

# Alcimed

Press Release

## The organ allocation process in the United States

*Alcimed, an innovation & new business consulting firm, discusses current obstacles in the regulation of organ allocation in the United States with a brief look into potential innovative solutions, such as blockchain, in tackling some of these challenges.*

**Geographical inequities in transplant patients' access to donor organs have been the center of an ongoing debate in the U.S. government and transplant community.**

The Final Rule (published by the HHS in 1994) required that organ allocation “shall not be based on the candidate’s place of residence or place of listing except to the extent required...” The proper implementation of that rule and other related organ allocation policies have created tension for those impacted, due to significantly longer wait times for organs in some geographies. The previous policy, in place since 2013, based the order candidates would receive an organ by taking into account the candidate’s medical urgency, via a Model for End-Stage Liver Disease (MELD) score, and their location, via their region or donation service area. This previous policy kept donated livers largely within their regional borders.

A new amendment was approved December 2018 by the UNOS board for liver and intestine allocation in response to a lawsuit filed by liver transplant patients in New York City, claiming that urban residents had to wait longer for livers than others with less severe disease. The new policy uses nautical miles from the donor hospital in conjunction with the MELD scores for organ allocation and was set to take effect on April 30<sup>th</sup>, 2019. However, the policy was deferred until May 14<sup>th</sup>, 2019 due to a federal lawsuit challenging the new distribution policy, brought by hospitals in states, such as Georgia, Indiana, Oregon, Kansas, and Tennessee, claiming that the new policy fails to account for differences in health care access, reducing the number of transplants in rural areas that already suffer from healthcare disparities.

**Geographical disparities are not easily addressed, as they are multifactorial in nature.**

The now politicized organ allocation policies have been in the limelight due to the recent lawsuits and policy changes. States such as New York and California have more recipients waiting than potential donors, while the reverse situation is seen in the South and Midwest. The large disparities seen in different areas of the country between the amount of people on the “wait list” for transplants and the number of available organs stems from multiple contributing factors, such as organ procurement organizations (OPOs) inability to effectively convince urban areas to become donors (with rural states having 60% more adults on donor registries per capita), disparities in access to healthcare across regions, and standardization in eligible deaths and

donor requirements. Even if OPOs were performing at the same level throughout the US, an imbalance would likely exist. There are also different organ donation and acceptance practices in transplant centers. In order to address the geographical disparities, the new policy aims to lessen the impact of location in the transplantation process, it does not address some of the critical, underlying issues outlined above.

**There is not one, perfect solution to solve all of the contributing factors creating organ allocation disparities. However, innovative solutions like blockchain should be explored.**

Several pieces of legislation, such as the Living Donor Protection Act, have recently been proposed as solutions. In December 2018, Senator Todd Young announced he intends to introduce legislation this year to call for greater oversight of the organ donation system. A call for greater transparency in the organ transplant process may also necessitate innovative technology to create more readily accessible data. Coincidentally, Young and Senator Ed Markley also introduced the Blockchain Promotion Act of 2019 to assist in providing funding for blockchain solutions in nonfinancial industries, such as healthcare. “Bringing these two initiatives together provides an opportunity to explore blockchain in the transplant allocation process. A few reasons blockchain is an appealing option are its traceability and transparent nature, decentralized and more secure network, reduction of overhead costs, and its potential to accelerate the donation process, as time is a critical factor of organ donation,” according to Danna Hargett, a project manager at Alcimed. Although no viable blockchain solutions have been implemented in the U.S. healthcare industry thus far, other countries are blazing the trail forward. For example, The UAE health ministry in Dubai began piloting blockchain applications to provide a safer more optimized organ donation procedure this year.

At Alcimed, we think the potential for blockchain or other innovative solutions to alleviate some of the current pain points of the transplant donation process in the U.S. are worth exploring.

**About Alcimed** - [www.alcimed.com](http://www.alcimed.com)

Founded in 1993, Alcimed is an innovation and new business consulting firm specialized in life sciences (healthcare, biotech, agri-food), chemicals, materials, energy and mobility; as well as in aeronautics, space & defense, and public policies. Today Alcimed works with major industrial groups, SMEs, investment funds, start-ups, and institutional players. ALCIMED relies on a team of 200 highly-skilled individuals to help its clients in the exploration and development of their uncharted territories: New Technologies, New offers, New Geographies, Possible Futures, and New Ways to Innovate. Alcimed is headquartered in Paris and has offices in Lyon and Toulouse in France, as well as in Germany, Belgium, Switzerland, the United-States and Singapore.

Alcimed is a member of CroissancePlus and the ACI (Association des Conseils en Innovation – Association of Consultants in Innovation).