

## What you need to know

# CDH1 Gene

### What does it mean to have a CDH1 pathogenic variant?

Having a *CDH1* pathogenic variant, also known as a mutation, means a person has a version of the *CDH1* gene that causes a cancer predisposition condition called Hereditary Diffuse Gastric Cancer (HDGC) syndrome.

### What is my risk for cancer if I have a CDH1 pathogenic variant?

If you have a *CDH1* pathogenic variant, you have an increased risk of developing certain types of cancer. However, not everyone who has a pathogenic variant will develop cancer.

### Lifetime Cancer Risks\*

	People who have a <i>CDH1</i> Pathogenic Variant
Diffuse gastric cancer (assigned male at birth)	42-70%
Diffuse gastric cancer (assigned female at birth)	33-83%
Lobular breast cancer (assigned female at birth)	39-60%
Colon cancer	Insufficient evidence, possibly increased

\*It is important to note that these risks are based on individuals who did not have regular screening and/or other treatments such as preventive surgery. There are data that suggest that people with a *CDH1* mutation can significantly decrease their risk of developing cancer by careful medical and surgical follow-up.

### How is diffuse gastric cancer different from other gastric cancers?

Diffuse gastric cancer (DGC) is also referred to as signet ring carcinoma. DGC is difficult to detect because no visible tumor is formed. Cancer cells spread under normal gastric tissue and are not visible on the surface of the stomach.

### If I have a CDH1 pathogenic variant, what is the chance my family members will have it too?

There is a 50% chance that a person with a pathogenic variant will pass it on to each of their children. In most cases, siblings of a person with a pathogenic variant have a 50% chance to have the pathogenic variant. Additionally, other family members are at risk to have the pathogenic variant.

