TROPICAL CYCLONE 39 - 11/08/0600Z TO 11/18/1800Z

I. DATA

A. STATISTICS

1. NUMBER OF WARNINGS ISSUED - 45
2. NUMBER OF WARNINGS WITH TYPHOON INTENSITY - 32
3. TOTAL DISTANCE TRAVELED DURING TROPICAL WARNING PERIOD - 2580 MI

B. CHARACTERISTICS AS A TYPHOON

1. MINIMUM OBSERVED SLP - 890MBS AT 140400Z
2. MINIMUM OBSERVED 700MB HEIGHT - 2270M. AT 140400Z
3. MAXIMUM SURFACE WIND - 130 KTS (FROM BEST TRACK)
4. MAXIMUM RADIUS OF SURFACE CIRCULATION - 600 MI

II. DEVELOPMENT

A. INITIAL IMPETUS - FRACTURE OF A POLAR TROUGH AND AN EASTERLY WAVE

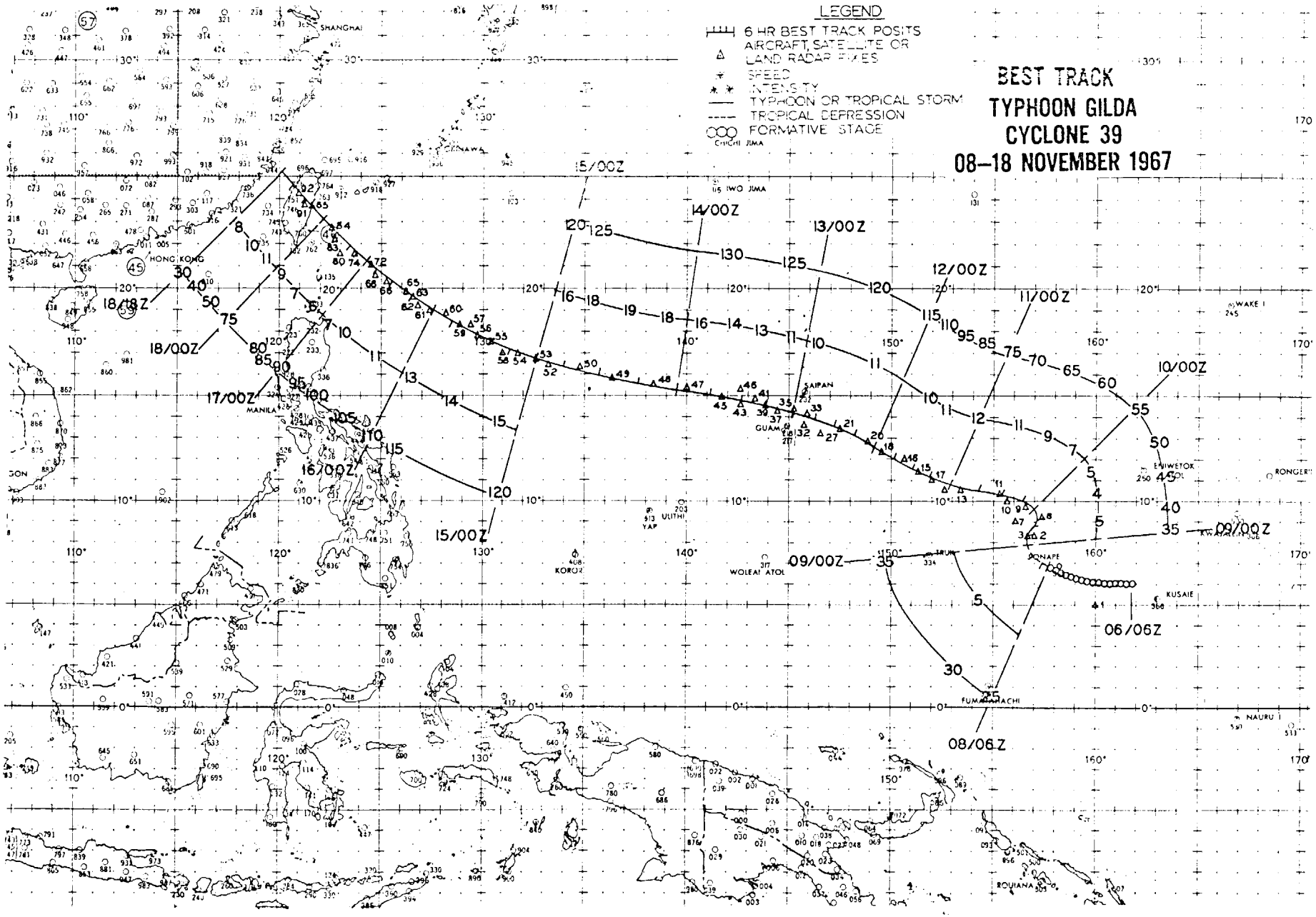
B. INITIAL SURFACE VORTEX

1. JUNCTION VORTEX AT 060600Z
2. SURFACE PRESSURE LESS THAN 1004MB

C. 200MB FLOW ABOVE SURFACE VORTEX

1. INITIAL - SOUTHWEST
2. UPON REACHING TYPHOON INTENSITY - NORTHEAST

III. FINAL DISPOSITION - DISSIPATED OVER WATER


BEST TRACK
TYPHOON GILDA
CYCLONE 39
08–18 NOVEMBER 1967
LEGEND
6 HR BEST TRACK POSITS
AIRCRAFT, SATELLITE OR LAND RADAR FIXES
SPEED
INTENSITY
TYPHOON OR TROPICAL STORM
TROPICAL DEPRESSION
FORMATIVE STAGE
SHANGHAI
OKINAWA
HONG KONG
MANILA
SAIPAN
GUAM
YAP
ULITHI
KOROR
WOLEAI ATOL
IWO JIMA
CHICHI JIMA
WAKE I
ENIWETOK
RONGERIK
PONAPE
KUSAIE
NAURU I
ROUIANA
18/18Z
18/00Z
17/00Z
16/00Z
15/00Z
14/00Z
13/00Z
12/00Z
11/00Z
10/00Z
09/00Z
06/06Z
08/06Z

EYE FIXES CYCLONE 39

FIX NO.	TIME	POSIT	UNIT-METHOD -ACCY	FLT LVL	FLT LVL WND	OBS SFC WND	OBS MIN SLP	MIN 700MB HGT	FLT LVL TT/TD	EYE FORM	ORIEN-TATION	EYE DIA	THKNS WALL CLOUD
1	080200Z	05.0N 160.0E	SLTLS	STG C	DIA --	BNDS -							
2	082132Z	08.5N 157.0E	SLTLS	STG -	DIA --	BNDS -							
3	090150Z	08.5N 156.8E	54-P-P15		---	---	999	---	--/--	----			--
4	090250Z	09.0N 156.0E	SLTLS	STG X	DIA 05	BNDS 2							
5	090425Z	08.5N 156.9E	54-P-P15	700MB	045	040	998	3033	11/--	----			F.B.
6	090950Z	08.3N 157.0E	VW-P-P10	0380M	026	030	995	---	--/--	CIRC	----	80	--
7	091540Z	08.6N 156.1E	VW-P-P05	0350M	032	035	991	3027	--/--	CIRC	----	90	--
8	092220Z	09.3N 157.2E	54-P-P05	700MB	045	040	988	2990	12/--	CIRC	----	20	--
9	100140Z	09.5N 156.0E	SLTLS	STG X	DIA 05	BNDS 2							
10	100409Z	09.8N 156.6E	54-P-P02	700MB	050	050	977	2920	16/--	CIRC	----	10	--
11	100952Z	10.0N 155.7E	VW-P-P05	0290M	070	060	982	---	--/--	ELIP	NW-SE	35X20	--
12	101540Z	10.4N 155.3E	VW-P-P05	0360M	060	055	981	2956	13/10	ELIP	NW-SE	70X50	--
13	102135Z	10.5N 153.4E	54-P-P01	700MB	055	070	975	2896	21/12	----			--
14	110300Z	10.7N 152.5E	54-P-P05	700MB	065	080	968	2822	19/--	----			--
15	110949Z	11.3N 151.2E	VW-P-P03	0190M	080	085	967	---	--/--	ELIP	NE-SW	70X55	06
16	111555Z	12.0N 150.6E	VW-P-P05	0230M	105	100	961	2835	16/--	CIRC	----	64	15
17	110236Z	11.0N 152.0E	SLTLS	STG X	DIA 06	BNDS 3							
18	112045Z	12.4N 149.5E	54-R-F10	700MB	---	---	---	---	--/--	----			--
19	112355Z	12.6N 149.3E	54-P-P03	700MB	080	130	964	2789	17/--	CIRC	----	20	--
20	120327Z	13.0N 148.5E	SLTLS	STG X	DIA 05	BNDS 3							
21	120346Z	12.9N 148.9E	54-P-P15	700MB	070	075	963	2783	18/--	ELIP	NW-SE	50X20	--
22	120900Z	13.3N 147.7E	LND RDR		---	---	---	---	--/--	----			--
23	120930Z	13.4N 147.6E	LND RDR		---	---	---	---	--/--	----			--
24	120955Z	13.4N 147.4E	VW-P-P03	0230M	100	100	953	---	--/--	ELIP	NW-SE	40X30	04

EYE FIXES CYCLONE 39

FIX NO.	TIME	POSIT	UNIT-METHOD-ACCY	FLT LVL	FLT LVL WND	OBS SFC WND	OBS MIN SLP	MIN 700MB HGT	FLT LVL TT/TD	EYE FORM	ORIEN-TATION	EYE DIA	THKNS WALL CLOUD
25	121000Z	13.4N 147.4E	LND RDR		---	---	---	---	--/--	----			--
26	121100Z	13.4N 147.1E	LND RDR		---	---	---	---	--/--	----			--
27	121200Z	13.4N 146.7E	LND RDR		---	---	---	---	--/--	----			--
28	121400Z	13.4N 146.5E	LND RDR		---	---	---	---	--/--	----			--
29	121452Z	13.6N 146.3E	VW-R-F05	700MB	---	---	---	---	--/--	----			--
30	121500Z	13.5N 146.3E	LND RDR		---	---	---	---	--/--	----			--
31	121600Z	13.5N 146.3E	VW-P-P02	700MB	075	045	958	2477	19/10	CIRC	----	21	--
32	122200Z	14.1N 145.6E	LND RDR		---	---	---	---	--/--	CIRC	----	27	--
33	122000Z	13.8N 145.9E	LND RDR		---	---	---	---	--/--	CIRC	----	28	15
34	122212Z	14.0N 145.6E	54-P-P01	700MB	080	075	943	2597	19/--	CIRC	----	21	--
35	122300Z	14.2N 145.4E	LND RDR		---	---	---	---	--/--	CIRC	----	22	--
36	130000Z	14.3N 145.1E	LND RDR		---	---	---	---	--/--	CIRC	----	21	--
37	130227Z	14.0N 144.5E	SLTLS	STG X	DIA 04	BNDS 3							
38	130230Z	14.4N 144.3E	LND RDR		---	---	---	---	--/--	----			--
39	130400Z	14.3N 144.3E	54-P-P01	700MB	120	100	920	2432	22/--	CIRC	----	20	10
40	130650Z	14.6N 143.9E	LND RDR		---	---	---	---	--/--	----			--
41	130900Z	14.6N 143.3E	VW-R-P--		---	---	---	---	--/--	----			--
42	131000Z	14.9N 143.2E	LND RDR		---	---	---	---	--/--	----			--
43	131000Z	14.7N 143.5E	VW-R-P05	0400M	---	---	---	---	--/--	CIRC	----	24	08
44	131200Z	14.8N 142.7E	VW-R-P--	700MB	---	---	---	---	--/--	CIRC	----	18	08
45	131300Z	15.2N 142.5E	LND RDR		---	---	---	---	--/--	----			--
46	131600Z	14.9N 141.7E	VW-R-P05	700MB	---	---	---	---	--/--	CIRC	----	18	06
47	132148Z	15.3N 140.0E	54-P-P03	700MB	090	130	909	2286	26/--	CIRC	----	20	--
48	140318Z	15.5N 138.5E	SLTLS	STG X	DIA 06	BNDS 4							

EYE FIXES CYCLONE 39

FIX NO.	TIME	POSIT	UNIT-METHOD-ACCY	FLT LVL	FLT LVL WND	OBS SFC WND	OBS MIN SLP	MIN 700MB HGT	FLT LVL TT/TD	EYE FORM	ORIEN-TATION	EYE DIA	THKNS WALL CLOUD
73	162020Z	20.9N 124.7E	VW-R-P05	700MB	---	---	---	---	--/--	----			--
74	162100Z	21.1N 124.5E	VW-P-P02	700MB	060	045	972	2666	17/15	CIRC	----	18	--
75	170300Z	21.1N 124.1E	54-P-P01	700MB	060	045	955	2707	16/--	----			F.B.
76	170354Z	21.5N 124.0E	SLTLS	STG X	DIA 05	BNDS 3							
77	170600Z	21.7N 123.7E	LND RDR		---	---	---	---	--/--	----			--
78	170600Z	21.6N 123.7E	54-P-P01	700MB	075	050	955	2691	15/--	----			F.B.
79	170900Z	21.3N 123.2E	LND RDR		---	---	---	---	--/--	----			--
80	170900Z	21.8N 123.5E	54-P-P01	700MB	075	050	955	2688	14/--	----			F.B.
81	171025Z	21.6N 123.6E	LND RDR		---	---	---	---	--/--	----			--
82	171125Z	21.8N 123.0E	LND RDR		---	---	---	---	--/--	----			--
83	171200Z	21.8N 122.9E	LND RDR		---	---	---	---	--/--	----			--
84	171600Z	22.1N 123.1E	VW-P-F10	700MB	---	---	953	2710	14/--	----			--
85	171800Z	22.4N 122.7E	VW-P-P10	700MB	---	---	---	2740	14/--	----			--
86	172030Z	22.8N 122.5E	VW-P-F05	700MB	---	---	---	2734	14/--	ELIP	N-S	40X30	--
87	172200Z	22.9N 122.2E	LND RDR		---	---	---	---	--/--	----			--
88	180200Z	23.8N 121.7E	LND RDR		---	---	---	---	--/--	----			--
89	180000Z	23.1N 122.5E	LND RDR		---	---	---	---	--/--	----			--
90	180249Z	23.9N 121.5E	54-R-P10	4880M	045	---	---	---	--/--	CIRC	----	20	--
91	180445Z	24.5N 121.0E	SLTLS	STG X	DIA 04	BNDS 2							
92	180555Z	23.9N 121.2E	54-P-P08	8250M	035	---	---	---	--/--	----			--
93	180846Z	24.2N 120.9E	54-P-F10	7610M	050	---	---	---	--/--	----			N.F.B.

EYE FIXES CYCLONE 39

FIX NO.	TIME	POSIT	UNIF-METHOD -ACCY	FLT LVL	FLT LVL WND	OBS SFC WND	OBS MIN SLP	MIN 700MB HGT	FLT LVL TT/TD	EYE FORM	ORIEN-TATION	EYE DIA	THKNS WALL CLOUD
49	140400Z	15.5N 138.2E	54-P-P03	700MB	112	100	890	2270	19/--	CIRC	----	18	--
50	141000Z	15.9N 136.3E	VW-P-P03	700MB	110	---	910	2627	17/15	CONC		70-14	--
51	141500Z	16.3N 134.7E	VW-R-P10	700MB	---	---	---	---	--/--	CONC		65-19	--
52	142200Z	16.6N 133.1E	54-P-P02	700MB	080	080	919	2277	17/--	CIRC	----	25	--
53	150000Z	16.8N 132.6E	54-P-P01	700MB	125	100	---	---	--/--	----			--
54	150300Z	17.0N 131.8E	54-P-P01	700MB	130	100	919	2350	20/--	CIRC	----	40	--
55	150408Z	17.0N 131.0E	SLTLS	STG X	DIA 05	BNDS 4							
56	151030Z	17.6N 130.2E	VW-P-P03	700MB	085	---	928	2405	20/--	CIRC	----	35	--
57	151200Z	17.9N 129.8E	VW-R-F--		---	---	---	---	--/--	----			--
58	151300Z	18.0N 129.8E	VW-R-P--		---	---	---	---	--/--	----			--
59	151400Z	18.1N 129.5E	VW-R-P--		---	---	---	---	--/--	----			--
60	151500Z	18.3N 129.2E	VW-R-F--		---	---	---	---	--/--	----			--
61	151600Z	18.3N 128.9E	VW-P-P03	700MB	070	---	926	2432	19/--	ELIP	N-S	40X30	05
62	152120Z	18.9N 128.1E	54-P-P03	700MB	095	---	928	2481	24/--	CIRC	----	30	10
63	160053Z	19.0N 127.3E	54-P-P03	700MB	090	085	931	2512	18/--	CIRC	----	30	--
64	160313Z	19.2N 126.9E	54-P-P03	700MB	090	100	937	2548	18/--	CIRC	----	30	--
65	160533Z	19.6N 126.5E	54-P-P03	700MB	090	100	937	2859	17/--	CIRC	----	30	--
66	160630Z	19.6N 126.3E	ACFT RDR		---	---	---	---	--/--	----			--
67	160900Z	19.9N 126.1E	VW-R-P05	0300M	---	---	---	---	--/--	CIRC	----	08	08
68	161412Z	20.3N 125.1E	VW-R-P10	0400M	---	---	---	---	--/--	----			--
69	161500Z	20.4N 125.0E	VW-R-P04	0430M	100	085	---	---	--/--	CIRC	----	20	09
70	161600Z	20.6N 125.1E	VW-R-P--		---	---	---	---	--/--	----			--
71	161700Z	20.6N 124.8E	VW-R-P--		--	---	---	---	--/--	----			--
72	161800Z	20.7N 124.8E	VW-P-P02	700MB	0	045	951	2643	12/09	CIRC	----	30	0

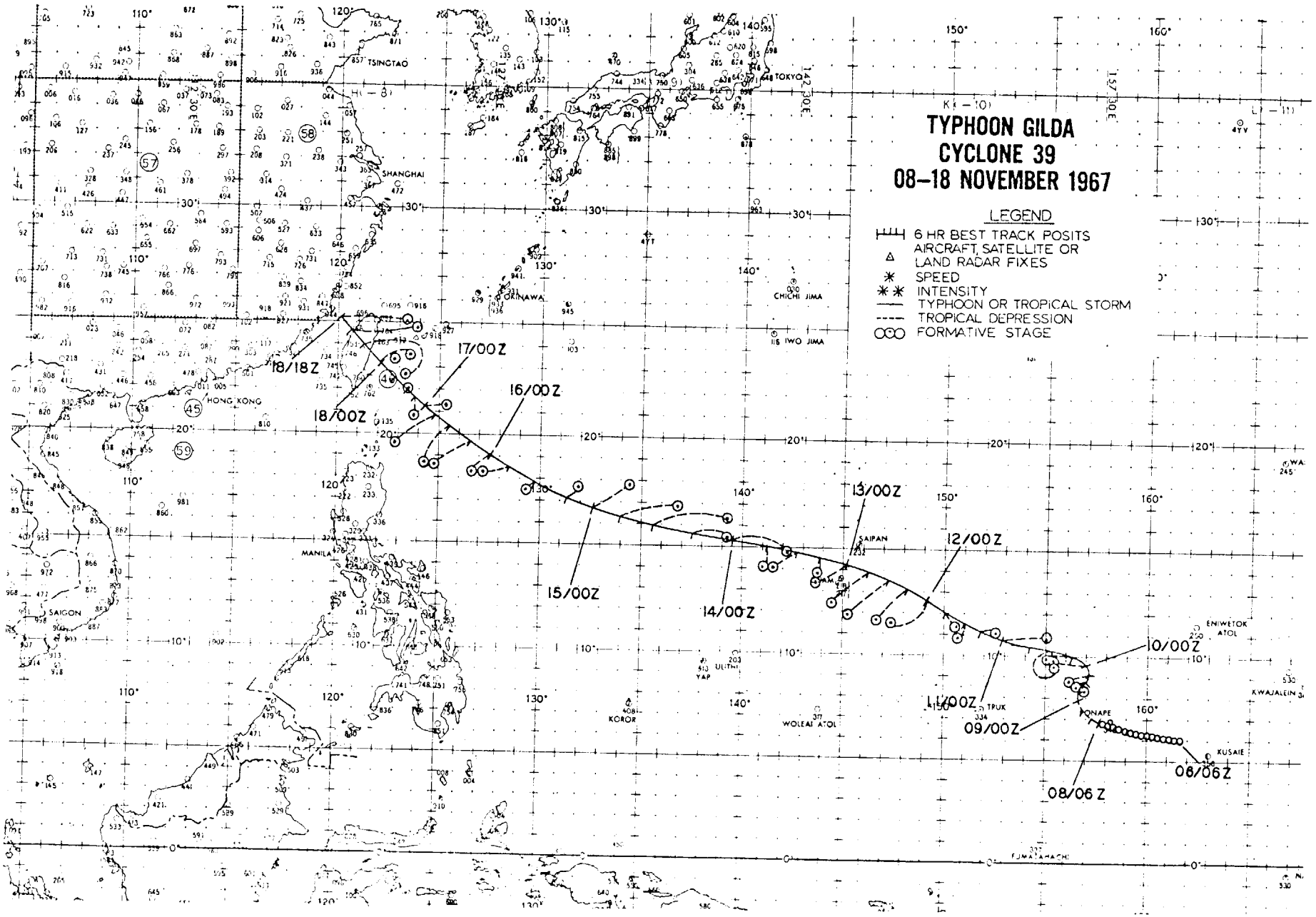
TROPICAL CYCLONE 39 -- 11/08/06007 TO 11/18/1800Z
POSITION AND FORECAST VERIFICATION DATA

DTG	STORM POSITION LAT.	LONG.	24 HR. ERROR DEG. DIST.	48 HR. ERROR DEG. DIST.	72 HR. ERROR DEG. DIST.
090000Z	07.8N	156.7E	--------	--------	--------
090600Z	08.3N	156.8E	116-0012	--------	--------
091200Z	08.7N	156.9E	217-0030	--------	--------
091800Z	09.0N	157.1E	244-0048	--------	--------
100000Z	09.6N	157.0E	277-0096	--------	--------
100600Z	10.0N	156.3E	266-0072	--------	--------
101200Z	10.3N	155.3E	180-0036	--------	--------
101800Z	10.4N	154.1E	214-0018	--------	--------
110000Z	10.6N	152.9E	085-0120	--------	--------
110600Z	11.1N	151.9E	101-0030	270-0090	--------
111200Z	11.6N	151.0E	189-0042	199-0036	--------
111800Z	12.1N	150.1E	147-0054	226-0072	--------
120000Z	12.7N	149.1E	237-0126	144-0102	--------
120600Z	13.1N	148.1E	221-0114	201-0102	246-0240
121200Z	13.5N	147.1E	229-0144	227-0144	--------
121800Z	13.9N	146.1E	226-0144	206-0138	230-0234
130000Z	14.2N	145.1E	233-0096	242-0258	--------
130600Z	14.5N	143.9E	180-0048	234-0228	227-0198
131200Z	14.7N	142.7E	238-0078	234-0252	--------
131800Z	15.0N	141.1E	180-0060	226-0234	222-0216
140000Z	15.3N	139.4E	104-0162	238-0078	--------
140600Z	15.7N	137.6E	101-0090	128-0102	224-0258
141200Z	16.1N	135.7E	089-0198	180-0042	--------
141800Z	16.4N	134.0E	080-0156	119-0144	206-0234
150000Z	16.7N	132.6E	060-0114	102-0372	--------
150600Z	17.2N	131.2E	051-0042	089-0234	114-0204
151200Z	17.8N	129.8E	249-0030	090-0318	--------
151800Z	18.5N	128.4E	261-0072	081-0282	113-0240
160000Z	19.0N	127.4E	218-0066	068-0234	--------
160600Z	19.6N	126.4E	237-0108	093-0102	084-0342
161200Z	20.3N	125.4E	210-0108	229-0144	--------
161800Z	20.7N	124.7E	238-0120	253-0192	073-0354
170000Z	21.1N	124.2E	085-0060	234-0198	--------
170600Z	21.5N	123.7E	170-0036	245-0258	093-0090

TROPICAL CYCLONE 39 -- 11/08/0600Z TO 11/18/1800Z
POSITION AND FORECAST VERIFICATION DATA (CONT)

DTG	STORM POSITION LAT.	LONG.	24 HR. ERROR DEG. DIST.	48 HR. ERROR DEG. DIST.	72 HR. ERROR DEG. DIST.
171200Z	21.9N	123.2E	046-0006	239-0252	--------
171800Z	22.4N	122.7E	007-0054	247-0282	246-0330
180000Z	23.1N	122.1E	072-0072	103-0102	--------
180600Z	23.9N	121.1E	124-0144	134-0132	240-0444
181200Z	24.5N	120.5E	085-0186	104-0138	--------

AVERAGE 24 HOUR ERROR - 0084 MI.
AVERAGE 48 HOUR ERROR - 0175 MI.
AVERAGE 72 HOUR ERROR - 0260 MI.


TYPHOON GILDA
CYCLONE 39
08–18 NOVEMBER 1967
LEGEND
6 HR BEST TRACK POSITS
AIRCRAFT, SATELLITE OR LAND RADAR FIXES
SPEED
INTENSITY
TYPHOON OR TROPICAL STORM
TROPICAL DEPRESSION
FORMATIVE STAGE
08/06Z
09/00Z
10/00Z
11/00Z
12/00Z
13/00Z
14/00Z
15/00Z
16/00Z
17/00Z
18/00Z
18/18Z
TSINGTAO
SHANGHAI
TOKYO
OKINAWA
CHICHI JIMA
IWO JIMA
HONG KONG
MANILA
SAIGON
SAIPAN
YAP
ULITHI
KOROR
WOLEAI ATOL
TRUK
PONAPE
KUSAIE
ENIWETOK ATOL
KWAJALEIN
FUMATAHACHI