NATIONAL OBSERVATORY OF ATHENS

Nº 14

SEISMOLOGICAL INSTITUTE

BULLETIN

1963

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INTRODUCTION

Station site: The geographic coordinates of the seismographic station in Athens are: 37°58'22" N and 23°43'0 E. The instruments are standing 95 m above mean-sea-level on Cretaceous limestone.

Instruments: All the seismographs which were in operation in 1962 were also in operation in 1963.

On April 1963 a Wiechert vertical seismograph was installed in Patras. The geographic coordinates of the seismographic station in Patras are: 38°14'11" N, 21°44'48" E. The instrument is standing 45 m above mean-sea-level on Alluvium.

The mean constants of all the instruments which were in operation in 1963 are in the following table:

Type of Instruments	Period		Magnification		Damping ratio	Mass Kgr	Drum speed mm/min.
	Ts sec.	Tg sec.	at Ts	Static			
Wiechert (Z comp.)	1.6			208	1.3	1300	29±0.5
" (N-S comp.)	4.2			142	4.4	1000	30.5±0.5
" (E-W comp.)	4.8			165	4.3	1000	30.5±0.5
Mainka (N-S comp.)	3.1			56	2.8	135	30 - 32
" (E-W comp.)	3.5			54	5.7	135	30 - 32
Kritikos (N-S comp.)	2.1			4	4.4	40	38 - 42
Wiechert (Z comp.) (Patras)	3.3			64	3.6	80	31 - 32
Benieff (Z comp.)	1	0.25	10000			100	60
Benioff (Z comp.)	1	0.76	12500			107.5	60
" (N-S comp.)	1	0.77	12500			107.5	60
" (E-W comp.)	1	0.74	12500			107.5	60
Sprengnether (Z comp.)	30	100	1500			11.2	30
" (N-S comp.)	30	100	1500			10.75	30
" (E-W comp.)	30	100	1500			10.75	30

Presentation of Data: All times are Greenwich Mean Time, from midnight till midnight. The time is controlled by a Mercer vertical type Chronometer for the seismographs with mechanical recording and by the timing system of the standardized station for the seismographs with optical recording. The chronometers are compared daily with signals from Pontoise or Moscow radio station. The time signal is automatically recorded on the records of the seismographs with optical recording.

Symbols and abbreviations are the very known ones.

The distance of epicenter of the shallow shocks has been calculated by means of curves based on the time tables of H. JEFFREYS and K.E.BULLEN 1948, and that of deep shocks by means of the "Chart of Depth, Time and Distance for deep focus Eartquakes" by G.J. BRUNNER, S.J., Saint Louis University 1935. The epicentral distances of near shallow shocks ($\Delta < 500$ km) were calculated by means of curves constructed by B.PAPAZACHOS, P. COMNINAKIS and J. DRAKOPOULOS (1966).

The maxima Amplitudes measured from the medium line have been calculated in cases of strong short-distance shocks by means of the formula

$$W = \frac{V}{\sqrt{\left[1 - \left(\frac{T}{T_o}\right)^2\right]^2 + 4\left(\frac{T_o}{2\pi\tau}\right)^2 \left(\frac{\tau}{T_o}\right)^2}} .$$

The amplitudes have been omitted when the oscillations were too irregular.

The first part of the Bulletin contains readings of main impulses of distant shocks. Additional readings are given when possible. Data under heading remarks refer to the locations after U S C G S and B C I S. The magnitude is given ordinarily according to Pasadena, Uppsala and U S C G S. Readings of local and short distance shocks are given separately in the second part. The readings from the station of Patras are denoted by an asterisk. The third section consists of two tables, one with the shocks felt in the area of Greece which have not been recorded and another table with the localities

and the assigned intensities of the felt shocks.

On the annexed map there are plotted the epicenters of near shocks located by BCIS, and the corresponding area of highest intensity according to the reports of felt shaking. Intensities are given on Mercalli-Sieberg scale. In case of two near epicenters the strongly shaken area of the major earthquake and the region of the reported highest intensity of the minor shock are given.

Epicenters marked in by + denote an initial compression in Athens and by - an initial delatation, In doubtful cases the symbols of the epicenters are not marked. Epicenters of probably deep shocksare marked by a triangle circumscribed. The date of the shocks are noted close to the symbols of the epicenters. The arabic figures below the symbols indicate the magnitude of the shocks derived to nearest tenth by means of the calibration formula:

$$M = 1.42 \log \Delta + 1.04 \log A + 0.20 .$$

In case of lack of maximum amplitude of the horizontal ground motion in Athens the magnitude was approximately estimated from the number of stations, N, and the distances out to which the direct waves were recorded, R, as entered in the Bulletin of the BCIS, by means of the empirical formula:

$$M = 1.7 \log N + \log R.$$

Macroseismic magnitudes were computed from the epicentral intensity, Io, and the radius of the area of perceptibility, r, or the shaken area, A, by means of the calibration formula:

$$M = 1.381 \log Ior^2 - 1.63$$

or the equivalent:

$$M = 1.385 \log A\, Io - 2.315$$

set up by the author.

Assuming that the highest intensity of surface shocks occurs at epicentral distance equal to the depth of the focus

the focal depth, h, was determined from the maximum intensity Io, and the mean radius of the area over which the shock was felt, r, by means of the formula:

$$\frac{h}{r} = 1.47^{\,Io - 1.5}.$$

The focal depths found by this formula are in a good agreement with those determined by the relative formula derived in 1942 by B.Gutenberg and C.Richter.

One diagram and two maps show, respectively, the earthquake energy released per month, the distribution of the epicentres, as well as the strain release pattern, in the area of Greece in 1963.

Chronological Summary:

From the numerous seismic disturbances occurred in the area of Greece during the year 1963, 110 shocks were strong enough to be located by BCIS or USCGS. The shocks came from 101 foci; 11 of them were of intermediate focal depth. Of the 101 foci located in 1963, 41 foci released shocks of magnitude 4.7 or higher, and 39 of them were active for first time. Thus the total number of earthquake foci which released shocks of magnitude $\geqslant$ 4.7 in the area of Greece during the period 1710-1963 were 778.

Damage of VI to VII+ degree on Mercalli-Sieberg scale caused by 6 shocks were reported during the year 1963. The most severe of the damaging shocks was the shallow earthquake of 19 April or Crete Island (35°1 N, 25°2 E). The shock was assigned an instrumental magnitude 4.4. and a macroseismic magnitude 4.7.

Damages of VI degree were reported from Heraklion, Preveza, Leucas, Skiathos and Jannina, afflicted by shocks which occurred, respectively, on March 4 (35°2 N 25°3 E), March 17 (39°4 N 21°0 E), June 4 (38°9 N 20°6 E), July 10 (39°1 N 23°5 E) and July 13 (39°6 N 20°8 E).

In the western centre of higher strain energy release being permanent between Cephalonia and Zante the tectonic flux,

in spite of a 6 magnitude shock on December 16, 1963 (37°.3 N, 20°9 E), hardly surpassed the annual average found for the region. However, the occurrence of 6 shocks of magnitude 5 1/4 - 5 1/2 on February 15 and 22 (40°2 N, 20°1E; 40°4 N, 20°4E), on March 17 (39°4 N, 21°.0 E) on May 6 (39°1 N, 20°.7 E), on June 4 (38°.9 N, 20°6 E) and on November 3 (38°9 N, 21°1 E) resulted to a broadening of the central core in the N - S direction. The Skopje shock of July 26 (42°.1 N, 21°.5 E) centered in the southern side of the fault basin of the Vardar river (Vardar-Graben) shifted the secondary centre of high strain energy release, which the Northern Epirus, entertains semi-permanently to the NE. The tectonic flux in the centre hardly surpassed the annual average maximum level of strain energy release found for Northen Epirus.

The southeastern centre of higher strain energy release split up into two broad centres with a tectonic flux almost half the annual average found for the southern Aegean Sea. The western centre which covers the eastern and central Crete and extends northwards up to Santorin and Astypalaea has been developed by a 5 1/2 magnitude shock on March 4 (35°2N, 25°3 E). The eastern centre which covers the area of Rhodes and the southern part of Asia Minor has been developed by a 5 3/4 magnitude shock on March 11 (38°0N, 29°2E) and a minor shock of magnitude 5 1/4 on July 8 (36°6N, 27°9E).

Finally, a 6 1/4 magnitude shock in the eastern side of the Marmara Sea (40°8 N, 29°1 E) broadened the transient centre of Northern Anatolia developed in 1962, and shifted it to the NE. The tectonic flux remained almost at the same level, i.e. reached a level about 3 times higher than the annual average found for the region. The Northen Aegean Sea remained almost inert in 1963.

Acknowledgements

Credit is due to the assistant of the Seismological Institute Mr. P.Comninakis for the reinterpretation of the seismic data, the preparing of the tables of felt shocks not recorded and of the intensities of the shocks felt in Greece, for the diagram of the earthquake energy release per month and

the reading of the proofs. The map of the strain release pattern in 1963 has been elaborated by the assistant Mr. N.Delibasis.

March 30, 1967

Prof. Dr. A.G. Galanopoulos
Director of the Institute.

A. LONG DISTANCE SHOCKS.

Date	Phase	Time	Additional Readings and Remarks.
Jan. 1	eSS	20 06 36	Traces. Δ=10,330 km. ~ 93 dg. Indian Ocean, 40°.2 S, 81°.3 E.- H=19:35:55.1; h about 33 km. (USCGS).
1	eiP	23 51 41 CS	Very weak. Δ=9,460 km. ~ 85.1 dg.
	eiS	00 02 06	Alaska Peninsula, 56°.6 N, 157°.7 W. H=23:39:05.6; h about 50 km. (USCGS). M=6 1/2 (Pasadena, Kew).
2	ePP	15 15 08	Traces. Δ=12,110 km. ~ 109 dg.
	e(SKS)	21 18	Near south coast of western New Guinea, 4°.1 S, 135°.2 E.- H=14:56: 05.4; h about 33 km. (USCGS). M= 5 1/2 (Peking).
3	eP	03 17 28	Traces. Δ=9,280 km. ~ 83.5 dg.
	eSKS	27 54	Ryukyu Islands, 29°.7 N, 130°.1 E.- H=03:05:03.5; h about 33 km. (USCGS). M=5 1/2 (Moscow,Peking).
4	eP	00 33 59	Traces. Δ=6,610 km.~ 59.5 dg. 1500 km. south of Cape Verde Islands, 1°.2 N, 27°.7 W.- H=00:23: 55.1; h about 33 km. (USCGS). M= 5.3 (Tulsa).
4	ePP	05 59 20	Traces. Δ=10,110 km. ~91 dg. Bonin Islands region. 29°.7 N, 142°.2 E.- H=05:42:35.3; h about 33 km. (USCGS). M=5 (Peking,Moscow).
5	ePKP	13 24 20	Traces. Δ=15,890 km. ~ 143 dg.
	ePP	27 34	New Hebrides Islands 17°.8 S,
	e(SKS)	31 34	167°.9 E.- H=13:04:48.1; h about

Date	Phase	Time		Assitional Readings and Remarks.
Jan.				
5	ePS	38 12		33 km. (USCGS). M=5-5 1/4 (Port Moresby).
6	e(P)	21 33 28		Traces. Δ=9,390 km.~ 84.5 dg. Kurile Islands, 47°.4 N, 155°.9 E.- H=21:20:56.5; h about 33 km. (USCGS). M=6.1 (Uppsala, Kiruna).
7	eSKS	12 12 35		Traces. Δ=11,055 km. ~99.5 dg. Halmahera region, 0°.6 N, 126°.7 E.- H=11:48:22.7; h about 42 km.(USCGS). M=5 1/2-5 3/4 (Palisades).
9	e(P)	18 30 16		Traces. Δ=4,560 km. ~41 dg. Republic of the Congo, 3°.3 S, 29°.4 E.- H=18:22:33.4, h about 33 km. (USCGS). M=5 1/4 (Moscow, Iwiro).
	eS	36 30		
11	ePP	12 32 39		Traces. Δ=13,445 km. ~ 121 dg. Near coast of southern Chile 45°.0 S, 75°.7 W.- H=12:12:16.2; h about 33 km (USCGS). M=6.1 (Uppsala,Kiruna).
12	e	01 21.0		Traces.
14	eiPKP$_1$	11 39 26	C	Traces. Δ=16,230 km. ~ 146 dg. Loyalty Islands, 21°.2 S, 169°.3 E.- H=11:19:47.5; h about 33 km. (USCGS). M=5.5 (Tulsa).
	eiPKP$_2$	30	D	
14	eiP	18 35 19	C	Traces. Δ=890 km.~ 8 dg. Rumania, 46°.0 N, 26°.8 E.- H=18:33:24; h about 100 km. (BCIS). M=5.3 (Uppsala).
	e S	36 49		
15	ePP	01 41 14		Traces. Δ=4,230 km.~ 38 dg. Denmark Strait, 68°.9 N, 17°.1 W.- H=01:32:20; h about 33 km.(USCGS) M=5 (Palisades).
	eS	45 32		
	eiSS	48 14		

Date	Phase	Time		Additional Readings and Remarks.
Jan.				
15	ePPS	03 01 24		Traces. Δ=11,670 km. ~105 dg. Mariana Islands, 13°.4 N, 145°.3 E.- H=02:32:39.9; h about 38 km.(USCGS) M=5 (Moscow).
15	eS	05 36 21		Traces. Δ=4,335 km.~ 39 dg. Jan Mayen Island region, 69°.5 N, 17°.5 W.- H=05:23:00 (BCIS). M=5.3 (Uppsala).
15	ePKP	19 45 28		i. 45:37 C. Traces. Δ=17,160 km. ~154.5 dg. Fiji Islands 20°.5 S, 177°.9 W.- H=19:26:34.3; h about 496 km. (USCGS). M=5.8 (Wichita Mountains).
15	eS	22 39 29		Traces. Δ=8,560 km. ~77 dg.South Atlantic Ocean, 31°.3 S, 13°.4 W.- M=22:17:50.9; h about 33 km. (USCGS). M=5.7 (Roma).
	eSS	44 43		
16	e(SSS)	12 50 55		Traces. Δ=4,720 km. ~42.5 dg. 1300 km Southwest of Iceland 54°.4 N, 35°.0 W.- H=12:32:37.6; h about 33 km. (USCGS). M=4.9 (Tulsa, Wichita M).
25	eiPKP	00 35 28	D	Traces. Δ=16,280 km. ~ 46.5 dg. Loyalty Islands region 20°.3 S, 169°.6 E.- H=00:16:05.7; h about 135 km. (USCGS). M=6 1/2 (Nouméa).
27	e P	01 19 30		Traces. Δ=9,440 km.~ 85 dg. Ryukyu Islands, 25°.6 N, 128°.3 E.- H=01:06:55.4; h about 61 km. (USCGS).M=5 (Moscow).
	e S	29 54		
27	eiP	19 39 49	D	Very Weak. Δ=2,280 km. ~ 20.5 dg. Caspian Sea near Azerbaijan SSR, 41°.2 N, 49°.8 E.- H=19:35:14.3;
	eiS	43 29		

Date	Phase	Time		Additional Readings and Remarks.
Jan. 27				h about 33 km. (USCGS). M=6.1 (Uppsala, Kiruna).
28	e	04 44.0		Traces. Δ= 9,170 km.~ 82.5 dg. Near South coast of Hokkaido, Japan 43°.5 N, 144°.6 E.- H=04:05:30.9; h about 33 km. (USCGS). M=5.6 (Uppsala, Kiruna).
28	ePP	12 32 23		Traces. Δ=13,000 km. ~ 117 dg. New Britain 2°.6 S, 149°.9 E.- H=12:12:19.8; h about 33 km. (USCGS). M=6 1/2 (Pasadena).
28	eiP	13 13 37	D	Very weak. Δ=9,720 dg ~ 87.5 km. Alaska Peninsula 54°.7 N, 161°.6 E.- H=13:00:50.7, h about 33 km. (USCGS). M=6.5 (Pasadena, Matsushiro, Kew).
29	eiP	09 33 24	CSW	Traces. Δ=9,165 km. ~ 82.5 dg. Kurile Islands 49°.7 N, 154°.9 E.- H=09:21:14.3; h about 126 km. (USCGS). M=6.25 (Pasadena).
30	e P	10 24 04	D	Very weak. Δ=11,500 km. ~ 103.5 dg. Sandwich Islands region 55°.6 S, 28°.3 W.- H=10:10:04.1; h about 33 km. (USCGS). M=6 1/2 (Lhasa, Pasadena).
31	eiP eiPP	05 19 06 22 20	D	Traces. Δ=9,165 km.~ 82.5 dg. Ryukyu Islands 27°.9 N, 126°.3 E.- H=05:06:46.0; h about 33 km. (USCGS). M=6.75 (Kew).
31	e P	17 10 39	C	Traces Δ=2,280 km. ~ 20.5 dg. Turkmen S.S.R. 41°.4 N, 50°.2 E.- H=17:06:04.4; h about 33 km. (USCGS). M=5.4 (Wichita M).

Date Feb.	Phase	Time	Additional Readings and Remarks.
4	e P	23 33 29.50	Traces. Δ=9,335 km ~ 84 dg. Kurile Islands 48°.5 N, 154°.9 E.- H=23:21:09.0; h about 85 km. (USCGS). M=5.2 (Tulsa).
5	eiPP eiPS	20 59 16 E 21 08 55 C	e 59:07 D. Very weak, Δ=13,000 km. ~ 117 dg. Near coast of central Chile 38°.4 S, 73°.2 W.- H=20:39:21.6; h about 41 km. (USCGS). M=6 1/4-6 1/2 (Pasadena).
6	e PP ei(PS)	01 41 24 C 51 10	Traces. Δ =13,055 km.~ 117.5 dg. Near coast of central Chile 38°.4 S, 73°.6 W.- H=01:21:19.0; h about 33 km. (USCGS). M=6.2 (Uppsala).
6	ePP	10 40 24	Traces. Δ=13,000 km. ~ 117 dg. Bismarck Sea 3°.5 S, 146°.0 E.- H=10:20:25.5; h about 33 km. (USCGS). M=5 3/4-6 (Matsushiro).
6	eiPkP	13 06 02 C	Traces. Δ =16,445 km. ~ 148 dg. Loyalty Islands region 22°.2 S, 171°.3 E.- H=12:46:26.7; h about 101 km. (USCGS).
6	e P	18 29 25	Traces. Δ =9,000 km. ~ 81 dg. Komandorskie Islands region 55°.6 N, 166°.1 E.- H=18:17:10.9; h about 33 km. (USCGS). M=5 1/4-5 1/2 (Matshushiro).
9	e	04 41.5	Traces. Δ =9,335 km. ~ 84 dg. Central Honshu, Japan 36°.4 N, 137°.9 E.- H=03:53:06.1; h about 33 km. (USCGS). M=5.4 (Matsushiro).
9	e	17 28.1	Traces. Δ =17,165 km. ~ 154.5 dg. South of Fiji Islands 24°.0 S, 179°.1 E.- H=17:07:59.2; h about 550 km. (USCGS). M=5.0 (Wellington).
12	e S	04 51 04	Traces. Δ =780 km. ~ 7 dg. Italy 41°3/4 N, 15°3/4 E.- H=04:47:58 (BCIS).

Date	Phase	Time		Additional Readings and Remarks.
Feb.				
12	eiPkP	23 26 19	C	Traces. Δ=16,835 km. ~ 151.5 dg. Fiji Islands 17°8 S, 178°6 W.- H=23:07:28.9. h about 583 km. (USCGS). M=5.2 (College).
13	e P	01 42 09		Traces. Δ =4,280 km. ~ 38.5 dg. Arabian Sea 13°0 N, 57°9 E.- H=01:34:40.4; h about 33 km. (USCGS). M=4 1/2-5 (Moscow).
	ePP	43 48		
	e S	48 08		
13	e P	09 02 16	C	Very weak. Δ =9,000 km.~ 81 dg. Northern Formosa 24°5 N, 121°8 E.- H=08:50:02.2; h about 33 km. (USCGS). M=7 1/4 (Pasadena, Moscow, Berkeley).
	iSkS	12 40		
13	e Pn	12 56 44.8		Traces. Δ=730 km. ~ 6.6 dg. South Italy 40°5 N, 15°8 E.- H=12:45: 10 (BCIS). M=6.2 (Uppsala).
	eiPb	55.0	E	
	e Sn	47 58.3		
13	ePkP	18 33 06	D	Very weak. Δ=14,720 km.~ 132.5 dg. Solomon Islands 9°9 S, 160°8 E.- H=18:13:55.1; h about 29 km. (USCGS). M=6 1/2 (Pasadena).
	eiPP	35 30	D	
	eiPkS	36 39		
	ei(PPS)	47 37		
	eiSS	53 06		
14	e P	12 19 20	C	Traces. Δ=6,720 km. ~ 60.5 dg. Mid-Atlantic Ocean 0°9 N, 30°0W.- H=12:09:11.4; h about 33 km. (USCGS). M=6.5 (Matsushiro).
	eiPS	27 54		
14	e P	13 21 08	D	Traces. Δ=1,000 km.~ 9 dg. Near coast of Yugoslavia 44°1 N, 15°1 E.- H=13:18:56 (BCIS). M=5.4 (USCGS, Stuttgart).
	eiS	22 45		
14	ePP	22 28 00		Traces. Δ=13,000 km.~ 117 km. Eastern New Guinea 5°0 S, 144°6 E.- H=22:07:54.3; h about 80 km. (USCGS). M=6.5 (Pasadena).

Date	Phase	Time		Additional Readings and Remarks.
Feb.				
17	eiS	20 15 25		Traces. Δ=850 km. ~ 7.7 dg. Yugoslavia 43°8 N, 17°2 E. -20:12:12 (BCIS). M=4.5 (College).
18	e	19 23.0		Traces. Δ=4,555 km. ~ 41 dg. North Atlantic Ocean 57°9 N, 32°2 W.- H=19:03:01; h about 33 km.(USCGS).
19	eSS	17 12 15		Traces. Δ=11,445 km. ~ 103 dg. Sandwich Islands region 55°3 S. 28°8 W.- H=16:39:15.1; h about 33 km. (USCGS).
20	eSS	17 45 00		Traces. Δ=13,720 km. ~ 123.5 dg. Off coast of southern Chile 45°7 S, 78°7 W.- H=17:07:33.5; h about 33 km. (USCGS). M=5 3/4-6 (Matsushiro).
21	ePP	14 52 36		Traces. Δ=17,445 km.~ 157 dg. Tonga Islands region 20°5 S, 173°9 W.- H=14:28:29; h about 29 km. (USCGS). M=5.5 (Matsuchiro).
21	ePn	17 15 56.1	D	e?15:55, ei 17:01 An=6μ, Tn=2.7 sec. Ae=3μ, Te=2.3 sec. Δ=630 km.~ 5.7 dg. M=5 (Athens). Near coast of Libya 32°6 N, 21°0 E.- H=17:14:29 (BCIS). M=5.6 (Kew, Uppsala, Kiruna, Tulsa).
	eiSn	16 59.6		
21	ePn	18 34 27.6	C	ei 35:32.Traces. Δ=595 km.~ 5.4 dg. Near coast of Libya 32°9 N, 21°1 E.- H=18:33:06.8; h about 33 km. (USCGS). M=4.5 (USCGS , College).
	eSn	35 28.0		
21	ePn	20 28 05.7	DS	ei 29:12.Weak. Δ=635 km.~ 5.7 dg. Near coast of Libya 32°6 N, 21°0 E.- H=20:26:38 (BCIS). M=4.7 (Kew).
	eiSn	29 10.2		

Date	Phase	Time	Additional Readings and Remarks.
Feb.			
22	ePn	02 48 44.6	ei 49:48.Traces. Δ=600 km. ~ 5.4 dg. Near coast of Libya 32°.9 N, 21°.1 E.- H=02:47:21.6; h about 33 km. (USCGS). M=4.1 (College).
	ePb	52.8	
	eiSn	49 46.0	
22	e P	07 19 29	Traces. Δ=5,670 km. ~ 51 dg. North Polar region 85°.0 N, 98°.9 E.- H=07:10:28.0; h about 33 km. (USCGS). M=5 1/2 (Moscow, Matsushiro).
24	e	14 21.0	Traces. Δ=11,055 km. ~ 99.5 dg. Central Guatemala 14°.6 N, 91°.4 W.- H=13:34:15.7; h about 135 km. (USCGS). M=5.9 (Uppsala, Kiruna).
25	eiP	17 23 21 D	Traces. Δ=9,110 km.~ 82 dg. Near east coast of Formosa 24°.4 N, 123°.4 E.- H=17:11:01.7; h about 33 km. (USCGS). M=5.5-5 3/4 (Matsushiro).
26	eiP	20 29 03 C	Very weak. Δ=13,280 km.~ 119.5 dg. Eastern New Guinea 7°.5 S, 146°.2 E.- H=20:14:08.7; h about 171 km. (USCGS). M=7 1/2 (Pasadena).
	eipPkP	33 19 D	
	eisS	42.53	
27	e P	04 45 08	Traces. Δ=13,445 km. ~ 121 dg. New Britain region 6°.0S, 149°.4 E.- H=04:30:00.8; h about 52 km. (USCGS). 6 1/4 (Pasadena).
	eiPP	50 33 W	
	eiPS	05 00 12	
28	e S	01 50 50	Traces. Δ=7,445 km.~ 67 dg. Indian Ocean 16°.3 S, 66°.0 E.- H=01:31:13.2; h about 33 km. (USCGS). M=6.0 (Tulsa).
March			
1	e P	19 24 31 D	Traces. Δ=6,835 km.~ 61.5 dg. Atlantic Ocean 1°.4 N, 29°.6 W.- H=19:14:13.1; h about 33 km.(USCGS). M=5 3/4-6 (Matsushiro).
	eiS	32 47	

Date	Phase	Time	Additional Readings and Remarks.
March			
2	e	09 57 03	Traces. Δ=9,390 km.~ 84.5 dg. Kurile Islands region 46°.1 N,153°.1 E.- H=09:25:55.0; h about 33 km. (USCGS). M=5.4 (Uppsala).
4	e S	14 01 04	Traces. Δ=9,060 km.~ 81.5 dg. Formosa 24°.2 N, 121°.7 E.- H=13:38:41.0. h about 33 km. (USCGS). M=6.4 (Uppsala).
4	ePkP	19 22 35 C	Traces. Δ=16,110 km. ~ 145 dg. New Hebrides Islands region 19°.3S, 169°.5 E.- H=19.04:02.5; h about 43 km. (USCGS). M=4.8 (Eureka).
7	eiPkP	05 41 32 D	Traces. Δ=15,835 km.~ 142.5 dg. Approximately 500 km. west of Easter Island 27°.0 S, 113°.5 W.- H=05:22:01.1; h about 33 km. (USCGS). M=6 3/4 (Pasadena).
7	eiPP	12 36 49 D	Traces. Δ=13,445 km.~ 121 dg. Near coast of southern Chile 44°.3 S, 75°.3 W.- H=12:16:28.5; h about 45 km. (USCGS). M=6.3 (Uppsala).
7	e P	21 56 32 C	Traces. Δ=4,170 km.~ 37.5 dg. Hindu kush 36°.1 N, 71°.2 E.- H=21:49:32.6; h about 202 km. (USCGS). M=5.3 (Quetta).
8	ePkP	03 04 05 D	ei 04:06 C. Traces. Δ=16,110 km.~ 145 dg. New Hebrides Islands 19°.2 S, 169°.7 E.- H=02:44:31.5; h about 33 km. (USCGS). M=5 1/4 (Matsushiro).
8	eiPkP	03 44 29 C	Traces. Δ=16,110 km.~ 145 dg. New Hebrides Islands 19°.2 S, 169°.6 E.- H=03:24:57.2; h about 49 km. M=4.8 (USCGS).

Date	Phase	Time	Additional Readings and Remarks.
March.			
8	eiPkP	03 52 37 D	Traces. Δ=16,000 km.~ 144 dg. New Hebrides Islands 19°3 S,169°.6 E.- H=03:33:03.4; h about 33 km. (USCGS). M=5.8 (Tulsa).
8	eSS	12 37 51	Traces. Δ=940 km.~ 85 dg. Central Italy about 41°7 N, 13°.6 E.- H=12: 34.0 (BCIS).
8	e P	15 16 17	Traces. Δ=6,780 km.~ 61 dg. Mid-Atlantic Ocean 1°1 N, 29°9 W.- H=15:06:05:3; h about 33 km. (USCGS). M=5.2 (USCGS, Eureka).
8	eiPkP	16 24 24 D	Traces. Δ=16,280 km. ~ 146.5 dg. Loyalty Islands region 21°3 S, 170°2 E.- H=16:04:54.0; h=108 km. M=5.0 (USCGS).
9	e P e(S)	02 24 45 26 22	Traces. Δ=4,060 km. ~ 36.5 dg. Arabian Sea 21°9 N, 62°.0 E.- H=02: 17:39.5; h about 33 km. (USCGS) M=5.1 (USCGS, Stuttgart).
10	e P	01 38 43	Traces. Δ=9,555 km. ~86 dg. Kodiak Island, Alaska 56.2 N, 153°.8 W.- H=01:26:04.1; h about 33 km. (USCGS).
10	e P e S	03 05 44 15 52	Traces. Δ=9,110 km. ~ 81.5 dg. Near east coast of Formosa 24°.7 N, 122°1 E.- H=02:53:33.0; h about 33 km (USCGS). M=6.3 (Uppsala).
10	ePP	11 10 58 C	Traces. Δ=12,335 km. ~ 111 dg. Near coast of central Chile 29°9 S, 71°2 W.- H=10:51:48.1; h about 70 km.(USCGS). M=6-6 1/4 (Pasadena).
10	e	15 20 34	Traces. Epicentre in Romania (BCIS).

Date	Phase	Time	Additional Readings and Remarks.
March 11	e	19 10.0	Traces. South of Indian Ocean (BCIS).
15	eP	00 29 10 D	Traces. Δ=10,500 km. ~ 94.5 dg. Mindanao, Philippine Islands 8°4 N, 126°4 E.- H=00:16:01.3; h about 117 km. (USCGS). M=6.0 (Matsushiro).
16	eP eiS eilSKS	08 57 22 C 09 07 42 44	An=72 μ, Tn=19.5 sec. Ae=106 μ, Te= 24 sec., Δ=9445 km.~85 dg. M=6.7 (Athens); Kurile Islands region 46°5 N, 154°7 E.- H=08:44:48.3; h about 26 km. (USCGS). M=7 (Pasadena).
18	e P	10 06 50 C	ei 06:51 D. Traces Δ =2,335 km.~ 21 dg. Southern Algeria 24°1 N, 5°.0 E.- H=10:02:00.8; h about 0 km. (USCGS).
19	eiPKP	06 06 28 D	Traces. Δ=16,445 km.~ 148 dg. Loyalty Islands region 22°8 S, 170°5 E.- H=05:46:50.1; h about 67 km. M=4.6 (USCGS).
19	ePKP	13 33 03 C	Traces. Δ=16,445 km.~ 148 dg. Loyalty Islands region 22°.6 S, 170°6 E.- H=13:13:22.5; h about 49 km. (USCGS). M=4.5 (USCGS, Eureka, Port Moresby).
19	ePKP	15 01 42	Traces. Δ=16,445 km.~ 148 dg. Loyalty Islands region 22°6 S, 170°8 E.- H=14:42:01.2; h about 33 km. M=4.8 (USCGS).
20	ePKP	05 04 18	Traces. Δ=17,000 km.~ 153 dg. Fiji Islands region 19°6 S, 179°3 W.- H=04:45:49.5; h about 680 km. M=5.2 (USCGS).

Date	Phase	Time	Additional Readings and Remarks.
March			
20	e PP	16 58 08	Traces. Δ=12,280 km. ~ 110.5 dg. Western New Guinea 2°.4 S, 138°.4 E.- H=16:38:55.8; h about 40 km. M=5.5 (USCGS).
21	e P	04 12 48	Traces. Δ=9,440 km. ~ 85 dg. Near east coast of Honshu; Japan 36°.5 N, 140°.9 E.- H=04:00:11.1; h about 50 km. M=5.2 (USCGS).
24	e P	02 20 57	Traces. Δ=11,220 km. ~ 101 dg. Sumba Island region 9°.7 S, 120°.4 E.- H=02:07:12.8; h about 33 km. (USCGS). M=6 1/4 (Pasadena).
	eiPP	25 12 C	
	eSKS	31 38	
24	e P	12 48 34 CW	Very weak. Δ=2,220 km. ~ 20 dg. Western Iran 34°.4 N, 47°.9 E.- H=12:44:03.2; h about 33 km. (USCGS). M=6 1/4 (Matsushiro).
	eiS	52 14	
24	e P	21 48 13	Traces. Δ=9,780 km. ~ 88 dg. Adreanof Islands, Aleutian Islands 51°.8 N, 178°.1 E.- H=21:35:24.4; h about 57 km. M=6 (USCGS).
25	e	20 39.0	Traces. Δ=15,610 km ~ 140.5 dg. Macquarie Islands region 56°.3 S, 149°.9 E.- H=20:17:03.8; h about 39 km. (USCGS).
25	e P	22 58 01 D	Traces. Δ=8,450 km. ~ 76 dg. Off southwest coast of Sumatra 0°.7 N, 96°.5 E.- H=22:46:16.2; h about 30 km. (USCGS). M=6.5 (Uppsala).
26	ePKP	10 08 13 C	Very weak. Δ=17,780 km. ~160 dg. Kermadec Islands 29°.7 S, 177°.8 W.- H=09:48:19.7; h about 45 km. (USCGS). M=6 3/4 (Pasadena, Zose).

Date	Phase	Time	Additional Readings and Remarks.
March			
26	eiPKP$_1$	13 44 57 C	Very weak. Δ=17,780 km. ~ 160 dg. Kermadec Islands 29°.8 S, 177°.9 W.- H=13:25:02.6; h about 42 km. (USCGS). M=7.0 (Uppsala).
26	ei P	20 00 02	Traces. Δ=9,220 km. ~ 83 dg. Kurile Islands 44°.4 N, 146°.7 E.- H=19:47:46.0; h about 110 km. (USCGS). M=6.2 (Uppsala).
26	ei P	21 47 05 C	Very weak. Δ=9,220 km. ~ 83 dg. Near east coast of Honshu, Japan 36°.0 N, 135°.7 E.- H=21:34:41.1; h about 33 km. (USCGS). M=6 1/2 (Peking, Pasadena, Berkeley).
	ei PP	50 18	
	ei SKS	57 24	
28	ei P	00 23 05DNW	Very weak. Δ=4,220 km. ~ 38 dg. North of Iceland 66°.3 N, 19°.6 W.- H=00:15:47.6; h about 15 km. (USCGS). M=7-7 1/4 (Pasadena, Matsushiro).
	ei(PP)	24 33 DN	
	ii S	28 55	
30	eiPKP	02 12 45 D	Very weak. Δ=16,000 km. ~144 dg. New Hebrides Islands 19° S,169°.1 E.- H=01:53:28.8; h about 160 km. M=6.1 (USCGS).
	eipPkP	13 25 D	
	ei(PP)	16 02	
30	eiP	17 04 24 C	Very weak. Δ=9,335 km. ~ 84 dg. Kurile Islands 44°.2 N, 148°.0 E. H=16:51:56.6; h about 33 km.(USCGS). M=6.1 (Quetta, Uppsala).
	eiS	14 43	
31	e P	02 32 48	Traces. Δ=3,000 km. ~ 27 dg. Northeastern Iran 36°.9 N, 57°.7 E.- H=02:27:09.2; h about 33 km. (USCGS). M=4.6 (USCGS, College).
31	eiPP	05 04 31 CE	Traces. Δ=11,665 km. ~ 105 dg. Near coast of southern Peru 6°.5 S, 81°.1 W.- H=04:46:00.8; h about 33 km. (USCGS). M=5.2 (USCGS, State College, Moscow).

Date	Phase	Time		Additional Readings and Remarks.
March				
31	e	13 16.0		Traces. Δ=9,000 km. ~ 81 dg. Near coast of southern Honshu, Japan 35°8 N, 132°6 E.- H=12:26:11.6; h about 33 km. (USCGS). M=4.7 (Eureka, USCGS).
31	e PkP	19 42 47	C	Traces. Δ=17,780 km. ~ 160 dg. Kermadec Islands 30°0 S, 178°0 W.- H=19:22:53.3; h about 50 km. (USC GS). M=6.2 (Uppsala).
Apr.				
1	eiP	04 40 28	C	Traces. Δ =8,945 km. ~ 80.5 dg. Off west coast of Hokkaido, Japan 44°8 N, 141°1 E.- H=04:28:44.3; h about 255 km. (USCGS). M=6.7 (Kiruna).
2	e	04 45.0		Traces. Δ =8,835 km. ~ 79.5 dg. Kamchatka 55°2 N, 160°3 E.- H= 04:06:57.8; h about 40 km.(USCGS). M=5 1/2 (Matsushiro).
2	eP	16 31 31		e 32:14. Traces. Δ=9,780 km. ~ 88 dg. Andreanof Islands, Aleutian Islands 53°1 N, 171°7 W.- H=16: 18:55.3; h about 140 km. (USCGS). M=6 1/4-6 1/2 (Pasadena).
3	e	02 30.0		Traces. Δ=7,170 km. ~ 64.5 dg. Atlantic Ocean 16°4 N, 46°7 W.- H=02:09:36.5; h about 33 km.(USC GS). M=4.5 (USCGS, College).
3		12 56.5		Traces. Δ=9,335 km.~ 84 dg. Babuyan Islands, Philippine Islands 19°1 N, 121°2 E.- H=11:58:07.2 ; h about 70 km. (USCGS). M=4 (Peking, College).

Date	Phase	Time		Additional Readings and Remarks.
Apr.				
3	e(PkP$_1$)	15 08 01		Traces. Δ=17,110 km. ~ 154 dg. South Pacific Ocean 55°5 S, 128°1 W.- H=14:47:55.6; h about 33 km. (USCGS). M=6-6 1/4 (Matsushiro).
7	e	11 34.7		Traces. Δ=4,280 km. ~ 38.5 dg. Jan Mayen Island region 71°5 N, 13°0 W.- H=11:16:03.8; h about 33 km. M=4.6 (USCGS).
7	e P	22 48 30	D	Very weak. Δ =9,390 km. ~ 84.5 dg.
	eiS	58 52		Near southwest coast of Sumatra 4°9 S, 103°2 E.- H=22:36:03.4; h about 72 km. (USCGS). M=6.7 (Praha, Uppsala, Kiruna).
8	e P	14 48 10		Traces. Δ =6,280 km. ~ 56.5 dg.
	e(PS)	56 10		North Atlantic Ocean 27°7 N, 44°3 W.- H=14:38:27.0; h about 33 km. (USCGS). M=5.0 (Trinidad, USCGS).
9	e PKP	02 21 18	DSE	Traces. Δ=16,890 km.~ 152 dg. Fiji Islands region 17°7 S, 178°7 W.- H=02:02:25.1; h about 538 km. (USCGS). M=4.8 (College).
10	e PP	08 09 00		Traces. Δ =11,610 km.~ 104.5 dg. Timor 9°2S, 125°0 E.- H=07:50:30.2; h about 33 km. (USCGS). M=6 (Matsushiro).
12	e(SS)	00 59 54		Traces. Δ =5,000 km.~ 45 dg. Northern India 31°9 N, 78°8 E.- H=00: 41:27.9; h about 33 km. (USCGS). M=5.8 (Uppsala).
12	e	09 14.0		Traces. Δ =17,665 km.~ 159 dg. North Island, New Zealand 39°0 S, 176°7 E.- H=08:41:56.7; h about 106 km. (USCGS). M=5 3/4-6.- (Matsushiro).

Date	Phase	Time	Additional Readings and Remarks.
Apr. 13	eiP eiS	02 34 39 D 46 05	Very weak. Δ=11,280 km. ~ 101.5 dg. Central Peru 6°.2 S, 76°.5 W.- H=02:20:57°.5; h about 125 km. (USCGS). M=6.7 (Uppsala, Kiruna).
13	ePP	14 50 29 D	Traces. Δ=12,165 km.~ 109.5 dg. Near north coast of New Guinea 3°.4 S, 135°.4 E.- H=14:31:21.0; h about 31 km. (USCGS). M=6.0 (Uppsala).
16	e P ePP	01 43 12 C 47 27	An=32 μ, Tn=20 sec. Ae=27 μ, Te= 23 sec. Δ=11,280 km. ~ 101.5 dg. M=6.3 (Athens). Halmahera region 0°.9 S, 128°.2 E.- H=01:29:15.9; h about 6 km. (USCGS). M=7 (Pasadena, Moscow).
16	eiPP	12 13 25	Very weak. Δ=11,280 km.~ 101.5 dg. Halmahera region 0°.7 S, 128°.0 E.- H=01:55:10.9; h about 32 km. (USCGS). M=6.9 (Matsushiro).
16	e P eiS	18 51 04 D 54 17	Traces. Δ=1,890 km.~ 17 dg. Irac 35°.8 N, 44°.4 E.- H=18:47:07; h about 45 km. (BCIS). M=5.2 (USCGS).
17	ePS	01 37 16	Traces. Δ=11,280 km.~ 101.5 dg. Halmahera region 0°.9 S, 127°.9 E.- H=01:10:11; h about 33 km.(USCGS). M=6 (Matsushiro).
17	eiPkP$_1$ ePkP$_2$	02 31 11 C 31 CS	Very weak. Δ=16,830 km. ~ 151.5 dg. South of Fiji Islands 19°.6 S,178°.6 E.- H=02:11:26.1; h about 33 km. (USCGS). M=6 1/2-6 3/4 (Pasadena, Matsushiro).
17	e R	17 48.0	Traces. Δ=12,110 km.~ 109 dg. Western New Guinea 3°.5S, 135°.4 E.- H=17:03:02; h about 39 km.(USCGS). M=5.5 (Port Moresby, USCGS).

Date	Phase	Time	Additional Readings and Remarks.
Apr. 19	*eP eP eiPP ei(PS)	07 44 58 07 45 08 C 48 43 DNE 53 10	Traces. Δ=6,170 km. ~55.5 dg. An=30μ, Tn=19 sec, Ae=20μ, Te= 20 sec. Δ=6340 km.~ 57 dg. M= 5.8 (Athens). Tsinghai Province, China 35°.8 N, 96°.9 E.- H=07:35: 23.7; h about 33 km. (USCGS). M=7 (Peking, Moscow, Pasadena).
20	e P	01 02 20	Traces. Δ=9,280 km.~ 83.5 dg. Kurile Islands 46°.5 N, 151°.3 E.- H=00:49:57.8; h about 69 km.(USCGS).
20	e	21 04.2	Traces. Δ=9,110 km.~ 82 dg. Off coast of Kamchatka 52°.3 N, 159°.5 E.- H=20:32:16.2; h about 33 km. (USCGS). M=5 1/4-5 1/2 (Matsushiro).
21	eiP eiS	04 50 38 C 05 00 48	Traces. Δ=9,110 km.~ 82 dg. Near east coast of Formosa 24°.2 N, 122°.3 E.- H=04:38:21.7; h about 35 km. (USCGS). M=6-6 1/4 (Matsushiro).
21	ePS	11 08 14	Traces. Δ=13,110 km.-~ 118 dg. Bismarck Sea 3°.2 S, 146°.9 E.- H=10:38:30.2; h about 33 km. (USCGS). M=6.0 (USCGS, Peking, Port Moresby).
22	e	15 45 00	ei 46:02. Traces. Δ=1,335 km. ~ 12 dg. Black Sea 41°.5 N, 38°.5 E.- H=15:38:22 (BCIS). M=5.3 (USCGS).
23	e	03 17.0	Traces. Δ=6,335 km.~ 57 dg. Outer Mongolia 46°.7 N, 103°.5 E.- H= 02:51:15.8; h about 33 km.(USCGS). M=6.0 (Uppsala).
23	e(SSS)	10 21.2	Traces. Δ=7,055 km. ~63.5 dg. Yunnan Province, China 25°.7 N,

Date	Phase	Time	Additional Readings and Remarks.
Apr. 23			99°.5 E.- H=09:55:06.9; h about 30 km. (USCGS). M=5 1/2 (Peking, Moscow, Kew).
27	e	03 56.0	Traces. Δ=4170 km.~ 37.5 dg. Off north coast of Iceland 66°.7 N, 19°.2 W.- H=03:42:33.9; h about 33 km. M=4.6 (USCGS).
27	ePS	09 09 54	Traces. Δ=11280 km.~ 101.5 dg. Halmahera region 0°.9 S, 128°.4 E.- H=08:42:48.1; h about 27 km.(USCGS). M=6.1 (Uppsala).
29	eiPKP	15 11 19	Traces. Δ=15890 km.~ 143 dg. Balleny Islands region 64°.0S, 159°.2 E.- H=14:51:52.3; h about 33 km. (USCGS). M=5.9 (Port Moresby).
29	eiP eiPP eiSKS	21 57 03 C 22 00 34 C 07 32	Traces. Δ=9830 km.~ 88.5 dg. Andreanof Islands, Aleutian Islands 51°.3 N, 178°.7 E.- H=21:44:17.2; h about 56 km. (USCGS). M=6.0 (Moscow, Peking, Pasadena, Uppsala).
30	eSKS eiPS	01 22 54 25 29	e 16:18; Traces. Δ=11330 km. ~ 102 dg. Halmahera region 0°.9 S, 128°.8 E.- H=00:58:19.2; h about 33 km. (USCGS). M=6 3/4 (Pasadena).
30	e	10 21.0	Traces. Δ=6170 km.~ 55.5 dg. Maldives 0°.8S, 67°.8 E.- H=10:03:59; h about 33 km. (USCGS). M=5 (Moscow).
30	ePS	19 11 02	Traces. Δ=11720 km. ~ 105.5 dg. Near coast of Perou 8°.3 S, 80°.0 W.- H=18:43:07.0; h about 9 km. M=4.8 (USCGS).

Date	Phase	Time	Additional Readings and Remarks.
May 1	eiPkP eiPPkP	10 22 38 D 23 14 D	Very weak. Δ=16,060 km.~ 144.5 dg. New Hebrides Islands 19°.0 S, 168°.9 E.- H=10:03:20.2; h about 142 km. (USCGS). M=7 (Pasadena).
3	eP	10 49 44 D	Traces. Δ=2,670km.~ 24 dg. Iran 30°.8 N, 51°.7 E.- H=10:44:31 (BCIS). M=5.3 (USCGS).
3	e	11 55.4	Traces. Δ=17,000 km.~ 153 dg. Tonga Islands 15°.2S, 173°.2 W.- H=10:54:44.7; h about 47 km. (USCGS). M=5.0 (USCGS, Port Moresby).
5	e	15 45.0	Traces. Δ=11,890 km. ~107 dg. Northern Chile 24°.8 S, 69°.6 W.- H=15:17:02.1; h about 53 km.(USCGS). M=5.3 (Albuquerque).
7	e	17 13.0	Traces. Δ=11,670 km. ~105 dg. Northern Chile 22°.1 S, 68°.7 W.- H=16:23:11.8; h about 112 km. M=5.4 (USCGS).
8	eiP ei(PP) eiS	10 34 46 CW 38 06 D 45 10	Very weak.Δ=9,555 km.~ 86 dg. Honshu, Japan 36°.4 N, 141°.0 E.- H=10:22:09.6, h about 45 km.(USCGS). M=6.4 (Matsushiro, Kiruna, Uppsala),
9	e	15 34.0	Traces. Δ=10,670 km.~ 96 dg. Near West coast of Nicaragua 12°.4 N, 87°.0 W.- H=15:03:43.8; h about 50 km.(USCGS). M=5 1/4-5 1/2 (Palisades).
10	eiPkP	04 48 15 C	Traces. Δ=16,000 km.~ 144 dg. Loyalty Islands 20°.2 S, 168°.1 E.- H=04:28:42.6; h about 40 km. M=4.9 (USCGS).
10	eP eS	22 36 25 47 05	Very weak. Δ=11,110 km.~ 100 dg. Ecuador 2°.1 S, 77°.6 W.- H=22:22:42.7; h about 30 km.(USCGS). M=6 3/4 (Pasadena).

Date	Phase	Time	Additional Readings and Remarks.
May 11	ePkP	05 03 27 D	Traces. Δ=16,890 km. ~ 152 dg. Fiji Islands region 15°7 S, 176.7 W.- H=04:44:26.9; h about 487 km. M=5.1 (USCGS).
11	eP	18 01 58	Traces. Δ=9,060 km. ~ 81.5 dg. Off east coast of Formosa 24°1 N, 122°3 E.- H=17:49:41.9; h about 33 km. (USCGS). M=5.9 (Uppsala, Kiruna).
12	eiPkP	10 02 30 D	Traces. Δ=16,110 km. ~ 145 dg. Macquarie Islands ragion 57°5 N, 159°4 E.- H=09:42:57.3; h about 33 km. (USCGS). M=6.2 (USCGS, Honiara, Port Moresby, Kipapa).
12	eiP ei(S) eiSkS	20 21 11 D 31 30 37	Very Weak. Δ=9,440 km. ~ 85 dg. Kodiak Island, Alaska 57°3 N, 154°0 W.- H=20:08:40.8; h about 60 km. (USCGS). M=6 1/2 (Pasadena).-
13	eiPkP	14 27 04 D	Traces. Δ=16,110 km. ~ 145 dg. New Hebrides Islands 19°5 S, 169°2 E.- H=14:07:46.5; h about 158 km. M=5.6 (USCGS).
15		03 20.0	Traces. Δ=13,110 km. ~ 118 dg. Bismark Sea 3°4 S, 146°9 E.- H= 02:52:39.7; h about 33 km. M=5.7 (USCGS).
15	e P	12 15 41	Traces. Δ=4,390 km. ~ 39.5 dg. Azores region 38°6 N, 26°7 N.- H=12:08:12 (BCIS). M=5.8 (Kiruna, Uppsala, Kevo).
16	eiPkP	01 47 42 D	Traces. Δ=16,500 km. ~ 148.5 dg. New Hebrides region 22°4 S, 171°7 E.- H=01:28:05; h about 84 km. (USCGS). M=4.8 (USCGS, Eureka).

Date	Phase	Time	Additional Readings and Remarks.
May 16	e	16 08 33	Traces. Δ=11,330 km. ~ 102 dg. Halmahera region 0°9S, 128°6 E.- H=15:52:15.4; h about 24 km. M= 4.4 (USCGS).
17	eiP	04 19 06 D	Traces. Δ = 9,390 km. ~ 84.3 dg. Kurile Islands region 45°5 N, 150°9 E.- H=04:06:39.5. h about 51 km. (USCGS). M=6.0 (Uppsala, Kiruna).
17	eP	12 21 25	Traces. Δ=9,220 km. ~ 83 dg. South of Hokkaido, Japan 41°6 N, 142°0 E.- H=12:09:08.1; h about 72 km. (USCGS). M=5.1 (College).
18	eiPkP$_1$	02 18 15 C	Traces. Δ=16,330 km. ~ 147 dg. Loyalty Islands 21°6 S, 169°7 E.- H=01:58:46. M=5 1/2 (Noumea).
18	e	12 46,1	Traces. Δ=10,720 km. ~ 96,5 dg. Bali 8°2 S, 115°6 E.- H=12:20:34.4; h about 65 km. (USCGS). M=5.9 (US CGS, Riverview).
19	eiPP	01 23 34 C	e 23:24 W. Traces. Δ=13,500 km.~ 121.5 dg. Coast of southern Chile 46°3 S, 74°8 W.- H=01:03:06.2; h about 48 km. (USCGS). M=6 3/4 (Pasadena, Kew).
19	e P e S	10 02 35 C 04 25	Traces. Δ=1,170 km. ~ 10.5 dg. Northwestern Yugoslavia 46°0 N, 14°8 E.- H=10:00:04 (BCIS). M= 4.9 (USCGS).
19	eiP eiS	21 45 57 C 54 11	Very weak. Δ=6,830 km. ~ 61.5 dg. North Atlantic Ocean 23°9 N, 46°0 W.- H=21:35:47; h about 10 km. (BCIS). M=6 1/2 (Moscow, Pasadena).

Date	Phase	Time	Additional Readings and Remarks.
May			
20	e(PkP_1)	11 57 57 C	Very weak. Δ=17,780 km.~ 160 dg. Kermadec Islands region 30°7 S, 178°3 W.- H=11:38:05.3; h about 68 km. (USCGS). M=6 3/4-7 (Pasadena, Matsushiro).
	eiPkP_2	58 42 D	
	eiPP	12 02 23 C	
	eiSKKS	09 06	
21	ePkS	17 53 10	Traces. Δ=15,000 km.~ 135 dg. Solomon Islands region 11°1 S, 163°3.- H=17:30:15.3; h about 33 km. (USCGS). M=5.4 (USCGS, Port Moresby).
22	ePkS	02 50 56	Traces. Δ=15,000 km.~ 135 dg. Solomon Islands region 11°2 S, 163°2 E.- H=02:27:55.7; h about 60 km. M=5.1 (USCGS).
22	e P	14 09 10 C	Very weak. Δ=9,220 km.~ 83 dg. Kurile Islands rgion. 48°7 N, 154°8 E.- H=13:56:47.5; h about 54 km. (USCGS). M=6 1/2 (Pasadena).
	eiS	19 25	
	eiSkS	29	
22	ei(SkS)	22 17 02	e 04:46. Traces. Δ=10,720 km.~ 96.5 dg. Java Sea 8°2 S, 115°7 E.- H=21:53:03.7; h about 47 km. M= 6.0 (Uppsala, Kiruna).
23	eiPkP	03 52 42CS	Traces. Δ=16,780 km. ~151 dg. Fiji Islands region 14°7 S, 172°6 W, H=03:33:24.8; h about 302 km. (USCGS). M=4.2 (Pasadena).
23	e S	08 05 30	Traces. Δ=8,560 km. ~ 77 dg. Leeward Islands region 19°2 N, 64°5 W.- H=07:43:56.9; h about 47 km. M=5.4 (USCGS).
23	e	12 53.0	Traces. Δ=13,500 km.~ 121.5 dg. Off coast of southern Chile 44°7 S, 75°8 W.- H=11:56:45.3; h about 33 km. (USCGS). M=5.1 (Albuquerque, USCGS).

Date	Phase	Time	Additional Readings and Remarks.
May			
23	e	15 42.0	Traces. Δ=10,670 km.~ 96 dg. Near east coast of Mindanao, Philippine Islands 6°0 N, 126°1 E.- H=15:12: 09.7; h about 124 km. (USCGS). M=5 1/4-5 1/2 (Matsushiro).
25	e P	08 53 29	Traces. Δ=9,220 km.~ 83 dg. Near east coast of Hokkaido, Japan 42°9 N, 144°4 E.- H=08:41:11.6; h about 88 km. M=5.4 (USCGS).
25	e P	16 22 03	Traces. Δ=11,440 km. ~103 dg. Sandwich Islands region 56°7 S, 24°8 W.- H=16:08:00.6; h about 33 km.(USCGS). M=6.2 (Uppsala).
25	ePKP_1	18 25 06	Traces. Δ=16,220 km.~ 146 dg. Balleny Islands region 62°3 S, 163°8 E.- H=18:05:25.0; h about 32 km. (USCGS).
26	e	05 24.9	Traces. Δ=9,220 km.~ 83 dg. Near east coast of Kamchatka 51°6 N, 160°0 E.- H=04:52:24.0; h about 33 km. M=5.3 (USCGS).
26	eiP	23 19 01	Traces. Δ=8,885 km. ~ 80 dg.Near east coast of Kamchatka 55°2 N, 160°1 E.- H=23:06:54.0; h about 34 km.(USCGS). M=6-6 1/4 (Matsushiro).
27	e P	24 10 50 D	Traces. Δ=8,885 km.~ 8 0 dg. Near east coast of Kamchatka 55°2 N, 160°1 E.- H=03:58:46.6; h about 49 km. (USCGS). M=6-6 1/4 (Matsushiro).
	e S	20 54	
28	e P	21 16 25 D	Traces. Δ=9,275 km.~ 83.5 dg. Kurile Islands region 47°5 N, 152°6 E.- H=21:04:15.4; h about 166 km.(USCGS). M=6.1 (Uppsala, Kiruna).

Date	Phase	Time	Additional Readings and Remarks.
May 29	e P	00 53 19	Traces. Δ=2,890 km. ~26 dg. Western Iran 27°9 N, 52°4 E.- H=00:47:48 (BCIS). M=5.8 (Uppsala, Kiruna).
29	e P	08 41 28 D	Traces. Δ=3,560 km. ~32 dg. Western Iran 27°2 N, 59°5 E.- H=08:35:08; h about 75km. (BCIS). M=5 1/2-5 3/4 (Matsushiro).
31	ePkP$_1$	00 18 44 D	Traces. Δ=17,000 km. ~153 dg. Samoa Islands region 15°3 S,173°4 W.- H=23:58:52.2; h about 61 km. M=5.4 (USCGS).
June 1	e P	10 56 57	Traces. Δ=4,110 km. ~ 37 dg. Hindu-Kush 36°1 N, 71°2.- H=10: 49:57.0; h about 100 km. M=5.3 (USCGS).
1	e P	20 37 45 C	Traces. Δ=720 km. ~6.5 dg. Tyrrhenian Sea 38°9 N, 14°8 E.- H=20:36:09; h about 280 km.(BCIS). M=4.4 (USCGS , Kevo, Köbenhavn, Stuttgart).
1	ePkP$_1$	21 33 40	Traces. Δ=17,000 km. ~153 dg. Samoa Islands region 15°3 S, 173°4 W.- H=21:13:53.0; h about 33 km. (USCGS). M=5.91 (Tulsa,Kiruna, College).
2	e P	21 18 15 D	Traces. Δ=11,280 km.~ 101.5 dg. Sandwich Islands region 58°3 N, 15°3 W.- H=21:04:21.6; h about 33 km. (USCGS). M=6.2 (Uppsala, Kiruna).
3	e P	07 48 30	Traces. Δ=9,610 km.~ 86.5 dg. Honshu, Japan 34°1 N, 138°7 E.-

Date	Phase	Time	Additional Readings and Remarks.
June 3			H=07:35:50.6; h about 21 km.(USCGS). M=5.9 (Kiruna, Uppsala, JMA).
3	e(SkS)	11 55 25	Traces. Δ=10,220 km. ~92 dg. Colombia 5°4 N, 73°0 W.- H=11:31:50.5; h about 32 km. (USCGS). M=5.7 (Uppsala).
4	ePkP$_1$	12 14 04	Traces. Δ=17,830 km.~ 160.5 dg. Kermadec Islands 30°5 S, 177°8 W,- H=11:54:09.1; h about 33 km.(USCGS). M=6 (Matsushiro).
4	e P e PP e SKS	21 18 35 22 49 29 10	Traces. Δ=11,280 km.~ 101.5 dg. Halmahera region 1°2 S, 127°3 E.- H=21:04:42.3; h about 33 km. (USCGS). M=6-6 1/4 (Pasadena).
5	e	15 10.0	Traces. Δ=16,940 km.~ 152.5 dg. Tonga Islands region 17°2 S, 176°8 W.- H=14:07:38.2; h about 33 km. (USCGS). M=4.5 (Eureka,USCGS).
5	eSkS	23 18 43	Traces. Δ=10,780 km.~ 97 dg. Celebes 3°0 S, 119°6 E.- H=22:54: 29.2; h about 75 km. (USCGS). M= 5 3/4-6 (Matsushiro).
6	ei P	05 31 18 D	Traces. Δ=9,220 km.~ 83 dg. Off north coast of Luzon, Philippine Islands 19°9 N, 120°5 E.- H=05:18: 54.9; h about 33 km. (USCGS). M= 6.4 (Kiruna, Uppsala).
6	e	12 28.6	Traces. Δ=10,110 km.~ 91 dg. Indean Ocean 37°9 S, 78°0 E.- H= 12:04:15.3; h about 33 km. M=5.3 (USCGS, Port Moresby).
7	e P	16 02 32	Traces. Δ=9,440 km. ~85 dg. Off north coast of Luzon, Philippine

Date	Phase	Time	Additional Readings and Remarks.
June 7			Islands 18°.9 N, 121°.9 E.- H=15: 50:00.8; h about 66 km. (USCGS). M=5.7 (Kiruna, Uppsala).
7	e	19 59.5	Traces. Δ=13,560 km.~ 122 dg. Clipperton Island region 8°.5 N, 103°.1 W.- H=19:30:35.6; h about 33 km. (USCGS). M=5.9 (Uppsala, Kiruna).
7	$ePkP_1$	22 51 42	Traces. Δ =17,000 km.~ 153 dg. Samoa Islands region 8°.7 N,102°.8 W.- H=21:28:48.2; h about 33 km. (USCGS). M=4.7 (USCGS, Wichita M.)
8	e S	04 43 10	Traces. Δ=7,780 km. ~ 70 dg. South Atlantic Ocean 22°.9 S, 13°.5 W.- H=04:22:52.2; h about 33 km.(USCGS). M=4.9 (USCGS, Cumberland Pl.).
9	e	17 15.0	Traces. Δ=17,000 km. ~153 dg. Samoa Islands region 15°.2 S,173°.0 W.- H=15:50:31.9; h about 33 km. (USCGS). M=5.0 (USCGS, College).
9	e P	20 48 29	Traces. Δ = 7,170 km. ~64.5 dg. Mid-Atlantic Ocean 10°.6 N,41°.8 W.- H=20:37:47.1; h about 11 km.(USCGS) M=5.1 (Stuttgart, College).
10	ePkP	04 36 03	Traces. Δ =15,330 km.~ 138 dg. 800 km. west of Macquarie Islands 55°.9 S, 146°.2 E.- H=04:16:38.4; h about 33 km. (USCGS). M=6 1/4 (Pasadena).
10	e P	10 59 22	Traces. Δ = 9,280 km. ~83.5 dg. Off coast of Kamchatka 51°.0 N, 160°.1 E.- H=10:46:59.4; h about 44 km. (USCGS). M=5.7 (Uppsala, Kiruna).

Date	Phase	Time	Additional Readings and Remarks.
June 11	eP	03 32 45 D	Traces. Δ=4,060 km.~ 36.5 dg. Hindu Kush 37°.1 N, 70.1 E.- H=03: 25:41.5; h about 44 km. (USCGS). M=5.4 (USCGS, Quetta, Nurmijaervi).
11	e	16 14.0	Traces. Δ=11,220 km.~ 101 dg. Baja California 31°.8 N, 116.2 W.- H=15:23:42.7; h about 33 km. (USCGS). M=5 (Pasadena).
13	eiPn eiSn	08 39 20 40 36	Traces. Δ=760 km. ~ 7 dg. Off northern coast of Sicily 38°.6 N, 15°.4 E.- H=08:37:37 (BCIS). M=4.7 (USCGS).
13	e	17 56.1	Traces. Δ=13,720 km. ~ 123.5 dg. New Britain 4°.7 S, 153°.2 E.- H= 17:26:41.0; h about 51 km. M=5.3 (USCGS).
15	e	15 52.0	Traces. Δ =9,830 km.~ 88.5 dg. Off coast of central Chile 36°.3S, 98°.9 W.- H=15:30:37.7; h about 33 km. (USCGS). M=4.9 (USCGS,Blue M).
17	$ePkP_1$	18 50 49	Traces. Δ=16,560 km. ~ 149 dg. Scott Island region 65°.7S, 179°.3 W.- H=18:30:54.3; h about 33 km. (USCGS). M=6.2 (Uppsala, Kiruna).
17	eiP	23 14 28 D	e?14:27. Traces. Δ=9,280 km. ~ 83.5 dg. Near south coast of Sumatra 4°.1 S, 102° E.- H=23:02:06.0; h about 69 km. (USCGS). M=6.2 (Uppsala, Kiruna).
18	e P	04 15 11	Traces. Δ=9,390 km.~ 84.5 dg. Ryukyu Islands 28°.8 N, 130°.0 E.- H=04:02:32.4; h about 53 km.(USCGS). M=5.7 (Uppsala, Kiruna, Nurmijaervi).

Date	Phase	Time	Additional Readings and Remarks.
June 19	e PPS	02 53 26	Traces. Δ=17,610 km. ~ 158.5 dg. Tonga Islands region 23°6 S, 174°9 W.- H=02:15:54.1; h about 55 km. M=4.3 (USCGS).
19	e P	09 22 28 D	Traces. Δ=10,780 km. ~97 dg. Talaud Island region 4°.7 N, 126°.5 E.- H=09:09:04.0; h about 83 km. (USCGS). M=6.3 (Uppsala,Kiruna).
19	eiP	10 57 17 D	Traces. Δ=6,500 km. ~58.5 dg. Assam, India 25°0 N, 92°.1 E.- H=10:47:24.6; h about 51 km. (USCGS). M=6.2 (Uppsala, New-Delhi).
19	e P	23 14 47	Traces. Δ=9,830 km. ~ 88.5 dg. South of Honshu, Japan 31°7 N, 140°0 E.- H=23:01:55.9; h about 62 km. (USCGS). M=5.8 (Uppsala, Matsushiro).
20	e	01 38.5	Traces. Δ=9,780 km. ~88 dg. Off east coast of Honshu, Japan 36°4 N, 144°6 E.- H=00:56:02.2; h about 15 km. (USCGS). M=5.1 (USCGS, Wichita M).
20	e P	19 52 31	Traces. Δ=2,440 km. ~22 dg. Western Mediterranean 35°7 N,3°.7 W.- H=19:47:40; h about 40 km. (BCIS). M=4.5 (Blue M, USCGS).
20	ePkP	23 06 12	Traces. Δ=17,830 km. ~160.5 dg. Kermadec Islands 28°.0 S, 176°.5 W.- H=22:46:18.8; h about 48 km. (USCGS). M=5.3 (USCGS, Tonto Forest).
21	e	14 20.5	Traces. Δ=7,780 km. ~ 70 dg. Eastern Manchuria 47°8 N, 130°.5E.-

Date	Phase	Time	Additional Readings and Remarks.
June 21			H=13:44:20.8; h about 8 km.(USCGS). M=5.6 (Uppsala, Kiruna).
21	e	23 02.0	Traces. Δ=17,890 km. ~161 dg. Kermadec Islands 29°.9 S, 177°.1 W.- H=21:42:00.5; h about 47 km.(USCGS). M-4.9 (USCGS, Tonto Forest).
22	e	21 22.0	Traces. Δ=7,110 km. ~ 64 dg. Northwestern Manchuria 53°.1 N, 121°.1 E.- H=20:51:57.6; h about 33 km.(USCGS). M=4.6 (USCGS, Blue M).
23	e	04 19.0	Traces. Δ=17,890 km. ~ 161 dg. Kermadec Islands region 29°.7S, 177°.9 W.- H=03:49:34.1; h about 51 km.(USCGS). M=5.1 (USCGS, Blue M, Port Moresby).
24	e P eiSkS	04 38 58 D 49 16	Very weak. Δ=9,220 km. ~ 83 dg. Cook Inlet, Alaska 59°.5 N, 151°.7 W.- H=04:26:37.9; h about 52 km. (USCGS). M=6¾-7 (Pasadena).
24	e P	16 30 09	Traces. Δ=9,940 km.~ 89.5 dg. Fox Islands region,Aleutian Islands 52°2 N, 171°.1 W.- H=16:17:15.7; h about 36 (USCGS). M=5.6 (Uppsala, Kiruna).
27	e P	07 20 16	Traces. Δ=9,000 km. ~ 81 dg. Yukon Territory 60°.5 N, 140°.8 W.- H=07:08:01.8; h about 31 km. M=5.9 (USCGS).
28	e P	02 40 38	Traces. Δ=8,440 km. ~ 76 dg. Indian Ocean 27°.5 N, 66°.0 E.- H=02:28:50.7; h about 28 km. M=6 (USCGS).

Date	Phase	Time	Additional Readings and Remarks.
June			
28	eP	22 08 09 C	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands region 46°7 N, 153°3 E.- H=21:55:36.8; h about 12 km. (USCGS). M=6 3/4 (Pasadena).
28	eP	23 09 37 D	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands region 46°7 N, 153°4 E.- H=22:57:01.5; h about 11 km. (USCGS). M=6.2 (Uppsala).
28	eP	00 06 26	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands region 46°6 N, 153°5 E.- H=23:53:56.6; h about 33 km. (USCGS). M=6.5 (Kiruna, Uppsala).
30	ePKP	02 24 10	Traces. Δ=16,440 km. ~ 148 dg. Loyalty Islands region 22°0 S, 170°9 E.- H=02:04:35.9; h about 66 km. M=4.8 (USCGS).
30	eP	06 57 41	Traces. Δ=9,170 km. ~ 82.5 dg. South Sumatra 2°6 S, 102°5 E.- H=06:45:38.7; h about 181 km. M= 5,4 (USCGS).
30	eiP	07 45 52 D	e? 45:51. Traces. Δ=2,390 km. ~ 21.5 dg. Western Iran 33°2 N, 49°2 E.- H=07:41:07; h about 38 km. M=5.1 (USCGS).
30	e P	22 17 23	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands region 46°7 N, 153°6 E.- H=22:04:52.7; h about 22 km. (USCGS). M=6.2 (Uppsala, Kiruna).
July			
1	e P	21 20 07	Traces. Δ =6,220 km. ~ 56 dg. Tsinghai Province, Chine 37°0 N, 96°1 E.- H=21:10:28.5 ; h about 33 km. M=5.3 (USCGS).

Date	Phase	Time	Additional Readings and Remarks.
July			
2	e PP	19 15 31	Traces. Δ =1,330 km. ~ 12 dg. Sinai peninsula, Egypt 28°8 N, 33°3 E.- H=19:12:24 (BCIS).
4	ePkP	11 17 52	Traces. Δ=17,610 km. ~158.5 dg.
	epPKP	18 28 C	Tonga Islands region 26°3 S, 177°7 W.- H=10:58:13.2; h about 158 km. (USCGS). M=6 3/4 (Pasadena).
4	eP	23 07 01	Traces. Δ=7,280 km. ~ 65.5 dg. St.-Helena Island region 18°5 S, 12°6 W.- H=21:56:15.7; h about 33 km. (USCGS). H=5.6 (Cumberland Pb., Uppsala, USCGS).
8	eP	11 14 27 C	Traces. Δ =5,890 km. ~ 53 dg. Mid Atlantic Ocean 0°3 N, 17°8 W.- H=11:05:07.5; h about 33 km. (USCGS). M=4 3/4 (Palisades).
10	eP	03 27 14	Traces. Δ =9,390 km. ~84.5 dg. Kurile Islands region 46°3 N, 153.4 E.- H=03:14:41.8; h about 33 km. (USCGS). M=5.7 (Kiruna, Uppsala).
10	eP	05 35 30	Traces. Δ = 9,390 km. ~ 84.5 dg. Kurile Islands region 46°3 N, 152°9 E.- H=05:22:57.1; h about 33 km. (USCGS). M=6 1/4-6 1/2 (Pasadena, Moscow).
12	eSkS	15 51 08	Traces. Δ =9,390 km. ~84.5 dg. Kurile Islands region 46°8 N, 153°6 E.- H=15:28:08.5; h about 33 km. (USCGS). M=5.9 (Kiruna, Uppsala).
12	e(P)	00 05 00	Traces. Δ =9,720 km. ~ 87.5 dg. Off south coast of Honshu, Japan

Date	Phase	Time	Additional Readings and Remarks.
July 12			83°9 N, 140°7 E.- H=23:42:03; h about 73 km. M=4.4 (USCGS).
13	e?	14 38.0	Traces. Δ=9,110 km.~ 82 dg. Ryukyu Islands 24°3 N, 122°3 E.- H=14:06:23.7; h=33 km. M=4.9 (USCGS).
14	eP	05 53 58 D	Traces. Δ=9,000 km.~ 81 dg. Off coast of northern Venezuela 10°4 N, 62°6 W.- H=05:41:43; h about 24 km. (USCGS). M=6.3 (Kiruna, Uppsala, Roma).
	ei(S)	06 04 04	
14	eP	17 23 45	Traces. Δ=2890 km.~ 26 dg. Red Sea 15°6 N, 39°0 E.- H=17:18:10 (BCIS). M=4 1/2 (Moscow).
16	ei P	18 30 43 CSW	Weak. Δ =1,610 km.~ 14.5 dg. Georgia S.S.R. 43°4 N, 41°6 E.- H=18:27:14 (BCIS). M=6.8 (Kiruna, Uppsala).
	eiS	33 30.	
	e*(P)	18 31 05	Traces. Δ=1,780 km. ~16 dg.
17	e P	12 00 30	Traces. Δ=1610 km.~ 14.5 dg. Aftershock of July 16.- Georgia S.S.R. 43°4 N, 41°6 E.- H=11:57:03 (BCIS). M=5.6 (Stuttgart, Uppsala, Kiruna).
18	ePP	05 16 40 D	Traces. Δ=11,670 km. ~105 dg. Sandwich Islands region 61°0 S, 22°3 W.- H=04:58:09.2 (USCGS). M=6.0 (Arequipa, Santa Lucia, Matsushiro, USCGS,Moscow).
19	e*P	05 48 11	Traces. Δ =1,280 km.~ 11.5 dg.
	e P	05 48 30 DNW	Weak. Δ=1,440 km.~ 13 dg. Ligurian Sea 43°23' N, 8°10' E.- H=05:45:29, h about 35 km. (BCIS). M=5.7 (Kiruna, Uppsala).

Date	Phase	Time	Additional Readings and Remarks.
July 20	e P	00 23 19 D	Traces. Δ=8,390 km.~ 75.5 dg. Yukon 65°2 N, 133°7 W.- H=00:11: 35.0; h about 33 km. (USCGS). M=5.8 (Uppsala, Kiruna).
20	e P	00 55 18	Traces. Δ=1,610 km. ~14.5 dg. Aftershock of July 16. Georgia S.S.R. 43°4 N, 41°6 E.- H=00:51: 50 (BCIS). M=5.3 (Uppsala, Kiruna).
20	e P	02 26 02 D	Traces. Δ=9,220 km.~ 83 dg. Kurile Islands region 47°2 N, 152°2E.- H=02:13:45.3; h about 108 km. (USCGS). M=4.4 (USCGS, Cumberland Pl.).
20	e SS	07 16 54	Traces. Δ=15,560 km. ~140 dg. Macquarie Island region 57°6 S, 148°5 E.- H=06:36:10.8; h about 33 km. (USCGS). M=6 1/4 (Matsushiro, Pasadena).
21	e?	06 09.7	Traces. Δ=4,060 km.~ 36.5 dg. Arabian Sea 14°8 N, 56°1 E.- H=06:01:57.3; h about 33 km.(USCGS). M=5 (Moscow).
21	ePP	11 10 55	Traces. Δ=1,000 km.~ 9 dg. Central Italy 42°5 N, 13°4 E.- H=11: 08:25 (BCIS).M=4.9 (Roma).
	e S	12 17	
22	ePP	00 49 47 D	Traces. Δ =13,440 km.~ 121 dg. New Britain 6°1 S, 148°9 E.- H=00:29:14.9; h about 59 km. M=5.1 (USCGS).
24	e S	11 54 44	Traces. Δ=9,060 km.~ 81.5 dg. Near east coast of Formosa 24°6 N, 122°0 E.- H=11:32:17.7; h about 33 km. (USCGS). M=6.3 (Uppsala, Kiruna).

Date	Phase	Time	Additional Readings and Remarks.
July			
25	e S	03 44 07	Traces. Δ=1,000 km.~ 9 dg. Central Italy 42°.5 N, 13°.4 E.- H=03:40:13 (BCIS). M=4.2 (Roma).
26	e P	09 28 22	Traces. Δ=720 km.~6.5 dg. Tyrrhenian sea 39°.4 N, 15°.0 E.- H=09:26:44; h about 320 km. (BCIS). M=4.2 (USCGS, Uinta).
27	eSS	06 04 18	Traces. Δ=1,440 km.~13 dg. Aftershock of July 19. Ligurian Sea 43°.4 N, 8°.2 E.- H=05:58:22; h about 33 km. (USCGS). M=5.1 (USCGS).
28	e P	19 04 08	Traces. Δ=9,440 km. ~85 dg. Kurile Islands region 46°.6 N, 153°.1 E.- H=18:51:36.7; h about 33 km. (USCGS). M=6.0 Uppsala, Kiruna).
29	$ePkP_1$ $eiPkP_2$	20 34 03 C 46 D	Traces. Δ=17,890 km. ~161 dg. Kermadec Islands 30°.2 S, 177°.3 W.- H=20:14:07.3; h about 39 km.(USCGS). M=5.7 (USCGS, Uinta).
30	$ePkP_1$	06 05 49 C	Traces. Δ=17,830 km.~160.5 dg. Kermadec Island 29°.6 S, 177°.3 W.- H=05:45:53.5; h about 33 km.(USCGS). M=6.3 (Uppsala, Kiruna).
30	eSKKS	15 35 49	Traces. Δ=17,830 km.~160.5 dg. Kermadec Islands 29°.9 S, 177°.4 W.- H=15:04:38.7; h about 76 km. M=5.3 (USCGS).
Aug.			
2	e(SSS)	09 31 30	Traces. Δ=4,670 km.~42 dg. Aftershock of August 2. North Atlantic Ocean 56°.3 N, 34°.5 W.- H=09:13:42 (BCIS). M=4.2 (USCGS).

Date	Phase	Time	Additional Readings and Remarks.
Aug.			
3	ePP	10 31 43	Traces. Δ=6,670 km.~60 dg.
	eiP	10 31 51 C	Very Weak Δ=6,830 km.~61.5 dg. Mid-
	eiPCP	32 33 C	Atlantic Ocean 7°.7 N, 35°.8 W.-H=10:21:36.6; h about 33 km. (USCGS). M=6.9 (Praha, Pasadena).
3	e PS	20 25 42	Traces. Δ=6,610 km.~59.5 dg. Mid-Atlantic Ocean 1°.4 N, 28°.2 W.- H=20:07:19.9; h about 33 km. (USCGS). M=4.5 (Uinta B).
4	ePKP	00 13 10 C	Traces. Δ=16,830 km.~151.5 dg. Fiji Islands region 17°.5 S, 179°.1 W.- H=23:54:14; h about 515 km. M=5.2 (USCGS).
5	ePP	16 01 53	Traces. Δ=15,830 km.~142.5 dg. Maequarie Island region 60°.7 S, 154°.3.- H=15:39:07; h about 33 km. (USCGS). M=5.2 (Port Moresby, USCGS).
6	eP	13 44 24 C	Traces. Δ=4,670 km.~42 dg. North Atlantic Ocean 57°.0 N,33°.9 W.- H=13:36:32 (BCIS). M=5.1(Tonto, Wichita M, USCGS).
7	e	05 12.7	Traces. Δ=8,220 km.~74 dg. Sakhalin Island U.S.S.R. 54°.0 N, 142°.1 E.- H=04:33:42.7; h about 33 km. M=5.1 (USCGS).
8	eP	02 27 19 C	Traces. Δ=9,220 km.~83 dg. Fox Islands, Aleutian Islands 54°.2 N, 168°.1 E.- H=02:14:54.4; h about 33 km. M=5.5 (USCGS).
8	ePP	11 36 22 C	Traces. Δ=13,610 km.~122.5 dg. New Britain 5°.8 S, 151°.0 E.- H=11:16:11.2; h about 48 km. (USCGS). M=5.6 (Baguio, USCGS).

Date	Phase	Time	Additional Readings and Remarks.
Aug. 9	ePP	06 08 23 C	Traces. Δ=1,220 km. ~11 dg. Northern Italy 44°22' N, 12°06E.- H=06:05:30 (BCIS). M=4.9 (Tonto Forest, USCGS).
9	$ePkP_1$ $ePkP_2$	14 56 32 38 C	Traces. Δ=16,500 km. ~148.5 dg. Fiji Islands region 15°.3 S, 175°.7 W.- H=14:36:45.9; h about 33 km. (USCGS). M=6.0 (Pasadena).
10	e P	04 33 00	Traces. Δ=2,940 km. ~26.5 dg. Southern Iran 27°.9 N, 53°.2 E.- H=04:27:27 (BCIS). M=4.8 (USCGS).
11	e P	08 49 10	Traces. Δ=2,780 km. ~25 dg. Northern Iran 36°.9 N, 55°.1 E.- H=08:43:43 (BCIS).
12	ePP	18 37 52	Traces. Δ=3,890 km. ~35 dg. Near coast of West Pakistan 25°.3 N, 62°.7 E.- H=18:29:38.8; h about 33 km. M=5.2 (USCGS).
13	e P	07 10 40	Traces. Δ=4,110 km. ~37 dg. Hindu Kush 36°.6 N, 70°.9 E.- H=07:03:49.6; h about 244 km. (USCGS). M=4.7 (College, USCGS).
13	$ePkP_1$	22 12 30	Traces. Δ=17,330 km. ~156 dg. Tonga Islands 19°.3 S, 173°.7 W.- H=21:52:37.4; h about 33 km. (USCGS). M=5.1 (Port Moresby, USCGS).
25	eiP eiPP eiS	06 24 06 CSW 27 27 W 34 25	Very weak. Δ=9,440 km. ~85 dg. Near east coast of Honshu, Japan 37°.9 N, 141°.6 E.- H=06:11:34.6; h about 590 km. (USCGS). M=5.7 (Wichita M, USCGS).

Date	Phase	Time	Additional Readings and Remarks.
Aug. 15	e* e P	17 38 (19) 17 37 57 D	Traces. Δ=11,000 km. ~99 dg. Very Weak. Δ=11,170 km. ~100.5 dg. Peru-Bolivia border 13°.8 S, 69°.3 W.- H=17:25:05.9; h about 543 km. M=6.0 (USCGS).
16	e P	23 16 50	Traces. Δ=6,890 km. ~62 dg. South Atlantic Ocean 12°.8 S, 14°.5 W.- H=23:06:24.6; h about 33 km. (USCGS). M=5.1 (Nurmijaervi, Wichita M, USCGS).
17	eiP eiS	11 25 08 CS 35 25	Very Weak. Δ=9,280 km. ~83.5 dg. Ryukyu Islands region 30°.6 N, 130°.9 E.- H=11:12:41.2; h about 33 km. M=5.6 (USCGS).
18	e P e	18 56 14 19 06 47	Traces. Δ=10,000 km. ~90 dg. Andreanof Islands, Aleutian Islands 50°.3 N, 176°.9 W.- H=18:43:16.1; h about 33 km. (USCGS).
20	e	16 11.0	Traces. Δ=9,280 km. ~83.5 dg. Off east coast of Honshu, Japan 41°.2 N, 142°.7 E.- H=15:48:12.2; h about 50 km. M=4.5 (USCGS).
22	e PKP	20 11 31	Traces. Δ=14,440 km. ~130 dg. Solomon Islands 9°.4 S, 158°.0 E.- H=19:52:25; h about 33 km. M=6.1 (USCGS).
25	e S	06 16 38	Traces. Δ=1,280 km. ~11.5 dg. Central Turkey 39°.1 N, 38°.4 E.- H=06:11:45 (BCIS). M=4.8 (Wichita M, USCGS).
25	ePKP ei(pPkP)	12 36 57 C 39 15	Very Weak. Δ=16,830 km. ~151.5 dg. Fiji Islands region 17°.5 S, 178°.8 W.- H=12:18:125; h about 565 km. (USCGS). M=6.1 (Blue M, USCGS).

Date	Phase	Time	Additional Readings and Remarks.
Aug.			
25	e* PkP	12 36 59	Traces. Δ=16,940 km. ~ 152.5 dg.
26	e PkP	05 08 31	Traces. Δ=16,830 km. ~ 151.5 dg. Fiji Islands region 17.7 S, 178.8 W.- H=04:49:43.8; h about 575 km. (USCGS).
26	e PkP_1	12 39 10 C	Traces. Δ=16,500 km. ~ 148.5 dg. Loyalty Islands region 22.7 S, 171.7 E.- H=12:19:27.6; h about 43 km. (USCGS). M=4.5 (College, Uinta B, USCGS).
29	ei P	09 01 13 C	Very weak. Δ=4,300 km. ~39 dg.
	ei S	07 15	Sinkiang Province, China 39.6 N, 74.2 E.- H=08:53:48.4; h about 31 km. M=5.5 (USCGS).
	e * P	09 01 26	Traces. Δ=4,500 km. ~ 40.5 dg.
29	e P	15 44 46	Very weak. Δ=11,780 km. ~ 106 dg.
	e PP	49 10 CW	Off coast of Peru 7.1 S, 81.6 W.-
	e SKS	55 25	H=15:30:31.4; h about 23 km. (USCGS). M=6.1 (Blue M, USCGS).
29	e PkP_1	21 17 20	Traces. Δ=17,000 km. ~ 153 dg. Tonga Islands region 15.5 S, 172.9 W.- H=20:57:31.5, h about 33 km. (USCGS). M=4.9 (Cumberland Pl, USCGS).
30	ei PkP_1	10 48 14	Traces. Δ=16,330 km. ~ 147 dg. Loyalty Islands 21.5 S, 170.2 E.- H=10:28:46. M=5.0 (Noumea).
31	e	00 01.0	Traces. Δ=6,670 km. ~60 dg. Atlantic Ocean 1.0 N, 28.4 W.- H=23:28:08.4; h about 33 km. (USCGS). M=4.5 (USCGS, Eureka).
Sept.			
2	e S	01 48 14	Traces. Δ=4,560 km. ~ 41 dg. Northern India 33.9 N, 74.7 E.- H=01: 34:31.6; h about 44 km. (USCGS).

Date	Phase	Time	Additional Readings and Remarks.
Sept.			
2			M=5.1 (USCGS, Port Moresby).
2	e(SKS)	00 08 08	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 45.4 N, 150.8 E.- H=23:45:00,1; h about 33 km.(USCGS). M=4.9 (USCGS, Wichita M,Uinta).
4	ei P	05 10 14CE	Very weak. Δ=1,670 km. ~15 dg.
	eiPP	25 W	Near coast of Algeria 36.0 N,5.2
	eiPPP	36 W	E.- H=05:06:42; h about 10 km.
	eiS	13 02	(BCIS). M=5.7 (Uppsala Kiruna).
4	ei P	13 41 53 C	Traces. Δ=6,280 km. ~ 56.5 dg.
	ei(S)	49 46	Near east coast of Baffin Island 71.3 N, 73.1 W.- H=13:32:12.3; h about 33 km. (USCCGS). M=$6\frac{1}{4}$-$6\frac{1}{2}$ (Pasadena, Palisades).
6	e P	06 15 56	Traces. Δ=8,890 km. ~ 80 dg. Sea of Japan 36.4 N, 130.6 E.- H=06: 03:52.1; h about 33 km. (USCGS). M=6 (Uppsala, Kiruna, Kew, Nurmijaervi, Moscow).
6	e	21 38.5	Traces. Δ=9,670 km. ~ 87 dg. Fox Island, Aleutian Islands 53.9 N, 165.6 W.- H=02:56:59.9; h about 33 km. (USCGS). M=5.0 (USCGS, Tonto Forest,Wichita M).
7	e P	01 29 02	Traces. Δ=8,890 km. ~ 80 dg. Off east coast of south Korea 36.4 N, 130.6 E.- H=01:16:55.1; h about 33 km. (USCGS). M=6 (Moscow, Uppsala, Honiara, Kew, Keve).
7	e P	07 26 10	Traces. Δ=9,390 km. ~84,3 dg. Kurile Islands 45.4 N, 150.8 E.- H=07:13:39.9; h about 33 km. M= 5.2 (USCGS).
7	e P	09 01 06	Traces. Δ=6,780 km. ~ 61 dg. Ascension Island region 11.7 S,

Date	Phase	Time	Additional Readings and Remarks.
Aug. 7			13°.6 W.- H=08:50:57.5; h about 33 km. M=5.3 (USCGS).
7	eiP	12 56 05 C	Traces. Δ=9,000 km. ~81 dg. Kamchatka 54°.0 N, 160°.3 E.- H=12:44:01.1; h about 110 km. M=4.5 (USCGS).
7	e	15 58.0	Traces. Δ=17,170 km. ~154.5 dg. Fiji Islands 22°.0 S, 179°.6 W.- H=15:16:55.4; h about 558 km. M=4.7 (USCGS).
8	ePkP	01 07 10	Traces. Δ=16,560 km. ~149 dg. Kermadec Islands region 28°.1 S, 176°.8 W.- H=00:47:27.7; h about 57 km. (USCGS). M=5.3 (Tonto Forest, Blue M, USCGS).
8	ePkP	20 09 20 C	Traces. Δ=17,170 km. ~154.5 dg. Fiji Islands region 23°.6 S, 179°.8 E.- H=19:50:29.8; h about 550 km. (USCGS). M=6 1/4 (Pasadena).
9	eiPkP$_1$	03 04 40 D	Traces. Δ=13,610 km. ~122.5 dg. New Britain 4°.4 S, 152°.7 E.- H=02:45:45.5; h about 34 km. (USCGS). M=6.2 (Uppsala Kiruna).
10	ePkP$_1$	19 34 10	ei 3412 C. Traces. Δ=16,500 km. ~148.5 dg. Fiji Islands region 19°.0 S, 175°.8 E.- H=19:14:26.8; h about 33 km. M=5.3 (USCGS).
12	ePkP$_1$	03 31 33	Traces. Δ=16,390 km. ~147.5 dg. Loyalty Islands region 22°.5 S, 170°.7 E.- H=03:11:53.9; h about 54 km. (USCGS). M=4.9 (USCGS, Eureka).

Date	Phase	Time	Additional Readings and Remarks.
Sept. 12	e P	08 20 45	Traces. Δ=840 km. ~7.5 dg. Cyprus Island 34°.6 N, 32°.1 E.- H=08:18:55; h about 45 km. (BCIS). M=5.6 (Uppsala, Kiruna).
14	e	00 48.0	Traces. Δ=11,720 km. ~105.5 dg. Ceram region Island 3°.6 S, 131°.2 E.- H=00:18:33.4; h about 33 km. (USCGS). M=5.8 (USCGS, Adelaïde).
14	e SS	04 36 37	Traces. Δ=17,670 km. ~159 dg. Kermadec Islands 31°.4 S, 179°.0 W.- H=03:52:16.9; h about 33 km. (USCGS). M=6.2 (Uppsala, Kiruna).
15	ePkP$_1$ eiPP	01 06 09 C 08 51 N	Very weak. Δ=15,110 km. ~136 dg. Santa Cruz Islands 10°.3 S, 165°.6 E.- H=00:46:54.1; h about 43 km. (USCGS). M=7 1/4-7 1/2 (Pasadena).
	e*PkP$_1$	01 06 13	Traces. Δ=15,280 km. ~137.5 dg.
17	e P	07 47 05	Traces. Δ=9,610 km. ~86.5 dg. Ecuador 1°.5 S, 77°.9 W.- H=07:34:38.7; h about 178 km. (USCGS). M=4.0 (USCGS, Cumberland Pl. Wichita M, Blue M).
17	ePkP	19 39 14 CW	Very Weak. Δ=15,110 km. ~136 dg. Santa Cruz Islands 10°.1 S, 165°.3 E.- H=19:20:08.2; h about 17 km. (USCGS). M=7.5 (Kiruna, Uppsala).
19	e SS	17 05 22	Traces. Δ=4,280 km. ~38.5 dg. North Atlantic Ocean 47°.1 N, 27°.4 W.- H=16:49:29.9; h about 33 km. (USCGS). M=4.7 (USCGS, Tonto Forest, Wichita M).
22	ePkP$_1$	03 16 09 C	Traces. Δ=16,610 km. ~149.5 dg. Fiji Islands region 19°.3 S, 175°.9 E.- H=02:56:24.3; h about 28 km. M=5.8 (USCGS).

Date	Phase	Time	Additional Readings and Remarks
Sept. 22	ePK$_1$ ei	19 41 44	Traces. Δ=16,610 km. ~ 149.5 dg. Tonga Islands region 19°2 S, 175°9 E.- H=19:21:57.1; h about 24 km. M=5.5 (USCGS).
23	eP	09 11 08	Traces. Δ=6,000 km. ~ 54 dg. Northern Rhodesia 16°6 S, 28°8 E.- H=09:01:56.8; h about 33 km. (USCGS). M=6 (Pasadena).
24	e PP eiS	16 48 45 54 58	e 48:09. Traces. Δ=11,720 km.~ 105.5 dg. Near coast of Peru 10°6 S, 78°0 W.- H=16:30:16.0; h about 80 km. (USCGS). M=7 (Pasadena).
25	e P	07 13 21	Traces. Δ=6,000 km.~ 54 dg. Northern Rhodesia 16°7 S, 28°7 E.- H=07:03:54.6; h about 33 km. (USCGS). M=5.8 (USCGS, Nurmijaervi).
26	e P	05 41 06	Traces. Δ=10,000 km.~ 90 dg. Andreanof Islands, Aleutian Islands 50°4 N, 176°9 W.- H=05:28:07.3; h about 33 km.(USCGS). M=5 1/2 (Matsushiro).
27	ePKP$_1$	11 45 37	Traces. Δ=16,330 km.~ 147 dg. Fiji Islands region 17°2 S, 174°7 E.- H=11:25:53.6; h about 33 km. (USCGS). M=5.0 (USCGS, College).
27	e S	22 37 06	Traces. Δ=6,000 km.~ 54 dg. Atlantic Ocean, northwest of Ascension Island 0°1 S, 18°4 W.- H=22:20:06.6; h about 33 km. (USCGS). M=5.0 (USCGS, Wichita M, Uinta B Blue M).

Date	Phase	Time	Additional Readings and Remarks.
Sept. 28	e P	03 41 12	Traces. Δ=7,000 km. ~ 63 dg. Atlantic Ocean, south of Ascension Island 14°3 S, 13°7 W.- H=03:30:48.8; h about 33 km. M=5.0 (USCGS).
28	ePkP	07 17 57	Traces. Δ=17,670 km.~ 159 dg. Kermadec Islands 31°5 S, 179°6 E. H=06:58:12.7; h about 457 km. M=5.0 (USCGS).
29	e	03 53.0	Traces. Δ=16,170 km.~ 145.5 dg. Balleny Islands region 62°0 S, 163°0 E.- H=02:55:05; h about 33 km (USCGS).
Oct. 3	e	16 16.0	Traces. Δ=11,830 km. ~ 106.5 dg. Sandwich Islands 58°5 S 25°1 W.- H=15:48:17.2; h about 54 km. (USCGS). M=5.9 (Kiruna).
3	e P	23 36 58CSW	Traces. Δ=9,220 km.~ 83 dg. Kyushu, Japan 32°2 N, 131°6 E.- H=23:24:34.7; h about 33 km.(USCGS). M=6 1/2 (Pasadena, Matsushiro).
4	e S	13 42 50	Traces. Δ=4,170 km. ~37.5 dg. Arabia Sea 18°0 N, 60°0 E.- H=13:29:44 (BCIS). M=5.3 (USCGS, Nurmijaervi).
5	e	02 37.6	Traces. Δ=17,110 km. ~ 154 dg. Tonga Islands 16°0 S, 173°2 W.- H=01:55:35.2; h about 79 km.(USCGS). M=5.5 (USCGS, Cumberland Pl.).
5	eiS	15 09 16	Traces. Δ=3,500 km. ~31.5 dg. French Somoliland 11°6 N, 42°8 E.- H=14:57:47.4; h about 33 km. (USCGS). M=5.6 (Uppsala, Kiruna).

Date	Phase	Time	Additional Readings and Remarks.
Oct. 5	e	17 38.2	Traces. Δ= 3,500 km. ~ 31.5 dg. Aftershock Oct.5. French Somoliland 11°.5 N, 42°.8 E.- H=17:18:21 (BCIS).
6	e	19 05.0	Traces. Δ=3,500 km. ~31.5 dg. Aftershock Oct.5. French Somoliland.- H=18:46.2 (BCIS).
7	ePkP	13 33 44	Traces. Δ=17,220 km. ~ 155 dg. Fiji Islands region 23°.6 S, 179°.9 E.- H=13:14:24.6; h about 550 km. (USCGS). M=5.7 (USCGS, Tonto Forest, Blue M, Kipapa).
8	ePkP$_1$	00 36 48	Traces. Δ=16,940 km. ~152.5 dg. Samoa Islands region 15°.1 S, 173°.2 N.- H=00:17:01.1; h about 33 km. (USCGS). M=6 (Pasadena Kew).
8	ePS	13 36 06	Traces. Δ=9,280 km. ~83.5 dg. Prince Edward Island region 45°.5 S, 35°.3 E.- H=13:12:15.8; h about 33 km. (USCGS).
9	e	02 30.3	Traces.
9	e	04 46.1	Traces. Δ=1,670 km. ~ 15 dg. Eastern Turkey 39°.9 N, 43°.0 E.- H=04:36:46 (BCIS). M=4.6 (USCGS, Stuttgart).
9	e	21 45.5	Traces. Δ=1,220 km. ~ 11 dg. Vajont Italy 46°16'.0 N, 12°20'.3 E.- H=21:41:40 (BCIS). M=5 (Uppsala, Kiruna).
11	e	11 00.0	Traces. Δ=11,780 km. ~ 107 dg. 17°.8 N, 105°.9 W.- H=10:17:07.5; h about 33 km. M=5.0 (USCGS).

Date	Phase	Time	Additional Readings and Remarks.
Oct. 11	e P	11 25 42	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 46°.0 N, 151°.9 E.- H=11:13:11; h about 30 km. M=4.3 (USCGS).
12	e P eiS	11 39 25 C 49 48	Very weak. Δ=9,330 km. ~84 dg. Kurile Islands 44°.8 N, 149°.0 E.- H=11:26:57.9; h about 40 km.(USCGS). M=6^3/4-7 (Pasadena, Palisades).
13	e P e(S)	05 30 23 C 40 51	Weak. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 44°.8 N, 149°.5 E.- H= 05:17:57.1; h about 60 km.(USCGS). M=8^1/4 (Pasadena).
	e*(P)	05 30 34	Very weak. Δ=9,390 km.~ 84.5 dg.
13	e P	05 54 39 D	Traces. Δ=9,390 km.~ 84.5 dg. Kourile Islands 46°.5 N, 151°.6 E.- H=05:42:14.2; h about 55 km. M=5.5 (USCGS).
13	e P	06 17 58 C	Traces. Δ=9,390 km.~ 84.5 dg. Kurile Islands 45°.9 N, 151°.9 E.- H=06:05:29.5; h about 55 km. M= 5.5 (USCGS).
13	e P	07 00 56	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 45°.5 N, 151°.8 E.- H=06:48:26.3 (USCGS). M=5.2 (USCGS, Uinta B).
13	e P	09 28 54	Traces. Δ=9,390 km.~ 84.5 dg. Kurile Islands 44°.6 N, 149°.6 E.- H=09:16:25.9; h about 55 km.(USCGS). M=4.9 (USCGS, Cumberland Pl. Uinta B).
13	e P	12 42 11 C	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 45°.9 N, 151°.8 E.- H=12:29:39.2; h about 30 km.(USCGS). M=5.0 (USCGS, Uinta B).

Date	Phase	Time	Additional Readings and Remarks.
Oct. 13	e P	12 54 41	Traces. Δ=9,390 km.~ 84.5 dg. Kurile Islands 44°4 N, 149°4 E.- H=12:42:13; h about 55 km.(USCGS). M=5.9 (Kiruna, Uppsala).
13	e P	13 10 50 C	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 45°0 N, 150°1 E.- H=12:58:21.6; h about 50 km.(USCGS). M=6 (Kipapa, Blacksburgh, Moscow, Uppsala, Kiruna, Kew).
13	e P	14 38 40	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 44°5 N, 149°5 E.- H=14:26:11.9; h about 50 km. M=5.1 (USCGS).
13	ei P	16 12 21 C	Traces. Δ=9,390 km.~ 84.5 dg. Kurile Islands 45°6 N, 150°5 E.- H=15:59:52.9; h about 33 km. (USCGS). M=6.3 (Kiruna, Uppsala Stuttgart,State College, Cumberland Pl.)
13	e P	19 40 07 C	Traces. Δ=9,390 km.~ 84.5 dg. Kurile Islands 45°7 N, 151°7 E.- H=19:27:38.2; h about 45 km. (USCGS). M=5.8 (Nurmijarvi, Uppsala, Kiruna).
13	e P	22 07 34 C	Traces. Δ =9,440 km. ~ 85 dg. Kurile Islands 44°7 N, 152°1 E.- H=21:55:00.8; h about 50 km.(USCGS). M=6.1 (Uppsala, Kiruna).
13	e P	00 04 54 C	Traces. Δ=9,390 km.~ 84.5 dg. Kurile Islands 44°5 N, 150°1 E.- H=23:52:22.8; h about 50 km. (USCGS). M=6.1 (Uppsala, Kiruna).

Date	Phase	Time	Additional Readings and Remarks.
Oct.			
14	e P	03 43 40	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 45°? N, 151°8 E.- H=03:31:07.8; h about 25 km. (USCGS). M=5.0 (USCGS, Moscow).
14	e P	04 18 30 C	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 44°9 N, 150°2 E.- H=04:06:01.7; h about 50 km. (USCGS). M=5.3 (USCGS, Cumberland Pl.).
14	e P	04 23 44	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 44°7 N, 150°6 E.- H=04:11:14; h about 45 km. (USCGS). M=6.1 (Uppsala, Kiruna).
14	e P	13 34 15 C	Very weak. Δ=9,390 km.~ 84.5 dg. Kurile Islands 44°8 N. 151°0 E.- H=13:21:45.2; h about 60 km.(USCGS) M=6.3 (Uppsala, Kiruna, Quetta, Kipapa, Nurmijaervi).
15	e P	08 12 44	Traces. Δ=9,390 km.~ 84.5 dg. Kurile Islands 45°0 N, 151°1 E.- H=08:00:11.5; h about 49 km. (USCGS). M=5.8 (Uppsala Kiruna).
15	e P	09 14 36	Traces. Δ=9.390 km. ~ 84.5 dg. Kurile Islands 45°3 N, 150°2 E.- H=09:02:08.3; h about 40 km. (USCGS). M=5.4 (USCGS, Blue M.).
15	e P	09 44 37	Traces. Δ=9,390 km.~ 84.5 dg. Kurile Islands 45°2 N, 150°2 E.- H=09:32:08.7; h about 40 km.(USCGS). M=5.5 (USCGS, Cumberland Pl.).
15	e P	10 59 41	Traces. Δ=9,330 km. ~ 84 dg.Kurile Islands 44°6 N, 149°0 E.- H=10:47:12.6; h about 50 km. (USCGS).M=5.4 (USCGS, Tonto Forest, Blue M.).

Date	Phase	Time	Additional Readings and Remarks.
Oct.			
15	e P	12 06 18	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 45°.1 N, 151°.9 E.- H=11:53:45.5; h about 35 km.(USCGS). M=4.8 (USCGS, Cumberland Pl.).
15	e P	18 36 29	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 45°.3 N, 151°.0 E.- H=18:23:57.8; h about 35 km. (USCGS). M=5.8 (Uppsala Kiruna).
15	e	21 29.2	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 45°.4 N, 151°.1 E.- H=20:41:30.2; h about 50 km. M=4.9 (USCGS).
16	e P eiS	15 50 21 C 56 18	Very weak. Δ=4,280 km. ~38.5 dg. Tadzhik, U.S.S.R. 38°.6 N, 73°.4 E.- H=15:43:00.8; h about 33 km. (USCGS). M=6.4 (Uppsala, Kiruna).
16	eiP	19 08 31 D	Traces. Δ=3,330 km. ~30 dg. Southern Iran 28°.8 N, 58°.0 E.- H=19:02:25; h about 32 km.(USCGS), M=4.8 (USCGS, Nurmijaervi).
17	eiP e S	23 37 02 47 22	Traces. Δ=9,330 km. ~84 dg. Kurile Islands 44°.6 N, 149°.0 E.- H=23:24:34.4; h about 45 km. (USCGS). M=6 (Pasadena).
18	e	04 34.0	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 44°.5 N, 150°.4 E.- H=04:01:21.7; h about 60 km. (USCGS). M=4.8 (USCGS, Nurmijaervi).
18	e P	09 05 55	Traces. Δ =9,390 km. ~84.5 dg. Kurile Islands 44°.8 N, 150°.2 E.- H=08:53:33.9; h about 60 km. (USCGS). M=5.7 (Kiruna, Uppsala).

Date	Phase	Time	Additional Readings and Remarks.
Oct.			
18	e	22 16.1	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 45°.2 N, 151°.1 E.- H=21:22:52.7; h about 45 km.(USCGS). M=5.9 (Uppsala, Kiruna).
19	e P	02 31 07 D	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 46°.8 N, 153°.7 E.- H=02:18:37.9; h about 45 km.(USCGS). M=6.2 (Uppsala, Kiruna).
19	e P	03 46 50 D	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 46°.6 N, 153°.8 E.- H=03:34:19.6; h about 33 km. (USCGS). M=6.1 (Kiruna, Uppsala).
19	e P	03 59 40 D	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 46°.8 N, 153°.6 E.- H=03:47:07.7; h about 25 km. (USCGS). M=5.2 (USCGS, State College, Uinta B).
19	e	16 57.7	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 44°.4 N, 150°.9 E.- H=16:15:21.4; h about 120 km. USCGS). M=5.1 (USCGS, Tonto Forest).
20	e P	01 05 41 C	Very Weak. Δ=9,390 km. ~84.5 dg. Kurile Islands 44°.7 N, 150°.7 E.- H=00:53:07.2; h about 25 km. (USCGS). M=6 3/4-7 (Pasadena).
20	e P	09 23 05 D	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 44°.4 N, 150°.0 E.- H=09:10:43.9; h about 40 km.(USCGS). M=6.1 (Uppsala Kiruna, Kobenhaven, Quetta).
20	e P	12 04 50 CN	Traces. Δ=9,390 km. ~84.5 dg. Kurile Islands 44°.7 N, 150°.2 E.- H=11:52:20.7; h about 45 km. (USGGS). M=6.1 (Uppsala, Kiruna, Köbenhaven).

Date	Phase	Time	Additional Readings and Remarks.
Oct. 20	e P	13 04 47 DN	Traces. Δ=2,330 km. ~ 21 dg. Southern Algeria 24°0 N, 5°1 E.- H=12:59:59 (BCIS). M=5.6 (USCGS, State College, Wichita M, Tonto Forest).
20	e	18 04.5	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 44°2 N, 149°6 E.- H=17:41:27.3; h about 45 km.(USCGS). M=4.8 (USCGS, College,Cumberland Pl.).
21	e P	15 50 49 D	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 45°5 N, 149°7 E.- H=15:38:24.3; h about 55 km. (USCGS). M=5.4 (USCGS, Nurmijaervi, Wichita M).
21	e P	17 33 16	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 44°1 N, 150°3 E.- H=17:20:46; h about 65 km. (USCGS). M=5.9 (Uppsala, Kiruna).
21	e	00 02.0	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 44°1 N, 150°2 E.- H=23:29:21.3: h about 55 km. (USCGS). M=5.2 (Cumberland Pl. USCGS).
22	e P	03 29 44 D	Traces. Δ=9.390 km. ~ 84.5 dg. Kurile Islands 45°0 N, 150°2 E.- H=03:17:15.2; h about 45 km. (USCGS). M=5.8 (Uppsala,Kiruna).
23	e P	09 59 36	Traces. Δ=9,390 km.~ 84.5 dg. East of Honshu, Japan 41°2 N, 144°2 E.- H=09:47:08.1; h about 50 km. (USCGS). M=5.4 (Wichita M, USCGS).

Date	Phase	Time	Additional Readings and Remarks.
Oct. 24	e P	01 18 57 C	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 44°5 N, 150°3 E.- H=01:06:25.9; h about 45 km (USCGS). M=5.0 (USCGS, Uinta B).
24	e P eiS	07 38 52 C 49 12	Traces. Δ=9,390 km.~ 84.5 dg. Off south coast of Sumatra 4°9 S,102°9 E.- H=07:26:23.9; h about 50 km. (USCGS). M=6.3 (Uppsala, Kiruna, Adelaïde).
25	eSkS	20 23 45	Traces. Δ=11,720 km. ~ 105.5 dg. Mariana Islands 12°3 N, 144°5 E.- H=19:58:58.3; h about 29 km. (USCGS). M=5.4 (USCGS, Kevo).
26	e S	04 18 32	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 44°5 N, 150°1 E.- H=03:55:39.7; h about 55 km.(USCGS). M=5.8 (Uppsala Kiruna).
26	eSSS	11 54 52	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 44°7 N, 149°7 E.- H=11:21:47.6; h about 55 km. (USCGS). M=5.8 (Cumberland Pl.Uppsala, Kiruna).
28	e	09 20.0	Traces. Δ=17,560 km. ~ 158 dg. Tonga Islands region 24°3 S,176°0 W.- H=07:55:12.3; h about 33 km. M=5.4 (USCGS).
28	e P	12 15 31	Traces. Δ=9,110 km.~ 82 dg. Off east coast of Kamchatka 52°8 N, 159°8 E.- H=12:03:19.8; h about 33 km. (USCGS). M=6.2 (Uppsala, Praha, Kiruna).
29	e	21 17.0	Traces. Δ=17,560 km. ~ 158 dg. Kermadec Islands region 26°2 S, 177°8 W.- H=20:22:15.7; h about 49 km. M=4.8 (USCGS).

Date	Phase	Time	Additional Readings and Remarks.
Oct. 29	e P	22 32 50	Traces. Δ=5,560 km. ~ 50 dg. Mongolia 47°0 N, 92°8 E.- H=22: 24:02.6; h about 118 km. (USCGS). M=5 3/4 (Moscow).
30	e	11 37.8	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 44°6 N, 150°2 E.- H=10:51:45.9; h about 65 km. M= 4.4 (USCGS).
30	e	16 08.0	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 44°8 N, 150°2 E.- H=15:21:07.2; h about 45 km. M= 4.5 (USCGS, Uinta B).
31	ePkP$_1$	03 37 36 C	Traces. Δ=17,440 km. ~ 157 dg. Tonga Islands 21°8 S, 175°0 W.- H=03:17:42; h about 33 km.(USCGS). M=6 1/4 (Pasadena, Kew).
Nov. 1	e P	22 53 48 D	Traces. Δ=9,330 km. ~ 84 dg. Kurile Islands 44°9 N, 148°9 E.- H=22:41:23.8; h about 60 km. (USCGS). M=5.5 (USCGS, Blue M, Wichita M.).
2	e	23 31.6	Traces. Δ=11,390 km. ~ 111.5 dg. Near north coast of western New Guinea 1°9 S, 138°9 E.- H=22:21: 20.7: h about 33 km. M=5.2 (USCGS).
3	e P e S	03 24 03 CE 34 41	Traces. Δ=11,220 km. ~ 101 dg. Peru-Ecuador border 3°5 S,77°8 W.- H=03:10:12.7; h about 33 km. (USCGS). M=6.0 (Trinidad, USCGS, Cumberland Pl.).
4	e P	01 31 17	Very weak. Δ=11,830 km. ~ 106.5 dg. Banda sea 6°8 S, 129°6 E.- H=01:17:08.9; h about 80 km. M= 6.3 (USCGS).

Date	Phase	Time	Additional Readings and Remarks.
Nov. 4	e P	01 31 29	Traces. Δ=11,890 km. ~ 107 dg.
6	eiPP	02 32 30 C	e? 27:46 Traces. Δ=12,330 km. ~ 111 dg. Western New Guinea 2°6 S, 138°4 E.- H=02:13:16.8; h about 33 km. (USCGS). M=6.7 (Uppsala,Kiruna).
6	e P	09 37 24 C	Traces. Δ=9,440 km. ~ 85 dg. Near West coast of Kamchatka 46°3 N, 154°8 E.- H=09:24:49.2; h about 33 km. (USCGS). M=5.4 (USCGS, Kevo, Blue M).
8	e	08 54.0	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 45°0 N, 150°9 E.- H=08:08:09.2; h about 40 km. M= 4.8 (USCGS).
9	e	01 52.0	Traces. Δ=9,390 km. ~ 84.5 dg. Aftershock. Kurile Islands.-H= 01:22:42 (BCIS).
9	e P	02 54 34	Traces. Δ=4,670 km. ~ 42 dg. South of Iceland 56°8 N, 34°6 N.- H= 02:46:44.5; h about 33 km. M=4.8 (USCGS).
9	e	09 24.0	Traces. Δ=9,330 km. ~ 84 dg. Kurile Islands 45°3 N, 150°8 E.- H=08:51: 18.6; h about 33 km.(USCGS). M= 5.2 (USCGS,College, Nurmijaervi).
9	e	13 22.6	Traces. Δ=6,500 km. ~ 58.5 dg. Atlantic Ocean 0°1S, 25°1 W.- H=12:54:30.3; h about 33 km. (USCGS). M=5.2 (USCGS, La Paz, Uinta B, Blue M).
9	e P eipP	21 28 12 D 30 22 C	An=93μ, Tn=18 sec. Ae=55μ, Te=18 sec., Δ=11,060 km. ~ 99.5 dg. M=

Date Nov.	Phase	Time	Additional Readings and Remarks.
9			6.7 (Athens). Western Brazil 9°.0S; 71°.5 W.- H=21:15:30.4; h about 600 km (USCGS). M=6^3/4-7 (Pasadena, Berkeley).
	e*P	21 28 15	Traces. Δ=11,110 km. ~ 100 dg.
10	e P	01 13 21	Traces. Δ=11,060 km. ~ 99.5 dg. Western Brasil 9°.2 S, 71°.5 W.- H=01:00:38.8; h about 600 km. (USCGS). M=6^1/2-6^3/4 (Pasadena).
10	e P	17 30 08.	Traces. Δ=9,390 km. ~ 84.5 dg.
	eiS	40 34	Kurile Islands 44°.4 N, 149°.5 E.- H=17:17:42.7; h about 40 km. (USCGS). M=6.3 (Uppsala, Kiruna).
11	e	10 22.0	Traces. Δ=9,330 km. ~ 84 dg. Kurile Islands 44°.6 N, 148°.9 E.- H=09:49:43.3; h about 55 km. M= 4.7 (USCGS).
12	eiP	07 07 50DSE	Very Weak. Δ=600 km. ~ 5.5 dg.
	eiS	08 5 4	Near southwest coast of Turkey 35°.4 N, 29°.6 E.- H=07:06:30; h about 50 km. (BCIS). M=5.3 (København).
	e*P	07 08 14	Traces. Δ=760 km. ~ 8 dg.
12	e	13 46.0	Traces. Δ=9,330 km. ~ 84 dg. Kurile Islands 44°.2 N, 149°.4 E.- H=13:00:00.7; h about 50 km.(USCGS). M=4.9 (USCGS, Tonto Forest, Tucson).
14	ePKP	04 55 24	Traces. Δ=15,830 km. ~ 142.5 dg. New Hebrides Islands 17°.5 S, 167°.7 E.- H=04:35:48.5; h about 33 km. (USCGS). M=4.8 (USCGS, Blue M.).

Date Nov.	Phase	Time	Additional Readings and Remarks.
15	e P	21 19 02 C	Very Weak. Δ=9,390 km. ~84.5 dg.
	e S	29 20	Kurile Islands 44°.3 N, 149°.0 E.-
	eiSkS	25	H=21:06:34; h about 50 km.(USCGS). M=6.5 (Uppsala, Kiruna, Eureka).
	e*P	21 19 06	Traces. Δ=9,440 km. ~ 85 dg.
16	e P	02 42 36	Traces. Δ=9,390 km. ~ 84.5 dg. Kurile Islands 44°.3 N, 149°.0 E.- H=02:30:07.0; h about 50 km.(USCGS). M=5.0 (USCGS, Moscow, Nurmijaervi).
16	ePkP	07 05 23	Traces. Δ=14,280 km. ~ 128.5 dg. Off coast of Chili 41°.3 S, 87°.5 W. H=06:46:15.7; h about 11 km.(USCGS). M=5.3 (USCGS, State College, Blue M).
16	ePkP$_1$	23 03 21	Traces. Δ=17,610 km. ~ 158.5 dg. Tonga Islands 22°.3 S, 175°.0 W.- H=22:43;26.4; h about 33 km.(USCGS). M=5.6 (USCGS, Eureka, Uinta B).
17	eiP	00 58 26 CE	Very weak. Δ=7,000 km. ~ 63 dg.
	e S	01 06 57	North Atlantic Ocean 7°.6 N, 37°.4 W.- H=00:48.2.6; h about 33 km. (USCGS). M=6.6 (Uppsala, Kiruna).
17	ePkP	13 32 45	Traces. Δ=16,830 km. ~ 151.5 dg. Fiji Islands region 17°.4 S,178°.5 W.- H=13:13:49.3; h about 509 km. M=4.7 (USCGS).
18	ePP	14 56 36	Traces. Δ=11,280 km. ~101.5 dg.
	e(SkS)	15 03 03	Gulf of California 29°.9 N, 113°.6 W.- H=14:38:28.9; h about 14 km. (USCGS). M=6.6 (Uppsala, Kiruna).

Date	Phase	Time	Additional Readings and Remarks.
Nov.			
19	e	09 17.7	Traces. Δ=11,170 km. ~100.5 dg. Gulf of California 30°9 N, 113°8 W.- H=08:23:11.6; h about 14 km. (USCGS). M=5.0 (USCGS, Blue M).
19	eiPkP	11 05 32 C	Traces. Δ=16,440 km. ~148 dg. Loyalty Islands region 22°5 S, 171°3 E.- H=10:45:49.1; h about 36 km. (USCGS). M=5 (USCGS, Afia malu, Port Moresby).
19	e P	11 13 24 C	Traces. Δ=9,330 km. ~84 dg. Kurile Islands 44°4 N, 149°2 E.- H=11:00:54.3; h about 33 km. (USCGS). M=5.6 (Uppsala, Kiruna).
19	eiP	17 50 54 C	Traces. Δ=9,060 km. ~81.5 dg. Off east coast of Kamchatka 53°1 N, 159°6 E.- H=17:38:39.7; h about 40 km. M=4.9 (USCGS).
19	e(P)	18 29 44	Traces. Δ=9,330 km. ~84 dg. Off south coast of Sumatra 5°0 S, 102°2 E.- H=18:17:02.2; h about 37 km. (USCGS). M=5.4 (USCGS, Nurmijaervi).
20	ePkP$_2$	12 20 25	Traces. Δ=17,500 km. ~157,5 dg. Tonga Islands 22°2 S, 175°2 W.- H=11:59:58.5: h about 33 km. (USCGS). M=5.6 (USCGS, Uinta B).
22	e	15 15.0	Traces. Δ=9,330 km. ~84.5 dg. Kurile Islands 44°4 N, 149°0 E.- H=14:45:51.7; h about 33 km. (USCGS). M=5.6 (USCGS, Cumberland Pl.),
22	e P eiS	20 27 15 28 13	ei 2815. Traces. Δ=535 km. ~4.8 dg. Southwestern Turkey 37°2 N, 29°7 E.- H=20:26:02; h about 40

Date	Phase	Time	Additional Readings and Remarks.
Nov. 22			km. (BCIS). M=4.4 (USCGS, Stuttgart).
22	e P eiS	21 42 47 43 48	Traces. Δ=540 km. ~4.9 dg. Southwestern Turkey 37°4 N, 29°8 E.- H=21:41:33 (BCIS). M=5.1 (USCGS).
23	e	08 30.0	Traces. Δ =11,280 km. ~101,5 dg. Gulf of California 30°1 N, 114°0W. H=07:50:46.3; h about 14 km. (USCGS). M=6.2 (Uppsala, Kiruna).
24	e	18 47.0	Traces. Δ =9,220 km. ~83 dg. Kurile Islands 46°4 N, 150°0 E.- H=18:09:08.7; h about 40 km. (USCGS). M=4.9 (USCGS, College).
25	e(SkS)	10 25 24	Traces. Δ =9,330 km. ~84 dg. Kurile Islands 44°3 N, 149°5 E.- H=10:02:24; h about 55 km. (USCGS). M=4.9 (USCGS, Cumberland Pl.)
26	ePkP	23 09 50 D	Traces. Δ 16,330 km. ~ 147 dg. Fiji Islands region 16°6 S, 175°2 E.- H=22:50:08.9; h about 33 km. (USCGS). M=5.3 (USCGS, College).
Dec. 2	eiP	21 04.00 D	Traces. Δ =4,830 km. ~ 43,5 dg. Svalbard region 80°1 N, 0°6 W.- H=20:55:58.8; h about 33 km.(USCGS). M=5.9 (Quetta, Uppsala).
4	e P e S	01 40 08 C 50 38	Traces. Δ =9,390 km. ~84.5 dg. Kurile Islands 46°2 N, 153°1 E.- H=01:27:34.1; h about 20 km. M=5.2 (USCGS).
4	e P	02 56 04	Traces. Δ =9,440 km. ~85 dg. Kurile Islands 45°9 N, 153°2 E.- H=02:43:30.4; h about 50 km.(USCGS). M=5.5 (Uppsala, Kiruna).

Date	Phase	Time	Additional Readings and Remarks.
Dec.			
4	e P	08 36 49	Traces. Δ =9,390 km. ~84.5 dg. Kurile Islands 46°1 N, 152°9 E.- H=08:24:17.1; h about 33 km. (USCGS). M=6 (Uppsala).
4	e P	15 57 23	Traces. Δ =9,440 km.~ 85 dg. Kurile Islands region 46°0 N, 153°2 E.- H=15:44:52.9; h about 40 km. M=4.9 (USCGS).
7	ePkP	04 26 53 D	Traces. Δ =17,170 km.~ 154.5 dg. Fiji Islands 22°1 S, 179°4 W.- H=04:07:52.8; h about 546 km. M= 5.5 (USCGS).
8	e P	08 05 44 D	Traces. Δ =9,390 km. ~84.5 dg. Kurile Islands 46°4 N, 153°0 E.- H=07:53:15.1; h about 20 km. (USCGS). M=5.2 (USCGS, Cumberland Pl., Stuttgart, Nurmijaervi).
10	eSkS	03 54 53	e? 49:14. Traces. Δ =11,670 km.~ 105 dg. Banda Sea 6°2 S, 128°1 E.- H=03:31:21.2; h about 366 km. M=5.6 (USCGS).
10	e S	10 23 44	Traces. Δ 1,000 km.~ 9 dg. Central Italy 42°9 N, 13°7 E.- H=10: 19:45 (BCIS).
11	$ePkP_1$	01 07 38	Traces. Δ =17,000 km.~ 153 dg. Tonga Islands region 15°1 S, 173°6 W.- H=00:41:48.3; h about 33 km. (USCGS). M=6 (Kipapa, Pasadena).
11	ei(PkP)	02 50 14	Traces. Δ =16,890 km. ~ 152 dg. Fiji Islands region 17°8 S,178°6 W.- H=02:31:19.4; h about 537 km. M=4.9 (USCGS).
11	e	17 53.8	Traces. Δ 9,830 km.~ 88.5 dg. Andreanof Islands,

Date	Phase	Time	Additional Readings and Remarks.
Dec.			
11			Aleutian Islands 51°1 N, 179°3 W.- H=17:08:12.3; h about 32 km. (US CGS). M=6.1 (Kiruna, Uppsala).
15	e P	19 46 31	A_z=5 μ, T_z=1.6 sec. Δ =9,830 km.~ 88.5 dg. m=7.1 (Athens). Java Sea 4°8 S, 108°0 E.- H=19:34;45.5; h about 650 km. (USCGS). M=7 (Pasadena, Kiruna, Uppsala, Matsushiro).
	ei(pP)	49 54 C	
	e(SkS)	55 55	
	i↓↓ S	56 20	
16	eiP	02 04 14	Very Weak. Δ =9,720 km.~ 87.5 dg. Near West coast of Sumatra 6°4 S, 105°4 E.- H=01:51:30.6; h about 64 km. (USCGS). M=6.4 (Uppsala, Kiruna).
	eiS	14 45	
18	ePkP	00 49 56 D	Very Weak. Δ =17,610 km ~ 158.5 dg. Tonga Islands 24°8 S, 176°6 W.- H=00:30:2.6; h about 46 km. (USCGS). M=7 1/2 (Pasadena).
18	e P	06 48 12 D	Traces. Δ =4,940 km. ~44.5 dg. Sinkiang Province, China 41°7 N, 82°5 E.- H=06:40:05.9; h about 33 km. (USCGS). M=6.5 (Uppsala, Kiruna).
19	e PS	17 31 57	Traces. Δ =11,720 km.~ 105.5 dg. Near coast of central Peru 9°7 S, 79°1 N.- H=17:04:07.8: h about 56 km. M=5.1 (USCGS).
20	eiS	07 20 54	Traces. Δ =890 km.~ 8 dg. Tyrrhenian sea 41°0 N, 13° 1/4 E.- H=07:17:34 (BCIS).
21	e P	13 21 39 D	Traces. Δ 9,440 km.~ 85 dg. Near west coast of Luzon, Philippines 16°1 N, 119°7 E.- H=13:09:09.6; h about 49 km. M=5.6 (USCGS).

Date	Phase	Time		Additional Readings and Remarks.
Jan.				
13	e Pn	21 41 46.0		Very Weak. Δ =240 km. ~ 2.2 dg.
	eiSn	42 13.7		Felt in Karditsa (V at Artesia-
	eiSb	16.0		non, IV+ at Prodromos, IV at
	eiSg	20.7		Karditsomagoula, II+ at Kedros)
				and Evrytania (IV at Agrapha).
15	eiP	15 04 47.5	DSE	An=7 μ , Tn=1.4 sec., Ae=12 μ ,
	eiS	05 11.4		Te=1.2 sec., Δ =210 km.~ 1,9 dg.
				M=4.5 (Athens). Off north coast
				of Crete Island 36°.1 N, 24°.0 E.-
				H=15:04:17, h about 100 km.
				Recorded up to 126° N° of station
				46 (BCIS). M=5.2 (Wichita M).
				Felt on Crete Island, especially
				in Chania (V+ at Galatas, IV at
				Chania, Souda) and Heraklion
				(III at Heraklion). Area of felt
				shaking about 55,000 km^2. M.M.=
				5.3.*
15	eiSg	16 22 25.0		Traces. Felt in Arcadia (IV+ at
				Vytina).
15	e Pg	21 25 39.2		An=3 μ , Tn=2 sec. Ae=4 μ , Te=
	eiSb	26 02.4		2.3 sec., Δ =220 km. ~ 2 dg.-
				M=4.1 (Athens). West of central
				Greece. 38°.7 N, 21°.4 E.- H=21:
				25.00. Recorded up to 27°; N° of
				station 10 (BCIS). Felt in Ae-
				tolia (V+ at Kaenourghion, Agri-
				nion, IV at St.-Vlasios), Acar-
				nania (V at Chalkiopoulon) and
				Evrytania (IV at Kerasochori).
				Area of felt shaking about 5,000
				km^2. M.M=3.8 * . h=17 km.
15	e	22 28 06.0		Traces. Felt in Evrytania (IV
				at Agrapha).
16	ei	15 10 35.7		Traces. Felt on Crete Island
				(IV at Kandanos).

Date	Phase	Time		Additional Readings and Remarks.
Jan.				
16	eiPn	17 03 46.0	D	Traces. Δ =240 km. ~2.2 dg. Felt
	eiSn	04 14.0		in Acarnania (IV+ at Archontocho-
				ri, IV at Mytikas).
17	e Pn	01 09 11.4		Traces. Δ =240 km.~ 2.2 dg. Felt
	eiSn	39.0		in Acarnania (IV at Astakos).
19	e Pn	08 23 27.5		Very weak. Δ =205 km.~ 1.9 dg.
	eiSg	56.6		Aftershock of Jan.15. West of
				Central Greece. H=08:22.9. Record-
				ed up to 4°; N° of stations 2
				(BCIS). Felt in Aetolia (IV at St.-
				Vlasios).
23	eiSg	04 56 41.0		Traces. Felt in Acarnania (II+ at
				Astakos).
23	e Pg	15 25 56.6	D	Traces. Δ =140 km.~ 1.3 dg. Felt
	eiSg	26 14.2		in Arcadia (IV at Vytina).
24	e Pn	03 59 56.8		Very weak. Δ =445 km. ~4.0 dg. Near
	eiPy	04 00 06.1		coast of Albania 40°.4 N. 19°.6 E.-
	eiSn	43.5		H=03:58:56. Recorded up to 88°.
	eiSb	52.5		N° of Stations 29 (BCIS). Felt on
				Corfou Island (III+ at Avliotes).
24	eiPg	16 03 29.0	CSW	Very weak. Δ =35 km. ~ 0.3 dg. Felt
	eiSg	33.8		in Attica (III at Kalamos).
25	eiPn	01 46 49.2	D	Very weak. Δ =245 km. ~ 2.2 dg.
	e Pb	50.5		Felt in Acarnania (IV+ at Astakos,
	eiPy	52.0	D	Mytikas), Aetolia (IV+ at Agrini-
	eiSn	47 17.4		on, IV at Panaetolion) and on Leu-
				kas Island (III at Leukas).
26	e Pn	11 07 37.1		Traces. Δ =290 km.~ 2.6 dg. Felt
	e Py	41.5		on Cephalonia Island (IV+ at Svo-
	e Pg	44.6		ronata, Argostoli, IV at Lixouri).
	eiSb	08 13.3		

Date	Phase	Time	Additional Readings and Remarks.
Jan.			
26	e Pn	22 26 53.8	Traces. Δ =455 km. ~ 4.1 dg. Off
	e Pb	59.3	south coast of Crete Island about
	eiPy	27 03.5	34° N, 25° E.- H=22:25.8. Record-
	eiSn	41.2	ed up to 96°; N° of stations 8 (BCIS).
27	eiPn	09 45 30.5 D	Traces. Δ =200 km. ~ 1.8 dg. Felt
	eiSg	58.4	in Elis (IV+ at Letrinoe,Strephi).
28	e	03 16 31.3	Traces. Felt in Elis (III+ at Letrinoe).
29	e Sg	08 21 55.2	Traces. Felt in Elis (III+ at Letrinoe).
30	e	10 30 37.5	Traces. Felt in Argolis (III at Karya).
31	eiPn	15 07 42.6 C	An=16μ , Tn=2.6 sec., Ae=26 μ,
	eiPb	45.0CE	Te=2.3 sec. Δ=290 km. ~2.6 dg.
	e Py	47.0 S	M=5.1 (Athens).
	eiPg	50.7 W	Off south coast of Peloponnesus35°9 N,
	eiSy	08 22.0	21°8 E.- H=15:07:01.8; h about
	eiSg	25.8	25 km. Recorded up to 92°;N° of stations 57 (BCIS); M=5.1 (Wichita M.) 6.1 (Matshchiro),4.5 (Moscow).
Feb.			
1	eiPn	19 19 52.3 D	Very weak. Δ =115 km. ~1 dg.
	eiSn	20 06.1	Felt in Corinthia (V+ at Panariti)
	eiS$_{33}$S	07.0	and Arcadia (IV+ at Levidi).
	eiSg	07.5	
2	eiSg	01 25 04.1	Traces. Felt in Achaïa (VI at Pharae, V at Patras, IV+ at Kryoneri, III+ at Selianitika, III at Kounina. Mintiloglion, Psathopyrgos) and in Aetolia (III+ at Mesolonghi, St.-George, III at Palaeochori II+ at Perithorion).

Date	Phase	Time	Additional Readings and Remarks.
Feb.			
2	e	14 30 34.0	Traces. Felt in Achaïa (IV at Patras).
2	e	17 55 06.6	Traces. Felt in Achaïa (IV at Patras).
5	e Sn	09 37 39.5	Traces. Δ =465 km. ~4.2 dg. Off south east coast of Crete Island 34°5 N, 26°7 E.- H=09:35:44. Recorded up to 34°; N° of Stations 9 (BCIS).
6	e Pn	02 56 12.6	Traces. Δ =280 km. ~ 2.5 dg. Felt
	e(Pg)	20.2	in Jannina (III+ at Terovon) and
	eiSn	43.9	in Preveza (III at Parga).
	eiSg	54.1	
8	e Pn	01 26 20.0	Traces. Δ =230 km. ~ 2.1 dg. Felt
	eiSn	46.5	in Elis (IV+ at Amalias, IV at Letrinoe).
8	eiPg	01 49 41.4 D	Very weak. Δ =80 km. ~ 0.7 dg. Felt
	eiSg	51.5	in Boeotia (IV+ at Ste.- Trias).
9	e	02 42 36.0	Traces. Felt in Arta (III at Drossopighi).
14	e Pn	12 48 58.5 D	An=3 μ , Tn=4.4 sec. Ae=5 μ, Te=4
	e Py	49 07.0 C	sec. Δ =420 km. ~ 3.8 dg. M=4.6
	eiSb	50.0	(Athens). Near coast of Albania
	eiSy	56.0	40°4 N, 19°9 E.- H=12:48:02; h
	eiSg	50 03.0	about 33 km. (USCGS). Recorded up to 87°; N° of stations 33. (BCIS). M=4.4 (College, USCGS).
15	e Pn	07 31 36.5 D	Traces. Δ =270 km. ~2.4 dg. Felt
	eiSy	32 12.5	on Samos Island (IV+ at Pagondas).
	eiSg	16.0	

Date	Phase	Time	Additional Readings and Remarks.
Feb.			
15	eiPn	10 19 19.5 C	An=6 μ, Tn=2.4 sec. Ae=10 μ, Te=
	ei(Py)	28.4 C	4.2 sec. Δ=410 km. ~3.7 dg. M=
	ei(Sb)	20 10.0	4.8 (Athens). Albania 40°2 N,
	ei Sy	15.8	20°1 E.- H=10:18:20. Recorded up to 84°; N° of stations 67 (BCIS). M=4-4 1/2 (Moscow), 4.6 (College).
16	e Pn	03 51 47.1 C	Traces. Δ=295 km. ~2.7 dg. Felt
	eiPg	55.0 D	in Preveza (V+ at Gorgomylos, III
	eiSb	52 24.1	at Kamarina) and in Arta (IV+ at Korphovouni, IV at Gramenitsa).
16	eiP	06 22 08.1 D	Very weak. Δ=400 km. ~ 3.6 dg.
	ei(S)	51.0	Near coast of Turkey 36°7 N, 28°0 E.- H=06:21:13.2; h about 101 km. (USCGS). Recorded up to 93°; N° of stations 37 (BCIS). M=4.1. (College, USCGS). Felt on Rhodes Island (IV at Maritsa). Area of felt shaking about 5,000 km2. M.M=3.8*
18	e Pn	16 30 11.5	Very weak. Δ=230 km. ~ 2.1 dg.
	eiPb	13.0 C	Felt in Messinia (IV at Kyparis-
	eiPg	16.5	sia).
	eiSn	38.0	
	eiSb	39.9	
	eiSg	44.5	
19	eiSg	20 02 21.5	Traces. Felt in Preveza (V+ at Gorgomylos) and in Arta (IV+ at Tetrakomon).
20	e	17 14 31.2	Traces. Felt in Jannina (V+ at Platanousa).
21	eiPn	10 29 42.0DW	Very weak. Δ=325 km. ~2.9 dg.
	ei(Pb)	45.4SW	Epirus 39° 1/2 N, 20° 1/2 E.- H=10:
	ei(Pg)	52.0 C	28:59. Recorded up to 28°; N° of
	eiSg	30 31.4	stations 15 (BCIS). Felt in Preveza (V+ at Papadatae, IV at Kranaea) and in Jannina (IV+ at Terovo).

Date	Phase	Time	Additional Readings and Remarks.
Feb.			
22	e Pn	14 13 48.1 D	An=19 μ,, Tn=3.9 sec. Ae=13 μ,,Te=
	ei(Py)	55.3 DN	3.7 sec. Δ=385 km. ~3.5 dg. M=5.2
	ei Sn	14 29.1	(Athens). Albania 40°4 N, 20°4 E.-
	ei Sb	35.6	H=14:12:52. Recorded up to 88°;
	ei(Sg)	37.1	N° of stations 103. Slight damage was reported from Argyrocastron and Tepeleni. It was felt as far as Skopje (IV) (BCIS). M=5.2 (Collm), 5 (Moscow), 4.8 (Tulsa); 4 1/2(Kew), 4.4 (College).
23	e Pn	20 22 17.2 D	Traces. Δ=310 km. ~2.8 dg. Felt
	eiSg	23 04.2	on Crete Island: in Heraklion (IV at Myron III+ at Charax).
24	eiSg	07 36 20.5	Traces. Felt on Crete Island, especially in Lasithi (IV+ at Phourni, IV at Vrachasi, Limnae) and in Heraklion (III+ at Limin-Chersonisou).
24	e	13 55 13.1	Traces. Felt on Cephalonia Island (III at Argostoli).
24	eiPn	22 22 17.8 D	Very weak. Δ=260 km. ~2.3 dg.
	eiPy	21.1 W	NW of Greece, about 39° N, 21° 1/4
	eiPg	23.9	E.- H=22:21.7. Recorded up to 33°;
	eiSn	47.0	N° of stations 13 (BCIS). Felt in
	eiSg	56.0	Preveza (V at Michalitsi, Myrsini, IV+ at Preveza, III at Parga).
25	e	00 22 45.3	Traces. Felt in Preveza (III+ at Preveza).
26	e Pg	12 11 06.0	Traces. Δ=275 km. ~2.5 dg. Felt
	eiSg	39.5	in Arta (III+ at Kypseli).
27	e Pn	04 07 36.2 D	Traces. Δ=280 km. ~2.5 dg. Felt
	e Sn	08 07.4	in Preveza (V+ at Gorgomylos, IV+
	eiSb	10.8	at Philipias) and in Arta (IV at
	ei(Sy)	14.8	Tetrakomon).

Date	Phase	Time	Additional Readings and Remarks.
Feb. 28	e Pn	19 17 28.5 D	Traces. Δ =410 km. ~ 3.7 dg.
	ei(Pb)	32.3 C	Epicentre probably off south of
	eiSg	18 32.5	Crete Island (BCIS).
March 1	e Pn	09 31 14.4	Very weak. Δ=245 km.~~2.2dg.
	ei(Sn)	42.0	South of Greece 35°8 N, 23°1 E.-
	eiSb	45.1	H=09:30:43.2; h about 156 km.
	eiSg	49.8	(USCGS). Recorded up to 79°; N°
			of stations 14. (BCIS). Probably
			surface focus (Athens).
1	e Pn	11 28 06.4	Traces. Δ =295 km. ~2.7 dg. Felt
	e Sg	50.5	in Jannina (VI at Pigadia, IV at
			Zitsa). Cracks were observed in
			10 houses at Pigadia. About 20
			aftershocks were felt in Zitsa.
1	e(Pn)	22 29 34.5	Traces. Felt in Preveza (IV+ at
			Gorgomylos).
2	e Pn	04 00 45.3	Traces. Δ =270 km. ~ 2.4 dg. Felt
	e Sn	01 15.5	in Arta (IV at Kypseli).
2	e Pn	15 59 02.4 D	Very weak. Δ =315 km. ~2.8 dg.
	e Pb	05.0	Epirus.- H=15:58.4. Recorded up
	e(Pg)	11.0 W	to 25°; N° of stations 5 (BCIS).
	eiSb	41.0	Felt in Jannina (IV+ at Terovo)
	eiSy	45.0	and in Preveza (IV at Papadatae).
2	e Pn	17 13 13.0	ei 1314 C. Very weak. Δ =320 km.
	eiPb	16.0	~ 2.9 dg. Epirus about 39°3/4 N,
	eiPy	18.5	20°3/4 E.- H=17:12.4. Recorded
	eiPg	22.5 D	up to 25°; N° of station 4 (BCIS).
	eiSn	48.0	Felt in Jannina (IV+ at Terovo)
	ei(Sb)	53.2	and in Preveza (IV at Papadatae).
	eiSy	56.5	
	ei(Sg)	14 00.5	
3	eiPn	20 16 58.0 D	Traces. Δ=145 km. ~1.3 dg. Felt
	eiSn	17 14.5	in Achaïa (IV+ at Selianitica, IV
			at Temeni, III+ at Rododaphni).

Date	Phase	Time	Additional Readings and Remarks.
March 4	e Pb	09 21 36.5	Traces. Δ =315 km. ~ 2.8 dg. After-
	eiPg	42.8	shock; felt in Jannina (IV at Te-
	e Sn	22 08.1	rovo).
	eiSb	13.0	
4	e Pn	15 11 07.5 W	An=26 μ, Tn=3.6 sec. Ae=48 μ, Te=
	eiPb	10.7 S	4.9 sec. Δ =345 km. ~ 3.1 dg. M=
	ei!Py	13.6 W	5.4 (Athens). Crete Island 35°2 N,
	i Sn	44.8	25°3 E.- H=15:10:16. Recorded up
	i!!!(Sg)	12 01.0	to 135°; N° of Stations 120 (BCIS).
			M=5 (Moscow, Kew), 4.8 (Stuttgart).
			Felt on Crete Island, especially
			in Heraklion (VI at Moerae, IV+
			at St.- Myron, Arkalochori, Ampe-
			louzos, Archanae, Charax, Pitsidia,
			IV at Ste·- Varvara, Zaros, Herak-
			lion, Pyrgos), in Lasithi (V+ at
			Malae, Phourni, IV at Hierapetra,
			Kato-Chorio, Limnae, III at St.-
			Nikolaos) and in Rethymnon (III+
			at Melampes). Area of felt shaking
			about 10,000 km^2. M.M.=7.3 *.
5	e Sn	03 29 35.4	Traces. Δ =295 km. ~ 2.7 dg. Darda-
			nellia region about 40° N, 26° E.-
			H=03:28.3. Recorded up to 13° ;
			N° of stations 13 (BCIS).
5	e Pn	07 54 18.9	Very weak. Δ =305 km. ~ 2.7 dg.
	e Pb	21.5	Aegean Sea 36°1 N, 26°2 E.- H=
	ei(Py)	23.5 D	07:53:39.2; h about 77 km. (USCGS).
	eiSy	55 00.6	Recorded up to 93°; N° of stations
	eiSg	04.5	16 (BCIS). Probably surface focus
			(Athens).
			Felt on Crete Island; especially
			in Heraklion (IV at Archanae, St.-
			Myron, Ste.- Varvara, III+ at Ar-
			kalochori).
			Area of felt shaking about 80,000
			km^2. M.M.=5.3 *.

Date	Phase	Time		Additional Readings and Remarks.
March				
5	e Pn	13 04 43.0	C	Very weak. Δ =140 km. ~ 1.3 dg.
	eiPg	45.5	D	Felt in Arcadia (IV at Vytina).
	eiSg	05 02.5		
5	e	17 55 13.5		Traces. Felt on Crete Island; especially in Heraklion (III+ at Arkalochori).
6	e Pn	04 05 53.5		Traces. Δ =340 km. ~ 3.1 dg.
	eiSb	06 34.9		Felt on Crete Island; especially
	e Sg	44.6		in Heraklion (IV at Arkalochori, Charax, III+ at St.- Myron).
6	e Pn	22 35 58.0		Very weak. Δ =285 km. ~ 2.6 dg.
	e(Pg)	36 06.1		Ionian Islands about 38°1/2 N,
	eiSb	33.4		20°1/2 E.- H=22:35.3. Recorded up
	eiSy	36.2		to 15°; N° of stations 4. (BCIS).
	eiSg	40.1		
7	e Pn	04 03 40.0		Traces. Δ =340 km.~ 3.1 dg. Felt
	eiPg	50.0		on Crete Island; especially in He-
	eiSg	04 31.3		raklion (III+ at Charakas).
8	e Pg	03 29 20.7	C	Traces. Δ =230 km. ~ 2.1 dg. Felt
	e Sn	42.7		in Aetolia (IV at Rigani).
	eiSb	44.4		
9	e	11 04 33.5		Traces. Felt in Evrytania (IV at Karpenisi).
11	eiPn	07 28 26.5	D	An=120 μ, Tn=4.9 sec. Ae=42 μ,
	eiSn	29 17.2		Te=3 sec. Δ =485 km. ~ 4.4 dg. M=6 (Athens). Turkey 38°0 N, 29°2 E.- H=07:27:22; h about 33 km. Recorded up to 123°; N° of Stations 140 (BCIS). M=5.2 (Stuttgart Kew, Albuquerque), 5.5 (Eureka) 5.7 (State College, Georgestown), 5.9 (Ljubliana), 5 1/2-5 3/4 (Matsushiro).

Date	Phase	Time		Additional Readings and Remarks.
March				
12	e Pn	07 31 38.5	C	Very weak. Δ =220 km. ~2 dg.
	eiPg	42.5	D	Felt in Evrytania (IV at Agrapha).
	eiSn	32 04.9		
	eiSb	06.3		
	eiSg	10.0		
12	e Pn	09 02 37.4	D	An=3 μ, Tn=2 sec. Ae=4μ, Te=1.6
	eiPb	39.0	D	sec. Δ =265 km. ~ 2.4 dg. M=4.2
	eiPy	40.8	D	(Athens). North Greece, about 40°
	eiPg	43.4		N, 22° E.- H=09:02.0. Recorded up
	eiSn	03 07.0		to 25°; N° of stations 11 (BCIS).
	eiSy	12.5		
	eiSg	16.0		
12	eiSg	19 51 11.5		Traces. Felt in Evrytania (IV at Karpenisi).
12	eiPn	21 21 43.6	D	Very weak. Δ =250 km. ~ 2.3 dg.
	e Pb	45.1		Felt in Messinia (III+ at Gargalia-
	e(Py)	46.9		noe, Chandrinou).
	eiPg	48.9	D	
	eiSb	22 14.1		
	eiSy	16.6		
13	e Pn	07 52 14.0		Traces. Δ =280 km. ~ 2.5 dg.
	eiPg	20.9		Felt on Leukas Island (IV at Karya).
	eiSb	48.4		
13	e Pn	17 02 24.6	C	Very weak. Δ =235 km. ~ 2.1 dg.
	e Py	26.9	C	Felt in Arta (IV at Tetrakomon)
	eiPg	29.5	D	and in Evrytania (IV at Agrapha).
	eiSn	52.0		
	eiSy	55.7		
14	e Pn	01 51 01.1	C	Very weak. Δ =340 km. ~3.1 dg.
	eiPg	11.6	S	Epirus, 39°7 N, 20°6 E.- H=01:50:
	eiSn	38.1		10. Recorded up to 25°; N° of stations 12 (BCIS). Felt in Jannina (III+ at Doliana).

Date	Phase	Time	Additional Reading and Remarks.
March			
14	e Pn	08 49 54.7	Traces. Δ=200 km.≈ 1.8 dg.
	eiPy	56.0D	Felt in Evrytania (IV at Phourna).
	eiPg	57.7D	
	eiSb	50 19.8	
	eiSg	22.4	
14	e Pn	12 10 58.3D	Very weak. Δ=195 km.≈ 1.8dg.
	e Pb	59.0D	Felt in Evrytania(IV+ at Karpenisi, IV at Phourna) and in Phthiotis (III + at Leuka).
	eiPg	11 01.0C	
	eiSn	21.7	
	eiSy	23.7	
14	ei	12 24 00.9	Traces.Felt in Evrytania (IV at Phourna).
14	ei	15 03 13.1	Traces Felt in Evrytania (IV at Karpenisi)
14	e Pn	15 13 13.5D	Traces Δ =185 km ~ 1.7 dg.
	eiSg	38.6	Felt in Evrytania (IV at Karpenisi).
14	e Pn	22 33 31.7GSE	Very weak. Δ=195 km ~ 1.8dg.
	eiPg	34.6D	Central Greece,about 39°1/2 N,
	eiSn	55.0	22°1/2 E.- H=22:33.0.Recorded up
	eiSg	58.4	to 20°.N° of stations 4 (BCIS). Felt in Evrytania(IV at Karpenisi).
15	e	03 21 22.5	Traces. Felt in Jannina (IV+ at Terovo).
15	eiSg	09 01 52.0	Traces. Felt in Evrytania (IV+ at Karpenisi).
15	e Pn	09 10 47.5	Traces. Δ =220 km. ~ 2 dg.
	eiSg	11 19.0	Felt in Evrytania (IV at Karpenisi).
15	e Pn	09 18 48.5C	Very weak. Δ =200 km. ~ 1.8 dg.

Date	Phase	Time	Additional Readings and Remarks.
March			
15	eiSn	19 11.5	Felt in Evrytania (IV at Karpenisi)
15	ei	15 01 08.5	Traces. Felt in Evrytania (IV at Karpenisi).
16	e Pn	01 29 02.3C	Traces. Δ=170 km. ~ 1.5 dg.
	eiPg	03.8D	Felt in Magnesia (IV at Nea-Ionia).
	eiSg	25.0	
17	e Pn	14 18 02.2	An=16μ, Tn=3,5 sec, Ae=20μ,Te
	eiPy	06.5	=5 sec. Δ =290 km. ~ 2,6 dg.
	eiSn	34.0	M=5.0 (Athens).Epirus 39.°4 N,
	eiSb	38.5	21°.0 E.-H=14:17:18.Recorded up to
	eiSy	41.0	92°. N° of stations 90 (BCIS).
	eiSg	45.0	M=4.7 (Albuquerque). According to Press reports the shock incurred damages in the region of Philippias; especially in the localities Gymnotopos, Ammotopos, Gorgomylos and Kastri; It was reported that one house and 44 cisterns were distroyed and 129 houses were cracked. The shock was felt in Preveza (VI+at Gymnotopos, VI at Gorgomylos, V+ at Kastri, IV+ at Philipias, IV at Kranaea III+ at Kamarina, Louros), Jannina (VI+ at Platanousa, IV+ at Terovo, III at Jannina) and Arta (VI+ Amotopos). Area of felt shaking about 5,000 km². M.M.=3.9* ,
17	e	15 27 51.3	Traces. Felt in Preveza (III+ at Gorgomylos).
18	ePn	11 42 53.0	Very weak. Δ =200 km. ~ 1.8 dg.
	i Sn	43 17.0	Felt in Evrytania (IV+ at Agrapha)
	i Sy	19.5	
	i Sg	20.5	
18	e Pn	11 57 11.0	Traces. Δ=195 km. ~ 1.8 dg.

Date	Phase	Time	Additional Reading and Remarks.
March			
18	e(Pb)	11.4D	Felt in Evrytania (IV+ at Agra-
	eiSn	34.5	pha).
	eiSb	35.4	
18	e Pn	11 59 52.0D	Very weak. Δ =200 km. ~ 1.8 dg.
	eiPy	53.6C	Aftershock of March 14. Central
	eiSn	12 00 15.7	Greece 39°1/2 N, 22°1/2 E.- H=
	eiSb	17.0	11:59:30. Recorded up to 14°; N°
	eiSg	19.8	of stations 3 (BCIS). Felt in Evrytania (IV+ at Agrapha III at Karpenisi).
18	eiSg	13 54 56.0	Traces. Felt in Evrytania (V at Agrapha).
18	e Pn	14 15 44.5DN	Weak. Δ =200 km. ~ 1.8 dg.
	eiPy	45.5D	Central Greece 38°9 N,21°.9 E.-
	eiPg	47.5 D	H=14:15:11.
	eiSg	16 12.2	Recorded up to 72°.;N° of stations 14 (BCIS). Felt in Evrytania (V at at Karpenisi).
18	eiSg	15 18 10.5	Traces. Felt in Evrytania (IV at Karpenisi).
18	eiPn	21 51 03.7D	Very weak. Δ =200 km. ~ 1.8 dg.
	eiPy	05.1D	Felt in Evrytania (IV at Karpe-
	eiSn	27.3	nisi).
	eiSg	31.5	
22	e Pn	22 28 00.3D	Very weak. Δ =265 km. ~ 2.4 dg
	e Pb	01.7	Epirus about 39o N, 21° E.-22:
	eiPg	06.2E	27.4;Recorded up to 21°; N° of
	ei(Sn)	30.4	stations 7 (BCIS).
	eiSb	35.8	
	eiSg	38.3	

Date	Phase	Time	Additional Readings and Remarks.
March			
23	e Pn	22 42 18.6D	Very weak. Δ =210 km. ~ 1.9 dg.
	eiPy	20.2D	Felt in Messinia (IV at Pylos,
	eiSn	43.0	III+ at Methoni, Kyparisia).
	eiSy	46.0	
	ei(Sg)	48.1	
24	eiSg	17 00 59.1	Traces. Felt in Messinia (IV at Chandrinou).
25	e?(Pn)	07 14 50.3	Traces. Δ =265 km. ~ 2.4 dg.
	e(Pb)	51.9	Felt in Preveza (V+ at Michalitsi).
	eiSn	15 20.2	
25	e	09 06 47.2	Traces. Felt in Salonica (IV+at kryoneri).
27	e	02 05 24.8	Traces. Felt in Arta (IV at Drosopighi).
27	eiSg	08 28 14.5	Traces.Felt in Phthiotis (IV+ at Neo-Monastiri) and in Larisa(IV at Eretria, III + at Pharsala)
27	e	11 06 07.9	Traces. Felt in Phthiotis (IV+ at Neo-Monastiri).
27	e	15 18 29.8	Traces. Felt in Messinia (IV at Chandrinou).
29	eiPn	03 10 00.0 C	An=6μ, Tn=2.2 sec, Ae=4μ, Te=2sec.
	eiPy	06.8 E	Δ =355 km.~ 3.2 dg. M=4.6(Athens).
	eipg	11.0 Dn	Northwestern Turkey 40°.4N, 26°.
	eiSg	53.9	4 E.- H=03:09:16; h about 33 km. Recorded up to 90°; N° of stations

Date	Phase	Time	Additional Readings and Remarks.
March			
29			73 (BCIS). M=4 1/2 (Moscow), 4.4 (USCGS, College). Felt in Evros (V at Nea-Vyssos, IV+ at Pherrae, Paliourion, Didymotichon, IV at Lavara, Zoni, Peplos, Ardanion, Pithion, Soufli, Kavyli, Mani, Orestias, Makri, Alexandroupolis), and on Lesbos Island (IV at Kalloni). Area of felt shaking abour 50,000 km^2. M.M=5.2 *
29	ei P	21 52 57.4 C	ei5300, ei5356 Very weak. Δ = 500 km. ~4.5 dg. Dodecanese Islands region 35°.6 N, 28°.6 E.- H=21:52:08; h about 33 km(USCGS). Recorded up to 82° ; N° of stations 11 (BCIS), Probably intermediate shock.
	ei S	53 48.0	
30	eiPn	17 26 05.0 D	Traces. Δ=355 km. ~ 3.2 dg. Dodecanese (BCIS).
	eiSn	43.1	
	eiSy	52.7	
31	eiPg	14 01 42.1 0	e01:40. Traces, Δ =390 km.~ 3.5 dg.Felt on Crete Island; especially in Lasithi (IV+ at Kato-Chorion).
	eiSn	02 11.0	
	eiSb	17.6	

Date	Phase	Time	Additional Readings and Remarks.
Avril			
2	e	11 37 47.1	Traces. Felt in Jannina (III+ at Konitsa).
3	e Pn	03 59 11.8	Traces. Δ =200 km. ~ 1.8 dg. Felt in Elis (III+ at Letrinoe).
	e Pb	12.6	
	eiSg	39.5	
3	e	04 41 13.9	Traces. Felt in Arta (IV+ at Drosopighi).
6	eiPn	09 47 34.8 D	Very weak. Δ =240 km. ~2.2 dg. Epirus about 39°N, 21° E.- H=09:46:57 (Probably 38°1/4 N, 21°E). Recorded up to 25; N° of stations 7 (BCIS). Felt on the Islands: Cephalonia (V at Vlachata, Spartiae, Svoronata, IV+ at Lixouri, Argostoli, III at Digaleton), Ithaca(III+ at Ithaca) and in Acarnania (IV at Astakos). Area of felt shaking about 30,000 km.^{2} M.M=4.8 *,
	e Pb	36.0 E	
	eiSn	48 02.5	
	eiSy	06.5	
	eiSg	09.1	
6	e	10 03 25.2	Traces. Felt on Cephalonia Island (IV+ at Lixouri, Vlachata).
7	e	00 51 46.6	Traces. Felt on Euboea Island (IV + at Psachna).

Date	Phase	Time	Additional Readings and Remarks.
Avril			
8	e Pn	08 51 15.1	Wery weak. Δ=265 km. ~ 2.4 dg.
	e Py	18.4	Felt in Acarnania (IV+ at Pa-
	eiSn	45.2	laeros, IV at Archontochori).
	eiSy	50.4	
	eiSg	53.7	
8	e	14 26 29.0	Traces. Felt in Magnesia (IV+ at St.-George-Nilias).
8.	eiPn	16 14 51.7 C	Very weak. Δ=165 km. ~ 1.5 dg.
	eiPg	52.7 C	Felt in Magnesia (IV+ at Kato-
	eiSg	15 13.8	Lechonia, Agria IV at Sesklon).
9	e	13 29 32.5	Traces. Flet in Acarnania(IV at Archontochori).
9	e Pg	19 11 56.9	Traces. Δ=270 km. ~ 2.4 dg.
	eiSb	12 23.5	Felt in Acarnania (IV at Ar-
	eiSg	30.0	chontochori).
10	e Pb	00 32 33.2	Very weak. Δ=305 km. ~ 2.7 dg.
	e Py	35.6	Epirus 39° 3/4 N; 21° 0 E.-H=
	eiSn	33 04.6	00:31:45. Recorded up to 18°;
	eiSy	12.6	N° of stations 5 (BCIS).
			Felt in Jannina (V+ at Plata-
			nousa).
			Area of felt shaking about
			5,000 km.^{2} M.M.=3.8 *,

Date	Phase	Time	Additional Readings and Remarks.
April			
12	ei P	23 59 37.1DSW	Weak. Δ =255 km ~ 2.3 dg.
	ei S	00 00 04.6	Off south coast of Peloponnesus
			36°4 N, 21°7 E.-H=23:59:01;h
			about 50 km. Recorded up to 43°;
			N° of stations 18 (BCIS).
13	e Sn	18 53 41.5	Traces. Δ=515 km. ~ 4.6 dg.
	e Sb	51.2	Coast of Albania, Durazzo region,
			about 41° 3 N, 19°5 E.- H=18:51.6.
			Recorded up to 25°; N° of stat-
			ions 5 (BCIS).
14	e*Pg	23 15 33.9	Traces. Δ =75 km. ~ 0.7 dg.
	eiPn	23 15 50.9 D	Very weak. Δ =195 km. ~ 1.8 dg.
	eiPy	52.2 D	Central Greece 38°9 N, 21°8 E.-
	eiSn	16 14.4	H=23:15:20; Recorded up to 13°
	eiSy	16.5	N° of stations 7 (BCIS).
	eiSg	17.8	
15	e*Pg	19 14 05.4	Traces. Δ =70 km. ~ 0.6 dg.
	e Pn	19 14 21.6 C	Traces. Δ =175 km. ~ 1.6 dg.West
	e Py	22.0 S	Peloponnesus about 37°1/2 N,
	eiSn	43.0	21°3/4 E.-H=19:13:52(Athens).
	eiSg	44.5	Felt in Elis(V at Strephi, Makry-
			sia, II + at Letrinoe).
17	e Pn	00 10 29.8	Traces. Δ =260 km. ~ 2.3 dg.
	eiSn	59.0	Felt on Crete Island; especially
			in Chania (IV at Voukolia).
19	ei P	07 31 06.0DSE	e31:04D.An=4μ, Tn=3.5 sec, Ae=3μ,
	ei S	42.0	Te=2.7 sec. Δ =350 km. ~3.1 dg.
			M=4.4 (Athens). Crete Island 35°
			1 N, 25°2 E.-H=07:30:18; h about
			45 km. Recorded up to 93°;N° of
			stations 35 (BCIS).
	e*P	07 31 19.9	Traces. Δ=460 km. ~ 4.1 dg.
			A damaging shock on Crete Island;

Date	Phase	Time	Additional Readings and Remarks.
April 19			especially in Heraklion.According to the Press reports 5 houses in Vaghionia collapsed and 120 were badly damaged; the remainder were cracked. The shock was felt in Heraklion (VII+ at Vaghionia, VII at Staviae VI at Lourae, Atsipades Kato-Akria,Ano-Akria,Loukia, Moria, Koumasa, V+ at Ste-Varvara, V at Charakas, Archanae, Moerae, Tylisos, IV+ at Pompia, Zaros, St.-Myron,Ampelouzos, Daphne, Galia,Pitsidia, Pyrgos, IV at Archalochori,Kastelli, Thrapsanon, Heraklion, III+ at Kounavoe, III at Goniae, and in Rethymnon (IV at Melampes, Margaritae, Anoghia III+ at Livadia, III at Rethymnon). Area of felt shaking about 15,000 km^2. M.M.=4.7*
19	e Pn	17 46 04.3	Traces. Δ =490 km. ~ 4.4 dg. Coast of Albania, about 41° N, 19°1/2 E.-H=17:45.1. Recorded up to 22°; N° of stations 6 (BCIS).
20	e*P	00 44 10.8	Traces. Δ =100 km. ~ 0.9 dg.
	e P	00 44 34.8	Very weak. Δ =270 km. ~ 2.4 dg.
	eiS	45 04.0	Leukas Island 38°7 N. 20°8 E.-H=00:43:56; h about 40 km., Recorded up to 29°; N° of stations 12 (BCIS). Felt in Acarnania (IV at Astakos, Mytikas) and Aetolia (IV at Papadatae).Area of felt shaking about 15,000 km^2. M.M=4.3*.

Date	Phase	Time	Additional Readings and Remarks.
April 23	e*Py	14 04 16.2	Traces. Δ =480 km. ~ 4.3 dg.
	e Pn	14 04 17.0 D	Very week. Δ =585 km. ~ 5.3 dg.
	eiSn	05 16.5	Yugoslavia, Albania border 42°2N 19°5 E.- H=14:02:57, Recorded up to 92°; N° of Stations 63 (BCIS). M=5.6 (Stuttgart), 5.1 (USCGS), 4.5(College).
24	eiPg	06 05 09.0CS	Very weak. Δ =65 km. ~ 0.6 dg.
	eiSg	17.2	Felt on Euboea Island (IV at Psachna).
25	eiPg	02 06 13.0CS	Very weak. Δ =65 km. ~ 0.6 dg.
	eiSg	21.1	Felt on Euboea Island (IV+ at Psachna).
25	e*Py	06 06 53.1	Traces. Δ =480 km. ~ 4.3 dg.
	eiPn	06 06 51.8 C	Very weak. Δ =585 km. ~ 5.3 dg.
	eiSn	07 51.7	Yugoslavia, Albania border 42°2N, 19°5 E.- H=06:05:33.0. Recorded up to 92°; N° of stations 36. (BCIS).
26	e Pg	22 22 02.1	Traces. Δ =70 km. ~ 0.6 dg.
	eiSg	10.5	Felt on Euboea Island (IV at Psachna).
27	i Pg	00 48 48.4CSW	Weak. Δ =70 km. ~ 0.6 dg.
	eiSg	57.0	Felt on Eboea Island (V at Psachna, IV+ at Aphration, Chalkis, IV at Politika).
27	e	01 01 49.0	Traces. Felt on Euboea Island (IV+ at Mytikas, III at Psachna).
27	e Pn	01 45 39.2	Traces. Δ =205 km. ~ 1.8 dg.
	eiPb	40.2	Felt in Elis (III+ at Letrinoe).
	eiSn	46 03.5	
	eiSy	06.5	

Date	Phase	Time	Additional Readings and Remarks.
April			
27	e Pg	02 05 45.5	Traces. Δ =65 km. ~ 0.6 dg.
	eiSg	53.6	Felt on Euboea Island (III at Politica)
27	e	05 10 02.0	Traces. Felt on Euboea Island(V at Psachna).
27	e Pg	11 42 56.8	Traces. Δ =65 km. ~ 0.6 dg.
	eiSg	43 05.0	Felt on Euboea Island (IV at Psachna).
28	e Pn	00 42 41.2	Very weak. Δ =390 km. ~ 3.5 dg.
	eiPg	54.6C	Northwestern Turkey 39°.5 N, 27°.8 E.-
	eiSg	43 41.0	H=00:41;52. Recorded up to 97°; N° of stations 32 (BCIS). M=4 (Moscow).
28	e Pg	21 16 47.5D	Traces. Δ =65 km. ~ 0.6 dg.
	eiSg	55.6	Felt on Euboea Island (IV at Psachna).
29	e Pg	12 06 26.1	Traces. Δ =70 km. ~ 0.6 dg.
	eiSg	34.5	Felt on Euboea Island (III at Psachna).
29	eiPg	22 48 38.2C	Very weak. Δ =70 km. ~ 0.6 dg.
	eiSg	47.0	Felt on Euboea Island (III+ at Psachna).
30	e P	05 21 31.1	Very weak. Δ=290 km. ~ 2.6 dg.
	eiS	22 03.4	Epirus 39°.6 N, 21°.1 E.-H=05:20:50; h about 70 km. Recorded up to 94°; N° of stations 22 (BCIS). Felt in Jannina (IV+ at Terovo), Arta (IV at Kentrikon) and Preveza (IV at Kranaea). Area of felt shaking about 5000 km². M.M=3.7.*

Date	Phase	Time	Additional Readings and Remarks.
May			
4	e Pg	09 44 49.6	Very weak. Δ =65 km. ~ 0.6 dg.
	eiSg	57.6	Felt on Euboea Island (IV at Psachna).
4	eiPg	12 44 35.0 CS	Very weak. Δ =65 km. ~ 0.6 dg.
	eiSg	43.2	Felt on Euboea Island (IV at Psachna).
4	i Pg	15 42 04.7CSW	An=21μ, Tn=0.8 sec, Ae=16μ, Te=
	eiSg	13.0	2 sec. Δ=65 km. ~ 0.6 dg.M=4.1 (Athens). Felt on Euboea Island (IV+ at Psachna, Politika, Aphration, IV at Chalkis) and in Attica (II+ at Nikaea).
4	e	16 09 42.5	Traces. Felt on Euboea Island (IV+ at Aphration).
4	eiPg	17 28 01.0CS	Very weak. Δ=65 km ~ 0.6 dg.
	eiSg	08.8	Felt on Euboea Island (IV+ at Aphration).
4	eiSg	17 45 47.3	Traces. Felt on Euboea Island (IV at Chalkis).
4	eiPg	18 38 01.4CS	Very weak. Δ=65 km. ~ 0.6 dg.
	eiSg	09.5	Felt on Euboea Island (IV+ at Aphration).
4	eiPg	21 56 34.3 C	Very weak. Δ =65 km ~ 0.6 dg.
	eiSg	42.5	Felt on Euboea Island (IV at Chalkis).
4	e	22 02 29.7	Traces. Felt on Euboea Island (IV+ at Politika).
5	eiPg	03 05 01.1CSW	Weak. Δ =65 km. ~ 0.6 dg.
	eiSg	09.2	Felt on Euboea Island (IV+at Politika, IV at Aphration, Chalkis).
	eiS	10.0	
	eiS	13.0	

Date	Phase	Time		Additional Readings and Remarks.
May				
5	eiPg	03 13 35.5	CS	Very weak. Δ =65 km. ≈ 0.6 dg.
	$eiS_{12}P$	37.3	C	Felt on Euboea Island (IV+ at
	eiSg	43.6		Aphration, IV at Chalkis).
	$eiS_{12}S$	44.4		
5	eiPg	07 55 35.2	CS	Very weak. Δ =65 km. ~ 0.6 dg.
	$eiS_{12}P$	37.0		Felt on Euboea Island (IV at Chal-
	eiSg	43.4		kis).
	$eiS_{12}S$	44.0		
5	e Pn	09 17 01.6		Traces. Δ =260 km. ~ 2.3 dg.
	eiPy	05.1	C	Felt in Acarnania (IV at Archon-
	eiSn	31.0		tochori).
5	e Pn	09 25 05.6		Traces. Δ =2 55 km. ~ 2.3 dg.
	eiSg	42.5		Felt in Acarnania (IV at Archon-
				tochori).
5	e(Sg)	10 29 17.4		Traces. Felt in Acarnania (IV at Archontochori).
6	e Pg	05 43 26.4		Traces. Δ =60 km. ~ 0.5 dg.
	eiSg	34.0		Felt on Euboea Island (IV at Gy-
				mnon).
6	e Pn	19 31 11.6	D	An=16μ, Tn=2,8 sec, Ae=8μ, Te=2.4
	e Pb	13.9	S	sec. Δ =280 km. ~ 2.5 dg. M=4.8
	eiPy	15.7	C	(Athens). Epirus 39°.1 N, 20°.7 E.-
	eiPg	19.1	CSE	H=19:30:29. Recorded up to 88°.
	eiSb	45.9		N° of stations 62 (BCIS). M=5.1
	eiSy	49.1		(Nurmijaervi), 4-4 1/2 (Moscow).
	eiSg	53.0		Felt in Preveza (V+ at Nichalitsi,
				V at Kamarina, IV+ at Myrsini,
				Aghia, IV at Preveza, Parga, Lou-
				ros, Kranea).
				Area of felt shaking about
				5000 km^2. M.M=3.8.*
6	eiPg	21 01 55.1	DW	Very weak. Δ =65 km. ~ 0.6 dg.
	eiSg	02 03.4		Felt in Corinthia(IV+ at Isthmia,
				IV at Athikia).

Date	Phase	Time		Additional Readings and Remarks.
May				
7	e	02 16 48.0		Traces. Felt on Euboea Island (V+ at Psachna).
7	e Pn	03 13 25.5		Traces. Δ =285 km. ~ 2.6 dg.
	eiSg	14 07.5		Felt in Preveza (IV at Kamarina, II+ at Parga).
7	eiPg	04 55 07.4	CSW	Very weak. Δ =55 km. ~ 0.5 dg.
	ei Sg	14.0		Felt on Euboea Island (IV+ at Gymnon).
7	e	09 28 21.1		Traces. Felt in Jannina (III at Dodoni).
8	ePn	04 05 28.5		Traces. Δ = 285 km. ~ 2.6 dg.
	eiSy	06 07.2		Felt in Preveza (III at Parga).
10	e	03 14 32.5		Traces. Felt on Samos Island (III at Pagontas).
10	e Pn	18 08 45.0		Traces. Δ =230 km. ~ 2.1 dg.
	eiSy	09 15.4		Felt on Lemnos Island (IV at
	eiSg	17.5		Myrina).
11	e*(Pg)	01 12 01.2		Traces. Δ =95 km. ~ 0.9 dg.
	eiPn	01 12 19.0	CS	An=13μ, Tn=3 sec, Ae=6μ, Te=2.4
	eiPg	20.6	D	sec. Δ =170 km. ~ 1.5 dg. M=4.3
	eiSg	41.5		(Athens). Central Greece 39° N,
				22° 1/4 E.-H=01:11:48. Recor-
				ded up to 29°; N° of stations 20
				(BCIS). M=5.8 (Nurmijaervi) 5.6
				(USCGS).
				Felt in Evrytania (V+ at A-
				grapha) and Aetolia (III at
				Platanos). Area of felt shaking
				about 10,000 km^2. M.M=4.3.*
12	e	02 35 12.3		Traces. Felt in Arcadia (IV+ at Nestani).

Date	Phase	Time	Additional Readings and Remarks.
May			
12	e*Pg	15 05 47.5	Traces. Δ =90 km. ~ 0.8 dg.
	eiPn	15 05 55.2 CE	Weak. Δ =105 km. ~ 0.9 dg.
	eiSg	06 09.0	North Peloponnesus about 37°3/4 N, 22°1/2 E.-H=15:05:31(Athens). Felt in Arcadia (IV+ at Levidi), Corinthia (IV at Nemea) and Argolis (III at Karya).
15	e*Pb	11 16 44.2	Traces. Δ =410 km. ~ 3.7 dg.
	e Pn	11 16 47.6	Very weak. Δ =515 km. ~ 4.6 dg
	ei Py	17 00.2	Albania 41°.7 N, 20°.1 E.-H=11:15:
	ei Sn	40.4	40. Recorded up to 92°. N° of sations 73(BCIS).M=5.3 Nurmijaervi), 4.4 (USCGS, College).
15	ei Sg	12 25 41.0	Traces. Felt on Euboea Island (IV at Gymnon).
15	eiPg	18 51 38.2 CSW	Weak. Δ =45 km. ~ 0.4 dg.
	eiSg	44.1	Felt on Euboea Island (IV at Gymnon).
15	eiPg	19 05 54.5	Traces. Δ =45 km. ~0.4 dg.
	eiSg	06 00.5	Felt on Euboea Island (III at Gymnon).
18	eiSg	14 17 08.4	Traces. Felt in Jannina (IV at Jannina).
19	e Pb	03 35 12.3	e?35:10. Very weak. Δ =380 km. ~
	eiSn	49.0	3.4 dg. Turkey, about 38° 1/2 N, 28°E.- H=03:34.2 (BCIS).
19	e Pn	10 51 27.0	Very weak. Δ =295 km. ~ 2.7 dg.
	ei(Pb)	28.8 C	
	eiPy	31.5	

Date	Phase	Time	Additional Readings and Remarks.
May			
19	eiSn	59.6	
	eiSb	52 03.0	
	ei(Sy)	07.0	
20	e*Pg	23 59 23.5	Traces. Δ=85 km. ~ 0.8 dg.
	e Pn	23 59 40.7	Very weak. Δ=210 km. ~ 1.9 dg.
	eiPb	41.3	Central Greece about 39°N, 21°
	eiSn	00 00 05.5	3/4 E.- H=23:59:07 (Athens).
	eiSg	10.0	Felt in Evrytania (IV at Agrapha).
21	e.Pg	03 51 41.4	Traces. Δ =70 km. ~ 0.7 dg.Felt
	eiSg	50.4	on Euboea Island (III at Psachna).
23	e Pn	10 16 00.6 D	Traces. Δ =530 km. ~ 4.8 dg.
	eiSn	54.6	South coast of Turkey 36°4 N,
	eiSb	17 05.5	29°.4 E.- H=10:14:49. Recorded up to 95°. N° of stations 25 (BCIS). M=5.6(Nurmijaervi,USCGS).
23	e	13 57 50.2	Traces.Felt on Crete Island; especially in Heraklion (V at Pompia, IV+ at Moerae, IV at Pitsidia III at Ambelouzos).
25	e Sb	05 52 26.5	Traces. Δ =460 km.4.2 dg. off
	e Sy	32.8	south coast of Albania about 40°N, 19°E.- H=05.50.4 (BCIS).
25	e Pn	21 17 02.6	Traces. Δ =170 km. ~ 1.5 dg.
	eiSg	25.0	Felt in Aetolia(IV+ at Palaeochoraki).
27	e Pn	09 26 14.6	Very weak. Δ =330 km. ~ 3 dg.Dar-
	eiSb	54.9	danelles 40°1/4 N, 26°1/4 E.-
	eiSg	27 04.4	H=09:25:25 (BCIS).

Date	Phase	Time	Additional Readings and Remarks.
May			
27	e *	21 18 32.3	Traces. Δ =220 km. ~ 2 dg.
	e Pn	21 18 49.1	eil2:22.Very weak. Δ =275 km. ~
	e Pb	51.1W	2.5 dg. Macedonia 40°2 N, 22°3 E.-
	ei(Py)	52.5S	H=21:18:10. Recorded up to 20° ;
	eiSg	19 29.0	N° of stations 7 (BCIS).
29	e Pn	10 32 29.2	Traces. Δ =400 km. ~ 3.6 dg.
	eiSg	33 31.4	Off southern coast of Crete Island, about 34°1/2 N, 24°1/2 E.- H=10:31.4 (BCIS).
31	e Pg	08 39 58.8C	Very weak. Δ=75 km. ~ 0.7 dg.
	eiSg	40 07.7	Felt on Euboea Island (IV at Aphration, III at Psachna).
June			
3	e Pg	20 30 55.6	Traces. Δ =55 km. ~ 0.5 dg. Felt
	eiSg	31 02.7	on Euboea Island (II+ at Psachna)
4	eiPg	17 10 44.3CS	Very weak. Δ =65 km. ~ 0.6 dg.
	eiSg	52.8	Felt on Euboea Island (IV at Aphration, Psachna).
4	e Pg	22 11 49.2	Traces. Δ=125 km. ~ 1.1 dg.
	e Sn	12 02.2	
	eiSg	04.6	
	e Pn	22 12 13.1	An=23μ, Tn=2sec, Ae=9μ, Te=1.2 sec,
	eiPb	15.5C	Δ =290 km. ~ 2.6 dg. M=5(Athens).
	ei(Pg)	21.4S	Leukas Island 38°9 N, 20°6 E.-
	i Sy	52.1	H=22:11:35.Recorded up to 98°;
	eiSg	56.7	N° of stations 92 (BCIS).M=4.7 (Nurmijaervi, Praha, USCGS). Felt on the Islands Leukas (VI+ at Englouvi, St.-Helias,VI at Karya , IV+ at Leukas,Marantochori, IV at St.-Petros), Kalamos (IV+ at Kalamos),Cephalonia (IV at Svoronata, Skala,Mousata),Ithaca(IV at Ithaka)Zante (III atAno-Voli-

Date	Phase	Time	Additional Readings and Remarks.
June			
4			mae, Macheradon). Further it was felt in the regions of Aetolia (V at Aetolikon, St.- Konstantinos, IV + at Zevgaraki, Agrinion, Messolonghi, IV at Bourlesia,Panaetolion, Dokimion, Neochori,Paravola, Mataranga, Angelokastron, Papadatos, III+ at Kaenourghion, Spolaïta, Stamna,III at Gavalou, Palaeochoraki), Acarnania (V at Peratia, Astakos, Palaeros, IV at Katouna, Vonitsa, Amphilochia,Paliampela, Pentalophos), Achaïa (IV at Lechouri, Patras, III+ at Ano-Klitoria,III at Alissos, II+ at Klitor), Elis (IV+ at Andravida, IV at Vartholomio, III at Amalias), and Preveza (IV+ at Preveza, IV at Parga). Not felt at Asprogerakas(of Cephalonia), Katastari, Keri,Gaïtani, Gerakari (of Zante),Myrtea, Nea-Avorani, Rigani (of Aetolia), Palaeomanina, Thyrion, Lepenou(of Acarnania). Area of felt shaking about 95,000 km² M.M.=5.7.*
7	eiPn	02 50 47.1 CS	Weak. Δ =120 km. ~ 1.1 dg. Felt
	eiSg	51 03.1	on the Islands Skopelos (IV+ at Skopelos), and Skiathos (IV at Skiathos).
12	e Pg	04 54 41.9 D	Traces. Δ =220 km. ~ 2 dg.
	e Sb	55 05.2	Felt in Evrytania (IV at Agrapha).
	eiSg	08.7	
12	e	16 58 12.5	Traces. Felt in Arta (IV+ at Tetrakomon).

Date	Phase	Time	Additional Readings and Remarks.
June			
13	e Pn	00 03 38.1	Traces. Δ =270 km. ~ 2.4 dg.
	eiSn	04 08.6	Felt in Arta (V at Tetrakomon)
	eiSb	11.4	and Jannina (IV at Terovo).
16	e Pn	04 03 18.4 D	Traces. Δ =370 km. ~3.3 dg.
	eiSg	04 15.0	Rhodes Island.- H=04:02.4.Recorded up to 25°.N° of stations 5 (BCIS).
27	e Pn	11 06 53.5	Traces. Δ =450 km. ~ 4 dg. Aftershock of June 26.Bulgaria 42°0 N, 23°5 E.-H=11:05.8.Recorded up to 8°; N° of stations 20 (BCIS). M=4 (Sofia).
30	e Pn	00 06 32.6 D	Traces. Δ=320 km. ~2.9 dg. Off south west coast of Crete Island 35°0 N, 23°2 E.-H=00:05:45. Recorded up to 83.N° of stations 18 (BCIS).M=4.4 (USCGS, Cumberland Pl.).
30	eiPn	18 22 58.7C	Traces. Δ =390 km. ~ 3.5 dg.
	eiSg	23 58.8	Epicentre in Ionian Sea.
July			
4	e Pn	03 10 26.3	Traces. Δ =250 km.~2.2 dg.
	eiSg	11 02.4	West Greece 38°3/4 N, 21° E.-H=03:09:47 (Athens). Felt on Leukas Island (IV at Leukas) and in the regions Acarnania (IV at Astakos),Aetolia (IV at Mesolonghi). Are of felt shaking about 10,000 km². M.M.=4.1.*
5	e	12 34 20.6	Traces. Felt in Phthiotis (IV at Pelasghia).

Date	Phase	Time	Additional Readings and Remarks.
July			
5	e Pn	12 42 57.0	Traces. Δ =120 km. ~ 1.1 dg.
	ei(P_{23}P)	58.0	Felt on Euboea Island (V at
	eiSg	43 13.4	Oreoe) and in the region of Phthiotis (IV at Pelasghia).
5	e Pn	14 21 46.7	An=48μ, Tn=2.6 sec, Ae=42μ,Te=
	eiSg	22 01.7	=3.2 sec, Δ =115 km. ~ 1 dg. M=4.7 (Athens). North Euboea 38°9 N, 23°1 E.- H=14:21:27. Recorded up to 89°; N° of stations 35 (BCIS). M=4.1(Blue Mt.), 4.2 (USCGS, Nurmijaervi),4.4 Wichita M).
	e*Pn	14 21 48.3	Very weak. Δ =135 km. ~ 1.2 dg.
	e*Sn	22 04.2	Felt in Phthiotis (V at Pelasghia, IV+ at Molos, Stylis,IV at Elatia, Lamia, III+ at Zeli), Boeotia (IV+ at Thebes, II+ at Orchomenos), Phokis (III+ at Kasteli), Magnesia (IV at Almyros), and Attica (II + at Athens); also in Euboea Island (IV+ at Loutra-Aedipsos, Oreoe, Histiaea, Neos-Pyrgos). Area of felt shaking about 40,000 km².M.M= 5.*
5	e Pn	14 29 34.9 D	Traces. Δ =140 km. ~ 1.3 dg.
	eiSg	54.3	Felt in Phthiotis (IV at Pelasghia).
5	e*	15 17 11.7	Traces. Δ=115 km. ~ 1 dg.
	eiPg	15 17 08.5 D	Weak. Δ =130 km. ~ 1.2 dg.
	eiSg	24.7	Central Greece 38°9 N, 22°.8 E.-H=15:16:48. Recorded up to 29°; N° of stations 12 (BCIS). Felt on Euboea Island(V at Loutra-Aedipsos, Oreoe, IV+ at Histiaea), and in the districts

Date	Phase	Time	Additional Readings and Remarks
July 5			Magnesia (IV a t Almyros), Phthiotis (IV at Stylis) and Attica (II+ at Athens). Area of felt shaking about 55,000 km.M.M.=5.2*.
6	e	01 36 58.8	Traces. Felt in Elis (IV at Strephi).
6	e	13 00 51.1	Traces. Felt in Phthiotis(IV at Pelasghia).
6	e Pg	19 00 12.8	Traces. Δ =130 km. ~ 1.2 dg.
	eiSg	29.1	Felt in Phthiotis (IV at Pelasghia).
7	e	01 19 05.7	Traces. Felt in Elis (V+ at Douneika).
7	e Pg	12 38 42.3 D	Traces. Δ =130 km. ~ 1.2 dg.
	eiSg	58.1	Felt in Phthiotis (II+ at Pelasghia).
8	e Pn	16 03 23.1 D	Very weak. Δ = 395 km. ~ 3.6dg.
	eiSy	04 17.5	Near south coast of Turkey 36°.6 N, 27°.9 E.- H=16:02:27. Recorded up to 97° N° of stations 73 (BCIS). M=4.9 (Wichita M), 4.8 (Cumberland Pl.), 4.7 (Blue M, Nurmijaervi, USCGS), 4.6 (Tonto Forest), 4.3 (Uinta B).
	e*Pn	16 03 49.3	Traces. Δ=565 km. ~ 5.1 dg. Felt on the Islands Rhodes (III+ at Rhodes), and Symi (III+ at Symi). Area of felt shaking about 5,000 km². M. M.=(3.6*).

Date	Phase	Time	Additional Readings and Remarks.
July 8	e Pg	17 40 37.1 D	Very weak. Δ = 130 km. ~ 1.2 dg.
	eiPn	37.9 C	Felt in Phthiotis (II+ at Pe-
	eiSg	53.2	lasghia).
9	e	16 54 30.1	Traces. Felt in Aetolia (IV at Papadatos).
9	e Ph	18 38 26.7	e 38:23 D. Very weak. Δ =385 km.
	eiSg	39 13.3	~3.5 dg. Near west coast of Turkey about 37° N, 28° E.- H= 18:37.3 (BCIS).
10	e Pn	07 01 01.9	Traces. Δ =130 km. ~ 1.2 dg.
	eiSn	17.0	Felt in Magnesia (IV+ at Argalasti).
10	eiPn	07 19 48.1 C	An=32 μ, Tn= 3.2 sec., Ae=54 μ,
	$eiP_{33}P$	49.3	Te=3.5 sec. Δ =125 km.~ 1.1 dg.
	eiPg	49.8	M=4.7 (Athens). Aegean Sea 39°.1
	$eiS_{23}S$	20 03.8	N, 23°.5 E.- H=07:19:26. Record-
	$eiS_{33}S$	04.3	ed up to 97°; N° of stations 44 (BCIS). M=4.0 (Tonto Forest, Blue M), 4.1 (Uinta, Cumberland Pl.), 4.4 (Wichita M, Nurmijaervi),4.2 (USCGS).
	e*Pn	07 19 54.8	Very weak. Δ =170 km.~ 1.5 dg.
	e*Sn	20 15.7	Felt on the Islands of Skiathos (VI at Skiathos), Skopelos (V at Skopelos), Euboea (IV+ at Ste-Anna) and Alonisos (IV at Alonisos); further in Magnesia (IV+ at Argalasti, Agria and IV at Nea-Ionia). Area of felt shaking about 10,000 km². M.M.=4.3.*
10	e Pn	07 25 38.3	Very weak. Δ =120 km. ~1.1 dg.
	$eiP_{33}P$	39.4 C	Felt in Magnesia (III at Nea-
	eiSg	54.8	Ionia) and on Skopelos Island (III at Skopelos).

Date	Phase	Time	Additional Readings and Remarks.
July 10	e Pn	08 06 20.4 C	An=7μ , Tn=1,6 sec. Ae=13 μ , Te=
	eiPg	20.9 C	2,0 sec. Δ =130 km. ~1.2 dg. M=
	e Sn	37.7	4.2 (Athens). Central Greece, probably about 39° N, 23° E.- H= 08:06.0. Recorded up to 26°; N° of stations 3 (BCIS). Felt in Magnesia (IV+ at Agria).
	e*Sn	08 06 40.8	Traces. Δ =140 km. ~1.3 dg.
13	e	04 05 23.2	Traces. Felt in Jannina (III at Kranoula).
13	e Pn	07 39 56.8 C	An=5 μ, Tn=3.9 sec. Ae=5μ , Te=
	eiSn	40 31.0	4.3 sec. Δ =310 km. ~2.8 dg. M=4.5
	eiSy	38.6	(Athens). Epirus 39°6 N, 20°8 E.- H=07:39:14. Recorded up to 28°; N° of stations 22 (BCIS). A damaging shock in Jannina. According to the Press reports 3 houses in Kranoula and Perivlepton collapsed and 210 were cracked several large rocks lides from the neighbouring mountains. The shock was felt in Jannina (VI+ at Kranoula, Perivlepton V+ at Eleousa, Lykostomon, IV at Katsikas, Zitsa,Kourenta, III at Pramanta, Koutseli). Not felt at Metsovon Raptanea, Terovon, Platanousa, Kouklioe (Of Jannina). Area of felt shaking about 5000 km^2. M.M=3.9*.
14	e Pn	02 39 38.5 D	Traces. Δ =310 km. ~ 2.8 dg. Felt
	eiPg	46.9 D	in Jannina (VI+ at Eleousa, IV at
	ei(Sb)	40 16.0	Jannina).
	eiSy	20.0	
17	e*Pg	08 39 38.5	Traces. Δ =80 km. ~ 0.7 dg.
	eiPn	08 39 50.4 D	Weak. Δ =160 km. ~ 1.4 dg. Peloponnesus about 37°1/2 N, 22° E.- H= 08: 39:23 (Athens). Felt in Eéis (IV+ at Andritsaena).

Date	Phase	Time	Additional Readings and Remarks.
July 17	e*Pg	08 47 52.5	Traces. Δ =75 km. ~0.7 dg.
	eiPn	08 47 57.8DN	Weak Δ=165 km. ~1.5 dg. Peloponnesus about 37°1/2 N, 22° E.- H= 08:47:30 (Athens). Felt in Elis (IV at Kalydona).
	eiSn	48 16.5	
17	e Pn	09 02 00.9DW	Traces. Δ =170 km. ~ 1.5 dg. Felt
	e Sn	20.0	in Elis (III at Kalydona).
18	e*Pg	16 34 12.2	Traces. Δ =65 km. ~ 0.6 dg.
	eiPn	16 34 34.2DW	Very weak. Δ=215 km. ~ 1.9 dg.
	e Pb	35.0N	Peloponnesus about 37° 3/4 N,
	eiSg	35 04.0	21°1/4 E.-H=16:34:00 (Athens). Felt in Elis (IV at Vounargos, Amalias, IV at Pyrgos).
24	eiSg	12 28 32.4	Traces. Felt in Argolis (IV + at Palaea Epidavros).
26	iPn	04 18 21.9CSE	e 1915 An=120μ, Tn=4.4 sec, Ae=
	iiSb	19 22.5	77μ, Te=4.7 sec. Δ =495 km. ~ 4.5 dg, M =6.1 (Athens). Skopje,Yugoslavia 42°1 N, 21°5 E.-H=04:17:11; h=0 km. Recorded up to 160°; N° of stations 226 (BCIS). M=7 (Masushiro), 6.7 (Stuttgart) 6.5 (Collm), 6.4 (Tulsa, Roma), 6.2 (Quetta), 6.1 (Dallas), 6.0(BCIS, Moscow, Kiruna, Uppsala,Peking), 5.7 (Kew), 5 3/4-6 (Pasadena),5 1/2-5 3/4 (Berkeley), 5.6(Lwiro, Georgetown), 5 1/2 (Palisades), 5.5 (USCGS, Blacksburgh), 5.3(Tonto Forest, Unita, Blue M), 5.2 (Wichita M, College). A destructive shock in Skopje. The property domage was estimated at $ 500.000.000 Casualties: 1070 persons killed and 3300 injured, of which 1200 seriously. Maximum intensity designed in the

Date	Phase	Time	Additional Readings and Remarks.
July 26			epicentral region IX. Area of felt shaking about 200,000km^2. (BCIS). The shock was felt in Florina (IV+ at Vevi, Amynteon, Kella, IV at Papaghianni, Heroïkon, Florina, Aetos, III+ at Xyno-Nero, Phlambouron, Skopia, Sklithron, II+ at Palypotamos), Kilkis (IV+ at Axioupolis, Kastaneae, IVat Toumpa, Goumenissa, Rodon, III+ at Mouriae, Plaghia, III at Evzonoe), Pelli (IV+ at Milea, Apsalos, IV at Kali, Aridea, Prophitis-Helias, Edessa, Vorinon, Arnissa, Palaeophyton, Sevastiana, Sosandra, Krya-Vrysi, III+ at Galatades, III at Nea Pelli, Mylopotamos, II + at Karyotissa, Aravissos), Kastoria (IV + at Mavrochori, Vogatsikon, IV at Corisos, III+ at Argos-Orestikon, III at Nestorion, II + at Germas). Salonica (IV at Salonica III + at Langadas, III at Diavata, Zagliveri, Vasilika, St.- Pavlos), Emathia (IV at Nision, Alexandria, II + at Kopanon, Veroea, Phytia, II at Platy), Kozani (IV at Philotas, Krokos, III at Ptolemaïs, Velvendos). Not felt at Nea-Santa, Mavroneri, Kentrikon, Gorgopi (of Kilkis), Sochos, Stavros, Pentalophos, Askos, Sykea (of Salonica), Koryphi, St. George , Rizomata, Marina (of Emathia), Pontokomi, Mavrodendri, Siatista, Servia (of Kozani). M.M: 6.3 *.

Date	Phase	Time	Additional Readings and Remarks.
July 26	e Pn e Sn	04 33 55.0 34 45.5	Traces. Δ =485 km. ~ 4.4 dg. Aftershock of July 26, Skopje, Yugoslavia 42°0 N, 21°.4 E.- H= 04:53:10. Recorded up to 92° N° of stations 34 (BCIS). M=4.2 (USCGS, Wichita M, Blue M).
26	eiPn eiSb	04 54 19.0 D 55 18.5	Traces. Δ =485 km. ~ 4.4 dg. Aftershock of July 26. Skopje Yugoslavia 42°0 N, 21°4 E.-H= 04:53:10. Recorded up to 88°; N° of stations 23 (BCIS). M=4.2 (USCGS, Wichita M, Blue M),
26	e(Sy)	16 03 04	Traces, Δ =585 km. ~ 5.3 dg. Albania about 42°0 N, 19°3/4 E.- H=16:00;19 (BCIS).
26	e Pn eiSn eiSg	16 13 00.5 D 50.9 16.5	Very weak. Δ =480 km. ~ 4.3 dg. South west Turkey 37°2 N, 29°.1 E.- H=16:11:55. Recorded up to 89° N° of stations 18 (BCIS).
26	e P eiS	19 47 38.0 D 48 27.0	An=4μ, Tn=3.0 sec. Ae=2μ, Te= =4 sec. Δ=475 km. ~ 4.3 dg. M=4.5 (Athens). Southwest Turkey 36°8 N, 28°9 E.- H=19:46: 36; h about 70 km. Recorded up to 89°; N° of stations 34(BCIS).
26	e Py e Sg	20 09 56.8 D 10 52.9	Traces. Δ =420 km. ~ 3.8 dg. South west Turkey about 38°3/4 N, 28°1/2 E.-H=20.08.7 (BCIS).
27	eiPb eiSb	13 45 29.5 DS 46 08.5	Traces. Δ =340 km. ~ 3.1 dg. Off south coast of Crete Island 34°9 N, 23°5 E.- H=13:44:36. Recorded up to 93°; N° of stations 17 (BCIS). M=4.3 (USCGS, Blue M).

Date	Phase	Time	Additional Readings and Remarks.
July			
28	e	20 39 17.1	Traces. Felt on Crete Island especially in Rethymnon (III+ at Argyroupolis).
30	e	04 19 36.4	Traces. Felt in Jannina (II at Konitsa).
30	e Pn	04 24 13.8	Traces. Δ =445 km. ~ 4 dg.
	eiSg	25 23.8	Near south west coast of Turkey 36°.5 N, 28°.5 E.- H=04:23:00. Recorded up to 32°; N° of stations 18 (BCIS).
August			
4	e*	02 20 13.0	Traces.
	eiSg	02 20 58.0	Traces. Felt in Aetolia (IV + at Palaeochoraki).
7	e*Pg	01 31 20.5	Traces. Δ =45 km.~0.4 dg.
	e Pn	01 31 41.5	Weak. Δ =175 km. ~ 1.6 dg.
	eiSg	32 05.2	Peloponnesus 37°3/4 N, 21°3/4 E.- H=01:31:12 (Athens). Felt in Elis (V at Kalydona), and Achaïa (IV + at Drosia).
8	e*	20 58 17.3	Traces.
	e Pn	20 58 47.5	Traces. Δ =160 km. ~ 1.4 dg.
	eiSn	59 05.5	Probably 38°1/2 N, 21°3/4 E.- Felt in Achaïa (IV + at Patras, IV at Kato-Achaïa) and Aetolia (IV + at Galata).
15	e	13 29 16.3	Traces. Felt in Elis (IV at Strephi).
15	e Pn	17 57 46.5	Very weak. Δ =200 km. ~ 1.8 dg.
	e Pb	47.0	
	eiSn	58 10.4	Felt on Chios Island (IV at Chios).
	eiSg	13.5	

Date	Phase	Time	Additional Readings and Remarks.
August			
15	e Pg	18 42 08.0 D	Traces. Felt in Arta (IV+ at Ano-Kalentini).
16	e	04 30 06.1	Traces. Felt in Achaïa (III+ at Patras).
17	e	06 24 03.1	Traces. Felt in Arta (IV at Ano - Kalentini).
18	eiPg	08 37 12.0 D	Traces. Δ =260 km. ~2.3 dg.
	eiSy	40.4	Felt in Arta (IV + at Arta).
	eiSg	43.6	
18	e*Pg	23 41(56.1)	Traces.
	ePg	23 42 11.1	Very weak. Δ =200 km. ~ 1.8dg.
	eiSn	32.1	Felt in Aetolia (V at Stamma, IV + at Agrinion, Naupaktos, IV at Galata, Mesolonghi), Achaïa (IV + at Patras, IV at Drosia).
19	e Py	08 00 39.0	Traces. Δ =260 km. ~ 2.3 dg.
	eiSg	01 13.5	Cyclades Islands about 36°1/2 N, 26°E.- H=07:59.9 (BCIS).
20	e	23 26 27.3	Traces. Felt on Skopelos Island (IV at Skopelos).
21	eiPn	22 45 22.0 D	Weak. Δ =370 km. ~ 3.3.dg.
	ei(Py)	29.5	Near north coast of Astypalaea
	eiSn	46 01.6	36°.0 N, 27°.2 E.-H=22:44:33. Recorded up to 32°; N° of stations 81 (BCIS). Felt on Astypalaea Island (IV at Astypalaea).
22	e	07 26 51.5	Traces. Felt on Cephalonia Island (IV at Lixouri).

Date	Phase	Time	Additional Readings and Remarks.
August			
26	e Pg	10 54 14.5 D	Traces. Δ =310 km. ~ 2.8 dg.
	eiSn	40.0	Felt in Kozani (IV at Knidi).
	eiSg	52.3	
26	e*Pg	21 39 41.4	Very weak. Δ =40 km. ~ 0.4 dg.
	eiPn	21 40 00.1 CE	weak. Δ =170 km. ~ 1.5 dg.
	eiPb	00.6 N	Peloponnesus 37°0 N, 21°3/4 E.-
	eiPg	03.5S	H=21:39:33. Probably 37°3/4 N,
	eiSn	25.1	21°3/4 (Athens). Recorded up to
	eiSg	29.1	27°; N° of srarions 10 (BCIS). Felt in Achaïa (VI at Drosia IV + at Kalavryta, Klitor IV at Patras), Elis (IV+ at Strephi) and Arkadia (III+ at Levidi).
28	e*Pg	00 22 33.4	Traces. Δ =85 km. ~0.8 dg.
	e Pn	00 22 51.8	Traces. Δ=220 km.~ 2 dg. Near
	eiSn	23 17.6	west coast of Peloponnesus about 37°1/2 N, 21°1/4 E.- H=00:22:17 (Athens). Felt in Elis (IV at Pyrgos).
September			
3	e*Py	18 21 04.7	Traces. Δ =185 km. ~ 1.7 dg.
	eiPn	18 21 23.1 C	e?21:21, Very weak. Δ =330 km.~
	eiPy	29.0 C	3 dg. Ionian Sea 37?2 N, 20°1
	eiSn	58.9	E.- H=18:20:33. Recorded up to
	eiSg	22 12.8	31°; N° of stations 14 (BCIS).
4	e Pn	11 57 37.5	Traces. Δ =350 km. ~ 3.2 dg.
	eiSn	58 15.5	South Crete Island 35° N,25° E.-
	eiSg	31.1	H=11:56:45. Recorded up to 24°; N° of stations 5(BCIS).
4	e	13 49 11.5	Traces. Felt in Magnesia (IV+at Mileae).
5	eiPg	2 13 30.1 CS	Weak. Δ =50 km. ~ 0.5 dg. Felt
	i Sg	36.7	on Euboea Island (IV at Vrysi).

Date	Phase	Time	Additional Readings and Remarks.
Sept.			
7	eiPn	00 14 47.5 CS	Very weak. Δ =100 km. ~ 0.9 dg.
	eiSg	15 00.5	Felt on Euboea Island (IV + at Ste.- Anna).
7	eiPn	00 32 05.0 DN	Traces. Δ =100 km. ~ 09 dg.
	eSg	17.9	Felt on Euboea Island (IV at Ste. -Anna).
7	eiPn	00 56 16.0 DN	Traces. Δ =100 km.~ 0.9 dg.Felt
	eiSg	28.2	on Euboea Island (IV at Ste.- Anna).
7	e Pn	01 13 42.3	Traces. Δ =100 km. ~ 0.9 dg.
	e Sg	55.0	Felt on Euboea Island (IV a t Ste.-Anna).
10	e Pn	13 10 03 D	Traces, Foreshock ?
10	eiPn	13 10 12.5 DE	Very weak. Δ =365 km ~ 3.3 dg.
	ei(Sn)	52.5	Dodecanese Islands 36°7 N, 27°6 E.- H=13;09:16; h about 55 Recorded up to 93°; N° of stations 24 (BCIS).M=4.6 (Cumberland Pl)4.5 (USCGS, Blue M., Wichita M). Felt on Kos Island (IV+ at Pylion, III+ at Kardamaena).
10	e Pn	21 58 29.9 C	Traces. Δ =270 km. ~ 2.4 dg.
	e Sn	59 00.7	Felt in Preveza (IV+ at Preveza).
11	e	02 42 14.0	Traces. Felt on Chios Island (III+ at Neochori).
11	e Pn	03 20 43.8	Very weak. Δ =200 km.~ ~ 1.8dg.
	e Pg	46.6 C	Felt on Chios Island (V at Chios,
	eiSn	21 08.7	IV+ at Neochori).
	eiSy	09.8	
	eiSg	11.0	

Date	Phase	Time	Additional Readings and Remarks,
Sept.			
12	ei Sg	12 42 35.8	Traces. Felt on Cephalonia Island (IV+ at Lixouri, Argostoli).
12	e*Pg	18 30 03.9	Traces. Δ =100 km. ~09 dg.
	e Pn	18 30 21.5 G	Very weak. Δ=235 km. ~ 2.1 dg. West
	eiPy	24.2 C	Greece 39°1 N, 21°.4 E.- H=18:29:
	eiSy	52.8	45. Recorded up to 5°. No of sta-
	eiSg	55.4	tions 4 (BCIS). Felt in Jannina (V at Platanousa IV+ at Terovo).
13	e	09 35 16.6	Traces. Felt on Cephalonia Island (IV at Lixouri).
14	ei	06 05 03.5	Traces. Felt in Preveza (IV at Kamarina).
15	eSg	05 26 38.2	Traces. Felt in Arta (IV+ at Arta IV at Tetrakomon).
15	e Pg	06 36 12.6	Traces. Δ =270 km. ~2.4 dg. Felt
	eiSg	45.0	in Arta (IV+ at Arta, IV at Kentrikon), Acarnania (II+ at Patiopoulon).
15	e	12 41 15.7	Traces. Felt in Arta (IV+ at Arta).
16	eSg	18 34 09.5	Traces. Felt in Arta (IV at Tetrakomon, III+ at Kentrikon).
18	iPn	16 59 25.5 CSW	An=190 μ , Tn=5.2 sec., Ae=716 μ ,
	iPy	39.0 ONE	Te=8 sec., Δ =560 km. ~ 5 dg. M=
	eiPg	47.1	6.8 (Athens). Turkey 40°8 N,29°1 E.-
	iSn	17 00 23.0	H=16:58:09. Recorded up to 154°;
	i(Sb)	35.0	N° of Stations 224 (BCIS). N=6 1/2
	iSy	42.5	(Matsushiro), 6 1/4 (Pasadena),6.2 (Praha, BCIS), 6.1 (Uppsala, Kiruna), 6.0 (Quetta) 5 3/4-6 (Palisades), 5.6 (Cumberland Pl.), 5.5 (Wichita M), 5.3 (Uinta B, Blue M). 5.2 (College, USCGS), 4.8 (Stuttgart), 4.7 (Tonto Forest), 4.3 (Nürmijaervi).

Date	Phase	Time	Additional Readings and Remarks.
Sept.			
18	ei*Pg	17 00 11.9	e 16:59:48. Very weak. Δ =690 km. ~ 6.2 dg.

The shock centered in Gulf of Izmid was strongly felt in Istanbul; 1 dead and some injured. The shock was further felt in Evros (V at Tycheron, IV+ at Pherae, Hellinochori, Kastaneae, Didymotichon, Soufli, IV at Loutros, Ardanion Kornofolea, Nea-Vyssa, Mani,Paliourion, Protoklissi, Lagyna, III+ at Petrades, Kavyli, Peplos, Phylakton, Lavara, Petrota, Neochori, Anthia, Zoni, Kyani, III at Thourion, Prangion, Avantos, II+ at Pythion, Alexandroupolis, Amori), Rhodope (V at Aeghiron, IV+ at Thrylorion, IV at Komotini, Salpi, Xylogani,Kosmion, Asomatoe, Arisvi, III+ at Lophari, III at Polyanthon, Organi, II+ at Iasmos, Calchas), Xanthe (IV at Nea-Kissani, Kotyli, III at Neochori). The shock was felt on the Islands of Lesbos (V at Petra, IV+ at Stypsi, Mandamados, Kerami, Skopelos, Kapi, Kato-Tritos, Vasilika, Vrisa, Ippios, III+ at Kliou, Mesagros, III at Methymna, II+ at Fresos, Ste.-Paraskevi, Daphia), Chios (IV+ at Kalamoti, Vrondades, IV at Kallimasia, Nénita, Kardamyla, III at Tholopotamion, Pyrgion), Lemnos (IV at Myrina, III at Kontopouli), St.- Eustratios (III at St.-Eustratios). Not felt at Asproneri, Ormenion, Metaxades, Rizia, Dikaea, Pentalophon (of Evros), Xanthe, Diomidia, Mandra, Therma, Genisea, Erasmion, Evmoeron (of

Date	Phase	Time	Additional Readings and Remarks.
Sept. 18			Xanthe), Proskinitae, Amaranta, Pandrosos, Gratine, Maronia (of Rhodope), Aghiasos, Plomari, Skalochori, Andissa (of Lesbos), Kontia (of Lemnos) Thimiana, Chios, St.- George (of Chios), Oenousae (of Oenousae). Area of felt shaking about 465,000 km^2. M.M.=6.8.* 156 aftershocks have been recorded in Istanbul.
19	e	01 08 15.5	Traces. Felt in Evros (IV at Kavyli).
19	e*Pn	10 43 21.6	Traces. Δ =215 km. ~ 2.1 dg.
	ePn	10 43 37.5 D	Very weak. Δ=345 km. ~ 3.1 dg. Epirus
	eiPy	44.1 D	39°9 N, 20°6 E.- H=10:42:47. Re-
	eiSn	44 15.0	corded up to 13°; N° of stations
	eiSb	20.0	14 (BCIS). Felt in Jannina (IV+ at
	eiSg	30.0	Doliana IV at Zitsa).
19	e*Pn	23 48 08.1	Traces. Δ =215km. ~ 2.1 dg.
	e Pn	23 48 23.0CSE	Very weak Δ=345 km. ~ 3.1 dg. After-
	eiSn	49 00.1	shock of Sept.19. Epirus 39°9 N,
	eiSy	10.0	20°6E.- H=23:47:33. Recorded up
	eiSg	15.2	to 20°; N° of stations 17(BCIS).
			Felt in Jannina (IV + at Zitsa, Doliana, III at Jannina).
20	e	23 29 00.0	Traces. Felt in Jannina (IV at Konitsa).
21	e Pn	06 22 49.2	Traces. Δ =365 km. ~ 3.3 dg.
	eiSg	23 44.9	Dodecanese Island. Probably about 36°1/4 N, 27°1/4 E.- H=06:21.9 (BCIS).
21	eiPg	21 58 04.1 C	Very weak. Δ =50 km. ~ 0.5 dg.
	eiSg	10.5	Felt on Euboea Island (IV at Gymnon).

Date	Phase	Time	Additional Readings and Remarks.
Sept. 22	e Pn	22 32 50.1 C	Foreshock ?
22	e*Pn	22 32 35.5	Traces. Δ = 120 km ~ 1.1 dg.
	ei*Sn	52.1	
	eiPy	22 32 59.0	Weak. Δ 275 km. ~ 2.5 dg. Ionian
	eiSn	33 00.2	Sea 37°5 N, 20°7 E.- H=22:32:13;
	eiSg	35.0	h about 45 km. Redorded up to 90°; N°of stations 50 (BCIS). M=4.9(Nurmijaervi),4.7(Köbenhavn) 4.6(USCGS), 4 1/2 (Moscow), 4.4 (Blue M), 4.3 (Uinta B).
23	e	17 44 13.6	Traces. Felt on Cephalonia Island (IV at Svoronata, Lixoyri).
24	e Pn	02 11 56.0 D	A n=9μ, Tn=2.8 sec., An=7μ,
	e Pb	12 03.3 D	Te=2.8 sec., Δ=560 km. ~ 5 dg.
	eiPg	17.5 D	M=5.1 (Athens). Aftershock of
	ei(Sb)	13 05.5	Spt.18. Turkey 40°8 N, 29°1 E.-
	ei(Sy)	14.5	H=02:10:41. Recorded up to 91°. N° of stations 71(BCIS). M=4.8 (Blue M. Wichita M), 4 1/2 (Moscow), 4.5(Uinta B), 4.1(Nurmijaervi). Slight damage in Istambul.
	e*Pg	02 12 45.6	Traces. Δ=695 km. ~ 6.3 dg.
24	eiSg	09 35 24.0	Felt on Oenoussae Island (IV at Oenoussae).
25	e Pn	14 07 05.5	Traces. Δ =380 km. ~ 3.4 dg.
	eiSg	08 04.0	Dodecanese Island H=14:06.2 (BCIS).
25	ePn	23 48 37.2	Traces. Δ =380 km. ~ 3.4 dg.
	eiSg	49 35.4	Dodecanese Islands 36° N, 27°1/4 E.- H=23:47:45 (BCIS).
26	e Pg	20 55 24.9 D	Traces. Δ =560 km. ~ 5 dg. Pro-
	e Sy	56 21.1	bably aftershock of Sept. 18. Turkey.-H=20:53:45. Recorded up to 23°; N° of stations 3(BCIS).

Date	Phase	Time	Additional Readings and Remarks
Sept.			
27	e Pn	08 34 52	e 34:47. Traces. Δ=555 km. ~ 5 dg. Yugoslavia 42°3/4 N, 21°3/4 E.-H=08:33:35. Recorded up to 8°; N° of stations 5 (BCIS).
28	e	12 10 31.0	Traces. Felt on Crete Island (IV at Kato-Chorio).
29	e P	13 36 54.0	An=7μ, Tn=3 sec., Ae=3μ, Te=3.4
	e s	37 46.3	sec., Δ=495 km. ~ 4.5 dg. M= =4.8 (Athens). Near south coast of, Turkey 36°5 N, 29°.0 E.-H=13:35:48; h aboud 65 km. Recorded up to 100° ; N° of stations 63(BCIS). M=4.9 (Nurnijaervi), 4.8 (Stuttgart)4.5 (USCGS), 4 1/2 (Moscow), 4.3(Wichita M, Blue M, Unita B).
29	e Pn	15 17 19.6 DE	Traces. Δ=455 km. ~ 4.1 dg.
	e(Pb)	24.2 W	Near east coast of Rhodes Is-
	e Sn	18 07.8	land 36°0 N, 28°1/4 E.-H= 15:
	e(Sb)	15.2	16:10. Recorded up to 19°; N° of stations 6 (BCIS).
29	e*Pb	22 17 36.3	Traces. Δ=370 km. ~ 3.3 dg.
	e Pn	22 17 52.1 C	An=3μ, Tn=2.7 sec., Ae=3μ, Te=
	ei(Sn)	18 44.2	2.5 sec., Δ=520km. ~ 4.7 dg. M=4.6 (Athens). Ionian Sea 36°I N, 18°1 E.-H=22:16:38; h about 40 km. Recorded up to 141°; N° of station 169(BCIS). M=5.9(Wichita M), 5.8(State College) 5.6(Uinta B), 5.4(Stuttgart), 5.3 (USCGS, Tonto Forest, College), 5.2 (Longmire), 5.1(Nurmijaervi), 4 1/2 -5 (Moscow), 4.9 (Blue M), 4.7(Cumberland Pl.). It was reported from Preveza (IV at Kamarina).

Date	Phase	Time	Additional Readings and Remarks
Oct.			
1	e*	17 22 45.2	Traces. Δ=290 km. ~ 2.6 dg.
	e P	17 22 29.0 D	Very weak. Δ=320 km. ~ 2.9 dg.
	eiS	23 03.0	Off south coast of Peloponnesus 35°6 N, 21°7 E.-H=17:21:44; h about 45 km. Recorded up to 92°; N° of stations 34 (BCIS). M=4.8 (Nurmijservi), 4.6 (USCGS), 4.4 (Blue M).
2	e	15 05 21.5	Traces.
2	e*Pg	19 32 12.5	Traces. Δ=40 km. ~ 0.4 dg.
	ePn	19 32 35.1 C	Very weak. Δ=185 km. ~ 1.7 dg.
	eiSn	58.0	Probably 38°1/2 N, 21°3/4 E.- H= 19:32:05 (Athens). Felt in Achaïa (III at Patras).
2	ei P	21 06 00.2 C	Very weak. Δ=355 km. ~ 3.2 dg.
	ei(S)	38.4	Off south coast of Crete Island 34°8 N, 23°5 E.- H=21:05:11; h about 45 km. Recorded up to 93°; N° of stations 66 (BCIS). M=4.7 (Nurmijuervi, Blue M); 4.5 (USCGS); 4.4(Stuttgart, Cumberland Pl.), 4.3 (College).
	e*	21 06 19.4	Traces. Δ=400 km. ~ 3.6 dg.
3	e Pn	10 07 43.0 C	Very weak. Δ=135 km. ~ 1.2 dg.
	eiPg	45.0 E	Felt in Magnesia (IV + at Pro-
	eiSn	58.5	myri).
	$eiS_{23}S$	59.4	
3	e	11 16 49.0	Traces. Felt in Magnesia(IV+ at Promyri).
3	e Pn	11 40 28.9 C	Very weak. Δ=130 km. ~ 1.2 dg.
	eiSn	44.0	Felt in Magnesia (IV+ at Promyri).
4	e Pn	17 02 09.0	Very weak. Δ=360 km. ~ 3.2 dg.
	eiPb	12.1	Off southwest coast of Crete
	eiSg	03 04.5	

Date	Phase	Time		Additional Readings and Remarks.
Oct.				
4				Island 34°.8 N, 23°.0 E.-H= 17: 01:17. Recorded up to 37°; N° of stations 16 (BCIS).
5.	e Pn	04 40 52.2	D	Traces. Δ =385 km. ~ 3.5 dg.
	eiSn	41 33.5		Off southwest coast of Crete Island 34°.6 N, 22°.8 E.- H=04: 40:00.Recorded up to 94°; No of stations 25 (BCIS).M=4.6(Uinta B), 4.5 (USCGS), 4.3 (Blue M).
6	e	05 24 52.2		Traces. Cephalonia Island(IV+ at Lixouri).
8	e Pg	01 18 04.0	C	Very weak. Δ=70 km. ~0.6 dg.
	eSg	12.5		Felt on Euboea Island (IV+ at Politika).
8	e Pg	01 55 04.5	CS	Very weak. Δ=70 km. ~ 0.6 dg.
	eiSg	13.5		Felt on Euboea Island (IV at Politika, II + at Chalkis).
8	e*Pn	05 40 51.1		Traces. Δ =155 km. ~1.4 dg.
	e Pn	05 41 11.5	C	Very weak. Δ=320 km. ~ 2.9 dg.
	eiSn	46.0		Ionian Sea 38°.9 N, 20°.2 E.-H= 05:40:28. Recorded up to 89°; N° of stations 35 (BCIS).M=4.5 (Cumberland Pl.),4.4(Wichita M), 4.3 (USCGS), 4.2 (Blue M,Uinta B).
11	e*	06 22 27.0		Traces.
	e Pn	06 22 52.3	c	Very weak. Δ=270 km. ~ 2.4 dg.
	e Pb	55.9		Velt on the Islands Cephalonia
	eiSn	23 22.5		(IV at Poros) and Ithaca (IV
	eiSy	28.9		at Ithaca).
12	eiPg	03 50 55.2		e50:52.Very weak. Δ=65 km. ~
	eiSg	51 03.5		0.6 dg. Felt in Boeotia (V at Thisvi) and Attica (III at Palaeon-Phaliron,II+ at Kallithea).

Date	Phase	Time		Additional Readings and Remarks.
Oct.				
17	e Pg	15 07 58.0		Traces. Δ =115 km. ~1 dg. Felt in
	e Sg	08 13.0		Magnesia (IV+ at St.- George Nilias, Agria).
18	e Pg	20 14 26.7		Traces. Δ=160 km. ~ 1.4 dg. Felt
	eiSg	46.2		in Evrytania (IV at Agrapha).
21	e Pn	00 01 23.6		Traces. Δ=370 km. ~ 3.3 dg. Dode-
	eiSg	02 20.3		canese Islands about 36° N, 27° E.- H=00:00.5 (BCIS).
21	ePn	00 45 22.4	D	Very weak. Δ =400 km. ~ 3.6 dg.
	ePb	33.3		West Turkey 39°1/4 N, 28°.0 E.- H=
	eiSn	46 12.0		00:44:35. Recorded up to 22°; No of stations 6 (BCIS).
21	ePg	05 52 13.7	C	Very weak. Local shock. Felt in
	eiSg	16.5		Attica (IV+ at Kiphisia, Nea-Erythrea, Stamata, St.-Stephanos,IV at Galatsi, Ano-Liosia, III+ at Grammatikon, Marathon, Pefki, Avlon, Athens, Cholargos, III at Aphidnae, Amarousion, Nea-Chalkidon, Kalithea, Paeania, Erythrae, Kalamos, II+ at Daphni, Lavreotiki) and on Hydra Island (II+ at Hydra. Not felt at Moschaton, Korydalos, Koropi, Keratea, Chaïdari, Ste.-Paraskevi, Kapandriti, Nea-Makri (of Attica).
21	e*Pg	12 47 09.0		Very weak. Local shock.
	e Pn	12 47 36.6	C	Traces. Δ=175 km. ~1.6 dg. Felt
	eiSg	48 00.0		in Achaïa (IV+ at Patras, St.-George-Rion).
22	i Pg	06 10 11.0	CSW	Traces. Local shock. Felt in At-
	eiSg	13.0		tica (IV+ at Kiphisia, Nea-Erythrea).

Date	Phase	Time		Additional Readings and Remarks.
Oct.				
22	ePn	17 03 51.1		Traces. Δ=475 km.~ 4.3 dg. Off south coast of Crete Island 34°.1 N, 26°.0 E.- H=17:02:46. Recorded up to 95°. No of stations 12 (BCIS). M=4.6 (USCGS, Blue M).
25	e*Pg	10 26 41.5		Traces. Δ=50 km.~ 0.5 dg.
	eiPg	10 26 57.4	C	Very weak Δ=150 km.~ 1.3 dg. Peloponnesus 37°3/4 N, 22°E.- H=10:26:31 (Athens). Felt in Arcadia (IV+ at Perdikoneri, IV at Langadia).
	ei Sg	27 16.5		
27	ePn	11 03 00.0		Traces. Δ=220 km.~ 2 dg. Felt on Thera Island (IV at Oea, Fyra).
	eiPg	05.0		
	eiSg	30.7		
28	ePn	16 12 34.8		Traces. Δ=525 km.- ~4.7 dg. Turkey 40°4 N, 29°0 E.- H=16:11:23. Recorded up to 27°; N° of Stations 8 (BCIS).
	eiSg	13 57.6		
29	ePn	20 18 21.8		Very weak. Δ=280 km. ~2.5 dg.
	ePb	24.2		Off north coast of Lemnos Island
	ePg	29.9		about 40°1/4, 25°1/4 E.- H=20:17:
	eSy	19 00.0		20 (BCIS).
31	ePn	22 12 31.6	C	Very weak. Δ =330 km. ~3 dg. Near
	eiSy	13 12.4		west coast of Crete Island about 35°1/2 N, 23°1/2 E.- H=22:11:50 (BCIS).
	e*	22 13 00.9		Traces. Δ =335 km.~ 3 dg.
Nov.				
1	ePn	03 11 18.7		Very weak. Δ =240 km. ~ 2.2 dg.
	eiPg	23.8	E	Felt on the Islands Chios (IV+ at
	eiSn	46.5		Vrondados, Chios, IV at Kallimassia, Kardamyla, Neochori) and Lesbos (IV at Petra, Stypsi, Ste.- Paraskevi, III+ at Ippios).

Date	Phase	Time		Additional Readings and Remarks.
Nov.				
3	e*Pg	14 07 57.6		Traces. Δ =110 km.~ 1 dg.
	ePn	14 08 18.5		Traces. Δ =260 km. 2.3 dg. West Greece,
	eiSn	47.6		39°N, 21° E.- H=14:07:7. Recorded up to 9°; No of stations 3 (BCIS). Felt in Aetolia (III+ at Messolonghi).
3	e*Pg	14 09 34.0		Traces. Δ =95 km.~ 0.9 dg.
	eiPn	14 09 50.0	D	Very weak. Δ =250 km. ~ 2.2 dg. West
	i Sn	10 19.0		Greece 38°9 N, 21°.1 E.- H=14:09: 16. Recorded up to 25°; N° of stations 9 (BCIS). Felt in Aetolia (IV at Messolonghi).
3	e*Pg	14 13 55.9		Traces. Δ =95 km.~ 0.9 dg.
	eiPn	14 14 18.6	D	Very weak Δ =260 km. ~ 2.3 dg. West
	eiPy	21.8	D	Greece about 38°8 N, 21°0 E.-
	i Sn	48.5		H=14:13:38 (Athens).
	i Sy	53.4		
3	e*Pg	14 31 56.8		Traces. Δ=110 km.~ 1 dg.
	eiPn	14 32 19.5	DNW	Very weak Δ =260 km. ~ 2.3 dg. West
	eiSn	48.0		Greece 39° N, 21° E.- H=14:31.7. Recorded up to 13°; N° of stations 3 (BCIS). Felt in Aetolia (IV at Messolonghi), Arta IV at Kompoti), and Preveza (IV at Preveza).
3	e*Pg	14 36 14.6		Very weak. Δ=96 km.~ 0.9 dg.
	e Pn	14 36 36.0	C	A_n=28μ, Tn=2.1 sec., Ae=21μ , Te=
	eiPg	41.7	SE	1.9 sec. Δ =255 km. ~ 2.3 dg. M=
	eiSy	37 10.0		5 (Athens). West Greece 38°9 N,
	eiSg	13.0		21°.1 E.- H=14:36:02. Recorded up to 94°; N° of Stations 57 (BCIS). M=4.5 (Nurmijaervi), 4.4 (Blue M), 4.3 (USCGS), 4.2 (Uinta B), 4.0 (Tonto Forest). Felt in Aetolia (IV+ at Aetolikon, Neochori, IV at Messolonghi), Preveza (IV+ at Preveza), Evrytania (IV at Agrapha).

Date	Phase	Time	Additional Readings and Remarks.
Nov.			
3	e*Pg	14 59 49.2	Traces. Δ=95 km.~ 0.9 dg.
	e Pn	15 00 10.5 C	Traces. Δ=250 km.~ 2.2 dg. After-
	eiSn	38.8	shock. Felt in Preveza (IV+ at
			Preveza) and Arta (IV at Kompori).
3	e*Pg	15 59 25.0	Traces. Δ=95 km. ~0.9 dg.
	e Pn	15 59 45.5	Very weak Δ=255 km. ~2.3 dg. After-
	eiSn	16 00 15.0	shock of Nov.3. West Greece 38°.9
	eiSg	22.5	N, 21°.1 E.- H=15:59:12. Recorded
			up to 128° ; N° of Stations 15
			(BCIS). M=4.1 (USCGS, Blue M).
3	e Pn	17 35 40.5	Traces. Δ=260 km. ~ 2.3 dg. Felt
	eiSb	36 13.0	on Leukas Island (IV at Leukas).
	eiSg	18.0	Six foreshocks have been felt since
			16h30m of the same day.
6	e Pn	07 26 38.7	Very weak. Δ=265 km. ~ 2.4 dg.
	eiSg	27 17.1	Felt on Zante Island (II+ at Zante).
6	e*Pg	21 08 35.4	Very weak. Δ=100 km. ~ 0.9 dg.
	e Py	21 08 56.1	Very weak. Δ=220 km. ~ 2 dg. Near
	e Pg	58.5	West coast of Peloponnesus 37°.4 N,
	eiSb	09 21.4	21°.4 E.- H=21:08:19. Recorded up
			to 90°; N° of stations 24 (BCIS).
			M=4 (USCGS, Blue M). Felt on Zante
			Island (IV+ at Zante) and in the
			region Elis (IV at Vounargos, III
			at Kalidona). Area of felt shaking
			about 10,000 km^2; M.M.=4.1 * .
6	e Sg	23 02 27.2	Traces. Felt in Elis (IV at Stre-
			phi).
7	e Pn	18 56 23.5 C	Very weak. Δ=225 km. ~ 2 dg. Cy-
	e(Pb)	25.0	clades Islands 35°.4 N, 24°.9 E.
	eiPg	27.8DE	(Probably 36°1/4 N, 25° E).- H=
	eiSn	49.3	18:55:50. Recorded up to 24°; N°
	eiSg	55.2	of stations 9 (BCIS). M=4 (USC
			GS). Felt on Paros Island (II+ at
			Naoussa).

Date	Phase	Time	Additional Readings and Remarks.
Nov.			
7	e Pn	20 04 46.5	Very weak. Δ=230 km. ~ 2.1 dg.
	eiSg	05 19.0	Felt on Paros Island (IV at Na-
			oussa).
10	eiPn	11 19 05.8CNW	Weak. Δ=250 km. ~2.2 dg. Cyclades
	eiPb	07.5	Islands 36°.4 N, 25°.8 E.- H=11:18:
	eiSb	38.0	33. Recorded up to 93°; N° of sta-
	eiSy	40.8	tions 40 (BCIS). M=4.7 (Cumberland
			Pl, Blue M), 4.6 (Wichita M), 4.5
			(USCGS, Tonto Forest), 4.1 (Stutt-
			gart).
	e*(Py)	11 19 39.0	Traces. Δ=410 km. ~ 3.7 dg.
10	e*(P)	18 37 29.9	Traces. Δ=70 km. ~0.7 dg.
	e P	18 37 55.0 C	Very weak Δ=240 km. ~2.2 dg.
	eiS	38 20.8	Ionian Sea 38°.0 N, 21°.0 E.- H=18:
			37:23; h about 55 km. Recorded up
			to 90°; N° of stations 37 (BCIS).
			M=4.7 (Tonto Forest, Nurmijaervi)
			4.5 (USCGS, Cumberland Pl., Wichi-
			ta M), 4.4 (Uinta B). 3.9 (Blue M).
			Felt on the Islands Cephalonia
			(IV+at Lixouri, Argostoli, IV at
			Svoronata, Poros, Skala), Zante
			(IV+ at Gaïtani, III Ano-Volimae),
			and in the region of Elis (IV+ at
			Vartholomio) and Acarnania (III
			at Astakos). Area of felt shaking
			about 10,000 km^2. M.M.=4.1* .
11	e	03 56 29.0	Traces. Felt on Chios Island (IV+
			at Kardamyla).
11	e Pg	11 49 25.5	Traces. Δ=280 km. ~ 2.5 dg. Felt
	eiSy	56.5	on Zante Island (III at Volimae).
	eiSg	11 50 00.0	
15	e	02 26 19.1	Traces. Felt in Evrytania (IV+ at
			Karpenisi).

Date	Phase	Time		Additional Readings and Remarks.
Nov.				
15	e Pn	13 13 51.7		Traces. Δ=180 km. ~ 1.6 dg. Felt in Aetolia (IV at Messolonghi).
	e Pg	53.2		
	eiSt	14 14.8		
	e Sg	15.4		
15	e Pn	18 17 38.0		Traces. Δ=290 km. ~ 2.6 dg. Felt in Jannina (IV+ at konitsa).
	e Pb	40.3		
	e Pg	45.7		
	eiSg	18 20.4		
16	e Pn	18 57 31.0		Traces. Δ=200 km. ~ 1.8 dg. Felt in Aetolia (III at Kaenourghion).
	eiSg	57.6		
25	e Sg	04 11 20.1		Traces. Felt in Evrytania (IV at Agrapha).
26	e Pn	16 20 50.6	D	Very weak. Δ =500 km. ~ 4.5 dg. Off east coast of Crete Island 34°6 N, 27°5 E.- H=16:19:49. Recorded up to 96°; N° of Stations 36 (BCIS). M=4.7(Cumberland Pl.), 4.5 (USCGS), 4.3 (Blue M).
	eiSb	52.0		
Dec.				
2	e Pn	17 06 49.3	D	Very weak. Δ=290 km. ~ 2.6 dg. Dodecanese Island about 36°1/2 N, 26°1/2 E.- H=17:06.1 (BCIS). Felt on Astypalaea Island (II+ at Astypalaea).
	eiPg	57.3		
	eiSb	07 25.2		
	eiSy	28.5		
4	e?Pn	04 27 24.6		Traces. Δ=120 km. ~ 1.1 dg. Felt in Arcadia (III at Vytina).
	eiSg	38.6		
5	eiSg	11 00 13.5		Traces. Felt on Samos Island(III at Pagontas).
5	e(Sg)	20 13 40.6		Traces. Felt on Corfou Island (V+ at St.- Matheos, V at Neochori, IV+ at Gastouri, IV at Corfou, Aphra).

Date	Phase	Time		Additional Readings and Remarks.
Dec.				
16	e*Pn	13 48 25.9		Weak. Δ =125 km. ~ 1.1 dg.
	ei*Sg	41.9		
	e Pn	13 48 36.0	D	An=153 μ , Tn=3.8 sec., Ae=181μ ,
	eiPb	38.0	CE	Te=4.6 sec., Δ=260 km. ~ 2.3 dg.
	i Pg	42.5	W	M=5.9 (Athens). Ionian sea 37°3
	i Sn	49 05.5		N, 20°9 E.- H=13:47:59.
	i Sb	08.5		Recorded up to 154°; N° of Stations 176 (BCIS). M=6 (Matsushiro, Uppsala, Kiruna), 5.8 (Eureka), 5.7 (Uinta B), 5.6 (USCGS, Blue M, Wichita M, Nurmijaervi), 5 1/2 (Moscow, Cumberland Pl., Tonto Forest) 5.0 (Kew).
				Felt in Elis (V at Strephi, Kalydona, Douneika, IV+ at Krestena, Letrinoe, IV at Vounargos, Vartholomio, Kardama, Zacharo, III+ at Andravida, Traganon, III at Savalia, Epitalion, Neochori, II+ at Makrysia, Katakolon), Messinia (V at Chora, Kremydia, IV+ at Diodia, Messini, Phyliatra, Mikromani, IV at Evangelismos, Methoni, Meligalas, Kopanaki, Platy, Gargalianoe, Kyparissia, Koroni, Avramion, III+ at Kentrikon, Chandrinou, Vlachopoulon, III at Katsaron, Pylos, II+ at Petalidi, Thouria, Kynigos), Aetolia (IV+ at Agrinion, IV at Analipsis, Perdikaki, III+ at Aetolikon, Messolonghi, Panaetolion, III at Kaenourghion, Palaeochoraki), Achaïa (IV at Kertezi, III at Patras, Alissos, IV+ at Perithorion), and on the Islands of Zante (IV+ at Zante, Machaeradon, IV at Keri, III+ at Gaïtani, Skoulikadon, Gerakari, III at Ano-Volimae, Volimae, Lithakia), Cephalonia (III+ at Mousata, III at

Date	Phase	Time	Additional Readings and Remarks.
Dec. 16			Sami, Svoronata, Lixouri, II+ at Digaleton), Ithaca (III at Ithaca) and Leukas (III at St.- Petros). Not felt at Kylene, Lampia, Goumeron, Platanos, Ladikon (of Elis), Psari, Skala, Longa, Ano-Dorion (of Messinia), Evinochori, Gouria, Spolaïta, Papadatos, Platanos, Paravola, Gavalou (of Aetolia), Vrachneïka, Skiada, Lousika, Chalandritsa, Valimitika, Kalavryta (of Achaïa), Lepenou (of Acarnania), Katastari, Asprogerakas (of Zante), Chionata, Poros, Argostoli Vlachata (of Cephalonia), Leukas (of Leukas). Area of felt shaking about 70,000 km^2. M.M.=5.3.-*
19	ePn	18 44 22.5 D S E	An=16 μ, Tn=2.8 sec., Ae=18 μ,
	eiPy	27.5 D	Te=2.8 sec., Δ=300 km. ~ 2.7 dg.
	eiSb	45 00.0	M=5 (Athens). Off north coast of
	i Sy	03.5	Crete Island 35°9 N, 25°9 E.- H=18:43:39. Recorded up to 93°; N° of Stations 28 (BCIS). M=4.8 (Wichita M, USCGS).
	e*(Pg)	18 45 02.6	Traces. Δ=445 km.~ 4 dg.
20	eiPn	05 36 35.2 D	Very weak. Δ=120 km.~ 1.1 dg.
	eiP$_{33}$P	36.2 D	Felt in Phokis (IV at Galaxidi).
	eiSn	49.3	
	eiSg	50.9	
	e*	05 36 42.8	Traces.
21	e*Pg	01 35 56.4	Traces. Δ=60 km. ~0.6 dg.
	e*Sg	36 03.9	
	e Pn	01 36 15.0 D	Very weak. Δ=135 km. ~ 1.2 dg.
	e Pb	17.2	Felt in Achaïa (IV+ at Temeni),
	eiSg	34.0	and Phokis (III at Galaxidi).

Date	Phase	Time	Additional Readings and Remarks.
Dec. 21	e	16 23 12.2	Traces. Felt on Skopelos Island (IV+ at Skopelos).
22	e	16 06 57.6	Traces. Felt in Achaïa (IV at Patras).
24	e Pn	08 16 57.1	Traces. Δ=370 km. ~ 3.3 dg. Felt on
	e Pb	17 00.8	Crete Island, especially in Lasi-
	e Sn	37.0	thi (IV at Kato-Chorio).
	eiSg	53.2	
25	e	22 02 06.0	Traces. Felt on Samos Island (III+ at Skoureika).

C. FELT SHOCKS NOT RECORDED.

Date	Time h.m.	Localities	Provinces	Intensities
Jan.				
3	14:32	Zaros	Heraklion	III
12	11:20	Kastelli	Phokis	III
14	21:25	St.-Konstantinos	Aetolia	III+
15	20:25	Patiopoulon	Aetolia	II+
18	03:30	Kalyvae	Chania	III+
18	08:30	Chalkiopoulon	Aetolia	IV
19	02:20	Volos	Magnesia	IV+
19	02:22	Volos	Magnesia	IV+
19	02:26	Volos	Magnesia	IV+
19	06:15	Galaxidi	Phokis	II+
20	08:20	St.-Konstantinos	Aetolia	IV
24	04:55	Leukas	Leukas	IV
24	06:42	Tetrakomon	Arta	IV
25	05:00	Gorgomylos	Preveza	IV
28	09:45	Pyrgos	Elis	IV
Feb.				
1	01:40	Terovon	Jannina	IV
1	06:30	Gorgomylos	Preveza	IV
2	20:16	Patras	Achaïa	IV+
2	21:12	Patras	Achaïa	IV+
7	17:30	Riganion	Aetolia	II+
8	03:27	Terovon	Jannina	III+
8	03:30	Riganion	Aetolia	IV
8	04:15	Palaeochoraki	Aetolia	II+
8	11:00	Drosopighi	Arta	III
11	05:20	Terovon	Jannina	III+
12	12:19	Terovon	Jannina	III+
12	12:33	Terovon	Jannina	III+
12	17:53	Terovon	Jannina	IV
12	22:34	Terovon	Jannina	II+
13	13:03	Terovon	Jannina	III+
13	22:38	Terovon	Jannina	III
14	07:55	Terovon	Jannina	IV
14	12:00	Drosopighi	Arta	IV
		Tetrakomon	Arta	IV

Date	Time	Localities	Provinces	Intensities
Feb.				
16	01:00	Drosopighi	Arta	IV
17	00:05	Gorgomylos	Preveza	V
17	02:48	Terovon	Jannina	IV+
17	04:25	Terovon	Jannina	IV
20	04:10	Tertakomon	Arta	IV
20	19:30	Platanousa	Jannina	V
20	19:50	Drosopighi	Arta	IV
21	05:00	Zitsa	Jannina	IV+
21	08:30	Zitsa	Jannina	IV
22	01:00	Drosopighi	Arta	IV
24	06:20	Heraklion	Heraklion	III
25	10:25	Leukas	Leukas	IV
25	12:05	Karpenisi	Evrytania	III+
25	23:55	Karpenisi	Evrytania	IV
26	00:27	Zitsa	Jannina	IV+
26	01:35	Gorgomylos	Preveza	IV
26	18:18	Terovon	Jannina	IV
26	19:14	Tetrakomon	Arta	III+
27	12:11	Tetrakomon	Arta	IV
27	14:47	Tetrakomon	Arta	IV
27	15:10	Tetrakomon	Arta	IV
28	09:13	Parga	Preveza	II+
March				
1	14:00	Zitsa	Jannina	IV+
1	23:40	Gorgomylos	Preveza	IV
2	08:00	Zitsa	Jannina	V
2	09:05	Palaeros	Akarnania	IV
4	14:05	Lithinae	Lasithi	IV
5	00:39	St.-George	Aetolia	IV
5	06:25	Lithinae	Lasithi	IV
5	13:40	Gorgomylos	Preveza	V+
6	07:53	St.-Myron	Heraklion	IV
8	17:00	Tetrakomon	Arta	IV+
11	18:41	Tetrakomon	Arta	IV+
12	12:35	Gorgomylos	Preveza	V+
12	16:03	Gorgomylos	Preveza	V+
		Platanousa	Jannina	V
12	20:25	Agrapha	Evrytania	IV
12	20:53	St.-Petros	Leukas	IV+
13	05:20	Tetrakomon	Arta	IV

Date	Time h.m.	Localities	Provinces	Intensities
March				
13	18:46	Gorgomylos	Preveza	IV+
13	19:20	Karpenisi	Evrytania	IV
14	03:26	Karpenisi	Evrytania	IV
14	10:35	Phourna	Evrytania	IV+
14	10:37	Tetrakomon	Arta	IV
14	13:25	Agrapha	Evrytania	IV
14	16:00	Karpenisi	Evrytania	IV
14	20:30	Karpenisi	Evrytania	IV
14	20:35	Karpenisi	Evrytania	IV
14	21:35	Karpenisi	Evrytania	IV
15	11:15	Karpenisi	Evrytania	IV
15	13:00	Drosopighi	Arta	IV+
15	19:32	Karpenisi	Evrytania	IV
17	16:00	Gorgomylos	Preveza	III+
17	16:13	Gorgomylos	Preveza	III+
17	16:52	Gorgomylos	Preveza	III+
17	18:10	Platanousa	Jannina	V
17	18:35	Gorgomylos	Preveza	III+
18	02:40	Platanousa	Jannina	V
18	03:03	Gorgomylos	Preveza	IV
18	03:26	Gorgomylos	Preveza	III
18	04:12	Gorgomylos	Preveza	III
18	07:34	Gorgomylos	Preveza	III
18	09:54	Gorgomylos	Preveza	III
18	14:30	Karpenisi	Evrytania	IV
18	15:46	Gorgomylos	Preveza	V
18	17:15	Tetrakomon	Arta	IV
19	10:25	Gorgomylos	Preveza	V
19	22:42	Tetrakomon	Arta	IV
19	23:25	Gorgomylos	Preveza	V
19	23:35	Gorgomylos	Preveza	V
20	01:27	Gorgomylos	Preveza	V
20	05:25	Gorgomylos	Preveza	V
20	10:30	Gorgomylos	Preveza	V
20	19:52	Oenousae	Chios	IV
20	21:15	Terovon	Jannina	IV
23	19:00	Chandrinou	Messenia	IV+
23	21:40	Chandrinou	Messenia	IV
23	23:00	Chandrinou	Messenia	III
25	19:18	Neon-Mobastiri	Phtiotis	V

Date	Time h.m.	Localities	Provinces	Intensities
March				
26	02:00	Platanousa	Jannina	V+
27	02:25	Terovon	Jannina	IV+
27	06:30	Jannina	Jannina	III+
27	09:25	Larisa	Larisa	II+
28	13:21	Tetrakomon	Arta	IV
April				
1	19:05	Konitsa	Jannina	III+
3	01:12	Vrangiana	Karditsa	IV
5	15:45	Drosopighi	Arta	V
5	16:00	Drosopighi	Arta	III
5	16:10	Drosopighi	Arta	V
7	10:45	Vlachata	Cephalonia	IV+
8	03:40	Palaeros	Acarnania	IV
8	08:58	Palaeros	Acarnania	II+
9	17:30	Archondochori	Acarnania	IV
9	18:00	Archondochori	Acarnania	IV
9	19:30	Archandochori	Acarnania	IV
16	00:47	Zitsa	Jannina	IV
16	14:00	Tetrakomon	Arta	IV
16	16:21	Tetrakomon	Arta	V+
19	08:00	Ste.-Varvara	Heraklion	IV+
		St.- Myron	Heraklion	II+
19	08:30	Ste.-Varvara	Heraklion	IV+
19	12:10	Archanae	Heraklion	III+
20	10:11	Daphe	Heraklion	IV+
		St.-Myron	Heraklion	III
20	12:45	Tylisos	Heraklion	V
23	01:16	Zitsa	Jannina	IV
26	06:18	Karya	Larisa	IV+
26	13:02	Zitsa	Jannina	III+
27	00:15	Politika	Euboea	IV
28	03:08	Zitsa	Jannina	IV+
30	05:25	Terovon	Jannina	III
30	07:20	Platanousa	Jannina	III
May				
1	05:14	Letrinoe	Elis	III
3	04:55	Platanousa	Jannina	III
5	02:00	Myrsini	Preveza	IV

Date	Time h.m.	Localities	Provinces	Intensities
May				
6	21:05	Isthmia	Corinthia	IV
6	21:06	Isthmia	Corinthia	III
9	12:00	Psachna	Euboea	V
11	02:35	Platanousa	Jannina	V
11	19:46	Zitsa	Jannina	IV+
13	01:00	Nestani	Arcadia	IV+
15	13:40	Nemea	Corinthia	II+
17	13:00	Patiopoulon	Acarnania	III+
22	10:07	Archondochori	Acarnania	IV
22	17:30	Seskoulon	Magnesia	IV
23	10:01	Eretria	Larisa	IV
29	10:13	Tetrakomon	Arta	IV
30	11:45	Platamousa	Jannina	IV
June				
6	23:40	Psachna	Eubea	IV
9	13:30	Papadaton	Acarnania	IV
10	20:19	Zitsa	Jannina	IV
23	10:45	Vyzikion	Arcadia	III+
23	14:45	Kosmion	Rhodope	IV+
23	21:00	Kosmion	Rhodope	IV
24	01:00	Kosmion	Rhodope	IV+
24	02:10	Aeghiali	Thera	IV+
24	05:10	Aeghiali	Thera	IV
24	11:02	Terovon	Jannina	IV+
July				
5	13:50	Pelasghia	Phthiotis	IV
9	16:25	Neos-Pyrgos	Euboea	IV
16	20:05	Klitor	Achaïa	II+
Aug.				
1	17:15	Argostoli	Cephalonia	IV+
12	13:53	Avliotes	Corfou	IV+
18	11:03	Kanallaki	Preveza	IV
23	20:28	Lixouri	Cephalonia	IV
Sept.				
6	00:45	Ste.-Anna	Euboea	IV
15	07;10	Platanousa	Jannina	IV+

Date	Time	Localities	Provinces	Intensities
	h.m.			
Sept.				
16	21:05	Arta	Arta	IV
24	08:00	Petrades	Evros	IV
Oct.				
12	20:22	Poros	Cephalonia	IV
17	15:01	St.-George-Nilias	Magnesia	IV+
17	15:05	St.-George-Nilias	Magnesia	IV+
21	06:25	Agria	Magnesia	IV+
23	12:55	Perovon	Jannina	II+
26	05:33	Poros	Cephalonia	III+
28	18:05	Ios	Cyclades	IV
Nov.				
10	17:35	Spartiae	Cephalinia	IV+
Dec,				
2	19:30	Astypalaea	Dodecanese	III
7	20:15	Aphra	Corfou	IV
22	15:58	Patras	Achaïa	IV

TABLE

INTENSITIES OF THE SHOCKS FELT IN GREECE

Localities	Provinces	Intensities on Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot.
Aeghiron	Xanthi				1							1
Aetolikon	Aetolia		1	1	1							3
Aetos	Florina			1								1
Aghia	Preveza			1								1
Agrapha	Evrythania			12	2							14
Agria	Magnesia			4								4
Agrinion	Aetolia			4	1							5
Alexandrou-polis	Evros	1		1								2
Alexandria	Emathia			1								1
Alissos	Achaïa		2									2
Almyros	Magnesia			2								2
Alonisos	Magnesia			1								1
Amalias	Elis		1	2								3
Amarousion	Attica		1									1
Amori	Evros	1										1
Amotopos	Arta					1						1
Ampelouzos	Heraklion		1	3								4
Amphilochia	Acarnania			1								1
Amyntecn	Florina			1								1
Analipsis	Aetolia			1								1
Andravida	Elis		1	1								2
Andritsaena	Elis			1								1
Angelokastron	Aetolia			1								1
Anoghia	Rethymnon			1								1
Ano-Akria	Heraklion					1						1
Ano Kalentini	Arta			2								2
Ano-Klitoria	Achaïa		1									1
Ano-Liosia	Attica			1								1
Ano-Volimae	Zante		3									3
Anthia	Evros		1									1
Aphidnae	Attica		1									1

Localities	Provinces	Intensities on Mercalli - Sieberg Scale									
		II	III	IV	V	VI	VII	VIII	IX	X	Tot.
Aphra	Corfou			1							1
Aphration	Euboea			9							9
Apsalos	Pelli			1							1
Aravissos	Pelli			1							1
Arcalochori	Heraklion		1	4							5
Archanae	Heraklion			3	1						4
Archondochori	Acarnania			7							7
Ardanion	Evros			2							2
Argalasti	Magnesia			2							2
Argos-Orestikon	Kastoria		1								1
Argostoli	Cephalonia		1	4							5
Argyroupolis	Rethymnon		1								1
Aridea	Pella			1							1
Arisvi	Xanthe			1							1
Arnisa	Pelli			1							1
Arta	Arta			3							3
Artesianon	Karditsa				1						1
Asomatoe	Xanthe			1							1
Asopia	Boeotia			1							1
Astakos	Acarnania	1	1	5	1						8
Astypalaea	Dodecanese	1		1							2
Athens	Attica	2	1								3
Athikia	Corinthia			1							1
Atsipades	Heraklion					1					1
Avantos	Evros		1								1
Avliotes	Corfou		1								1
Avlon	Attica		1								1
Avramion	Messinia			1							1
Axioupolis	Kilkis			1							1
Bourlesia	Aetolia			1							1

Localities	Provinces	Intensities on Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot.
Calchas	Rhodope	1										1
Chalkiopoulon	Acarnania			1								1
Chalkis	Euboea	1		7								8
Chania	Chania			1								1
Chandrinou	Messinia		2	2								4
Charakas	Heraklion		2	2	1							5
Chios	Chios			2	1							3
Cholargos	Attica		1									1
Chora	Messinia				1							1
Corfou	Corfou			1								1
Corissos	Kastoria			1								1
Daphia	Lesbos	1										1
Daphne	Heraklion			1								1
Daphni	Attica	1										1
Diavata	Salonica		1									1
Didymotichon	Evros			2								2
Digaletoh	Cephalonia	1	1									2
Diodia	Elis			1								1
Dodoni	Jannina		1									1
Dokimion	Aetolia			1								1
Doliana	Jannina		1	2								3
Douneika	Elis				2							2
Drosia	Achaïa			2		1						3
Drosopighi	Arta		1	2								3
Edessa	Pelli			1								1
Elatia	Phthiotis			1								1
Eleousa	Jannina				1	1						2
Englouvi	Ieukas					1						1

Localities	Provinces	Intensities on Mercall - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot.
Epitalion	Elis		1									1
Eresos	Lesbos	1										1
Eretria	Larisa			1								1
Erythrae	Attica		1									1
Evangelismos	Messinia			1								1
Evzonoe	Kilkis		1									1
Florina	Florina			1								1
Fyra	Thera			1								1
Gaitani	Zante		1	1								2
Galatas	Chania				1							
Galatas	Aetolia			2								2
Galatades	Pelli		1									1
Galatsi	Attica			1								1
Galaxidi	Phokis		1	1								2
Galia	Heraklion			1								1
Gargalianoe	Messinia		1	1								2
Gastouri	Corfou			1								1
Grammatikon	Attica		1									1
Gramenitsa	Arta			1								1
Gavalou	Aetolia		1									1
Germas	Kastoria	1										1
Goniae	Heraklion		1									1
Gorgomylos	Preveza		1	1	3	1						6
Goumenissa	Kilkis			1								1
Gymnon	Euboea		1	5								6
Gymnotopos	Preveza					1						1
Hellinochori	Evros			1								1

Localities	Provinces	Intensities on Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot
Heraklion	Heraklion		1	2								3
Heroïkon	Florina			1								1
Hierapetra	Lasithi			1								1
Histiaea	Euboea			2								2
Hydra	Attica	1										1
Iasmos	Rhodope	1										1
Ippios	Lesbos		1	1								2
Ithaca	Ithaca		2	2								4
Isthmia	Corinthia			1								1
Jannina	Jannina		2	2								4
Kaenourghion	Aetolia		3	1								4
Kalamos	Attica		2									2
Kalamos	Ithaca			1								1
Kalamoti	Chios			1								1
Kalavryta	Achaïa			1								1
Kali	Pelli			1								1
Kallimasia	Chios			2								2
Kallithea	Attica	1	1									2
Kalloni	Lesbos			1								1
Kalydona	Elis		2	1	2							5
Kamarina	Preveza		2	3	1							6
Kandanos	Chania			1								1
Kapi	Lesbos			1								1
Kardama	Elis			1								1
Kardamaena	Kos		1									1
Kardamyla	Chios			2								2
Karditsomagoula	Karditsa		1									1

Localities	Provinces	Intensities on Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot.
Karpenisi	Evrytania		1	13	1							15
Karya	Argolis		2									2
Karya	Leukas			2								2
Karyotissa	Pelli		1									1
Kastaneae	Kilkis			1								1
Kastaneae	Evros			1								1
Kasteli	Phokis		2									2
Kasteli	Heraklion			1								1
Kastri	Preveza				1							1
Katakolon	Elis	1										1
Kato-Akria	Heraklion					1						1
Kato-Achaïa	Achaïa			1								1
Kato-Chorio	Lasithi			4								4
Kato-Lechonia	Magnesia			1								1
Kato-Tritos	Lesbos		1									1
Katouna	Acarnania			1								1
Katsaron	Messinia		1									1
Katsikas	Jannina			1								1
Kavyli	Evros		1	2								3
Kedros	Karditsa	1										1
Kela	Florina			1								1
Kentrikon	Messinia		1									1
Kentrikon	Arta		1	2								3
Kerami	Lesbos			1								1
Kerasochori	Evrytania			1								1
Keri	Zante			1								1
Kertezi	Achaïa			1								1
Kiphisia	Attica			2								2
Kliou	Lesbos		1									1
Klitor	Achaïa	1		1								2
Knidi	Kozani			1								1
Komotini	Rhodope			1								1
Kompoti	Arta			3								3
Konitsa	Jannina		1	3								4
Kontopouli	Lemnos		1									1
Kopanaki	Messinia			1								1

Localities	Provinces	Intensities on Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot.
Kopanon	Emathia	1										1
Kornopholea	Evros			1								1
Koroni	Messinia			1								1
Korphovouni	Arta			1								1
Kosmion	Rhodope			1								1
Kotyli	Xanthe			1								1
Kounavoe	Heraklion		1									1
Kounina	Achaïa		1									1
Kourenta	Jannina			1								1
Koutseli	Jannina		1									1
Kranaea	Preveza			4								4
Kranoula	Jannina				1							1
Kremydia	Messinia				1							1
Krestaena	Elis			1								1
Krokos	Kozani			1								1
Krya-Vrysi	Pelli			1								1
Kryoneri	Achaïa			1								1
Kryoneri	Salonica			1								1
Kyani	Evros		1									1
Kynigos	Messinia	1										1
Kyparisia	Messinia		1	1								2
Kypseli	Arta		1	1								2
Lagyna	Evros			1								1
Langadas	Salonica		1									1
Langadia	Arcadia			1								1
Lavara	Evros			2								2
Lavreotiki	Attica	1										1
Lechouri	Achaïa			1								1
Letrinoe	Elis	1	4	2	1							8
Levidi	Arcadia		1	2								3
Leuka	Phthiotis		1									1
Leukas	Leukas		1	2								3
Leukia	Phthiotis			1								1
Limnae	Lasithi			2								2

Localities	Provinces	Intensities on Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot.
Limin-Cersonisou	Heraklion		1									1
Lithakia	Zante		1									1
Livadia	Rethymnon		1									1
Lixouri	Cephalonia		1	9								10
Lophari	Rhodope		1									1
Loukia	Heraklion					1						1
Lourae	Heraklion					1						1
Louros	Preveza		1	1								2
Loutra-Aedipsou	Euboea			1	1							2
Loutros	Evros			1								1
Lykostomon	Jannina				1							1
Macheradon	Zante		1	1								2
Makri	Evros			1								1
Makrysia	Elis	1			1							2
Mandamados	Lesbos			1								1
Mani	Evros			2								2
Merantochori	Leukas			1								1
Marathon	Attica		1									1
Margaritae	Rethymnon			1								1
Maritsa	Rhodes			1								1
Mataranga	Aetolia			1								1
Mavrochori	Kastoria			1								1
Melampes	Rethymnon		1	1								2
Meligalas	Messinia			1								1
Mesagros	Lesbos		1									1
Mesolonghi	Aetolia		2	8								10
Messini	Messinia			1								1
Methoni	Messinia		1	1								2
Methymna	Lesbos		1									1
Michalitsi	Preveza				3							3
Mikromani	Messinia			1								1
Milea	Pelli			1								1

Localities	Provinces	Intensities on Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot.
Mileae	Magnesia			1								1
Mintiloglion	Achaïa		1									1
Moerae	Heraklion			1	1	1						3
Molos	Phthiotis			1								1
Moria	Heraklion					1						1
Mouriae	Kilkis		1									1
Mousata	Cephalonia		1	1								2
Mylopotamos	Pelli		1									1
Myrina	Lemnos			2								2
Myrsini	Preveza			1	1							2
Mytikas	Acarnania			3								3
Mytikas	Euboea			1								1
Naousa	Paros	1		1								2
Naupaktos	Aetolia			1								1
Nea-Chalkidon	Attica		1									1
Nea-Erythrea	Attica			2								2
Nea-Ionia	Magnesia		2	3								5
Nea-Kessani	Xanthe			1								1
Nea-Pelli	Pelli		1									1
Nea-Vyssa	Evros			1	1							2
Nemea	Corinthia			1								1
Nenita	Chios			1								1
Neochori	Aetolia			2								2
Neochori	Chios		1	2								3
Neochori	Evros		1									1
Neochori	Elis		1									1
Neochori	Xanthe		1									1
Neo-Monastiri	Phthiotis			1								1
Neos-Pyrgos	Euboea			1								1
Nestani	Arcadia			1								1
Nestorion	Kastoria		1									1
Nikaea	Attica	1										1

Localities	Provinces	Intensities On Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot
Nision	Emathia			1								1
Oea	Thera			1								1
Oenousae	Chios			1								1
Orchomenos	Boeotia	1										1
Oreoe	Euboea			1								1
Orestias	Evros			1								1
Organi	Rhodope		1									1
Paeania	Attica		1									1
Pagontas	Samos		2									2
Palaea-Epidavros	Argolis			1								1
Palaeochoraki	Aetolia		1	1								2
Palaeochori	Aetolia		1									1
Palaeon-Phaliron	Attica		1									1
Palàeophyton	Pelli			1								1
Palaeros	Acarnania			1	1							2
Paliampela	Acarnania			1								1
Paliourion	Evros			2								2
Panaetalion	Aetolia		1	2								3
Panariti	Corinthia				1							1
Papadatae	Preveza			2	1							3
Papadatae	Aetolia			1								1
Papadatos	Aetolia			2								2
Papaghiannis	Florina			1								1
Paravola	Aetolia			1								1
Parga	Preveza	1	3	1								5
Patiopoulon	Acarnania	1										1
Patras	Achaïa		3	9	1							13
Pefki	Attica		1									1

Localities	Provinces	Intensities on Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot.
Pelasghia	Phthiotis	2		5	1							8
Pehtalophos	Acarnania			1								1
Peplos	Evros			2								2
Peratia	Acarnania				1							1
Perdikaki	Aetolia			1								1
Perdiconeri	Arcadia			1								1
Perithorion	Aetolia		1									1
Perithorion	Achaïa	1										1
Perivlepton	Jannina					1						1
Petalidi	Messinia	1										1
Petra	Lesbos			1	1							2
Petrades	Evros			1								1
Petrota	Evros			1								1
Pharae	Achaïa					1						1
Pharsala	Larisa		1									1
Pherae	Evros			2								2
Philipias	Preveza			2								2
Philotas	Kozani			1								1
Phlampouron	Florina		1									1
Phourna	Evrytania			3								3
Phourni	Lasithi			1	1							2
Phylakton	Evros			2								2
Phyliatra	Messinia			1								1
Phytia	Emathia	1										1
Pigadia	Jannina					1						1
Pitsidia	Heraklion			3								3
Plaghia	Kilkis		1									1
Platanos	Aetolia		1									1
Platanousa	Jannina				3	1						4
Platy	Messinia			1								1
Platy	Emathia	1										1
Politika	Euboea		1	6								7
Polyanthon	Rhodope		1									1
Polypotamos	Florina	1										1
Pompia	Heraklion			1	1							2
Poros	Cephalonia			2								2
Pramanta	Jannina		1									1

Localities	Provinces	Intensities on Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot.
Prangion	Evros		1									1
Preveza	Preveza		1	6								7
Prodromos	Karditsa			1								1
Promyri	Magnesia			3								3
Prophitis-Elias	Pelli			1								1
Protoklissi	Evros			1								1
Psachna	Euboea	1	5	11	2							19
Psathopyrgos	Achaïa		1									1
Ptolemaïs	Kozani		1									1
Pyli	Kos			1								1
Pylos	Messinia		1	1								2
Pyrgion	Chios		1									1
Pyrgos	Elis			2								2
Pyrgos	Heraklion			2								2
Pythion	Evros	1		1								2
Rethymnon	Rethymnon		1									1
Rigani	Aetolia			1								1
Rizomylos	Larisa			1								1
Rhodes	Rhodes		1									1
Rododaphni	Achaïa		1									1
Rodon	Kilkis			1								1
Salonica	Salonica			1								1
Salpi	Rhodope			1								1
Savalia	Elis		1									1
Selianitika	Achaïa		1	1								2
Sesklon	Magnesia			1								1
Sevastiana	Pelli			1								1
Skala	Cephalonia			2								2
Skiathos	Skiathos			1		1						2
Sklithron	Florina		1									1

Localities	Provinces	Intensities on Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot.
Skopelos	Lesbos			1								1
Skopelos	Skopelos		2	3	1							6
Skopia	Florina		1									1
Skoulikadon	Zante		1									1
Skoureïka	Samos		1									1
Sosandra	Pelli			1								1
Souda	Chania			1								1
Souphli	Evros			2								2
Spartiae	Cephalonia				1							1
Spolaïta	Aetolia		1									1
Stamata	Attica			1								1
Stamna	Aetolia		1		1							2
Staviae	Heraklion						1					1
St.-George	Aetolia		1									1
St.-George-Nilias	Magnesia			2								2
St.-George-Rion	Achaïa			1								1
St.-Elias	Leukas					1						1
St.-Eustratios	Lemnos		1									1
St.-Konstantinos	Aetolia			1								1
St.-Matheos	Corfou				1							1
St.-Myron	Heraklion		1	3								4
St.-Nikolaos	Lasithi		1									1
St.-Pavlos	Salonica		1									1
St.-Petros	Leukas		1	1								2
St.-Stephanos	Attica			1								1
St.-Vlasios	Aetolia			2								2
Ste.-Anna	Euboea			5								5
Ste.-Paraskevi	Lesbos	1		1								2
Ste.-Trias	Boeotia			1								1
Ste.-Varvara	Heraklion				3							3
Strephi	Elis			5	2							7
Stylis	Phthiotis			2								2

Localities	Provinces	Intensities on Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot.
Strephi	Elis			5	2							7
Stylis	Phthiotis			2								2
Stypsi	Lesbos			2								2
Svoranata	Cephalonia		1	4	1							6
Symi	Dodecanese		1									1
Temeni	Achaïa			2								2
Terovon	Jannina		1	9								10
Tetrakomon	Arta			6	1							7
Thebes	Boeotia			1								1
Thisvi	Boeotia				1							1
Tholopotamion	Chios		1									1
Thouria	Messinia	1										1
Thourion	Evros		1									1
Thrapsanon	Heraklion			1								1
Thrylorion	Rhodope			1								1
Toumpa	Kilkis			1								1
Traganon	Elis		1									1
Tycheron	Evros				1							1
Tylisos	Heraklion				1							1
Vaghionia	Heraklion						1					1
Vartholomio	Elis			3								3
Vasilika	Lesbos			1								1
Vasilika	Salonica		1									1
Velvendos	Kozani		1									1
Veroea	Emathia	1										1
Vevi	Florina			1								1
Vlachata	Cephalonia			1	1							2
Vlachopoulon	Messinia		1									1
Vogatsikon	Kastoria			1								1
Volimae	Zante		3									3

Localities	Provinces	Intensities on Mercalli - Sieberg Scale										
		II	III	IV	V	VI	VII	VIII	IX	X	XI	Tot.
Vonitsa	Acarnania			1								1
Vorinon	Pelli			1								1
Voucolia	Chania			1								1
Vounargos	Elis			3								3
Vrachasi	Lasithi			1								1
Vrisa	Lesbos			1								1
Vrondados	Chios			2								2
Vrysi	Euboea			1								1
Vytina	Arcadia		1	3								4
Xylogani	Rhodope			1								1
Xyno-Nero	Florina		1									1
Zacharo	Elis			1								1
Zagliveri	Salonica		1									1
Zante	Zante	1		2								3
Zaros	Heraklion			3								3
Zeli	Phthiotis		1									1
Zevgaraki	Aetolia			1								1
Zitsa	Jannina			4								4
Zoni	Evros		1	1								2
		42	187	523	63	20	2					937

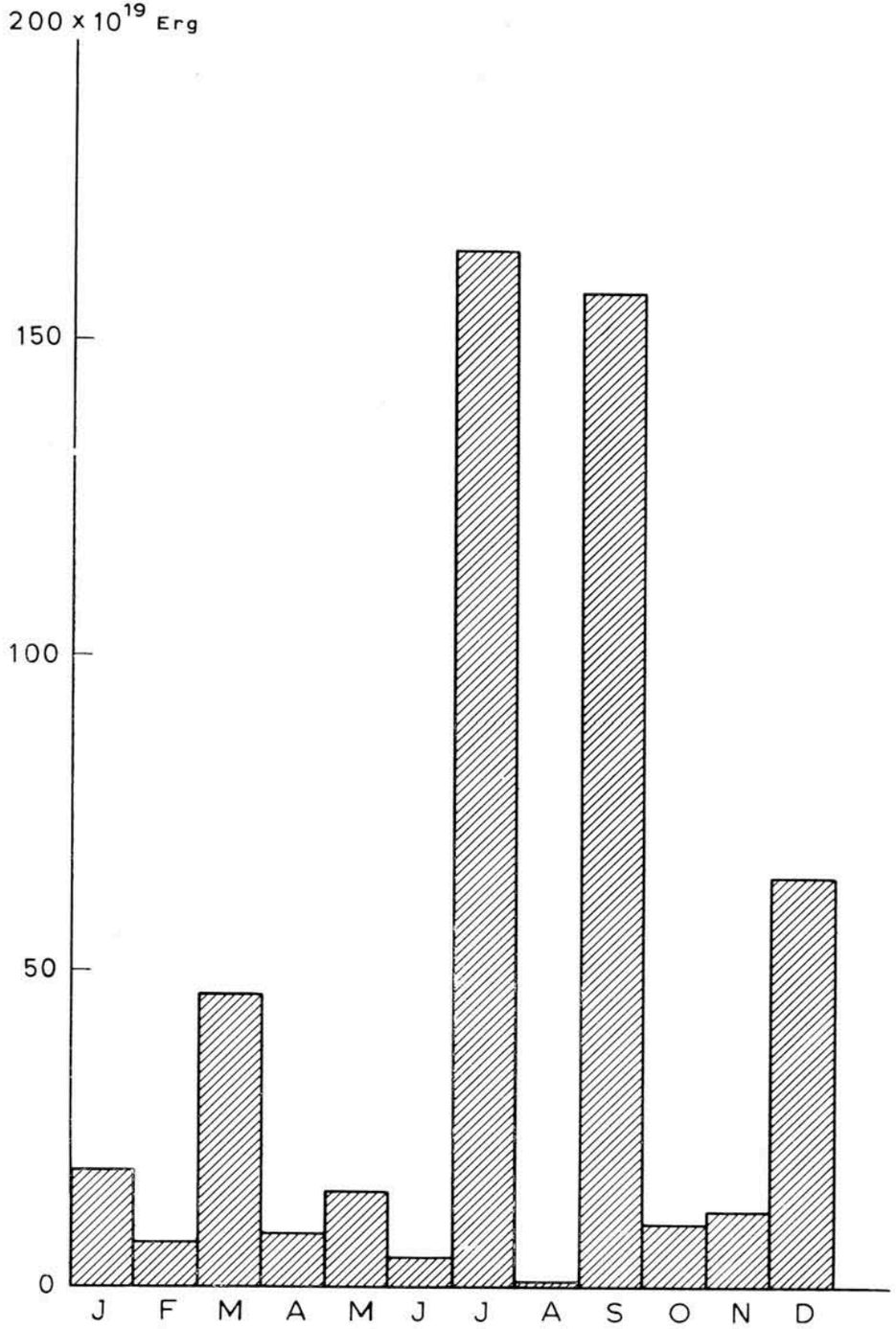

Fig. 1.—Earthquake energy released in the area of Greece per month in 1963.

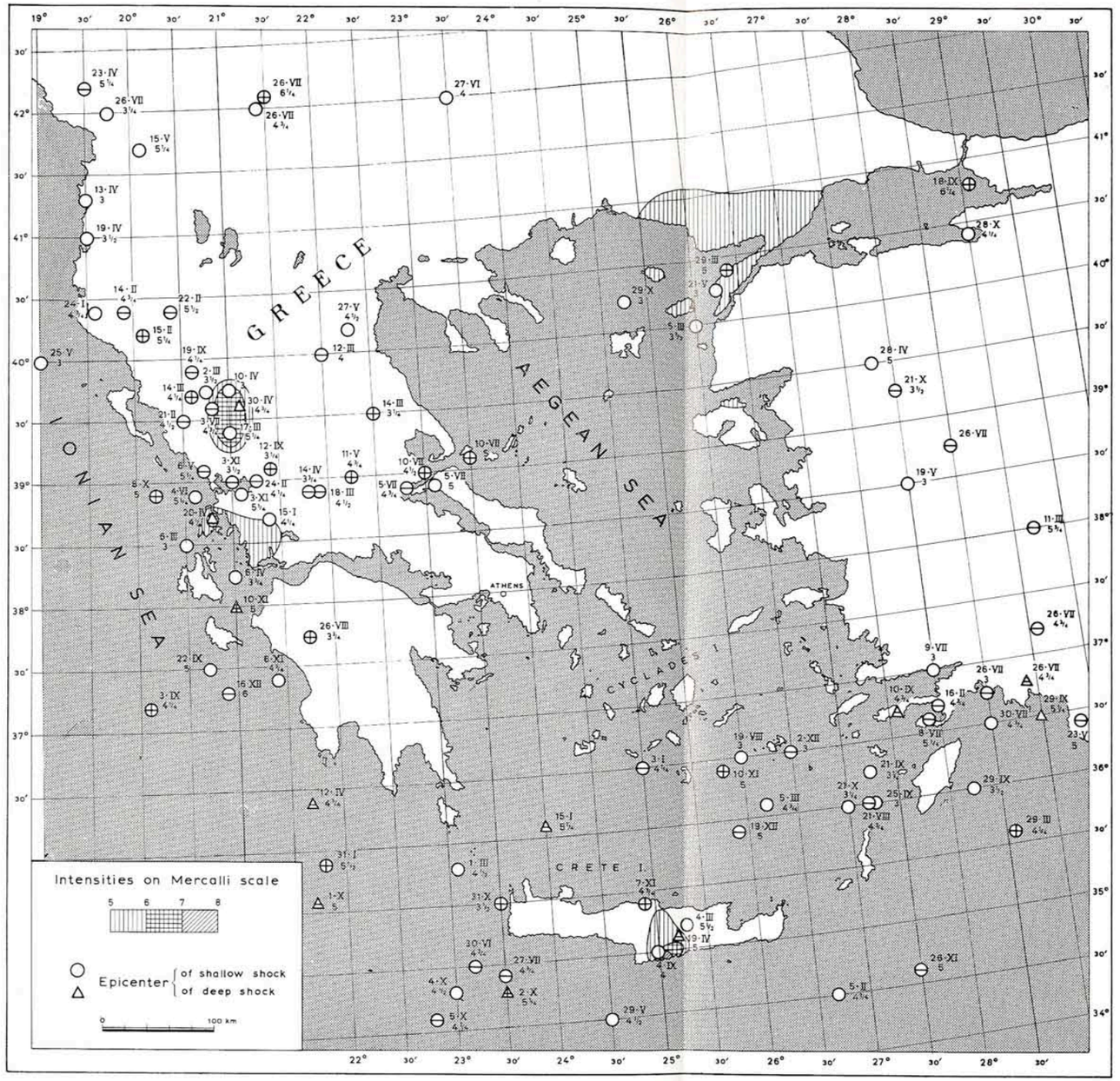

Fig. 2.—The earthquake activity in the area of Greece in 1963.

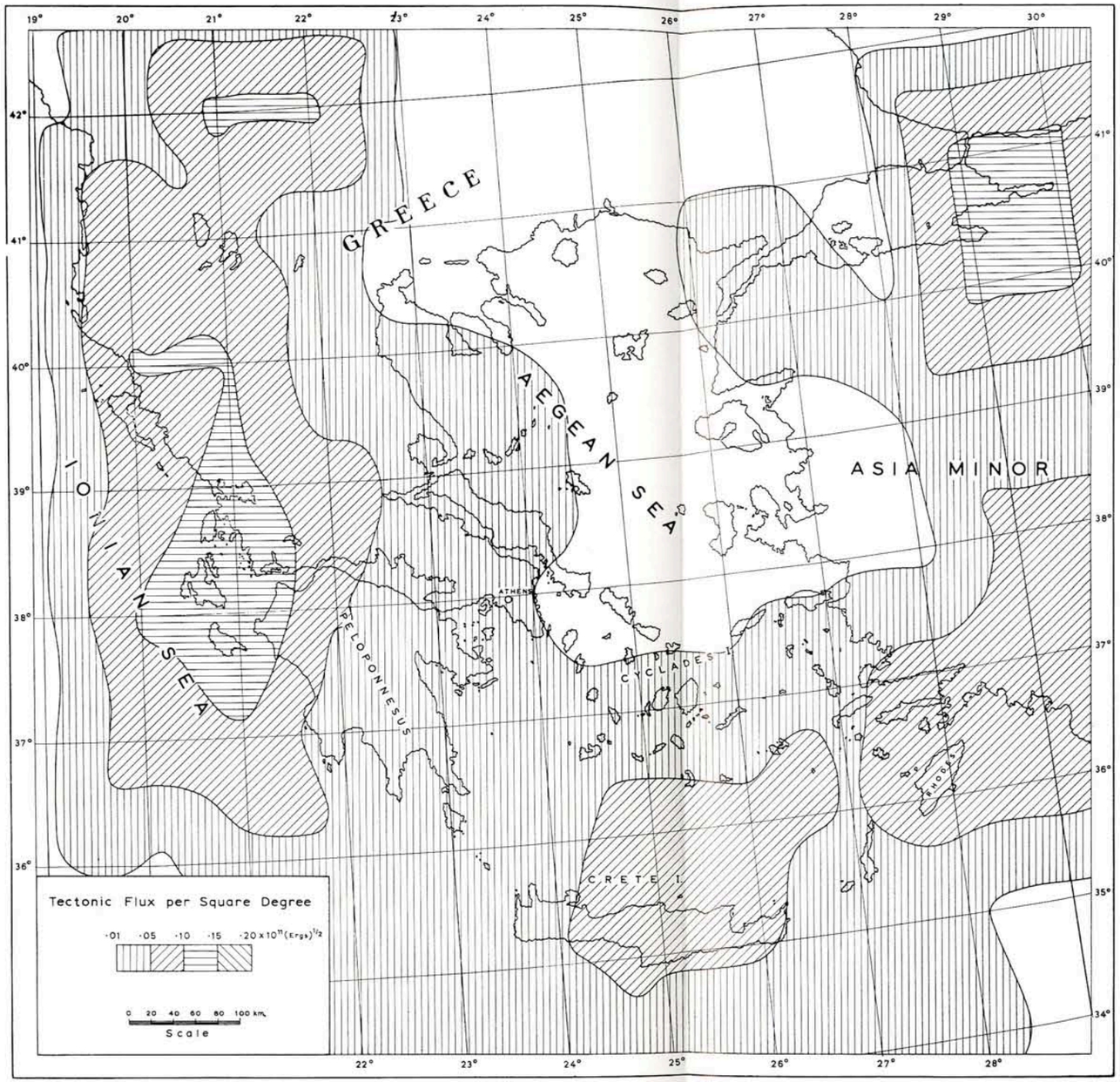

Fig. 3.—Strain release pattern in the area of Greece in 1963.