

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 "overgrowth syndrome and/or cerebral malformations due to abnormalities in MTOR pathway genes" (5 matching pairs). · Rows: 5 · Generated: 2026-10-10 00:50:51

Disease A	Disease B	Shared Genes	Corroborated Shared Genes	Shared Gene Names	Similarity Score	Overlap Coefficient	P-value	FDR Q-value	Shared Cluster
Hemimegalencephaly	overgrowth syndrome and/or cerebral malformations due to abnormalities in MTOR pathway genes	2	2	AKT3 (3), MTOR (3)	0.22222	0.66667	5.313e-7	3.272e-6	
Cortical development malformation	overgrowth syndrome and/or cerebral malformations due to abnormalities in MTOR pathway genes	2	2	AKT3 (2), MTOR (2)	0.06897	0.66667	8.873e-6	4.408e-5	
Cebalid syndrome	overgrowth syndrome and/or cerebral malformations due to abnormalities in MTOR pathway genes	1	1	MTOR (2)	0.20000	0.50000	3.896e-4	8.665e-4	
Focal cortical dysplasia	overgrowth syndrome and/or cerebral malformations due to abnormalities in MTOR pathway genes	1	1	MTOR (4)	0.10000	0.33333	1.363e-3	2.148e-3	
overgrowth syndrome and/or cerebral malformations due to abnormalities in MTOR pathway genes	Small cell carcinoma	1	1	MTOR (2)	0.08333	0.33333	1.753e-3	2.609e-3	