

**Specific Composition of *Camellia sinensis* Lowers LDL Cholesterol, Blood Pressure  
and Markers of Chronic Inflammation: A Randomized, Double-Blind, Placebo-  
Controlled Study**

**Running title:**

**CSC Lowers Cardiovascular Risk Factors**

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**ABSTRACT**

**Objective:** Determine if a specific composition of *Camellia sinensis* (CSC) can lower blood pressure, cholesterol, and markers of chronic inflammation.

**Methods:** Design: Randomized, double-blind, placebo-controlled study. Subjects: Healthy adults 18-70 years old. Intervention: Proprietary composition of *Camellia sinensis* (green tea) capsules, or a placebo, twice a day, for three months. Measures of Outcome: At three weeks, blood pressure, serum lipids, serum amyloid alpha (SAA), C-reactive protein (CRP), and IL-6 were measured.

**Results:** CSC decreased systolic BP by a mean of 4.2 points (p=0.004 vs. baseline BP). Diastolic BP decreased by a mean of 4.2 points (p=0.001 vs. baseline BP). Placebo had no significant effect on BP. CSC decreased LDL cholesterol by 11.7±4.9 mg/dl in subjects with baseline LDL>99 (P=0.017 vs. placebo). There was no significant effect on HDL cholesterol or triglycerides. CSC decreased serum amyloid alpha (SAA), a marker of chronic inflammation, by 42% (P=0.041 vs. baseline). Placebo had no significant effect on SAA. Adverse effects were mild and few, and not different from placebo

**Conclusions:** This proprietary composition of CSC is a safe and effective dietary supplement for lowering blood pressure, LDL cholesterol, and markers of chronic inflammation, all independent cardiovascular risk factors.