

Funding report

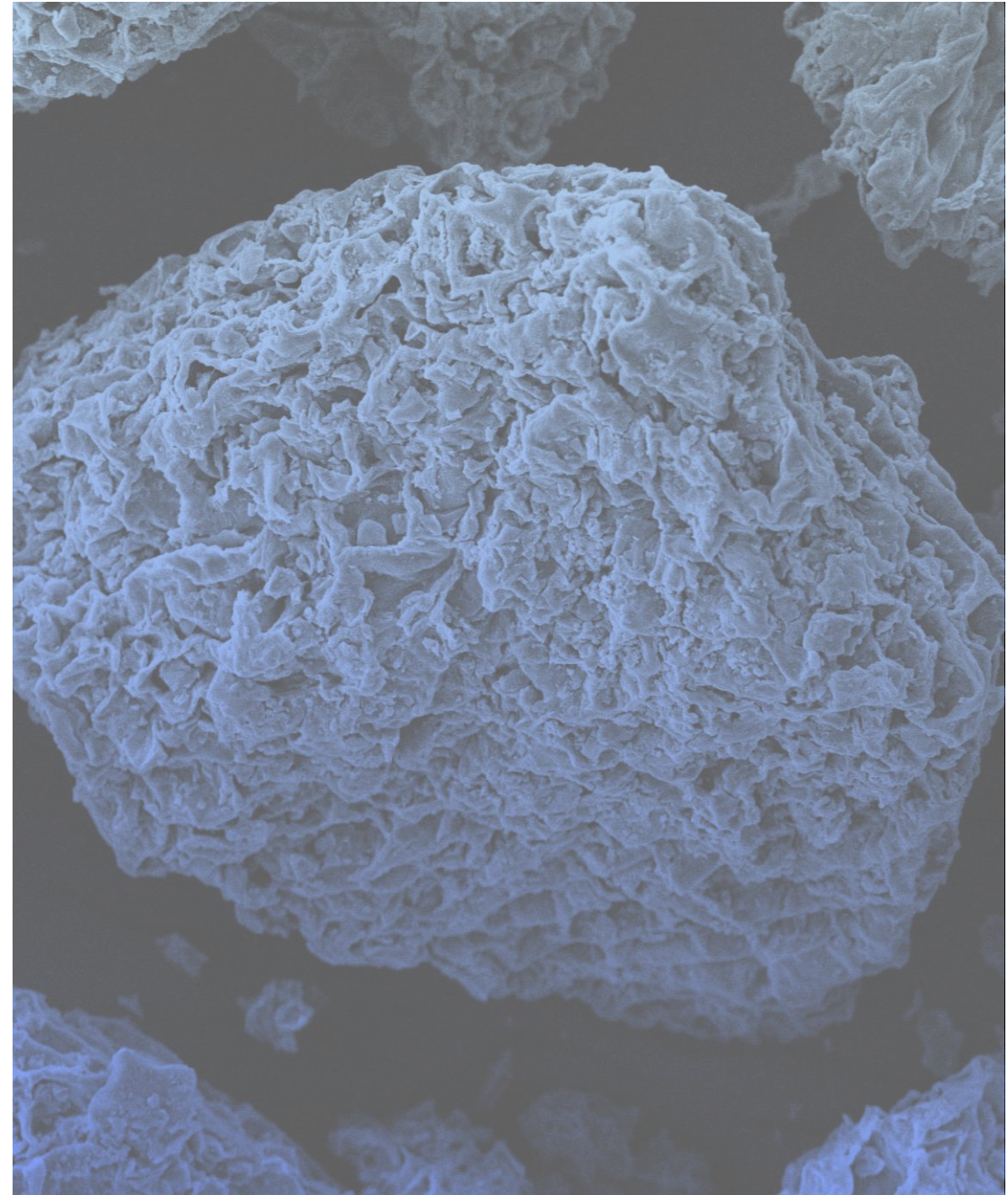
The Life Science funding landscape in Sweden
2015-2019

Introduction

- Industrifonden has reviewed the funding flows into Swedish life science companies, focusing on Therapeutics, Healthtech, Diagnostics and Medtech, over the last five years (2015-2019) with the addition of Q1 2020
- The report covers funding across the life cycle, from grants, to incubator and angel funding, on to venture capital (VC) and the stock markets*; the amounts increase for each step
- The included companies all aim high and consciously take substantial risks to generate data, win regulatory approvals and secure global partners; to bring innovation into large scale clinical practice. Some will fail
- But some will succeed beautifully; the system makes sense. During this 5-year period, a handful of successful exits, some public, some private, generated funding flows *back to* investors of about 22 bnSEK. With 35 bnSEK recently invested – exciting times ahead

This report was released in June 2020

* Partnership and licensing deals are not included; they will be summarized in an separate report.



Executive Summary

Swedish life science companies raised a total 35 bnSEK 2015-2019 - majority over the stock markets

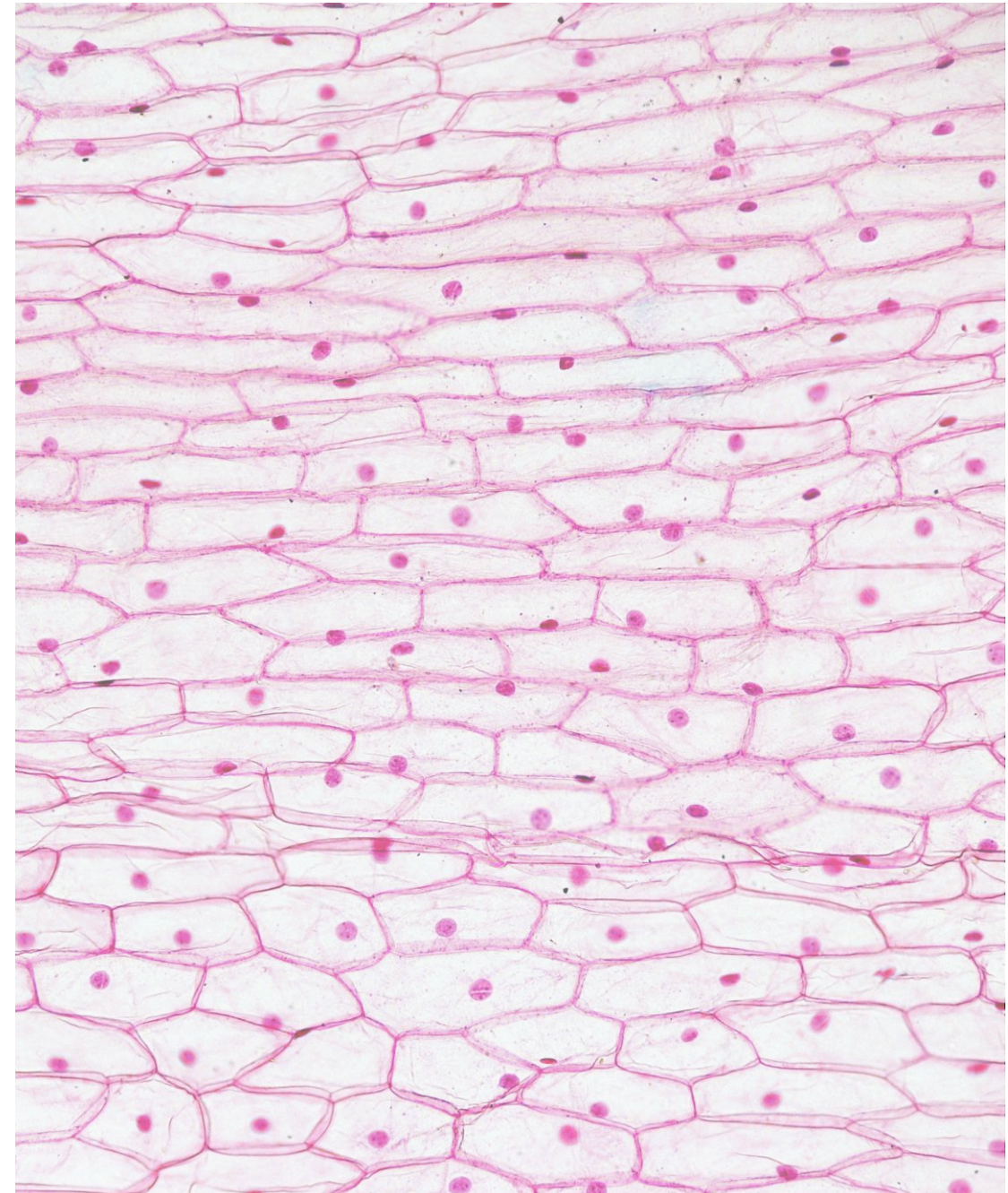
- Stock markets have been the dominant funding mechanism representing 75%, or 26 bnSEK. This includes IPOs and follow-on public offerings on the Nasdaq main market, First North and Spotlight

Capital raised in IPOs declined, instead increasing amounts were raised in follow-ons

- 2017 was the peak year of life science IPO:s (15); a sharp drop to 2018 (10) and lower still in 2019 (5). The same pattern applies in capital raised
- The growing group of listed companies is raising increasing amounts; the follow-on offerings keep growing and add up to 18 bn SEK, about 50% of the total amount raised

VC funding represent a smaller share, reflecting the limited pool of active and specialized VC funds in Sweden and in the Nordics

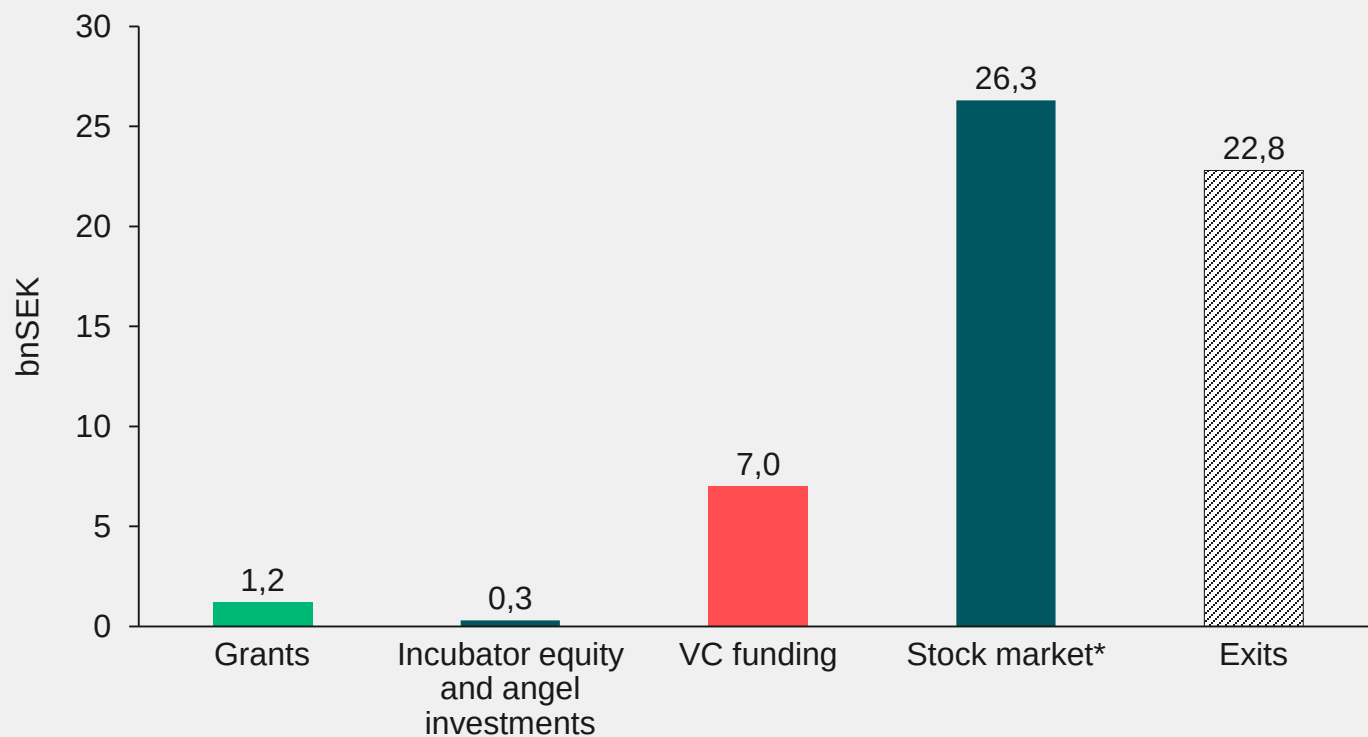
- 7 bnSEK (20%) was raised in VC funding. The funding dropped from 2018 to 2019; the number of deals was stable, but fewer large deals
- VC investments have been focused on Healthtech (41%) and Therapeutics (39%), while Medtech and Diagnostics/IVD and R&D Tools together represent only 20%
- At the Nordic level, we see Sweden (49%) and Denmark (32%) dominating Life science VC funding. Healthtech drives the Swedish totals and Therapeutics drive Danish data





Sweden

Swedish life science companies raised a total of 35 bnSEK, 2015-2019



Swedish life science companies raised a total of 35 bnSEK during the five year period 2015-2019.

The public market served a very significant role in funding the Swedish life science sector. Over 75% of the capital was raised over the public stock markets in either IPOs or follow-on public offerings (FPOs) during 2015-2019.

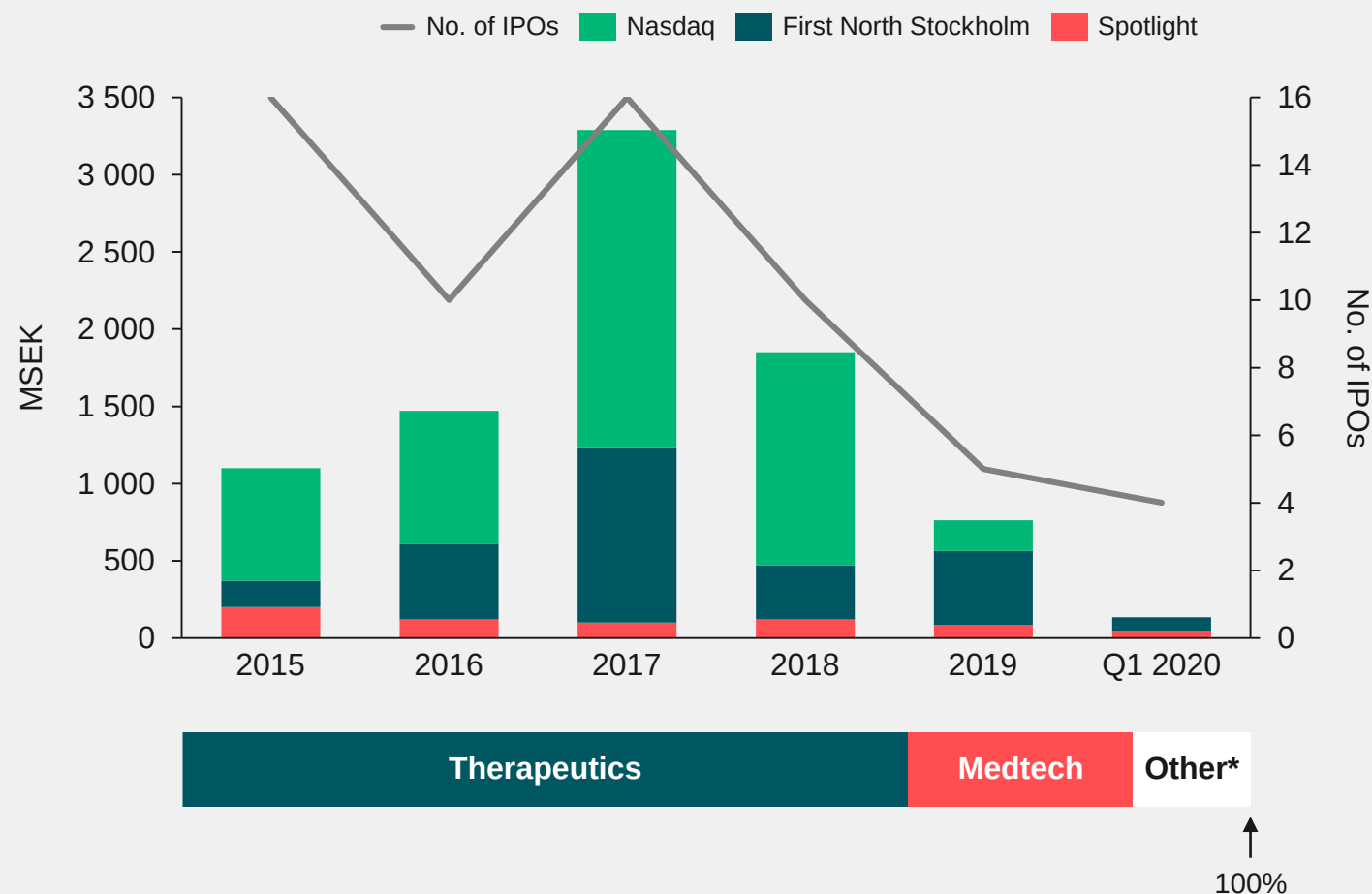
A relatively large share of the capital was regained in exits, with a total deal value of ca 22.8 bnSEK – including both private and public exit deals.

Note that partnership and licensing deals are not within the scope of this report, but are also important sources of capital for life science companies – particularly in the therapeutics sector.

* Includes capital raised in FPOs, listings and IPOs on Spotlight, First North and Nasdaq main market



Stock market: a recent sharp decline in life science IPOs



* Includes IVD-, Healthtech- and R&D Tool-companies

A total of 8,4 bnSEK was raised in IPOs in 2015-2019. In Q1 2020 135 MSEK was raised in 4 IPOs, none at Nasdaq.

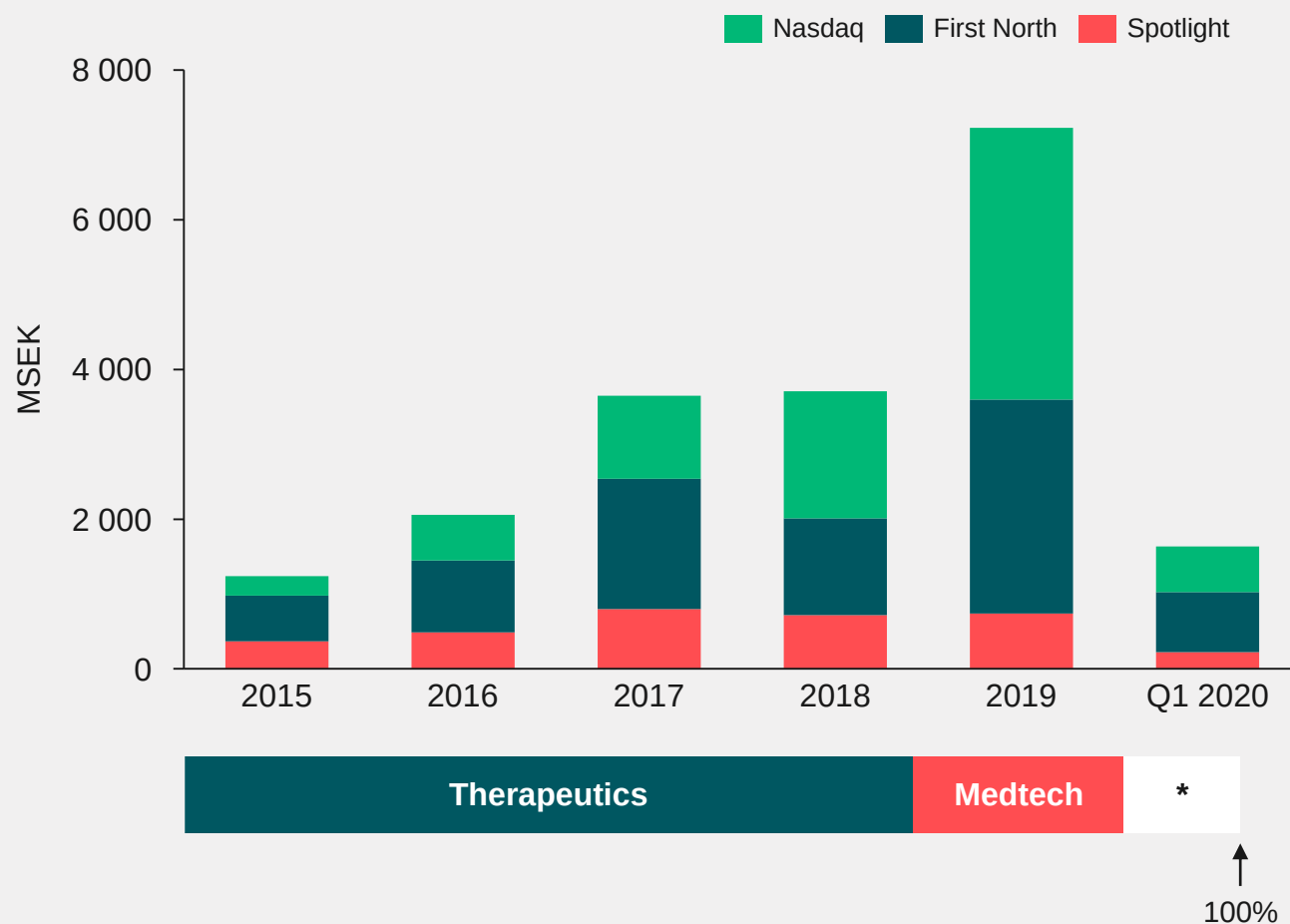
2017 was a record year, both in terms of capital raised and number of companies gone public. Since then we've seen a decline in companies entering the stock market. In 2019 only five life science companies went public, raising a total of ca 700 MSEK – the lowest figure in this period.

Therapeutics represented 68% of total capital raised in IPOs.

The largest IPOs in Sweden during this period included the listings of *Calliditas*, *BioArctic*, *Camurus* and *Oncopeptides*, each of them raising 700-800 MSEK. The Swedish company Aprea Therapeutics also made a noteworthy IPO in 2019 raising almost 1 bnSEK, although on the Nasdaq US market.



Stock market: 2019 was the year of follow-on public offerings (FPOs)



* Includes IVD-, Healthtech- and R&D Tool-companies

A total of 18 bnSEK was raised in follow-on public offerings (FPOs) during 2015-2019.

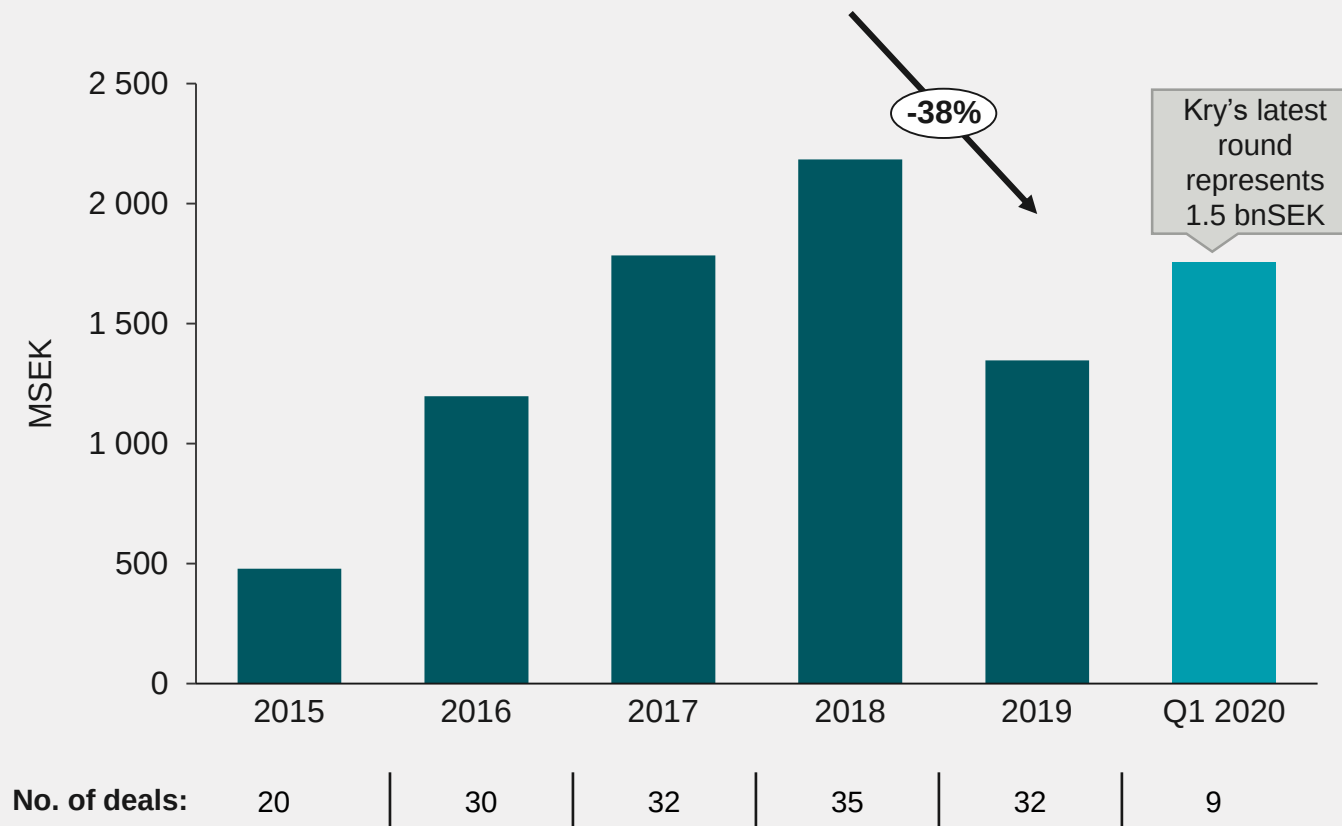
As opposed to the recent negative IPO trend, the amounts raised in FPOs increased steadily during this five year period. In 2019 a record of 7.2 bnSEK was raised by life science companies in FPOs, primarily on the Nasdaq main market and First North. Also Q1 2020 continued strong with 1,6 bnSEK raised in FPOs.

The amounts raised in the two year period 2018-2019 was 3 times that raised in 2015-2016.

The majority of capital was raised by Therapeutic companies (71%). Considering the R&D-heavy nature of life science it is not surprising that more than half of the listed companies raised funding more than once during this five year period (many of them multiple times), and the average time between fundraisings was only 1.6 years.



Venture capital: lack of big deals caused a decline in VC funding in 2019



A total of 7 bnSEK was raised in venture capital funding 2015-2019 in Sweden.

The majority of deals in Sweden are small and amount to 50 MSEK or less. But a few big deals each year drive the figures in venture capital funding. In 2019 a decline in large VC deals – only 1 deal over 100 MSEK compared to 5 in 2018, led to a sharp decline in the total VC funding (-38%).

Only in Q1 2020 over 1,5 bnSEK has been raised in VC funding in 9 separate deals. Kry's record round represents the major share.

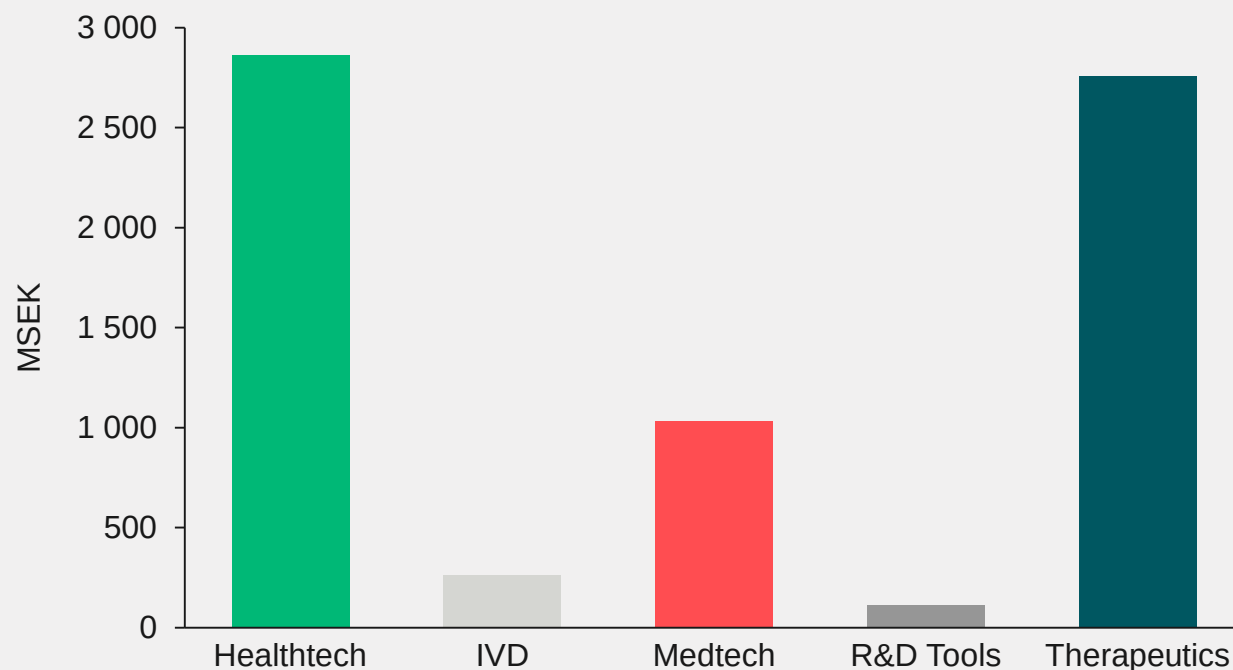
The companies that have raised most in venture capital funding during 2015-2019 include several Healthtech companies; *KRY*, *MinDoktor*, *Docly* and *Natural Cycles*, and a few therapeutic companies; *Aprea Therapeutics*, *ITBMed*, *OxThera* and *Bonesupport*.

See Appendix for largest VC rounds 2015-2020 (Q1) listed

Venture capital finances Healthtech and Therapeutics



Venture capital funding per sector, 2015-2019 (MSEK)



Healthtech and Therapeutic companies are the major receivers of life science venture capital funding.

The majority of Healthtech funding was raised between 2017-2018. Therapeutics have on the other hand been more steadily financed over the five year period.

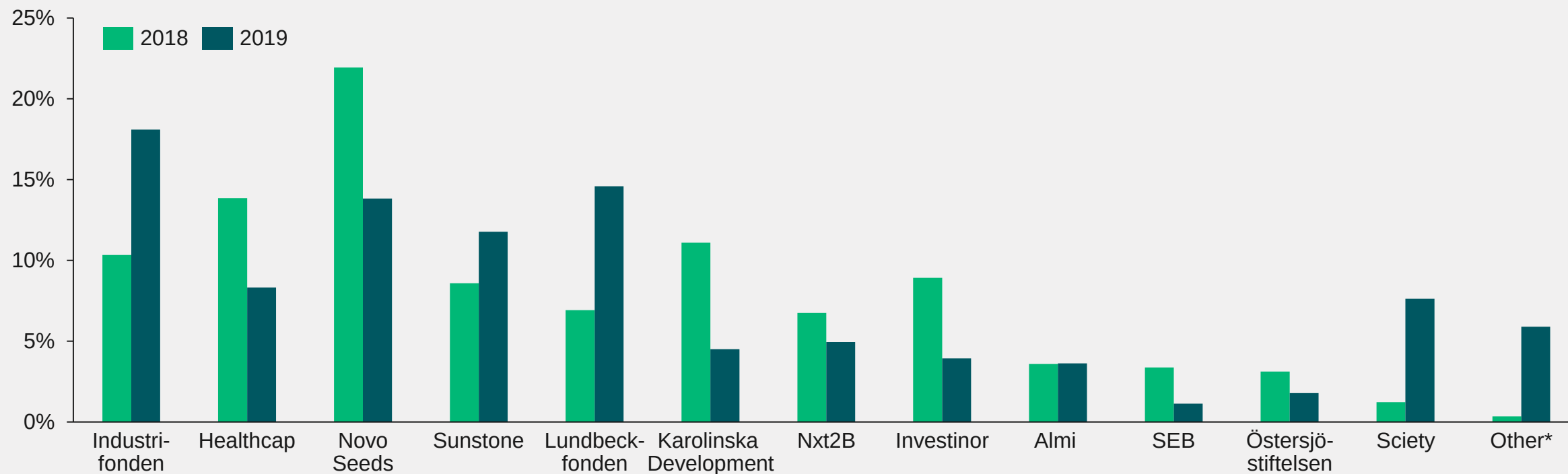
The investor base differs between Healthtech and Therapeutics. Healthtech companies have to a large degree been financed by non-life science investors, including by Swedish and non-Swedish tech investors– *EQT*, *Creandum*, *Accel* and *Index Ventures*. The therapeutics investor base mainly consists of Swedish and non-Swedish life science focused investors.

Investors that have invested both in Healthtech and Therapeutics include, *Industrifonden*, *Almi Invest*, *Healthcap*, *Novo Holdings* and *Chalmers Ventures*.

Share of VC funding in private companies, 2018-2019



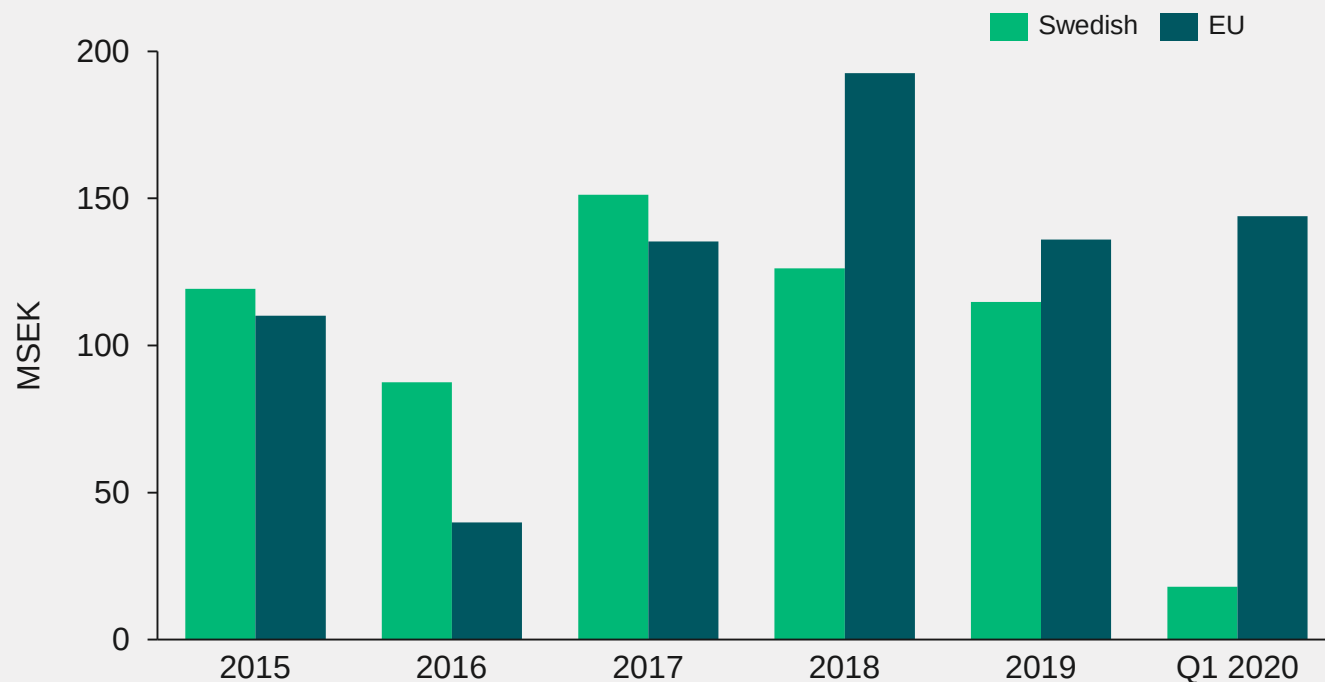
Life Science investments in the Nordics made by the following investors amounted to a total of ca 1.1 bnSEK in 2018 and 1.2 bnSEK in 2019.



* Other includes: Sarsia, Bonit Capital, LUBio, Neomed, Hadean and Seed Capital



Public grants key source of funding for early stage life science companies



Source: Cordis (EU) and SweCRIS (mainly Vinnova and SweLife), donations from private sources not included

Swedish life science companies received 1.2 bnSEK in grant funding 2015-2019, ca 50/50 from EU and Sweden. However, the grants from EU are on average much larger and only a few companies receive them each year—*ca 100 companies receive Swedish public grants each year, while only ca 15 companies receive EU grants via Horizon 2020.*

Although grants are a relatively small share of the total funding, they serve an important source of capital to many early stage life science companies. Note that also research grants assigned to individuals and grants from private financiers are also important sources of company funding, but are not included in this data.

Major public grant receivers during this period include the following companies, with the lion's share received from EU:

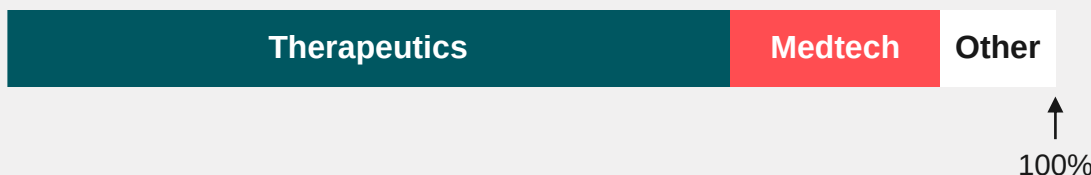
Scandinavian BioPharma	220 MSEK
Bioarctic	75 MSEK
Immunovia	50 MSEK
Symcel	40 MSEK
Ilya Pharma	35 MSEK



Exits between 2015-2019 amounted to 22,8 bnSEK

Top 5 exits in Sweden, 2015-2019

Company	Buyer	~Deal size (MSEK)	Year
Wilson Therapeutics	Alexion	6 550	2018
Cormorant Pharmaceuticals	Bristol-Myers Squibb	4 400	2016
Trimb Healthcare	Karo Pharma	3 350	2019
Aerocrine	Circassia Pharmaceuticals	1 800	2015
Gyros Protein Technologies	Mesa Labs	1 700	2019



The total exit value of Swedish life science companies between 2015-2019 was 22.8 bnSEK*. Only a few exits make up this figure – the top 5 exits making up almost 80% of the total value.

The largest exit during this period was Wilson Therapeutics, acquired by Alexion in 2018 for 6,5bnSEK. The second largest, and the largest private exit was Cormorant Pharmaceuticals, acquired by Bristol-Myers Squibb in 2016 for 4.4 bnSEK (deal value).

Majority of the exits were within the therapeutics sector (ca 70%). Although much has been invested in Healthtech, big exits are yet to be seen.

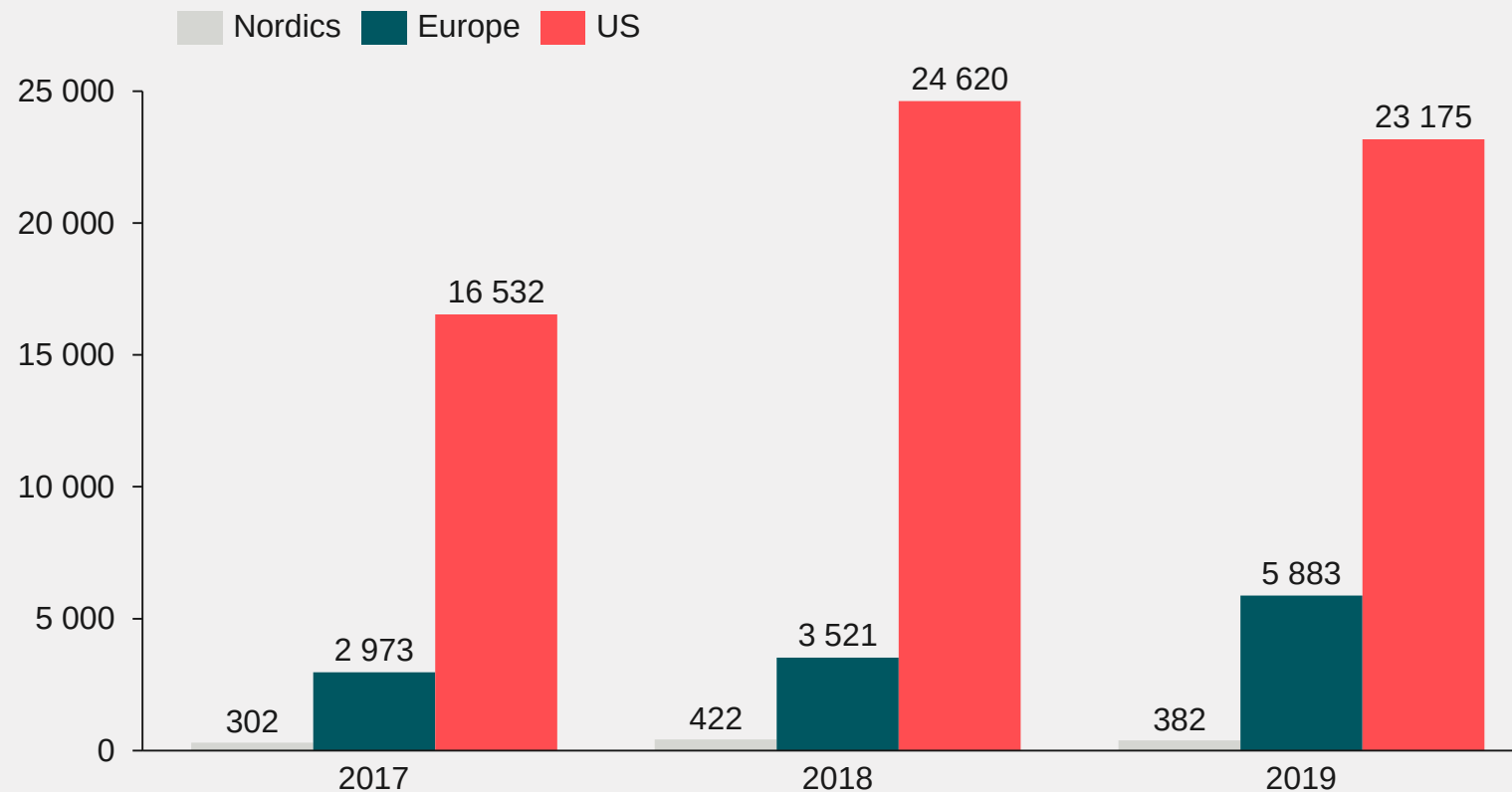
In Q1 2020 no exits were announced in the sector.*

* Note that data only includes deal values made public, total deal value could potentially be larger considering some deals are not made public. The data is excluding the Mylan's acquisition of Meda in 2016.



Big Picture – How does Sweden compare to the RoW and the Nordics?

Total LS VC funding 2017-2019 EU, Nordics and US (MEUR)

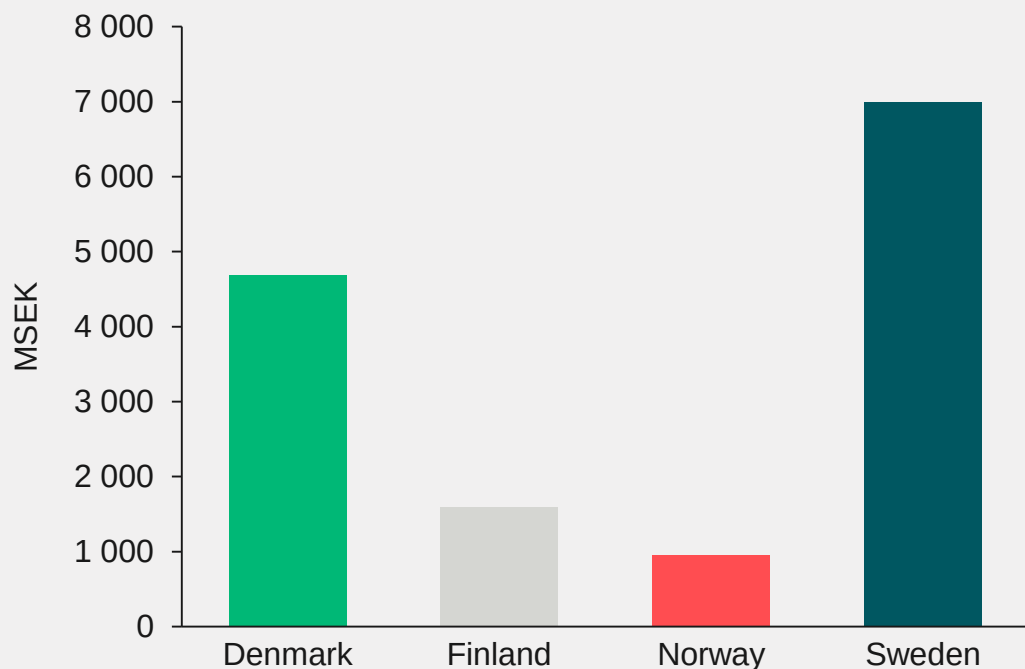


Source: Silicon Valley Bank (SVB), Pitchbook, Industrifonden

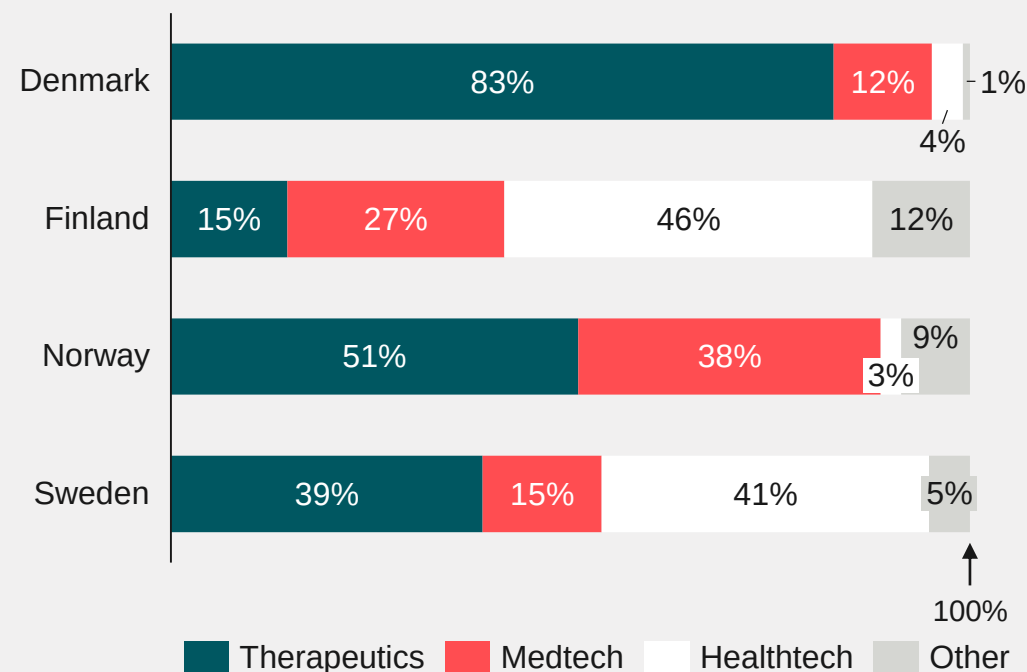


VC funding in the Nordics 2015-2019

In total, 14 bnSEK was invested in Nordic Life Science companies between 2015-2019. Swedish and Danish companies dominate (49% and 32%).



The share of VC funding in the different sectors differs between the Nordic countries. In Denmark the therapeutic sector is dominant, while in Sweden and Finland a large share of the funding has gone to Healthtech companies.





Appendix and Methodology



Largest VC rounds 2015 – 2020 (Q1)

Company Name	Year	Sector	Deal Size (mEUR)
KRY	2020	Healthtech	140
KRY	2018	Healthtech	56,2
ITBMed	2018	Therapeutics	54,3
Apra Therapeutics	2019	Therapeutics	54,1
Apra Therapeutics	2017	Therapeutics	40,4
Docly	2018	Healthtech	35,0
Bonesupport	2016	Medical Device	33,4
OxThera	2016	Therapeutics	32,0
Natural Cycles	2017	Healthtech	25,6
Cinclus Pharma	2020	Therapeutics	24
Min Doktor	2017	Healthtech	22,6
KRY	2017	Healthtech	20,0
OxThera	2017	Therapeutics	16,2
Q-linea	2018	Medical Device	14,8
Modus Therapeutics	2018	Therapeutics	13,6
Doktor.se	2017	Healthtech	13,2
Bonesupport	2015	Medical Device	13,0
Doctrin	2017	Healthtech	10,1



Methodology: data sources and analysis

Data sources:

- **Pitchbook** – Data on VC funding and M&A was collected from Pitchbook. Broad search terms were used to include all companies headquartered in *Sweden, Norway, Denmark or Finland*, within the “Healthcare Industry” except for “Healthcare Services” that raised funding or were acquired between 2015-Q1 2020. Note that the data only includes deals with known deal sizes, i.e. deals without financial information are excluded
- **Westerberg Kommunikation AB** – Sten Westerberg, on behalf of Industrifonden, collected information about Nordic life science investor activity during 2018 and 2019
- **Pareto Securities** – Pareto Securities kindly shared data with Industrifonden on FPOs and IPOs on the Nasdaq main market and First North 2015-2019
- **Spotlight** – Data on FPOs and IPOs on Spotlight was collected separately from <https://spotlightstockmarket.com/>
- **Cordis** – Data on EU funding was collected from <https://cordis.europa.eu/>. The data was further filtered based on the “coordinating country” Sweden and the “coordinator” denoted as “AB”. Funding granted to individuals potentially linked to private or public companies are therefore not included
- **Swecris** – Data on funding from Swedish Institutions has been collected from <https://www.swecris.se/>. Data is hence limited to the institutions reporting to Swecris, including Vinnova and SweLife
- *Data on partnership and licensing deals has not been analysed*

Data cleanse and Industrifonden’s analysis:

Life science vs non-Life science:

All of the companies included in the collected datasets have been categorised by Industrifonden as either life science or non-life science for inclusion or exclusion.

Sub-sectors of Life Science:

The complete list of included life science companies have been further categorised into one of the following sub-sectors; *Therapeutics, Medical Device, IVD, Healthtech* and *R&D tools*. For sub-sector categorization qualified judgements have been made based on available company information.

Note that categorization is not obvious and somewhat vague; some of the companies float between multiple sub-sectors. Scientific and technological advancements enable novel innovations that do not neatly fit into a stringent sector definition.

See next page for the definition of life science and sub-sector definitions used in this report.

Industrifonden welcomes all comments on the methodology applied.



Methodology: definitions

Definition of Life science:

Life science is very broadly defined as the sciences that deal with living organisms - including humans, animals and plants. In this report we have used a narrower definition of the sector, and focused only on the human science, and more specifically on companies developing products for the healthcare and pharma sector.

Biotechnology companies developing tools and products for agriculture or food (including food supplements) have been excluded, also companies developing laboratory equipment (production) and healthcare providers have been excluded from the analysis. Companies solely providing services to the biotech and pharma industry, without a proprietary technology, such as Contract Research Organizations (CROs) and Contract development and Manufacturing Organizations (CDMOs) have also been excluded from the report.

Sub-sector definitions:

Therapeutics – companies focusing on drug discovery, drug development and commercialization of small and large molecules/biologics for the treatment and prevention of disease.

Medtech (Medical Device) – companies developing and commercializing products that prevent, diagnose, monitor, treat and care individuals. Medical devices are mechanical instruments, such as apparatus, appliances, implants, materials and other form of articles that do not engage the body's chemistry, as opposed to therapeutics.

In Vitro Diagnostics (IVD) – are non-invasive tests used on biological samples to determine the status of the patient's health. IVDs do not treat patients, but give healthcare professionals and patients information to make treatment decisions.

Healthtech – Healthtech is a growing sector with a broad spectrum of companies. The common denominator is the use of software (ICT) to support patients, healthcare professionals (HCPs), and/or the pharma/biotech industry. For example, Healthtech comprises companies that use ICT to connect HCPs and patients and companies using AI and machine learning for diagnosis and decision support.

R&D tools – companies that provide proprietary technology for the biopharma industry and academia, for example to improve and/or speed up drug discovery and development.

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