

Ishodi resinkronizacijskog liječenja zatajivanja srca u Kliničkom bolničkom centru Split

The outcomes of cardiac resynchronization therapy in University Hospital Centre Split

Ivo Božić,
Zrinka Jurišić*,
Josip Kedžo,
Ante Anić,
Toni Brešković,
Marina Jurić Paić,
Ivan Pletikosić

Klinički bolnički centar Split,
Split, Hrvatska

University Hospital Centre
Split, Split, Croatia

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***ADDRESS FOR CORRESPONDENCE:** Zrinka Jurišić, Klinički bolnički centar Split, Spinčićeva 1, HR-21000 Zagreb, Croatia. / Phone: +385-91-5262-844 / E-mail: zrinkacn@gmail.com

ORCID: Ivo Božić, <http://orcid.org/0000-0003-3508-1536> • Zrinka Jurišić, <http://orcid.org/0000-0001-7583-9036>
Ante Anić, <http://orcid.org/0000-0002-6864-3999> • Josip Kedžo, <http://orcid.org/0000-0003-3845-7199>
Toni Brešković, <http://orcid.org/0000-0001-7266-2087> • Marina Jurić Paić, <http://orcid.org/0000-0003-4117-0105>
Ivan Pletikosić, <http://orcid.org/0000-0001-5925-090X>

Uvod: Resinkronizacijsko liječenje (CRT) je standard u liječenju bolesnika sa zatajivanjem srca, reduciranom sistoličkom funkcijom (LVEF \leq 35%) i produženim trajanjem QRS kompleksa (QRS \geq 130ms) nakon postignutog optimalnog medikamentnog liječenja¹.

Bolesnici i metode: U ovoj retrospektivnoj studiji uključeni su bolesnici kojima je implantiran biventrikulski elektrostimulator srca s (CRT-D) ili bez defibrilatorske funkcije (CRT-P) od 2011. do travnja 2018. godine. Cilj je bio utvrditi uspješnost CRT pri kontrolnom pregledu nakon šest mjeseci.

Rezultati: Uključeno je 40 ispitanika, 23 muškarca te 17 žena prosječne životne dobi 66,3 godine. Ishemijsku kardiomiopatiju (IDCM) su imala 4 (10%) bolesnika dok je neishemijsku kardiomiopatiju (NIDCM) imalo 36 (90%) ispitanika podjednake distribucije po spolu. Prosječna širina QRS je bila 160 ms, a tipični blok lijeve grane (LBBB) po Straussu je imalo 75% bolesnika. U trenutku implantacije 6 (15%) bolesnika je imalo permanentnu fibrilaciju atrijsa. Prosječna vrijednost LVEF je bila 28% uz prosječan funkcionalni status NYHA III. U svih bolesnika s IDCM implantiran je CRT-D. U 19 bolesnika s NIDCM je implantiran CRT-P, a u 17 bolesnika CRT-D. Pri kontrolnim pregledima nakon 6 mjeseci u 34 (85%) bolesnika je nastupilo poboljšanje LVEF, a od njih je 11 (svi su imali NIDCM, sinus ritam i tipični LBBB) postiglo gotovo normalnu funkciju srca (LVEF \geq 50%) s regresijom volumena lijevog ventrikula. U 5 (12,5%) bolesnika nije nastupilo poboljšanje funkcionalnog statusa dok je u njih 6 (15%) nastupilo pogoršanje ili nije došlo do poboljšanja LVEF. Ukupno, prosječan LVEF bolesnika je bio 45,4% uz NYHA I/II. Tijekom praćenja 10% bolesnika je bilo hospitalizirano zbog akutizacije zatajivanja srca. Smrtni ishod je zabilježen u 3 ispitanika, u jednog zbog nekardiogenog uzroka smrti.

Zaključak: U skladu s podacima studija, uz primjerenu implantaciju elektrode lijevog ventrikula i optimalno programiranje uređaja, ciljanim probirom bolesnika postigli smo dobar odgovor na resinkronizacijsko liječenje.

Introduction: Cardiac resynchronization therapy (CRT) is standard for heart failure patients with low left ventricular ejection fraction (LVEF \leq 35%) and QRS duration \geq 130ms despite optimal medical treatment¹.

Patients and Methods: This is a retrospective study that involved patients with implanted biventricular heart electrostimulators with (CRT-D) or without (CRT-P) defibrillator functions since 2011 to April 2018. The goal was to assess the CRT efficiency during check-ups after 6 months.

Results: Including 40 patients, 23 men and 17 women of an average age of 66.3 years. There were 4 (10%) patients with ischemic cardiomyopathy (IDCM), while 36 (90%) of the non-ischemic cardiomyopathy (NIDCM) had equal gender distribution. The average width of the QRS was 160 ms, and 75% of patients presented with typical Strauss left bundle branch block (LBBB). At the time of implantation, 6 (15%) patients had atrial fibrillation. The average LVEF value was 28%, and their NYHA status was III. CRT-D was implanted in all patients with IDCM. CRT-P was implanted in 19 and CRT-D in 17 patients with NIDCM. In 34 (85%) patients, there was an improvement of LVEF of which 11 (all with NIDCM, sinus rhythm and typical LBBB) achieved almost normal heart function (LVEF \geq 50%) with regression of LV volume. There was no improvement in NYHA status with 5 (12.5%) patients, and with 6 (15%) there was deterioration or there was no improvement in LVEF. Four (10%) patients were hospitalized for acute heart failure. The average LVEF was 45.4% and the NYHA status was I/II. Sudden deaths or syncope in CRT-P patients were absent, while appropriate and necessary treatment of tachyarrhythmia occurred in 3 patients with CRT-D. Lethal outcomes were with 3 patients (one non-cardiac and two non-sudden cardiac deaths).

Conclusion: Targeted patient selection with proper left ventricular lead implantation and optimal device programming improves the response rate to resynchronization therapy.

LITERATURE

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