

Personal information

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Academic qualifications

Experience

Aktiviteter

Synergistic Targeting of Innate Receptors TLR7 and NOD2 for Therapeutic Intervention in Multiple Sclerosis

Dubik, M., Marczyńska-Grzelak, J., Sørensen, M. Z., Dieu, R. S., Rusin, D., Schiöth, E. S., Ramazani, B., Belal, R., Ojha, B., Krieger, J., Arengoth, D. S., Włodarczyk, A., Owens, T. & Khoroshii, R., jul. 2024, I: International Journal of Molecular Sciences . 25, 13, 10 s., 7462.

Microglial TNFR2 signaling regulates the inflammatory response after CNS injury in a sex-specific fashion

Raffaele, S., Pedersen, E. T., Laursen, C. C. H., Gao, H., Andersen, K. M., Nielsen, P. V., Orti-Casan, N., Blichfeldt-Eckhardt, M. R., Koch, S., Deb-Chatterji, M., Magnus, T., Stubbe, J., Madsen, K., Meyer, M., Degn, M., Eisel, U. L. M., Włodarczyk, A., Fumagalli, M., Clausen, B. H. & Brambilla, R. & 1 flere, Lambertsen, K. L., feb. 2024, I: Brain, Behavior, and Immunity. 116, s. 269-285

Microglia-Derived Insulin-like Growth Factor 1 Is Critical for Neurodevelopment

Rusin, D., Becirovic, L. V., Lyszczarz, G. T., Krueger, M., Benmamar-Badel, A., Mathiesen, C. V., Schiöth, E. S., Lambertsen, K. L. & Włodarczyk, A., 18. jan. 2024, I: Cells. 13, 2, 184.

Peripherally-derived myeloid cells induce disease-dependent phenotypic changes in microglia

Pedersen, E. T., Carney, B., Włodarczyk, A., Brambilla, R. & Lambertsen, K. L., 14. dec. 2023, I: Frontiers in Cellular Neuroscience. 17, 12 s., 1295840.

Systemic treatment with a selective TNFR2 agonist alters the central and peripheral immune responses and transiently improves functional outcome after experimental ischemic stroke

Thougaard, E., Nielsen, P. V., Forsberg, A., Phuong, V., Velasco, A. M., Włodarczyk, A., Wajant, H., Lang, I., Mikkelsen, J. D., Clausen, B. H., Brambilla, R. & Lambertsen, K. L., 17. nov. 2023, I: Journal of Neuroimmunology. 385, 578246.

Detrimental role of type I interferon-activated microglia in Neuromyelitis Optica.

Włodarczyk, A., Khoroshii, R., Marczyńska, J., Holtman, I., Burton, M., Jensen, K. N., Thomassen, M., Eggen, B., Asgari, N. & Owens, T., 1. jul. 2021, I: Glia. 69, Suppl. 1, s. E470-E471 T14-053C.

Protective microglial subset in development, aging and disease

Benmamar-Badel, A., Owens, T. & Włodarczyk, A., 1. jul. 2021, I: Glia. 69, Suppl. 1, s. E574 1 s.

Innate Signaling in the CNS Prevents Demyelination in a Focal EAE Model

Dubik, M., Marczyńska, J., Mørch, M. T., Webster, G., Jensen, K. N., Włodarczyk, A., Khoroshii, R. & Owens, T., 3. jun. 2021, I: Frontiers in Neuroscience. 15, 10 s., 682451.

Type I interferon-activated microglia are critical for neuromyelitis optica pathology

Włodarczyk, A., Khoroshii, R. M. H., Marczyńska, J., Holtman, I. R., Burton, M., Jensen, K. N., Blaabjerg, M., Meyer, M., Thomassen, M., Eggen, B. J. L., Asgari, N. & Owens, T., apr. 2021, I: Glia. 69, 4, s. 943-953

Microglia-Secreted Factors Enhance Dopaminergic Differentiation of Tissue- and iPSC-Derived Human Neural Stem Cells
Schmidt, S. I., Bogetoft, H., Ritter, L., Agergaard, J. B., Hammerich, D., Kabiljagic, A. A., Wlodarczyk, A., Lopez, S. G., Sørensen, M. D., Jørgensen, M. L., Okarmus, J., Serrano, A. M., Kristensen, B. W., Freude, K., Owens, T. & Meyer, M., 9. feb. 2021, I: *Stem Cell Reports*. 16, 2, s. 281-294

An Experimental Model of Neuromyelitis Optica Spectrum Disorder–Optic Neuritis: Insights Into Disease Mechanisms
Soerensen, S. F., Wirenfeldt, M., Wlodarczyk, A., Moersch, M. T., Khoroshi, R., Arengoth, D. S., Lillevang, S. T., Owens, T. & Asgari, N., 2021, I: *Frontiers in Neurology*. 12, 11 s., 703249.

Protective roles for myeloid cells in neuroinflammation

Owens, T., Benmamar-Badel, A., Wlodarczyk, A., Marczyńska, J., Mørch, M. T., Dubik, M., Arengoth, D. S., Asgari, N., Webster, G. & Khoroshi, R., nov. 2020, I: *Scandinavian Journal of Immunology*. 92, 5, 7 s., e12963.

Absence of miRNA-146a Differentially Alters Microglia Function and Proteome

Martin, N. A., Hyrlov, K. H., Elkjaer, M. L., Thygesen, E. K., Wlodarczyk, A., Elbaek, K. J., Aboo, C., Okarmus, J., Benedikz, E., Reynolds, R., Hegedus, Z., Stensballe, A., Svenningsen, Å. F., Owens, T. & Illes, Z., 5. jun. 2020, I: *Frontiers in Immunology*. 11, 21 s., 1110.

Protective Microglial Subset in Development, Aging, and Disease: Lessons From Transcriptomic Studies

Benmamar-Badel, A., Owens, T. & Wlodarczyk, A., 3. apr. 2020, I: *Frontiers in Immunology*. 11, 19 s., 430.

Diffusion Kurtosis Imaging maps neural damage in the EAE model of multiple sclerosis

Chuhutin, A., Hansen, B., Wlodarczyk, A., Owens, T., Shemesh, N. & Jespersen, S. N., mar. 2020, I: *NeuroImage*. 208, 14 s., 116406.

CSF1R stimulation promotes increased neuroprotection by CD11c+microglia in EAE

Benmamar-Badel, A., Wlodarczyk, A., Cedile, O., Jensen, K. N., Kramer, I., Elsborg, N. B. & Owens, T., dec. 2019, I: *Scandinavian Journal of Immunology*. 90, 6, s. 41 s., 7.

Absence of miR-146a alters the function and proteome of microglia

Hyrlov, K. H., Martin, N. A., Elkjaer, M. L., Thygesen, E. K., Wlodarczyk, A., Elbaek, K. J., Okarmus, J., Benedikz, E., Stensballe, A., Svenningsen, Å. F., Owens, T. & Illes, Z., 1. sep. 2019, I: *Multiple Sclerosis Journal*. 25, 2 Suppl. 1, s. 651-652 P1203.

An experimental model of Neuromyelitis Optica Spectrum Disorder (NMOSD)-Optic Neuritis: Insights into disease mechanisms

Soerensen, S. F., Soelberg, K., Wlodarczyk, A., Moersch, M. T., Arengoth, D. S., Owens, T. & Asgari, N., 1. sep. 2019, I: *Multiple Sclerosis Journal*. 25, 2 Suppl. 1, s. 363-364 P725.

CSF1R Stimulation Promotes Increased Neuroprotection by CD11c+ Microglia in EAE

Wlodarczyk, A., Benmamar-Badel, A., Cédile, O., Jensen, K. N., Kramer, I., Elsborg, N. B. & Owens, T., 10. jan. 2019, I: *Frontiers in Cellular Neuroscience*. 12, 10 s., 523.

A2AR antagonism in acute EAE model leads to early and more severe EAE

Nylund, M., Vuorimaa, A., Paavilainen, H., Wlodarczyk, A., Jensen, K., Hukkanen, V., Finsen, B., Owens, T. & Airas, L., 1. okt. 2018, I: *Multiple Sclerosis Journal*. 24, Suppl. 2, s. 823-824 2 s.

Experimental demyelination and axonal loss are reduced in MicroRNA-146a deficient mice

Martin, N. A., Molnar, V., Szilagyi, G. T., Elkjaer, M. L., Nawrocki, A., Okarmus, J., Wlodarczyk, A., Thygesen, E. K., Palkovits, M., Gallyas, F., Larsen, M. R., Lassmann, H., Benedikz, E., Owens, T., Svenningsen, Å. F. & Illes, Z., 2018, I: *Frontiers in Immunology*. 9, 14 s., 490.

Eosinophils Regulate Interferon Alpha Production in Plasmacytoid Dendritic Cells Stimulated with Components of Neutrophil Extracellular Traps

Skrzeczynska-Moncznik, J., Zabieglo, K., Bossowski, J. P., Osiecka, O., Wlodarczyk, A., Kapinska--Mrowiecka, M., Kwitniewski, M., Majewski, P., Dubin, A. & Cichy, J., mar. 2017, I: *Journal of Interferon & Cytokine Research*. 37, 3, s. 119-128

A novel microglial subset plays a key role in myelinogenesis in developing brain

Wlodarczyk, A., Holtman, I., Krueger, M., Yogev, N., Bruttger, J., Khoroshii, R. M. H., Benmamar-Badel, A., de Boer Bergsma, J., Martin, N. A., Karram, K., Kramer, I., Boddeke, E. W. G. M., Waisman, A., Eggen, B. J. L. & Owens, T., 2017, I: The EMBO Journal. 36, 22, s. 3292-3308

CCL2 recruits T cells into the brain in a CCR2-independent manner

Cédile, O., Wlodarczyk, A. & Owens, T., 2017, I: APMIS. 125, 11, s. 945–956

The chemokine receptor CCR2 maintains plasmacytoid dendritic cell homeostasis

Cédile, O., Østerby Jørgensen, L., Frank, I., Wlodarczyk, A. & Owens, T., 2017, I: Immunology Letters. 192, s. 72-78

Pathologic and Protective Roles for Microglial Subsets and Bone Marrow- and Blood-Derived Myeloid Cells in Central Nervous System Inflammation

Wlodarczyk, A., Cédile, O., Jensen, K. N., Jasson, A., Mony, J. T., Khoroshii, R. & Owens, T., 8. sep. 2015, I: Frontiers in Immunology. 6, 11 s., 463.

The inhibitory effect of secretory leukocyte protease inhibitor (SLPI) on formation of neutrophil extracellular traps

Zabieglo, K., Majewski, P., Majchrzak-Gorecka, M., Wlodarczyk, A., Grygier, B., Zegar, A., Kapinska-Mrowiecka, M., Naskalska, A., Pyrc, K., Dubin, A., Wahl, S. M. & Cichy, J., 27. apr. 2015, I: Journal of Leukocyte Biology. 98, 1, s. 99-106

Microglial regulation of CNS inflammation

Owens, T., Khoroshii, R. M. H., Mørch, M., Wlodarczyk, A., Hermansen, C. & Steckelings, U. M., jan. 2015, I: Irish Journal of Medical Science. 184, S1, s. 5 1 s., S1.2.

CD11c(+) microglia are potent producers of IGF-1 during postnatal neurodevelopment

Wlodarczyk, A., Martin, N. & Owens, T., 2015, I: Glia. 63, S1, s. E253 1 s., T08-43B.

Thymic CCL2 influences induction of T-cell tolerance

Cédile, O., Løbner, M., Toft-Hansen, H., Frank, I., Wlodarczyk, A., Irla, M. & Owens, T., dec. 2014, I: Journal of Autoimmunity. 55, s. 73-85

The role of metalloproteinase ADAM17 in regulating ICOS ligand-mediated humoral immune responses

Marczynska, J., Ozga, A., Wlodarczyk, A., Majchrzak-Gorecka, M., Kulig, P., Banas, M., Michalczyk-Wetula, D., Majewski, P., Hutloff, A., Schwarz, J., Chalaris, A., Scheller, J., Rose-John, S. & Cichy, J., 15. sep. 2014, I: Journal of Immunology. 193, 6, s. 2753-2763

Comparison of microglia and infiltrating CD11c+ cells as antigen presenting cells for T cell proliferation and cytokine response

Wlodarczyk, A., Løbner, M., Cédile, O. & Owens, T., 25. mar. 2014, I: Journal of Neuroinflammation. 11, 1, 9 s., 57.

Interferons in the central nervous system: A few instruments play many tunes

Owens, T., Khoroshii, R. M. H., Wlodarczyk, A. & Asgari, N., mar. 2014, I: Glia. 62, 3, s. 339–355

CCL2 Chemokine in Central Tolerance

Cedile, O., Lobner, M., Toft-Hansen, H., Frank, I., Wlodarczyk, A., Irla, M. & Owens, T., 2014, I: Scandinavian Journal of Immunology. 79, 6, s. 452-453

CCL2 chemokine in T cell tolerance and protection against experimental autoimmune encephalomyelitis

Cedile, O., Lobner, M., Toft-Hansen, H., Frank, I., Wlodarczyk, A., Irla, M. & Owens, T., 2014, I: Journal of Neuroimmunology. 275, 1-2 (Special issue), s. 197-197

IGF1 producing CD11c(+) microglia emerge during postnatal neurodevelopment

Wlodarczyk, A., Martin, N. & Owens, T., 2014, I: Journal of Neuroimmunology. 275, 1-2, s. 93-93

DNA structures decorated with cathepsin G/secretory leukocyte proteinase inhibitor stimulate IFN γ production by plasmacytoid dendritic cells

Skrzeczynska-Moncznik, J., Wlodarczyk, A., Banas, M., Kwitniewski, M., Zabieglo, K., Kapinska-Mrowiecka, M., Dubin, A. & Cichy, J., 2013, I: American Journal of Clinical and Experimental Immunology. 2, 2, s. 186-94

Neuromyelitis optica-like pathology is dependent on type I interferon response

Khorooshi, R., Wlodarczyk, A., Asgari, N. & Owens, T., 2013, I: Experimental Neurology. 247, s. 744-747

Secretory leukocyte proteinase inhibitor-competent DNA deposits are potent stimulators of plasmacytoid dendritic cells: implication for psoriasis

Skrzeczynska-Moncznik, J., Wlodarczyk, A., Zabieglo, K., Kapinska-Mrowiecka, M., Marewicz, E., Dubin, A., Potempa, J. & Cichy, J., 15. aug. 2012, I: Journal of Immunology. 189, 4, s. 1611-7 7 s.

Activities

12 th ISNI Congress in Mainz

Wlodarczyk, A. (Deltager)
9. nov. 2014 → 13. nov. 2014

42nd Scandinavian society for immunology

Wlodarczyk, A. (Oplægsholder)
11. jun. 2014 → 14. jun. 2014

MS Symposium 2014

Wlodarczyk, A. (Oplægsholder)
16. jan. 2014

15h International Congress of Immunology

Wlodarczyk, A. (Deltager)
22. aug. 2013 → 27. aug. 2013

XI European Meeting on Glial Cells in Health and Disease (GLIA 2013) July 3 – 6 2013, Berlin, Germany

Wlodarczyk, A. (Deltager)
3. jul. 2013 → 6. jul. 2013

Danish Brain Research Laboratories Meeting (OAK), Copenhagen

Wlodarczyk, A. (Oplægsholder)
14. jun. 2013 → 15. jun. 2013

41st Scandinavian Society for Immunology Meeting

Wlodarczyk, A. (Deltager)
14. apr. 2013 → 17. apr. 2013