

Title: Health-related quality of life in post-stroke patients attended at tertiary-level hospitals in Bangladesh

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Abstract: Insufficient data on the health-related quality of life (HRQoL) of stroke survivors in less-resourced regions like Bangladesh emphasizes the need for understanding influencing factors. In this cross-sectional study, our objective was to assess potential factors associated with the HRQoL among stroke survivors in Bangladesh. The study included 424 stroke survivors (65% male, mean age 57.25 ± 12.13 years) undergoing rehabilitation at four tertiary-level hospitals in Bangladesh. The HRQoL was assessed using the European Quality of Life Scale-5 Dimensions (EuroQol-5D), covering mobility, self-care, usual activities, pain/discomfort, and anxiety/depression, along with a visual analog scale (VAS). Sociodemographic such as age, marital status, education, occupation, tobacco habit cohabitant situation, and health-related factors such as type and duration of stroke, co-morbidity, receipt of rehabilitation, and use of assistive devices served as independent variables. Bivariate logistic regression was utilized to ascertain the estimated risk factors for HRQOL, presenting odds ratios (OR) and a 95% confidence interval (CI) after adjusting for potential confounders. The study primarily involved participants from rural areas (57.8%) with primary education (67.7%). Stroke survivors reported a mean EQ summary index of 0.393 ± 0.46 and a VAS score of 40.43 ± 18 . A majority experienced a stroke within 1–3 months (66%), with 52.6% exhibiting left-side weakness. The results highlight significant challenges among survivors: 79.5% faced mobility issues, 81.1% were dependent in self-care, 87% had activity limitations, 70.8% suffered from bodily pain, and 84% experienced symptoms of anxiety or depression. Widowed or single survivors encountered greater difficulties in mobility (Adjusted Odds Ratio, AOR = 1.24, 95% CI = 0.35–4.45) and pain/discomfort (AOR = 2.85, 95% CI = 0.85–9.27) compared to their married counterparts. Those lacking access to rehabilitation services faced considerably higher challenges: mobility difficulties were nearly thirty times greater (AOR = 29.37, 95% CI = 8.85–97.50), difficulties in self-care were about forty-four times higher (AOR = 43.21, 95% CI = 10.02–186.41), challenges in usual activities were also forty-four times more frequent (AOR = 43.47, 95% CI = 5.88–321.65), pain/discomfort was nearly five times more prevalent (AOR = 4.35, 95% CI = 2.45–7.71), and anxiety or depression was over twenty times more common (AOR = 20.14, 95% CI = 7.21–56.35) compared to those who received rehabilitation services. The findings suggest that the enhancement of HRQoL in post-stroke patients in Bangladesh necessitates targeted interventions, including family support, tobacco cessation, recurrent stroke prevention, and effective rehabilitation services. Longitudinal studies are recommended for further confirmation of these findings.

Keywords: Stroke, Quality of life, Cross-sectional study, Rehabilitation, Bangladesh

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