

Product Information

MemDX™ Human CLDN18.2 NUGC4 Cell Line

Cat. No.: **S01YF-0123-KX70**

This product is for research use only and is not intended for diagnostic use.

Product Information

Target Protein

CLDN18.2

Target Protein Species

Human

Accession Number

NM_001002026.2

Protein Tag

Tag-free

Host Cell Type

NUGC4

Target Classification

Others

Target Family

Others

Target Research Area

Cancer Research

Related Diseases

Gastroesophageal Adenocarcinoma; Gastroesophageal Junction Adenocarcinoma

Product Properties

Morphology

Fibroblastoid cells growing as a monolayer

Assay Types

Drug screening and biological assays

Assay Reporter

Luc2

Resistance

Puromycin

Mycoplasma Testing

Negative

Sterility Testing

10 passages

Biosafety Level

Level 1

Activity

Yes

Quantity

5x10⁶ cells

Form

Frozen cells

Freeze Medium

70% RPMI 1640 + 20% FBS + 10% DMSO

Culture Medium

RPMI 1640 + 10% FBS + 0.5µg/mL Puromycin

Selective Antibiotic(s)

Regular antibiotics active against mycoplasmas, bacteria and fungi.

Handling Notes

Frozen cells should be thawed immediately upon receipt and grown according to handling procedure to ensure cell viability and proper assay performance.

Note: Do not freeze the cells upon receipt as it may result in irreversible damage to the cell line.

Disclaimer: We cannot guarantee cell viability if the cells are not thawed immediately upon receipt and grown according to handling procedure.

Incubation

37°C with 5% CO₂

Applications

Drug screening and biological assays

Application Notes

Cells were plated in a 384-well plate and incubated overnight at 37°C and 5% CO₂ to allow the cells to attach and grow. Cells were then stimulated with a control for high-throughput drugs screening and functional assays.

Use Restrictions

These cells are distributed for research use only.

Shipping

Dry ice

Storage

Liquid nitrogen

Target

Full Name

Claudin 18

Introduction

This gene encodes a member of the claudin family. Claudins are integral membrane proteins and components of tight junction strands. Tight junction strands serve as a physical barrier to prevent solutes and water from passing freely through the paracellular space between epithelial or endothelial cell sheets, and also play critical roles in maintaining cell polarity and signal transductions. This gene is upregulated in patients with ulcerative colitis and highly overexpressed in infiltrating ductal adenocarcinomas. PKC/MAPK/AP-1 (protein kinase C/mitogen-activated protein kinase/activator protein-1) dependent pathway regulates the expression of this gene in gastric cells. Alternatively spliced transcript variants encoding different isoforms have been identified.

Alternative Names

CLDN18; SFTA5; SFTPJ; claudin-18; surfactant associated 5; surfactant associated protein J; surfactant, pulmonary associated protein J; Claudin 18

Gene ID

[51208](#)

UniProt ID

[P56856](#)