|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Category** | **GO ID** | **Description** | **p-value** | **gene Number** |
| BP | GO:0072593 | reactive oxygen species metabolic process | 0.001  | 26 |
| BP | GO:0042744 | hydrogen peroxide catabolic process | 0.001  | 24 |
| BP | GO:0042743 | hydrogen peroxide metabolic process | 0.001  | 24 |
| BP | GO:0006518 | peptide metabolic process | 0.001  | 301 |
| BP | GO:0006412 | translation | 0.001  | 298 |
| BP | GO:0043604 | amide biosynthetic process | 0.001  | 301 |
| BP | GO:0034645 | cellular macromolecule biosynthetic process | 0.001  | 385 |
| BP | GO:0043603 | cellular amide metabolic process | 0.001  | 308 |
| BP | GO:0043043 | peptide biosynthetic process | 0.001  | 298 |
| BP | GO:0009059 | macromolecule biosynthetic process | 0.001  | 389 |
| BP | GO:1901566 | organonitrogen compound biosynthetic process | 0.001  | 396 |
| BP | GO:0044271 | cellular nitrogen compound biosynthetic process | 0.002  | 421 |
| BP | GO:1901564 | organonitrogen compound metabolic process | 0.003  | 484 |
| BP | GO:1901576 | organic substance biosynthetic process | 0.004  | 548 |
| CC | GO:0005576 | extracellular region | 0.001  | 57 |
| CC | GO:0030529 | intracellular ribonucleoprotein complex | 0.001  | 339 |
| CC | GO:1990904 | ribonucleoprotein complex | 0.001  | 339 |
| CC | GO:0005840 | ribosome | 0.001  | 236 |
| CC | GO:0043232 | intracellular non-membrane-bounded organelle | 0.002  | 250 |
| CC | GO:0043228 | non-membrane-bounded organelle | 0.002  | 250 |
| MF | GO:0004497 | monooxygenase activity | 0.001  | 60 |
| MF | GO:0046906 | tetrapyrrole binding | 0.001  | 103 |
| MF | GO:0016705 | oxidoreductase activity, acting on paired donors, with incorporation or reduction of molecular oxygen | 0.001  | 72 |
| MF | GO:0005506 | iron ion binding | 0.001  | 76 |
| MF | GO:0020037 | heme binding | 0.001  | 103 |
| MF | GO:0005198 | structural molecule activity | 0.001  | 320 |
| MF | GO:0003735 | structural constituent of ribosome | 0.001  | 310 |
| MF | GO:0003746 | translation elongation factor activity | 0.001  | 43 |
| MF | GO:0016684 | oxidoreductase activity, acting on peroxide as acceptor | 0.001  | 41 |
| MF | GO:0004601 | peroxidase activity | 0.001  | 36 |
| MF | GO:0016491 | oxidoreductase activity | 0.001  | 422 |
| MF | GO:0004568 | chitinase activity | 0.009  | 8 |
| MF | GO:0004822 | isoleucine-tRNA ligase activity | 0.014  | 15 |
| MF | GO:0016209 | antioxidant activity | 0.017  | 52 |
| MF | GO:0016210 | naringenin-chalcone synthase activity | 0.022  | 4 |
| MF | GO:0010333 | terpene synthase activity | 0.033  | 8 |
| MF | GO:0008061 | chitin binding | 0.045  | 10 |