & 12 \cdot 8 \\ 14 & 12 \cdot 2 \end{array}$	22 35·3 14 34·0	0*55 0*5	= }	S.D. Sw. D.M.
50 51	,, 19 91	6 47*9 7 09*4	7 14·9 7 10·4	7 18·2 7 14·1	9 11.8 7 50.4	3-85 0-5	-	Typical carth- quake. D.M. Sw.
52	,, <u>3</u> 1	-	3 02-4	3 10.9	3 39-7	0.22	-	Sw. P.T. indis- tinct.
53	April 4	10 39.5	11 04.5	11 32·0 11 44·4	12 52.8	1.6	Ξį	Local earthquake
	* *						}	at about 18h. 05.3m, Trace in- terrupted from 17h.59.3m, to 18h.15.3m,
54 55	,, 12	11 00.6 18 59.6	11 04·6 19 04·4	11 15 [.] 6 19 07 [.] 4	$\begin{array}{ccc} 11 & 47^{+}9 \\ 20 & 42^{+}6 \end{array}$	$ \begin{array}{c} 0.25 \\ 2.3 \end{array} $	=	Trace interrupted 19h,17.6m.—19h. 25.6m.
*56 57	, 14 May 1	1 <u>32·2</u>	1 34·7 16 05·4	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	2 20-5 —	0.85 3.0	=	Trace poorly de-
58 *59	" 1 " 14	23 42.8	23 55·1 14 09·1	24 00-1 14 14 ⁻ 4	²⁴ 29·9 —	0.8 1.6	_	veloped. Air tremors at beginning and
)	1	1	!	Ι.		1		end.

Register from C. and G.S. Magnetic Observatory, near Honolulu, T.H.--continued.

No.	Date		me	om- ence- nent		W. mence	м	ax.	End	Max. Ampli- tude	Duration	Remarks.
60	June	4	н.	м.	н. 22	м. 58°5	11. 22	м. 59 [.] 0	и. м. 	мм. —	н. м.	Local earthquak felt in Honolulu Pendulum, hel by spider's web
61	,,	18	6	17-7	6	28.4	6	32.6	7 41.0	3 0.0	'	record imperfee
62	"	24	ĩ	20.4	Ĩ	28.4	ĩ	33.9	2 25-			D.M. Trace poor ly developed.
*63		25	2	41.9	1.	_ `	2	50.5	2 57.1			Sw.
64 /	,,	25	21	08.8	21	15.4	21	15.8	—	2.6	、	Distinct shocks a
- U							21	18.9	- 1	2.0	! — \	21h.15m., 211
- 21							21 21	$\frac{21.0}{22.8}$	i	2.0		18.4m., 21h.21m
- 1					1		21	22.0		11.4	= (and 21b.22.8n 5th and 6th ma:
1							21	32.0	25 03-1	5.9	= $($	ima D.M. Sligh
<u>``</u>					i –			02.0			÷ 1	disturbance from
						1					:)	20h.12.6m. t
*65		26	10	48.0	10	58·0	11	08.5	12 24.1	2.5	Í Í	20h,24 ⁻⁵ m. D.M.
667	»,	27	10	09.8	10	23.1	- 16	24.7	لتحد شد	2.0		First four maxim
001	**	~•	Ĭ	00.0	v	-01	ő	29.1	_	3.0		due to distin
- 71					1		ŏ	30-4		1 4.9	I Ş	shocks, fift
					i		0	31.9	_	10.1	(somewhat dia
- ()		1			1]	0	37.4	4 00.0	14.05	i)	grammatic.

Periods for which there is no record :--

			Period			the	re is n	io record :
Fror	n			Te				
1903	3			190	3			Cause
April	13	12	30	April	13	24	00	Clock stopped.
.,	15	0	53	, ,	15	- 3	59	Instrument open.
May	18		42	May	19		26	Lamp out.
June	15	16	32	June	16	17	07	19 19
,,	18	20	43	,,	19	1	32	Clock stopped.
,,	19	10	00	",	20	9	00	Trace spoiled.
	20	15	00	<i>"</i> ,	20	22	00	Lamp out.
July	1	4	50	July	1	8	40	Trace spoiled.
,,	1	11	47	"	1	18	50	Clock stopped.
"	17	4	12	**	17	18	57	,, , , , , , , , , , , , , , , , , , ,
"	18	6	02	,,	18	19	02	
,,	18	21	07	,,	19	18	06	
	28		12	"	28		12	11 17
,,	29		02		29		02	Trace spoiled.
,,	30		02	,,	30	17		No trace.
Aug.	2	18		Aug.	11			Clock stopped nearly all time.
Sept.	17		15	Sept.		23	49	Trace lost in transmission.
Nov.	30		32	Nov.			44	No paper.
1904				190				
April		18	08	April		23	14	Supply of paper exhausted.
,,	22		00	.,	24		25	Recording cylinder stuck.
May	22	21	22	May	23		06	Lamp out.
June	2	-8	27	June	2	19		Paper caught.
,,	6		02	,,	7	18		Lamp out.
	25		32		25	18		Clock stopped.
"	26	16		"	26	20		
,,				**				** **

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Register from Perth Observatory, Western Australia. Director, W. E. COOKE, M.A., F.R.A.S., §c.

No.	Date	Com- mence- ment	L.W. Com- mence	Max.	End	Max. Ampli- tude	Remarks.
				1906			·
1	Jan. 3	п. м. 2 8·2	н. м. 2 22.6	н. м.	н. м.		l
2	, 18		22 7.7	2 25.9 22 8.4	$\begin{array}{ccc} 3 & 3 \cdot 0 \\ 22 & 34 \cdot 5 \end{array}$		
-	,, 19	4 0.0			8 0.0		Small tremors.
	<i>,</i> , 19	13 0.0	_	_	0 0.0		
	,, 20	0 0.0			6 0.0	i	Very small tremors
3	,, 21 , 22	$\begin{array}{ccc} 12 & 3 \cdot 3 \\ 0 & 0 \cdot 0 \end{array}$	14 8.8	14 23.6	15 44.0 4 22.0		
4		4 21.8	$4 \ 34.2$	4 37.0	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$		Small tremors.
*	,, 22 ,, 22	5 30.0			0 0.0		Small tremors.
	,, 23	0.0	_		17 26.0		,, ,,
5	,, 23		17 41.6	17 45.4	18 22.5	0.2	
$\begin{bmatrix} 6\\7 \end{bmatrix}$,, 24	2 43.4	2 48.9		3 2.9		
1	,, 27	10 13.9		11 19-9	11 26.7	0.4	-
		No record	l from 19	06, Jan. 31,	15h., to	Feb. 1, 1h	. 30m.
8	Feb. 1	2 34.2	$2 \ 48 \ 3$	2 48.7	3 41.9	2.1	·
9	,, 5	4 37.7	4 48.2	5 3.9	5 27.4		-
10	,, 8	0 25.3	0 45.4	0 46.9	1 8.6	0.2	_
11	,, 10	8 56.0	9 2.2	9 6.0	9 29.7	0.85	
$\frac{12}{13}$, 12, 13	6 56.8	$\begin{array}{ccc} 7 & 18.0 \\ 5 & 39.5 \end{array}$	$\begin{array}{c} 7 & 27 \cdot 8 \\ 5 & 40 \cdot 1 \end{array}$	$\begin{array}{c} 7 & 50.8 \\ 5 & 47.0 \end{array}$	$ \begin{array}{c c} 0.3 \\ 0.5 \end{array} $	-
14	. 15	$14 \ 39.6$	0 000		14 50.1	0.3	
15	, 17	0 53.3	0 54.9	0 58.1	1 30.1	0.4	
16	., 19	4 8.3	4 15.4	4 29.9	5 18.7	14.9	
17	,, 20	5 55.1	6 4.7	6 7.8	6 11.5	0.3	
	,, 20	Small	tremors	at 10 55 a 6 29.6	nd 11	22. 0.8	-
-		0 00 1		8 1.21		0.9	
18	,, 21	3 38.2	-	8 31.9	12 8.0	0.9	—
				9 2 4)		11)	
	,, 22	0 0.0		-	24 0.0	-	Very small tremors at intervals.
[,, 23	0 30.0			17 30.0		,, ,, ,,
	No ,,			Feb. 23, 22h Feb. 25, 14h			
19 T			20 31.5	20 49 3	21 8.8	0.5	
	Mar. 1	12 10.0	_		14 45.0		Small tremors.
	,, 3	9 15.0	-		11 0.0	-	** **
	// B	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	-	-	$ \begin{array}{rrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrr$	·	** **
20			9 48.2	19 50.4	2 0.0 20 48.4	1.5	,, ,,
21	,, 10 ,, 10	6 51.9	7 5.8	7 20.6	8 6.8	2.5	
22	,, 10		6 53.6	16 56.7	$16 \ 27 \cdot 4$	5.6	
	,, 11	0 0.0	-		4 0.0	-	Small tremors.
1	,, 11	$\begin{array}{c c} 9 & 0.0 \\ 21 & 0.0 \end{array}$		-	9 30.0		,, ,,
	19	$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$			21 30·0 14 0·0		,, ,,
23	14	2 31.4	2 34.8	2 35.1)		0.5	** **
	,, 14	2 314	2 34 X I	2 36.3	2 44.1	0.5	

Register from Perth Observatory, Western Australia-continued.

No.	Date	me	om- ence- ient	L.W. Com- mence	Max.	End	Max. Ampli- tude	Remarks
24 25 26	Mar. 10 ,, 18 ,, 20 ,, 20 ,, 20 ,, 21 ,, 22 ,, 25	$ \begin{array}{c} 3 & 21 \\ 0 & 2 \\ 0 & 7 \\ 0 & 7 \\ 12 \\ 12 \\ 0 \\ 0 \end{array} $	30·0 0·0	н. м. 23 9·1 2 12·9 23 52·7	н. м. 23 24.0 2 2 16.7 0 10.5 	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$.MM. 0·5 	Small tremors. Very small tremors. Small tremors. Very small tremor at intervals. Frequent sma tremors.
	,, 23	7	30.0	í		0 0.0		Very small tremo at intervals.
27 28 29	,, 24 ,, 24 ,, 26 ,, 27 ,, 27 ,, 28 ,, 28 ,, 28	4 14 0 5 	0.0 30.0 30.0 0.0 0.0 0.0 0.1 23.3	$ \begin{array}{c} - \\ - \\ - \\ - \\ - \\ - \\ - \\ - \\ - \\ - \\$	$ \begin{array}{c}$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	0·4 0·9 1·2 5·0	Frequent ,, ,, at intervals Frequent ,, ","
	,, 29 ,, 30	12 8	55•0 0•0	_	_	13 45·0 14 0·0		Displacement of pendulum. Small tremors a
30 i	,, 31 ,, 31		$\frac{11.5}{45.0}$	² <u>17</u> ·1	2 <u>18</u> ·3	$\begin{array}{ccc} 2 & 24 \cdot 1 \\ 13 & 45 \cdot 0 \end{array}$	0.2	intervals. Frequent small di placements o
	Apr. 2 ,, 3 ,, 4		0·0 30·0 20·0	_	_	$\begin{array}{ccc} 14 & 15 \cdot 0 \\ 13 & 30 \cdot 0 \\ 13 & 45 \cdot 0 \end{array}$		pendulum. ,, ,, ,, ,, ,, ,, ,, ,, ,,
31	,, 5	22 8	35.1	22 41·3		23 0.4	1.4	-
$\frac{32}{33}$,, 6 ,, 8		19·6 12·6	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$		${16\ 38\cdot 6\ 1\ 26\cdot 5}$	$0.25 \\ 1.0$	
34	,, 10	21 5	55-5	22 28.0	$\begin{array}{ccc} 22 & 44 \cdot 9 \\ 22 & 48 \cdot 0 \end{array}$	23 47.5	$\begin{pmatrix} 0.4 \\ 0.3 \end{pmatrix}$	
35 36 37	,, 13 ,, 13 ,, 14	19 4	29·1 10·6 27·7	$\begin{array}{cccc} 5 & 32 \cdot 4 \\ 19 & 43 \cdot 9 \\ 0 & 58 \cdot 2 \end{array}$	6 4·9	$\begin{array}{c cccc} 6 & 48 \cdot 6 \\ 20 & 56 \cdot 1 \\ 1 & 22 \cdot 5 \end{array}$	0.3	No definite max.
38	,, 14	4	6.3	4 14.3	$\left[\begin{array}{cc} 4 & 26 \cdot 5 \\ 4 & 38 \cdot 5 \end{array} \right]$	5 39-5	$\begin{array}{c} 2 \cdot 0 \\ 1 \cdot 8 \end{array}$	vienes
	Ν	o reco	rd fr	om 1906,	April 14, 8h	. 0m., to .	April 17,	1h. 30m.
39				14 15.9	$egin{array}{cccc} 14 & 26\cdot7 & & \ 37\cdot7 & & \ 42\cdot8 & \ 51\cdot7 & \ \end{array}$	16 37.9	$2.75 \\ 2.55 \\ 2.6 \\ 2.4$	San Francisco earthquake.
40 41	,, 19, 25		4·7 8·2	7 22.9	$ \begin{array}{cccc} 15 & 3 \cdot 1 & 7 \\ 7 & 27 \cdot 2 & & \\ & - & & \\ $	$ \begin{array}{ccc} 8 & 40 \cdot 4 \\ 2 & 17 \cdot 9 \end{array} $	$\frac{2 \cdot 3}{4 \cdot 0}$	Film changed dur ing quake.

Register from Perth Observatory, Western Australia-continued.

No.	Date	mence- Co	W. om- once Max.	End	Max. Ampli- tude	Remarks
42	Apr. 25 ,, 29 ,, 29 ,, 30	H. M. H. 10 40.0 6 56.0 None. 2 6.9	м. н. м. 45·2 16 46·2	н. М. 10 55 ^{.0} 6 59 ^{.0} 17 34 ^{.1} 2 31 ^{.9}	мм. 0.5	Small tremors. "" Too small to meas-
1	May 1	12 5.0 -	- -	13 45.0		ure max. Displacement of boom.
44	$,, 2 \, 2$	$\begin{array}{ c c c c c c c c c c c c c c c c c c c$	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	$\begin{array}{ccc} 7 & 56.8 \\ 13 & 40.0 \end{array}$	1·0 —	Displacement of boom.
	,, 20	0 0.0 -	- -	6 0.0		Frequent small tremors.
$ ^{45}$,, 20	17 41.5		17 44.8	_	Too small to meas- ure max.
46	,, 21 ,, 22	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	$\begin{array}{ccc} 13 & 47{\cdot}4 \\ 16 & 7{\cdot}2 \end{array}$	1.35	Several small
l	,, 31	12 0.0 -	- -	14 0.0	-	tremors. Displacement of boom.
47 48	June 1 ,, 1		$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	$\begin{array}{ccc} 6 & 30\cdot 1 \\ 7 & 34\cdot 9 \end{array}$	$ \begin{array}{c} 14.8 \\ 1.0 \end{array} $	
	Noa	record from 19	906, June 1, 22h.	30m., to 1	906, June	2, 1h. 40m.
	,. 2	5 0.0	- 1 _	10 15·0	-	Several small tremors.
49	,, 2, 3, 4	1 0.0	44.3 14 48.1	$ \begin{array}{r} 15 & 18 \cdot 8 \\ 8 & 30 \cdot 0 \end{array} $	1.0	Several small treinors.
50	$ \begin{array}{c} ,, & 6 \\ ,, & 7 \\ ,, & 8 \\ ,, & 10 \end{array} $	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$		$\begin{array}{c ccccccccccccccccccccccccccccccccccc$		Frequent,, ,,
51	,, 10		$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	1 11 59-0	~0·7 0·7	
	,, 14	0 0.0 -		24 0.0		Very small tremors all day.
	No	record from 19	906, June 16, 2h	0m., to 19	06, June S	23, 1h. 40m.
	,, 23	4 30.0	- -	9 25.0	-	Frequent very
52	,, 23 ,, 23	9 26·1 9 16 30·0 -	30.3 9 31.4	$ \begin{array}{c} 9 & 45 \cdot 6 \\ 0 & 0 \cdot 0 \end{array} $	0·5 	small tremors. Frequent small tremors.
53	,, 24 ,, 24 ,, 27 ,, 28	$\begin{array}{c ccccc} 0 & 0 \cdot 0 & -1 \\ 11 & 34 \cdot 0 & 11 \\ 8 & 10 \cdot 0 & -12 & 0 \cdot 0 \\ \end{array}$	$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	1.6 0.5 —	Slight displacement of boom.
	·	· · · ·		····	·	en el comerciones d

1906, Jan. 17.	$1 \text{mm.} = 0^{\prime\prime} \cdot 60.$
March 6.	$1 \text{mm.} = 0'' \cdot 60.$
April 25.	$1 \text{mm.} = 0^{\prime\prime} \cdot 68.$

Register from the Magnetic Observatory, Christchurch, New Zealand. Observer, HENRY F. SKEY, B.Sc.

No.	Dat	e	Com- mence- ment	L.W. Commence	Max.	End	Max. Ampli- tude	Dura- tion	Remarks
	1905.								
		,	н. м. 1 01.8	н. м. 1 22•4	и. м. 1 24·4	н. м. 1 26.5	MM. 211	н. м. 1 08-2	
	July "	$\frac{1}{9}$	l 01.8 Indefinite		1 24.4 11 20.4		2.85	Indefinite	P.T's and A.T obscured by N.T
	,,	11	15 57-2		16 08.6		0.35	0 50.7	Swellings merely
	,, ,,	$\frac{17}{23}$	0 29.4 3 06.8	$ \begin{array}{cccc} 0 & 36 \cdot 7 \\ 3 & 17 \cdot 2 \end{array} $	$ \begin{array}{r} 0 & 38 \cdot 2 \\ 4 & 19 \cdot 3 \end{array} $	0 39·3 5 28·6	1-5	1 37.3	_
		27			23 23.0		-	-	V, slight swellin
	Aug.	31 4			9 03·5 7 51·7			1 -	** ** **
	,,	8	Indefinite	13 21.6	13 23-2	13 38.6	10.3	Indefinite	P.T's and A.T obsed. by N.T's
	,,	11	-	-	—	_	-		Small tremor stor between21h57·3r and 22h.57·3m
	"	12	13 20.6	—	13 22-9	_		Indefinite	
	" "	$15 \\ 15$	Indefinite	_	$\begin{array}{ccc} 4 & 42 \cdot 1 \\ 8 & 12 \cdot 1 \end{array}$	Ξ	0.8	Indefinite	Very slight. P.T's and A.T' obsed. by con
		29	4 11-3		4 12.4		1.0	0 07.8	tinuous tremors
ĺ	Sept.	29 4	4 41.9	_	+ 12 + 	_	-	0 08.2	Slight swelling.
	.,	4	5 39.8	-	1 10.0	-	0.2	0 06-2	,, ,,
	"	6 8	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$		$ 4 46.0 \\ 3 51.9 $	_	0.3	0 27.4	! Origin India.
	" "	12			21 59.8		_		Very slight.
	,	15 15	$\begin{array}{ccc} 6 & 22 \cdot 8 \\ 22 & 43 \cdot 5 \end{array}$	6 52.8	$\begin{array}{ccc} 6 & 55.9 \\ 22 & 51.3 \end{array}$	7 13.5	2·2 0·6	3 20·7 0 40·3	
	"	16		~ -	6 24.9	-	_		Thickening of lin
	,,	$\frac{18}{29}$	Indefinite	12 09.4	9 07·0 12 30·1	12 49.7	7.35	Tradofinito	P.T's and A.T
	73	29	Indennia	12 09.4	to	12 -19.7	1.99	Indennite	obsed. by N.T's
	Oct.	8	6 22.9	_	12 <u>3</u> 3·2	_	_	0 05.1	Very slight.
	"	10	Indefinite	18 09.0	18 11-0	18 16.7	3+2	Indefinite	P.T's and A.T' obsed. by N.T's
		$\frac{13}{21}$	Indefinite Indefinite	18 43.7	5 29.9 18 45.8 to	18 48-4	0-6 1-4	Indefinite Indefinite	P.T's and A.T' obsed, by N.T's
		22	8 28.5		$ \begin{array}{rrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrr$		0.5	1 11.3	
	Nov.	1	10 49-7	10 54.8	10 57.9	11 00.0	2.35	1 32.0	Town alf what
	• • •	$\frac{2}{2}$	4 13·2 9 09·1	_	$\frac{4}{9}$ 14.3	- 1	0.85	$\begin{array}{ccc} 0 & 12.4 \\ 0 & 26.9 \end{array}$	Very slight.
	" "	9	19 47.9	_	19 51.0			0 23.7	Slight.
	,,	24 4	5 30.5 23 08.0		5 40.8 23 11.1	-	0+25 0+3	$\begin{array}{ccc} 0 & 36 \cdot 2 \\ 0 & 27 \cdot 9 \end{array}$	
	Dec.	17^{4}	23 08·0 6 17·3	_ !	6 39.0		0.2	1 18.6	_
	,,	21	4 44.2	-	4 48.9		0.2	0 20.7	Slight.
	,,	28	23 19.2	23 20.8	23 21-3	23 27.5	2.62	1 09-3	—

Register from the Royal Alfred Observatory, Mauritius, Director, T. P. CLAXTON.

No.	Date	Com- mence- ment	L.W. Commence	Max.	End	Ampli- tude	Remarks
1903							
$410 \\ 411 \\ 412 \\ 413 \\ 414 \\ 415 \\ 416$	Oct. 1 ., 4 ., 14 ., 19 ., 20 ., 21 ., 21 ., 21	H. M. 22 5500 17 198 6 5811 	H. M. 8 6·9 7 5·1 3 31·5 8 47·2 10 2·2	н. м. 5 27.0 7 7-4 3 35.8 3 48.0 —	$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	мм. 0·5 0·25 —	D. of $P_1 = 5 \cdot 5 \cdot n$. D. of $P_1 = 10 \cdot 5 \cdot n$. EW. boom disturbed by insorts. Max, in NS.
417 418 419* 429*	", 21 ", 24 ", 25	17 36·0 — — 14 44·2	1 24·7 - 15 12·2	1 25.0 1 41.0 15 20.0	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	1.5 0.6 1.7	10h.6m., ampl. 6'5mm. — An apparently seismic move- ment among frequent A.T's.
421 422 423 421 425 426 427 428	", 29 Nov. 10 , 10 , 10 , 10 Dec. 9 , 10 , 13 , 18	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	# 55.9 I8 16.9 21 51.5 6 11.0 17 24.6 17 25.9 20 47.3	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	$ \frac{2.0}{-} $ $ \frac{0.6}{0.5} $ $ \frac{1.0}{-} $ $ \frac{-}{0.5} $	Frequent thickenings of trace. D. of P ₁ = 6.5m. P ₁ not shown. Seisnic origin doubtful. Register faint. Slight thickening of trace. Seismic origin doubtful. D. of P ₁ = 3m.
				19	04		
429 430 431 432 433 433	Jan. 10 ,, 20 ,, 29 ,, 29 Feb. 4 ,, 4 ,, 9	$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	3 47·1 16 9·4 -	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	3 56.6 17 20.0 1 5.0 6 15.0 21 13.7 23 4.7 8 55.0	0-85 0-25 — — 0-4	Thickening of trace. — Frequent irregular thicken- ings of traco. Isolated; followed by occa- sional thickenings of traco. P _i not shown.
435 436 437 438 439 440 441	Mar. 31 April 4 ,, 5 ,, 11 ,, 24 ,, 26	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	3 31.7 6 31.7 - 11 27.0 15 15.8 10 22.9	0.2 0.4 1.0 0.3 0.3 0.4	D. of $P_1 = 2m$. Register faint. D. of $P_1 = 12m$. Frequent irregular thicken-
$442 \\ 443 \\ 414$	May 1 ,, 1 ,, 2	7 21·4 15 50·4 0 8·8	$\begin{array}{ccc} 7 & 28 \cdot 4 \\ 16 & 5 \cdot 4 \\ & \end{array}$	${}^{7}_{16}$ ${}^{29^{\cdot}4}_{16^{\cdot}9}$ ${}^{-}$	$\begin{array}{cccc} 8 & 3^{*}4 \\ 16 & 51^{*}4 \\ 0 & 15^{*}8 \end{array}$	1·0	several slight thickenings of
$ \begin{array}{r} 445 \\ 446 \\ 417 \\ 448 \\ 449 \\ 450 \\ 450 \\ \end{array} $	$ \begin{array}{cccc} , & 2 \\ , & 15 \\ , & 19 \\ , & 21 \\ , & 26 \\ , & 29 \\ \end{array} $	$\begin{array}{ccccccc} 10 & 58{}^{*}8 \\ 22 & 15{}^{*}0 \\ 16 & 27{}^{*}9 \\ 11 & 13{}^{*}1 \\ 4 & 2{}^{*}1 \\ 0 & 7{}^{*}7 \end{array}$	11 1·8 0 14·7	$\begin{array}{cccccccc} 11 & 3.8 \\ 22 & 16.5 \\ 16 & 30.9 \\ \hline & \\ 4 & 7.1 \\ 0 & 19.7 \end{array}$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	0.6 	Isolated thickening of trace. Very slight thickening of trace Possibly air tremors. Tremors for several hours
451 152 453	June 25 25 25	3 41·2 15 12·5 15 35·5 21 21·1	- 15 46.0 22 0.1	3 47.7 15 16.0 15 54.5 22 9.6	4 0.2 15 20.5 17 35.5 23 41.1	0·3 — 2·0	afterwards. Isolated thickening of trace. Isolated; followed by occa- sional thickenings of trace. P, not shown.
454 455 456 457 458	", 25 July 23 ", 25	2 15.0 0 28.2 0 56.1 1 58.6	$\begin{array}{c} 1 & 11.7 \\ 1 & 16.1 \\ - \\ - \\ - \\ - \end{array}$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	0·7 — — —	Occasional thickenings of trace.

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Register from the Royal Alfred Observatory, Mauritius-continued.

No.	Date	Com- mence-	L.W.	Max.	End	Ampli-	Remarks
		ment	Commence		ļ	tude	
439	July 27	н. м. 5 57°6	м. н.	ж.н. —	н. м. 6 3 [.] 6	н. м. —	Very slight thickening o trace.
460 461 462 46 3	,, 27 Aug. 3 ,, 8–9	$\begin{array}{cccccccccccccccccccccccccccccccccccc$		$\begin{array}{cccc} 16 & 49{}^{\circ}6 \\ 11 & 13{}^{\circ}3 \\ 12 & 45{}^{\circ}3 \\ 23 & 52{}^{\circ}9 \end{array}$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	=;	"Irregular tremors." Cloc error uncertain. Frequent thickenings o trace.
$\frac{464}{465}$	", 11 ", 14	6 43·3 0 25·9	=	3 21.9	7 26-3 5 15-9		Active air tremors; som movements look seismic.
466 467 468	$ \begin{array}{c} $	2 30 22 20 13 20·5	-	-	$ 5 30 \\ 5 10 \\ 13 25.5 $		Irregular thickenings o
469 470	$ $	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	²¹ 45·3	23 0°8	$\begin{array}{ccc} 23 & 25 \cdot 3 \\ 6 & 0 \\ 5 & 0 \end{array}$	0.8	trace. Active air tremors.
471 472 473	,, 30 Sept. 11	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	12 16·5 6 21·8	$ \begin{array}{rrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrrr$	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	0.8 0.4 0.4	D. of $P_1 = 11m$.
474 475	,, 13 ,, 16	18 3·1 13 39·8	-	18 12-1 13 44-8	$ 18 16.1 \\ 13 46.8 $	-	Isolated thickening of trace
476 477	,, 19 ,, 19 ,, 25	5 50.0 6 54.1 15 30	-	6 1.0 7 18-6 —		= {	Frequent thickenings o trace. Frequent slight thichening of trace.
478 479 480	Oct. 27	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	3 16.7		$\begin{array}{ccc} 4 & 0 \\ 3 & 42 \\ 5 & 1.7 \end{array}$	2.0	Register faint, I', no
481 482	,, 4	2 43.8	3 15-8	3 17·8 17 4·1	4 19·8 17 7·1		shown. D. of $P_1 = 7.5m$.
483 484	", 1ì	6 23·9	-		7 4·9 1 23·5	_	Frequent slight thickening of trace.
485 486	,, 16 ,, 25 ,, 28		14 16.8	14 19.3	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	2.2	Beginning of disturbance
487	,, 31	21 0.8	-	-	21 6.3	-	Frequent slight thickening of trace.
488	Nov. 3	8 15	-	10 1.8	12 15		Frequent air tremors; move- ment at time of max. look: seismic.
489	,, 5 ,, 6	7 57 0 10	_	-	8 7 2 10	_	Frequent very slight thick- enings of trace. ModerateA.T's) Possibly
490 { 491	"			 7 33·2	8 15 9 15	-	Active A.T's mic movts Frequent thickenings of
492	,, 20 ,, 21	$ \begin{array}{ccc} 20 & 15 \\ 4 & 0.8 \end{array} $	4 3·8	4 10.3	$ \begin{array}{ccc} 3 & 45 \\ 4 & 36 \cdot 3 \end{array} $	1.0	trace. Active air tremors. —
493 194 }	Dec. 1 ,, 2	16 49·8 20 15 3 35·5	16 51·8 	16 54·8 3 46·5	17 6·8 3 45 3 58·5 3 59·1	1.0	Active air tremors.
495 { 496	" 4 " 4 " 4 " 4 " 19 " 19 "	$\begin{array}{cccc} 3 & 51.6 \\ 4 & 40 \\ 10 & 36.6 \end{array}$	10 39-1	$\begin{array}{cccc} 3 & 54 \cdot 1 \\ 4 & 44 \cdot 1 \\ 10 & 40 \cdot 6 \\ 17 & 25 \cdot 8 \end{array}$	$\begin{array}{rrrr} 3 & 59 \cdot 1 \\ 4 & 48 \cdot 1 \\ 10 & 44 \cdot 6 \end{array}$	0.4 0.6 0.5 0.7	perceptible in East-West.
490	$ \begin{array}{c} 19 \\ 20 \\ $	5 43.8 6 3.8 6 48.8	6 22·8 6 56·8		5 48.8	0.5	Masked by air tremors, Isolated thickening of trace D. of $P_1 = 145m$. P_1 not shown.
498 499	,, 28 ,, 25	15 40·8		16 12-3	16 20·8 19 45		Frequent thickenings of trace.
500	, 28	17	i — I	- !	19 45	- 1	77 15 1 51 77 9
501	To- 0		10 70 1	190			37
501 502 503 504 505	Jan. 8 ,, 9 ,, 10 ,, 13 ,, 13		$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$		Mere thickening of the trace D_{i} of $P_{i} = 2m$. D_{i} of $P_{i} = 7m$.

544 548 548	No. 102 102 102 102 102 102 102 102 102 102	1
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mounted in pillar the b 7 4 7 4 7 4 1 55 1 43	стори	Register from the Royal
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5 - 0.5 - 0.5	1 1	Mauritius
	Remarks D. of $P_i = 5m$. P. not shown. Bagisfer faint. Several thickenings of the frage, we slight thickenings of the frage, we slight thickenings of the frage, we slight thickenings of the frage, we shown. The seven thickening of the true. A.T's present P_i not shown. Thickening of the true. A.T's present P_i not shown. Bagisfer faint. E-W. Thickening of the true. A.T's present P_i not shown. Booms crossed a moji- tice and the true. A.T's present P_i not shown. Booms crossed is a moji- tice and the true. A.T's present P_i not shown. Booms crossed is a softwer the true of a softwer interprint thickening of the true. Special thickening of the true. Thickening of the true. D. of $P_i = 7m$. Thickening of the true. Thickening of the true.	size continued.

Register from
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continued.

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Oct. 1, 1903, to July 27, 1904 Aug. 3, 1904, to Dec. 28, 1904 Jan. 8 to Dec. 19, 1905

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