

**NEWS RELEASE**

[Witt-NR-13-2011_TEMPRO-plus-D-Micro]

September 7th, 2011

TEMPRO plus D Micro:
The most compact dual zone temperature controller
on the market

WITTMANN is presenting at this year's FAKUMA show from October 18th to 22nd (hall B1, booth 1204) the compact and highly effective TEMPRO plus D Micro dual zone temperature controller, developed for use with molds up to 600 kg and micro injection molding.



TEMPRO plus D Micro

WITTMANN has developed the new TEMPRO plus D Micro temperature controller in close collaboration with the constructing engineers of the WITTMANN BATTENFELD *MicroPower* injection molding machines. This new development is based upon the already proven technology of the TEMPRO plus D. It is widening the product range towards smaller injection molding machines, but also is suitable for molds weighing up to 600 kg. This is made possible through the unit's dual zone construction, in which the heating capacity of 6,000 W – in combination with a maximum pump capacity of 30 lit./min and 5 bar (max.) – are carrying out the best possible heat transfer. The TEMPRO plus D Micro features low dimensions of 584 × 265 × 607 mm (H × W × D) that allow for direct installation in the inside bottom of the *MicroPower* injection molding machine. This integration into the machine saves valuable floor space and reduces the overall footprint of the system.

Also with regard to its handling, the TEMPRO plus D Micro can be fully integrated into the *MicroPower* injection molding machine. Using an Ethernet port, the TEMPRO user interface can be completely mirrored on the machine's control panel. There, the setting and adjusting of the process parameters can be executed, as well as the presentation of the complete course of the process over any predefined time period. WITTMANN is offering the TEMPRO plus D Micro in three different designs, for process temperatures of up to 100 °C, 140 °C and 160 °C, the latter with a maintenance-free magnetically coupled pump. For the first time, WITTMANN thus is altering the tradition of offering 90 °C units, breaking new ground with a pressurized and pressure controlled version for 100 °C. For this 100 °C version – as well as for the 140 °C and 160 °C units – the system pressure is first measured, and then controlled above the saturation pressure that is subject to the water temperature. This approach guarantees the cavitation-free operation of the pump, thus contributing to a longer life cycle. The closed construction is leading to unlimited mold-discharging volume, because the mold water is not delivered into the heat exchanger, but into the return line.

The very small entire volume constitutes a further essential aspect of the TEMPRO plus D Micro: due to the unit's overall size, the volume was reduced to only 1 liter! The WITTMANN flow technology engineers managed to fully optimize the control of such a small volume. After having executed numerous elaborate tests, and after having developed a special vibration damper, the predefined control accuracy of ± 0.2 °C was realized – even at water temperatures of 160 °C and flow rates of 5 lit./min. One more advantage: due to the small water volume that the temperature controller has to hold, the molds can be heated up and cooled down very quickly, because there is no need to heat/cool unnecessary masses. Through indirect cooling that is done by a cooling coil, the TEMPRO plus D Micro reaches cooling capacities that are matching the values of common size models! Beyond that, the integrated standard direct cooling that can be switched on additionally is exponentially increasing the cooling capacity, thus much more rapidly cooling down the mold when a mold-change is impending. Serial interface and flow measurement are optionally available, perfecting the TEMPRO's technical profile and guaranteeing highest process security – using a minimum of space.

WITTMANN worldwide is one of the leading manufacturers of robots and peripheral equipment for the plastics industry. The WITTMANN group with Headquarters in Vienna/Austria is a worldwide operating company with 7 production facilities and 20 branch offices in all major plastics markets in the world. WITTMANN's product range includes robots and automation systems, automatic material handling with dryers and plastic recycling, temperature controllers and chillers for machine tools and volumetric and gravimetric blenders.

With this comprehensive range of peripheral equipment, WITTMANN can provide processors of plastics with total solutions which cover all their requirements, ranging from autonomous work cells with single zone temperature controllers, screenless granulators, sprue pickers, integrated vacuum loading systems and integrated cross-linked control systems with integrated material loading and dryers to automated robotic systems for flexible finishing of semi-finished injection molded parts.

On April 1, 2008 WITTMANN has taken over the BATTENFELD Kunststoffmaschinen GmbH at Kottlingbrunn (Lower Austria). The market for auxiliary equipment on one hand and for injection molding machines by BATTENFELD on the other will continue to grow independently. However, the syndication will of course lead to the completion of both product lines, providing the advantage plastics processors have been looking for in terms of a seamless combination of processing machines, automation and auxiliary equipment – all occurring at a progressive rate.

Contact:

WITTMANN Robot Systeme GmbH
Am Gewerbepark 1-3
64823 Gross-Umstadt
GERMANY
Tel.: +49-6078 93 39-0
Fax: +49-6078 93 39-40
info.de@wittmann-group.com
www.wittmann-group.com



Friedrichshafen – October 18–22, 2011
WITTMANN at the FAKUMA: hall B1, booth 1204