



BLM GROUP

officially recognised by



MUMBAI • DELHI • KOLKATA • CHENNAI • BANGALORE

members of



MAKE IN INDIA
WITH ITALIAN
TECHNOLOGY



MAKE in INDIA with ITALY Trends In The Manufacturing Sector



BLM GROUP



UCIMU-SISTEMI PER PRODURRE



AUTOMATION & INDUSTRY 4.0

IN

TUBE PROCESSING



About BLM GROUP



BLM GROUP HEADQUARTERS
Cantù, Italy

BLM specializes in the design and production of CNC tube and wire bending and tube end-forming equipment.



ADIGE CAMPUS
Levico, Italy

ADIGE manufactures tube laser-cutting systems and cold sawing machines for tube and bars. The product range also includes wire brushing, measuring, washing and collection systems.



ADIGE-SYS produces combination Tube and sheet laser systems, large diameter capacity Lasertube And end-machining tubes and bars equipment.

BLM GROUP develops advanced integration & automation between tube processing technologies.



WHO WE ARE

BLM GROUP is a **family** owned company
founded in 1960

PRODUCTION MADE IN ITALY	EMPLOYEES	HEADQUARTER
MACHINE TOOLS FOR PROCESSING TUBE AND SHEET METAL	788	CANTÙ, COMO Italy



INDUSTRY 4.0 - BASIC PRINCIPLES

Interconnection — The ability of machines, devices, sensors, and people to connect and communicate with each other via the Internet of Things (IoT), or the Internet of People (IoP).

Information Transparency — Inter-connectivity results in data transparency and allows operators to collect immense amounts of data and information from all points in the manufacturing process, identify key areas that can benefit from improvements in decision making to increase functionality.

Technical Assistance — The technological capability of systems to gather and analyze huge quantity of data helps in decision-making, problem-solving and helps humans with difficult or unsafe tasks.

Decentralized Decisions — The ability of cyber physical systems to make decisions on their own and to perform their tasks as autonomously as possible. Only in the case of exceptions, interference, or conflicting goals, are tasks delegated to a higher level.



BASIC REQUIREMENT : INTERCONNECTIVITY



BLM machines satisfy this requirement.

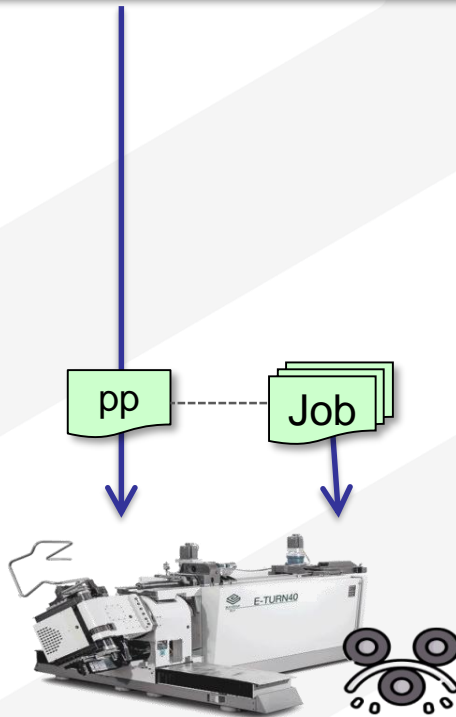


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VIRTUAL ENVIRONMENT TO REAL ENVIRONMENT CONNECTION



Programming and Simulation SW For Bending

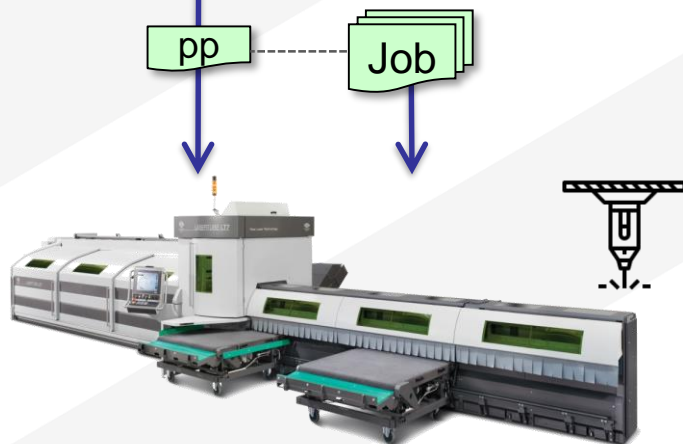


VGP3D – SALIENT FEATURES

- Offline and on machine
- Design a tube using drawing data
- Import a 3D drawing – automatic identification of the tube data (diameter, wall thickness, CLR etc)
- Visually check if the part is as per the drawing
- Automatic assignment of appropriate tool set
- Simulate the bending process and check the feasibility off-line, get raw tube length/cycle time estimate – useful for costing
- Feasibility can be checked on multiple machine models with overlapping capacities if you have those machines
- Once the simulation is satisfactory, save the program (locally or on the machine thru' LAN) alongwith all the set-up parameters
- Machine is ready to bend the parts with proper tooling and raw material
- Multipart lot size can be programmed



CAD/CAM For LaserTube



ARTUBE – SALIENT FEATURES

- Offline CAD/CAM parametric software
- Design a tubular component with all holes, slots, special end-cuts etc with few clicks
- Import a 3D drawing (IGES, STEP, X_T, IFC) of a single part or an assembly
- Automatic generation machine programs for each part
- Simulate the laser cutting process
- Get cycle time estimates and operating cost/piece information
- Machine programs can be generated for multiple machine models with overlapping capacities and sent to the machine
- Machine is ready to optimize nesting and cut the parts with proper raw material

ALL-IN-ONE (MACHINE TO MACHINE DIALOG)

All in One
easily managed **straight** and **bent** tubes



BLM ELEMENTS – BLM GROUP'S SOFTWARE SUITE



ARTUBE



LASERTUBE CUTTING

PART VIEWER



PROTUBE

PRODUCTION PLANNING &
REAL TIME MONITORING

VGP3D



TUBE BENDING

TOOLROOM

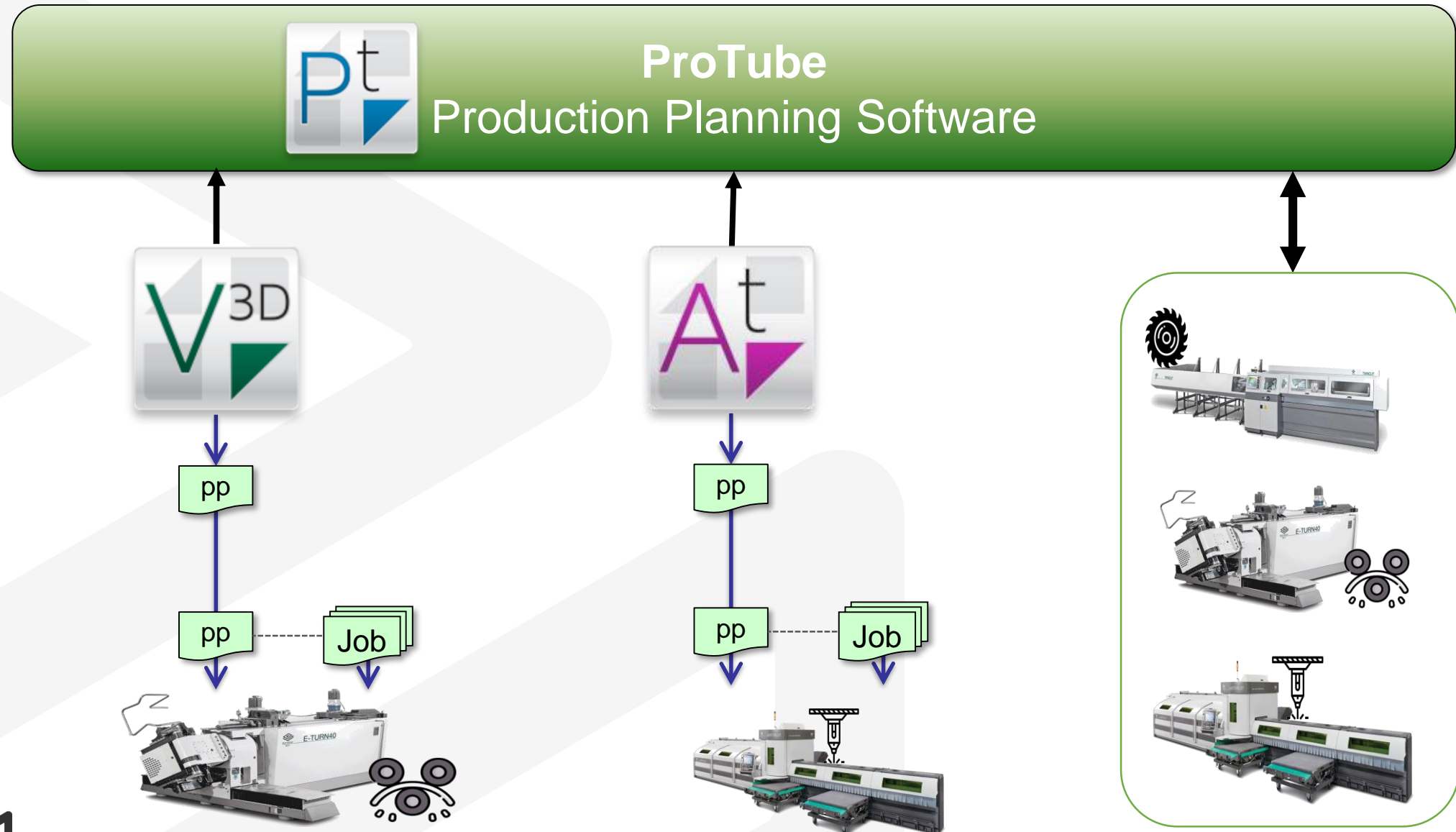


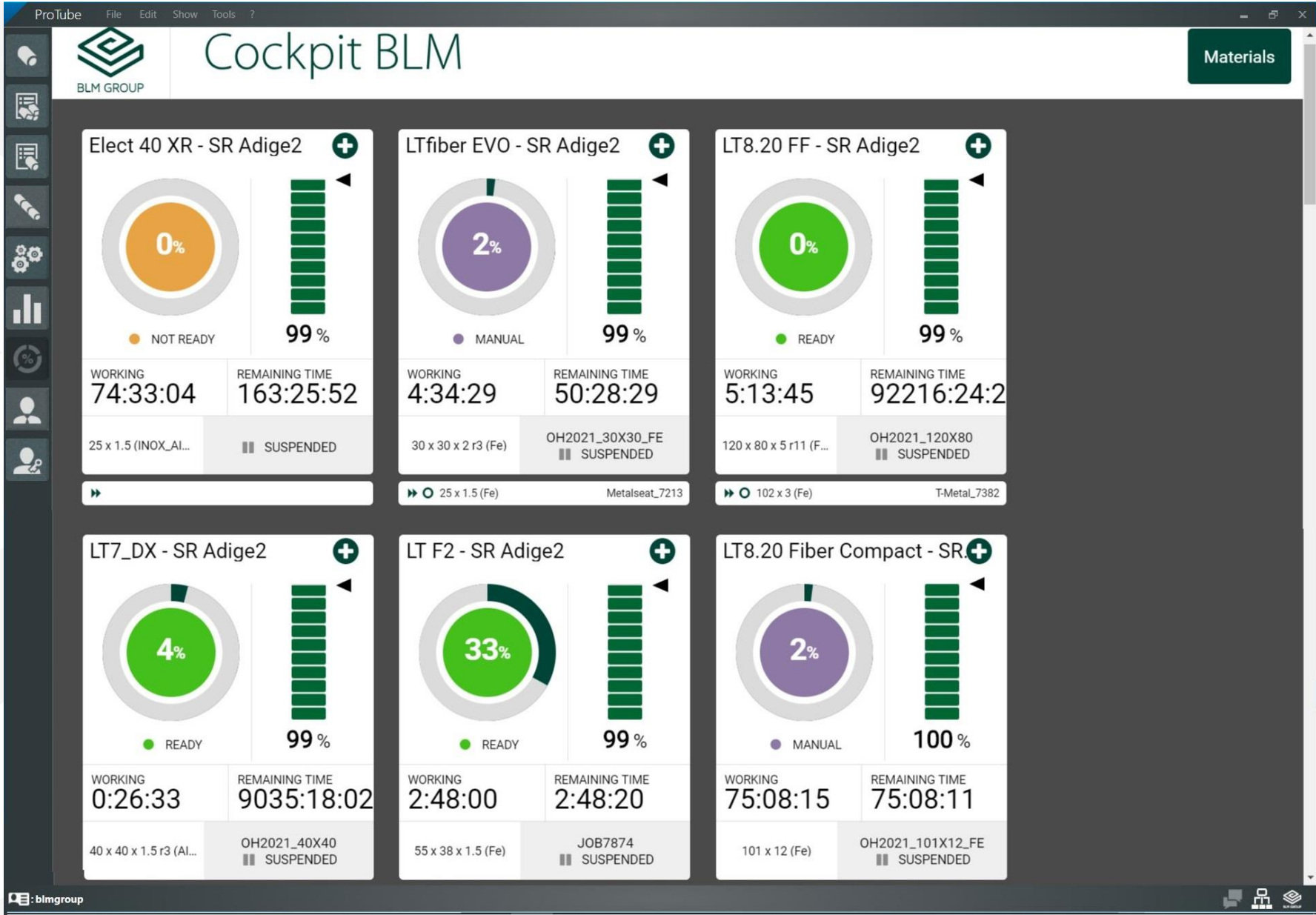
MACHINES



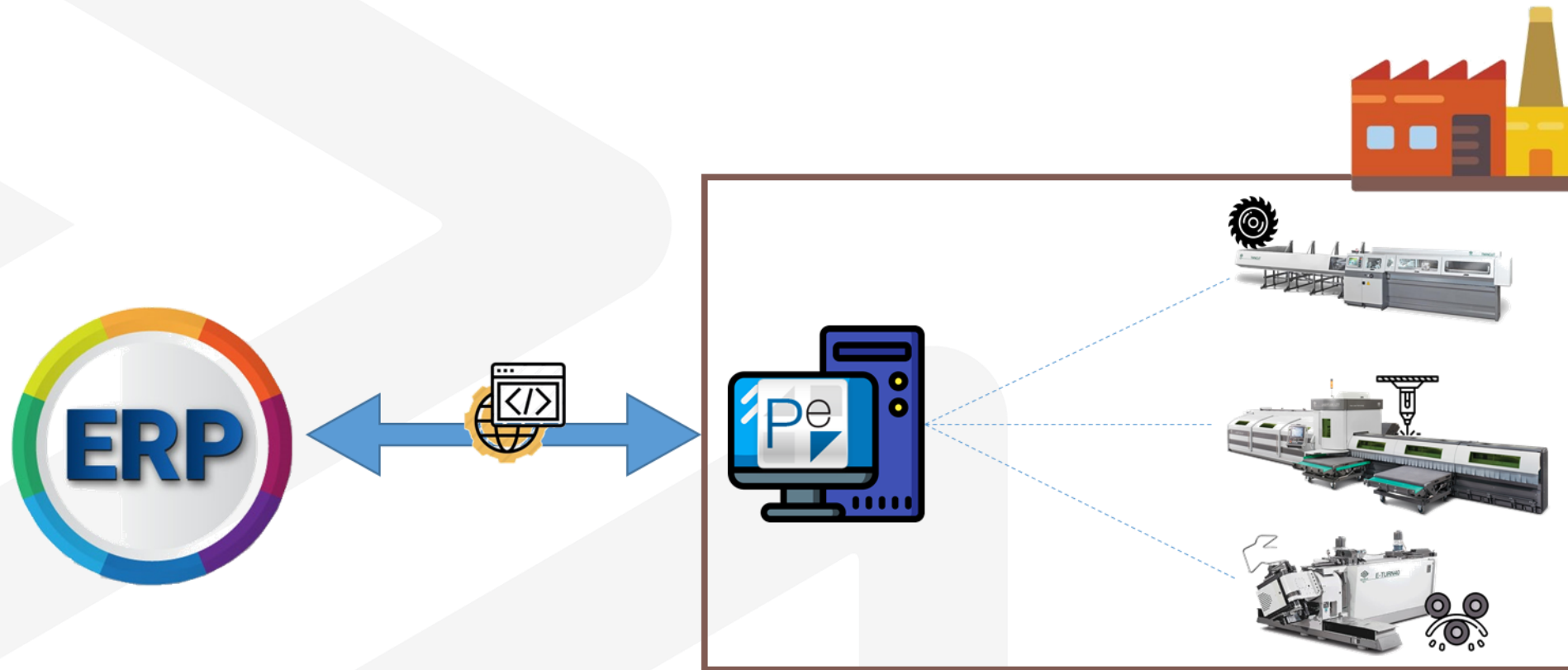
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Digital Bending



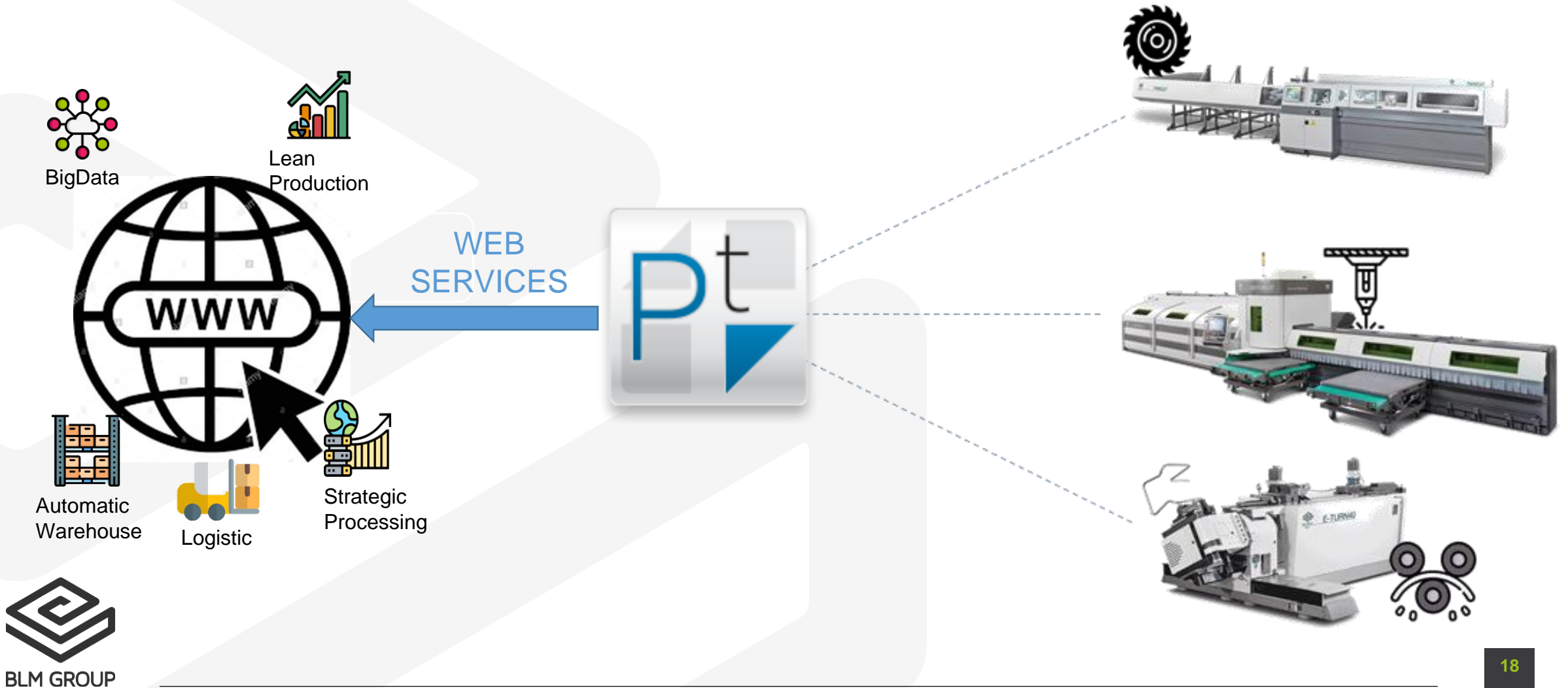


INTERFACING PROTUBE WITH CUSTOMER'S ERP



INDUSTRY4.0 APPLICATIONS

INFORMATION TRANSPARENCY AND FREE SHARING



Active Eye – Remote Technical Assistance



ACTIVE EYE

**AUGMENTED REALITY PLATFORM
FOR PROBLEM RESOLUTION AND SAVING TIME**



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*THANK YOU VERY MUCH FOR
YOUR TIME AND ATTENTION !*

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