

## Program transplantacije srca u djece u Kliničkom bolničkom centru Zagreb

## Heart transplantation program in children in University Hospital Centre Zagreb

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Transplantacija srca (TS) u djece metoda je liječenja teških bolesti srca kada se iscrpe sve ostale mogućnosti liječenja. Prema se TS u odraslih danas smatra rutinskom operacijom, kod djece je to puno složeniji i zahtjevniji postupak.<sup>1</sup> U složenom procesu pripreme djeteta za transplantaciju i poslijoperacijskoj skrbi ključna je besprijekorna suradnja članova tima. Postupnjom TS-a želi se produžiti život djetetu, omogućiti normalno odrastanje i povratak u aktivnu život. Transplantacija srca namijenjena je primarno djeци s kardiomiopatijama, rjeđe s teškim aritmijama ili prirođenim srčanim greškama. Da bi se učinila TS potrebno je prije svega ostvariti teoretske i praktične uvjete koji su propisani sustavom Eurotransplanta: kriterijima za odabir, protokolom pretraga pri obradi za postupak TS i spremnosti kardiokirurškog tima. Nakon zadovoljenih kriterija potrebno je planirati adekvatnu postoperativnu skrb i zdravstvenu njegu djeteta.

U radu će se prikazati program TS-a kod djece u Kliničkom bolničkom centru Zagreb koji se provodi od 2011. godine. Prema registru Internacionalnog društva za TS srca godišnje se u cijelom svijetu učini 300 do 400 TS-a u djece, odnosno 10% svih TS-a. Dulje preživljivanje postignuto je složenim smjernicama za probir donora i primatelja organa, iznimnim napretkom imunosupresivne terapije, izvođenjem endomiokardijalnih biopsija, a samim time i njegovom bolesniku u vremenu do transplantacije i nakon nje. Podizanje svijesti o TS-u kod djece vrlo je važno zbog podizanja svijesti o donaciji organa jer je to najveći ograničavajući čimbenik ove metode. Boravak djeteta nakon transplantacije na Klinici usmjeren je na ponovno zbljžavanje djeteta sa roditeljima, praćenje odbacivanja transplantata, praćenje postoperativnih infekcija i edukaciju roditelja od strane liječnika i medicinske sestre.

Uspješnost TS-a u djeteta ovisi o pravodobnom postavljanju dijagnoze i prepoznavanju terminalnog stadija bolesti, sposobnosti kardiokirurškog tima i sposobnosti adekvatnoga zbrinjavanja djeteta nakon TS-a. Liječenje zahtjeva multidiscipliniranu suradnju i potporu od strane roditelja i okoline u kojoj dijete živi.

Heart transplantation (HT) in children is a method of treating severe heart diseases when all other treatment options are exhausted. Although HT in adults is now considered a routine operation, in children it is a much more complex and demanding procedure.<sup>1</sup> In the complex process of preparing a child for transplantation and postoperative care, the flawless cooperation of team members is crucial. Heart transplantation aims to prolong the life of a child, enable normal growth and return to an active life. Heart transplantation is intended primarily for children with cardiomyopathies, less frequently with severe arrhythmias or congenital heart defects. In order to perform a HT, it is first of all necessary to achieve the theoretical and practical conditions prescribed by the Eurotransplant system: selection criteria, examination protocol during processing for HT and readiness of the cardiac surgery team. After the criteria are met, it is necessary to plan adequate postoperative care and health care for the child.

The paper will present the HT program in children at the University Hospital Centre Zagreb. Heart transplantation has been performed since 2011. According to the Register of the International Society for HT, 300 to 400 HT in children are made worldwide every year, or 10% of all HT. Longer survival has been achieved with complex guidelines for screening donors and organ recipients, remarkable advances in immunosuppressive therapy, performing endomyocardial biopsies, and thus patient care in the period before and after transplantation. Raising awareness about HT in children is very important for raising awareness about organ donation as it is the biggest limiting factor of this method. The stay of the child after the transplant at Clinic is aimed at bringing the child closer to the parents, monitoring the rejection of the transplant, monitoring postoperative infections and parents' education led by the physician and nurse.

The success of a HT in a child depends on the timely diagnosis and recognition of the terminal stage of the disease, the ability of the cardiac surgery team and the ability to adequately care for the child after a HT. Treatment requires multidisciplinary cooperation and support from parents and the environment in which the child lives.

### LITERATURE

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