

Advanced Materials**Aradur® 3741#**

Liquid formulated hardener

DATA SHEET

Polyamine																																							
Applications	The combination of the binder system Araldite® BY 158 / Aradur® 3741 with high grade mineral fillers results in epoxy concrete of outstanding dimensional stability, suitable for demanding applications such as machine bases. The best results are obtained with cure temperatures of 20 °C to 50 °C. Can be used in 2 systems for wet lay-up, infusion, adhesives.																																						
Properties	Controlled reactivity for the production of shrink- and deformation-free large elements: <ul style="list-style-type: none"> • easy processing • very good wetting capability • relatively low exothermic heat generation • good mechanical properties and very good damping effect • good chemical resistance • good thermal resistance 																																						
Key data	<p>Specified key data</p> <table border="1"> <tr> <td>Aspect (visual)</td> <td colspan="2">clear liquid</td> </tr> <tr> <td>Colour (Gardner, ISO 4630)</td> <td colspan="2">≤ 1</td> </tr> <tr> <td>Amine number (ISO 9702)</td> <td>695 - 730</td> <td>[mg KOH/g]</td> </tr> <tr> <td>Viscosity at 25 °C (Falling-ball, ISO 12058-1)</td> <td>1 - 15</td> <td>[mPa s]</td> </tr> </table> <p>Specified key data are individually checked throughout and guaranteed.</p> <p>Typical key data</p> <table border="1"> <tr> <td>H⁺ active equivalent weight</td> <td>39</td> <td>[g/eq]</td> </tr> <tr> <td>Density at 25 °C (ISO 1675)</td> <td>0.91 - 0.92</td> <td>[g/cm³]</td> </tr> <tr> <td>Flash point (Pensky Martens, ISO 2719)</td> <td>≥ 108</td> <td>[°C]</td> </tr> <tr> <td>As-supplied form</td> <td colspan="2">liquid</td> </tr> <tr> <td>Odour</td> <td colspan="2">yes</td> </tr> <tr> <td>Shelf life (at storage temperature between 2 - 40 °C) (see expiry date on original container)</td> <td colspan="2">several years</td> </tr> <tr> <td>Hazardous decomposition products (when disposed of in fire)</td> <td colspan="2">carbon monoxide, carbon dioxide, nitrogen oxides and other toxic gases and vapours</td> </tr> <tr> <td>Disposal</td> <td colspan="2">regular procedures approved by local authorities</td> </tr> </table> <p>Typical key data are spot checked; the values are typical for the product and are indicated for information only. The values are not guaranteed.</p>			Aspect (visual)	clear liquid		Colour (Gardner, ISO 4630)	≤ 1		Amine number (ISO 9702)	695 - 730	[mg KOH/g]	Viscosity at 25 °C (Falling-ball, ISO 12058-1)	1 - 15	[mPa s]	H ⁺ active equivalent weight	39	[g/eq]	Density at 25 °C (ISO 1675)	0.91 - 0.92	[g/cm ³]	Flash point (Pensky Martens, ISO 2719)	≥ 108	[°C]	As-supplied form	liquid		Odour	yes		Shelf life (at storage temperature between 2 - 40 °C) (see expiry date on original container)	several years		Hazardous decomposition products (when disposed of in fire)	carbon monoxide, carbon dioxide, nitrogen oxides and other toxic gases and vapours		Disposal	regular procedures approved by local authorities	
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In addition to the brand name product denomination may show different appendices, which allows us to differentiate between our production sites: e.g. BD = Germany, US = United States, IN = India, CI = China, etc. These appendices are in use on packaging, transport and invoicing documents. Generally the same specifications apply for all versions. Please address any additional need for clarification to the appropriate Huntsman contact.

Mix ratios	Components	Parts by weight				
	Araldite [®] BY 158	[p.b.w.]	100			
	Aradur [®] 3741		25			
	Gel time (Tecam, 100 ml, 20 °C, 65% RH)	[min]	180			
	Glass transition temperature (DSC, 10 K/min)	[°C]				
	Cured 7 days at RT		60			
Cured 4 days at RT + 1 day at 40 °C		78				
Cured 4 days at RT + 1 day at 60 °C		95				
Viscosity build-up	Viscosity (ISO 12058-1) of an Araldite [®] BY 158/Aradur [®] 3741 mix (100:25 p.b.w.) as a function of time at 25 °C					
	Time	[min]	0	30	60	90 120
	Viscosity	[mPa s]	130	160	210	290 400
Storage	Aradur [®] 3741 should be stored in a dry place, preferably in the sealed original container, at temperatures between 2 and 40 °C. The product should not be stored exposed to direct sunlight.					
Handling precautions	Mandatory and recommended industrial hygiene procedures should be followed whenever our products are being handled and processed. For additional information please consult the corresponding product safety data sheets.					
Note	Araldite [®] and Aradur [®] are registered trademark of Huntsman LLC or an affiliate thereof.					

Huntsman Advanced Materials

(Switzerland) GmbH
Klybeckstrasse 200
4057 Basel
Switzerland

Tel: +41 (0)61 299 11 11
Fax: +41 (0)61 299 11 12

www.huntsman.com/advanced_materials
Email: advanced_materials@huntsman.com



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