

Technical Data Sheet

Pipeline Repair and Hot Tapping Epoxy Putty



USES IN PIPELINE APPLICATIONS

Epoxy putty is a rapid cure product for gap filling used in epoxy filled shell repair clamps and Grouted Tee fittings. Each fitting comprises two oversized half shells which are mechanically bolted or welded together, to loosely encircle the damaged section of pipeline. The gap between pipe and outer shell is then sealed at both ends with epoxy putty before being filled with epoxy grout.

OTHER USES

- Rapid bonding and bedding of concrete, brickwork and masonry
- Rapid jointing of pre-cast concrete pipes and units
- Rapid fixing of steel inserts into precast concrete pipes and units.

SPECIAL CHARACTERISTICS OF NAMCO SOLUTIONS EPOXY PUTTY

Namco Solutions epoxy putty is a 3-part resin product. It contains PART A (epoxy resin paste), PART B (hardener) and two bags of fine filler. It is specially formulated to provide a rapid set mortar for gap filling with a long pot life. It also provides an excellent compressive strength after 24 hours. Once in place, the putty gains strength within a short period of time and once set with negligible shrinkage or expansion and without any cracks.

There are three grades covering a range of ambient temperature conditions range from 5°C to 50°C. It is packaged ready for full pack onsite mixing. The mixed putty has excellent adhesion to most construction materials and is resistant to a wide range of chemicals including petroleum products plus road, rail, marine and aviation applications.

GRADE (Product code)	Installation Temperature	Service Temperature	Pot Life (Minutes)	Hard Set To Touch (Minutes)
Winter Grade NSL-EPUTTY-WIG-001	5°C to 20°C	-40°C to 70°C	45 @ 5°C 18 @ 10°C 15 @ 15°C 12 @ 20°C	240 @ 5°C 150 @ 10°C 90 @ 15°C 32 @ 20°C
Summer Grade NSL-EPUTTY-SUG-001	15°C to 40°C	-40°C to 70°C	35 @ 15°C 25 @ 20°C 10 @ 30°C 7 @ 40°C	240 @ 15°C 105 @ 20°C 35 @ 30°C 20 @ 40°C
Tropical Grade NSL-EPUTTY-TRG-001	30°C to 50°C	-40°C to 100°C	25 @ 30°C 20 @ 35°C 15 @ 40°C 10 @ 45°C	180 @ 30°C 100 @ 35°C 75 @ 40°C 67 @ 45°C

Manufactured by: Namco Solutions Limited, Unit F9, Cumberland Trading Estate, Cumberland Road, Loughborough, Leicestershire, LE11 5DF, United Kingdom

Pipeline Repair and Hot Tapping Epoxy Putty

1. PACKAGING CONTENTS:

Materials are normally supplied in ½L, 2½L, and 5L packs with each pack containing:

- 1 bucket of special formulated epoxy resin paste
- 1 bottle of special formulated reactive hardener solution with added black pigment
- 2 bags of fine formulated filler.

2. PIPELINE SURFACE PREPARATION

Ensure the pipeline surface is prepared by grit or shot blasting to a surface cleanliness equivalent to SA2.5 (ISO 8501-1:1988) or SSPC- SP6. Steel surface should be clean, free of grease, dry and prepared in accordance of user's pre-approved site instructions. Surface roughness of the steel surface is to be at least 30µm to maximise adhesion strength.

3. MIXING INSTRUCTIONS

- Step 1.** Firstly, shake the bottle of hardener vigorously for at least 30 seconds.
- Step 2.** Empty the bottle of liquid hardener (PART B) into the bucket containing white resin paste (PART A).
- Step 3.** Mix the resin and hardener for at least 30 seconds until a uniform and consistent colour is achieved. Make sure the mixing paddle is worked all around the bucket and from top to bottom ensuring there are no traces of unmixed materials
- Step 4.** Add the first bag of filler into the resin bucket and mix for no more than 30 seconds until all the dry filler is wetted out and with little to no contrast in colour
- Step 5.** Add the second bag of filler into the bucket and mix for two minutes until all the dry filler is wetted out and a uniform colour is achieved (Note: When the filler is first added, it gives a dry powder and lumpy feel to the mix but when all the filler is wetted out then it becomes a paste consistency).

4. APPLYING MIXED MATERIALS ONTO SUBSTRATE

Always refer to user's approved installation procedure and equipment.

5. CLEANING

Equipment used to mix and pump epoxy grout can be cleaned using suitable epoxy cleaning solvents in accordance with user's approved installation instructions. Namco supplies an epoxy solvent (Product No.: NSL-PR-SOLV-001) suitable for cleaning equipment used to mix the epoxy materials. Strict solvent manufacturing instructions must be adhered to whichever solvent is used for cleaning to prevent damage to health and environments.

6. WORKING TIME AND INSTALLATION TEMPERATURE:

Refer to the table of installation conditions.

7. OPERATING (IN-SERVICE) TEMPERATURE RANGE:

Refer to the table of installation conditions.

8. STORAGE CONDITIONS:

- Store at ambient room temperature between 10°C and 25°C.
- Always store in original undamaged containers securely closed
- Keep away from sources of heat and ignition.
- Store away from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials.
- Keep away from oxidising materials.
- Keep containers upright, tightly closed and sealed until ready for use.

9. MATERIALS SHELF LIFE:

Materials in the sealed packaging will have a shelf life of 12 months from specified date of manufacture clearly stated on the packaging container.

10. SAFETY REQUIREMENTS:

Please refer to the valid Material Safety Data Sheet (SDS) as well as to the legal and recommended industrial hygiene regulations.

11. TRANSPORTATION REQUIREMENTS

All packaging is labelled suitable for road, sea and freights and in full compliance with ADR, RID, AND, IMDG and IATA regulations

For Technical & Sales Enquiries:

Namco Solutions Limited
Unit F9, Cumberland Trading Estate
Cumberland Road
Loughborough Road
Leicestershire
LE11 5DF
United Kingdom

Tel: +44 (0)7877 632 078

Email: enquiries@namco-solutions.com

Website: www.namco-solutions.com

The information provided in this datasheet is true and accurate based on our extensive laboratory and site testing conditions. The actual conditions of use and applications by the users are beyond the control of Namco Solutions Limited. Therefore, the users must satisfy themselves by using their own qualification testing, installation equipment and Competent Operatives to ensure this product is suitable for their application and no responsibility can be accepted or any warranty given by Namco Solutions Limited or its Representatives or Distribution Agents. Buyers and end users should always refer to their own approved installation procedures. (Document No.: NSL-18-11-DAT-01-VC2) (Issued Date: 01. Jan.2020)