

# IN 1307 – Updated IMCA guidance on the testing of diving bell/basket hoist wire ropes

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IMCA's [Recommended practice on wire rope integrity management for vessels in the offshore industry](#) (IMCA M194, Rev. 2) was published in December 2015.

Diving contractor Members should note that this revision has simplified the guidance given on monitoring the deterioration in breaking force of diving bell hoist ropes.

Previously, the advice was:

“... a test to destruction should be carried out when any high tensile bell wire rope is first put in to service to establish the actual minimum breaking force of the wire at that time. Provided the test result does not fall below the manufacturer’s MBF, future destructive test results should be compared to that original figure (the base value), rather than to any claim (or test certificate) provided by the manufacturer.

“If the test to destruction when the wire is first put into service does indicate a MBF below that of the manufacturer, then the manufacturer’s MBF should always be adopted as the base value against which to monitor future deterioration in breaking force. However if the result falls 10% below the MBF then the rope should be discarded. The sample tested to destruction should prove an adequate safety factor exists. This is normally 8 times the SWL.”

The advice now is that:

“The manufacturer’s MBF is the base value against which to monitor future deterioration in breaking force. If the test result falls 10% below the MBF then the rope should be discarded. The sample tested to destruction should prove an adequate safety factor exists. This is normally 8 times safe working load ...

“The ultimate strength test to be carried out on a sample from the part subject to the most severe dynamic loading will be used to verify that a factor of safety of 8:1 is still being maintained and if not the wire rope should be discarded. Even if the factor of safety is being maintained but the result falls 10% below the MBF it should be discarded.”

IMCA’s DESIGN documents will soon be altered to reflect the new guidance provided in IMCA M194 Rev. 2. In the meantime the correct way to proceed is to follow IMCA M194 Rev. 2.

The information contained herein is given for guidance only and endeavours to reflect best industry practice. For the avoidance of doubt no legal liability shall attach to any guidance and/or recommendation and/or statement herein contained.

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