

SMARTTECH3D

- 3D scanners for medical applications and much more...

The most innovate technology dedicated to the digitization of human body.

NEW 3D scanner

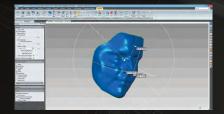


WHITE LED light technology

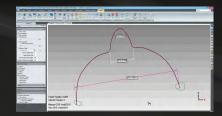
NEW: single scan in 0,2 seconds!



Cloud of points with XYZ coordinates and RGB color - raw scanned data



3D model for plastic surgery planning



Virtual dimensioning of 3D scanned model

MEDICINE

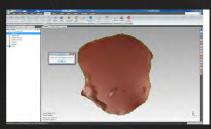
The latest generation of SMARTTECH3D med is a complex solution dedicated to digitize accurately human body. The 3D scanner works in safe white structured-light technology, which allows the scanned person to feel comfortable during the measurement process.

The digital result of 3D scanning enables for a quick plan of operation, a detailed dimensional analysis of skin lesions, a project of a prosthesis or to create a visualization.

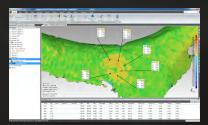
Using the panoramically merged results we can create a virtual model of the body enabling us to do all types of measurements and become very helpful during treatment planning.



Color model of a wounded leg - result of 3D scanning



Calculating the surface of wounds and measuring the amount of missing skin



Analysis of the healing process



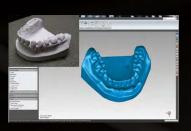
SECURITY AND IDENTIFICATION

3D scanning technology can be also used in the security sector. New methods of identification are now possible, based on the characteristic of the shape of the body parts (thanks to the colorful and accurate data provided by a 3D measurement). Using a 3D scanner we are able to create a digital archive of suspects, which will not only ease the identify process but also allows to simulate the changes of appearance during a time.

COMPUTER GRAPHICS

The 3D scanner SMARTTECH3D med, beyond just the medical application, can be also successfully used by CG artists. A color triangle mesh that shows the scanned model can be easily achieved within a few minutes, allowing graphic designers to focus on the animation and creating the environment.

MAIN ADVANTAGES:



ACCURATE - The applied VDI/VDE 2634 sets the standards in the optical 3D scanning process. The SMARTTECH3D med line is factory calibrated, therefore the digital measurement is metrologically approved. The cloud of points that represents the scanned surface has an accuracy of up to 0.01 mm.

EASY - SMARTTECH3D med is ready to work directly out of the case. Using it does not require any sophisticated measurement knowledge from the operator. The intuitive software interface helps provide data analysis with full understanding from the doctor's as well as the patient's side.

FAST - The body measurement has never been so quick. The 3D scanner is able to measure over a million points that represent the scanned surface within 0.2 seconds. This amount of time can be compared to taking an photograph. Thanks to the new multithreaded SMARTTECH3Dmeasure software - the data calculation and analysis can be done during a patient's single visit.



3D print of a human face

The SMARTTECH3D med scanner was used for 3D digitizing of Robert Lewandowski, in the project for beating the Guinness World Record for the highest figure of a man printed on a 3D printer. Project by FabLabKielce.pl

Figure height: 3,06 m.

3D printing time: 350h The record was beaten on 29th September 2016.





SMARTTECH3D med x2 - integrated system of a few 3D scanners

The stationary system of a few integrated 3D scanning units assures the full repeatability of results (which is very difficult for handheld 3D scanners). Additionally, this solution enables complete automation of the measurement allowing us to scan hundreds of people per day.

Planning plastic surgeries, designing prostheses monitoring the healing process, creating digital archives or digitizing the actors are just the tip of the iceberg of 3D scanning application. No matter what you are going to use it for - you can be sure that the results will be accurate, patients will be comfortable and astonished by the new technology, and above all, the effects of your work will be even better.



Integrated system of two 3D scanners allows us to make a measurement from different angles

Our Clients:













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