No.: 1023 Be_C	**Testreport** (Initial sample test report)	ERNI

Edition date: 08/09/2011	File No.: 526-528	Replaces edition dated:
Requested by: Mr. Popp Mr. Lappöhn	**Performed by: Kle/Kuna**	**The report comprises 18 pages**

cc: BEE, QM,

Description of test sample:

First sample test report for DIN connectors type C, CD, E160, C/2, B, B/2, C/3, M, B/3, E/2, R, R/2, Q/2, RD, TE, R/3, ZW acc. to DIN EN 60603-2.
The test were performed representative with female connectors generation 7 (part number 224408) paired with male connector generation 4 (part number 444790) from type C96

Insulating material:	PBT or PA46
Base material of contacts:	Copper alloy (female CuSn6 and male connector CuZn36)
Layercomposition:	PdNi + Au

Contacts were lubricatet acc. ERNI spec.

In addition to the IEC-tests a second testbatch BP 3.2 was performed acc. to DIN EN 60068-2-60 procedure 4 (4 component gas) and Telcordia GR 1217 Core “Mixed Flowing Gas Test controlled environment”.

Termination type: THR, EN, Wire Wrap **Performance level: 2**

Standard: DIN EN 60603-2/ 60068-60/ Telcordia GR 1217 Core

Result:

Deviating to connector standard testing "EP1" Robustness of terminations, the nominal value of the female connectors in solder and press fit technology was reduced.
For the material thickness of 0.3mm was the nominal value reduced from ≥ 20N auf ≥ 10N.
The applied connector standard DIN EN 60603-2 requires a minimal value of 20N which is constructive not reachable due to the small cross section.
The connector standard DIN EN 60603-2 refer to the test standard DIN EN 60068-2-21 which includes requirements of values for different cross sections. In this case a reduction to 10 N is allowed.
For material thickness of 0.6mm was the nominal value reduced from ≥ 20N auf ≥ 15N due to the female connector design.
The female connector is a one piece body without a base plate and there is a mechanical block of the contact in mounting direction.
The required contact resistance force of ≥ 20N is only needed for the termination type wire wrap.

All other tests and measurements were conform to the used standards and had been passed successful and without failures!

QL - decision: **date/ signature:**
08/09/2011/ Uebele

Release: ☒ **Conditional release:** ☐ **No release:** ☐

Remarks:

Test sequence

Test group P
24 samples
P1 Visual examination, dimensions
P2 Polarization
P3 Contact resistance
P4 Insulation resistance
P5 Voltage proof

Test group AP
4 samples

AP1	Gauge retention force
AP2	Total insertion and withdrawal force
AP3	Solder ability
AP4	Voltage proof
AP6	Vibration, sinusoidal
AP9	Rapid change of Temperature
AP10	Insulation resistance
AP11	Voltage proof
AP12	Visual examination
AP13	Climatic sequence
AP13.1	Dry heat
AP13.1	Insulation resistance
AP13.2	Damp heat, cyclical,1.cycle
AP13.3	Cold
AP13.4	Low air pressure
AP13.4	Voltage proof
AP13.5	Damp heat, cyclical, 5 cycles
AP14	Insulation resistance
AP15	contact resistance
AP16	Voltage proof
AP17	Total insertion and withdrawal force
AP18	Visual Examination

Test group BP - method 1
4 samples

BP1	Gauge retention force
BP2	Mechanical operation, 1.half
BP3.2	Industrial atmosphere
BP4	Contact resistance
BP5	Mechanical operation,2.half
BP6	Insulation resistance
BP7	Voltage proof
BP9	Gauge retention force
BP10	Visual examination
BP11	Static axial load

Test group BP – method 4
4 samples

BP1	Gauge retention force
BP2	Mechanical operation, 1.half
BP3.2	Industrial atmosphere
BP4	Contact resistance
BP5	Mechanical operation, 2.half
BP6	Insulation resistance
BP7	Voltage proof
BP9	Gauge retention force
BP10	Visual examination
BP11	Static axial load

Test group DP
4 samples

DP1	Mechanical operation, 1.half
DP2	Electrical load and Temperature
DP3	Contact resistance
DP4	Voltage proof
DP6	Partial-discharge extinction voltage
DP8	Visual Examination

Test group CP
4 samples

CP1	Damp heat, constant
CP2	Insulation resistance
CP3	Contact resistance
CP4	Voltage proof
CP5	Visual Examination

Test group EP
4 samples

EP1	Robustness of terminations
EP2	Contact retention insert
EP3	Mould growth
EP4	Visual examination
EP5	Flammability
EP6	Visual Examination

Additional function Telcordia Mixed Flowing Gas Test controlled environment 20 day
6 samples

Z 1	Contact resistance
Z 2	Mechanical operation (100 cycle)
Z 3	Contact resistance
Z 4	5 days MFG inserted
Z 5	Contact resistance
Z 6	5 days MFG non-inserted
Z 7	Contact resistance
Z 8	5 days MFG non-inserted
Z 9	Contact resistance
Z 10	5 days MFG inserted
Z 11	Contact resistance
Z 12	0,1mm travel
Z 13	Contact resistance
Z 14	Mechanical operation (100 cycle)
Z 15	Contact resistance

Test sequence	Test, measurement, result
P 1	Visual examination, dimensional and weight test IEC 60 512 test 1 a/1 b (Telcordia GR-1217-Core sect. 5.1.1) see initial sample test report QM number: 194441 and 444790 **Result:** Passed!
P 2	Polarization IEC 60 512 test 13 e Insertion force: 135 N **Result:** Passed!
P 3	Contact resistance (mΩ), 6 contacts/sample IEC 60 512 test 2 a, Millivolt method (Telcordia GR-1217-Core sect. 5.4.1 or MIL STD-1344 A-3002.1) Nominal: ≤ 20 min: 5,5 avg: 6,46 max: 6,6 s: 0,12 **Result**: Passed!
P 4	Insulation resistance (Ω) IEC 60 512 test 3 a, adapter measurement (Telcordia GR-1217-Core sect. 5.4.6 or MIL STD-1344 A-3003.1) Nominal: ≥ 10^{12} min: 4,9x10^{13} max: 7,3x10^{13} **Result:** Passed!
P 5	Voltage proof IEC 60 512 test 4 a (Telcordia GR-1217-Core sect. 5.4.7 or MIL STD-1344 A-3001.1) Test voltage: contact/ contact: 1000 Veff contact/ ground: 1550 Veff **Result:** No flashover - passed!

Test sequence	Test, measurement, result
AP 1	Gauge retention force [N] 6 contacts/sample IEC 60 512 test 16 e Nominal: ≥ 0,15 min: 0,26 avg: 0,35 max: 0,45 s: 0,05 **Result:** Passed!
AP 2	Total insertion and withdrawal force [N] IEC 60 512 test 13 b (Telcordia GR-1217-Core sect. 5.1.5 or MIL STD 1344 A - 2013.1) Nominal: ≤ 90 Insertion force: min: 67,1 max: 77,7 Pull-out force: min: 40,3 max: 44,2 **Result:** Passed!
AP 3	Solder ability (solder bath process, method 1) IEC 60 512 test 12 a **Result:** Connections were completely covered with tin - passed!
AP 4	Voltage proof IEC 60 512 test 4 a (Telcordia GR-1217-Core sect. 5.4.7 or MIL STD 1344 A - 3001.1) Test voltage: contact/ contact: 1000 Veff contact/ ground: 1550 Veff **Result:** No flashover - passed!
AP 6	Vibration, sinusoidal IEC 60 512 test 6 d (Telcordia GR-1217-Core sect. 6.3.5 or MIL STD 1344 A - 2005.1) Duration: 6 h Frequency: 10- 500 Hz Acceleration: 3,5 mm oder 5 g Number of cycles: 10 Monitoring: Contact disturbance ≤ 1µs **Result:** The test was performed by SGS test lab in Munich! See attached test report E0QA0001! No contact disturbance - passed!
AP 9	Rapid change of Temperature IEC 60 512 test 11 d (Telcordia GR-1217-Core sect. 6.3.3 or MIL STD 1344 A - 1003.1) Temperature: -55°C - +125°C Duration: 30 min Number of cycles: 5 **Result:** Carried out!

Test sequence	Test, measurement, result
AP 10	Insulation resistance [Ω] IEC 60 512 test 3 a adapter measurement (Telcordia GR-1217-Core sect. 5.4.6 or MIL STD 1344 A - 3003.1) Nominal: ≥ 10^{12} min: 7,9 x10^{13} max: 1,9 x10^{14} **Result:** Passed!
AP 11	Voltage proof IEC 60 512 test 4 a (Telcordia GR-1217-Core sect. 5.4.7 or MIL STD 1344 A - 3001.1) Test voltage: contact/ contact: 1000 Veff contact/ ground: 1550 Veff **Result:** No flashover - passed!
AP 12	Visual examination IEC 60 512 test 1 a (Telcordia GR-1217-Core sect. 5.1.1) **Result:** Passed!
AP 13	Climate sequence IEC 60 512 test 11 a **Result:** Carried out!
AP 13.1	Dry heat IEC 60 512 test 11 i Temperature: 125°C Duration: 16 h Insulation resistance for dry heat test [Ω] IEC 512 test 3 a Nominal: ≥ 10^{11} min: min: 1,2 x10^{12} max: 1,2 x10^{12} **Result:** Passed!
AP 13.2	Damp heat, cyclical (1st cycle) IEC 60 512 test 11 m variant 2 Temperature: 40°C **Result:** Carried out!

Test sequence	Test, measurement, result
AP 13.3	Cold IEC 60 512 test 11 j Temperature: -55°C Duration: 2 h **Result:** Carried out!
AP 13.4	Low air pressure IEC 60 512 test 11 k Condition: 30 k Pa Voltage resistance IEC 512 test 4 a Test voltage: 300 Veff **Result:** No flashover- passed!
AP 13.5	Damp heat, cyclical (remaining 5 cycles) Conditions such as AP 13.2 **Result:** Carried out!
AP 14	Insulation resistance [Ω] IEC 60 512 test 3 a adapter measurement (Telcordia GR-1217-Core sect. 5.4.6 or MIL STD 1344 A - 3003.1) Nominal: $\geq 10^{10}$ min: $3{,}7 \times 10^{12}$ max: $3{,}9 \times 10^{12}$ **Result:** Passed!
AP 15	Contact resistance [mΩ] sample/ 6 contacts IEC 60 512 test 2 a, millivolt method (Telcordia GR-1217-Core sect. 5.4.1 or MIL STD 1344 A - 3002.1) Nominal: ≤ 20 min: 6,7 avg: 7,19 max: 7,6 s: 0,22 **Result**: Passed!
AP 16	Voltage proof IEC 60 512 test 4 a (Telcordia GR-1217-Core sect. 5.4.7 or MIL STD 1344 A - 3001.1) Test voltage: contact/ contact: 1000 Veff contact/ ground: 1550 Veff **Result:** No flashover- passed!

Test sequence	Test, measurement, result
AP 17	Total Insertion and withdrawal force [N] IEC 60 512 test 13 b (Telcordia GR-1217-Core sect. 5.1.5 or MIL STD 1344 A - 2013.1) Nominal: ≤ 90 Insertion force: min: 51,2 max: 61,8 Pull-out force: min: 33,2 max: 42,7 **Result**: Passed!
AP 18	Visual examination IEC 60 512 test 1a (Telcordia GR-1217-Core sect. 5.1.1) **Result:** Accepted visible abrasion in contact area without influence of function - passed!

Test sequence	**Test, measurement, result** **BP 3.2 test acc. DIN EN 60068-2-60 Methode 1**
BP 1	Gauge retention force[N] 6 contacts/sample IEC 60 512 test 16 e Nominal: ≥ 0,15 min: 0,30 avg: 0,35 max: 0,39 s: 0,03 **Result:** Passed!
BP 2	Mechanical operation (1st half) IEC 60 512 test 9 a (Telcordia GR-1217-Core sect. 5.2.5 or MIL STD 1344 A - 2016) Thrust velocity max. 10 mm/s Rest period (unmated): 30 s Number of cycles: 200 **Result:** Carried out!
BP 3.2	Industrial atmosphere IEC 60 512 test 11 g Test climate: 25°C/ 75% r.H. Gas concentration: Mixed gas 0,5 ppm SO_2/ 0,1 ppm H_2S Duration: 4 days One half of samples mated, the other half unmated **Result:** Carried out!
BP 4	Contact resistance [mΩ] IEC 60 512 test 2 a, millivolt method (Telcordia GR-1217-Core sect. 5.4.1 or MIL STD 1344 A - 3002.1) Nominal: ≤ 20 mated half: min: 6,4 avg: 6,62 max: 6,9 s: 0,16 unmated half: min: 6,4 avg: 6,76 max: 7,0 s: 0,22 **Result:** Passed!
BP 5	Mechanical operation (2nd half) IEC 60 512 test 9 a (Telcordia GR-1217-Core sect. 5.2.5 or MIL STD 1344 A - 2016) Thrust velocity max: 10 mm/s Rest period (unmated) max: 30 s Number of cycles: 200 **Result:** Carried out!

Test sequence	**Test, measurement, result** **BP 3.2 test acc. DIN EN 60068-2-60 Method 1**
BP 6	Insulation resistance [Ω] IEC 60 512 test 3 a adapter measurement (Telcordia GR-1217-Core sect. 5.4.6 or MIL STD 1344 A - 3003.1) Nominal: ≥ 10^{12} min: 3,8 x10^{13} max: 4,0 x10^{13} **Result:** Passed!
BP 7	Voltage proof IEC 60 512 test 4 a (Telcordia GR-1217-Core sect. 5.4.7 or MIL STD 1344 A - 3001.1) Test voltage: contact/ contact: 1000 Veff contact/ ground: 1550 Veff **Result:** No flashover – passed!
BP 9	Gauge retention force [N] 6 contacts/sample IEC 60 512 test 16 e Nominal: ≥ 0,15 min: 0,31 avg: 0,35 max: 0,42 s: 0,03 **Result:** Passed!
BP 10	Visual examination IEC 60 512 test 1 a (Telcordia GR-1217-Core sect. 5.1.1) **Result:** Some contacts shows abrasion of gold flash but the PdNi plating was still O.K. No visible failures on female and male contacts which has any influence to function! Passed!
BP 11	Static axial load IEC 60 512 test 8 b Force increase: 10 N/s Duration: 10 s Force: 90 N **Result:** Passed!

Test sequence	**Test, measurement, result** **BP 3.2 test acc. DIN EN 60068-2-60 Method 4**
BP 1	Gauge retention force[N] 6 contacts/sample IEC 60 512 test 16 e Nominal: ≥ 0,15 min: 0,33 avg: 0,36 max: 0,39 s: 0,02 **Result:** Passed!
BP 2	Mechanical operation (1st half) IEC 60 512 test 9 a (Telcordia GR-1217-Core sect. 5.2.5 or MIL STD 1344 A - 2016) Thrust velocity max. 10 mm/s Rest period (unmated): 30 s Number of cycles: 200 **Result:** Carried out!
BP 3.2	Industrial atmosphere IEC 60 512 test 11 g Test climate: 25°C/ 75% r.H. Gas concentration: Mixed gas 10ppb CL_2, 200ppb SO_2, 10ppb H_2S, 200ppb NO_2 Duration: 4 days One half of samples mated, the other half unmated **Result:** Carried out!
BP 4	Contact resistance [mΩ] IEC 60 512 test 2 a, millivolt method (Telcordia GR-1217-Core sect. 5.4.1 or MIL STD 1344 A - 3002.1) Nominal: ≤ 20 mated half: min: 6,3 avg: 6,63 max: 6,9 s: 0,19 unmated half: min: 6,4 avg: 6,74 max: 7,2 s: 0,24 **Result:** Passed!
BP 5	Mechanical operation (2nd half) IEC 60 512 test 9 a (Telcordia GR-1217-Core sect. 5.2.5 or MIL STD 1344 A - 2016) Thrust velocity max: 10 mm/s Rest period (unmated) max: 30 s Number of cycles: 200 **Result:** Carried out!

Test sequence	**Test, measurement, result** **BP 3.2 test acc. DIN EN 60068-2-60 Method 4**
BP 6	Insulation resistance [Ω] IEC 60 512 test 3 a adapter measurement (Telcordia GR-1217-Core sect. 5.4.6 or MIL STD 1344 A - 3003.1) Nominal: ≥ 10^{12} min: 3,0x10^{13} max: 3,2x10^{13} **Result:** Passed!
BP 7	Voltage proof IEC 60 512 test 4 a (Telcordia GR-1217-Core sect. 5.4.7 or MIL STD 1344 A - 3001.1) Test voltage: contact/ contact: 1000 Veff contact/ ground: 1550 Veff **Result:** No flashover – passed!
BP 9	Gauge retention force [N] 6 contacts/sample IEC 60 512 test 16 e Nominal: ≥ 0,15 min: 0,33 xquer: 0,37 max: 0,41 s: 0,02 **Result:** Passed!
BP 10	Visual examination IEC 60 512 test 1 a (Telcordia GR-1217-Core sect. 5.1.1) **Result:** Some contacts shows abrasion of gold flash but the PdNi plating was still O.K. No visible failures on female and male contacts which has any influence to function! Passed!
BP 11	Static axial load IEC 60 512 test 8 b Force increase: 10 N/s Duration: 10 s Force: 90 N **Result:** Passed!

Test sequence	Test, measurement, result
CP 1	Damp heat, constant IEC 60 512 test 11 c (Telcordia GR-1217-Core sect. 6.3.4 or MIL STD 1344 A - 1002.1) Polarization voltage: 60 V DC Test climate: 40°C/ 93% r.H. Storage period: 21 days **Result:** Carried out!
CP 2	Insulation resistance [Ω] IEC 60 512 test 3 a adapter measurement (Telcordia GR-1217-Core sect. 5.4.6 or MIL STD 1344 A - 3002.1) Nominal: $\geq 10^{10}$ min: $1{,}6 \times 10^{12}$ max: $4{,}3 \times 10^{12}$ **Result:** Passed!
CP 3	Contact resistance [mΩ] 6 contacts/sample IEC 60 512 test 2 a, millivolt method (Telcordia GR-1217-Core sect. 5.4.1 or MIL STD 1344 A - 3002.1) Nominal: ≤ 20 min: 6,1 avg: 6,47 max: 7,0 s: 0,26 **Result:** Passed!
CP 4	Voltage proof IEC 60 512 test 4 a (Telcordia GR-1217-Core sect. 5.4.7 or MIL STD 1344 A - 3001.1) Test voltage: contact/ contact: 1000 Veff contact/ ground: 1550 Veff **Result:** No flashover – passed!
CP 5	Visual inspection IEC 60 512 test 1 a (Telcordia GR-1217-Core sect. 5.1.1) **Result:** No visible failures on female and male contacts which has any influence to function! Passed!

Test sequence	Test, measurement, result
DP 1	Mechanical operation IEC 60 512 test 9 a (Telcordia GR-1217-Core sect. 5.2.5 or MIL STD 1344 A - 2016) Thrust velocity max: 10 mm/s Rest period (unmated): 30 s Number of cycles: 200 **Result:** Carried out!
DP 2	Electric load and temperature IEC 60 512 test 9 b (Telcordia GR-1217-Core sect. 6.3.2 or MIL STD 1344 A - 1005.1) Temperature: 70°C Current: 1 A Duration: 1000 h **Result:** Carried out!
DP 3	Contact resistance [mΩ] 6 contacts/sample IEC 60 512 test 2 a, millivolt method (Telcordia GR-1217-Core sect. 5.4.1 or MIL STD 1344 A - 3002.1) Nominal: 20 min: 6,0 avg: 6,56 max: 7,1 s: 0,29 **Result:** Passed!
DP 4	Voltage resistance IEC 60 512 test 4 a (Telcordia GR-1217-Core sect. 5.4.7 or MIL STD-1344 A - 3001.1) Test voltage: contact/ contact: 1000 Veff contact/ ground: 1550 Veff **Result:** Passed!
DP 6	Partial-discharge extinction voltage IEC 60 512 test 4 b Test voltage: contact/ contact: 1000 Veff contact/ ground: 1000Veff **Result:** Passed!
DP 8	Visual examination IEC 60 512 test 1 a (Telcordia GR-1217-Core sect. 5.1.1) **Result:** No visible failures on female and male contacts which has any influence to function! Passed!

Test sequence	Test, measurement, result
EP 1	Robustness of terminations - 6 contacts/sample IEC 60 512 test 16 f Test force: 15 N **Result:** Passed!
EP 2	Contact retention - 6 contacts/sample IEC 60 512 test 15a Test force: 10 N **Result:** Passed!
EP 3	Mould growth IEC 60 512 test 11 e **Result:** Test certificate from plastic manufacturer!
EP 4	Visual examination IEC 60 512 test 1a (Telcordia GR-1217-Core sect. 5.1.1) **Result:** No visible failures on female and male contacts which has any influence to function! Passed!
EP 5	Flammability IEC 60 512 test 20 a Duration of action: 10 s Duration of after burn: 10 s max. **Result:** Passed!
EP 6	Visual examination IEC 60 512 test 1a (Telcordia GR-1217-Core sect. 5.1.1) **Result:** The samples were destroyed during flammability testing!

	Mixed Flowing Gas Test with 4 gas components according Telcordia GR-1217-Core **controlled environment / ever 5 days mated and unmatet aged / tightened test about a total of 20 days / 180 contacts / requalification quality level II**
Test sequence	**Testing, Measurement, Result**
Z 1	Contact resistance (mΩ) 6 samples/ 180 contacts (Initial measurement) Telcordia GR-1217-Core sect. 5.4.1 and 6.2.1 (Low-Level Contact Resistance) Required:≤ 20 Actual value: min: 5,13 avg: 5,46 max: 7,06 s: 0,167 **Result:** Passed!
Z 2	Mechanical operation (1st half) IEC 60 512 test 9 a (Telcordia GR-1217-Core sect. 5.2.5) Thrust speed max: 10 mm/s Rest period (unmated): 30 s No. of cycles: 100 **Result:** Carried out!
Z 3	Contact resistance (mΩ) 6 samples/ 180 contacts Telcordia GR-1217-Core sect. 5.4.1 and 6.2.1 (Low-Level Contact Resistance) Required:≤ 20 Required max changing: > 5 mΩ 3%/ > 10 mΩ 1%/ > 50 mΩ 0% Actual value: min: 5,20 avg: 5,53 max: 8,17 s: 0,233 max changing in percent: > 5 mΩ 0%/ > 10 mΩ 0%/ > 50 mΩ 0% max changing over-all: 1,11 **Result:** Passed!
Z 4	Corrosion, industrial atmosphere Telcordia GR-1217-Core sect. 9.1.3 Controlled Environment Test climate: 30°C/ 70% r.H. Gas concentration: Mixed flowing gas 100 ppb SO_2 + 10ppb Cl_2 + 200 ppb NO_2 +10 ppb H_2S Duration: 5 days Test samples mated **Result:** Carried out!

Test sequence	Testing, Measurement, Result
Z 5	Contact resistance (mΩ) 6 samples/ 180 contacts Telcordia GR-1217-Core sect. 5.4.1 and 6.2.1 (Low-Level Contact Resistance) Required:≤ 20 Required max changing: > 5 mΩ 3%/ > 10 mΩ 1%/ > 50 mΩ 0% Actual value: min: 5,18 avg: 5,44 max: 7,82 s: 0,212 max changing in percent: > 5 mΩ 0%/ > 10 mΩ 0%/ > 50 mΩ 0% max changing over-all: 0,76 **Result:** Passed!
Z 6	Corrosion, industrial atmosphere Telcordia GR-1217-Core sect. 9.1.3 Controlled Environment Test climate: 30°C/ 70% r.H. Gas concentration: Mixed flowing gas 100 ppb SO_2 + 10ppb Cl_2 + 200 ppb NO_2 +10 ppb H_2S Duration: 5 days Test samples unmated **Result:** Carried out!
Z 7	Contact resistance (mΩ) 6 samples/ 180 contacts Telcordia GR-1217-Core sect. 5.4.1 and 6.2.1 (Low-Level Contact Resistance) Required:≤ 20 Required max changing: > 5 mΩ 3%/ > 10 mΩ 1%/ > 50 mΩ 0% Actual value: min: 5,24 avg: 5,59 max: 8,11 s: 0,250 max changing in percent: > 5 mΩ 0%/ > 10 mΩ 0%/ > 50 mΩ 0% max changing over-all: 1,05 **Result:** Passed!
Z 8	Corrosion, industrial atmosphere Telcordia GR-1217-Core sect. 9.1.3 Controlled Environment Test climate: 30°C/ 70% r.H. Gas concentration: Mixed flowing gas 100 ppb SO_2 + 10ppb Cl_2 + 200 ppb NO_2 +10 ppb H_2S Duration: 5 days Test samples unmated **Result:** Test carried out!

Test sequence	Testing, Measurement, Result
Z 9	Contact resistance (mΩ) 6 samples/ 180 contacts Telcordia GR-1217-Core sect. 5.4.1 and 6.2.1 (Low-Level Contact Resistance) Required:≤ 20 Required max changing: > 5 mΩ 3%/ > 10 mΩ 1%/ > 50 mΩ 0% Actual value: min: 5,33 avg: 5,84 max: 9,90 s: 0,503 max changing in percent: > 5 mΩ 1,1%/ > 10 mΩ 0%/ > 50 mΩ 0% max changing over-all: 4,48 **Result:** Passed!
Z 10	Corrosion, industrial atmosphere Telcordia GR-1217-Core sect. 9.1.3 Controlled Environment Test climate: 30°C/ 70% r.H. Gas concentration: Mixed flowing gas 100 ppb SO_2 + 10ppb Cl_2 + 200 ppb NO_2 +10 ppb H_2S Duration: 5 days Test samples mated **Result:** Passed!
Z 11	Contact resistance (mΩ) 6 samples/ 180 contacts Telcordia GR-1217-Core sect. 5.4.1 and 6.2.1 (Low-Level Contact Resistance) Required:≤ 20 Required max changing: > 5 mΩ 3%/ > 10 mΩ 1%/ > 50 mΩ 0% Actual value: min: 5,10 avg: 5,64 max: 8,63 s: 0,430 max changing in percent: > 5 mΩ 0,55%/ > 10 mΩ 0%/ > 50 mΩ 0% max changing over-all: 6,07 **Result:** Passed!
Z 12	Small Motion Displacement: 0,1 mm **Result:** Test carried out!

Test sequence	Testing, Measurement, Result
Z 13	Contact resistance (mΩ) 6 samples/ 180 contacts Telcordia GR-1217-Core sect. 5.4.1 and 6.2.1 (Low-Level Contact Resistance) Required:≤ 20 Required max changing: > 5 mΩ 3%/ > 10 mΩ 1%/ > 50 mΩ 0% Actual value: min: 5,28 avg: 5,70 max: 8,45 s: 0,433 max changing in percent: > 5 mΩ 0%/ > 10 mΩ 0%/ > 50 mΩ 0% max changing over-all: 2,91 **Result:** Passed!
Z 14	Mechanical operation (2nd half) IEC 60 512 test 9 a (Telcordia GR-1217-Core sect. 5.2.5) Thrust speed max: 10 mm/s Rest period (unmated): 30 s No. of cycles: 100 **Result:** Carried out!
Z 15	Contact resistance (mΩ) 6 samples/ 180 contacts Telcordia GR-1217-Core sect. 5.4.1 and 6.2.1 (Low-Level Contact Resistance) Required:≤ 20 Required max changing: > 5 mΩ 3%/ > 10 mΩ 1%/ > 50 mΩ 0% Actual value: min: 5,18 avg: 5,62 max: 8,69 s: 0,388 max changing in percent: > 5 mΩ 0%/ > 10 mΩ 0%/ > 50 mΩ 0% max changing over-all: 3,32 **Result:** Passed!

DAT-PL-002/91-03

Center for Quality Engineering

Test Report No.: E0QA0001

Order No.: E0QA **Pages:** 11 **Munich,** Apr 27, 2011

Client:	ERNI Electronics GmbH
Equipment Under Test:	DIN Steckverbinder, 96polig 4x DIN Messerleiste C96polig Basismaterial Messing + 4x DIN Federleiste C96polig Basismaterial Bronze 4x DIN Messerleiste C96polig Basismaterial Bronze + 4x DIN Federleiste C96polig Basismaterial Bronze
Manufacturer:	ERNI Electronics GmbH
Task:	Vibration sinusoidal and Shock with contact monitoring
Test Specification(s): [covered by accreditation]	IEC 60068-2-6, Test Fc: Vibration (sinusoidal) IEC 60512-6-4, Test 6d: Vibration (sinusoidal) IEC 60512-2-5, Test 2e: Contact disturbance
Result:	No contact disturbances >1µs were detected. Further evaluation will be carried out by the customer.

The results relate only to the items tested as described in this test report.

approved by:	**Date**	**Signature**
Metzger Lab Manager Environmental Simulation	May 03, 2011	

This document was signed electronically.

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LIST OF FIGURES

LIST OF PHOTOS

1 Summary

No contact disturbances >1µs were detected.
Further evaluation will be carried out by the customer.

2 References

2.1 Specifications

[1] **IEC 60068-2-6: 2007-12**
Environmental testing –
Part 2-6: Tests – Test Fc: Vibration (sinusoidal)

[2] **IEC 60512-6-4: 2002-02**
Connectors for electronic equipment–Tests and measurements
Part 6-4: Tests – Test 6d: Vibration (sinusoidal)

[3] **IEC 60512-2-5: 2003-05**
Connectors for electronic equipment–Tests and measurements
Part 2-5: Tests – Test 2e: Contact disturbance

3 General Information

3.1 Identification of Client

ERNI Electronics GmbH
Ziegelhau 25
73099 Adelberg
Stefan Kupfernagel

3.2 Test Laboratory

Center for Quality Engineering
SGS Germany GmbH
Hofmannstraße 50
81379 München

3.3 Time Schedule

Delivery of EUT:	Apr 20, 2011
Start of test:	Apr 20, 2011
End of test:	Apr 20, 2011

3.4 Participants

Name	Function	Phone	E-Mail
Rudolf Egner	Accredited testing, Editor	+49 89 787475-312	rudolf.egner@sgs.com
Michael Schwarzenböck	Accredited testing, Editor	+49 89 787475-326	michael.schwarzenboeck@sgs.com

4 Equipment Under Test

DIN Steckverbinder, 96polig
4x DIN Messerleiste C96polig Basismaterial Messing +
4x DIN Federleiste C96polig Basismaterial Bronze

4x DIN Messerleiste C96polig Basismaterial Bronze +
4x DIN Federleiste C96polig Basismaterial Bronze

5 Test Equipment

5.1 Test Facility

The measurements were carried out in the Center for Quality Engineering
SGS Germany GmbH, Department Environmental Simulation
Hofmannstraße 50, 81379 München, Germany.

5.2 Measuring Equipment

ID No.	Equipment	Type	Manufacturer	Status	Last Cal.	Next Cal.
S5419	Vibration Control and Analysis System (VIB2000)	Vibrunner	Agilent	cal	Mar 01, 2011	Mar 2012
S5450	Software Version 2.10.28	Vib Control/NT f. VIB 2000	M&P	cnn		
S5793	Vibration Exciter VIB2000	SW 8140	RMS	cnn		
S5794	Cooling Unit VIB2000	SWG 731/5	RMS	cnn		
S5795	Amplifier VIB2000	TGE 10-5	RMS	cnn		
S5956	Control PC VIB2000	Lenovo ThinkCentre	Lenovo	cnn		
S5825	Accelerometer	TLD 352C34 (50g / 6,6gr)	PCB	cal	Apr 29, 2010	Apr 2012
S5563	Measuring Data Recorder	DL750	Yokogawa	ind		
S5796	Power Supply	EA-PS 3065-10 B, 65 V / 10 A	Elektro Automatik GmbH	ind		

cal = Calibration, car = Calibration restricted use, chk = Check, chr = Check restricted use, cpu = Check prior to use, cnn = Calibration not necessary, ind = for indication only

6 Test Specifications and Results

The test results in the report refer exclusively to the test object described in section 4 and the test period in section 3.3.

6.1 Test Specification

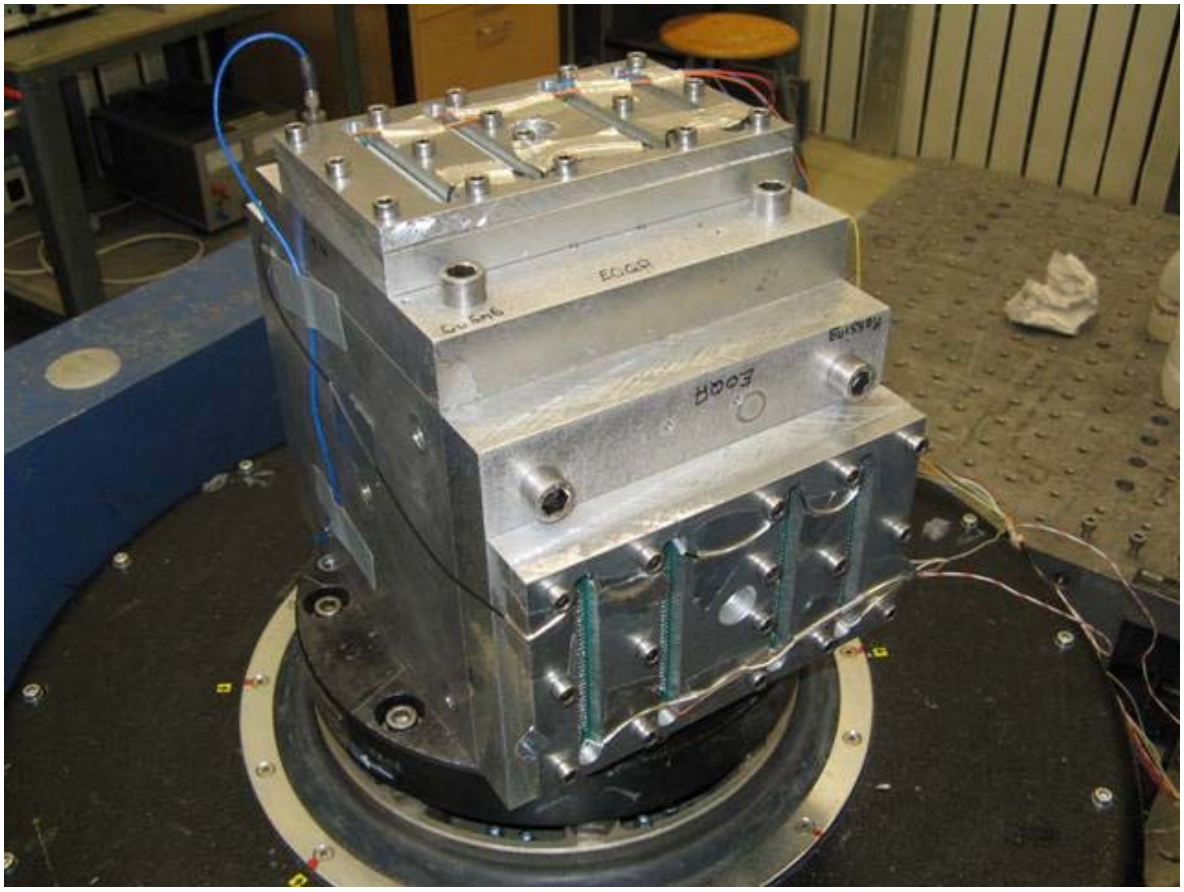
6.1.1 Vibration (sinusoidal)

Test	Parameter	Test Severity	Reference	Method
Vibration sinusoidal	Displacement Acceleration Frequency range Sweep rate Axes of vibration Duration	0,35 mm 5 g 10-60 Hz 60-500 Hz 1 oct/min 3 3 x 10 cycles	IEC 60068-2-6 IEC 60512-6-4	Fc: Vibration (sinusoidal) 6d

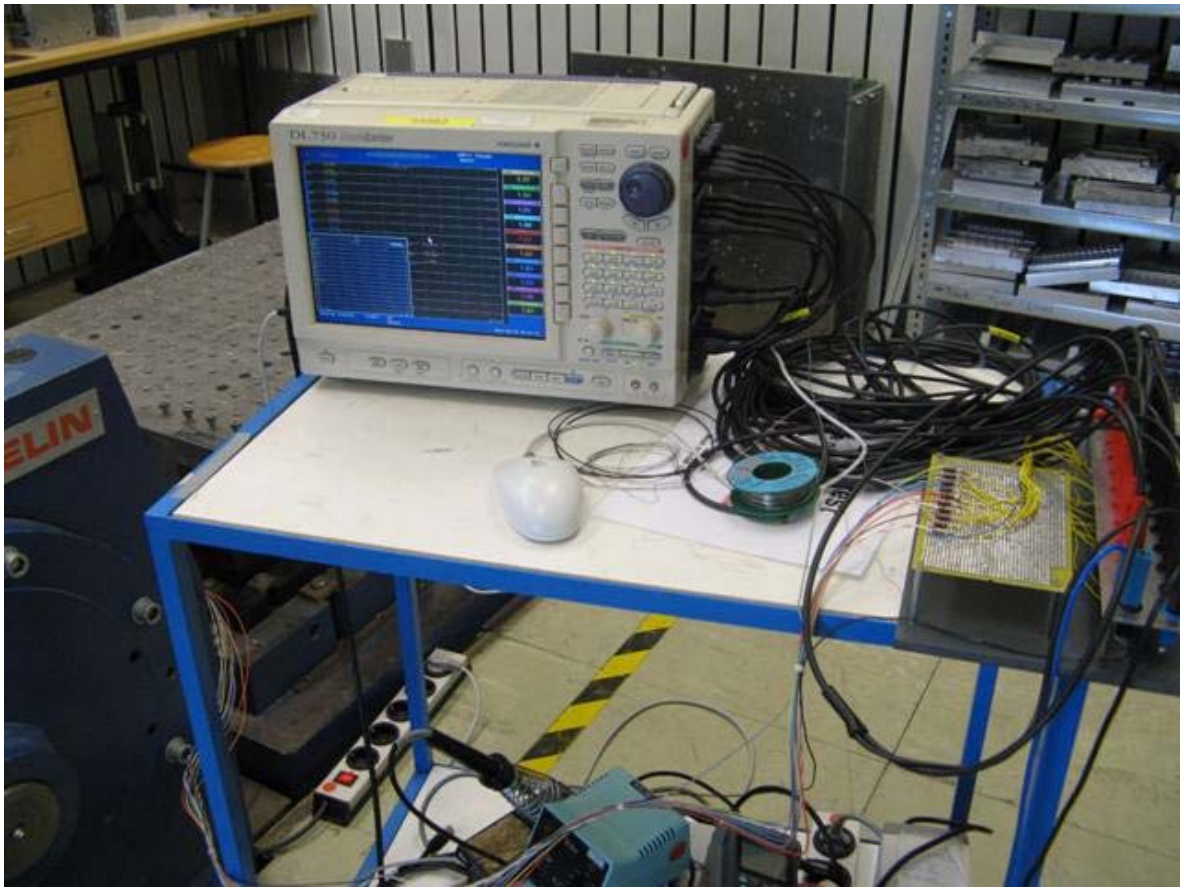
6.2 Test Performance

6.2.1 Vibration (sinusoidal)

The EUT were screwed to an aluminium mounting plate with a thickness of 30 mm.
The mounting plate was fixed over a rigid aluminium cube to the shaker table.
The test was performed in 3 mutually perpendicular axes.



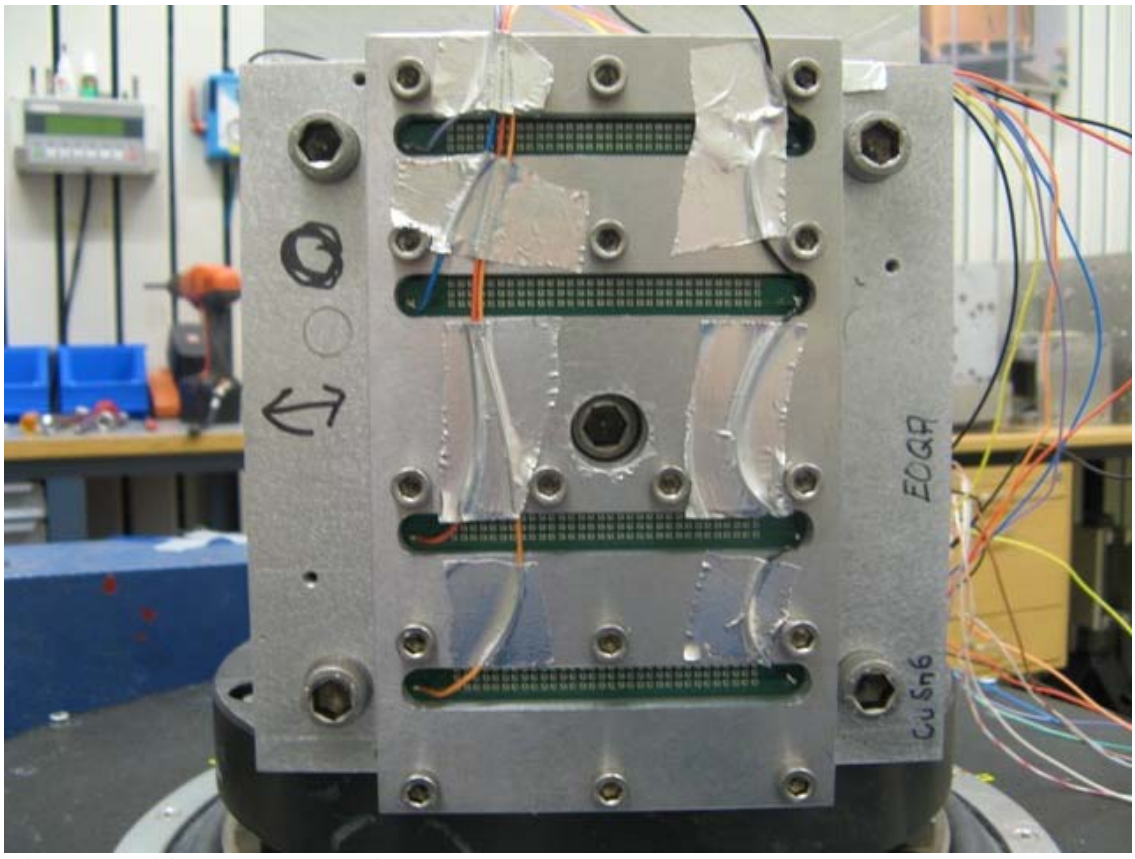
Pic. 1 EUTs mounted on shaker table



Pic. 2 Test setup for contact monitoring

6.2.2 Monitoring of Contact disturbance

During the shock test every circuit are connected in series with a 150 Ω resistance and loaded with 10V DC. The voltage drop of the connection was monitored by a data logger with 10MS/s, the trigger level was adjusted to a voltage drop of 5V, which equals to 150Ω.



Pic. 3 Wiring of test samples

Each Sample is connected with one channels of the measuring equipment.

6.3 Test Result

6.3.1 Contact disturbance

No contact disturbances >1µs were detected
Further evaluation will be carried out by the customer.

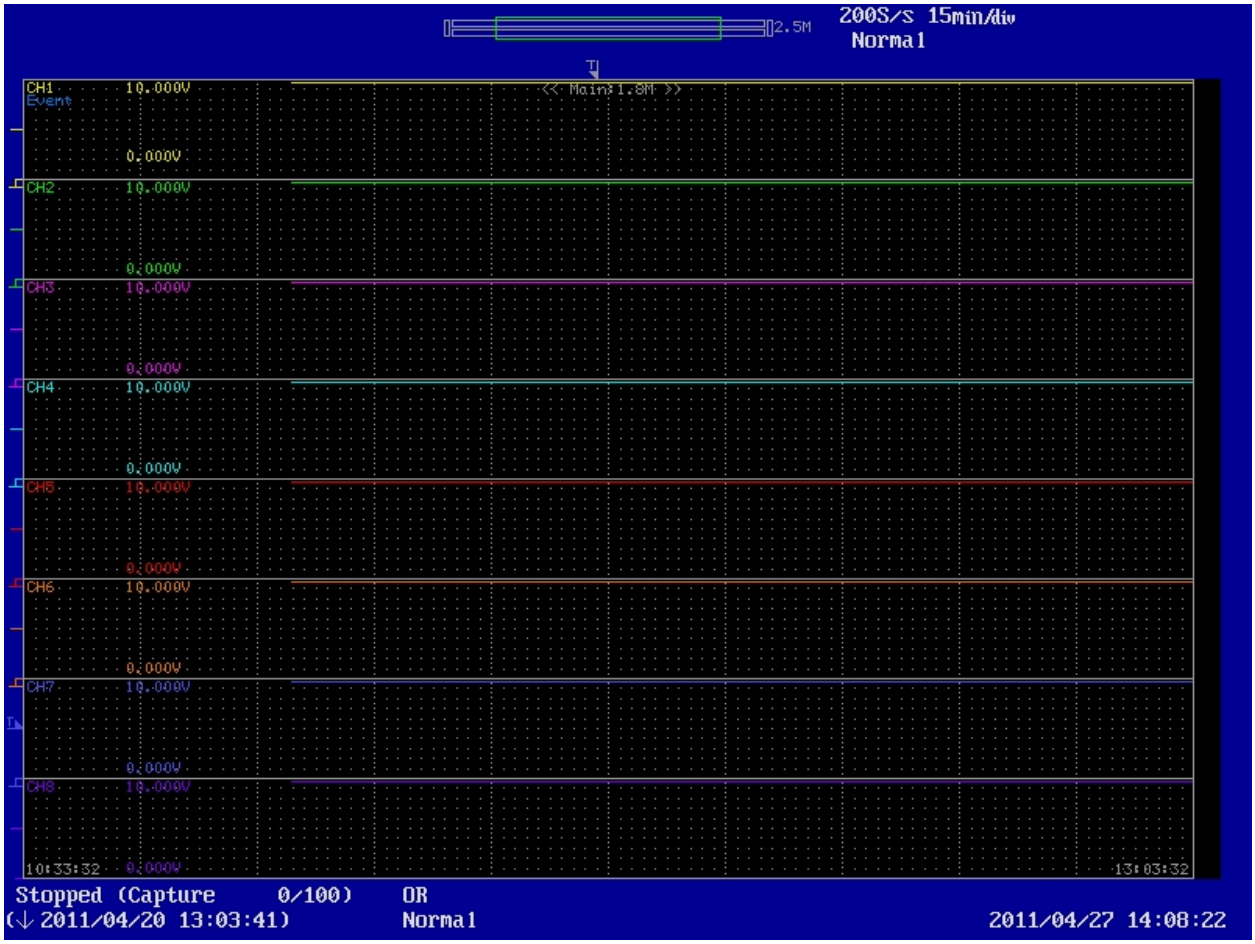


Fig. 1 Monitoring of contact disturbance

6.3.2 Vibration (sinusoidal)

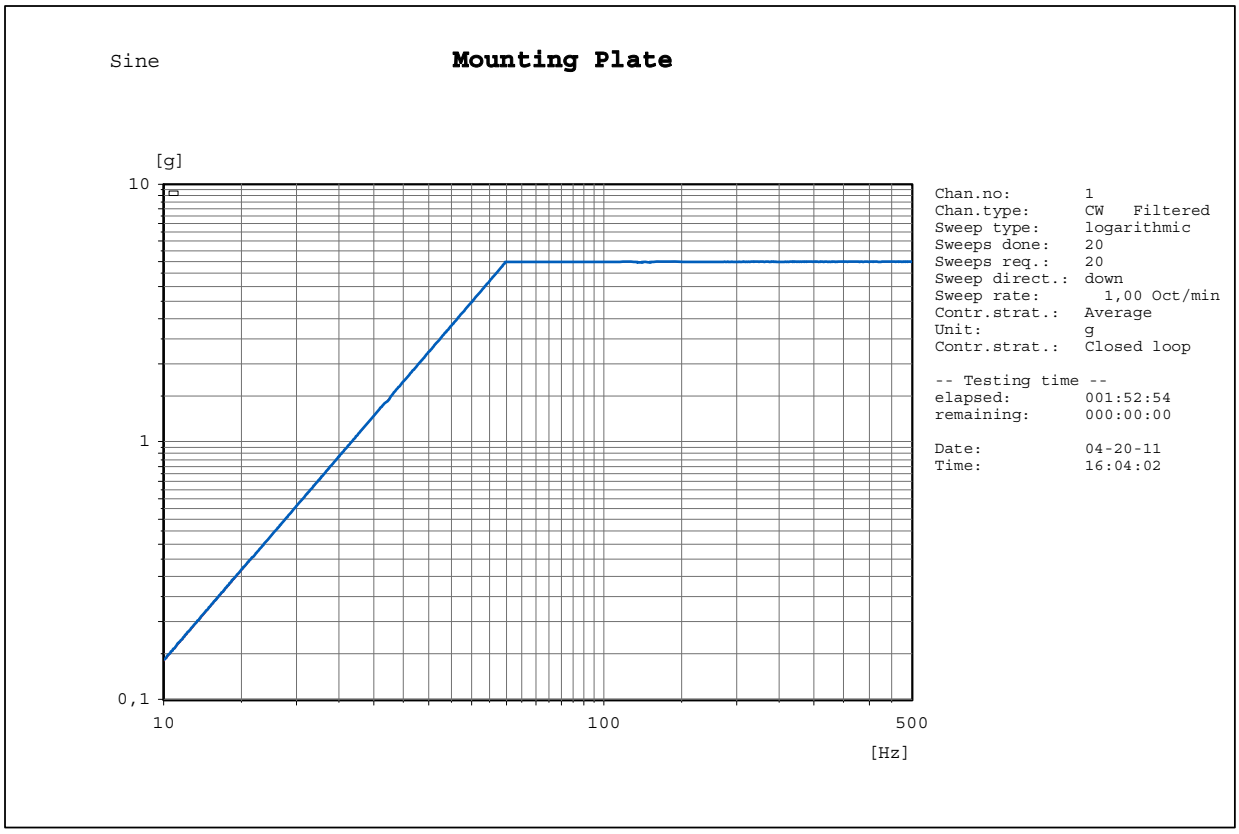


Fig. 2 Diagram of vibration response measured at mounting plate

Deckblatt

Absender
SPRITZEREI Fa. ERNI GmbH

Ziegelhau 25

73099 Adelberg

Empfänger
ERNI Entwicklung

Seestrasse

D 73099 Adelberg

☐ **Bericht Produktionsprozess- und Produktfreigabe**
☐ **DmbA**
Vorlagestufe: _____
☐ Erstbemusterung
☐ Neuteil
☐ Produktänderung (Spezifikationsänderung)
☐ Produktionsverlagerung
☐ Änderung von Produktionsprozessen
☐ Aussetzen der Fertigung länger als 12 Monate
☐ Werkzeugänderung / -korrektur
☐ Änderung von Zukaufteilen
☐ Änderung von Lieferanten
☐ Sonstige
☐ Nachbemusterung
☐ Neubemusterung
☒ **Bericht sonstige Muster**

Anlagen / Einsichtnahme		
☒ 01 Maßprüfung	☐ 09 EMV - Prüfung	☐ 17 Prüfmittelliste
☐ 02 Funktionsprüfung	☐ 10 Zuverlässigkeitsprüfung	☐ 18 Prüfmittelfähigkeitsnachweis
☐ 03 Werkstoffprüfung	☐ 11 Design - FMEA	☐ 19 EU - Sicherheitsdatenblatt
☐ 04 Haptikprüfung	☐ 12 Konstruktionsfreigabe	☐ 20 Materialdatenblatt / IMDS
☐ 05 Akustikprüfung	☐ 13 Prozess - FMEA	☐ 21 Transportmittel / Verpackung
☐ 06 Geruchsprüfung	☐ 14 Prozessablaufdiagramm	☐ 22 Zertifikate
☐ 07 Aussehensprüfung	☐ 15 Produktionslenkungsplan	☐ 23 Prozessabnahme
☐ 08 Oberflächenprüfung	☐ 16 Prozessfähigkeitsnachweis	☐ 24 Sonstiges

Lieferant / Produktionsstandort: SPRITZEREI Fa. ERNI GmbH	**Kunde:** ERNI Entwicklung
Kennnummer/DUNS-Code: 151	Kennnummer: 9999918
Berichts-Nr.: 1571 Index: 1	Berichts-Nr.: Index:
Benennung: STVBUG C 96 7-00 048 Sachnummer: 194441 Zeichnungsnummer: 194442 Stand/Datum: F 25.04.06 / 09.09.06	Benennung: STVBUG C 96 7-00 048 Sachnummer: 194441 Zeichnungsnummer: 194442 Stand/Datum:
Lieferschein-Nr./-datum: 22.06.09	**Wareneingangs-Nr./-datum:**
Liefermenge: Prüfmenge: 8 Stück Chargennummer: Auftr. Nr. 128 68 76 Mustergewicht:	Bestellabruf-Nr./-datum: Abladestelle:

Bestätigung Lieferant:
Hiermit wird bestätigt, dass die Bemusterungen entsprechend dem VDA Band 2 Kapitel 4 durchgeführt worden sind.
☐ Der IMDS-Datensatz wurde erstellt unter der IMDS-ID-Nr.: _____

Name: Schmid Abteilung: QMT Telefon: 07166-50261 Fax: 07166-5055261 E-Mail: jschmid@erni.de Datum: 14.07.09 Unterschrift: i. A. Deufel	Bemerkung: Vermessung der wichtigsten Maße und Erstellung Maßprüfbericht. WERKSTOFF: PBTB KINGFA (Auftrag: H.Mödinger, H.Rentschler, H.Popp)

Entscheidung Kunde	**gesamt**	**Einzelfreigaben:** 01	02	03	04	05	06	07	08	09	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24
frei	☒	☒	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐
frei mit Auflagen, Nachbem. erforderlich	☐																								
abgelehnt, Nachbem. erforderlich	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐

Abweich-Genehmigung-Nr.: Gültig bis: Stückzahl: Termin für Nachbemusterung:
Bei Rücksendung Lieferschein-Nr./-datum:

Name: Abteilung: Telefon: Fax: E-Mail:	Bemerkung: Datum: Unterschrift:

Deckblatt

Absender

BEE Herr Woerner

Empfänger

BEE
Herr Woerner

☐ **Bericht Produktionsprozess- und Produktfreigabe**
☐ **DmbA**
Vorlagestufe: _____
☒ Erstbemusterung
☒ Neuteil
☐ Produktänderung (Spezifikationsänderung)
☐ Produktionsverlagerung
☐ Änderung von Produktionsprozessen
☐ Aussetzen der Fertigung länger als 12 Monate
☐ Werkzeugänderung / -korrektur
☐ Änderung von Zukaufteilen
☐ Änderung von Lieferanten
☒ Sonstige
☐ Nachbemusterung
☐ Neubemusterung
☐ **Bericht sonstige Muster**

Anlagen / Einsichtnahme		
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☐ 02 Funktionsprüfung	☐ 10 Zuverlässigkeitsprüfung	☐ 18 Prüfmittelfähigkeitsnachweis
☐ 03 Werkstoffprüfung	☐ 11 Design - FMEA	☐ 19 EU - Sicherheitsdatenblatt
☐ 04 Haptikprüfung	☐ 12 Konstruktionsfreigabe	☐ 20 Materialdatenblatt / IMDS
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☐ 08 Oberflächenprüfung	☐ 16 Prozessfähigkeitsnachweis	☐ 24 Sonstiges

Lieferant / Produktionsstandort:	**Kunde:**
Kennnummer/DUNS-Code:	Kennnummer:
Berichts-Nr.: 3445 Index: **1**	Berichts-Nr.: Index:
Benennung: **STVC 96 M ABC VVV 4-0** Sachnummer: **444790** Zeichnungsnummer: **444790** Stand/Datum: **--- / 10.06.11**	Benennung: **STVC 96 M ABC VVV 4-0** Sachnummer: **444790** Zeichnungsnummer: **444790** Stand/Datum:
Lieferschein-Nr./-datum:	**Wareneingangs-Nr./-datum:**
Liefermenge: **2 Stück** Chargennummer: **Muster Nest 1 und Nest 2** Mustergewicht:	Bestellabruf-Nr./-datum: Abladestelle:

Bestätigung Lieferant:
Hiermit wird bestätigt, dass die Bemusterungen entsprechend dem VDA Band 2 Kapitel 4 durchgeführt worden sind.
☐ Der IMDS-Datensatz wurde erstellt unter der IMDS-ID-Nr.: _____

Name: **Hikel** Abteilung: **QMT** Telefon: **07166-50490** Fax: **07166-5055570** E-Mail: **michael.hikel@erni.de** Datum: **10.06.11** Unterschrift:	Bemerkung: Bauart 4 mit Kontaktband 247 lt Aufdruck

Entscheidung Kunde	**gesamt**	**Einzelfreigaben:** 01	02	03	04	05	06	07	08	09	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24
frei	☒	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☒	☐	☐	☐	☐	☐	☐	☐
frei mit Auflagen, Nachbem. erforderlich	☐																								
abgelehnt, Nachbem. erforderlich	☐	☒	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐	☐

Abweich-Genehmigung-Nr.: Gültig bis: Stückzahl: Termin für Nachbemusterung:
Bei Rücksendung Lieferschein-Nr./-datum:

Name: **Herr Woerner** Abteilung: **BEE** Telefon: **110** Fax: E-Mail:	Bemerkung: Werkstoffversuch CU ZN neuer Kontaktwerkstoff. Datum: **15.06.11** Unterschrift:

Inhalt des PPF - Berichtes

Lieferant / Produktionsstandort:	Kunde:
Kennnummer / DUNS-Code:	Kennnummer:
Berichts-Nr.: **3445** Index: **1**	Berichts-Nr.: Index:
Benennung: **STVC 96 M ABC VVV 4-0** Sachnummer: **444790** Zeichnungsnummer: **444790** Stand / Datum: **--- / 10.06.11**	Benennung: **STVC 96 M ABC VVV 4-0** Sachnummer: **444790** Zeichnungsnummer: **444790** Stand / Datum:

Anlage	Stand / Datum	Art, Umfang und Kennzeichnung der Anlage
☒ 01 Maßprüfung		**444790 vom 28.10.2010**
☐ 02 Funktionsprüfung		
☐ 03 Werkstoffprüfung		
☐ 04 Haptikprüfung		
☐ 05 Akustikprüfung		
☐ 06 Geruchsprüfung		
☐ 07 Aussehensprüfung		
☐ 08 Oberflächenprüfung		
☐ 09 EMV - Prüfung		
☐ 10 Zuverlässigkeitsprüfung		
☐ 11 Design - FMEA		
☐ 12 Konstruktionsfreigabe		
☐ 13 Prozess - FMEA		
☐ 14 Prozessablaufdiagramm		
☐ 15 Produktionslenkungsplan		
☐ 16 Prozessfähigkeitsnachweis		
☐ 17 Prüfmittelliste		
☐ 18 Prüfmittelfähigkeitsnachweis		
☐ 19 EU - Sicherheitsdatenblatt		
☐ 20 Materialdatenblatt / IMDS		
☐ 21 Transportmittel / Verpackung		
☐ 22 Zertifikate		
☐ 23 Prozessabnahme		
☐ 24 _____		

Bemerkung Lieferant:
Bestückt mit Kontakten aus CUZn 36 .
für Labortest. Bezeichnung auf Produkt : Kontaktband 247

Name: **Hikel**
Abteilung: **QMT**
Telefon: **07166-50490**
Fax: **07166-5055570**
E-Mail: **michael.hikel@erni.de**

Datum: **10.06.11** Unterschrift:

Produktbezogene Prüfergebnisse Stand: Datum: Blatt **3** von **6**

[x] 01 Maßprüfung	[ ] 06 Geruchsprüfung
[ ] 02 Funktionsprüfung	[ ] 07 Aussehensprüfung
[ ] 03 Werkstoffprüfung	[ ] 08 Oberflächenprüfung
[ ] 04 Haptikprüfung	[ ] 09 EMV - Prüfung
[ ] 05 Akustikprüfung	[ ] 10 Zuverlässigkeitsprüfung

Lieferant / Produktionsstandort:	Kunde:
Kennnummer / DUNS-Code:	Kennnummer:
Berichts-Nr.: **3445** Index: **1**	Berichts-Nr.: Index:
Benennung: **STVC 96 M ABC VVV 4-0** Sachnummer: **444790** Zeichnungsnummer: **444790** Stand / Datum: **--- / 10.06.11**	Benennung: **STVC 96 M ABC VVV 4-0** Sachnummer: **444790** Zeichnungsnummer: **444790** Stand / Datum:

Ref. Nr.:	Forderungen Spezifikation	IST-Werte Lieferant	Spezifikation erfüllt Ja	Nein	Bemerkung
	Ansicht oben.				
1	**85.50 ±0.15**	**85.52;85.48**	**x**		
2	**8.70 +0.20/+0**	**8.85;8.90;8.89;8.85**	**x**		
3	**5.08 ±0.15**	**5.07-5.14**	**x**		
4	**max. 11.1**	**10.78;10.78;10.78;10.78**	**x**		
5	**2.50 +0/-0.20**	**2.38;2.38;2.38;2.38**	**x**		
	Ansicht bei Bef.löcher				
10	**max. 94**	**93.93;93.94**	**x**		
11	**78.74 ±0.150**	**78.72;78.73**	**x**		
12	**2.540 ±0.100**	**2.62;2.62**	**x**		
14_re	**10.200 +0.000/-0.200**	**10.09;10.12**	**x**		**rechts**
14-li	**10.200 +0.000/-0.200**	**10.11;10.13;10.12**	**x**		**links**
15	**88.90 ±0.150**	**88.95;88.94**	**x**		
17	**ø 2.50 +0.10/+0**	**2.57-2.58**	**x**		**Prüfstifte**
18	**12.70 ±0.10**	**12.64;12.61;12.64;12.61**	**x**		

Bestätigung Lieferant:	Entscheidung Kunde:	
Bemerkungen: angenommene Toleranz: DIN 7167 f Bei Nest 1 war ein Kontakt verbogen.	frei	[ ]
	abgelehnt, Nachbemusterung erforderlich	[x]
	Bemerkungen:	
Name: **Hikel** Abteilung: **QMT** Telefon: **07166-50490** Fax: **07166-5055570** E-Mail: **michael.hikel@erni.de** Datum: **10.06.11** Unterschrift:	Name: **Herr Woerner** Abteilung: **BEE** Telefon: Fax: E-Mail: Datum: **10.06.11** Unterschrift:	

Produktbezogene Prüfergebnisse Stand: Datum: Blatt **4** von **6**

[x] 01 Maßprüfung	[ ] 06 Geruchsprüfung
[ ] 02 Funktionsprüfung	[ ] 07 Aussehensprüfung
[ ] 03 Werkstoffprüfung	[ ] 08 Oberflächenprüfung
[ ] 04 Haptikprüfung	[ ] 09 EMV - Prüfung
[ ] 05 Akustikprüfung	[ ] 10 Zuverlässigkeitsprüfung

Lieferant / Produktionsstandort:	Kunde:
Kennnummer / DUNS-Code:	Kennnummer:
Berichts-Nr.: **3445** Index: **1**	Berichts-Nr.: Index:
Benennung: **STVC 96 M ABC VVV 4-0** Sachnummer: **444790** Zeichnungsnummer: **444790** Stand / Datum: **--- / 10.06.11**	Benennung: **STVC 96 M ABC VVV 4-0** Sachnummer: **444790** Zeichnungsnummer: **444790** Stand / Datum:

Ref. Nr.:	Forderungen Spezifikation	IST-Werte Lieferant	Spezifikation erfüllt Ja	Nein	Bemerkung
	Ansicht seitlich				
25_re	**5.240 ±0.100**	**5.21;5.22**	**x**		
25_m	**5.080 ±0.100**	**5.00;4.98**	**x**		
22	**3.000 +0.200/-0.400**	**3.09;3.09**	**x**		
23	**3.000 +0.100/+0.000**	**3.02;3.05**	**x**		
24_re	**2.535 ±0.100**	**2.62;2.590**	**x**		
24_li	**2.535 ±0.100**	**2.62;2.62;2.60**	**x**		
25_li	**5.080 ±0.100**	**5.06;5.07**	**x**		
	Rasterlehre		**x**		**visuell vor Ort geprüft.**

Bestätigung Lieferant: Bemerkungen: angenommene Toleranz: DIN 7167 f Bei Nest 1 war ein Kontakt verbogen.	Entscheidung Kunde: frei [ ] abgelehnt, Nachbemusterung erforderlich [X] Bemerkungen:
Name: **Hikel** Abteilung: **QMT** Telefon: **07166-50490** Fax: **07166-5055570** E-Mail: **michael.hikel@erni.de** Datum: **10.06.11** Unterschrift:	Name: **Herr Woerner** Abteilung: **BEE** Telefon: Fax: E-Mail: Datum: **10.06.11** Unterschrift:

☐ 01 Maßprüfung ☐ 02 Funktionsprüfung ☐ 03 Werkstoffprüfung ☐ 04 Haptikprüfung ☐ 05 Akustikprüfung	☐ 06 Geruchsprüfung ☐ 07 Aussehensprüfung ☐ 08 Oberflächenprüfung ☐ 09 EMV - Prüfung ☐ 10 Zuverlässigkeitsprüfung

Lieferant / Produktionsstandort:	Kunde:
Kennnummer / DUNS-Code:	Kennnummer:
Berichts-Nr.: **3445** Index: **1**	Berichts-Nr.: Index:
Benennung: **STVC 96 M ABC VVV 4-0** Sachnummer: **444790** Zeichnungsnummer: **444790** Stand / Datum: **--- / 10.06.11**	Benennung: **STVC 96 M ABC VVV 4-0** Sachnummer: **444790** Zeichnungsnummer: **444790** Stand / Datum:

Ref. Nr.:	Forderungen Spezifikation	IST-Werte Lieferant	Spezifikation erfüllt Ja	Spezifikation erfüllt Nein	Bemerkung

Bestätigung Lieferant: Bemerkungen:	Entscheidung Kunde: frei ☐ abgelehnt, Nachbemusterung erforderlich ☐ Bemerkungen:
Name: Abteilung: Telefon: Fax: E-Mail: Datum: Unterschrift:	Name: Abteilung: Telefon: Fax: E-Mail: Datum: Unterschrift:

Prozessbezogene und sonstige Dokumente Stand: Datum: Blatt **6** von **6**

☐ 11 Design - FMEA	☐ 18 Prüfmittelfähigkeitsnachweis
☐ 12 Konstruktionsfreigabe	☐ 19 EU - Sicherheitsdatenblatt
☐ 13 Prozess - FMEA	☐ 20 Materialdatenblatt
☐ 14 Prozessablaufdiagramm	☐ 21 Transportmittel / Verpackung
☐ 15 Produktionslenkungsplan	☐ 22 Zertifikate
☐ 16 Prozessfähigkeitsnachweis	☐ 23 Prozessabnahme
☐ 17 Prüfmittelliste	☐ 24 _____

Lieferant / Produktionsstandort:	Kunde:
Kennnummer / DUNS-Code:	Kennnummer:
Berichts-Nr.: **3445** Index: **1**	Berichts-Nr.: Index:
Benennung: **STVC 96 M ABC VVV 4-0** Sachnummer: **444790** Zeichnungsnummer: **444790** Stand / Datum: **--- / 10.06.11**	Benennung: **STVC 96 M ABC VVV 4-0** Sachnummer: **444790** Zeichnungsnummer: **444790** Stand / Datum:

Lf.Nr.	Prüfmittel-nummer	Prüfmittelbezeichnung	Prüfmittelgruppe	letzte Prüfung	Fähigkeits-untersuchung
	301534010	**opt. Tischmessmaschine Werth**		**13.01.10**	

Bestätigung Lieferant: Bemerkungen:	Entscheidung Kunde: frei ☒ abgelehnt, Nachbemusterung erforderlich ☐ Bemerkungen:
Name: Abteilung: Telefon: Fax: E-Mail: Datum: Unterschrift:	Name: Abteilung: Telefon: Fax: E-Mail: Datum: **10.06.11** Unterschrift: