

Novel Mixed Simulation Skills Course for Physicians

Brion Benninger MD MSc, Professor, Executive Director, Medical Anatomy Center, Healthcare & Education Futurist was invited to design, lecture and demonstrate one of his mixed simulation medical skills CME courses on Wednesday March 6th, 2019 for Emergency Physicians and Surgeons at the Surgical Center of Southern Oregon. He integrated mixed simulation with novel images, dynamic anatomy, innovative prepared donor cadaver with an andragogical teaching technique he created. Dr. Benninger taught a thoracostomy (chest drain) technique he developed using Reactor technology and demonstrated multiple thoracotomy procedures unique for emergency physicians, trauma and cardiothoracic surgeons. He also taught the DPAC method he originated for interosseous IV access. He provided surface anatomy and alternative craniometrics for safe Burr hole procedures. Physicians were taught eFAST, IVC, central lines and fracture identification using current wearable and hand-held ultrasound systems (Sonivate, Phillips-Lumify, Ge-Vscan) with hi-fidelity simulators from CAE and echogenic needles. He also taught video-laryngoscopy (EagleVision & Glidescope) and emergency anterior neck airway access on 7-Sigma simulation and cadavers. He revealed Sectra table technology and its multiple benefits for learning and maintaining medical invasive skills with CT/MRI and 3D imaging and Toltech Opus mini robotics with haptics for nerve block procedures.



Dr. Benninger taught EM Physician's eFAST exam using Phillips-Lumify hand held ultrasound on novel donor cadavers.



Clinicians performed Benninger's DPAC proximal humerus interosseous IV access procedure on novel donor cadavers.



Rebecca Heigel Photography
Clinicians were taught ultrasound skills with Sonivate dual array finger probe Benninger help develop for military & civilian trauma, pre-hospital and wilderness medicine.



Rebecca Heigel Photography
EM & Trauma Clinician's learned and practiced novel 3-Pull
technique created by Dr. Benninger using Reactor technology
for rapid chest tube insertion.