

**RESEARCH PRODUCTS** 

Additional Standards for MS/MS



Cambridge Isotope Laboratories, Inc. (CIL) is pleased to offer these additional high-quality standards for use in tandem mass spectrometry (MS/MS). These isotope-labeled standards are fit for quantification via isotope dilution mass spectrometry (IDMS).

	Catalog No.	Description
	CNLM-9007-CA-0.1MG	L-Argininosuccinic acid, barium salt·2H <sub>2</sub> O (arginine- <sup>13</sup> C <sub>6</sub> , 99%; <sup>15</sup> N <sub>4</sub> , 99%) CP 90%+
	CNLM-9007-CA-0.5MG	L-Argininosuccinic acid, barium salt·2H <sub>2</sub> O (arginine- <sup>13</sup> C <sub>6</sub> , 99%; <sup>15</sup> N <sub>4</sub> , 99%) CP 90%+
	ULM-9008-CA-0.1MG	L-Argininosuccinic acid, barium salt-3H <sub>2</sub> O (unlabeled) CP 90%+
NEW!	NSK-PO-1	lpha-Glucosidase Substrate and Internal Standard
NEW!	NSK-FA-1	lpha-Galactosidase Substrate and Internal Standard
	CLM-9792-0.001	Hexacosanoyl lysophosphatidylcholine (hexacosanoyl-1,2,3,4,5,6-13C <sub>6</sub> , 99%)
	CLM-9792-0.005	Hexacosanoyl lysophosphatidylcholine (hexacosanoyl-1,2,3,4,5,6-13C <sub>6</sub> , 99%)
	ULM-9791-0.005	Hexacosanoyl lysophosphatidylcholine (unlabeled)
	ULM-9791-0.01	Hexacosanoyl lysophosphatidylcholine (unlabeled)
	CLM-9426	Methylmalonic acid (13C <sub>4</sub> , 99%)
	DLM-387-0.25	Methylmalonic acid (methy-D <sub>3</sub> , 98%)
	DLM-3619-1	DL-Homocystine (3,3,3',3'4,4,4',4'-D <sub>8</sub> , 98%)

Please see other side for additional product details

## **Other Standards Coming Soon!**

Catalog No.	Description	Catalog No.	Description
NSK-MP-1	$\alpha\text{-L-Iduronidase}$ Substrate and Internal Standard	NSK-GA-1	Glucocerebrosidase Substrate and Internal Standard
NSK-KR-1	Galactocerebrosidase Substrate and Internal Standard	NSK-NI-1	Acid Sphingomyelinase Substrate and Internal Standard

For research use only. Not for use in diagnostic procedures.

Catalog No.	Description			
NSK-PO-1	Lysosomal $\alpha\text{-}Glucosidase$ Substrate and Internal Standard			
Each vial contain	s the following compounds at a molar ratio of 100:1:			
Compound #1	(7-Benzoylamino-heptyl)-{2-[4-(3,4,5-trihydroxy-6-hydroxymethyl-tetrahydro-pyran-2-yloxy)-phenylcarbamoyl]-ethyl}-carbamic acid <i>tert</i> -butyl ester			
Formula	$C_{34}H_{49}N_3O_{10}$			
Weight (Da)	659.8			
Compound #2	(7-d <sub>5</sub> -Benzoylamino-heptyl)-[2-(4-hydroxy-phenyl-carbamoyl)-ethyl]-carbamic acid <i>tert</i> -butyl ester			
Formula	$C_{28}H_{34}N_3O_5D_5$			
Weight (Da)	502.7			
Product Specifications				
Amount	~600 samples per vial			
Storage and stability	Store in freezer (-20°C), protected from light			
Stability	Two years if stored under recommended conditions.			

If reconstituted, store in either 2-8°C or in freezer (-20°C)

for up to four weeks.					
For research use only. Not for use in diagnostic procedures.					

Catalog No.	Description
NSK-FA-1	lpha-Galactosidase Substrate and Internal Standard
Each vial contain	s the following compounds at a molar ratio of 500:1:
Compound #1	(6-Benzoylamino-hexyl)-{2-[4-(3,4,5-trihydroxy-6-hydroxymethyl-tetrahydro-pyran-2-yloxy)-phenylcarbamoyl]-ethyl}-carbamic acid <i>tert</i> -butyl ester
Formula	$C_{33}H_{47}N_3O_{10}$
Weight (Da)	645.7
Compound #2	(6-d <sub>s</sub> -Benzoylamino-hexyl)-[2-(4-hydroxy-phenyl-carbamoyl)-ethyl]-carbamic acid <i>tert</i> -butyl ester
Formula	$C_{27}H_{32}N_3O_5D_5$
Weight (Da)	488.6
<b>Product Spe</b>	cifications
Amount	~600 samples per vial
Storage and stability	Store in freezer (-20°C), protected from light
Stability	Two years if stored under recommended conditions. If reconstituted, store in either 2-8°C or in freezer (-20°C) for up to four weeks.

## Reference

Haynes, C.A.; De Jesús, V.R. 2016. Simultaneous quantitation of hexacosanoyl lysophosphatidylcholine, amino acids, acylcarnitines, and succinylacetone during FIA-ESI-MS/MS analysis of dried blood spot extracts for newborn screening. Clin Biochem, 49(1-2), 161-165.

