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Monthly Contractor Safety Meeting

January 2018





INTRODUCTION

- Facilities
- Emergency Exits
- Cell Phones
- Safety Share
- Estevan Varela
- This months focus
 - Special Presentation by John Dahlgren & Les Dunn from Southwest Irrigation
 - John Deere Safety Notice
 - Environmental
 - Branch Safety Performance
 - Contractors Safety Manual Excavation and Trenching Sections 5.14 thru 5.14.7

A Message From: Global Supply Chain (GSC)

- GSC Contact:
 - Please refer to the contact information for the Contract Administrator that issued your Agreement. Our office is located at Global Supply next to the Warehouse. Our assistant can place you in contact with your Contract Admin should you need to visit one of us.
- Incident requirements for GSC:
 - We expect to be notified within a reasonable time frame. Of course, priority is to notify Safety/the area you are working in. Our response will be specific to each individual case. We are here to assist, so do not hesitate to contact any one of us.

Morenci Environmental Services

WHO DO I CONTACT WHEN I HAVE AN ENVIRONMENTAL QUESTION?





When in doubt. Call an Environmental Services representative.

SPILL HOTLINE – (928) 865-7745

Environmental Administration Office - Christina Seballos - (928) 865-6000

Environmental Yard, Satellite Accumulation, Roll Offs & Hoppers – Cody Watkins – 928-965-6928

Asbestos & Lead – Rob Walker – 928-215-6422

Air Quality — Shanna Holguin — (928) 965-0245, Bobby Scott — (928) 965-1770, Waleed Sunna — (928) 215-5695

Environmental ISO 14001 & Product Approvals – Ruth Chismar – (928) 215-9312 – Jonathan Anderson (928) 215-2730

Water Quality & Wild Life – James Hogan – (928) 965-0061, Dee Broadwell – (928) 965-3142, SWPPP – Jamie Aberle – (928) 215-0667

Asset Recovery & Morenci Transfer Station – Bryan Taylor – (928) 965-2777

Environmental Administration Accounting & Contracts - Cheryl Wright - (928) 965-1785











Contractors are responsible for understanding the FCX Environmental Policy and complying with all site EMS requirements while on site.

<u>https://fcx365-public.sharepoint.com/</u>

Safety Performance

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1/2/2018

Family Freeport-McMoRan

Day	of	FMMO Employees working														
the Y	ear	Safely (Reportable Injuries Only)				DAYS W/O LTA Hrs W/O I		N/O LTA	Days W/O Rec.	Hrs W/O	Rec.					
365	5	TOTAL	MTI	D	YTD											///////////////////////////////////////
	Number	3,170	3,16	28	3,103	4	2/	,176	10	242,0	34					
	Rate	3,170	5,10	50	5,105	-	2-	,170	10	242,0	54					
											//					
REI	PORTAB	le inju	RY RAT	ΓE		Lost Time I	njury Rat	e	Pi	roperty Da	mage Rat	ie	////// 	ligh Energy	High Impa	act
REI	-	LE INJU TRIR	RY RAT	ΓE	I	Lost Time I LT		9	Pi	roperty Da PD	-	ie	ŀ		High Impa Events	act
REF MTD	-	TRIR		Target	MTD			e Target	Pi MTD		-	re Target	H			act Target
	-	TRIR Q				LT	IR			PD	IR			HEHI	Events	

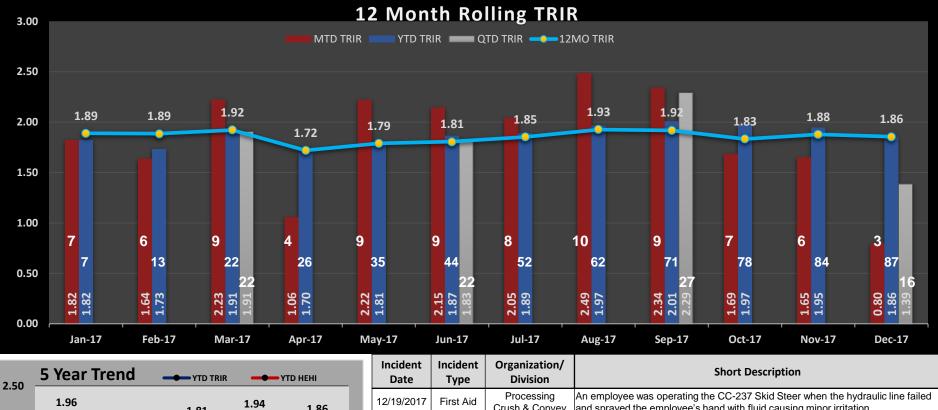
228 Total Injuries

87 Reportable Injuries





Safety Dashboard as of 12/31/2017

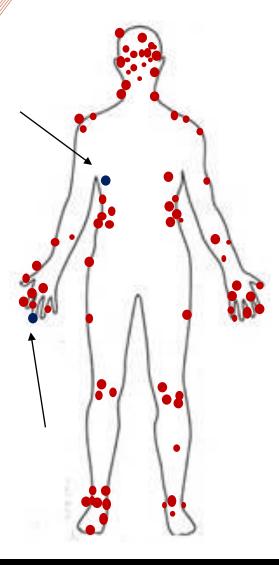




Incident Date	Incident Type	Organization/ Division	Short Description
12/19/2017	First Aid	Processing Crush & Convey	An employee was operating the CC-237 Skid Steer when the hydraulic line failed and sprayed the employee's hand with fluid causing minor irritation.
12/21/2017	First Aid	Mine Mine Maint.	An employee was cutting with an air arc when he got dirt in his eye.
12/21/2017	Medical Treatment	Contractor Crush & Convey	An employee was injured when their hand was caught between a rolling cart and an elevator wall.
12/24/2017	First Aid	Processing Leaching	A leaching operator was hit by a mandrill stabilizer
12/25/2017	First Aid	Processing Metcalf Con.	Employee was sprayed in the face with hydraulic fluid
12/26/2017	First Aid	Mine Frag- L/S	Employee's hand became swollen after operating equipment
12/27/2017	Lost Time	Mine Haulage	An employee slipped in loose gravel and fell to the ground injuring his rib.

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Reportable Injuries – Top 5 Injuries



Nature of	Injury		al No. juries	Medical Treatment	Restricted Duty	Lost Time
	Sprain/Strain	37	43%	0	23	14
	Cut/Laceration	15	17%	15	0	0
	Fracture	12	14%	2	4	6
	Abrasion	7	8%	7	0	0
	Bruise/Contusion	4	5%	0	4	0
	Cut/Laceration Fracture Abrasion	15 12 7	17% 14% 8%	0 15 2 7 0	23 0 4 0 4	0 6 0 0

- = Last two week's injuries
 - = Year to date injuries.

		Medical Treatment	Restricted Duty	Lost Time
13	15%	7	6	0
12	14%	12	0	0
9	10%	0	4	5
9	10%	0	8	1
8	9%	0	4	4
	of In 13 12 9 9	1214%910%910%	of Injuries Treatment 13 15% 7 12 14% 12 9 10% 0 9 10% 0	of Injuries Treatment Duty 13 15% 7 6 12 14% 12 0 9 10% 0 4 9 10% 0 8

Property Damage

Incident Detail											
Date	Date 12.21.2017										
Organization Mine											
Division	Haulage										
Potential Risk	2	3	6 - Medium								
FOLEIILIAI INISK	Consequence	Likelihood	Potential Risk								
Brief Description	Brief An employee was backing the 505HT into the 16 Shovel Tie Down. Employee was trying to fit at the end of tie down. The employee noticed that he had backed over the cross berm. He then attempted to correct his parking by pulling forward and adjusting to the right. Employee did not pay attention to the rt side										







5.14 Excavation and Trenching

5.14.1 Excavation Permits

 An excavation permit is required for any excavation

(digging, trenching or drilling).

Permits must be completed prior

to beginning excavation.

The contractor in charge of the work will:



5.14.1 Excavation Permits

- Require that all trenches and excavations over 4 feet deep be sloped, shored, benched, braced, or otherwise supported. Contractors also may use a trench box. When soil conditions are unstable (as determined by the competent person), excavations shallower than 4 feet shall be sloped, supported, or shored.
- Initiate the excavation permit following site-specific requirements and forward the completed form to the project engineer

5.14.1 Excavation Permits

- Ensure that all approval signatures required on the permit are obtained after the individuals have reviewed the field drawing
- Present the completed excavation permit to the machine operator.
- Identify by name, the on-site Qualified Person for the excavation(s).

5.14.1 Excavation Permits

The determination and design of the supporting system shall be based on careful consideration of the following: depth of the cut; anticipated changes in the soil due to air, sun and water; and ground movement caused by vehicle vibration or blasting, and earth pressures (not only the angle of repose).

5.14.1 Excavation Permits

- The machine or equipment operator will not begin excavation until the permit, signed by all required personnel, is present at the excavation site.
- The qualified person shall classify the soils of an excavation as "A", "B", or "C"

and shall determine safety measures and recommendations appropriate for the soil classification.

	Soil Type Stable Rock Type A Type B Type C	Max. Slope (H:V) Vertical 3/4 : 1 1:1 1-1/2 : 1	Slope Angle (degrees) 90 53 45 34	
Stable Rock		,	уре А	
Туре В		,	ype C	
in the second				

5.14.1 Excavation Permits

- The excavation permit will remain at the site of the excavation during the entire time the excavation is being accomplished.
- When the excavation operation has been completed, the excavation permit will be filed by the contractor.



5.14.2 Underground Utility Location (Blue Stake)

The contractor shall identify and locate all sub-surface utility and process or product lines prior to making any cut into the ground. This shall be coordinated through both the utility owner and the on-site resources.



5.14.3 Designing Adequate Protection

- Some of the considerations the contractor must take into account in the design of adequate protection are:
 - Soil structure
 - Dept of cut
 - Water content of soil
 - Changes due to weather and climate
 - Superimposed loads
 - Vibrations
 - Other operations in the vicinity
 - Overhead power lines

5.14.3 Designing Adequate Protection (Cont.)

- Underground obstructions
- The presence of underground utilities, product or process lines
- The presence of "disturbed" soils (either fill material or due to previous excavation activity)
- Air quality



5.14.3 Installing the Protection

- Shoring must be installed according to manufacturer specifications. Installation of shoring shall closely follow the excavation work.
- All materials used for shoring shall be in good condition, free of defects and of the right size.

5.14.4 Special Precautions

Underground utilities (gas lines, electric lines, communication lines, process lines, etc.) shall be located and identified prior to any excavation. As the anticipated location of the utility is approached, manual means of excavation shall be used to determine the final, actual location of the utility. The location of the lines may be through a commercial service (may be known as "Blue Stake") or by contact with the utility owning the lines, or through site planning or facilities departments. In the case of work being performed within a building or structure, any penetration of a wall or floor must follow a similar process in terms of locating and approaching the hidden utility.

5.14.4 Special Precautions

 The contractor shall guard against an unstable excavation bottom, such as below the water line.
 Sheeting may have to be driven below the bottom of such an excavation to add to the soil stability.



5.14.4 Special Precautions

 Standards require that diversion dikes and ditches, or other suitable means, be used to prevent surface water from entering an excavation and to provide adequate drainage of the area adjacent to the excavation. Water causes erosion and softening and shall not be allowed to accumulate in a trench or excavation.

5.14.4 Special Precautions

 In excavations that employees may be required to enter, excavated or other material shall be removed or sufficiency retained. Spoil piles, loose materials and equipment shall be kept at least 2 feet or more from the edge of the excavation.
 The opening of the excavation shall be secured by fencing or other effective means to prevent a passer-by from falling into the excavation during times when no active excavation is occurring.

5.14.4 Special Precautions

- All excavations, when unattended, shall be demarcated to prevent unintentional or unauthorized access.
- Where passage across the opening of the excavation is necessary, a properly secured and guarded walking surface shall be installed.
- No persons shall be allowed to be beneath any live load while the load is being placed into or removed from the excavation.

5.14.4 Special Precautions

In case of emergency, workers must be able to leave the trench quickly. When employees are required to be in trenches 4 feet deep or more, adequate means of exit, such as ladders or steps, shall be provided and located so as to require no more than 25 feet of lateral travel. Ladder will be of proper type, adequate length and secured from movement. Additional means of exit should be considered where relevant.



5.14.4 Special Precautions

- Underground utilities shall be located, and provisions made for their protection.
- Excavations which are at or greater than 20 feet deep shall be designed by a professional engineer, and the plans for the excavation shall be kept at the excavation site. The design shall specifically include protection features if persons must enter the excavation for any reason for any length of time.

5.14.5 Inspections

Excavations and shoring systems must be inspected daily and after each event or occurrence which may affect the integrity or stability of the excavation, such as rainfall, vibration caused by passage of equipment or mine blasting, etc. by a Qualified Person. Inspections shall be documented and made available for review. 5.14.6 After the Work is Complete

As soon as work is completed, backfilling shall take place as the shoring is dismantled. Workers shall remove the shoring from the bottom up, taking care to release jacks or braces slowly. In unstable soil, ropes will be used to pull out the jacks or braces from above.

- The owner will authorize an excavation permit prior to any excavation, digging, trenching or drilling operations.
- The drilling area shall be inspected for hazards before starting the drilling operation.
- Drill crews and other employees shall be directed to stay clear of augers or drill stems that are in motion.

- When drill helpers assist the drill operator during installation or operation of a drilling rig, the helpers shall be in sight of, or in communication with, the operator at all times.
- While in operation, drilling rigs shall be attended at all times.
- Drill steel, spare parts and tools shall be safely stored in racks or receptacles on the drill rig when not in use.

- Operators must maintain control of the drill during operation.
- Employees shall not drill from positions that hinder their access to the controls or from insecure footing or staging.
- Remote operation of drills shall be done at a level, adequate work surface.

5.14.7 Drilling Operations

 Drilling equipment shall be inspected at the start of each shift by a Qualified Person and any defects noted shall be corrected before the equipment is used.



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- Before each drilling cycle is started, warnings shall be given to workers in the area around the drilling operation.
- During a lightning storm, the site-specific procedures for evacuation and safety must be followed.
- Respirators are required for dry drilling operations.



Please try to give advanced notice to me of any HEHI activities that are coming up.

The intent is just to be on site when the HEHI activities are taking place to help make assessments of the controls.

Thanks in advance for your help on this.

2018 Contractor Monthly Safety Meeting Schedule Freeport Morenci

Meeting Dates	1/8/2018	2/12/2018	3/12/2018	4/10/2018	5/1/2018	6/12/2018	7/10/2018	8/14/2018	9/11/2018	10/9/2018	11/13/2018	12/11/2018
.	10am to	10am to										
Time	11am	11am										
Place	Morenci	Morenci										
	Club Hall	Club Hall										

2018 Focus:

Please give advance notice to FMI safety for all jobs that will have HEHI type tasks.

FMI safety wants to assess the pre-planning and execution of these tasks.

Your cooperation is greatly appreciated.

Living the Vision

Positive Recognition

Who want's next month's Special Presentation?

