

ADOLESCENT EDUCATION MAJOR IN TEACHING MATHEMATICS

Campus: NYC, Westchester

Major Completion Summary

Requirement	Credits
University Core Requirements	57
Major Requirements	61-64
Electives	3-6
Total Credits	121-127

University Core Requirements

See complete University Core (<http://catalog.pace.edu/undergraduate/university-core-curriculum/>) requirements.

Code	Title	Credits
Foundation Requirements		
ENG 110	Composition	3
ENG 120	Critical Writing	4
ENG 201	Writing in the Disciplines	3
COM 200	Public Speaking	3
LOTE		6
MAT 131	Calculus I	4
CIS 101	Introduction to Computing	0-3
BIO 123	Biology and Contemporary Society	4
UNV 101	First-Year Seminar: Introduction to University Community	1
Areas of Knowledge (AOK)		
<i>AOK #1: Civic Engagement</i>		
TCH 201	Education I: Understanding Schools	
<i>AOK #2: Western Heritage</i>		
<i>AOK #3: World Traditions and Cultures</i>		
<i>AOK #4: Humanistic and Creative Expression</i>		
<i>AOK #5: Analysis of Human, Social Natural, Phenomena</i>		
<i>One Additional AOK</i>		
In-Depth Sequence		
Three Level 200 (or higher) in Concentration Area		10
Total Credits		54-57

Major Requirements

Code	Title	Credits
Mathematics Concentration Requirements		
MAT 132	Calculus II	4
MAT 137 or MAT 233	Introduction to Discrete Mathematics Mathematical Structures and Models	4
MAT 236	Multivariable Calculus	4
MAT 238	Linear Algebra	4
MAT 253	Differential Equations	4
MAT 260	History of Mathematics	3
MAT 301	Algebraic Structures	3
MAT 303	Modern Geometry	3
MAT 315	Introduction to Real and Complex Analysis	4

MAT 400 or MAT 490 & MAT 491	Mathematics: Connections, Communications, Research Mathematics Seminar Capstone Experience I and Mathematics Seminar Capstone Experience II	3
Adolescent Education Major Requirements		
TCH 211A	Child Abuse and Violence Prevention	0
TCH 211D	DASA- Harassment, Bullying, Cyberbullying and Discrimination in Schools, Prevention & Intervention	0
TCH 201	Understanding Schools	3
TCH 215	Understanding Teaching & Learning: General Curriculum Models & Methods for all Learners	3
TCH 203	Understanding Development: Childhood and Adolescence in Context	3
TCH 301	Understanding Learning Environments	3
TCH 309	Understanding Assessment and Evaluation	3
TCH 428	Teaching Mathematics to Adolescents	3
TCH 412	Literacy Instruction in the Secondary School	3
TCH 316	Fieldwork I: Field Experiences in Adolescent Settings	0-1
TCH 317	Fieldwork II: Field Experiences in Adolescent Settings	0-1
TCH 475	Introduction to Special Education	3
TCH 452	Understanding Language, Culture, and Education	3
TCH 418	Fieldwork III: Field Experiences in Adolescent Settings	0-1
TCH 495	Student Teaching in Adolescent Classroom	7
TCH 419	Student Teaching Seminar in Adolescent Settings	2
Total Credits		72-75