

Timber Resin Splice

Specification

Introduction

The Timber Resin Splice is a Patented device for replacing the ends or mid-sections of timber.

It should only be attached to sound timbers. These timbers must be treated to our Specification to validate our Lifetime Guarantee.

For indoor use, the moisture content of the 'parent' timber must not exceed 22% in the connection zone.

Special features

- replace ends or mid span
- wood replaces wood
- easy to fix to
- natural appearance
- Fire Tested resin connection
- match species e.g. oak, elm
- no bolts, nails or plates

HISTORY

The Timber-Resin Splice (TRS) was Patented in 1997 and has been manufactured exclusively by Property Repair Systems. Over 6,000 beam ends and mid-span repair Kits have been supplied, to all parts of the UK and Ireland.

TECHNICAL DATA

Resins

- Compressive strength 81N/mm²
- Tensile strength 22 N/mm²
- Flexural strength 42 N/mm²
- Specific gravity 1.53
- Static Modulus E_t 17,235 KN/mm²
- Young's Modulus 8300 N/mm²
- Bond Strength, timber & steel 6-12 N/mm²

Timber

- Visual Strength Grading to BS EN518
- Kiln Dried
- C16 and C24 (SC3/SC4)
- Oak, Elm, Pitch Pine, Douglas Fir

Bars

- Steel Allthreaded Bar, High Tensile, 8.8
- BS.EN.ISO.898-1:2009
- Bright Zinc Plated TO BS.7371-1:2009

STRUCTURAL CALCULATIONS

Based on the Straight Line Theory of Elasticity (as originally used for concrete) and available at three levels:

- as part of an Order for TRS Kits (free)
- as a separate Calculation by us (charge)
- from our Independent Structural Engineer, Indemnified (charge)

LIMITATIONS

TRS repair units need to broadly match the moisture content of the existing timber in the environment in which they will be installed. Most units are installed indoors, in centrally heated environments. To match indoor situations Kiln Dried (KD) timber is used and normally this level of drying will tolerate the ambient temperature and humidity of the modern building. However, occasionally during Site storage or after installation, splitting or cracking may occur along the grain of the timbers (shakes) as they adjust to their new environment. This is perfectly normal and no special action is necessary.

For further technical guidance contact us on: 01626 331351 or at dcmoore@timber.org.uk