

FEDERAL MINE SAFETY AND HEALTH REVIEW COMMISSION

OFFICE OF ADMINISTRATIVE LAW JUDGES
1331 PENNSYLVANIA AVENUE, NW, SUITE 520N
WASHINGTON, D.C. 20004
Telephone No.: (202) 434-9958 / Fax No.: (202) 434-9949

June 4, 2015

SECRETARY OF LABOR
MINE SAFETY AND HEALTH
ADMINISTRATION (MSHA),
Petitioner

v.

DRUMMOND COMPANY, INC.,
Respondent

CIVIL PENALTY PROCEEDING

Docket No. SE 2013-303
A.C. No. 01-02901-314991

Mine: Shoal Creek Mine

DECISION AND ORDER

Appearances: Angele Gregory, Esq., Office of the Solicitor, U.S. Department of Labor,
Nashville, Tennessee, for Petitioner

Noelle Holladay True, Esq., Lexington, Kentucky, and Damon J. Boiles
III, Esq., Birmingham, AL, for Respondent

Before: Judge McCarthy

I. Statement of the Case

This case is before me upon a Petition for the Assessment of Civil Penalty filed by the Secretary of Labor (“Secretary”) under section 105(d) of the Federal Mine Safety and Health Act of 1977 (“the Mine Act” or “the Act”), 30 U.S.C. §814(d). The parties agreed to settle 12 of the 13 citations originally included in this docket and filed a Joint Motion to Approve Partial Settlement. I issued an Amended Decision Approving Partial Settlement on August 6, 2014. Only Citation No. 4481323 remains at issue.

On August 16, 2012, MSHA issued Citation No. 4481323 to Drummond Company, Inc. (“Drummond” or “Respondent”) for an alleged violation of 30 C.F.R. §75.333(h). That standard mandates that in underground coal mines, “all ventilation controls, including seals, shall be maintained to serve the purpose for which they were built.” Citation No. 4481323 states:

In the I-1 Longwall Panel Entries, the mandoor between Entry #2 and #1 at Block #34 was not being used to serve the purpose for which it was installed. At the time of the inspection the mandoor was being held open by a piece of plastic 14” inside diameter

Drisco pipe. The man door measured 30” by 30.” The air flow was from the #2 entry (intake) to the #1 Entry Return.

The citation was designated as significant and substantial (“S&S”) because it was reasonably likely to result in a lost-workdays or restricted-duty injury, with 10 persons affected, as a result of Respondent’s high negligence. P. Exh. 1.

Specifically, the Secretary alleges that Drummond violated 75.333(h) when it propped open a man door with a very large drainage pipe for over 90 minutes. The Secretary argues that the mandoor was built for the purpose of ventilation control to separate intake and return air, while allowing miners to travel between air courses. The Secretary argues that propping open the mandoor with a large pipe in order to transport the pipe or other large equipment contravenes the standard. P. Br. 6, 16-19. Respondent contends that MSHA abused its discretion by issuing the citation because the mandoor was not damaged and was maintained properly. Respondent also disputes the S&S, gravity, and negligence designations, and the appropriateness of the \$8,893 proposed penalty. R. Br. 1-2.

A hearing was held in Birmingham, Alabama. The parties introduced testimony and documentary evidence, and witnesses were sequestered.¹ The parties submitted post-hearing briefs. For the reasons set forth below, I affirm the S&S citation, as modified, to reduce Respondent’s negligence from high to moderate, and assess a civil penalty of \$2,678.

II. Stipulations

At hearing, the parties agreed to the following stipulations:

1. The Respondent is subject to the jurisdiction of the Federal Mine Safety and Health Act of 1977, and the Administrative Law Judge has the authority to hear this case and issue a decision regarding this case.
2. Drummond Company, Inc., has an effect upon interstate commerce within the meaning of the Federal Mine Safety and Health Act of 1977.
3. Drummond Company, Inc., operates Shoal Creek Mine, Mine ID No. 01-02901.
4. Drummond Company, Inc. is a large operator.

¹ In resolving conflicts in testimony, I have taken into consideration the demeanor of the witnesses, their interests in this matter, the inherent probability of their testimony in light of other events, corroboration or lack of corroboration for testimony given, experience and credentials, and consistency, or lack thereof, within the testimony of witnesses and between the testimony of witnesses.

5. The proposed penalty assessments will not affect Respondent's ability to continue in business.
6. The citation at issue in this case was properly served by a duly authorized representative of the Secretary upon an agent of the Respondent.

Jt. Ex. 1; Tr. 12-15.

III. Findings of Fact

On August 14, 2012, Drummond's Shoal Creek Mine experienced a rock fall in the #1 tailgate entry on the I-1 longwall panel, at cross-cut 35, which impeded travel. The rock fall damaged a piece of drainage pipe used to pump water. Tr. 322-23, 326-29.² Water began to accumulate in the area. Tr. 49-50, 56, 106-07, 335-37, 412. The pipe needed repair, once the roof was re-supported, to maintain ventilation and prevent flooding. Tr. 324-26, 356.

On August 16, 2012, MSHA field office supervisor, Edward Boylen, and coal mine inspector, Greg Willis, arrived at the Shoal Creek Mine to inspect the reported roof fall. Tr. 47-48.³ Boylen testified that Shoal Creek is a gassy mine because it liberates 2.9 million cubic feet of methane ("cfm") every 24 hours. Tr. 46.

On his way to break #35 to investigate the rock fall, Boylen walked past break #34 and noticed that several miners were in the area, a scoop was parked in the number 2 (middle) entry, and Drisco pipe, which was several hundred feet long and 14 inches in diameter, was lying through the mandoor located between the number 1 and 2 entries, about two and one-half blocks from the longwall face. Tr. 51, 56-57, 63, 67. The mandoor was 30 inches by 30 inches and had a 6.25 square-foot opening. Tr. 92.

When Boylen asked miners present about the drainage pipe in the mandoor, they said that the mandoor had been propped open for about an hour and one-half so that Respondent could

² Every 24 hours, 20 million gallons of water are pumped from the Shoal Creek Mine. Tr. 325.

³ Boylen worked as a coal mine inspector for MSHA from 2008 until 2012, when he became a field officer supervisor for the Bessemer field office. Tr. 43. Boylen earned a degree in Industrial Management at West Virginia University, and has 20 years of experience in the mining industry. Tr. 33. Boylen served in various capacities in the mining industry, including foreman, fire boss, long wall coordinator, and mine superintendent. Tr. 33, 35, 37. Boylen had worked at Drummond's Shoal Creek Mine for four years and oversaw the completion of the mine's slope, portal, and ventilation shafts and the installation of two longwalls. Tr. 40. Boylen was discharged by Drummond, but credibly testified that he does not harbor any resentment toward the company. Tr. 163-65.

push the pipe through the door to replace the damaged drain pipe at the roof fall area. Tr. 63, 67. A loader was being used to push the large pipe through the mandoor. Tr. 328-29, 344, 346-47; P. Exs. 4-5.

Boylen told superintendent Scott Meadows that the mandoor could not be left open because it would disrupt ventilation inby and it must be closed as soon as possible. Tr. 94-95. Under MSHA's direction, miners put a can bag over the mandoor opening to mitigate ventilation disruption. Tr. 356-58.

Boylen issued Citation No. 4481323 for a violation of 30 C.F.R. § 75.333(h). Tr. 51-52. Boylen determined that the mandoor was a ventilation control designed to separate the number 1 entry (return air) from the number 2 entry (intake air) to prevent air from moving along the wrong course or through the wrong entry. Tr. 64-65. Boylen testified that the mandoor was designed to allow miners to travel between air courses and hand carry supplies. Tr. 64.

Based on experience, Boylen testified that the air pressure flowing through the mandoor was excessive, although he did not take an air measurement. Tr. 69, 71. Boylen explained that he did not take a measurement because while the pipe was being removed from the door, miners cut the pipe in half and a piece of pipe swung to the right, striking Meadows and pinning him against the mine rib. Tr. 69-71. Boylen did, however, take an air reading outside break # 34. That reading measured 130,000 cubic feet per minute (cfm), with the mandoor closed. Tr. 73, 89.

Boylen testified that he was concerned about the effect that a propped-open mandoor would have on the ventilation system. Specifically, Boylen testified:

All right. By experience I know the network of this longwall ventilation system. I know that this entire area is being ventilated with multiple intakes and only one return. The pressure from intake to the return was excessive simply because the design of this system. And with the mandoor open it allowed a great amount of air to go from the intake to the return and in my opinion disrupted the entire ventilation schematic of the longwall, which includes the entries over on the headgate, which are the main intake entries, which includes the longwall face and also includes the bleeder network behind the longwall face.

....

Air will take the path of least resistance. The network of ventilation controls throughout this entire longwall panel is designed purposely so that the flow of air can be controlled and can be controlled continuously allowing normal mining to

continue. And with this door open, that entire schematic, that entire scheme of ventilation was put in jeopardy.

....

[F]or this personnel door that was part of the ventilation control to be open for an hour and a half, to be open normally in any condition based on the air flow disrupted the air of that entire longwall network to where one couldn't predict now where methane's going to exist or where there's a potential for problems such as ignitions and/or explosions.

....

Because of the blue creek coal seam the methane is being liberated continuously. Greater amounts occur up on the longwall mining face area and greater amounts are in the bleeders because that's designed to maintain the ventilation to take care of methane.

Tr. 66-68. Boylen further testified that the greatest risk of methane accumulation in this gassy mine occurs on the longwall face and in the bleeder section. Tr. 68.

Boylen reviewed production reports from August 16, 2012. Those reports indicated that miners were changing out a trapping shoe on the tailgate side between 7:30 a.m. and 11:00 a.m., an interval during which the pipe had propped open the mandoor. Tr. 103. Boylen testified that this task normally requires cutting and welding, and that such maintenance on mine equipment has resulted in numerous face ignitions in the district. Tr. 103-04.

On August 20, 2012, four days after the citation was written, Boylen sent inspector Willis to Shoal Creek Mine to take an air-pressure reading at the mandoor. Tr. 74. Willis took a Magnehelic pressure reading at 1.4 pounds per mercury. Tr. 75. Ventilation specialist, Brandon Russell, was consulted. Based on Willis's reading, Russell concluded that 28,093 cfm of air was travelling through the mandoor. Tr. 76. On cross examination, Boylen testified that the airflow through the mandoor on August 16, 2012 was lower than 28,093 cfm because the pipe was lodged through the mandoor. Tr. 141. The pipe was approximately 1.2 square feet in diameter and the door was 6.25 square feet in diameter. Tr. 92, 141. Taking this differential into account, Boylen testified that the airflow would have been closer to 23,000 cfm on August 16. Tr. 141-142.

Ventilation specialist, Steven Harrison, also testified for MSHA regarding the ventilation at Shoal Creek Mine. Tr. 170-71.⁴ Harrison testified that air was travelling at about 14,500 to 24,500 cfm through the open mandoor at the time of the citation. Tr. 229-31. To make his calculations, Harrison used two formulas, one published and one unpublished. Tr. 197, 229-30, 294-95, 312. Harrison ruled out the possibility that less than 9,000 cfm was travelling through the propped-open mandoor on August 16. Tr. 205. Harrison emphasized that the August 20 reading was taken after water had been pumped down. Therefore, according to Harrison, that reading reflected higher pressure and less air flow than what was present on August 16. Tr. 205, 243.

A weekly examination from August 15, 2012 indicated that the water levels at various breaks were over boot level or waist deep. Tr. 243. Harrison opined that this amount of water would have obstructed airflow in the number 1 entry on the upwind side, and increased the pressure drop across the mandoor. Tr. 205. Harrison also reviewed the mine's weekly examination reports and found that on August 15 and 16, the air readings showed a 30,000 to 40,000 cfm spike on the intake and return entries. Tr. 228. Harrison attributed this significant increase to a short in the ventilation system, which was likely caused by the mandoor being left opened as early as August 15 to transport roof supplies. Tr. 229. In fact, Superintendent Meadows testified that between 800 to 1000 crib blocks were carried through the man door between August 14 and August 16. Tr. 377, 378.

At the time the citation was issued, the Shoal Creek Mine utilized a "wraparound bleeder system" in which intake air enters the longwall face and travels across the three headgate entries. Tr. 182, 184. Some air is lost as it travels back toward the gob. Tr. 186. This system required that the mine have a t-split, allowing some air to travel back to the caved area to allow attraction of air on the face toward the back. Tr. 187. Harrison explained that the pull of air toward the back of the section allows the mine to control the accumulation of methane and to maintain oxygen levels at the face. Tr. 187, 189, 190-93. Under this system, there must be a relative vacuum at the tail gate number three corner to pull the air. Tr. 190. Without this pull, air will become stagnant or reverse flow, allowing methane from the gob to go toward the active face. Tr. 195. Harrison testified that since Shoal Creek has a single air course to pull three splits, if a ventilation change affects a single return entry, the other air splits are also affected. Tr. 192, 195.

⁴ Harrison evaluates ventilation plans and conducts mine ventilation examinations for MSHA. Tr. 177. Harrison was assigned to review the ventilation plan and conduct inspections of the Shoal Creek Mine. Tr. 178. Before joining MSHA, Harrison was a mining engineer for 26 years. Tr. 171. For 23 years, Harrison worked in the ventilation department at Consolidation Coal Company. Tr. 171. Harrison worked for Drummond at the Shoal Creek Mine for 14 months, assessing ventilation issues until he was laid off. Tr. 174. Harrison has published three papers on ventilation. Tr. 176-77.

Harrison further testified that the conditions in the mine and the duration of the alleged violation made it reasonably likely that methane in the area would migrate toward the active face, and, if an ignition source was present, an explosion could result. Tr. 198-99. Harrison testified that power on the longwall face would present potential ignition sources that could ignite the methane that was migrating to the active face because of the open mandoor. Tr. 201. Harrison further testified that even if the longwall had been shut down, miners repairing or replacing parts, and welding with a torch, would create an ignition source. Tr. 252.

IV. Legal Analysis

A. Respondent Violated Section 75.333(h) by Propping Open a Mandoor with a Large Pipe for at least 90 Minutes on August 16

Section 75.333 sets forth mandatory health and safety standards for underground coal mine ventilation controls. 30 C.F.R. §75.333. As noted, the standard mandates that “[a]ll ventilation controls, including seals, shall be maintained to serve the purpose for which they were built.” 30 C.F.R. § 75.333(h). The standard lists personnel doors (or mandoor) as a type of ventilation control, and directs that they “shall be constructed on noncombustible material and shall be of sufficient strength to serve their intended purpose of maintaining separation and permitting travel between air courses. . . .” 30 C.F.R. § 75.333(c).

Neither party disputes that the cited mandoor is a ventilation control that separates intake air from return air. R. Br. 10; P. Br. 16. The parties dispute whether, by leaving the mandoor open for an hour and a half and pushing a drainage pipe through it, the mandoor was being maintained for the purpose for which it was built. The Respondent argues that because the mandoor was not damaged or in disrepair, it was being maintained properly. R. Br. 10. The Secretary contends, however, that because the door was propped open with a pipe, the mandoor could not serve its intended purpose of separating air courses. P. Br. 19.

The term “maintained” is not defined in the standard or in 30 C.F.R. Part 75. The Commission applies the ordinary meaning of the term “maintain,” in absence of a technical usage. *Sedgman*, 28 FMSHRC 322, 329 (June 2006). The Commission has held that the term “maintain” means “to keep in a state of repair, efficiency or validity.” *Jim Walter Resources, Inc.*, 19 FMSHRC 1761, 1765-66 (Nov. 1997), quoting *Webster's Third New International Dictionary* (unabridged) 1362 (1986)). Elsewhere, the Commission has found that “maintain” means “uphold,” “keep up,” “continue,” or “preserve from failure or decline.” *Lopke Quarries, Inc.*, 23 FMSHRC 705, 707-08 (July 2001).

The Commission has held that an operator fails to maintain equipment if the equipment is not capable of “producing the appropriate or designed effect,” or is used in a manner that defeats its intended purpose. *Jim Walter Resources, Inc.*, 19 FMSHRC 1761, 1766 (Nov. 1997). The Commission has further explained that “[i]nclusion of the word ‘maintain’ in a standard makes it clear that equipment ‘shall be capable of performing on an uninterrupted basis and at all times.’” *Nally & Hamilton Enterprises, Inc.*, 33 FMSHRC 1759 (Aug. 2011).

By propping open the mandoor for over an hour and a half, and using it as a passageway to transport a very large pipe with a loader, Drummond did not maintain the mandoor to serve the purpose for which it was built as contemplated by the cited standard. The mandoor was not being maintained in a state of efficiency because it was propped open for an extended period of time thereby preventing it from fulfilling its intended purpose of separating air courses and allowing the brief passage of personnel between air courses. Rather, the mandoor was being used *in a manner that defeated its intended purpose* and the door was not able to *produce its designed effect* of separating return and intake air. On August 16, if not before, the mandoor was left open for an extended period of time, which meant that it was not *capable of performing ventilation control on an uninterrupted basis*.

Respondent argues that it did not fail to maintain the mandoor in violation of 75.333(h) because “[t]he mandoor was not damaged, in disrepair, or in a state of decline,” and was “fully functional and useable.” R. Br. 10. I reject this argument as the mandoor *was not* functioning as intended when it was propped open and blocked with a drainage pipe. The Respondent proffered several cases where Commission judges held that holes or leaks in ventilation control are indicative of improper maintenance. R. Br. 10; *Twentymile Coal Co.*, 34 FMSHRC 2293 (Aug. 2012) (ALJ); *Twentymile Coal Co.*, 33 FMSHRC 1885, 1892-93 (Aug. 2011) (ALJ). Respondent’s reliance on these judges’ decisions is not binding or persuasive because the term “maintain” can and does require more diligence on the part of the operator than simply ensuring that there are no holes or leaks in a ventilation control.

Respondent further argues that the mandoor may be open while it is in use because the ventilation control standard dictates that “when not in use, personnel doors shall be closed.” R. Br. 11, *citing* 30 C.F.R. § 75.333(c)(3). This argument is also unpersuasive. The mandoor by its very nature must open to allow personnel through. *See ICG Knott Co.*, KENT 2009-872 (Aug. 2013) (ALJ) (“[m]andoors are for egress but remain closed otherwise.”). Although the standard is silent about the exact duration that a mandoor may be open, leaving it open for an extended period of time, such as 90 minutes, would prevent the mandoor from controlling ventilation.

An operator is tasked with ensuring that the mandoor is in a constant state of efficiency, i.e., it must be closed when it is not being used for its intended purpose as a means of brief ingress or egress, without disrupting ventilation. *See Lopke Quarries, Inc.*, 23 FMSHRC 705, 707-08 (July 2001) (holding that the word “maintain” in a standard incorporates an ongoing responsibility on the part of the operator). Section 75.333(c)(3) dictates that a mandoor must be closed when not in use. Section 75.333(h) requires that a mandoor, as a ventilation control, be maintained to serve its intended purpose. Even though the two safety standards impose separate requirements, both can be applicable to the conduct at issue. *Walker Stone Co. v. Sec’y of Labor*, 156 F.3d 1076, 1084 (10th Cir. 1998). Here, both standards are relevant to the facts surrounding the citation and Drummond must comply with both simultaneously.

The parties disagree about the intended purpose of the mandoor. Respondent contends that it should be allowed to transport a drainage pipe through the mandoor to fix the damaged pipe near the roof fall. R. Br. 11. The Secretary argues that the mandoor is intended to allow personnel to pass through. The Secretary concedes that the personnel door can be used to transport supplies, but only those that can be carried by hand as a miner passes through the mandoor, not large equipment that requires the door to remain propped open. P. Br. 18; Tr. 64,

110, 111-12, 117, 364-65. The Respondent counters that distinguishing hand-held supplies from larger equipment is too confusing, and that a loader pushing a large drainage pipe through a mandoor should be acceptable because the pipe is a type of supply. R. Br. 12.

I conclude that allowing the mandoor to be propped open for 90 minutes to transport a large pipe with a loader would stretch the purpose of the standard beyond the bounds of reasonableness. The context and wording of the regulation make the Secretary's interpretation of the mandoor's intended purpose more reasonable and self-evident. The term personnel door (or colloquially "mandoor") itself makes clear that it is to be used for personnel ingress and egress. The personnel door is listed as a ventilation control, and is to be closed when not in use, which suggests that it should not be propped open to transport large equipment. *Cf., Wolf Run Mining Company*, 32 FMSHRC 1669, 1682 (2010) (holding that the Secretary's interpretation is practically self-evident given the context of the regulation.)

The Respondent argues that they were not given fair notice of the standard before receiving the citation. R. Br. 13. The Respondent further argues that the Secretary has provided no explanation why it is impermissible to transport the drainage pipe through the mandoor with a loader. The Respondent also contends that because the pipe was too heavy to be cut into pieces and hand carried through the mandoor without injury, the Secretary's interpretation of the regulation is contrary to the Mine Act and unreasonable. R. Br. 12.

I do not find the cited regulation to be vague or overly broad, or to provide inadequate notice simply because it does not list every action proscribed, address a specific time period, or mandate what supplies may be carried through the mandoor by a miner travelling between air courses. *See Walker Stone Co.* 156 F.3d 1076, 1084 (10th Cir. 1998) ("regulations cannot specifically address the infinite variety of situations which employees may face and that by requiring regulations to be too specific, we open loopholes, allowing conduct which the regulation is intended to address to remain unregulated.").

The Commission does not require that the operator receive actual notice of the Secretary's interpretation. Rather, the Commission applies an objective, reasonably-prudent-person test. *Island Creek Coal Co.*, 20 FMSHRC 14, 24 (Jan. 1998); *BHP Minerals Int'l Inc.*, 18 FMSHRC 1342, 1345 (Aug. 1996) (when faced with a challenge that a safety standard fails to provide adequate notice of prohibited or required conduct, the Commission has applied an objective standard, i.e., the reasonably prudent person test); *Ideal Cement Co.*, 12 FMSHRC 2409, 2416 (Nov. 1990) (the test "is not whether the operator had explicit prior notice of a specific prohibition or requirement, but whether a reasonably prudent person familiar with the mining industry and the protective purposes of the standard would have recognized the specific prohibition or requirement of the standard.").

Additionally, the Commission has held that an operator has fair notice so long as the Secretary's interpretation of the standard does not seem "so far from a reasonable person's understanding of the regulations that they could not have fairly informed [the operator] of the agency's perspective." *Island Creek Coal Co.*, 20 FMSHRC 14, 25 (Jan. 1998). This is particularly true when no evidence is presented that MSHA ever construed the standard in a manner inconsistent with its position in the instant case. *Island Creek Coal Co.*, 20 FMSHRC

14, 25 (Jan. 1998). No evidence was presented in this case that MSHA ever enforced the standard inconsistently.

Applying the Commission's reasonably-prudent-person test, the operator should have recognized that using a loader to transport a large drainage pipe through a mandoor that was propped open for 90 minutes was prohibited by the standard. I find that a reasonably prudent operator would understand that the mandoor is to be used for ventilation control, and that using large equipment to push a pipe through while the manor was propped open would interfere with this use, especially over an extended period.

Perhaps more importantly, Meadows had actual notice that leaving a pipe through a mandoor was prohibited. Meadows testified that he was aware at the time that he was developing the pipe transport plan that the Shoal Creek Mine had received a previous citation for a having a pipe prop open a mandoor in a fixed position for an extended period. Tr. 364-65.

The very purpose of requiring that the mandoor be closed when not in use and maintained for its intended use is to protect miners from the possible effects of accumulation of methane and other toxic or contaminated air at an active working face through disruption of the ventilation control. The Secretary's interpretation of the cited standard is reasonable and promotes this objective, which fosters miner safety and health.

B. The Violation was S&S

The Mine Act describes an S&S violation as one "of such nature as could significantly and substantially contribute to the cause and effect of a coal or other mine safety or health hazard." 30 U.S.C. § 814(d)(1). The Commission has held that a violation is S&S "if, based on the particular facts surrounding the violation, there exists a reasonable likelihood that the hazard contributed to will result in an injury or illness of a reasonably serious nature." *Cement Div., Nat'l Gypsum Co.*, 3 FMSHRC 822, 825 (Apr. 1981).

To establish an S&S violation under *National Gypsum*, the Secretary must prove the four elements of the Commission's subsequent *Mathies* test: (1) the underlying violation of a mandatory safety standard; (2) a discrete safety hazard – that is, a measure of danger to safety – contributed to by the violation; (3) a reasonable likelihood that the hazard contributed to will result in an injury; and (4) a reasonable likelihood that the injury in question will be of a reasonably serious nature. See *Mathies Coal Co.*, 6 FMSHRC 1, 3-4 (Jan. 1984) (footnote omitted); accord *Buck Creek Coal, supra*, 52 F.3d at 135 (7th Cir. 1995) (recognizing wide acceptance of *Mathies* criteria); *Austin Power, Inc. v. Sec'y of Labor*, 861 F.2d 99, 103 (5th Cir. 1988) (approving use of *Mathies* criteria). An evaluation of the reasonable likelihood of injury is made assuming continued normal mining operations. *U.S. Steel Mining Co. (U.S. Steel III)*, 7 FMSHRC 1125, 1130 (Aug. 1985) (quoting *U.S. Steel Mining Co. (U.S. Steel I)*, 6 FMSHRC 1573, 1574 (July 1984)). I will address each factor in turn.

1. There was a Violation of a Mandatory Safety Standard

For the reasons set forth above, I have found a violation of a mandatory safety standard, satisfying the first prong of the *Mathies* test. Drummond violated 75.333(h) by propping open a mandoor, which was used to regulated airflow, for an extended period of time, while using a loader to push a large drainage pipe through the mandoor.

2. The Violation Contributed to a Discrete Measure of Danger to Safety

The failure to maintain the mandoor for the purpose for which it was built, by propping open the mandoor for 90 minutes in order to transport a large pipe, contributed to a discrete measure of danger to safety. The violation interrupted mine ventilation, which would likely result in an accumulation of methane in the active working face, near potential ignition sources, which would result in a fire. The hazard contributed to by the violation was a methane-related fire caused by interrupted ventilation which would result in an increased amount of methane at the active working face, where ignition sources were present. As such, I find the second prong of *Mathies* is met.

3. The Violation Contributed to a Hazard That Was Reasonably Likely to Result in Injury

The third *Mathies* factor is typically the most disputed aspect of the S&S analysis, and often the most difficult to apply. The Secretary proves that this element is established if there is “a reasonable “likelihood the hazard contributed to will result in an event in which there is an injury.” *U. S. Steel Mining Co.*, 7 FMSHRC 1125, 1129 (Aug. 1985). When analyzing the violation, the Commission has indicated that the “focus of the seriousness of the violation is not necessarily on the reasonably likelihood of serious injury, which is the focus of the S&S inquiry, but rather on the effect of the hazard if it occurs.” *Musser Eng'g, Inc.*, 32 FMSHRC 1257, 1281 (Oct. 2010); *Consolidation Coal Co.*, 18 FMSHRC 1541, 1550 (Sept. 1996).

In examining the third element for violations that involve hazards of ignition, fire, or explosion, the Secretary must prove that such a hazard is reasonably likely to occur, in addition to proving that the hazard is reasonably likely to result in an injury. *Ziegler Coal Co.*, 15 FMSHRC 949, 953 (June 1993). The Commission held in *Ziegler Coal* that a finding that a fire or explosion hazard is reasonably likely to occur is a necessary pre-condition to finding that an injury is reasonably likely to occur. *Id.*, citing *U.S. Steel Mining*, 6 FMSHRC 1834, 1836 (Aug. 1984). When evaluating the reasonable likelihood of a fire, ignition, or explosion, the Commission has examined whether the requisite “confluence of factors” is present based on the particular facts surrounding the violation. *Enlow Fork Mining Co.*, 5 FMSHRC 5, 9 (Jan. 1997), citing *Texasgulf, Inc.*, 10 FMSHRC 498, 501 (April 1988). Stated more succinctly, is there a confluence of factors that make a fire and concomitant injury reasonably likely? *Utah Power & Light Co., Mining Div.*, 12 FMSHRC 965, 970-71 (May 1990). The Commission has held that the confluence of factors analysis requires consideration of the particular circumstances in the

mine, including the possible ignition sources, the presence of methane, and the type of equipment in the area. *Excel Mining, LLC*, 37 FMSHRC ___, slip op. at 7, No. KENT 2009-1368 (Mar. 9, 2015); *Utah Power & Light Co.*, 12 FMSHRC at 970-71 (Oct. 1990); *Texasgulf*, 10 FMSHRC at 501-03 (Dec. 1998).

There was a unique ventilation system in place, and according to MSHA ventilation specialist Harrison, any interruption, such as a mandoor propped open for an extended period, would affect the ventilation system. Tr. 192, 195. When the ventilation system is uninterrupted, the pull of air toward the back of the section allows the mine to control the accumulation of methane and maintain oxygen levels at the face. Tr. 187, 189, 190-93. The Shoal Creek mine needed an air pull at the tailgate number three entry corner to bleed methane gas to the back end of the section, away from the face, to avoid a methane ignition. Tr. 187, 189-90. This is especially important because the Shoal Creek Mine is a gassy mine that was on a five-day spot inspection at the time of the violation. Tr. 46. The Commission has held that if a mine liberates high levels of methane there may be an even greater potential for methane ignition to occur and that this may be considered in a confluence-of-factors analysis. *Excel Mining, LLC*, 37 FMSHRC ___, slip op. at 7, KENT 2009-1368 (Mar. 9, 2015); *Knox Creek Coal Corp.*, 36 FMSHRC 1128, 1134 (May 2014).

As MSHA supervisory inspector Boylen testified, the greatest risk of methane accumulation occurs on the longwall face and in the bleeder section. Tr. 68. There were numerous potential ignition sources present at the face. At the time of the violation, the longwall was energized. Tr. 80, 82. Harrison testified that power on the longwall face created potential ignition sources that would ignite methane. Tr. 201. Harrison further testified that even if the longwall had been shut down, miners repairing or replacing parts, and welding with a torch, would create an ignition source. Tr. 252. As noted, Boylen reviewed production reports from the date the citation was written. They showed that between 7:30 a.m. and 11:00 a.m., during the time interval when the pipe had propped open the mandoor, miners were changing out a trapping shoe on the tailgate side. Tr. 103. This task required cutting and welding, which created sources of ignition. Tr. 104. Boylen testified that in his experience in the district, such maintenance of mine equipment has resulted in ignitions at the face on various occasions. Tr. 104.

The Respondent argues that because an air measurement was not taken on the date of the violation, the Secretary has not met his burden of proving a reasonable likelihood of a disruption in ventilation and a subsequent methane ignition under the third prong of the *Mathies* test. R. Br. 14. Boylen credibly explained that he did not take readings at the time the citation was issued because the pipe was in the way, and Meadows was eventually pinned to the wall by the pipe and injured during the transport operation. Tr. 69-70. The Secretary presented convincing testimonial evidence based on several calculation methods used by ventilation specialist Harrison that air pressure was affected by the violation. Tr. 197, 229-30, 294-95, 312. Further, the records from the days in between the rock fall and the issuance of the citation show a change in the ventilation, supporting the testimony of Boylen and Harrison. Tr. 228. The Commission has held that an inspector's judgment is an important element in an S&S determination and may be

relied upon as part of the S&S analysis. *Harlan Cumberland Coal Co.*, 20 FMSHRC 1275, 1278 (Dec. 1998); *Mathies*, 6 FMSHRC at 5 (Jan. 1984) (citing *National Gypsum*, 3 FMSHRC at 825-26 (Apr. 1981); see also *Buck Creek Coal*, 52 F.3d at 135-36 (7th Cir. 1995)(ALJ did not abuse discretion in crediting opinion of experienced inspector).

The conditions at the mine at the time the citation was written and the duration of the violation for 90 minutes made it reasonably likely that as ventilation was interrupted, methane would migrate to the active face, where ignitions sources were present, and result in a methane ignition, fire or explosion. Tr. 198-99. Methane liberation from this gassy mine and the unique ventilation system described herein, made it reasonably likely that as the open mandoor disrupted ventilation, methane or other toxic or contaminated air would accumulate at the face. There were ignition source present at the face, including the energized longwall and welding equipment that was in use to make repairs. Given the oxygen present in the atmosphere, the requisite confluence of factors was present to make it reasonably likely that a methane ignition, fire, or explosion would occur causing injury to miners working there. Tr. 82, 103, 252.

4. There Was a Reasonable Likelihood That the Injury in Question Will Be of a Reasonably Serious Nature

With regard to the fourth *Mathies* factor, the record establishes that a methane-related fire or explosion contributed to by the violation was reasonably likely to result in serious injury or illness to miners working at the face, who would suffer burns or inhalation of toxic chemicals, primarily carbon dioxide. Tr. 82.

In sum, considering all the relevant factors, I find the violation was properly designated as S&S.

C. The Citation's Remaining Gravity Determinations were Appropriate

Boylen reasonably determined that "10 persons" were affected by the violation given the number of miners working inby the mandoor when the pipe was being transported. Tr. 83, 351-52. According to Boylen, at the time the citation was written, ten miners were working at the mandoor, and four to eight miners were working on the longwall. Tr. 83. I also find that the designation of "lost workdays or restricted duty" was appropriate for this violation. Boylen credibly testified that if a methane-related fire, ignition or explosion occurred as a result of the interruption in ventilation, miners would suffer burns or inhale smoke or toxic chemicals, primarily carbon dioxide. Tr. 82.⁵

⁵ It is noteworthy that although no evidence or testimony was offered on the subject, the return air being sent to the longwall as a result of ventilation interruption could have contained respirable dust and increased the level of respirable dust at the face, where miners were working. The Commission has held that overexposure to respirable dust can result in chronic bronchitis and pneumoconiosis in miners. *Consolidation Coal Co.*, 8 FMSHRC 890, 898 (June 1986),

D. Respondent Acted with Moderate Rather Than High Negligence by Using the Mandoor to Facilitate Transport of the Large Drainage Pipe

The parties disagree as to whether the violation was properly attributed to Respondent's high negligence. P. Br. 22; R. Br. 16. Although not binding on the Commission, MSHA defines negligence by regulation in the civil penalty context as "conduct, either by commission or omission, which falls below a standard of care established under the Mine Act to protect miners against the risks of harm." Negligence is further defined as "the failure to exercise a high standard of care." 30 C.F.R. § 100.3. A high negligence designation is appropriate when "[t]he operator knew or should have known of the violative condition or practice, and there are no mitigating circumstances." 30 C.F.R. § 100.3 Table X. A moderate negligence designation is appropriate when "[t]he operator knew or should have known of the violative condition or practice, but there are mitigating circumstances." *Id.*

I emphasize that the Mine Act imposes a high standard of care on foremen and supervisors, like superintendent Meadows. *Midwest Material Co.*, 19 FMSHRC 30, 35 (Jan. 1997) (holding that "a foreman ... is held to a high standard of care"); *see also Capitol Cement Corp.*, 21 FMSHRC 883, 892-93 (Aug. 1999) ("Managers and supervisors in high positions must set an example for all supervisory and nonsupervisory miners working under their direction," quoting *Wilmot Mining Co.*, 9 FMSHRC 684, 688 (Apr. 1987); *S&H Mining, Inc.*, 17 FMSHRC 1918, 1923 (Nov. 1995) (heightened standard of care required of section foreman and mine superintendent).

The Respondent argues that its level of negligence should be reduced from high to moderate because the Secretary did not present a history of violations of the cited standard. R. Br. 17. I find that argument unpersuasive. As noted above, Superintendent Meadows testified that he knew that the Shoal Creek Mine had been cited under similar circumstances in the past. Such knowledge put him on notice that a large pipe propping open a mandoor for an extended period of time was a violation. Meadows conceded:

There's a lot of instances where we have got citations at Shoal Creek, I'm almost embarrassed to say, but even the same situation with the pipe going through a man door, but the difference being someone had installed the pipe through a man door and left it there in a fixed position. That is a violation.

Tr. 364. Meadows was aware that the reason why propping open a personnel door was a violation was because of the lasting disruptive effect on the ventilation system. See Tr. 365. For

aff'd, 824 F.2d 1071 (D.C. Cir. 1987). The Commission further held with regard to the fourth *Mathies* factor that "there is a reasonable likelihood that illness resulting from overexposure of respirable dust will be of a reasonably serious nature. *Consolidation Coal Co.*, 8 FMSHRC 890, 899 (June 1986), *aff'd*, 824 F.2d 1071 (D.C. Cir. 1987).

example, Meadows recalled that in one past citation at Shoal Creek Mine, a “pumper would run a flexible hose through a man door that wouldn't allow the man door to close completely.” Tr. 365.

Meadows developed the plan to use the loader equipment to drive the 300-foot piece of pipe through the mandoor. Tr. 328. Meadows stated that the actual length of pipe that he needed was “[p]robably 70 to 80 feet,” rather than the several-hundred-foot portion that was pushed through the mandoor. Tr. 327. Meadows never measured the pipe to determine the length necessary. Tr. 328. Had Meadows cut a much smaller portion of pipe, this action would have at least limited the time that the mandoor was propped open.

While developing and executing the plan, Meadows failed to mitigate the risks presented by the open mandoor. The longwall operation was not shut down or informed of the open mandoor and potential for ventilation disruption. Respondent took no air readings while moving the pipe through the mandoor. Tr. 81-82, 104-05, 386. Meadows testified that he knew a portion of air would go through the mandoor if it was propped open. Nevertheless, Meadows did not consult with any of Drummond’s ventilation engineers, or with MSHA ventilation specialists present that day to examine the roof fall. Tr. 329, 384-85. MSHA witnesses presented several alternatives for transporting the drainage pipe to the rock fall, such as using a Kennedy stopping or equipment doors and an airlock curtain, which would minimize ventilation disruption. Tr. 24, 97, 99-101, 241. Thus, Meadows’s plan was not the only option available. Furthermore, Meadows did not take steps to mitigate any ventilation impact. As a result, MSHA inspectors had to direct miners to place a can bag over part of the mandoor aperture. When the can bag was displaced during the pipe-transport operation, miner Andy Martin had to search abruptly for a curtain. Tr. 358-59.

Respondent argues that because MSHA supervisor Boylen presented conflicting ways to transport the pipe at his deposition and at the hearing, Respondent’s negligence should be reduced. Respondent further argues that Boylen did not offer Meadows an alternative prior to issuing the citation on August 16. R. Br. 17. I note, however, that Respondent has the primary responsibility to ensure mine safety and health, and that had superintendent Meadows asked for input from MSHA or conferred with his own ventilation specialists or engineers prior to implementing his large pipe-transport plan, he would have likely developed a better and safer solution to his conundrum.

Despite the foregoing, I find some mitigating circumstances present and conclude that Meadow’s negligence falls closer to moderate than high negligence. Although Meadows did not select the safest method for transporting the drainage pipe, he did attempt to do so safely. Meadows checked the regulators when the mandoor was open to ensure that positive air was flowing through them. Tr. 361. He communicated his pipe-transport plan to supervisors and held a briefing with the transport crew. Tr. 387-88. He considered other ideas, such as using a

bleeder entry, but determined that there were significant hazards with such options. Tr. 355-56, 406-08.

In addition, the damaged drainage pipe near the roof fall needed to be repaired expeditiously because the flooding would significantly affect ventilation. Tr. 374. Meadows credibly testified that he and his team were operating with urgency. Tr. 323. As noted, a roof fall had occurred on August 14 and damaged a drain pipe at the roof fall area. Tr. 63-67. From August 14 to August 16, work was done to improve roof support so that the damaged pipe could be repaired. Tr. 323-25. Meadows needed to ensure that the non-functioning water pumps would be restored to functional status to prevent water from filling the mine, which would create a host of additional problems. The applicable weekly examination report stated that there was “water over boots” at crosscut 38 and “water waist deep” at crosscut 47. Tr. 243.

Thus, while Meadows knew or should have known of the violation and acted negligently in developing and executing his plan to transport the drainage pipe through the propped-open mandoor, some mitigating factors were present. Accordingly, I reduce the level of Respondent’s negligence from high to moderate on these facts.

E. Penalty Assessment

The Act requires that the Commission consider the following statutory criteria when assessing a civil penalty: 1) the operator’s history of previous violations; 2) the appropriateness of the penalty to the size of the business; 3) the operator’s negligence; 4) the operator’s ability to stay in business; 5) the gravity of the violation; and 6) any good-faith compliance after notice of the violation. *Douglas R. Rushford Trucking*, 22 FMSHRC 598, 600 (May 2000). The Commission is not required to give equal weight to each of the criteria, but must provide an explanation for any substantial divergence from the proposed penalty based on such criteria. *Spartan Mining Co.*, 30 FMSHRC 699, 723 (Aug. 2008).

As I discussed in my final *Big Ridge* decision, in an effort to avoid the appearance of arbitrariness, I look to the Secretary’s assessment formula as a reference point when assessing a civil penalty. *Big Ridge Inc.*, 36 FMSHRC 1677, 1681-82 (July 19, 2014) (ALJ). This formula is not binding, but operates as a lodestar, since factors involved in a violation, such as the level of negligence, may fall on a continuum rather than fit neatly into one of five gradations. Unique aggravating or mitigating circumstances will be taken into account and may call for higher or lower penalties that diverge from this paradigm.

The parties stipulated that Respondent is a large operator and that the originally proposed penalty of \$8,893 would not affect Respondent’s ability to remain in business. MSHA recognized Respondent’s good-faith compliance in abating the citation. I have reduced Respondent’s negligence from high to moderate. The violation was serious and properly designated as S&S. Accordingly, I assess a \$2,678 civil penalty against the Respondent.

V. ORDER

For the reasons set forth above, Citation No. 4481323 is **MODIFIED** to reduce the level of negligence from “high” to “moderate.” Within 30 days of the date of this decision, Respondent, Drummond Company, Inc. is **ORDERED TO PAY** a civil penalty of \$2,678 for the S&S violation found herein.

Thomas P. McCarthy

Thomas P. McCarthy
Administrative Law Judge

Distribution:

Noelle H. True, Rajkovich, Williams, Kilpatrick & True, PLLC, 3151 Beaumont Centre Circle, Suite 375, Lexington, KY 40153

Damon J. Boiles III, Drummond Company, Inc., P.O. Box 10246, Birmingham, AL 35202

Angele Gregory, U.S. Department of Labor, Office of the Solicitor, 211 7th Avenue North, Suite 420, Nashville, TN 37219