Abstract

The existing SQL/JSON standard specifies the way how queries can be performed, but in order to reach the full functionality for data representation and as a sharing format, it needs to support several additional features. One of the most important missing features is the facility to perform updates on the content of JSON documents. In this article we discuss how update operations for JSON data have been implemented in relational database systems and compare these implementations in relation to their scope and coverage of our framework, which comprises the set of primitive update operations.

SQL Server uniformly supports all implemented operations with the JSON_MODIFY function, but the syntax of the second argument of the function is not uniform. The syntax for PostgreSQL update operations is rather awkward and the implementation is not uniform. On the other hand, PostgreSQL supports the full update operation in the same way as this paper proposes. MySQL implemented all update primitives specified in the framework.
References


6. MS SQL Server: JSON Data,

7. MS SQL Server JSON_MODIFY function.


12. PostgreSQL 9.5, JSON Functions ,


Index Terms

Computer Science

Databases
Keywords

JSON, SQL/JSON, JSON Update Framework, MySQL, PostgreSQL, SQL Server