MEMORANDUM OF UNDERSTANDING

BETWEEN

LOUISIANA STATE UNIVERSITY AND A&M COLLEGE

AND

BOSSIER PARISH COMMUNITY COLLEGE

The Louisiana State University and A&M College (LSU) and Bossier Parish Community College (BPCC) have agreed to enter into an Articulation Agreement Memorandum of Understanding between the two institutions dealing with the topic of Engineering.

This agreement will allow students to complete the Associate of Science in Engineering at BPCC and transfer all credit hours applied as listed in Appendix A to LSU in partial fulfillment of degree requirements for the Bachelor of Science in Biological Engineering, Chemical Engineering, Civil Engineering, Computer Engineering, Environmental Engineering, Electrical Engineering, Mechanical Engineering, Industrial Engineering or Petroleum Engineering Degrees in the LSU College of Engineering.

This partnership is mutually beneficial to both institutions for several reasons. This arrangement will benefit the BPCC students, traditional and nontraditional, by offering them an opportunity to continue their education after completing the AS degree in Engineering at BPCC with a university that will accept those credits. The arrangement is beneficial to LSU because it provides another opportunity for LSU to attract and retain Engineering students with a proven record of academic success.

Both higher education institutions have full-time, tenure-track faculty with advanced academic and field experience credentials.

Both institutions have extensive support resources (i.e., library, on-line access, service courses, and adequate administrative – faculty – staff backup).

In accordance with this Memorandum of Understanding, BPCC agrees to:

- 1. Have BPCC students who plan to transfer to LSU to complete a Bachelor's Degree in Engineering apply to LSU.
- 2. Jointly with LSU market these Articulation Agreements to prospective students.
- 3. Provide information about these Articulation Agreements on the BPCC Website beginning immediately.
- Provide information about these Articulation Agreements in the BPCC catalog beginning in 2015-2016.
- 5. Provide students the opportunity to obtain the BPCC credit hours as listed in Appendices 1 and 2 of this Memorandum of Understanding between LSU and BPCC.

Description	BPCC Course	Cr.	LSU Course	Cr.
General Education Courses				
English Composition	ENGL 101	3	ENGL 1001	3
(6 credit hours)	ENGL 102	3	ENGL 2000	3
Mathematics:				
Calculus block transfer	MATH 250 (3)	12	MATH 1550 (5)	12
(12 credit hours)	MATH 251 (3)		MATH 1552 (4)	
	MATH 252 (3)			
	MATH 253 (3)		MATH 2057 (3) *	
Differential Equation	MATH 254 (3)	3	MATH 2065 (3) [#]	3
(3 credit hours)				
Social Science	BADM 201	3	ECON 2010	3
(6 credit hours)	BADM 202	3	ECON 2000	3
Natural Science	BLGY 105 or BLGY 101^	3	BIOL 1001 or 1201	3
(12 credit hours)	CHEM 101	3	CHEM 1201	3
	PHYS 211	3	PHYS 2110	3
	PHYS 212	3	PHYS 2112 or PHYS	3
			2113**	
Humanities (9 credit hours)	Lit. Elect.	3	Lit. Elect.	3
	Hist. Elect.	3	Hist. Elect.	3
	SPCH 110	3	CMST2060	3
Fine Arts (3 credit hours)	Art. Elect.	3	Art. Elect.	3
Pre-Engineering Courses				
Engineering Science courses	ENGR Electives***	4-15	ENGR Electives***	4-15
Total		55-66 ^{&}		55-66

Appendix A – Articulation Matrix Pre-Engineering Program between BPCC and LSU

*MATH 2057 is not needed for Biological Engineering, Chemical Engineering, Environmental Engineering, Industrial Engineering, or Petroleum Engineering, but required for Civil Engineering, Electrical Engineering, Computer Engineering and Mechanical Engineering.

[#]MATH 2065 is the Differential Equation course required for Biological Engineering, Civil Engineering, Environmental Engineering, and Petroleum Engineering. For majors including Chemical Engineering, Mechanical Engineering, Industrial Engineering, Electrical Engineering and Computer Engineering, a different 4-credit Differential Equation is needed at LSU.

** For Chemical Engineering, Biological Engineering, Electrical Engineering, Computer Engineering, and Mechanical Engineering, Petroleum Engineering.

^: BLGY 101- science major Biology is needed for Biological Engineering, Chemical Engineering and Environmental Engineering. BLGY 105 will work for other remaining engineering majors at LSU.

[&]: A total of 60 Credit hours is required for an Associate's Science degree in engineering.

***Engineering Elective courses could include the following, by discipline:

BPCC Courses	LSU Courses
Biological Engineering (total: 14)	Biological Engineering
ENGR 220 – Statics (3)	CE 2450 – Statics (3)
CHEM 250 – Organic Chemistry I (3)	CHEM 2261 – Organic Chemistry (3)
CHEM 102 – General Chemistry II (3)	CHEM 1202 – General Chemistry II (3)
CHEM 101L (1) and CHEM 102L (1) – Chemistry I and	CHEM 1212 – General Chemistry Laboratory (2)
II Labs	EE2950 – Comprehensive Electrical Engineering
ENGR 221—Circuits (3)	(3)
Chemical Engineering (total: 8)	Chemical Engineering
CHEM 102 - General Chemistry II (3)	CHEM 1202 – General Chemistry II (3)
CHEM 250 – Organic Chemistry I (3)	CHEM2261 – Organic Chemistry I (3)
CHEM 101L (1) and CHEM 102L (1) – Chemistry I and	CHEM 1212 – General Chemistry Laboratory (2)
II Labs	
Civil Engineering (total: 14)	Civil Engineering
ENGR 220 – Statics (3)	CE2450 – Statics (3)
CHEM 102 – General Chemistry II (3)	CHEM 1202 - General Chemistry II (3)
PHSC 111 – Physical Geology (3)	GEOL 1001 – General Geology : Physical (3)
CHEM 101L (1) and CHEM 102L (1) – Chemistry I and	CHEM 1212 – General Chemistry Laboratory (2)
II Labs	EE2950 – Comprehensive Electrical Engineering
ENGR 221—Circuits (3)	(3)
Environmental Engineering (total: 15)	Environmental Engineering
ENGR 220 – Statics (3)	CE2450 – Statics (3)
CHEM 250 – Organic Chemistry I (3)	CHEM2261 – Organic Chemistry I (3)
BLGY 101L – General Biology Lab (1)	BIOL 1208 – Biology Laboratory for Science
CHEM 102 – General Chemistry II (3)	Majors I (1)
PHSC 111 – Physical Geology (3)	CHEM 1202 - General Chemistry II (3)
CHEM 101L (1) and CHEM 102L (1) – Chemistry I and	GEOL 1001 – General Geology : Physical (3)
II Labs	CHEM 1212 – General Chemistry Laboratory (2)
Electrical or Computer Engineering (total: 4)	Electrical Engineering
PHYS 201L – General Physics I Laboratory (1)	PHYS 2108– Introductory Physics Laboratory (1)
CIT 110 – Ethics in Info Technology (3)	CSC1200 – Ethics in Computing
Mechanical Engineering (total: 12)	Mechanical Engineering
CHEM 102 – General Chemistry II (3)	CHEM 1202 - General Chemistry II (3)
ENGR 220 – Statics (3)	CE2450 – Statics (3)
PHYS 201L – General Physics I Laboratory (1)	PHYS 2108 – Introductory Physics Laboratory (1)
ENGR 221 – Circuits (3)	EE 2950 – Comprehensive Electrical Engineering
CHEM 101L (1) and CHEM 102L (1) – Chemistry I and	(3)
II Labs	CHEM 1212 – General Chemistry Laboratory (2)

Articulated Engineering/ Science Courses by Major

Industrial Engineering (total: 10)	Industrial Engineering		
CHEM 102 – General Chemistry II (3)	CHEM 1202 - General Chemistry II (3)		
ENGR 220 – Statics (3)	CE2450 – Statics (3)		
PHYS 201L – General Physics I Laboratory (1)	PHYS 2108– Introductory Physics Laboratory (1)		
ENGR 221 – Circuits (3)	EE 2950 – Comprehensive Electrical		
	Engineering(3)		
Petroleum Engineering (total: 14)	Petroleum Engineering		
CHEM 102 – General Chemistry II (3)	CHEM 1202 - General Chemistry II (3)		
PHSC 111 – Physical Geology (3)	GEOL 1001 – General Geology : Physical (3)		
ENGR 220 – Statics (3)	CE2450 – Statics (3)		
CHEM 101L (1) and CHEM 102L (1) - Chemistry I and	CHEM 1212 – General Chemistry Laboratory (2)		
II Labs	EE2950 – Comprehensive Electrical Engineering		
ENGR 221—Circuits (3)	(3)		

In Accordance with this Memorandum of Understanding, LSU agrees to:

- 1. Accept BPCC credit hours as listed in Appendix A of this Memorandum of Understanding between BPCC and LSU. All courses that transfer to LSU must have a minimum grade of C.
- 2. Along with BPCC, jointly market these Articulation Agreements through Tiger Transfer Tables.
- Upon completion of an Associate of Science in Engineering degree at BPCC in accordance with this Articulation Agreement, a student with a 2.5 GPA will transfer to LSU as a Junior in one of the Engineering majors listed in Appendix A.
- 4. By signature of Associate Vice President for Institutional Effectiveness and Academic Planning, Dr. T. Gilmour Reeve, Louisiana State University, and signature of Interim Chancellor, Dr. Rick Bateman, Bossier Parish Community College, this Articulation Agreement Memorandum of Understanding is entered into on the date of the last signature below

Dr. T. Gilmour Reeve, Associate Vice President for Institutional Effectiveness and Academic Planning Louisiana State University

Dr. Sherif Ishak, Associate Dean of Academic Affairs LSU College of Engineering

19/2015

Date

Dr. Rick Bateman, Chancellor Bossier Parish Community College

Ms.^{*}Sandra Partain Dean, Technology, Engineering, and Mathematics Bossier Parish Community College

7/9/2015

Date