

# SpectraCure: from university start-up to public company

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#### SpectraCure introduction



- Founded 2003 as a start-up from Lund University, Division of Atomic Physics
- Medical device company interstitial photodynamic therapy (PDT)
- Focus on treatment of prostate cancer
- Currently: phase I-II clinical trials at Princess Margret Hospital in Toronto, Canada, Pennsylvania University Hospital in Philadelphia, USA, and University College London Hospital

#### Fotodynamic therapy - PDT

**Triple component treatment** 



#### Interstitial PDT concept



### SpectraCure P18

- 18 optical treatment fibres (18 lasers up to 600 mW each)
- Optical switch, treatment/monitoring
- IDOSE<sup>®</sup> treatment planning and dosimetry software
- CE-marked class IIb medical device for use with temoporfin (652 nm)
- Not yet CE-marked for use with verteporfin (690 nm)



#### **Treatment overview**



#### SpectraCure pre-history

- 1907: Discovery of PDT (von Tappeiner)
- 1988: First publication on PDT at Lund University
- 1998: Large grant by the Swedish Strategic Research Foundation (SSF)
- 2003: SpectraCure AB founded Sune Svanberg, Katarina Svanberg, Stefan Andersson-Engels. Initial funding by Karolinska Development AB



## SpectraCure history

- 2003-2009: Funded by Karolinska Development, Industrifonden, Östersjöstiftelsen (+ minor investors)
  - Development of SpectraCure P18 and IDOSE (652 nm)
  - Pilot clinical trial i Malmö and Stockholm
  - Focus on non-treated (primary) prostate cancer
- 2010: Company sold to Masoud Khayyami and group of private investors
  - Development of SpectraCure P18 and IDOSE (690 nm)
  - Focus on recurrent prostate cancer
  - Planning for clinical trial in Toronto and Philadelphia
- 2015: Initial public offering (IPO) at Aktietorget
- 2017: First patient treatment in Toronto
- 2018: Listed at Nasdaq First North

### **Current trial**

- Localised recurrent prostate cancer (failed radiotherapy) as the route to market approval of the technology and clinical introduction
- Dose escalation trial (photosensitiser dose and light dose)
- Trial divided between Toronto, Philadelphia and London

#### **Clinical situation**



Treatment planning



Inserting needles



Treatment

#### Dose map examples









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Post-treatment (7 days)

**Pre-treatment** 



#### Thank you!

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