Specific Interests

Current projects
Studies of disorders of human pregnancy, including pre-eclampsia, intrauterine growth retardation, diabetes, and those caused by drugs of dependence. Such disorders can cause perinatal morbidity and/or mortality. This work is being performed in collaboration with members of the Pregnancy Research Centre at the Royal Women’s Hospital. Research is identifying various abnormal changes in human placental function, and in substances produced by the placenta which may contribute to disorders of human pregnancy.

The development of a new type of microscopy, fibre optic confocal imaging. This new technology is suitable both for research and for diagnostic purposes, and enables subsurface microscopic imaging inside the living body. Research is being performed in collaboration with Optiscan Imaging, and has contributed to the development of a novel fibre optic confocal endomicroscope which enables microscopic subsurface confocal imaging beneath the surface of tissues inside the body.