

**Supplementary Table S1. Pearson linear correlation coefficient between the given marker (Lyso- Gb1, *SNCA* mRNA level,  $\alpha$ -SNCA total protein concentration and oligomer concentration) and age in the following groups: GD1, GD3, unknown mutation carriers, L444P carriers, and control.**

	<b>Lyso-Gb1</b>	<b><math>\alpha</math>-SNCA total protein concentration</b>	<b><i>SNCA</i> mRNA level</b>	<b>Oligomer concentration</b>
<b>GD1</b>	0,098275	0,289212	0,227364	-0,03859
<b>GD3</b>	-0,15565	-0,51458	0,068943	-0,05628
<b>Unknown mutation carriers</b>	-0,05349	0,034903	-0,60128	-0,38611
<b>L444P carriers</b>	-0,14434	-0,4052	0,741275	-0,33516
<b>Control</b>	0,223636	-0,1354	0,102784	-0,09648

**$\alpha$ -SNCA** – alpha-synuclein

**GD** – Gaucher disease

**Lyso-Gb1** - Glucosylsphingosine

***SNCA*** - gene coding alpha-synuclein