INTRODUCTION

Causalgia, also known as complex regional pain syndrome type II, develops after a peripheral nerve injury or trauma. Causalgia patients have chronic pain that interferes with physical function and lowers their quality of life so treatments are implemented to improve physical function and reduce pain. Dorsal Root Ganglion Stimulation (DRG-S) is an effective treatment for CRPS-II of the lower extremities. The sub-analysis of data from the prospective, multi-center, REALITY study (NCT03876054) is to demonstrate the effectiveness of DRG-S in patients with causalgia.

METHOD

CRPS II subjects enrolled in the REALITY study (NCT03876054) who received DRG-S treatment were identified and analyzed based on focal pain area and affected nerve: Abdomen, Ankle/foot, Chest, Groin, Hip/pelvis, and Knee. Patient-reported data for pain intensity (NRS), global health (PROMIS-29), and Patient global impression of change (PGIC) were collected.

RESULT

Six-month data were available for 31 subjects: 1-Abdomen, 6-Ankle/foot, 1-Chest, 10-Groin, 5-Hip/Pelvis, and 8-Knee. 22/31 (71.0%) of patients had at least a 2-point decrease or a 30% decrease in pain at 6 months signifying “much-improved condition” for minimal clinically important differences. (Individual cohort scores are shown in Figs 2 and 3 above). The average NRS score improved from 26.8 ± 14.0 at baseline to 16.0 ± 14.6 (p = 0.0004). 25/31 (80.7%) of subjects reported improved physical function. 23/31 (75.2%) of subjects were satisfied or very satisfied with DRG-S and would recommend the procedure. Overall, 26/31 (83.9%) would redo the procedure.

DISCUSSION

DRG-S showed significantly improved conditions for pain scores and reduced catastrophizing thoughts for all patients. Pre-implant NRS pain score was reported as 7.9 (±1.9) and most patients reported high helplessness score on the PCS scale when compared to rumination and magnification. Six months post-implant, NRS pain score reduced to 3.2 (±2.9) with significantly improved PCS score. Helplessness at 6M decreased significantly.

In majority of patients reported improved physical function and would recommend the procedure.

CONCLUSION

DRG-S is effective in treating causalgia for various extremities.

REFERENCES