Sustainability Report 2009
CYTEC INDUSTRIES INC. is a global specialty chemicals and materials company focused on developing, manufacturing and selling value-added products. Our products serve a diverse range of end markets including aerospace, adhesives, automotive and industrial coatings, chemical intermediates, inks, mining and plastics. We use our technology and application development expertise to create chemical and material solutions that are formulated to perform specific and important functions in the finished products of our customers.

CYTEC AT A GLANCE
- 2009 sales of $2.79 billion
- Approximately 5,800 employees
- 36 manufacturing facilities globally
- 3 research centers
- NYSE: CYT

PERCENT OF 2009 NET SALES BY GEOGRAPHIC REGION

- Europe / Middle East/ Africa: 39%
- North America: 38%
- Asia-Pacific: 17%
- Latin America: 6%
From the Chairman

In 2009, we made strides with our sustainability efforts at Cytec despite operating in a challenging economic climate, and I am pleased to bring you this year’s Sustainability Report.

Sustainability is a subject which is growing in importance and visibility. While continuing our journey toward implementation of sustainable practices in all aspects of our business, we realize that sustainability is not only about environmental stewardship, but also economic progress and social responsibility.

At Cytec, safety, health and protecting the environment is our first priority, and we remain focused on our vision of world class safety, health and environmental performance. In 2009, we were pleased with our safety performance, as we had a milestone year with improvement of six percent over a record setting 2008 performance. Our employees’ dedication to safety is paramount, particularly during a time of change, and we will remain focused on safety as our business climate improves.

We are committed to environmental progress, especially our focus on compliance with regulations and responding to new legislation, our continuous improvement initiatives such as energy and waste reduction programs, and development efforts on environmentally friendly products in order to support the industry in reducing its environmental footprint. Cytec has also made significant progress in the development and public rollout of a tool, the iSUSTAIN™ Green Chemistry Index, for measuring the green chemistry of a product for industry and academic institutions.

Cytec has a significant portfolio of eco-friendly products, with increasing opportunities to grow our business around these products. We have strong differentiated technology platforms, which include our Engineered Materials, eco-friendly Radcure and Waterborne Coating Resins, and In Process Separation Businesses. We are committed to delivering technology that meets our customers’ needs without compromising safety, health or the environment.

Sustainability is a growing worldwide trend, and in 2009, we introduced our employees to the concepts of sustainability and Cytec’s sustainability efforts, with a focused awareness campaign at all of our global manufacturing, R&D and office locations. This effort continues in 2010. Our people are the cornerstone of what Cytec is today. We are committed to providing a culture at Cytec that challenges, engages and rewards our employees, and in turn will help positively impact society.

Through our collective efforts, we are a stronger company as we move into 2010. We will continue to be proactive in addressing our social, environmental and economic opportunities, and this report details our commitment to understanding our impact on the environment and making decisions with our planet in mind. On behalf of our employees, we are proud of our accomplishments, and are looking forward to our future achievements in all aspects of our business.

Shane Fleming
Chairman, President, and Chief Executive Officer

Safety, Health and Environmental (SHE) Policy

At Cytec, we are committed to the safety and health of our employees, contractors, customers and neighbors, and to sustainability and the protection of the environment.

We demonstrate this commitment by striving to:
• Maintain an open dialogue with our stakeholders;
• Continually improve our safety, health, security, and environmental performance by maintaining an effective management system;
• Meet or exceed applicable regulatory requirements;
• Enable our employees to protect the environment and to maintain a safe, secure and healthy workplace;
• Reduce waste and prevent emissions to the environment;
• Conserve energy and materials usage through recovery, reuse and recycling;
• Promote the development of products that reduce safety, health and environmental risks;
• Guide our customers in the safe and responsible use of our products;
• Provide for the security of our workplace, employees and products; and
• Set objectives and targets to drive reduction of risk and improve our performance.

We seek to work with contractors, customers, suppliers, distributors, and transporters that share these commitments.

Cytec’s SHE Vision

To be a world leader in safety, health, and security and in the protection of the environment, so that our employees will take pride in their achievements while our shareholders will enjoy the highest return on their investment.

Cytec’s SHE Mission

Build a global team of fully-engaged employees committed to the achievement of an incident-free workplace.

Extend product stewardship and sustainable development in our business activities, achieving a positive impact on our company, the environment and the communities in which we operate.

Ensure a continued value for all of our stakeholders through the proper application of our SHE Policy.
### Sustainability as a Strategic Commitment

At Cytec, we believe that Safety, Health and Environment (SHE) performance serves as a foundation for our business. Thus, our SHE Vision is to be a world class leader in SHE Performance, and our SHE Policy describes our commitment to sustainability and the protection of the environment.

We know that being a leader in SHE will result in improved financial results and greater employee commitment. We will achieve this by building a team of committed employees who share in our vision, extending the principles of sustainable development into all of our business processes, and implementing a management system that will enable us to continuously improve our performance. Strategic planning is important to align an organization around sustainability, and this was a focus for Cytec throughout 2009.

After a thorough analysis, we developed a sustainability definition that fits our business model. At Cytec, sustainability means living our values in a changing world, including development of innovative and environmentally sustainable products that compete in a global economy; achieving the highest standards of safety, health and environmental stewardship; and being responsible to our stakeholders. These statements show how sustainability aligns with our technology platforms, our traditional SHE programs, and the needs of our stakeholders. We have looked at specific areas where sustainability applies to our business — where the biggest impacts are in our business — and determined the areas that we will focus on through a practical and meaningful approach to sustainability.

### Practical Approach to Sustainability

At Cytec, we have gone through a review of how sustainability can be applied across our enterprise. There are various sustainability aspects that are relevant to different business processes. Thus, the sustainability strategy can zero in on which aspects apply to raw material supply, all the way through to the customer. Cytec, a global specialty chemicals and materials company, relies on adding value for our customer. Therefore our sustainability efforts focus not only on improving the sustainability of our own products but extending technology to our customers that will improve the sustainability of their operations.

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### Organizational Focus of Sustainability

For Cytec, there is an organizational hierarchy to sustainability and our approach is a directed interaction with all stakeholders. Within the Company, there is a Sustainability Council, which includes cross-functional top leadership. Most recently, we created a broad-based, multi-functional, virtual Sustainability Community of Practice (SusCoP) to share best practices and ideas. And, there is the extended community of all employees and the external environment. We also have a SHE Committee of the Board of Directors which reviews progress against our SHE targets.

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### CUSTOMER FOCUS

Cytec works with customers to help with their sustainability efforts, while focusing on bringing value to the products they produce.

Cytec has a wide range of resins used in eco-friendly coatings systems. One example is the UV RADCURE® coatings on plastics predominantly used in consumer electronics. Cytec’s technology helps manufacturers create coatings for plastics that dry faster using less energy during production.

Cytec is leveraging our technology leadership in aerospace composites to investigate other high-performance industrial composites markets such as wind energy. Cytec helps our customers, and their customers, be environmentally friendly.

Our carbon fiber composites make airplanes lighter, stronger and, therefore, more fuel efficient.

Our waterborne resins also help meet the environmental needs of our customers. These solvent-free liquid coatings, found in paints, are not harmful to the environment during the drying process.
Our Stakeholder Commitment: Voluntary and Other Programs

We will continue our proactive approach in addressing our social, environmental and economic opportunities, and this also means involvement in unique opportunities to support this effort. Some examples are shown below:

- Cytec was one of the first companies to team up with the U.S. Environmental Protection Agency (EPA) in the Sustainable Futures™ Program in 2006. This program has enabled the Company to use sophisticated modeling and other tools to assess the impact of our products on the environment.

- Cytec is committed to implementing an externally certified, ISO-based, SHE Management System at 100 percent of our sites globally. As of 2009, 92 percent of our sites have implemented the SHE Management System, and we have achieved certification of all but three of our locations.

Throughout 2009, our technical experts have attended trade association conferences sharing our company’s best practices and practical approaches to sustainability. These included:

- American Chemistry Society (ACS) Green Chemistry Institute (GCI) Standards Group Meeting in July
- American Institute of Chemical Engineers (AIChE) Sustainability Congress Meeting in August
- The Conference Board’s Environmental, Health and Security Council sessions in North America in September and in Europe in October.

- Cytec hosted an EPA Design for the Environment meeting in 2009 with representatives of the U.S. EPA’s Design for the Environment Program office. This meeting resulted in an excellent informational exchange and included an overview of the EPA Design for the Environment certification program. Products meeting EPA sustainability criteria receive an actual certification label, thus allowing for “green” claims.

In addition, each of our businesses, Building Block Chemicals (BBC), Cytec Engineered Materials (CEM) and Cytec Specialty Chemicals (CSC), has reached out to like-minded customers to discuss how we can work together to improve sustainability performance and contribute toward additional sustainability efforts.
Our Priority
Operating safely to protect our employees from workplace injuries and illnesses, to comprehensively manage health risks to our people, to safeguard the communities adjacent to our facilities, and to preserve the natural environment for all of us and future generations is the fundamental priority at the core of everything that we do at Cytec. We have been — and continue to be — at the forefront of our industry as a leader in setting the pace in procedures, programs and, most importantly, performance relating to Safety, Health and the Environment.

Employee Safety
Cytec’s goal is zero injuries. Safety is our number one priority, and we strive to achieve an injury-free workplace. Our leaders made commitments to safety through Cytec’s Visible Safety Leadership Program, which began in 2008. We continued our commitment to safety in 2009 by investing approximately $14 million in safety capital to reduce the potential for process incidents and other risk. Cytec also renewed its focus on incorporating safety, health and environmental aspects in product and process design, and we are working to integrate our Design for SHE (DFSHE) principles into practice. These efforts will continue in 2010.

Injuries
For 2009, our Recordable Injury Frequency on a global basis was 0.84, improving our performance by six percent against 2008, which marks our best performance to date. Nearly 50 percent of our manufacturing sites had no recordable injuries in 2009. While we are pleased with the performance improvement, we remain focused on continuously reducing injuries, and have again set a 10 percent improvement target for 2010.

Our lost time injury frequency was 0.37 in 2008 and 0.28 in 2009. This represents a dramatic improvement, especially during a difficult economic time when safety performance typically slips.

Process Safety
We define the most serious process incidents as unplanned process incidents that could cause injuries or monetary damage. During 2009, we had six such incidents that met these criteria. The increase can partially be explained by a change in our metric. However, we are focusing on reducing these and our potential for exposure to process incidents. We are also improving our systems to investigate the root causes of these incidents. We have further refined our process safety incident metric to be consistent with the Center for Chemical Process Safety (CCPS) metric as we move forward. Our goal for 2010 is to reduce all process safety incidents by five percent.

Also in the area of process safety, Cytec is now implementing a new standard to manage combustible dust in advance of any regulatory requirements. In 2009, we finalized and issued a thermal (hot) fluid standard in order to more adequately protect our people and facilities in the event of a leak which would likely result in a fire.
Plant Security
Cytec is committed to security at all of our locations. This is an important component of our SHE Management System requirements, with a purpose of helping to protect people, property, products, processes, information and information systems by enhancing security, including security against potential terrorist attack, not only at plant locations, but throughout the chemical industry value chain.

The Department of Homeland Security (DHS) has issued Chemical Facility Anti-Terrorism Standards for any facility that manufactures, uses, stores or distributes certain chemicals at or above a specified quantity. This requirement applies to some of the Cytec facilities in the U.S. and, where applicable, all required submittals have been made on time or ahead of schedule. Submittals required up to this point in time have included the Top Screen security assessment, designed by the DHS to give a preliminary evaluation of potential risk; the Security Vulnerability Analysis, designed to give DHS a more quantifiable evaluation of potential risk; and the Site Security Plan, which identifies existing and/or planned security measures in order to allow the DHS to assess the adequacy of protective measures. In some instances, Cytec facilities have worked to eliminate the use of the chemicals that made them subject to the requirement. Where this is not possible, Cytec will work with the DHS to meet all future security requirements, including the Risk Based Performance Standards.

Over the past year, Cytec’s Occupational Health strategy focus areas included:
• Further developing the Occupational Health Center of Excellence organization to leverage Cytec’s expertise and resources providing more effective and efficient services on a global basis.
• Updating foundation processes such as health hazard identification, health risk assessment, exposure assessment and health surveillance.
A globalized occupational health risk assessment process, integrating European and North American criteria, has been developed and is being piloted to ensure site resources are focused on managing key risks.
• Installing a risk-based focus to our occupational health activities and efforts to obtain the best benefit to Cytec.
• Integrating occupational health into our product development, process development, and sustainability activities.

In an effort to develop a strategy for comprehensively managing all health impacts to lead to healthier and more productive employees, we are developing a Cytec Comprehensive Wellness Program in which employees can proactively take charge of their health and well-being with access to various information and resources.

Health and wellness has long been a part of Cytec’s SHE culture. Our sites continue to enthusiastically support wellness activities and are committed to the health and well-being of each other and their communities, which will be leveraged in Cytec’s comprehensive program. A few site examples are shown below:
• Our Graz, Austria, site was one of 14 local sites in the Styrian region that recently received a quality seal for outstanding occupational health promotion.
• In 2009, the Welland, Canada, facility’s Wellness Committee was recognized by the Canadian Blood Services for their involvement and dedication to the nationwide program “Partners for Life,” promoting the importance of blood donation to the local community.
• At our Fortier plant in Louisiana, an on-site fitness facility and personal training are provided to employees.
• Welland has focused health risk assessments, and other sites have similar programs in place to enhance wellness.

Occupational Health & Wellness
Early in 2009, Cytec’s focus on occupational health activities expanded with the creation of a new Occupational Health Center of Excellence (OH COE) to meet the needs of Cytec today and in the future. This new function is responsible for implementing a comprehensive strategy for managing occupational health risks across Cytec on a global basis with formal collaboration with Cytec’s medical and health professionals.
Governance
Cytec has a mature auditing process to assess compliance with applicable safety, health and environmental regulations. In addition, we maintain detailed SHE operating standards which are required on a global basis. We audit against both our regulatory compliance and compliance with Cytec’s standards.

We monitor emerging regulations to ensure that our sites are able to meet upcoming requirements. Our compliance record has improved over time. Penalties paid have gradually reduced, although we did see an increase in 2009 due to increased regulatory agency enforcement actions and aggressive penalty setting. Additionally, as part of the penalty for the late reporting of an environmental release in 2009, we agreed to pay for a supplemental environmental project that amounted to a total of $10,576.

<table>
<thead>
<tr>
<th>Type</th>
<th>Penalties ($US)</th>
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<tr>
<td></td>
<td>2007</td>
<td>2008</td>
<td>2009</td>
</tr>
<tr>
<td>Safety and Health</td>
<td>4,000</td>
<td>18,000</td>
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<tr>
<td>Other</td>
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<tr>
<td>Totals</td>
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We track and monitor compliance with our permit parameters and have significantly reduced permit excursions over the past five years. Also, inspections and notices of violation are monitored, as well as neighbor complaints. We continue to work to maintain good relationships with local regulatory agencies.

Our site remediation program, which has been in place since Cytec’s inception, focuses on reducing long-term liabilities, actively assessing off-site impacts, and working with the regulatory agencies to perform site assessments and remediation programs. Cytec has made good progress addressing long-term liabilities and has closed, remediated, and in some cases, helped to develop legacy properties. We continue to look for opportunities to partner with local interests to bring our remediation sites to viable economic use.

As an example, in Niagara Falls, Canada, the City of Niagara Falls will open a $30 million, four-pad recreational ice hockey arena complex in September 2010 that is being constructed on a 16.5 acre parcel of a former Cytec manufacturing facility. Cytec donated the 16.5 acres to the City after remediating the property in 2007. Cytec is continuing to work with the City of Niagara Falls, the Niagara Region Department of Transportation and a local developer in exploring additional opportunities to further develop the remaining 77 acres of land that made up this former manufacturing site. Currently, three other parcels of the site are under consideration by the City and Niagara Region for further development.

Management Systems
Cytec continues to fully implement an externally certified SHE Management System on a global basis. Our system incorporates ISO 14001 (environment), RC14001, security, product stewardship, emergency response, and value chain management requirements and has just recently included OHSAS 18001 (occupational safety). In 2009, all but three facilities successfully implemented the SHE Management System. The remaining sites will complete the implementation of their systems in 2010.

Community Involvement
Cytec employees are actively involved in the communities in which they live and work. Volunteers participate in educational activities, health and human service programs and environmental initiatives.

Giving back to the communities in which we operate has been a long standing part of Cytec’s history. We have a decentralized approach to community involvement. Donations and participation in specific initiatives are determined locally by regional needs and cultures. Some examples of involvement in 2009 include:

- Mentoring students, participating in science fairs and hosting plant tours
- Awarding scholarships to students excelling in science
- Supporting fund-raisers through volunteerism and giving
- Hosting community health fairs and blood drives
- Hosting environmental awareness events including tree plantings and recycling activities.

Several of our manufacturing facilities are also involved in Community Advisory Panels (CAP).
Cytec facilities are regularly recognized for their commitments to their local communities and dedication to safety, health and the protection of the environment. In 2009, our facilities received several prestigious honors for a variety of social responsibility efforts including:

- Cytec’s Rayong, Thailand, site was honored with an Environmental Governance Award by the Governor of the Industrial Estate Authority of Thailand for excellence in the principles of Environmental Governance Management.
- Cytec’s Seremban, Malaysia, facility received the Prime Minister’s Hibiscus Award in recognition of notable performance in environmental management. The Prime Minister’s Hibiscus Award is the country’s premier private sector environmental award for business and industry that recognizes environmental accomplishments and leadership.
- Cytec’s Welland, Canada, plant was honored for their long standing excellent safety record with a visit from the Ministry of Labour and local Member of Parliament for a media event to kick off the Minister’s campaign to address “Trips, Slips and Falls.”
- Cytec’s Winona, Minnesota, facility received the Governor’s Safety Award for Excellence in Workplace Safety and Health from the Minnesota Safety Council.
- Cytec’s Fortier plant in Louisiana received the “Workforce Investor” award from the Louisiana Workforce Commission, the state’s labor department.
- Cytec’s Atequiza, Mexico, facility was re-certified in February 2009 as “Clean Industry” by the Mexican Federal Environment Protection Prosecutor (PROFEPA); the site was one of the first plants certified in 2001 and has been re-certified every two years since.

Our Employees
Cytec knows that progress and growth depend on each employee taking responsibility, being creative and contributing to successful performance. We value our employees and strive to keep them engaged, empowered and challenged so they can enjoy success. We invest in our employees’ education, growth and personal development by:

- Providing a structured program for employee development and career path
- Supporting employee mentoring programs
- Providing educational assistance to eligible Cytec employees seeking higher education.

We realize the innovative policies, benefits and programs we offer our employees to promote health and well-being not only lead to a more productive and energized workforce, but help our local communities and benefit Cytec as a whole. Some of our unique program offerings include:

- Maternity Leave with full compensation including time allotted prior to the birth of a child and Paternity/Adoption Leave with full compensation
- A global women’s network to provide an opportunity for communication and career development for Cytec employees

- A Cytec Scholarship Program for sons and daughters of Cytec employees identified as exceptionally able high school students conducted annually by National Merit Scholarship Corporation (NMSC), an independent, not-for-profit organization
- Our pharmacy vendor’s tool, which monitors the medical and prescription drug claims of U.S. employees, retirees and dependents and identifies safety risks that may result in hospitalization and other adverse outcomes
- Our medical vendor’s nurse line program, which is available to U.S. employees, retirees and dependents and provides members with telephonic access to a live nurse on a 24/7 basis.

Additionally, our corporate wellness program and flex time initiatives are being developed, and efforts to identify and implement these types of programs will continue in 2010.
Resource Use
During 2009, Cytec utilized a new environmental metrics tracking system that captures all waste, energy, greenhouse gas, Sulfur Oxides/Nitrous Oxides (SOx/NOx), water consumption, and related data. This system is helping our sites track and monitor their performance against targets. One of Cytec’s top goals is to reduce waste and energy usage across the Company. We have set five-year targets of 15 percent improvement in waste reduction and energy efficiency and are working towards achieving these long-term goals.

Waste Reduction and Energy Efficiency
Cytec’s operations improvement initiatives have focused on reducing waste and energy consumption at our manufacturing sites. In absolute terms, in 2009, Cytec reduced energy use by 12 percent and reduced waste by 32 percent for the same period, as compared to 2008. The Company has well established processes and tools such as Six Sigma, Lean and Workout, which are used to support continuous improvement across the company. These tools have helped Cytec find opportunities to reduce waste and energy use at our facilities.

The Company’s waste performance improved in a number of areas last year, despite many challenges as a result of the economic downturn. In 2009, Cytec achieved a 9.7 percent waste intensity improvement on a weight average basis, measured as kg waste / kg production, and a 32 percent reduction in waste on an absolute basis eliminating approximately 1,360 truckloads of waste when compared to our 2008 waste generation. These waste reduction achievements were the result of yield improvements, wastewater recycling and reuse initiatives, solvent reclamation efforts and the sale of co-product streams into the market for use as a raw material in a manufacturing process. While our decreased production levels aided with the reduction of waste generation on an absolute basis, it actually worked against us on the weight average basis as units like our waste water pretreatment facilities continued to produce sludge at normal levels. Cytec is on track in achieving its long-term waste intensity goal of 15 percent reduction by 2012.

Cytec continues to invest significant capital to improve energy efficiency at many of our operating locations. In 2007, to support these efforts, Cytec set an internal energy efficiency improvement goal of 15 percent by 2012. Since then, Cytec has developed an active energy program focused on improvements in energy efficiency through both capital investments, as well as non-capital operating improvements.

In 2009, these improvements were overshadowed by a slow economy reflected by a slowdown in production. As a result, the amount of energy used versus the amount of product made (KWH/ Kg product) increased, resulting in a decrease in efficiency of 2.7% against the annual energy improvement target of 3%. The absolute energy use across Cytec dropped by 12 percent when compared to 2008, but over the same time period, production dropped by 14 percent.

Across the company, capital improvements have been implemented to expand capacity and improve efficiency of furnaces, upgrade steam distribution systems and install variable frequency drives and economizers to improve energy efficiency. Operational improvements included better and more frequent energy audits, as well as more effectively matching energy supply to process demands. These practices are shared across the manufacturing locations to improve efficiencies.

In the future, greater emphasis will be placed on identifying metrics that better reflect improvements in energy performance in these challenging times and on identifying process improvement projects that directly impact energy consumption to help achieve our 2012 goals.
The chart below indicates overall that energy consumption declined and intensity increased between 2008 and 2009.

**Greenhouse Gas Emissions**

In 2007, Cytec became a member of EPA Climate Leaders, an industry-government partnership that works to develop comprehensive climate change strategies. Since then, Cytec has committed to reduce impact on the global environment by completing a corporate-wide inventory of our Greenhouse Gas (GHG) emissions based on our SHE Management System, setting aggressive reduction goals, and annually reporting progress to EPA.

Cytec has set an internal GHG emissions efficiency improvement of 12 percent by 2012. Due to the downturn in the economy, a trend similar to energy was seen in GHG emissions. The amount of GHG emitted versus the amount of product made (kg CO₂ equivalents/kg production) increased, as compared to 2008, resulting in a decrease in efficiency of 4.2 percent against an annual improvement target of 2 percent. The absolute reduction in GHG was 11 percent in 2009 as compared to 2008 or 13 percent reduction since 2007. The corresponding reduction in production was greater than 11 percent in 2009.

With the completion of the GHG inventory and the use of the Web-based data collection system, Cytec will be tracking GHG emissions and efficiency improvements against the requirements set by Climate Leaders based on World Resources Institute (WRI) and the World Business Council for Sustainable Development (WBCSD) protocols.

**Releases to the Environment**

Cytec tracks all releases of materials to the environment, including air, water and land, as well as releases to secondary containment, including air pollution control equipment and wastewater treatment systems. Our sites have had a continuous improvement goal to reduce all unanticipated emissions to the environment by 10 percent, year-on-year (see chart below). During 2009, the number of releases to the environment greater than one pound of material was 80, the same as in 2008. For those facilities that did not show improvement, plans are in place to identify needs and implement activities to address operations, data collection and analysis.

**Environmental Compliance Management**

Cytec tracks compliance with our environmental permits by measuring the number of events leading to an exceedance of a permit limit. Shown below is our permit compliance performance over the last four years.

Since 2005, we have improved compliance by 65 percent, while at the same time, doubling the number of manufacturing facilities that are regulated.

We currently track volumes of wastewater and sludge generated for disposal and include reduction of such waste in our performance metrics.
Global Cytec Commitment
In 2008, Cytec integrated sustainability and green chemistry practices into its R&D programs. In 2009, we worked to spread this practice throughout the company. The establishment of a high-level Sustainability Council created a high-level dialogue around the sustainability direction for the company going forward. Additionally, a Sustainability Community of Practice (SusCoP) was formed to act as a communication hub and help disseminate sustainability-related information to all functional groups within Cytec. The SusCoP is also the information arm of the Sustainability Council, acting as their resource to develop tactical approaches to the use of renewable raw materials and expansion of the metrics we use to measure sustainability.

Cytec has also provided sustainability training for all employees, having rolled out the first stage, an overview of sustainability and its application within Cytec, late in 2009. Additional stages will address the specific activities and actions applicable to various functional groups within Cytec, such as manufacturing, procurement and R&D.

Renewable Raw Materials
A cross-functional group of employees is working as a subgroup of the Cytec Sustainability Community of Practice to advance the company’s use of renewable raw materials (RRM), defined as natural resources that are replenished by natural processes of growth at a rate comparable or faster to its rate of consumption.

Increasing numbers of product development projects are evaluating the use of renewable raw materials in addition to performance improvements. After reducing the Volatile Organic Compounds (VOC) content of coating resins and overall energy-saving efforts in production and application, the usage of renewable raw materials has become one of the most important principles of Green Chemistry.

There are several examples of these RRMs used in Cytec’s products, such as oils and fatty acids, including their derivatives, and glycerol from oilseed crops and their conversion process.

In addition to developing definitions and usage equations for RRM, the subgroup has developed an updated list of renewable raw materials used in Cytec, which it has made available to the Cytec technical community. The group has now turned its attention to making up a list of renewable raw materials that are not used in Cytec, but could be used by the company.

The usage of renewable resources as feedstock for chemical production has clear advantages, since they are CO2-neutral (a cyclic process with no net gain), not persistent in the environment, and can require fewer steps in synthesis, because of the complexity already provided in their structures.

Sustainability Index
Cytec has expanded the use of our internally-developed iSUSTAIN™ Green Chemistry Index, based on the Twelve Principles of Green Chemistry1, throughout our R&D organization. Interest generated outside of the company by demonstration at various venues, plus the urging of our collaborator in this work, Dr. John Warner of the Warner-Babcock Institute of Green Chemistry (WBI), has prompted us to work toward developing a public Web-based version of the Index.

As a result, Cytec has created an iSUSTAIN Alliance with Sopheon Corporation, an international provider of product lifecycle management software and services that improve the business impact of product innovation, and Beyond Benign Foundation, the non-profit arm of WBI that promotes sustainable science in order to create an environmentally, socially and economically prosperous world, to promote Green Chemistry awareness in the global chemical industry.

The Alliance has launched a website, www.isustain.com, which allows chemical manufacturers and users to track their progress in developing greener products over time through the use of the publicly available iSUSTAIN Green Chemistry Index. They will be able to assess the sustainability of new products using a systematic approach, which is both comprehensive and simple, to help shape the formulation of these products. The site allows companies to test their green product attributes and give each product an iSUSTAIN Green Chemistry Index rating, which will be independently verifiable through a certification process.

The academic community will be able to use the iSUSTAIN application free of charge, while company users will pay a small subscription fee. While the software will be managed, updated and supported by Sopheon, administration and support for a key element of the iSUSTAIN Green Chemistry Index, the Raw Material Database, will be provided by Beyond Benign. This database, which was initially constructed within Cytec, provides safety, health, environmental and regulatory scoring for several thousand chemical compounds based on readily available public information. It is our intent with Beyond Benign to create a consortium of users around the iSUSTAIN Green Chemistry Index and the Raw Material Database to continue to develop both systems and provide corroboration and evolution for the various algorithms and data used. Additionally, an advisory board for the Alliance will be established in 2010, which will include representation from the website’s user community.

**Sustainable Products**

Cytec has a significant portfolio of products that offer substantial environmental, health and safety advantages, and offer increased value to Cytec’s customers. Below are just a few examples of Cytec’s new and existing sustainable products.

**MAX HT Bayer Sodalite Scale Inhibitor**

This family of products in our In Process Separation operating segment was developed to eliminate sodalite scaling in the heat exchangers and piping used in the Bayer process for the production of alumina from bauxite ore. By eliminating the formation of the sodalite scale on the heater surface, several benefits are realized, including increased efficiency in the recovery of heat from steam produced in various unit operations, reduced production of new steam with the resulting reduction in carbon emissions, and reduced use of sulfuric acid resulting in less waste.

**Formaldehyde-Free Crosslinker**

CYLINK® 2000 crosslinking agent, a class of melamine resin used in automotive clear topcoat and cell phone coatings, was developed as a replacement for amino formaldehyde crosslinkers to help the coating industries comply with stringent environmental regulations to reduce Volatile Organic Compounds (VOCs) and other health-related Occupational Safety and Health Association (OSHA) regulations. While coating systems formulated with high solids melamine crosslinkers can reduce VOCs dramatically and offer excellent coating properties, these systems also involve formaldehyde, which is regulated by OSHA and has been the subject of numerous studies for health and toxicity risks.

**New Saturated Polyester Resins (Epoxy-Free Technology)**

Cytec has developed a family of new saturated polyester resins as replacements for high-molecular-weight epoxy resins in interior can-coating applications for food. While these coatings show good performance as conventional, epoxy resin-based systems, they offer the clear advantage of not containing Bisphenol A. In combination with melamine or benzoguanamine resins, these new polyester resins can also be used as backbone binders for high-heat resistant and flexible exterior can-coating systems.

**UV Pressure Sensitive Adhesives (UV PSA)**

Cytec’s GELVA® GMR 8020-02 UV PSA represents the first viable alternative for the commercial PSA tapes converter. For Cytec and the industry, the sustainability advantages of 100 percent solids systems are clear. There are no dilution solvents needed and packaging materials are reduced by more than 50 percent. This will result in lower utility costs per pound of adhesive produced. For the converter, the sustainability advantages are equally obvious — lower energy required for vaporizing solvents, fewer VOCs, lower noise, less metals and other raw materials required for converting operations’ mechanical equipment and floor space, and improved yields with reduced changeover costs. All of these sustainable benefits, in addition to lower unit conversion costs, present significant value for adopting the converter in the tapes industry.

**Bio-solvent Based Acrylic Conformal Coating**

Cytec Engineered Material’s CONAP® CE-2290 single-component acrylic conformal coating provides customers with a “green” alternative for high-performance thin film applications. This product is used in coatings for printed circuit boards in electronics for shock and vibration requirements, which includes laptops and airplanes. CE-2290 is free from Hazardous Air Pollutants (HAPs) and ozone depleting solvents. This product was featured in the Productronica 2009 Innovation Guide.

**U.S. EPA Green Chemistry Program**

Cytec is a strong supporter of the EPA Green Chemistry Program and has made numerous submissions to the annual EPA Presidential Green Chemistry Challenge Awards, demonstrating examples of products developed and used with sustainability in mind. These can be found at [http://www.epa.gov/greenchemistry/pubs/pgcc/past.html](http://www.epa.gov/greenchemistry/pubs/pgcc/past.html).

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Cytec Coating Resins is a pioneer in the development of low-VOC coatings, radiation curing and powder coating resins and additives that allow our customers to create sustainable change for the industries they serve. Cytec is promoting our product sustainability efforts to customers around the globe with a “Pioneering Sustainable Change” campaign.
Product Regulatory Compliance
Cytec’s product stewardship program starts with global product regulatory compliance. The company maintains standards related to product regulatory and hazard communication compliance activities. Cytec maintains systems that comply with all global chemical control laws in countries where they exist (U.S., Canada, Europe, China, Australia, etc.). This is done with oversight and vision to make the best use of available data to allow our products to enter new markets quickly and in a cost-effective manner.

REACH
REACH stands for the Registration, Evaluation and Authorization of Chemicals, representing the European Commission’s harmonized chemicals management legislation within Europe.

The REACH process requires a manufacturer or importer to notify the European Chemicals Agency (ECHA) of the intention to produce or import a substance and to submit a technical dossier under an 11-year transition period, which began in 2007.

Cytec pre-registered all components of products manufactured in Europe or imported into Europe by the November 2008 deadline, and contacted suppliers of potentially affected raw materials. Cytec developed a gatekeeper process to ensure that no products are offered for sale in Europe which have not been pre-registered. We are now focused on registration and consortia participation, as well as dossier preparation for high volume Tier I substances (greater than 1000 tons). Internal teams are working to address Substances of Very High Concern (SVHC), Strictly Controlled Conditions (SCC) and use and exposure. All related information needs to converge as part of the REACH registration dossier. For more information, see http://www.cytec.com/about/reach.htm.

Nanomaterials in New Product Development
Cytec is working with nanomaterials and the development of new technology. We believe that the risk associated with nanoscale materials can be managed effectively, and the materials can be used to produce a next generation of sustainable products. Cytec has developed protocols for safe handling of nanoscale materials within R&D and manufacturing. In 2009, Cytec developed a training module for safe handling of nanomaterials, to heighten awareness about this important topic.

Hazard Assessment and Risk Communication
Cytec has developed and continues to refine a world-class global hazard assessment process. Cytec personnel used their knowledge of individual country hazard communication requirements to develop a process which can assess products for all regulated regions at the same time. The advantages of this process include consistency of information and data, as well cost effectiveness.

To help support this process, we developed and maintain a centralized database for all product-related data, including physical/chemical properties, toxicity, environmental toxicity, and environmental fate and effects. We assess the potential hazards of our products and communicate safe handling information to our employees and customers. Where possible, we use computer modeling, structure-activity relationships and literature data to assess potential hazards in lieu of testing, including the EPA Sustainable Futures modeling. Our world-class Safety Data Sheets (SDS) and labels are now available in 28 languages with the 2009 additions of Russian and Turkish.

Globally Harmonized System of Classification and Labeling, or GHS for short, is a United Nations developed recommendation for a single, globally harmonized system to address the classification of chemicals, labels, and SDS, which is in various stages of implementation by many countries. Of particular interest to Cytec are relatively early implementations for New Zealand, Taiwan, Thailand, Malaysia, Korea and China. We have successfully completed both SDS and label requirements for both Japan and China.

A more detailed description of Cytec’s Risk Characterization and Management process can be found on our website at http://www.cytec.com/about/risk_process.htm.
Value Chain Customer and Supplier Review Process
Cytec’s SHE Management System encourages adoption and implementation of appropriate product risk management practices for Cytec’s high volume or hazardous products. The process assesses the product stewardship attributes of our customers and distributors to assure that they can handle those Cytec products which have the potential to be highly hazardous. A similar system is in place for suppliers of raw materials to Cytec. The process and associated procedures assure that Cytec’s chemical raw material suppliers strive toward the responsible management of chemicals.

Suppliers are asked to complete questionnaires to assess their commitment to working in a safe and environmentally conscious manner. Similar to our approach to customers and distributors, there may be suppliers or potential suppliers who lack certain safety, health, environmental or product stewardship skills. Our procurement staff will contact them, review any concerns and offer training or other services. We also rate suppliers based on their performance on safety, health, and environmental issues as part of our supplier scorecard.

If it is found that a customer lacks sufficient safety, health, environmental or product stewardship skills to handle a potentially highly hazardous product, the chief product steward, product manager and business director work in concert to assure any deficiencies are corrected.

Contractor Selection
When Cytec uses outside service providers to perform work at our sites, companies are selected based upon several factors, including their compliance and safety performance. Cytec chooses business partners who share our priorities around environmental and safety performance.

Toll and Other Manufacturing Services
Cytec’s SHE Management System seeks to engage only those third-party facilities whose operations are in compliance with applicable regulatory requirements and whose activities do not endanger employees, the public or the environment. Occasionally, it is necessary for Cytec to use the services of an outside third party to perform manufacturing, formulation, blending, packaging and other services. Accordingly, depending on the evaluated risk, third-party facilities may be subject to a thorough evaluation of their operations which may include a full on-site audit. Approximately 100 toll manufacturers are actively listed with Cytec.

Waste Disposal Services
Cytec works to reduce and prevent the generation of waste. However, where Cytec has to contract for waste disposal, we conduct a review of companies and individual off-site facilities used for the management of hazardous and non-hazardous wastes. The review of these sites may be implemented by Cytec staff, by third-party consultants or through consortium audits. In addition, the company minimizes the number of waste management facilities and companies used, as the use of additional companies and individual sites increases potential long-term risk.

Distribution Facilities
We monitor our distribution facilities’ compliance with safety, health and environmental practices and compliance with standards. These facilities are reviewed on an ongoing basis. We expect facilities that manage our products to live by the same standards of excellence.

Transportation
Our transporters are qualified on the basis of safety performance, in addition to other parameters. We perform transportation risk assessments for carriers that transport high-risk raw materials to Cytec locations. We also track transportation incidents across Cytec and have reduced the number of incidents with releases by 60 percent from 2008 to 2009.

<table>
<thead>
<tr>
<th>BUSINESS</th>
<th>Incidents with Release</th>
<th>Frequency (Incident/1000 shipments)</th>
</tr>
</thead>
<tbody>
<tr>
<td>BBC</td>
<td>8</td>
<td>3</td>
</tr>
<tr>
<td>CEM</td>
<td>3</td>
<td>0</td>
</tr>
<tr>
<td>CSC</td>
<td>32</td>
<td>25</td>
</tr>
<tr>
<td>Cytec</td>
<td>43</td>
<td>28</td>
</tr>
</tbody>
</table>
Cytec is on a journey toward the implementation of sustainable practices in all aspects of our business. Our vision is to be a world leader in safety, health and environmental performance, and we have set long-term improvement goals to assess our performance and track progress.

2010 Goals
Cytec’s objective for 2010 is to continue improving against 2009 performance. During 2010, Cytec is committed to the following goals:
- Reducing the Recordable Injury Frequency by 10 percent against the 2009 rate
- Achieving a 5 percent reduction in all process safety incidents across Cytec from 2009
- Achieving 10 percent reduction in accidental environmental releases greater than 1 pound from 2009 levels
- Achieving a 3 percent improvement in energy efficiency and 2 percent improvement in CO₂ intensity against 2009
- Achieving a 3 percent improvement on waste reduction per kilogram of products against 2009
- Fully implementing the SHE Management System at all of our manufacturing sites and R&D sites on a global basis by year end 2010.

Long-Term Goals
Cytec is committed to the following long-term goals:
- Reducing the Recordable Injury Frequency rate to 0.5
- Improving global energy efficiency by 15 percent by 2012
- Improving global greenhouse gas emissions intensity (CO₂ equivalents per kg of product) by 12 percent by 2012
- Reducing global waste generation by 15 percent by 2012.

Key Metrics - Safety, Health & Environment

<table>
<thead>
<tr>
<th>Key Metric</th>
<th>2007</th>
<th>2008</th>
<th>2009 Target and Actual</th>
<th>2010 Target</th>
</tr>
</thead>
<tbody>
<tr>
<td>Recordable Injury Frequency</td>
<td>1.22</td>
<td>0.89</td>
<td>10% annual improvement against 2008 / .84 for 2009</td>
<td>10% annual improvement against 2009</td>
</tr>
<tr>
<td>Serious Process Safety Incidents</td>
<td>1</td>
<td>2</td>
<td>0</td>
<td>Roll into PSM incident reduction target</td>
</tr>
<tr>
<td>Process Safety Incidents</td>
<td>n/a</td>
<td>Set baseline</td>
<td>Develop severity factor</td>
<td></td>
</tr>
<tr>
<td>Releases to the Environment</td>
<td>94</td>
<td>79</td>
<td>10% annual improvement against 2008</td>
<td>10% improvement against 2009</td>
</tr>
<tr>
<td>Energy Efficiency (kwh/kg product)</td>
<td>3% improvement against 2006</td>
<td>Energy – 16% increase from 2007 to 2008; influenced by a 10% decrease in production due to state of global economy</td>
<td>3% annual improvement against 2008</td>
<td>3% improvement in energy efficiency or theoretical model, against 2009</td>
</tr>
<tr>
<td>Greenhouse Gas Emissions (GHG)</td>
<td>Set baseline</td>
<td>Revising baseline to meet Climate Leaders requirements and changing baseline year to 2007</td>
<td>2% against 2008</td>
<td>2% improvement against 2009</td>
</tr>
<tr>
<td>Waste Reduction (kg waste/kg product)</td>
<td>1% improvement against 2006</td>
<td>Waste efficiency has improved by over 5% in the first 2 years</td>
<td>3% against 2008</td>
<td>3% against 2009, using weighted average</td>
</tr>
<tr>
<td>Product Stewardship and Sustainability</td>
<td>n/a</td>
<td>n/a</td>
<td>Existing products – Compliance with Product Stewardship requirements New products – Sustainability Index Implement in 2009 and establish baseline</td>
<td>Implement SUSTAIN™ Index for newly commercialized products; work to close data gaps for existing products</td>
</tr>
<tr>
<td>Corrective Action Closure Rate</td>
<td>Track</td>
<td>Track</td>
<td>90% / 91% for 2009</td>
<td>90%</td>
</tr>
</tbody>
</table>

Global Reporting Initiative
We support the Global Reporting Initiative (GRI) efforts to standardize non-financial reports such as this and will increasingly align our reporting and metrics with the GRI guidance.