

Award-winning paper in 2010

Papers published in *Construction Materials* are eligible for awards from the Institution of Civil Engineers. Papers from any of the ICE journals can be nominated for several awards. In addition, each journal has awards dedicated to their specific subject area.

On Monday 24 October 2011, ICE president Peter Hansford presented an award to the following paper published in *Construction Materials* in 2010. The editorial panel nominated their best papers and an awards committee chaired by Barry Clark allocated the awards.

Howard Medal

The Howard Medal was awarded to: Lawson RM, Popo-Ola SO, Way A, Heatley T and Pedreschi R (2010) Durability of light steel framing in residential applications. *Proceedings of the Institution of Civil Engineers, Construction Materials* **163**(2): 109–121, <http://dx.doi.org/10.1680/coma.2010.163.2.109>

Abstract

This paper presents a summary and analysis of research findings on the durability of galvanised cold-formed steel sections used in housing in order to deduce their design life. These cold-formed sections are produced from pre-galvanised strip steel. It reviews

reports and publications from research projects carried out by Corus and the Steel Construction Institute on zinc-coated, cold-formed steel products. New data have also been gathered from measurements on houses and similar buildings that have used galvanised steel components. The data also extend to over-cladding applications in building renovation. The performance of galvanised (zinc-coated) steel components within warm-frame applications is very good. The research leading to this paper shows that the predicted design life of the standard G275 coating, based on the measured loss of zinc from the strip steel, is over 200 years, provided that the building envelope is well insulated and properly maintained. The evidence for this conclusion is based on measurement of zinc loss on light steel frames in various applications and locations. A formula for the loss of zinc over time in areas subject to low condensation risk is presented.



ICE president Peter Hansford presents the Howard Medal to R. Mark Lawson, Sunday O. Popo-Ola, Andrew G. Way and Remo Pedreschi