Personalized Coronary Artery Disease (CAD) Screening, Prevention, and Management

CAD is the most common type of heart problem and is caused by the build-up of fatty deposits (plaque) in the arteries of your heart.[1,2] Over time, this can reduce blood flow to your heart, which can cause chest pain, a heart attack, or even sudden death.[1] Your CAD risk is influenced by a combination of genetic and non-genetic factors. Genetic testing can help you understand your personal risk for CAD, so you and your health-care team can take proactive steps for better health outcomes.

Background

Genetics and Risk

- Changes in your DNA (genetic variants) can increase your risk of developing CAD.[2]
- Some people inherit genetic variants that greatly raise their CAD risk, but these are rare.
- Many others carry variants that each have a small impact on risk, but can add up to meaningfully increase CAD risk.

Clinical Factors and Risk

- Genetics are only part of the picture—other lifestyle and health factors can influence your CAD risk.[2]
- Clinical risk factors like your age, sex, race, cholesterol levels, diabetes status, blood pressure, smoking status, and history of anti-hypertension treatment can impact your risk for CAD.

Understanding Your Risk

- Knowing your personal risk is just the start—your provider can use your risk to create a care plan designed just for you.
- Personalized care plans can include tailored screening, prevention, and management recommendations that meet your specific healthcare needs.

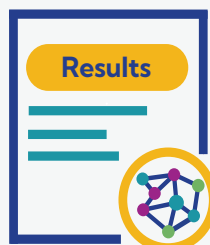## MyOme's Prostate Cancer Risk Prediction

Measuring Genetic Risk

MyOme's CAD test measures your genetic risk using a Polygenic Risk Score (PRS). Think of it like a scorecard that adds up all of the small-impact DNA changes that are linked to CAD. The higher the score, the greater your overall risk for developing CAD

Integrating Clinical Factors

MyOme's test goes beyond genetics by incorporating key clinical factors into your final risk score calculation.

Improved Risk Prediction

Results

By looking at your genes together with certain clinical factors, MyOme's test can predict your risk more clearly than tests that use only one piece of the puzzle.

Clinical Testing for CAD

Your doctor may suspect you have CAD based on symptoms or abnormalities on an electrocardiogram (ECG). They may recommend additional testing, such as an exercise stress test, coronary CT scan, blood tests, or other tests to see if there are any blockages in your coronary arteries.[1]

Reducing Your Risk of CAD

Following the American Heart Association (AHA) guidelines, called "Life's Essential 8", can help you reduce your risk of developing CAD[3]:

Sleep
7–9 hours/day

Blood Pressure
<120/80 mmHg

Physical Activity
- ≥150 min/week (Moderate)
- ≥75 min/week (Vigorous)

Fasting plasma glucose
<100mg/dL or A1C <5.7%

BMI
<25kg/m^2

Diet
- Rich in fruits, vegetables, whole grains, lean protein
- Low in sodium and added sugar

Smoking
Don't smoke or vape

Total Cholesterol
<200mg/dL

You may also talk to your doctor about guidelines for screening other CAD risk factors, like cholesterol levels, blood pressure, and blood sugar levels.[1,2]

Enable Personalized Care with MyOme's iPRS™ Test for CAD

myome® | **Proactive Health**
INTEGRATED PRS™
CORONARY ARTERY DISEASE

When it comes to your health, information is power. Ask your provider about our iPRS test to better understand your risk of CAD and make more informed health decisions.

Visit our website to learn more about genetic testing for personalized CAD risk prediction.

1. CDC. About Coronary Artery Disease (CAD). Web. Published 15 May 2024. Accessed 7 Apr 2025. **2.** CDC. Heart Disease Risk Factors. Web. Published 2 Dec 2024. Accessed 7 Apr 2025. **3.** Lloyd–Jones DM, et al. Life's Essential 8: Updating and Enhancing the American Heart Association's Construct of Cardiovascular Health: A Presidential Advisory From the American Heart Association. Circulation. 2022;146:e18–e43.