EpiGeneer

The First Regenerative Treatment for Multiple Sclerosis

Strategic partnership & Investment opportunity

- Short version -

AdRegeneer

EpiGeneer is AdRegeneer's Theophylline Patch Company

Date: 25. April 2026
Contact: mert.duman@adregeneer.com

Multiple Sclerosis (MS) still faces high unmet medical needs

Progressive loss of function, and unmet hope for recovery despite good treatments (DMTs) slowing down immune attacks

MS: Prevalence - Onset age

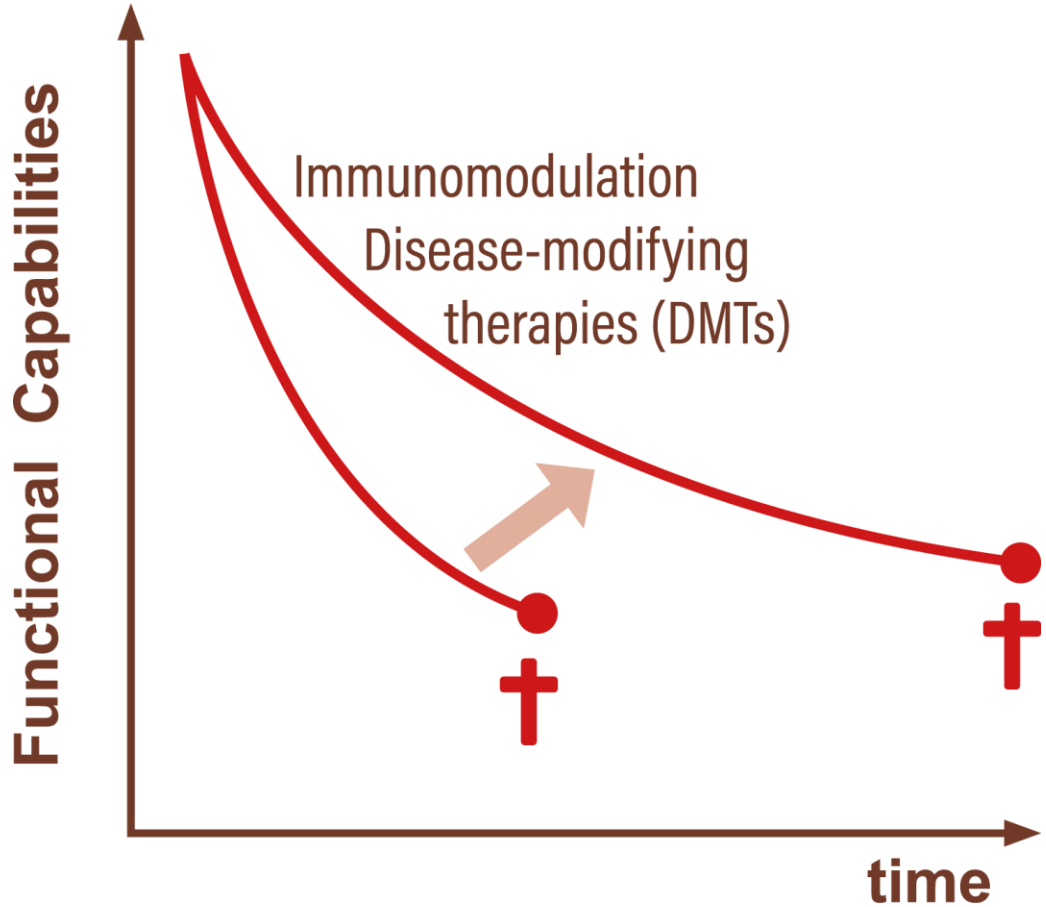
2
100K
per year

2.9 mio

Onset age **20-40**

Progressive disability despite DMTs

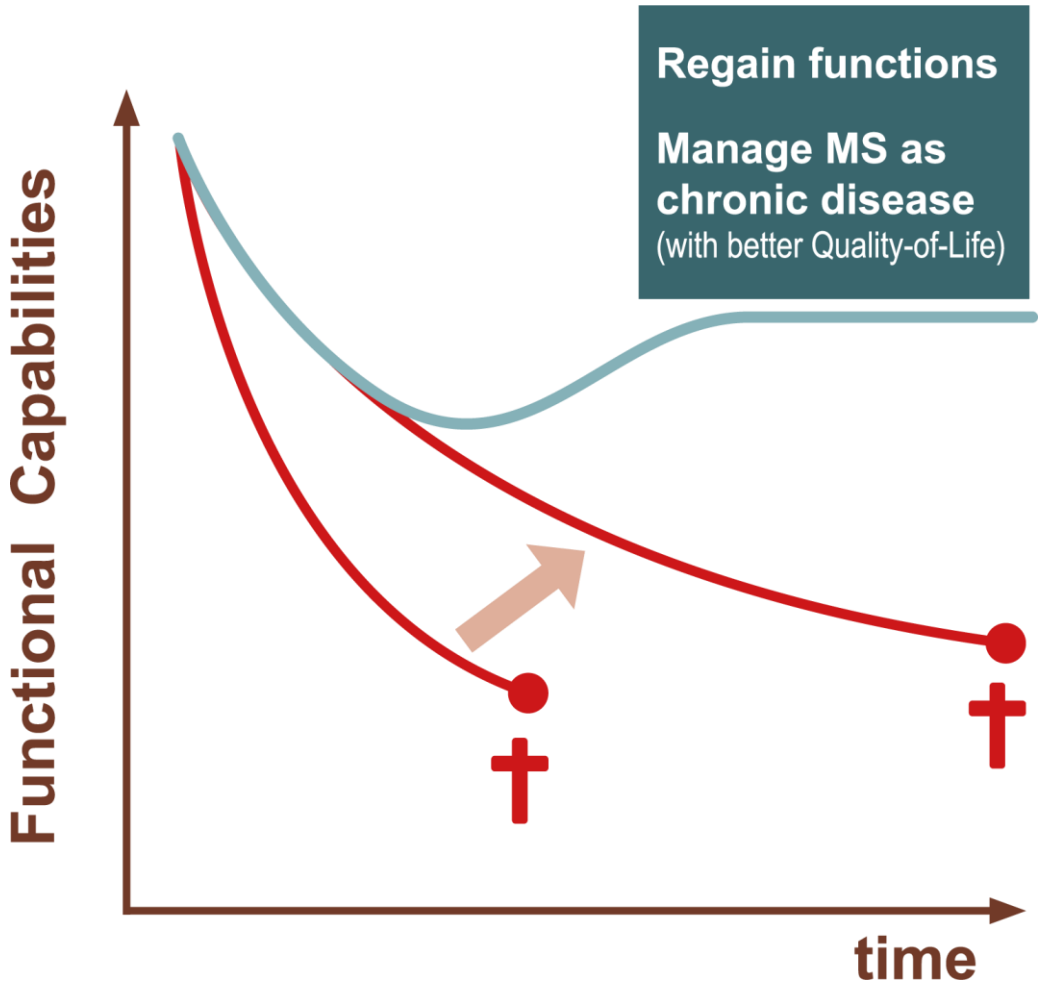
Available Treatments for MS



Our approach aims to regain functions and to manage Multiple Sclerosis (MS) as chronic disease

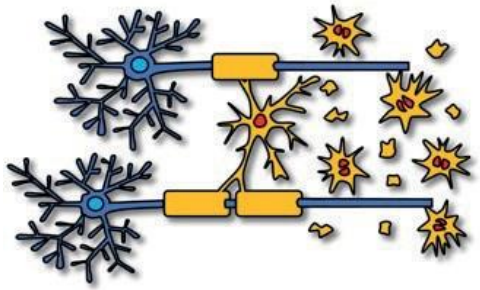
By activating regeneration via epigenetic pathways

Our objective

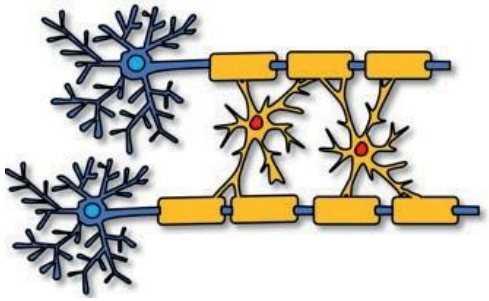


Our Mode of Action (MoA)

Lesion



Repair

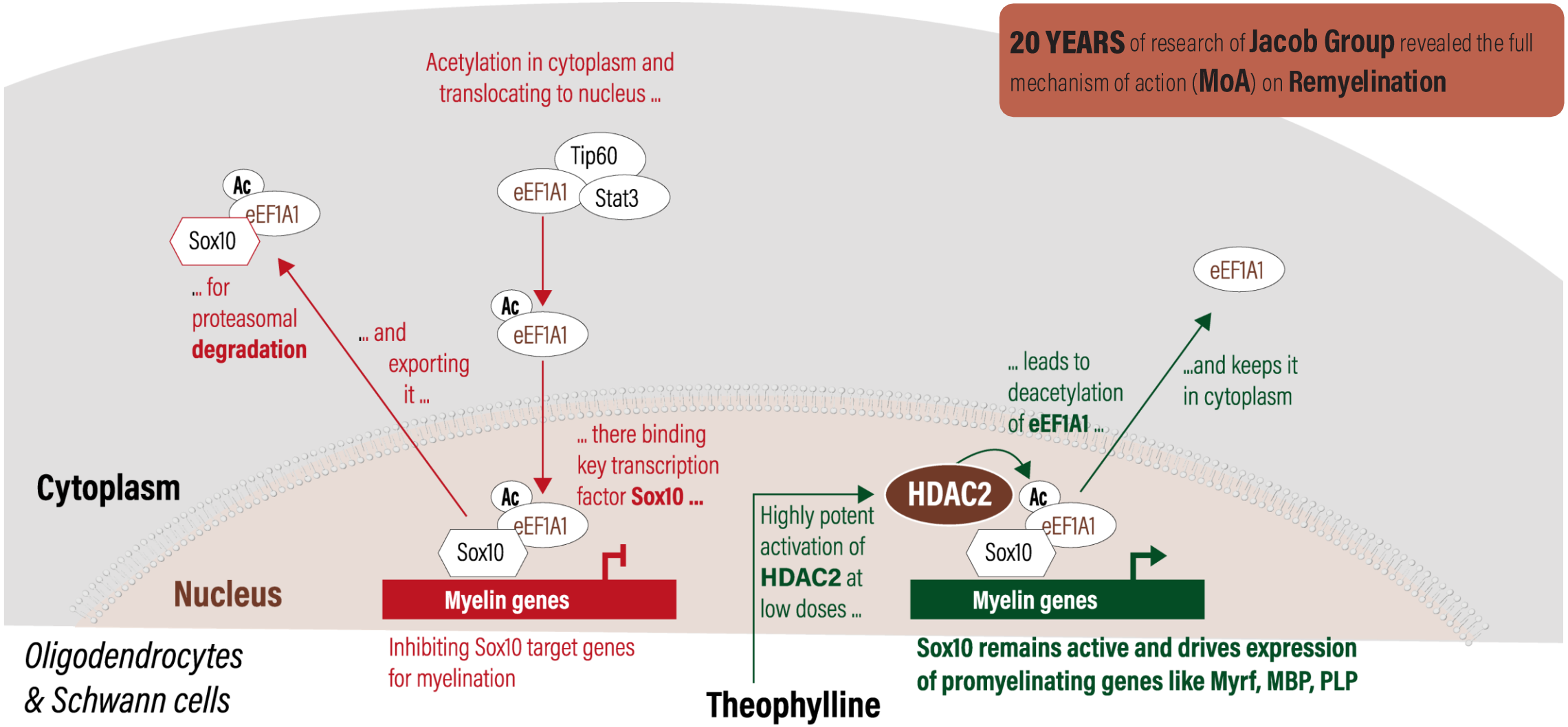


Activating Regeneration via Epigenetic Pathways

Theophylline modulating epigenetic HDAC1/2 pathways, leading to efficient activation of remyelination by oligodendrocyte precursor cells (OPCs)

We target the novel epigenetic factor of HDAC2, that induces the full program of remyelination

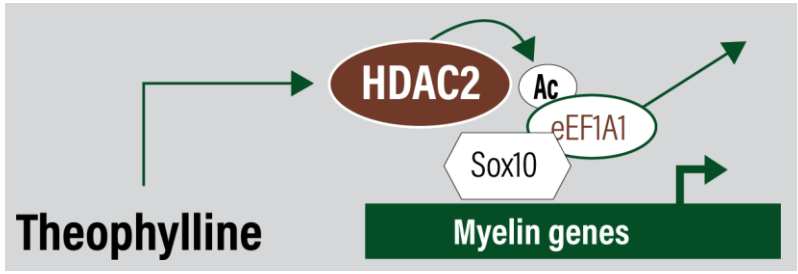
Theophylline is a highly potent HDAC2 activator when used at low doses



Supplementary data demonstrating additional therapeutic benefits is available under NDA

Treating MS at 4 different levels for maximal efficacy

Low risk approach



Highly innovative, first-in-class epigenetic gene activation approach

Highly innovative, potential to be first on market drug for remyelination

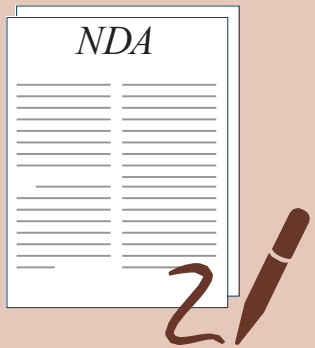
1 Enhancing remyelination

+

2 ...

3 ...

4 ...



Additional unpublished confidential pre-clinical data can be shared and discussed after a NDA is signed

Our transdermal patch outperforms oral formulations

No commercial risk due to off-label use in the market

EpiGeneer Transdermal patch

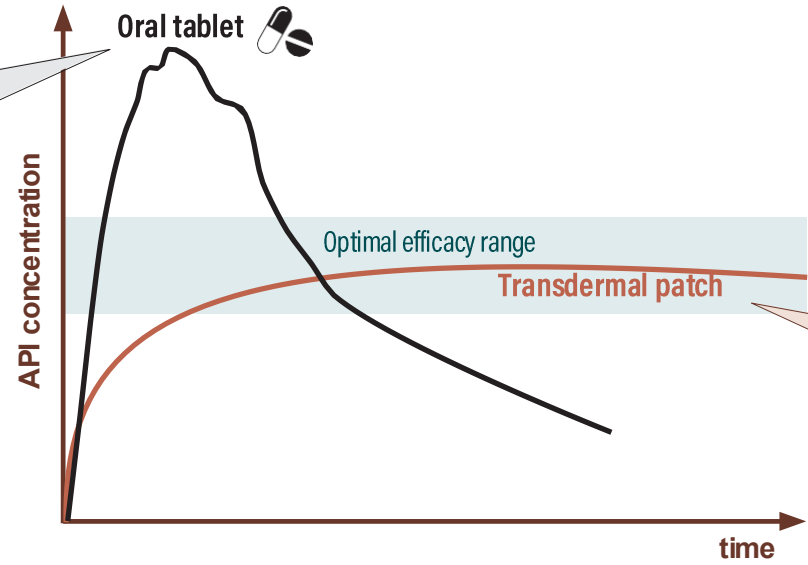
- **Constant** API release over time = constantly within therapeutic window
- **Efficient** OPC activation = constant induction of remyelination
- Very low risk of side effects due to **steady low dose delivery**

Oral tablet

- **Quick** spike and drop-off in API concentration = outside efficacy range
- **Shorter** duration of OPC activation = lower remyelination capacity
- **Higher risk** of side effects due to initial peak and accumulation

Additionally,..

- *off-label use for remyelination would violate our MoA patent*
- *doctors who would prescribe it as an individual healing attempt take a high personal risk in the presence of an approved and more potent patch*



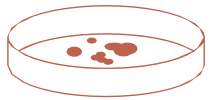
Developed for sustained release of precise dose and Improved compliance ► Increasing efficiency and minimizing side effects compared to use of oral formulations

We have compelling Pre-Clinical data

Theophylline treatment results in faster and more efficient remyelination in young and old adults

Extensive own **Pre-clinical Validation**

In Vitro
cell-based models



In Vivo
4 mouse models

MS

3x Faster Regeneration in young adults

60% more efficient in old mice

+ Data on Post-Mortem MS Brain Lesions and on human iPSC-derived oligodendrocytes confirm our translational rationale *(unpublished)*

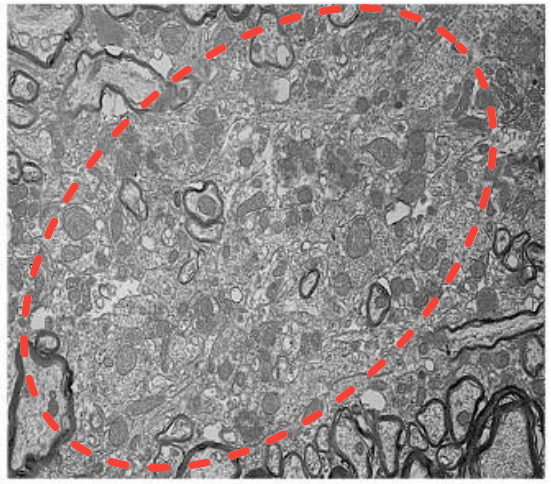
+ Published results & Mechanism of Action in high ranking scientific journals

Duman, M., (2020). Nature Communications
Brügger, V., (2015). PLOS Biology
Duman, M., (2022). Biomedicines

Brügger, V., Duman, M., (2017). Nature Communications
Jacob, C., (2011). Nature Neuroscience

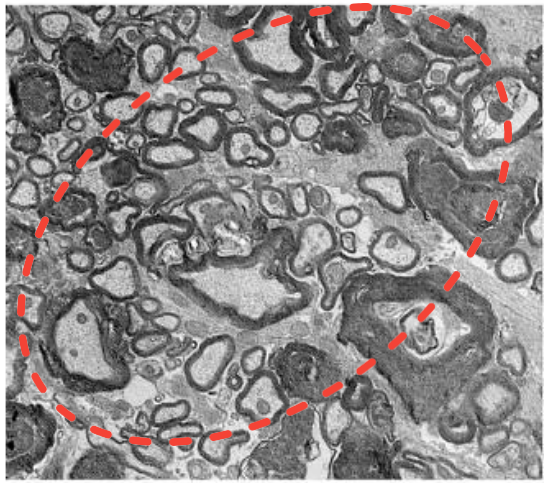
14 days post-lesion ► 4-day treatment

Vehicle



Mostly naked axons in lesion site

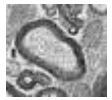
Theo



Mostly remyelinated axons in lesion site

Electron micrographs of spinal cord ultrathin sections in the lesion site

Lesion site



Black ring: **Myelin**
Inside: **Axon**

Our innovative MS therapy is patent-protected

Patents can be transferred from universities to EpiGeneer as soon as bridge financing is secured

MoA - Patent

EpiGeneer

UNI FR UNIVERSITÉ DE FRIBOURG UNIVERSITÄT FREIBURG

"HDAC1/2 activators for promoting and/or accelerating myelination and remyelination"

Priority date June 2017

Patent Applications

- n° EP17174916
- n° PCT/EP2018/065168
- n° US20200182859A1 ***(granted)***

RoA - Transdermal Patch - Patent

EpiGeneer

JG|U JOHANNES GUTENBERG UNIVERSITÄT MAINZ

"Transdermal patch for promoting or accelerating myelination and/or remyelination"

Priority date Sept. 2022

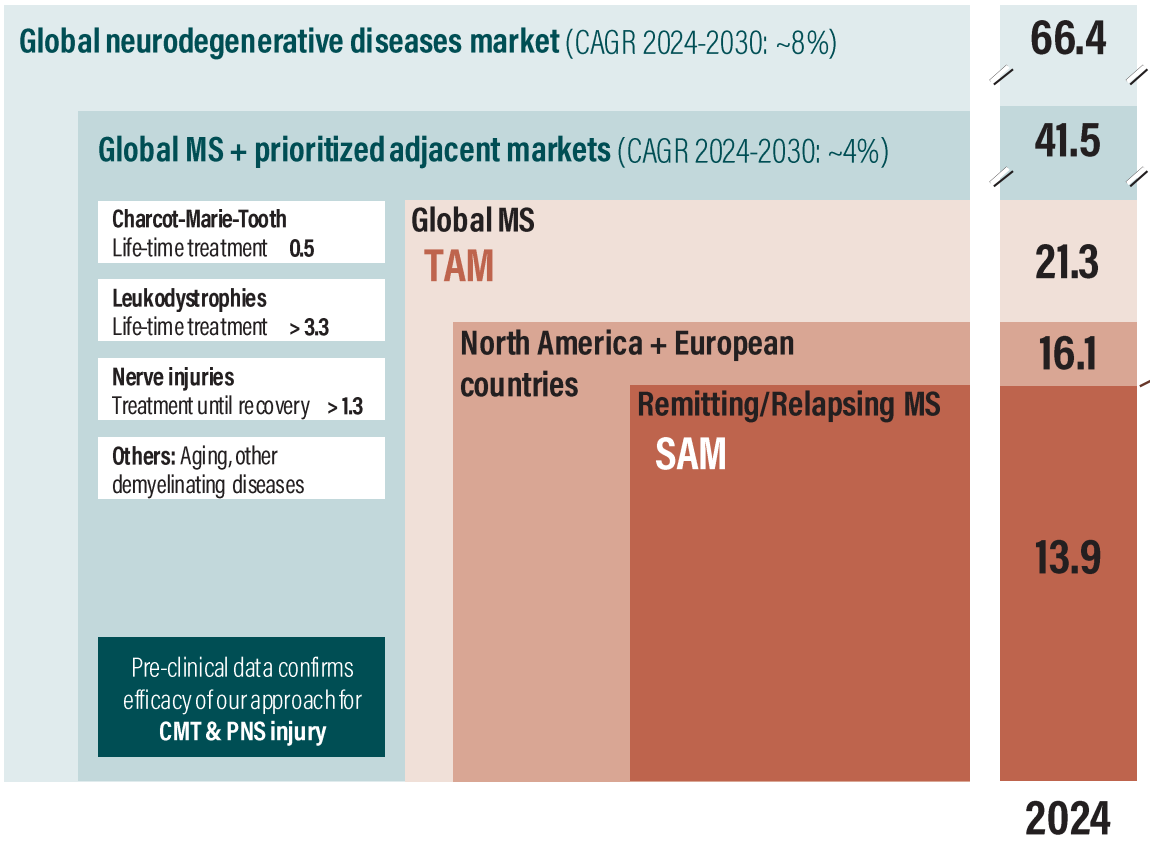
Patent Applications

- n° EP22195291, EP4587027
- n° PCT/EP2023/074981
- n° WO/2024/056642
- n° CA3267676

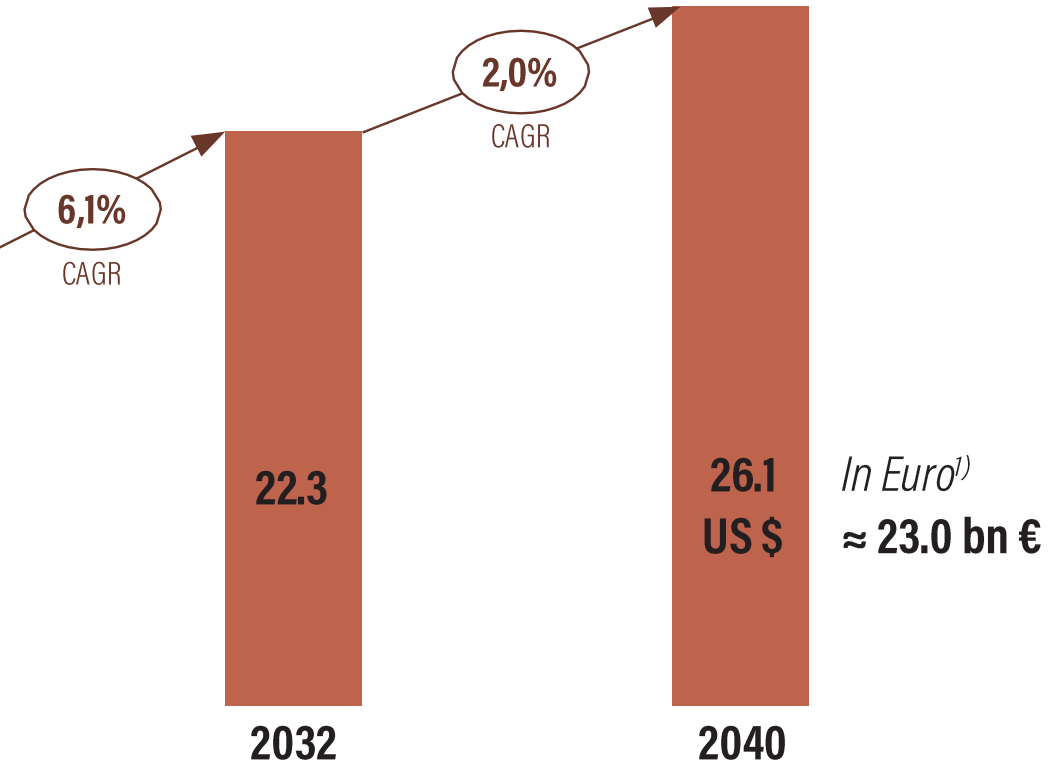
EpiGeneer's addressable MS Market is > 20 bn

With an upside potential for other neurodegenerative diseases beyond MS indication

Market for **MS** & neurodegenerative diseases in **billion US $**



Growth rate of Serviceable Available Market



In Euro[1)]

≈ 23.0 bn €

1) Average rate of last 3 years

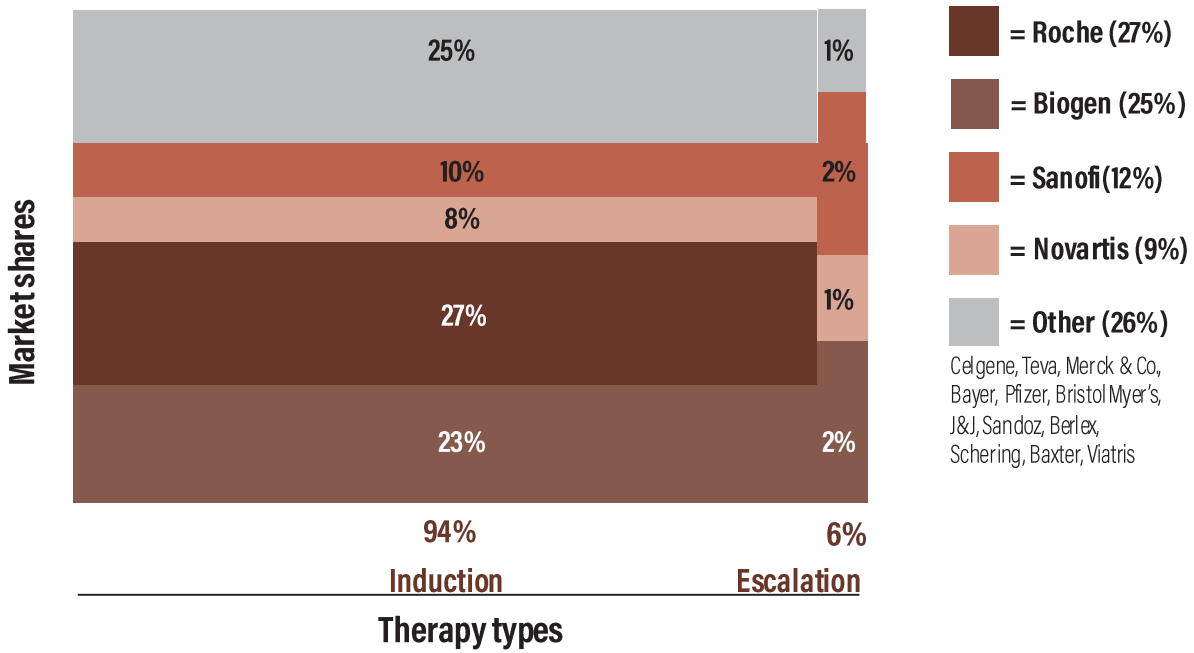
Current MS treatment market is dominated by large pharmaceutical players …

… but they are not competitors, they rather provide partner opportunities

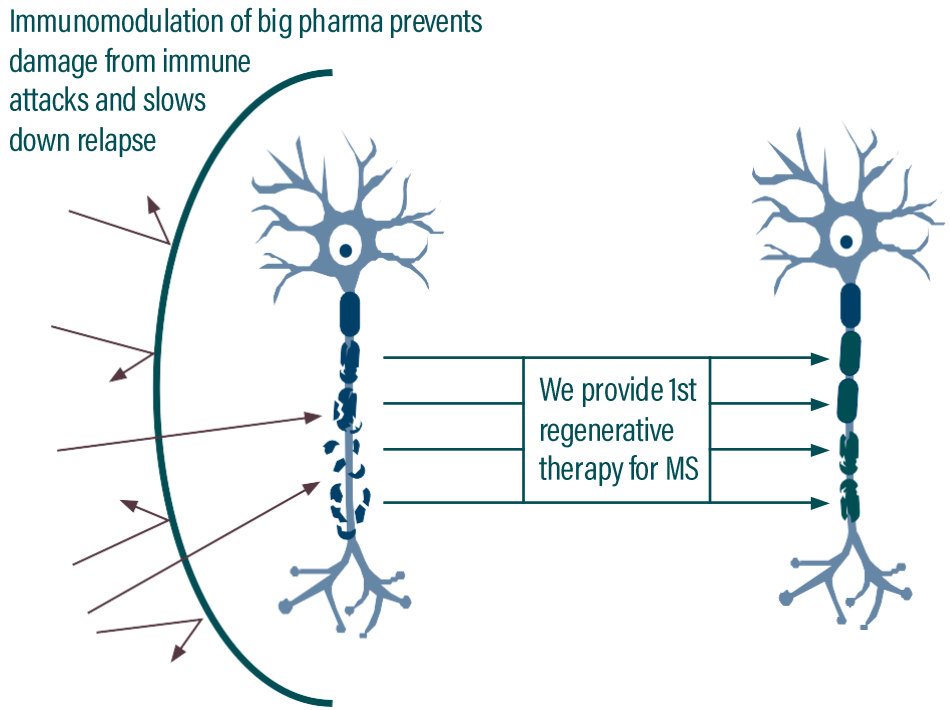
Market shares in MS treatment

2024 MS drug market: ~**21 bn $**

2032 MS drug market: ~33-40 bn $[1)]



Complementarity of approaches enables partnership

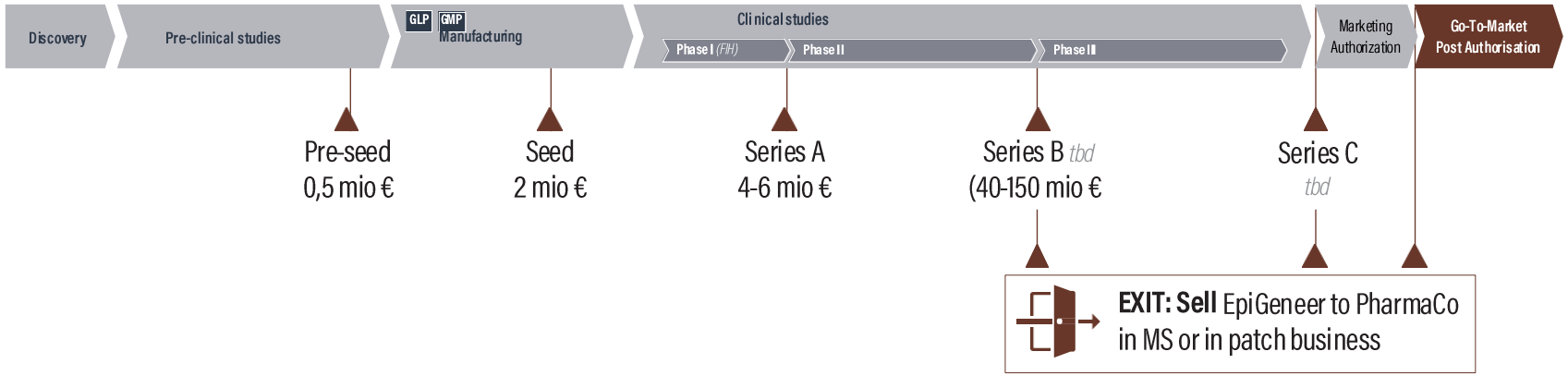


1) Some upper scenaios reach ub to 46 bn in 2034 - the role of novel and remyelinating therapies also plays a role for wide range of forecasts

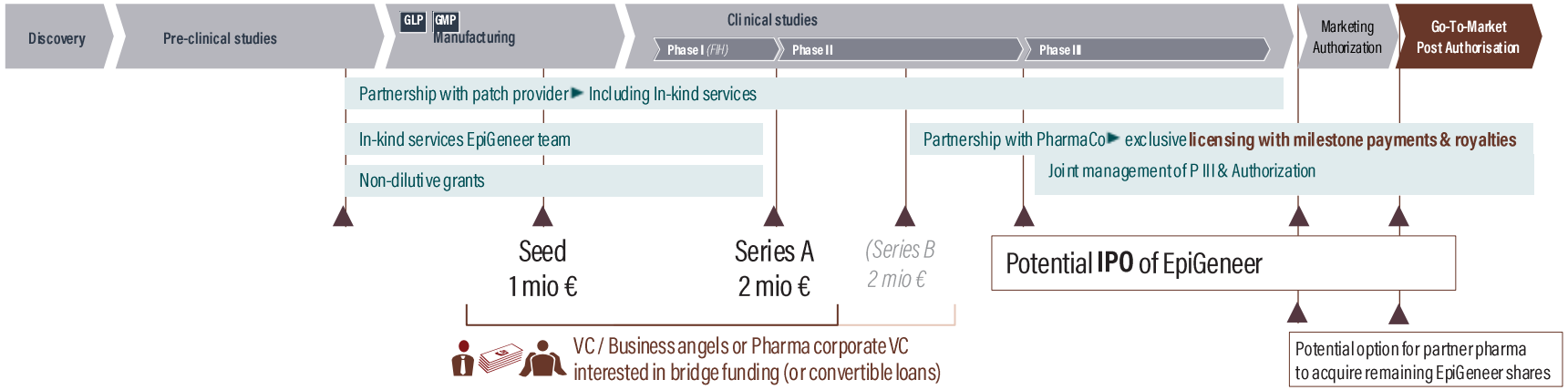
We keep the option for two strategic thrusts

Classical VC investment with pharma acquisition exit or strategic partnerships with bridge financing & IPO, with preference for the latter

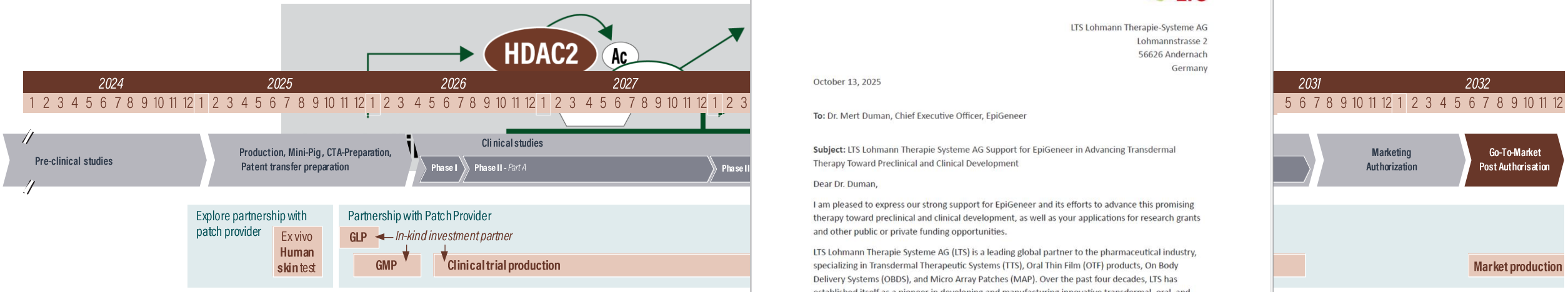
Option 1: classical VC / Business angel financial investors



Option 2: Strategic partnership with patch CDMO & pharma company



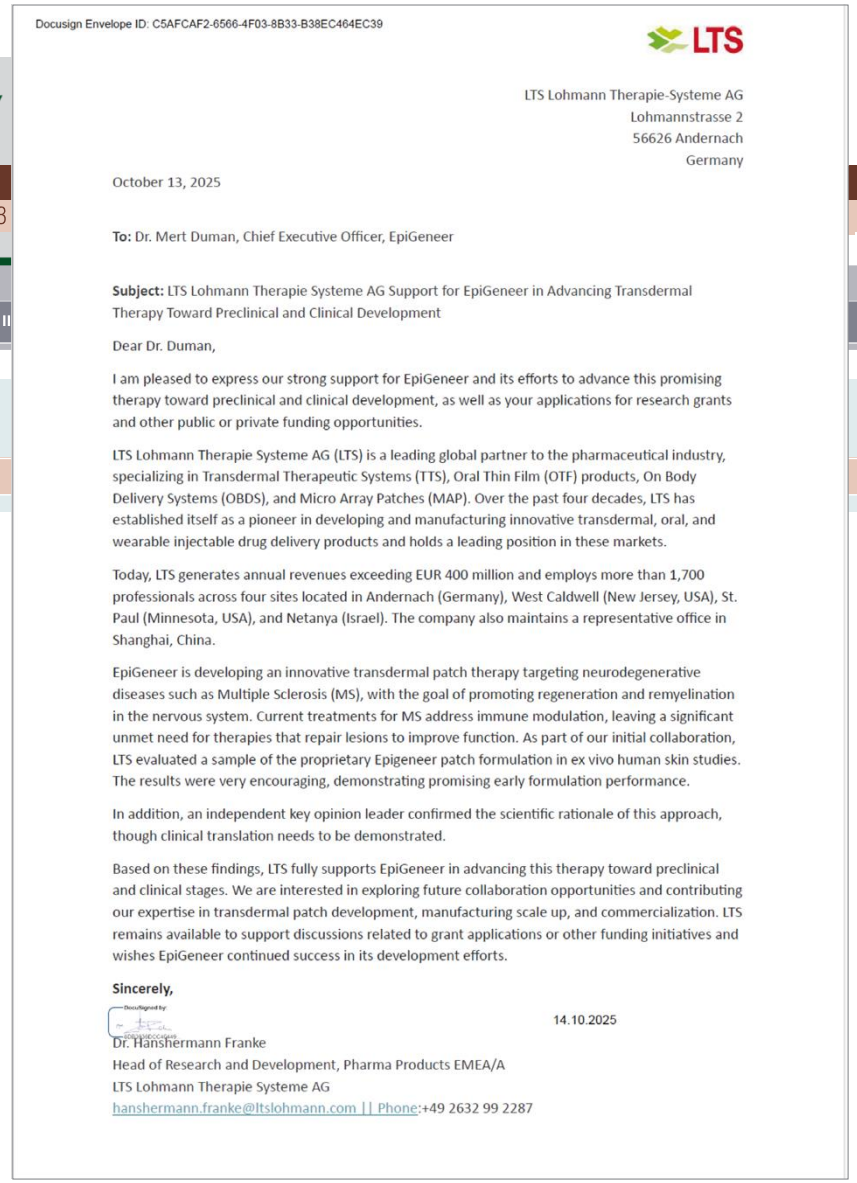
Existing interest of patch providers in a novel form of partnership between CDMO and EpiGeneer
Including in-kind investments, as EpiGeneer has potential to open up the large MS market to the patch business



Novel Form of Partnership between CDMO & Startup:

Including **In-kind investment** (worth **~800k**€) of partner for GLP & GMP

€1.1 million non-dilutive support from Else Kröner-Fresenius-Stiftung.



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LTS

LTS Lohmann Therapie-Systeme AG
Lohmannstrasse 2
56626 Andernach
Germany

October 13, 2025

To: Dr. Mert Duman, Chief Executive Officer, EpiGeneer

Subject: LTS Lohmann Therapie Systeme AG Support for EpiGeneer in Advancing Transdermal Therapy Toward Preclinical and Clinical Development

Dear Dr. Duman,

I am pleased to express our strong support for EpiGeneer and its efforts to advance this promising therapy toward preclinical and clinical development, as well as your applications for research grants and other public or private funding opportunities.

LTS Lohmann Therapie Systeme AG (LTS) is a leading global partner to the pharmaceutical industry, specializing in Transdermal Therapeutic Systems (TTS), Oral Thin Film (OTF) products, On Body Delivery Systems (OBDS), and Micro Array Patches (MAP). Over the past four decades, LTS has established itself as a pioneer in developing and manufacturing innovative transdermal, oral, and wearable injectable drug delivery products and holds a leading position in these markets.

Today, LTS generates annual revenues exceeding EUR 400 million and employs more than 1,700 professionals across four sites located in Andernach (Germany), West Caldwell (New Jersey, USA), St. Paul (Minnesota, USA), and Netanya (Israel). The company also maintains a representative office in Shanghai, China.

EpiGeneer is developing an innovative transdermal patch therapy targeting neurodegenerative diseases such as Multiple Sclerosis (MS), with the goal of promoting regeneration and remyelination in the nervous system. Current treatments for MS address immune modulation, leaving a significant unmet need for therapies that repair lesions to improve function. As part of our initial collaboration, LTS evaluated a sample of the proprietary Epigeneer patch formulation in ex vivo human skin studies. The results were very encouraging, demonstrating promising early formulation performance.

In addition, an independent key opinion leader confirmed the scientific rationale of this approach, though clinical translation needs to be demonstrated.

Based on these findings, LTS fully supports EpiGeneer in advancing this therapy toward preclinical and clinical stages. We are interested in exploring future collaboration opportunities and contributing our expertise in transdermal patch development, manufacturing scale up, and commercialization. LTS remains available to support discussions related to grant applications or other funding initiatives and wishes EpiGeneer continued success in its development efforts.

Sincerely,

14.10.2025

Dr. Hanshermann Franke
Head of Research and Development, Pharma Products EMEA/A
LTS Lohmann Therapie Systeme AG
hanshermann.franke@ltslohmann.com || Phone:+49 2632 99 2287

Meet our team

Mert Duman
CEO

10 years neuroscience experience

Claire Jacob
Co-founder & CSO

Prof. Johannes Gutenberg University Mainz

Thomas Meier
Co-founder

CEO Medios AG; former CEO Bachem AG

Ingo Schroeter
Strategy & Business

BCG, Philips Head of strategy + Corporate VC, Project Co-lead GeneNovate

Our Scientific Advisory Board

Roland Martin
Head of Neuroimmunology and Multiple Sclero-sis Research , University Hospital Zürich

Martin Schwab
Professor of Brain Research
at the University and ETH Zurich