

1.



Seismological Bulletin 1939.

Royal Magnetical and Meteorological Observatory.

Batavia, Java.

B A T A V I A .

Foundation: River Quaternary.

S. Latitude $6^{\circ} 11' 0''$; E. Longitude $7^{\text{h}} 7^{\text{m}} 20.3^{\text{s}}$; $106^{\circ} 50'$; Height above sea-level 8 m.

Wiechert Horizontal Pendulum, 1000 kg., NS and EW components,

Wiechert Vertical Pendulum, 1300 kg.,

Bosch-Omori seismograph, 25 kg., NS and EW components,

Greenwich Mean Time

M A L A B A R .

Foundation: Volcanic.

S. Latitude $7^{\circ} 13'$; E. Longitude $107^{\circ} 37'$; Height above sea-level 1550 m.
Wiechert Horizontal Pendulum 100 kg., NS and EW components. Since July 1911.
Greenwich Mean Time.

Possession Malabar Estate.

A M B O I N A .

Foundation: Quaternary.

S. Latitude $3^{\circ} 42'$; E. Longitude $128^{\circ} 10'$; Height above sea-level 4 m.
Wiechert Horizontal Pendulum 1000 kg., NS and EW components. Since October 1924.
Greenwich Mean Time.

M E D A N .

Foundation: Quaternary.

N. Latitude $3^{\circ} 35'$; E. Longitude $98^{\circ} 41'$; Height above sea-level 25 m.
Wiechert Horizontal Pendulum 1000 kg., NS and EW components. Since July 24, 1929.
Greenwich Mean Time.

Remarks. The siesmograph at Amboina was still out of working order.
The epicentral distances given are those corresponding with superficial focus, unless epicentre and focal depth are given.

January - March 1939.

January.

No	Date	Station	Character	Phase	G.M.T.	Distance	Remarks
					h m s	degrees	
1	Jan. 3	Med	Iv	PE ePN iE S?NE	10 44 14 10 44 19 10 44 24 10 44 39	2.0?	
2	" 4	Bat	Iv	ePE iE S?NE	10 42 16 10 42 34 10 42 54	3.0?	in micros, felt in Palembang (S. Sumatra).
		Mal	v	i	10 43 04		
3	" 4	Mal	d	iPNE	19 26 28	0.9	felt in Priangan, EW pen thrown off.
		Bat	Iv	iSNE iPZNE SN iSNE	19 26 40 19 26 31 19 26 45 19 26 49	1.1	dilatation; deep?
4	" 8	Bat	Iv	PE	04 29 17		faint in strong micros.
		Mal	v	i	04 29 44		
5	" 8	Med		NE	09 34		traces, starting in hour sign.
6	" 9	Bat	Ir	P?E	03 08 39		dubious in very strong micros.
		Med	Ir	PNE eSE eL?N eLE	03 11 17 03 16 00 03 20 03 22	27.0	in strong micros.
7	" 10	Med	Iv	ePNE iSNE	01 03 23 01 03 42	1.5	faint in micros, deep?
8	" 10	Med	IIIv	ePNE iE SNE iNE iNE	02 52 10 02 52 25 02 53 27 02 53 44 02 54 44	6.0	faint.
9	" 10	Med	IIIv	ePE iN S?NE iNE iNE	10 08.6 10 08 45 10 09 54 10 10 12 10 11 06	6.0?	faint in minute eclipse, character and force identical with 8.
10	" 10	Med	Iv	ePNE SNE	12 13 36 12 14 53	6.0	aftershock?
11	" 12	Mal	v	eP?NE iSNE	06 11 37 06 11 46	0.7?	faint.

3.

					h m s degrees	
12	Jan.13	Bat	Iv	eP?E	11 47 44	4.9? in strong micros, felt in Palembang and in Benkoelen (S.Sumatra)
				SNE	11 48 44	
				iE	11 49 06	
		Med	Iv	eP?NE	11 49 05	faint in micros.
				P?E	11 49 20	
				P?N	11 49 24	
				iN	11 49 46	
				iE	11 50 54	
				iE	11 51.5	in minute eclipse.
13	" 14	Bat	Iv	PZ	11 17 27	2.0
				PE	11 17 30	
				sZNE	11 17 53	
				iE	11 18 46	
		Mal	v	ePN	11 17 47	3.1
				iPE	11 17 49	
				eNE	11 18 18	
				SNE	11 18 26	
14	" 16	Med	Iv	ePNE	06 41 44	1.4 dubious.
				iSNE	06 42 02	
15	" 19	Mal	v	iNE	19 37 05	
16	" 20	Bat	Iu	P?Z	21 00.1	faint in minute eclipse.
				iZE	21 00 20	
				eE	21 00 39	
				iZ	21 01 00	
				iN	21 01 47	
		Med	Iu	P?NE	21 00 41	dubious.
				iN	21 01 37	
17	" 22	Med	I	iE	05 11 24	
				eN	05 11 30	
				eE	05 12 30	
				eE	05 13 45	
18	" 22	Med	Ir	PNE	11 18 25	39.3
				SNE	11 24 36	
				LE	11 37	
		Bat			11 25	traces.
19	" 22	Bat	Ir	PZE	13 39 38	38.5 in strong micros.
				eSN	13 45 44	
				eLZ	14 00	
				LNE	14 01	
		Med	Iu	PE	13 41 02	49.3 faint.
				SNE	13 48 14	
				eLN	13 57	
				LE	14 07	
20	" 22	Bat	Iu	P		dubious
				iZ	18 49 24	
				iE	18 49 39	
				SN	18 56 13	
		Med	Iu	PN	18 50 45	60.3
				eE	18 58 45	
				iSN	18 59.1	in minute eclipse.

4.					
h m s degrees					
21	Jan.25	Mal	u	PNE	03 51 12
				iNE	03 54 46
				eLN	04 36
				LNE	04 43
		Bat	IIu	ePZ	03 51 30
				iE	03 51 43
				iE	03 55 50
				iE	04 12 27
				eLZ	04 20
				LE	04 28
				LZNE	04 38
				LZNE	04 42
		Med	IIIu	PNE	03 51 54
				iPNE	03 51 57
				LN	04 41
				LE	04 43
				LN	04 46
					faint.
					strong.
					strong.
22	" 25	Bat			10 38
					traces.
23	" 25	Bat	I	ePNE	17 26 47
				iE	17 28 15
					faint in micros.
24	" 25	Bat	Iv	iPZ	20 37 34
				PNE	20 37 36
				iN	20 38 17
25	" 26	Bat	Ir	ePZE	17 31 52
				iN	17 36 14
				S?E	17 36 32
		Med	Ir	P?NE	17 31.9
				iE	17 42 26
				eLNE	17.49
					26.6? faint.
					extremely faint in minute eclipse.
26	" 27	Bat			05 51
					traces.
27	" 28	Bat			05 59
					traces.
28	" 28	Med	Iv	P?NE	15 02.8
				iSE	15 03 14
					1.5? faint in minute eclipse, felt at Koeala Bhee (N.Sum.).
29	" 28	Med	Iv	iE	18 10 55
30	" 29	Med	IIIv	iPNE	15 26 47
				S?NE	15 27 28
				iN	15 27 41
		Bat	Ir	iPZ	15 29 32
				iPN	15 29 34
					pens thrown off, felt in A-tjeh, Wé and Simeulocü Island (N.Sum.).
31	" 30	Mal	u	ePE	02 27 02
				iPNE	02 27 06
				iSNE	02 33 57
				iE	02 37 07
				eLNE	02 39
				LNE	02 43
					46.7
					strong.

5.

						h m s degrees		
31	Jan.30 (cont.)	Bat	IIIu	iPZNE	02 27 08	47.1	in minute eclipse.	
				iE	02 33 55			
				SNE	02 34 04			
				LE	02 41			
				LZ	02 42			
				LZNE	02 43		strong.	
		Med	IIIu	ePNE	02 28 18	57.6	NS pen thrown off.	
				iNE	02 29 06			
				iN	02 32 00			
				iE	02 32 08			
				SE	02 36 23			
				LN	02 52			
32	" 30	Bat	Iu	eP?Z	05 32 24	46.9?	in previous.	
				iN	05 33.1		in minute eclipse.	
				SN	05 39 20			
				eLE	05 52			
		Med	Iu		05 33		traces in previous, in hour mark.	
				S?E	05 41 39			
				iE	05 42 10			
				eLE	02 52			
33	" 30	Bat	Iv	ePE	07 58 00			
				iE	07 58 19			
		Mal	v	eP?NE	07 58 07	1.1?		
				iSNE	07 58 21			
34	" 30	Mal	v	iNE	09 11 49			
35	" 30	Bat	Iu	eP?Z	23 57 38		in change of papers.	
				PNE				
				iZ	23 58 23			
		Med	IIu	PNE	23 59.7	52.5	in minute eclipse.	
				SNE	00 07 15			

February.

36	Feb. 1	Mal	v	iNE	01 32 10		faint traces.	
37	" 1	Mal	r	ePNE			too faint to be measured.	
				SN	01 47 56			
		Bat	Ir	PZ	01 44 05	21.3	felt on the Sangir and Talaud Islands.	
				iE	01 45 15			
				SNE	01 48 01			
		Med	Ir	ePE	01 45 18	25.5?	extremely faint.	
				SE	01 49 49			
				iE	01 51 13			
38	" 2	Bat	Ir	ePZNE	07 13 50	31.5	dubious in strong micros.	
				SN	07 19 07			
		Med	Ir	eP?E	07 15 01	39.5?		
				SE	07 21 13			

6.

						h m s degrees		
39	Feb. 2	Med	IIIv	PNE	14 06 52			
				iS?N	14 08 04			
				iS?E	14 08 31			
		Bat	Ir	PE	14 09 44			faint in micros.
40	" 2	Med	I	ePNE	23 27 52			faint.
				iE	23 35 18			
41	" 3	Mal	u	PNE	05 35 34	49.6		
				SNE	05 42 48			
				iNE	05 45 55			
				LNE	05 54			
		Bat	IIu	iPZNE	05 35 39	50.0		
				SE	05 42 51			
				iSN	05 42 55			
				LZ	05 50			
				eLN	05 51			
				eLE	05 52			
				LNE	06 02			
		Med	IIu	PE	05 36 50	58.9		
				iE	05 44 52			
				iSN	05 45 03			
				iE	05 45 28			
				iE	05 46 07			
				LE	06 01			
				LN	06 04			
42	" 3	Med	Iv	iE	08 41 45			faint.
43	" 3	Med	Iv	ePE	18 57 59	2.0?		
				S?E	18 58 24			
44	" 3	Med	I	eE	20 26 13			traces.
45	" 4	Med	I	eE	05 30 50			traces.
		Bat			05 33			in very strong micros.
46	" 4	Med		L?	08 35			
47	" 4	Mal	v	iNE	10 19 51			
48	" 4	Bat	Ir	PZ	11 39 10	23.2		in very strong micros.
				iE	11 39 34			
				SNE	11 43 22			
		Med	Ir	PE	11 39 59			
				iN	11 44 13			
				iE	11 45 20			
49	" 5	Med	Iv	iE	11 03 53			faint traces
50	" 6	Mal	v	iSNE	07 32 13			
51	" 8	Med	Ir	eP?NE	10 33 38	35.1?		
				S?E	10 39.3			in minute eclipse.
				eLE	10 44			
		Bat	Ir	eE	10 34 08			faint.
52	" 9	Bat	I	P?E	02 38 58			in micros.
				iE	02 49 00			

7.

h m s degrees

53	Feb. 9	Mal	v	iPNE	11 36 15	0.9?	
				S?NE	11 36 27		
		Bat	Iv	PZNE	11 36		in hour sign.
				iSZE	11 36 55		
54	" 9	Med	IIIv	iPNE	11 46 25	3.6	pens thrown off, felt in Sum. West Coast.
				iE	11 46 53		
				iSNE	11 47 10		
		Bat	IIv	PNE	11 47 52		
				iN	11 48 41		
				iN	11 49 42		
				iNE	11 50.4		in minute eclipse.
				iN	11 50 31		
				iNE	11 51 32		
		Mal	v	ePNE	11 48 01		faint.
				S?E	11 49 55	9.1?	
				S?E	11 50 02	9.7?	
55	" 9	Mal	v	PNE	11 59 38	1.2	
				iSNE	11 59 53		
		Bat	Iv	PN	11 59 54		dubious in previous.
				iSNE	12 00 17		
56	" 9	Mal	v	PNE	12 18 28	1.2	
				iSNE	12 18 44		
		Bat	Iv	iNE	12 19 02		in previous.
57	" 9	Mal	v	iSNE	12 23 18		
58	" 9	Mal	v	iSNE	12 28 03		
59	" 9	Mal	v	iSNE	13 51 40		
60	" 9	Mal	v	PN	15 38 30	1.1	
				iSNE	15 38 45		
		Bat	Iv	iE	15 39 11		
61	" 9	Mal	v	iSNE	16 35 25		
		Bat	Iv		16 35		traces.
62	" 9	Mal	v	eP?NE	22 38 08	1.2?	
				iSNE	22 38 24		
63	" 10	Med			07 49		faint traces.
64	" 13	Mal	v	iN	10 21.5		traces in minute eclipse.
65	" 13	Mal	v	ePNE	12 31 12	1.0	faint.
				SNE	12 31 25		
66	" 13	Bat	IIv	iPZ	22 54 49	2.3	Dilatation from West, felt in S.Sumatra and in Bantam (W. Java).
				iPNE	22 54 52		
				iSZNE	22 55 18		
		Mal	v	iPNE	22 55 05	3.3	
				SNE	22 55 46		
		Med	Ir	ePE	22 57 19		extremely faint.
				iE	23 00 27		
				iN	23 00 33		

8.

						h m s degrees		
67	Feb.14	Bat	Iv	P?Z	09 26 42	4.9?	faint in micros, felt in Palembang and Benkoelen.	
				SN	09 27 41			
				iE	09 28 00			
		Med	Iv	ePE	09 29.1		in minute eclipse.	
68	" 15	Mal	v	iNE	22 03 46		traces.	
69	" 15	Mal	v	eNE	23 50 12		traces.	
70	" 16	Med	Iv	ePNE	18 43 32	0.9		
				iSNE	18 43 45			
71	" 16	Med	Iu	ePNE	19 00 14	50.5	in micros.	
				eSE	19 07 34			
				eLE	19 21			
		Bat	Iu	iPZ	19 00 29	52.6		
				SNE	19 08 02			
72	" 18	Mal	v	iNE	00 01 18			
73	" 19	Med	Iv	P?N	21 12.9		in minute eclipse.	
				iE	21 13 51			
74	" 19	Mal	v	iNE	23 15 41			
75	" 20	Bat	Ir	ePE	02 46 47	13.6	in micros, felt in C.Celebes.	
				SE	02 49 30			
				iE	02 51 46			
		Med	Ir	eNE	02 52.8		traces in minute eclipse.	
76	" 20	Bat	Iu	PZ	03 54 08	48.1	faint in micros.	
				PE	03 54 12			
				iE	03 55 37			
				eE	04 00 04			
				eSN	04 01 12		uncertain.	
		Med	Iu	ePE	03 55 22		extremely faint.	
				iE	03 59 11			
				iE	04 04 20			
77	" 21	Mal	v	iNE	06 39 48			
78	" 22	Mal	v	PNE	02 26 21	0.7		
				iSNE	02 26 30			
79	" 22	Med	Iv	PNE	22 18 05	0.7		
				iSNE	22 18 14			
80	" 24	Mal	v	PNE	20 02 09	0.8		
				iSNE	20 02 19			
81	" 26	Med	I	eE	10 34 50			
		Bat	I	ePZ	10 36 30			
				iNE	10 38 41			
				iN	10 45 21			
82	" 26	Mal	d	PNE	20 51 24	1.5	felt in Priangan.(W.Java).	
				iSNE	20 51 43			
		Bat	Iv	ePE	20 51 42	2.6	faint in micros.	
				iN	20 52 05			
				iSNE	20 52 14			

9.

						h m s degrees		
83	Feb.27	Mal	v	PNE	00 11 13	1.6		
				SN	00 11 33			
				iSE	00 11 35			
		Bat	Iv	iPZNE	00 11 17	1.7	dilatation from South	
				iSNE	00 11 39			
84	" 27	Bat	Iv	PNE	02 00 40		faint in micros.	
				iE	02 01 43			
		Mal	v		02 01		traces.	
85	" 28	Bat	I	PZ	02 43 56		dubious in micros.	
				iPE	02 44 00			
				iE	02 45 01			
		Med	I	ePE	02 45 03			

March.

86	Mar. 1	Med	Iv	iE	16 57 08			
				iN	16 57 12			
87	" 2	Bat	Ir	PZ	07 07 23			
				ePE	07 07 25		in strong micros.	
				iE	07 08 46			
				iNE	07 15 31			
		Med	Ir	ePE	07 08 37	42.6	faint in micros.	
				iPE	07 08 43			
				PN	07 08 45			
				SNE	07 15 06			
88	" 2	Med	Iv	ePE	07 58 05		faint in previous.	
89	" 4	Bat	Ir	PZ	20 09 05	23.5	felt at Beo (Talaud Islands).	
				PE	20 09 07			
				iN	20 09 29			
				iE	20 09 48			
				S?E	20 12 58			
				SN	20 13 19		uncertain.	
		Med	Ir	PNE	20 09 52		faint.	
				iPE	20 09 54			
				iE	20 15 15			
				iNE	20 15 47			
				iE	20 16 47			
				iN	20 16 57			
				iE	20 17 25			
90	" 5	Bat	Ir	ePZ	02 18 57	23.5	faint traces in micros, felt at Beo (Talaud Islands);	
							aftershock.	
				eSE	02 23 11			
		Med	Ir	iPE	02 19 46		in micros.	
				iE	02 26 59			
91	" 6	Med	Iv	PE	00 43 45			
				iN	00 44 05			

10.

					h m s. degrees		
92	Mar. 7	Bat	Ir	ePZ	02 01 46	38.7	dubious in micros.
				iE	02 03 49		
				iSE	02 07 53		
		Med	Iu	ePNE	02 03 15	51.9	
				iSNE	02 10 43		
93	" 7	Bat	Iu	PZ	17 25 34	51.9	faint.
				eSE	17 33 02		faint.
		Med			17 36		traces.
94	" 8	Bat	Iu	ePZE	22 06 57		
				SNE	22 13 44	45.4	
				iSE	22 13 52		
				eLZ	22 22		
		Med	Iu	PNE	22 08.1	55.9	in minute eclipse.
				iSNE	22 15 59		
				eLNE	22 34		
95	" 9	Med	IIv	ePNE	06 26 49		
				iNE	06 27 24		
				iN	06 28 14		
96	" 11	Mal	v	PNE	06 47 54	1.7	
				iSE	06 48 16		
		Bat	Iv	PZNE	06 48 03	2.3	
				iZ	06 48 20		
				iNE	06 48 25		
				SNE	06 48 32		
				iZ	06 49 08		
				iN	06 49 21		
				iN	06 49 42		
97	" 11	Mal	v	P?NE	10 16 09	1.2?	
				iN	01 16 17		
				S?NE	01 16 24		
98	" 12	Med	IIv	ePNE	19 42 21	8.1?	
				iS?NE	19 44 04		
99	" 14	Bat	Iv	iPZE	17 02 29	1.7?	
				S?E	17 02 51		
				iE	17 02 55		
				iNE	17 03 04		
		Mal	v	ePNE	17 02 46	2.8	dubious.
				iSNE	17 03 21		
100	" 15	Bat	Iv	ePZ	22 00 59	1.6?	extremely faint.
				S?NE	22 01.3		in minute eclipse.
				iE	22 01 51		
		Mal	v	iSNE	22 01 22		
101	" 17	Mal	v	iNE	11 53 34		
102	" 17	Mal	v	iNE	14 04 00		
103	" 20	Med	Ir	iPNE	03 30 21	40.5	
				iSNE	03 36 37		
				eLE	03 45		
				LN	03 46		

11.

		h m s			degrees	
103	Mar.20 (cont.)	Bat	Ir	PZ	03 30 38	44.3
				PNE	03 30 41	
				iN	03 30 44	
				iSZN	03 37 18	
				iSE	03 37 21	
				eLZ	03 46	
104	" 20	Med	II	ePNE	03 47 02	faint in previous.
				iE	03 48 26	
				iE	03 54 35	
		Bat	I	eP?Z	03 47 37	dubious in previous.
105	" 21	Med	IIIv	iPNE	01 13 44	pens thrown off, azimuth 255°.
				iE	01 13 49	
				iN	01 13 59	
		Bat	IIIr	iPZ	01 15 21	18.0 dilatation.
				iPZ	01 15 23	
				PE	01 15 23	
				iPNE	01 15 25	
				SN	01 18 47	
				iE	01 19 27	EW and NS pen thrown off.
				iZ	01 19 58	
		Mal	r			18.8 iS-P= 3 ^m 33 ^s ; no minute eclipses.
106	" 22	Mal	r	iSNE		no hour marks.
		Bat	Ir	PZ	03 53 03	compression from NE.
				iPNE	03 53 05	
				iE	03 54 31	
				iN	03 54 35	
				iN	04 01 54	
				eLZ	04 12	
		Med	IIr	iPNE	03 54 18	in micros.
				SNE	04 01 20	47.7
				iSE	04 01 26	
				iN	04 04 44	
				iE	04 06 44	
107	" 22	Mal	v			no minute eclipses.
108	" 22	Bat	Iu	PZ	07 33 17	76.9
				iPZNE	07 33 18	compression.
				SNE	07 43 09	
				iSE	07 43 12	
		Med	Iu	PNE	07 34 02	85.5
				SE	07 44 37	
				eLN	08 11	extremely faint.
				eLE	08 13	
109	" 23	Med	Ir	P?NE	10 33 29	23.8? faint traces.
				iSNE	10 37 46	
		Bat	I			traces.
110	" 23	Bat	Iu	iPZ	16 32 11	77.9
				PNE	16 32 12	
				iE	16 36 02	
				SE	16 42 08	
				iN	16 43 10	

12.

110	Mar.23 (cont.).	Med	Iu	ePE PNE iNE SE	h m s degrees			extremely faint.
					16	33	14	
					16	33	27	
					16	37	21	
					16	44	03	
111	" 25	Bat	Ir	ePZ L?Z	01	46	38	23.9
		Med	Ir	PE SNE	01	47	41	
					01	51	59	
112	" 25	Bat	Ir	ePZ eSN iE L?Z	05	43	52	25.9
					05	48	26	
					05	50	00	
					05	52		
		Med	Ir	PNE iE iSN	05	45	05	35.0
					05	49	25	
					05	50	47	
113	" 25	Mal	v	ePE iSNE	16	57	25	1.2
					16	57	41	
114	" 26	Bat	Ir	PZ ePNE iSN	04	03	32	37.1
					04	03	34	
					04	09	28	
		Med	Iu	PNE eSE	04	05	23	
					04	12	43	50.6
115	" 27	Med	Iv	P?E iSNE	09	15	15	1.4
					09	15	33	
116	" 27	Med	IIIv	ePE PNE iSNE	14	38	56	3.9
					14	38	58	
					14	39	44	
		Bat						traces.
117	" 29	Bat	Ir	iPZ PE iN iN	00	22	32	in strong micros.
					00	22	34	
					00	25	18	
					00	25	56	
		Med	Ir	PNE iN iE	00	23	59	faint in micros.
					00	29	21	
					00	29	52	
118	" 29	Bat	Ir	iPZE S?E iS?NE	02	34	21	24.1?
					02	38	41	
					02	38	53	
		Med	Ir	PE SE eLN	02	34	51	26.9
					02	39	33	
					02	44		
119	" 30	Med	Iv	ePE iSN	06	46	09	1.2
					06	46	25	

13.

CONSTANTS WIEGHERT SEISMOGRAPHS.

BATAVIA.

	EW Component			NS Component			Z Component		
	V	T ₀	ξ	V	T ₀	ξ	V	T ₀	ξ
January	226	7.3	3.4	203	7.4	3.4	300	4.4	3.6
February	226	7.4	3.5	203	7.4	3.4	300	4.3	3.5
March	226	7.3	3.5	203	7.4	3.4	300	4.4	3.6

	e	r			e	r			e	r
January	1.89	0.76			1.89	0.42			1.14	0.14
February	1.09	0.73			1.08	0.45			1.14	0.05
March	1.08	0.81			1.09	0.50			1.14	0.02

MEDAN.

EW Component				NS Component					
V	T ₀	ξ	e ₀	r	V	T ₀	ξ	e ₀	r
219	5.2	3.8	1.07	1.0	228	4.3	2.3	1.11	0.9

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## Seismological Bulletin 1939.

Royal Magnetical and Meteorological Observatory

Batavia, Java.April - June 1939

Ref. 3876

Remarks. The seismograph at Amboina was still out of order during April and May. Its recording starts again June 12.

April.

| No. | Date   | Station | Character | Phase                                | G.M.T.                                                               | Distance | Remarks                   |
|-----|--------|---------|-----------|--------------------------------------|----------------------------------------------------------------------|----------|---------------------------|
|     |        |         |           |                                      | h m s                                                                | degrees  |                           |
| 120 | Apr. 1 | Bat     | I         | P?Z<br>iN                            | 02 14 05<br>02 23 37                                                 |          | extremely faint.          |
| 121 | " 3    | Bat     | Ir        | PNE<br>S?N<br>iE                     | 08 47 08<br>08 50 40<br>08 51 25                                     | 18.7?    | faint.                    |
| 122 | " 3    | Mal     | d         | iPNE<br>iSN                          | 09 21 28<br>09 21 43                                                 | 1.2      | felt in Priangan(W.Java). |
|     |        | Bat     | IIV       | iPZ<br>iPN<br>ePE<br>iN<br>SNE<br>iN | 09 21 36<br>09 21 39<br>09 21 40<br>09 21 56<br>09 22 05<br>09 22 38 | 2.0      | faint in micros.          |
| 123 | " 4    | Bat     | Iu        | eP?E<br>iE<br>SNE                    | 10 21 14<br>10 29 12<br>10 29 26                                     | 59.4?    | dubious in micros.        |
|     |        | Med     | Iu        | eP?NE<br>iE<br>eSE                   | 10 22 36<br>10 31 38<br>10 32 17                                     | 74.7?    | extremely faint.          |
| 124 | " 4    | Med     | Iv        | ePNE<br>SE                           | 12 46 32<br>12 47 16                                                 | 3.6      | faint in micros.          |
| 125 | " 4    | Bat     | Ir        | iPNE                                 | 16 51 14                                                             |          | in micros.                |
| 126 | " 5    | Med     | I         | ePE<br>iNE<br>iE<br>iN               | 04 31.0<br>04 35 43<br>04 35 53<br>04 36 08                          |          | in minute eclipse.        |



15.

|     |        |     |      |       | h m s    | degrees |                              |
|-----|--------|-----|------|-------|----------|---------|------------------------------|
| 127 | Apr. 5 | Bat | IIIu | iPZ   | 16 52 59 |         | dilatation.                  |
|     |        |     |      | PNE   | 16 53 01 |         |                              |
|     |        |     |      | iPNE  | 16 53 03 |         |                              |
|     |        |     |      | SN    | 17 01 21 |         |                              |
|     |        |     |      | iSZN  | 17 01 23 | 60.7    |                              |
|     |        |     |      | iSE   | 17 01 27 | 61.4    |                              |
|     |        |     |      | eLZ   | 17 08    |         |                              |
|     |        |     |      | eLE   | 17 14    |         |                              |
|     |        |     |      | LE    | 17 16    |         | strong.                      |
|     |        |     |      | eIN   | 17 17    |         |                              |
|     |        |     |      | LN    | 17 18    |         | strong.                      |
|     |        | Med | IIIu | PNE   | 16 54 11 | 71.3    |                              |
|     |        |     |      | iNE   | 16 54 19 |         |                              |
|     |        |     |      | iSNE  | 17 03 34 |         |                              |
|     |        |     |      | INE   | 17 21    |         | strong.                      |
| 128 | " 6    | Med | Iv   | ePE   | 18 26 09 |         | extremely faint.             |
|     |        |     |      | iN    | 18 27 45 |         |                              |
| 129 | " 8    | Med | Iv   | eP?E  | 05 52 51 |         |                              |
|     |        |     |      | iN    | 05 53 13 |         |                              |
| 130 | " 8    | Bat | I    | PZ    | 09 50 11 |         |                              |
|     |        |     |      | PE    | 09 50 13 |         |                              |
|     |        |     |      | iNE   | 09 51 05 |         | in micros.                   |
|     |        |     |      | iE    | 09 52 15 |         |                              |
|     |        | Mal |      |       |          |         |                              |
|     |        | Med | I    | PE    | 09 50 53 |         | traces.<br>in micros.        |
| 131 | " 8    | Bat | Iv   | iZ    | 10 34 46 |         |                              |
| 132 | " 11   | Med | Ir   | PNE   | 04 05 29 | 27.5?   | faint.                       |
|     |        |     |      | S?E   | 04 10 16 |         |                              |
|     |        | Bat | Ir   | ePZE  | 04 07 07 |         | dubious.                     |
|     |        |     |      | iN    | 04 10 39 |         |                              |
|     |        |     |      | iE    | 04 11 02 |         |                              |
| 133 | " 12   | Mal | v    | iNE   | 14 42 42 |         |                              |
| 134 | " 13   | Bat | Iv   | PZN   | 03 40 20 |         | felt in Priangan (W.Java).   |
| 135 | " 14   | Mal | v    | iSNE  | 04 30.5  |         | in minute eclipse.           |
| 136 | " 15   | Med | Iv   | eP?NE | 19 21 23 |         | felt in Sum. W. Coast (Sum). |
|     |        |     |      | iNE   | 19 22 06 |         |                              |
|     |        |     |      | iNE   | 19 22 26 |         |                              |
| 137 | " 15   | Bat | Iv   | PZ    | 20 08 26 | 2.0     |                              |
|     |        |     |      | PE    | 20 08 28 |         |                              |
|     |        |     |      | iSNE  | 20 08 51 |         |                              |
|     |        | Mal | v    | SNE   | 20 09 06 |         |                              |
| 138 | " 15   | Bat | Iu   | P?Z   | 20 14 13 | 63.1?   | in previous.                 |
|     |        |     |      | iE    | 20 14 45 |         |                              |
|     |        |     |      | iN    | 20 15 06 |         |                              |
|     |        |     |      | SN    | 20 22 51 |         |                              |
|     |        |     |      | eLZ   | 20 34    |         |                              |

16.

|     |         |     |      |      | h m s    | degrees |                                          |
|-----|---------|-----|------|------|----------|---------|------------------------------------------|
| 139 | Apr. 15 | Med | Iv   | ePNE | 23 34 38 |         | faint, felt at Lasikin<br>(P. Simeuloe). |
|     |         |     |      | iE   | 23 35 13 |         |                                          |
|     |         |     |      | iNE  | 23 35 28 |         |                                          |
| 140 | " 17    | Med | IIIv | iPN  | 15 19 39 | 4.3     |                                          |
|     |         |     |      | iSNE | 15 20 32 |         |                                          |
|     |         | Bat | Ir   | eP?E | 15 22 03 | 15.2?   | dubious in micros.                       |
|     |         |     |      | eN   | 15 24 15 |         |                                          |
|     |         |     |      | SE   | 15 25 02 |         |                                          |
| 141 | " 18    | Mal | u    | iPNE | 06 42 20 |         |                                          |
|     |         | Bat | IIIu | iPZ  | 06 42 20 |         | compression                              |
|     |         |     |      | PN   | 06 42 22 |         |                                          |
|     |         |     |      | iPZN | 06 42 24 |         |                                          |
|     |         |     |      | iPE  | 06 42 26 |         |                                          |
|     |         |     |      | eLZ  | 07 29    |         |                                          |
|     |         |     |      | LZN  | 07 33    |         | strong.                                  |
|     |         |     |      | LE   | 07 35    |         |                                          |
|     |         | Med | IIu  | ePE  | 06 42 34 |         | faint.                                   |
|     |         |     |      | iE   | 06 43 03 |         |                                          |
|     |         |     |      | iN   | 06 43 28 |         |                                          |
|     |         |     |      | iE   | 06 55 13 |         |                                          |
|     |         |     |      | eLE  | 07 35    |         |                                          |
|     |         |     |      | LE   | 07 41    |         | strong.                                  |
|     |         |     |      | LN   | 07 42    |         | strong.                                  |
| 142 | " 19    | Mal | v    | iE   | 02 18 08 |         | felt in Jokjakarta (C.Java).             |
| 143 | " 19    | Med | Iv   | PN   | 08 39 15 | 2.0     |                                          |
|     |         |     |      | ePE  | 08 39 16 |         | faint.                                   |
|     |         |     |      | iSNE | 08 39 40 |         |                                          |
| 144 | " 20    | Bat | Iu   | PZ   | 22 17 22 |         | compression.                             |
|     |         |     |      | ePE  | 22 17 26 |         |                                          |
|     |         |     |      | iPNE | 22 17 28 |         |                                          |
|     |         | Med | Iu   | ePNE | 22 18 39 | 76.1    |                                          |
|     |         |     |      | iE   | 22 19 06 |         |                                          |
|     |         |     |      | SNE  | 22 28 27 |         |                                          |
| 145 | " 21    | Med | Iu   | PNE  | 04 38 00 | 48.7    | in micros.                               |
|     |         |     |      | iSNE | 04 45 03 |         |                                          |
|     |         | Bat | Iu   | iPZ  | 04 38 27 | 53.4    | compression.                             |
|     |         |     |      | iPNE | 04 38 30 |         |                                          |
|     |         |     |      | iSNE | 04 46 05 |         |                                          |
| 146 | " 22    | Bat | Ir   | ePZ  | 11 29 03 | 21.7    | faint, felt at Manado (NE<br>Celebes).   |
|     |         |     |      | SE   | 11 33 02 |         |                                          |
|     |         | Med | Ir   | PNE  | 11 30    |         | in hour mark.                            |
|     |         |     |      | iE   | 11 35 07 |         |                                          |
|     |         |     |      | iN   | 11 35 11 |         |                                          |
|     |         |     |      | iE   | 11 35 15 |         |                                          |
| 147 | " 22    | Med | IIv  | ePE  | 20 30 56 | 2.6?    | in micros.                               |
|     |         |     |      | iN   | 20 31 14 |         |                                          |
|     |         |     |      | iE   | 20 31 21 |         |                                          |
|     |         |     |      | S?E  | 20 31 29 |         |                                          |



17.

|     |        |     |      |       | h m s    | degrees |                            |
|-----|--------|-----|------|-------|----------|---------|----------------------------|
| 148 | Apr.23 | Bat | IIv  | iPZ   | 02 55 32 | 1.9     | Dilatation from WNW. Deep? |
|     |        |     |      | iPNE  | 02 55 34 |         |                            |
|     |        |     |      | iSZNE | 02 55 56 |         |                            |
|     |        | Mal | v    | PE    | 02 55 43 | 2.8     |                            |
|     |        |     |      | iPNE  | 02 55 45 |         |                            |
|     |        |     |      | iSNE  | 02 56 18 |         |                            |
|     |        | Med | Ir   | PE    | 02 57 58 | 11.7    | in strong micros           |
|     |        |     |      | SE    | 03 00 20 |         |                            |
|     |        |     |      | iN    | 03 01 17 |         |                            |
| 149 | " 26   | Med | Ir   | PE    | 11 22 15 | 26.0    | dubious, in strong micros. |
|     |        |     |      | iE    | 11 24 53 |         |                            |
|     |        |     |      | iN    | 11 26 36 |         |                            |
|     |        |     |      | SE    | 11 26 50 |         |                            |
|     |        |     |      | iNE   | 11 29 29 |         |                            |
|     |        |     |      | L?NE  | 11 31    |         |                            |
|     |        | Bat | Ir   | ePZ   | 11 22 19 |         | faint in micros.           |
|     |        |     |      | iN    | 11 23 44 |         |                            |
|     |        |     |      | iE    | 11 27 36 |         |                            |
|     |        |     |      | iN    | 11 28 17 |         |                            |
| 150 | " 28   | Mal | d    | iPNE  | 14 52 11 | 1.4     | felt in Priangan (W.Java). |
|     |        |     |      | iSNE  | 14 52.5  |         | in minute eclipse.         |
| 151 | " 30   | Mal | u    | ePE   |          |         | preliminary.               |
|     |        |     |      | PE    | 03 04 39 | 51.1    |                            |
|     |        |     |      | iE    | 03 04 47 |         |                            |
|     |        |     |      | iN    | 03 07 06 |         |                            |
|     |        |     |      | iNE   | 03 11 46 |         |                            |
|     |        |     |      | iSNE  | 03 12 03 |         |                            |
|     |        |     |      | LNE   | 03 17    |         |                            |
|     |        | Bat | IIIu | PZ    | 03 04 29 |         | preliminary.               |
|     |        |     |      | ePE   | 03 04 30 |         | preliminary.               |
|     |        |     |      | iPZNE | 03 04 47 | 51.7    |                            |
|     |        |     |      | iSE   | 03 12 14 |         |                            |
|     |        |     |      | iS?NE | 03 12 32 |         |                            |
|     |        |     |      | iS?N  | 03 12 38 |         |                            |
|     |        |     |      | LZN   | 03 20    |         | strong.                    |
|     |        |     |      | LE    | 03 21    |         |                            |
|     |        | Med | IIIu | PNE   | 03 05 46 | 59.7    | in micros.                 |
|     |        |     |      | iE    | 03 05 57 |         |                            |
|     |        |     |      | iN    | 03 06 09 |         |                            |
|     |        |     |      | iE    | 03 11 29 |         |                            |
|     |        |     |      | SNE   | 03 14 04 |         |                            |
|     |        |     |      | iS?E  | 03 14 37 |         |                            |
| 152 | " 30   | Bat | Iu   | PNE   | 14 12 27 | 56.3    |                            |
|     |        |     |      | SE    | 14 20 24 |         |                            |
|     |        | Med | Iu   | PE    | 14 13 24 | 63.8    |                            |
|     |        |     |      | SE    | 14 22 06 |         |                            |
|     |        |     |      | iE    | 14 22 46 |         |                            |
| 153 | " 30   | Med | Iv   | PNE   | 15 39 48 | 3.1     | in micros.                 |
|     |        |     |      | iSE   | 15 40 27 |         |                            |

18.

|     | May.  |     |     |      | h m s    | degrees |                                              |
|-----|-------|-----|-----|------|----------|---------|----------------------------------------------|
| 154 | May 1 | Med | IIu | ePNE | 06 07 31 | 53.0    | dubious.                                     |
|     |       |     |     | SNE  | 06 15 06 |         |                                              |
|     |       |     |     | iE   | 06 16 16 |         |                                              |
|     |       |     |     | iN   | 06 18 12 |         |                                              |
|     |       |     |     | LNE  | 06 27    |         |                                              |
|     |       | Bat | Iu  | PZNE | 06 07 59 | 55.4    | uncertain.                                   |
|     |       |     |     | SN   | 06 15 50 |         |                                              |
|     |       |     |     | eLZ  | 06 26    |         |                                              |
| 155 | " 1   | Med | I   | iE   | 12 21 06 |         | in strong micros.                            |
| 156 | " 1   | Med | Iu  | PNE  | 16 15 04 | 50.0    |                                              |
|     |       |     |     | SNE  | 16 22 20 |         |                                              |
|     |       |     |     | LE   | 16 33    |         |                                              |
|     |       |     |     | LNE  | 16 37    |         |                                              |
|     |       | Bat | Iu  | ePE  | 16 15 26 | 52.7    |                                              |
|     |       |     |     | ePN  | 16 15 28 |         | in minute eclipse.                           |
|     |       |     |     | SN   | 16 23.0  |         |                                              |
| 157 | " 2   | Mal | v   | PNE  | 07 21 50 | 0.8     | felt in Priangan (W.Java).                   |
|     |       |     |     | iSNE | 07 22 01 |         |                                              |
| 158 | " 2   | Med | I   | P?N  | 13 37 46 |         |                                              |
|     |       |     |     | iE   | 13 39 05 |         |                                              |
|     |       |     |     | eLE  | 14 21    |         | uncertain.                                   |
| 159 | " 3   | Med | I   | iN   | 08 16 50 |         | in strong micros.                            |
|     |       |     |     | iE   | 08 17 10 |         | in strong micros.                            |
| 160 | " 3   | Med | Iv  | ePE  | 09 27 11 |         |                                              |
|     |       |     |     | SE   | 09 28 06 | 4.5     |                                              |
|     |       |     |     | SN   | 09 28 13 | 5.1     |                                              |
| 161 | " 3   | Med | Iv  | iNE  | 13 16 50 |         |                                              |
| 162 | " 3   | Med | Iv  | P?E  | 15 52 42 |         |                                              |
|     |       |     |     | iN   | 15 53 07 |         |                                              |
|     |       |     |     | iE   | 15 53 20 |         |                                              |
| 163 | " 3   | Med | Ir  | PE   | 16 23 12 | 34.7    | dubious, in strong micros.                   |
|     |       |     |     | SN   | 16 28 52 |         |                                              |
|     |       | Bat | Ir  | PE   | 16 23 25 |         |                                              |
|     |       |     |     | iE   | 16 27 37 |         |                                              |
|     |       |     |     | iE   | 16 29 41 |         |                                              |
| 164 | " 4   | Med | Iv  | ePNE | 17 51 25 | 1.2     |                                              |
|     |       |     |     | iNE  | 17 51 37 |         |                                              |
|     |       |     |     | SNE  | 17 51 41 |         |                                              |
| 165 | " 5   | Bat | Ir  |      |          | 16.8?   | S?E - iPE = 3 <sup>m</sup> 14 <sup>s</sup> ; |
|     |       |     |     |      |          | 19.9?   | S?E - iPE = 3 <sup>m</sup> 43 <sup>s</sup> ; |
|     |       |     |     |      |          |         | no minute eclipses.                          |
|     |       | Med | Ir  | PE   | 12 18 28 | 31.3?   | in micros.                                   |
|     |       |     |     | iN   | 12 23 28 |         |                                              |
|     |       |     |     | SE   | 12 23 44 |         |                                              |
|     |       |     |     | iE   | 12 25 56 |         |                                              |
|     |       |     |     | iN   | 12 24 00 |         |                                              |
|     |       |     |     | iN   | 12 24 51 |         |                                              |



| 19. |       |     |    |                        |                                              | degrees |                                                   |
|-----|-------|-----|----|------------------------|----------------------------------------------|---------|---------------------------------------------------|
|     |       |     |    | h m s                  |                                              |         |                                                   |
| 166 | May 5 | Mal | v  | iPE<br>SNE             | 22 48 15<br>22 48 24                         | 0.7     | felt in Priangan (W. Java).                       |
|     |       | Bat | Iv |                        |                                              |         | no minute eclipses.                               |
| 167 | " 6   | Med | Iu | P?E<br>iE<br>iE<br>iN  | 06 20 24<br>06 27 06<br>06 35 47<br>06 38 09 |         | traces in very strong micros.                     |
|     |       | Bat | Iu | iP?E<br>iE             | 06 20 54<br>06 26 18                         |         |                                                   |
| 168 | " 6   | Bat | Ir | PNE<br>SN              | 17 05 28<br>17 09 45                         | 23.8    |                                                   |
|     |       | Med | Ir | iE<br>P?E<br>iSE<br>iN | 17 12 22<br>17 05 30<br>17 10 02<br>17 12 18 | 25.6?   | in very strong micros.                            |
| 169 | " 6   | Bat | I  | ePE<br>iN              | 20 14 33<br>20 21 00                         |         | extremely faint.                                  |
|     |       | Med | I  | iPE<br>iN<br>iE<br>iN  | 20 15 37<br>20 21 27<br>20 25 24<br>20 25 36 |         | in strong micros.                                 |
| 170 | " 7   | Med | I  | P<br>iE<br>iE          | <br>00 40 24<br>00 42 58                     |         | in change of papers.                              |
| 171 | " 8   | Med | Iu | P?E<br>iN<br>eLNE      | 02 05 08<br>02 12 51<br>03 00                |         | in very strong micros.                            |
|     |       | Bat | Iu | P?NE<br>iE             | 02 05 40<br>02 07 51                         |         |                                                   |
| 172 | " 8   | Mal | d  | PNE                    | 21 42 32                                     | 1.4     | in minute eclipse, felt in West and Central Java. |
|     |       | Bat | Iv | iSNE<br>eP?Z<br>S?E    | 21 42 49<br>21 42 53<br>21 43 27             | 2.6?    |                                                   |
| 173 | " 10  | Med | I  | iP?E<br>PNE<br>iE      | 07 56 49<br>07 56 57<br>08 07 29             |         | in very strong micros                             |
|     |       | Bat | I  | iPZ<br>iE              | <br>07 57 56                                 |         | no minute eclipses.<br>faint.                     |
| 174 | " 11  | Bat | Iv | PZ<br>PNE<br>iSN       | 00 26 19<br>00 26 22<br>00 26 35             | 1.2     |                                                   |
| 175 | " 11  | Med | Iv | PNE                    | 15 17 42                                     |         | in micros, felt at Koeta-tjané (N. Sumatra).      |
| 176 | " 11  | Mal | v  | ePN<br>iSNE            | 17 32 23<br>17 33 29                         | 5.2     | dubious, felt in E. Java.                         |

| 20. |         |     |      |                                         |                                                                | degrees |                                                                   |
|-----|---------|-----|------|-----------------------------------------|----------------------------------------------------------------|---------|-------------------------------------------------------------------|
|     |         |     |      | h m s                                   |                                                                |         |                                                                   |
| 176 | May 11  | Bat | Iv   | PZ<br>ePNE<br>SN                        | 17 32 36<br>17 32 38<br>17 33 59                               | 6.3     | faint.                                                            |
|     | (cont.) | Med | Ir   | iE<br>eP?E<br>iNE<br>SE<br>iN           | 17 34 11<br>17 38 32<br>17 36 32<br>17 38 56<br>17 39 17       |         | in strong micros.                                                 |
| 177 | " 13    | Med | IIIv | iPNE                                    | 12 59 30                                                       | 2.0     | felt in Tapanoeli and on Simeuloeë (N. Sumatra); pens thrown off. |
|     |         | Bat | Ir   | iSNE<br>PNE<br>iN                       | 12 59 55<br>13 01 45<br>13 02 16                               |         | faint.                                                            |
| 178 | " 14    | Med | IIv  | ePNE<br>iSNE                            | 08 43 34<br>08 43 55                                           |         | deep focus. 200 km.                                               |
| 179 | " 14    | Med |      | eE                                      | 18 35 06                                                       |         | traces.                                                           |
| 180 | " 15    | Med | I    | P?NE<br>iE<br>iN                        | 07 52 52<br>07 57 19<br>07 57 38                               |         | faint in strong micros.                                           |
| 181 | " 16    | Med | Ir   | iPNE<br>S?E<br>iE                       | 07 26 24<br>07 31 32<br>07 35 24                               | 30.3?   | in very strong micros.                                            |
|     |         | Bat | Ir   | iPZ<br>iPNE<br>iE<br>iS?E               | 07 26 48<br>07 26 51<br>07 29 32<br>07 32 06                   | 31.6?   | compression.<br>from WNW.                                         |
| 182 | " 17    | Med | I    | iNE<br>iN<br>iE                         | 15 19 25<br>15 20 46<br>15 26 31                               |         | in very strong micros.                                            |
| 183 | " 17    | Med | IIu  | PNE<br>iPNE<br>iS?E<br>iS?E<br>LE<br>LN | 18 38 53<br>18 39 18<br>18 45 38<br>18 46 02<br>18 57<br>18 58 |         | in strong micros.                                                 |
|     |         | Bat | IIu  | PZNE<br>eSZE<br>eSN<br>iSN              | 18 38 57<br>18 45 41<br>18 45 43<br>18 45 45                   | 45.6    |                                                                   |
| 184 | " 19    | Mal | v    |                                         |                                                                |         | no hour marks.                                                    |
| 185 | " 20    | Med | Ir   | PNE<br>S?E                              | 09 13 16<br>09 17 22                                           | 22.5?   |                                                                   |
| 186 | " 21    | Bat | Iv   | PZ<br>iSNE<br>SN                        | 10 48 57<br>10 49 14<br>10 49 16                               | 1.6     |                                                                   |



21.

|     |        |     |    |       | h m s    | degrees |                                     |
|-----|--------|-----|----|-------|----------|---------|-------------------------------------|
| 187 | May 21 | Bat | Iu | PZ    | 20 32 25 | 63.2    |                                     |
|     |        |     |    | iPZ   | 20 32 27 |         |                                     |
|     |        |     |    | iSNE  | 20 41 03 |         |                                     |
|     |        | Med | Iu | ePE   | 20 33 26 | 72.9    | extremely faint.                    |
|     |        |     |    | iN    | 20 37 39 |         |                                     |
|     |        |     |    | iSNE  | 20 42 57 |         |                                     |
| 188 | " 21   | Med | Iv | ePNE  | 23 08 03 | 2.2     |                                     |
|     |        |     |    | iSNE  | 23 08 30 |         |                                     |
| 189 | " 22   | Bat | Ir | PZ    | 01 41 36 |         | uncertain, felt in North N. Guinea. |
|     |        | Med | Ir | PE    | 01 42 45 | 42.9    | faint.                              |
|     |        |     |    | iS?N  | 01 48 59 |         |                                     |
|     |        |     |    | iE    | 01 49 06 |         |                                     |
|     |        |     |    | SN    | 01 49 16 |         |                                     |
| 190 | " 22   | Med | I  | PE    | 02 13 38 |         | faint traces in previous.           |
|     |        |     |    | iN    | 02 13 49 |         |                                     |
| 191 | " 23   | Med | Ir | P?E   | 04 26 02 |         |                                     |
|     |        |     |    | PNE   | 04 26 27 | 40.5    | extremely faint                     |
|     |        |     |    | iN    | 04 27 18 |         |                                     |
|     |        |     |    | SNE   | 04 32 43 |         |                                     |
|     |        | Bat | I  | P?E   | 04 27 58 |         | faint traces.                       |
| 192 | " 24   | Bat | Iv | ePNE  | 14 02 17 | 3.0?    | in micros                           |
|     |        |     |    | S?NE  | 14 02 55 |         |                                     |
| 193 | " 24   | Med | Iv | P?E   | 14 31 49 |         | felt at Kampong Air (Simeu-loeŕ)    |
|     |        |     |    | iNE   | 14 32 21 |         |                                     |
|     |        |     |    | iE    | 14 32.9  |         | in minute eclipse.                  |
| 194 | " 25   | Med | Iv | eP?E  | 00 19 22 | 1.4?    |                                     |
|     |        |     |    | iSNE  | 00 19 40 |         |                                     |
| 195 | " 25   | Bat | Ir | ePZ   | 06 21 45 | 26.0?   | extremely faint.                    |
|     |        |     |    | S?N   | 06 26 20 |         |                                     |
|     |        | Med | Ir | P?E   | 06 21 55 | 25.5?   |                                     |
|     |        |     |    | S?E   | 06 26 26 |         |                                     |
|     |        |     |    | iE    | 06 28 14 |         |                                     |
| 196 | " 26   | Med | Iv | iN    | 04 48.9  |         | in minute eclipse.                  |
| 197 | " 26   | Med | Iu | P?N   | 09 50 06 |         |                                     |
|     |        |     |    | iE    | 10 08 23 |         |                                     |
|     |        |     |    | iE    | 10 16 10 |         | P of new shock?                     |
|     |        | Bat | Iu | ePZ   | 09 50 40 |         | S of new shock?                     |
|     |        |     |    | SN    | 09 58 54 | 59.1    |                                     |
| 198 | " 26   | Bat | Ir | PZ    | 17 57 04 |         | felt at Genjem (N. Guinea).         |
|     |        |     |    | iN    | 17 58 45 |         |                                     |
|     |        |     |    | iE    | 17 58 55 |         |                                     |
|     |        |     |    | eL?ZE | 18 04    |         |                                     |
|     |        |     |    | LN    | 18 07    |         |                                     |

22.

|     |         |     |      |      | h m s    | degrees |                                              |
|-----|---------|-----|------|------|----------|---------|----------------------------------------------|
| 198 | May 26  | Med | Ir   | PNE  | 17 58 20 | 43.0    |                                              |
|     | (Cont.) |     |      | iN   | 17 58 31 |         |                                              |
|     |         |     |      | iN   | 18 04 42 |         |                                              |
|     |         |     |      | iSNE | 18 04 52 |         |                                              |
| 199 | " 26    | Mal | r    | iNE  |          |         | no hour marks; felt at Wai-kaboebak (Soemba) |
|     |         | Bat | Ir   | iPZ  | 20 10 01 |         |                                              |
|     |         | Med | Ir   | P?E  | 20 12 49 |         |                                              |
|     |         |     |      | S?N  | 20 16 54 |         |                                              |
| 200 | " 27    | Med | IIIr | PE   | 03 50 28 | 21.6    | in micros.                                   |
|     |         |     |      | iPN  | 03 50 29 |         |                                              |
|     |         |     |      | iSNE | 03 54 26 |         |                                              |
|     |         | Bat | IIr  | PZNE | 03 52 11 | 31.6    |                                              |
|     |         |     |      | iE   | 03 57 23 |         |                                              |
|     |         |     |      | SN   | 03 57 29 |         |                                              |
|     |         |     |      | iE   | 03 57 45 |         |                                              |
|     |         |     |      | iNE  | 04 02 53 |         |                                              |
| 201 | " 27    | Med | Iv   | PNE  | 17 11 25 | 3.6     |                                              |
|     |         |     |      | SNE  | 17 12 09 |         |                                              |
| 202 | " 28    | Med | I    | P?E  | 04 08 10 |         |                                              |
|     |         |     |      | iN   | 04 14 24 |         |                                              |
|     |         |     |      | iE   | 04 15 43 |         |                                              |
|     |         | Bat | I    | P?ZE | 04 08 39 |         | uncertain in micros.                         |
|     |         |     |      | iN   | 04 13 43 |         |                                              |
| 203 | " 30    | Mal | v    | iNE  | 16 04 34 |         |                                              |

June.

|     |        |     |      |      |          |      |                                                                                     |
|-----|--------|-----|------|------|----------|------|-------------------------------------------------------------------------------------|
| 204 | Jun. 1 | Med | IIIv | iPNE | 11 15 26 |      |                                                                                     |
|     |        |     |      | iE   | 11 16 17 |      |                                                                                     |
|     |        | Bat | I    |      |          |      | faint traces.                                                                       |
| 205 | " 2    | Mal | r    | ePNE | 03 38 10 | 20.0 | felt in Menado (NE. Celebes), on the Sangir and Talaud Isl. and at Kau (Halmahera). |
|     |        |     |      | iPNE | 03 38 16 |      |                                                                                     |
|     |        |     |      | SNE  | 03 41 55 |      |                                                                                     |
|     |        |     |      | iNE  | 03 49 24 |      | may be another shock.                                                               |
|     |        | Bat | IIIr | iPZ  | 03 38 12 |      | compression from ENE                                                                |
|     |        |     |      | iPNE | 03 38 13 |      |                                                                                     |
|     |        |     |      | SN   | 03 42 00 | 20.5 |                                                                                     |
|     |        |     |      | SN   | 03 42 03 | 20.8 |                                                                                     |
|     |        |     |      | iE   | 03 43 09 |      |                                                                                     |
|     |        |     |      | eLZ  | 03 48    |      |                                                                                     |
|     |        |     |      | iZ   | 03 48 12 |      |                                                                                     |
|     |        | Med | IIIr | iPNE | 03 39 07 | 25.7 |                                                                                     |
|     |        |     |      | iSN  | 03 43 40 |      |                                                                                     |



| 23. |        |     |     |                                                                              |                                                                                                                                              |         |                                                         |  |  |
|-----|--------|-----|-----|------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------|---------|---------------------------------------------------------|--|--|
|     |        |     |     |                                                                              | h m s                                                                                                                                        | degrees |                                                         |  |  |
| 206 | Jun. 2 | Mal | v   | ePNE<br>iSNE                                                                 | 15 11 45<br>15 11 55                                                                                                                         | 0.8     | felt at Daradjat (Priangan)                             |  |  |
| 207 | " 3    | Mal | v   | iNE                                                                          | 06 32 24                                                                                                                                     |         |                                                         |  |  |
| 208 | " 4    | Mal | r   | PNE                                                                          |                                                                                                                                              |         | in change of papers; felt<br>the Lesser Soenda Islands. |  |  |
|     |        |     |     | SE                                                                           | 00 30 36                                                                                                                                     |         |                                                         |  |  |
|     |        |     |     | iE                                                                           | 00 39 43                                                                                                                                     |         |                                                         |  |  |
|     |        | Bat | IIr | PZ                                                                           | 00 27 51                                                                                                                                     | 16.1    | in micros.                                              |  |  |
|     |        |     |     | PNE                                                                          | 00 27 54                                                                                                                                     |         |                                                         |  |  |
|     |        |     |     | iE                                                                           | 00 27 58                                                                                                                                     |         |                                                         |  |  |
|     |        |     |     | iN                                                                           | 00 29 53                                                                                                                                     |         |                                                         |  |  |
|     |        |     |     | SNE                                                                          | 00 30 59                                                                                                                                     |         |                                                         |  |  |
|     |        |     |     | iE                                                                           | 00 32 31                                                                                                                                     |         |                                                         |  |  |
|     |        |     |     | iN                                                                           | 00 39 42                                                                                                                                     |         |                                                         |  |  |
|     |        | Med | Ir  | P?NE                                                                         | 00 29 48                                                                                                                                     | 28.0?   |                                                         |  |  |
|     |        |     |     | SNE                                                                          | 00 34 39                                                                                                                                     |         |                                                         |  |  |
|     |        |     |     | iN                                                                           | 00 35 31                                                                                                                                     |         |                                                         |  |  |
|     |        |     |     | iE                                                                           | 00 36 13                                                                                                                                     |         |                                                         |  |  |
|     |        |     |     | iNE                                                                          | 00 36 51                                                                                                                                     |         |                                                         |  |  |
| 209 | " 4    | Med | Ir  | ePNE<br>S?NE                                                                 | 15 24 44<br>15 30 51                                                                                                                         | 38.7?   | extremely faint.                                        |  |  |
|     |        | Bat |     |                                                                              |                                                                                                                                              |         | extremely faint traces in<br>micros.                    |  |  |
| 210 | " 5    | Med | Iv  | PE                                                                           | 05 45 03                                                                                                                                     | 2.2     | in micros, felt in Atjeh<br>(N.Sumatra).                |  |  |
|     |        |     |     | iSNE                                                                         | 05 45 31                                                                                                                                     |         |                                                         |  |  |
| 211 | " 5    | Med | Iv  | PNE<br>SN                                                                    | 18 12 45<br>18 13 16                                                                                                                         | 2.5     |                                                         |  |  |
| 212 | " 7    | Bat | Ir  | ePZ<br>S?NE                                                                  | 01 04 38<br>01 10 56                                                                                                                         | 40.8?   | dubious.                                                |  |  |
|     |        | Med | Iu  | P?E<br>SNE                                                                   | 01 05 23<br>01 12 17                                                                                                                         | 46.5?   | in micros.                                              |  |  |
| 213 | " 7    | Med | I   | iN                                                                           | 16 43 27                                                                                                                                     |         | traces.                                                 |  |  |
| 214 | " 8    | Bat | I   | iPZ<br>iPNE<br>iN<br>iE<br>S?NE<br>iNE<br>PNE<br>iN<br>iE<br>iE<br>S?N<br>iE | 20 58 45<br>20 58 48<br>20 59 31<br>21 06 05<br>21 08 33<br>21 09 01<br>20 59 43<br>21 07 07<br>21 08 15<br>21 09 58<br>21 10 13<br>21 11 20 | 76.2?   | compression from East.                                  |  |  |
|     |        | Med | I   |                                                                              |                                                                                                                                              | 84.5?   |                                                         |  |  |
| 215 | " 9    | Med | I   | iN                                                                           | 15 58 04                                                                                                                                     |         | traces.                                                 |  |  |
| 216 | " 9    | Med | I   | P?N<br>iN                                                                    | 17 09 55<br>17 17 09                                                                                                                         |         |                                                         |  |  |

| 24. |        |     |     |                                |                                                          |                       |                                                                                                                                                                                |  |  |
|-----|--------|-----|-----|--------------------------------|----------------------------------------------------------|-----------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|--|
|     |        |     |     |                                | h m s                                                    | degrees               |                                                                                                                                                                                |  |  |
| 217 | Jun. 9 | Bat | Ir  | ePZE<br>iE<br>S?N              | 19 15 03<br>19 19 41<br>19 19 56                         |                       | faint.                                                                                                                                                                         |  |  |
|     |        | Med | Ir  | iSE<br>PNE<br>SE               | 19 20 12<br>19 16 18<br>19 22 31                         | 28.3?<br>30.4<br>40.0 | in micros.                                                                                                                                                                     |  |  |
| 218 | " 11   | Med | Iv  | PNE                            | 07 52 35                                                 |                       | faint traces.                                                                                                                                                                  |  |  |
| 219 | " 12   | Amb | v   | iNE                            | 04 06 38                                                 |                       | traces.                                                                                                                                                                        |  |  |
| 220 | " 12   | Bat | Iu  | P?E<br>iE                      | 04 27.3<br>04 31 30                                      |                       | traces in minute eclipse.                                                                                                                                                      |  |  |
| 221 | " 12   | Amb | v   | iNE                            | 04 29 12                                                 |                       |                                                                                                                                                                                |  |  |
| 222 | " 12   | Bat | Iv  | iPZNE<br>iSNE                  | 06 03 42<br>06 04 14                                     |                       | compression, deep focus.                                                                                                                                                       |  |  |
|     |        | Mal | v   | PNE<br>SN                      | 06 03 44<br>06 04 18                                     |                       |                                                                                                                                                                                |  |  |
| 223 | " 12   | Bat | I   | iN<br>iE                       | 10 38 51<br>10 39 58                                     |                       | traces.<br>traces.                                                                                                                                                             |  |  |
|     | 13     | Amb |     |                                |                                                          |                       | several faint local shocks.                                                                                                                                                    |  |  |
| 224 | " 13   | Amb | v   | iPNE                           | 20 41 01                                                 | 4.8                   | from NW; felt in Menado (NE<br>Celebes) and at Laboeha (Ba-<br>tjan). Deep focus, h = 200<br>Prov. epic. 126.2E 0.7N;<br>O = 20 <sup>h</sup> 39 <sup>m</sup> 54 <sup>s</sup> . |  |  |
|     |        |     |     | iN<br>iSNE                     | 20 41 47<br>20 41 56                                     |                       |                                                                                                                                                                                |  |  |
|     |        | Bat | Ir  | iPE<br>ePN<br>iE<br>iSE<br>iNE | 20 44 15<br>20 44 15<br>20 44 22<br>20 47 49<br>20 48 08 | 20.5                  | faint.                                                                                                                                                                         |  |  |
|     |        | Med | Ir  | iPNE<br>SE<br>iE<br>iN<br>iN   | 20 45 28<br>20 49 59<br>20 51 03<br>20 51 16<br>20 51 40 | 27.6                  | from nearly East.                                                                                                                                                              |  |  |
| 225 | " 16   | Mal | v   | eP?E<br>iSNE                   | 00 40 49<br>00 40 59                                     | 0.8?                  |                                                                                                                                                                                |  |  |
| 226 | " 16   | Bat | IIv | PNE<br>iSN<br>iSNE             | 12 17 09<br>12 17 33<br>12 17 36                         | 1.9                   | felt in Bantam (W.Java).                                                                                                                                                       |  |  |
|     |        | Mal | v   | PNE<br>SE                      | 12 17 22<br>12 17 56                                     | 2.7                   |                                                                                                                                                                                |  |  |
| 227 | " 17   | Mal | v   | PNE<br>iSNE                    | 22 39 53<br>22 40 15                                     | 1.7                   | felt in Central Java.                                                                                                                                                          |  |  |
|     |        | Bat | Iv  | PZ<br>ePNE<br>S?NE<br>iNE      | 22 40 06<br>22 40 07<br>22 40 40<br>22 40 57             | 2.7?                  | in micros.<br>in micros.<br>uncertain.                                                                                                                                         |  |  |



| 25. |         |     |     |                                                                                          |                                                                                                                                                                   | degrees |                                                                       |
|-----|---------|-----|-----|------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------|-----------------------------------------------------------------------|
|     |         |     |     | h m s                                                                                    |                                                                                                                                                                   |         |                                                                       |
| 228 | Jun. 18 | Mal | v   | iNE                                                                                      | 10 13 10                                                                                                                                                          |         |                                                                       |
| 229 | " 19    | Bat | Iv  | PNE                                                                                      | 02 31 37                                                                                                                                                          |         | dubious in strong micros;<br>felt at Tandjong Keling (S.<br>Sumatra). |
| 230 | " 19    | Med | IIr | ePNE<br>PNE<br>SE<br>iSNE<br>iN<br>iN<br>iN<br>P?Z<br>P?E<br>iE<br>iE<br>iE<br>LZ<br>P?Z | 22 01 26<br>22 01 32<br>22 05 12<br>22 05 16<br>22 06 19<br>22 09 39<br>22 11 06<br>22 02 07<br>22 02 09<br>22 03 00<br>22 04 58<br>22 12 36<br>22 17<br>22 16 57 | 19.6    | extremely faint.<br><br>traces of another shock?                      |
| 231 | " 21    | Med | Iv  | iNE                                                                                      | 02 19 17                                                                                                                                                          |         | faint traces.                                                         |
| 232 | " 21    | Bat | Iv  | iPZ<br><br>PNE<br>SNE<br>iN<br>iN                                                        | 12 56 45<br><br>12 56 47<br>12 57 40<br>12 58 05<br>12 58 42                                                                                                      | 4.5     | felt in Palembang and Ben-<br>koelen (S, Sumatra).                    |
|     |         | Mal | v   |                                                                                          |                                                                                                                                                                   | 5.1     | eS - P = 1 <sup>m</sup> 06 <sup>s</sup> , no hour mark                |
| 233 | " 21    | Med | Iv  | iNE                                                                                      | 21 06 14                                                                                                                                                          |         |                                                                       |
| 234 | " 22    | Mal | v   |                                                                                          |                                                                                                                                                                   | 2.5     | iS - P = 31 sec.; no hour<br>marks.                                   |
|     |         | Bat | Iv  | PZ<br>iSNE<br>iN                                                                         | 12 06 47<br>12 07 32<br>12 08 38                                                                                                                                  | 3.6     |                                                                       |
|     |         |     |     |                                                                                          |                                                                                                                                                                   | 235     | Jun. 22 Amb v iE 14 29 46<br>iE 14 30 15                              |
| 236 | " 22    | Amb | v   | PNE<br>S?E                                                                               | 19 13 09<br>19 14 58                                                                                                                                              | 8.6?    | faint.                                                                |
|     |         | Bat | Ir  | iPZ<br>PNE<br>iN<br>SE                                                                   | 19 15 48<br>19 15 50<br>19 18 01<br>19 19 50                                                                                                                      | 22.0    |                                                                       |
| 237 | " 22    | Amb | v   | PNE<br>iSNE                                                                              | 21 35 03<br>21 35 15                                                                                                                                              | 0.9     |                                                                       |
| 238 | " 22    | Amb | v   | iE                                                                                       | 22 37 24                                                                                                                                                          |         | faint traces.                                                         |
| 239 | " 25    | Amb | r   | ePE                                                                                      | 02 45 48                                                                                                                                                          | 12.2    | traces, felt at Tambora es-<br>tate (Soembawa)                        |
|     |         | Bat | Ir  | eSE<br>PZ<br>iPZNE<br>iE<br>S?N                                                          | 02 48 16<br>02 45 52<br>02 45 54<br>02 48 10<br>02 48 30                                                                                                          | 12.9?   | uncertain.                                                            |

| 26. |         |     |      |                                    |                                                                     | degrees |                                                      |
|-----|---------|-----|------|------------------------------------|---------------------------------------------------------------------|---------|------------------------------------------------------|
|     |         |     |      |                                    |                                                                     |         |                                                      |
| 239 | Jun. 25 | Bat | Ir   | iN<br>iE<br>iE                     | 02 49 31<br>02 50 02<br>02 52 16                                    |         |                                                      |
|     | (Cont.) | Med | IIr  | PE<br>iE<br>SE<br>iE<br>iNE<br>iE  | 02 48 03<br>02 48.9<br>02 52 25<br>02 53 48<br>02 56 21<br>02 56 35 | 24.1    | uncertain in micros.<br>in minute eclipse.           |
| 240 | " 25    | Med | I    | S?N                                | 05 00.9                                                             |         | in minute eclipse.                                   |
| 241 | " 26    | Amb | v    | iE                                 | 05 59 09                                                            |         | traces, felt at Morotai (Mo-<br>luccas).             |
| 242 | " 26    | Amb |      |                                    | 08 36                                                               |         | faint traces.                                        |
| 243 | " 26    | Amb | v    | PNE<br>iE<br>iN<br>iE              | 10 26 23<br>10 26 44<br>10 26 47<br>10 27 01                        |         | extremely faint.                                     |
| 244 | " 26    | Bat | Iv   | P?NE                               | 10 45 57                                                            |         | in strong micros.                                    |
| 245 | " 26    | Mal | v    | iPNE<br>S?N                        | 23 30 11<br>23 30 26                                                | 1.2?    | felt in W. and Central Java.                         |
|     |         | Bat | IIv  | PZNE<br>S?Z<br>iSNE                | 23 30 23<br>23 30 46<br>23 30 49                                    | 2.1     |                                                      |
|     |         | Med | Ir   | iE<br>iE<br>iN                     | 23 37 40<br>23 38 26<br>23 39 36                                    |         | traces in micros.                                    |
| 246 | " 27    | Bat | Iv   | eNE<br>iE<br>iN                    | 00 19 52<br>00 20 41<br>00 20 47                                    |         | traces in micros.                                    |
|     |         | Mal | v    | SNE                                | 00 19 59                                                            |         |                                                      |
| 247 | " 27    | Mal | v    | PNE<br>iSNE                        | 16 29 29<br>16 29 39                                                | 0.8     | faint.                                               |
| 248 | " 27    | Mal | v    | PNE<br><br>iSNE                    | 16 30 27<br><br>16 30 39                                            | 0.9     | in previous, felt at Goenoeng<br>Bitceng (Priangan). |
| 249 | " 27    | Amb | r    | PNE<br>SNE<br>LN                   | 23 07 14<br>23 09 27<br>23 11                                       | 10.8    |                                                      |
|     |         | Bat | IIIr | PZNE<br>iPZNE<br>iSNE<br>eLZ<br>LZ | 23 09 36<br>23 09 40<br>23 13 53<br>23 19<br>23 22                  | 23.3    | dilatation from NE.                                  |
|     |         | Mal | r    | ePNE<br>PNE<br>eN<br>SNE<br>LN     | 23 09 40<br>23 09 44<br>23 13 50<br>23 13 57<br>23 19               | 23.3    | too faint.                                           |
|     |         | Med | IIIr | iPE<br>ePN<br>iSN<br>iN            | 23 10 22<br>23 10 22<br>23 15 01<br>23 16 18                        | 26.5    | from East.                                           |



| 27. |         |     |   |     |          | degrees | in previous.  |
|-----|---------|-----|---|-----|----------|---------|---------------|
|     |         |     |   |     | h m s    |         |               |
| 250 | Jun. 27 | Mal | v | iNE | 23 20 39 |         |               |
| 251 | " 28    | Amb | v | PN  | 01 50 56 |         |               |
|     |         |     |   | iE  | 01 51 20 |         |               |
|     |         |     |   | iN  | 01 51 29 |         |               |
| 252 | " 28    | Amb | v | iE  | 15 32 45 |         |               |
| 253 | " 28    | Amb | v | ePE | 16 33 15 |         | dubious.      |
| 254 | " 28    | Amb | v | PNE | 19 07 12 | 1.2?    |               |
|     |         |     |   | S?E | 19 07 27 |         |               |
| 255 | " 28    | Amb | v | eE  | 19 56 32 |         | traces.       |
| 256 | " 29    | Med | I |     | 16 17 45 |         | faint traces. |

\*\*\*\*\*5\*\*\*\*\*

# CONSTANTS WIECHERT SEISMOGRAPHS.

## BATAVIA.

|       | EW Component |       |       | NS Component |       |       | Z Component |       |       |
|-------|--------------|-------|-------|--------------|-------|-------|-------------|-------|-------|
|       | V            | $T_o$ | $\xi$ | V            | $T_o$ | $\xi$ | V           | $T_o$ | $\xi$ |
| April | 226          | 7.4   | 3.5   | 203          | 7.4   | 3.4   | 300         | 4.4   | 3.6   |
| May   | 226          | 7.3   | 3.5   | 203          | 7.4   | 3.5   | 300         | 4.5   | 3.5   |
| June  | 226          | 7.3   | 3.5   | 203          | 7.4   | 3.6   | 300         | 4.5   | 3.5   |

  

|       | $e_o$ | r    | $e_o$ | r    | $e_o$ | r    |
|-------|-------|------|-------|------|-------|------|
|       |       |      |       |      |       |      |
| April | 1.09  | 0.78 | 1.10  | 0.45 | 1.14  | 0.11 |
| May   | 1.07  | 0.74 | 1.09  | 0.37 | 1.16  | 0.31 |
| June  | 1.10  | 0.55 | 1.11  | 0.52 | 1.15  | 0.32 |

## MEDAN.

| EW Component |       |       |       |     | NS Component |       |       |       |     |
|--------------|-------|-------|-------|-----|--------------|-------|-------|-------|-----|
| V            | $T_o$ | $\xi$ | $e_o$ | r   | V            | $T_o$ | $\xi$ | $e_o$ | r   |
| 219          | 5.2   | 3.8   | 1.07  | 1.0 | 228          | 4.3   | 2.3   | 1.11  | 0.9 |

\*\*\*\*\*5\*\*\*\*\*



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Batavia, Java.



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The recording at the seismographic station at Malabar was stopped on November 29th. Recording and time service at Amboina were unsatisfactory during the whole quarter.

| No. | Date            | Station | Character | Phase | G.M.T.   | Distance | Remarks                           |
|-----|-----------------|---------|-----------|-------|----------|----------|-----------------------------------|
|     | <u>October.</u> |         |           |       | h m s    | degrees  |                                   |
| 402 | Oct 2           | Med     | Iv        | PN    | 03 16 01 |          | felt at Sigli (N. Sumatra)        |
|     |                 |         |           | iNE   | 03 16 24 |          |                                   |
|     |                 |         |           | iNE   | 03 16 40 |          |                                   |
| 403 | " 3             | Bat     | Iu        | PZ    | 13 51 58 | 64.6     |                                   |
|     |                 |         |           | PNE   | 13 52 00 |          |                                   |
|     |                 |         |           | iSE   | 14 00 44 |          |                                   |
| 404 | " 3             | Med     | Iv        | PN    | 20 06 24 | 1.5      |                                   |
|     |                 |         |           | SN    | 20 06 44 |          |                                   |
| 405 | " 5             | Mal     |           | PE    | 15 09 46 |          | felt in E. Java, Bali and Lombok. |
|     |                 |         |           | iNE   | 15 11 11 |          |                                   |
|     |                 | Bat     | I         | PZ    | 15 09 53 |          |                                   |
|     |                 |         |           | PE    | 15 09 54 |          | in micros.                        |
|     |                 |         |           | iZ    | 15 12 17 |          |                                   |
|     |                 |         |           | iE    | 15 13.0  |          |                                   |
|     |                 | Med     | Ir        | PNE   | 15 12 31 | 20.0     | in minute eclipse.                |
|     |                 |         |           | iSNE  | 15 16 15 |          |                                   |
|     |                 |         |           | iE    | 15 21 21 |          |                                   |
|     |                 |         |           | iN    | 15 23 38 |          |                                   |



|     |       |     |      |       |          |      |                                             |
|-----|-------|-----|------|-------|----------|------|---------------------------------------------|
| 406 | Oct 6 | Mal | v    | INE   | 13 26 37 |      |                                             |
| 407 | " 7   | Amb | IIIv | IPNE  |          | 6.0  | $S_E - P_E = 1^m 17^s$                      |
|     |       | Bat | IIr  | IPZNE | 20 47 53 | 25.2 | dilatation.                                 |
|     |       |     |      | iSN   | 20 52 21 |      |                                             |
|     |       |     |      | LZE   | 20 56    |      |                                             |
|     |       | Med | IIr  | PNE   | 20 49 27 | 35.4 |                                             |
|     |       |     |      | iNE   | 20 49 36 |      |                                             |
|     |       |     |      | iN    | 20 54 34 |      |                                             |
|     |       |     |      | iNE   | 20 54 57 |      |                                             |
|     |       |     |      | iSN   | 20 55 12 |      |                                             |
|     |       |     |      | iE    | 20 55 32 |      |                                             |
| 408 | " 7   | Amb | I    |       | + 22 20  |      |                                             |
| 409 | " 7   | Amb | Ir   |       | + 23 20  |      |                                             |
| 410 | " 8   | Amb | Ir   |       | + 01 00  |      | aftershock?                                 |
| 411 | " 9   | Bat | Iu   | PE    | 02 28 36 | 58.8 | in micros.                                  |
|     |       |     |      | ePN   | 02 28 37 |      |                                             |
|     |       |     |      | PZ    | 02 28 39 |      | faint.                                      |
|     |       |     |      | iSN   | 02 36 48 |      |                                             |
|     |       |     |      | SE    | 02 36 52 |      |                                             |
|     |       |     |      | eLE   | 02 50    |      |                                             |
|     |       | Med | Iu   | ePE   | 02 29 46 | 70.0 | extremely faint, minute eclipses uncertain. |
|     |       |     |      | iSE   | 02 39 02 |      |                                             |
|     |       |     |      | eLE   | 02 56    |      |                                             |
| 412 | " 9   | Amb | Iv   |       | + 12 40  |      |                                             |
| 413 | " 9   | Med | IIv  | PNE   | 17 20 24 |      | in micros.                                  |
|     |       |     |      | iN    | 17 21 16 |      |                                             |
|     |       |     |      | iE    | 17 21 37 |      |                                             |
| 414 | " 10  | Med | Iv   | iNE   | 11 05 44 |      |                                             |



|     |      |     |    |      |          |      |                                   |
|-----|------|-----|----|------|----------|------|-----------------------------------|
|     |      | Med | Iu | ePNE | 18 41 10 |      | faint.                            |
|     |      |     |    | PE   | 18 41 12 |      | faint.                            |
|     |      |     |    | NE   | 18 41 24 |      | may be P.                         |
|     |      |     |    | iN   | 18 43 58 |      |                                   |
|     |      |     |    | iN   | 18 44 27 |      |                                   |
|     |      |     |    | iNE  | 18 48 50 |      | may be S.                         |
|     |      |     |    | iS?N | 18 49 08 |      | strong.                           |
|     |      |     |    | iS?E | 18 49 58 |      | strong.                           |
|     |      |     |    | eLNE | 18 57    |      |                                   |
|     |      |     |    | LE   | 18 59    |      |                                   |
|     |      | Bat | Iu | PZNE | 18 41 33 | 55.0 | compression in micros.            |
|     |      |     |    | iPE  | 18 41 36 |      | in micros.                        |
|     |      |     |    | iSNE | 18 49 21 |      |                                   |
|     |      |     |    | eLZ  | 18 55    |      | faint.                            |
|     |      |     |    | eLN  | 18 57    |      |                                   |
|     |      |     |    | eLE  | 18 58    |      |                                   |
|     |      |     |    | LZN  | 19 04    |      |                                   |
|     |      |     |    | LE   | 19 06    |      |                                   |
| 416 | " 10 | Med | Iu | iE   | 18 58 30 |      | P?, in previous, after-<br>shock? |
|     |      |     |    | iN   | 18 58 35 |      |                                   |
|     |      |     |    | iE   | 19 00 44 |      |                                   |
|     |      |     |    | iE   | 19 06 16 |      |                                   |
|     |      |     |    | iE   | 19 08 22 |      |                                   |
|     |      |     |    | iN   | 19 08 32 |      |                                   |
|     |      | Bat | Iu | PZ   | 19 00 28 | 54.6 | in previous.                      |
|     |      |     |    | PNE  |          |      | uncertain in previous.            |
|     |      |     |    | SNE  | 19 08 14 |      |                                   |
| 417 | " 11 | Med | Iv | P?N  | 08 18 14 |      | traces.                           |
|     |      |     |    | iE   | 08 19 08 |      |                                   |
| 418 | " 12 | Med | Iv | PNE  | 03 38 07 | 4.5  | felt in Sum. Westcoast.           |
|     |      |     |    | iE   | 03 38 52 |      |                                   |
|     |      |     |    | iN   | 03 38 55 |      |                                   |
|     |      |     |    | iSNE | 03 39 04 |      |                                   |
|     |      |     |    | iN   | 03 39 23 |      |                                   |
|     |      |     |    | iE   | 03 39 30 |      |                                   |
|     |      | Bat | Iv |      |          |      | lost in micros.                   |



|     |             |     |      |      |          |     |                                                           |
|-----|-------------|-----|------|------|----------|-----|-----------------------------------------------------------|
| 418 | (continued) |     |      | SNE  | 03 41 10 |     |                                                           |
|     |             |     |      | iN   | 03 41 53 |     |                                                           |
| 419 | " 12        | Bat | Iv   | P?E  | 09 38 53 |     | faint traces, felt at<br>Talang Padang (S. Su-<br>matra). |
| 420 | " 12        | Bat | Iv   | PZE  | 21 42 40 | 0.9 |                                                           |
|     |             |     |      | SZNE | 21 42 53 |     |                                                           |
|     |             | Mal | v    | PE   | 21 43 05 |     | S?                                                        |
|     |             |     |      | iE   | 21 43 08 |     |                                                           |
|     |             |     |      | iN   | 21 43 11 |     |                                                           |
| 421 | " 13        | Mal | v    | PNE  | 06 37 13 | 1.4 |                                                           |
|     |             |     |      | iSNE | 06 37 32 |     |                                                           |
|     |             | Bat | Iv   | ePZE | 06 37 35 | 2.8 | extremely faint.                                          |
|     |             |     |      | SNE  | 06 38 11 |     |                                                           |
| 422 | " 13        | Mal | v    | iNE  | 23 01 09 |     |                                                           |
| 423 | " 14        | Mal | v    | iNE  | 22 19 36 |     | artificial disturbance?                                   |
| 424 | " 17        | Amb | Ir   |      |          |     | deep focus.                                               |
|     |             | Mal | u    | PE   | 06 32 04 |     |                                                           |
|     |             |     |      | iPN  | 06 32 07 |     |                                                           |
|     |             |     |      | eSNE | 06 40 01 |     |                                                           |
|     |             |     |      | iE   | 06 40 25 |     |                                                           |
|     |             |     |      | iE   | 06 41 41 |     |                                                           |
|     |             | Bat | IIu  | PZNE | 06 32 07 |     |                                                           |
|     |             |     |      | iPZ  | 06 32 09 |     |                                                           |
|     |             |     |      | iPN  | 06 32 11 |     |                                                           |
|     |             |     |      | iZ   | 06 32 14 |     |                                                           |
|     |             |     |      | iSNE | 06 40 07 |     |                                                           |
|     |             |     |      | eLE  | 06 58    |     |                                                           |
|     |             | Med | IIIu | ePE  | 06 33 14 |     |                                                           |
|     |             |     |      | iPE  | 06 33 18 |     |                                                           |
|     |             |     |      | iPN  | 06 33 20 |     |                                                           |
|     |             |     |      | iSE  | 06 42 20 |     |                                                           |
|     |             |     |      | iSN  | 06 42 39 |     |                                                           |
|     |             |     |      | iE   | 06 42 57 |     |                                                           |



|     |        |     |    |       |          |     |                                                         |
|-----|--------|-----|----|-------|----------|-----|---------------------------------------------------------|
| 425 | Oct 17 | Bat | I  | iE    | 09 13 41 |     |                                                         |
|     |        |     |    | iE    | 09 17 32 |     |                                                         |
|     |        |     |    | eN    | 09 17 32 |     |                                                         |
|     |        |     |    | iN    | 09 17 34 |     |                                                         |
|     |        | Med | I  | eNE   | 09 20 05 |     | traces.                                                 |
| 426 | " 17   | Bat | Iv | PNE   | 12 45 36 | 0.8 | in strong micros, felt<br>at Bajah (Lebak, W.<br>Java). |
|     |        |     |    | iSN   | 12 45 46 |     |                                                         |
|     |        | Mal | v  | iS?E  | 12 45 53 |     |                                                         |
| 427 | " 17   | Mal | v  | eNE   | 15 42 15 |     | faint traces.                                           |
|     |        |     |    | iNE   | 15 42 22 |     |                                                         |
| 428 | " 17   | Mal | v  | iNE   | 20 15 58 |     |                                                         |
| 429 | " 17   | Med | Iv | eP    | 23 40 02 |     |                                                         |
|     |        |     |    | iN    | 23 40 39 |     |                                                         |
|     |        |     |    | iE    | 23 41 45 |     |                                                         |
| 430 | " 18   | Mal | v  | eE    | 15 50 01 |     | traces.                                                 |
| 431 | " 18   | Med | Iv | iNE   | 19 29 00 |     | felt in Sum. Westcoast.                                 |
| 432 | " 20   | Med | Iv | eP?E  | 07 05 34 |     | faint traces.                                           |
| 433 | " 23   | Med | Iv | P?E   | 02 44 30 |     | dubious.                                                |
|     |        |     |    | iNE   | 02 44 58 |     |                                                         |
| 434 | " 23   | Med | Iv | ePE   | 12 01 37 |     | extremely faint.                                        |
|     |        |     |    | iN    | 12 02 15 |     |                                                         |
|     |        |     |    | iE    | 12 02 28 |     |                                                         |
|     |        |     |    | iN    | 12 02 32 |     |                                                         |
| 435 | " 23   | Mal | d  | PNE   | 19 09 20 | 0.9 | felt in Priangan (W.<br>Java).                          |
|     |        |     |    | iSNE  | 19 09 31 |     |                                                         |
|     |        | Bat | Iv | iPZNE | 19 09 37 | 1.8 |                                                         |
|     |        |     |    | SNE   | 19 10 01 |     |                                                         |



|     |             |     |     |       |          |      |                                                           |
|-----|-------------|-----|-----|-------|----------|------|-----------------------------------------------------------|
| 435 | (continued) |     |     | iN    | 19 10 32 |      |                                                           |
|     |             |     |     | iZ    | 19 10 37 |      |                                                           |
| 436 | " 24        | Med | I   | eP?E  | 09 06 36 |      | extremely faint.                                          |
|     |             | Bat | I   | iPE   | 09 07 01 |      |                                                           |
|     |             |     |     | PN    | 09 07 02 |      |                                                           |
|     |             |     |     | iN    | 09 07 59 |      |                                                           |
|     |             |     |     | iN    | 09 11.1  |      | in minute eclipse.                                        |
| 437 | " 24        | Mal | v   | iNE   | 21 38 59 |      |                                                           |
| 438 | " 28        | Med | Iv  | PNE   | 02 31 01 | 1.4  |                                                           |
|     |             |     |     | iSNE  | 02 31 19 |      |                                                           |
| 439 | " 28        | Mal | v   | iE    | 09 20 13 |      |                                                           |
| 440 | " 30        | Bat | Iu  | PNE   | 13 24 22 | 74.3 | in micros.                                                |
|     |             |     |     | iSNE  | 13 34 01 |      |                                                           |
|     |             | Med | Iu  | ePNE  | 13 25 10 | 82.7 |                                                           |
|     |             |     |     | iSE   | 13 35 31 |      |                                                           |
| 441 | " 30        | Med | IIv | eP?NE | 17 05 18 |      | uncertain in micros,<br>felt in N. Atjeh (N.<br>Sumatra). |
|     |             |     |     | PE    | 17 05 35 |      |                                                           |
|     |             |     |     | iE    | 17 06 26 |      |                                                           |
|     |             |     |     | iNE   | 17 06 41 |      |                                                           |
|     |             |     |     | iE    | 17 06 50 |      |                                                           |
| 442 | " 30        | Amb | Iv  |       | + 17 44  |      |                                                           |
|     |             | Mal |     | PNE   | 17 46    |      |                                                           |
|     |             | Bat | I   | PZ    | 17 46 49 |      |                                                           |
|     |             |     |     | PNE   | 17 46 53 |      | in micros.                                                |
|     |             |     |     | eN    | 17 48 59 |      |                                                           |
|     |             |     |     | iE    | 17 49 36 |      |                                                           |
|     |             | Med | I   | PNE   | 17 48 06 |      |                                                           |
|     |             |     |     | iE    | 17 52 35 |      |                                                           |
|     |             |     |     | eN    | 17 57 38 |      |                                                           |



|     |       |     |    |       |          |  |                                     |
|-----|-------|-----|----|-------|----------|--|-------------------------------------|
| 443 | Nov 1 | Bat | I  | PNE   |          |  | faint in micros.                    |
|     |       |     |    | iE    | 06 23 05 |  |                                     |
|     |       |     |    | eN    | 06 26 39 |  |                                     |
| 444 | " 1   | Med | Iv | iNE   | 14 22 05 |  |                                     |
| 445 | " 1   | Med | Iv | PNE   | 14 53 26 |  |                                     |
|     |       |     |    | iSNE  | 14 53 28 |  |                                     |
| 446 | " 2   | Med | Iv | P?N   | 05 08 11 |  | faint traces, felt Sum W-<br>coast. |
|     |       |     |    | iE    | 05 08 57 |  |                                     |
| 447 | " 3   | Med | Iv | P?E   | 17 31 52 |  | faint, dubious.                     |
|     |       |     |    | P?NE  | 17 32.0  |  | in minute eclipse                   |
|     |       |     |    | iE    | 17 32 27 |  |                                     |
| 448 | " 4   | Med | I  | PE    | 10 25 39 |  | faint traces.                       |
| 449 | " 4   | Bat | Iv | iE    | 10 37 06 |  | felt at Batoer (C. Java)            |
| 450 | " 7   | Bat | I  | P?Z   | 04 00 06 |  |                                     |
|     |       |     |    | iE    | 04 19 48 |  |                                     |
|     |       | Med | I  | P?NE  | 04 04 05 |  |                                     |
|     |       |     |    | eN    | 04 07 41 |  |                                     |
|     |       |     |    | iE    | 04 13 42 |  |                                     |
| 451 | " 9   | Bat | I  | P?ZNE | 09 26 23 |  | in micros.                          |
|     |       |     |    | iN    | 09 31 25 |  |                                     |
|     |       | Med | I  | P?E   | 09 28 13 |  | in strong micros.                   |
|     |       |     |    | iE    | 09 34 05 |  |                                     |
|     |       |     |    | iE    | 09 38 27 |  |                                     |
| 452 | " 9   | Bat | Ir | PZ    | 16 13 56 |  |                                     |
|     |       |     |    | iSNE  | 16 19 55 |  |                                     |
|     |       | Med | Ir | iN    | 16 17 36 |  |                                     |
|     |       |     |    | SE    | 16 21 00 |  |                                     |
|     |       |     |    | iNE   | 16 26 14 |  |                                     |
| 453 | " 10  | Bat |    | eE    | 17 08 56 |  | faint traces.                       |



|     |        |     |    |       |          |      |                                        |
|-----|--------|-----|----|-------|----------|------|----------------------------------------|
| 454 | Nov 10 | Mal | v  | eNE   | 18 04 08 |      | felt at Batoer (Java).                 |
|     |        |     |    | iNE   | 18 04 16 |      |                                        |
|     |        | Bat | Iv | eE    | 18 05 07 |      |                                        |
| 455 | " 10   | Bat | Ir | ePZE  | 20 28 37 | 41.2 | in micros.                             |
|     |        |     |    | iSN   | 20 34 57 |      |                                        |
|     |        |     |    | iE    | 20 35 41 |      |                                        |
| 456 | " 11   | Med | Iv |       | 06 30    |      | in strong micros, felt Sum. Westcoast. |
| 457 | " 12   | Bat | Iv | ePZ   | 17 25 08 |      |                                        |
|     |        |     |    | ePE   | 17 25 10 |      |                                        |
|     |        |     |    | iE    | 17 25 27 |      |                                        |
| 458 | " 17   | Bat | I  | iPZE  | 09 10 05 |      |                                        |
|     |        |     |    | eN    | 09 16 46 |      |                                        |
|     |        | Mal |    | iNE   | 09 10 06 |      | time correction uncertain.             |
|     |        |     |    | iNE   | 09 10 08 |      |                                        |
| 459 | " 17   | Bat | Iu | PZ    | 18 50 11 | 63.8 |                                        |
|     |        |     |    | iSNE  | 18 58 53 |      |                                        |
| 460 | " 18   | Med | I  | P     | 00 31    |      | uncertain in micros.                   |
|     |        | Bat | Iv | iPZNE | 00 32 23 | 3.8  | felt S. Sumatra.                       |
|     |        |     |    | SE    | 00 33 11 |      |                                        |
|     |        | Mal | v  | P?E   | 00 32 47 |      | extremely faint.                       |
|     |        |     |    | iSE   | 00 33 41 |      |                                        |
| 461 | " 18   | Med | Iu |       |          |      | no time eclipses.                      |
|     |        | Bat | Iu | PZ    | 01 44 08 | 70.4 | compression.                           |
|     |        |     |    | PNE   | 01 44 10 |      |                                        |
|     |        |     |    | SNE   | 01 53 26 |      |                                        |
| 462 | " 19   | Mal | d  | iPNE  | 17 10 46 | 0.6  |                                        |
|     |        |     |    | iSNE  | 17 10 53 |      |                                        |
|     |        | Bat | Iv | PZNE  | 17 10 58 | 1.2  | faint minute eclipses.                 |
|     |        |     |    | iSZNE | 17 11 14 |      | felt in Priangan (W.                   |



|     |        |     |      |      | h m s    | degrees |                                              |
|-----|--------|-----|------|------|----------|---------|----------------------------------------------|
| 463 | Nov 20 | Med | III  | eP?N | 06 19 39 |         | extremely faint, time correction uncertain.  |
|     |        |     |      | ePNE | 06 19 42 |         |                                              |
|     |        |     |      | iE   | 06 20 43 |         |                                              |
|     |        |     |      | iS?E | 06 21 47 |         |                                              |
|     |        |     |      | iN   | 06 22 00 |         |                                              |
|     |        | Bat | I    | NE   | 06 28    |         | traces.                                      |
| 464 | " 20   | Mal | Id   | iPNE | 19 32 17 | 0.9     | pens thrown off, felt in Priangan (W. Java). |
|     |        |     |      | iSNE | 19 32 29 |         |                                              |
|     |        | Bat | Iv   | iPZ  | 19 32 33 |         | dilatation.                                  |
| 465 | " 20   | Bat | Iv   | ZNE  | 22 37    |         | traces, felt in C. Java.                     |
| 466 | " 21   | Med | Iu   | ePE  | 09 00 05 | 70.2    |                                              |
|     |        |     |      | SE   | 09 09 22 |         |                                              |
| 467 | " 21   | Med | IIIu | PNE  | 11 09 07 | 50.3    | time correction uncertain.                   |
|     |        |     |      | iN   | 11 10 13 |         |                                              |
|     |        |     |      | iN   | 11 12 11 |         |                                              |
|     |        |     |      | iSE  | 11 16 25 |         |                                              |
|     |        | Bat | Iu   | PZ   | 11 10 45 | 62.8    | in micros.                                   |
|     |        |     |      | PNE  | 11 10 46 |         | faint in micros.                             |
|     |        |     |      | iSE  | 11 19 21 |         |                                              |
|     |        |     |      | eLZ  | 11 31    |         |                                              |
|     |        |     |      | iE   | 11 42 13 |         | another shock?                               |
|     |        | Mal | u    | eE   | 11 12 02 |         |                                              |
|     |        |     |      | eSE  | 11 19 51 |         |                                              |
|     |        |     |      | iE   | 11 20 23 |         |                                              |
| 468 | " 21   | Mal | v    | iE   | 17 37 49 |         |                                              |
| 469 | " 21   | Bat | Iv   | ePN  | 21 31 03 |         | faint traces, felt in Central Java.          |
| 470 | " 22   | Med | I    | iNE  | 19 28 14 |         | time correction uncertain.                   |



|     |        |     |      |       | h m s              | degrees |                                                            |
|-----|--------|-----|------|-------|--------------------|---------|------------------------------------------------------------|
| 471 | Nov 23 | Med | IIv  |       | <sup>+</sup> 04 01 | 2.3     | no minute eclipses,<br>felt at Tapa Toean (N.<br>Sumatra). |
| 472 | " 23   | Mal | v    | iPNE  | 07 11 15           | 1.4     | felt Priangan (W. Java).                                   |
|     |        |     |      | iSNE  | 07 11 34           |         |                                                            |
|     |        | Bat | IIIv | iPZ   | 07 11 26           | 2.5     |                                                            |
|     |        |     |      | iPN   | 07 11 27           |         |                                                            |
|     |        |     |      | iSE   | 07 12 00           |         |                                                            |
|     |        |     |      | iN    | 07 12 15           |         |                                                            |
| 473 | " 23   | Med | I    | PNE   | <sup>+</sup> 07 21 |         | faint, no minute eclipses.                                 |
| 474 | " 23   | Mal | v    | PNE   | 16 14 13           | 1.9     |                                                            |
|     |        |     |      | eN    | 16 14 34           |         |                                                            |
|     |        |     |      | iSE   | 16 14 38           |         |                                                            |
|     |        | Bat | Iv   | PZ    | 16 14 24           | 2.6     |                                                            |
|     |        |     |      | iSNE  | 16 14 58           |         |                                                            |
| 475 | " 23   | Mal | v    | iNE   | 18 33 00           |         |                                                            |
| 476 | " 23   | Mal | v    | PNE   | 21 00 51           | 0.8     | felt Priangan (W. Java).                                   |
|     |        |     |      | SNE   | 21 01 02           |         |                                                            |
| 477 | " 24   | Bat | Iu   | P?ZNE | 23 33 20           |         | extremely faint traces.                                    |
| 478 | " 25   | Bat | I    | ePNE  | 06 57 18           |         |                                                            |
|     |        |     |      | iN    | 07 01.3            |         | in minute eclipse.                                         |
| 479 | " 28   | Mal | v    | PE    | 13 18 58           |         |                                                            |
|     |        |     |      | iN    | 13 19 13           |         |                                                            |
|     |        |     |      | iE    | 13 19 17           |         |                                                            |
| 480 | " 28   | Mal | v    | iNE   | 13 26 12           |         |                                                            |
| 481 | " 28   | Mal | v    | iNE   | 16 38 13           |         |                                                            |
| 482 | " 29   | Bat | Iv   | iPZNE | 00 22 38           | 2.1     | felt at Talang Padang<br>(S. Sumatra).                     |



Nov 29

h m s

degrees

|     |                 |     |    |       |          |                                  |
|-----|-----------------|-----|----|-------|----------|----------------------------------|
| 482 | (continued)     |     |    | iSZNE | 00 23 04 |                                  |
|     |                 | Mal | v  | ePNE  | 00 22 49 | 3.1?                             |
|     |                 |     |    | S?E   | 00 23 20 |                                  |
|     | <u>December</u> |     |    |       |          |                                  |
| 483 | Dec 1           | Bat | I  |       | 06 45    | traces.                          |
| 484 | " 1             | Med | I  | iE    | 16 44 37 | traces of rather long waves.     |
|     |                 |     |    | iN    | 16 45 37 |                                  |
| 485 | " 3             | Med | I  | P?NE  | 15 44 03 | uncertain in very strong micros. |
|     |                 |     |    | iE    | 15 44 18 |                                  |
|     |                 |     |    | iE    | 15 46 20 |                                  |
| 486 | " 4             | Med | Iv | PNE   | 07 07 24 | in strong micros.                |
|     |                 |     |    | iE    | 07 07 37 |                                  |
|     |                 |     |    | iE    | 07 08 00 |                                  |
| 487 | " 5             | Bat | Iu | iPZ   | 08 50 08 | compression.                     |
|     |                 |     |    | iE    | 09 01.3  | in minute eclipse.               |
|     |                 |     |    | eLE   | 10 05    |                                  |
|     |                 | Med | Iu | PNE   | 08 50.4  | in minute eclipse.               |
|     |                 |     |    | eLNE  | 10 04    |                                  |
|     |                 |     |    | LE    | 10 11    |                                  |
|     |                 |     |    | LN    | 10 13    |                                  |
| 488 | " 8             | Bat | Iv | iPZNE | 07 04 14 | felt Priangan (W. Java).         |
|     |                 |     |    | iN    | 07 04 30 |                                  |
|     |                 |     |    | iNE   | 07 04 42 |                                  |
| 489 | " 10            | Bat | I  | PNE   | 03 40    | traces in strong micros.         |
|     |                 |     |    | P?Z   | 03 40 41 |                                  |
| 490 | " 10            | Bat | I  | iE    | 14 00 08 |                                  |
| 491 | " 12            | Bat | Iv | PZNE  | 02 44 21 |                                  |
|     |                 |     |    | iN    | 02 44 38 |                                  |
|     |                 |     |    | iE    | 02 44 42 |                                  |



|     |        |     |      |       |          | degrees |                                                                  |
|-----|--------|-----|------|-------|----------|---------|------------------------------------------------------------------|
| 492 | Dec 12 | Med | IIIv | iPNE  | 04 50 33 | 0.6     | pens thrown off, felt<br>in Atjeh and Tapandell<br>(N. Sumatra). |
|     |        |     |      | iSN   | 04 50 42 |         |                                                                  |
|     |        |     |      | iE    | 04 50 57 |         |                                                                  |
|     |        | Bat | Ir   | PZNE  |          |         | lost in micros.                                                  |
|     |        |     |      | iS?N  | 04 55 56 |         |                                                                  |
|     |        |     |      | iS?E  | 04 56 27 |         |                                                                  |
| 493 | " 13   | Bat | Iv   | PZ    | 14 23 05 | 2.3     | felt priangan (W. Java).                                         |
|     |        |     |      | iSE   | 14 23 32 |         |                                                                  |
| 494 | " 14   | Med | I    | iN    | 03 19 47 |         |                                                                  |
| 495 | " 15   | Med | Iu   | PNE   | 21 56 43 |         |                                                                  |
|     |        |     |      | iE    | 21 57 37 |         |                                                                  |
|     |        |     |      | iN    | 21 57 55 |         |                                                                  |
|     |        |     |      | iN    | 21 58 11 |         |                                                                  |
|     |        | Bat | Iu   | ePZ   | 21 56 44 |         | extremely faint.                                                 |
|     |        |     |      | iN    | 21 58 39 |         |                                                                  |
|     |        |     |      | iE    | 21 58 43 |         |                                                                  |
| 496 | " 16   | Med | Iu   | PNE   | 10 56 47 | 58.8    |                                                                  |
|     |        |     |      | iE    | 10 58 13 |         |                                                                  |
|     |        |     |      | iE    | 11 04 44 |         |                                                                  |
|     |        |     |      | SN    | 11 04 59 |         |                                                                  |
|     |        | Bat | Iu   | iPZNE | 10 56 48 | 60.3    |                                                                  |
|     |        |     |      | iSNE  | 11 05 09 |         |                                                                  |
| 497 | " 17   | Bat | Ir   | iPNE  | 07 52 35 |         | in micros, felt in<br>Flores and Timor.                          |
|     |        |     |      | iN    | 07 56 27 |         |                                                                  |
|     |        |     |      | iE    | 07 56 38 |         |                                                                  |
|     |        | Med | Ir   | ePNE  | 07 53 51 |         |                                                                  |
| 498 | " 18   | Bat | I    | ePZE  | 06 36 32 | 60.1?   | faint, uncertain in<br>micros.                                   |
|     |        |     |      | eS?E  | 06 44 52 |         |                                                                  |



|     |        |     |      |       | h m s    | degrees |                                                                                                                                                                                                                                |
|-----|--------|-----|------|-------|----------|---------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 499 | Dec 18 | Med | I    | P?N   | 10 29 48 |         |                                                                                                                                                                                                                                |
|     |        |     |      | eP?E  | 10 29 51 |         |                                                                                                                                                                                                                                |
|     |        |     |      | iE    | 10 29 55 |         |                                                                                                                                                                                                                                |
|     |        | Bat | I    | iPE   | 10 30 51 |         |                                                                                                                                                                                                                                |
|     |        |     |      | eE    | 10 37 48 |         |                                                                                                                                                                                                                                |
| 500 | " 20   | Amb | Ir   |       |          | 9.4     | iS - iP = 1 m 41 s,<br>deep focus, h = 350 km,<br>provisional epicentre<br>1.5° S 119.0° E,<br>O = 13 04 11.                                                                                                                   |
|     |        | Bat | IIr  | iPZ   | 13 07 02 | 13.0    | compression.                                                                                                                                                                                                                   |
|     |        |     |      | PNE   | 13 07 04 |         |                                                                                                                                                                                                                                |
|     |        |     |      | SZ    | 13 09 19 |         |                                                                                                                                                                                                                                |
|     |        |     |      | iSNE  | 13 09 21 |         |                                                                                                                                                                                                                                |
|     |        | Med | IIr  |       |          | 21.0    | no minute eclipses,<br>iS - iP = 3 m 29 s.                                                                                                                                                                                     |
| 501 | " 21   | Med | IIIv | iPN   | + 01 20  |         | no minute eclipses.                                                                                                                                                                                                            |
|     |        |     |      | ePNE  | 01 22.4  |         | doubtful.                                                                                                                                                                                                                      |
|     |        |     |      | P?E   | 01 23 44 |         | in micros.                                                                                                                                                                                                                     |
|     |        |     |      | P?Z   | 01 23 45 |         |                                                                                                                                                                                                                                |
|     |        |     |      | iN    | 01 23 50 |         | in micros.                                                                                                                                                                                                                     |
|     |        |     |      | iN    | 01 24 12 |         |                                                                                                                                                                                                                                |
|     |        |     |      | iNE   | 01 25 08 |         |                                                                                                                                                                                                                                |
| 502 | " 21   | Amb | IIIv |       |          | 5.2     | pens thrown off, com-<br>pression, felt in Ce-<br>lebes, Moluccas, Minda-<br>nao and Soeloe Islands,<br>destructive at Goronta-<br>lo, provisional epicen-<br>tre 0.3° S, 124.1° E,<br>O = 21 00 34, deep focus<br>h = 150 km. |
|     |        | Bat | IIIr | iPZNE | 21 04 35 | 18.2    | pens thrown off.                                                                                                                                                                                                               |
|     |        |     |      | iE    | 21 04 52 |         |                                                                                                                                                                                                                                |
|     |        |     |      | iN    | 21 06 40 |         |                                                                                                                                                                                                                                |
|     |        | Med | IIIr | iPNE  | 21 05 52 | 25.7    | pens thrown off.                                                                                                                                                                                                               |
|     |        |     |      | iNE   | 21 06 01 |         |                                                                                                                                                                                                                                |



|     |        |     |      |       |          |      |                                                                                                                                                              |
|-----|--------|-----|------|-------|----------|------|--------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 503 | Dec 22 | Amb | Iv   |       |          | 5.2  | iS - iP = 1 m 03 s,<br>aftershock 502, deep<br>focus, h = 150 km.                                                                                            |
|     |        | Bat | Ir   | PNE   | 00 55 45 | 18.2 | in strong micros.                                                                                                                                            |
|     |        |     |      | SN    | 00 59 01 |      |                                                                                                                                                              |
| 504 | " 22   | Med | Iu   | ePNE  | 05 04 07 |      | faint.                                                                                                                                                       |
|     |        |     |      | iN    | 05 13 16 |      |                                                                                                                                                              |
|     |        | Bat | Iu   | iPZNE | 05 04 19 |      | in very strong micros.                                                                                                                                       |
|     |        |     |      | iN    | 05 05 30 |      |                                                                                                                                                              |
|     |        |     |      | iE    | 05 15 54 |      |                                                                                                                                                              |
|     |        |     |      | iE    | 05 30 16 |      |                                                                                                                                                              |
|     |        |     |      | eLZ   | 06 22    |      |                                                                                                                                                              |
|     |        |     |      | eLN   | 06 24    |      |                                                                                                                                                              |
|     |        |     |      | eLE   | 06 25    |      |                                                                                                                                                              |
| 505 | " 22   | Amb | Iv   |       |          | 5.2  | S - P = 1 m 00 s,<br>aftershock 502, deep<br>focus, h = 150 km.                                                                                              |
|     |        | Bat | Ir   | ePNE  | 21 04 57 | 18.2 | dubious in micros.                                                                                                                                           |
|     |        |     |      | iE    | 21 08 18 |      |                                                                                                                                                              |
|     |        |     |      | iN    | 21 08 34 |      |                                                                                                                                                              |
|     |        | Med | Ir   |       | 21 06    | 25.7 | faint traces in strong<br>micros.                                                                                                                            |
| 506 | " 23   | Amb | Iv   |       |          | 6.8  | S - P = 1 m 15 s, felt<br>in C. Celebes and at<br>Laboeha (Batjan). Deep<br>focus, h = 350 km. Pro-<br>visional epicentre 1.7°<br>S, 121.7° E, O = 02 56 21. |
|     |        | Bat | Ir   | PNE   | 02 59 41 | 15.5 | uncertain in micros.                                                                                                                                         |
|     |        |     |      | iSN   | 03 02 22 |      |                                                                                                                                                              |
|     |        | Med | Ir   | PE    | 03 01 21 | 23.6 |                                                                                                                                                              |
|     |        |     |      | iSE   | 03 05 09 |      |                                                                                                                                                              |
| 507 | " 23   | Bat | IIIv | ePZNE | 12 18 18 |      | dilatation, felt in Java.                                                                                                                                    |
|     |        |     |      | iS?ZE | 12 19 06 |      |                                                                                                                                                              |
|     |        |     |      | iS?ZE | 12 19 18 |      |                                                                                                                                                              |
|     |        |     |      | iN    | 12 19 37 |      |                                                                                                                                                              |



|     |        |     |     |      | h m s    | degrees |                                                                                                                |
|-----|--------|-----|-----|------|----------|---------|----------------------------------------------------------------------------------------------------------------|
| 508 | Dec 23 | Amb | Iv  |      | 21 05    | 5.2     | S - P = 1 m 00 s, after-shock 502, felt at Laboeha (Batjan) and Gorontalo (N. Celebes). Deep focus h = 150 km. |
| 509 | " 23   | Med | Iv  | iNE  | 22 02 16 |         |                                                                                                                |
| 510 | " 25   | Amb | Ir  |      |          | 19.4    | S - P = 3 m 39 s                                                                                               |
|     |        | Bat | Ir  | ePZ  | 16 32 33 |         | uncertain in micros.                                                                                           |
|     |        |     |     | iE   | 16 34 30 |         |                                                                                                                |
|     |        |     |     | iSE  | 16 39 10 |         |                                                                                                                |
|     |        | Med | Ir  | PE   | 16 34 23 | 48.0    |                                                                                                                |
|     |        |     |     | iSN  | 16 41 27 |         |                                                                                                                |
| 511 | " 25   | Amb | Iv  |      |          |         | S - P = 59 s, felt at Malili (C. Celebes) and Laboeha (Batjan). Shock near No. 502. Deep focus.                |
|     |        | Bat | Ir  | PZ   | 21 00 10 |         | in micros.                                                                                                     |
|     |        |     |     | PE   | 21 00 15 |         | faint.                                                                                                         |
|     |        |     |     | iE   | 21 00 55 |         |                                                                                                                |
|     |        |     |     | iSE  | 21 03 41 |         |                                                                                                                |
|     |        | Med | Ir  | PE   | 21 01 21 |         | dubious in strong micros.                                                                                      |
|     |        |     |     | iSNE | 21 05 41 |         |                                                                                                                |
| 512 | " 25   | Amb | Iv  |      |          | 4.6     | S - P = 1 m 00 s.                                                                                              |
|     |        | Bat | Ir  | PE   | 22 27 39 | 25.7    | in micros.                                                                                                     |
|     |        |     |     | iE   | 22 29 00 |         |                                                                                                                |
|     |        |     |     | iSE  | 22 32 12 |         |                                                                                                                |
|     |        | Med | Ir  | PNE  |          |         | doubtful in micros.                                                                                            |
|     |        |     |     | iN   | 22 32 35 |         |                                                                                                                |
|     |        |     |     | iE   | 22 33 28 |         |                                                                                                                |
| 513 | " 27   | Med | IIu | PNE  | 00 08 05 |         |                                                                                                                |
|     |        |     |     | iN   | 00 08 42 |         |                                                                                                                |
|     |        |     |     | iN   | 00 08 51 |         |                                                                                                                |
|     |        |     |     | iN   | 00 14 21 |         |                                                                                                                |
|     |        |     |     | iE   | 00 14 27 |         |                                                                                                                |



|     |             |     |     |      |          |      |                    |
|-----|-------------|-----|-----|------|----------|------|--------------------|
| 513 | (continued) |     |     | eLNE | 00 32    |      |                    |
|     |             | Bat | IIu | iPZ  | 00 09 12 |      | in strong micros   |
|     |             |     |     | ePNE | 00 09 16 |      |                    |
|     |             |     |     | iN   | 00 19 34 |      |                    |
|     |             |     |     | iZ   | 00 20 14 |      |                    |
|     |             |     |     | iZ   | 00 20 34 |      |                    |
|     |             |     |     | eLZ  | 00 29    |      |                    |
|     |             |     |     | eLE  | 00 32    |      |                    |
|     |             |     |     | LN   | 00 36    |      |                    |
|     |             |     |     | LZE  | 00 37    |      |                    |
| 514 | " 27        | Bat | Ir  | PE   | 03 08 30 | 29.8 |                    |
|     |             |     |     | iE   | 03 10 08 |      |                    |
|     |             |     |     | iSE  | 03 13 34 |      |                    |
|     |             | Med | Ir  | PE   | 03 09 51 | 37.9 |                    |
|     |             |     |     | iN   | 03 10 13 |      |                    |
|     |             |     |     | iE   | 03 12 15 |      |                    |
|     |             |     |     | iN   | 03 12 21 |      |                    |
|     |             |     |     | iSNE | 03 15 53 |      |                    |
| 515 | " 28        | Med | I   | NE   | 00 08    |      | traces.            |
|     |             | Bat | I   | PNE  |          |      | doubtful in micros |
|     |             |     |     | iE   | 00 08 38 |      |                    |
|     |             |     |     | iE   | 00 11 31 |      |                    |
| 516 | " 29        | Med | I   | P?E  | 00 35 32 |      |                    |
| 517 | " 29        | Med | I   | iNE  | 07 25 19 |      |                    |
| 518 | " 31        | Amb | Iv  |      | + 03     |      |                    |



B A T A V I A .

|          | EW Component |                |            | NS Component |                |            | Z Component |                |            |
|----------|--------------|----------------|------------|--------------|----------------|------------|-------------|----------------|------------|
|          | V            | T <sub>0</sub> | $\epsilon$ | V            | T <sub>0</sub> | $\epsilon$ | V           | T <sub>0</sub> | $\epsilon$ |
| October  | 226          | 7.3            | 3.4        | 203          | 7.4            | 3.5        | 300         | 4.4            | 3.1        |
| November | 226          | 7.3            | 3.4        | 203          | 7.4            | 3.4        | 300         | 4.4            | 3.1        |
| December | 226          | 7.3            | 3.5        | 203          | 7.4            | 3.4        | 300         | 4.4            | 3.0        |

  

|          | EW Component   |      | NS Component   |      | Z Component    |      |
|----------|----------------|------|----------------|------|----------------|------|
|          | e <sub>0</sub> | r    | e <sub>0</sub> | r    | e <sub>0</sub> | r    |
| October  | 1.08           | 0.60 | 1.08           | 0.40 | 1.15           | 0.41 |
| November | 1.09           | 0.62 | 1.10           | 0.40 | 1.14           | 0.35 |
| December | 1.09           | 0.70 | 1.09           | 0.38 | 1.13           | 0.52 |

M E D A N .

| EW Component |                |            |                |      | NS Component |                |            |                |      |
|--------------|----------------|------------|----------------|------|--------------|----------------|------------|----------------|------|
| V            | T <sub>0</sub> | $\epsilon$ | e <sub>0</sub> | r    | V            | T <sub>0</sub> | $\epsilon$ | e <sub>0</sub> | r    |
| 231          | 5.8            | 4.7        | 1.09           | 0.95 | 249          | 5.6            | 4.0        | 1.11           | 1.37 |

Batavia 16 - 7 1940.