

SAP Forest Products, Paper and Packaging Forum

On the road to Industry 4.0:
Advanced Production Planning and integrated
Manufacturing Execution in a Packaging Plant

October 21-22, 2015

Congress Forum, Frankenthal, Germany



About LP:

- Founded in 1992
- Head office is based Zweibrücken, Germany
- Employees > 70
- Focus is on providing All-in-One Industry Solutions for the Print & Packaging Industry and Solution Components based on SAP Business Suite
- SAP MII based MES-Solution
- Predefined integration with pre-press, press & post-press management systems



LP

LP.Packaging & LP.Print Solution Portfolio



Value Proposition

- LP.Packaging & LP.Print are innovative ready-to-run business solutions for the print & packaging industry based on SAP™ Business Software
- The solutions implement industry Best Practices making optimum use of the leading SAP Standard Software.
- The solutions incorporate a pre-configured data model, business processes and domain specific add-ons (LP.Solution Components)

About Autexis:

- Service provider for automation, MES, IT and mobile solutions with 33 years experience
- We support you need-oriented with a high commitment and professional services from the initial idea to a secure go live and maintenance.
- Head office: Villmergen, Switzerland
- Employees: > 30 experts
- Long-term partnership with customers & suppliers

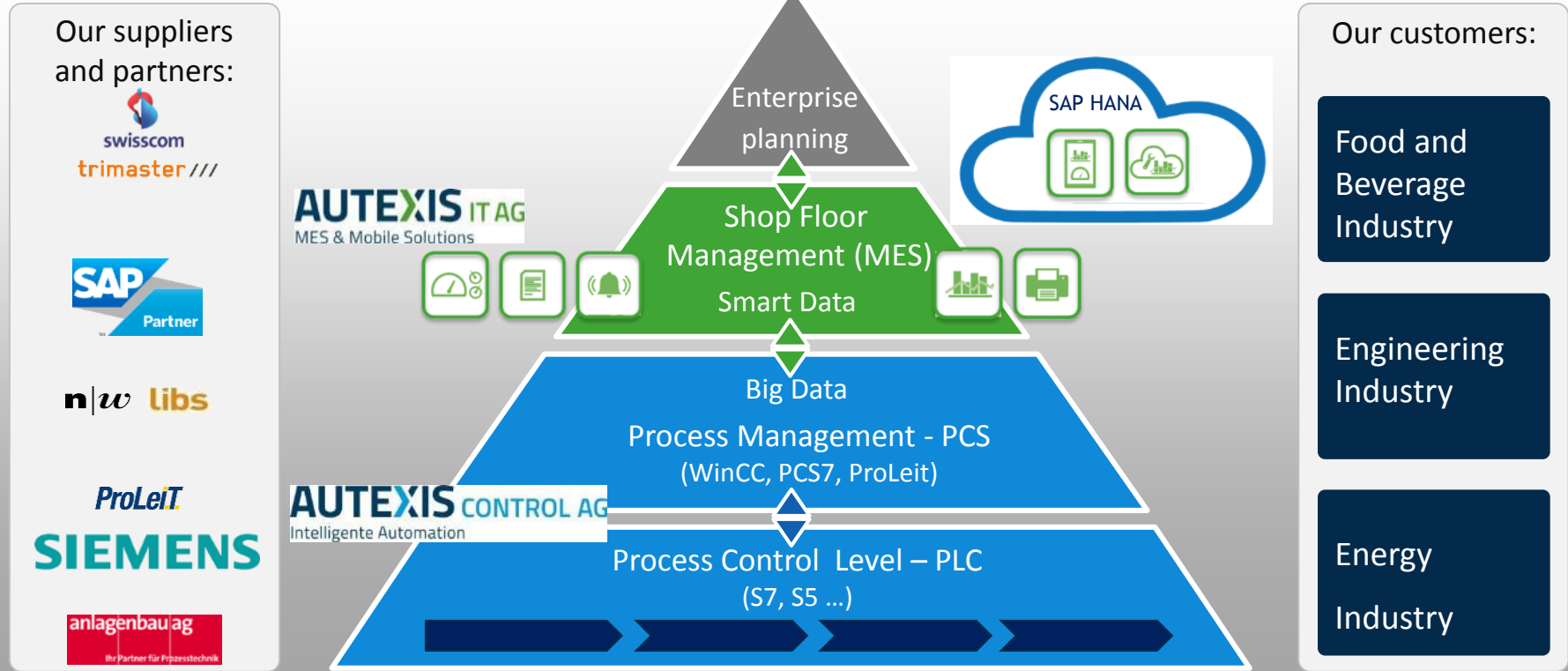
A group of people are seated around a table in a meeting room, looking at a large computer monitor. The monitor displays the Autexis logo. The background shows a window with blinds.

AUTEXIS

Added Value with Strategic Partnerships

Solutions for the process and discrete industries

AUTEXIS IT AG
MES & Mobile Solutions

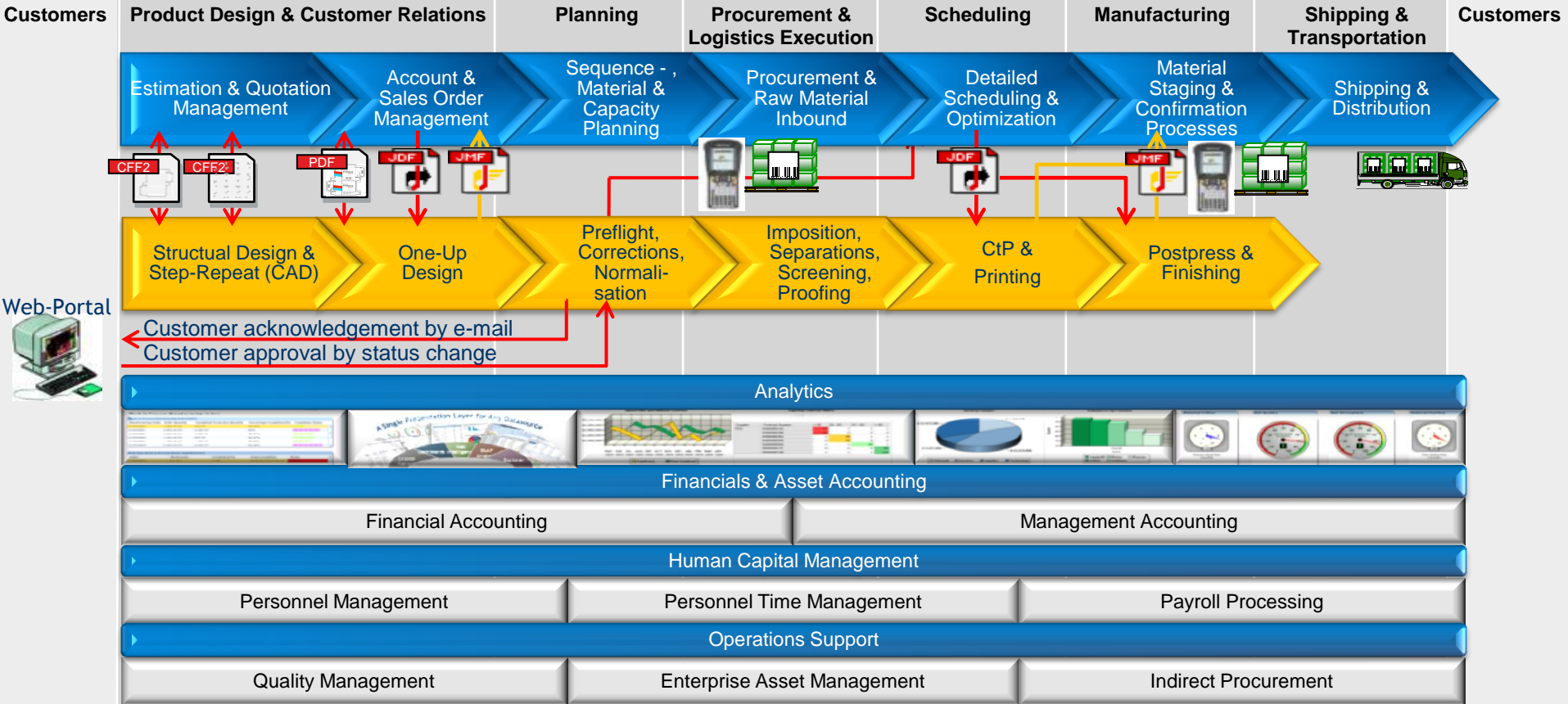


About Model Group:

- Establishment of a millboard factory in Ermatingen by Louis Model 1882
- Swiss family-owned operation with international reach
- 12 production sites, 8 pack shops, 3 co-pack & 4 sales offices in Europe
- Intelligent packaging solutions in cardboard and corrugated board backed up by a comprehensive service package



Business Process Overview & Project Focus Areas



LP.MES / Autexis Shop Floor Connectors: JDF & Sensors

Company Level

SAP ERP

IDocs RFC

LP.MES Cockpit



Production Control Level

SAP MII
LP.MES

Mobile KPI-Cockpit

DB
PCo-OPC



Process Control Level



Machine
Connectors

MI Dashboard

Automation Level



Sensors

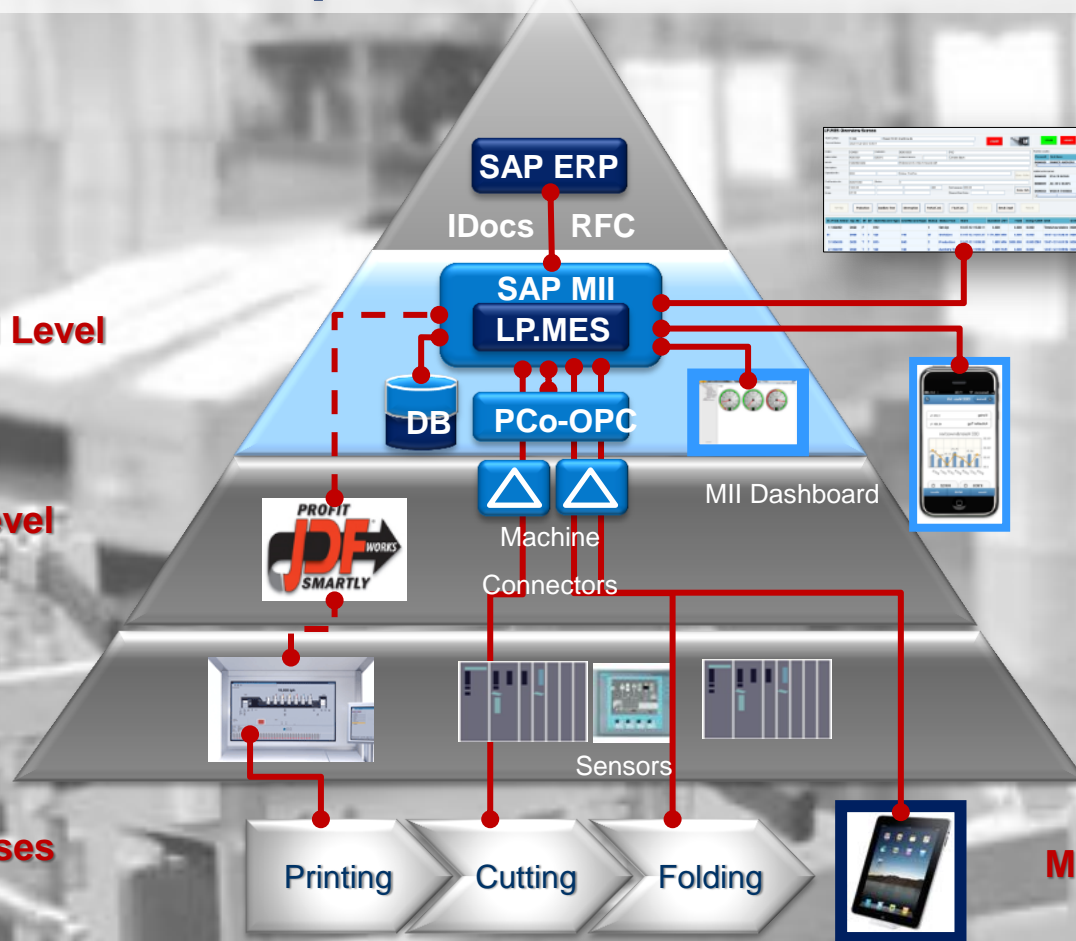
Production Processes

Printing

Cutting

Folding

Manual Data Collection



Project Location:
Model Group Plant Opava Czech Republic



Implementation Scope:

- Implementation of SAP Manufacturing & Intelligence with LP/Autexis Solution Components for Shop-Floor & Machine Integration
- Realtime Integration of Sheet Counters & Event based Time Confirmations
- Integration of RFC Scanners for Material Staging and consumption
- Plant Manager Dashboard & OEE-Reporting



Motivation for Implementation:

- Establish a basis for a smart factory
- Deeper integration of ERP with MES
- Move PP / DS closer to shop floor (real-time) to reduce lead time
- Eliminate paper-based workflow in shop floor
- Close the loop between shop floor & admin.
- Better analysis of shop floor data: where are we good, where do we need to improve



Implementation Facts:

- 10 weeks implementation time (Mai - July 2015)
- 105 days of internal effort from Model team
- Model team: ~5 persons (3 IT, 2 Business)
- 20 machines connected to SAP MII
- 120 workers working with the MES system
- more than 950 production orders / month running over MES



Next Steps:

- Roll out to other cardboard packaging plants
- Integration of SAP Plant Maintenance into MES
- Evaluation of deeper machine integration
- Integration of Automated Guided Vehicles control system



**Please contact us for more information
about the showcased solutions and
our service portfolio:**

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ATTENTION 😊**

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