

GeDiPNet Shared-Gene Disease Pairs

Similarity: Jaccard index on shared curated genes (disease_gdp). Significance: upper-tail hypergeometric test ($P(X \geq k)$), Benjamini-Hochberg FDR-corrected across all tested pairs. Corroborated Shared Genes: count of shared genes backed by ≥ 2 distinct disease_gdp.main_source values combined across both diseases (e.g. GWAS-backed for one, ClinVar-backed for the other still counts); Shared Gene Names lists each gene's own source count in parentheses. Overlap Coefficient: shared genes / MIN(each disease's own total gene count) -- complements the Jaccard-based Similarity Score by showing how much of the SMALLER disease's entire known gene-set is covered by this pair, which Jaccard (dividing by the union) can understate. Shared Cluster: cluster id if both diseases fall in the same label-propagation cluster (scripts/build_disease_clusters.php), blank otherwise. See scripts/build_related.php on gedipnet.bicnirrh.res.in. Data as of: 2026-10-10 03:00:13. Filters applied: disease name contains "Learning disorders" (9 matching pairs). · Rows: 9 · Generated: 2026-10-10 20:26:58

Disease A	Disease B	Shared Genes	Corroborated Shared Genes	Shared Gene Names	Similarity Score	Overlap Coefficient	P-value	FDR Q-value	Shared Cluster
Learning disorders	Memory disorders	17	16	APP (2), PSEN1 (2), HTR1A (2), HTR7 (2), MAPT (2), PRKN (2), VEGFA (2), ACHE (2), BCL2 (2), IGF1 (2), IL1B (2), SIGMAR1 (1)	0.23944	0.47222	2.848e-34	1.003e-32	
Degenerative disorder	Learning disorders	5	5	APP (2), PSEN1 (2), MAPT (2), HMOX1 (2), APOD (2)	0.06944	0.13889	3.245e-8	2.449e-7	
Learning disorders	Neurodegenerative disorder	5	5	APP (2), PSEN1 (2), MAPT (2), HMOX1 (2), APOD (2)	0.06849	0.13889	3.689e-8	2.772e-7	
Cerebral hemorrhage	Learning disorders	4	4	APP (2), VEGFA (2), BCL2 (2), HMOX1 (2)	0.06452	0.13793	5.732e-7	3.501e-6	
Delirium	Learning disorders	3	3	IGF1 (2), IL1RN (2), TH (2)	0.06818	0.30000	1.393e-6	7.969e-6	
Amyloidosis	Learning disorders	3	3	APP (2), PSEN1 (2), ACHE (2)	0.05660	0.15789	1.108e-5	5.455e-5	
Cleft palate cardiac defects impaired intellectual development	Learning disorders	1	1	MEIS2 (2)	0.02703	1.00000	2.338e-3	3.243e-3	
Cleft palate congenital heart defect intellectual disability syndrome due to 15q14 microdeletion	Learning disorders	1	1	MEIS2 (2)	0.02703	1.00000	2.338e-3	3.243e-3	
Learning disorders	Thauvin-robinet-faivre syndrome	1	1	FIBP (3)	0.02703	1.00000	2.338e-3	3.243e-3	