Cardiovascular diseases

The research of cardiovascular diseases at the faculties of Charles University has a long tradition. In 1930, Otto Klein from the Faculty of Medicine in Prague published his unique cardiac output measurement results in 11 patients. It was the world’s first diagnostic cardiac catheterisation in human medicine. The tradition continues today – the invasive cardiology area, including hemodynamic and therapeutic catheter interventions is still the most successful area of cardiovascular research at CU. The highest distinction of the European Society of Cardiology in 2014 – the Gold Medal was awarded to Petr Widimský for his research results in the field of transcatheter treatment of myocardial infarction. Other areas of research of cardiovascular diseases at all Five Faculties of Medicine of the CU include: treatment and imaging techniques in coronary heart disease, cardiomyopathy and myocarditis, pulmonary hypertension, peripheral vascular disease, heart failure, arterial hypertension, preventive cardiology, invasive diagnostics and therapy, physiology and pathophysiology of pulmonary circulation, acute coronary syndromes and thrombosis, reperfusion therapy of acute strokes, new technologies in interventional cardiology, surgical and interventional treatment of arrhythmias and new biological markers and prognostic factors and pharmacological and non-pharmacological treatment.

The research thus effectively covers the entire spectrum of cardiovascular diseases, and all CU Faculties of Medicine are involved, which cooperate on many projects (e.g. the internationally unique series of clinical trials “PRAGUE”).

Selected outputs