Date of Accident: December 21, 2002

On December 21, 2002, a welder was struck in the head by a plug on the end of the pipe being worked upon.

Description of Accident: The victim was preparing to build up the inside of the pipe to match the tolerance of a new reducer to be installed. A vapor barrier plug in a pipe-T was installed and the section of pipe was filled with nitrogen. The bleed hose iced up, allowing pressure to build from the nitrogen purging system. No low-pressure gauge was installed to monitor the pressure within the pipe. The victim was in position across the plane of the pipe, ready to strike an arc when the vapor barrier plug blew, striking the welder in the face and knocking him backwards into a support brace nearby. The victim died instantly from being struck on the head.

ACCIDENT PREVENTION RECOMMENDATIONS:

- Use low pressure gauges to monitor pressure when purging a pipe.
- Remove water residue from the containment area when purging with nitrogen.
- Ensure that purge bleed tubes or other pressure relief systems are kept clear and in good operating condition.
- When purchasing manufactured products, request the technical specifications and testing data to verify the product’s capabilities.
- Ensure that training is completed at all levels (owner, general contractor, subcontractors, and employees). Document employee training in writing.
- Employers shall regularly re-evaluate their safety procedures and training to ensure that all employees are aware of and understand procedures.
- Employers shall evaluate any near-miss incidents, develop best practices and implement the best practices as training and learning tools to avoid future accidents.
- An employer should have a written safety program which includes enforcement and discipline procedures to ensure that employees follow the employer’s safety requirements. The employer should take steps to discover employee violations and document disciplinary action taken.