

## COMPONENT DOSING SYSTEM

**MULTIPUMP**

FULLY AUTOMATED CHEMICAL DOSING OPERATIONS



MULTIPUMP® is a component dosing system for fully automated chemical dosing operations. With the Multipump® dosing system, each chemical component of the glue mixture has its own dosing line, consisting of a motorized dosing pump, flow meter, and intermediate storage tank. This ensures precise and efficient dosing for optimal glue mixture consistency.

The most evident advantage of this dosing configuration is that of being able to change the chemical composition of the glue mixture on line during production and to see the immediate effect on production, enabling quality issues (e.g. board with low IB) or production issues (blistered boards) to be solved almost instantly. With the traditional batch system on the other hand, you have to wait until all the glue mixture has been consumed before the results of the changes made to the chemical formula of the mixture become evident. With today's market requirements, more and more mills are producing "just in time" board lots and consequently need to be able to change production parameters easily and smoothly. At each production changeover, the Multipump® dosing system promptly adapts the chemical formulas of the glue mixture to the various productions, sending just the right amount of chemical components to the blender for that particular production. The batch system does not have such a prompt reaction at a production changeover because the mixture for the previous production has to be used up completely before the new chemical composition can go into the process, or before you are able to see the effects of the change, often wasting glue or creating problems with quality/production. The Multipump® system may be equipped with IMAL volumetric flow meters or with mass or magnetic flow meters.

**BEST IN CLASS FOR:**

WOOD BASED PANELS:

MDF/HDF

PB/SPB

OSB/LSB/FOSB

The main advantage of the Imal volumetric flow meters is that once calibrated during start-up, they don't require recalibration for the rest of their mechanical life. Flow rates can also be inspected visually through a graduated transparent vessel as it fills and empties in alternating cycles. The Imal volumetric flow meter consists of a vessel connected to the pump suction and storage tank. For mass or magnetic flow meters, we've designed a system to check calibration at least once a month without stopping production. This system uses a transparent graduated vessel connected to the hydraulic circuit. To verify the flow rate, a valve diverts the dosing pump suction to the graduated vessel, where a stopwatch measures the flow rate, which can then be compared with the electronic flow meter reading. Each Multipump® dosing unit is fully assembled and tested for electrical and hydraulic systems before shipment, ensuring quick and easy installation.



## MAIN FEATURES

- To change the chemical composition of the glue mixture on line during production
- The system may be equipped with IMAL volumetric flow meters or mass or magnetic flow meters
- Each dosing unit is fully assembled and the electrics and hydraulics are workshop tested prior to shipment
- It is very quick and easy to install.

