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3D printing on customized orthotics applications

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With the 5 years to involve the 3D printing technology developing and sales , the “Additive Manufacturing” technology are getting mature and accessible .

Compare to traditional “Subtractive Manufacturing “ , 3D printing has its advantage , especially to handle the complicated geometry which Subtractive Manufacturing might be hard to do it , another application on the customized orthotics are very suitable to install in the Hospital to service the patients directly . 3D printer only require minor space and low demand of power and accessory facility , keep the office clean and less air pollution should be another great advantage for the Hospital institution.

We build an manufacturing environment easy way from 3D Scan , 3D Modeling and 3D printing with different material property for various OPM application , such as , customized insole , AFO , Knee orthotics , Hand orthotics , we are working on it to extend the application for more OPM application.

Experience:

Job experience:

1. TADC 8 Years for CAD/CAM/CAE (CATIA , IDEAS , ANSYS)
2. TeraSoft 5 Years for Control/ CAE (MatLab/Simulink , Nastran)
3. DimensionWay 7 Years for 3D Printer/ CAD/CAM/CAE

Teaching experience:

1. Creative design and 3D printing class at National Chung Hsing University
2. 3D Maker class at National Taichung Industrial High School
3. Mechanism Motion class at Feng Chia University

Speech experience:

1. Composites material laminate analysis at SAMPE Taiwan
2. New thinking of design with additive manufacturing at Feng Chia University
3. New thinking of design with additive manufacturing at National Chin-Yi University of Technology
4. New thinking of design with additive manufacturing at Hsiuping University of Technology
5. 3D printer with Mechanical and electrical integration at KAO YUAN University of Technology
6. 3D printer with Mechanical and electrical integration at Far East University of Technology