

NULLIFIRE SC902 VOC CLASSIFICATION IN RELATION TO GREEN STAR – DESIGN & AS BUILT v1.2 JUNE 2017 SECTION 13 – INDOOR POLLUTANTS

Section "IEQ-13" addresses 'Indoor Pollutants' and Clause 13.1.1 relates to Paints, Adhesives and Sealants and the contribution they impart to Volatile Organic Compounds (VOC's) or "off gassing".

The section 'Credit Criteria' 13.1 – Paints, Adhesives, Sealants and Carpets states that 1 point is available where at least 95% of all internally applied paints, adhesives, sealants and carpets meet stipulated 'Total VOC Limits' (TVOC).

Nullifire SC902 intumescent basecoat has been tested in accordance with Clause 13.1.1B - Laboratory Testing and the results are documented in the below certificate:-



VOC Content Test Certificate

Thursday, 17th April 2014

Manufacturer: Nullifire Limited (Torrington Avenue, Coventry, CV4 9TJ United Kingdom)

Sample Description: Nullifire SC902

Date Tested: April 2014 (Tested by FORAY Laboratories – NATA Accreditation 1231)

Test Method: SCAQMD Method 304-91 Determination of Volatile Organic Compounds (VOC) in Various Materials as referenced by South Coast Air Quality Management District (SCAQMD) Rule 1168

Test Data:

Specification Green Building Council of Australia Green Star Office Design V3 IEQ-13	Nullifire SC902
Any solvent-based coating whose purpose is not covered in Green Star Office Design Table IEQ-13.1 200 grams per Litre as VOC content per material	132 grams per Litre as VOC content per material

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Nullifire SC902 is a 'hybrid', low solvent, 2 component intumescent coating suitable for both off-site and on-site application for the fire protection of structural steel and does not exceed the 200 g/L VOC limit as referred to originally in the GECA 2005 section 4 guideline. It needs to be taken into consideration that this guideline was directed at architectural/decorative coatings, and did not encompass intumescent coatings which had no classification.

As there has been no provision made specifically for intumescent coatings with regards to TVOC limits, we have consulted with CETEC in an effort to provide a logical approach to determine a viable classification and we believe that it can be included with 'One and two pack performance coatings for floors' as outlined in the below table:-

Table 13.1.1: Maximum TVOC Limits for Paints, Adhesives and Sealants

Product Category	Max TVOC content in grams per litre (g/L) of ready to use product.
General purpose adhesives and sealants	50
Interior wall and ceiling paint, all sheen levels	16
Trim, varnishes and wood stains	75
Primers, sealers and prep coats	65
One and two pack performance coatings for floors	140
Acoustic sealants, architectural sealant, waterproofing membranes and sealant, fire retardant sealants and adhesives	250
Structural glazing adhesive, wood flooring and laminate adhesives and sealants	100