Semantic web technologies in EEG/ERP domain

The paper shortly describes EEG/ERP domain and the system for storage and management of data and metadata from EEG/ERP experiments. The system has been developed using common technologies and data structures (object oriented code, relational database). A registration of the system as a recognized data source requires representation of its data and metadata by semantic web resources. A short overview of differences between common data structures and semantic web representations is given and possible approaches to automated transformation of data and metadata from common data structures are mentioned. The existing semantic web frameworks and tools, widely tested for our purposes, are listed. Finally, the integration of selected tools and the software solution for automated transformation from the relational database to a semantic web representation is described.

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