

## INLINE VISCOMETER FOR EXTRUSION



### TYPICAL APPLICATION FIELDS

Plastics, polymers, elastomers

PE, PP, PS, PC, PET, PVC, PA...

Food

Extrusion, injection

Recycling, Compounding

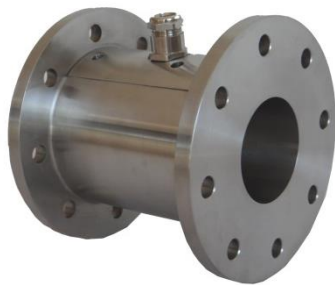


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### THE FIRST INLINE VISCOMETER TO BE INSERTED DIRECTLY IN THE EXTRUDER STREAM

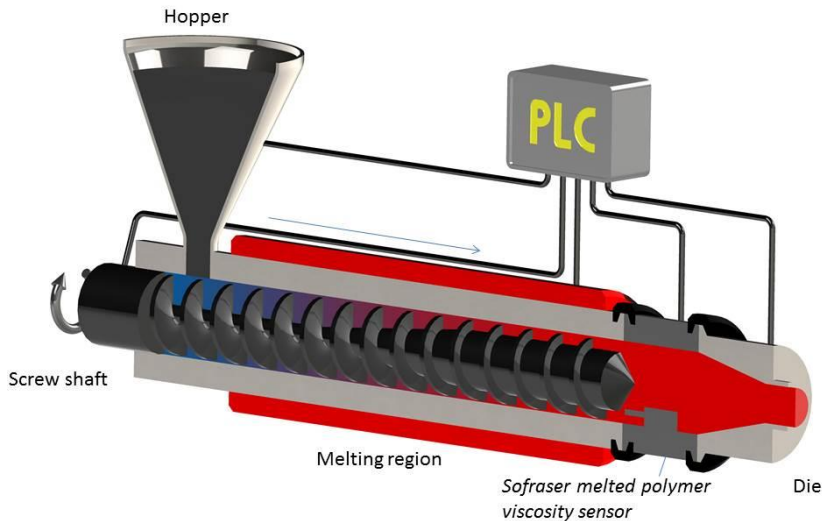
**SOFLUX viscosity sensor** is a new vibrating inline process viscometer with a dedicated shape allowing easy integration into any plastic, polymer or elastomer extruder. It is the ideal solution to monitor any extrusion process even the most demanding like speciality compounding, recycling, reactive extrusion...

- **Based on the proven vibrating technology of Sofraser:** Reliable, repeatable and continuous measurements combined with superior quality result in permanent production efficiency and increased profitability.
- **First real inline viscosity measurement for melted polymers:** Installed between the screw and the die, the Soflux measures viscosity directly inside the flow and in **real time** avoiding any error due to the evolution of the product outside of the process.
- **Easy correlation:** Viscosity by the Soflux can be correlated to usual parameters like **MFI** or **intrinsic viscosity (iV)** in order to control the extrusion process via analog or digital output.
- **Minimal maintenance:** Thanks to its design, the Soflux does not have drift in time and is easy to clean. Designed in 316 stainless steel, it is robust and reliable.



## SOFLUX VISCOMETER

### TYPICAL SOFLUX INTEGRATION ON EXTRUDER



In 1981, Sofraser invented & patented the world's first vibrating viscometer at resonance frequency also called tuning-type.

The vibration amplitude varies according to the viscosity of the product in which the rod is immersed.

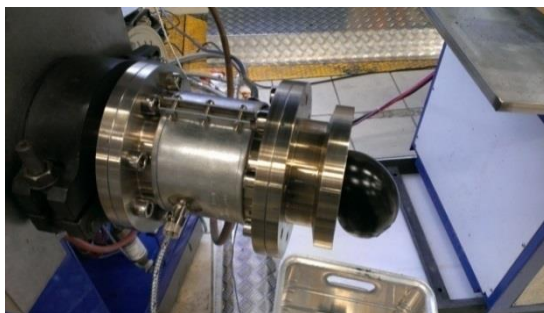
The active part of the sensor, a vibrating rod held in oscillation at resonance frequency, is driven by constant electrical power.

Sofraser remains unsurpassed regarding process reliability and accuracy.

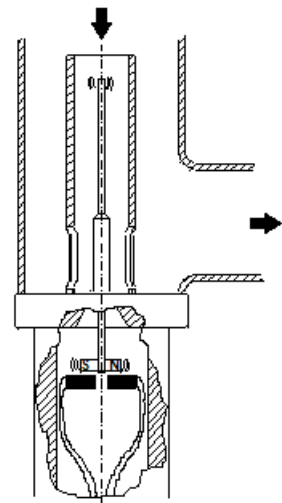
### EXAMPLE OF APPLICATION

#### Working conditions:

210 °C  
200 bar  
Thermoplastic material



Measured in line viscosity with Soflux (at about  $1\,000\text{ s}^{-1}$ ) of 245 Pa.s, correlated to the lab measurement at  $1\text{ s}^{-1}$  of 10 208 Pa.s



CE

