

2001

HELICOPTER SAFETY ADVISORY CONFERENCE (HSAC) GULF OF MEXICO OFFSHORE HELICOPTER OPERATIONS AND SAFETY REVIEW

HSAC Members: May 13, 2002

Please find attached the Helicopter Safety Advisory Conference (HSAC) "2001 Gulf of Mexico Offshore Helicopter Operations and Safety Review". The membership support and response from 24 helicopter operators for this review is not only appreciated, but vital in establishing a meaningful report. Continued support is encouraged for the future.

The 2001 Gulf of Mexico oil industry helicopter accident rate per 100,000 flight hours was 1.77 with a total of 8 accidents (6 single engine, 2 medium twin) compared to an 18-year annual average of 8.9 accidents with an accident rate of 1.72. The U.S. accident rate per 100,000 hours for all commercial non-scheduled FAR Part 135 operations was 2.12, and the fatal rate was 0.53, while the HSAC helicopter rates were 1.77 and 0.22 respectively. There was 1 fatal accident with 1 fatality when a passenger walked into the main rotor of a medium twin.

In the last 5 years there have been 35 accidents of which 7 were fatal (21%) with 8 fatalities. The leading causes of accidents have been 6 engine related (17%), 5 (14%) flight into terrain, water or obstacles, and 5 (14%) tail rotor malfunction. Technical faults accounted for 12 (34%) of these accidents.

During 2001, the accident causes did not fit the above pattern; pilot procedures accounted for 4 (50%) of the 8 accidents. Unofficial, are that two of these were misdiagnosis of aircraft malfunction, one was an unauthorized flight procedure, and the last was failure to properly secure the baggage compartment. Two additional accidents (25%) were caused by poor fuel quality control. When coupled with the fatal passenger control accident, 6 of the 8 accidents in 2001 were human error related (75%).

This is the first year in which we have gathered operational data on the percentages of flights flown at night or under IFR conditions and those results are noted below:

Type Aircraft	% Night Flight	% IFR Flight
Single Eng.	1	0
Light Twin	0	0
Med. Twin	10	4
Heavy Twin	10	5
Fleet Average	3	1

We are optimistic that by sharing this information with all operators and other oil industry group's, safety initiatives may be developed to reduce accidents and incidents.

Bob Williams
Industry Liaison Committee Member

GULF OF MEXICO OFFSHORE HELICOPTER OPERATIONAL DATA SUMMARY

YEA NUMBERS by TYPE HELICOPTER

YEAR	SINGL ENGINE	LIGHT TWIN	MEDIUM TWIN	HEAVY TWIN	TOTAL FLEETS	PASSENGERS CARRIED	HOURS FLOW	NUMBER OF FLIGHTS
1997	380	114	131	11	636	3,759,642	471,513	1,705,629
1998	392	89	94	13	588	2,725,682	454,280	1,390,773
1999	413	81	93	14	601	2,664,848	392,712	1,459,781
2000	385	76	106	15	582	3,451,511	441,908	1,394,679
2001*	407	87	121	17	632	3,127,449	451,712	1,473,057

* Data extracted from voluntary input of 12 helicopter operators in the Gulf of Mexico

GULF OF MEXICO OFFSHORE HELICOPTER OPERATIONAL DATA DETAILS

HOURS by TYPE HELICOPTER						OPERATIONS by TYPE HELICOPTER				
YEAR	SINGL ENGINE	LIGHT TWIN	MEDIUM TWIN	HEAVY TWIN	TOTAL FLEETS	SINGL ENGINE	LIGHT TWIN	MEDIUM TWIN	HEAVY TWIN	TOTAL FLEETS
1997	288,443	69,142	109,631	4,297	471,513	1,113,151	249,595	320,023	22,860	1,705,629
1998	303,434	54,509	88,470	7,867	454,280	1,025,105	183,133	167,255	15,280	1,390,773
1999	316,029	38,126	79,736	8,016	441,908	1,051,160	134,035	192,289	17,197	1,394,679
2000	316,029	38,126	79,736	8,016	441,908	1,051,160	134,035	192,289	17,197	1,394,679
2001	309,429	35,318	96,548	10,417	451,712	1,123,393	125,832	204,285	19,547	1,473,057

GULF OF MEXICO HELICOPTER FLEET OPERATIONAL DATA

Averages Per Helicopter	1999	2000	2001	Averages Per Helicopter	1999	2000	2001
Passengers per Day per 5 Day Week	10,249	13,275	12,029	Annual Hours Per Aircraft	653	760	715

Flights Per Day	3,999	3,821	4,036	Flights Per Aircraft	2,429	2,399	2,333
Average Flight Duration in Min.	16	19	18	Passengers Flown Per Year	4,434	5,936	4,952

As a service to the Helicopter Safety Advisory Conference (HSAC) membership, this Gulf of Mexico Offshore Helicopter Statistical Report is compiled annually from information submitted voluntarily by the membership and helicopter operators. The information is neither verified nor reviewed for accuracy and should be treated as unofficial. The data is believed to be representative; however, the HSAC assumes no liability for accuracy or completeness.

Dedicated to Safety Through Cooperation Since 1978

2001 GULF OF MEXICO OFFSHORE HELICOPTER ACCIDENT DATA

NUMBER OF ACCIDENTS				INJURY CLASSIFICATION				AIRCRAFT DAMAGES			AVIATION ACCIDENT			
Aircraft Category				Injuries		Severity		Classification			Rates			
Type	#	#	#							Total	#	#	#	#
Aircraft	Accidents	Fatal	Eng Related	Pass	Crew	Injured	Fatal	Minor	Substantial	Loss	Acc 100k Hours	Fatal Acc 100k Hours	Fatal Occupants	100k Flt Stages
Single Eng.	0*	0	0	0	0	0	0	0	0	0	0.00	0.00	0.00	0.00
Light Twin	0	0	0	0	0	0	0	0	0	0	0.00	0.00	0.00	0.00
Med. Twin	0	0	0	0	0	0	0	0	0	0	0.00	0.00	0.00	0.00
Heavy Twin	0	0	0	0	0	0	0	0	0	0	0.00	0.00	0.00	0.00
2001	8	1	0	8	3	10	1	3	3	2	1.77	0.22	0.21	0.54
2000	9	3*	2	3	8	8	3	0	1	8	2.04	0.68	0.47	0.65

* One engine related accident.

Note, there was one single engine ditching in 2001, not recorded as an accident.

2001 GULF OF MEXICO OFFSHORE HELICOPTER ACCIDENT CAUSES/INFO

1997	6	1	1	6	6	11	1	1	2	4	1.27	0.21	0.20	0.35
1998	3	1	1	0	2	1	1	0	1	3	0.66	0.22	0.23	0.22
1999	9	1	2	7	4	9	2	2	2	5	2.29	0.25	0.47	0.62
2000	9	3	2	3	8	8	2	0	1	8	2.04	0.68	0.40	0.65
2001	8	1	1	8	3	10	1	3	2	3	1.77	0.22	0.32	0.54
5 Yr. Avg.	7.0	1.4	1	4.8	4.6	7.8	1.6	1.2	1.6	4.6	1.61	0.32	0.32	0.48

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