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Profile



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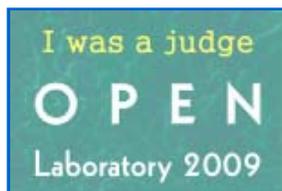
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[Can OSHA ban a dangerous work practice?](#)

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Posted on: August 19, 2010 9:55 AM, by [Celeste Monforton](#)

Earlier this month, Labor Secretary Solis [proposed more than \\$16 million](#) in penalties [to 17 employers](#) involved in the construction of the Kleen Energy Systems power plant in Middletown, Connecticut. The construction site was the scene of a massive explosion on the morning of February 7 in which Peter Chetulis, Ronald J Crabb, 42, Raymond Dobratz, 58, Chris Walters, 42, and Roy Rushton, 37 were killed; Kenneth Haskell, 37, later died from his injuries. More than 50 other individuals were injured and residents as far as 20 miles away felt the blast.

Investigations by the U.S. Chemical Safety Board (CSB) and the Occupational Safety and Health Administration (OSHA) determined that high-pressure natural gas was being used to clean debris from pipes. The practice is **extremely dangerous** because the gas is highly flammable---the smallest ignition source, like a static-electric spark, can cause the gas to explode. In the Middletown, CT explosion, neither agency was able to identify the exact ignition source, but offered several possibilities including the electric heaters being used and the welding taking place during the "gas blows." Regardless of the exact ignition source in this particular disaster, both the CSB and OSHA conclude that using natural gas to blow clean pipes puts workers at very serious risk of death and injury.

In a [June 28 report](#), the CSB said the practice should be abolished. It made several recommendations to OSHA, among them,

"OSHA should issue a regulation to: Prohibit the release of flammable gas to the atmosphere for the purpose of cleaning fuel gas piping;" and "Prohibit flammable gas venting or purging indoors. Prohibit venting or purging outdoors where fuel gas may form a flammable atmosphere in the vicinity of workers and/or ignition sources."

Just about a month after the CSB made its recommendations, [OSHA announced the citations and penalties](#) related to the Kleen Energy plant disaster. OSHA's news release called these "gas blows" a "deadly practice," and during its August 5 press briefing about its investigation, OSHA chief David Michaels, PhD said the practice was "inherently dangerous."

The phrases "deadly practice" and "inherently dangerous" echoed in my head as I listened to the press briefing. Assistant Secretary Michaels indicated that OSHA would be addressing the problem immediately by issuing

"a warning letter to natural gas power plant operators regarding the dangerous practice of cleaning fuel gas piping using natural gas."

(As 8/18/2010 at 5:30 pm EST, OSHA's public affairs office has been unable to confirm whether these warning letters have been sent.)

Rebecca Smith of the *Wall Street Journal* asked the first question during OSHA's Aug 5 press briefing:

"I'm struggling with what seems to be a real contradiction in OSHA's action. On the one hand you say that the practice of gas blows is inherently dangerous and yet you appear to be willing to tolerate a continuation of the practice."

The CSB report, she said, indicated

"there is basically no way to make it safe.I really don't understand why OSHA isn't simply abolishing it."

That's a good question. *Does* OSHA have the authority to abolish a workplace practice that is unsafe?

Short answer: Yes. OSHA can abolish an unsafe work practice. Over the agency's 40 year history it has done so numerous times. OSHA's [excavation standard](#), for example, prohibits workers from entering an unshored, unshielded or unsloped trench that is more than 5 feet deep (and not made of stable rock.) OSHA's hearing conservation standard prohibits workers from being exposed to noise levels that exceed 115 db for more than 15 minutes in a single day. OSHA's asbestos standard prohibits dry sweeping. So, yes, the agency can ban unsafe practices.

Long answer: OSHA can't, however, simply issue an edict: "We hereby ban natural gas blows." Even for something that is extremely dangerous, and for which there are feasible and much safer alternatives, OSHA must issue a regulation to prohibit (or compel) a change. (Of course, some employers don't wait for OSHA action to make safety improvements, but for those who don't, OSHA sets a minimum standard that employers are obligated to follow.)

OSHA's process for issuing a new regulation is not a speedy one. (Some of the slow pace stems from principles of due process, as well as statutory and administrative requirements like Presidential Executive Orders, while other reasons are managerial, organizational and political.) During the regular rulemaking process for a safety standard, OSHA has to propose what the new rule will be (and may propose several alternatives), and offer evidence to demonstrate that the new standard will substantially reduce a significant risk of material impairment or harm and provide the most cost-effective means of achieving the intended goal. The regulatory option ultimately selected by OSHA has to be feasible for the affected industries. Finally, OSHA is obligated to follow certain procedures outlined in the Administrative Procedure Act, in particular public notice and comment, in proposing and finalizing its new standard. (For readers who are policy geeks, here's [my flowchart](#) of major steps in the OSHA rulemaking process.)

The *Wall Street Journal* reporter pressed the assistant secretary about banning a practice that OSHA itself says is inherently unsafe. OSHA chief Michaels responded:

"Our position is, right now, if you're going to do it, it must be done safely or chose an alternative. That may change as we pursue this further. For us to issue a standard it would take several years."

Dr. Michaels was giving the participants of the press briefing a reality check about OSHA's current rulemaking system: it does take "several years" for the agency to issue a new health or safety standard, and that's an optimistic characterization. There are many hazards faced by U.S. workers that are not adequately regulated, and the culprit is an OSHA rulemaking system that's paralyzed. (The remedy involves more political leadership and legislative change than the White House and Capitol Hill can muster these days.)

The *WSJ's* Rebecca Smith tweaked her question and asked the OSHA chief:

"Does OSHA have the power to abolish, pending a rulemaking, the practice of using natural gas and to require the industry to use compressed air which the industry said they are willing to do?"

As noted in the CSB report, some of the major players in the industry---General Electric Co, Siemens AG and American Electric Power---have already said they will be using (or telling their customers to use) compressed air or nitrogen for the pipe cleaning blows instead of the highly flammable natural gas. Another strength of the CSB's report is the exploration with industry experts on alternatives pipe-cleaning methods that still adequately protect the power plants' turbine blades.

In order to abolish the practice pending a rulemaking, Dr. Michaels responded:

"We would have to issue an **emergency temporary standard** to do that."

The assistant secretary was referring to a provision in the OSH Act allowing the agency to issue an emergency regulation without initially giving interested parties a formal opportunity to comment on it. [Section 6\(c\) of the Act](#) permits the Labor Secretary to issue a regulation that takes affect immediately in situations where workers face a "grave danger" and the rule is necessary to protect them from that danger. The emergency rule is only effective for 6 months, and during that time OSHA must conduct regular notice and comment rulemaking, with the emergency temporary standard (ETS) functioning as the proposed rule.

Of course with any federal regulation, like an OSHA ETS or final rule, an interested party can request judicial review of the agency's decision, setting up the possibility that the rule is halted temporarily (i.e., a stay) or vacated by a Court (in OSHA's case, a U.S. Court of Appeals or ultimately the Supreme Court). OSHA's rules have for the most part been viewed favorably by the Courts. That doesn't mean they haven't been challenged---nearly all of them have----but ultimately, the agency's approach to protecting workers from death and serious harm has been upheld.

As far as OSHA's ETS's are concerned, the agency has issued nine of them, starting in 1971 with an exposure limit for airborne asbestos. The last OSHA ETS was issued more than 30 years ago. Many OSHA officials and attorneys with the Labor Department are quick defend the agency's reluctance to use the statute's ETS authority. They point out that in five of the nine instances, the Courts forced OSHA to withdraw the ETS. Factually, that's true, but I see more to the story.

No argument from me that the legal burden for an ETS is steep. First, OSHA must demonstrate that workers face a "grave danger," and second, that the rule is necessary to fill the gap in protection during the 6 month period while the agency conducts regular notice and comment rulemaking. Looking at OSHA's history of using its ETS authority as simply a 4-5 win-loss record, it might seem bleak, but I don't see it that way. Four of the nine ETS's took effect and were promptly replaced within the required six months by permanent standards. Only one of the nine ETSs, a rule on organophosphate pesticides, was not pursued after it was challenged and then deemed to be preempted by US EPA.

For the remaining hazards, even though the ETS's were vacated by the Court and withdrawn, OSHA was able to issue permanent standards for each of them within one year of the ETS. This tells me that despite "losing" the ETS, the advance work on these rules allowed OSHA to finalize them quickly and get the protections in place for workers. Lawyers may consider them legal losses, but these cases led to concrete protections for workers. (The Courts' instructions note that OSHA can't simply use the ETS provision for administrative expediency to shortcut public notice and comment. OSHA must demonstrate that workers will face grave harm during the six months leading up to the final rule if not for the protections provided by the emergency rule. In some ways, addressing an inherently dangerous practice like gas blows may lend itself better to an ETS than say exposure to a carcinogen. One may be able to count the number of injuries and deaths avoided in a six month period with an ETS in place, where there's much more uncertainty about the number of latent cancer cases avoided because of six extra months of protection.)

At the end of the press briefing, Dr. Michaels returned to the question of whether OSHA can ban an inherently dangerous work practice.

"It's complicated and difficult for us to do that because we have to show in a Court that there is no alternative and that's a very high bar. And we believe we would be told by industry that this can be done safely. We think it's inherently dangerous but we don't believe that we can successfully go in and say there is no alternative, you must ban it."

He also said,

"we would love to be able to ban it [gas blows], but we can't."

I realize that the OSHA assistant secretary has a whole slew of government attorneys providing him legal advice. I suppose that some have told him that proposing a ban on gas blows is not a viable regulatory option, or using the term "ban" is taboo. When I study the statute and case law, however, I believe that OSHA does have the authority to abolish a practice that poses a significant risk of harm to workers. It can't be done with the snap of a finger. There *are* procedures the agency is obligated to follow, but it has banned, abolished, prohibited or whatever you want to call it, unsafe work practices. OSHA may attempt to do so and fail because, like all of its regulatory actions, affected parties have a right to challenge them and have their day in Court. But, OSHA does have the authority to try, and when it has tried to issue rules to protect workers' lives and health it has succeeded.

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1

Perhaps the tactic needed is not an outright ban but Furthermore, the mere fact that rules are proposed can have significant impact on industry practices.

Leagally, companies are not required to conform to proposed rules. However, they can be expose themselves to considerable liability if they ignore potential safety improvements.

Posted by: Chilidog | [August 19, 2010 10:25 AM](#)

2

OSHA will, eventually, work its way around to stopping this. IMHO the agency has been systematically weakened, compromised, defunded, restructured to keep its teeth well hidden behind multiple bureaucratic muzzles, and generally made safe, slow and predictable for business to be around without needing to fear for their rear ends, or their profits. That it actually gets something done and makes progress is something of a miracle.

But there is a much faster, much more nimble, much more threatening to business organization that can pretty much snap its fingers and force compliance: insurance.

The threat to raise rates or withdraw insurance coverage entirely gives contractors cold sweats. The law, and most contracts, demand coverage. If your company lacks insurance, because it was dropped or you can't afford it, a contractor can't get jobs, and won't work.

Posted by: Art | [August 19, 2010 11:05 AM](#)

3

>"It's complicated and difficult for us to do that because we have to show in a Court that there is no alternative and that's a very high bar. And we believe we would be told by industry that this can be done safely."

No, the approach to show that alternative, safer *and cheaper* purging gases exist, are readily available and that there is no logical excuse for using compressed methane to remove piping debris, particularly when venting a highly combustible gas to an active construction area!

What about worker exposure to toxic petroleum fumes? Not an issue here? Huh. Why weren't workers evacuated from the area before the purge and vent?

The environmental & safety manager should have been onboard for construction of the Kleen Systems plant.

squint Something really stinks here. Is OSHA under lobby pressure? Why would they continue to allow this dangerous practice in the first place??

From a chemical-, environmental- and safety-engineering perspective, it's a no-brainer.

'some of the major players in the industry---General Electric Co, Siemens AG and American Electric Power--- have already said they will be using (or telling their customers to use) compressed air or nitrogen for the pipe cleaning blows instead of the highly flammable natural gas.'

This is what I would have expected, but they are acting after the fact. No one doing safety reviews, eh? The subcontractor tier needs to make sure that prohibition clauses are ironed into sales contracts to limit liability blowback. That will fix their wagons!

Alex is correct, the insurers can also put contractual pressure on the industry to prevent use of methane as an option for purging lines.

Natural gas field development and gas plant energy station construction is on the rise in the US. There are secondary parties that also need to be considered by OSHA: homeowners living nearby.

'Many of the homes in both towns suffered physical damage and needed major repairs because of their close proximity to the blast, which could be felt all the way down the Connecticut coastline. The plaintiffs' homes are located in a widely-recognized and clearly proven high-impact "blast zone.

This is a serious side issue to plant construction and operations safety concerns for workers.

'Homeowners (35 litigants) located in the blast zone not only had to face physical damage and contamination of their property, affecting their ground water supply and septic system, but also elevated property and casualty insurance premiums, emotional distress and the prospect of not being able to sell their homes in the future, the lawsuit states.'

www.middletonpress.com/articles/2010/08/05/news/doc4c59bc464141e509204634.txt

Must have been one helluva shockwave!

Posted by: Passerby | [August 19, 2010 12:46 PM](#)

4

The insurance route works about as well as the regulation route, as a business person you want workmans comp cover? do this, you want liability insurance better purge the lines right or we will raise the premium. In Fl the insurance company put requirements on construction that mean homes can take a hurricane better. Or another example, in Tx you get a discount if you put a hail resistant roof on. (Now I would go one further and say no hail resistant roof no homeowners insurance, for new construction.

Posted by: Lyle | [August 19, 2010 4:45 PM](#)

5

When your workplace practices cause explosions that can be felt 20 miles away, it's not just the safety of the workers that we should be concerned about.

Posted by: [feralboy12](#) | [August 19, 2010 7:12 PM](#)

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