PRELIMINARY REPORT

HURRICANE BOB

9 - 16 July 1979

Hurricane Bob developed from one of the many disturbances that originate over Africa each hurricane season. It was first detected in the Eastern North Atlantic near the Cape Verde islands the last week of June and continued westward without showing any signs of development until the system reached the northwest Caribbean on 6 July.

After passing across the Yucatan Peninsula during 7 July, a weak circulation began forming on 8 July and organized into the third tropical depression of the year by 9 July.

On the morning of 10 July an Air Force reconnaissance aircraft reported a developing tropical storm about 400 miles south of the Louisiana Coast with maximum winds estimated 50 knots and lowest pressure 998 mbs. This was a drop of 14 mbs since the flight on the previous day. Afternoon flights measured winds of 60 to 70 knots and reported that the lowest pressure had dropped another 10 mbs. The storm was upgraded to a hurricane in the late afternoon and it remained a minimal hurricane with lowest pressure 986 mbs as the center moved inland west of Grand Isle, Louisiana, early on the morning of 11 July.

During the development stage the depression moved toward the northeast around 10 knots. After reaching tropical storm strength, Bob made a gradual turn to the north with an increase in forward speed to 15 knots as it approached the coast. This motion was associated with the effects of a deepening upper level trough west of the system. The upper atmospheric acceleration of the wind field over Bob, which was produced by this trough, contributed significantly to the hurricanes rather rapid intensification.

After moving inland Bob moved north northeast up the Mississippi Valley into Western Tennessee on 12 July and into Southern Ohio 13 July. Thereafter, the low pressure area that was once Bob drifted southeast off the Mid-Atlantic coast on 16 July and was absorbed in a low pressure system over the Western Atlantic.

The statistics associated with Bob were typical of a minimal hurricane. Tides were generally 3 to 5 feet above normal and rainfall totals between 3 and 6 inches. Highest winds were 45 to 55 knots along the coast with a few locations reporting 65 knot winds. Eight tornadoes were reported but only one produced significant damage. A tornado caused damage estimated at \$27,500 in Biloxi, Mîssissippi. There was one death and one injury in Lafitte, Louisiana, when two men were blown off a marina roof during the height of the storm.

No serious flooding was reported in Louisiana, MIssissippi, or Alabama. The remnants of Bob produced flooding over portions of Indiana, Ohio, and West Virginia, but details are sketchy at this time.

A number of boats were sunk or damaged and there was considerable pier damage

due to high tides and rough seas. Besides the usual tree and power line damage, gusty winds produced some window breakage in the business district of New Orleans. Total storm damage may reach several million dollars including an estimated one quarter million dollars in Harrison County, Mississippi alone.

Hurricane Bob was a well behaved storm so that warnings and forecasts were exceptionally good. The fact that Bob was a minimal hurricane may make it difficult for the public to comprehend the danger, and to heed the warnings, when a more severe storm strikes the United States coast.

GBC

PRELIMINARY BEST TRACK

HURRICANE BOB 9 - 16 July 1979

DATE	TIME (GMT)	LAT.	LONG.	PRESSURE (MB)	WIND (KT)	STAGE
7/9	1200	22.0	96.0	1012	20	DEPRESSION
8	1800	22.5	95.3	1010	25	
7/10	0000	23.0	94.6	1007	30	
	0600	23.5	93.8	1004	35	TROPICAL STORM
	1200	24.0	93.0	998	50	
	1800	25.0	92.3	996	55	2
7/11	0000	26.2	91.6	988	65	HURRICANE
	0600	27.8	91.1	991	65	*
	1200	29.1	90.6	986	65	
	1800	31.0	90.2	992	40	TROPICAL STORM
7/12	0000	32.5	89.9	998	30	DEPRESSION
	0600	34.0	89.7	1002	25	
(68)	1200	35.9	89.1	1004	25	
37	1800	37.2	87.8	1006	25	4
7/13	0000	38.5	86.5	1006	25	
	1200	39.0	84.0	1007	25	
7/14	0000	39.0	81.3	1009	2,0	
	1200	38.3	78.8	1010	20	
7/15	0000	37.5	76.5	1011	.20	
	1200	36.0	76.0	1012	20	w - 2
7/16	0000	34.0	76.5	1013	20	
	1200	33.0	75.0	1014	20	



