

N32. Hall-Effect Helps

For magnetic crack detection, a range of standards is now available which invariably designate the precise current for detecting cracks in a component of a given size.

Until recently, the currents used for NDT have been measured by a current transformer linked to a conventional analogue ammeter. But this method does not offer the accuracy demanded in high specification testing.

Three years of joint work by NDT specialists, Johnson and Allen of Sheffield, U.K., and HEME International of Skelmersdale, U.K., has resulted in the development of a test system using a HEME Hall-effect current transducer. This enables the NDT machine to set to an accuracy of 1 percent of range. The accuracy exceeds BS 6072 and the NPL Standard on magnetic crack detection.

For more, see Nuclear Engineering International, Vol. 35, No. 430, p. 57, May 1990.