

**Supplemental table 8: List of canonical pathways significantly represented by genes regulated with LTMCR**

**A- Anterior Pituitary**

<b>Ingenuity Canonical Pathways</b>	<b>-log(p-value)</b>	<b>Ratio</b>	<b>Molecules</b>
Circadian Rhythm Signaling	3,98	0,13	<i>Bhlhe41, Cry2, Per2, Arntl</i>
Androgen and Estrogen Metabolism	1,97	0,04	<i>Sts, Csgalnact1, Arsb</i>
Glycosaminoglycan Degradation	1,96	0,08	<i>Mgea5, Arsb</i>
Crosstalk between Dendritic Cells and Natural Killer Cells	1,91	0,04	<i>Pvrl2, Hla-E, Camk2d</i>
Glycolysis/Gluconeogenesis	1,71	0,04	<i>Pdhx, Galm, Pfkp</i>
Tight Junction Signaling	1,63	0,03	<i>Pvrl2, Jam2, Myh14, Myh6</i>
Coagulation System	1,57	0,06	<i>F2r, Tfp1</i>
Protein Ubiquitination Pathway	1,54	0,02	<i>Hspa1a/Hspa1b, Birc3, Dnajb1, Dnaja1, Usp2</i>
Calcium Signaling	1,50	0,02	<i>Myh14, Myh6, Chrn4, Camk2d</i>
Alanine and Aspartate Metabolism	1,50	0,05	<i>Pdhx, Asns</i>
Galactose Metabolism	1,47	0,05	<i>Gaa, Pfkp</i>

**B- Hypothalamus**

<b>Ingenuity Canonical Pathways</b>	<b>-log(p-value)</b>	<b>Ratio</b>	<b>Molecules</b>
Circadian Rhythm Signaling	3,86	0,10	<i>Cry1, Per2, Nr1d1</i>
Cytotoxic T Lymphocyte-mediated Apoptosis of Target Cells	3,67	0,06	<i>Casp8, Rt1-N2, Rt1-T24-3</i>
Allograft Rejection Signaling	2,34	0,04	<i>Rt1-N2, Rt1-T24-3</i>
OX40 Signaling Pathway	2,10	0,03	<i>Rt1-N2, Rt1-T24-3</i>
Endothelin-1 Signaling	1,97	0,02	<i>Gna14, Casp8, Pla2g3</i>
Phospholipid Degradation	1,71	0,02	<i>Gna14, Pla2g3</i>
Huntington's Disease Signaling	1,60	0,01	<i>Hspa1a/Hspa1b, Casp8, Tgm2</i>
Apoptosis Signaling	1,54	0,02	<i>Casp8, Gas2</i>
Atherosclerosis Signaling	1,48	0,02	<i>Apoa1, Pla2g3</i>
Sphingosine-1-phosphate Signaling	1,44	0,02	<i>Gna14, Casp8</i>
Neuropathic Pain Signaling In Dorsal Horn Neurons	1,42	0,02	<i>Gna14, Camk1g</i>
Cdc42 Signaling	1,38	0,02	<i>Rt1-N2, Rt1-T24-3</i>
Glycerophospholipid Metabolism	1,38	0,02	<i>Gna14, Pla2g3</i>
Synaptic Long Term Depression	1,30	0,02	<i>Gna14, Pla2g3</i>