T. Moske. Jan 06. 1996

Reg. 4

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OMB No. 04-R-4078

DEPARTMENT OF TRANSPORTATION
FEDERAL RAILROAD ADMINISTRATION

# FALSE PROCEED SIGNAL REPORT

REPORT FOR (month/year)
December 1995

DATE
January 2, 1996

All railroads subject to Regulations of the Federal Railroad Administration shall submit a false proceed signal report, or email only, to the Federal Railroad Administration within five days after a false proceed occurs. If no false proceed occurs during any calendar month, a report showing "No Failures" must be filed within ten days after the end of the month.

Copies of this form will be furnished upon request to the Department of Transportation, Federal Railroad Administration, Office of Safety, Washington, D.C. 20590

REPORTING CARRIER (railroad & region or division)
Norfolk Southern Corporation
Division - Illinois

MAIL TO

Federal Railroad Admin.
Suite 440, North Tower
1720 Peachtree Rd., NW
Atlanta, GA. 30309

REPORTING OFFICER (signature/title)
Chief Engineer - West
Communications & Signal Dept.

A failure should not be counted more than one time in items 1, 2, 3, and 4; the failure should be classified under the basic system or appliance of which it forms an essential part. E.g.: assume grounds cause a block signal to indicate a false proceed causing corresponding indications of a cab signal system on each train approaching this point, such failures should be included in item 1, Block Systems.

A false proceed failure is a failure of a system, device or appliance to indicate or function as intended which results in less restriction than intended.

The following abbreviations may be used in the report.

| | |
|---|---|
| A–Automatic | EM–Electromechanical |
| AB–Automatic block | EP–Electropneumatic |
| ACS–Automatic cab signal | FP–False proceed |
| APB–Absolute permissive block | MB–Manual block |
| ATC–Automatic train control | M–Mechanical |
| ATS–Automatic train stop | P–Pneumatic |
| CL–Color light | PL–Position light |
| CPL–Color position light | SA–Semiautomatic |
| E–Electric | TC–Traffic control |

| TYPE OF SYSTEM | DATE | LOCOMOTIVE NUMBER | DEVICE THAT FAILED | LOCATION (city and state) |
|---|---|---|---|---|
| 1 BLOCK SYSTEMS ☐ AB ☐ APB ☒ TC | 12/22/95 | 3920 | Signal | Jacksonville, IL |
| 2 INTERLOCKING ☐ AUTOMATIC ☐ REMOTE ☐ MANUAL | | | | |
| 3 AUTOMATIC SYSTEMS ☐ ATS ☐ ATC ☐ ACS | | | | |
| 4 OTHER (specify) | | | | |

DEPARTMENT OF TRANSPORTATION
FEDERAL RAILROAD ADMINISTRATION
RECEIVED
JAN 08 1996

NATURE AND CAUSE OF FAILURE/CORRECTIVE ACTION TAKEN

At approximately 12:58 PM, Train No. D33D westbound, Engineer , Conductor , was waiting in the siding at Arnold to meet an eastbound train. Train D33D was stopped about four (4) car lengths east of the westward signal, 56L. After the eastbound train passed on the Main Track, the crew on D33D observed signal 56L display yellow over yellow, **advance approach**, for their move. The engineer started his train moving out of the siding. Just before reaching the power switch, the engineer observed that it was lined against his movement, made a normal stop but ran through the switch with his entire train. The dispatcher had not requested a route for D33D to leave the siding.

Signal 56L is a double mast bracket signal located to the right of the Main Track. Westbound movements on the main are governed by signal heads 56LA & 56LB on the right mast; the siding by signal heads 56LD & 56LE on the left mast. All heads are US&S H-2 with 9 volts (AC or DC) on the bulbs, and only the D & E heads (the siding signal) equipped with 30° deflecting lenses. A long sweeping right-hand curve is transversed approaching the west end of the siding. **Advance approach** is a valid signal to leave the siding.

The false yellow over yellow was observed on the 56L E&D heads by the investigating signal personnel. When compared to the Main Track signal red over red, the siding signal did appear yellow over yellow from an engine until it backed more than 150 feet back from the shunting joints. Tests revealed that this was a phantom signal, caused by sunlight reflecting off the snow covered ground in the early to mid-afternoon. Further experimentation showed where the removal of the deflecting lenses was the only sure way to prevent this phantom signal from occurring. The lenses were removed and the signals re-aligned to compensate. Signals were placed back in service.