

# Cadox D-50 VR

## Methyl ethyl ketone peroxide

Cadox D-50 VR is a special purpose catalyst (including a Vanishing Red Cure Indicator System) used for curing gel coats and promoted unsaturated polyester resins at room temperature. Low-hydrogen peroxide content reduces gel-coat porosity and provides improved curing of vinylester resins.

CAS number  
1338-23-4

EINECS/ELINCS No.  
215-661-2

TSCA status  
listed on inventory

### Specifications

Appearance, 20-25°C	Red liquid
Hydrogen peroxide	≤ 1.2 %
Total active oxygen	8.9 %

### Characteristics

Density, 20 °C	1.0 g/cm <sup>3</sup>
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### Applications

Cadox D-50 VR is a special purpose catalyst for the room temperature cure of promoted unsaturated polyester resins. Cadox D-50 VR has a low hydrogen peroxide content which provides improved curing of vinyl ester resins. Cadox D-50 VR also has a high MEKP monomer content which may provide reduced cure times in some resin systems. Cadox D-50 VR offers all the advantages of a red MEKP, except red parts. The VR series of products includes a red indicator system that virtually disappears during cure. The red is there when you need it, but not in the finished product. Key features are: Indicates initiator presence

### Thermal stability

Organic peroxides are thermally unstable substances, which may undergo self-accelerating decomposition. The lowest temperature at which self-accelerating decomposition of a substance in the original packaging may occur is the Self-Accelerating Decomposition Temperature (SADT). The SADT is determined on the basis of the Heat Accumulation Storage Test.

SADT	60°C (140°F)
Method	The Heat Accumulation Storage Test is a recognized test method for the determination of the SADT of organic peroxides (see Recommendations on the Transport of Dangerous Goods, Manual of Tests and Criteria - United Nations, New York and Geneva).

## Storage

Due to the relatively unstable nature of organic peroxides a loss of quality can be detected over a period of time. To minimize the loss of quality, Nouryon recommends a maximum storage temperature (Ts max. ) for each organic peroxide product.

Ts Max.	30°C (86°F)
Note	When stored under these recommended storage conditions Cadox D-50 VR will remain within the Nouryon specifications for a period of at least three months after delivery.

## Packaging and transport

Cadox D-50 VR is packed in non-returnable, 5 gallon polyethylene containers of 40 lb net weight. Both packaging and transport meet the international regulations. For the availability of other packed quantities contact your Nouryon representative. Cadox D-50 VR is classified as Organic peroxide type D; liquid; Division 5. 2; UN 3105. This product contains a component that is classified as Toxic for Reproduction, Category 1B under the Globally Harmonized System of Classification and Labelling of Chemicals (GHS). Nouryon ensures that it consistently manages hazardous substances to ensure safe use. To that end, a full risk assessment of this product has been conducted under Nouryon's Priority Substance Program and safe use has been demonstrated throughout the supply chain.

## Safety and handling

Keep containers tightly closed. Store and handle Cadox D-50 VR in a dry well-ventilated place away from sources of heat or ignition and direct sunlight. Never weigh out in the storage room. Avoid contact with reducing agents (e. g. amines), acids, alkalis and heavy metal compounds (e. g. accelerators, driers and metal soaps). Please refer to the Safety Data Sheet (SDS) for further information on the safe storage, use and handling of Cadox D-50 VR. This information should be thoroughly reviewed prior to acceptance of this product. The SDS is available at [nouryon.com/sds-search](http://nouryon.com/sds-search).

All information concerning this product and/or suggestions for handling and use contained herein are offered in good faith and are believed to be reliable. Nouryon, however, makes no warranty as to accuracy and/or sufficiency of such information and/or suggestions, as to the product's merchantability or fitness for any particular purpose, or that any suggested use will not infringe any patent. Nouryon does not accept any liability whatsoever arising out of the use of or reliance on this information, or out of the use or the performance of the product. Nothing contained herein shall be construed as granting or extending any license under any patent. Customer must determine for himself, by preliminary tests or otherwise, the suitability of this product for his purposes. The information contained herein supersedes all previously issued information on the subject matter covered. The customer may forward, distribute, and/or photocopy this document only if unaltered and complete, including all of its headers and footers, and should refrain from any unauthorized use. Don't copy this document to a website.

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The Nouryon logo consists of a stylized blue 'N' followed by the word 'ouryon' in a lowercase, sans-serif font. The 'N' is significantly larger and more prominent than the rest of the text.