

SELF-INFLICTED PENETRATING CARDIAC INJURY: TWO DIFFERENT SURGICAL APPROACHES

Vladimir Stojiljković¹, Saša Živić¹, Dejan Perić¹, Aleksandar Kamenov¹,
Nenad Paunović¹, Marko Gmijović³, Dragan Milić^{1,2}

¹Department of Cardiac surgery, Clinical Center of Niš, Niš, Serbia

²University of Niš, Faculty of Medicine, Niš, Serbia

³Digestive Surgery Clinic, Clinical Center of Niš, Serbia

Contact: Vladimir Stojiljković
Cvjičeva 9/18, 18000 Niš, Serbia
E-mail: serbvlada@yahoo.com

Penetrating cardiac injuries represent a great challenge for the surgeon because of their lethality. It is estimated that more than 90% of mortality happens before the patient reaches the hospital and survival after stab wounds to the heart is about 50% as opposed to 11% after gunshot wounds.

A 58-year-old hemodynamically unstable male was brought to the ED with two stab wounds to the left chest. Two surgical approaches were applied to treat the injury. First, urgent left antero-lateral thoracotomy with left ventricle suture repair was performed. Few hours later, due to massive bleeding and hemodynamic instability, left ventricle repair through a median sternotomy with extracorporeal circulation and cardiac arrest was performed.

Heart injuries can be treated with two surgical approaches. Left thoracotomy can be feasibly applied in emergency department but median sternotomy provides better access to the heart and all important cardiovascular structures.

Prompt and early diagnosis associated with a well-trained surgical team can be crucial in the management of life-threatening cardiac injuries.

Acta Medica Medianae 2020;59(2):88-92.

Key words: penetrating, heart, injury