Title (English)
Differential and co-expression of long non-coding RNAs in abdominal aortic aneurysm

Abstract
This project concerns an exploration of the presence and interactions of long non-coding RNA transcripts in an experimental atherosclerosis mouse model with relevance for human abdominal aortic aneurysm development. 187 long noncoding RNAs, two of them entirely novel, were found to be differentially expressed between angiotensin II treated (developing abdominal aortic aneurysms) and non-treated apolipoprotein E deficient mice (not developing aneurysms) harvested after the same period of time. These transcripts were also studied with regards to co-expression network connections. Eleven previously annotated and two novel long non-coding RNAs were present in two significantly disease correlated co-expression groups that were further profiled with respect to network properties, Gene Ontology terms and MetaCore© connections.

Keywords
LncRNA, lincRNA, abdominal aortic aneurysm, differential expression, co-expression, RNA-seq, WGCNA

Supervisors
Bengt Sennblad
Karolinska Institutet

Scientific reviewer
Magnus Lundgren
Uppsala University

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Biology Education Centre
Box 592, S-751 24 Uppsala
Tel +46 (0)18 4710000
Fax +46 (0)18 471 4687

Biomedical Center
Husargatan 3, Uppsala