Printing the future
Interview with Rik Jacobs about the rise of 3D printing in dentistry

By 3D Systems

The 21st century has not turned out exactly as predicted by the science fiction writers of the past. There aren’t any flying cars filling the skies or robots walking the streets, but there are devices in our homes, like Amazon’s Alexa, which listen for our voices and carry out our commands. Companies like Boston Dynamics have taken impressive steps towards creating eerily lifelike robots and the US Navy is even testing incredibly precise laser weapons onboard its ships. 3D printing is also seeing a massive expansion in its applications, from the inspiring printing of functioning human organs to the more sinister ability to download voices and carry out our commands. Amazon’s Alexa, which listen for our voices and carry out our commands.

Rik Jacobs, vice-president of 3D Systems’ dental business, says that the technology will only grow. But even the smallest of practices will benefit from outsourcing to a lab with a printer because of the higher speeds, accuracy and lower cost. Rik explained that 3D Systems primarily sell their printers and materials to labs, but that dental practices interested in keeping some of their production in-house are increasingly purchasing 3D printers. As complicated pieces of equipment, learning to use 3D printers to their fullest can require a fairly significant amount of training. Rik explained, “3D printing can sound a little too good to be true, but we’re sometimes faced with people that think they can start using their printer without any training and expect great results, if you put rubbish into the printer, you’ll get rubbish out. That’s something I’m always explaining and emphasizing.”

3D printing is sure to play an important part in the digital future of dentistry, as materials become more and more advanced the applications of the technology will only grow. But printers in labs and in practice are already changing dental workflows, with labs able to provide faster, more reliable and very precise end products with incredible efficiency.

The future may not end up being characterised by a deluge of sci-fi robots and lasers, but there’s no doubt that 3D printing will play an incredibly important role in the increasingly digital profession of dentistry.

An example of a 3D printed dental implant.

Rik Jacobs, The Netherlands

Rik Jacobs is a founder and the former CEO of NextDent B.V. The company was founded in 2012 in the Netherlands as an independent subsidiary of Vertex Global Holding to complement the dental materials portfolio of its affiliate Vertex Dental BV, which has a 77-year track record in developing and producing traditional denture materials and products. Within four years, NextDent became the leading developer and manufacturer of biocompatible dental 3D printing materials. In January 2017, Vertex Global Holding merged with 3D Systems, a company that provides comprehensive additive manufacturing products and services, including 3D printer specifically designed for dental applications, print materials, demand parts services and digital design tools. Upon this merger, Rik became the VP General Manager of the Dental business. He holds a degree in International Marketing Management from NHL University of Applied Science.