

GeDiPNet Cluster 69 -- Enriched Pathways

Pathway enrichment: KEGG + Reactome, upper-tail hypergeometric test, Benjamini-Hochberg FDR-corrected. Fold enrichment = (overlap / cluster gene count) / (pathway gene count / universe size). Top 15 pathways per cluster by q-value. See scripts/build_cluster_enrichment.php on gedipnet.bicnirrh.res.in. Data as of: 2026-10-08 03:30:07. · Rows: 15 · Generated: 2026-10-08 11:41:18

Pathway	Source	Overlap Genes	Overlap Gene Names	Pathway Gene Count	Cluster Gene Count	Fold Enrichment	P-value	FDR Q-value
Cross-presentation of particulate exogenous antigens (phagosomes)	Reactome	5	CYBA, CYBB, NCF1, NCF2, NCF4	8	44	170.60	2.899e-11	4.500e-9
Detoxification of Reactive Oxygen Species	Reactome	6	GSR, CYBA, CYBB, NCF1, NCF2, NCF4	34	44	48.17	2.114e-9	2.107e-7
Leishmaniasis	KEGG	7	CYBA, CYBB, IFNG, NCF1, NCF2, NCF4, IL10	78	44	24.50	1.170e-8	9.721e-7
RHO GTPases Activate NADPH Oxidases	Reactome	5	CYBA, CYBB, NCF1, NCF2, NCF4	24	44	56.87	2.107e-8	1.648e-6
ROS and RNS production in phagocytes	Reactome	5	CYBA, CYBB, NCF1, NCF2, NCF4	34	44	40.14	1.343e-7	8.484e-6
VEGFA-VEGFR2 Pathway	Reactome	5	CYBA, CYBB, NCF1, NCF2, NCF4	62	44	22.01	2.894e-6	1.221e-4
Diabetic cardiomyopathy	KEGG	7	G6PD, GSR, CYBA, CYBB, NCF1, NCF2, NCF4	205	44	9.32	8.546e-6	3.014e-4
Osteoclast differentiation	KEGG	6	IKBKG, CYBA, IFNG, NCF1, NCF2, NCF4	142	44	11.53	1.199e-5	3.967e-4
Lipid and atherosclerosis	KEGG	7	IKBKG, CYBA, CYBB, NCF1, NCF2, NCF4, IL6	216	44	8.85	1.202e-5	3.978e-4
Glutathione metabolism	KEGG	4	G6PD, GSR, GSS, GCLC	59	44	18.51	6.158e-5	1.529e-3
Leukocyte transendothelial migration	KEGG	5	CYBA, CYBB, NCF1, NCF2, NCF4	116	44	11.77	6.197e-5	1.537e-3
Glycolysis	Reactome	3	PKLR, GPI, HK1	28	44	29.25	1.410e-4	2.989e-3
Fluid shear stress and atherosclerosis	KEGG	5	IKBKG, CYBA, IFNG, NCF1, NCF2	141	44	9.68	1.561e-4	3.236e-3
Phagosome	KEGG	5	CYBA, CYBB, NCF1, NCF2, NCF4	155	44	8.80	2.429e-4	4.600e-3
African trypanosomiasis	KEGG	3	IFNG, IL10, IL6	37	44	22.13	3.268e-4	5.823e-3