## Santa Clara University

## School of Engineering

For use by Transfer Applicants

## TRANSFER CREDIT PLANNER CHECK-SHEET

*Admission recommendations
University Core Requirement
Course Completed or IP (In Progress)

## FOUNDATIONS

$\square \quad$ Critical Thinking \& Writing 1*
$\square \quad$ Critical Thinking \& Writing 2*
$\square \quad$ Cultures \& Ideas 1
$\square$ Cultures \& Ideas 2
$\square$ Mathematics* Satisfied within major requirements at SCU
$\square \quad$ Religion Theology \& Culture 1
(Students transferring with 30 or more semester units (or 44 or more quarter units) of transfer credit will be exempt from completing one RTC Core requirement)

## EXPLORATIONS

$\square$ Ethics

- Civic Engagement

Must be completed at Santa Clara
$\square$ Diversity: U.S. Perspectives
$\square$ Arts
$\square$ Natural Science w/Lab* Satisfied within major requirements at SCU
$\square$ Social Science
$\square \quad$ Religion, Theology \& Culture 2 Must be completed at Santa Clara
$\square \quad$ Cultures \& Ideas 3

- Science, Technology \& Society Must be completed at Santa Clara
- Religion, Theology \& Culture 3 Must be completed at Santa Clara


## INTEGRATIONS

- ELSJ
- Advanced Writing

Must be completed at Santa Clara University

- Pathways

Must be completed at Santa Clara University
Must be completed at Santa Clara University

## SCHOOL OF ENGINEERING REQUIREMENTS

(Refer to the School of Engineering website for individual major requirements at: https://www.scu.edu/engineering/undergraduate/degree-programs/

Engineering School Requirement
Course completed or IP (In Progress)

## MATHEMATICS*

$\square$ Calculus and Analytic Geometry I* $\qquad$

- Calculus and Analytic Geometry II* $\qquad$
$\square$ Calculus and Analytic Geom III/IV $\qquad$
Differential Equations
$\square$ $\qquad$
$\qquad$


## NATURAL SCIENCE*

$\square$ General Chemistry*
$\square$ Physics w/ Calculus *
$\square$ Physics w/ Calculus *

- Physics w/ Calculus *
$\square$ $\qquad$


## ADDITIONAL ENGINEERING MAJOR Requirements

- Bioengineering
- Civil Engineering
- Computer Science and Engineering
- Electrical \& Computer Engineering
- Electrical Engineering
- General Engineering
- Mechanical Engineering
- Web Design and Engineering

TOTAL SEMESTER UNITS $\qquad$ x $1.5=$ $\qquad$ TOTAL QUARTER UNITS**

[^0]
# Santa Clara University 

## Undergraduate

## School of Engineering

Canada College Transfer Guide
For use by Transfer Applicants
Use the TRANSFER CREDIT PLANNER to map out your transfer credit.
Thank you for your interest in Santa Clara University! This guide has been designed to help make the course-planning process easier for students who wish to transfer to the School of Engineering at Santa Clara University.

## Admission Recommendations for Transfer Students:

## School of Engineering:

Bachelor of Science majors: Bioengineering, Civil Engineering, Computer Science \& Engineering, Electrical and Computer Engineering, Electrical Engineering, General Engineering, Mechanical Engineering, and Web Design \& Engineering

## Courses strongly recommended for admission:

- Two English composition courses (aka: Critical Thinking \& Writing 1 \& 2)
- Mathematics: MATH 251 and MATH 252
- One natural science course with a lab: CHEM 210
- Two Calculus-based Physics courses: PHYS 250 and PHYS 260
- Web Design Engineering majors are not required to complete CHEM 210, PHYS 250 \& 260. Complete one course in the Natural Science list.
- GPA 3.5

For additional SCU Transfer Admissions information:
https://www.scu.edu/admission/undergraduate/transfer-students/

The following information is provided to help transfer students understand and complete additional Santa Clara University Core Curriculum (General Education) requirements.

## STRUCTURE OF SANTA CLARA UNIVERSITY GENERAL CORE

Below is a visual representation of Santa Clara University Core Curriculum Requirements. Some Core requirements must be met at SCU: Civic Engagement, Religion, Theology \& Culture 2, Science, Technology \& Society, Religion, Theology \& Culture 3, Experiential Learning for Social Justice, Advanced Writing, and Pathways. Moreover, no courses listed in this guide can fulfill more than one Core requirement.


To learn more about Santa Clara University's Core Curriculum learning goals and objectives, click here.

Note: Current high school students applying as First-Year students may not transfer courses to fulfill
Core Critical Thinking \& Writing 1 and 2 or Cultures \& Ideas 1 and 2, Religion Theology and Culture 1 in addition to the Core requirements listed above that must be met at SCU.

## MAXIMUM NUMBER OF TRANSFER UNITS ACCEPTED:

- Santa Clara University is on a quarter system
- 1 semester unit is equivalent to 1.5 quarter units
- It is recommended to transfer with $\mathbf{3 0}$ or more semester units ( $\mathbf{4 4}$ or more quarter units) of transfer credit (not including AP/IB test credit).
- Students are allowed to transfer in a maximum of one-half of the total quarter units required to graduate in their specific program. The maximum number includes credit transferred from another institution and Advanced Placement and High-Level International Baccalaureate and University of Cambridge A-Level test credits.

| Academic Division | Minimum <br> number of units <br> required for <br> graduation | Maximum <br> transferrable <br> Quarter units | Maximum <br> transferrable <br> Semester unit <br> equivalency |
| :--- | :---: | :---: | :---: |
| College of Arts and Sciences | 175 | 87.5 | 58.33 |
| College of Arts and Sciences: Engineering <br> Physics | 193 | 96.5 | 64.33 |
| Leavey School of Business | 175 | 87.5 | 58.33 |
| School of Engineering: | 191 | 95.5 | 63.66 |
| Bioengineering | 195 | 97.5 | 65 |
| Civil Engineering | 189 | 94.5 | 63 |
| Computer Science \& Engineering and <br> General Engineering | 190 | 95 | 63.33 |
| Electrical Engineering and <br> Electrical \& Computer Engineering | 192 | 96 | 64 |
| Mechanical Engineering | 175 | 87.5 | 58.33 |
| Web Design and Engineering |  |  |  |

## TRANSFER CREDIT ACCEPTED:

SCU does not give transfer credit for $\mathrm{P} / \mathrm{NP}, \mathrm{CR}$, or courses with a grade of C - or lower. Grades are not transferable to SCU, only units.

The following courses are not transferrable: most first-year seminars, internships, professional development courses, independent study courses, workshops, most physical education courses, remedial English and remedial mathematics courses.

Santa Clara University only accepts University of California transferable courses. In addition, SCU does not allow the following Canada College UC transferrable courses to transfer for credit: Career and Personal Development, English as a Second Language, Fashion Design, most Health Science, Interior Design, most Kinesiology and Physical Education, Physical Education Individual, Intercollegiate Sports, Team Sports and Physical Education Theory courses. To view all Canada College's UC transferable courses, visit www.assist.org. UC transferrable courses not listed in this guide and not listed above as excluded will be accepted as elective units. After acceptance, students may petition a course that received elective credit to be evaluated, and if approved, fulfill a Core and/or major requirement. Transfer credit evaluations for individual students are completed after admission to SCU. However, the following information will help students evaluate their own course work.

## FOUNDATIONS Core requirements

## Critical Thinking \& Writing 1 and 2 Core Requirement:

To fulfill the Critical Thinking \& Writing (CTW) 1 and 2 Santa Clara University Core requirements, a student must complete one course from the Critical Thinking \& Writing 1 course list, and one course from the Critical Thinking \& Writing 2 course list below. If both requirements are not satisfied prior to enrollment at SCU, students who have completed fewer than 30 semester units (or 44 quarter units) of transfer credit will be required to take the 2quarter course sequence at SCU. Students who transfer with 30 or more semester units (or 44 or more quarter units) of transfer credit and have fulfilled the CTW 1 but not the CTW 2 requirement will be required to complete an additional course at SCU to satisfy the CTW 2 requirement.

## CRITICAL THINKING \& WRITING 1: Complete one course from list below.

Admission recommendation: Complete Critical Thinking and Writing 1 Core requirement.
Exceptions for taking a course listed below to satisfy CTW 1: Students placed into the $2^{\text {nd }}$ college level English, or who scored a 4 or 5 on the AP English Language exam, may substitute the course placement or the test credit for CTW 1. Students are responsible for submitting the appropriate official AP CollegeBoard Report at the time of acceptance to receive such credit.

## Canada College Course

ENGL 100: Reading and Composition

## CRITICAL THINKING \& WRITING 2: Complete one course from list below.

Admission recommendation: Complete Critical Thinking and Writing 2 Core requirement.

## Canada College Course

ENGL 110: Composition, Literature and Critical Thinking
ENGL 105: Intensive Composition and Reading
ENGL 165: Advanced Composition
PHIL 103: Critical Thinking

## CULTURES \& IDEAS 1 and 2 Core Requirements:

To fulfill the Santa Clara University Cultures \& Ideas 1 and 2 Core Curriculum requirements, a student must complete one course from the Cultures and Ideas 1 list, and one course from the Cultures and Ideas 2 course list. If both requirements are not satisfied prior to enrollment at SCU, students who have completed fewer than 30 semester units (or fewer than 44 quarter units) of transfer credit will be required to take the 2 -quarter course sequence at SCU. Students who transfer with 30 or more semester units (or 44 or more quarter units) and fulfilled the Cultures \& Ideas 1 but not the Cultures \& Ideas 2 requirement, will be required to take one course instead of the 2-course sequence at SCU. Although it is not listed as an admission recommendation, it is advised to fulfill the Cultures and Ideas 1 and 2 course sequence prior to enrollment at SCU.

## CULTURES \& IDEAS 1: Complete one course from list below.

Transfer courses cannot fulfill more than one Santa Clara University Core requirement. If you already took a course listed below to satisfy a different requirement, you will want to choose a different course to complete.

| Canada College Course |
| :--- |
| ART 101: Ancient, Classical and Medieval Art History |
| ART 102: Late Medieval, Renaissance and Baroque Art History |
| ART 103: Eighteenth and Nineteenth Century Art History |
| ART 104: History of Modern Art |
| ART 113: Great Museums of America |
| ART 114: The Art History of Paris |
| ART 116: The Art of Great Britain |
| ART 118: The Art and Architecture of Spain |
| ART 119: The Golden Age of Painting in Northern Europe |
| ART 250: The Art History of Rome |
| BUS 100: Contemporary American Business |
| BUS 201: Business Law |
| DRAM 101: History of Theatre |
| ECON 230: Economic History of the United States |
| HIST 100: History of Western Civilization I |
| HIST 101: History of Western Civilization II |
| HIST 104: World History I |
| HIST 106: World History II |
| HIST 201: U.S. History through 1877 |
| HIST 202: U.S. History from 1877 to Present |
| MUS 215: Music, Culture, and History |
| MUS 240: Music of the Americas |
| PHIL 160: History of Philosophy- Ancient and Medieval |
| PHIL 175: History of Philosophy - 16 |
| PHIL 190: Contemporary Philosophy |
| SOCI 100: Introduction to Sociology |

## CULTURES \& IDEAS 2: Complete one course from list below.

Transfer courses cannot fulfill more than one Santa Clara Core requirement. If you already took a course listed below to satisfy a different requirement, you will want to choose a different course to complete.

| Canada College Course |
| :--- |
| ANTH 110: Cultural Anthropology |
| ANTH 200: Ethnographic Film |
| ANTH 351: Intro to Archaeology and World Prehistory |
| ART 105: Art of Asia and the Near East |
| BUS 125: International Business |
| DRAM 160: Latin America Theatre |
| GEOG 110: Cultural Geography |
| GEOG 150: World Regional Geography |
| HIST 104: World History I |
| HIST 106: World History II |
| HIST 422: Modern Latin America |
| LIT 205: New Voices in World Literature |
| LIT 373: Latin American Literature in Translation |
| MUS 250: World Music |
| PHIL 300: Intro to World Religions |
| PLSC 103: Critical Thinking About World Politics |
| PLSC 130: Intro to International Relations |
| PLSC 170: Intro to Comparative Politics |
| PLSC 320: Latin American Politics |

## SECOND LANGUAGE

Note: Students accepted in the School of Engineering are not required to fulfill the second language requirement. However, if a student is admitted in the School of Engineering and decides to change schools after enrollment, the student will be required to fulfill the second language requirement at SCU.

## MATHEMATICS:

Admission recommendation: Complete MATH 251 and MATH 252
To fulfill the admission mathematics requirement, complete both MATH 251 \& 252 listed below. A score of 4 or 5 on the Advanced Placement Calculus BC exams will satisfy the mathematics Admission recommendations. Engineering majors at SCU require the completion
of more than one math course (see table at the end of this document for additional courses to complete per major).

| Canada College Course | SCU Course |
| :--- | :--- |
| MATH 251: Analyt Geom \& Calc I | MATH 11 |
| MATH 252: Analyt Geom \& Calc II | MATH 12 |
| MATH 253: Analyt Geom \& Calc III | MATH 13 \& 14 |
| MATH 268: Discrete Mathematics | MATH 51 OR COEN 19 |
| MATH 270: Linear Algebra | MATH 53 |
| MATH 275: Differential Equations | MATH 22 |

Note: SCU does not accept remedial mathematics courses. Although a pre-Calculus course is transferrable, it will not fulfill any general core, major or minor requirements.

RELIGION, THEOLOGY \& CULTURE 1: Only needed if transferring with less than 30 semester units (44 quarter units) of transfer credit. Students transferring with more than 30 semester units (44 quarter units) of transfer credit will be exempt from this requirement.

Students transferring with less than 30 semester units (44 quarter units) of transfer credit may complete one course from the list below to satisfy the RTC 1 Core requirement.

Transfer courses cannot fulfill more than one Santa Clara Core requirement. If you already took a course listed below to satisfy a different requirement, you will want to choose a different course to complete.

## Canada College Course

PHIL 300: Introduction to World Religions

Note: The transferring with more than 30 semester units (or more than 44 quarter units) of transfer credit for the RTC 1 exemption rule does not apply to freshmen applicants.

## EXPLORATIONS Core requirements

ETHICS: Complete one course from the list below.

Canada College Course<br>PHIL 240: Introduction to Ethics

CIVIC ENGAGEMENT: Must be completed at Santa Clara University.

## DIVERSITY: US Perspectives: Complete one course from list below.

Transfer courses cannot fulfill more than one Santa Clara Core requirement. If you already took a course listed below to satisfy a different requirement, you will want to choose a different course to complete.

| Canada College Course |
| :--- |
| COMM 150: Intercultural Communication |
| HIST 242: African-American History |
| HIST 245: Race, Ethnicity and Immigration in the US |
| HIST 246: History of Latinos in the US |
| HIST 247: Women in US History |
| LIT 252: Women Writers- Multicultural Perspectives |
| LIT 266: Black Literature |
| LIT 371: Mexican-American Literature |
| LIT 372: Myth and Folklore of La Raza |
| LIT 373: Mexican-American Lit |
| LIT 375: Native-American Lit |
| SOCI 105: Social Problems |
| SOCI 141: Ethnicity and Race in |


#### Abstract

ARTS School of Engineering students will automatically fulfill the Arts by taking required courses within their major at SCU. However, if a student is admitted in the School of Engineering and decides to change schools after enrollment, the student will be required to fulfill the ARTS requirement by taking a course(s) at SCU. Refer to the College of Arts \& Sciences or Leavey School of Business transfer guides for a list of courses that could satisfy the Arts core requirement.


## NATURAL SCIENCE (WITH A LAB) Core Requirement: Complete one course from list below.

Admission recommendation: Complete CHEM 210 and PHYS 250 \& 260

[^1]To satisfy the Core Natural Science requirement, the course must have a lab component.
Engineering majors at SCU require the completion of more than one science course (see table at the end of this document for additional courses to complete per major).

When a Canada College course does not have a direct SCU course equivalent, but fulfills the Natural Science Core requirement, a transfer credit (TRCR) code of TRCR 18 is assigned.

| Canada College Course | SCU Course Equivalency |
| :--- | :--- |
| ANTH 125/126: Phys Anthr w/ Lab | TRCR 18: Core Natural Science |
| ASTR 100/101: Intro to Astron w/ Lab | TRCR 18: Core Natural Science |
| BIO 110: Principles of Biology | TRCR 18: Core Natural Science |
| BIO 130/132: Human Biology w/ Lab | TRCR 18: Core Natural Science |
| BIO 225: Biology of Organisms | TRCR 18: Core Natural Science |
| BIO 230: Molecular Biology | TRCR 18: Core Natural Science |
| BIO 240: General Microbiology | TRCR 18: Core Natural Science |
| BIO 250: Human Anatomy | TRCR 18: Core Natural Science |
| BIO 260: Human Physiology | TRCR 18: Core Natural Science |
| CHEM 114: Survey of Chemistry and Physics | TRCR 18: Core Natural Science |
| CHEM 192: Elementary Chemistry | TRCR 18: Core Natural Science |
| CHEM 210: General Chemistry I | CHEM 11 |
| CHEM 220: General Chemistry II | CHEM 12\&50 |
| CHEM 231: Organic Chemistry | CHEM 31 |
| CHEM 232: Organic Chemistry II | CHEM 32 (If CHEM 231 \& 232 completed, <br> equates to SCU's CHEM 31, 32 \& 33) |
| ENVS 115/101: Environmental Science w/Lab | TRCR 18: Core Natural Science |
| GEOG 100/101: Physical Geography w/Lab | TRCR 18: Core Natural Science |
| GEOL 100/101: Intro to Geol w/ Lab | CENG 20/20L |
| GEOL 121: Earth Science | TRCR 18: Core Natural Science |
| OCEN 100/101: Oceanog w/ Lab | TRCR 18: Core Natural Science |
| PHYS 114: Survey of Chemistry and Physics | TRCR 18: Core Natural Science |
| PHYS 210: General Physics I | PHYS 11 |
| PHYS 220: General Physics II | PHYS 13 (If PHYS 210 \& 220 completed, <br> equates to SCU's PHYS 11,12 \& 13) |
| PHYS 250: Physics with Calculus I | PHYS 31 |
| PHYS 260: Physics with Calculus II | PHYS 33 (If PHYS 250 \& 260 completed, <br> equates to SCU's PHYS 31, 32 \& 33) |
| PHYS 270: Physics with Calculus III | PHYS 34 (If PHYS 250, 260 \& 270, will <br> equate to SCU's PHYS 31, 32, 33 \& 34) |

## SOCIAL SCIENCE: Complete one course from list below.

Transfer courses cannot fulfill more than one Santa Clara Core requirement. If you already took a course listed below to satisfy a different requirement, you will want to choose a different course to complete.

| Canada College Course |
| :--- |
| ANTH 110: Cultural Anthropology |
| ANTH 351: Archaeology |
| ECON 100: Principles of Macro Economics |
| ECON 102: Principles of Micro Economics |
| GEOG 110: Cultural Geography |
| PLSC 103: Critical Thinking about World Politics |
| PLSC 130: Intro to International Relations |
| PLSC 150: Intro to Political Theory |
| PLSC 170: Intro to Comparative Politics |
| PLSC 210: American Politics |
| PSYC 100: General Psychology |
| PSYC 300: Social Psychology |
| SOCI 100: Intro to Sociology |
| SOCI 105: Social Problems |
| SOCI 141: Ethnicity and Race in Society |

## RELIGION, THEOLOGY \& CULTURE 2: Must be completed at Santa Clara

 University.
## CULTURES \& IDEAS 3: Complete one course from the list below.

Transfer courses cannot fulfill more than one Santa Clara Core requirement. If you already took a course listed below to satisfy a different requirement, you will want to choose a different course to complete.

| Canada College Course |
| :--- |
| ANTH 110: Cultural Anthropology |
| ANTH 351: Archaeology |
| ECON 100: Principles of Macro Economics |
| ECON 102: Principles of Micro Economics |
| GEOG 110: Cultural Geography |
| PLSC 103: Critical Thinking about World Politics |
| PLSC 130: Intro to International Relations |
| PLSC 150: Intro to Political Theory |
| PLSC 170: Intro to Comparative Politics |
| PLSC 210: American Politics |
| PSYC 100: General Psychology |
| PSYC 300: Social Psychology |
| SOCI 100: Intro to Sociology |
| SOCI 105: Social Problems |
| SOCI 141: Ethnicity and Race in Society |

SCIENCE, TECHNOLOGY \& SOCIETY: Must be completed at Santa Clara University.

RELIGION, THEOLOGY \& CULTURE 3: Must be completed at Santa Clara University.

## INTEGRATIONS Core requirements EXPERIENTIAL LEARNING FOR SOCIAL JUSTICE: Must be completed at Santa Clara University.

ADVANCED WRITING: Must be completed at Santa Clara University.
PATHWAYS: Must be completed at Santa Clara University.
Transfer students who matriculate with fewer than 44 quarter units (or fewer than 30 semester units) must take 4 courses to fulfill the pathways requirement. However, students transferring in with more than 44 quarter units (or with 30 semester units or more) will complete 3 courses to fulfill the Core Pathways requirement.

## ADDITIONAL SCHOOL OF ENGINEERING REQUIREMENTS PER MAJOR

The following courses allow students to complete additional School of Engineering requirements.

| SCU COURSE | CC COURSE | BIOE | CENG | COEN | ECEN | ELEN | ENGR | MECH | WDE |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MATH 11 | MATH 251 | X | X | X | X | X | X | X | X |
| MATH 12 | MATH 252 | x | X | X | X | X | X | X | X |
| MATH 13 | MATH 253 | X | X | X | X | X | X | X | X |
| MATH 14 | MATH 253 | X | X | X | X | X | X | X | X |
| MATH 22 or AMTH 106 | MATH 275 | X | X | X | X | X | X | X |  |
| MATH 51 or COEN 19 | CIS 262 |  |  | X | X |  |  |  |  |
| MATH 53 | MATH 270 |  |  | X | X |  |  |  |  |
| PHYS 31 | PHYS 250 | X | X | X | X | X | X | X |  |
| PHYS 32 | PHYS 250/260 | X | X | X | X | X | X | X |  |
| PHYS 33 | PHYS 260 | X | X | X | X | x | X | X |  |
| PHYS 34 | PHYS 270 |  |  |  |  | X |  |  |  |
| CHEM 11 | CHEM 1A | X | X | X | X | X | X | X |  |
| $\begin{array}{\|l\|} \hline \text { ELEN/COEN } \\ \hline 21 / 21 \mathrm{~L} \\ \hline \end{array}$ | - |  |  | X | X | X | X |  |  |
| ELEN 50/50L | $\begin{array}{\|l\|} \hline \text { ENGR } \\ 260 / 261 \\ \hline \end{array}$ | X |  | X | X | X | X | X |  |
| CENG 41 | ENGR 230 |  | X |  |  |  | X | X |  |
| COEN 10/10L | CIS 118 |  |  | X | X | X | X |  | X |
| COEN 11/11L | CIS 250 |  |  | X | X | X |  |  | X |
| COEN 12/12L | CIS 252 |  |  | X | X | X |  |  | X |
|  |  |  |  |  |  |  |  |  |  |
| Abbreviations and Links: |  |  |  |  |  |  |  |  |  |
| BIOE = Bioengineering |  |  |  |  |  |  |  |  |  |
| CENG = Civil, Environmental, and Sustainable Engineering |  |  |  |  |  |  |  |  |  |
| COEN = Computer Science and Engineering |  |  |  |  |  |  |  |  |  |
| ECEN = Electrical and Computer Engineering |  |  |  |  |  |  |  |  |  |
| ELEN = Electrical Engineering |  |  |  |  |  |  |  |  |  |
| ENGR = General Engineering |  |  |  |  |  |  |  |  |  |
| MECH = Mechanical Engineering |  |  |  |  |  |  |  |  |  |
| WDE = Web Design and Engineering |  |  |  |  |  |  |  |  |  |
| A "-" indicates that an equivalent course has not been approved at time of publication. |  |  |  |  |  |  |  |  |  |

## BIOENGINEERING MAJOR REQUIREMENTS

| Canada College Course | SCU course equivalency |
| :---: | :--- |
| Natural Science: |  |
| CHEM 210: General Chemistry I | CHEM 11 |
| CHEM 220: General Chemistry II | CHEM 12\&50 |
| CHEM 231: Organic Chemistry | CHEM 31 |
| CHEM 235: Organic Chemistry II w/Lab | CHEM 33 (If CHEM 231 \& 235 completed, <br> equates to SCU's CHEM 31, 32 \& 33) |
| PHYS 250: Physics with Calculus I | PHYS 31 |
| PHYS 260: Physics with Calculus II | PHYS 33 (If PHYS 250 \& 260 completed, <br> equates to SCU PHYS 31, 32 \& 33) |
| Engineering: |  |
| ENGR 260/261: Circuits \& Devices w/Lab | ELEN 50/50L |
| Mathematics: | MATH 11 |
| MATH 251: Analyt Geom \& Calc I | MATH 12 |
| MATH 252: Analyt Geom \& Calc II | MATH 13\& 14 |
| MATH 253: Analyt Geom \& Calc III | MATH 22 or AMTH 106 |
| MATH 275: Differential Equations |  |

## CIVIL ENGINEERING MAJOR REQUIREMENTS

| Canada College Course | SCU course equivalency |
| :---: | :--- |
| Natural Science: |  |
| CHEM 210: General Chemistry I | CHEM 11 |
| PHYS 250: Physics with Calculus I | PHYS 31 |
| PHYS 260: Physics with Calculus II | PHYS 33 (If PHYS 250 \& 260 completed, <br> equates to SCU PHYS 31, 32 \& 33) |
| GEOL 100/101: Introduction to Geology w/Lab | CENG 20/20L |
| Engineering: |  |
| ENGR 210: Engineering Graphics | CENG 7/7L |
| ENGR 111: Surveying | CENG 10/10L |
| ENGR 230: Statics | CENG 41 |
| Mathematics: |  |
| MATH 251: Analyt Geom \& Calc I | MATH 11 |
| MATH 252: Analyt Geom \& Calc II | MATH 12 |
| MATH 253: Analyt Geom \& Calc III | MATH 13\&14 |
| MATH 275: Differential Equations | MATH 22 or AMTH 106 |

## COMPUTER SCIENCE \& ENGINEERING MAJOR REQUIREMENTS

| Canada College Course | SCU course equivalency |
| :--- | :--- |
| Natural Science: |  |
| CHEM 210: General Chemistry I | CHEM 11 |
| PHYS 250: Physics with Calculus I | PHYS 31 |
| PHYS 260: Physics with Calculus II | PHYS 33 (If PHYS 250 \& 260 completed, <br> equates to SCU PHYS 31, 32 \& 33) |
| Engineering: |  |


| No approved course equivalency at time of <br> publication | COEN 21/21L |
| :---: | :--- |
| ENGR 260/261: Circuits \& Devices w/Lab | ELEN 50/50L |
| CIS 118: Introduction to Computer Science | COEN 10/10L |
| CIS 250: Introduction to Object Oriented <br> Programming-C++ | COEN 11/11L |
| CIS 252: Introduction to Data Structures-C++ | COEN 12/12L |
| CIS 262: Discrete Mathematics for Computer <br> Science | COEN 19 or MATH 51 |
| Mathematics: |  |
| MATH 251: Analyt Geom \& Calc I | MATH 11 |
| MATH 252: Analyt Geom \& Calc II | MATH 12 |
| MATH 253: Analyt Geom \& Calc III | MATH 13\&14 |
| MATH 275: Differential Equations | MATH 22 or AMTH 106 |
| MATH 270: Linear Algebra | MATH 53 |

## ELECTRICAL \& COMPUTER ENGINEERING MAJOR REQUIREMENTS

| Canada College Course | SCU course equivalency |
| :---: | :--- |
| Natural Science: |  |
| CHEM 210: General Chemistry I | CHEM 11 |
| PHYS 250: Physics with Calculus I | PHYS 31 |
| PHYS 260: Physics with Calculus II | PHYS 33 (If PHYS 250 \& 260 completed, <br> equates to SCU PHYS 31, 32 \& 33) |
| Engineering: | ELEN 21/21L |
| No approved course equivalency at time of <br> publication | ENGR 260/261: Circuits \& Devices w/Lab |
| CIS 118: Introduction to Computer Science | COEN 50/50L |
| CIS 250: Introduction to Object Oriented <br> Programming-C++ | COEN 11/11L |
| CIS 252: Introduction to Data Structures-C++ | COEN 12/12L |
| CIS 262: Discrete Mathematics for Computer <br> Science | COEN 19 or MATH 51 |
| Mathematics: | MATH 11 |
| MATH 251: Analyt Geom \& Calc I | MATH 12 |
| MATH 252: Analyt Geom \& Calc II | MATH 13\& 14 |
| MATH 253: Analyt Geom \& Calc III | MATH 22 or AMTH 106 |
| MATH 275: Differential Equations | MATH 53 |
| MATH 270: Linear Algebra |  |

## ELECTRICAL ENGINEERING MAJOR REQUIREMENTS

| Canada College Course | SCU course equivalency |
| :--- | :--- |
| Natural Science: |  |
| CHEM 210: General Chemistry I | CHEM 11 |
| PHYS 250: Physics with Calculus I | PHYS 31 |


| PHYS 260: Physics with Calculus II | PHYS 33 (If PHYS 250 \& 260 completed, <br> equates to SCU PHYS 31, 32 \& 33) |
| :---: | :--- |
| PHYS 270: Physics with Calculus III | PHYS 34 |
| Engineering: |  |
| ENGR 260/261: Circuits \& Devices w/Lab | ELEN 50/50L |
| ENGR 230: Statics | CENG 41 |
| CIS 118: Introduction to Computer Science | COEN 10/10L |
| CIS 250: Introduction to Object Oriented <br> Programming-C++ | COEN 11/11L |
| CIS 252: Introduction to Data Structures-C+++ | COEN 12/12L |
| Mathematics: |  |
| MATH 251: Analyt Geom \& Calc I | MATH 11 |
| MATH 252: Analyt Geom \& Calc II | MATH 12 |
| MATH 253: Analyt Geom \& Calc III | MATH 13\&14 |
| MATH 275: Differential Equations | MATH 22 or AMTH 106 |

GENERAL ENGINEERING MAJOR REQUIREMENTS

| Canada College Course | SCU course equivalency |
| :---: | :--- |
| Natural Science: |  |
| CHEM 210: General Chemistry I | CHEM 11 |
| PHYS 250: Physics with Calculus I | PHYS 31 |
| PHYS 260: Physics with Calculus II | PHYS 33 (If PHYS 250 \& 260 completed, <br> equates to SCU PHYS 31, 32 \& 33) |
| Engineering: | ELEN 50/50L |
| ENGR 260/261: Circuits \& Devices | MECH 10/10L |
| No approved course equivalency at time of <br> publication | MECH 11 |
| No approved course equivalency at time of <br> publication | MECH 15/15L |
| ENGR 270: Materials Science | CENG 41 |
| ENGR 230: Statics | COEN 10/10L |
| CIS 118: Introduction to Computer Science |  |
| Mathematics: | MATH 11 |
| MATH 251: Analyt Geom \& Calc I | MATH 12 |
| MATH 252: Analyt Geom \& Calc II | MATH 13\&14 |
| MATH 253: Analyt Geom \& Calc III | MATH 22 or AMTH 106 |
| MATH 275: Differential Equations |  |

## MECHANICAL ENGINEERING MAJOR REQUIREMENTS

| Canada College Course | SCU course equivalency |
| :--- | :--- |
| Natural Science: | CHEM 11 |
| CHEM 210: General Chemistry I | PHYS 31 |
| PHYS 250: Physics with Calculus I | PHYS 33 (If PHYS 250 \& 260 completed, <br> equates to SCU PHYS 31, 32 \& 33) |
| PHYS 260: Physics with Calculus II | ELEN 50/50L |
| Engineering: | ENGR 260/261: Circuits \& Devices |


| No approved course equivalency at time of <br> publication | MECH 10/10L |
| :---: | :--- |
| No approved course equivalency at time of <br> publication | MECH 11 |
| ENGR 270: Materials Science | MECH 15/15L |
| ENGR 215: Computational Methods for <br> Engineers and Scientists | MECH 45/45L |
| ENGR 230: Statics | CENG 41 |
| Mathematics: |  |
| MATH 251: Analyt Geom \& Calc I | MATH 11 |
| MATH 252: Analyt Geom \& Calc II | MATH 12 |
| MATH 253: Analyt Geom \& Calc III | MATH 13\&14 |
| MATH 275: Differential Equations | MATH 22 or AMTH 106 |

## WEB DESIGN AND ENGINEERING MAJOR REQUIREMENTS

| Canada College Course | SCU course equivalency |
| :--- | :--- |
| Natural Science: |  |
| CHEM 210: General Chemistry I (Recommended) | CHEM 11 |
| Engineering: |  |
| CIS 118: Introduction to Computer Science | COEN 10/10L |
| CIS 250: Introduction to Object Oriented <br> Programming-C++ | COEN 11/11L |
| CIS 252: Introduction to Data Structures-C++ | COEN 12/12L |
| Mathematics: |  |
| MATH 251: Analyt Geom \& Calc I | MATH 11 |
| MATH 252: Analyt Geom \& Calc II | MATH 12 |
| MATH 253: Analyt Geom \& Calc III | MATH 13\&14 |

## Additional notes:

- Consult the current Undergraduate Bulletin for Advanced Placement and High-Level International Baccalaureate test credit equivalencies at: https://www.scu.edu/bulletin/undergraduate/chapter8/AcademicCreditEvaluation.html
- Consult the Santa Clara University Undergraduate Bulletin for additional requirements in a major. The Bulletin can be found at: https://www.scu.edu/academics/course-catalogs/undergraduate-bulletin/
- Once students are admitted to Santa Clara University, they must abide by the policies, regulations and other requirements outlined in the Undergraduate Bulletin for their cohort year.
- Per SCU policy, transfer credit earned after enrollment cannot satisfy University Core, major or minor requirements. Refer to the SCU Undergraduate Bulletin for additional transfer credit restrictions.
- This guide is to be used by transfer applicants, not First-Year (aka: freshmen) applicants. Admitted First-Year students must complete the following Core requirements at SCU: Critical Thinking \& Writing 1 and 2; Cultures \& Ideas 1 and 2; Religion Theology \& Culture 1, 2 and 3 (taken in sequence order at SCU); Civic Engagement; Science, Technology \& Society; Experiential Learning for Social Justice; Advanced Writing; and four Pathway courses.

For questions regarding transfer credit or test credit, contact the Transfer Record Analyst at: Registrar@scu.edu.

Disclosure: The information contained in this document is to be used as a guide for the purpose of admissions into Santa Clara University. This information is reviewed periodically and the date of the most recent update is noted in the bottom right-hand corner of this guide. Students are responsible to make sure that any courses taken are listed on this guide at the time of actual enrollment. Transferability is not guaranteed and is up to our discretion, largely based upon the Santa Clara University core curriculum in effect at the time of admission.


[^0]:    **Note: Refer to the chart listing the maximum number of units allowed to transfer (including AP/IB test credit) per major located on the SCU Undergraduate Admission webpage at: http://www.scu.edu/ugrad/transfer/

[^1]:    (Note: Web Design \& Engineering major completes one course to satisfy Natural Science core requirement. It is recommended to complete CHEM210)

