ISO 1938-1:2015-11 (E)

Geometrical product specifications (GPS) - Dimensional measuring equipment - Part 1: Plain limit gauges of linear size

Contents

Page

Foreword iv

Introduction v

1 Scope 1

2 Normative references 1

3 Terms and definitions 2
3.1 Limits 2
3.2 Gauge types 3
3.3 Characteristics and function of gauges 6

4 Abbreviated terms and symbols 7

5 Design characteristics for gauges 8

6 Metrological characteristics 10
6.1 General 10
6.2 Metrological characteristic relative to the type of limit gauge (GO gauge or NO GO gauge) 10

7 Maximum permissible limits on metrological characteristics 14
7.1 General 14
7.2 Limit gauges for internal features of size 15
7.3 Limit gauges for external features of size 16
7.4 Values for calculation of MPL of limit gauges 18

8 Proving conformance with specification for limit gauges 21

9 Verification of dimensional specification of a workpiece with limit gauges 21

10 Marking 23

Annex A (informative) General principles and application of limit gauging 24

Annex B (informative) Description of the specific use of the various gauge types and the associated uncertainty 26

Annex C (informative) Relation to the GPS matrix model 28

Bibliography 30