Industry 4.0 implementations are generating a huge amount of data and events that need to be collected, filtered, managed, persisted as well as combined and analysed in a simple and affordable way. Therefore, having data available from the shop floor and being able to analyze them in order to create value is a top prerequisite of every system that aims to ride the wave of Industry 4.0 revolution.

**The project: OEDIPUS DIDA**

OEDIPUS project (Operate European Digital Industry with Products and Services) belongs to the Digital Industry Action Line of EIT Digital and is aimed to create innovative solutions and business opportunities for European players in the manufacturing industry. OEDIPUS project allowed ENGINEERING R&D department and CRF (FIAT Research Center) to jointly work towards the development of the DIDA (Digital Industry Data Analytics) Platform.

**The Need to improve business processes**

This Platform helps users to monitor and identify shop-floor incoming events (i.e. machine breakdowns or quality issues), while visualizing and supporting decision making (i.e. update maintenance plan).

The Platform offers capabilities to manage data from different sources by aggregating them and providing analytics and visualization services targeted to different purposes. Several applications can be developed on top of the Platform, such as production system monitoring, as well as product quality assessment, control and management.

The Platform follows the approaches defined in the platform paradigm Industry 4.0 (Platform 4.0) and in the reference architectural model RAMI 4.0. Furthermore, it exploits existing Open Source software components such as those available in the FIWARE ecosystem as well as those designed and managed directly by ENGINEERING, that is the Knowage Suite, able to provide Business Intelligence, Big Data analytics and visualization features.
How OEDIPUS DIDA platform uses Knowage

In the OEDIPUS DIDA Platform, Knowage is responsible for processing data in a FCA plant. The experimentation is based on data coming from various sensors from the shopfloor (e.g. from sensorized welding cells) that are stored and elaborated. Thanks to Knowage intuitive and dynamic interface, DIDA allows non-IT users such as analysts and managers to easily create analytics dashboards starting from these data, enabling and improving the decision-making process for the prevention of faults generation and propagation.

Key Benefits

“We already had a monitoring system in place enabling us to quickly spot obvious issues, but we wanted to go one step further into data analysis through advanced visualisation techniques and identify incoming events. The next step will be to integrate other predictive analytics strategies, and that is what we are working on right now.”

Julien Mascolo - CRF

Contacts

KNOWAGE LABS
knowage@eng.it

About KNOWAGE

Knowage is the full capabilities open source suite for any modern business analytics. OW2con’18 Best Project and MARKET AWARD2018 winner.

About OW2

OW2 is an independent industry consortium dedicated to developing open source code infrastructure and to fostering a vibrant community and business ecosystem. OW2 federates some one hundred organizations and 6000 IT Professionals in Europe, Asia and the Americas. OW2 hosts over one hundred technology Projects, including ASM, Bonita, Chameleon, CLIF, DocDoku, EasyBeans, Emerginov, Fractal, FusionDirectory, JOnAS, JORAM, JOTM, LemonLDAP:NG, Lutece, PetalsESB, Prelude, ProActive, SAT4J, SpagoBI, Tairn Studio, Telosys, WebLab, XWiki. Several of these projects are combined into market-driven Initiatives (e.g. Security, Accessibility) which facilitate their implementations into business solutions by systems integrators, OEMs and end-users. OW2 is an open source dissemination partner in a number of collaborative projects, such as CHOReVOLUTION, OCCware CROSSMINER and STAMP.