

Technical sheet no. 36 Editing September 2022

SOLVANT-FREE EPOXY FINISH FOR DRINKING WATER STORAGE **TYPE OF PRODUCT: PROPERTIES:** BIOTANK is a solvent-free epoxy paint, low viscosity and strong gel recovery, allowing the application of thick, inert, abrasion-resistant layers, suitable for contact with drinking water. Grades: The properties of the coating, apart from its appearance, are not affected by actinic radiation. Information Products It is the user's responsibility to ensure that the foodstuffs he stores are in no way affected by contact with the coating. Applications on concrete*, steel, epoxy composite laminates, on aluminum properly primed with EPOXY PRIMER EP 211. Maintenance and repair of drinking water tanks for boats. Protection of any structural element related to the storage and distribution of drinking water. Do not use for hot water tanks above 50°C. *Consult us.

COMPONENTS:

SOLVENT FREE



Hardeners Thinners

BIOTANK HARDENER

SPECIFICATIONS:

MAP YACHTING Paint Systems SPEC



Standards and Qualifications

HEALTH COMPLIANCE CERTIFICATE (ACS) N° 20 MAT LY 053 Expiration August 2025

For the latest missing updates, please check with us at sales@map-yachting.com



Surface Preparation



All surfaces to be covered must be free of dirt, pollution due to grease, water vapour, dust or mold and cleaned.

Steel: all sheet metal work will be completed before the start of surface preparation work.

Excess welds will be eliminated, sharp edges rounded off.

Eliminate oils and greases, alkaline deposits and soluble salts.

Abrasive blast (according to ISO 8501.1-1988) to degree Sa 2.5 roughness BN 10a of Rugotest n°3 (Ra 12.5 _m).

Dust carefully with a vacuum cleaner.

Aluminium: directly on the primer EPOXY PRIMER EP 211 after the recommended covering time*

Composites: on sanded composites or raw surface of delamination fabric (possible on polyester* and vinyl ester* classified as food, perfectly polymerized and solvent-free). For any other type of coating, and for surface preparation of aluminium, zinc, galvanized or any previously painted support, consult our technical department.

*Consult us

Manual



Mixing ratio

Volume (ml): 100 Base / 40 Hardener

Weight (gr): 100 (gr) Base 23 (gr) Hardener







Duration dying

Viscosity initial of application (at 23°C)

Remark

None

Thick thixotropic product





Shelf life of the mixture at 20°C

3h at 10°C 1h30 at 20°C 1 hour at 30°C



Remark

It is advisable to check the viscosity of the Base + Hardener mixture, if the system thickens, do not use it any more and prepare a new mixture.



Dry film thickness

RECOMMENDED THICKNESS PER LAYER:

From $300\mu m$ to $400\mu m$ maximum at $20^{\circ}C$

Applications & Recommendations



Conditions

<u>Hardeners</u>: BIOTANK HARDENER

Temperature: 15°C-30°C

Hygrometry: 30% – 70%



Note

The quality of application of all coatings will be influenced by the application equipment chosen and by the temperature, humidity and shape of the application area. When first applying the product, it is recommended that test panels be prepared to identify the best application settings to use to optimize system performance and appearance. BIOTANK cannot be applied under conditions outside the limits indicated. Care should be taken to ensure a satisfactory result.

Please contact your MAP YACHTING Paint Systems technician to determine proper application techniques and media when environmental conditions are outside of the recommended range.



Remark

Optimal application conditions are 20°C to 25°C for 30% to 70% relative humidity.

Reactivity of the mixture for 500 g at 30°C with Hardener: + - 30 minutes.

Commissioning: 14 days at 10°C

7 days at 20°C 5 days at 30°C





Materiel

Long hair roller application 12mm to 15mm



Name of lying down

2 coats of $300\mu m$ dry to $450\mu m$ dry



Cleaning the material

To clean the tools, use cleaning thinner or epoxy thinner EP N°17 or EP N°3.



Physical properties		LIMIT TEMPERATURE FOR USE: max. +100 °C Dry temperature: maxi 50°C in immersion			
	Time to Drying	Drying time given for $300\mu m$ dry:			
	(at 23°C	Temperature	Dry to the touch	Dry hard	
<u> </u>	- 40 to 60% RH)	10°C	20 hours	30 hours	
		20°C	12 hours	20 hours	
		30°C	7 hours	10 hours	
	Recovery (at 23°C – 40 to 60% RH)	Temperature 10°C 20°C 30°C	Minimum 36 hours 24 hours 12 hours	Maximum 6 days 48 hours 24 hours	
	YIELD THEORETICALLY	3.3 to 1.1 m 2 /kg for 200 to 600μ m dry 0.4 litres/m 2 for 600μ m dry			
<u>kg</u> <u>I μm</u>	Dry extract in Volume you Mixed	97.0 +/-3%			
	Density of Mix at 20°C	1.50+/-0.05 g/cm3			
voc	Compounds organic Volatiles	EU limit value for this product (cat. A/d): 500 g/l (2010) This product contains a maximum of 5 g/l of VOC			





ASPECT

Briaht

(at 60°)



Colors

Egg shell



Flash point

Base: 60°C < PE <= 93°C Hardener: PE > 100°C



Storage

Store the product in a dry place and at a temperature between + 10°C and + 25°C according to the specifications of MAP YACHTING Paint Systems. Store in original unopened containers. Storage temperature may vary depending on OEM specification requirements. Refer to container label for specific information on storage time.

Lifetime +10°C to 25°C

The information is given for closed containers in the original packaging, i.e. 24 months according to the commercial specifications of MAP YACHTING Paint Systems for the base, 24 months for the hardener. In tropical conditions, contact us.

Shelf life may vary due to OEM specification requirements. Refer to container label for specific shelf life information.

Safety instructions

Comply with all local safety, disposal and transportation regulations. Carefully check the Safety Data Sheet (SDS) and label of each product before using it.

Safety Data Sheets are available on request.

Publication date:

September 2022 - ONLY FOR PROFESSIONAL USE -

Exhaustive and is based on the current state of our knowledge and on the laws in force: anyone using the product for purposes other than those specifically recommended in the data sheet without first obtaining written confirmation from us as to the suitability of the product for the intended use does so at its own risk. It is always the responsibility of the user to take all necessary measures to meet the requirements set by local rules and legislation. Always read the Material Data Sheet and Technical Data Sheet for that product, if available. All advice we give or statements we make about the product (whether in this data sheet or elsewhere) are correct to the best of our knowledge, but we have no control over the quality or condition of the substrate or on the many factors affecting the use and application of the product. Therefore, unless we agree otherwise in writing, we accept no liability whatsoever for the performance of the product or for any loss or damage arising from the use of the product. All products supplied and technical advice given are subject to our terms and conditions of sale. You should request a copy of this document and review it carefully. The information contained in this data sheet is subject to change from time to time in the light of experience and our policy of continuous development. It is the user's responsibility to check that this data sheet is up to date before using the product. **Brand names mentioned in this data sheet are registered trademarks or licensed to:**