

PRODUCT INFORMATION



Sphingolipid Mixture (bovine)

Item No. 29375

Supplied as: A solution in chloroform:methanol (2:1)

Storage: -20°C

Stability: ≥2 years

Concentration: 25 mg/ml

Special Conditions: This standard is accurately prepared by gravimetric technique (+/-0.5%)

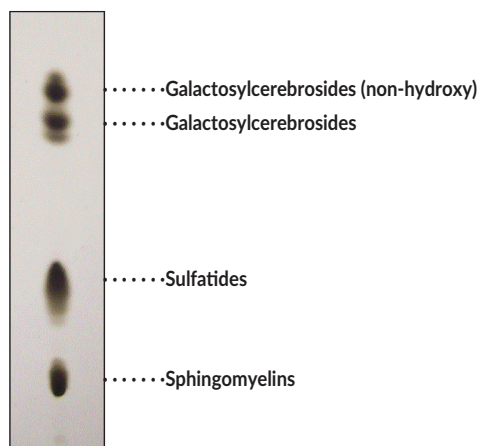
Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

Description and Data

Galactosylceramides are glycosphingolipids that contain galactose attached to a ceramide containing an N-acyl hydroxy or non-hydroxy fatty acid. They are metabolic precursors to sulfatides, found primarily in nerve tissues, and are the main glycosphingolipids in the central nervous system.^{1,2} Galactosylceramides are involved in a multitude of cellular processes, including cell agglutination, cellular signaling in glycosynapses, cellular development, and activation of T cells.¹⁻³ They accumulate in globoid cells in the brain of patients with Krabbe disease, a disorder characterized by a deficiency in galactosylcerebrosidase activity.¹ Sulfatides are primarily found in the myelin sheath of oligodendrocytes and Schwann cells, with smaller chain lengths predominant during development and longer chain lengths predominant in mature cells.⁴ They accumulate in the lysosome of patients with metachromatic leukodystrophy, a disorder characterized by arylsulfatase A deficiency.^{5,6} Sphingomyelins are bioactive sphingolipids found in mammalian cell membranes.⁷ They make up 2-15% of the total organ phospholipid population but are found at higher concentrations in the brain and myelin sheaths surrounding peripheral nerves. Sphingolipid Mixture (bovine) contains bovine hydroxy- and non-hydroxy galactosylcerebrosides, sulfatides, and sphingomyelins. It is intended for use as a reference standard for the detection of these sphingolipids in various sample types by TLC or LC-MS. This mixture is supplied in an amber ampule in which the headspace has been purged with argon to prevent lipid oxidation.

Included are:

Elution Order*	Item Name
1	Galactosylcerebrosides (non-hydroxy)
2	Galactosylcerebrosides
3	Sulfatides
4	Sphingomyelins



WARNING

THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

SAFETY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the [complete](#) Safety Data Sheet, which has been sent via email to your institution.

WARRANTY AND LIMITATION OF REMEDY

Buyer agrees to purchase the material subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information can be found on our website.

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References

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