BATAAN PENINSULA STATE UNIVERSITY
Balanga City, Bataan

OFFICIAL BIDDING FORM

Item No.	QTY	Unit	SPECIFICATIONS	OFFER; (Brand)	Unit Cost	Total Cost
1	1	Lot	**HIGH FIDELITY MATERNITY MANNEQUIN SIMULATOR**			

Maternal

• Wireless and Tetherless and fully responsive even while being transported.

• Wireless control at distances of up to 300ft using Radio Frequency signals for more stable connection.
• Internal rechargeable battery provides up to 3 hrs. of tetherless operation.

• Supports continuous operation on AC power.

• Pneumatic and fluid reservoirs are housed inside the body.

Labor and Delivery

• Maternal and Fetus-Newborn wireless link capability.

• Automatic and fully programmable birthing mechanism simulates descent and cardinal movements.
• Precise labor scenario repeatability for competency-based training and assessment.

• Programmable normal, breech, shoulder dystocia, instrument-assisted delivery, and C- section.

• 9 Labor and Delivery SLEs.

• Facilitator's Guidebook.

• Supports Leopold's Maneuvers and external cephalic version.

• Epidural placement and needle detection; palpable anatomical landmarks and skin layers.

• Force sensors monitor traction applied to the fetus in real-time.

• Anatomic landmarks include bilateral ischial spines, coccyx, and pubic bone.

• Realistic birth canal with dilating cervix.

• Fetus rotates, dips, and rises during delivery.

• Palpable contractions.

• Programmable intrapartum bleeding.

• Supports McRoberts maneuvers.

• Supports Woods' screw, arm sweeps, and Lovset.

• Postpartum: palpable fundus with programmable uterine contractions,

• Uterine bleeding: manage uterine hemorrhage using medications or a balloon tamponade.

• Episiotomy repair inserts simulate human tissue that can be sutured closed repeatedly.

Neurological

• Programmable blinking, dilation, and eye response to light.

• Programmable duration and intensity of convulsions.

• Prerecorded responses.

• Wireless streaming voice: be the voice of the mannequin and listen to the participants' responses via a wireless headset.

Airway

• Program tongue edema and pharyngeal swelling.

• Multiple upper airway sounds synchronized with breathing.

• Supports nasal and oral intubation.

• Sensors detect depth of intubation.

• Supports Bag-Valve-Mask ventilation.

• Supports conventional airway adjuncts.

Breathing

• Automatic chest rise is synchronized with respiratory patterns

• Normal and abnormal breath sounds.

• Independent left or right lung sounds synchronized with breathing.

• Ventilation may be assisted using BVM, ETT, or LMA.

• Ventilations are measured and logged.

Cardiac

• Monitor rate and compression depth, no-flow time, ventilation rate, and excessive ventilation. The smart trainer features vocal cues and outputs performance reports.
• Chest compressions generate palpable blood pressure waveform and ECG artifacts.

• Normal and abnormal heart sounds.

• Heart sounds synchronized with ECG.

- ECGs are generated in real time with physiologic variations.

Circulation

- Measure blood pressure by palpation or auscultation using real instruments.
- Korotkoff sounds audible between systolic and diastolic pressures.
- Oxygen saturation detected using real monitors.
- Bilateral carotid, radial, and brachial pulses synchronized with ECG.
- Pulse sites synchronized with BP and heart rate.
- Bilateral IV arms with fill/drain sites.
- SubQ and IM injection sites.
- Chest compressions are measured and logged.
- ECG monitoring using "real devices" without using any converters or boxes.
- Defibrillate, cardiovert, and pace using "real devices" without using any converters or boxes.C81

Virtual Patient and Toco Monitor

- Touchscreen patient monitor preloaded with vitals.
- Programmable uterine activity.
- Control frequency, duration, and intensity of contractions, resting tone, and decels.
- Program fetal heart rate and baseline variability.
- Control episodic, periodic, and variable changes.
- Generate FHR patterns at any time.
- Virtually monitor FHR via External Fetal Monitoring or the Fetal Spinal Electrode Mode.
- Review up to 2 hours of recorded fetal tracings.
- Save/print fetal tracings for debriefing.
- Interactive virtual patient monitor displays vital signs in real time.
- Customizable layout mimics real patient monitors.
- Display simulated ultrasounds, CT scans, lab results, x-rays.

Capabilities

- Advanced Life Support/Basic Life Support .
- Articulating full size adult .
- Birth canal with dilating cervix .
- BP using real cuffs.
- Breathing with multiple airway sounds .
- Circulation multiple heart sounds.
- Pulse sites.
- Computer control.
- Convulsions and tremors.
- Defibrillate, cardiovert and pace.
- Deliveries include vertex, instrumented, shoulder dystocia, breech, "C" section, prolapse and previa.
- Display ECG using REAL monitor.
- Display oxygen saturation using REAL oximeter.
- Dynamic perinatal monitor displays uterine activity and FHR ECGs (Virtual) generated in real time.
- Episiotomy repair.
- Fetus is fully articulating with fontanelles/sutures.
- Fetus delivered with precise, repeatable control.
- Fetal manipulations.
- Fetal force/torque/positioning graphed in real time Intubatable airway and IV arm.
- Maternal vital signs monitor.
- Post-partum hemorrhage/fundal massage.
- Preprogrammed scenarios, modify them, or create new ones Share images such as x-rays, CT scans, lab results.
- Streaming Audio.
- Training Guide with basic and advanced scenarios.
- Tetherless.
- Virtual oxygen saturation measurement.

Highlights

- UNI Software.
- Practice epidural procedures.
- Realistic fetal palpation with amniotic sac Pelvic landmarks.
- Contraction Stomach.
- C-section using real surgical instruments Lifelike birth canal.
- Realistic episiotomy repair.

- Streaming audio included.

- Perfect fit into stirrups.

Includes: 1 unit Newborn simulator

Features and Specifications

Appearance and Anatomy

- Age: 40-week term newborn.

- Weight: 6 lbs. / 2.7 kg.

- Length: 20.75 in / 52.7 cm

- Smooth and supple full body skin

- Seamless trunk and limb joints.

- Realistic joint articulation: neck, shoulder, elbow, hip, and knee.

- Forearm pronation and supination.

- Lifelike umbilicus.

- Palpable landmarks including ribs and xiphoid process.

- Tetherless and Wireless Mobility.

- Tetherless and fully responsive even while being transported for team training.

- Internal rechargeable battery provides up to 4 hrs. of tetherless operation.

- Pneumatic and fluid reservoirs are housed inside the body.

- Maternal & Fetus-Newborn wireless link capability.

Airway

- Head tilt, chin lift, jaw thrust.

- Realistic orotracheal and nasotracheal airway and visible vocal cords.

- Bag-valve-mask ventilation.

- Neck hyperextension and airway obstruction with event capture and logging.

- Intubation depth detection and logging.

- Programmable crying/grunting sounds.

- ETT, LMA, fiberoptic intubation.

Breathing

- Spontaneous breathing.

- Real end-tidal CO2 capability.

- Variable respiratory rates and inspiratory/expiratory ratios.

- Visible chest rise with bag valve mask ventilation.

- Unilateral chest rise with right mainstem intubation.

- Lung ventilations are measured and logged.

- Programmable unilateral chest rise and fall.

- Unilateral lung sounds synchronized with respiratory rate.

Cardiac

- Comprehensive ECG rhythm library.

- ECG monitoring using real devices.

- Real-time CPR performance monitor and trainer.

- Effective chest compressions generate palpable pulses and CPR activity.

- Healthy and abnormal heart sounds.

- Virtual pacing and defibrillation.

Circulatory

- Visible central cyanosis with programmable intensity.

- Fontanelle, brachial, and umbilical pulses.

- Blood pressure-dependent pulses.

- Measure blood pressure using real modified BP cuff and Korotkoff sounds.

- Pre-ductal and post-ductal O2 saturation values simulated on patient monitor.

- Arterial/venous umbilical catheterization.

Vascular Access

- Bilateral IV arms.

- IV access on the lower left leg.

- Umbilical vein and arteries support catheterization and infusion.

- Umbilical cutdown.

- Intraosseous access and infusion at right tibia.

- Bilateral anterolateral thigh intramuscular injection sites.

Digestive

- Interchangeable female and male genitalia.

• Urinary catheterization with urine output.		
• Selectable bowel sounds.		

Additional Features

• Seizures/Convulsions.

• 1-month neonate navel insert.

• Programmable muscle tone: bilateral or unilateral arm movement, reduced, and limp.

• Temperature sensor placement detection.

Simulator Control Software

• Interface design and controls are shared across the entire line of computer-controlled simulators.

• 3D patient visualization monitor.

• Create your own scenarios –add/edit.

• Includes 13 pre-programmed scenarios.

• Monitor rate and compression depth, no-flow time, rate, and excessive ventilation; smart trainer features vocal cues and outputs performance report.

• Generate and share simulated diagnostic lab results.

• Interactive questionnaire form designer.

• Track team and individual provider actions.

• Time-stamped event recording and reporting.

• Optional Automatic Mode responds to caregiver or instructor actions.

• Pharmacologic intervention, injury, or cardiac and respiratory events.

• No annual license fee.

Package Includes

• Newborn Patient Simulator.

• Control Tablet PC preloaded with software.

• 12'' Touchscreen Tablet PC.

• Software License including 13 scenarios.

• RF Communications Module.

• Battery charger/Power supply.

• Receiving blanket, umbilical cords, tibia bone pack replacement lower arms.

BP cuff, IV filling kit

• Soft carrying case.

• User Manual.

• 1-year standard warranty.

*** See attached Additional Requirement/Technical Specifications

****************Nothing Follows****************