
1 APPLICABILITY

VDA 6.1: Section: 3.1; 7
new: In addition to the applicability for supplier sites for production, services and their subcontractors for:

- products and production materials, or
- services like heat and surface treatment,

the customers may extend the applicability to specified products.
Subcontractors can be included.

General On the following pages the phrase "new requirements" could come up, which is already included in the VDA 6.1 standard. This is by intent since VDA 6.1 includes many explanations and examples of activities, methods etc. which not necessarily have to be implemented. The here listed requirements have to be implemented in any case to be in accordance with ISO/TS 16949.
To a great extent the VDA 6.1 requirements are much more detailed than those outlined in ISO/TS 16949 (or QS 9000). This was not, or only in a few cases (e.g. 4.1.3.2), highlighted in this document as a difference/deviation.
To implement a quality system in accordance with ISO/TS 16949 the more detailed requirements of VDA 6.1 might be used as a guideline.

4 QUALITY SYSTEM REQUIREMENTS

4.1 Management responsibility

4.1.1 Quality policy

4.1.1.1 Quality policy - ISO 9001:1994

VDA 6.1: Questions: 01.1; 02.2
new: No change.

4.1.1.2 Goals

VDA 6.1: Questions: 01.2; 04.7
new: Objectives for quality are to be included in the business plan.

4.1.1.3 Customer satisfaction

VDA 6.1: Question: Z1.4

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

new: The procedure to determine customer satisfaction has to include the timely performance of analyses and the way to achieve objective and validated results.
Indicators are to be documented and supported by objective information.
Internal and external customers are to be considered.

4.1.1.4 Continuous improvement process

VDA 6.1: Questions: 01.3; Z1.2

new: The quality policy shall provide for continuous improvement in quality, service, cost and technology.
Opportunities for quality and productivity improvement shall be identified, where appropriate.
Note 1 lists possible techniques to be used: control charts, design of experiments, value analysis, benchmarking, mistake proofing and others.

4.1.2 Organization

4.1.2.1 Responsibility and authority

4.1.2.1.1 Responsibility and authority - ISO 9001:1994

VDA 6.1: Questions: 02.2; 02.3
new: No change.

4.1.2.1.2 Responsibility for customer needs

new: Appropriate personnel have to be assigned responsibility to represent customer needs (e.g. selection of special characteristics, setting quality objectives etc.)

4.1.2.1.3 Responsibility for quality

new: Management with responsibility and authority for corrective action shall be promptly informed of products or processes which become noncompliant with specified requirements.
Personnel responsible for quality shall have the authority to stop production to correct quality problems.

4.1.2.2 Resources

4.1.2.2.1 Resources - ISO 9001:1994

VDA 6.1: Question: 01.4
new: No change.

4.1.2.2.2 Resources in shift operation

new: During all shifts, especially concerning production, personnel shall be present who have delegated responsibility and authority for quality control.

4.1.2.3 Management representative

VDA 6.1: Question: 01.5

new: The requirements of VDA 6.1 with regard to responsibility and authority are more extensive than those outlined in ISO/TS 16949 (e.g. control of strategic quality goals, control and coordination of quality management tasks with multidisciplinary cooperation).

4.1.2.4 Organizational interfaces

VDA 6.1: Questions: 02.3; 02.4; 02.5; 02.6; 17.1; 18.1; 18.3; 18.4

new: Necessary information is to be transmitted in the language of the customer (waiver is possible).
Data is to be communicated in the customer-prescribed format.

4.1.3 Management review

4.1.3.1 Management review - ISO 9001:1994

VDA 6.1: Questions: 01.6; 20.1

new: Records of the reviews are to be retained.
Refer also to 4.1.3.2.

4.1.3.2 Management review - supplement

VDA 6.1: Question: 01.6

new: The periodic review of a minimum once a year, required by VDA 6.1, is not a requirement of ISO 9001:1994 or ISO/TS 16949. The intervals shall be adequate.

For the review all elements of the quality system have to be reported on.

Beyond the strategic quality goals, part of the review shall also be the regular reporting about costs of poor quality (which are only required in that detailed by VDA 6.1, questions 05.1 and 05.4)

Refer also to 4.2.8.

4.1.4 Business plan

VDA 6.1: Questions: Z1.1; Z1.2; Z1.3; Z1.4; 02.5

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

new: The business plan has to be a controlled document and shall include short term (one to two years) and long term (three or more years) goals and plans. Methods for control, updating and review shall be documented.
(for quality goals refer to 4.1.1.2)

4.1.5 Analysis and use of company level data

VDA 6.1: Questions: Z1.2; Z1.3

new: Company data (like quality, production performance, actual quality level on characteristics of key products) are to be documented in trends to support, for example:

- the development of priorities for solving customer problems,
- usage of an information system for the timely reporting of product data arising from usage.

The comparison of the data with those of other companies is referred to in a note.

4.1.6 Motivation empowerment and satisfaction of personnel

VDA 6.1 Question: Z1.5, 04.6

new: Processes are required for:

- motivation of employees to achieve quality objectives and make continuous improvements,
- measure employee satisfaction and understanding of appropriate quality goals.

4.1.7 Effect on the society

4.1.7.1 Product safety

VDA 6.1 Questions: 06.1; 06.3

new: No change.

4.1.7.2 Governmental regulations

VDA 6.1 Question: 01.2, 02.2, 02.3

new: It shall be ensured that safety and environmental constraints are satisfied including those for the handling of dangerous materials.

4.2 Quality system

4.2.1 General

VDA 6.1 Question: 02.1

new: No change.

4.2.2 Quality system procedures

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

4.2.2.1	Quality system procedures - ISO 9001:1994
VDA 6.1 new:	Question: 02.1 No change.
4.2.2.2	Quality system documentation
VDA 6.1 new:	Question: 02.1 The requirements of ISO/TS 16949 are to be included in the quality system documentation but not necessarily in individual procedures.
4.2.3	Quality planning
4.2.3.1	Quality planning - ISO 9001:1994
VDA 6.1 new:	Questions: 02.4; 02.5; 02.6 No change.
4.2.3.2	Requirement for a quality plan
VDA 6.1 new:	Questions: 02.5; 02.6; 14.3; 15.1 A quality plan with the customer requirements and the relevant technical specifications shall be available. The German version of ISO/TS 16949 defines: - QM-Plan, Prozeßablaufplan und Produktionslenkungsplan (control plan) different / with other content than VDA 6.1 does for: - QM-Plan, Prozeßablaufplan und Prüfablaufplan Refer also to 4.2.4.10 and 4.9.3.
4.2.4	Product realization
new:	Note: " Product realization " includes all quality planning activities of all phases before going into the market.
4.2.4.1	General
VDA 6.1 new:	Questions: 02.4; 02.5 Introduction of a process to ensure timely compliance with customer requirements (quality, costs, delivery).
4.2.4.2	Indicators
new:	During product realization, indicators like quality risk, costs, lead times, critical paths and similar shall be defined, analysed and reported to executive management.
4.2.4.3	Review

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

new: The process of product realization is to be reviewed (coordinated with design phases and include process design).

4.2.4.4 Multidisciplinary approach

VDA 6.1 Questions: 02.4; 02.5

new: No change.

4.2.4.5 Methods and tools

VDA 6.1 Questions: 06.2; 06.3

new: For product quality planning and control plans general reference is given to the customer manuals (bibliography).
Process-FMEAs have to include all special characteristics.
Customer requirements to review and release FMEAs are to be considered.
New processes shall be analysed for process capability and to identify additional requirements for process control.
Goals for process capability, reliability, maintainability and availability as well as acceptance criteria shall be documented.

4.2.4.6 Computer aided design (CAD)

VDA 6.1 Questions: 08.2; 09.3

new: The requirement for CAD has to be contractually agreed upon.
It shall be possible to use numeric design and engineering data for the production of production tools or prototypes.
Technical leadership shall be provided by the supplier if manufacturing of production tools and prototypes are subcontracted.

4.2.4.7 Special characteristics

VDA 6.1 Questions: 02.5; 06.2

new: All special characteristics shall be included in the control plans.
Suitable methods for the identification of special characteristics (product characteristics or process parameters) shall be applied.

4.2.4.8 Feasibility review

VDA 6.1 Questions: 02.5; 07.2

new: Records of investigation and confirmation of feasibility shall be maintained.

4.2.4.9 Management of process development

4.2.4.9.1 General

VDA 6.1 Question: 09.1

new: No change.

4.2.4.9.2	Process design input
VDA 6.1 new:	Questions: 09.1; 09.2; 09.3; 09.7 Goals for productivity have to be identified.
4.2.4.9.3	Process design output
VDA 6.1 new:	Questions: 09.2 - 09.6; 13.2 Data for reliability and maintainability have to be available.
4.2.4.9.4	Verification of process development
VDA 6.1 new:	Questions: 09.2 - 09.6; 14.1 No change.
4.2.4.10	Control plans
VDA 6.1 new:	Questions: 02.5; 02.6; 14.3; 15.1 Refer to 4.2.3.2. Control plans also have to be updated in case of changes to inspection and test method, frequency etc.
4.2.4.11	Release of production process and product
VDA 6.1 new:	Questions: 09.4; 09.5; 14.1; 14.2; 14.3 The procedure used by the supplier should be recognized by the customer and should be applied to the subcontractor. Where no customer procedure exists the supplier should comply with one of the part approval manuals listed in the bibliography. All changes are to be validated. All changes, including those from the subcontractor, shall be verified and accepted. Additional customer requirements for verification/identification have to be fulfilled.
4.2.5	Planning of plants, facilities and equipment
VDA 6.1 new:	Questions: 09.1; 09.2; 14.6; 14.7 During planning by an interdisciplinary team the following has to be considered: <ul style="list-style-type: none">- Minimize material travel and handling,- facilitate synchronous material flow,- maximise value-added use of floor space. During the evaluation of the effectiveness of existing operations and processes the following factors are to be considered: <ul style="list-style-type: none">- operator and line balance,- storage and buffer inventory level etc.

4.2.6 Tool management

VDA 6.1
new: Questions: 09.1; 09.2; 14.4
Resources for development and manufacturing of tools, measurement and test equipment are to be made available.
Tool management includes:

- maintenance and repair facilities,
- storage and recovery,
- set-up,
- documentation of changes to the tool design including technical change index/status,
- documentation of tool status, e.g. production, repair or scrap etc..

Follow-up and review these tasks in case they are subcontracted.

4.2.7 Process improvement

VDA 6.1
new: Question: 09.7
Refer also to 4.1.1.4.
Highest priority is to be put on special characteristics.

4.2.8 Performance of the quality system

VDA 6.1
new: Question: 01.6
A review of the efficiency of the procedures of the quality system has to be conducted as a minimum on the:

- goals from the quality policy,
- goals out of the business plan,
- customer satisfaction.
- (refer also to 4.1.3.2)

4.3 Contract review

4.3.1 General

VDA 6.1
new: Questions: 02.1; 07.2
No change.

4.3.2 Review

4.3.2.1 Review - ISO 9001:1994

VDA 6.1 Questions: 07.1; 07.2

4.3.2.2 Review - supplement

VDA 6.1
new: Questions: 07.1; 07.2; 07.3; 07.4; 07.5
No change.

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

4.3.3	Amendment to a contract
VDA 6.1 new:	Questions: 07.2 No change.
4.3.4	Records
VDA 6.1 new:	Questions: 07.2; 20.1 No change.
4.4	Design control
4.4.1	General
VDA 6.1 new:	Questions: 02.1; 08.1 No change.
4.4.2	Design and development planning
4.4.2.1	Design and development planning - ISO 9001:1994
VDA 6.1 new:	Question: 08.1 No change
4.4.2.2	Required skills
VDA 6.1 new:	Question: 04.5 Additional, appropriate skills are required: <ul style="list-style-type: none">- geometric dimensioning and tolerancing (GD&T),- design for manufacturing and assembly (DFM/DFA),- finite-element-analysis (FEA),- reliability planning.
4.4.2.3	Research and development
new:	Through access to research and development facilities the innovation of products and processes shall be ensured.
4.4.3	Organisational and technical interfaces
VDA 6.1 new:	Questions: 02.4; 08.1 No change.
4.4.4	Design input
4.4.4.1	Design input - ISO 9001:1994
VDA 6.1 new:	Question: 08.2 No change.

4.4.4.2	Reliability goals
new:	Goals for product life, reliability, durability and maintainability are to be included in the design input.
4.4.4.3	Use of design data
VDA 6.1	Question: 08.7
new:	No change.
4.4.5	Design output
4.4.5.1	Design output - ISO 9001:1994
VDA 6.1	Questions: 08.1 - 08.6
new:	No change.
4.4.5.2	Design optimisation
VDA 6.1	Question: 08.4
new:	refer to 4.4.2.2
4.4.6	Design review
VDA 6.1	Questions: 02.4; 08.1 - 08.5
new:	No change.
4.4.7	Design verification
VDA 6.1	Questions: 02.4; 08.1 - 08.4
new:	No change.
4.4.8	Design validation
4.4.8.1	Design validation - ISO 9001:1994
VDA 6.1	Questions: 02.4; 08.1 - 08.4
new:	No change.
4.4.8.2	Design validation - supplement
VDA 6.1	Questions: 02.4; 08.1 - 08.4
new:	Design validation shall be conducted in compliance with customer timing requirements. Design failures shall be documented in the validation records and necessary actions are to be taken.
4.4.8.3	Prototype program
VDA 6.1	Questions: 02.6; 08.4; 08.5

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

new:	Wherever possible use the same subcontractors, tools and processes as in the production. Performance testing to be monitored for timely completion, and conformance to requirements. Technical leadership shall be provided in case of subcontracted services.
4.4.9	Design changes
4.4.9.1	Design changes - ISO 9001:1994
VDA 6.1	Questions: 08.1 - 08.6
new:	Design changes and modifications are to be identified, documented, reviewed and released (ISO). Suppliers own design is included.
4.4.9.2	Design changes - review
VDA 6.1	Questions: 08.1 - 08.6
new:	Review effects of a design change on a system in which the product will be used, the customer assembly process, or other related products and systems.
4.5	Document and data control
4.5.1	General
VDA 6.1	Questions: 02.1; 10.1 - 10.5
new:	No change.
4.5.2	Document and data approval and issue
4.5.2	Document and data approval and issue - ISO 9001-1994
VDA 6.1	Questions: 10.1 - 10.5
new:	No change.
4.5.2.2	Design input
VDA 6.1	Questions: 10.2; 10.4
new:	No change.
4.5.3	Document and data changes
VDA 6.1	Questions: 10.1 - 10.4
new:	Changes to the documents and data shall be reviewed and approved by the same functions/organizations that performed the original review and approval (ISO).

**Comparison
ISO/TS 16949 (1999) to VDA 6.1 (1998)**

4.6	Purchasing
4.6.1	General
4.6.1.1	General - ISO 9001:1994
VDA 6.1 new:	Questions: 02.1; 11.1 No change.
4.6.1.2	Customer approved subcontractors
new:	Products, materials and services have to be purchased from approved subcontractors (e. g. in the customer drawing or in specifications), if contractually agreed upon. Other subcontractors can only be used if approved by the customer. The responsibility for quality remains with the supplier.
4.6.1.3	Governmental regulations
new:	Products and material used in the manufacture of product have to comply with the individual governmental regulations applicable to the country of manufacture and sale.
4.6.2	Evaluation of subcontractors
4.6.2.1	Evaluation of subcontractors - ISO 9001:1994
VDA 6.1 new:	Questions: 11.2; 11.4 No change.
4.6.2.2	Development of subcontractors
new:	Development shall be performed with the goal that the requirements of the standard or of an existing quality system requirements manual will be fulfilled. Note 1, audits at subcontractors as part of the development shall be performed by a 2 nd or 3 rd party, recognized by the customer.
4.6.2.3	Scheduling of deliveries
new:	The supplier shall require 100 % on-time delivery performance from subcontractors. This requires providing of appropriate planning information and purchase commitments. Implement a system to monitor delivery performance. Records of premium freight shall include both supplier and subcontractor paid charges.

**Comparison
ISO/TS 16949 (1999) to VDA 6.1 (1998)**

4.6.3	Purchasing data
VDA 6.1 new:	Questions: 11.1; 11.3; 11.5; 11.7 No change.
4.6.4	Verification of purchased products
4.6.4.1	Supplier verification at subcontractor premises
VDA 6.1 new:	Question: 11.6 Arrange for verification by the supplier of product at subcontractor site (ISO), if applicable.
4.6.4.2	Customer verification of subcontracted products
VDA 6.1 new:	Question: 11.1 No change.
4.7	Control of customer supplied products
4.7.1	Control of customer supplied products - ISO 9001:1994
VDA 6.1 new:	Questions: 12.1 - 12.4 According to note 1, customer-owned returnable packaging is to be included.
4.7.2	Customer owned tooling
new:	The ownership on customer-owned tools and equipment shall be clearly identified.
4.8	Product identification and traceability
VDA 6.1 new:	Questions: 11.7; 13.1; 13.6 No change.
4.9	Process control
4.9.1	General
4.9.1.1	General - ISO:1994
VDA 6.1 new:	Questions: 13.2 - 13.4; 14.1 - 14.7 No change.
4.9.1.2	Cleanliness of premises
VDA 6.1	Question: 14.6

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

new:	The premises shall be maintained in a state of order.
4.9.1.3	Contingency plans
new:	Contingency plans shall be prepared (e.g. utility interruptions, labor shortages, key equipment failure).
4.9.1.4	Designation of special characteristics
VDA 6.1	Questions: 02.5; 06.2
new:	Refer to 4.2.4.7.
4.9.1.4	Preventive maintenance
VDA 6.1	Questions: 13.4; 14.4
new:	No change.
4.9.2	Work instructions
VDA 6.1	Questions: 10.1; 10.2; 13.2; 15.1
new:	Detailed listing of possible content. (Refer to 4.2.3)
4.9.3	Process control in production
VDA 6.1	Questions: 14.1; 14.2; 14.3; 15.1
new:	No change.
4.9.4	Verification of job set-up
VDA 6.1	Questions: 13.3; 13.7; 14.2; 14.3; 15.2
new:	Use of statistical techniques, where applicable. Last-off part comparisons are recommended.
4.9.5	Appearance items
new:	For parts designated by the customer as "appearance items" the supplier shall provide: <ul style="list-style-type: none">- appropriate lighting for inspection area,- master parts,- qualification of personnel.
4.10	Inspection and testing
4.10.1	General
4.10.1.1	General - ISO 9001:1994
VDA 6.1	Questions: 02.1; 02.6; 15.1
new:	No change.

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

4.10.1.2	Acceptance criteria for attribute characteristics
VDA 6.1 new:	Questions: 11.3; 11.6; 15.1; 15.3 Acceptance criteria for attribute data sampling plan shall be zero defects. Appropriate acceptance criteria for other cases (master for reference purpose / visual inspection) shall be documented by the supplier.
4.10.2	Receiving inspection and testing
VDA 6.1 new:	Questions: 11.3; 11.6; 15.1; 15.3 No change.
4.10.2.4	Incoming product quality
new:	Methods to assess incoming product quality are specified. A visual inspection for transport damages and identification of products is not possible. The possibility of a customer waiver with regard to the listed methods was added.
4.10.3	In-process inspection and testing
VDA 6.1 new:	Question: 15.4 No change.
4.10.4.	Final inspection and testing
4.10.4.1	Final inspection and testing - ISO 9001:1994
VDA 6.1 new:	Questions: 13.4; 15.5 No change.
4.10.4.2	Periodic inspection and testing
VDA 6.1 new:	Question: 15.6 On all products, a functional test and layout inspection have to be performed. The frequency of the inspection and testing has to be outlined in the control plan by the supplier.
4.10.5	Inspection and test records
VDA 6.1 new:	QM-Element 15; Question: 20.1 The records have to indicate whether the product has passed the inspection or test and the inspection authority (ISO).
4.10.6	Laboratory requirements
VDA 6.1	Question: 15.1

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

new:	Internal laboratories have to fulfil the ISO/IEC 17025 requirements taking the scope of the accreditation into account. External laboratories have to be accredited to ISO/IEC 17025 (or national equivalent).
4.11	Control of inspection, measuring and test equipment
4.11.1	General
4.11.1.1	General - ISO 9001:1994
VDA 6.1	Questions: 02.1; 16.1; 16.3
new:	No change
4.11.1.2	Measuring system analysis
VDA 6.1	Question: 16.4
new:	The requirement is valid for any type of measurement equipment or system which is listed on the control plan. A note with regard to good knowledge of the measuring system etc. was added.
4.11.2	Control procedure
VDA 6.1	Questions: 16.1; 16.2; 16.3; 16.5
new:	No change.
4.11.3	Records
VDA 6.1	Questions: 13.2; 16.1; 20.1
new:	Records of employee and customer owned inspection, measuring and test equipment were added. The records shall include: <ul style="list-style-type: none">- all measured values,- statement of conformance to specification after calibration.
4.12	Inspection and test status
VDA 6.1	Questions: 13.1; 13.4; 17.1
new:	No change.
4.13	Control of nonconforming products
4.13.1	General
4.13.1.1	General - ISO 9001:1994
VDA 6.1	Questions: 02.1; 17.1; 19.4

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

new:	No change.
4.13.1.2	Suspect material or product
VDA 6.1	Question: 17.1
new:	Defect and suspect products / materials and the restricted area for those items have to be identified / marked.
4.13.1.3	Corrective action plan
VDA 6.1	Questions: 17.1; 18.1; 19.4
new:	No change.
4.13.2	Review and disposition of nonconforming products
VDA 6.1	Questions: 15.2; 17.1
new:	No change.
4.13.3	Control of reworked product
VDA 6.1	Question: 17.3
new:	No change.
4.13.4	Engineering Approved Product Authorisation
VDA 6.1	Question: 17.2
new:	The request for customer authorization is also valid for product purchased from subcontractors. Deliveries shall be identified / marked accordingly. Compliance is to be ensured with original or superseding specifications and requirements when the authorization expires.
4.14	Corrective and preventive action
4.14.1	General
4.14.1.1	General - ISO 9001:1994
VDA 6.1	Questions: 02.1; 18.1 - 18.4
new:	No change.
4.14.1.2	Problem solving methods
VDA 6.1	Questions: 17.4; 18.1; 18.2; 18.4
new:	For external nonconformities, the supplier shall respond in a manner acceptable to the customer.
4.14.1.3	Mistake proofing
VDA 6.1	Questions: 18.1; 18.2

**Comparison
ISO/TS 16949 (1999) to VDA 6.1 (1998)**

new:	No change.
4.14.2	Corrective action
4.14.2.1	Corrective action - ISO 9001:1994
VDA 6.1	Questions: 17.4; 18.1; 18.4; 21.3
new:	No change.
4.14.2.2	Corrective action impact
new:	The supplier shall apply the corrective actions taken, and controls implemented to eliminate the cause of a nonconformity, to other similar products or processes.
4.14.2.3	Returned product test / analysis
VDA 6.1	Questions: 17.1; 17.4; 18.3; 18.4
new:	The time for the analysis (including identification of cause, corrective action and control of effectivity) shall be minimized.
4.14.3	Preventive action
VDA 6.1	Questions: 18.2; 18.3; 18.4
new:	No change Refer also to 4.1.3.1.
4.15	Handling, storage, packaging, preservation and delivery
4.15.1	General
VDA 6.1	Questions: 02.1; 19.1
new:	No change.
4.15.2	Handling
VDA 6.1	Questions: 19.1; 19.3
new:	No change.
4.15.3	Storage
4.15.3.1	Storage - ISO 9001:1994
VDA 6.1	Questions: 19.1; 19.3; 19.5
new:	No change.
4.15.3.2	Stock
VDA 6.1	Questions: 13.6; 19.1

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

new:	Inventory turnover times are to be optimized (e.g. by first-in/first-out). Products which are outdated or of old status are to be treated as nonconforming products.
4.15.4	Packaging
4.15.4.1	Packaging - ISO 9001:1994
VDA 6.1 new:	Question: 19.2 No change.
4.15.4.2	Packaging requirements of the customer
VDA 6.1 new:	Question: 19.2 No change.
4.15.4.3	Identification
VDA 6.1 new:	Questions: 19.2; 19.5 No change.
4.15.5	Preservation
VDA 6.1 new:	Questions: 19.1; 19.2; 19.3 No change.
4.15.6	Delivery
4.15.6.1	Delivery - ISO 9001:1994
VDA 6.1 new:	Questions: 19.3; 19.4; 19.5 No change.
4.15.6.2	Supplier delivery performance monitoring
VDA 6.1 new:	Question: 19.6 The supplier shall develop, evaluate and monitor adherence to lead time requirements. Records are to be maintained on supplier responsible premium freight. The supplier shall adhere to customer specified transportation mode, routings and containers.
4.15.6.3	Production scheduling
new:	The supplier shall schedule and control production in accordance with customer requirements.
4.15.6.4	Electronic communication

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

new: A computerized system or another procedure outlined by the customer shall be implemented.

4.15.6.5 Shipment notification system

VDA 6.1 Question: 19.6

new: A computerized system or another procedure outlined by the customer shall be implemented.
A back-up method shall be available in case the online-system fails.

4.16 Control of quality records

4.16.1 Control of quality records - ISO 9001:1994

VDA 6.1 Questions: 06.2; 20.1 - 20.4

new: No change

4.16.2 Records retention

VDA 6.1 Questions: 06.2; 20.1 - 20.4

new: To meet the governmental and customer requirements retention periods are to be outlined.

4.17 Internal quality audits

4.17.1 Internal quality audits - ISO 9001:1994

VDA 6.1 Questions: 02.1; 03.1 - 03.4

new: No change.

4.17.2 Internal quality audits - supplement

4.17.2.1 General

new: When internal / external nonconformances or customer complaints occur, frequency shall be appropriately increased.
For each function, activity or process to be audited, a specific checklist is to be used.

4.17.2.2 System audit

VDA 6.1 Questions: 03.2

new: All shifts have to be audited.
The fulfilment of the requirements of the standard as well as of additional system requirements has to be verified.

4.17.2.3 Process audit

VDA 6.1 Question: 03.4

Comparison ISO/TS 16949 (1999) to VDA 6.1 (1998)

new:	The product realization process and the production processes are to be audited.
4.17.2.4	Product audit
VDA 6.1	Question: 03.4
new:	The supplier shall conduct product audits at suitable phases in the production and the delivery process in appropriate frequencies. It shall verify the conformance to specified requirements (e.g. dimensions, packaging and labelling).
4.17.3	Qualification of auditors
VDA 6.1	Questions: 03.1; 04.5
new:	The customer requirements with regard to the qualification of internal auditors for system and process audits have to be fulfilled.
4.18	Training
4.18.1	Training - ISO 9001:1994
VDA 6.1	Question: 04.1
new:	Note 1 stresses that this requirement is valid for all members of the suppliers organization.
4.18.2	Training effectiveness
new:	The effectiveness of training shall be periodically reviewed. Customer specific requirements shall be given special attention.
4.18.3	Work instruction/training
VDA 6.1	Questions: 04.4; 04.5
new:	Personnel performing activities affecting quality have to be informed about effects of failure for the customer if quality standards are not met.
4.19	Servicing
4.19.1	Servicing - ISO 9001:1994
VDA 6.1	Questions: 02.1; 21.5
new:	No change.
4.19.2	Feedback of information from service
VDA 6.1	Questions: 21.3; 21.4
new:	No change.

4.19.3 Service - agreement with customer

VDA 6.1 Question: 21.4
new: In case of agreement with customer, service effectiveness has to be verified for:

- service centers,
- use of special tools,
- training of service personnel.

4. 20 Statistical Techniques

4. 20.1 Identification of need

VDA 6.1 Questions: 22.1 - 22.6
new: No change.

4. 20.2 Procedures

VDA 6.1 Question: 22.1
new: No change.

4. 20.3 Selection of statistical tools

VDA 6.1 Questions: 22.1 - 22.6
new: As part of the quality planning activities, appropriate statistical tools shall be defined for each process and documented in the control plan.

4. 20.4 Knowledge of basic statistical concepts

new: Basic concepts such as variation, control (stability), capability and overadjustment shall be understood throughout the suppliers organization as appropriate.