



**Australian Government**  

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**National Occupational  
Health and Safety Commission**

# **NATIONAL HAZARDOUS SUBSTANCES REGULATORY PACKAGE**

## **Substances Subject to Limitations on Exposure (National Exposure Standards)**

**AMENDMENTS TO UPDATE STANDARDS – CRYSTALLINE SILICA**

<p>Seal of NOHSC</p>	<p>Robin Stewart- Crompton Chief Executive Officer</p>
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## TITLE

1. These amendments may be cited as Amendments to the *Adopted National Exposure Standards for Atmospheric Contaminants in the Occupational Environment* (Source C Updates) 2004.

## OBJECTIVE

2. The objective of these amendments is to update the National Exposure Standards maintained by the National Occupational Health and Safety Commission by replacing the existing standards for 3 forms of crystalline silica – quartz, cristobalite and tridymite.

## AMENDMENTS

3. Replace the TWA ( $\text{mg}/\text{m}^3$ ) values for quartz, cristobalite and tridymite in the *Adopted National Exposure Standards for Atmospheric Contaminants in the Occupational Environment* [NOHSC: 1003(1995)] with the revised TWA ( $\text{mg}/\text{m}^3$ ) values as shown in the following table. The blank entries for the STEL indicate that there is no requirement for a specified short-term limit for these substances. The date of effect for these amendments is 1 January 2005.

Substance	CAS #	TWA		STEL	
		ppm	$\text{mg}/\text{m}^3$	ppm	$\text{mg}/\text{m}^3$
Quartz (i)	[14808-60-7]	-	0.1	-	-
Cristobalite (i)	[14464-46-1]	-	0.1	-	-
Tridymite (i)	[15468-32-3]	-	0.1	-	-

## NOTES

(i) The national exposure standards of  $0.1 \text{ mg}/\text{m}^3$  (TWA, 8 hours) for quartz, cristobalite and tridymite are each to be measured in accordance with the methodology in Australian Standard *Workplace Atmospheres – Method for sampling and gravimetric determination of respirable dust* AS2985-2004.

TWA = The average airborne concentration of a particular substance when calculated over a normal eight-hour working day, for a five-day working week.

STEL = A 15 minute TWA exposure which should not be exceeded at any time during a working day even if the eight-hour TWA average is within the TWA exposure standard. Exposures at the STEL should not be longer than 15 minutes and should not be repeated more than four times per day. There should be at least 60 minutes between successive exposures at the STEL.

CAS # = Chemical Abstracts Service Registry Number.

ppm = parts of vapour or gas per million parts of contaminated air by volume.

$\text{mg}/\text{m}^3$  = milligrams of substance per cubic metre of air.