Saving money and lives in cardiovascular disease prevention

Strategies to prevent cardiovascular disease traditionally target single risk factors such as high blood pressure, high blood cholesterol or high blood sugar. Now a study published today in the *Bulletin of the World Health Organization*
calls for an alternate approach to treatment that could significantly reduce the number of people on medication while preventing a similar number of heart attacks and stroke.

The study, done in Seychelles, compares the typical approach of treating each risk factor with medication to an alternative strategy that prioritizes treatment to those people who have multiple risk factors that, when combined, put them at high total risk of heart attack or stroke.

The study shows that 60% of adults aged 40-64 years have a single risk factor, such as high cholesterol, that can meet the criteria for medication even if their total risk of cardiovascular disease is low. Under the alternate approach, only 5% of adults have a high total risk and so should receive treatment that targets multiple risk factors at the same time.

“If we treated only those with a high total cardiovascular risk, far fewer people would need to take medication and so this would reduce health-care costs significantly with comparable health benefits to the population,” says co-author Dr Pascal Bovet, from the University Institute of Social and Preventive Medicine at the University of Lausanne, Switzerland, and a consultant in the Ministry of Health of the Seychelles.

“The World Health Organization (WHO) recommends the total-risk approach for prevention of

heart attacks and strokes because it is highly cost-effective, affordable for low- and middle-income countries and brings a very good return for a modest investment," says Dr Shanthi Mendis, coordinator of Chronic Disease Prevention and Management at WHO.

This study is also important because it is one of the first to estimate cardiovascular risk and the impact of prevention strategies in the African region. The study shows that the percentage of adults with high cardiovascular risk in Seychelles is not markedly different than in other countries including China, Spain and the United States of America.

Read the paper here:

http://www.who.int/bulletin/volumes/89/4/10-082370/en/index.html