



**SOUTH DAKOTA BOARD OF REGENTS**  
**ACADEMIC AFFAIRS FORMS**  
**New Course Request**

USD

Arts & Sciences/Biomedical Engineering

Institution

Division/Department

Institutional Approval Signature

Date

**Section 1. Existing Course Title and Description**

Prefix & No.	Course Title	Credits
BME 723	Cellular Engineering	3

**Course Description**

Topics include introduction to cell, organelles and cytoskeleton, membrane structure and transport, cell communication/signaling, cell cycle control, cell death, cancer, stem cells, tissue development/repair, cell and materials interaction, and main methods for cell research. In addition, the course will introduce the basic concepts of application of cell therapy for bone, neural and vascular tissue regeneration.

**Pre-requisites or Co-requisites (add lines as needed) N/A**

**Registration Restrictions N/A**

**Section 2. Review of Course**

**2.1. Was the course first offered as an experimental course?**

- Yes (if yes, provide the course information below)       No

**2.2. Will this be a unique or common course?**

- Unique Course**

Prefix & No.	Course Title	Credits
BME 721	Tissue Engineering	3

*Provide explanation of differences between proposed course and existing system catalog courses below:*

This course provides some coverage of the principles of cell growth and biomaterials, but is focus on connective tissues, including skin, fat, bone, cartilage, and tendon.

**Section 3. Other Course Information**

**3.1. Are there instructional staffing impacts?**

- No.** Schedule Management, explain below: The Department of Biomedical Engineering has added new faculty and will integrate this course into teaching schedules

**3.2. Existing program(s) in which course will be offered:** Biomedical Engineering

**3.3. Proposed instructional method by university:** R-Lecture

**3.4. Proposed delivery method by university:** 001 Face-to-Face

**3.5. Term change will be effective:** Fall 2017

**3.6. Can students repeat the course for additional credit?**

Yes, total credit limit: \_\_\_\_\_  No

**3.7. Will grade for this course be limited to S/U (pass/fail)?**

Yes  No

**3.8. Will section enrollment be capped?**

Yes, max per section: 25  No

**3.9. Will this course equate with any other unique or common courses in the common course system database in Colleague and the [Course Inventory Report](#)?**

Yes  No

**3.10. Is this prefix approved for your university?**

Yes  No

**Section 4. Department and Course Codes (Completed by University Academic Affairs)**

**4.1. University Department Code:** UBME

**4.2. Proposed [CIP Code](#):** 14.05.01

*Is this a new CIP code for the university?*  Yes  No