



COVID-19 is an emerging, rapidly evolving situation.

Get the latest public health information from CDC: <https://www.coronavirus.gov>

Get the latest research information from NIH: <https://www.nih.gov/coronavirus>

Find NCBI SARS-CoV-2 literature, sequence, and clinical content: <https://www.ncbi.nlm.nih.gov/sars-cov-2/>



Standard Protein BLAST

blastn

blastp

blastx

tblastn

tblastx

BLASTP programs search protein databases using a protein query. [more...](#)

Reset page

Bookmark

Enter Query Sequence

Enter accession number(s), gi(s), or FASTA sequence(s)

[Clear](#)

6KFS-A

Or, upload file

Choose File no file selected

Job Title

Enter a descriptive title for your BLAST search

☐ Align two or more sequences

Query subrange

From

To

New columns added to the Description Table

Click 'Select Columns' or 'Manage Columns'.

Choose Search Set

Database

RefSeq Select proteins (refseq_select)

Organism

exclude

Enter organism common name, binomial, or tax id. Only 20 top taxa will be shown.

Exclude

☐ Models (XM/XP) ☐ Non-redundant RefSeq proteins (WP) ☐ Uncultured/environmental sample sequences

Program Selection

Algorithm

☐ blastp (protein-protein BLAST)

☒ PSI-BLAST (Position-Specific Iterated BLAST)

☐ PHI-BLAST (Pattern Hit Initiated BLAST)

☐ DELTA-BLAST (Domain Enhanced Lookup Time Accelerated BLAST)

Choose a BLAST algorithm

BLAST

Search database RefSeq Select proteins (refseq_select) using PSI-BLAST (Position-Specific Iterated BLAST)

☒ Show results in a new window

Algorithm parameters

Note: Parameter values that differ from the default are highlighted in yellow and marked with ♦ sign

Restore default search parameters

General Parameters

Max target sequences

500

Select the maximum number of aligned sequences to display

Short queries

☒ Automatically adjust parameters for short input sequences

Expect threshold

♦ 1e-40

Word size

3

Max matches in a query range

0

Scoring Parameters

Matrix

BLOSUM62

Gap Costs

Existence: 11 Extension: 1

Compositional adjustments

Conditional compositional score matrix adjustment

Filters and Masking

Filter

♦ ☒ Low complexity regions

Mask

☐ Mask for lookup table only

☐ Mask lower case letters

PSI/PHI/DELTA BLAST

Upload PSSM

Choose File no file selected

PSI-BLAST Threshold

0.005

Pseudocount

0

BLAST

Search database RefSeq Select proteins (refseq_select) using PSI-BLAST (Position-Specific Iterated BLAST)

☒ Show results in a new window