

# SQS (Škoda Quality System)

Information system for real-time monitoring and evaluation of the quality of manufactured cars

The SQS system is designed for real-time collection and evaluation of data related to the quality of manufactured cars.

In each car, several hundreds of points are monitored during the production process; each of the points may take several tens to hundreds of values, depending on its characteristic and on the type of failure.

Data are collected in real time, in control points distributed along the production lines. The data are scanned in the control points using an optical device from the car card and stored in the SQL database after processing. The reading and processing is performed in the production line cycles (1-3 min).

To cache data in case of main SQL server failure, the control point workplaces are equipped with local MS Access databases; the data are later replicated to the main SQL server.

The system uses the data per request to create a number of overviews and statistics. These are either immediate information on the status of car failures on specific production lines or long-term check back evaluations. All evaluations can be parameterized by the user and may be accessed by any company intranet user who is allowed to use this application.

The SQS system was the first intranet application in the history of Škoda-Auto.

<b>Purpose:</b>	<b>Custom solution for the production and quality departments of Škoda-Auto</b>
<b>Installation:</b>	Škoda-Auto ČR
<b>Types of users:</b>	Workers on new cars production lines Production supervisors Foremen Quality department employees
<b>Environment:</b>	Intranet, Client/Server
<b>Technology:</b>	Database: Oracle (main database - UNIX) MS Access (local databases in control points) Application server: Sybase EAS Clients: HTML, Visual Basic
<b>Number of users:</b>	60
<b>Main functions:</b>	Car card scanning using optical page readers Registration of repairs and their printing on the car card Evaluating of failure rate of individual work operations On-line distribution of information using an HTML application Possibility of function even if case of main SQL server failure
<b>Share in the project:</b>	One of several software solution suppliers, partial analysis, development, installation, maintenance, support.

