



TESTIMONY OF

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ON BEHALF OF
NATIONAL MINING ASSOCIATION

BEFORE THE
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OF THE
UNITED STATES SENATE

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INTRODUCTION

Mr. Chairman, members of the Committee, I am Bruce Watzman, Vice President, Safety, Health and Human Resources for the National Mining Association. Thank you for providing us this opportunity to share our thoughts regarding the issues we face as we strive to meet the mandates of the Mine Improvement and New Emergency Response Act (MINER) Act of 2006 and the challenges that remain as we strive to return each miner home safely to their families after each shift.

Today I want to discuss two related issues: safety technology and safety culture. But, before turning to the specific issues before the committee let me again express our sympathy to the families of the fallen miners at the Crandall Canyon mine. We mourn their losses and are determined to return to the path that existed for much of the past three decades, when steady reductions in fatalities and serious injuries were the rule. That is why we supported strong new mine safety legislation last year, established an independent commission to provide recommendations for new safety risk-based systems and continue to partner with the National Institute for Occupational Safety and Health to develop and test new safety and communication technology.

In 1977 Congress declared in the Mine Act that "the first priority and concern of all in the coal or other mining industry must be the health and safety of its most precious resource – the miner." The mining industry strives to reflect this priority through performance. Indeed, the industry's commitment is reflected in thirty-five years of decreasing injuries and fatalities. And, while last year this steady progress was tragically interrupted by a series of accidents, 83 percent of our nation's operating mines worked the entire year of 2006 without a single lost-time accident. Nonetheless, these recent accidents are a powerful reminder that indicates a need for the industry to reinforce the "safety-first" culture that exists within companies throughout our industry.

MINER ACT

Last year, NMA joined you in supporting passage of the most sweeping mine safety legislation in more than 30 years. The MINER Act, as implemented through Emergency Response Plans, recognizes the need for a forward-looking risk assessment, that good safety practices continually evolve based upon experience and technological development, and that every underground coal mine presents a unique environment and what may work in one may not be effective or desirable in another.

Since passage of the MINER Act the industry has moved aggressively to identify technologies that satisfy the law's requirements as quickly as possible. While more work needs to be done, the industry has made significant investments and progress. Briefly,

- 100,000 additional self-contained self-rescuers (SCSRs) have been placed into service, with another 100,000 on back order.
- All underground coal mines have submitted emergency response plans including plans to supply breathable air and other supplies to sustain miners trapped underground. Units to meet these requirements are being ordered and installed without the normal testing that a device such as these would normally receive.
- All underground coal miners have received new training and will continue to receive quarterly training.
- Underground coal mines have implemented procedures to track miners underground.
- Existing communications systems have been hardened and redundant systems installed.
- More than thirty-five new mine rescue teams have or will be added around the country.

This progress is only the beginning of our continued commitment for reaching our desired goal to protect our nation's miners.

The recent accident at Crandall Canyon spotlighted our continuing challenge to develop reliable two-way communication devices that could help locate and communicate with miners trapped underground. At a time when most Americans are well-connected with each other through cell phones, many wonder why miners cannot communicate from underground to the surface. Intuitively, we understand why: Sending a signal through rock deep underground is far more challenging than signaling through the air.

Apart from these fundamental technical barriers to in-mine or through-the-earth signal propagation, explosions, fire and roof falls produce destructive forces that can damage or destroy system components and render the system inoperable. At present, there is simply no available single system that can withstand all potential scenarios while maintaining mine-wide communications.

Despite these daunting technological challenges, the industry is not sitting idly by until a reliable system reaches acceptable functionality under all circumstances. Today one member of NMA, Alliance Coal, has developed one of several systems that use radio frequency identification (RFID) tags and bi-directional readers to track miner's movement throughout the mine, pre-event. This is an improvement over earlier systems and is considered state-of-the-art. Yet, it too is susceptible to damage by destructive forces that will

affect its functionality. The system currently requires a connective through-the-mine fiber optic cable that is vulnerable to damage and could potentially render the system useless.

NMA member companies recently conducted tests of communication technology being developed primarily for Department of Defense use. The results indicate that improved communication systems are possible. The Kutta system, a subterranean wireless communication system having the ability to couple onto and transmit radio signals using the existing metallic infrastructure in the mines, including metal core lifelines, phone cables, tracks, etc. holds great promise. Its ability to interface with a mine UHF leaky feeder communication system has the potential to integrate an analog and digital handheld multi-frequency radio and complementary repeaters to overcome traditional barriers to enhanced wireless communication.

Obviously there are other improvements in communication that can be achieved. Our concern is not that additional communication requirements will be mandated, nor is it the cost of communication systems. Rather, it is that realistic expectations of what is technologically achievable drive whatever requirements become the industry practice. Working with researchers at the National Institute for Occupational Safety and Health (NIOSH) we continue to approach this issue through sound science and realistic timeframes for implementation.

In sum, there is no silver bullet technology yet available. True "through-the-earth" wireless technology does not yet exist. Until we overcome the technical barriers that preclude transmission of signals through the earth, the systems will require some form of underground backbone and infrastructure, which are susceptible to damage. Nevertheless, the perfect solution may still be beyond reach, we will not be deterred in the quest to find and deploy it.

CREATING A CULTURE OF PREVENTION

We have so far commented on technical improvements and these are clearly important. But perhaps the most important element in improving safety is the relentless focus on "safety culture". For successful companies safety culture exists at every level of the organization. In those companies with outstanding safety performance safety is emphasized at every meeting, at every shift at the mines and is an integral part of the business model.

In a recent speech to the Utah Mining Association, J. Brett Harvey, President and Chief Executive Officer of Consol Energy, Inc. stated this succinctly. Let me quote key passages from his speech:

"To achieve our goal, we will need to join the science of safety with a culture of safety.

The science of safety is technology-driven. We use technology to help us monitor conditions, to provide early identification of problem areas, to improve communications between sites underground or between the underground and the surface, and to enhance the safety of equipment.

By deploying technology to augment the efforts of our employees, we can minimize physical conditions in a mine as a source of accidents. We are great engineers, and we intend to engineer our mines so that the physical conditions in the mine are as predictable as those inside this room.

The culture of safety, on the other hand, involves engaging the mind of every employee. We want to make safety their core value. You do that in many ways: with constant training regarding safe work practices, with regular discussion of safety issues -- both at work and at home, and with programs that acknowledge and reward safe work practices and safety achievements."

Mr. Harvey's remarks reflect what so many in the industry have come to recognize, that safety must be a core value that "trumps production, it trumps profits, it trumps all other rules, policies or procedures." These same views were captured by the Mine Safety Technology and Training Commission (MSTTC) in its December 2006 report, *Improving Mine Safety Technology and Training: Establishing U.S. Global Leadership*. In the section on prevention the Commission stated that:

Prevention requires that systematic and comprehensive approaches be used to manage risks. Compliance is an important aspect of prevention, but it is more important to realize that it is only a starting point in a more comprehensive process of risk management.

A critical action to ensure success of the process for any company is the creation of a "culture of prevention" that focuses all employees on the prevention of all accidents and injuries... In essence the process moves the organization from a culture of reaction to a culture of prevention. Rather than responding to an accident or injury that has occurred, the company proactively addresses perceived potential problem areas before they occur.

To achieve these goals we will be working with recognized experts to develop a safety management system that encourages integration of safety into the entire suite of business management systems.

Our efforts will build upon the strong leadership demonstrated last year by the industry through the establishment of the MSTTC as an independent body of safety experts charged with examining how advanced technology and training procedures can be more readily adapted for use in our mines. The commission provided a pro-active blueprint for achieving zero fatalities and zero serious injuries in U.S. underground coal mines and our actions going forward will further the adoption of the commission's blue-print.

Risk assessment and management are well-established practices that are employed in many industrial settings. Our goal is to formalize this process for use throughout the mining industry so that we can identify, eliminate and manage conditions or practices that have the greatest potential to cause injury. In so doing we hope to develop a system that recognizes the MSTTC objective to foster an approach that is "founded on the establishment of a value-based culture of prevention that focuses all employees on the prevention of all accidents and injuries."

Our objective is prevention of accidents, injuries and illnesses and reinforcing a culture of prevention. Decisions will be based upon sound science recognizing technologic limits, where they exist. By developing risk-based safety priorities we will identify and focus resources on conditions that most directly place miners in potential peril. Our goal is to foster industry-wide partnerships among coal companies and equipment and service supply providers for the research, development and commercialization of new practices and technology that will raise the performance bar industry-wide.

Conclusion

Some believe we must do something quickly with mining legislation otherwise nothing will change. Mr. Chairman let us assure you that things are changing and will continue to change until we reach our mutually shared goal. We would submit to this committee that legislation without the support of science and facts is not progress. This committee and the public must not rush to judgment on the necessity for additional legislation. We achieve more as a total mining industry to solve a problem, without agendas, when we pool the collective efforts of industry, labor and government representatives.

Today, mine safety and health professionals face challenges far different from those anticipated when the Mine Act was enacted. Today's challenge is to analyze why accidents are occurring at a mine, then use that analysis as a basis for designing programs or techniques to eliminate or manage the accident promoting condition or cause. Where existing technology is not sufficient, mine operators must be afforded the flexibility to use all existing, non-traditional means to protect miners.

Mr. Chairman, once again, on behalf of the members of the National Mining Association, thank you for the opportunity to give our perspective on this

vital public policy matter. If you or the other members of the committee require additional information, we stand ready to provide it.