TCC2OSU
TRANSFER MAP
LINKEDEGREE

Associate in Science in Mechanical Engineering (TCC) to Bachelor of Science in Aerospace Engineering and Bachelor of Science in Mechanical Engineering (OSU)

Available in Stillwater

Tulsa Community College (years 1 and 2) – 2025-26

Year One – Tulsa Community College

Fall

TCC Equivalent or Substitute	OSU Requirement	✓
ENGR 1111 – Intro to Engineering	UNIV 1111	
*CHEM 1365 – General Chemistry for Engineers	CHEM 1414 (LN) + 1 hour elective	
ENGL 1113 – Composition I	ENGL 1113	
*MATH 2114 – Calculus I	MATH 2144 (Q)	
HIST 1483 – Am Hist 1492 – Civil War or HIST 1493 – Am Hist Civil War - Pres	HIST 1483 (H) or HIST 1493 (DH)	
Semester Credit Hours at TCC: 16		

Spring

TCC Equivalent or Substitute	OSU Requirement	✓
ENGR 1242 – Intro to Engineering Computer Programming	ENGR 1412	
ENGR 1132 – Engineering Design w/CAD - Solidworks	ENGR 1332	
ENGL 1213 – Composition II	ENGL 1213	
3 Hrs Humanities (with D)	Humanities (D)	
PHYS 2034 –Physics I with Calculus	PHYS 2014 (LN)	
MATH 2124 – Calculus II	MATH 2153 (Q) + 1 hour elective	
Semester Credit Hours at TCC: 18		

***Students must have completed MATH 1513 and MATH 1613 or MATH 1715 or have demonstrated math competencies at the pre-calculus level through test scores prior to the first semester to complete this degree within two years/within the number of hours listed in the agreement. See an academic advisor to learn more about Math placement testing.**

**** The (G) and (D) requirements are waived with completion of the AS degree.**

Year Two- Tulsa Community College

Fall

TCC Equivalent or Substitute	OSU Requirement	✓
ENGR 2103 Engineering Statics	ENSC 2113	
ENGR 2213 Thermodynamics	ENSC 2213	
PHYS 2124 –Physics II with Calculus	PHYS 2114 (LN)	
POLS 1113 – American Federal Government	POLS 1113	
MATH 2613 – Differential Equations	MATH 2233	
3 Hrs Humanities (with G)	Humanities (G)	
Semester Credit Hours at TCC: 19		

Spring

TCC Equivalent or Substitute	OSU Requirement	✓
ENGR 2523 – Elementary Dynamics	ENSC 2123	
ENGR 2143 – Strength of Materials	ENSC 2143	
ENGR 2613 Intro Electrical Science	ENSC 2613	
MATH 2134 – Calculus III	MATH 2163 + 1 hour elective	
COMM 1113 General Education Required Elective	SPCH 2713 (S)	
Semester Credit Hours at TCC: 16		

Before transferring to OSU, have the TCC Registrar send an official transcript to the OSU Admissions Office with any degrees earned noted on the transcript. If you have not completed the requirements for an associate degree, talk with your OSU Academic Advisor about Reverse Transfer options to use OSU coursework to complete your TCC associate degree.

FINISH ORANGE

COLLEGE OF ENGINEERING, ARCHITECTURE AND TECHNOLOGY

Oklahoma State University (years 3 and 4) – 2025-26

Year Three – Oklahoma State University

Fall

OSU Requirement	✓
ENGR 2421 Engineering Data Acquisition Controls Lab and two additional labs: ENSC 2141 Strength of Materials, ENSC 2411 Electrical Science, ENSC 2611 Electrical Fabrication, ENSC 3231 Fluids & Hydraulics, ENSC 3311 Materials Science, ENSC 3431 Thermodynamics and Heat Transfer	
MAE 3333 – Fundamental Fluid Dynamics	
ENSC 3313 Material Science	
MAE 3153 Introduction to MAE Design	
MAE 3013 – Engineering Analysis	
Semester Credit Hours at OSU: 15	

Spring

OSU Requirement	✓
MAE 3253 – Applied Aerodynamics	
MAE 3724 – Dynamic Systems Analysis & Controls	
MAE 3324 Mechanical Design I	
MAE 3293 Fundamentals of Aerodynamics	
MAE 3403 – Computer Methods	
Semester Credit Hours at OSU: 17	

Year Four – Oklahoma State University

Fall

OSU Requirement	✓
MAE 4513 Aerospace Structures	
MAE 4243 Propulsion & Power	
MAE 4283 Stability and Control	
IEM 3503 – Engineering Economics	
3 Hrs Technical Elective (Varies) or MAE 3233 – Heat Transfer for Dual Degree	
Semester Credit Hours at OSU: 15	

Spring

OSU Requirement	✓
MAE 4374 Aerospace Systems Design	
MAE 4223 Aerospace Engineering Laboratory	
3 Hrs from Natural Science course options	
MAE 3524 – Thermal Fluids Design (for Dual Degree)	
Semester Credit Hours at OSU: 14	

 # Work with an advisor to determine timing of the Lab courses to coincide with appropriate courses.
**** The (G) and (D) requirements are waived with completion of the AS degree.**
This plan is only one example of how a student may successfully complete degree requirements in four years. Course rotations may vary between the Stillwater and Tulsa campuses. Students are responsible for completing the requirements as given in the official degree requirements sheet.

OSU-Tulsa
918-594-8355 • tulsa.info@okstate.edu
tulsa.okstate.edu/transfer

OSU College of Engineering, Architecture and Technology
405-744-5276 • ceat.okstate.edu