# Restoring immune balance in NMOSD patients with a tolerogenic vaccine



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#### SUMMARY

2023

Neuromyelitis optica (NMOSD) is a devastating autoimmune disease that causes blindness and paralysis. Current therapies for NMOSD are neither disease-specific nor curative and have side effects that are debilitating or even life-threatening, and come at a high cost (200k/patient/year).

With the goal of preventing disease exacerbation and relapse in NMOSD patients, the team is developing a specific vaccine designed to restore healthy immune homeostasis, with the potential to be curative with minimal side effects.

### PROJECT GOALS

- Design optimal vaccine composition
- Demonstrate efficacy and specificity in vitro

### LONG-TERM GOALS

- Approval by PEI and conduct clinical trial Phase I
- Develop a specific vaccination for NMOSD patients

## PREVIOUS SPARK FUNDING

• Track 1 2022