

PIOX[®] R - Hygienic Design

Process Refractometry for the Pharmaceutical
and Beverages Industries

°Brix

Plato

Oechsle

Concentration

Density

Yield Rate

Purity



Process Insight
through Transmitted Light



PIOX® R – Hygienic Design variant

Density and concentration analysis in the Food and Beverage as well as the Pharmaceutical Industries are a very important aspects of real time quality control.

Whether the degree of °Brix, Oechsle or Plato needs to be monitored during beverage production or the concentration levels of pharmaceutical substances during their manufacturing processes have to be supervised, P10X® R outputs the desired values with an accuracy of 0.1%.

PIOX® R is highly hygienic by itself.

With all wetted sensor parts made out of electropolished stainless steel (316L / 1.4404) and being engineered with no allowance for dead spaces, potential bacterial contamination can be ruled out at any time.

Available as a long and short form sensor design, P10X® R can easily be integrated into the process via a Varivent or Tri-clamp compatible connection flange.

Benefits:

- Highly accurate, reliable and hygienic real-time concentration measurement solution (°Brix, Oechsle, Plato, sugar content and more)
- No measurement drift due to potential scale or foulant build up on the optics as often indicated when employing conventional measurement technologies
- Quality assurance due to real time product monitoring with the additional benefit of a reduction of laboratory costs

Case study: °Brix Measurement during Beverage Production

During the production process of soft drinks, the precise monitoring of the sugar content, or for „Diet“ products the concentration of the artificial sweetener, is of crucial importance. Normally, the concentrations levels are between 10 and 12 °Brix for standard soft drinks and 1 to 3 °Brix for „Diet“ drinks.

Offline, laboratory methods inherit the disadvantage that they do not offer real-time measuring. Alternatively, conventional inline technologies often do not possess the required accuracy of 0,01 °Brix or have to be installed in slipstream bypass lines.

P10X® R can directly be installed in process and offers an unrivalled accuracy, ensuring deviations of less than 0.1 % to the laboratory value.

PIOX® R precisely measures:

- Artificial sweeteners
- Ascorbic acid
- °Brix, Plato, Oechsle
- Ethanol
- Ketogluonic acid
- Original wort content
- Pectin
- Sugar
- Whey products
- and many more

Note: Table does not include all fluids in the FLEXIM library. If you do not see your fluid or requirements listed, contact your local FLEXIM representative at www.flexim.com/contact for verification or email us at info@flexim.com.

Contact:

FLEXIM GmbH
info@flexim.com
www.flexim.com

