





OUTCOME OF EXTRACORPOREAL LIFE SUPPORT FOR DRUG INTOXICATION-INDUCED REFRACTORY CARDIOGENIC SHOCK: A SINGLE-CENTRE, 6-YEAR EXPERIENCE

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INTRODUCTION

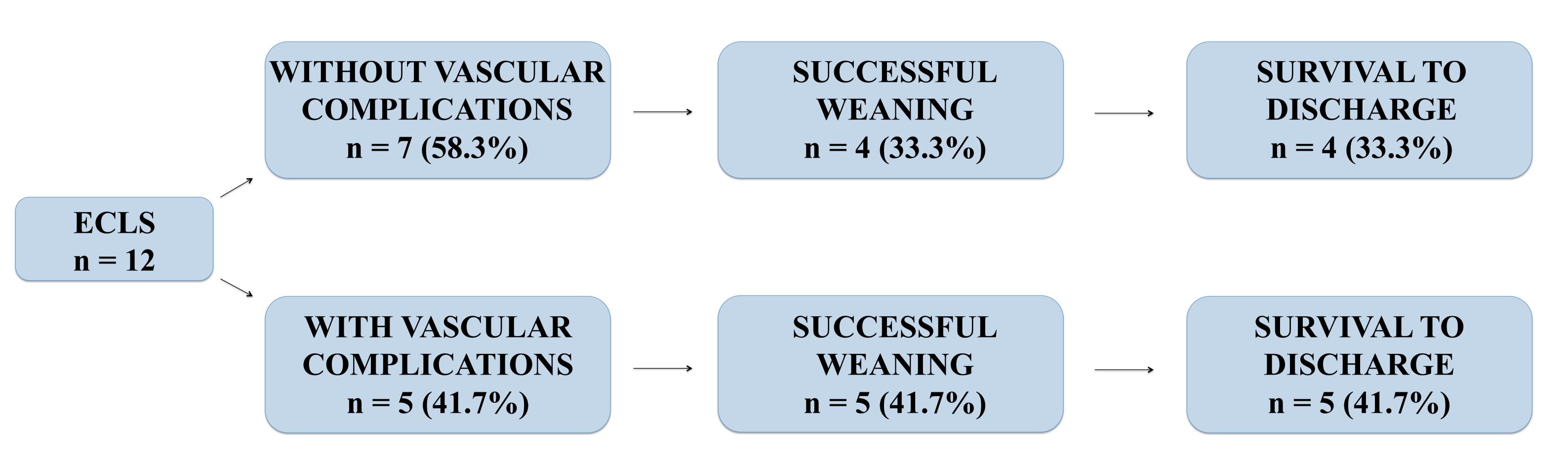
Drug intoxication may induce cardiogenic shock, which could be supported by extracorporeal life support (ECLS) in those cases refractory to conventional medical treatment. In the literature there is a paucity of data in this specific setting [1,2]. The aim of our study is to show the results of ECLS for drug intoxication-induced refractory cardiogenic shock in a single-centre experience.

METHODS

We retrospectively reviewed our experience with the use of ECLS for patients with refractory cardiogenic shock due to drug intoxication during a 6-year time period. The primary endpoints were successful weaning rate (ECLS decannulation without the need for reinsertion of ECLS or mortality within 48 h) and survival to hospital discharge.

RESULTS

Between January 2010 and December 2015, we performed 12 ECLS. Mean age was 44.2 ± 17.8 years and there was a prevalence of females (66.6%). Drug intoxication was mainly due to beta-blockers and calcium channel inhibitors (83.3%). However 7 patients (58.3%) had single drug overdose. Successful weaning rate and survival to hospital discharge with good neurological recovery were 75% (9 patients). Among patients weaned from ECLS mean duration of support was 2.7 ± 1.0 days. Three (25%) patients underwent ECLS implantation during cardiopulmonary resuscitation, 2 of them (66.6%) died while on mechanical circulatory support. Five (41.6%) patients developed lower limb ischemia and, among them, 2 (16.6%) underwent fasciotomy and another 1 (8.3%) amputation.



CONCLUSION

Refractory cardiogenic shock due to drug intoxication is one of the best indications for ECLS. Further data are however necessary in order to best understand the possible relation between drug intoxication and lower limb ischemia, which was quite superior to the reported rates for other indications.



REFERENCES

[1] de Lange DW, et al. Clin Toxicol (Phila) 2013;51:385-93

[2] Masson R, et al. Resuscitation 2012;83:1413-7