

MEN'S HEALTH & WELLNESS



A systematic review and meta-analysis of the relationship between erectile dysfunction and the neutrophil-to-lymphocyte and platelet-to-lymphocyte ratios.



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Several studies were conducted to explore the association between hematological parameters and erectile dysfunction (ED), but the conclusions were contradictory with small sample size. The extensively search was conducted in PubMed, Cochrane Library and Web of science from inception to August 2021. Studies comparing the hematological parameter (at least NLR, PLR) between ED patients and healthy controls were eligible for the present meta-analysis. The differences in NLR and PLR between ED patients and healthy controls were assessed by calculating the standardized mean difference (SMD) and 95% confidence interval (95% CI). Eventually, 7 studies were remained for our meta-analysis, with a total of 929 ED patients and 737 healthy controls. For the methodological quality based on NOS, 5 studies were of high quality, scored 7, and 8. 2 studies were of moderate quality, scored 6. There were statistically significant differences in NLR values between ED patients and healthy controls, based on the pooled results (SMD: 0.53, 95% CI: 0.24-0.82). Pooled results from the 6 studies revealed that ED patients had higher PLR values than healthy controls (SMD: 0.70, 95%CI: 0.12-1.28). Our meta-analysis solidly confirmed the association between NLR, PLR and ED. Increased NLR and PLR should be independent risk factors for ED.

Keywords: erectile dysfunction; meta-analysis; neutrophil-to-lymphocyte ratios; platelet-to-lymphocyte ratios; review

RESOURCES: <https://pubmed.ncbi.nlm.nih.gov/34879439/>

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