REPORT OF INVESTIGATION

Open Pit Metal Mine
(Copper)

Fatal Other
October 25, 2018

James Hamilton Construction Company
Contractor ID (AB8)
at
Freeport-McMoRan Chino Mines Company
Chino Mines Co. Mine
Vanadium, Grant County, New Mexico
ID No. 29-00708

Accident Investigators

Erin A. Estrada
Mine Safety and Health Inspector

Lee Cruise
Mine Safety and Health Inspector

Origination Office

Mine Safety and Health Administration
South Central District
1100 Commerce Street RM 462
Dallas, TX 75242

William O’Dell, Acting District Manager
# Table of Contents

OVERVIEW.........................................................................................................................Page 1

GENERAL INFORMATION..................................................................................................Page 2

DESCRIPTON OF ACCIDENT..............................................................................................Page 2

INVESTIGATION OF THE ACCIDENT..................................................................................Page 3

DISCUSSION.......................................................................................................................Page 3

ROOT CAUSE ANALYSIS.......................................................................................................Page 4

CONCLUSION......................................................................................................................Page 4

ENFORCEMENT ACTIONS..................................................................................................Page 4

Appendix A: INVESTIGATION PARTICIPANTS....................................................................Page 5
OVERVIEW

Cruz Mejia, a 29-year old laborer with nine weeks of experience, died on October 25, 2018, when his escort vehicle flipped while he was ascending a mine haul road. The victim's vehicle veered off the haul road and climbed the adjacent haul road bank, causing the truck to overturn.
GENERAL INFORMATION

Freeport-McMoRan Chino Mines Company (Freeport) owns and operates Chino Mines Co. Mine (Chino), an open pit, multi-bench copper mine located in Vanadium, Grant County, New Mexico. The mine operates seven days per week with two twelve-hour shifts per day and employs 1,022 miners.

Chino drills and blasts copper ore in an open pit and transports the ore by haul truck to a primary crusher. Crushed ore is transported by belt conveyor to the mill, where the ore is then milled, concentrated, and smelted into copper plates. The finished product is sold to commercial industries.

James Hamilton Construction Company assists the mine operation by extracting material in the pit and quarry.

The Mine Safety and Health Administration (MSHA) completed the last regular inspection of this operation on August 16, 2018.

DESCRIPTION OF ACCIDENT

On October 25, 2018, Cruz Mejia, Laborer, an employee with James Hamilton Construction, arrived at the mine site at approximately 6:45 a.m. and conducted a pre-operational inspection of the Ford F-250 pickup truck assigned to him. Miguel Gomez, Laborer, also a James Hamilton Construction employee, approached Mejia in the parking lot and noticed Mejia looking for something. Mejia stated he couldn’t find his medication. Gomez told investigators that Mejia made a phone call in his presence and he was overheard discussing concern about not having the medication. Mejia completed his equipment inspection and both Mejia and Gomez drove to the Leach Building, where the company’s tailgate safety meeting and job assignments take place. Gomez told inspectors Mejia wore his seatbelt on their way to the meeting, but he also complained that the seatbelt caused discomfort to his waist.

According to other James Hamilton employees interviewed, Mejia did not act any differently than usual on the day of the accident. They did notice Mejia did not hang around after the meeting to socialize as he generally did. At the conclusion of the safety meeting, Mejia and Gomez were assigned the task of escorting an All-Terrain Vehicle (ATV) to the 7045 Lampbright stock pile.

Gomez got into Mejia’s pickup and asked Mejia if everything was ok. Mejia stated he did not feel good and was planning to inform his supervisor he wanted to go home after the escorting task. Mejia also informed Gomez he had not taken his medication that day, and was having family issues at home. Gomez told investigators Mejia appeared nervous and sweaty.

Mejia and Gomez met up with Justin Francisco, Laborer, and Antonio (Tony) Arzola, Laborer, both employees of James Hamilton Construction, to assist with the ATV escort. Francisco and Arzola agreed to be the lead escorts. Mejia agreed to be the rear escort and Gomez exited the pickup to operate the ATV.
At approximately 7:25 a.m., the crew began escorting the ATV to the 7045 Lampbright stock pile. While traveling up the 6975 Lampbright haul road, the front escort party lost sight of Mejia and decided to wait for him. Freeport employee Armando Aguilera, Sr. Quality Specialist Leach Stock Pile, waited for the escort crew to pass as he traveled down the haul road and noticed no rear escort.

Aguilera continued to travel down the haul road and observed the rolled pickup truck. When Aguilera arrived at the accident scene, he found Mejia unresponsive in the cab of the pickup truck. Mejia was not wearing a seatbelt. At 7:34 a.m., Aguilera made a mayday call over the Freeport radio pit channel. Freeport employee Tyler Morrison, Haul Truck Driver/First Responder, arrived on the scene and found Mejia unresponsive and without a pulse. Morrison attempted to establish an airway but was unsuccessful and decided to start CPR. Freeport’s ambulance arrived and transported Mejia to Gila Regional Medical Center, where he was pronounced dead.

INVESTIGATION OF ACCIDENT

Ruth Fox, Administrative Assistant for Freeport-McMoRan Chino Mines, called the Department of Labor’s National Contact Center (DOLNCC) at 7:58 a.m. on October 25, 2018, and notified MSHA of the accident. Inspector Lee Cruise and Lead Investigator Erin Estrada were dispatched to the mine site to secure the scene. MSHA issued an order under provisions of Section 103 (k) of the Mine Act to ensure the safety of the miners and began the investigation.

MSHA’s accident investigation team conducted a physical examination of the accident scene, interviewed sixteen mine employees and contractors, and reviewed documents and work procedures relevant to the accident. MSHA conducted the investigation with the assistance of the Freeport mine management, James Hamilton Construction management, miners, and contract miners.

DISCUSSION

Location of Accident

The accident occurred on the 6975 Lampbright haul road. The haul road is used to transport material from the pit to the plant. It has posted speed limit signs of thirty-five mph. Investigators interviewed other escort drivers who stated twenty to twenty-five miles per hour was a safe operating speed based on the ATV escorting task. The left hand drive 6975 Lampbright haul road has a nine degree slope, an average road width of one hundred and two feet, and is well maintained with no obstacles. The embankment is approximately eight feet in height with an approximate grade of fifty-eight degrees.

Weather Conditions

Weather reports on the day of the accident indicated a temperature of 69°F with no visibility restrictions. Investigators did not consider weather to be a factor in the accident.
**Equipment involved in the accident**

The vehicle involved in the accident was a 2012 Ford F-250 single cab pickup truck (JH176). The pre-operational inspection report indicated the engine light and passenger air bag light were on but did not impair the operation of the pickup. The vehicle’s last full service was on 6/13/2018. There were no other defects reported on the pickup truck.

**Training and Experience**

All pit and quarry drivers, including the victim, were properly trained in accordance with Part 48 training requirements. The victim completed his new miner training on August 17, 2018, and his pit and quarry task training on August 21, 2018. The victim had a total of nine weeks and six days of mining experience, all at this mine.

**CONCLUSION**

Cruz Mejia died when his escort vehicle veered off the haul road and climbed the adjacent haul road bank, causing the truck to overturn.

**ENFORCEMENT ACTIONS**

**Order No. 9408626** - On October 25, 2018, 103 (k) order 9408626, was issued in accordance with the 1977 Mine Act to assure the safety of all persons at this operation and to prevent and destruction of any evidence which would assist in investigating the cause or causes of the accident.

Approved: __________________________ Date: __________________________

William O’Dell
Acting District Manager
Appendix A

Persons participating in the investigation
(Persons interviewed are indicated by a * next to their names)

Freeport-McMoRan Chino Mine Co.
Tony Otero* Sr. Health and Safety Specialist
Armando Aguilera* Sr. Quality Specialist Leach Stock Pile
Angela Kirkpatrick* Powder Handler #2
Andrew Sosaya* Blasting Supervisor
Tyler Morrison * Haul Truck Driver/First Responder
Earl David Fix* Mine Ops. Supervisor
Shane Leonard* Support Equipment Operator
Elijah Toney* Haul Truck Driver

James Hamilton Construction Company
Bradley Gutierrez* Leach Foreman
Antonio (Tony) Arzola* Laborer
Justin Francisco* Laborer
Miguel Gomez* Laborer
Leslie Mendes* Laborer
Korina Simintal* Laborer

Participating in the investigation
Jim Cook Sr. Health and Safety Specialist
John Swagzdis Manager of Health and Safety
Heidi Ogas* JH Safety
Arliss Jones* Health and Safety Specialist 2

Mine Safety and Health Administration
Erin A. Estrada Mine Safety and Health Inspector
Lee Cruise Mine Safety and Health Inspector