

ISO 18352:2009-08 (E)

Carbon-fibre-reinforced plastics - Determination of compression-after-impact properties at a specified impact-energy level

Contents	Page
Foreword	iv
1 Scope	1
2 Normative references	1
3 Terms and definitions	2
4 Principle	3
5 Conditioning of specimens and test environment	4
5.1 Standard conditioning procedure for specimens	4
5.2 Environmental test chamber for impact and compression tests	4
6 Test apparatus	4
6.1 General	4
6.2 Impact facility	4
6.3 Support fixture for specimen	4
6.4 Non-destructive testing instrument	6
6.5 Compression-testing machine	6
6.6 Compression-loading fixture	6
6.7 Measuring apparatus	7
6.8 Strain gauges	8
7 Specimens	8
7.1 Dimensions	8
7.2 Specimen preparation	9
7.3 Number of specimens	10
8 Procedure	10
8.1 Specimen conditioning	10
8.2 Measurement of specimen dimensions	10
8.3 Impact test	10
8.4 Non-destructive testing (NDT)	11
8.5 Inspection of specimens	11
8.6 Compression test	11
9 Validation	13
10 Calculation of results	14
10.1 CAI strength	14
10.2 CAI modulus	15
10.3 Maximum CAI strain	15
10.4 Rounding the results	15
10.5 Standard deviation and coefficient of variation	15
11 Test report	16
Annex A (normative) Detailed drawings of the components of the compression-loading fixture	17
Bibliography	20