

Wissenschaftliche und klinische Schwerpunkte der Universitätsklinik für Augenheilkunde im Pius-Hospital Oldenburg

Der Schwerpunkt des klinischen und wissenschaftlichen Interesses unserer Arbeitsgruppe liegt im Bereich Hornhauttransplantation und Augenoberflächenrekonstruktion, sowie der Entwicklung neuer Ansätze zur Augenoberflächen- und Tränendrüsenregeneration. Ein besonderer Forschungsschwerpunkt liegt in der Entwicklung von Ersatzgeweben zur Rekonstruktion von Bindegewebe und Hornhaut, sowie der Stimulation der kornealen Nervenregeneration zur Entwicklung neuer Therapien für die Neurotrope Keratopathie. Ein weiterer Schwerpunkt ist die Evaluation des regenerativen Potentials epithelialer und mesenchymaler Tränendrüsen-Stammzellen im Hinblick auf eine klinische Anwendung bei Patienten mit schwerstem trockenen Auge, sowie die Etablierung vaskularisierter 3D-Modelle zur Rekonstruktion der Tränendrüse.

Im Einzelnen beinhaltet dies aktuelle Projekte zu folgenden beispielhaften Themen:

Entwicklung neuer Techniken zur Hornhaut- u. Bindegewebe-Rekonstruktion

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Entwicklung Regenerativer Strategien zur Therapie der Neurotrophen Keratopathie

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Entwicklung Regenerativer Strategien zur Therapie des trockenen Auges

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Entwicklung Regenerativer Strategien zur Therapie Retinaler Erkrankungen

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Evaluation verschiedener Behandlungsansätze für den vorderen Augenabschnitt

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Evaluation neuer Keratoplastik- und Keratoprothesen-Techniken

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