



CSIRO

TEST REPORT

PULL OFF ADHESION TESTS

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1. SAMPLE DETAILS

Client: Ceramic Heatshields & Protective Coatings Pty Ltd
PO Box 498
Bullmba QLD 4171

Submitted by: Don Cuttings

Sample details: Rust Grip paint together with various substrates

Requirement: Pull off adhesion of Rust Grip to various metal substrates.

2. TEST METHOD

The substrates supplied were coated with Rust Grip in accordance with the manufacturer's recommendations. The coating was allowed to cure for a period of 3 weeks before the pull off adhesion was undertaken.

AS/NZS 1580.408.5:1994 'Adhesion – Pull-off test was used to determine the adhesion of the coating to the metal substrates. The Elcometer 106-1 (SN 1001) calibrated 19/09/2005 Range 0.5 to 3.5 Mpa was used. A two-part epoxy adhesive was used to stick the dollies in place and allowed to cure for 3 days. The testing was conducted in the laboratory under routine testing conditions.

3. RESULTS

Sample	Substrate	Adhesive Strength (MPa)	Mode of Failure
Rust Grip	New Steel	2.7	Within coating
		3.4	Within coating
		>2.7	Adhesive/coating
Rust Grip	Old Rusty Steel No mill scale	>3.4	Adhesive/coating
		>3.5	None
		2.6	Within coating
Rust Grip	New Galvanizing	>3.5	None
		>2.7	Adhesive/coating
		>0.6	Adhesive/coating
Rust Grip	Aged Galvanizing	1.3	Within coating
		1.1	Within coating
		1.2	Within coating

G Eccleston
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