

**University of San Diego Shiley-Marcos School of Engineering**  
**Computer Science Degree Checklist (2017/18 catalog)**

<b>Complete</b>	<b>Core Curriculum</b>	<b>Course that Satisfies Requirement</b>	<b>Units</b>
	First Year Writing (CFYW)	FYW 150	3
	Mathematical Reasoning (CMRP)	MATH 150	
	Second Language Competency		3 to 9
	Lower-Division Theological and Religious Inquiry (FTRI)		3
	Upper-Division Theological and Religious Inquiry (FTRI)		3
	Philosophical Inquiry (FPHI)		3
	Ethical Inquiry (FETI)		3
	Scientific and Technological Inquiry (ESTI)		
	Historical Inquiry (EHSI)		3
	Social and Behavioral Inquiry (ESBI)		3
	Literary Inquiry (ELTI)		3
	Artistic Inquiry (EARI)		3
	Diversity, Inclusion, Social Justice (FDD1)		
	Diversity, Inclusion, Social Justice (FDD2 or FDG2)		
	Advanced Writing (CADW)	COMP 465	
	Oral Communication (CORL)		3
	Quantitative Reasoning (CQUR)		
	First Year Integration (CINL)	LLC Course	
	Advanced Integration (CINT)		
<b>Complete</b>	<b>Math/Science Courses</b>	<b>Prerequisites/(Corequisites)</b>	
	MATH 150 - Calculus I		4
	MATH 151 - Calculus II	MATH 150	4
	MATH 160 - Logid for Math/CS		3
<b>Complete</b>	<b>Computer Science Core Courses</b>	<b>Prerequisites/(Corequisites)</b>	<b>11</b>
	COMP 150: Computer Programming I		3
	COMP 151 Computer Programming II	COMP 150	3
	COMP 285: Data Structures and Algorithms	COMP 151	3
	COMP 280: Intro to Computer Systems	COMP 151	3
<b>Complete</b>	<b>Computer Science Required Courses</b>	<b>Prerequisites/(Corequisites)</b>	<b>12</b>
	COMP 300 - Principles of Digital Hardware	MATH 160, COMP 280	4
	COMP 305 - Object-Oriented Design and Programming	COMP 285	3
	COMP 310 - Operating Systems	COMP 280	3.5
	COMP 370 - Automata, Commutability and Formal Languages	COMP 285	3
	COMP 465 - Software Engineering	COMP 305	3
	COMP 495 - Senior Project	COMP 465	2
<b>Complete</b>	<b>Computer Science Elective Courses choose 9 units</b>		<b>18.5</b>
	COMP 340 - Numerical Analysis	MATH 151, COMP 150	
	COMP 345 - Database Management Systems Design	COMP 285	
	COMP 350 - Computer Graphics	MATH 151, COMP 285	
	COMP 355 - Digital Modeling and Simulation	MATH 151, COMP 305	
	COMP 360 - Principles of Programming Languages	COMP 285	
	COMP 375 - Networking	COMP 151	
	COMP 380 - Neural Networks	MATH 151, COMP 285	
	COMP 480 - Algorithms	MATH 151, COMP 285	
	COMP 494 - Special Topics	COMP 305	
	COMP 499 - Independent Study	COMP 151	
		<b>Total Degree Units</b>	<b>124</b>