BioMedTech is an entrepreneur program, in which teams of students from different faculties develop engineering solutions for medical problems. Our team focused on the development of a reliable way of measuring and monitoring symptoms of Rheumatoid Arthritis (RA) disease in patients, so pharma companies could use this data for clinical trials.

**Clinical Background**

Nearly 1% of the USA population deals with RA, mostly women. It reduces life expectancy by 3-12 years, and affects patients’ quality of life who suffer from inflamed joints. (inflammations express in pain, swollleness, redness etc).

**Unmet Need**

**Objective, Accurate & Continuous monitoring device for Rheumatoid Arthritis**

In order to approve a new RA medicine, the Pharma companies use subjective and inaccurate methods (ACR20) for monitoring patients’ symptoms and disease progress. Our device is designed to provide objective, accurate and continues data, to be used by pharma companies in clinical trials, to check the effectiveness of new RA drugs.

**The Market**

The RA market has a CAGR of 12%, and is evaluated to get to 30B$ by 2019. Some of the most profitable medications in 2017 were RA medications.

**Prototype**

Range of motion measurement by using the changing impedance of a conductive fabric attached on a sleeve.