

SEMANTIC VERSIONING IN ONTOLOGIES

AASTHA MAHAJAN¹ & PARMINDER KAUR²

¹Research Student, Department of Computer Science & Engineering, Guru Nanak Dev University, Punjab, India

²Assistant Professor, Department of Computer Science & Engineering., Guru Nanak Dev University, Punjab, India

ABSTRACT

This paper gives you an idea concerning semantic versioning pertaining to semantically rich ontologies. As SemVer is being adopted worldwide for versioning different software systems, it makes dependency hell a thing of the past and solves two problems of version lock and version promiscuity. This paper reveals the importance of associating well defined semantics with the versioning schemes to make users, either providers or consumers of the software clear about the dependency/compatibility issues. In this paper, the importance of SemVer and different versioning schemes has been conversed. In the end, semantic versioning is applied to ontology based information system. Cooking domain ontology is created in protégé and new changes are induced, as a result, new versions are likely to form. The kind of changes made could be judged through SemVer scheme based on, which part of the scheme is changed, owing to the changes affecting the ontology consumers and providers. The most important thing is to declare the ontology as a public API in order to use semantic versioning otherwise associating meaning with the versioning scheme would be of no use.

KEYWORDS: API, Compatibility, Cooking, Dependency, Domain, Eclipse, Ontology, OSGi, Protégé, SemVer, Semantics, Versioning