The application of genome-wide approaches to the study of atherosclerotic cardiovascular disease (ASCVD) and its risk factors is having a major impact on our understanding of this complex disease and our ability to prevent and treat it. Genome-wide common and rare variant studies and subsequent functional genomics approaches have provided important new insights into the biological pathways involved in lipoprotein metabolism and atherogenesis. The application of Mendelian randomization is allowing important inferences with regard to the causality of cardiovascular risk factors. The intense focus on human genetics is leading to the identification of new therapeutic targets for ASCVD. Application of genetic testing and new biomarkers in the clinical arena is likely to lead to greatly improved risk stratification and personalization of preventive and treatment paradigms. The cardiovascular field is rapidly moving into the precision medicine era.

**Daniel Rader, PhD**

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**Precision Medicine in Preventing and Treating Cardiovascular Disease**

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**Tuesday November 21, 2017 at 4:00 PM**

Pinn Hall Conference Center Auditorium, followed by a reception