

**TESTIMONY OF**  
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**PRESIDENT**  
**INDUSTRIAL MINERALS ASSOCIATION – NORTH AMERICA**  
  
**BEFORE THE**  
  
**SUBCOMMITTEE ON WORKFORCE PROTECTIONS**  
**COMMITTEE ON EDUCATION AND THE WORKFORCE**  
**UNITED STATES HOUSE OF REPRESENTATIVES**  
  
**HEARING ON “MODERNIZING MINE SAFETY”**  
  
**MAY 4, 2011**

Chairman Walberg, Ranking Member Woolsey, and Members of the Subcommittee:

I am Mark Ellis, president of the Industrial Minerals Association – North America, also known as IMA-NA. I also serve as president of the National Industrial Sand Association (NISA) and executive director of the International Diatomite Producers Association (IDPA), two minerals trade associations that also are members of IMA-NA. I have more than 30 years experience addressing mine safety and health matters.

IMA-NA represents companies that extract and process a vital and beneficial group of raw materials known as industrial minerals. Industrial minerals are the feed stocks for many of the products we take for granted, such as glass, ceramics, plastics, paper, and building products. It is the unique chemical and physical properties imparted by these minerals that make them valuable. Minerals represented by IMA-NA include ball clay, barite, bentonite, borates, calcium carbonate, diatomite, feldspar, industrial sand, kaolin, magnesia, mica, soda ash, talc, wollastonite and a variety of other minerals. IMA-NA mineral sections typically represent 75-100% of the North American production of these industrial minerals.

Mr. Chairman, thank you for inviting the industrial minerals industry to testify today. Our sector often is forgotten in the attention paid to other, more familiar, mined products. In many ways, the low-profile of our industry is a testament to our ability to extract and process minerals using safe and responsible methods.

My message to you today is fourfold. First, the safety of America's miners is the paramount responsibility of all who work in the mining industry. Second, I ask that we all spend some time today rethinking what initiatives will modernize mine safety. Third, embracing technological innovation will modernize mine safety. Finally, please recognize that not all mining is the same.

### **Safety Is The Paramount Responsibility**

The industrial minerals industry is proud of our contributions to reducing both the number and, more importantly, the rate of mining-related deaths, injuries, and illnesses. But let us not lose sight of the fact that the measure of our success is the safety and health of the mining workforce. There is absolutely nothing more important than sending miners home safe and healthy at the end of each day.

Mining presents risks unique to minerals extraction and processing that must be recognized and taken seriously, and anyone who does not affirmatively and proactively minimize these risks has no business operating mines. But the people you encounter in the mining industry generally are good, ethical individuals, who are dedicated to the protection of those who work in our mines and processing facilities. In fact, we commend all those who seek to drive fatality and injury rates to zero, including the U.S. Congress, employees at the Mine Safety and Health Administration (MSHA) and the National Institute for Occupational Safety

and Health (NIOSH), other government officials, labor unions, mining communities and families, mine management, health and safety professionals, the media, and last but not least the miners themselves.

In the 33+ years since passage of the Federal Mine Safety and Health Act of 1977, the mining industry (and here I am referring collectively to the mining industry as a whole) has made significant gains in reducing both the number, and more importantly, the rate of mining-related deaths, injuries and illnesses. The industrial minerals industry is proud of our contributions to this effort and the successes together we have achieved. But let us not lose sight of the fact that the measure of our success is not the number or severity of the enforcement actions taken against mine operators, but the safety and health of the mining workforce.

Mr. Chairman, if I were to ask you what the leading cause of injury is in the industrial minerals industry, what would be your guess? Explosions, lung disease, falling rocks, or mobile equipment accidents? In fact, ergonomic or musculoskeletal injuries from slips, lifting, repetitive movement and the like represent 87% of the injuries in our industry.

A basic tenet of the safety profession is to first identify the hazard. I can't say that the industrial minerals industry has eliminated all non-ergonomic hazards in the workplace, just as I can't say we've eliminated all unsafe behaviors, but our injury statistics are telling us something and we are responding to that message. We want to address what is injuring our miners. So what have we done?

IMA-NA formed an ergonomics task force in 2005. We partnered with the National Institute for Occupational Safety and Health (NIOSH), supported its research, and produced a

variety of products to address ergonomic hazards in the mining industry. Our companies are responding, they are evaluating their workplaces for ergonomic hazards, they are training mine personnel to eliminate unsafe behaviors, they are installing controls, and they are preventing injuries; all without a single legislative or regulatory action.

Our industry has not been timid in its embrace of public-private partnerships. We have formed another partnership with NIOSH and MSHA to address dust control because minimizing the hazards associated with exposure to respirable dust is a major priority for our companies. This particular effort will culminate shortly in the publication by NIOSH of a definitive resource document filled with information to help the minerals industry to manage dust control intelligently.

And not insignificantly, we also have maintained an Alliance with MSHA that has been enormously successful in achieving substantive results “beyond compliance” and which has improved the already outstanding safety programs of our membership. A few examples of the successes achieved through this alliance merit attention. Each year we identify and honor best-in-class companies in the industrial minerals industry for their safety performance. This includes not only companies with the best overall safety performance, but individual mining operations that operate without injuries in excess of 200,000 continuous work hours. We also generate and provide an analysis of safety performance at each company covering each of their individual operations. The goal here is to ensure that senior company executives know not only how their company and its constituent units are performing on the safety front, but how they compare to companies of similar size. Finally, I’d like to highlight that IMA-NA and MSHA jointly developed “A Practical Guide to an Occupational Health Program for Respirable Crystalline

Silica.” The model program is based largely on material developed by MSHA and the National Industrial Sand Association. The NISA voluntary occupational health program goes far beyond regulatory requirements, represents thousands of hours of work by dedicated professionals, and no doubt is the primary cause for the virtual elimination of silicosis (the world’s oldest occupational disease) from their workplaces. The companies did this, not because the law requires it, but because it is the right thing to do. IMA-NA thanks Assistant Secretary Main and his dedicated colleagues at MSHA for their continuing contributions to this Alliance.

### **Rethinking What Initiatives Will Modernize Mine Safety**

This leads me to my second point. Mr. Chairman, it is time to rethink what types of initiatives will modernize mine safety. We acknowledge that there have been recent preventable tragedies in the mining industry that only stand to highlight the need for continued vigilance. However, the overall safety performance of the mining industry may be a surprise to some. For instance between 2002 and 2009, the fatality rate decreased by 49%, and the total injury rate decreased by 32%. Further, the mining industry compares quite favorably to other business and industrial sectors. In 2009, the total injury rate was 3.2 for the mining industry as a whole (based on the number of injuries per 200,000 hours worked). This rate is half that of many other business and industrial sectors. In fact, the mining industry’s collective injury rates are below the 3.9 average for business and industry as a whole.

We believe that the mining industry is not in need of legislative reform, and that MSHA already has the statutory and regulatory authority it needs to compel compliance with the law by recalcitrant mine operators. This has been demonstrated recently by MSHA’s utilization of

its injunctive relief authority and its decision finally to begin placing mines on a “pattern of violations” status.

Today’s approach to safety relies on such concepts as “behavior based safety.” Threats and intimidation have been proven to be ineffective in getting “buy-in” on safety. And “buy-in” is what is needed because what really matters is how people act when no one is watching.

The mining industry has made considerable advancements in the development of safe processes and controls, and any efforts to improve mine safety should recognize the level of sophistication in modern mine safety management.

Mr. Chairman, IMA-NA believes that the best solutions to protect the lives of miners emerge from joint public-private partnerships as opposed to over-reliance on “command-and-control” regulatory schemes. It is human nature to take greater ownership in something that you helped to create, and collaborative programs are destined to “get-things-right” from the outset as everyone has played a role in their creation.

MSHA should focus its resources and the powers it already possesses where they are needed most.

As members of this subcommittee likely are aware, MSHA’s statutory mandate covers a mining industry workforce of about 350,000 miners working at fewer than 15,000 mining operations. By contrast, OSHA’s statutory mandate covers the construction, agriculture and maritime sectors, and general industry, with in excess of 130 million employees working at millions of workplaces. And both MSHA and OSHA seek to fulfill their statutory mandates with roughly the same number of federal employees. One reason it takes so many MSHA inspectors to fulfill the agency’s statutory mandate is that the Mine Act requires each underground mine

to be inspected in its entirety four times per year and each surface mine to be inspected in its entirety two times per year. At some larger mines, that MSHA inspector presence can become almost a continuing presence. And these periodic inspections are mandated regardless of whether the mine demonstrates an exemplary safety performance or an unacceptable one. While these mandatory federal inspections without doubt have contributed in some measure to the steady improvement in mine safety performance, strict adherence to the mandate has prevented MSHA from re-allocating scarce inspector resources where they are needed most.

IMA-NA urges Congress and the Department of Labor to leverage the existing safety programs currently being utilized by the mining industry. We believe that America's miners would benefit greatly by implementing a program based on public-private partnerships, for instance a program similar to OSHA's Voluntary Protection Program (VPP), and that doing so would be a more efficient use of MSHA's resources. Since OSHA launched the VPP in 1982, more than 2,000 worksites have been approved for VPP status. VPP sites must demonstrate an effective safety and health program and operations must meet performance-based criteria for safety and health. Because this program is intended to promote a cooperative approach to workplace safety, the support of employees is a prerequisite for acceptance into the program. Worksites accepted into VPP are exempt from programmed inspections, but are subject to inspections generated by complaints, accidents, and other significant events. The program has generated impressive results, with the average VPP worksite having injury/illness rates that are approximately 50% lower than industry averages.

Instituting programs such as this will allow MSHA to hold out the success of VPP participants to the rest of industry as examples of the benefits that can be derived from

successful safety and health programs. Recognizing resource limitations at MSHA, a VPP-type program would be a fiscally responsible way to help promote safety and health success stories, while at the same time improving efficiency by freeing the agency to focus its scarce inspection resources on those companies and operations that truly merit attention and need assistance to help strengthen their programs.

### **Embracing Technological Innovation Will Modernize Mine Safety**

Mr. Chairman, I would be remiss if I did not at least touch on the subject of technological innovation when discussing modernizing mine safety. This committee is to be commended for the technology-forcing provisions included in the MINER Act. While some intractable challenges do not lend themselves to technical solutions, solutions that work or offer promise should be embraced.

I have one example that utilizes the controlled use of compressed air to clean “take home” dust from a miner’s work clothes. The technology was developed in collaboration between an IMA-NA member company, that company’s workforce, and NIOSH. In essence, the technology involves a clothes-cleaning booth that whisks the dust from the clothing and safely discharges it from the work environment. It has potential application at both MSHA- and OSHA-regulated work sites, but both agencies currently have regulations on their books addressing the use of compressed air that restrict the introduction of this technology. Both agencies have expressed interest in the technology informally, with MSHA approving its use in a limited number of instances under its petition for modification procedures. However, a rulemaking of general application is the preferred method to make this innovative technology



more readily available, thereby reducing workers' exposure to potentially harmful respirable dust.

Another example of cutting-edge technology involves the apparatus I have in front of me on the witness table. The so-called "Helmet-CAM" uses a hardhat-mounted video camera to capture a video of tasks performed by a mobile worker throughout the workday with the worker's respirable dust exposure also displayed in real time on the video to better identify areas or tasks of high exposure. Combining these two different forms of information together allows for the identification of key processes and/or tasks that significantly impact a worker's personal dust exposure. Once areas of high respirable dust exposure are determined, work practices or control technology can be developed to address the potential overexposure. The work practices or control technology then can be re-evaluated to determine its effectiveness in reducing the worker's dust exposure. This technology also is the result of a collaborative effort between an IMA-NA member company, that company's workforce, and NIOSH.

### **Not All Mining Is The Same**

It is important to note that not all mining is the same. The nonmetallic minerals sector of the mining industry simply does not present the same degree of hazard as other sectors. No fatality is acceptable, but we note that between 2003 and 2009 our fatality rate averaged nearly 80% less than the sector with the highest rate. It also should be noted that the nonmetal sector in the past has achieved the universally pursued goal of zero fatalities, most recently in 2006. To maximize advances toward our common objective of safe and healthy miners, the focus of any reform, legislative or otherwise, must focus on what is needed most and where the

greatest benefit can be realized. The same easily can be said of enforcement and compliance assistance.

### **Conclusion**

Modernizing mine safety is an ongoing activity and the best results are achieved through collaboration between industry and government. Regulatory compliance and reasonable enforcement still are necessary. However, the measure of our success is not the number or severity of the enforcement actions taken against mine operators, but the safety and health of the mining workforce. We also need to be prepared to recognize and acknowledge superior mine safety performance as readily as we condemn unacceptable performance.