

Resource Summary Report

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ProtParam Tool

RRID:SCR_018087

Type: Tool

Proper Citation

ProtParam Tool (RRID:SCR_018087)

Resource Information

URL: <https://web.expasy.org/protparam/>

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Description: Software tool to calculate various physicochemical parameters for given protein stored in Swiss-Prot or TrEMBL or for user entered protein sequence. Protein can either be specified as Swiss-Prot/TrEMBL accession number or ID, or in form of raw sequence. Computed parameters include molecular weight, theoretical pI, amino acid composition, atomic composition, extinction coefficient, estimated half-life, instability index, aliphatic index and grand average of hydropathicity.

Synonyms: ProtParam

Resource Type: data analysis software, service resource, software application, production service resource, software resource, sequence analysis software, data processing software, analysis service resource

Defining Citation: [PMID:10027275](#)

Keywords: Calculate physicochemical parameter, protein, Swiss-Prot, TrEMBL, protein sequence, molecular weight, theoretical pI, amino acid composition, atomic composition, extinction coefficient, bio.tools

Funding: NHGRI U01 HG02712;
Swiss Federal Government through Federal Office of Education and Science

Availability: Free, Freely available

Resource Name: ProtParam Tool

Resource ID: SCR_018087

Alternate IDs: biotools:protparam

Alternate URLs: <https://bio.tools/protparam>

Record Creation Time: 20220129T080338+0000

Record Last Update: 20260801T190617+0000

Ratings and Alerts

No rating or validation information has been found for ProtParam Tool.

No alerts have been found for ProtParam Tool.

Data and Source Information

Source: [SciCrunch Registry](#)

Usage and Citation Metrics

We found 5406 mentions in open access literature.

Listed below are recent publications. The full list is available at [PRECISE-TBI](#) .

Barajas JM, et al. (2026) Tandem Duplications in UBTF Create XPO1-Dependent Nuclear Export Signals that Reveal a Leukemic Therapeutic Dependency. *Blood cancer discovery*, 7(1), 51.

Marted?? R, et al. (2026) De novo cysteine biosynthesis in *Pseudomonas aeruginosa*: Characterization of the two main cysteine synthase isoforms. *iScience*, 29(1), 114304.

Gao H, et al. (2026) Hydrogen-deuterium exchange reveals catalytically linked protein flexibility in myoglobin-mediated intramolecular C(sp³)-H activation. *Protein science : a publication of the Protein Society*, 35(1), e70410.

Verma HK, et al. (2026) Cystatin C prevents tissue injury after lung transplantation. *Life science alliance*, 9(2).

Khan A, et al. (2026) HMPV-TherResDB: Comprehensive human metapneumovirus (HMPV) database for sequence-structure annotations, vaccine resources, and therapeutics research. *Virus research*, 363, 199665.

Cleveland ME, et al. (2026) Toward the Bioremediation of Nylon Waste Materials: Genome Mining Leads to the Identification of a Thermostable Laurolactamase From *Thermopolyspora flexuosa*. *ChemSusChem*, 19(1), e202501964.

Smorodinsky-Atias K, et al. (2026) On the same side: VISTA and its ligands interact in cis on the cell surface. *Protein science : a publication of the Protein Society*, 35(1), e70415.

Grieben M, et al. (2026) Cloning, expression, purification, and structural modeling of the Chandipura virus matrix protein. *FEBS open bio*, 16(1), 41.

Farias FM, et al. (2026) Streptocyclin BTW is a novel member of a diverse family of circular bacteriocins in the genus *Streptococcus*. *Molecular nutrition & food research*, 70(1), e70290.

Pasha AVK, et al. (2026) Immunoinformatics-Based Multi-Epitope Vaccine Targeting *Helicobacter Pylori*. *Cancer reports (Hoboken, N.J.)*, 9(1), e70441.

Lyu Y, et al. (2026) An open axial channel of the AAA ClpXP protease enhances degradation of specific classes of protein substrates. *Protein science : a publication of the Protein Society*, 35(1), e70372.

De Coninck T, et al. (2025) OsAPSE modulates non-covalent interactions between arabinogalactan protein O-glycans and pectin in rice cell walls. *Frontiers in plant science*, 16, 1588802.

Graham LA, et al. (2025) Winter-active spiders (*Clubiona*) have a hyperactive antifreeze protein with a unique beta-solenoid fold. *The FEBS journal*.

Walvekar AS, et al. (2025) Failure to repair damaged NAD(P)H blocks de novo serine synthesis in human cells. *Cellular & molecular biology letters*, 30(1), 3.

Li L, et al. (2025) Identification and functional analysis of Wall-Associated Kinase genes in *Nicotiana tabacum*. *Frontiers in plant science*, 16, 1543437.

Modenbach JM, et al. (2025) Biochemical analyses of cystatin-C dimers and cathepsin-B reveals a trypsin-driven feedback mechanism in acute pancreatitis. *Nature communications*, 16(1), 1702.

Zubair A, et al. (2025) Targeting HIV-1 conserved regions: An immunoinformatic pathway to vaccine innovation for the Asia. *PloS one*, 20(3), e0317382.

Ramberg KO, et al. (2025) Solid-state NMR of membrane peptides and proteins in the lipid cubic phase. *Biophysical journal*, 124(9), 1387.

Kasibhatla SM, et al. (2025) Construction of an immunoinformatics-based multi-epitope vaccine candidate targeting Kyasanur forest disease virus. *PeerJ*, 13, e18982.

Kronenberg PA, et al. (2025) Identification and characterization of the elusive protein backbone of the immuno-dominant and species-specific Em2(G11) metacestode antigen of *Echinococcus multilocularis*. *Frontiers in parasitology*, 4, 1540215.