

Extracorporeal Shock Wave Therapy for Management of Chronic Ulcers in the Lower Extremities

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Device and producing company:

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Introduction:

Management of chronic ulcers in the lower extremities is still a challenge for patients and health providers. Recent studies showed extracorporeal shock waves (ESW) to be effective in stimulating growth factors, inducing angiogenesis and healing of fractures and injuries. This study was designed to investigate the possibility of using ESW in the treatment of chronic wounds.

Methods:

Thirty patients with chronic post-traumatic, venous and diabetic ulcers unresponsive to conservative or advanced dressing treatments were counselled about the use of ESWT as alternative treatment for their wounds. Thirty-two wounds were treated, 16 of which healed completely within six sessions of ESW.

Results: In all of the non-healed wounds, decrease in the amount of exudates, increase in the percentage of granulation tissue compared with fibrin/necrotic tissue, and decrease in wound size were statistically significant after four to six sessions of ESWT ($p = 0.01$).

Discussion: ESW therapy seems to be a safe, feasible and cost-effective treatment for chronic ulcers in the lower extremities.

Conclusion: Further research and clinical trials are necessary to evaluate dose and time intervals of sessions to standardize a protocol of treatment in the management of chronic wounds.