



**BOSCH**

COMPLETE AND RELIABLE  
SOLUTIONS FOR OSHA  
SILICA DUST SAFETY

# MAKE DUST HISTORY



## WHAT PUTS YOU AT RISK FOR SILICA DUST EXPOSURE?

If you Cut, Grind, Drill, or Saw in Concrete, Mortar, Masonry and more



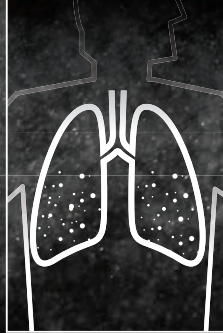
Learn more about **PRO+GUARD™**  
dust solutions for performance,  
dust compliance and safety.



# GET THE FACTS

**PRO+GUARD™**  
PERFORMANCE • COMPLIANCE • SAFETY

SILICOSIS IS  
**100%**  
PREVENTABLE\*  
according to  
CPWR



**1.85M**  
CONSTRUCTION  
WORKERS  
are currently exposed  
to respirable  
crystalline silica



MORE THAN  
**640K**  
WORKERS  
are exposed to silica  
levels that exceed the  
(OSHA) proposed  
Permissible Exposure  
Limit (PEL)



LESS THAN  
**50 µg/**  
**m³**  
OVER 8-HOURS  
in 2016, (OSHA)  
reduced the (PEL) of  
respirable crystalline  
Silica averaged over  
an 8-hour shift by 5x.



50 micrograms/  
cubic meter of air

## ENHANCE YOUR SAFETY

According to health experts, inhaling dust containing silica in some instances may cause silicosis, lung cancer, COPD and other debilitating diseases.

**Bosch dust collection systems** can reduce airborne dust, helping to create a safer and healthier working environment.



## BREATHE EASIER

The Center for Construction Research and Training explains the danger of silica exposure.

## WHAT IS CRYSTALLINE SILICA?

Silica, often referred to as quartz, is a very common mineral. It is found in many materials common on construction sites, including soil, sand, concrete, masonry, rock, granite, and landscaping materials. The dust created by cutting, grinding, drilling or otherwise disturbing these materials can contain crystalline silica particles. These dust particles are very small and invisible to the naked eye. When inhaled, even in very small amounts, silica dust can cause serious health hazards. Each exposure to silica adds to the lung damage.

## WHAT IS SILICOSIS?

Silicosis is a disabling, irreversible, and sometimes fatal lung disease. When a worker inhales crystalline silica, the lungs react by developing hard nodules and scarring around the trapped silica particles. If the nodules become too large, breathing becomes difficult and death can result. There is no cure for this disease, but it is 100% preventable.

## WHY IT'S DEADLY

Inhaling crystalline silica can lead to serious, sometimes fatal illnesses including silicosis, lung cancer, tuberculosis (in those with silicosis), and chronic obstructive pulmonary disease (COPD). In addition, silica exposure has been linked to other illnesses including renal disease and other cancers. In 1996, the World Health Organization—International Agency on Cancer Research (IARC) identified crystalline silica as a “known human carcinogen” (they reaffirmed this position in 2009). The American Thoracic Society and the American College of Occupational and Environmental Medicine have also recognized the adverse health effects of exposure to crystalline silica, including lung cancer.



**FOR MORE INFORMATION  
REGARDING SILICA EXPOSURE  
OR OSHA RULINGS, PLEASE VISIT  
CPWR'S WEBSITE SILICA-SAFE.ORG**

**CPWR**   
THE CENTER FOR CONSTRUCTION  
RESEARCH AND TRAINING



# MOVE TOWARDS COMPLIANCE

Improve your safe work practices and help reduce on-the-job health hazards for all types of environments.

Dust Solutions don't have to be complicated. Bosch offers several systems to help you meet OSHA compliance without jeopardizing efficiency.

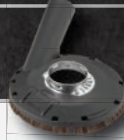
## CHOOSING THE RIGHT SYSTEM

1



Choose the tool that best fits your needs

2



Identify the correct attachment that fits your tool

3



Choose a HEPA rated dust extractor with the highest CFM and meets EPA guidelines

4



Determine the respirator for your application (refer to the OSHA Table 1)\*  
APF 10 shown 3M™ Rugged Comfort™ Half Face Respirator 6500 Series

\*OSHA Rule 1926.1153 Table 1

## CHOOSE THE RIGHT SYSTEM: CONCRETE DRILLING & ANCHORING



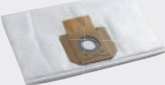















Find Your Tool	Attachment or Accessory	Filter & Dust Extractor	Respiration	OSHA Silica Compliant <sup>o</sup>
<b>Hammer Drill</b>  2LDB1, 39RY34, 5EEW4	 35GN79	9 gallon dust vac 19TT53 + 35KF47 		Yes 
<b>SDS-plus Hammers</b>  19L475, 2LDB3, 4WLJ2, 423N65, 53DM69, 54EF67, 53DM24, 54EF82, 38C956, 49AX82, 49AX83, 5EEW2, 5EEW3, 22DK22	<b>Anchoring Applications</b>  <b>Speed Clean™ SDS-plus®:</b> 48UR88 48UR89 48UR90 48UR91 48UR92 48UR93 48UR94  <b>Universal Dust Extraction</b>  423N84*, 35GN79	+ 35KF47  14 gallon dust vac 446P26  + 35KF51  <b>AND</b> 35KF56 	 Not needed for compliance of these applications	Yes 
<b>SDS-max &amp; Spline Hammers</b>  4GAE3, 48XY46, 30RW21, 35ZD85, 21TY29, 46AE4, 30RW20	<b>Anchoring Applications</b>  <b>Speed Clean™ SDS-max®:</b> 48UR95 48UR96 48UR97 48UR98 48UR99 48UT01  <b>Universal Dust Extraction</b>  35GN79, 35GN78	+ 35KF51  <b>AND</b> 35KF56 		Yes 

\*Compatible with 2LDB3, 38C956, 49AX82, 4WLJ2, 22DK22 and 49AX83

o All information cited was prepared by Robert Bosch Tool Corporation on December 1, 2016, which is to serve as a basic summary helping users generally understand the OSHA Respirable Crystalline Silica Rule for the construction industry. This is not an official, legal, safety-related or comprehensive interpretation of the rule; you should always rely on your own review and evaluation of the applicable rules and regulations and understand that it is the individual's and/or employer's obligation to comply with such rules. Also, there may be additional OSHA standards and OSHA-approved state programs that apply. When using the equipment shown in this guide as you strive to meet your required compliances, always use the tools in accordance with the owner's manual and OSHA regulations. For official information, please go to <https://www.osha.gov/silica/> and for the complete rule (including Table 1), please see <https://www.osha.gov/silica/SilicaConstructionRegText.pdf>.



# CHOOSE THE RIGHT SYSTEM: CONCRETE CHISELING, DEMOLITION & SURFACING

Find Your Tool	Attachment or Accessory	Filter & Dust Extractor	Respiration	OSHA Silica Compliant*
<b>SDS-max and Spline Hammers (Chisel Mode Only)</b>  4GAE3, 48XY46, 30RW21, 35ZD85, 21TY29, 46AE4, 30RW20	 35KF65	9 gallon dust vac 19TT53 +  35KF47	<ul style="list-style-type: none"> <li>• Needed when used indoors</li> <li>• Needed when used outdoors &gt;4 hours/shift</li> </ul> 3M 	Yes 
<b>Demolition Hammers</b>  4WN69, 4GAE5, 21TY31, 35KF35, 53DM92	 35KF65	14 gallon dust vac 446P26 +  35KF51	APF 10* (N95) OR 3M 	Yes 
<b>Demo/ Breaker Hammers</b>  2LDA9, 19TR99, 6TXC1, 21TY30	 35KF66	AND 35KF56 	RR 6500* 	Yes 
<b>Concrete Surfacing</b>  36WH94	Not Required	35KF56 		Yes 

\*3M™ Particulate Respirator 8210V & 3M™ Rugged Comfort™ Half Face Respirator 6500 Series shown. For suggested respiratory protection and other personal protective equipment, go to 3M.com/OSHASilica ♦ See page 3



## SILICA & OSHA REFERENCES

- [https://www.osha.gov/dte/library/silicosis/si\\_con.html](https://www.osha.gov/dte/library/silicosis/si_con.html)
- <http://www.silica-safe.org>
- <https://www.osha.gov/silica/index.html>
- <https://www.osha.gov/silica/SilicaConstructionRegText.pdf>
- <https://www.osha.gov/SLTC/respiratoryprotection/index.html>
- <https://www.osha.gov/SLTC/wooddust/recognition.html>

AVAILABLE THROUGH

**GRAINGER®**

FOR THE ONES WHO GET IT DONE

For more information contact your Grainger Representative or visit [Grainger.com](http://Grainger.com)®.

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