



### Commercial in Confidence

Test Laboratory MIRA Ltd

Date of Report 26<sup>th</sup> September 2012

Client Signpost Solutions Ltd

Test Item Optimast 244 Two Leg Signpost

Date of Test 28<sup>th</sup> June 2012

Test Number L0057

Report Number 1033700-001 Rev 02

Test Type Vehicle Impact to EN 12767-2007

Number of Pages 27



Prepared By:

Approved By

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Da

16/10/2012

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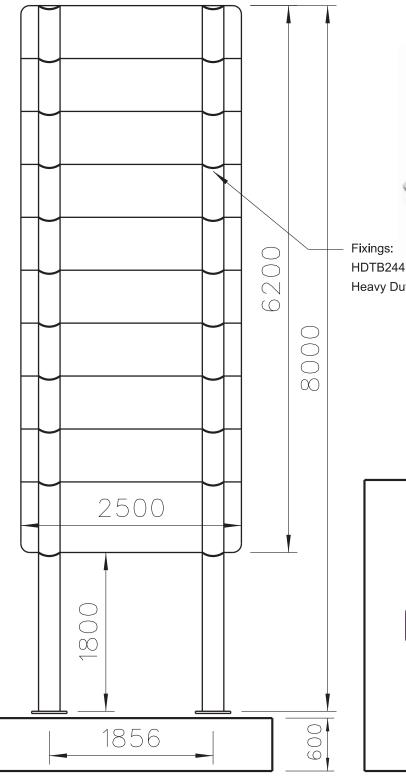
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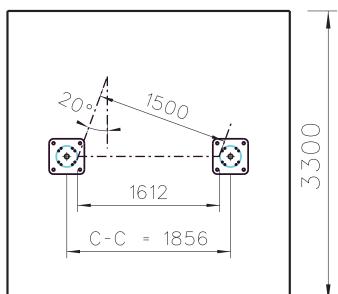
# primast 244 Test construction EN12767 test at MIRA

## **EN12767 test at MIRA**





Heavy Duty 2-Bolt 'D' Clip with Insert



Concrete foundation ST5 concrete

3200

Concrete foundation ST5 concrete

3200





David Milne CEng MICE 8 Cherry Close South Wonston Winchester SO21 3HU

> Tel 01962 881777 12 October 2012

Jim Gallagher Highways Agency Piccadilly Gate, Store Street, Manchester, M1 2WD

Dear Jim

### Third Party Review of OPTIMAST 244 crash testing to EN 12767 at MIRA

Signpost Solutions have developed a new product range of passively safe aluminium sign masts, the OPTIMAST range.

They crash tested the largest mast in the range, the OPTIMAST 244, at MIRA in June. Two OPTIMAST 244's supporting a large sign of area 15.5m<sup>2</sup> were subjected to BSEN 12767 crash tests (at 100 kph and 35 kph).

The MIRA reports (L0057 and L0058) are attached and they conclude the mast is passively safe to the classification 100 NE 3 in BS EN 12767.

Signpost Solutions asked me to review the test reports for the 100 kph and 35 kph tests and associated photographs and video footage.

My firm view is the tests have been responsibly and professionally executed and reported. The tests fully support the conclusion that the OPTIMAST 244 is passively safe with an EN12767 classification of 100 NE 3. This safety classification is the best available for such a product.

The OPTIMAST 244 is the largest and strongest of a family of masts (with a diameter of 244 mm). Mast diameters and shear bolt numbers are progressively reduced for the smaller members of the family. The same shear bolts are used across the range. I consider the rating of 100NE 3 is applicable to the full OPTIMAST range as the masts form a family of products in accordance with EN 12767 with the largest and strongest member being successfully crash tested.

Please advise if you are content with the 100 NE3 rating to BSEN 12767 for the OPTIMAST 244 in particular and the OPTIMAST range in general.

Warm Regards

David Milne

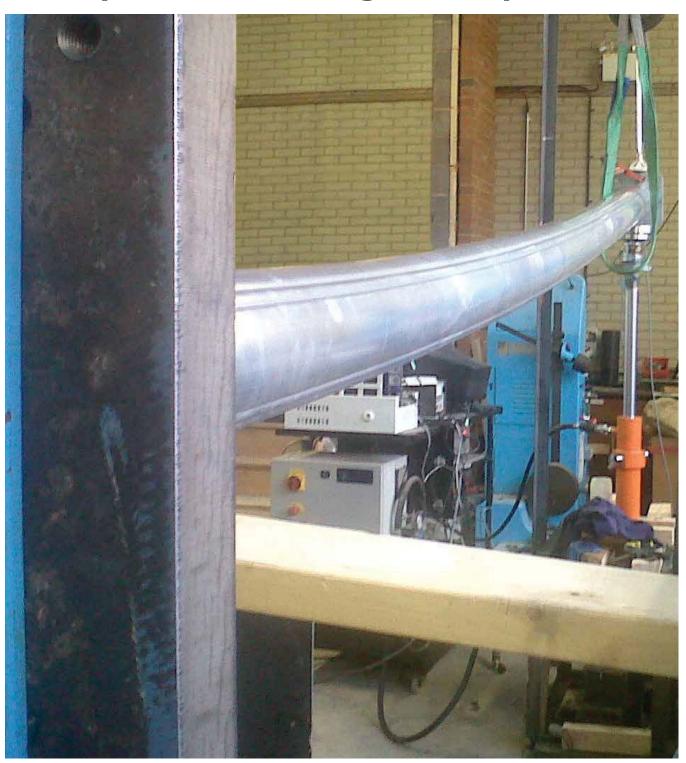
Enclosures: MIRA REPORTS FOR CRASH TESTS L0057 and L0058 (to include video clips and photographs)

David Pulne



### EN 12899

## Third party reviewed & tested to prove mast strengths & capacities



For more information please see our Optimast Method Statement

