

# 地 震 季 報

第十二卷 第一號

中華民國五十四年一、二、三月

## SEISMOLOGICAL BULLETIN

January to March 1965

VoL. 12 No. 1

臺 灣 省 氣 象 所

PUBLISHED QUARTERLY BY

TAIWAN WEATHER BUREAU

64 KUNG YUAN ROAD, TAIPEI, TAIWAN, CHINA

## General Aspect of Earthquakes

January to March, 1965

The number of earthquakes which occurred during the Period from January to March, 1965 is 244. Among them, there are only 25 felt earthquakes including 2 remarkable, 1 moderate, 6 small felt area, and 16 local ones.

The two remarkable earthquakes both happened in March and in Henchun district. The former occurred on 1st, March at a spot about 95 km. SE. of Henchun.

The latter happened on 6th, of the same month. Its epicenter was located at about 200 km. SSE. of Henchun.

The moderate one happened on March 15th at the spot about 36 km. E. of Tawu. Six small felt ones were distributed along the east coast and its neighborhood.

During this period, 60 distant earthquakes had been recorded by our seismographs. These data could be found in the latter part of this bulletin.

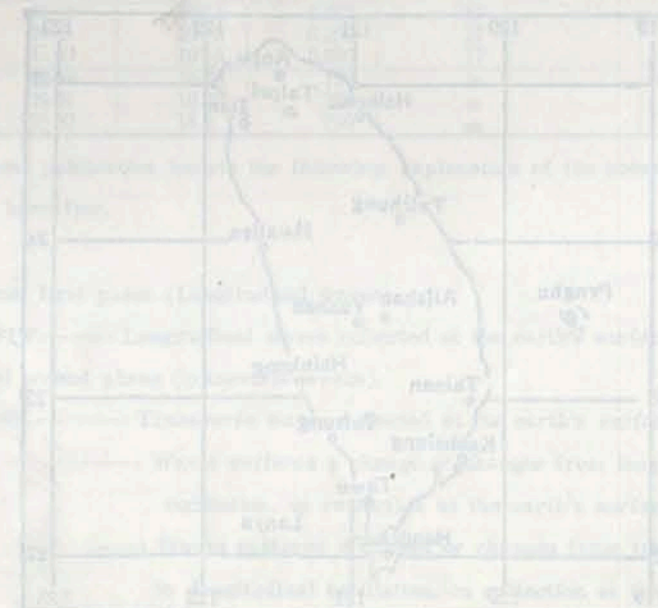




Table I. Geographical coordinates of the Seismological Station, Taiwan, China.

$\lambda$ : Longitude  $\phi$ : Geographical Latitude  
 $\phi'$ : Geocentric Latitude  
 $a = c\phi' \cos \lambda$   $b = \cos \phi' \sin \lambda$   $c = \sin \phi'$

Station	$\phi$ ; (N)	$\lambda$ ; (E)	$\phi'$	Altitude	Subsoil	a	b	c	Seismographs
Anpu	25.11	121.31	25.20	836.2	Andesite	-0.4736	+0.7725	+0.4231	SP (H. V.) LP (H. L.)
Alishan (mt.)	23.31	120.48	23.22	2403.1	Miocene Sands-tone	-0.4700	+0.7855	+0.3966	W. (H. V.) O. S <sub>1</sub>
Hengchun	22.00	120.45	21.52	22.3	Alluvium	-0.4754	+0.7976	+0.3724	W. (H. V.) S <sub>2</sub>
Hsinkong	23.06	121.22	22.58	36.5	"	-0.4793	+0.7862	+0.3901	P <sub>1</sub> S <sub>2</sub> W. (H.V.) A <sub>1</sub>
Hsinchu	24.48	120.58	24.39	32.8	"	-0.4677	+0.7793	+0.4171	P <sub>1</sub> S <sub>2</sub>
Hwalien	23.58	121.37	23.49	17.6	"	-0.4796	+0.7791	+0.4038	W. (H.V.) P <sub>1</sub> S <sub>2</sub> A <sub>2</sub>
Ilan	24.46	121.45	24.73	7.4	"	-0.4784	+0.7731	+0.4165	W. (H.V.) P <sub>1</sub> S <sub>1</sub>
Kaohsiung	22.37	120.16	22.29	33.1	"	-0.4657	+0.7981	+0.3824	P <sub>1</sub> S <sub>1</sub>
Lanyu	22.02	121.33	21.54	332.2	Basalt	-0.4881	+0.7950	+0.3730	P <sub>2</sub>
Penghu	23.32	119.33	23.23	9.4	"	-0.4527	+0.7985	+0.3969	P <sub>1</sub>
Taipei	25.02	121.31	24.53	8.0	Alluvium	-0.4742	+0.7733	+0.4208	W. (H. V.) O. S <sub>1</sub> P <sub>3</sub> A <sub>1</sub>
Tawu	22.21	120.54	22.13	7.6	"	-0.4754	+0.7944	+0.3781	W. (H. V.) S <sub>1</sub>
Taitung	22.45	121.09	22.37	8.9	"	-0.4775	+0.7900	+0.3846	W. (H. V.) S <sub>2</sub>
Tainan	23.00	120.13	22.52	12.7	"	-0.4637	+0.7962	+0.3886	W. (H.V.) P <sub>1</sub> S <sub>1</sub> A <sub>1</sub>
Taichung	24.09	120.41	24.00	77.1	"	-0.4662	+0.7856	+0.4067	W. (H. V.) S <sub>2</sub> P <sub>1</sub>
Yushan (Mt. Marrison)	23.29	120.57	23.21	3850.0	"	-0.4722	+0.7873	+0.3964	P <sub>1</sub>

W(H): Wiechert's horizontal seismograph.  
 W(V): Wiechert's vertical seismograph.  
 O: Omori's horizontal seismograph. (V:20)  
 P<sup>1</sup>: C.M.O. type horizontal portable seismograph. (V:40)  
 P<sup>2</sup>: Three component portable seismograph. (V:20)  
 P<sub>3</sub>: Higuti-C.M.O. type short period, horizontal seismograph. (V:50)  
 S<sub>1</sub>: C.M.O. type three component strong motion seismograph. (V:2)  
 S<sub>2</sub>: Higuti-C.M.O. type three component strong motion seismograph. (V:1)  
 A<sub>1</sub>: Isnimoto's three component acceleration seismograph.  
 A<sub>2</sub>: Higuti's three component strong motion accelerometer.  
 S.P.: Benioff short-period seismograph.  
 L.P.: Sprengnether long-period seismograph.

Map showing the Position of Seismological Station in Taiwan, China.

Figure 1

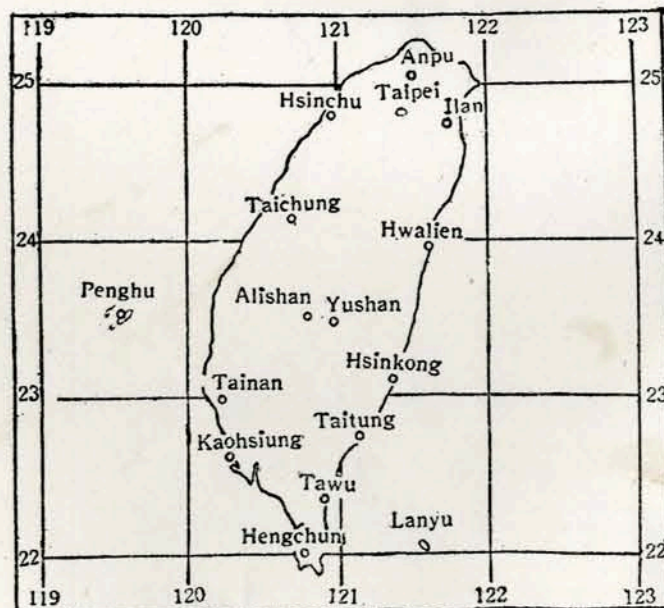


Table II. Specification of instruments:-

Mass of the pendulum M (kg) Friction r (mm.<sup>2</sup>)  
 Magnification V. Proper period of the pendulum T<sub>0</sub> (sec.)  
 Damping ratio  $\nu$ . Proper period of the galvanometer T<sub>g</sub> (sec.)

The Constants of Seismographs are as follows.

Seismograph	Component	M.	V.	$\nu$ .	r.	To	Tg
W(H)	E-W	200	77	9	0.10	5.1	
	N-S	200	78	9	0.13	5.1	
	U-D	80	75	8	0.08	5.1	
P <sub>1</sub>	E-W	18	40	8	0.13	5.1	
	N-S	18	40	8	0.13	5.1	
P <sub>2</sub>	E-W	10	20	2	0.24	4.0	
	N-S	10	20	2	0.41	4.0	
	U-D	7.5	20	2	0.29	4.0	
P <sub>3</sub>	E-W	20	49	10	0.08	2.2	
	N-S	20	49	10	0.08	2.3	
O	E-W	15	20	3	0.05	15.7	
	N-S	15	20	3	0.08	15.1	
S <sub>1</sub>	E-W	2	2	4	0.06	3.8	
	N-S	2	2	4	0.06	3.8	
	U-D	1.5	2	8	0.06	3.5	
S <sub>2</sub>	E-W	4	1	8	0.04	6.0	
	N-S	4	1	8	0.04	6.0	
	U-D	2	1	8	0.03	5.0	
A <sub>1</sub>	E-W	15	220	10	0.005	0.10	
	N-S	15	220	10	0.009	0.10	
	U-D	15	170	10	0.006	0.08	
A <sub>2</sub>	E-W	1	16	10	0.01	0.11	
	N-S	1	16	10	0.02	0.10	
	U-D	1	16	10	0.01	0.11	
SP	E-W	107.5	6.250	17		1.0	0.75
	N-S	107.5	6.250	17		1.0	0.75
	U-D	107.5	6.250	17		1.0	0.75
LP	E-W	10.75	750	$\infty$		30.0	100.0
	N-S	10.75	750	$\infty$		30.0	100.0
	U-D	11.2	750	$\infty$		30.0	100.0

The present publication inserts the following explanation of the notations only in the first number hereafter.

1. Phase.

- P: Normal first phase (Longitudinal waves)
- pP, PP, PPP,.....: Longitudinal waves reflected at the earth's surface.
- S: Normal second phase (transverse waves).
- sS, SS, SSS,.....: Transverse waves reflected at the earth's surface.
- PS, PPS,.....: Waves suffered a change or changes from longitudinal to transverse oscillation, on reflection at the earth's surface.
- SP, SPP,.....: Waves suffered a change or changes from transverse to longitudinal oscillation, on reflection at the earth's surface.



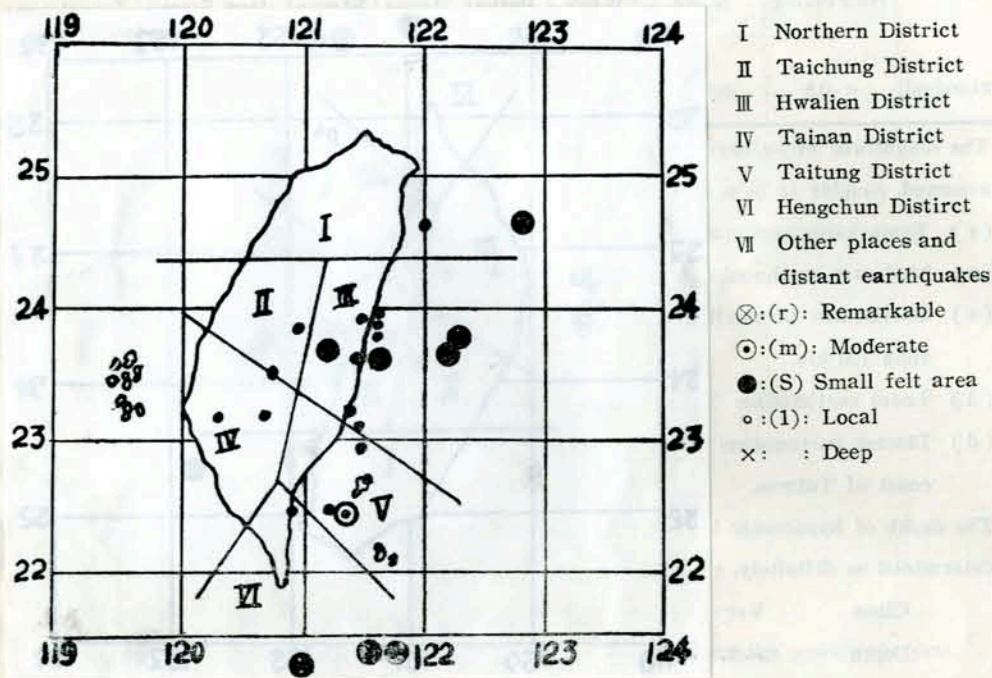
- L : Long waves at the beginning of the surface waves.
  - Q : Shorter and more regular waves in the surface waves.
  - M : Largest motion in the surface waves.
  - C : Tail or end portion.
  - F : End of the discernible movement
  - $\Delta$  : Epicentral distance.
  - $\Delta H$ : Focal distance.
  - H : Depth of focus.
  - $\mu$  : Micron.
  - P-S: Duration of Preliminary tremor.
2. Nature of the motion.
- i : Sudden commencement of a phase.
  - e : Gradual or indistinct commencement of a phase.
  - ? : Questionable or uncertain.
3. Period and Initial motion.
- T : Period, duration of one complete oscillation.
  - I : Amplitude of the true displacement of the ground from the position at rest.
  - In : N-S component of I.
  - I<sub>E</sub> : E-W component of I.
  - I<sub>Z</sub> : Vertical component of I.
- Displacement to the north, east and upward are regarded as positive.
4. Scales of seismic intensity.
- The intensity of the shock is estimated according to the scales O-VI, as follows:
- O : No feeling: Shocks too weak to cause human feelings, registered only by seismographs,
  - I : Slight: Extremely feeble shocks only felt by persons at rest or by those who are observant to an earthquake.
  - II : Weak: Shocks felt by most persons, slight shaking of doors and latticed sliding doors.
  - III : Rather strong: Slight shaking of houses and buildings, rattling of doors and latticed sliding doors, swinging of hanging objects like the electric lamps, moving of liquids in vessels.
  - IV : Strong: Strong shaking of houses and buildings, overturning of unstable objects spilling of liquids out of vessels.
  - V : Very Strong: Cracks in the walls, overturning of gravestones, etc, lanterns etc, damaging of chimneys and mud-and-plaster warehouses.
  - VI : Disastrous: Demolition of houses landslips, fissures on the roads, the ground etc.

	No Feeling	Slight	Weak	Rather Strong	Strong	Very Strong	Disastrous
Scale Acceleration(gal)	O <-0.8	I 0.8-2.5	II 2.5-8	III 8-25	IV 25-80	V 80-250	VI 250<

5. The magnitude of an earthquake is classified according to the radius of the felt area assumed, roughly to be a circle as follows:-
- (r) Remarkable earthquake: The radius of the felt area is greater than 300 km.
  - (m) Moderate earthquake: The radius is smaller than 300 km, but greater than 200 km.
  - (s) Earthquake of small felt area: The radius is smaller than 200 km, but greater than 100 km.
  - (1) Local earthquake: The radius is smaller than 100 km.
  - (d) Distant earthquake: The epicentral distance is greater than 300 km, from the coast of Taiwan.
6. The depth of hypocenter is as a rule expressed in terms of kilometers. If it is not determined so definitely, the following scale will be adopted.
- |       |              |           |             |         |
|-------|--------------|-----------|-------------|---------|
| Class | Very shallow | Shallow   | Rather deep | Deep    |
| Depth | 0~30km.      | 30~100km. | 100~200km.  | >200km. |
7. Geographical coordinates:
- $\lambda$ : Longitude (E)                       $\phi$ : Latitude (N)
- The coordinates are been expressed in degrees with one place of decimal.
8. Time
- Time is referred to Greenwich Mean Time (G.M.T.)



Epicenters of Felt Earthquakes in January to March, 1965



Number of earthquakes classified according to its magnitude and districts January to March, 1965

Classification	Number of felt earthquakes					Number of unfelt earthquakes	Total
	Remarkable	Moderate	Small felt area	Local	Total		
Northern District	—	—	1	1	2	33	35
Taichung "	—	—	—	2	2	21	23
Hwalien "	—	—	4	7	11	101	112
Tainan "	—	—	—	2	2	3	5
Taitung "	—	1	1	3	5	47	52
Hengchun "	2	—	—	1	3	14	17
Total	2	1	6	16	25	219	244
Other places	—	—	—	—	0	60	60

The Felt Earthquakes from January to March, 1965.

No.	Month	P. (G. M. T.)			Mag-nitude	Epicenter	Latitude		Longtitude	Depth
		d.	h.	m.			N.	E.		
1	Jan.	1	12	46	S	About 46 Km. SW. of Hwalien	23.5	121.3	10	
2	"	2	10	11	S		24.6	122.9	80	
3	"	8	09	53	L	About 27 Km. NE. of Tainan			45	
4	"	13	06	31	L	About 15 Km. NNE. of Hsinking			20	
5	"	13	16	35	L	About 40 Km. NNE of Yushan			15	
6	"	15	18	34	S	About 49 Km. SSE. of Hwalien	23.5	121.8	20	
7	"	15	19	47	L	About 47 Km. S. of Hwalien			45	
8	"	17	20	01	S	About 65 Km. ESE. of Hwalien	23.6	122.1	10	
9	"	28	01	00	L	About 27 Km. ESE. of Ilan About 32km. S. of			20	
10	"	29	22	36	L	Alishan			5	
11	Feb.	1	00	39	L	Near Alishan				
12	"	9	21	47	L	About 12Km. WSW. of Hwalien			40	
13	"	11	08	53	S	About 82 Km. ESE. of Hwalien	23.7	122.4	30	
14	"	21	21	52	L	About 25 Km. ESE. of Hsinking			5	
15	Mar.	1	08	19	S	About 105 Km. SE. of Hengchun	21.5	121.6	10	
16	"	1	13	20	R	About 95 Km. SE. of Hengchun	21.6	121.5	50	
17	"	4	15	13	L	Near Hwalien				
18	"	6	20	24	R	About 200Km. SSE. of Hengchun	20.3	121.7	10	
19	"	8	17	06	L	Near Tawu				
20	"	10	16	48	L	Near Hwalien				
21	"	15	02	02	M	About 36 Km. E. of Tawu	22.3	121.2	10	
22	"	20	19	12	L	About 13 Km. E. of Hsinking				
23	"	22	07	57	L	About 25 Km. E. of Tawu			20	
24	"	23	15	01	L	Near green Is.			10	
25	"	24	12	51	L	Near Hwalien				

Unfelt Earthquakes From January to March, 1965.

No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
1	Jan.	1	12	53	About 46 Km. Sw. of Hwalien	6	Jan.	1	13	35	Taitung district
2	"	1	12	55	"	7	"	1	14	07	Hwalien district
3	"	1	14	55	"	8	"	1	14	55	About 70 Km. ENE. of Hsinking
4	"	1	13	02	Near Hwalien	9	"	1	15	41	About 45 Km. SW. of Hwalien
	"	1	13	11	"	10	"	1	15	44	About 45 Km. SW. of Hwalien



No.	Month	P. (G. M. T.)	Epicenter	No.	Month	P. (G. M. T.)	Epicenter
11	Jan.	1 16 44	About 30 Km. S. of Hwalien	46	Jan.	11 09 51	Near Tawu
12	"	1 17 48	About 45 Km. ENE. of Alishan	47	"	12 06 15	Hwalien district
13	"	1 18 17	Hwalien district	48	"	12 06 18	Taichung district
14	"	2 06 23	Northern district	49	"	12 09 16	Northern district
15	"	2 09 21	Hwalien district	50	"	12 10 25	Taichung district
16	"	2 09 25	Near Alishan	51	"	12 10 29	About 47 Km. SSE. of Hwalien
17	"	2 13 49	d	52	"	12 11 29	Northern district
18	"	3 02 14	Near Ilan	53	"	12 15 54	Hwalien district
19	"	3 14 00	Near 70 Km. ENE. of Hsinkong	54	"	12 16 25	Northern district
20	"	4 00 03	Taitung district	55	"	13 06 44	Northern district
21	"	4 07 25	Taitung district	56	"	13 07 12	Hwalien district
22	"	4 15 06	Near 60 Km. ENE. of Hsinkong.	57	"	13 09 56	About 38 Km. NNE. of Hsinkong
23	"	4 18 04	Near Ilan	58	"	14 08 42	d
24	"	5 10 07	Near 35 Km. SSE. of Ilan	59	"	15 05 52	Northern district
25	"	5 22 08	Hwalien district	60	"	15 15 32	d
26	"	6 00 45	Near 65 Km. ENE. of Hsinkong	61	"	15 19 17	Northern district
27	"	6 07 32	Hwalien district	62	"	15 23 33	d
28	"	6 10 40	Near Hsinkong	63	"	16 03 00	About 68 Km. S. of Hwalien
29	"	6 18 18	Northern district	64	"	16 05 01	Near Yushan
30	"	7 00 15	d	65	"	17 01 55	Near Tainan
31	"	7 09 53	Taitung district	66	"	17 04 24	Taitung district
32	"	7 15 41	Near Ilan	67	"	17 05 23	Near Tainan
33	"	7 18 50	Hengchun district	68	"	17 13 33	Northern district
34	"	8 07 38	Near 30 Km. SSE. of Ilan	69	"	17 13 48	Near Anpu
35	"	8 13 46	Hwalien district	70	"	17 15 40	Near Yushan
36	"	9 06 14	Hwalien district	71	"	17 15 43	Hwalien district
37	"	9 13 34	d	72	"	18 00 50	Hwalien district
38	"	10 12 49	Hwalien district	73	"	18 17 21	Hwalien district
39	"	10 13 37	Northern district	74	"	19 04 59	Hwalien district
40	"	10 13 46	d	75	"	19 08 17	Hwalien district
41	"	10 15 01	Taitung district	76	"	19 13 55	Near Hsinkong
42	"	10 20 27	Near Ilan	77	"	20 12 48	Hwalien district
43	"	11 03 51	Hwalien district	78	"	21 19 43	Near Ilan
44	"	11 03 58	Hwalien district	79	"	21 22 01	About 40 Km. SE. of Hwalien
45	"	11 04 01	Hwalien district	80	"	22 13 52	Near Ilan

No.	Month	P. (G. M. T.)	Epicenter	No.	Month	P. (G. M. T.)	Epicenter
81	Jan.	23 02 30	Hwalien district	116	Feb.	4 05 13	Taitung district
82	"	23 02 33	Hwalien district	117	"	4 08 49	d
83	"	23 02 35	Near alishan	118	"	4 12 14	d
84	"	23 02 48	Near alishan	119	"	4 14 27	d
85	"	23 08 41	about 18 Km. ESE. of Yushan	120	"	5 11 50	Heng chun district
86	"	23 10 29	Hwalien district	121	"	5 09 41	Taitung district
87	"	23 23 27	Near alishan	122	"	5 19 53	Taitung district
88	"	23 23 29	Taichung district	123	"	6 01 50	d
89	"	24 00 16	d	124	"	6 17 00	d
90	"	24 00 27	Taitung district	125	"	6 17 27	Near Alishan
91	"	24 12 41	Hwalien district	126	"	7 02 25	d
92	"	24 16 00	Taitung district	127	"	7 04 20	d
93	"	24 18 48	Hwalien district	128	"	7 09 34	d
94	"	25 08 19	Near 20 Km. NE. of Yushan	129	"	7 11 42	d
95	"	26 13 02	Near 40 Km. ESE. of Hsinkong	130	"	7 14 23	Taitung district
96	"	26 23 56	d	131	"	7 23 18	Taitung district
97	"	28 01 58	Near 50 Km. SSW. of Hwalien	132	"	8 01 22	Taitung district
98	"	28 06 00	Near 50 Km. SSW. of Hwalien	133	"	8 01 43	Taitung district
99	"	28 15 28	Northern district	134	"	8 04 41	Hengchun district
100	"	28 18 08	Near 30 Km. SSE. of Ilan	135	"	8 15 54	d
101	"	28 21 11	about 80 Km. E. of Taipei	136	"	9 00 55	Hwalien district
102	"	28 22 25	Hwalien district	137	"	9 05 29	Northern district
103	"	28 22 36	Near 30 Km. NE. of Yushan	138	"	9 17 45	Northern district
104	"	29 22 31	Taitung district	139	"	9 23 24	d
105	"	30 19 50	Near 50 Km. WSW of Hwalien	140	"	10 11 29	Near Tawu
106	"	30 20 26	Hwalien district	141	"	11 23 21	d
107	"	31 02 35	Hwalien district	142	"	12 00 59	d
108	"	31 17 02	Northern district	143	"	12 07 16	Near 15 Km. WNW. of Hsinkong
109	Feb.	1 07 30	Tainan district	144	"	12 07 47	Hwalien district
110	"	2 02 52	Taitung district	145	"	12 17 19	Taitung district
111	"	2 16 14	d	146	"	12 18 50	Near Hsinkong
112	"	2 19 22	About 33 Km. NNE. of Yushan	147	"	13 19 10	Taitung district
113	"	2 20 37	About 35 Km. ENE. of Yushan	148	"	13 22 51	Near 48 Km. SE. of Ilan
114	"	3 01 30	About 28 Km. ENE. of Yushan	149	"	13 22 52	d
115	"	4 05 10	d	150	"	14 02 48	Near Tawu



No.	Month	P. (G. M. T.)	Epicenter	No.	Month	P. (G. M. T.)	Epicenter
151	Feb.	14 18 01	Hwalien bistrict]	186	Feb.	27 21 04	Hengchun districe
152	"	14 19 05	Near 40Km. SSW. of Ilan	187	"	27 21 34	Hengchun district
153	"	15 10 47	d	188	"	28 04 40	Near 125 Km. ESE. of Hengchun
154	"	15 12 57	d	189	"	28 22 15	About 107 Km. ENE. of Ilan
155	"	16 11 18	Near Taitung	190	Mar.	1 07 29	(d)
156	"	16 12 29	d	191	"	1 09 03	About 25 Km. NNE. of Hsinkong
157	"	17 10 28	d	192	"	1 13 09	Hengchun district
158	"	18 04 32	d	193	"	1 15 36	Hengchun district
159	"	18 22 46	d	194	"	2 09 31	d
160	"	19 04 12	Near 90 Km. ESE. of Hwalien	195	"	2 17 26	About 62 Km. ENE. of Ilan
161	"	21 15 10	Hwalien districe	196	"	2 21 40	d
162	"	21 22 34	Near 103 Km ENE. of Hsinkong	197	"	2 21 50	Near Yushan
163	"	22 16 08	Taitung district	198	"	3 15 21	d
164	"	22 17 06	Taitung district	199	"	3 23 44	About 64 Km. SSE. of Ilan
165	"	22 18 56	Taitung district	200	"	4 02 01	Hwalien district
166	"	23 22 31	d	201	"	4 04 42	Hwalien district
167	"	23 23 24	d	202	"	4 23 30	Hwalien district
168	"	24 01 10	Near alishan	203	"	8 05 15	Taitung district
169	"	24 04 42	d	204	"	8 12 26	About 247 Km. ESE. of Hengchun
170	"	24 07 12	Near Hsinkong	205	"	8 03 56	Near Hwalien
171	"	25 01 00	Hwalien district	206	"	8 12 26	Hwalien district
172	"	25 01 20	Taitung district	207	"	9 18 10	b
173	"	25 04 59	d	208	"	11 13 15	About 82 Km. ESE. of Hwalien
174	"	25 16 05	Near 265 km. SE. of Hengchun	209	"	11 13 53	Hwalien district
175	"	25 16 34	Near 45Km. SSE. of Ilan	210	"	11 22 04	Hwalien district
176	"	25 02 53	Near 23 Km. S. of Hsinkong	211	"	12 10 42	About 92 Km. ESE. of Ilan
177	"	26 00 20	Taichung district	212	"	12 14 55	Northern district
178	"	26 05 59	d	213	"	12 17 54	Hwalien district
179	"	26 09 02	d	214	"	12 19 00	Hwalien district
180	"	27 02 03	d	215	"	13 03 27	Near Hsinkong
181	"	27 08 31	d	216	"	13 04 02	Near Alishan
182	"	27 13 42	Northern district	217	"	13 17 11	Near Hwalin
183	"	27 17 13	Near Yushan	218	"	14 16 01	d
184	"	27 18 08	Near Alishan	219	"	14 17 55	Taichung district
185	"	27 18 35	Hengchun district	220	"	15 02 00	Hwalien district

No.	Month	P. (G. M. T.)	Epicenter	No.	Month	P. (G. M. T.)	Epicenter
221	Mar.	15 05 44	Near Tawu	256	Mar.	25 20 36	Near Hwalien
222	"	15 06 15	Taitung district	257	"	25 21 25	Near Hwalien
223	"	15 08 02	Taitung district	258	"	26 04 10	Hwalien district
224	"	16 16 51	d	259	"	26 04 16	Hwalien district
225	"	16 16 56	Hwalien district	260	"	26 06 09	Hwalien district
226	"	17 09 35	Hwalien district	261	"	26 06 22	Hwalien district
227	"	17 10 09	Northern district	262	"	27 09 14	Near Hwalien
228	"	17 10 33	Hwalien district	263	"	28 00 02	Taitung district
229	"	17 21 36	Near Hwalien	264	"	28 08 46	d
230	"	18 05 33	d	265	"	28 13 30	d
231	"	18 10 08	Northern district	266	"	28 16 53	d
232	"	19 11 27	Near Ilan	267	"	28 17 55	Taitung district
233	"	19 16 26	d	268	"	29 02 36	d
234	"	19 20 19	Taitung district	269	"	29 10 52	d
235	"	20 06 52	Hwalien district	270	"	29 15 57	About 80 Km. E. of Ilan
236	"	21 00 54	Taitung district	271	"	29 16 18	Hwalien district
237	"	21 11 13	d	272	"	29 17 34	Hengchun district
238	"	21 11 18	Taichung district	273	"	30 02 35	d
239	"	21 12 31	Taitung district	274	"	30 07 59	Near Hwalien
240	"	21 13 55	Near Alishan	275	"	30 08 07	Near Hwalien
241	"	21 23 37	Hwalien district	276	"	30 17 52	Taitung district
242	"	22 02 56	d	277	"	30 19 34	Taitung district
243	"	22 13 29	Near Hwalien	278	"	30 21 47	Near Ilan
244	"	22 17 16	d	279	"	31 09 59	d
245	"	23 08 59	Near Hwalien	280	"	31 09 46	Near Alishan
246	"	23 15 06	About 37 Km ESE of Taitung				
247	"	23 15 09	About 40 Km. ESE. of Taitung				
248	"	24 00 15	d				
249	"	24 07 58	Near Hwalien				
250	"	24 08 09	d				
251	"	24 15 28	Hwalien district				
252	"	24 21 50	Hengchun district				
253	"	24 22 46	d				
254	"	25 02 01	Near Hwalien				
255	"	25 19 53	Taitung district				



Major Earthquakes Occurred in January, 1965.

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks			
					N	E	Z	N	E	Z	N	E	Z						
1	Yushan	1	ip	h. m. s. 12 46 44.3	-	95	-	143	-	-	-	-	-	3.3	I	About 46Km.			
	Hsinkong		ip	46 50.2	-	1.3	+	0.6	+	0.7	1000	1364	637	1.8	2.0	1.8	7.0	I	SW. of
	Hwalien		ip	46 52.0	+	86.2	+	52.5	+	75.0	800	1020	430	2.8	2.4	3.0	9.8	II	Hwalien
	Alishan		ip	46 53.0	-	3	-	61	-	-	780	635	-	2.4	1.8	-	6.7	II	121.3E
	Taichung		ip	46 58.2	-	-	-	-	-	-	383	383	191	4.1	4.5	2.8	11.7	O	23.5N
	Taitung		ip	46 58.5	+	3	-	4	-	-	517	429	-	0.9	1.6	-	27.8	I	(H=10)
	Tawu		P	47 05.2	-	-	-	-	-	-	75	122	-	2.9	4.2	-	23.1	O	
	Ilan		ip	47 05.5	+	16	-	7	+	26	631	465	224	2.0	1.9	1.5	16.5	II	
	Taipei		ip	47 09.2	+	16.2	±	0	+	20.0	450	306	62	1.5	1.8	2.0	19.2	I	
	Hengchun		ip	47 13.0	+	238	+	4.8	-	34.2	143	179	150	-	2.0	2.1	43.4	I	
Hsinchu		ep	47 51.6	-	-	-	-	-	-	-	-	-	-	-	-	21.6	O		
2	Taitung	2	ep	10 11 13.0	-	-	-	-	-	-	-	-	-	-	26.2	O	122.9E		
	Hwalien		ip	11 56.8	-	2.11	+	1.9	+	29.0	-	56	-	-	1.3	-	16.9	I	24.6N
	Ilan		ip	11 53.4	+	13.5	+	13.5	+	39.0	152	106	88	1.1	1.1	1.4	13.3	I	
	Taipei		ep	11 58.7	-	-	-	-	-	-	-	-	-	-	-	-	11.8	O	
	Hsinkong		ep	12 04.1	-	-	-	-	-	-	-	-	-	-	-	-	22.8	O	
	Tawu		ep	12 20.7	-	-	-	-	-	-	-	-	-	-	-	-	-	O	
	Alishan		ep	12 22.2	-	-	-	-	-	-	-	-	-	-	-	-	31.1	O	
	Yushan		P	12 03.8	-	-	-	-	-	-	-	-	-	-	-	-	26.0	O	
	3	Taitung	2	ep	13 49 13.7	-	-	-	-	-	-	-	-	-	-	3	23.3	O	U.S.C.G.S
Hwalien			P	49 17.2	-	-	-	-	-	-	-	-	-	-	4	04.7	O	19.1N145.4E	
Tawu			ep	49 21.8	-	-	-	-	-	-	-	-	-	-	-	-	O	Mariana	
Hengchun			ep	49 31.3	-	-	-	-	-	-	-	-	-	-	-	-	O	Islands	
4	Tawu	10	ep	13 46 14.0	-	-	-	-	-	-	-	-	-	-	-	-	O	U. S. C. G. S.	
	Hengchun		ep	46 19.9	-	-	-	-	-	-	-	-	-	-	-	-	O	13.5S166.6E	
	Taitung		ep	46 21.1	-	-	-	-	-	-	-	-	-	-	3	56.8	O	New Hebrides	
	Hwalien		P	46 22.6	-	-	-	-	-	-	-	-	-	-	7	54.2	O	Islands	
	Taipei		ep	46 24.0	-	-	-	-	-	-	-	-	-	-	-	-	O		
5	Taitung	15	ep	18 34 10.4	-	-	-	-	-	536	653	436	2.4	2.8	1.6	12.4	I		
	Yushan		ip	34 18.7	-	-	-	-	-	1870	1180	-	2.6	2.0	-	9.2	II	About 49Km.	
	Hsinkong		ip	34 20.1	+	16	+	22	-	43	1600	900	900	1.4	1.7	1.4	7.1	VI	SSE. of

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks			
					N	E	Z	N	E	Z	N	E	Z						
	Hwalien		p	34 20.9	+	2.8	-	8.8	+	25	1800	2200	1200	2.0	1.8	1.8	9.0	III	Hwalien
	Alishan		ip	34 21.6	-	-	-	-	-	790	770	-	1.9	1.7	-	9.1	II	121.8E	
	Taichung		ip	34 30.7	-	-	-	-	-	-	-	-	-	-	-	14.7	II	23.5N	
	Tawu		p	34 33.3	-	-	-	-	-	155	242	88	1.3	1.1	1.6	22.3	I	(H=20)	
	Hsinchu		ep	34 34.4	-	-	-	-	-	-	-	-	-	-	-	19.2	O		
	Ilan		p	34 36.0	-	-	-	-	-	304	250	176	1.7	1.9	2.0	14.3	I		
	Tainan		ip	34 36.8	-	-	-	-	-	-	-	-	-	-	-	19.6	O		
	Anpu		ip	34 37.5	-	-	-	-	-	-	-	-	-	-	-	11.5	I		
	Taipei		ep	34 39.3	-	-	-	-	-	244	213	-	1.3	0.8	-	17.5	I		
	Hengchun		ip	34 42.3	+	3.8	+	6.0	-	0.6	300	292	109	-	-	-	23.7	O	
6	Alishan	17	P	20 01 08.0	-	-	-	-	-	-	-	-	-	-	-	-	6.2	I	
	Yushan		ip	01 27.2	-	25	-	10	-	-	350	1550	-	1.0	2.4	-	5.3	I	About 65Km.
	Hwalien		P	01 32.1	-	-	-	-	-	210	290	-	2.2	2.8	-	10.2	II	ESE. of	
	Hsinkong		ep	01 33.0	-	-	-	-	-	-	-	-	-	-	-	8.1	O	Hwalien	
	Taichung		p	01 38.4	-	-	-	-	-	-	-	-	-	-	-	11.1	O	122.1E	
	Taitung		ep	01 38.8	-	-	-	-	-	-	-	-	-	-	-	17.8	O	23.6N	
	Hsinchu		ep	01 43.2	-	-	-	-	-	-	-	-	-	-	-	21.6	O	(H=10)	
	Tainan		ep	01 45.2	-	-	-	-	-	-	-	-	-	-	-	16.5	O		
	Tawu		P	01 45.9	-	-	-	-	-	-	-	-	-	-	-	23.2	O		
	Taipei		ip	01 50.5	-	9.4	±	0	+	2.5	-	-	-	-	-	-	20.4	O	
	Kaohsiung		ep	01 51.0	-	-	-	-	-	-	-	-	-	-	-	-	21.2	O	
	Anpu		ip	01 51.6	-	-	-	-	-	-	-	-	-	-	-	-	22.4	O	
Hengchun		ep	01 56.8	+	4.0	+	4.0	-	-	-	-	-	-	-	-	23.7	O		
Ilan		P	02 14.0	-	-	-	-	-	-	170	106	50	2.9	2.6	2.3	15.8	I		
7	Alishan	24	ip	00 16 22.3	-	-	-	-	-	-	-	-	-	-	-	5	04.0	O	U.S.C.G.S
	Tawu		P	16 39.0	-	-	-	-	-	141	4200	1100	5.6	25.7	15.3	4	33.2	O	2.4S 126.0E
	Hengchun		P	16 43.0	-	21.4	-	8.3	+	10.1	280	282	275	-	-	4	20.1	O	Ceram
	Hsinkong		ep	16 47.8	-	-	-	-	-	-	-	-	-	-	-	-	O	Sea	
	Taitung		ep	16 48.3	-	-	-	-	-	-	-	-	-	-	-	4	37.6	O	
	Yushan		P	16 52.5	-	-	-	-	-	-	-	-	-	-	-	4	41.4	O	
	Tainan		P	16 53.9	-	-	-	-	-	-	-	-	-	-	-	2	22.4	O	
	Penghu		P	16 55.6	-	-	-	-	-	-	-	-	-	-	-	4	43.0	O	
Hwalien		P	16 55.8	-	-	-	-	-	-	-	-	-	-	-	3	43.3	O		











No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks
					N	E	Z	N	E	Z	N	E	Z			
6	Alishan	14	P	16 01 00.0	μ	μ	μ	μ	μ	μ	s	s	s	m	s	O U.S.C.G.S.
	Taichung		ep	01 01.0										4	42.4	O 36.3N 70.7E
	Anpu		ip	01 02.0										6	03.0	O Hindu Kush
	Tainan		ep	01 04.1										5	58.0	O Region
	Taipei		P	01 05.2	17	+	27							6	17.5	O In Afghanis
	Yushan		P	01 05.2												O tan and West
	Kaohsiung		P	01 08.0												O Pakistan
	Hwalien		ip	01 08.0	6.8	+	10.0	-21.0	58	48	48			5	25.4	O
	Tawu		ip	01 09.7	4	+	10.0							5	26.9	O
	Taitung		P	01 10.5										6	25.5	O
	Heinkong		ep	01 11.1												O
	Hengchun		ep	01 13.5										6	22.5	O
	Ilan		P	01 15.6												
7	Taitung	15	P	02 02 11.0	81.2	-	66.2	-	60	150	165	1200				5.8 II
	Heinkong		ep	02 11.0												5.8 O About 36Km
	Tawu		ip	02 11.6	+	2	-	2	28000	25000	40000	1.3	3.4	1.8	5.0	III E. of Tawu
	Alishan		ep	02 17.0												16.0 I 22.3N121.2E
	Yushan		ep	02 18.0												27.0 I (H÷10)
	Hengchun		ip	02 21.3	+	17.9	+	16.7	-30.0	530	458	481				7.9 III
	Tainan		P	02 25.9												27.9 I
	Kaohsiung		P	02 26.2												13.3 O
	Hwalien		P	02 31.1					185	185	70	3.4	3.2	2.0	37.3	O
	Ilan		P	02 31.7					90	84	80	2.4	2.6	2.5	33.1	I
	Taichung		ip	02 35.0												25.0 O
	Anpu		ip	02 50.8												55.2 O
	Taipei		P	02 51.0												39.0 O
Penghu		P	03 05.6												19.6 O	
8	Anpu	16	ip	16 51 25.6										4	10.4	O U.S.C.G.S.
	Ilan		ep	51 26.6										5	23.6	O 40.8N142.9E
	Taipei		P	51 27.1	+	2	+	7								O Near East Coast
	Hwalien		P	51 34.8												O of Honshu
	Taitung		ep	51 35.3										5	00.3	O Japan

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks	
					N	E	Z	N	E	Z	N	E	Z				
	Tawu		ep	51 47.4	μ	μ	μ	μ	μ	μ	s	s	s	m	s	O	
	Hengchun		ep	52 00.0										4	36.0	O	
9	Tawu	19	ep	16 26 05.9												O U.S.C.G.S.	
	Hengchun		ep	26 06.0												O 2.0S 119.8E	
	Taitung		ep	26 12.0										4	33.0	O Cebbes	
	Yushan		P	26 16.8												O	
	Alishan		P	26 19.0												O	
	Anpu		ip	26 30.4										4	51.6	O	
	Ilan		ep	26 32.2												O	
	Hwalien		P	26 52.3										4	13.3	O	
10	Taitung	21	ep	11 13 32.7											4	35.1	O U.S.C.G.S.
	Hengchun		ep	13 35.0												O 1.5S 126.5E	
	Tawu		ep	13 32.7										4	27.0	O Molucca	
	Hsinkong		ep	13 43.5												O Sea	
	Hwalien		ep	13 50.0										4	41.9	O	
	Alishan		P	13 50.8												O	
	Anpu		ip	13 57.0												O	
	Tainan		ep	14 02.1												O	
	Taichung		ep	14 03.1												O	
	Ilan		ep	14 10.8										4	22.5	O	
	Taipei		ep	14 14.8										4	55.0	O	
	Kaohsiung		ep	14 25.9												O	
11	Taitung	28	ep	16 53 12.6											11	2.0	O
	Anpu		ip	53 14.2												O d	
	Taipei		ep	53 17.2												O	
	Tawu		ep	53 17.3												O	
12	Anpu	29	ip	10 52 46.0											4	10.0	O U.S.C.G.S.
	Ilan		ep	52 47.6										4	27.4	O 40.8N142.8E	
	Taipei		ep	52 50.4												O Near East	
	Hengchun		ep	53 02.6												O Coast of	
	Taitung		ep	53 08.4										4	43.0	O	



No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks	
					N	E	Z	N	E	Z	N	E	Z				
	Tawu		ep	53 08.5	μ	μ	μ	μ	μ	μ	s	s	sm	s	0	Honshu	
	Hwalien		P	53 09.3	-	-	-	-	-	-	-	-	-	-	0	Japan	
	Tainan		ep	53 17.2	-	-	-	-	-	-	-	-	-	-	0		
13	Anpu	30	ip	02 35 57.3	-	-	-	-	-	-	-	-	-	-6	42.7	0	U.S.C.G.S.
	Taipei		P	36 00.5	-	-	-	-	-	-	-	-	-	-7	8.0	0	50.6N 177.9E
	Hwalien		P	36 05.3	-	-	-	-	-	-	-	-	-	-	0	Rat Islands	
	Yushan		P	36 08.3	-	-	-	-	-	-	-	-	-	-	0	Aleutian	
	Hsinkong		ep	36 12.1	-	-	-	-	-	-	-	-	-	-	0	Islands	
	Ilan		ep	36 12.7	-	-	-	-	-	-	-	-	-5	47.5	0		
	Alishan		ep	36 12.8	-	-	-	-	-	-	-	-	-	-	0		
	Hsinchu		ep	37 13.0	-	-	-	-	-	-	-	-	-	-	0		
	Taitung		ep	36 14.0	-	-	-	-	-	-	-	-	-7	24.0	0		
	Taichung		ep	36 14.4	-	-	-	-	-	-	-	-	-	-	0		
	Tawu		ep	36 14.9	-	-	-	-	-	-	-	-	-	-	0		
	Hengchun		ep	36 19.8	-	-	-	-	-	-	-	-	-	-	0		
14	Taitung	31	ep	09 59 29.9	-	-	-	-	-	-	-	-	-	-	0	d	
	Anpu		ip	59 41.9	-	-	-	-	-	-	-	-	-	-10	00.1	0	



# 地 震 季 報

第十二卷 第二號

中華民國五十四年四、五、六月

## SEISMOLOGICAL BULLETIN

April to June 1965

VoL. 12 No. 2

臺 灣 省 氣 象 局

PUBLISHED QUARTERLY BY

TAIWAN WEATHER BUREAU

64 KUNG YUAN ROAD, TAIPEI, TAIWAN, CHINA



## General Aspect of Earthquakes

### From April to June, 1965

The earthquakes occurred during the period from April to June, 1965 summed up to 263. They consist of 30 felt earthquakes (including 2 remarkable, 1 moderate, 7 small felt areas, and 20 local ones) and 233 unfelt earthquakes.

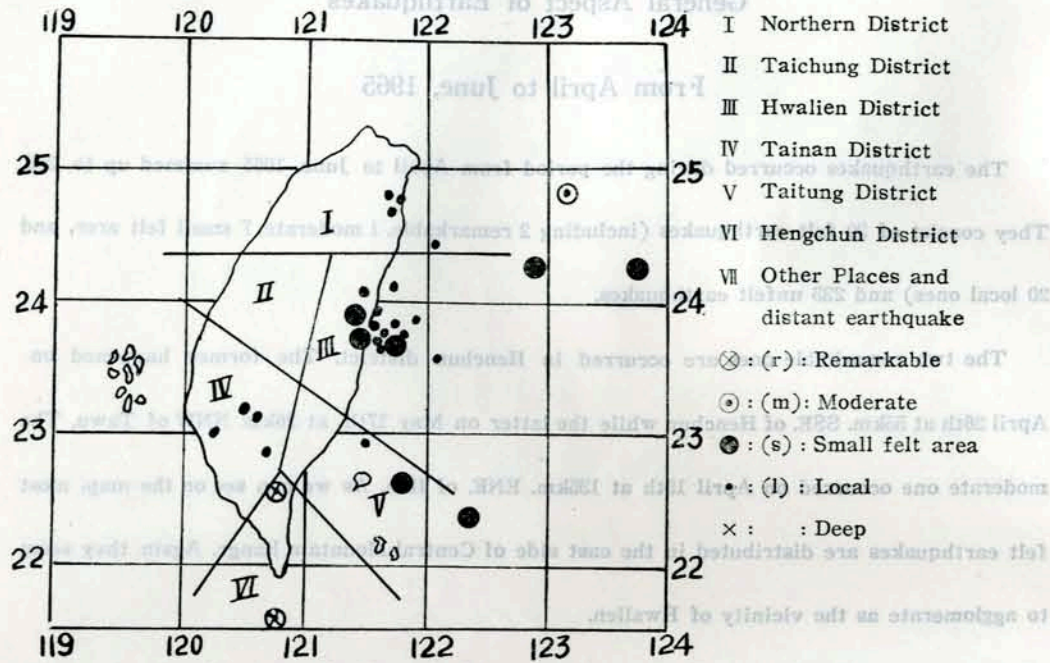
The two remarkable ones are occurred in Henchun district. The former happened on April 26th at 55km. SSE. of Henchun while the latter on May 17th, at 26km. NNW of Tawu. The moderate one occurred on April 15th at 135km. ENE. of Ilan. As we can see on the map, most felt earthquakes are distributed in the east side of Central Mountain Range. Again, they seem to agglomerate as the vicinity of Hwalien.

Besides those happened in Taiwan and its neighborhood, 79 distant earthquakes have also been recorded by our seismographs. Their data are shown on the latter part of this bulletin.

District	Number of earthquakes				Total	Classification
	Remarkable	Moderate	Small felt areas	Local		
Northwest District	—	1	—	1	1	
Taipei District	—	—	—	—	—	
Hualien District	—	—	—	—	—	
Tainan District	—	—	—	—	—	
Taiwan	—	—	—	—	—	
Other areas	—	—	—	—	—	
<b>Total</b>	<b>2</b>	<b>1</b>	<b>7</b>	<b>20</b>	<b>30</b>	



Epicenters of Felt Earthquakes in April to June, 1965



Number of earthquakes classified according to it's magnitude and districts April to June, 1965

Classification	Number of felt earthquakes					Number of unfelt earthquakes	Total
	Remarkable	Moderate	Small felt area	Local	Total		
Northern District	—	1	—	4	5	21	26
Taichung "	—	—	—	—	0	17	17
Hwalien "	—	—	5	11	16	94	110
Tainan "	—	—	—	4	4	5	9
Taitung "	—	—	2	1	3	56	59
Hengchun "	2	—	—	—	2	40	42
Total	2	1	7	20	30	233	263
Other places	—	—	—	—	0	79	79

The Felt Earthquakes Occurred from April to June, 1965.

No.	Month	P. (G. M. T.)	Mag- nitude	Epicenter	Latitude		Longitude	Depth
					N.	E.		
26	Apr.	d. h. m. 2 03 05	(1)	Near Tainan				
27	"	5 13 00	"	Near Hwalien				
28	"	6 20 39	"	Near Ilan				
29	"	6 20 55	"	"				
30	"	8 05 22	"	Near Hwalien				
31	"	9 08 41	"	About 34 km. NE. of Tainan				0
32	"	9 22 34	"	About 65 km. SE. of Hwalien				20
33	"	11 20 20	"	About 40 km. ESE. of Tainan				0
34	"	15 05 10	(m)	About 135 km. ENE. of Ilan	24.9	123.1		10
35	"	18 13 14	(1)	About 38 km. ENE. of Tainan				0
36	"	24 17 02	"	Near Hwalien				
37	"	26 22 15	(r)	About 55 km. SSE. of Hengchun	21.5	120.9		0
38	"	29 00 41	(1)	About 23 km. SE. of Hsin-kong				0
39	"	29 02 31	"	About 40 km. SE. of Ilan				40
40	May	5 13 58	"	About 25 km. NE. of Hwalien				35
41	"	17 17 19	(r)	About 26 km. NNW. of Tawu	22.5	120.8		
42	"	28 05 17	(s)	About 155 km. E. of Tawu	22.2	122.4		20
43	Jun.	1 19 10	(1)	About 16 km. NNW. of Hwalien				20
44	"	6 11 21	(s)	About 66 km. E. of Taitung	22.8	121.8		20
45	"	11 13 20	"		24.4	122.9		50
46	"	15 08 02	(1)	About 35 km. ESE. of Hwalien				20
47	"	15 21 02	"	Near Ilan				
48	"	17 10 44	(s)	195 km. ESE. of Ilan	24.4	123.6		60
49	"	27 11 36	"	About 30 km. SSE. of Hwalien	23.7	121.7		30
50	"	27 14 55	(1)	About 40 km. S. of Hwalien				20
51	"	28 00 07	(s)	About 24 km. WSW. of Hwalien	23.9	121.4		10
52	"	28 15 45	"	About 30 km. SSW' of Hwalien	23.7	121.5		5
53	"	28 17 33	(1)	About 35 km. S. of Hwalien				35
54	"	28 18 12	"	About 32 km. SE. of Hwalien				25
55	"	28 20 47	"	About 25 km. SSE. of Hwalien				20



## Unfelt Earthquakes from April to June, 1965.

No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
		d.	h.	m.				d.	h.	m.	
281	Apr.	1	04	02	Near Hsinkong	315	Apr.	18	06	57	d
282	"	1	09	46	About 47 km. SSE of Ilan	316	"	18	09	58	d
283	"	1	21	43	d	317	"	18	12	43	Taitung district
284	"	1	16	44	Taitung district	318	"	18	18	11	Hengchun district
285	"	2	02	53	About 67 km. E. of Hwalien	319	"	18	18	29	Taitung district
286	"	2	07	24	Hengchun district	320	"	18	18	53	"
287	"	2	12	53	Taitung district	321	"	18	20	26	"
288	"	2	13	07	d	322	"	19	16	20	Tainan district
289	"	3	12	31	d	323	"	19	18	58	Taitung district
290	"	5	03	59	d	324	"	19	23	46	d
291	"	5	06	34	d	325	"	21	00	00	About 140 km. ESE. of Ilan
292	"	5	14	04	d	326	"	21	01	53	Hwalien district
293	"	5	19	11	Near Hwalien	327	"	21	06	05	"
294	"	6	09	47	d	328	"	23	15	00	Near Hwalien
295	"	7	00	02	Northern district	329	"	23	23	46	Northern district
296	"	7	09	47	d	330	"	24	03	10	d
297	"	8	05	16	Near Hwalien	331	"	24	08	03	d
298	"	8	13	52	d	332	"	24	22	00	d
299	"	9	10	57	d	333	"	25	01	04	d
300	"	9	16	34	Northern district	334	"	25	01	04	Taitung district
301	"	9	22	58	d	335	"	25	11	03	About 62 km. SSW. of Hwalien
302	"	10	09	47	Near Alishan	336	"	25	21	04	About 44 km. ENE. of Alishan
303	"	10	14	12	Taitung district	337	"	25	21	31	d
304	"	11	01	55	About 38 km. NE. of Hsinkong	338	"	26	09	52	d
305	"	11	02	25	Taichung district	339	"	26	13	37	Taitung district
306	"	12	20	44	Hwalien district	340	"	26	22	23	About 55 km. SSE. of Hengchun
307	"	12	20	47	Hwalien district	341	"	27	02	43	"
308	"	13	09	20	Taitung district	342	"	27	14	05	Taitung district
309	"	13	18	56	Northern district	343	"	28	12	08	d
310	"	15	04	29	Hengchun district	344	"	28	19	30	Taitung district
311	"	15	14	37	About 100 km. ENE. of Taipei	345	"	29	15	41	Hwalien district
312	"	15	18	02	Taitung district	346	"	29	15	59	"
313	"	16	23	32	d	347	"	29	22	00	Near Hsinkong
314	"	18	04	15	d	348	"	30	06	00	Hengchun district

No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
		d.	h.	m.				d.	h.	m.	
349	Apr.	30	15	41	d	384	May	16	15	51	About district
350	"	30	16	15	About 18 km. ESE. of Ilan	385	"	17	17	31	About 26 km. NNW. of Tawu
351	May	1	09	42	Northern district	386	"	17	17	37	"
352	"	2	01	46	Taitung district	387	"	17	17	41	"
353	"	2	07	15	d	388	"	17	17	47	"
354	"	2	09	33	Near Alishan	389	"	17	18	29	"
355	"	3	07	17	About 65 km. SE. of Ilan	390	"	17	18	42	"
356	"	3	10	12	Northern district	391	"	17	18	43	"
357	"	4	02	15	d	392	"	17	18	59	"
358	"	4	02	23	Northern district	393	"	17	20	03	"
359	"	4	08	00	d	394	"	17	20	45	"
360	"	4	08	42	d	395	"	17	20	47	"
361	"	4	11	40	Hwalien district	396	"	17	21	39	"
362	"	4	14	23	Northern district	397	"	17	22	43	"
363	"	5	17	47	d	398	"	18	00	44	"
364	"	5	19	10	Near Alishan	399	"	18	00	58	"
365	"	6	14	03	Near Yushan	400	"	18	01	21	"
366	"	7	07	33	d	401	"	18	01	41	"
367	"	6	15	31	d	402	"	18	02	44	"
368	"	8	03	06	d	403	"	18	03	04	About 46 km. ENE. of Tainan
369	"	8	14	12	Near Yushan	404	"	18	03	07	"
370	"	8	18	01	Hengchun district	405	"	18	05	49	Hengchun district
371	"	8	19	29	Near Yushan	406	"	18	06	20	Near Alishan
372	"	8	22	37	"	407	"	18	09	15	Hengchun district
373	"	9	01	08	Northern district	408	"	18	10	42	Taitung district
374	"	9	01	57	Hengchun district	409	"	18	12	10	d
375	"	9	15	17	About 62 km. ENE. of Hwalien	410	"	18	16	54	About 39 km. ESE. of Tawu
376	"	11	16	44	Taitung district	411	"	18	22	52	d
377	"	11	21	26	Tainan district	412	"	19	01	55	About 39 km. ESE. of Tawu
378	"	12	08	12	d	413	"	19	03	52	Near Hengchun
379	"	12	10	40	d	414	"	19	05	59	Taitung district
380	"	14	16	02	Near Hwalien	415	"	19	06	11	d
381	"	15	11	54	Near Tawu	416	"	19	11	16	Near Hwalien
382	"	16	00	06	d	417	"	19	12	58	About 24 km. SE of Hengchun
383	"	16	11	39	d	418	"	19	13	07	d



No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
		d.	h.	m.				d.	h.	m.	
419	May	19	22	34	Northern district	454	May	26	05	48	Taichung district
420	"	19	22	39	Taitung district	455	"	28	19	51	Taitung district
421	"	20	00	44	d	456	"	28	19	57	"
422	"	20	02	22	Taitung district	457	"	30	08	13	"
423	"	20	02	30	"	458	"	30	09	14	Hwalien district
424	"	20	14	14	d	459	Jun.	1	04	38	d
425	"	20	05	22	Northern district	460	"	2	01	24	Hwalien district
426	"	20	05	27	About 18 km. ENE. of Hsinkong	461	"	2	07	54	"
427	"	20	23	48	About 32 km. ESE. of Tawu	462	"	2	14	56	d
428	"	21	03	54	Taitung district	463	"	2	16	01	About 66 km. ENE. of Ilan
429	"	21	06	05	"	464	"	2	20	25	Hengchun district
430	"	21	12	54	Hengchun district	465	"	3	00	47	d
431	"	21	17	32	Near Tawu	466	"	4	00	49	About 72 km. ENE. of Ilan
432	"	22	00	24	d	467	"	4	11	05	Taitung district
433	"	22	03	09	d	468	"	4	15	00	Northern district
434	"	22	10	42	d	469	"	4	15	23	d
435	"	22	11	31	Taichung district	470	"	5	02	41	Taitung district
436	"	22	11	34	"	471	"	5	06	23	"
437	"	22	15	14	"	472	"	5	11	22	Hwalien district
438	"	22	14	21	d	473	"	5	11	22	"
439	"	22	16	57	d	474	"	5	11	24	"
440	"	23	04	45	Taichung district	475	"	5	13	48	d
441	"	23	05	16	Taitung district	476	"	5	21	02	About 50 km. NNE. of Hwalien
442	"	23	10	28	Hengchun district	477	"	6	01	53	Hwalien district
443	"	23	12	30	Near Hwalien	478	"	6	05	58	Taitung district
444	"	23	16	14	Northern district	479	"	6	08	54	"
445	"	23	23	54	d	480	"	6	15	34	d
446	"	24	01	19	About 58 km. E. of Ilan	481	"	7	12	26	Taitung district
447	"	24	03	12	Hengchun district	482	"	8	07	44	Hengchun district
448	"	24	03	40	Taitung district	483	"	8	09	43	Taitung district
449	"	24	19	58	"	484	"	8	11	14	Near Taitung
450	"	24	23	23	d	485	"	10	15	21	d
451	"	25	16	10	Hengchun district	486	"	10	18	14	Near Hwalien
452	"	25	18	45	d	487	"	11	02	46	d
453	"	26	01	00	Taitung district	488	"	11	03	39	d

No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
		d.	h.	m.				d.	h.	m.	
489	Jun.	11	12	06	d	524	Jun.	23	18	37	Near Lanyu
490	"	11	15	16	Near Hwalien	525	"	24	07	49	d
491	"	12	00	32	d	526	"	24	23	09	d
492	"	12	04	21	Hwalien district	527	"	25	01	09	Taitung district
493	"	12	05	40	d	528	"	26	07	20	"
494	"	13	02	31	d	529	"	26	20	39	Hwalien district
495	"	13	07	11	d	530	"	27	11	46	About 30 km. SSE. of Hwalien
496	"	13	15	24	Taitung district	531	"	27	11	47	"
497	"	13	17	29	About 103 km. SW. of Hengchun	532	"	27	12	00	"
498	"	13	20	51	Hwalien district	533	"	27	12	01	"
499	"	14	05	23	"	534	"	27	12	24	"
500	"	14	05	59	Taitung district	535	"	27	12	28	"
501	"	14	08	30	Hwalien district	536	"	27	12	30	"
502	"	14	12	03	Near Hwalien	537	"	27	12	39	"
503	"	14	13	15	Near Alishan	538	"	27	12	44	"
504	"	15	05	28	Taitung district	539	"	27	12	55	"
505	"	15	23	21	d	540	"	27	13	14	"
506	"	16	05	02	Taitung district	541	"	27	13	29	Taitung district
507	"	16	12	49	Hwalien district	542	"	27	15	05	Hwalien district
508	"	16	14	05	Near Taipei	543	"	27	14	14	"
509	"	16	20	04	Near Lanyu	544	"	27	14	36	"
510	"	17	10	46	Taitung district	545	"	27	14	54	"
511	"	17	16	43	About 32 km. S. of Yushan	546	"	27	15	01	Near Hwalien
512	"	17	20	26	d	547	"	27	15	14	About 42 km. S. of Hwalien
513	"	18	06	53	Hwalien district	548	"	27	15	31	"
514	"	18	14	21	Hwalien district	549	"	27	16	58	"
515	"	19	06	57	d	550	"	27	17	56	"
516	"	20	01	28	About 110 km. E. of Hsinkong	551	"	27	19	23	"
517	"	20	02	08	d	552	"	27	21	01	"
518	"	21	00	31	d	553	"	27	21	01	"
519	"	21	02	06	About 23 km. S. of Ilon	554	"	27	21	04	"
520	"	22	23	50	d	555	"	27	22	55	"
521	"	23	11	20	d	556	"	28	02	12	Taitung district
522	"	23	18	03	Near Ilan	557	"	28	02	41	Hwalien district
523	"	23	18	30	Hwalien district	558	"	28	03	03	"



No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
		d.	h.	m.				d.	h.	m.	
559	Jun.	28	03	04	"	576	Jun.	28	18	38	About 32 km. SE. of Hwalien
560	"	28	03	41	d	577	"	28	20	23	"
561	"	28	06	12	Hwalien district	578	"	28	20	52	"
562	"	28	07	03	"	579	"	28	23	15	"
563	"	28	07	04	"	580	"	29	00	00	"
564	"	28	11	36	Taichung district	581	"	29	02	16	d
565	"	28	12	35	Near Hwalien	582	"	29	06	00	Taichung district
566	"	28	14	35	Near Tawu	583	"	29	10	48	Hwalien district
567	"	28	15	53	About 30 km. SSW. of Hwalien	584	"	29	11	36	"
568	"	28	16	04	"	585	"	29	13	40	"
569	"	28	16	08	"	586	"	30	02	58	d
570	"	28	16	08	"	587	"	30	03	06	Hwalien district
571	"	28	16	35	"	588	"	30	04	54	"
572	"	28	16	58	"	589	"	30	07	43	Taitung district
573	"	28	17	30	"	590	"	30	08	42	d
574	"	28	17	30	"	591	"	31	02	19	d
575	"	28	17	42	About 22 km. SSW. of Hwalien	592	"	31	11	28	d

Major Earthquakes Occurred in April, 1965.

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			Period			P~S Intensity	Epicenter & Remarks
					N	E	Z	N	E	Z	N	E	Z		
1	Anpu	2	ep	13 07 20.0	"	"	"	"	"	"	s	s	s	m s	1 54.0 O (d)
	Taitung		ep	09 43.0											O
	Hsinkong		ep	09 23.6											O
2	Taipei	6	ep	09 47 17.4										5 00.0 O	U. S. C. G. S.
	Tawu		ep	47 28.5										4 02.3 O	0.5 S
	Yushan		ep	47 30.0											O Northern
	Hwalien		p	47 33.4										4 30.4 O	Celebes
	Taitung		ep	47 36.3										4 11.9 O	
	Tainan		ep	47 46.8											O
	Hengchun		ep	47 46.9											O
Ilan		ep	48 00.5										4 14.0 O		

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			Period			P~S Intensity	Epicenter & Remarks
					N	E	Z	N	E	Z	N	E	Z		
3	Ilan	15	ip	05 10 17.3	-13.5	-20.0	+67.0	250	149	80	1.4	1.9	1.5	m s	19.2 I
	Taipei		p	10 18.5				146	141		1.0	1.4			19.6 O
	Anpu		ip	10 18.5											22.5 O
	Hwalien		ip	10 21.7	-6.1	-2.5	+42.1	258	185	120	1.7	1.5	1.7		22.0 II
	Hsinkong		ep	10 28.6											30.6 O
	Taichung		p	10 28.7											26.6 O
	Yushan		ep	10 30.1											28.1 O
	Alishan		ip	10 31.9	-21	+3	-15	310	350		2.0	2.3			30.0 I
	Taitung		ip	10 34.4											36.5 O
	Tawu		ep	10 39.3											42.0 O
	Tainan		ep	10 43.8											29.5 O
4	Hengchun		ep	10 49.5											44.0 O
	Kaohsiung		ep	10 56.0											23.7 O
	Cnpu	19	ip	23 46 02.0											O U. S. C. G. S.
	Tawu		ep	46 23.3											O 34.9 N 138.0 E
	Taitung		ep	46 26.0										6 2.5	O Near S. coast of Honshu Japan
5	Hengchun		ep	46 31.5											O
	Taitung	24	ep	08 03 11.6										4 54.4 O	U. S. C. G. S.
	Hengchun		ep	08 03 12.6										28.0 O	19.2N 121.2E
	Tawu		p	03 15.9										33.8 O	Philippine
	Hsinkong		ep	03 25.5											O Islands
	Kaohsiung		ep	03 30.0											O Region
	Tainan		ep	03 32.0											O
	Alishan		ep	03 34.4											46.0 O
	Hwalien		p	03 42.1											24.4 O
	Ilan		ep	03 54.4											-1 00.0 O
6	Anpu		ip	03 55.0											-1 28.0 O
	Taipei		ep	04 16.4											34.0 O
	Taitung	24	ep	22 00 13.4										4 1.4 O	U. S. C. G. S.
Anpu		ip	00 21.2											4 31.2 O	11.4N 140.1E
Hwalieu		ep	00 24.4												O West Caroline Islands



No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks	
					N	E	Z	N	E	Z	N	E	Z				
7	Anpu	25	ip	01 04 41.0	μ	μ	μ	μ	μ	μ	s	s	sm	s	49.0	O U. S. C. G. S.	
	Hwalien		p	04 43.4	-	-	-	-	-	-	-	-	-	-	41.3	O 24.5N 142.7E	
	Taitung		ep	04 46.1	-	-	-	-	-	-	-	-	-	-	56.7	O Volcand	
	Ilan		ep	04 48.1	-	-	-	-	-	-	-	-	-	-	24.1	O Islands	
	Tawu		ep	04 49.5	-	-	-	-	-	-	-	-	-	-		O Region	
	Hengchun		ep	04 53.8	-	-	-	-	-	-	-	-	-	-		O	
8	Taitug	26	ep	09 52 30.0	-	-	-	-	-	-	-	-	-	-	5	2.0	O U. S. C. G. S.
	Anpu		ip	53 12.5	-	-	-	-	-	-	-	-	-	-	5	51.5	O 1.7S 126.6E
					-	-	-	-	-	-	-	-	-	-			Molucca Sea
9	Taitung	26	p	22 15 57.6	+12.8	-11.4	+ 0.9	643	325	165	1.1	1.1	1.1	22.2	I		
	Hengchun		ip	16 00.9	+40.5	-17.0	+42.0	-	512	536	-	-	-	10.8	II	About 55km.	
	Tawu		ip	16 05.2	+ 36	- 4	+ 20	221	274	166	4.6	4.9	4.5	11.9	I	SSE. of	
	Kaohsiung		ep	16 10.0	-	-	-	-	-	-	-	-	-	17.5	I	Hengchun	
	Tainon		ep	16 14.3	-	-	-	-	-	-	-	-	-	44.7	I		
	Penghu		ep	16 16.8	-	-	-	-	-	-	-	-	-	27.8	O	21.5 N	
	Yushan		ep	16 22.8	-	-	-	-	-	-	-	-	-	23.6	O		
	Alishan		ep	16 23.0	-	-	-	-	-	-	-	-	-	26.4	I	120.9E	
	Hwalien		p	16 33.9	- 2.1	- 8.1	+ 5.3	223	141	95	2.6	2.2	3.7	34.1	O	(H=O)	
	Taichung		p	16 35.2	-	-	-	-	-	-	-	-	-	28.6	O		
	Ilan		p	16 44.6	-	-	-	142	96	85	2.8	2.0	1.8	45.4	I		
	AnPu		ip	16 45.0	+14.3	+ 4.0	+14.3	-	-	-	-	-	-	35.0	O		
	Taipei		p	16 48.3	-	-	-	-	-	-	-	-	-	39.6	O		
	Hsinkong		ep	17 07.7	-	-	-	144	222	113	13.0	10.8	17.5	22.6	I		
10	Taipei	28	ep	12 08 38.7	-	-	-	-	-	-	-	-	-	-	1	11.5	O U. S. C. G. S.
	Hwalien		p	09 17.0	-	-	-	-	-	-	-	-	-	-	31.4	O 24.7N 127.0E	
					-	-	-	-	-	-	-	-	-	-			Ryukyu Is.

Major Earthquakes Occurred in May, 1965.

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks	
					N	E	Z	N	E	Z	N	E	Z				
1	Ilan	2	ep	07 15 45.6	μ	μ	μ	μ	μ	μ	s	s	sm	s	2	26.6	O U. S. C. G. S.
	Hwalien		p	15 52.1	-	-	-	-	-	-	-	-	-	-	1	50.6	O 28.9N 128.9E

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks	
					N	E	Z	N	E	Z	N	E	Z				
	Alishan		p	15 59.2	μ	μ	μ	μ	μ	μ	s	s	sm	s		O Ryukyu Islands	
	Taipei		ep	16 00.1	-	-	-	-	-	-	-	-	-	-	5	10.5	O
	Taitung		ep	16 01.3	-	-	-	-	-	-	-	-	-	-	3	34.8	O
	Taichung		ep	16 02.3	-	-	-	-	-	-	-	-	-	-		O	
	Tainan		ep	18 11.4	-	-	-	-	-	-	-	-	-	-		O	
	Kaohsiung		ep	18 23.0	-	-	-	-	-	-	-	-	-	-		O	
	Hengchun		ep	19 18.8	-	-	-	-	-	-	-	-	-	-		O	
2	Hwalien	6	p	15 31 13.2	-	-	-	-	-	-	-	-	-	-		O	
	Anpu		p	15 31 44.0	-	-	-	-	-	-	-	-	-	-	9	33.0	O (d)
3	Anpu	7	ep	07 33 14.0	-	-	-	-	-	-	-	-	-	-	1	55.0	O U. S. C. G. S.
	Taipei		ep	33 42.2	-	-	-	-	-	-	-	-	-	-		O 30.2N 129.0E	
	Hwalien		ep	33 44.1	-	-	-	-	-	-	-	-	-	-		O East China Sea	
4	Hengchun	8	ep	03 06 45.5	-	-	-	-	-	-	-	-	-	-		O U. S. C. G. S.	
	Taitung		ep	06 48.1	-	-	-	-	-	-	-	-	-	-		O 18.4N 120.4E	
	Hwalien		p	06 56.4	-	-	-	-	-	-	-	-	-	-	1	5.0	O Luzon
	Alishan		ep	06 59.8	-	-	-	-	-	-	-	-	-	-	49.2	O Philippine Islands	
	Taipei		ep	07 27.5	-	-	-	-	-	-	-	-	-	-		O	
	Anpu		s	09 22.0	-	-	-	-	-	-	-	-	-	-		O	
5	Tawu	16	ep	11 39 48.2	-	-	-	-	-	-	-	-	-	-		O U. S. C. G. S.	
	Hengchun		ep	39 52.4	-	-	-	-	-	-	-	-	-	-		O 5.3N 125.7E	
	Anpu		p	40 19.5	-	-	-	-	-	-	-	-	-	-	3	48.5	O Mindanao
	Taitung		ep	40 20.5	-	-	-	-	-	-	-	-	-	-	3	26.6	O Philippine Islands
6	Tawu	17	ip	17 19 40.7	-16	-462	-11	-	-	-	-	-	-	-	5.8	IV	
	Hsinkong		ep	19 46.1	-	-	-	82	78	94	2.2	2.6	3.0	3.5	IV	About 26km.	
	Taitung		ip	19 46.9	-127.6	-216.9	-127.6	12200	13000	6900	2.4	3.8	4.0	12.6	IV	NNW. of	
	Hengchun		ip	19 47.7	-1.3	-1.2	+5.0	23000	23500	16500	-	-	2.3	4.6	IV	Tawu	
	Tainan		ip	19 50.7	-270	+391	-782	-	-	-	-	-	-	6.1	IV	120.8 E	
	Alishan		ip	19 54.6	+380	-19	+338	29750	28870	8075	2.9	2.4	2.9	13.8	III		
	Hwalien		ip	19 59.7	+37.4	+2.5	+18.4	-	5600	-	-	-	-	22.9	III		



No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks
					N	E	Z	N	E	Z	N	E	Z			
	Ywshan		p	20 00.5	μ	μ	μ	μ	μ	μ	s	s	s m	2.7	III	22.5 N
	Taichung		ip	20 02.7	-50	+30	-143							22.4	III	
	Anpu		p	20 14.8										13.2	II	
	Taipei		ip	20 18.2	+25.2		+25	118	106	48	4.2	3.8	3.7	36.0	III	
	Ilan		ip	20 32.1	-4.5	+0.3	+2.5	4667	4417	1733	2.7	2.5	3.4	23.7	III	
	Hsinchu		ep	20 55.7										20.8	III	
	Peughu		p	20											III	
	Kaohsiung		ip	20											IV	
7	Taipei	20	ep	00 44 19.2												O U. S. C. G. S.
	Tawu		ep	50 09.1												O 14.7S 167.4E
	Hengchun		ep	50 13.4												O New Hebrides
	Taitung		ep	50 14.0									-8	20.0	O Islands	
	Tainan		ep	50 14.3											O	
	Hwalien		ep	50 15.2									-8	4.8	O	
	Anpu		p	50 18.3									-8	26.7	O	
	Ilan		ep	50 24.6											O	
8	Hengchun	22	ep	03 09 37.0												O U. S. C. G. S.
	Taitung		ep	10 36.1												O 1.3N 126.3E
	Anpu		p	11 10.0									-5	4.0	O Molucca Passage	
9	Taitung	22	ep	10 42 14.7												O U. S. C. G. S.
	Anpu		p	42 22.0									-8	49.0	O 21.1S 178.7W	
																Figii Islands Region
10	Tawu	24	ep	23 23 31.8												O U. S. C. G. S.
	Hengchun		ep	23 40.0												O 13.0N 124.5E
	Taitung		ep	23 41.3									-3	5.1	O Samar	
	Hwalien		ep	23 53.5										42.9	O Philippine Islands	
	Taipei		ep	24 07.5												O
	Anpu		ip	24 08.8									-2	19.2	O	
	Ilan		ep	25 34.0										18.8	O	

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks
					N	E	Z	N	E	Z	N	E	Z			
11	Hengchun	28	ep	05 16 57.0	μ	μ	μ	μ	μ	μ	s	s	s m	20.0	I	About 155
	Tawu		ep	16 59.6												15.6 O km. E. of
	Taitung		ed	17 04.2												O Tawu
	Kaohsiung		ep	17 17.0												26.5 O (H=20)
	Alishan		ep	17 18.3												36.0 O 122.4 E
	Hwalien		p	17 23.4				52			3.4					16.1 O 22.2 N
	Hsinkong		ep	17 25.7												O
	Ilan		ep	17 36.5												38.3 O
	Anpu		p	17 40.2												49.8 O
	Taipei		p	17 52.5												36.8 O

Major Earthquakes Occurred in June, 1965.

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks
					N	E	Z	N	E	Z	N	E	Z			
1	Yushan	6	ep	h. m. s. 11 20 30.8	μ	μ	μ	μ	μ	μ	s	s	s m	15.5	O	Abotu 66km.
	Taitung		ip	21 23.2	+31.2	-50.0	-76.2	4050		2500	1.3		1.1	3.4	II	E. of Taitung
	Ilan		p	21 25.7												25.7 O 121.8 E
	Tawu		p	21 28.6												8.7 O 22.8 N
	Alishan		ep	21 34.9												12.4 O (H=20)
	Hsinkong		ip	21 39.3	-8.0	+13	+11									7.1 II
	Hengchun		ep	21 40.7												15.2 O
	Kaohsiung		ep	21 42.2												16.3 O
	Taichung		ep	21 43.5												12.1 O
	Hwalien		p	21 47.4				145	112	60	3.2	3.2	3.3	15.4	I	
	Anpu		ip	21 54.7												15.3 O
	Taipei		ep	21 59.1												33.6 O
	Lanyu		p	21 22.0												9.3 I
2	Anpu	11	ip	03 39 47.0										-5	38.0	O U. S. C. G. S.
	Taitung		ep	40 00.0										-5	21.6	O 44.7N 148.7E
	Alishan		ep	40 07.2												O Kurile
	Tawu		ep	40 08.4												O Islands
	Hwalien		ep	40 16.5										-4	47.8	O



No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			Period			P~S	Intensity	Epicenter & Remarks	
					N	E	Z	N	E	Z	N	E	Z				
	Hengchun		ep	40 19.9	μ	μ	μ	μ	μ	μ	s	s	s	m	s	O	
	Iilan		ep	40 30.0	-	-	-	-	-	-	-	-	-	-	-	O	
	Tainan		ep	40 31.2	-	-	-	-	-	-	-	-	-	-	-	O	
	Taichung		ep	40 35.0	-	-	-	-	-	-	-	-	-	-	-	O	
	Kaohsiung		ep	40 50.0	-	-	-	-	-	-	-	-	-	-	-	O	
3	Iilan	11	p	13 20 08.0	-	-	-	154	126	60	1.9	1.8	1.6	13.4	I	Ryukyu	
	Anpu		ip	20 09.0	-	-	-	-	-	-	-	-	-	14.0	O		
	Taipei		p	20 09.4	-	-	-	-	-	-	-	-	-	16.6	O	Islands	
	Hwalien		p	20 1.60	-	-	-	146	95	50	0.8	0.8	1.2	17.8	I		
	Taichung		ep	20 19.3	-	-	-	-	-	-	-	-	-	23.2	O	122.9 E	
	Hsinkong		ep	20 20.5	-	-	-	-	-	-	-	-	-	28.1	O	24.4 N	
	Yushan		ep	20 23.2	-	-	-	-	-	-	-	-	-	22.9	O		
	Alishan		p	20 23.5	-	-	-	-	-	-	-	-	-	26.6	O		
	Taitung		ep	20 25.7	-	-	-	-	-	-	-	-	-	29.8	O	(H=50)	
	Tawu		ep	20 30.5	-	-	-	-	-	-	-	-	-	32.2	O		
	Hengchun		ep	20 38.1	-	-	-	-	-	-	-	-	-	30.0	O		
	Lanyu		p	20 00.0	-	-	-	-	-	-	-	-	-	30.5	O		
4	Anpu	13	ip	07 11 33.2	-3.0	-2.0	+5.3	-	-	-	-	-	-4	21.8	O	U. S. C. G. S.	
	Taipei		p	11 35.1	-	-	-	-	-	-	-	-	-4	13.0	O	41.9N 143.4E	
	Taitung		ep	11 45.0	-	-	-	-	-	-	-	-	-5	28.4	O	Hokkaido	
	Tawu		p	11 52.8	-	-	-	-	-	-	-	-	-	-	-	O	JapanReei0n
5	Kaohsiung	17	ep	10 43 40.0	-	-	-	-	-	-	-	-	-	-	O		
	Hwalien		p	43 56.8	-	-	-	174	135	36	2.0	1.8	2.3	19.3	O	195 km. of	
	Alishan		ep	44 06.0	-	-	-	-	-	-	-	-	-	35.0	O	E SE.	
	Iilan		p	44 06.8	-	-	-	173	163	-	2.5	2.0	-	19.6	I	Iilan	
	Yushan		p	44 09.0	-	-	-	-	-	-	-	-	-	28.8	O	123.6 E	
	Anpu		ip	44 09.2	-	-	-	-	-	-	-	-	-	22.8	O	24.4 N	
	Taipei		p	44 09.4	-	-	-	-	-	-	-	-	-	29.5	O	(H=60)	
	Taitung		ep	44 13.5	-	-	-	-	-	-	-	-	-	-	O		
	Taichung		ep	44 14.4	-	-	-	-	-	-	-	-	-	31.1	O		
	Tawu		p	44 17.8	-	-	-	-	-	-	-	-	-	28.7	O		
	Hengchun		ep	44 27.6	-	-	-	-	-	-	-	-	-	31.5	O		

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			Period			P~S	Intensity	Epicenter & Remarks	
					N	E	Z	N	E	Z	N	E	Z				
	Lanyu		ep	44 05.7	μ	μ	μ	μ	μ	μ	s	s	s	m	s	2.65	O
6	Tawu	22	p	23 50 54.4	-	-	-	-	-	-	-	-	-	-	-	-	O U. S. C. G. S.
	Hengchun		ep	51 45.5	-	-	-	-	-	-	-	-	-	-	-	-	O 7.1 N 123.5 E
	Taitung		ep	51 52.0	-	-	-	-	-	-	-	-	-	-4	6.9	O	Mindanao
	Alishan		p	52 00.0	-	-	-	-	-	-	-	-	-	-	-	O	Philippine
	Hwalien		ep	52 11.1	-	-	-	-	-	-	-	-	-	-	-	O	Islands
	Anpu		p	52 15.9	+4.0	-1.9	+5.3	-	-	-	-	-	-	-3	19.3	O	
	Taichung		p	52 39.8	-	-	-	-	-	-	-	-	-	-	-	O	
7	Taitung	24	ep	07 49	-	-	-	-	-	-	-	-	-	-	-	O	
	Iilan		p	07 49 37.5	-	-	-	-	-	-	-	-	-	-	-	O	(d)
	Anpu		p	07 49 50.2	+2.0	-0.7	+0.2	-	-	-	-	-	-	-3	4.6	O	
8	Hengchun	24	ep	23 09 10.6	-	-	-	-	-	-	-	-	-	-1	08.0	O	U. S. C. G. S.
	Tawu		p	09 11.4	-	-	-	-	-	-	-	-	-	-	-	O	20.1N 120.8E
	Taitung		ep	09 19.0	-	-	-	-	-	-	-	-	-	-5	32.0	O	Philippine
	Tainan		ep	09 31.1	-	-	-	-	-	-	-	-	-	-	-	O	Islands
	Kaohsiung		ep	09 40.0	-	-	-	-	-	-	-	-	-	-	-	O	Region
	Alishan		ep	09 40.0	-	-	-	-	-	-	-	-	-	-	-	O	
	Hwalien		p	09 48.4	-	-	-	-	-	-	-	-	-	-	-	O	
	Anpu		ip	09 54.8	-	-	-	-	-	-	-	-	-	-2	16.2	O	
	Taichung		ep	09 56.2	-	-	-	-	-	-	-	-	-	-	-	O	
	Taipei		p	10 04.4	-	-	-	-	-	-	-	-	-	-3	22.0	O	
	Iilan		ep	10 54.0	-	-	-	-	-	-	-	-	-	-2	28.0	O	
9	Hwalien	27	ip	11 36 18.9	+54.0	+185	+500	6800	8300	4600	1.8	1.8	2.2	5.1	IV		
	Hsinhong		ip	36 25.6	+10	+40	+3	1900	2400	1070	2.3	2.3	2.3	10.3	III	About 30km.	
	Yushan		ip	36 24.7	+165	+163	-	-	-	-	-	-	-	8.6	I	SSE. of	
	Taihung		ip	36 25.8	-60	+145	+185	2200	3400	2500	-	-	-	12.3	II	Hwalieu	
	Alishau		ip	36 28.3	-	-	-	4870	4350	3370	2.3	2.9	2.6	8.1	II	121.7 E	
	Iilan		ip	36 32.8	+27	+7	-	563	593	-	1.8	1.9	-	10.0	II	23.7 N	
	Tawu		ep	36 34.4	-	-	-	245	332	-	2.8	3.2	-	25.2	O	(H=30)	
	Anpu		ip	36 35.7	-	-	-	-	-	-	-	-	-	14.3	O		
	Hsinchu		ep	36 36.5	-	-	-	1375	1200	-	1.2	1.3	-	18.9	II		







# 地震季報

第十二卷 第三號

中華民國五十四年七、八、九月

## SEISMOLOGICAL BULLETIN

July to September 1965

VOL. 12 No. 3

臺灣省氣象局

PUBLISHED QUARTERLY BY

TAIWAN WEATHER BUREAU

64 KUNG YUAN ROAD, TAIPEI, TAIWAN, CHINA



General Aspect of Earthquakes

from July to September, 1965

The number of earthquakes occurred from July to September, 1965 is 225. Among them, 28 shocks including 7 small felt area and 21 local ones are felt by men. As we can see from the distribution map, 4 of the small felt area earthquakes occurred in Hwalien district, 2 in Hengchun district and 1 in Northern district.

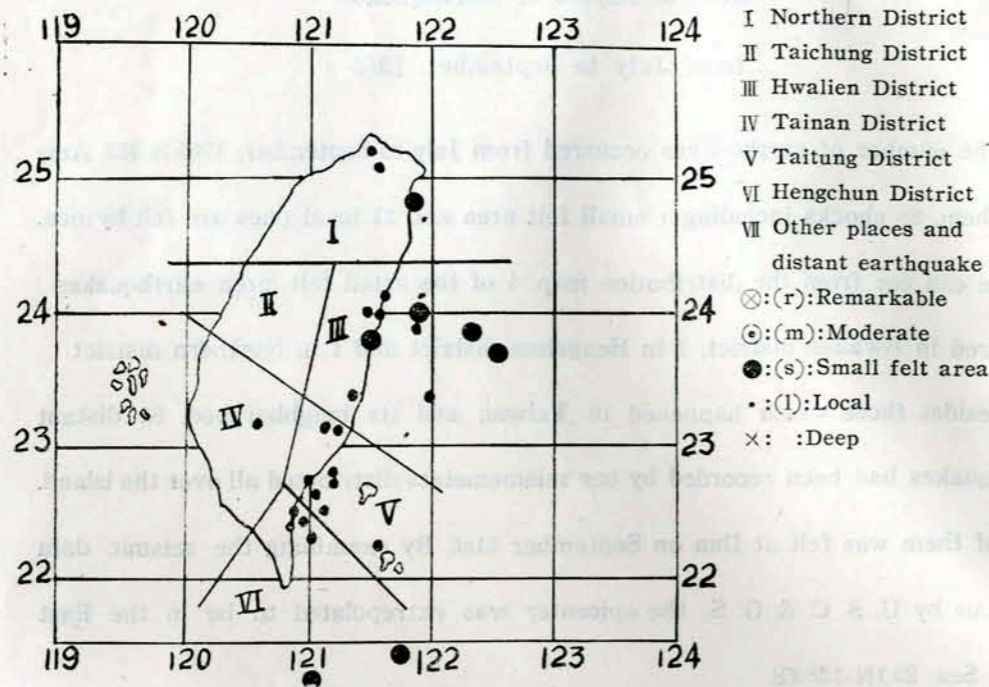
Besides those which happened in Taiwan and its neighborhood, 81 distant earthquakes had been recorded by our seismometers distributed all over the island. One of them was felt at Ilan on September 21st. By examining the seismic data given us by U. S. C. & G. S., the epicenter was extropolated to be in the East China Sea, 29.1N 128.2E.

The data of those major earthquakes had all been listed in the latter part of the bulletin.

No.	Date	Time	Location	Magnitude	Intensity	Remarks
1	7-1	10:00	...	...	...	...
2	7-2	...	...	...	...	...
...	...	...	...	...	...	...
225	9-21	...	...	...	...	...
						Total
						225



Epicenters of Felt Earthquakes from July to September 1965



Number of earthquakes classified according to its magnitude and districts July to September 1965

Classification	Number of felt earthquakes					Number of unfelt earthquakes	Total
	Remarkable	Moderate	Small felt area	Local	Total		
Districts							
Northern District	—	—	1	2	3	28	31
Taichung "	—	—	—	—	0	15	15
Hwalien "	—	—	4	6	10	60	70
Tainan "	—	—	—	1	1	7	8
Taitung "	—	—	—	8	8	72	80
Hengchun "	—	—	2	4	6	15	21
Total	0	0	7	21	28	197	225
Other places	1	—	—	—	1	80	81

Felt Earthquakes Occurred from July to September, 1965

No	Month	P. (G. M. T.)			Mag-nitude	Epicenter	Latitude	Longitude	Depth
		d.	h.	m.					
56	July	2	11	42	(L)	Near Tawu	N.	E.	kms.
57	"	7	14	24	"	About 40km. ESE. of Tainan			20
58	"	10	06	55	"	About 25km. E. of Hwalien			15
59	"	10	21	27	"	About 10km. SSE. of Taitung			20
60	"	11	07	18	"	Near Tawu			0
61	"	11	07	25	"	About 15km. NNE. of Tawu			0
62	"	11	07	28	"	About 15km. ESE. of Tawu			0
63	"	11	08	27	"	Near Tawu			0
64	"	11	09	27	"	About 15km. E. of Tawu			0
65	"	24	08	39	"	Near Anpu			
65	"	24	08	42	"	"			
67	"	25	03	43	(S)	About 20km. SSW. of Hwalien	23.8	121.5	25
68	"	27	16	18	"	About 27km. ENE. of Hwalien	24.0	121.9	45
69	"	29	06	32	(L)	Near Hwalien			
70	"	30	05	00	"	Near Hwalien			
71	Aug.	13	11	57	(S)	About 100km. ESE. of Hwalien	122.5	23.7	55
72	"	20	22	08	"	About 85km. ESE. of Hwalien	122.4	23.9	40
73	"	23	07	10	(L)	About 15km. NNE. of Hwalien			
74	"	23	18	45	"	About 70km. ENE. of Hsinkong			10
75	"	29	22	39	"	Near Taitung			
76	Sep.	4	12	58	"	About 20km. N. of Hsinkong			20
77	"	5	23	02	(S)	About 157km. SE. of Hengchun	20.9	121.6	60
78	"	6	03	18	"	About 150km. SE. of Hengchun	21.1	121.8	20
79	"	10	10	35	(L)	About 15km. WSW. of Hsinkong			10
80	"	14	21	01	"	About 30km. NNE. of Tawu.			
81	"	16	19	29	"	Near Lanyu.			
82	"	21	01	49	"	East China Sea.	29.1	128.2	
83	"	26	17	10	(L)	About 15km. WSW. of Hsinkong			
84	"	27	00	11	(S)	About 20 km. ENE. of Ilan.	24.9	121.9	5



## Unfelt Earthquakes Occurred from July to September, 1965

No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
		d.	h.	m.				d.	h.	m.	
593	July	1	02	17	Near Alishan.	627	July	11	09	00	Near Tawu.
594	"	1	08	26	About 46km. S. of Hwalien.	628	"	12	02	21	Taitung district.
595	"	1	23	31	(d)	629	"	12	02	43	"
596	"	2	21	08	(d)	630	"	12	06	46	"
597	"	3	11	30	(d)	631	"	12	08	47	"
598	"	4	12	00	Taichung district.	632	"	12	23	01	Hwalien district.
599	"	4	16	56	Near Hwalien.	633	"	13	00	41	Near Alishan
600	"	6	02	27	Hwalien district.	634	"	13	02	09	Northern district.
601	"	6	03	31	(d)	635	"	13	02	20	Near Tawu.
602	"	6	04	37	Taitung district.	636	"	13	02	43	"
603	"	6	05	47	Near Hwalien.	637	"	13	23	01	Hwalien district.
604	"	6	09	28	About 38km. SE. of Tawu.	638	"	14	01	29	"
605	"	6	18	43	(d)	639	"	14	03	06	"
606	"	6	22	07	Taitung district.	640	"	14	09	39	Northern district.
607	"	6	23	48	"	641	"	14	11	19	Tainan district.
608	"	7	06	07	Northern district.	642	"	14	14	21	Near Hsinkong
609	"	7	14	46	About 38km. ENE. of Tainan.	643	"	15	18	36	(d)
610	"	7	19	15	Taitung district.	644	"	15	18	39	Hengchun district.
611	"	7	19	42	(d)	645	"	16	18	50	Near Hsinkong.
612	"	8	07	23	About 35km. NNW. of Hsinkong.	646	"	17	05	53	Near Alishan.
613	"	8	20	05	Hwalien district.	647	"	17	07	29	(d)
614	"	9	00	46	Taitung district.	648	"	17	12	56	(d)
615	"	9	00	53	(d)	649	"	18	05	38	(d)
616	"	9	9	24	(d)	650	"	18	22	20	Hengchun district.
617	"	9	19	02	Near Alishan.	651	"	18	22	25	(d)
618	"	10	04	42	(d)	652	"	18	23	21	Taitung district.
619	"	10	06	39	Near Hwalien.	653	"	19	06		(d)
620	"	10	06	40	"	654	"	19	13	09	Taitung district.
621	"	10	08	07	"	655	"	19	19	22	Near Alishan.
622	"	11	01	34	"	656	"	20	13	22	(d)
623	"	11	03	07	Hwalien district.	657	"	20	19	21	About 83km. ENE of Hsinkong
624	"	11	07	29	Near Tawu	658	"	21	03	03	(d)
625	"	11	07	31	"	659	"	21	14	01	Hwalien district.
626	"	11	08	28	"	660	"	21	18	00	(d)

No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
		d.	h.	m.				d.	h.	m.	
661	July	21	19	25	About 70km. NE of Hwalien.	696	Aug.	1	05	27	Near Hwalien
662	"	21	21	38	Taitung district.	697	"	1	06	18	Taitung district.
663	"	22	13	50	Near Hsinkong	698	"	1	15	08	(d)
664	"	22	15	35	"	699	"	1	20	14	(d)
665	"	22	15	38	About 75km. E. of Ilan	700	"	2	01	55	Hwalien district.
666	"	23	23	01	Taitung district.	701	"	2	06	18	Taitung district.
667	"	24	08	43	Near Anpu.	702	"	2	13	32	(d)
668	"	25	02	03	Taitung district.	703	"	3	06	34	(d)
669	"	25	03	53	About 20km. SSw. of Hwalien.	704	"	3	19	35	Near Hsinkong.
670	"	25	04	13	"	705	"	5	00	15	(d)
671	"	25	04	17	"	706	"	5	00	26	Hengchun district.
672	"	25	05	35	About 50km. ENE. of Tainan.	707	"	5	07	24	About 30km. SSE. of Ilan.
673	"	25	15	27	About 18km. WNW. of Hwalien.	708	"	6	16	02	About 20km. WSW. of Alishan.
674	"	26	11	15	Near Hwalien	709	"	6	16	52	Near Alishan.
675	"	26	14	43	Hwalien district.	710	"	6	20	22	Near Yushan.
676	"	26	23	04	(d)	711	"	6	22	00	"
677	"	27	00	40	(d)	712	"	7	09	21	"
678	"	27	09	53	Taitung district.	713	"	7	16	10	Hengchun ditrict.
679	"	27	14	44	Near Hsinkong.	714	"	7	20	46	Near Lanyu.
680	"	28	00	51	Near Lanyu.	715	"	8	10	40	Near 15km. NNE. of Alishan.
681	"	28	02	41	"	716	"	8	17	26	About 50km. E. of Tainan.
682	"	28	22	36	(d)	717	"	9	14	30	Hwalien district.
683	"	29	01	39	Hwalien district.	718	"	10	02	51	About 110km. ENE. of Hwalien.
684	"	29	07	19	Taichung district.	719	"	10	21	39	Taichung district.
685	"	29	08	39	(d)	720	"	11	03	50	(d)
686	"	29	09	38	About 17km. ENE. of Hsinkong.	721	"	11	20	02	Hwalien district.
687	"	30	13	22	Northern district.	722	"	11	22		(d)
688	"	30	18	56	Taitung district.	723	"	11	22	41	(d)
689	"	30	20	50	(d)	724	"	11	23	55	Near Hsinkong.
690	"	31	07	41	(d)	725	"	12	08	11	(d)
691	"	31	15	16	Taitung district.	726	"	12	13	05	(d)
692	"	31	17	13	(d)	727	"	12	18	15	(d)
693	"	31	19	11	(d)	728	"	13	11	35	(d)
694	"	21	21	55	(d)	729	"	13	12	50	(d)
695	Aug.	1	01	46	Near Hwalien.	730	"	13	13	56	About 50km. ESE. of Ilan.



No.	Month	P.			Epicenter	No.	Month	P.			Epicenter
		(G.	M.	T.)				(G.	M.	T.)	
731	Aug.	d.	h.	m.							
		13	18	06	(d)	766	Aug.	d.	h.	m.	Near Hsinkong.
732	"	14	00	50		767	"	26	09	51	"
733	"	14	23	47	About 35km. ENE. of Hsinkong.	768	"	27	07	38	"
734	"	15	12	34	About 188km. ESE. of Hengchun.	769	"	27	15	45	Near Lanyu.
735	"	15	22	29		770	"	27	19	02	Northern district.
736	"	16	08	29		771	"	27	20	27	Near Lanyu.
737	"	16	12	15	Near Lanyu.	772	"	27	22	30	Near Hsinkong.
738	"	16	12	58	(d)	773	"	28	07	25	Near Taipei
739	"	17	05	45	Taitung district.	774	"	28	21	52	Near Hsinkong.
740	"	17	05	29	Near Hsinkong.	775	"	29	12	56	(d)
741	"	17	07	39	(d)	776	"	30	03	42	(d)
742	"	17	10	41	(d)	777	"	30	09	15	Near Hsinkong.
743	"	18	00	10	Near Ilan.	778	"	30	09	19	Taitung district.
744	"	18	19	56	About 50m. ENE. of Tainan.	779	"	30	18	43	Near Lanyu.
745	"	19	07	49	Near Hwalien.	780	"	30	23	05	Taitung district.
746	"	20	00	20	About 30km. E. of Hsinkong.	781	"	30	23	09	Near Hsinkong.
747	"	20	06	00	(d)	782	"	31	07	42	(d)
748	"	20	21	33	(d)	783	Sep.	1	06	48	(d)
749	"	21	00	10	About 85km. ESE. of Hwalien.	784	"	1	14	14	Northern district.
750	"	21	15	19	(d)	785	"	2	01	57	Near Hsinkong.
751	"	21	16	55	Taichung district.	786	"	2	04	35	(d)
752	"	22	17	37	Hwalien district.	787	"	2	13	37	Hwalien district.
753	"	22	23	25	Near Hsinkong.	788	"	2	19	40	(d)
754	"	23	14	04	About 74km. ENE. of Ilan.	789	"	4	07	35	Near Hwalien.
755	"	23	20	01	(d)	790	"	4	10	26	(d)
756	"	24	02	38	Near Lanyu.	791	"	4	14	43	(d)
757	"	23	18	42	(d)	792	"	4	16	03	Taitung district.
758	"	24	02	50	About 30km. ESE. of Hwalien.	793	"	4	17	22	Hwalien district.
759	"	24	03	27	Hwalien district.	794	"	5	13	19	Near Hsinkong.
760	"	24	10	35	Northern district.	795	"	5	23	06	Near Lanyu.
761	"	24	13	33	(d)	796	"	6	01	57	Taitung district.
762	"	24	22	43	Near Hwalien	797	"	6	02	56	About 178km. SE. of Hengchun.
763	"	25	06	00	About 35km. NNE. of Hsinkong.	798	"	6	03	14	Hengchun district.
764	"	26	00	25	Hwalien district.	799	"	6	04	04	About 150km. SE. of Hengchun.
765	"	26	06	46	Near Hsinkong.	800	"	6	06	12	Hwalien district.

No.	Month	P.			Epicenter	No.	Month	P.			Epicenter
		(G.	M.	T.)				(G.	M.	T.)	
		d.	h.	m.							
801	Sep.	6	06	23	Near Lanyu.	836	Sep.	d.	h.	m.	About 42km. E. of Taipei.
802	"	6	07	53	Hwalien district.	837	"	17	13	07	(d)
803	"	6	20	10	Taitung district.	838	"	17	14	27	(d)
804	"	7	07	02	(d)	839	"	17	15	23	(d)
805	"	8	06	57	Northern district.	840	"	17	16	25	(d)
806	"	8	11	57	About 65km. ESE. of Ilan.	841	"	18	06	10	Taitung district.
807	"	8	12	50	Hwalien district.	842	"	18	07	17	Near Hsinkong.
808	"	9	04	49	(d)	843	"	18	22	07	(d)
809	"	9	10	43	(d)	844	"	18	22	27	Northern district.
810	"	9	12	28	About 27km. WNW. of Hsinkong.	845	"	18	22	34	"
811	"	10	10	48	Taitung district.	846	"	19	01	38	(d)
812	"	10	11	01	Near Hsinkong.	847	"	19	13	30	Hwalien district.
813	"	10	14	02	"	848	"	19	18	31	About 15km. E. of Ilan.
814	"	10	17	12	"	849	"	20	09	40	Taitung district.
815	"	10	20	39	Hwalien district.	850	"	20	10	01	(d)
816	"	10	21	48	Taitung district.	851	"	20	14	43	About 40km. ESE. of Tainan.
817	"	10	22	04	Near Alishan.	852	"	20	17	38	(d)
818	"	11	07	00	(d)	853	"	20	23	55	(d)
819	"	11	07	51	Taitung district.	854	"	21	01	40	(d)
820	"	11	14	29	About 35km. ENE. of Tawu.	855	"	21	23	45	Hwalien district.
821	"	11	17	23	About 184km. E. of Hsinkong.	856	"	22	00	40	"
822	"	12	03	59	Northern district.	857	"	22	00	46	"
823	"	12	08	48	(d)	858	"	22	04	29	(d)
824	"	12	22	12	(d)	859	"	22	04	05	Hengchun district.
825	"	13	09	05	Near Lanyu.	860	"	22	09	41	(d)
826	"	13	13	16	(d)	861	"	22	12	52	(d)
827	"	14	08	31	(d)	862	"	22	22	12	(d)
828	"	14	16	01	Hengchun district.	863	"	23	23	15	Near Anpu.
829	"	14	22	49	Northern district.	864	"	23	23	31	"
830	"	15	22	00	Near Taipei.	865	"	23	23	32	"
831	"	16	04	56	Near Hwalien.	866	"	24	02	51	Near Hsinkong.
832	"	14	04	56	Near Hwalien.	867	"	24	23	59	(d)
833	"	16	13	54	(d)	868	"	25	14	42	(d)
834	"	16	17	02	About 36km. ENE. of Hwalien.	869	"	25	16	57	(d)
835	"	16	19	16	Near Hsinkong.	870	"	25	21	51	Near Hsinkong.



No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
871	Sep.	d.	h.	m.	Hwalien district.	874	Sep.	d.	h.	m.	About 44km. ESE. of Ilan.
872	"	26	21	53		875	"	28	07	53	About 94km. SE. of Hwalien.
873	"	27	03	13	Near Hwalien.			30	09	04	
		28	05	18	(d)						

Major Earthquakes Occurred in July, 1965

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			Period			P~S Intensity	Epicenter & Remarks
					N	E	Z	N	E	Z	N	E	Z		
1	Taipei	2	ep	21 08 29.4	μ	μ	μ	μ	μ	μ	s	s	s	m s	7 16.5 O U. S. C. G. S.
	Ilan		ep	08 29.5											8 10.6 O 53.1N 167.7W
	Aupu		ip	08 35.1											8 02.9 O Fox Islands
	Hwalien		p	08 47.1											7 59.4 O Aleution
	Yushan		ep	08 47.0											8 15.7 O Islands
	Taichung		ep	08 49.1											8 09.2 O
	Tawu		ep	08 51.6											8 12.1 O
	Hengchun		p	09 07.3											8 04.4 O
	Taitung		ep	09 09.0											7 07.0 O
	Hsinkong		p	09 47.7											8 09.1 O
	Kaohsiung		ep	10 00.0											O
2	Taitung	3	ep	11 30 01.0											6 40.9 O U. S. C. G. S.
	Tawu		p	30 20.7											O 22.6N 101.4E
	Anpu		ip	30 29.8											3 40.2 O Burma-
	Hengchun		ep	33 48.2											O China
	Taichung		ep	33 53.8											2 16.6 O Border
	Yushan		p	34 00.0											O Region
	Tainan		ep	34 40.5											O
	Kaoshiung		ep	34 55.0											O
	Alishan		ep	34 58.3											O
	Ilan		p	36 05.6											1 00.2 O
	Hwalien		ep	36 08.8											O
	Taipei		p	36 09.2											O
3	Ilan	6	ep	18 43 59.2											5 59.1 O U. S. C. G. S.
	Hengchun		ep	44 00.0											O 4.5S 155.1E
	Hwalien		p	44 07.2											4 49.5 O Soiomon

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			Period			P~S Intensity	Epicenter & Remarks
					N	E	Z	N	E	Z	N	E	Z		
	Anpu		ip	h. m. s.	μ	μ	μ	μ	μ	μ	s	s	s	m s	5 53.2 O Islands
	Taipei		ep	44 11.9											5 53.3 O
4	Ilan	15	ep	18 36 04.6											3 50.2 O U. S. C. G. S.
	Hsinkong		p	36 41.0											O 7.7N 123.8E
	Hengchun		ep	36 42.8											O Mindanao
	Yushan		p	36 45.8											O Philippine
	Alishan		ep	36 47.4											O Islands
	Taichung		ep	36 55.2											O
	Hwalien		p	36 55.6											2 41.1 O
	Anpu		ip	37 03.0											2 45.5 O
	Taipei		ep	37 04.8											O
5	Tawu	20	ep	13 22 04.3											O U. S. C. G. S.
	Taitung		ep	22 07.3											7.5N 124.3E
	Anpu		ip	22 33.7											1 57.5 O Mindanao
															3 19.3 O Philippine Islands
	Hwalien	25	ip	03 43 39.6	E	9.6 +	3.1 +	18.4	1100	1700	1000	2.2	2.6	2.6	5.8 III About 20km.
	Yushan		ep	43 42.6											8.4 I SSW. of
	Hsinkong		ip	43 45.5	C	5.0 +	7.5 +	7.7	141	111	83	0.1	0.1	0.1	10.2 I Hwalien
	Alishan		ep	43 47.8											11.0 I 121.5E 23.8N
	Taichung		ip	43 49.1	D	12 +	25 -	13	188	318	205	3.1	4.1	2.5	10.1 I (H=25)
	Taitung		ep	43 49.1											18.0 O
	Ilan		ip	43 52.5	E	13 +	9 +	10	316	208	208	2.0	2.0	1.8	13.5 II
	Hsinchu		ep	43 56.0											15.6 O
	Anpu		ip	43 56.2											28.8 O
	Taipei		p	43 58.0					145	100	80	1.0	1.0	1.2	13.2 I
	Lanyu		ep	43 59.7											O
	Tawu		ep	43 59.8											22.3 O
	Tainan		ep	44 01.3											18.2 O
	Hengchun		p	44 09.9											25.6 O
	Kaoshiung		ep	44 20.0											O
	Hwalien	27	ip	16 17 07.1	D	5.5 -	7.4 -	128.0	510	500	145	1.0	1.1	1.6	6.3 II About 27km.
	Taitung		p	17 55.7											22.0 O ENE. of
	Yushan		ep	18 01.0											12.0 I Hwalien

Handwritten notes and corrections in blue ink:

- 25 JULY
- 27 JULY
- Annotations: HWA, YUS, HSI, ALS, TCU, TIN, ILA, HSN, ANP, TAP, LAY, TAW, TAI, HEN, KAU
- Amplitude corrections: E 9.6 + 3.1 + 18.4, C 5.0 + 7.5 + 7.7, D 12 + 25 - 13, E 13 + 9 + 10, D 5.5 - 7.4 - 128.0
- Remarks: About 20km., SSW. of Hwalien, 121.5E 23.8N (H=25), About 27km. ENE. of Hwalien
- Intensity/Amplitude values: 5.8 III, 8.4 I, 10.2 I, 11.0 I, 10.1 I, 18.0 O, 13.5 II, 15.6 O, 28.8 O, 13.2 I, 22.3 O, 18.2 O, 25.6 O, 6.3 II, 22.0 O, 12.0 I
- Other values: 4345, 4359, 4425, 4435, 1713





No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			Period			P~S Intensity	Epicenter & Remarks	
					N	E	Z	N	E	Z	N	E	Z			
HSI	Hsinkong		ep	h. m. s. 18 02.4	μ	μ	μ	μ	μ	μ	s	s	s	m	s	121.9E 24.0N
ICA	Ilan		p	18 04.8				105	102	65	2.0	2.0	1.7	8.0	I	(H=45)
ALS	Alishan		p	18 05.0										11.0	I	
TCW	Taichung		ep	18 05.3										12.6	O	18 18
TAP	Taipei		ip	18 09.0	e	-	+ 10	95	90	35	0.8	0.8	0.6	15.4	I	S
ANP	Anpu		ip	18 09.5										21.5	O	18 31
HSN	Hsinchu		ep	18 15.0											O	
TAW	Tawu		ep	18 16.4										22.0	O	S
HEN	Hengchun		p	18 26.3										25.2	O	18 52
CAY	Lanyu		p	18 41.7										21.3	O	
KAU	Kaoshiung		ep	18 42.5											O	
8	Anpu	27	ip	08 39 04.0	+	4.0	+ 2.6	- 1.3						- 8	42.0	O U. S. C. G. S.
	Taipei		p	39 09.2										- 11	56.3	O 51.2N 171.3W
	Hwalien		p	39 13.0										- 7	57.0	O Fox Islands
	Ilan		ep	39 13.2												O Aleautian
	Tawu		p	39 16.4												O Islands
	Yushan		p	39 17.0												O
	Taichung		ep	39 17.7										- 8	00.0	O
	Hengchun		ep	89 21.1												O
	Taitung		ep	39 21.3										- 7	56.2	O
	Alishan		ep	39 24.4												O
	Tainan		ep	39 37.2												O

Major Earthquakes Occurred in August, 1965

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			Period			P~S Intensity	Epicenter & Remarks	
					N	E	Z	N	E	Z	N	E	Z			
1	Hengchun	2	ep	h. m. s. 13 32 28.0	μ	μ	μ	μ	μ	μ	s	s	s	m	s	O U. S. C. G. S.
	Anpu		ip	32 37.8										- 10	22.2	O 56.2S 158.2E
	Tawu		p	32 38.5												O Macquarie
	Taitung		ep	32 40.0										- 5	10.0	O Island
	Taipei		ep	32 41.8										- 11	33.0	O Region
	Taichung		ep	32 46.0												O

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			Period			P~S Intensity	Epicenter & Remarks	
					N	E	Z	N	E	Z	N	E	Z			
	Ilan		ep	h. m. s. 32 48.0	μ	μ	μ	μ	μ	μ	s	s	s	m	s	10 17.5 O
	Hwalien		ep	33 03.2												O
2	Tawu	5	p	00 15 27.7												O (d)
	Alishan		ep	15 41.0												O
	Taitung		p	22 00.0												O
3	Tawu	11	ep	03 50 55.4												O U. S. C. G. S.
	Hengchun		ep	51 00.0												O 15.4S 166.9E
	Yushan		p	51 01.0												O New
	Hwalien		p	51 01.8										- 8	10.8	O Hberides
	Taipei		ep	51 06.6										- 8	11.4	O Islands
	Ilan		ep	51 16.7										- 8	17.4	O
	Taichung		ep	51 18.0												O
	Taitung		ep	50 59.9										- 8	00.1	O
4	Hengchun	11	ep	22 41 46.0												O U. S. C. G. S.
	Hsinkong		ep	41 47.5										- 8	8.9	O 15.8S 16.7E
	Tawu		ep	41 50.8												O New
	Taitung		ep	41 52.8										- 5	20.3	O Hebrides
	Yushan		p	41 52.8												O Islands
	Hwalien		p	41 53.7										- 8	12.5	O
	Ilan		ep	41 57.5										- 6	22.5	O
	Taipei		ep	42 00.0										- 8	12.0	O
	Taichung		ep	42 03.2										- 8	6.5	O
	Alishan		ep	42 04.2										- 8	19.7	O
5	Taitung	12	ep	08 11 50.3										- 8	9.7	O U. S. C. G. S.
	Hwalien		p	11 53.0										- 8	12.1	O New Hebrides
	Taipei		ep	12 06.0										- 8	8.0	O Islands
6	Hengchun	12	ep	13 05 00.8												O U. S. C. G. S.
	Taitung		ep	05 02.2										- 6	15.0	O 5.3S 152.2E
	Tawu		ep	05 02.2												O New
	Anpu		ip	05 03.0										- 9	49.5	O Britain
	Taipei		ep	05 03.8										- 6	34.0	O Region







No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			period			P~S	intensity	Epicenter & Remarks
					N	E	Z	N	E	Z	N	E	Z			
<b>5<sup>th</sup> SEPT 65</b>																
HEN TAW TTN HSI LAY TAI KAU HWA ALS ILA TCU ANP TAP	2 Hengchun	5 ep	23 02 12.0	h. m. s.	μ	μ	μ	164	127	75	02 28	16.0	I	About		
	Tawu	ep	02 13.2									18.0	O	157km.		
	Taitung	ep	02 14.0											O SE. of		
	Hsinkong	p	02 22.3									32.4	O	Hengchun		
	Lanyu	p	02 26.5									13.5	O	121.6E 20.9N		
	Tainan	p	02 27.2											O (H=60)		
	Kaohsiung	p	02 37.0											O		
	Hwalien	p	02 42.9									03 29	35.7	O		
	Alishan	ep	02 53.7										14.5	O		
	Ilan	ep	02 54.8										40.8	O		
Taichung	ep	02 56.6									03 46	39.6	O			
Anpu	ep	02 58.5									03 05	6.5	O			
Taipei	ep	03 32.0										27.0	O			
<b>6<sup>th</sup> SEPT 65</b>																
TTN HEN TAW HSI LAY TAI ALS HWA KAU TCU TAP ANP HSN	3 Taitung	6 ep	03 18 44.5											O About		
	Hengchun	ip	18 55.6	E 2.9 - 2.4 + 3.2	509	500	338	2.1	1.13			17.4	O	150km.		
	Tawu	p	18 56.0			95	116	131	3.7	4.0	3.0	17.3	O	SE. of		
	Hsinkong	ep	19 08.1									11.1	O	Hengchun		
	Lanyu	ip	19 09.7	E 300 + 350 + 500								13.3	I	121.8E 21.1N		
	Tainan	ep	19 10.8									25.2	O	(H=20)		
	Alishan	ep	19 15.7										34.8	O		
	Hwalien	p	19 23.2			123	58					49 50	27.1	O		
	Kaohsiung	ep	19 30.0											O		
	Taichung	ep	19 32.7									19 49	15.9	O		
Taipei	ep	19 36.6										51.5	O			
Anpu	ip	19 39.0											O			
Hsinchu	ep	20 43.3										50.8	O			
4 Taitung	11 ep	07 00 16.1										7 59.6	O	U. S. C. G. S.		
Tawu	ep	00 45.8												O 5.3S 153.0E		
Hengchun	ep	00 52.8												O New		
Hwalien	p	00 53.2											6 20.0	O Britian		
Anpu	ip	00 58.0											9 18.0	O Region		
Taipei	ep	07 22.2												O		
Ilan	ep	00 47.5												O		

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			Period			P~S	intensity	Epicenter & Remarks
					N	E	Z	N	E	Z	N	E	Z			
<b>SEPT 27 65</b>																
5	Ilan	12 ep	08 48 14.6	h. m. s.	μ	μ	μ	μ	μ	μ						O U. S. C. G. S. 6.3S 151.6E
	Anpu	p	48 15.2											6 21.8	O	New Britian Region
	Taipei	ep	54 32.5											3 15.5	O	
6	Taitung	12 ep	22 12 18.8											7 56.5	O	U. S. C. G. S. 6.4S 70.8E
	Tawu	p	12 20.2												O	Chagos Archipelago
	Anpu	ip	12 31.7											8 7.3	O	Region
	Taipei	ep	19 14.0												O	
7	Taitung	14 ep	08 31 12.7											4 00.0	O	U. S. C. G. S. 8.4N 126.8E
	Ilan	ep	31 19.3											3 6.1	O	Mindanao Philippine Islands
	Anpu	ip	31 20.0											3 22.0	O	
	Taipei	ep	34 31.3												O	
8	Alishan	17 ep	16 25 06.7											4 59.4	O	U. S. C. G. S.
	Ilan	ep	25 43.2											4 22.6	O	36.3N 141.2E
	Taipei	ep	25 47.9											3 46.0	O	Near East
	Anpu	ip	25 51.3											4 02.7	O	Coast of
	Hwalien	p	26 01.2											4 08.9	O	Honshu
	Hsinkong	ip	26 06.9											3 58.6	O	Japan
	Taitung	ep	26 07.6											4 6.0	O	
	Tawu	ep	26 12.2											4 1.4	O	
	Hengchun	ep	26 23.7											3 0.9	O	
	Taichung	ep	26 30.7											4 8.2	O	
Tainan	ep	30 16.1												O		
Kaohsiung	ep	30 28.0												O		
9	Taitung	18 p	22 06 28.9											42 3.8	O	U. S. C. G. S. 8.2N 126.8E.
	Taipei	p	07 10.9												O	Mindanao Philippine Islands
	Anpu	ip	07 17.6											3 17.4	O	
	Hwalien	ep	07 24.1												O	
<b>SEPT 21 65</b>																
ANP ILA TAP HWA	Anpu	21 ip	01 40 13.8	E 68 - 85 + 93										1 3.2	O	U. S. C. G. S.
	Ilan	ip	40 14.3	E 10 - 10 + 8	285	250	125	3.9	3.3	3.7	50.8	I	29.1N 128.2E			
	Taipei	p	40 16.4	E 40 - 70 + 20	710	430		11.8	13.0		17.9	O	East China			
Hwalien	p	40 18.1			135	116	58	4.1	4.3	8.5	1 2.0	O	Sea			

4117  
4120





**SEPT 27 CONTN**

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			Period			P~S	Intensity	Epicenter & Remarks	
					N	E	Z	N	E	Z	N	E	Z				
HSI	Hsinkong		p	40 26.6	μ	μ	μ	μ	μ	μ	s	s	s	m	s	1 5.2 O	S
TCU	Taichung		p	40 29.4	-	-	-	-	-	-	-	-	-	-	-	-1 37.3 O	4207
ALS	Alishan		p	40 32.4	-	-	-	-	-	-	-	-	-	-	-1 32.0 O		
TTN	Taitung		p	40 33.8	-	-	-	-	-	-	-	-	-	-	-	0	
YUS	Yushan		p	40 33.9	-	-	-	-	-	-	-	-	-	-1 26.4 O			
TAW	Tawu		ep	40 39.6	-	-	-	-	-	-	-	-	-	-2 01.4 O			
TAI	Tainan		ep	42 46.2	-	-	-	-	-	-	-	-	-	-	-	0	
HEN	Hengchun		p	40 47.0	+ 8.3	+ 4.8	- 7.5	77	95	38	4.0	4.0	-2	12.0 O		S	
LAY	Lanyu		p	40 57.5	-	-	-	-	-	-	-	-	-	-1 3.04 O			
KAU	Kaohsiung		ep	42 55.0	-	-	-	-	-	-	-	-	-	-	-	0	

11	Hengchun	22	ep	04 29 23.5	-	-	-	-	-	-	-	-	-	-	-	0 U. S. C. G. S.	
	Taitung		p	29 24.0	-	-	-	-	-	-	-	-	-	-6	15.6 O	20.8N 99.3E	
	Tawu		ep	29 26.0	-	-	-	-	-	-	-	-	-	-	-	0 Burma	
	Alishan		ep	29 28.8	-	-	-	-	-	-	-	-	-	-9	1.8 O		
	Hsinkong		p	29 31.4	-	-	-	-	-	-	-	-	-	-6	24.3 O		
	Taichung		ep	29 33.3	-	-	-	-	-	-	-	-	-	-5	58.9 O		
	Anpu		ip	29 34.1	-	-	-	-	-	-	-	-	-	-4	2.9 O		
	Ilan		ep	29 36.0	-	-	-	-	-	-	-	-	-	-6	16.8 O		
	Taipei		ep	29 36.5	-	-	-	-	-	-	-	-	-	-	-	0	
	Hwalien		p	29 36.8	-	-	-	100	-	-	3.7	-	-	-5	48.3 O		

12	Anpu	22	ip	22 12 34.3	- 2.7	- 2.7	+ 4.0	-	-	-	-	-	-	-4	15.7 O	U. S. C. G. S.
	Ilan		ep	12 38.3	-	-	-	-	-	-	-	-	-	-4	38.4 O	36.4N 141.3E
	Taipei		ep	12 42.0	-	-	-	-	-	-	-	-	-	-4	24.0 O	Near East
	Hsinkong		p	12 48.5	-	-	-	-	-	-	-	-	-	-	-	0 Coast of
	Tawu		ep	12 54.4	-	-	-	-	-	-	-	-	-	-	-	0 Honshu
	Taitung		ep	12 55.3	-	-	-	-	-	-	-	-	-	-4	2.0 O	Japan
	Hengchun		ep	13 03.3	-	-	-	-	-	-	-	-	-	-	-	0
	Taichung		ep	12 17.9	-	-	-	-	-	-	-	-	-	-	-	0

**SEPT 27**

ILA	Ilan	27	ip	00 11 41.1	e	5-	6+	20	386	266	130	1.5	1.5	1.7	2.5	II 20km. ENE.
TAP	Taipei		ip	11 52.0	e	6-	10+	22	-	-	-	-	-	-	6.5	O of Ilan
HWA	Hwalien		p	11 54.6	-	-	-	-	32	-	-	-	-	-	7.7	I 121.9E 24.9N
TCU	Taichung		ep	12 06.9	-	-	-	-	-	-	-	-	-	-	14.9	O (H ÷ 5)

SEPT 27 Contn.

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximun Amplitude			Period			P~S	Intensity	Epicenter & Remarks
					N	E	Z	N	E	Z	N	E	Z			
ALS	Alishan		ep	12 09.0	μ	μ	μ	μ	μ	μ	s	s	s	m	s	20.5 O
YUS	Yushan		p	12 10.8	-	-	-	-	-	-	-	-	-	-	-	22.3 O
TTN	Taitung		ep	12 21.5	-	-	-	-	-	-	-	-	-	-	-	0
TAW	Tawu		ep	12 45.3	-	-	-	-	-	-	-	-	-	-	-	0
HEN	Hengchun		ep	13 05.8	-	-	-	-	-	-	-	-	-	-	-	0





# 地震季報

第十二卷 第四號

中華民國五十四年十、十一、十二月

## THE SEISMOLOGICAL BULLETIN OF TAIWAN WEATHER BUREAU

*for*

October-December 1965

VOL. 12 No. 4

臺灣省氣象局

PUBLISHED QUARTERLY BY

TAIWAN WEATHER BUREAU

64, KUNG YUAN ROAD, TAIPEI, TAIWAN, CHINA



**General Aspect of Earthquakes**

From October to December, 1965.

The number of earthquakes occurred during the period from October to December 1965 is 333. Among them, there are 62 felt earthquakes (including 4 small felt area and 58 local ones) and 271 unfelt ones. The epicenters of the four small felt earthquakes are all in Hwalien district. And most of the local ones are concentrated in the vicinities of Hwalien and Lanyu, a small island southeast of Taiwan, where a seismometer has been installed.

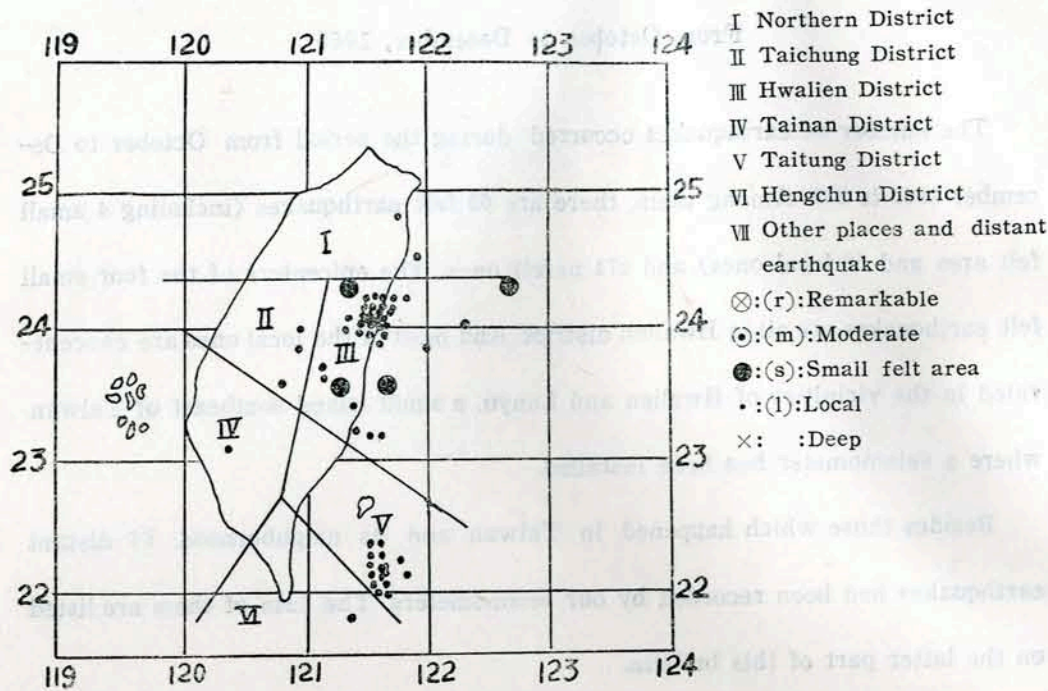
Besides those which happened in Taiwan and its neighborhood, 66 distant earthquakes had been recorded by our seismometers. The data of them are listed on the latter part of this bulletin.

Number of earthquakes recorded according to districts October to December 1965

District	Number of felt earthquakes		Number of unfelt earthquakes		Total
	Small felt area	Local	Small felt area	Local	
Keelung	0	0	0	0	0
Yilan	0	0	0	0	0
Hualien	4	54	0	0	58
Yuli	0	0	0	0	0
Tainan	0	0	0	0	0
Hsinchu	0	0	0	0	0
Total	4	54	0	0	58
Other places	0	0	0	0	0



Epicenters of Felt Earthquakes from October to December 1965



Number of earthquakes classified according to it's magnitude and districts October to December 1965

Classification	Number of felt earthquakes					Number of unfelt earthquakes	Total	
	Magnitudes	Remarkable	Moderate	Small felt area	Local			Total
Districts								
Northern District		—	—	—	2	2	34	36
Taichung "		—	—	—	3	3	8	11
Hwalien "		—	—	4	37	41	94	135
Tainan "		—	—	—	1	1	1	2
Taitung "		—	—	—	14	14	128	142
Hengchun "		—	—	—	1	1	6	7
Total		0	0	4	58	62	271	333
Other places		—	—	—	—	0	66	66

Felt Earthquakes from October to December, 1965

No	Month	P. (G. M. T.)			Mag-nitude	Epicenter	Latitude		Longitude	Depth
		d.	h.	m.			N.	E.		
85	Oct.	3	00	10	(L)	Near Ilan				
86	"	4	01	26	(S)	About 25 km. ENE. of Yushan	23.5	121.2		0
87	"	4	04	18	(L)	About 45km. ENE. of Alishan				10
88	"	4	23	05	"	Near Hwalien				
89	"	6	13	09	"	"				
90	"	6	13	10	"	"				
91	"	9	03	19	"	About 12 km. WNW. of Hwalien				0
92	"	9	18	19	"	Near Hwalien				
93	"	9	18	19	"	"				
94	"	9	18	23	"	"				
95	"	9	18	28	"	"				
96	"	10	05	08	"	"				
97	"	11	02	51	"	About 10km. NNE. of Hsinking				0
98	"	11	09	05	"	Near Hwalien				
99	"	12	01	57	"	"				
100	"	15	07	03	"	"				
101	"	20	17	25	"	"				
102	"	21	01	05	"	"				
103	"	22	12	33	"	"				
104	"	22	16	51	"	"				
105	"	23	12	15	"	"				
106	"	24	03	11	"	"				
107	"	26	18	58	"	About 30 km. ENE. of Hsinking				30
108	"	27	04	32	"	About 18 km. ENE. of Taiwan				10
109	"	27	06	22	"	Near Hwalien				
110	"	27	17	32	"	"				
111	"	31	15	11	"	"				
112	Nov.	1	14	19	"	About 17 km ENE. of Hsinking				5
113	"	2	04	49	"	About 20 km. W. of Hwalien				60
114	"	6	17	38	"	About 35 km. N. of Yushan				10
115	"	6	17	43	"	About 16 km. ENE. of Yushan				30
116	"	12	14	13	(S)	About 116 km. ENE. of Hwalien	24.4	122.6		30
117	"	16	17	06	(R)	About 392 km. ENE. of Hwalien	24.4	125.5		80
118	"	17	16	02	(L)	Near Hwalien				



No	Month	P. (G. M. T.)			Mag-nitude	Epicenter	Latitude		Longitude	Depth kms.
		d.	h.	m.			N.	E.		
119	Nov.	17	16	20	(L)	Near Lanyu				
120	"	17	21	19	"	"				
121	"	17	23	59	"	"				
122	"	18	00	08	"	"				
123	"	18	01	28	"	About 22 km. E. of Lanyu				10
124	"	18	03	22	"	About 20 km. SSE. of Hwalien				15
125	"	18	03	58	"	Near Lanyu				
126	"	18	04	30	"	"				
127	"	18	05	48	"	"				
128	"	18	06	47	"	"				
129	"	18	07	27	"	About 25 km. E. of Lanyu				10
130	"	18	07	36	"	Near Lanyu				
131	"	18	08	00	"	"				
132	"	19	22	31	(S)	About 50 km. SSE. of Hwalien	23.5	121.7		0
133	"	23	02	38	(L)	New Lanyu				
134	"	23	13	27	"	"				
135	"	25	10	16	"	Near Hwalien				
136	"	27	06	06	"	"				
137	Dec.	1	13	13	"	About 30 km. NNE. of Hwalien				15
138	"	4	20	57	"	About 74 km. ENE. of Hwalien				40
139	"	5	16	31	(S)	About 43 km. SSW. of Ilan	21.4	121.5		10
140	"	10	14	00	(L)	Near Hwalien				
141	"	12	09	46	"	"				
142	"	14	04	49	"	About 64 km. SSE. of Hengchun				20
143	"	17	10	22	"	About 65 km. W. of Hwalien				20
144	"	19	16	53	"	About 35 km. N. of Hsinkong				50
145	"	21	04	26	"	About 40 km. ESE. of Hwalien				20
146	"	27	02	21	"	Near Alishan				
147	"	26	04	43	"	About 30 km. SE. of Ilan				20

Unfelt Earthquakes From October to December, 1966

No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
		d.	h.	m.				d.	h.	m.	
876	Sep.	30	17	40	Near Hsinkong.	910	Oct.	7	21	35	Taitung district.
877	"	30	21	28	"	911	"	7	21	42	"
878	"	30	21	35	About 87 km. ESE. of Hwalien	912	"	8	11	55	About 100 km. ENE. of Hsinkong.
879	"	30	23	45	Near Hwalien.	913	"	9	02	59	Near Hwalien.
880	Oct.	1	05	56	Northern district.	914	"	9	03	47	Near Hsinkong.
881	"	1	08	53	Hwalien district.	915	"	9	03	49	Near Hwalien.
882	"	1	09	00	(d)	916	"	9	07	56	"
883	"	1	13	34	(d)	917	"	9	09	34	Near Hsinkong.
884	"	1	13	59	(d)	918	"	9	11	27	Taichung district.
885	"	1	14	00	About 130 km. ESE. of Hwalien.	919	"	9	18	25	Near Hwalien.
886	"	1	16	48	Hwalien district.	920	"	9	19	02	"
887	"	1	21	26	Northern district.	921	"	9	19	07	"
888	"	2	06	41	Hengchun district.	922	"	9	19	11	"
889	"	2	08	58	About 115 km. N. of Taipei.	923	"	9	20	14	Hwalien district.
890	"	2	09	59	Hengchun district.	924	"	9	20	45	Near Hwalien.
891	"	2	10	01	About 52 km. SSE. of Hwalien.	925	"	9	23	37	Near Ilan.
892	"	2	18	35	Near Lanyu.	926	"	9	23	39	Near Hsinkong.
893	"	2	21	28	About 115 km. E. of Hwalien.	927	"	10	05	16	Near Hwalien.
894	"	3	08	01	Taitung district.	928	"	10	05	19	"
895	"	3	13	24	Near Hwalien.	929	"	10	08	43	About 52 km. NE. of Hsinkong.
896	"	3	14	52	(d)	930	"	10	10	14	Near Hwalien.
897	"	4	00	10	Hwalien district.	931	"	10	10	14	"
898	"	4	11	22	"	932	"	10	10	20	"
899	"	4	15	09	Near Alishan.	933	"	10	10	23	Hwalien district.
900	"	4	16	05	Near Hsinkong.	934	"	10	16	41	Near Yushan.
901	"	6	01	50	Hwalien district.	935	"	10	17	11	Near Hwalien.
902	"	6	09	56	Taitung district.	936	"	10	18	37	About 45 km. SSW. of Hwalien.
903	"	6	13	36	Near Hsinkong.	937	"	10	19	24	Near Hwalien.
904	"	6	14	40	"	938	"	10	19	24	"
905	"	6	17	50	Taitung district.	939	"	11	09	11	Hwalien district.
906	"	6	21	35	"	940	"	11	10	27	Near Hwalien.
907	"	6	21	42	Near Hsinkong.	941	"	11	10	44	"
908	"	7	03	38	(d)	942	"	11	11	41	Near Taitung.
909	"	7	09	56	About 45 km. NNE. of Hsinkong.	943	"	12	03	34	Near Hwalien



No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
		d.	h.	m.				d.	h.	m.	
944	Oct.	12	06	02	About 32km. ENE. of Yushan	979	Oct.	24	20	26	(d)
945	"	12	13	51	(d)	980	"	25	00	15	(d)
946	"	13	09	00	Near Hwalien	981	"	25	06	54	Northern district.
947	"	13	14	57	(d)	982	"	25	14	15	Hwalien district.
948	"	14	05	54	Near Hsinkong	983	"	25	14	16	"
949	"	14	08	06	(d)	984	"	25	17	40	"
950	"	15	03	28	Near Hwalien.	985	"	25	22	39	(d)
951	"	15	19	20	About 32km. NNE. of Hsinkong.	936	"	25	23	45	Taitung district.
952	"	16	03	49	Near Hwalien.	987	"	26	00	03	About 104km. ESE. of Ilan.
953	"	16	20	15	(d)	988	"	26	20	38	Taitung district.
954	"	16	22	45	(d)	989	"	26	20	58	Northern district.
955	"	17	02	02	(d)	990	"	26	21	36	Near Hsinkong.
956	"	17	05	55	Near Taichung.	991	"	27	11	54	Near Alishan.
957	"	17	19	13	Near Hsinkong.	992	"	27	17	33	Near Hwalien
958	"	18	11	07	Hwalien district.	993	"	27	22	50	Northern district.
959	"	18	21	28	Near Taipei.	994	"	28	03	37	Taitung district.
960	"	18	21	55	(d)	995	"	28	09	04	(d)
961	"	19	20	57	(d)	996	"	28	23	09	Hwalien district.
962	"	20	14	02	Near Alishan.	997	"	29	14	15	Near Hwalien.
963	"	21	18	54	Near Lanyu	998	"	29	14	54	Northern district.
964	"	21	22	00	Near Hwalien	999	"	29	17	41	Hwalien district.
965	"	22	16	15	"	1000	"	29	23	02	Northern district.
966	"	22	16	18	"	1001	"	30	13	58	About 14km. NNE. of Hsinkong.
967	"	22	21	22	"	1002	"	30	16	44	Near Hsinkong.
968	"	22	23	00	Near Hsinkong.	1003	"	30	17	00	Near Hwalien.
969	"	23	08	54	About 55km. E. Taipei.	1004	"	30	18	34	Northern district.
970	"	23	09	21	Northern district.	1005	"	31	11	51	"
971	"	23	14	22	About 72km. ENE. of Ilan.	1006	"	31	13	09	About 46km. SE. of Ilan.
972	"	24	03	10	Near Hwalien.	1007	"	31	17	32	(d)
973	"	24	03	11	"	1008	"	31	19	47	About 40km. SSE. of Ilan.
974	"	24	03	11	"	1009	Nov.	1	01	05	Hengchun district.
975	"	24	03	27	"	1010	"	1	01	52	About 100km. ENE. of Taipei.
976	"	24	06	57	Near Hsinkong.	1011	"	1	02	53	Near Lanyu.
977	"	24	14	37	(d)	1012	"	1	17	27	Taitung district.
978	"	24	17	19	Taitung district	1013	"	1	18	13	(d)

No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
		d.	h.	m.				d.	h.	m.	
1014	Nov.	1	21	08	Taitung district.	1049	Nov.	15	12	53	Near Hsinkong.
1015	"	2	01	15	Near Lanyu.	1050	"	15	13	01	Near Hwalien.
1016	"	2	01	37	"	1051	"	15	14	34	Near Hsinkong.
1017	"	2	15	54	(d)	1052	"	15	13	45	Near Hwalien.
1018	"	3	01	57	(d)	1053	"	15	22	14	Near Hsinkong.
1019	"	3	02	08	Hengchun district.	1054	"	17	17	14	Near Lanyu.
1020	"	3	07	35	Northern district.	1055	"	17	17	16	Near Hwalien.
1021	"	3	13	47	Taitung district.	1056	"	17	19	14	Near Lanyu.
1022	"	3	16	40	About 50km. ENE. of Hwalien.	1057	"	17	20	21	Near Hwalien.
1023	"	3	18	51	Northern district.	1058	"	17	20	27	Near Lanyu.
1024	"	4	15	43	"	1059	"	17	21	16	"
1025	"	4	18	53	Taitung district.	1060	"	17	21	25	"
1026	"	5	19	08	(d)	1061	"	18	00	00	Taitung district.
1027	"	5	22	06	(d)	1062	"	18	00	07	Near Lanyu
1028	"	6	02	11	Hwalien district.	1063	"	18	00	09	"
1029	"	6	02	14	Taitung district.	1064	"	18	00	16	"
1030	"	6	02	51	"	1065	"	18	00	47	About 32km. N. of Hwalien.
1031	"	6	09	01	(d)	1066	"	18	02	13	Near Lanyu.
1032	"	6	15	32	Near Lanyu.	1067	"	18	02	17	"
1033	"	6	17	03	Near Hsinkong.	1068	"	18	02	18	"
1034	"	6	17	43	About 15km. ENE. of Yushan.	1069	"	18	03	08	"
1035	"	7	05	37	Taitung district.	1070	"	18	03	36	"
1036	"	9	21	01	About 15km. NNE. of Hwalien.	1071	"	18	03	49	Taitung district.
1037	"	9	22	28	Taitung district.	1072	"	18	06	16	Near Lanyu.
1038	"	10	04	27	Hwalien district.	1073	"	18	07	43	"
1039	"	10	04	33	Near Hwalien.	1074	"	18	08	46	"
1040	"	11	00	28	"	1075	"	18	11	28	"
1041	"	12	17	18	(d)	1076	"	18	11	34	"
1042	"	12	17	56	(d)	1077	"	18	16	38	"
1043	"	13	01	28	Near Hsinkong.	1078	"	18	18	27	"
1044	"	13	04	40	(d)	1079	"	18	27	11	(d)
1045	"	14	03	49	About 16km. ENE. of Yushan.	1080	"	18	21	37	Near Lanyu.
1046	"	14	05	35	Tainan district.	1081	"	18	22	05	(d)
1047	"	14	05	59	(d)	1082	"	19	00	10	Hwalien district.
1048	"	15	11	35	(d)	1083	"	19	07	20	(d)



No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
		d.	h.	m.				d.	h.	m.	
1084	Nov.	19	07	56	Near Lanyu.	1119	Nov.	27	12	10	(d)
1085	"	19	07	59	"	1120	"	27	21	15	Near Lanyu.
1086	"	19	17	07	"	1121	"	28	04	15	Northern district
1087	"	19	23	12	"	1122	"	28	05	27	Near Hwalien.
1088	"	20	02	16	"	1123	"	28	16	36	Near Lanyu.
1089	"	20	03	20	Neas Taipei.	1124	"	29	03	44	"
1090	"	20	04	10	Near Lanyu.	1125	"	29	05	31	"
1091	"	20	07	06	Northern district	1126	"	29	06	17	Taitung district.
1092	"	20	09	14	"	1127	"	29	13	26	"
1093	"	20	15	11	(d)	1128	"	29	13	46	"
1094	"	20	18	10	Near Lanyu.	1129	"	29	18	53	"
1095	"	21	06	46	Northern district.	1130	"	29	20	58	Hwalien district.
1096	"	21	10	37	(d)	1131	"	30	07	15	Near Hwalien.
1097	"	22	01	43	Near Lanyu.	1132	"	30	08	52	"
1098	"	22	10	49	"	1133	Dec.	1	10	32	Near Hsinkong.
1099	"	22	12	23	"	1134	"	1	16	30	Near Taipei.
1100	"	22	13	00	"	1135	"	1	13	98	Northern district.
1101	"	22	14	34	Hwalien district	1136	"	2	00	59	Near Hsinkong.
1102	"	22	14	56	Near Lanyu.	1137	"	2	07	24	"
1103	"	22	15	07	"	1138	"	2	12	08	"
1104	"	22	15	37	Northern district.	1139	"	2	13	02	Near Hwalien.
1105	"	22	15	48	Near Lanyu.	1140	"	2	16	30	Hwalien district.
1106	"	22	16	08	"	1141	"	2	19	38	About 108km. ENE. of Hwalien
1107	"	22	18	24	"	1142	"	3	01	59	Hwalien district.
1108	"	22	18	54	"	1143	"	3	06	54	(d)
1109	"	22	20	34	(d)	1144	"	3	15	30	(d)
1110	"	23	01	21	(d)	1145	"	3	17	55	Hwalien district.
1111	"	23	03	54	Near Lanyu.	1146	"	4	04	49	"
1112	"	23	11	40	Northern district.	1147	"	4	20	59	Taitung district.
1113	"	24	01	03	About 85km. ESE. of Hwalien.	1148	"	5	08	12	Hwalien district.
1114	"	24	06	13	Near Lanyu.	1149	"	5	15	36	Near Hwalien
1115	"	24	08	14	"	1150	"	6	12	04	(d)
1116	"	25	13	41	"	1151	"	6	12	14	Near Alishan.
1117	"	25	17	39	"	1152	"	6	13	01	Near Hsinkong.
1118	"	27	03	08	(d)	1153	"	6	15	16	"

No.	Month	P. (G. M. T.)			Epicenter	No.	Month	P. (G. M. T.)			Epicenter
		d.	h.	m.				d.	h.	m.	
1154	Dec.	6	16	41	"	1184	Dec.	20	00	20	(d)
1155	"	7	22	26	(d)	1185	"	20	03	25	Northern district.
1156	"	8	01	49	Taichung district.	1186	"	20	12	57	Hwalien district.
1157	"	8	02	02	Near Lanyu.	1187	"	20	23	03	Taitung. district
1158	"	8	13	28	Near Hwalien.	1188	"	21	04	47	Near Lanyu.
1159	"	8	18	17	(d)	1189	"	21	12	47	Taitung district.
1160	"	9	06	28	(d)	1190	"	21	21	50	Near Taitung.
1161	"	9	09	36	Near Lanyu	1191	"	22	00	17	(d)
1162	"	9	16	47	Near Lanyu.	1192	"	22	00	58	Hengchun district.
1163	"	9	18	37	"	1193	"	22	02	56	Near Hsinkong.
1164	"	9	20	35	(d)	1194	"	22	07	35	(d)
1165	"	10	04	02	About 36km. ENE. of Yushan.	1195	"	22	18	11	Hengchun district.
1166	"	10	06	44	Near Hsinkong.	1196	"	22	19	52	(d)
1167	"	10	17	54	Near Lanyu.	1197	"	23	14	12	Taitung district.
1168	"	10	22	02	(d)	1198	"	23	17	46	Northern district.
1169	"	12	02	28	Near Lanyu.	1199	"	23	20	30	"
1170	"	12	02	28	"	1200	"	24	23	39	Near Hwalien.
1171	"	13	05	51	(d)	1201	"	25	06	20	Taitung district.
1172	"	13	06	01	Taitung district	1202	"	22	13	58	(d)
1173	"	13	10	58	(d)	1203	"	26	04	00	(d)
1174	"	13	11	03	(d)	1204	"	26	11	19	Taitung district.
1175	"	13	14	52	(d)	1205	"	26	14	59	Near Hsinkong.
1176	"	12	22	42	(d)	1206	"	27	20	23	(d)
1177	"	15	23	24	(d)	1207	"	28	12	15	(d)
1178	"	16	08	06	Taitung district.	1208	"	28	20	36	(d)
1179	"	17	16	53	"	1209	"	28	21	33	(d)
1180	"	18	02	14	Near Lanyu.	1210	"	28	23	30	About 45km. E.NE. of Hsinkong.
1181	"	18	10	52	Northern district.	1211	"	29	04	23	(d)
1182	"	18	13	32	(d)	1212	"	30	10	34	About 44km. E. of Taitung.
1183	"	19	22	17	(d)						







Major Earthquakes Occurred in November, 1965

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks			
					N	E	Z	N	E	Z	N	E	Z						
1	Anpu		ip	01 57 58.0	μ	+ 1.5	μ	- 5.3	μ	μ	μ	s	s	s	13 50.0	O			
	Taitung			57 58.0												4 46.0	O (d)		
	Hwalien			58 21.1												9 59.4	O		
2	Hwalien	12	p	14 13 22.7					25					12.4	I	About 116 km.			
	Ilan			13 24.6											11.3	O	ENE. of		
	Hsinkong			13 30.2											11.6	O	Hwalien		
	Anpu			13 31.2											15.8	O	122.6E		
	Taipei			13 31.3											15.2	O	24.4N		
	Alishan			13 34.6											16.0	O	(H $\frac{\pm}{\pm}$ 30)		
3	Ilan	12	ep	17 56 22.8										-3	12.7	O			
	Anpu			56 28.1	- 27	- 30	+ 27								-4	39.9	O		
	Taipei			56 30.3											-3	34.3	O (d)		
	Hwalien			56 35.5											-4	54.4	O		
	Taichung			56 41.0													O		
	Alishan			56 46.4											-3	40.2	O		
	Hsinkong			56 48.3													O		
	Tainan			56 52.8													O		
	Kaohsiung			56 53.0													O		
	Taitung			56 58.8												-3	36.2	O	
4	Penghu	13	p	04 40 17.6										-4	8.4	O			
	Ilan			40 26.8											-4	48.3	O		
	Anpu			40 27.8	- 4.7	- 6.7	+ 7.9								-5	30.2	O (d)		
	Taipei			30.0											-5	16.7	O		
	Alishan			40 32.8											-11	7.0	O		
	Taichung			40 37.8											-5	36.7	O		
	Taitung			40 40.0											-5	27.0	O		
	Hwalien			40 40.1											-11	19.7	O		
	Hsinkong			40 45.5													34.0	O	
	Hengchun			41 00.0														O	
	Tainan			41 07.5														O	
	Kaohsiung			41 10.0														O	

No.	Station	Date	Phase	P. (G.M.T.)	Initial Motion			Maximum Amplitude			Period			P~S	Intensity	Epicenter & Remarks				
					N	E	Z	N	E	Z	N	E	Z							
5	Ilan	16	p	17 06 33.1	μ	μ	μ	μ	μ	μ	s	s	s	m s	20.1	O				
	Taipei			ep	06 35.0	- 2	- 3	+ 7									40.7	O	About 392 km.	
	Hwalien			p	06 35.2				162	130	76	3.4	3.4	3.9			22.2	I	ENE. of	
	Aupu			p	06 37.0													27.0	O	Hwalien
	Hsinchu			ep	06 44.2													45.6	O	125.5E
	Yushan			p	06 44.4													46.8	O	24.4N
	Taichung			ep	06 44.6													51.4	O	(H $\frac{\pm}{\pm}$ 80)
	Alishan			ep	06 48.8													48.4	O	
	Hsinkong			ep	06 50.5													44.3	O	
	Tainan			p	06 54.5													47.4	O	
	Penghu			p	06 55.8													2.0	O	
6	Lanyu	19	p	22 31 30.8												47.5	O			
	Hwalien			ip	31 35.0	- 32.9	+ 5.0	- 90.9	2200	2800	800	2.5	1.7	2.4	6.4	III	About 50 km.			
	Hsinkong			ep	31 35.0												14.7	II	SSE. of	
	Yushan			ip	31 38.4												9.6	III	Hwalien	
	Taitung			ep	31 41.1				357	405		2.0	1.9				18.2	I	121.7E	
7	Alishan	21	ip	31 44.1	+ 6	- 57									12.7	II	23.5N			
	Ilan			31 44.6	+ 43	+ 9	- 148	573	452	400	1.9	2.3	2.0	14.8	II	(H $\frac{\pm}{\pm}$ 0)				
	Taichung			p	31 44.8	- 15.2	+ 24.5	- 60.6	365			2.0				16.4	I			
	Tawu			ep	31 47.8												27.9	O		
	Lanyu			p	31 47.9			+ 200									18.4	I		
	Taipei			p	31 50.1	+ 20	± 0	+ 14	250	150		1.5	3.0				17.8	I		
	Anpu			p	31 50.3												22.7	O		
	Hsinchu			ep	31 52.0												17.9	I		
	Tainan			p	31 56.1												20.4	O		
	Hengchun			p	31 57.8				120	119	60						24.6	O		
8	Kaohsiung	23	ep	01 22 00.0																
7	Taitung	21	p	10 37 48.1											-5	32.5	O (d)			
	Anpu			ip	38 14.6	+ 1.6	- 1.3	+ 3.2								-4	55.4	O		



