

Current survey of standards for NDT of welds

Test method	VT	PT	MT	RT	UT	ET	HT
Standards for methods	DIN EN 13018 Visual testing, General principles	DIN EN ISO 3452-1 Penetration testing, General principles	DIN EN ISO 9934-1 Magnetic particle test, General principles	DIN EN ISO 5579 Principles of radiographic testing	DIN EN ISO 23243 Ultrasonic testing, Principles	DIN EN ISO 15549 Eddy current testing, Principles	DIN EN ISO 6507-1 Hardness testing, Vickers
Devices, Testing equipment	DIN EN 13927 VT, Devices	DIN EN ISO 3452-2 PT, Test of penetrants	DIN EN ISO 9934-3 MT, Devices	DIN EN ISO 19232-1, -2 RT, Image quality of radiographs	DIN EN ISO 16811 UT, Sensitivity and range setting	DIN EN ISO 15548 ET, Equipment -1: Instruments -2: Probe -3: system characteristics and verification	DIN EN ISO 6507-2 HT, Hardness test, testing machine
Inspection of testing equipment	DIN EN 13018 Visual test, General principles	DIN EN ISO 3452-3 PT, Reference test blocks	DIN EN ISO 9934-2 MT, Detection media	DIN EN 25580 RT, Industrial radiographic illuminators	DIN EN ISO 11699-1 RT, Classification of film system	DIN EN ISO 22825 UT, Welds in austenitic steels and Ni-based alloys	DIN EN ISO 6507-3 HT, Hardness test, Calibration of reference blocks
Personnel	DIN EN ISO 9712 Qualification and certification of NDT-personnal DIN EN ISO 18490 Evaluation of vision acuity of NDT-personnal DIN 54161 Qualification of non-destructive testing test assistants						
Testing of welds	DIN EN ISO 17635 NDT of welds, General rules for metallic materials						
Steel	DIN EN ISO 17637 Visual testing	DIN EN ISO 3452-1 Penetration testing, General principles	DIN EN ISO 17638 Magnetic particle test, Welds	DIN EN ISO 17636 RT, X-ray and gamma-ray techniques -1: with film -2: with digital detectors	DIN EN ISO 17640 UT, Techniques, Testing levels and assessment (UT-PE)	DIN EN ISO 17643 ET, Eddy current testing, Welds	DIN EN ISO 9015-1 HT, Hardness test on arc welded joints
Aluminium				DIN EN 13068-3 Radiographic testing (digital)	DIN EN ISO 16828, DIN EN ISO 10863 Time-of-flight diffraction techniques (TOFD)		DIN EN ISO 9015-2 HT, Microhardness test on arc welded joints
Evaluation	DIN EN ISO 5817 Quality levels	DIN EN ISO 23277 PT, Acceptance levels	DIN EN ISO 23278 MT, Acceptance levels	DIN EN ISO 10675-1 RT, Acceptance Levels	DIN EN ISO 23279 UT-PE, Characerization of discontinuities		DIN EN ISO 18265 HT, Conversion tables
	DVS MB 0703 Limiting values			DIN EN ISO 10675-2 RT, Acceptance levels	DIN EN ISO 11666 UT, Acceptance levels		DIN EN ISO 16859-1 HT by Leeb (Equotip)
	DIN EN ISO 10042 Quality Levels				DIN EN ISO 15626 TOFD, Acceptance levels		DIN 50159-1 HT with UIC method (MICRODUR)
Testing + Evaluation	AD 2000 HP 5/1 For external findings	Paragraph 4.5 for PT and MT		AD 2000 HP 5/3 + Enclosure 1 Paragraph 4.3 for RT		Paragraph 4.4 for UT	