

DIN EN 1303:2015-08 (E)

Building hardware - Cylinders for locks - Requirements and test methods

Contents		Page
Foreword		4
Introduction		5
1	Scope	6
2	Normative references	6
3	Terms and definitions	7
4	Requirements	8
4.1	General	8
4.2	Category of use -- Key strength	8
4.3	Durability	8
4.4	Door mass	8
4.5	Suitability for use on fire resistant / smoke control doors	8
4.6	Safety	8
4.7	Corrosion resistance and operation at extreme temperatures	8
4.7.1	Corrosion resistance	8
4.7.2	Operation at extreme temperatures	9
4.8	Key related security	9
4.8.1	Minimum number of effective differs	9
4.8.2	Minimum number of movable detainers	9
4.8.3	Maximum number of identical steps	9
4.8.4	Direct coding on key	9
4.8.5	Operation of security mechanism (inter-passing)	9
4.8.6	Torque resistance of plug/cylinder relevant to key related security	10
4.9	Attack resistance	10
4.9.1	General	10
4.9.2	Resistance to attack by drilling	10
4.9.3	Resistance to attack by chisel	11
4.9.4	Resistance to attack by twisting	11
4.9.5	Resistance to attack by plug / cylinder extraction	11
4.9.6	Torque resistance of plug/cylinder relevant to attack resistance	11
5	Test - General and test apparatus	12
5.1	General	12
5.2	Test rigs and apparatus	13
6	Test methods - procedures	13
6.1	General	13
6.2	Key strength	13
6.3	Durability tests -- Standard test cycles	14
6.4	Door mass	16
6.5	Suitable for use on fire resistance / smoke control doors	16
6.6	Safety	16
6.7	Corrosion resistance and test of operation at extreme temperatures	16
6.7.1	Corrosion resistance	16
6.7.2	Test of operation at extreme temperatures	16
6.8	Key related Security	16
6.8.1	Minimum numbers of effective differs	16
6.8.2	Minimum number of movable detainer	17

6.8.3	Maximum number of identical steps	17
6.8.4	Direct coding on key	17
6.8.5	Operation of the security mechanism	17
6.8.6	Torque resistance of plug and/or cylinder	17
6.9	Attack resistance	17
6.9.1	Resistance to drilling	17
6.9.2	Resistance to attack by chisel	18
6.9.3	Resistance to attack by twisting	19
6.9.4	Resistance to attack by plug/cylinder extraction	20
6.9.5	Torque resistance of plug/cylinder relevant to attack resistance	24
7	Classification	25
7.1	General	25
7.2	Category of use (1st digit)	25
7.3	Durability (2nd digit)	25
7.4	Door mass (3rd digit)	25
7.5	Suitable for use on fire resistant / smoke control doors (4th digit)	25
7.6	Safety (5th digit)	25
7.7	Corrosion resistance and temperature (6th digit)	25
7.8	Key related security (7th digit)	26
7.9	Attack resistance (8th digit)	26
8	Marking	26
Annex A (normative) Cylinders suitable for use on fire resistant / smoke control doors		27
Annex B (informative) Tables of test sequence		28
Annex C (informative) Product information		29
Annex D (informative) Manufacturer's declaration of compliance		30
Bibliography		33