



NQAC

Nestlé Quality Assurance Center  
Dublin

# Technical Datasheet

**Analysis Name:** Nitrite by Spectrophotometer and Nitrate by HPLC

**Method Number:** LI-SGRL-99.026

**Scope of Application:** This method applies to liquid and powdered milk, infant and dietetic products, whole and demineralized whey powder, caseins, caseinates, fruits and vegetables, water, chocolate, gummy-based vitamins and colored food matrices.

**Description:** Nitrites and nitrates are extracted from the sample using hot water. Fat and protein substances are eliminated through clarification of the product using various solutions. Nitrite is reacted with an indicator. The red complex formed is determined by spectrophotometric measurement at 540 nm. For nitrates, the solution is filtered, run on an HPLC, and read using UV detection at 205 nm.

**Sample Weight Required:** 50 g

**Analytical Platform:** Spectrophotometer, HPLC

**Special Information:** Gelatin cannot be run using this method. We offer external testing alternatives if needed.

Analyte Reported	Alias	Unit of Measure	Limit of Quantification	Reproducibility
Nitrate		mg/kg	4	20%
Nitrite		mg/kg	0.3 0.5 – (colored food matrices)	20%