

sequana medical

Commercial stage medical device company focused on innovative treatment solutions for liver disease, heart failure, malignant ascites and other fluid imbalance disorders

Fast facts

- Founded in 2006
- Headquarters in Ghent, Belgium
- Manufacturing in Zurich, Switzerland
- 34 employees
- Approximately €90 million in private funding to date
- Leading specialist life science investors
- Highly experienced leadership team
- Vast industry and business know-how within the board, which amongst others includes Rudy Dekeyser
- Strong IP position
- Global network of KOLs in Europe and North America
- Targeted commercial roll-out across Europe

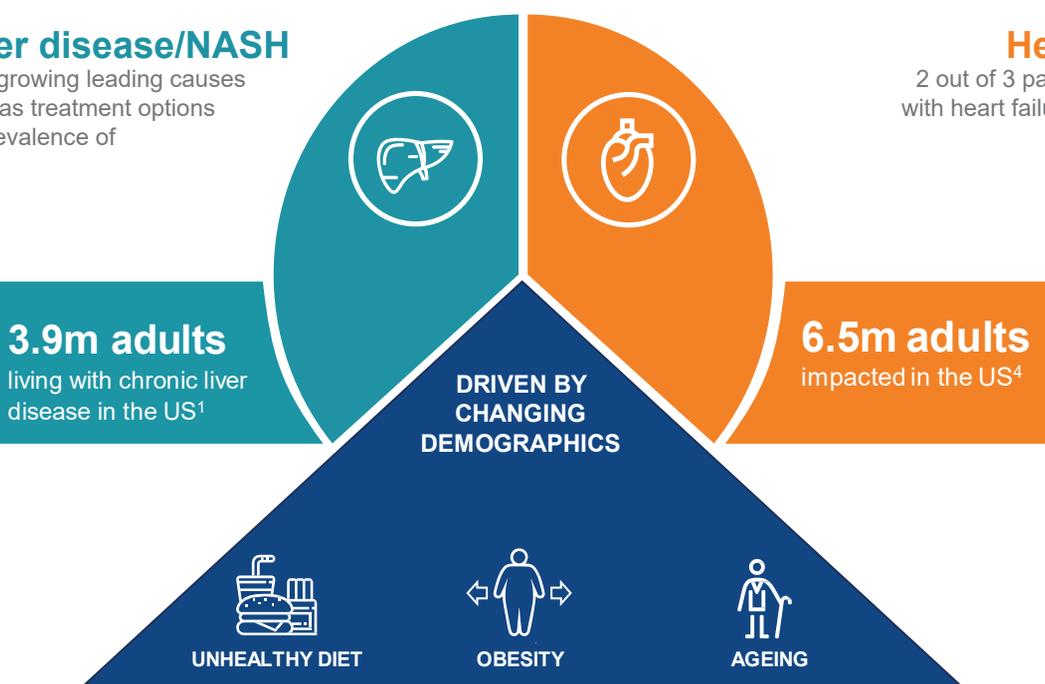


alfapump[®] is approved in Europe for the treatment of liver refractory ascites and malignant ascites. Ascites is the accumulation of excess fluid (up to 15L) in the abdomen due to liver disease or cancer. Over 650 systems have been implanted and a North American pivotal study is planned to commence in the second half of 2019. The **alfapump** DSR builds upon this experience to deliver a convenient and fully implanted system for volume overload in heart failure.

Focus on liver disease and heart failure, large and growing markets driven by unhealthy lifestyles, obesity and an ageing population

Chronic liver disease/NASH

One of the fastest growing leading causes of death in the US as treatment options are limited² and prevalence of NASH increases³



Heart failure

2 out of 3 patients diagnosed with heart failure will die within 5 years⁵

Liver Cirrhosis:

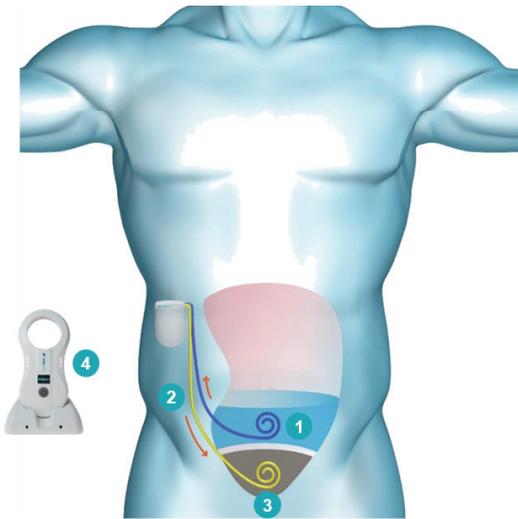
The market is forecast to grow dramatically due to increasing prevalence of fatty liver disease / NASH (non-alcoholic steatohepatitis) – especially in the US. Approximately three to four million people in the US will be suffering from liver cirrhosis due to NASH in the near- to medium- term.⁶

Volume Overload in Heart Failure:

Volume overload is a major clinical complication of heart failure. Approximately one million hospitalisations for heart failure occur in the US each year, 90% of which are due to volume overload, costing approximately \$13 billion.⁷

alfapump: proven step change in the management of liver refractory ascites and malignant ascites

Fully-implanted, wirelessly-charged, CE-marked system that automatically and continuously pumps ascites from the abdominal cavity into the bladder, where the body eliminates the ascites naturally.

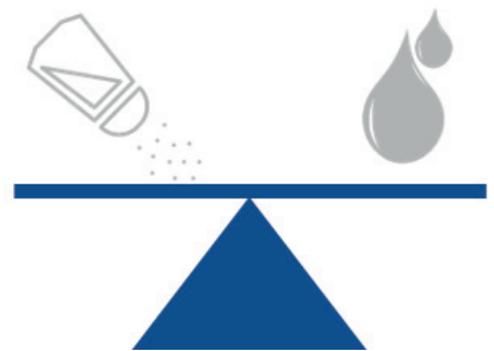


- 1 Automatic and continuous removal of ascites from peritoneal cavity
- 2 Ascites is pumped into bladder
- 3 Ascites leaves the body through normal urination
- 4 Wireless charging and communication for monitoring

Since April 2018, the **alfapump** has been included in the EASL (European Association for the Study of the Liver) clinical practice guidelines for decompensated cirrhosis.

alfapump DSR: breakthrough development for the management of volume overload due to heart failure

DSR (Direct Sodium Removal) therapy is Sequana Medical's proprietary and breakthrough approach to the management of volume overload in heart failure. The approach focuses on the removal of sodium from the body, and allows the body to naturally remove the excess fluid via urination and osmotic ultrafiltration. The **alfapump** DSR builds on the **alfapump** platform to deliver, a convenient and fully implanted system under development for DSR therapy. Animal studies at Yale have shown DSR to be both safe and effective, and human studies are planned for later this year.



Sequana Medical: Long-term plans

 <p>North American Liver & Malignant</p> <ul style="list-style-type: none"> <input checked="" type="checkbox"/> Clinical feasibility study (MOSAIC) <input type="checkbox"/> US Pivotal Study in liver recurrent and refractory ascites commencing in H2 2019 	 <p>North America & Europe – Heart Failure</p> <ul style="list-style-type: none"> <input checked="" type="checkbox"/> Animal studies (Yale) <input type="checkbox"/> First in human study in H2 2018
 <p>Europe Liver & Malignant</p> <ul style="list-style-type: none"> <input checked="" type="checkbox"/> CE mark and EASL clinical practice guidelines <input checked="" type="checkbox"/> Clinical studies (RCT, PMSR, retrospective malignant) <input type="checkbox"/> Prospective studies in malignant ascites & albumin <input type="checkbox"/> Focussed expansion in UK, DE, CH & FR 	

For more information, visit www.sequanamedical.com or contact IR@sequanamedical.com

Source 1: Centres for Disease Control and Prevention (CDC)
 Source 2: Big pharma bets billions on 'silent' liver disease, Financial times
 Source 3: Estes et al. 2018, GlobalData Nash Epidemiology Forecast to 2026
 Source 4: Mozzafarian D, Benjamin EJ, Go AS, et al. Heart disease and stroke statistics—2017 update (adults: >=20 years of age)
 Source 5: Mamas (2017) Do patients have worse outcomes in heart failure than in cancer?

Source 6: Management estimate based on Estes (2018), GlobalData Nash Epidemiology Forecast to 2026, Nouredin et al. 2013
 Source 7: Costanzo et al. (2007), Ambrosy et al. 2014, Kilgore et al. 2017

Important Regulatory Disclaimer: alfapump DSR is under development and neither CE-marked nor available for clinical use.