

# International Journal of Advanced Research

Publisher's Name: Jana Publication and Research LLP

*www.journalijar.com*

## REVIEWER'S REPORT

Manuscript No.: IJAR-57681

**Title:** Association between Paraoxonase 1 Allelic Frequency Distribution, Adjusted Odds Ratios, and the Risk of Cardiovascular Diseases in a Moroccan population.

### Recommendation:

Accept after major revision ...

Rating	Excel.	Good	Fair	Poor
Originality			✓	
Techn. Quality			✓	
Clarity			✓	
Significance		✓		

Reviewer's ID: JPR-198

### *Detailed Reviewer's Report*

The manuscript addresses a relevant topic, but it has substantial issues in language, statistical interpretation, organization, methodology clarity, and scientific rigor. Many conclusions are overstated despite mostly non-significant odds ratios and wide confidence intervals.

### Major Comments

1. Extensive grammatical and formatting problems throughout the manuscript.
2. Statistical interpretation is weak; many ORs are non-significant but discussed as meaningful associations.
3. Confidence intervals are very wide, suggesting insufficient statistical power.
4. No clear correction for multiple comparisons despite many subgroup analyses.
5. Phenotype/genotype terminology is inconsistently used.
6. Tables are poorly formatted and difficult to interpret.
7. Some methodological details are unclear or incomplete.
8. The manuscript repeatedly states "risk" despite lack of statistically significant evidence.

### Scientific Concerns

## REVIEWER'S REPORT

9. Odds Ratio Interpretation
10. Most reported ORs cross 1.0:
  - OR 1.37 (0.62–3.04)
  - OR 1.97 (0.63–6.21)
  - OR 1.64 (0.77–3.49)

These are not statistically significant, so strong claims about increased cardiovascular risk are not justified.

11. RR subgroup is very small (n=18). Age- and sex-stratified analyses become underpowered and Results may be unstable.
12. The manuscript claims:
13. "PON1 192 R allele is responsible for cardiovascular disease..." This is too strong for an observational association study with mostly non-significant findings.

### Methodological Issues

14. No direct genotyping method described; phenotype estimation alone may be insufficient.
15. Confounding factors are not adequately controlled.
16. Medication use (statins, antihypertensives) could strongly influence PON1 activity.