

## Training overview

ID	Training	Information
442	FMEA – Basic Training according to AIAG & VDA FMEA	<p><b>Target audience</b> Newcomers and users of the methods from product and process development, testing, logistics, manufacturing, test planning, maintenance and quality.</p> <p><b>Cost and duration</b> 2,800 RMB/person (incl. VAT) 2 days plus 90 min. webinar</p>
806	FMEA Basic Training Basing on the new AIAG & VDA FMEA (Tailor Made for China)	<p><b>Target audience</b> Beginners who need a preliminary understanding of the new FMEA methods and requirements. They can be FMEA participants from departments, such as R &amp; D, product and process development, project management, test / laboratory, quality department, supplier management, production, logistics, equipment and maintenance, etc.</p> <p><b>Cost and duration</b> 3,280 RMB/person/2 days (incl. VAT)</p>
807	PFMEA Training Basing on the new AIAG & VDA FMEA	<p><b>Target audience</b> Trainees who need master the PFMEA method and are going to lead/create PFMEA during work. They can be FMEA participates from departments, such as process development, production management, equipment management, process quality, supplier quality management, auditors, quality system, product development, logistics and purchasing, etc.</p> <p><b>Cost and duration</b> 2,800 RMB/person/2 days (incl. VAT)</p>
810	DFMEA Training Basing on the new AIAG & VDA FMEA	<p><b>Target audience</b> Trainees who need master the DFMEA method and are going to lead/create DFMEA during work. They can be FMEA participates from departments, such as R&amp;D, product development, supplier quality management, auditors, quality system, project management, process development, production management, equipment management, process quality, logistics and purchasing, etc.</p> <p><b>Cost and duration</b> 2,800 RMB/person/2 days (incl. VAT)</p>

**VDA QMC**

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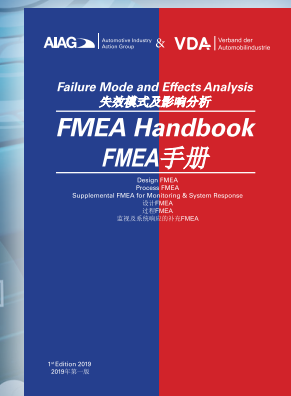


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Version: July 2024

# Failure Mode and Effects Analysis (FMEA)

English version



DRIVE WITH US INTO YOUR FUTURE!

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# Failure Mode and Effects Analysis (FMEA)

## Why FMEA is so important?

Failure Mode and Effects Analysis (FMEA) is an analytical methodology to ensure that potential problems have been considered and addressed, and improvement actions are defined to reduce risk for launching new products throughout the product and process development process. The product quality has to be assured through entire automotive supply chain.

Professional FMEA execution becomes more and more important due to following reasons:

- Increasing high number of recalls in China and worldwide
- Increasing complexity of products
- New technology and digitalization: NEV, Connected driving (ICV), autonomous driving and etc.
- Increasing importance of software and mechatronic
- Increased customer expectation
- Worldwide increasing of safety and new technology regulation
- Increasing complexity of global supply chain

Detecting a failure cause earlier in the development and manufacturing process will reduce the risk and cost for new product launch and assure front loading. Implementing FMEA earlier in the product development process helps identify product and process risks and reducing or even prevent their occurrence by taking suitable measures and actions.

## About the new AIAG & VDA FMEA

FMEA as the fundamental method in technical risk management is a team-oriented and systematic analytical method to identify risks in order to define mitigation measures.

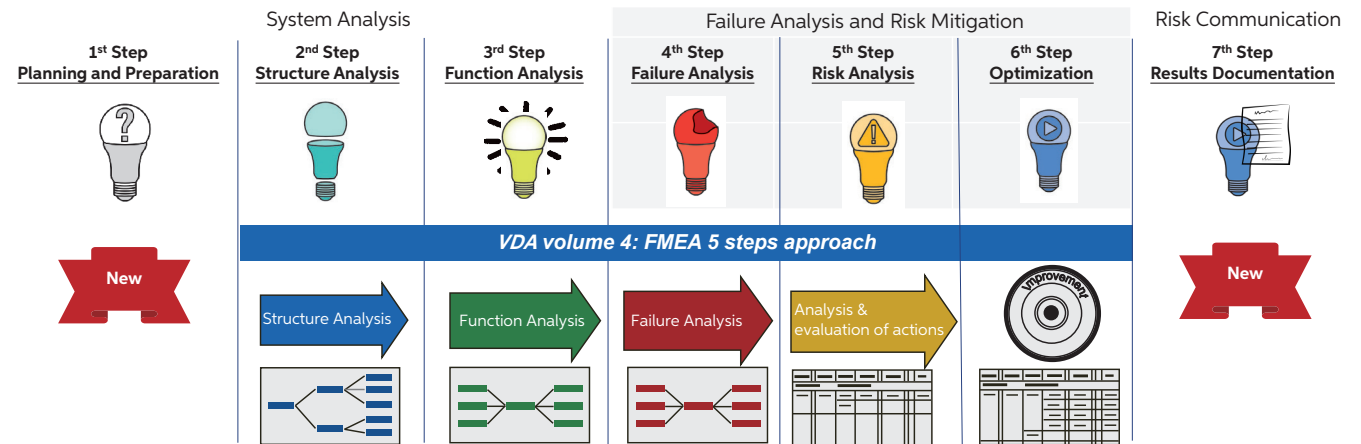
Major changes in new AIAG & VDA FMEA are as following:

- 7 steps approach
- Action Priority (AP) to replace Risk Priority Number (RPN)
- New Severity, Occurrence, Detection table
- Supplemental FMEA for Monitoring & System Response (FMEA-MSR)

7 steps v.s. 5 steps:

## New FMEA Highlights - 7 steps Approach

### New AIAG & VDA FMEA: 7 steps approach



6 steps to implement new FMEA methodology into your company

### Recommended steps for FMEA implementation

Step 1	<b>Training to get knowledge about new AIAG &amp; VDA FMEA standard</b> <ul style="list-style-type: none"> <li>■ Providing appropriate training for all parties that impact the development and support of FMEA:                             <ul style="list-style-type: none"> <li>✓ Multidisciplinary team</li> <li>✓ Practitioners</li> <li>✓ Managers</li> <li>✓ Auditors</li> </ul> </li> <li>■ Upcoming training course details to be found at: <a href="http://www.vda.china.com.cn/cn/index.php">http://www.vda.china.com.cn/cn/index.php</a> or call: 010-65900067</li> </ul>
Step 2	<b>Identify gaps</b> <ul style="list-style-type: none"> <li>■ Identify gaps in current FMEA development process and address them to meet the approach in the new handbook</li> <li>■ Define Action plan (get support by FMEA external experts)</li> </ul>
Step 3	<b>Implement pilot project</b> <ul style="list-style-type: none"> <li>■ For first FMEA get support by external FMEA coach</li> <li>■ Collect all failure data in database</li> <li>■ Make FMEA implement with support of software</li> </ul>
Step 4	<b>Implement FMEA into QMS development / PDP process (Product Development Process)</b> <ul style="list-style-type: none"> <li>■ First D-FMEA, 2nd P-FMEA, 3rd Input control plan, 4th Maintain FMEA by 8D and LL, 5th Lessons Learned Process for new projects</li> </ul>
Step 5	<b>Execution and performing new FMEA as defines in PDP (Product Development Process) and Lessons Learned</b>
Step 6	<b>Continuous Improvement (Lessons Learned and PDCA)</b> <ul style="list-style-type: none"> <li>■ Adopt a continuous improvement approach to make your FMEA a living document</li> <li>■ Maintain FMEA by 8D and FFA (collect all major failures and add them to FMEA) and install Lessons Learned Process for new projects</li> </ul>