Brain PI(4,5)P2
L-α-phosphatidylinositol-4,5-bisphosphate (Brain, Porcine) (ammonium salt)

840046X-1mg

<table>
<thead>
<tr>
<th>Molecular Weight</th>
<th>1096.385 (average based on fatty acid distribution in product)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Physical State</td>
<td>20:9:1 Chloroform: Methanol: Water</td>
</tr>
<tr>
<td>Storage</td>
<td>-20°C</td>
</tr>
<tr>
<td>Expiration Date</td>
<td>Three months from date of receipt</td>
</tr>
<tr>
<td>M Lot Number</td>
<td>5507XGA073</td>
</tr>
<tr>
<td>Avanti Lot Number</td>
<td>840046X-1MG-A-073</td>
</tr>
</tbody>
</table>

**ANALYSIS** | **SPECIFICATION** | **RESULTS**
--- | --- | ---
Physical Examination | CMW 20:9:1: Clear solution with no foreign matter | Pass
TLC (45:35:7:7:2.3 Chloroform: Methanol: Water: Ammonium Hydroxide) | >99% Purity
Ninhydrin: negative
Iodine: one major spot
Phosphorus: positive
Charring: positive
Water dip: one major spot | All Pass
UV Oxidation (prepare sample in methanol) | NMT 5% total all wavelengths | 0% total
Proton NMR | NMR spectrum consistent with structure | Consistent with structure
Phosphorus NMR | NMR spectrum consistent with structure | Consistent with structure
Calcium (ICP/MS) | NMT 500 ppm | None Detected
Mass Spectroscopy | [M-3NH₄⁺⁺H⁺]⁻ = 1045.385 ± 1 amu
[M-3NH₄⁺⁺H⁺]⁻ = 522.193 ± 1 amu (predominant species) | [M-3NH₄⁺⁺H⁺]⁻ = 1046.1 amu
[M-3NH₄⁺⁺H⁺]⁻ = 522.8 amu (predominant species) |

Approved By: [Signature]

For Research Use Only. Not For Human Use.