

zephyr[®] *Currents*

January 2000

a publication of
Zephyr Environmental
Corporation

“Everything is
connected,”

Jeff Saitas
TNRCC Executive Director

Sign of the Times: *The Chief Risk Officer* Will “EH&S managers” become extinct?

The importance of protecting public safety and the environment has increased steadily over the last 30 years. Events such as Bhopal, Three Mile Island, and the Valdez oil spill have helped to raise awareness and shape the public’s concept of acceptable risks. As a result, pollution and work-related accidents now pose a variety of potential risks to industry: some financial, others social. In response, companies are changing the ways they view their EH&S programs, increasingly taking a “risk management” approach to addressing environmental, health, and safety issues.

At one time, risk management meant buying insurance and having enough fire extinguishers. But today, a number of factors have combined to elevate EH&S risk management all the way to the corporate boardroom. They include:

- **Tougher Legislation** – Environmental, health and safety legislation is not only extensive, but more stringent. In many countries company directors can be jailed for corporate offenses, and fines can be high.
- **Expensive Insurance** – Following years of large claims for environmen-

tal and product liability losses, insurance is no longer the cheap option it once was. In addition, it is difficult to get insurance for protection from claims due to environmental contamination which developed over a long period of time.

- **Customer Attitudes** - Consumers are more litigious and are less likely to accept product failure. Equally, shareholders are more aware of risk. They are seeking more information in the annual report about the company’s exposure to regulatory risk.
- **A More Critical Public** – The public expects higher standards of corporate behavior than before. It is especially critical of pollution, dangerous products, and corporate fraud. This attitude encourages companies to avoid risking the public’s hostility.
- **Management Attitudes** – Management has learned from other firm’s disasters. Highly publicized events such as the Bhopal and Valdez accidents have shown management that risks are damaging to business.

With these factors in mind, it shouldn’t be a surprise that environmental risk is considered to be the most critical. As shown in the table, when companies were asked which categories of risk they considered

continued on page 3



currently...

Sign of the Times: <i>The Chief Risk Officer</i>	1
Outside the Box.....	2
News Briefs	4
On the Web.....	6

Outside the Box

Looking Back as We Look Forward



David Cabe, P.E.
Zephyr Environmental
Corporation

Currents is published quarterly by
Zephyr Environmental Corporation.

1515 Capital of Texas Hwy South
Suite 300
Austin, Texas 78746
(512) 329-5544
fax (512) 329-8253

3000 Wilcrest Drive
Suite 145
Houston, Texas 77042
(713) 977-8787
Fax (713) 977-8797

zephyr@zephyrenv.com
www.zephyrenv.com

Publisher: Wesley Box
Editor-in-Chief: David Cabe
Layout: Bonnie White

Zephyr is a professional services firm providing consulting, training and software to the industrial, commercial and public sectors. The firm's major areas of practice focus on environmental permitting, compliance and corrective action, incident management, occupational health and safety, risk assessments, ISO 14001 implementation, audits and regulatory tracking.

© 2000, All Rights Reserved.
Zephyr Environmental Corporation

Can you believe that it's been only 29 years since EPA was created? In that brief time, at least from the perspective of those who have been in the EH&S professions almost that long, the proliferation of federal, state, and local environmental, health, and safety regulatory programs and rules has been nothing short of mind boggling. Today, 799 Parts of the *Code of Federal Regulations* are devoted to environmental protection alone.

With the pervasive command and control approach to environmental, health, and safety protection that has evolved over the last three decades, it's easy to forget that in the early days, EH&S professionals approached things quite differently. Back then, pioneers in environmental protection such as the Tennessee Valley Authority (TVA) were already recognized for their initiatives in cleaning up the air and water and protecting other natural resources. Not surprisingly, given the fact that TVA was already an environmental leader in the 1960's, the driving force for its direction was not environmental regulatory pressure. Rather, TVA's proactive environmental stance flowed from its commitment to protect the health and welfare of the citizens of the Tennessee Valley.

Three decades ago, before the advent of ambient and emissions standards, and the threat of enforcement actions, organizations relied on a variety of creative approaches to protect the public. Looking again at TVA, the environmental professionals there developed an innovative pollution forecasting program for regulating the types of fuel and operating loads acceptable from one day to the next at its coal fired power plants. Although this program was far from fail/safe, TVA was successful in averting significant episodes of crop and vegetation damage and in reducing health problems caused by exposure to high air pollution levels.

What does this mean to the manager with EH&S responsibilities in the new millenium? Simply this – we have a heritage of being proactive about environmen-

tal health and safety protection, not just because of pressure from "bright line" standards but because of our commitment to do the right thing. Make no mistake – the profusion of environmental regulations, coupled with the threat of enforcement and penalties, has resulted in meaningful improvements in environmental quality. However, the relative effectiveness of the regulations does not remove our professional obligation to apply good judgement and deliberate care as protectors of public health and welfare, especially when potentially damaging situations never make it to the regulatory radar screen. For example:

- The regulator acknowledges that factors for calculating emissions of dust are unreliable and that certain dust sources are not directly regulated under the law. Does this mean that the EH&S manager has no obligation to evaluate the potential for adverse impacts on the public?
- The regulator requires the use of an emissions control measure with a high removal efficiency (at least on paper) that has not been proven technically feasible for the particular process application. Should the EH&S manager acquiesce to the Agency's wishes for expediency sake and potentially place the public at risk?
- Adoption of a pollution prevention practice with minimal potential impact on public welfare poses a moderate risk to worker safety. Should the EH&S manager encourage the company to adopt the more publicly visible pollution prevention stance anyway?

Such issues can only be successfully addressed through the application of experienced judgment and creativity that goes beyond simply following the rules. As practitioners of the environmental professions, we must remain committed to our obligation to the welfare of the public – an obligation based on our specialized knowledge and experience. What better resolution for the new millennium?

- David Cabe, P.E.
Zephyr Environmental Corporation

Sign of the Times: The Chief Risk Officer continued from page 1

to have the greatest impact on their business, environment and employee safety ranked the highest. In the early 1980's, the environment was rarely debated in the boardroom. By the end of the 1990's, it has taken its rightful place as one of many risks that businesses must manage.

The charter of environmental and safety professionals is to develop and maintain effective programs that minimize risks to the environment, the safety and health of the workers, and the general public. Ensuring compliance with federal regulations, as well as with state and local requirements, is an implied part of the job. However, three trends have emerged that will impact how environmental professionals will be viewed in the new millennium.

The first is a growing awareness of the value of risk-based approaches to environmental decision making. Whether it is risk-based closure of contaminated sites or risk assessments in the permitting process, risk analysis is playing a larger role in governmental policy making. This shift to a risk-based approach in environmental decision making will require environmental professionals to rethink how they approach their areas of responsibility.

The second trend is the steady decline in expenditures for remediation of contaminated soils and groundwater. This trend especially affects early assessment phase activities such as remedial investigations and feasibility studies. Although a number of sites still must be remediated, the emphasis has shifted to prevention of the conditions requiring remediation. This shift from cleaning up past transgressions to focusing on better management of current operations will require environmental professionals to become more risk control oriented.

The third significant trend is the realization that media-specific programs for air, water, hazardous waste, and other pollution control activities have provided limited flexibility to states to implement integrated approaches. The recent reorganization of the Texas Natural Resource Conservation Commission (TNRCC) is an example of a state regulatory agency attempting to correct this situation. "Everything is connected,"

said Jeff Saitas, TNRCC Executive Director. "Strategies that minimize air pollution often times impact water quality and vice versa. We need to build a culture in which individuals look at the total impact on the environment." This trend of integrating or viewing environmental issues as a system will continue at the federal, state and local level.

These trends of risk-based decision making, risk control, and managing environmental programs as integrated systems will reshape how companies view their environmental compliance programs. Viewing environmental issues from the "risk management perspective" will require adjustments. In particular, environmental professionals will need to begin seeing themselves as "risk managers" and not strictly as environmental engineers, geologists, or scientists.

Companies are increasingly delegating the management of their various operational risks to a single person. In fact, some organizations are seriously considering establishing the position of "Chief Risk Officer". Although larger firms will continue to maintain specialists in each area, risk management decision making will become more centralized in most companies. The risk manager in the new millennium will need a broader understanding of all corporate risks including environmental, health and safety risks.

In summary, the risk management focus is shifting from the traditional separate areas of insurance, health and safety, environmental, security, and other sources of business risk to greater emphasis on integration, risk assessment, and constructing realistic controls and contingency plans. The techniques used for risk management are different from traditional approaches to regulatory issues, and the EHS practitioner must adapt. This will necessitate that EH&S managers in the new millennium have all the right tools in their risk manager's tool box.

- Wesley Box
Zephyr Environmental Corporation

Ranking of the Most Critical Risks to Industry

Category	United States	United Kingdom	France
Environment	1	1	6
Health & Safety	2	2	2
Product Liability	3	3	5
Director's Liability	4	7	1
Business Interruption	5	4	3
Fire & Explosion	6	6	4
Due Diligence	7	8	7
Image Impairment	8	5	8
Security of Property	9	9	9
Pension Fund Integrity	10	11	11
Political Risk	11	10	10
Credit Risk	12	12	12

Source: Risk Management, a Boardroom Issue for the 1990's. Sedgewill 1992

News Briefs

TNRCC Extends Final Operating Permit Application Deadline

The TNRCC has delayed the scheduled call-in for the final group of Title V operating permit applications. For facilities in major SIC groups 26, 28 and 29 (paper and allied products, chemical and allied products, and petroleum refining and related products, respectively) the deadline has been extended to May 22, 2000. The TNRCC is providing this 1-month extension in recognition of the fact that some of the application forms which must be used were revised as recently as November 1999. In addition, the TNRCC has offered to extend the submittal date by an additional two months to those applicants who notify the Agency of their intention to transmit their applications electronically. For more information, contact Celeste Wiley at (512) 329-5544.

New Storm Water Phase II Rules May Eliminate Need for SWPPP

On December 8, 1999, EPA adopted its final NPDES Storm Water Phase II rules. Under the changes small municipal sewer systems and construction activities conducted in areas of one to five acres are now subject to the storm water rules. In addition, they extend the "no exposure exclusion" to all categories of industrial activity (except construction). Originally, the no exposure exclusion exempted only activities associated with "light industrial facilities" from storm water permitting requirements. Facilities that qualify for this exclusion and that submit written certifications every five years are exempted from having to permit their storm water discharges. Finally, EPA has clarified its criteria for determining whether storm water is exposed to industrial activity. For more information, contact Jerry Kung at (512) 329-5544.

OSHA Proposes Ergonomics Standard

In November, 1999, OSHA proposed its ergonomics standard requiring all industrial employers whose workers perform manual handling and manufacturing activities to implement a multi-phase program to protect employees from ergonomically-related injuries. About 1.6 million employers would be required to implement a basic ergonomics program. However, a more extensive "full" program would be required if work-related musculoskeletal disorders (MSDs) have occurred. Firms that already have effective ergonomics programs in place and are working to correct ergonomics hazards would be "grandfathered". The proposed standard would require that workers who experience certain MSDs receive a prompt response, evaluation of their injury, follow-up by a health care professional, if necessary, and time off with pay and benefits during recovery. Informal public hearings on the new rules will begin on February 22, 2000, and written comments on the proposal must be postmarked by February 1, 2000. For more information, contact Michael Kickey at (512) 329-5544.

TNRCC Revises NO_x and VOC Rules for Beaumont/Port Arthur

In an effort to take advantage of the EPA's revised air pollution transport policy and to extend the date for demonstrating attainment with the National Ambient Air Quality Standard for ozone to match that of the Houston/Galveston area, TNRCC has adopted new NO_x and VOC control rules for the Beaumont/Port Arthur (BPA) area. The new NO_x rules, which went into effect November 21, 1999, include a limit of 3.0 grams of NO_x per horsepower-hour for lean-burn natural gas-fired compressor engines and change the definition of "thirty-day rolling average". (Note, this new limit for lean-burn en-

january news briefs...

TNRCC Extends Final Operating Permit Application Deadline

New Storm Water Phase II Rules May Eliminate Need for SWPPP

OSHA Proposes Ergonomics Standard

TNRCC Revises NO_x and VOC Rules for Beaumont/Port Arthur

Update on TNRCC Sunset Review

What Ambient Ozone Standard Really Applies?

TNRCC Proposes Regional Ozone Control Plans for Texas

OSHA Proposes Policy on Use of Self Audits During Inspections

EPA Reforms Corrective Action Program Provisions of RCRA Rules

TNRCC Adopts Grandfathered Source Permitting Rules

EPA Proposes Hazardous Waste Identification Rule

gines is consistent with NO_x RACT rules previously adopted in other states.) In addition, new VOC rules, which also went into effect in late November, extend the industrial wastewater control requirements of 30 TAC §115.142 to the BPA area and add certain control requirements related to junction boxes and biotreatment plants. The TNRCC also added new sections §115.160 through §115.169 that specifically address control of VOC emissions from batch processes in the BPA area. For more information, contact Jeff Barnwell at (713) 977-8797.

Update on TNRCC Sunset Review

The Sunset Advisory Commission continues its review of the TNRCC, expecting to issue its report in May 2000. Public hearings on its findings will be held in June with the opportunity for public comments. Those interested in contributing to the analysis of the TNRCC should e-mail Jay Schmidt at Jay.Schmidt@sunset.state.tx.us for details.

What Ambient Ozone Standard Really Applies?

After the new, more stringent 8-hour ozone standard went into effect, replacing the old 1-hour standard, EPA removed areas that demonstrated compliance with the 1-hour standard from having to continue to comply with that standard. Since the DC Court of Appeals has recently remanded the 8-hour ozone standard, the former attainment areas are potentially no longer subject to any enforceable ozone standard. To correct this confusing situation, EPA has initiated the process of reinstating the old 1-hour standard in attainment areas. In the meantime EPA has filed for a rehearing by the Court on the 8-hour standard. For more information, contact Art Bedrosian at (512) 329-5544.

TNRCC Proposes Regional Ozone Control Plans for Texas

On December 16, 1999, the TNRCC proposed far-reaching changes to the State Implementation Plan involving a regional strategy for reducing ozone levels in the Houston/Galveston (HGA), Beaumont/Port Arthur (BPA) and Dallas/Fort Worth (DFW) areas. Included in this regional strategy are proposed changes to Chapter 117 of the TNRCC rules, involving massive reductions in emissions of nitrogen oxides from electric utility boilers, stationary gas turbines, and cement kilns in a 34-county area of east and central Texas. Based on recommendations from the North Central Texas

Council of Governments, TNRCC has also released a proposal for extensive control of NO_x emissions in the DFW area. In addition to upcoming federally mandated controls, the proposed rules would impose a wide spectrum of control measures including limitations on the operation of construction equipment, vehicle emissions testing, reduced speed limits, energy conservation, and electrification of ground support equipment at airports. Comments on the proposed changes are due to the TNRCC by February 14, 2000. For more information, contact David Cabe at (512) 329-5544.

OSHA Proposes Policy on Use of Self Audits During Inspections

The Occupational Safety and Health Administration (OSHA) has issued a proposed policy statement describing OSHA's treatment of voluntary employer self-audits that assess workplace safety and health conditions. According to the proposed policy statement, OSHA would not routinely request self-audit reports at the start of an inspection. Instead, OSHA proposes to treat self-audit reports that result in appropriate corrective actions as evidence of good faith efforts to correct non-compliance situations rather than as evidence of willful violations. For more information, contact Penny Pickard at (512) 329-5544.

EPA Reforms Corrective Action Program Provisions of RCRA Rules

After re-evaluating its Resource Conservation and Recovery Act (RCRA) Corrective Action Program, EPA is implementing a set of administrative changes known as the RCRA cleanup reforms. The goal of these changes is to provide faster and more efficient cleanup of sites that treat, store, or dispose of hazardous waste and that have potential environmental contamination. EPA plans to make these reforms in response to criticism that the current program has resulted in slow progress in cleaning up sites; has emphasized procedures over

actual work in the field; has been based on unrealistic, impractical and overly conservative cleanup goals; and has lacked meaningful public participation. For more information, call David Sorrells at (512) 329-5544.

TNRCC Adopts Grandfathered Source Permitting Rules

On December 16, 1999, the TNRCC adopted the first phase of its rules to implement Senate Bill 766: the non-utility grandfathered source air permitting law of the 76th Legislature. New Subchapter H of 30 TAC§116 codifies the voluntary permitting program to reduce emissions from non-utility grandfathered sources (see the October 1999 issue of *Currents*). To participate in this program, permit applications must be received by September 1, 2001. 30 TAC§116 was also amended to implement those portions of SB 766 that authorize the TNRCC to issue standard permits. For more information, contact Celeste Wiley at (512) 329-5544.

EPA Proposes Hazardous Waste Identification Rule

On November 19, 1999, EPA proposed revisions to 40 CFR§ 261.3 to change the way mixtures and "derived from" materials are considered in classifying hazardous wastes. In particular, stakeholders have been requested to consider and comment on two regulatory options for exempting materials from hazardous waste classification based on concentration. In addition, the proposed rule discusses the possibility of revising the land disposal restrictions by replacing technology-based treatment standards with risk-based standards. If enacted, the proposed revisions will potentially limit the types of materials that must be managed as hazardous wastes. For more information, contact Betty Moore at (512) 329-5544.

On the Web

Zephyr has solutions for every aspect of your environmental, health and safety, and emergency response needs. We exist to help you identify, assess, control and reduce your environmental, health and safety risks. If you haven't been to our website, we invite you to take a look.



See for yourself.
Visit us at <http://www.zephyrenv.com>

Useful Information

For more information on EPA's Strategic Plan for the environment, visit:

<http://www.epa.gov/ocfo/plan/>

For more information on EPA's Risk Management Program, visit:

<http://www.epa.gov/swercepp/>

For more information on the Texas Risk Reduction Program, visit:

<http://www.tnrcc.state.tx.us/permitting/remed/techsupp/>

For more information on permitting of grandfathered facilities in Texas, visit:

<http://www.tnrcc.state.tx.us/grandfathered/index.html>

For more information on OSHA's Self-audit Policy, visit:

<http://www.osha.gov>

*We want to hear from you - send your comments online to
<http://www.zephyrenv.com/fr-comments.html>*

zephyr environmental
corporation
1515 Capital of Texas Hwy, S, Suite 300
Austin, Texas 78746-6544



PRSRRT STD
U.S. POSTAGE
PAID
AUSTIN, TX
PERMIT NO. 2520