Scaled Robotics EXC3505 Strategy Research Projects

About

Construction impacts our daily lives in unique ways. The industry shapes the cities we live in and afterwards, our cities shape us, by producing the homes we live in and the infrastructure that drives our economies. With 200,000 people a day globally moving to urban areas, the industry must respond to some of the biggest challenges of our time, but it is plagued by waste and inefficiency. Up to 20% of a construction projects budget is taken up by rework and according to McKinsey large typically 20% over schedule and up to 80 percent over budget.

At Scaled Robotics we are applying robotics and machine learning to build new tools that can track, analyze and optimize the construction process. Reducing risk and uncertainty within the construction process to keep projects on budget and on schedule.

Our core product is a web based software platform that takes laser scan data from the construction site as input and compares it to the digital plans (BIM Model) using a combination of computer vision and machine learning. Delivering it back as actionable information and insight on a web based viewer. We provide two core data products within the platform that monitor quality and progress respectively.

In addition to the software product we are also developing a mobile robot that can capture data 10x times faster than traditional reality capture devices. This is crucial for the value delivered by the progress monitoring software product, where the higher the frequency of data captured the more detailed the analysis can be.

Business

We are currently bringing the software product to market on a B2B SaaS model, with a monthly fee based on size (m2) and complexity of the project. Focusing on large general contractors with existing reality capture teams and mature digital design processes (VDC). On a project level we are targeting those with a high complexity where we can deliver value immediately.

Moving forward we are looking to leverage more our principle investor PERI and continue using and developing the partnership with Autodesk by building further integrations between our two product sets.

The markets and areas we have chose to focus on in 2020 are, Scandinavia (Norway currently), Europe (UK, Netherlands, Belgium and France), The middle easy (UAE) and the USA.

Strategic questions

As we aim to expand over 2020 and bring our core product to market we have a number of strategic questions.

1. Is there a better pricing model than outlined above? How do we extract the maximum revenue from the product offering we have now.
2. What features will our customers pay more for? Quality control or Progress monitoring?
3. How can we enter and grow quickly within the middle eastern market, in particular the UAE and Saudi Arabia?
4. How can we enter and grow quickly within the US market? Especially as a majority of our competitors are US based.