



01 February 2022



ASPASA VARIOUS & IN THE NEWS

Dear all,

1. IMPORTANT – PLEASE NOTE:

- 1.1 We have had some hic-ups with getting the presentations of the recently held **ASPASA** Health and Safety Meeting to members. All three presentations are on the link below for your perusal
- 1.2 Meetings for February 2022: (Please contact: office@aspasa.co.za should you require more info.

FEBRUARY		
03.02.2022	Social Compliance & Communities	MS TEAMS
08.02.2022	Public Relations Meeting	MS TEAMS
15.02.2022	Environmental Committee Meeting	MS TEAMS
24.02.2022	Young Professionals	MS TEAMS

2. ASPASA IN THE NEWS:

MODERN QUARRYING

2.1 New ASPASA programme to develop young professionals

Surface mining industry association, ASPASA, will start an all-new mentorship programme aimed at encouraging and developing young professionals in the industry.



Mounting requests for the implementation of a mentorship programme were received following presentations to the industry by the association's Engineering and Young Professionals Committee and led to an agreement to launch the small surface opencast mining industry mentoring programme.

ASPASA director Nico Pienaar says the association recently registered with ECSA and also plans to assist young professionals to register with ECSA. The association will drive the learning and development of both mentees and mentors.

"We will arrange online meetings between professionals with talent, providing accessibility and opportunity regardless of location, encouraging participants to share and learn. Through a comprehensive matching process, this program supports professionals with career guidance and direction by sharing experiences, developing career goals and fostering mentoring relationships beyond the programme's duration.

"It is available to men and women living and working in South Africa and expressions of interest are now open. Mentees can expect to receive career guidance and support from a sector leader for their professional growth as well as expanding their industry networks. They will learn and be supported by a mentor who is invested in their career.

"Mentors by comparison can give back to the industry which has supported them. In doing so, they will gain recognition as a subject matter expert and leader. They will be exposed to fresh perspectives, ideas, and approaches, as well as expanding their own individual leadership and coaching style," says Pienaar.

He adds that individuals eligible for the mentee program must have a strong interest in developing their careers, currently be working in the surface mining industry and must formally reside in South Africa.

Mentors should have worked more than 10 years in the surface mining industry, have a desire to support career growth for the next generation of mining professionals and must currently be working in the surface mining industry or recently retired.

2.2 TMM accidents can be avoided



ASPASA is calling on industry players to improve their safety practices to avoid TMM accidents.

Following several recent mining accidents involving trackless mobile machines (TMMs), as well as incorrect lockout procedures of equipment and conveyors, surface mining industry association ASPASA is calling on industry players to improve their safety practices.

The association's director, Nico Pienaar, says majority of accidents can be avoided by following the requirements of the Mine Health and Safety (MHS) act, supported by the

Occupational Health and Safety (OHS) act, in conjunction with the mines and quarries' own risk assessments.

Surface mines also have the added advantage of measuring compliance by means of ASPASA's own health and safety audit, which is available to all association members.

The mandatory audits measure and provide corrective measures. Consequently, ASPASA members have over the years reported a low level of incidents.

"Providing better health and safety to all on our operations is not a competitive advantage but rather a responsibility that we all need to take seriously. Stipulations in the legislation require that certain procedures and practices be put in place to avoid accidents.

"In most instances, these have come about as a result of previous accidents or where risk assessments have highlighted the need for legislation to prevent accidents. It is therefore critical to study the parts of the legislation that are applicable to surface mines and to each specific mine and to implement the required safeguards.

ASPASA's carefully compiled health and safety ISHE Audit Protocol was developed to assist and educate ASPASA members with the requirements of the Mine Health & Safety Act, and add value by evaluating compliance and identifying non-conformances for continuous improvement.

More recently, an OHS Audit Protocol was also developed and made available to those members that have other operations within their companies that fall under the requirements of the OHS Act. Major successes have been achieved with the health and safety of employees over many years by compliance to the ISHE Audit Protocol and the same success and added value can be achieved with the OHS Audit Protocol.

The audit also serves as a measure and opportunity to correct non-compliance issues and better prepare for inspections by the Inspectorate from Department of Mineral Resources and Energy (DMRE) and Department of Employment and Labour (DEL).

"We hereby call on all ASPASA members and others in the mining industry to be vigilant on the inspections and testing of all safety devices and to be more thorough in scrutinising the compliance to all Legal and ISHE Audit requirements.

"The Inspectorate from DMRE and DEL will definitely focus on deviations that led to these unfortunate accidents, and we might see more Sec 54 & 55 notices from the DMRE, and Corrective / Non-Compliance notices issued from DEL.

"We would also like to call on members with OHS Act operations to allow ASPASA to audit them and assist them to be fully compliant and ensure health and safety of employees," concludes Pienaar.

2.3 Illegal sand extraction detrimental to the environment – ASPASA

QUARRYING AFRICA

Nico Pienaar, director of ASPASA.

Illegal sand mining in rivers around the country is taking a damaging toll on the environment, while the unprotected pits create potential drowning hazards for people and animals alike.

According to Nico Pienaar of surface mining industry association, ASPASA, the failure of law enforcement to clamp down on these legal activities has led to the proliferation of these sites across the country with increasingly sophisticated and larger scale operations taking hold.

"One of the most effective ways to fight back against this extremely damaging and dangerous practice is to hold our sand suppliers accountable and to obtain proof of purchase from a reputable and legally compliant sand producer.

"Compliant and licenced sand miners are required to comply with stringent legal requirements to protect water sources, protect the environment and surrounding communities as well as ensuring a safe workplace for all who enter the site. They are subjected to regular inspections by the Department of Mineral Resources and Energy (DMRE) and this cost of compliance can be substantial.

Along with statutory requirements such as royalties, tax and licensing fees, Pianaar says the costs can add a premium to the price of sand and give unlicensed operations a considerable advantage over their compliant competitors.

"There are however a number of catches that buyers need to be aware of that begins with the overall unsustainability of these types of operations that can be here today and gone tomorrow.

Quality of the products can also not be guaranteed and while one aggregate may resemble another, it may be totally unusable depending on its composition.

"These illegal operations may also devastate local economies through unfair competition and employment practices that can put legal competitors out of business and later leave ruins when the operation closes down," says Pienaar.

Studies, adds Pienaar, have indicated that illegal extraction of sand from rivers can alter the course of a river and lead to an altered stream structure that may erode river banks and cause damage to vegetation and arable land.

In addition, sedimentation can cause a build-up of sand that blocks channels and leads to fish and other animals not having access to clean water, causing a subsequent reduction in numbers. These and other factors provide an overwhelming argument for government to crackdown on unscrupulous operators.

By comparison, ASPASA members are required to be fully legally compliant and to have additional management structures in place to ensure compliance and sustainability of the company.

They are not allowed to take part in illegal activities and are regularly audited against international standards for health, safety and environmental audits management practices, as well as regularly participating in quality audits and other technical audits that ensure they provide professional service.

"We advise buyers of sand to rather make use of our ASPASA members who are located across the country and are fully compliant with all legislation and other statutory requirements.

Rather be responsible and contact ASPASA for a list of members in your area," concludes Pienaar.

2.4 Avoiding mine accidents

Dineo Phoshoko | Jan 21, 2022 | Health & safety, Industry Insight, News | 0 comments

Several mining accidents involving trackless mobile machines (TMMs) as well as incorrect lockout procedures of equipment and conveyors recently has led surface mining industry association ASPASA to call for closer adherence with safety legislation.

The association's director, Nico Pienaar, says majority of accidents can be avoided by following the requirements of the Mine Health and Safety Act, supported by the Occupational Health and Safety (OHS) Act, in conjunction with the mines own risk assessments.

Surface mines also have the added advantage of measuring compliance by means of ASPASA's own health and safety audit which is available to all ASPASA members. The mandatory audits measure and provide corrective measures in the event on non-compliance which has led to the mines under the association's banner reporting among the lowest level of incidents in the entire mining sector.



Hard lessons

According to Pienaar, providing better **health and safety** to everyone on mines is not a competitive advantage but rather a responsibility that we all need to take seriously. Stipulations in the acts require that certain procedures and practices be put in place to avoid accidents in future.

He explains that in most instances these have come about as a result of previous accidents or where risk assessments have highlighted the need for legislation to prevent accidents. It is therefore critical to study the parts of the legislation that are applicable to surface mines and to each specific mine and implement the required safeguards.

"For example, when machine guards are not replaced, or are not replaced correctly after maintenance work is done and the plant is started, it is normally due to two other systems that were totally ignored and failed. Those two systems would be the full compliance to isolation and lockout requirements, and total inspections of plants before start-up," Pienaar said.

In his view, both these systems rely on human interventions with employees doing the isolation and re-isolation after doing proper inspections before a plant is declared safe to be started. The human factor and human behaviour cannot be replaced by any electronic or computerized system. The same applies to TMMs where procedures need to be followed carefully to prevent accidents," says Nico.

Audit trail

He further added that the association's carefully compiled health and safety ISHE Audit Protocol was developed to assist and educate ASPASA Members in the requirements of the Mine Health & Safety Act, and annual audits add value by evaluating compliance and identifying non-conformances for continuous improvements.

More recently an OHS Audit Protocol was also developed and made available to those members that have other operations within their companies that fall under the requirements of the OHS Act.

Major successes have been achieved with the health and safety of employees over many years by compliance to the ISHE Audit Protocol and the same success and added value can be achieved with the OHS Audit Protocol.

The audit also serves as a measure and opportunity to correct non-compliance issues and better prepare for inspections by the Inspectorate from Department of Mineral Resources and Energy (DMRE) and Department of Employment and Labour (DEL).

Accident consequences



"We hereby call on all ASPASA members and others in the mining industry to be vigilant on the inspections and testing of all safety devices and to be more thorough in scrutinizing the compliance to all Legal and ISHE Audit requirements," Pienaar added.

He also mentioned that the inspectorate from DMRE and DEL will definitely focus on deviations that led to these unfortunate accidents, and we might see more Sec 54 & 55 notices from the DMRE, and Corrective / Non-Compliance notices issued from DEL.

"We would also like to call on the Members with OHS Act operations to allow ASPASA to audit them and assist them to be fully compliant and add value to the health and safety of employees.

Non-members need to be educated in the benefit of being part of this process to be educated and assisted to be fully compliant to Legal requirements," Pienaar concluded.

2.5 Pooled expertise and resources advance best practice among ASPASA members

Nico Pienaar, director of ASPASA.

Surface mining industry association, ASPASA, is actively encouraging its members to adopt the latest techniques and technologies to improve their operations.



Active participation of highly regarded industry experts sitting on the association's engineering committee is allowing members to share best practices and actively participate in regular workshops and webinars online.

ASPASA director Nico Pienaar says that information sharing and learnings from its various technical committees is an invaluable tool for the industry, which is easily shared via online webinars and meeting platforms.

The latest engineering committee presentation by Mathews Masegela of Lafarge was a good example of a study that has been carried out and which may shed some valuable light on the subject of blast vibration comparisons between various drill and blast parameters.

The study at Lafarge Peak Quarry in the Western Cape revealed the careful attention that is needed to optimise blast parameters and resultant fragmentation of rock, to ensure health and safety, as well as limiting ground vibration, air over pressure, fly rocks, among others. It also looked at environmental considerations such as preventing disturbances on plant infrastructure and neighbouring communities.

In depth calculations were shared on different blast types and charges and showed some surprising outcomes. It was found that it is possible to keep all the blasting activities (vibration and the noise) contained within a 500 m radius and that timing can play an important role in reducing noise and vibration using a single initiation point or single hole detonation. Reduced hole diameter, bench height, burden and spacing also needed to be carefully evaluated.

"This is the kind of information that we share among members and where possible use our pooled expertise and resources to advance surface mining in South Africa. We therefore encourage all surface mining operations to become part of ASPASA and participate in our many technical committee studies and events," concludes Pienaar.