

ISO 4866:2010-03 (E)

Mechanical vibration and shock - Vibration of fixed structures - Guidelines for the measurement of vibrations and evaluation of their effects on structures

Contents	Page
Foreword	iv
Introduction	v
1 Scope	1
2 Normative references	1
3 Terms and definitions	1
4 Source-related factors to be considered	2
5 Structure-related factors to be considered	3
6 Quantities to be measured	4
7 Frequency range and vibration amplitude	5
8 Instrumentation	5
9 Position and mounting of transducers	7
10 Data collection, analysis and assessment	10
11 Methods of measurement and reporting	12
12 Evaluation of vibration responses	14
Annex A (informative) Values of structural response	16
Annex B (informative) Classification of buildings	18
Annex C (informative) Random data	23
Annex D (informative) Predicting natural frequencies and damping of buildings	24
Annex E (informative) Vibrational interaction of the foundation of a structure and the soil	30
Bibliography	36