

Table. Definitions on Debt and Smells Requirements in Software Development.

No.	Definition	Ref.
1	1Def: a Requirement Smell is an indicator of a quality violation which may lead to a defect with a specific location and a specific detection mechanism [A1]. 2Def: Bad Smells are concrete symptoms of quality defects in the requirements artifacts [A2] [A8]. 3Def: a Requirement (Bad) Smell is a concrete symptom of quality defect of a requirement artifact in the use context of a given activity [A3]. 4Def: a Requirement Smell refers to a quality violation in the requirements [A5]. 5Def: a Requirement Smell is an indicator of quality problems in the requirements documents [A6]. 6Def: Requirements Smells are indicators in the search for violations of common quality criteria based on language processing [A8]. 7Def: Requirements Smells are signs of imprecision or ambiguity in the requirements statement causing high refactoring costs [A8]. 8Def: a Requirement Smell refers to a quality violation in the requirements [A9].	A1, A2, A3, A5, A6, A8, A9
2	Based on the natural language criteria of ISO/IEC/IEEE 29148, a set of bad smells is defined, including: subjective language, ambiguous adverbs and adjectives, loopholes, open-ended, non-verifiable terms, superlatives, comparatives phrases, negative statements, vague pronouns and incomplete references.	A1, A2, A3, A5, A7, A8 A9, A23
3	Requirements Debt is the distance between the optimal requirements specification and the actual system implementation, under assumptions and domain constraints.	A4
4	The ISO/IEC 25010 standard presents the quality characteristics that non-functional software requirements must have: functional adequacy, performance efficiency, compatibility, usability, reliability, security, maintainability and portability.	A7
5	Bad smells in requirements are signs of inaccuracy or ambiguity in the requirements statement, causing a high cost of refactoring which has already advanced to a certain point.	A8
6	Bad smells are an alternative approach to identify symptoms of poor quality in user story writing.	A9
7	User stories have inherent deficiencies that compromise the quality of requirements, such as incompleteness and ambiguity.	A9, A22
8	Some sources of problems in the requirements are defined, including vagueness, language errors and some types of ambiguities: lexical, syntactic, semantic and pragmatic ambiguities.	A22, A25
9	The IEEE 830 standard suggests that in a high quality SRS document, data should be correct, complete, consistent, unambiguous, modifiable, traceable and classified according to their stability and importance.	A8, A28

Abbreviations: Number (No.), Studies that make the proposal (Ref.).