# West Virginia Office of Miners' Health, Safety and Training

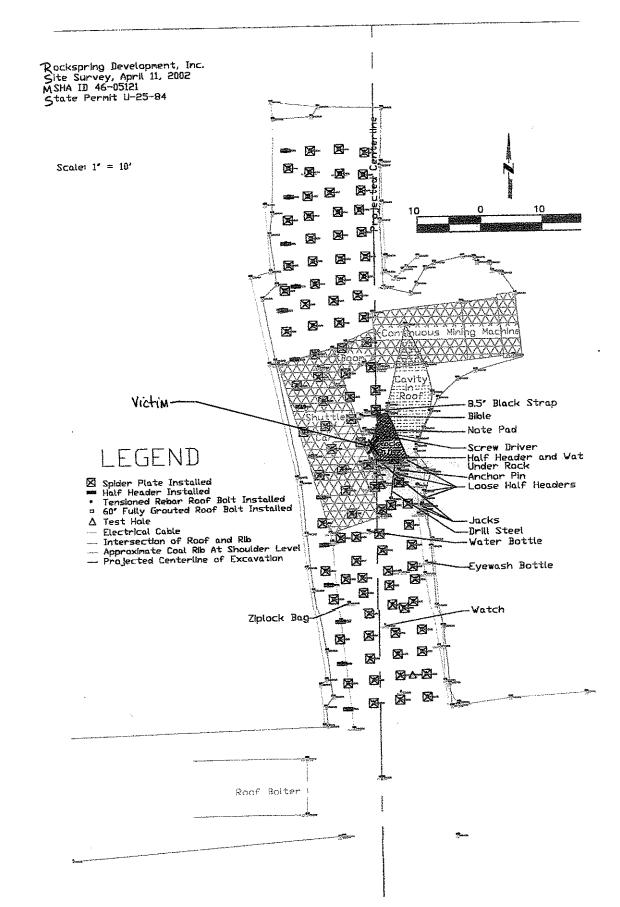
April 10, 2002

Fatal Roof Fall Investigation Report Rockspring Development, Inc. Camp Creek No. 1 Mine Permit No. U-25-84

Region Three - Danville Office 425 Lick Creek Road Danville, West Virginia 25053 Harry Linville, Inspector-at-Large

# TABLE OF CONTENTS

•	SKETCH	
-	OKL I CII	
•	GENERAL INFORMATION	4
•	DESCRIPTION	4, 5
•	FINDINGS OF FACT	5, 6
•	CONCLUSION	6
•	ENFORCEMENT ACTION	6
•	RECOMMENDATIONS	6, 7
•	ACKNOWLEDGMENT	7
•	APPENDIX	8-12



## Fatal Roof Fall Investigation Report Rockspring Development, Inc. Camp Creek No. 1 Mine Permit No. U-25-84

### **GENERAL INFORMATION**

A fatal roof fall accident occurred at approximately 10:15 p.m. on April 10, 2002 at the Rockspring Development, Inc., Camp Creek No. 1 Mine. The accident occurred on the no. 3 section where advance mining was being conducted. Brian Stepp, age 33, from Lovely, Ky. was fatally injured by section of mine roof which fell striking him while he was standing by a shuttle car. The section of mine roof fell from the inby side of permanent roof bolts striking Mr. Stepp and pinning him against the shuttle car wheel. Mr. Stepp is believed to have been standing between the last two rows of permanent supports when the fall occurred. The shuttle car had lost power prior to the accident while being loaded by a continuous mining machine operated by Mr. Stepp. Mr. Stepp had a total of nine (9) years mining experience and had worked at this mine for approximately three (3) years.

Richard Boggess, district inspector with the Office of Miners' Health, Safety and Training's Danville Office, received notification of the accident from Ed Rudder, safety director for Rockspring Development at approximately 11:45 p.m. on April 10, 2002. A joint investigation with the Mine Safety and Health Administration (MSHA) was started immediately.

The last general inspection at this mine was completed on March 14, 2002.

#### DESCRIPTION

The Rockspring Development, Inc., Camp Creek No. 1 Mine is a slope/shaft mine which produces coal from the Winifrede/Coalburg seam. The mine is located in Wayne County near East Lynn, West Virginia and was permitted to commence operation on January 20, 1995. Three underground working sections are currently in operation, and coal is transported to the surface by a slope conveyor belt. The average mining height ranges from six (6) to ten (10) feet.

The no. 3 section crew under the direction of section foreman, Jack Lovins, entered the mine at their normal starting time of 2:30 p.m. on April 10, 2002. The no. 3 section is a 2 unit super section where nine (9) entries are currently mined. Brian Stepp began mining on the left side of the section at approximately 3:20 p.m. According to section foreman, Jack Lovins, and shuttle car operator, Ray Jude, cut depths had been reduced from the maximum forty (40) foot depth allowed by the approved roof control plan throughout the shift due to questionable roof conditions.

Brian Stepp moved the continuous mining machine to the no. 4 entry at approximately 9:30 p.m. where a crosscut was to be turned to the right. Section foreman Jack Lovins was present at the time, but left the area before mining was started. Mining proceeded in the crosscut until approximately 10:00 p.m. Mr. Stepp had mined the right side of the crosscut to a depth of twenty-five (25) feet, ten (10) inches (depth measured by investigators) and the left side to a depth of twenty-

three (23) feet, three (3) inches (depth measured by investigators). Mr. Stepp had moved to the inby side of the continuous mining machine and was loading a shuttle car operated by Ray Jude. The shuttle car lost power and while Mr. Jude left to check the shuttle car's circuit breaker, Mr. Stepp apparently moved to the outby side of the shuttle car. Mr. Jude returned to the shuttle car and entered the operator's deck to attempt to restart the shuttle car. Mr. Jude stated that he was seated in the shuttle car facing the left rib in the no. 4 entry with his back to the crosscut. Mr. Jude stated that Mr. Stepp was standing near the shuttle car to his right within arm's reach facing the shuttle car. Mr. Stepp had the mining machine's remote control device on his person at the time. Mr. Jude stated that the roof fell without warning. A section of the falling material struck Mr. Stepp from behind, pinning him in an upright position against the shuttle car wheel. The roof material separated from the roof on the inby side of the last row of permanent supports.

Mr. Jude immediately attempted to move the section of rock and was unable to do so. Mr. Jude then called out to others on the section for assistance. Others arrived very quickly and no less than four men were unable to move the rock by hand. Lifting jacks were brought to the site and used to move the rock in order to free Mr. Stepp. EMT's Randy Horn and John Brown, along with others, placed Mr. Stepp on a backboard stretcher and transported him to the track on a rubber tired vehicle. According to Mr. Horn and Mr. Brown, Mr. Stepp went into cardiac arrest during the trip to the surface and they performed CPR until Mr. Stepp was transferred to the Wayne Ambulance Service waiting on the surface along with HealthNet.

#### FINDINGS OF FACT

- 1. The victim was standing near a shuttle car inby the next to last row of permanent roof supports at the time of the roof fall.
- 2. According to shuttle car operator Ray Jude, who was sitting in the shuttle car at the time of the accident, the victim was standing with his back to the unsupported roof within arm's reach of Mr. Jude's seated position when the roof fall occurred.
- 3. The roof fall separated from the roof on the inby side of the last row of permanent roof supports.
- 4. Reflectors required by the approved roof control plan to mark the next to last row of permanent supports were not found at the accident site.
- 5. The crosscut turn in width measured twenty-eight (28) feet, six (6) inches. The approved roof control plan specifies a maximum turn in width of twenty-six (26) feet.
- 6. The crosscut measured twenty-five (25) feet, ten (10) inches in depth at its deepest point.
- 7. The mining height at the accident was approximately ten (10) feet.

- 8. The section of roof rock which struck the victim measured eight (8) feet, four (4) inches by five (5) feet, five (5) inches and was four (4) inches to sixteen (16) inches thick.
- 9. According to section foreman, Jack Lovins, and shuttle car operator, Ray Jude, cut depths had been reduced from the forty (40) foot maximum in the places mined prior to the accident during the shift due to questionable roof conditions.

#### **CONCLUSION**

The victim was struck from behind by a section of falling roof material and was pinned against a shuttle car as he was standing inby the next to last row of permanent roof supports. The roof material separated from the roof on the inby side of the last row of permanent roof supports.

#### **ENFORCEMENT ACTION**

A non-assessed control order was issued in accordance with Chapter 22A, Article 2, Section 68 of the West Virginia Code to preserve evidence following the accident.

The Office of Miners' Health, Safety and Training issued seven (7) notices of violation during this investigation. There were three (3) violations that were considered to have contributed to this accident. They are:

Chapter 22A, Article 2, Section 25A: The approved roof control plan was not being complied with on the no. 3 section in that in the no. 4 entry an investigation shows that the mining machine operator did in fact enter the "red zone" area as defined on page 14 of the approved roof control plan.

Chapter 22A, Article 2, Section 25A: An investigation shows that reflective materials did not indicate the next to last row of permanent roof supports in the right crosscut in the no. 4 entry on the no. 3 section.

Chapter 22A, Article 2, Section 25A: The approved roof control plan was not being complied with on the no. 3 section in that in the no. 4 entry the mouth of the right crosscut measured 28.5 feet wide. The approved roof control plan stipulates a maximum width of 26 feet. This was determined during an investigation.

#### RECOMMENDATIONS

- 1. All employees were retrained in the provisions of the approved roof control with special emphasis given to requirements pertaining to reflectors, crosscut width and the designated area where mining machine operators shall be positioned.
- 2. The first cut mined from any crosscut that must be "turned" will be limited to a maximum

depth of 20 feet. The mine's approved roof control plan will be revised to reflect this change.

### **ACKNOWLEDGMENT**

The Office of Miners' Health, Safety and Training gratefully acknowledges the coopertion of the employees and management of Rockspring Development, Inc. and the Mine Safety and Health Administration during this investigation.

Respectfully submitted:	
- July	5-9-02
Terry Farley, Health and Safety Administrator	Date
Harry Sinville	5/7/02
Harry Linville, Inspector-at-Large	Date
Bulued & Boguen	5/7/02
Richard Boggess, District Inspector	

# **APPENDIX**

- Mine Information Sheet
- Victim Information Sheet
- Persons Present During Investigation

# MINE INFORMATION

COMPANY Rockspring Development, Inc.
MINE NAME Camp Creek No. 1
WV PERMIT NO. U-25-84
ADDRESS Box 390, East Lynn, West Virginia 25512
COUNTY Wayne
DATE PERMIT ISSUED January 20, 1995
WORKING STATUS Active
LOCATIONEast Lynn, West Virginia
UNION NON-UNIONX
DAILY PRODUCTION 20,000 raw ANNUAL PRODUCTION TO DATE 1,500,000 raw
TOTAL EMPLOYEES178
NUMBER OF SHIFTS3
COAL SEAM NAME AND THICKNESS Winifrede/Coalburg 6 ft. to 10 ft.
ACCIDENT INCIDENT RATE 3.5 to 4.0 LOST TIME ACCIDENTS 3
TYPE OF HAULAGE Shuttle cars, unihaulers, belt
WVOMHST INSPECTOR Richard Boggess
DATE OF LAST INSPECTION March 14, 2002
NOTIFIED BYEd Rudder, Safety Manager
TIME OF NOTIFICATION11:45 p.m. on April 10, 2002
CMSP - ANNIVERSARY DATE February 14, 2003
CMSP - CONTACT PERSONEd Rudder

# **VICTIM INFORMATION**

NAME Brian Stepp
ADDRESS Box 505, Lovely, Kentucky 41231
TELEPHONE NO. <u>(606)395-6611</u> AGE <u>33</u> SOCIAL SECURITY NO. <u>2040</u>
TOTAL MINING EXPERIENCE 9 years
EXPERIENCE AT THIS MINE3 years
AVERAGE NUMBER OF DAYS WORKED PER WEEK6
AVERAGE NUMBER OF HOURS WORKED PER WEEK 54 PER DAY 9
LENGTH OF SHIFTS AT THIS MINE 9 hrs. TRAVEL TIME TO/FROM WORK 1 hr.
OCCUPATION AT TIME OF ACCIDENT Mining machine operator
REGULAR OCCUPATION Mining machine operator
COAL MINER'S CERTIFICATION L-12163
OTHER CERTIFICATIONS None known
SPOUSE'S NAME Bonny Stepp
DEPENDENTS Wife, one child
DATE OF ACCIDENT: 10th. DAY OF April , 2002 AT 10:15 O'CLOCK p.m.
CAUSE OF ACCIDENT: The victim was struck from behind by a section of falling roof rock
and was pinned against a shuttle car.
DATE OF DEATH: 10th DAY OF April 2002

#### INVESTIGATION

The following persons were present during the onsite investigation conducted on April 11, 2002.

### ROCKSPRING DEVELOPMENT, INC.

Randy McMillion Randy Hansford Nelson Sumpter Ed Rudder Elmo Ellis

Bernie Ferrell Mark Barton Jimmy Hall Tim Morgan Senior Vice President President - Riverton President - Rockspring

Safety Manager Mine Foreman

Miners Representative

Chief Engineer Spad Engineer Spad Man

### MINE SAFETY AND HEALTH ADMINISTRATION

Roger Richmond James Humphrey James Beha Don Winston Accident Investigator
Accident Investigator
Accident Investigator
Roof Control Inspector

# OFFICE OF MINERS' HEALTH, SAFETY AND TRAINING

Terry Farley
Richard Boggess
Mike Rutledge

Health and Safety Administrator Accident Investigator

Safety Instructor

### **INTERVIEWS**

The following persons were present during interviews conducted on April 12, 2002.

### ROCKSPRING DEVELOPMENT, INC.

Randy McMillion
Randy Hansford
Nelson Sumpter
Ed Rudder
Chuck Burggraf
Bernie Ferrell
Don Stollings\*
Jack Lovins\*

Senior Vice President President - Riverton President - Rockspring Safety Manager

Director of Safety Miners Representative

Mine Foreman Section Foreman John Brown\*

Ray Jude\*

Randy Horn\*

Danny Stacy\*

R. Henry Moore

\*denotes those interviewed

Electrician

Shuttle Car Operator

Mining Machine Operator

Roof Bolter

Attorney

### MINE SAFETY AND HEALTH ADMINISTRATION

Roger Richmond

James Humphrey

James Beha

William Blevins

Accident Investigator

Accident Investigator

Accident Investigator

Supervisor

### OFFICE OF MINERS' HEALTH, SAFETY AND TRAINING

Terry Farley

Harry Linville

Richard Boggess

Health and Safety Administrator

Inspector-at-Large

Accident Investigator