



American
Heart
Association.



Clinicians' Guide to Frequently Asked Questions About **Lipoprotein(α) Testing**

What is Lp(a)?

Lp(a), also known as lipoprotein(a), is a genetically inherited lipoprotein.¹

Elevated levels of Lp(a) have been associated with an increased risk of cardiovascular disease including coronary artery disease, stroke, and aortic stenosis.

Although an estimated

20%–30%

OF PEOPLE WORLDWIDE

have high levels of Lp(a), levels differ across racial and ethnic groups with **BLACK PERSONS OF AFRICAN DESCENT AND SOUTH ASIANS** having the highest median levels.^{1,2}

Although treatment options for high Lp(a) are limited, there are some lifestyle changes and medication therapies that can assist with lowering a patient's overall risk for



heart disease. Some of the most common approaches to managing individuals with high Lp(a) levels are intensive lifestyle modifications (e.g., taking medications as prescribed, abstaining from tobacco use, eating heart-healthy foods, regular exercise, maintaining a healthy weight, limiting alcohol use, getting adequate sleep), cardiovascular screening(s), and decreasing lipid levels with lipid lowering therapies.³ As the community eagerly awaits the outcomes of various medical advancements regarding Lp(a) treatment, healthcare professionals can consider incorporating testing into their individual practices as another tool to assess patients' overall cardiovascular risk.



Why is it important to test Lp(a) levels?

High Lp(a) levels increase the likelihood of heart attack or stroke, especially in patients with familial hypercholesterolemia or signs of coronary heart disease. This is because Lp(a) can cause increased clotting leading to rapidly formed blockages in blood vessels.¹ Clinicians utilize various tools to assess patients' overall cardiovascular risk; testing Lp(a) levels can be thought of as an additional tool used to assess risk in terms of genetics.⁴ Checking Lp(a) levels can also present an opportunity for healthcare professionals to reduce the likelihood of serious cardiac events via primary prevention.⁵



Who should be tested?

Although there is no consensus on universal screening, most organizations suggest testing in adult patients with:

- High risk for ASCVD
- Strong family history of ASCVD
- A need for more clarification of risk¹

In addition to this population, clinicians should also consider testing patients who have **known family history of high Lp(a), personal or family history of premature heart disease, or a diagnosis of familial hypercholesterolemia (FH).**² Clinicians can also consider Lp(a) testing for any patient that expresses interest in learning more about their cardiovascular risk.



Frequently Asked Patient Questions

Discussing Lp(a) with patients can be challenging. Informational and educational fliers and websites can assist with patient education, but patients may have questions they wish to be answered by a trusted healthcare professional.

1. What is Lp(a)?

This is one of the most common questions a clinician will be asked when they recommend Lp(a) testing to patients. Although it was discovered in 1963, Lp(a) is still relatively new to the general population thanks to increased awareness and education efforts.²

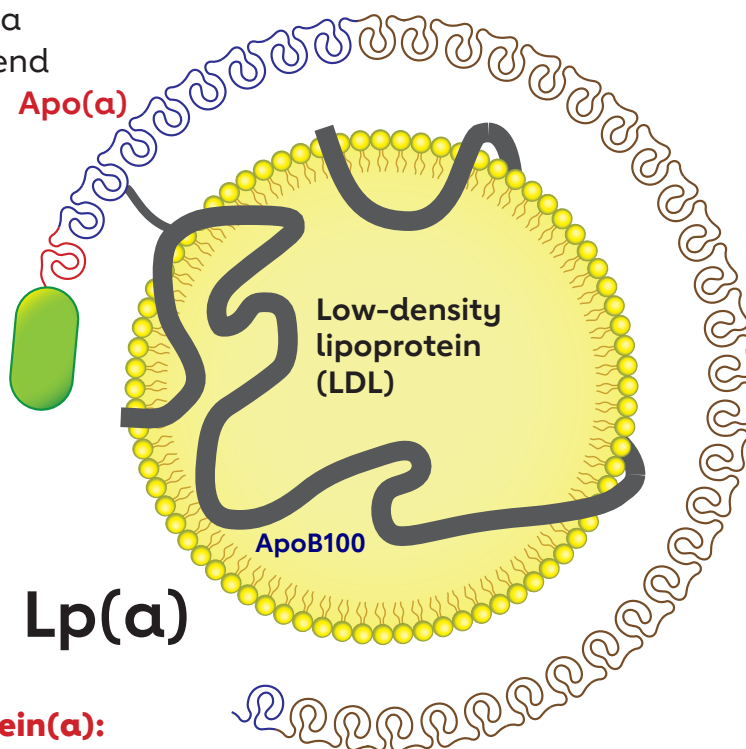
It is important to explain what a lipoprotein is:

Lipoproteins are particles made of protein and fats (lipids).

They carry cholesterol through your bloodstream to your cells.⁶

Next, provide information about lipoprotein(a):

Lp(a) is a lipoprotein that has an extra attachment called Apo(a) that causes it to stick to the walls of blood vessels, restricting blood flow and increasing the risk for heart attack or stroke.¹



2. Why are you testing me?

When asked this question, it is important to focus on the patient's history and risk factors to ensure they understand why **they** are being tested. Knowing a patient's Lp(a) level can provide additional insights for a clinician as they are assessing the patient's risk for heart attack or stroke and helps them plan accordingly.

Explain some common reasons for testing a patient's Lp(a) level, such as:

- A biological family history of heart disease
- Familial hypercholesterolemia
- High LDLs levels
- History of premature CAD
- Recurrent heart events
- Family history of high Lp(a)⁷

By using this and any additional information specific to the patient, clinicians can make Lp(a) testing feel relevant, thus improving buy-in and promoting shared decision-making.



3. What can I do if my Lp(a) levels are high?

This is a top concern of both patients and clinicians since no medications for lowering high Lp(a) have been approved for clinical use.⁸ Patients may feel anxious after learning what Lp(a) is and what it can mean for their cardiovascular health.

It is important for clinicians to reiterate that high Lp(a) is not a result of poor health decisions the patient made, but a genetic trait that they have and there are options available that can mitigate their overall risk of cardiovascular disease or events.

Discuss the risk enhancing levels of Lp(a):

An Lp(a) of **≥ 50 mg/dL (or ≥ 125 nmol/L)** has been established for clinical significance.⁹

Currently, the best approach in management of patients with high Lp(a) levels is to lower overall ASCVD risk.¹⁰ This can be done by targeting LDL-C with intensive lifestyle modifications, statins and other lipid lowering therapies.¹

Encourage **cascade screening** of first-degree relatives.

What is cascade screening?

Cascade screening is a method used to determine if first-degree relatives of a patient with a genetic condition are also at risk of developing that same condition.¹¹

It is important to highlight the benefits of cascade screening when encouraging patients to have their families' Lp(a) levels checked after discovering they have high Lp(a).

- **Early Detection:** Discovery of a condition before any symptoms have a chance to occur.
- **Preventative Measures:** Early management of other risk factors.
- **Family Health:** Creating better overall health outcomes for family members by making them aware of genetic risks.

First-degree relatives to include in cascade screenings are:

- Parents
- Siblings
- Offspring



4. How much does an Lp(a) test cost?

Another big concern when recommending unfamiliar testing for patients is out-of-pocket costs.

Fortunately, health insurance often covers Lp(a) testing, and with more data and literature supporting testing once in a lifetime, more insurance companies have started to cover the tests under certain diagnosis codes.

These codes include:

- Z83.430 Family history of elevated Lp(a)
- E78.5 Hyperlipidemia (unspecified)
- E78.01 Familial Hypercholesterolemia



Consider contacting the insurance company with CPT code 83695 (Lipoprotein (a) test) to get additional information about coverage.

5. Will there be more treatment options in the future?

Lipoprotein apheresis is a Food and Drug Administration approved adjunctive therapeutic option for treating refractory high levels of low-density lipoprotein cholesterol (LDL-C) and lipoprotein(a), in children and adults with clinical heterozygous and homozygous familial hypercholesterolemia who meet the criteria.¹² However, in the future we may have additional therapeutic agents to lower Lp(a).

Lp(a) professional education resources available at
www.heart.org/lpadiscovery



Novartis Pharmaceuticals Corporation is proud to support the American Heart Association's Lp(a) Community Health Centers Discovery Project.

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