It seems like wherever you turn today you can’t help but hear about the environment and its impact on the ready mixed concrete business. Today, the industry faces real challenges, including those driven by the environmental side of the business. First, within a complex regulatory world, the industry must acknowledge the ongoing USEPA enforcement initiative targeting the concrete industry, and targeted first and foremost at a baseline of environmental compliance (see “USEPA Enforcement Initiative,” Concrete InFocus, Summer 2008). Secondly, the concrete industry faces one of the most challenging economic conditions seen in many years, which makes meeting the challenge of environmental issues all the more difficult, yet perhaps more necessary than ever before (think fines and penalties as a means toward raising operating capital by environmental regulators). Finally, while these factors are clearly negative, the very positive environmental opportunity factor, which is presenting itself to the concrete industry through the sustainability and green building movements, also provides a real challenge to the industry.

Against these challenges (both negative and positive ones), many concrete producers might be confused on exactly how they ought to proceed. What are the best steps to take to meet these challenges? The action list below presents some key points that ready mix producers should be looking at now to ensure a necessarily-high compliance level as well as a means to seize the growing environmental opportunity.

**Training and Inspections** – Want to provide the highest level of environmental security possible? Start off with personnel who have received adequate environmental training appropriate to their job level. If you don’t have access to your own corporate training, seek out training opportunities from your state concrete association, NRMCA (the environmental course is a great place to start) or from knowledgeable consultants who can help. Once your personnel have gotten training, start a regular, documented program of regular plant inspections in order to assess your environmental and operational compliance level. Your inspection program can be anything from regular plant inspections by company personnel (which should be considered the minimum requirement today, particularly for smaller companies) all the way to formal compliance audits conducted by outside consultants under the direction of legal counsel (the highest level of inspections, and which may be more appropriate for larger companies). Without trained inspectors, regularly evaluating your concrete plant, you really don’t know where you stand. Most environmental regulations today require regular, documented inspections (as do most inspectors who might visit your plant). Furthermore, the top environmental performers in the concrete industry use the power of trained staff conducting regular inspections to ensure that they stay out of trouble with regulators or regulations – they do it, you should too!

**Process Water vs. Stormwater** – Understanding the difference between process water (i.e., non-stormwater), and stormwater at a concrete plant and ensuring that the plant’s permitting scenario accurately reflects the plant’s operating condition is one of the most basic issues confronting the concrete industry today, but one that continues to present a very large environmental threat to the industry. In fact, it is precisely this issue that has led to the recent USEPA enforcement initiative facing the industry. While understanding the difference may not be that difficult, the confusion between these vastly differently regulated discharge types continues to result in enforcement, fines and penalties. It’s imperative that each concrete producer know the difference and ensure that they are properly permitted to reflect this difference. If you don’t know the difference and how it applies to the permits that you may have, find out!

**SPCC Plans** – Spill Prevention, Control and Countermeasure plans, dealing with a full range of requirements and procedures related
to potential spills or leaks of petroleum at a concrete plant, is required at any plant that stores in excess of an aggregate of 1,320 gallons of any petroleum product in any sized container down to 55-gallon drum size (e.g., diesel, gasoline, oils, used oil, etc.). Since this regulatory requirement is enforced mainly by the USEPA (as opposed to the state regulators who visit concrete plants far more often), SPCC plans are often overlooked at concrete plants (or, if present, are not regularly updated as required). The penalties for not having an SPCC plan can be steep, particularly if a spill or leak of petroleum occurs (which an SPCC plan can help a producer avoid, providing a real benefit). It is also known that SPCC review will be a facet of the ongoing USEPA enforcement initiative toward the concrete industry. If a concrete plant needs an SPCC plan (or an existing one updated), it should get one immediately!

**Hazardous Materials Reporting** – Federal law requires that the presence of all chemicals stored or used at a concrete plant above a certain threshold be reported to various emergency planning agencies once per year under a program known as “Community Right to Know” reporting (SARA Title III, Sections 311-312 reporting). While many concrete producers view their Community Right to Know reporting as necessary, not many realize that there is a similar (but different) reporting program that requires the reporting of the storage, use or throughput of particularly hazardous chemicals at a concrete plant (toxic chemicals), as well as releases of these chemicals to the environment, which is known as “Toxic Release Inventory” (or “TRI”) reporting (SARA Title III, Section 313). While this reporting program usually applies to the throughput or use of a fairly high volume of nitrate-containing admixtures at a concrete plant, there may also be other materials at a concrete plant that could trigger the requirement of reporting. Non-compliance with these reporting requirements carries stiff penalties and is receiving more attention among all industries, including the ready mixed concrete industry. Concrete producers should evaluate compliance with both of these important programs (NRMCA provides excellent training programs to learn more about these reporting requirements).

**Recycling** – While we usually don’t think of concrete plants as having a lot of potential to recycle, that’s not true. Concrete producers really ought to begin considering the complete recycling of all process water and concrete materials produced on the concrete plant site (i.e., a “zero discharge/waste” operation). These activities will pay numerous dividends, not the least of which will be less environmental regulations and cost, such as those associated with process water treatment and discharges, solids hauling and disposal costs, etc. Many producers who begin recycling process water (e.g., for new concrete production) find that it makes their water discharge situation easier, and reduces water costs, providing a win-win. Similarly, many producers are finding new revenue streams from recycling concrete materials in often very creative ways. There’s another compelling reason to begin recycling process water and concrete materials – it’s becoming so commonplace amongst concrete producers that those not doing it run the risk of becoming “environmental dinosaurs” and attracting a greater degree of regulatory scrutiny.

**Corporate Commitment and Personnel** – Leadership typically starts at the top, and the same is true for environmental leadership. If it appears that environmental compliance is not a serious issue for corporate management, it is unlikely that a sound environmental culture will develop within the concrete company – the kind needed today to survive. It also must be made apparent to all within the company that environmental matters are taken seriously, from top to bottom. Similarly, no company can demonstrate its commitment unless personnel are present to do the job – if no one is going to manage environmental matters, it’s not going to get done (and problems will arise). While a typical ready mixed company may not need an environmental manager on staff, trained personnel with environmental responsibilities throughout the ranks is extremely important.

**Clean up** – The days of the stereotype of the ready mixed concrete industry being a dusty, dirty, unattractive business is long gone, thankfully. However, there are those in the industry who still run their plants like they did 50 years ago. Today, poor housekeeping conditions indicate a lack of environmental commitment and a poor compliance picture and give government inspectors the impression that the facility just doesn’t care! The answer is simple – clean up the plant, do anything and everything possible to make the plant and trucks look as good as possible, and make it a point to keep it that way (training!). Nothing is going to draw inspectors to your site, or provide a bad first impression, than a bad looking concrete plant. Don’t let it happen to you – clean up!

**EMS –** Simply put, consider developing and implementing some type of environmental management system (EMS) in order to be proactive, rather than reactive to environmental matters that affect your plant. An EMS doesn’t have to be complicated or expensive (see “Common EMS Misconceptions,” April-March 2009 InFocus), and can in fact be very helpful to environmental improvement, whatever size company you operate. They’ll help you improve your compliance level, reduce regulatory burdens and costs, and may even uncover opportunities for cost savings.

**Sustainability** – Think the environment is nothing but a drain on your concrete company? Think again! Today, the sustainable development and green building movements provide a lot of opportunity for concrete producers to get involved to their benefit by providing opportunities for new markets, products and customers. If you haven’t looked into this, you’re missing the boat (and you can bet your competitors have!). NRMCA offers a wealth of information regarding concrete’s role in the sustainable development movement, as do most state concrete associations. Look into it and start getting an education – the opportunity is there today waiting to be taken.

As can be seen, these relatively simple concepts can provide a lot of good, at a time when it’s most needed. In these challenging economic times, these ideas can protect you from unwanted environmental liabilities and can provide some new market opportunities. When you look into it, you may find that now is the best time of all to strengthen your environmental commitment!

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