Consensus panel recommendation for incorporating lipoprotein-associated phospholipase A2 testing into cardiovascular disease risk assessment guidelines.


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BACKGROUND: A consensus panel was formed to review the rapidly emerging literature on the vascular-specific inflammatory marker lipoprotein-associated phospholipase A2 (Lp-PLA2) and to update recommendations for the appropriate use of this novel biomarker in clinical practice. The recommendations of the panel build on guidelines of the Adult Treatment Panel III (ATP III) and the American Heart Association/Centers for Disease Control (AHA/CDC) for cardiovascular risk assessment.

DISCUSSION: Consistent with the ATP III guideline recommendations for the use of inflammatory markers, Lp-PLA2 is recommended as an adjunct to traditional risk assessment in patients at moderate and high 10-year risk. A simplified framework for traditional Framingham risk factor assessment is proposed. As a highly specific biomarker for vascular inflammation, elevated Lp-PLA2 levels should prompt consideration of increasing the cardiovascular risk category from moderate to high or high to very high risk, respectively. Because intensification of lifestyle changes and low-density lipoprotein (LDL) cholesterol lowering is beneficial in high-risk patients, regardless of baseline LDL cholesterol levels, consideration should be given to lowering the LDL cholesterol target by 30 mg/dL (1 mg/dL = 0.02586 mmol/L) in patients with high levels of Lp-PLA2.

CONCLUSION: Lp-PLA2 is recommended as a diagnostic test for vascular inflammation to better identify patients at high or very high risk who will benefit from intensification of lipid-modifying therapies. However, at this time Lp-PLA2 cannot be recommended as a target of therapy.

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