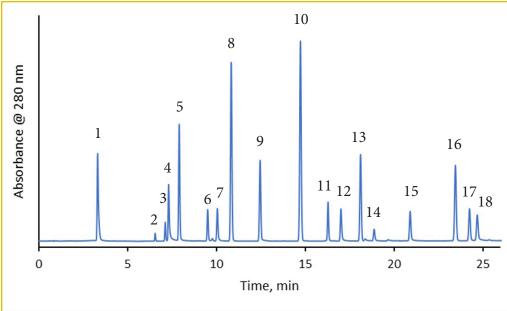
FOOD / BEVERAGE

Separation of Polyphenols in Wine

296



TEST CONDITIONS:

Column: HALO 90 Å LPH-C18, 2.7 μm 2.1 x 100 mm

Part Number: 92822-616

Mobile Phase A: Water/ 0.1% Formic Acid Mobile Phase B: Acetonitrile/ 0.1% Formic Acid

Gradient:	Time (min)	%B
	0.0	0
	3.5	8
	7.1	10
	25.0	30
	26.0	40
	27.0	100
	29.0	100
	30.0	0
	35.0	0

Flow Rate: 0.3 mL/min Pressure: 159 bar Temperature: 30 °C

Detection: UV 280 nm, PDA Injection Volume: 0.7 μL Sample Solvent: Water Data Rate: 100 Hz Response Time: 0.025 sec.

Flow Cell: 1 μL

LC System: Shimadzu Nexera X2

PEAK IDENTITIES

- 1. Gallic Acid
- 2. Epigallocatechin
- 3. Chlorogenic Acid
- 4. Catechin
- 5. Caffeic Acid
- 6. Epicatechin
- 7. Epigallocatechin Gallate
- 8. p-Coumaric Acid
- 9. Ferulic Acid
- 10. o-Coumaric Acid
- 11. Quercitrin
- 12. Myricetin
- 13. Resveratrol
- 14. Morin
- 15. Quercetin
- 16. Naringenin
- 17. Apigenin
- 18. Kaempferol

Polyphenols can be found in a wide variety of plant-based foods and are packed with antioxidants and potential health benefits. There are more than 8,000 of these types of compounds which contain multiples of phenol units. Common polyphenols found in wine are separated using a HALO 90 Å LPH-C18 column using analytical standards. This stationary phase contains a sterically protected ligand which is ideal for high stability under low pH conditions.



