

**Statement of CSB Chairman Dr. Rafael Moure-Eraso and Vidisha Parasram  
CSB News Conference**

**October 27, 2011**

Good morning and thank you for attending today's news conference. My name is Rafael Moure-Eraso, Chairman of the US Chemical Safety Board or CSB. I am here today to release the CSB's investigative study entitled "Public Safety at Oil and Gas Storage Facilities."

As many of you are aware, October 31, 2011 will mark the two year anniversary of the accident that occurred in Carnes, Mississippi – an accident that will forever impact the family and friends of Wade White and Devon Byrd.

I continue to commend the families' strength and perseverance in campaigning for change within the state of Mississippi. And I appreciate their ongoing support of the CSB's activities. Regrettably, there are other families that share a similar grief: the CSB's report we are releasing today examines similar accidents which occurred in Texas, Oklahoma, and other oil-producing states across the country.

Today I will be sharing the key findings and formal safety recommendations which have resulted from the CSB's investigation. After reviewing the work of our investigators it is clear to me that these accidents are entirely preventable. Through the findings and analysis of our investigative team and the help of the communities of Carnes and Brooklyn the CSB believes that we can prevent future accidents and improve the safety of oil and gas sites across the country.

Allow me to summarize how and why the CSB became involved in this issue. The CSB is an independent federal agency charged by Congress with investigating serious chemical accidents across the country. After learning of the accident in Carnes we wanted to get involved but were not sure of the best way to effect change. We started to develop a plan that would directly focus on educating teenagers and young people. Our team decided that a video as well as a lesson plan, that could be easily adapted to a variety of ages, would initially be the best way to spread this unique safety message.

On April 13 the CSB held a news conference and public meeting here in Hattiesburg to release "No Place to Hang Out: The Danger of Oil Well Sites." The video was aimed at educating young people. In the video the CSB interviewed teenagers and adults who stated that it is a common practice in rural areas for young people to hang out and socialize at oil production sites. In the words of 18-year-old Cody Hunt, "It's like our own little sanctuary where we can just be away from everybody."

The CSB found that these accidents were occurring at rural oil sites in states across the country and were impacting children, teenagers and young adults. Individuals expressed a general lack of awareness of the hazards that these tank sites presented. The CSB identified 26 similar accidents that occurred between 1983 and 2009 resulting in 44 fatalities among teenagers and young adults under the age of 25.

As a result of these findings the CSB convened a task force to look into the state and federal rules and regulations governing the safety and security of oil sites. The report released here today, is a result of the findings from that task force.

I would now like to introduce Vidisha Parasram who led the CSB task force and will be describing its findings. Vidisha is the Acting Director of the CSB's Incident Screening and Selection office and previously served as an investigator on several CSB investigations. Vidisha is currently pursuing a doctorate in public health.

## **Vidisha Parasram**

Thank you Chairman Moure-Eraso. I have worked with many of the families and supporters who are here today. I felt that the CSB's news conference and public meeting in April 2010 was a step towards safeguards at sites across the state. Our research indicates that accidents involving young people are recurring events in oil and gas producing states across the country.

Merely one day after returning from Mississippi, the CSB learned of another accident at what appeared to be a similar oil site located in Weleetka, Oklahoma. The CSB's newly formed task force deployed to Oklahoma in order to gather information and determine if we could identify similarities between this accident and the one that occurred in Carnes.

Witnesses stated that they were drawn to the site when they saw the open gate while driving along a public roadway. Witnesses further stated that oil sites were a common gathering place for local residents and that they were largely unfamiliar with the hazards.

Investigators found that a fire and explosion, most likely ignited by a cigarette or a lighter, engulfed the victim and caused a second explosion in an interconnected tank. The victim suffered third-degree burns over 85% of his body. He was able to describe the accident to emergency response and ambulance personnel, but died the following morning at a Tulsa burn unit. Another individual suffered second-degree burns. The responding fire department extinguished the fire after it burned for more than three hours.

The CSB also identified a lack of fencing at the site; the entrance was protected only by an unmarked gate which multiple witnesses described as being wide open on the night of April 14, and generally open and unlocked at other times. Apart from the gate the site had no fencing or other protective measures that would keep members of the public safe from hazards on the site. Fencing, of course, is one of the important ways to communicate to passersby that a site or installation is hazardous.

On April 28, two weeks after the accident in Oklahoma, the CSB learned of another accident in rural New London, Texas. A 24-year-old woman and a 25-year old man, both members of the public – were socializing in the vicinity of an unattended oil and gas production site. The tank exploded as the two individuals were climbing the stairway of the catwalk after

one victim asked the other to light a cigarette. Again, the CSB learned that this particular site was unsecured and unmanned.

Using information gathered by CSB investigators, state entities and local authorities the CSB's task force has identified the patchwork of laws nationwide that fail to uniformly address security around oil and gas wells. The team has thoroughly examined existing policies and standards at a national, state, and local level.

The team determined that there is a lack of consistent state or municipally mandated regulations for perimeter fencing, locks, and signage. These safeguards would warn of potential hazards and deter access. Public safety is rarely considered in municipal or state rules for constructing or maintaining tanks on oil and gas well sites, even for new construction.

The CSB identified a number of regulations and standards at the local level which do specify safeguards at such production sites. For example the City of Laurel, Mississippi, which is located in Jones County adjacent to Forrest County, requires oil and gas sites to be fenced. The State of California requires barbed wire fencing around oilfield facilities "where it is necessary to protect life and property." The State of Colorado requires fencing of oil and gas production sites that are located in high-density areas. Ohio requires fencing sites and securing tank hatches in urbanized areas. However, at the national level we could not identify any specific federal standards or industry guidance. The National Fire Protection Association – or NFPA – has published three codes that address security measures for various sectors, but these are not specific to E&P facilities. NFPA 30, the Flammable and Combustible Liquids Code of 2008, applies to the storage, handling and use of flammable and combustible liquids, but it contains no specific requirements for security or fencing.

I hope that our recommendations will be able to fill in the current gaps that exist at the state and federal level. As I have seen firsthand these sites are dangerous and the people who live and work in these communities should be properly protected. The CSB's recommendations aim to address existing shortcomings. Shortcomings which have proven deadly, immediate action to will prevent future accidents and save lives.

I would now like to turn our presentation back over to Chairman Moure-Eraso.

### **Chairman Moure-Eraso**

The demand for domestic energy resources is ever growing in the U.S. In 2008, the Energy Information Administration, referred to as the EIA, estimated there were approximately 360,000 oil well sites and 460,000 gas wells active throughout the United States. EIA data trends demonstrate a consistent increase in the number of active sites from 2004 to 2009. Operators are drilling new wells, and older, disused sites are being restored to operation. It is our

hope that sites will be equipped with the appropriate safeguards in order to save young people's lives.

Our investigation issues recommendations intended to address gaps within the regulatory framework.

As a result of the board's findings the CSB is making a number of safety recommendations. The CSB recommends that the Environmental Protection Agency issue a safety bulletin warning of the explosion hazards of oil and gas production sites, describing the importance of increased security measures such as fencing, gates and signs; and recommending the use of inherently safer storage tank design. Similarly, the CSB's recommendations seek to address the current gaps in regulations and codes in Mississippi, Oklahoma and Texas, where a number of the serious accidents have occurred. The board is calling for increased security measures and greater attention given to integrating inherently safer design into tanks at extraction and production sites across the country.

Specifically the CSB is recommending that the Mississippi State Oil and Gas Board amend state oil and gas regulations to require the use of inherently safer tank design features such as flame arrestors, pressure vacuum vents, floating roofs, or vapor recovery systems, to prevent the ignition of a flammable atmosphere inside the tank.

Simply put, there are more modern storage tank designs that make it much more difficult to accidentally ignite the flammable vapor inside. When the vapor ignites, tanks can explode killing or injuring any people in the vicinity. The storage tanks at oil refineries and other facilities already have many of these safeguards – they are cost-effective and they work.

The CSB's investigation also examined industry codes and standards, such as those from the American Petroleum Institute and the National Fire Protection Association. Although these standards, recommended practices and codes are voluntary, they are widely utilized by the energy industry.

API Standard 2610 on the Design, Construction, Operation, Maintenance and Inspection of Terminal and Tank Facilities specifically excludes E&P sites, and Recommended Practice 74 on Occupational Safety for Onshore Oil and Gas Production Operation primarily focuses on occupational safety requirements and includes no guidance on requirements for fencing, physical barriers, or security gates that could provide protection for the public.

The final report recommends that both organizations adequately address the hazards that these sites through amendments to their existing codes or creation of additional guidance.

Again, the CSB would like to take this opportunity to urge the oil and gas production industry, state legislatures, and federal and state regulators to learn from these tragedies and to take action. We hope that the state of Mississippi can stand at the forefront of this issue by requiring safeguards at oil and gas sites across the state.

I will now take questions from the audience, please state your name and affiliation.