

Impact of Traditional Bone Setting on Functional Outcome and Quality of Life After Musculoskeletal Injuries: A Population-Based Study in Sidama Region, Ethiopia

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Purpose: At the community level, evidence regarding the burden of musculoskeletal injuries is scarce and the impact of traditional bonesetting is difficult to assess. The main objective of this study is to take a community-based approach to determine the clinical outcomes, risk factors, and health-related quality of life (HRQoL) following a musculoskeletal injury in the Sidama Region, Ethiopia.

Methods: From December 2022 to January 2023, we conducted a population-based cross-sectional study and identified 830 participants who sustained extremity injuries. Demographic data, injury, type of treatment details, complications, and patient-reported HRQoL were collected using a pre-tested questionnaire. The association between complications, HRQoL, and risk factors was analyzed using binary logistic and linear regression models, respectively.

Results: Over half of the participants (56%) developed complications and 558 (67%) were treated by a traditional bone setter (TBS). An increased risk of developing complications was associated with low economic status (adjusted odds ratio [aOR] 2.96, 95% confidence interval [CI]: 1.91-4.58, $P < 0.001$), lack of formal education (aOR 2.38, 95% CI: 1.43-3.98, $P = 0.001$), and TBS treatment (aOR 4.15, 95% CI: 2.88-5.97, $P < 0.001$). Similar factors were found to increase the risk of poor HRQoL.

Conclusion: With a high incidence of complications among the study population, TBS treatment, lack of education, and poverty were found to increase the risk of developing complications and having a poor HRQoL. The Ministry of Health should consider regulating the scope of TBS practice to prevent severe injury-related complications, especially among the vulnerable population.