

IDENTIFICATION STRIP: Please fill in all blanks. NO RECORD WILL BE KEPT OF YOUR IDENTITY.

This section will be returned to you promptly.

TELEPHONE NUMBERS where we may reach you for further details of this occurrence:

(HOME) Area 901 No. 388-4259 Hours 24
(WORK) Area 901 No. 532-8558 Hours 24

(SPACE RESERVED FOR ASRS DATE/TIME STAMP)

NAME MARK S. ESTABROOK
ADDRESS 2722 MORNING WOODS DR
CORDOVA, TN 38018

TYPE OF EVENT/SITUATION TOOK OFF
ON WRONG RUNWAY
DATE OF OCCURRENCE 3/9/93
LOCAL TIME (24 hr. clock) 0526 MDT

Except for reports of aircraft accidents and criminal activities — which are not included in the ASRS and should not be submitted to NASA — all identities contained in this report will be removed to assure complete reporter anonymity.

PLEASE FILL IN APPROPRIATE SPACES AND CHECK ALL ITEMS WHICH APPLY TO THIS EVENT OR SITUATION.

REPORTER'S ROLE DURING OCCURRENCE

(pilot-flying, radar controller, cabin crew, maintenance, etc.) SECOND OFFICER (FLIGHT ENGINEER)

REPORTER	FLYING TIME	CERTIFICATES/RATINGS	ATC EXPERIENCE
<input type="checkbox"/> captain/pilot	total <u>5000</u> hrs.	<input type="checkbox"/> student	<input type="checkbox"/> FPL <input type="checkbox"/> developmental
<input type="checkbox"/> first officer	last 90 days <u>100</u> hrs.	<input type="checkbox"/> commercial	radar _____ yrs.
<input checked="" type="checkbox"/> other crewmember	in acft type <u>700</u> hrs.	<input type="checkbox"/> instrument	non-radar _____ yrs.
<input type="checkbox"/> controller		<input type="checkbox"/> multiengine	supervisory _____ yrs.
			military _____ yrs.

DESCRIBE ONE AIRCRAFT IN THIS SECTION (PILOTS DESCRIBE YOUR OWN) AND ADDITIONAL AIRCRAFT IN THE "DESCRIBE EVENT/SITUATION" SECTION:

AIRFRAME/ENGINES	OPERATOR	PURPOSE OF FLIGHT	FLIGHT PLAN
<input checked="" type="checkbox"/> low fixed wing	<input type="checkbox"/> scheduled carrier	<input type="checkbox"/> passenger	<input type="checkbox"/> VFR <input checked="" type="checkbox"/> IFR
<input type="checkbox"/> high fixed wing	<input checked="" type="checkbox"/> supplemental carrier	<input checked="" type="checkbox"/> cargo	<input type="checkbox"/> SVFR <input type="checkbox"/> none
<input type="checkbox"/> rotary wing	<input type="checkbox"/> FBO/flying school	<input type="checkbox"/> business	
<input type="checkbox"/> advanced/automated cockpit (e.g., CRT's, FMS, etc.)	<input type="checkbox"/> commuter	<input type="checkbox"/> training	
	<input type="checkbox"/> corporate	<input type="checkbox"/> pleasure	
	<input type="checkbox"/> government		
	<input type="checkbox"/> military (_____)		
crew size <u>3</u>			
pax seats <u>0</u>			
gross weight <u>119,483 lb</u>			
no. of engines <u>3</u>			

AIRSPACE/LOCALE	ATC/ADVISORY SERVICE	FLIGHT CONDITIONS	LIGHT AND VISIBILITY
<input type="checkbox"/> uncontrolled	<input type="checkbox"/> ground	<input checked="" type="checkbox"/> VMC	<input type="checkbox"/> daylight <input type="checkbox"/> dawn
<input checked="" type="checkbox"/> control zone	<input type="checkbox"/> local	<input type="checkbox"/> mixed	<input type="checkbox"/> dusk <input checked="" type="checkbox"/> night
<input type="checkbox"/> special use airspace	<input type="checkbox"/> center	<input type="checkbox"/> t'storm	ceiling _____ feet
<input type="checkbox"/> airway/route	<input type="checkbox"/> UNICOM	<input type="checkbox"/> turbulence	visibility _____ miles
ALTITUDE <u>0</u>	Name of ATC Facility <u>SALT</u>	<input type="checkbox"/> windshear	RVR _____ feet
NEAREST CITY <u>SALT LAKE CITY</u>	STATE <u>UT</u>	<input type="checkbox"/> ice	
	<u>LAKE CITY TOWER</u>		

SPECIFY LOCATION BY REFERENCE TO AN AIRPORT, NAVAID, OR OTHER FIX (distance, bearing, etc.): RUNWAY 32
AND RUNWAY 34R THRESHOLD

AIRCRAFT FLIGHT PHASES AT TIME OF OCCURRENCE (preflight, takeoff, cruise, hover, etc.) TAKEDOFF

IF A CONFLICT: Evasive action? ☐ yes ☒ no ☐ no time ☐ unknown. Estimated miss in feet _____ vert'l _____ horiz'l.

DESCRIBE EVENT/SITUATION

Keeping in mind the topics shown below, discuss those which you feel are relevant and anything else you think is important. Include what you believe really caused the problem, and what can be done to prevent a recurrence, or correct the situation. (CONTINUE ON THE OTHER SIDE AND USE ADDITIONAL PAPER IF NEEDED).

ATC CLEARED US FOR TAKEOFF. I DO NOT RECALL IF THEY SPECIFICALLY CLEARED US FOR RUNWAY 34R OR NOT, BUT THE CAPTAIN LINED US UP ON RUNWAY 32 INADVERTANTLY. WITHOUT ANYONE REALIZING THE MISTAKE UNTIL ROTATION, TAKEOFF WAS ACCOMPLISHED ON RUNWAY 32 WITHOUT INCIDENT BY THE FIRST OFFICER. OUR TAKEOFF DATA WAS PREPARED FOR RUNWAY 34R.

IT APPEARS THAT THE THRESHOLD ENVIRONMENT OF RUNWAY 32 AND 34 ARE VIRTUALLY INDISTINGUISHABLE AT NIGHT. WE TAXIED ALONG "K1" EAST-BOUND, AND THE CAPTAIN TURNED LEFT ONTO "32" AS IT WAS LT, AS HIS EXPECTATION WAS FOR A LEFT TURN OFF OF "K1" ONTO THE ACTIVE RUNWAY.

CONTRIBUTING FACTORS

1. FATIGUE - WE WERE ENGAGED IN NIGHT TIME CARGO OPERATIONS ON

CHAIN OF EVENTS

- How the problem arose
- How it was discovered
- Contributing factors
- Corrective actions

HUMAN PERFORMANCE CONSIDERATIONS

- Perceptions, judgements, decisions
- Actions or inactions
- Factors affecting the quality of human performance

National Aeronautics and
Space Administration

Ames Research Center
Moffett Field, California 94035

Official Business
Penalty for Private Use \$300



NO POSTAGE
NECESSARY
IF MAILED
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UNITED STATES

BUSINESS REPLY MAIL

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POSTAGE WILL BE PAID BY NASA

FIRST CLASS
AVIATION SAFETY DATA —
DO NOT DELAY

NASA Aviation Safety Reporting System
Post Office Box 189
Moffett Field, California 94035



**NATIONAL AERONAUTICS AND
SPACE ADMINISTRATION**

**AVIATION SAFETY
REPORTING SYSTEM**

NASA has established an Aviation Safety Reporting System to identify problems in the aviation system which require correction. The program of which this system is a part is described in detail in FAA Advisory Circular 00-48C. Your assistance in informing us about such problems is essential to the success of the program. Please fill out this postage free form as completely as possible, fold it and send it directly to us.

The information you provide on the identity strip will be used only if NASA determines that it is necessary to contact you for further information. THE IDENTITY STRIP WILL BE RETURNED DIRECTLY TO YOU. The return of the identity strip assures your anonymity.

Section 91.57 of the Federal Aviation Regulations (14 CFR 91.57) prohibits reports filed with NASA from being used for FAA enforcement purposes. This report will not be made available to the FAA for civil penalty or certificate actions for violations of the Federal Air Regulations. Your identity strip, stamped by NASA, is proof that you have submitted a report to the Aviation Safety Reporting System. We can only return the strip to you, however, if you have provided a mailing address. Equally important, we can often obtain additional useful information if our safety analysts can talk with you directly by telephone. For this reason, we have requested telephone numbers where we may reach you. Thank you for your assistance.

NOTE: AIRCRAFT ACCIDENTS SHOULD NOT BE REPORTED ON THIS FORM. SUCH REPORTS SHOULD BE FILED WITH THE NATIONAL TRANSPORTATION SAFETY BOARD AS REQUIRED BY 49CFR830.

15. NARRATIVE DESCRIPTION (continued): (Use additional sheets if necessary)

- THE BACK SIDE OF THE CLOCK.
2. RUNWAY 32 WAS LIT.
 3. TWO LIGHTED AIRPORT VEHICLES WERE IN THE IMMEDIATE VICINITY OF RUNWAY 34R THRESHOLD, AND SERVED AS A DISTRACTION.
 4. OUR FLIGHT SCHEDULE REQUIRED A :35 MINUTE TURN, BETWEEN LANDING AT SLC AND DEPARTING FOR SACRAMENTO.

RECOMMENDATIONS:

AFFECT CHANGE IN ALL CONTRIBUTING FACTORS ABOVE.

SECOND FOLD HERE

SECOND FOLD HERE