

ATM Moderate-Risk Gene Mutation

The ATM gene normally works to protect the body from cancer development. A genetic change (mutation) in the ATM gene causes the gene to stop working normally. When the ATM gene stops working normally, cancer risk increases

People with an ATM gene mutation have an increased risk of developing certain cancers.

Breast Cancer

Women with an ATM mutation have an increased risk of developing breast cancer, sometimes at a younger age. The average woman has a 10% to 20% lifetime risk of developing breast cancer. Women with an ATM mutation have an increased lifetime risk of developing breast cancer at about 24% to 48%. The risk may be higher in some families. The change to develop a new or second breast cancer is unknown.

Pancreatic Cancer

Men and women with an ATM gene mutation have an increased risk of developing pancreatic cancer. The exact risk of developing pancreatic cancer is unknown

Other Cancers

Men and women with an ATM gene mutation may have an increased risk of developing other types of cancer. The exact risk of developing other cancers is unknown.

Screening and Prevention

Screening helps detect cancer as early as possible when it may be easier to treat. People with an ATM gene mutation may benefit from additional screenings. Women with an ATM gene mutation may benefit from starting screening at an earlier age.

Screening recommendations depend on age, personal history, and family history. Your doctor's recommendations may include:

- Annual mammogram and breast magnetic resonance imaging (MRI) at age 40 or earlier based on family history
- Consider preventative breast surgery based on family history
- Consider pancreatic cancer screening based on family history

Patient Education



Recommendations may change as researchers learn more about how ATM mutations relate to cancer risks. Talk with your doctor about your care options.

Family Members

People with an ATM gene mutation inherited the mutation from either their father or mother. A person with the ATM gene mutation has a 50% (1 in 2) chance to pass down the ATM gene mutation to each child.

Family members may benefit from genetic testing when a person in the family has a genetic disorder. Predictive genetic testing is for family members who show no features or symptoms of the ATM gene mutation at the time of testing. Testing can help decide which family members should consider additional cancer screenings and preventive care.

Depending on family history, family members without the ATM gene mutation may still benefit from additional cancer screenings.

If both parents have an ATM gene mutation, their child can inherit 2 ATM gene mutations. Children with 2 ATM gene mutations are diagnosed with ataxia telangiectasia. This childhood condition often causes difficulty with coordinating movements, enlarged blood vessels, weakened immune system and increased cancer risk. If you have an ATM gene mutation, you may want to talk with your partner about testing to ATM gene mutations.

Resources

FORCE

www.facingyourrisk.org

FORCE is a nonprofit organization with resources for families with an increased risk for developing breast and ovarian cancer. FORCE has education resources and in-person and virtual support programs.

Bright Pink

www.brightpink.org

Bright Pink is a nonprofit organization that provides support and education to women ages 18 to 45 who have a high risk for developing breast and ovarian cancer.

Patient Education



The Genetic Information Nondiscrimination Act (GINA)

www.ginahelp.org

This website provides information about the laws protecting against discrimination based on genetic information. It includes information about employers and health insurance, and answers commonly asked questions about the Genetic Information Nondiscrimination Act (GINA).

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