

Press Release 24/2009

Servo-motor pump drive outperforms "fully electric" machines

MORE ECONOMICAL. QUIETER. FASTER. MORE PRECISE. These basic statements best describe the new BOY "E" series. Equipped with a servo-motor pump drive, these injection moulding machines set new standards for profitability, precision, and quietness in operation.

A comparison of drive concepts reveals that the new servo-motor pump drive technology is in many ways one step ahead of the competitors.

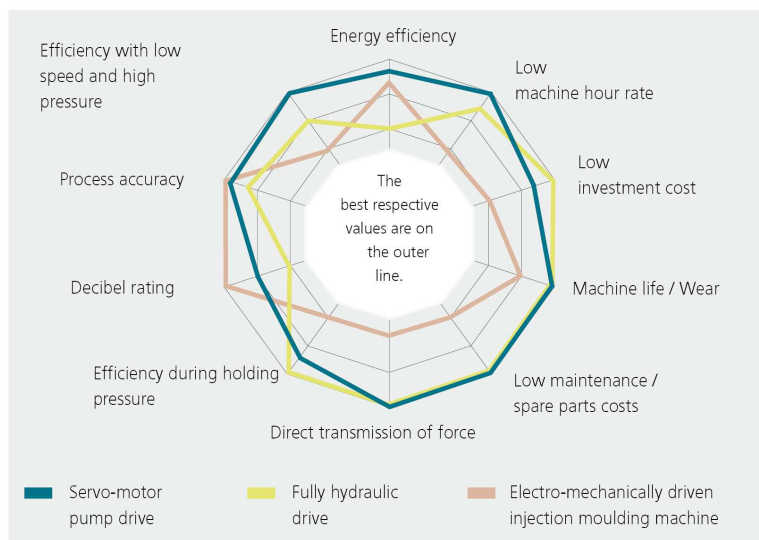


Illustration "Web Diagram"

The advantages when compared to "fully electric" machines are:

- Optimum control of pressures and forces

- Less mechanical wear and reduced spare parts cost
- Lower investment and operating costs
- Optimum operation and information.

A comparative study also reveals the economic advantages of BOY's new drive technology and how much potential savings can be achieved. This study compared the BOY 55 E and BOY 90 E injection moulding machines with their direct counterparts (also with hydraulic drive system). The comparative cost study included the cost savings related to required space, and revealed that a substantial savings for electricity and cooling energy was achieved. As an example, a BOY 90 E with 7,400 operating hours/year will save as much as € 7.500,00 or more. The BOY 55 E with the same amount of operating hours will reduce the operator's costs per year by more than € 5.000,00.

HIGHLY INNOVATIVE AND PRECISE - THE NEW „E“ SERIES BY BOY

50 % more economic, 20 % quieter, 10 % faster

By using a servo-motor pump drive, energy requirement as well as machine-related cooling capacity needed are reduced by half. Combined with the compact design, reliability, and ease of maintenance this entails lowest possible operating costs and very low machine hour rates.

The new drive technology by BOY, a machine manufacturing company based in Neustadt-Fernthal and managed by its owners, tops even electro-mechanically driven machines.

With the injection moulding machines BOY 55 E and BOY 90 E, you can significantly reduce your costs each year.



BOY has conducted a variety of energy measurements. The annual saving is most obvious when older machines from competitors are exchanged for new machines from the BOY „E“ series. Thus, energy savings of up to 70 % can be achieved. Concrete figures may be taken from the following, comparative calculations.

But even compared to new machines, the time until amortization turns out to be very brief. BOY will gladly provide you with the corresponding, comparative calculations.

Profitability study BOY 55 E

Comparison with competitor's machine

Electricity costs:	
For 7,400 operating hours x 5.97 kWh saving x 0.10 €/kWh the annual saving is	EUR 4,417.80
Cooling:	
Comparative measurements resulted in a saving of 2 kWh, which corresponds to a power of 0.58 kWh/h x 0.10 €/kWh	EUR 429.20
Cost for space:	
The required floor space is 3.59 m ² ; double the space of the saving (2 x 1.3 m ²) was calculated with an annual rent of € 60/m ²	EUR 156
Annual saving	EUR 5,003

Profitability study BOY 90 E

Comparison with competitor's machine

Electricity costs:	
For 7,400 operating hours x 9.05 kWh saving x 0.10 €/kWh the annual saving is	EUR 6,697
Cooling:	
Comparative measurements resulted in a saving of 3 kWh, which corresponds to a power of 0.87 kWh/h x 0.10 €/kWh	EUR 643.80
Cost for space:	
The required floor space is 4.52 m ² ; double the space of the saving (2 x 1.5 m ²) was calculated with an annual rent of € 60/m ²	EUR 180
Annual saving	EUR 7,520.80

Both calculations are based on a direct comparison with two hydraulically driven injection moulding machines and are proof of the financial advantages of BOY's modern drive technology.



Klaus Geimer,
Director of Sales and
Marketing
Dr. Boy GmbH & Co. KG

"The new BOY 55 E and BOY 90 E are our top products. The fact that they are superior to comparable competitors' machines is mainly due to their equipment with a servo-motor pump drive. We succeeded", says Klaus Geimer, "in achieving or even surpassing the positive features of electro-mechanical machines without, however, acquiring their disadvantages."

Once more, we have proven our guiding part and innovative strength regarding energy saving technology, achieving yet another leading break-through.

Put us to the test! We will be happy to carry out energy measurements at your premises, without obligation to you.

Our showroom, which is favourably situated with regard to transport facilities, is also available to you for mould tests and / or comparative tests any time, even at short notice."