



TRANSFAC[®] release 2024.2

The TRANSFAC[®] database on transcription factors, their genomic binding sites and DNA-binding motifs (PWMs), contains this new feature:

• JASPAR 2024 matrix library integration

New position frequency matrices from the <u>JASPAR 2024</u> release either added as matrix entries (446 cases) or hyperlinked to existing counterparts in the TRANSFAC matrix library.

• New enhancer data

2,045 new human and mouse enhancers have been integrated together with 2,693 high confidence enhancer - promoter interactions (EPI).

• Enhanced human SNP content

The 2023 dbSNP release 156 data for human has been integrated and increases the number of SNPs mapped to promoter, enhancer, and silencer sequences by more than 13,800,000 new single nucleotide variatons compared to the previously used version 155.

• Ensembl version update

Genomic information for genes, promoters, and ChIP fragments for the species human, mouse, rat, pig, macaque, Drosophila, and Arabidopsis is now based on Ensembl release 112.

• Rat genome assembly update

TRANSFAC now uses rat genome assembly mRatBN7.2.

• Additional interactions between human transcription factors

1,299 new human transcription factor interactions have been included from recent publications.