

# ITACONATE IMMUNOMODULATORY PROPERTIES- ISCHEMIA REPERFUSION

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Artyomov, Maxim, Lampropoulou, Vasiliki "Vicky"

Han, Nathan

T-016181

**Technology Summary:** Approximately 1.3 million individuals each year in USA alone are affected by ischemia-reperfusion injuries. A substantial portion of such injuries is the result of macrophage-mediated inflammation. There are some conventional methods for treating macrophage-mediated inflammation, but none has acquired a significant market share. A novel approach of administering itaconate or its derivatives could potentially surpass the existing treatments. Recent discovery of itaconate to suppress the LPS-induced immune macrophage response could open up new treatment opportunities for patients suffering from ischemic-reperfusion injuries.

## **Advantages:**

- Potential therapeutic approach to ischemia-reperfusion injury
- Non-toxic and scalable
- Additional marketability as supplement.