BOSTON HEART
STATIN INDUCED MYOPATHY (SLCO1B1) GENOTYPE

Are your patients at increased risk for statin induced myopathy?

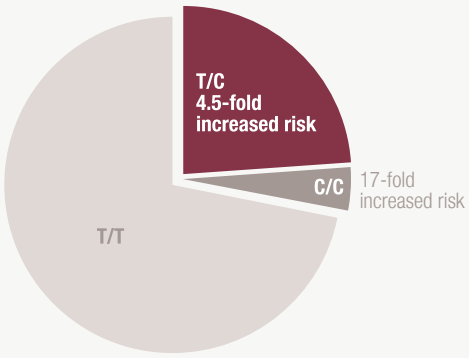
SLCO1B1 helps you:

Determine effective treatment

Genetic results from Boston Heart include specific treatment considerations based on variant combinations to optimize drug effectiveness and to limit side effects from statin usage.

ABOUT 25% OF THE POPULATION

carries either one or two copies of the SLCO1B1 variant.[1-4]



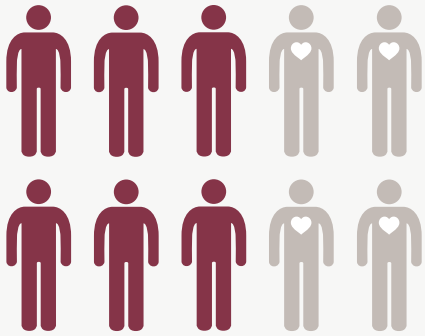
Research shows that 23% of people have one copy of the SLCO1B1 variant and 2% have two copies[1, 4] —that increases their risk up to 4.5-fold and up to 17-fold respectively for developing significant myopathy due to statins.[2]

Enable adherence

Statins have been shown to significantly reduce the risk of heart disease, stroke, and need for coronary bypass or coronary angioplasty, yet patient compliance remains a significant problem.

60% OF PATIENTS

who stopped taking a statin cite muscle pain as the primary reason for discontinuation.[5]



It has been reported that 7-29% of patients who take a statin experience statin associated muscle symptoms (SAMS)—the onset of muscle aches, spasms, weakness and/or pain associated with statin therapy.[5-7]

Research shows that patients who received SLCO1B1 genotype guided therapy were more likely to fill the statin prescription, take the medication and have a greater decrease in LDL cholesterol.[8]

Knowing your patient's SLCO1B1 genotype and risk of statin induced myopathy enables you to prescribe the right statin at the right dose for your patients.

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TREATMENT CONSIDERATIONS SPECIFIC TO SLCO1B1 GENOTYPES

If LDL-C is greater than 130 mg/dL, consider the following therapeutic options in addition to dietary modification and weight loss (if indicated):

Boston Heart Statin Induced Myopathy (SLCO1B1) Genotype	Ability to Metabolize Statins	Treatment Considerations
T/T	Normal statin metabolizer	Standard doses of statins are recommended.
T/C	Intermediate statin metabolizer	Consider using lower doses of water-soluble statins and if needed adding another class of LDL lowering drugs (i.e. non statins such as ezetimibe, colesevelam, niacin or fibrates).
C/C	Markedly decreased statin metabolizer	Consider using even lower doses of water-soluble statins or using statin therapy every other day and if needed adding another class of LDL lowering drug.

Water soluble statins: Pravastatin, rosuvastatin, pitavastatin, fluvastatin

Other significant risk factors for statin induced myopathy include age > 65 years, female gender, diabetes, physical activity, creatinine levels > 1.0 mg/dL, hypothyroidism, and use of calcium channel blockers and amiodarone.[2, 9]

ORDERING INFORMATION

Test Name: Boston Heart Statin Induced Myopathy (SLCO1B1) Genotype

Test Code: 835

Specimen Requirement: 1.0 mL blood collected in a K2 EDTA whole blood tube (lavender top)

REFERENCES

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