Student Technology Fee
Grant Proposal

2007-08

Dr. Jim McCrory
Approved
Denied
Comment: Insufficient technical information to evaluate.

Diana Hamilton
Approved
Denied
Comment:

Gary Gatch
Approved
Denied
Comment: No information to evaluate.

Mike McDonald
Approved
Denied
Comment: Unable to evaluate, no budget or quotes

Dale Martin
Approved
Denied
Comment:
ALL BLANKS MUST BE FILLED COMPLETELY

Prepared by: Tammy Curtis
For: Radiographic Opaque Head, with complete cervical spine (C1-C7)

Department/Unit: Radiologic Technology    College: College of Nursing    Campus: Shreveport

Which NSTEP Goals/Objectives does this project meet? Objective #3

Requested equipment will be located/installed/housed? Building Warrington Building, Second floor x-ray Lab located in Shreveport

Are department property policies and procedures in place for requested equipment? Yes

Which individual will be responsible for property control of the requested equipment?

Signature: ____________________________ Date: __________

Grant Proposal Requested Amount: $4,514.00       Budget Attached (circle one) YES/NO

Grant delivered to Student Technology located in Watson Library, Room 113. Date __________

The grant proposal must include all specifications, description, model number, quotation, cost, state contract number, and vendor for each item. If the proposal does not include all requested information, it will be returned to requestor.

1. Describe target audience.

The audience for this proposal is comprised of the Radiologic Technology students in the clinical phase of their education on the Shreveport Campus. Although there will be 55 students utilizing this equipment initially, it is projected that all of the currently enrolled 262 Radiologic Technology students will have access to and will gain clinical simulation experience with this vital equipment.

2. Describe project/initiative for which you are requesting funds.

With the growing infusion of technology in all phases of clinical radiology in the contemporary health care environment, Radiologic Technology students are mandated to gain clinical competency skills required to be successful on passing their national radiologic technology licensure and also successful in their clinical skills for future employment. The purpose of this
proposal is to secure a radiologic opaque phantom head with seven cervical spine attachments to enable enrolled students to perform simulated exams of the skull and facial bone competencies required as part of their mandatory clinical grades to graduate from the BSRT program. The addition of the phantom head will enable the students to gain the required competencies when they are not able to perform the exams on live patients in the clinical setting due to the complexity and infrequency of imaging the head. The mastery of these clinical competencies will enable the students to meet a required component of the registry examination upon completion of the program.

3. State measurable objectives that will be used to determine the impact/effectiveness of the project.

- Students are allowed to perform a total of 10 competency simulations on anthropomorphic phantoms prior to graduation. In particular, 5 of these simulations are on the head. Currently, the head phantom that we have been using is damaged and cracked. The students are not able to accurately evaluate successful positioning skills on the finished radiographs due to the damage.
- The addition of this phantom will allow us to meet our clinical course objectives more swiftly with better student learning outcomes.
- A good quality anthropomorphic head phantom will allow student simulations and will result in higher scores for students in image evaluation for laboratory tests.

4. Indicate how each project objective will be evaluated.

- Faculty will validate the student’s ability to obtain accurate imaging of the skull and facial bone competencies.
- Faculty will use the student’s scores on laboratory competencies to meet program goals and course objectives.
- Students will demonstrate competency in radiography of the head on the registry exam for professional practice.

5. If funded, which NSTEP objective(s) will this funding of this project advance. How will funding of the project advance the University and College/unit technology plan?

This project will advance the following objective:

Objective #3- To upgrade student technology laboratories with a good quality head phantom

The College of Nursing’s technology plan includes upgrading all simulation laboratories with equipment that closely mirrors the technology that is utilized within the healthcare environment. The addition of this phantom will support and advance this plan.

6. Provide a justification for funding of this project. Estimate the number of student that will be served per academic year and in what ways. Please indicate also any unique needs of the target
• An average of 30-40 students per semester will benefit from the imaging phantom. Because our students attend a full 12 week summer session, three semesters comprise our academic year. Considering three semesters per academic year, approximately 120 students per year will benefit from these phantoms. Our program is rapidly growing and can expect to add an additional 30-40 students next academic year.

• Due to the complexity and infrequency of some imaging exams, phantoms are used in the lab to simulate these studies. With the help of phantoms, students can still receive the repetition necessary to become competent with these procedures without exposure to the patient.

• Phantom imaging in the laboratory environment is critical to the learning and preparation of a medical imaging professional. Students can image the phantoms an innumerable amount of times without causing damage to the phantom or to a living being. The ability to practice in the energized lab with the phantoms helps to drastically reduce the amount of radiation exposure to patients once students go to the clinical education setting.

• Due to the nature of ionizing radiation professionals, hours of hands-on (psychomotor) practice is required to perfect patient positioning and radiographic technique development. Phantoms are the best way to practice using ionizing, dangerous radiation without endangering living beings.

7. List those individuals who will be responsible for the implementation of the project/initiative and indicate their demonstrated abilities to accomplish the objectives of the project.

Laura Aaron, PhD, RT(R)(M)(QM): Program Director
Kelli Haynes, MSRS, RT(R): Clinical Coordinator
Becky Britt, MSRS, RT(R)(M)
Tammy Curtis, MSRS, RT(R)
Kendall Delacerda, MSRS, RT(R)
Kari Cook, MSRS, RT(R)
Ben Wood, MSRS, RT (R)

• The above faculty members are assigned to either the Shreveport or Alexandria campus for the Radiologic Technology Program. Because the faculty hold a substantial number of years in the clinical setting as well as the educational setting, faculty are able to provide instruction and supervise students in the use of the phantom head to meet the objectives of this proposal.

8. Describe any personnel (technical or otherwise) required to support the project/initiative.

Faculty will be overseeing the use of the phantom in the laboratory setting. No additional personnel will be needed to meet the objectives of this proposal.
9. Provide a schedule for implementation and evaluation.
- Decision to fund proposal: October 31, 2007
- Monies made available during first quarter of 2008
- Radiographic opaque phantom head will be ordered the week monies become available
- Shipping time is 2-4 weeks
- Implementation in laboratory to begin the first week of April, 2008
- Evaluation to begin immediately upon receipt of the equipment in the lab by the faculty.

10. Estimate the expected life of hardware and software. Explain any anticipated equipment/software upgrades during the next five years.

The life span of the phantoms is usually unlimited. They are non-destructible and require no upgrades or any additional maintenance.

11. Explain in detail a plan and policy that will be in place to ensure property security/controls for any equipment received through a Student Technology Fee.
If you are requesting equipment that will be either/loaned to students or moved within the department, you must provide a checkout/loan policy.

The phantom will be stored in a locked laboratory located in the Warrington building in Shreveport. The only individuals who have access or a key to this laboratory are the faculty and the security guard onsite. The students will only be able to use the phantom with a faculty member present.

Attach two (2) letters of support for the project from the following individuals: the requesting department’s Dean, the appropriate Vice President (for non-academic units), or the SGA President from the requesting campus (for student requests).

**Student Technology Fee Grant Proposal Checklist:**

- X Is all information requested provided (items 1 – 11)?
- X Is a detailed budget attached?
- X Is all specifications, description, model number, quotation, cost, state contract number, and vendor provided for each item?
- X Are your two (2) letters of support attached?
- N/A If equipment is to be checked-out/loaned, is your policy attached?
Student Technology Fee Grant Review Committee  
Northwestern State University  
Natchitoches, LA 71497  

Members of the Committee,  

On behalf of the students and faculty in the Radiologic Technology program, this letter will serve as my strong support of the proposal submitted by the Radiologic Technology program to acquire a radiographic opaque phantom head for the Shreveport campus. The emphasis on supporting student learning through the provision of technology-advanced equipment is not only imperative, but a mandate by the accrediting and licensing agencies for Radiologic Technology programs. Our students must become clinically competent in the performance of these skills as they have become a critical component of the radiographic patient positioning skills necessary for imaging within the health care environment within which they will be employed. It is, therefore, essential that the College of Nursing increase its level of technology integration within the existing learning environment and your approval of this proposal will foster our initiative in that regard.

I urge the Committee members to act favorably on this proposal. In so doing, the students will be the benefactors of greater learning support and opportunities. I look forward hearing of your approval action in the near future.

Sincerely,

Norann Y. Planchock, PhD, APRN, BC, FNP  
Dean and Professor  
College of Nursing
October 24, 2007

Information Technology Fee Grant Committee
Northwestern State University
Natchitoches, LA 71497

Committee Members,

On behalf of the Shreveport Student Government Association (SSGA), it is my pleasure to offer this letter in support of the proposal by the Radiologic Technology program to acquire a radiographic opaque phantom head for the Shreveport learning laboratory. Learning these clinical positioning skills has become a critical component of the Bachelor of Science in Radiologic Technology (BSRT) curriculum and this phantom is requisite to students becoming efficient in radiographic patient positioning imaging procedures. The provision of this phantom will assist the near 260 BSRT students in preparing them to complete their competencies necessary for them to graduate and perform imaging skills in their future employment.

The practice of Radiologic Technology is continuously being enhanced by the infusion of cutting-edge technology and it is essential that we assist our students to be educated utilizing the latest and best technology available. This grant will enhance the integration of advanced technology for BSRT students.

Please consider supporting this proposal in a favorable manner. If I can be of assistance to the committee, please do not hesitate to call upon me.

Respectfully,

Kimberly A. French
President
SSGA