Resource Summary Report

Generated by NIF on Sep 6, 2026

MCF-10A

RRID:CVCL_0598
Type: Cell Line

Proper Citation

RRID:CVCL_0598

Cell Line Information

URL: https://web.expasy.org/cellosaurus/CVCL_0598

Proper Citation: RRID:CVCL_0598

Description: Cell line MCF-10A is a Spontaneously immortalized cell line with a species of origin Homo sapiens (Human)

Sex: Female

Defining Citation: PMID:1975513, PMID:12661003, PMID:15153330, PMID:15375546, PMID:16271952, PMID:17157791, PMID:17334996, PMID:19582160, PMID:20169162, PMID:22414580, PMID:24009699, PMID:24094812, PMID:24162158, PMID:24176112, PMID:24262153, PMID:24389870, PMID:25485619, PMID:25877200, PMID:25892236, PMID:25960936, PMID:26055192, PMID:26218769, PMID:26589293, PMID:28196595, PMID:28287265, PMID:28596718, PMID:28889351, PMID:29273624, PMID:29444910, PMID:29561695, PMID:30787054, PMID:32782317, PMID:34238275, PMID:35666001

Comments: Part of: MD Anderson Cell Lines Project., Part of: JWGray breast cancer cell line panel., Part of: ICBP43 breast cancer cell line panel., Part of: Cancer Dependency Map project (DepMap) (includes Cancer Cell Line Encyclopedia - CCLE)., Group: Patented cell line.

Category: Spontaneously immortalized cell line

Organism: Homo sapiens (Human)

Name: MCF-10A

Synonyms: MCF 10A, MCF.10A, MCF10A, MCF10-A, MCF10a, MCF-10 Attached, Michigan Cancer Foundation-10A

Cross References: BTO:BTO_0001939, CLO:CLO_0007599, EFO:EFO_0001200, MCCL:MCC:0000305, AddexBio:C0006015/4976, ArrayExpress:E-MTAB-2706,

ArrayExpress:E-TABM-157, ATCC:CRL-10317, BCRJ:0161, BioGRID_ORCS_Cell_line:40, BioSample:SAMN03471375, cancercelllines:CVCL_0598, CCRID:1101HUM-PUMC000406, CCRID:3101HUMSCSP575, ChEMBL-Cells:CHEMBL3307364, ChEMBL-Targets:CHEMBL614321, CLS:305026, Cosmic:1136376, Cosmic:1176649, Cosmic:2318371, Cosmic:2560254, DepMap:ACH-001357, EGA:EGAS00001000610, ENCODE:ENCBS066ENC, ENCODE:ENCBS067ENC, ENCODE:ENCBS317EPD, ENCODE:ENCBS417KGL, ENCODE:ENCBS617ENC, ENCODE:ENCBS618ENC, ENCODE:ENCBS619ENC, ENCODE:ENCBS620ENC, ENCODE:ENCBS621ENC, ENCODE:ENCBS622ENC, ENCODE:ENCBS623ENC, ENCODE:ENCBS868SSJ, GEO:GSM50033, GEO:GSM155217, GEO:GSM320171, GEO:GSM350543, GEO:GSM498022, GEO:GSM498026, GEO:GSM756371, GEO:GSM844584, GEO:GSM845395, GEO:GSM1053724, GEO:GSM1172882, GEO:GSM1172973, GEO:GSM1238116, GEO:GSM1328939, GEO:GSM1328940, GEO:GSM1328941, GEO:GSM2258704, GEO:GSM2258705, GEO:GSM2258706, GEO:GSM2258707, GEO:GSM2258708, GEO:GSM2258709, GEO:GSM2258710, GEO:GSM2258711, GEO:GSM2258712, GEO:GSM2258713, GEO:GSM2258714, GEO:GSM2258715, GEO:GSM2258716, GEO:GSM2258717, GEO:GSM2258718, GEO:GSM2258719, GEO:GSM2258720, GEO:GSM2258721, GEO:GSM2258944, GEO:GSM2258945, GEO:GSM2258946, GEO:GSM2862786, GEO:GSM2862787, GEO:GSM2862788, IARC_TP53:24292, IBRC:C10788, IGRhCellID:MCF10A, IZSLER:BS CL 174, KCB:KCB 2014066YJ, LINCS_HMS:50583, LINCS_LDP:LCL-2085, Lonza:131, MetaboLights:MTBLS401, NCBI_Iran:C609, PharmacoDB:MCF10A_891_2019, PRIDE:PXD000309, PRIDE:PXD000593, PRIDE:PXD000691, PRIDE:PXD003370, PRIDE:PXD005339, PRIDE:PXD008222, PRIDE:PXD009668, PRIDE:PXD028400, Progenetix:CVCL_0598, PubChem_Cell_line:CVCL_0598, TOKU-E:2378, Wikidata:Q54904280

ID: CVCL_0598

Hierarchy: cvcl_3633

Record Creation Time: 20220427T220750+0000

Record Last Update: 20260905T181113+0000

Ratings and Alerts

No rating or validation information has been found for MCF-10A.

No alerts have been found for MCF-10A.

Data and Source Information

Source: Cellosaurus

Usage and Citation Metrics

We found 6422 mentions in open access literature.

Listed below are recent publications. The full list is available at NIF .

Przanowska R, et al. (2026) IL-6R blockade with tocilizumab disrupts pericyte- and tumor cell-driven IL-6/STAT3 signaling, enhancing docetaxel efficacy in ER+ breast cancer. bioRxiv : the preprint server for biology.

Pyun WY, et al. (2026) Nutrient Availability Dictates Cancer Metabolism-Based Therapeutic Responses to Nononcology Drugs. Cancer research, 86(5), 1194.

Yang Z, et al. (2026) Syndecan-1-targeted therapeutic antibody impairs macropinocytosis and elicits antitumor immunity in pancreatic cancer. Cell reports. Medicine, 7(2), 102613.

Kim NY, et al. (2026) HER2-dependent paraptosis and ferroptosis induction by cannabidiol in breast cancer cells. Biochimica et biophysica acta. Molecular basis of disease, 1872(4), 168177.

Yang T, et al. (2026) Covalent Inhibition of SHMT2 by Gambogic Acid Induces Ferroptosis Through Mitochondrial Collapse in Triple-Negative Breast Cancer. Advanced science (Weinheim, Baden-Wurttemberg, Germany), 13(42), e20252.

Cando LF, et al. (2026) Targeting microRNA let-7b-5p-mediated aberrant androgen receptor signaling for prevention of hormone receptor-negative breast cancer. NPJ breast cancer.

Russo MR, et al. (2026) Protocol for cell cycle-resolved high-content imaging of transcription condensate dynamics in human cells. STAR protocols, 7(2), 104589.

Mathieu C, et al. (2026) Inhibition of TRAP1 in the C-terminal domain influences mitochondria properties and breast cancer cell metabolism. Biomedicine & pharmacotherapy = Biomedecine & pharmacotherapie, 196, 119060.

Marmolejo CO, et al. (2026) Precise control of transcription condensates across S phase balances linker histone expression with DNA replication, ensuring genome stability. Molecular cell, 86(4), 640.

Alheety NF, et al. (2026) Integrated DFT, Molecular Docking, and In Silico ADME Analysis of New Benzimidazole Derivatives as Promising Anticancer Candidates Targeting MCF-7 Cells. Chemistry & biodiversity, 23(2), e03385.

Xiao X, et al. (2026) Single-Mitochondrion ATP Profiling Directs Discovery of Targetable OXPHOS Dependency in Cancers. Advanced science (Weinheim, Baden-Wurttemberg, Germany), 13(21), e13341.

Li X, et al. (2026) Integration of Demethylation-Switchable Deoxyribozyme with Controllable Self-Assembly of Branched DNA Nanostructures Enables In Situ Monitoring of FTO Demethylation in Living Cells. Analytical chemistry, 98(7), 5614.

den Hollander P, et al. (2026) EMT-induced stem cell and mesenchymal programs can be decoupled via cell division and ESRP1-dependent mechanisms. iScience, 29(1), 114284.

Yang DM, et al. (2026) Isolation, Structural Elucidation, and Biological Evaluation of Homoisoflavonoids From Pterolobium Macropterum. Chemistry & biodiversity, 23(4),

e71207.

Berardi V, et al. (2026) Regulatory BC200 RNA promotes breast carcinogenesis by repressing BRCA1 gene expression. iScience, 29(4), 115267.

Venkatesh J, et al. (2026) LINC01929 mediates breast cancer immunosuppression and is an immunotherapy target. iScience, 29(4), 115381.

Rivera-Caraballo KA, et al. (2026) Oncolytic HSV-1-Mediated JAG1 Blockade Induces Glioma Senescence-Associated Secretory Phenotype to Increase Macrophage Activation and Cetuximab-Mediated Senolysis. Cancer research, 86(5), 1232.

Eason M, et al. (2026) Delivery of Pleckstrin-Homology Domains Suppresses PI3K/Akt Signaling and Breast Cancer Metastasis. Advanced science (Weinheim, Baden-Wurttemberg, Germany), 13(30), e18339.

Zhang Z, et al. (2026) A convergent uPAR-positive tumor ecosystem creates broad vulnerability to CAR T cell therapy. Cell, 189(10), 2898.

Chatterjee E, et al. (2026) Autophagy-lysosomal dependency defines a vulnerable physiological state in drug-tolerant persister cells of triple-negative breast cancer. Apoptosis : an international journal on programmed cell death, 31(5).