T47D/TR-1 Cell Line

Catalogue number: 152108
Sub-type: Continuous
Images:

Contributor

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Images:

Tool details

***FOR RESEARCH USE ONLY**

Name: T47D/TR-1 Cell Line

Alternate name:

Class:
Conjugate:
Description: The T47D/TR-1 cell line is a breast cancer cell line resistant to fulvestrant (Faslodex). This cell line has been established from T47D/S2 cells by long term treatment with 1 nM tamoxifen. T47D/TR-1 is adherent and the morphology is polygonal epithelial. T47D/TR-1 cells are oestrogen receptor (alpha) positive, they also express progesterone receptor. T47D/TR-1 are growth inhibited by fulvestrant. Antioestrogen resistance is a major problem in breast cancer treatment. Therefore, the search for new therapeutic targets and biomarkers for antiestrogen resistance is crucial. This cell line allows the study of the mechanisms involved in tamoxifen resistant breast cancer cell growth.
Purpose:
Parental cell: T47D/S2
Organism: Human
Tissue: Breast
Model: Tumour line
Gender:
Isotype:
Reactivity:
Selectivity:
Host:
Immunogen:
Immunogen UNIPROT ID:
Sequence:
Growth properties:
Production details:

The T47D/TR-1 cell line has been established by long term treatment of T47D/S2 cells with 1 uM tamoxifen. Clonal selection was performed in medium without tamoxifen. After growth in presence of 1 uM tamoxifen for 10 months, the growth rate was similar to the parental cells.
Formulation:
Recommended controls:
Bacterial resistance:
Selectable markers:
Additional notes:

Target details

Target: Oestrogen receptor

Target alternate names:

Target background:

Molecular weight:

Ic50:

Applications

Application: Determining molecular mechanisms around tamoxifen resistance
Application notes: T47D/TR-1 cells are ER alpha positive and express progesterone receptor, although at reduced level compared to parental T7D/S2 cells. T47D/TR-1 are growth inhibited by fulvestrant.

Handling

Format: Frozen
Concentration:
Passage number: Passage 164 (AL3569, AL3570)
Growth medium: Phenol red free RPMI 1640 + 2% FCS + glutamax + 8ug Insulin/ml + 1 uM tamoxifen
Temperature: 37° C
Atmosphere: 5% CO2
Volume:
Storage medium:
Storage buffer:
Storage conditions: Liquid Nitrogen
Shipping conditions: Dry ice

Related tools

Related tools: T47D/S2 Cell Line

References

References: van Welsem et al. 2018. Nucleic Acids Res. 46(21):11251-11261. PMID: 30203048. ; Dot1 promotes H2B ubiquitination by a methyltransferase-independent mechanism. ; Vlaming et al. 2016. Elife. 5:. PMID: 27922451. ; Direct screening for chromatin status on DNA barcodes in yeast delineates the regulome of H3K79 methylation by Dot1.