BEST PRACTICE

LOCATION:	**Concrete products plant**	**ARTICLE YEAR**	**2024**
ACTIVITY:	**Maintenance & Housekeeping**	**COMPANY:**	**Mansfield Sand Co. Ltd**
SUB ACTIVITY:	**Screens & washers**	**COMPANY LOCATION:**	**Mansfield Brick**
BEST PRACTICE No:	**BP2239**	**COMPANY TEL:**	**0000**
COUNTRY OF ORIGIN:			

TITLE

Dust extraction during pre-cast mould cleaning - Topic 2 - Highly Commended

ARTICLE

TOPIC 2 - Highly Commended -202447

As part of a block manufacturing process, we use a variety of different moulds which are changed out as required by production demands. Once a mould has been removed from the press it undergoes a thorough clean down prior to being put back to storage.

When the mould comes out of service it has a build-up of concrete product and a degree of oxidisation, both of which require removing. Hand-held abrasive wheels are used to carry out this cleaning process, resulting in the generation of airborne dusts including Respirable Crystalline Silica (Fatal 6) and Ferric Oxide – both of which are hazardous to health.

Employees wear appropriate RPE, but as the dusts became airborne this potentially puts others sharing the workplace at risk of exposure to them.

A suitable extraction unit was sourced and following a thorough analysis of the selected unit's specifications, it was deemed to be suitable to remove RCS and other harmful dusts at source. The unit contains a HEPA 13 filter which removes airborne particles down to 0.3 Microns and has the highest filtration efficiency rating of F9 EN779:2012.

The equipment supplier visited the site to understand the requirements and worked together to provide a suitable unit to remove hazardous dusts at the point they were generated, whilst providing the flexibility to move the unit around to where the work was being carried out, as opposed to having a fixed extraction system.

Please see additional pdf for details of the design process

Benefits

The primary benefit of introducing the portable extraction system is that it removes hazardous respirable dusts including Crystalline Silica and Ferric Oxide at source. This has a dual benefit as it protects the person carrying out the mould clean down activity and protects others in the workplace i.e. employees, contractors, visitors from exposure to hazardous airborne dusts.

By engaging and consulting with employees throughout the whole process, it has clearly demonstrated the management teams' visible leadership in promoting a healthier and safer workplace providing a positive impact on H&S culture across the site

ARTICLE IMAGES