

XQuery Update

Exercise 1a: XQuery Update

Use the example of the Flight reservation to perform the following operations:

1. Return the list of flights, but without the number of seats
2. Delete a passenger with a given name from the system.
3. Update the date of a given Reservation. Make sure (programmatically) that a flight exists at the new reservation date.
4. Insert a new Reservation. Perform validity checking, e.g., do the passenger, the flight exist, and if there are enough seats
5. Delete an airport. Ensure that all depending data objects (flights, reservations) are also deleted

Do not use schema validation when performing these operations. Perform the validity checking via an explicit query/function.

Exercise 1b:

Use the Micro XQuery Engine to run the queries (Saxon/Oxygen do not support XQuery Update).

The binary and source code version are available via <http://mxquery.org>.

To run your queries, download und unzip the binary version. Place your query into a file, e.g., sheet5_q1.xq. Then run the query using `java -jar mxquery.jar sheet5_q1.xq`.

As input use the helper files from exercise sheet 3.

Please note that updateable variables need to be defined using “declare persistent var \$varname“, e.g. `declare persistent var $airports := fn:doc(“...”)//airports`.

This is a limitation of our engine and will be fixed in a future version.