JASMINE PRO

CONTACT

+358 40 681 1716
Info@jasminepolymer.com
www.jasminepolymer.com
Turku, Finland

DETAILS

Research to Business Project
Prerevenue
Est. incorporation: Aug 2023
Institute: Abo Akademi University
Project Budget: €950k
Future Seed round: €2-3 M

TEAM

Sebastian Soidinsalo, MSc, MBA
Commercial Lead

Erica Sjöholm, PhD, MBA
Business Dev. Manager

Kuldeep Bansal, PhD
Laboratory Lead

Prof. Jessica Rosenholm
Co-Scientific Director

Prof. Carl-Eric Wilén
Co-Scientific Director

AFFILIATIONS

Business Finland - Personalized Health

Health Incubator Helsinki

SPARK Finland

UNMET NEED

Poor drug solubility is a problem that halts progress of 60-90% of preclinical drug molecules early in development. In total, this means hundreds of drug candidates faliling due to bioavailability issues. Pharmaceutical companies are sourcing for new technologies that can help with solubility of their preclinical drug candidates as this would help move forward with difficult drug molecules and ultimately save cost in R&D and bring superior benefits to patients such as less adverse effects and more effective therapies.

SOLUTION

Poly(jasmine lactone) (PJL) is a proprietary polymer that can be used to increase solubility of poorly soluble drugs. A poorly soluble drug can be multiple thousand fold more soluble when incorporated into a polymeric solubilizer. PJL has a industry-leading drug loading capacity, that allows for longer dosing intervals and better bioavailability and it can be tailored for various drug molecules and conjugation chemistries.

Applications of PJL:
- Solubility enhancement
- Oral, subcutaneous and I.V. formulations
- Easy incorporation of linker and targeting chemistries with click chemistry

Unique Technical Benefits:
- Customizable for various chemistries and drug molecules
- High Drug Loading

Pharma Benefits:
- Reduced R&D attrition due to low solubility
- Improved efficacy, toxicity profiles and pharmacokinetics

MARKET SEGMENTS

Industry Total Addressable Market (Advanced Drug Delivery): $132B
CAGR: 6.1%

Polymeric Solubility Enhancement:
Total Addressable Market Estimated $1-2B
Target Market Share: 1-5%
Annual Estimated Revenue: $10M – $100M

Polymeric Micelle Drug Delivery
Total Addressable Market: $8B
Value benchmark of clinical assets:
Phase III Cyviloq sold to Nant Pharma: $90M upfront and $1.2B in milestones

Target market share: 1-5% of new polymeric micelle drug development assets via partnerships and/or own development. Target market size: $80M-$400M with 80-90% of market value going to the pharma company → 8-80M$ expected annual revenue.

Potential partners: small and midcap biotech and big pharma
Potential acquirers: BASF, Merck KgA,, Bayer, Astra Zeneca

COMPETITION

Many companies working with drug solubility enhancement using different technologies (e.g. Nanoform). No one technology is optimal for all drugs, but the market will remain fragmented with multiple opportunities for value creation.
Companies on the market: Nanoform, BASF, Nanocarrier, Cristal Therapeutics

IP & PUBLICATIONS

Advanced Functional Materials, Impact Factor = 17,09
Bansal et al. (2021) Synthesis and Evaluation of Novel Functional Polymers Derived from Renewable Jasmine Lactone for Stimuli-Responsive Drug Delivery
DOI: https://doi.org/10.1002/adfm.202101998

PCT/FI2020/050579 POLYMER AND COMPOSITION FROM RENEWABLE SOURCE
Patent pending for the synthesis and structure of poly(jasmine lactone). Patent granted in Finland.