

Duracon® 221

An elastified resin binder for Duracon® flooring systems

Key Benefits Summary:

- Flexible
- Withstands vibrations and movements in the substrate
- Good impact resistance
- Medium viscosity
- Medium reactivity
- Exterior and interior application

Product Information:

Description:

Duracon® 221 is a medium viscosity, blue-violet, 2 component reactive resin based on methyl methacrylate (MMA).

Usage:

Duracon® 221 is an elastified resin binder. It is mainly used for:

- Elastified versions of the Duracon® System BC and L Floor Coatings.
- As a movement and anti-vibration membrane
- As a blend component for Duracon® 205

Duracon® 221 was developed especially to be included in Floor Coating Systems destined for situations of heavy loading such as the metal industry. It is also used as a membrane under Floor Coating Systems temporarily or permanently subjected to temperatures below 0°C, or outdoor areas, and for coatings in containers, on ship-decks etc. Floor Coating Systems where Duracon® 221 is the main resin binder must always be sealed with a suitable Duracon® sealer (e.g. Duracon® 306).

Packaging:

180 kg steel drums, 50 kg metal pails.

Shelf Life:

6 months when stored in a cool and dry place and in originally closed packaging. The optimal storage temperature is 15-20°C.

Technical Information:

Technical Characteristics (liquid state)

Viscosity, 25°C:	180-240mPa·s	DIN 53214
Density, 25°C:	0.97 g/ml	DIN 51757
Pot life/processing time at 20°C:		approx 15 min.
Curing time at 20°C:		approx 40 min.
Flash Point:	+11.5°C	ISO 1516

Technical Characteristics (cured state)

Tensile Strength:	4.01 N/mm ²	DIN 53455
Elongation at max. strength:	218%	
Elongation at fracture:	221%	
Modulus of elasticity:	5.9 N/mm ²	

Usage Guidelines:

Substrate Preparation:

The area to be coated, must be pretreated with a Duracon® primer (e.g. Duracon® 101) including sanding. The substrate must be dry, firm, solid and free of dust, fat and oil. Laitance and loose particles must be removed thoroughly, e.g. by shot blasting. Fats or oils as well as humidity can be removed by flame blasting for example.

For further details, see our General Preparation and application guidelines for Duracon® floor protection systems.

Mixing:

Prior to use Duracon® 221 must be carefully stirred to achieve a uniform distribution of the paraffin contained in the product. Duracon® 221 is thoroughly mixed together with the Duracon® CATALYST (50% dibenzoyl peroxide), in accordance with the below guidelines.

It should be noted that the amount of catalyst powder to be added depends upon the temperature.

At 30°C	add 1% by weight of resin
At 20°C	add 2% by weight of resin
At 10°C	add 4% by weight of resin
At 0°C	add 5% by weight of resin
Below 0°C	add 5% by weight of resin and additionally add Duracon® 404, which is an accelerating agent.

Please contact our technical services department for further details.

Note: Weight to Volumetric conversion of Catalyst.

1 cm³ of Duracon® CATALYST weights 0.64 g
1 g of Duracon® CATALYST = 1.57 cm³

Application:

The material consumption and application method depends in which of the Duracon® systems Duracon® 221 resin is being used for; see specific Systems Data Sheets for further information. For further details see our General Preparation and application guidelines for Duracon® floor protection systems.

Health & Safety:

Suitable protective clothing, gloves and safety goggles must be worn during mixing and application of Duracon® 221. In case of contact with eyes, rinse immediately for a long period of time and consult a physician. In case of contact with skin, clean immediately with water and soap.

Duracon® 221 is highly flammable; keep away from heat and all sources of ignition and do not smoke. The stirrer as well as all the other electric appliances used on the application site must be explosion-proof versions. For further information see our Material Safety Data Sheet.

GB484
2 pages

PRODUCT
DATA
SHEET

Guarantee:

RPM/Belgium N.V. and Alteco Technik GmbH warrant all goods to be free from defects and will replace materials proven to be defective.

The information and recommendations herein are believed by RPM/Belgium N.V. and Alteco Technik GmbH to be accurate and reliable.

Equus Industries Ltd
PO Box 601
Blenheim
Phone: 03 578 0214 Fax 03 578 0919
Email: admin@equus.co.nz
Web: www.equus.co.nz