

LOEWE Research Cluster NNCS

Non-neuronal Cholinergic Systems



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Before our nerves learned to function: non-neuronal acetylcholine

Acetylcholine is an old neurotransmitter that does not only work in the nervous system. The vital molecule controls many bodily functions, in particular interaction with the environment. It sets barriers and regulates their permeability, for example that of skin and lungs and during the intake of food. It is also a component with a decisive impact on the functioning of the immune system – and can, conversely, be involved in the incidence of illnesses. How exactly does acetylcholine work? Which disorders cause diseases? How can this knowledge be applied? From fundamental research to clinical studies – the researchers in the LOEWE research cluster are focusing on the molecule's non-neuronal areas of activity.

COORDINATOR

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PARTNERS

Justus Liebig University Giessen
Philipps-Universität Marburg (until 2014)
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ASSOCIATE PARTNERS

National Institutes of Health, Bethesda,
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LOCATIONS

Giessen
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Frankfurt am Main

SUBJECT AREAS

Biochemistry, Physiology, Anatomy,
Immunology, Pharmacology,
Accident surgery, Dermatology,
Surgery, Anaesthesiology,
Psychosomatics

FUNDING PERIOD

Since 2012

INTERNET

[www.uni-giessen.de/cms/fbz/fb11/
institute/anatomie/assoz/loewe](http://www.uni-giessen.de/cms/fbz/fb11/institute/anatomie/assoz/loewe)

LOEWE and ProLOEWE

Since 2008 the German federal state of Hessen has been promoting outstanding research initiatives through its own excellence programme, LOEWE. To date, 11 LOEWE research centres and 35 LOEWE research clusters have been selected in a competitive process to receive funding.

ProLOEWE is the LOEWE research initiatives network: their common aim is to provide information about their activities, speed up access to their research and intensify their cooperation. The website www.proloewe.de/en provides an overview of the LOEWE research initiatives.