

Cell Line MH7A | 305036

General Information

Description	MH7A is a human breast cancer cell line derived from a primary mammary carcinoma. It is characterized by high tumorigenicity, anchorage dependence, and resistance to anoikis. The cell line is immortalized by SV40 and expresses high levels of telomerase activity. MH7A cells are highly invasive and metastatic, forming nodules in subcutaneous tissue. The cell line is characterized by high levels of expression of MMP-9, MMP-13, and TIMP-1. The cell line is also characterized by high levels of expression of NF-κB, JAK-STAT, and MAPK signaling pathway components.
Organism	Human
Tissue	Breast
Disease	Breast cancer (Primary mammary carcinoma; SV40 immortalized; High tumorigenicity; High metastatic potential)
Metastatic site	Subcutaneous tissue (High tumorigenicity; High metastatic potential)
Applications	Cell culture; Drug screening; Tumor models; MMP/TIMP; NF-κB/JAK-STAT/MAPK; Invasion assays

Cell Culture

Age	1-3 years
Gender	Female
Ethnicity	White
Morphology	Epithelial
Cell type	Epithelial cells
Growth properties	High

Cell Line Characteristics

Citation	MH7A (Cell Line) Cytion 305036
Biosafety level	1
NCBI_TaxID	9606
CellosaurusAccession	CVCL_0427

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GMO Status

GMO-S1: MH7A is a derivative of the SV40-transformed human mammary epithelial cell line T-47D. It is not a transgenic cell line, but it contains a SV40 genome.

Cell Line: MH7A-305036

Cell Line: MH7A

Culture Medium

RPMI 1640, w: 2.0 mM CaCl_2 , w: 2.0 g/L NaHCO_3 (Cytion 820700a)

Supplements

10% FBS

Dissociation Reagent

Accutase, 5 min, 37°C

Doubling time

24-36 h

Subculturing

Cells are grown in 96-well plates. For subculturing, cells are detached with Accutase and seeded into new plates. The medium is replaced with fresh medium every 3-5 days. Cells are grown at 37°C.

Split ratio

1:8

Seeding density

1×10^4 cells/cm²

Fluid renewal

2-3 times per week

Post-Thaw Recovery

Cells are thawed in a water bath at 37°C. The cells are then seeded into a new plate. The medium is replaced with fresh medium every 24 hours.

Freeze medium

Cells are grown in 96-well plates. For freezing, cells are detached with Accutase and seeded into new plates. The medium is replaced with fresh medium every 3-5 days. Cells are grown at 37°C.

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**Thawing and
Culturing Cells**

1. XXXX XXXXXXXXXX XXXX XXXX XXXXXXXXXX XXX XXXXXXXXXX, XXX XXXXXXXXXX XXXXXXXXXX XXXX XXX XXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX
2. XXX XXXXX XXXXXXXXXX, XXXXX XXX XXXXXXXXXX XXXXXXXXXX XXX XXXXXXXXXX XXXXXXXXXX -150°C XXX XXXXXXXXXX XXX XXXXXXXXXX XXXXXXXXXX, XXX XXXXXXXXXX
3. XXXXXXX XXXXXXX XXXXXXXXXX, XXXXXXX XXX XXXXXXXXXX XXXXXXXXXX XXX XXX XXXXXXXXXX XXXXXXXXXX XXX XXXXXXXXXX XXX 37 XXXXXXXXXX XXXXXXXXXX XXX XXX XXXXXXXXXX
4. XXX XXX XXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX, XXXXX XXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX 70% XXXXX XXXXXXXXXX
5. XXX XXXXXXXXXX XXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX XXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX 15 μ" XXXXXXXXXX 8 μ" XXX XXX XXXXXXXXXX XXXXXXXXXX
6. XXXXXXX XXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX -300 x g XXXXXXXXXX 3 XXXXX XXX XXXXXXXXXX XXX XXXXXXXXXX, XXXXXXX XXXXXXXXXX XXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX
7. XXXXXXX XXXXXXXXXX XXX XXXXXXXXXX XXXXXXXXXX -10 μ" XXX XXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX, XXXXXXX XXX XXXXXXXXXX XXX XXX XXXXXXXXXX XXXXXXXXXX T2
8. XXXXXXXXXX XXX XXXXXXXXXX XXX-XXXXXXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX XXX XXX XXXXXXXXXX, XXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX XXXXXXXXXX

**Incubation
Atmosphere**

37°C, 5%_{CO2}, XXXXXXXXXX XXXX

**Shipping
Conditions**

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**Storage
Conditions**

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