A systematic review and meta-analysis of medical malpractice studies in Iran

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Background: Medical malpractice is a serious problem in the health care system. This study aimed the medical negligence **Methods:** Based on the PRISMA checklist, a search for scientific records was done separately by two researchers. All the articles that had selection criteria were evaluated in terms of methodological quality. Medical malpractice was assessed in four main divisions including negligence, Lack of skill, Carelessness and non-compliance with government regulations). The bias test was performed using the Egger's test. Revman software was used to analyze the data. Results: In the present study, 25 studies that examined the country's medical malpractice from April 1994 to March 2018 were included in the meta-analysis. Negligence has been implicated in 1,105 cases of the 2,068 claims. Lack of skill in 255 out of 2068 cases, 432 cases of carelessness and 244 cases of non-compliance with government regulations Were recorded the results of the metaanalysis showed that OR negligence was 0.76 (CI 95%: 0.66-0.87), lack of skill was 0.61 (CI 95%: 0.49-0.76), carelessness was 0.62 (CI 95%: 0.50-0.76) and non-compliance with government regulations was 0.66 (95% CI: 0.60-0.73). In the review of the confirmed negligence ratio of the registered complaint files, only 19 studies mentioned this ratio. The results of the meta-analysis of these 19 studies showed that the OR ratio of the confirmed negligence of complaints was 0.6 (95% CI: 0.41-0.86). From all claims, General surgeons had OR of confirmed medical malpractices, equal to 0.47 (CI 95%: 0.37-0.60), gynecologists with OR equal to 0.49 (CI 95%: 0.36-0.66), general practitioners with OR equal to 0.43 (CI 95%: 0.30-0.63) and orthopedic specialists with an OR of 0.44 (CI 95%: 0.32-0.61).

Conclusion: The results of this study help to understand the current position of medical negligence studies in the country to identify the cause of the malpractice and develop new studies for the future.

Keywords: Iran, medical error, medical malpractice, negligence.