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Developing Robotic Systems to Battle COVID-19

With the COVID-19 pandemic, there have been a limited number of personal protective equipment (PPE), medical staff, and hospital beds. This article in particular focuses on the hardships to provide sufficient mechanical ventilation in ICU rooms as the process to make simple adjustments to medical equipment wasted time, staff, and valuable PPE. Furthermore, it put the nurses at risk of infection every time they went into the COVID-19 rooms. To combat this problem, researchers from the University of Maryland and the John Hopkins Hospital collaborated to build a robotic system that could be remotely controlled to adjust ventilators in patient rooms. The system is attached to the ventilator screen and has a stylus that allows the robot to interact and move across the screen. The medical staff controls the robotic system through an operating tablet outside the patient room and thus solves the problem of having to put on gear, go into the room, and make a simple adjustment to the machine. In my opinion, this is very cool and interesting as I've always been interested in pursuing possibilities in both computer science and the medical field. This is a great example of how technology can help make a change in the world, especially now that we're in the middle of a pandemic. It's amazing to see how real-life problems can be solved through computer science and how we can continue to use tech and engineering to hopefully make more breakthroughs in the medical field.

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