INTM 4057: HYPERBARIC MEDICINE & CHRONIC WOUND CARE 2021-2022

Faculty In Charge Of Course:	Joseph G. Nevarez, M.D.
Participating Faculty:	Division Faculty
Location:	Memorial Hermann Center for Hyperbaric Medicine And Wound Healing
Offered:	Blocks 1-8, 10,11 and 13
Max. # Students/Period:	1

Course Objective

Material Covered:

- Pathophysiology and Hyperbaric Oxygen Treatment (HBOT) of decompression sickness, air embolism, carbon monoxide poisoning, late effects of radiation, necrotizing infections/osteomyelitis and Enhanced Wound Healing
- Pathophysiology and treatment of chronic wounds including those related to pressure, infection, ischemia, lymphedema & Venous stasis

Skills Acquired:

- Able to identify clinical uses of HBOT.
- Familiarity with hyperbaric oxygen chamber environment
- Understand importance of oxygen transport
- Familiarity with non-invasive vascular testing; Ankle Brachial Index, Transcutaneous Oximetry
- Develop systematic approach to wound assessment, description and staging
- Develop systematic approach to clinical investigation of wounds
- Familiarity with wound dressings
- Understand importance and types of debridement for wound healing
- Able to identify etiology of chronic edema
- Understand use of compression bandaging on lower extremity

Activities Of Elective

Number Of New Patients/Student/Week: 3

Responsibilities Of Student For Assigned Patients:

Does history/physical:	Possible
Who critiques:	Attending Physician
Follows patients, with appropriate notes as needed:	Possible
Who supervises:	Attending Physician
Does student see ambulatory patients:	Yes

Procedures	Observe	Perform
Evaluation of patients with wounds	X	X
Transcutaneous oximetry	X	
Wound debridement	X	X
Assist patients inside hyperbaric chamber	X	X*
Evaluation of Hyperbaric candidates	X	X
Attend to critically ill patients in hyperbaric chamber	X	
		** If physically cleared by HBO MD*

Scheduled Duties Of Student:

Frequency of rounds on patients:	As dictated by consultations done
Presents patients to preceptor or attending physician:	yes
Weekly schedule of required teaching sessions:	2 per week scheduled around clinical duties

Describe Optional Rounds And Activities, If Any:

Exposure to hyperbaric chamber environment

Other Required Activities:

Reading/review of current literature:	Reading and review of current literature
PowerPoint project	Develop ~20 minute PowerPoint on Hyperbaric or Wound related topic
Other:	Participate in ongoing research activities if desired

How Is Student Evaluated:

Clinical skills, intellectual curiosity, effort and willingness to participate. Assessed in written format per University standard.

Who Evaluates Students:

Faculty in charge of course, with input from all participating faculty.

Unique Features Of This Elective:

Exposure to altered environmental conditions which affords application of physiologic principles.