Linear Algebra Standards Module E: How can we solve systems of linear equations?	
□ □ E2.	Row reduction. I can explain why a matrix isn't in reduced row echelon form, and put a matrix in reduced row echelon form.
□ □ E3.	Systems of linear equations. I can compute the solution set for a system of linear equations or a vector equation.
Module	V: What is a vector space?
□ □ V 1.	Vector spaces. I can explain why a given set with defined addition and scalar multiplication does satisfy a given vector space property, but nonetheless isn't a vector space.
□ □ V2 .	Linear combinations. I can determine if a Euclidean vector can be written as a linear combination of a given set of Euclidean vectors by solving an appropriate vector equation.
□ □ V 3.	Spanning sets. I can determine if a set of Euclidean vectors spans \mathbb{R}^n by solving appropriate vector equations.
	Subspaces. I can determine if a subset of \mathbb{R}^n is a subspace or not.
	Linear independence. I can determine if a set of Euclidean vectors is linearly dependent or independent by solving an appropriate vector equation.
	Basis verification. I can explain why a set of Euclidean vectors is or is not a basis of \mathbb{R}^n .
	Basis computation. I can compute a basis for the subspace spanned by a given set of Euclidean vectors, and determine the dimension of the subspace.
□ □ V 8.	Polynomial and Matrix computation. I can answer questions about vector spaces of polynomials or matrices.
□ □ V 9.	Basis of solution space. I can find a basis for the solution set of a homogeneous system of equations.
Module	A: How can we understand linear maps algebraically?
□ □ A1.	Linear map verification. I can determine if a map between vector spaces of polynomials is linear or not.
□ □ A2 .	Linear maps and matrices. I can translate back and forth between a linear transformation of Euclidean spaces and its standard matrix, and perform related computations.
□ □ A3 .	Kernel and Image. I can compute a basis for the kernel and a basis for the image of a linear map, and verify that the rank-nullity theorem holds for a given linear map.
□ □ A4.	Injectivity and surjectivity. I can determine if a given linear map is injective and/or surjective.
Module	M: What algebraic structure do matrices have?
□ □ M 1.	Matrix Multiplication. I can multiply matrices.
□ □ M2 .	Row operations as matrix multiplication. I can can express row operations through matrix multiplication.
□ □ M3 .	Invertible Matrices. I can determine if a square matrix is invertible or not.
\square \square M4.	Matrix inverses. I can compute the inverse matrix of an invertible matrix.
Module	G: How can we understand linear maps geometrically?
□ □ G 1.	Row operations and Determinants. I can describe how a row operation affects the determinant of a matrix.

 \square **G4.** Eigenvectors. I can find a basis for the eigenspace of a 4×4 matrix associated with a given eigenvalue.

 \square **G2. Determinants.** I can compute the determinant of a 4×4 matrix.

 \square \square G3. Eigenvalues. I can find the eigenvalues of a 2×2 matrix.