

An important measure taken for China Organ Transplant Response System

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On September 7, 2021, mandated by the Bureau of Medical Administration of the National Health Commission, the China Organ Transplantation Development Foundation (COTDF) established the China Organ Transplant Response System (COTRS) Scientific Committee. The committee is composed of clinical experts in transplantation, health administrative executives, medical ethics experts, and experts from Organ Procurement Organizations (OPO) in China. The committee consists of six working groups, each focusing on heart, lung, liver, kidney, pancreas, and small bowel transplantation. The nationally representative committee members come from 74 medical institutions, covering the North, East, Central, South, Northeast, Northwest and Southwest China. These medical institutions have performed 6,337 cases of organ transplantations in the first half of 2020, accounting for 83% of total transplant surgeries in China.

The aim of establishing the COTRS Scientific Committee is to ensure the high-quality development of organ transplantation. As data shows, China has seen a rapid growth of voluntary organ donation since 2015. Till 2019, the number of deceased organ donation in China has increased from 2,766 to 5,818 per year (*Figure 1*). In 2020, despite the impact of the COVID-19 pandemic, China still saw 5,222 cases of deceased organ donation, but there is still a big gap with the needs of the people.

The healthy and high-quality development of human organ donation and transplantation system relies on a fair, just, and scientific organ allocation and sharing system. It requires synergistic efforts of the community to execute

a regular working schedule to strengthen the research on scientific policymaking regarding organ allocation, focusing on improving the quality of organ matching, improving the efficiency of organ allocation, and reducing the mortality rate of patients awaiting organs.

The United Network for Organ Sharing (UNOS) in the US (1), the National Transplant Organization (ONT) in Spain (2), and the NHS Blood and Transplant (NHSBT) in the UK collect (3), store and analyze data to identify opportunities and develop policies to improve the equity and efficiency of organ allocation. These agencies have formed review committee, working groups, and advisory groups, and have established internal procedures for scientific, evidence-based policy-making.

In China, COTRS has undertaken this task since its establishment in 2011. It is an IT system which enables the nationwide automatic organ allocation and is important manifestation and implementation of a series of legislation and policies, including the "Regulation on Human Organ Transplantation" (State Council [2007]), the "Interim Provisions on the Administration of Human Organ Procurement and Allocation" (NHFPC [2013], No. 11} and the "Basic Principles and Core Policies for the Allocation and Sharing of Human Organs in China" {NHC [2018], No. 24}. The mandatory use of COTRS for donors, transplant candidates and recipients' registration as well as organ allocation has enabled the traceability of organs donated, fairness of organ sharing, and guaranteed the system of human organ donation and transplantation in China develop in an internationally recognized way.

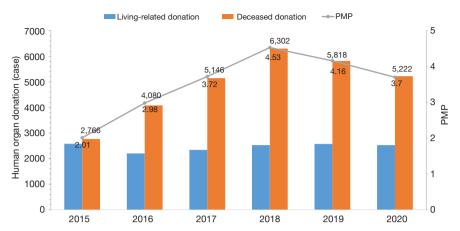


Figure 1 Number of Organ Donations in China 2015–2020. Note: not including Hongkong, Macao, and Taiwan regions. Data and figure from: Report on China Organ Transplantation Development in China [2020]. PMP, per million population.

COTRS is currently managed by COTDF.

As a growing need to gather inputs from stakeholders with expertise has emerged in China, it is prime time that the COTRS Scientific Committee comes into being to monitor practices, identify emerging challenges, and formulate policy proposals with regards to ethical, quality and safety standards for organ donation and transplantation. The main tasks of the Committee include: (I) strengthening patient-centered practice by reducing the heterogeneity of organ transplants between regions and medical institutions, reducing organ waste, and improving the survival of recipients; (II) improving the scientific decision-making mechanism of organ allocation policies; and (III) further standardizing organ sharing process and strengthening the self-discipline in transplantation practice, etc.

To accomplish these tasks, the Committee will hold regular working meetings and review relevant proposals of each working group, carry out academic research and case studies, provide support and consultation on quality control and decision-making in organ allocation, donor-recipient matching and transplantation.

With joint efforts from all related parties, the establishment of the Committee has marked a new milestone for the continuous improvement and optimization of China's human organ donation and transplantation system.

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