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Researchers create a device for measuring blood viscosity

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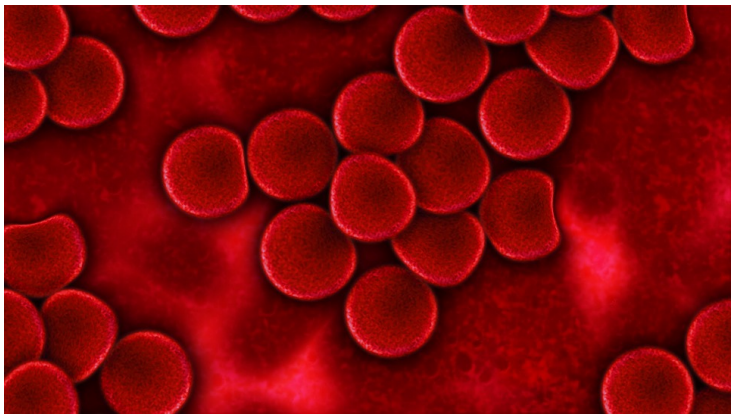

University of Connecticut researchers have developed a device that tests an important indicator of heart health that is often ignored - blood viscosity.

The device only requires a finger prick of blood and gives precise readings in just a few minutes. It comprises of a small card of transparent plastic containing a microchannel where the blood droplet is placed.

The blood wicks into the microchannel and flows through a small groove using its own capillary pressure. When the microchannel card is placed on a stage between a light source and a photodiode detector - a device that converts light into an electrical current - the device measures how long it takes the blood to travel through the microchannel.

A few minutes after the sample is placed on the microchannel, a digital screen displays a viscosity reading that indicates whether the patient is at elevated risk for cardiac events.

The team has formed a startup, Eir Medical Devices, based on their research. The researchers are in early discussions with physicians at UConn Health and Yale University to conduct clinical trials.