





JOINT TRANSNATIONAL CALL 2017: "Translational Research on Rare Cancers"

PARTNER REQUEST/COLLABORATION OFFER

If you would like to have your profile published on the TRANSCAN-2 website, "Looking for a research partner" webpage, please fill out this form and send it to 

If you have any questions about this form, please do not hesitate to contact us at 

Note: Fields marked with a * are mandatory

Contact Information	
First name *	Ferdinand + Orlando
Last name *	von Eggeling + Guntinas-Lichius
Position *	Head of MALDI Imaging Professor and Chairman
Telephone number	0049 3641 935526
E-mail address*	feggeling@med.uni-jena.de Orlando.Guntinas@med.uni-jena.de
Website address	www.hno.uniklinikum-jena.de/
Institution/Organisation *	Jena University Hospital
Department*	Department of Otorhinolaryngology
Street	Am Klinikum 1
Postal Code / City *	07740 Jena
Country *	Germany

***I agree with the publication of my contact data and of this form on the TRANSCAN-2 Website:**

YES



SEARCH FOR A COLLABORATOR

IF YOU ARE LOOKING FOR A PARTNER IN YOUR SUGGESTED PROPOSAL, PLEASE SPECIFY ALSO THE NEEDED EXPERTISE

Project proposal

Project title (draft):

The individualised adjustment of treatment of rare cancers of the head and neck under therapy by molecular imaging techniques

A reliable prognosis of the response of the rare entities of head and neck cancer to a chemotherapy or therapy with biologicals (e. g. immune check-point inhibitors) is imperative for a targeted and individualized improvement of the patient's survival, the decrease in the therapy's toxicity as well as improved quality of life.

A response to the listed therapies is hardly predictable with state of the art methods. This is due to a limited understanding of the interdependency of the therapeutics with the tumour itself, its environment and the chemotherapy- and biologicals-resistant cells. This resistance plays an important role in the genesis of residual tumours and tumour recurrences.

Parting from the example of an established neoadjuvant chemo therapy it is the goal to find markers and patterns via molecular imaging of primary tumour tissue as well by liquid biopsies.

The proposed imaging approach will be based on spectroscopic techniques like Raman and mass spectrometry (MS) imaging. Raman spectroscopy enables us to depict a morphochemical information in-vivo, whereas MS-imaging reveals spatial distribution of proteins, lipids, and metabolites in tissues cryosection ex-vivo and allows their identification.

With gained knowledge, unnecessary therapies and toxicity can be avoided in the future, treatment costs can be reduced, and patients with a resistance will obtain facilitated access to individualized treatment.

The overarching aims of the project are:

- to characterise molecular, spatial resolved primary tumour tissue,
- to find markers and signatures for the prediction of response of therapy,
- to gain biological and medical knowledge about occurring mechanisms before and during the therapy as well as about the treatment itself and
- to optimise the therapy on a social, medical and economical level.

Our offered expertise:

- Clinical and therapeutic expertise in oncology, especially Head and Neck Cancer
- Biobank for head and neck cancer
- Preclinical expertise in mass spectrometric (MALDI-MSI) and spectroscopic imaging (e. g. Raman)

Requested expertise:

- Animal model for head and neck cancer
- Immuno-Oncology
- Clinical partners using different therapy regimes with allocatable samples
- Bioinformatics, Machine Learning

Of course we are open minded for additional or other project ideas.



OFFER FOR COLLABORATION

IF YOU PROPOSE YOURSELF AS A PARTNER IN A CONSORTIUM, PLEASE DETAIL YOUR EXPERTISE

Short description of the areas of interest and expertise (Max. 2000 words):

Collaboration offered, please see above