

Bachelor of Science (BS) Mathematics

2024-2026

7-12, Teacher Certification

	Course #	Course Title	Min. Grade	GEC	Prerequisite	Additional Notes
3	Choose 1	Communication	С	010	For all 010 courses: Satisfactory scores on English portion of ACT test and TSI examination or ENGL 0301. For ENGL 1302, a grade of "C" or better in ENGL 1301.	See General Education Core for more details Options: ENGL 1301
4	MATH 2413	Calculus I	С	020	MATH 2412 with a grade of 'C' or better; or passing the Precalculus Exemption Test administered by the Department of Mathematics.	Prerequiste for MATH 2412: MATH 1314/1414 with a grade of "C" or better or passing Exemption Test administered by Department of Mathematics
3	Choose 1	American History (Core)		060		See General Education Core for more details. Options: HIST 1301 or HIST 2327
1	UTCH 1101	Inquiry Approaches to Teaching	С		Must be a Mathematics or Science Major.	A criminal background check will be required and a tuberculosis test be required before the first field experience. Special permission from UTeach co-director is required to enroll in UTCH 1101 and UTCH 1102 concurrently.
3	Choose 1	Integrative/Experiential Learning Option (Core)		090		Recommended: CSCI 1380
3	Choose 1	Creative Arts (Core)		050		See General Education Core for course options.
	UNIV	1301 Learning Framework 1101 Academic and Career Success 1001 Living and Working by Design				As required, based on credit hours earned, TSI status, High school rar major declaration
17 ;	Semester Total Hours					
3	Ob 4	Communication		010	For all 010 courses: Satisfactory scores on English portion of ACT test and TSI examination	See General Education Core for more details
3	Choose 1	Communication	С	010	or ENGL 0301. For ENGL 1302, a grade of "C" or better in ENGL 1301.	Options: ENGL 1302 or ENGL 1305
4	MATH 2414	Calculus II	С		MATH 2413 (or MATH 2487) with a grade of 'C' or better.	
3	MATH 2318	Linear Algebra	С		MATH 2413 (or MATH 2487) with a grade of 'C' or better.	
3	Choose 1	American History		060		See General Education Core for more details. Options: HIST 1302 or HIST 2328
1	UTCH 1102	Inquiry-Based Lesson Design	С		UTCH 1101 with a grade of "C"	Students will begin developing their UTeach Portfolio. May be taken concurrently with UTCH 3301.
3	Choose 1	Social and Behavioral Sciences		080		Recommended: ECON 1301 or ECON 2301
17 ;	Semester Total Hours					
Н	Course #	Course Title	Min. Grade	GEC	Prerequisite	Additional Notes
3	MATE 3321	Functions and Modeling	С		MATH 2413 (or MATH 2487) and UTCH 1102, each with a grade of 'C' or better.	
4	MATH 2415	Calculus III	С		MATH 2414 (or MATH 2488) with a grade of 'C' or better.	
3	POLS 2305	U.S. Federal Government & Politics		070		See General Education Core for more details
4	Choose 1	Life and Physical Sciences		030/ 090		Recommended: PHYS 2425
3	MATH 3350	Introduction to Mathematical Proof	С	090	MATH 2318 with a grade of 'C' or better.	
17 :	Semester Total Hours					
3	Choose 1	Language, Philosophy & Culture		040		See General Education Core for course options.
3	MATH 3341	Differential Equations	С		MATH 2414 (or MATH 2488) with a grade of 'C' or better.	
3	MATH 3352	Modern Geometry I	С		MATH 2318 with a grade of 'C' or better.	
3	UTCH 3301	Knowing and Learning in Mathematics and Science	С		UTCH 1101 and UTCH 1102 with a grade of 'C' or better or concurrent enrollment with UTCH 1102.	
1	Choose 1	Integrative/Experiential Learning Option		090		See General Education Core for course options.
4	Choose 1	Life and Physical Sciences		030/ 090		Recommended: PHYS 2426
17 9	Semester Total Hours	1		- 030		
			St	udent	must apply to Teacher Education Program.	

Symbols Key

The 2024-2026 list of core courses can be found in the 2024-2026 Undergraduate Catalog: www.utrgv.edu/catalog > See 'Bachelors Degree Program Regulations'

	Н	Course #	Course Title	Min. Grade	GEC	Prerequisite	Additional Notes				
	3	MATH 3363	Modern Algebra I	С		MATH 2318 and MATH 3350, each with a grade of 'C' or better.					
	3	POLS 2306	Texas Government & Politics		070		See General Education Core for more details				
Ę	3	MATE 3317	Perspectives in Mathematics and Science	С		Grade of "C" or better in MATE 3321.					
14	3	MATH 3326	History of Mathematics	С		MATH 2414 (or MATH 2488) with a grade of 'C' or better.					
	3	MATH 3372	Real Analysis I	С		MATH 2414 (or MATH 2488) and MATH 3350, each with a grade of 'C' or better.					
YEAR	15	15 Semester Total Hours									
THIRD	3	UTCH 3302	Classroom Interactions	С		(a) An institutional grade point average of at least 2.75, (b) UTCH 1102 with a grade of 'C' or better, (c) UTCH 3301 with a grade of 'C' or better, and (d) admission to the Teacher Education Program.					
	4	MATE 4423	Advanced Studies in Secondary Mathematics	С		MATH 3352 and MATH 3363, each with grade of 'C' or better.					
SPRING	3	STAT 3337	Probability and Statistics	С		MATH 2414 (or MATH 2488) with a grade of 'C' or better.					
S	3	MATE 3322	Secondary Mathematics in a Technological Environment	С		MATH 2414 (or MATH 2488) with a grade of 'C' or better.					
	3	MATH 3365	Number Theory	С		MATH 2318 and MATH 3350, each with a grade of 'C' or better.					
	16	Semester Total Hours									
	Н	Course #	Course Title	Min. Grade	GEC	Prerequisite	Additional Notes				
	3	MATE 4392	Research Methods in Mid & Secondary School Math	С		One of the courses MATE 3305, STAT 3337, STAT 2334 , or STAT 3301					
	3	MATH 3361	Applied Discrete Mathematics	С		MATH 2318 with a grade of 'C' or better.					
FALL	3	READ 4305	Disciplinary Literacy in the Classrooms								
TH YEAR	3	MATH 4390	Mathematics Project	С		Credit for or concurrent enrollment in MATH 2415, STAT 3337, MATH 3341, MATH 3352, MATH 3363, MATH 3372.					
FOUR	3	UTCH 3303	Project-Based Instruction	С		UTCH 3302 with a grade of 'C' or better. Must be officially admitted to the Educator Preparation Program.					
9	1	UTCH 4101	Apprentice Teaching Seminar				The final portfolio must provide evidence that the student has met state standards for teacher certification.				

121 TOTAL HOURS

7 Semester Total Hours

UTCH 4601

Apprentice Teaching

(42) Advanced minimum credit hours

UTCH 3303 with a grade of 'C' or better.