

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  $\geq 2$  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: 2026-10-12 03:00:13. Filters applied: disease name contains "Adams-oliver syndrome" (5 matching pairs). · Rows: 5 · Generated: 2026-10-11 23:19:01

| Disease A             | Disease B                            | Shared Genes | Corroborated Shared Genes | Shared Gene Names | Similarity Score | Overlap Coefficient | P-value  | FDR Q-value | Shared Cluster |
|-----------------------|--------------------------------------|--------------|---------------------------|-------------------|------------------|---------------------|----------|-------------|----------------|
| Adams-oliver syndrome | NOTCH1-related AOS spectrum disorder | 1            | 1                         | NOTCH1 (3)        | 0.14286          | 1.00000             | 3.897e-4 | 8.665e-4    |                |
| Adams-oliver syndrome | Aplasia cutis congenita              | 1            | 1                         | DLL4 (4)          | 0.09091          | 0.20000             | 1.947e-3 | 2.828e-3    |                |
| Adams-oliver syndrome | Congenital abnormalities             | 1            | 1                         | NOTCH1 (4)        | 0.05263          | 0.16667             | 5.056e-3 | 6.196e-3    |                |
| Adams-oliver syndrome | Congenital hydrocephalus             | 1            | 1                         | DOCK6 (3)         | 0.05000          | 0.16667             | 5.444e-3 | 6.629e-3    |                |
| Adams-oliver syndrome | Bicuspid aortic valve                | 1            | 1                         | NOTCH1 (4)        | 0.05000          | 0.16667             | 5.444e-3 | 6.629e-3    |                |