

Training the Next Generation: Integration of Abortion into Clinician Education

Teaching Surgical Skills with Simulation Models

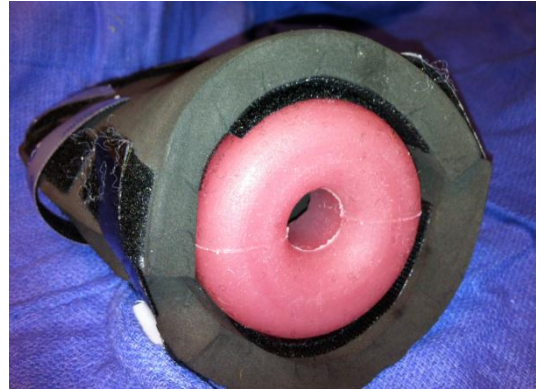
D&E Training Model

Sloane York, MD

Northwestern University

Description:

The D&E model includes a silicone cervix in 3 different dilations (2, 3, and 4cm) and 2 textures (one firmer, one softer). The uterus is made from 1 cm thick neoprene adhered using Velcro and is approximately 10-15cm in length. Velcro allows for the cervixes to be interchangeable between the neoprene uterus.



Equipment:

- Uterine model as described above
- Cat toys, ping pong balls, and nerf darts – fetal/placental material
- Extraction forceps
- Ring forceps (to use on anterior lip)
- Pelvic model (uterus can fit within multiple models) to simulate a case scenario

Strategies for specific learners:

We developed this model to teach our obstetrics & gynecology resident physicians the steps for dilation and evacuation procedures. A checklist of specific D&E steps was created to evaluate learners on D&E performance in a simulation setting prior to the operating room (see below). Each “case” will have 5 objects placed in the uterus so learners can count all fetal parts.

Learners are provided guidance on the model and then practice individually with directed feedback to allow for remediation and deliberate practice.

Additional tips: The model has also been used for laminaria simulation using crayons as laminaria.

Learning Objectives:

- Understand the steps for D&E procedures.
- Properly introduce extraction forceps.
- Open forceps widely within the uterus.
- Correctly extract material from uterus.

Checklist: Step	Performed correctly by resident	
	Yes (1)	No (0)
1.01. Washes hands & puts on gloves		
1.02. Establishes a sterile field		
1.03. Examines the patient and correctly assesses cervical dilation & effacement		
1.04. Assesses the location of fetus using ultrasound or performing a digital exam		
1.05. Grasps on the anterior lip of cervix with appropriate instrument		
1.06. Attempts to perform amniotomy		
1.07. Chooses proper instrument for extraction		
1.08. Initiates extraction by introducing instruments and putting traction on anterior lip		
1.09. Object 1: Introduces forceps closed		
1.010. Object 1: Opens forceps widely when past internal cervical os		
1.011. Object 1: Extracts material from uterus carefully using appropriate technique		
1.012. Object 2: Introduces forceps closed		
1.013. Object 2: Opens forceps widely when past internal cervical os		
1.014. Object 2: Extracts material from uterus carefully using appropriate technique		
1.015. Object 3: Introduces forceps closed		
1.016. Object 3: Opens forceps widely when past internal cervical os		
1.017. Object 3: Extracts material from uterus carefully using appropriate technique		
1.018. Object 4: Introduces forceps closed		
1.019. Object 4: Opens forceps widely when past internal cervical os		
1.020. Object 4: Extracts material from uterus carefully using appropriate technique		
1.021. Object 5: Introduces forceps closed		
1.022. Object 5: Opens forceps widely when past internal cervical os		
1.023. Object 5: Extracts material from uterus carefully using appropriate technique		
1.024. Keeps track of parts removed		
1.025. Confirms the uterus is empty		
1.026. Examines tissue removed to ensure all parts have been extracted		
1.027. Removes all instruments		
1.028. TOTAL:		