Reviewer's report

Title: Sequence variation in telomerase reverse transcriptase (TERT) as a determinant of risk of cardiovascular disease: the Atherosclerosis Risk in Communities (ARIC) Study

Version: 1
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Reviewer: Alexis Baass

Reviewer's report:

It is with interest that I have reviewed the manuscript entitled: ‘Sequence variation in telomerase reverse transcriptase (TERT) as a determinant of risk of cardiovascular disease: the Atherosclerosis Risk in Communities (ARIC) Study’. This manuscript describes the association between several SNPs of the TERT gene and the risk of CVD, stroke and mortality in both European and African Americans who composed the ARIC cohort. The authors concluded that there exists a weak association between rs2736122 and rs2853668 were nominally associated with incident myocardial infarction and stroke respectively. As mentioned by the authors none of the statistically significant associations presented in the manuscript remained significant after correction for multiple comparisons.

Major Comments:
1- The weak association between rs2736122 and rs2853668 and myocardial infarction and stroke respectively and the fact that these associations did not remain significant after correction for multiple comparison suggests that these associations could have been detected by pure chance or that the study lacks power to detect a true but weak effect of these SNPs. In both cases I believe that the findings of this manuscript would not generate sufficient interest in most readers of the BMC Medical Genetics journal.
2- The materials and method section should be shortened.
3- Please specify which risk factors were adjusted for in the second model.

Minor Comments:
4- The terms white and European Americans are used in the manuscript. The term European American would be preferable.

Level of interest: An article of limited interest

Quality of written English: Acceptable

Statistical review: Yes, but I do not feel adequately qualified to assess the statistics.
Declaration of competing interests:

I declare that I have no competing interests