ApoE and Alzheimer's Disease

Apolipoprotein E

- Involved in creating lipoproteins from lipids
- Three known alleles
 - e2 (rarest)
 - − e3 (most common ~50% of population)
 - e4 (10-15% of population)

ApoE2 and ApoE4 are correlated to changes in the risk of developing Alzheimer's

- ApoE2 decreases risk of developing AD
 - Only need 1 allele to get protection
- ApoE4 increases risk of developing AD
 - One allele (E3/E4) increases risk by 2-3 fold
 - Two alleles (E4/E4) increases risk by 12 fold