#### **Errata Notice**

This document contains references to PSS or Polymer Standards Service. Please note that PSS is now Agilent. This document will be republished as an Agilent document in the future. Agilent



# # 10061 - Column Application Note Characterization of Apple Juice

Food and beverages consist of different quality relevant compounds, e.g. polymeric substances (starches, pectins), sugars (saccarose, glucose), flavours and ethanol. For this example an apple juice with pectin, sugar and ethanol is analysed with just one GPC/SEC run

**Experimental Setup** 

Mobile Phase: Water Sodium azide 0.05%

Stationary Phase: PSS MCX Flow rate [mL/min]: 1,00 Temperature [°C]: 25

Temperature [°C]: 25
Detection: Shodex-RI71
Calibration:

Data processing: PSS WinGPC

## **Recommandations for Sample Concentration**

narrow PDI

M 100 Da - 10 000 Da: 2 g/L M 10 000 Da - 1 000 000 Da: 1-2 g/L

M > 1 000 000 Da: 0.5 g/L or less

broad PDI (>1.5)

all molar masses: 3.0 - 5.0 g/L

Injection volume [µL]: 20

### **Suitable Columns**

low molecular weights: P/N 211-0001 (set of 3) medium molecular weights: P/N 211-0012 (set of 2) high molecular weights: P/N 211-0003 (set of 3) ultrahigh molecular weights: P/N 211-0004 (set of 3)

# **Elugram** separation on PSS MCX

Molar Mass Distribution separation on PSS MCX



