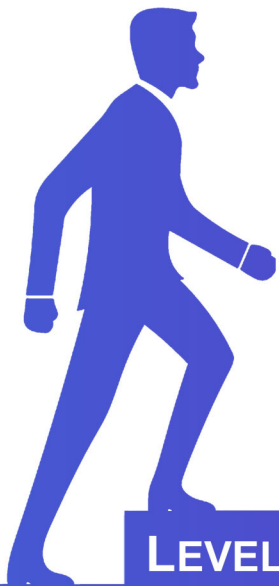


Quality Assurance maturity levels

Because there is a difference between „tested somehow” and quality



LEVEL 4

HOLISTIC PREVENTIVE QA

- All from L1 + L2 + L3
- Models to find hidden defects:
 - State Transition Testing
 - Fault Tree Analysis
 - FMEA
 - Data-flow testing
- Formal design↔analysis loops
- RCA of escaped defects

LEVEL 3

REDUCE RISKS

- All from L1 and L2, plus
- Test Classes (testing tests)
- Design feedback (TA+Arch)
- Environmental testing
- Fault Insertion testing
- Regression testing
- Integrity Levels

LEVEL 2

DESTRUCTIVE TESTING

- All from L1, plus
- BVT, EPs+DI
- Human Operator Error Tests
- Full Failure Mode Testing
- Stress & Load testing

LEVEL 1

VERIFICATION TESTING

- Prove SUT works with:
 - expected inputs
 - customer use-cases
 - industry standards
- Correct negative function:
 - correct error messages
 - no false positives
- Prove client compatibility

LEVEL 0

DEBUGGING

- Few ad-hoc tests
- No reproducibility
- "If ¬crash then OK"