

MAG



Deliverables

This pre-validated panel includes in total 21 acylglycerol species of monoacylglycerol (MAG) and allows delivery of **fully quantitative results** (expressed in pmol). In addition, the amount of each sample used is provided (weight or volume).



Method

Acylglycerols are analysed by **LC/ESI-MS/MS** with an Agilent 1290 HPLC system combined with an Agilent 6470 Triplequad mass spectrometer (Agilent Technologies, Santa Clara, USA). Samples are extracted with organic solvents. For lipid quantification, deuterated internal standards are added prior to sample extraction. Crude extracts are further purified by solid phase extraction (SPE). Clean extracts are loaded on the LC system for LC/ESI-MS/MS analysis. Mass spectrometry analysis is performed with multiple reaction monitoring (MRM) in positive ion mode with at least two mass transitions for each compound. Data analysis is done using Mass Hunter software (Agilent Technologies).



Sample submission guidelines

SAMPLE TYPE	SAMPLE AMOUNT	SHIPMENT CONDITIONS
Whole blood, plasma, serum	100 μΙ	Frozen, on dry ice
Tissue	20 mg	Frozen pieces of tissues, on dry ice
Feces	20 mg	Frozen, on dry ice
Cells	1 × 10 ⁶ cells <i>or</i> 150 μg of total protein	Frozen cell pellet, on dry ice
Liquids (e.g., cell supernatant, media)	0.5–20 ml	Frozen, on dry ice
CSF	0.4 ml	Frozen, on dry ice

Minimal sample number: 10

Standard turnaround time: 6 weeks

(for projects with up to 100 samples)

Expedited delivery is possible for an additional fee.

Applications

- > Diabetes
- > Obesity
- > Nutrition
- > Alzheimer's disease
- > Multiple sclerosis

Covered analytes

ANALYTE	FATTY ACID / SPECIES	
MAG	C14:0	
	C14:1	
	C16:0	
	C16:1	
	C18:0	
	C18:1	
	C18:2	
	C18:3	
	C20:0	
	C20:1	
	C20:2	
	C20:3	
	C20:4	
	C20:5	
	C22:0	
	C22:1	
	C22:2	
	C22:5	
	C22:6	
	C24:0	
	C24:1	







