Welcome to the

Computer Science Major
Animation and Games Emphasis

in the College of Computational, Mathematical, and Physical Sciences

College Advisement Center
- Website: https://science.byu.edu/advisement
- Email: cmsadvising@byu.edu
- Phone: 801-422-2674
- Office: N-181 ESC



Computer Science Department
- Website: cs.byu.edu
- Email: cs-office@byu.edu
- Phone: 801-422-3027
- Office: 3361 TMCB

Undergraduate Department Advisor (A-J) – Yannick Fitu
- Email: yfitu@cs.byu.edu
- Phone: 801-422-8602
- Office: 2245

Undergraduate Department Advisor (K-Z) – Lynnette Nelson
- Email: lnelson@cs.byu.edu
- Phone: 801-422-9439
- Office: 2250 TMCB

Internship Coordinator – Dennis Ng (International Students only)
- Email: ng@compsci.byu.edu
- Phone: 801-422-2835
- Office: 3322 TMCB

Career Advisor – Wagner Pinheiro
- Website: careers.byu.edu (Handshake--see flyer in packet)
- Email: wagner@cs.byu.edu
- Website: https://careers.byu.edu (schedule appointment)
- Phone: (801) 422-0211
- Office: 1112 TMCB

Clubs

ACM – Kimball Germane, cs.byu.acm@gmail.com
Developers Club – Kimball Germane, dev-assoc@byu.edu , visit dev.byu.edu to join and learn more
BYU Competitive Programming Club—Ryan Farrell, farrell@cs.byu.edu, visit cpc.byu.edu to join and learn more
Dev-G (Game development) – Seth Holladay, dev-g-assoc@byu.edu
Linux Users Group – Casey Deccio, linux-assoc@byu.edu
Women in Computer Science – Angela Jones – angela@cs.byu.edu, wics@cs.byu.edu
Club-Data Science: For information contact: datascience-assoc@byu.edu

Things to Know

Resources for Graduation Planning

- Flow Charts and Packets can be found here: https://science.byu.edu/advisement/explore-majors-and-minors.
- MAPs can be found in the university catalog.
- Academic advisors in N-181 ESC will help you understand course sequencing and help you plan classes to efficiently fill requirements. They can also help you with study skills and initial career exploration as well as connecting you with correct resources.
- Plan and register from your plan on MyMAP. Your academic advisor can help you understand how to best utilize this resource.
- Evaluate your current program. Periodically major programs are updated. An academic advisor would be happy to review the differences between the programs with you to help you determine what would be best for you.
- Consider meeting with a faculty advisor in your department. Contact info is found on the first page of this packet.

Tutoring Resources and Research

- Volunteer peer tutors are available through Y-Serve if you need help with a class. Also, if you excel in a subject, consider serving your fellow students by becoming a tutor. Find out more here: https://tutoring.byu.edu/.
- Many departments provide TA Tutorial Labs and research opportunities. Check your department for details:
  - Chemistry and Biochemistry: C-100 BNSN, 801-422-3667, https://www.chem.byu.edu/department/faculty/
  - Computer Science: 3361 TMCB, 801-422-3027, cs-office@byu.edu
  - Geological Sciences: S-389 ESC, 801-422-3918, geology@byu.edu
  - Mathematics: 275 TMCB, 801-422-2061, office@mathematics.byu.edu
  - Mathematics Education: A180 ESC, 801-422-1735, office@mathed.byu.edu
  - Physics and Astronomy: N-283 ESC, 801-422-4361, physics_office@byu.edu
  - Statistics: 2152 WVB, 801-422-4505, statsec@stat.byu.edu

Prepare Early for a Career

- Check out Careers & Experiential Learning in 1134 WSC and at careers.byu.edu.
- Visit BYU's Career Studio to work on your resume, cover letter, or other professional documents; learn to navigate LinkedIn, Handshake, and CareerShift; receive networking help; practice interview skills.
- Consider doing an internship.
  - Attend the STEM and Career Fairs held in fall and winter semesters.
  - Talk to your department about internship opportunities.
  - Use LinkedIn and Handshake (see flyer in this packet) to connect with alumni and apply for jobs/internships. BYU Connect is another great resource for networking (connect.byu.edu).
  - Talk with the college or department Career Director who can help you search for internships as well as assist you with many other career related strategies (see first page of this packet).
- Consider taking StDev 317 (Career Strategies) your junior year.
- Consider taking either Chem 502, CS 502, Geol 502, Math 502, PHSCS 502, or STAT 502 (1-credit Networking Class). Class is held for 1 hour each week.

BYU Computer Science
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Fall 2026 Requirements

77 – 81.5 credits

Grades below C- are not allowed in major courses

Core Course Requirements (78.5-79.5 Hours)

1. Complete the following prerequisite courses: CS 111, CS 191, CS 235, CS 291, CSANM 150, DESAN 101 (Apply to the program)

2. Complete the following: CS 224, 236, 240, 312, 324, 355,455, CSANM 250

3. Complete the following supporting courses: WRTG 316, Math 112, 213, 215, Phscs 121

4. Complete one of the following: STATS 121 or 201

5. Complete one of the following: Math 113, Math 290, or STAT 220

6. Complete either CSANM 354 or CSANM 342

7. Complete either DESAN 460 or CS 404

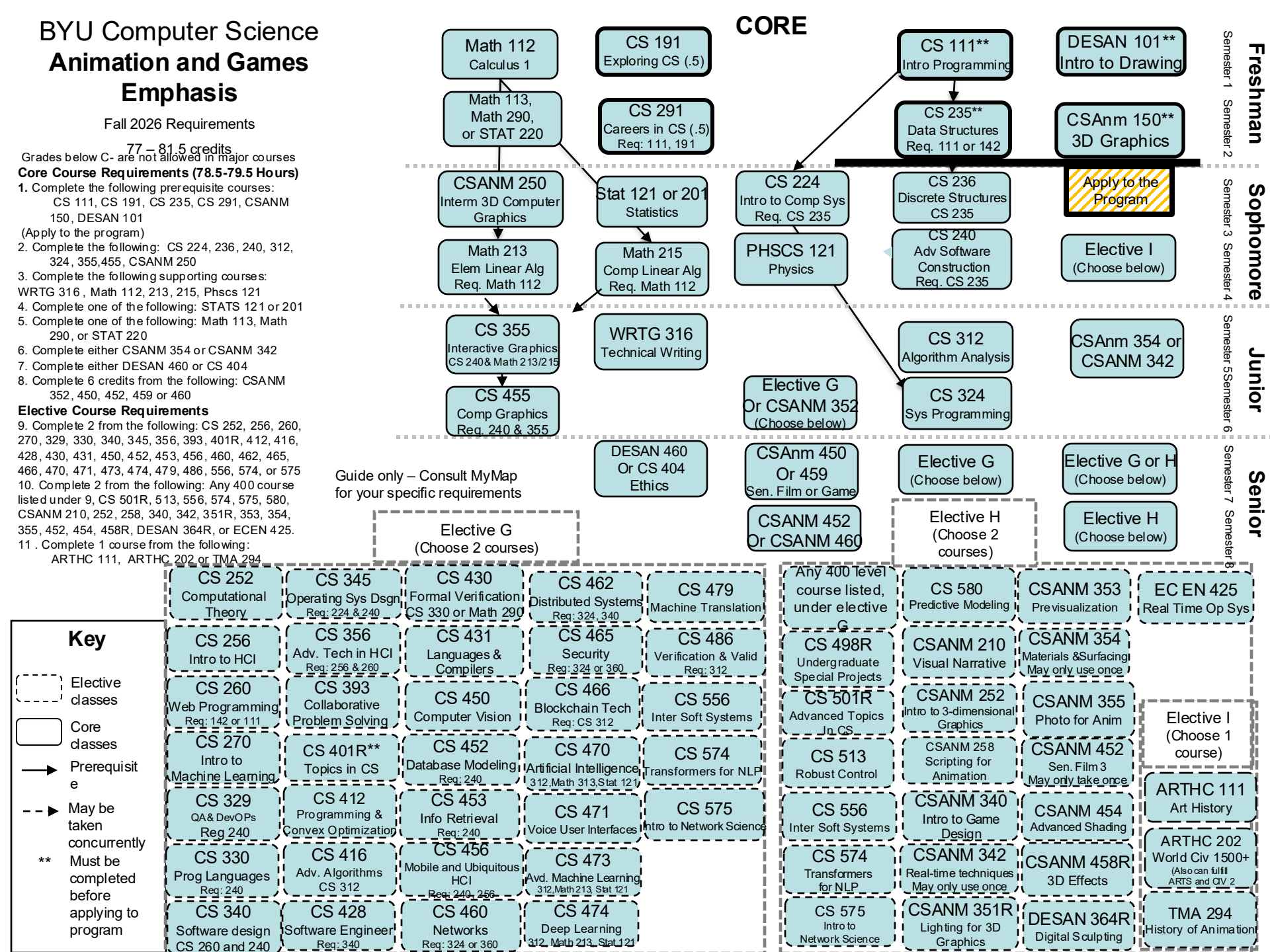
8. Complete 6 credits from the following: CSANM 352, 450, 452, 459 or 460

Elective Course Requirements

9. Complete 2 from the following: CS 252, 256, 260, 270, 329, 330, 340, 345, 356, 393, 401R, 412, 416, 428, 430, 431, 450, 452, 453, 456, 460, 462, 465, 466, 470, 471, 473, 474, 479, 486, 556, 574, or 575

10. Complete 2 from the following: Any 400 course listed under 9, CS 501R, 513, 556, 574, 575, 580, CSANM 210, 252, 258, 340, 342, 351R, 353, 354, 355, 452, 454, 458R, DESAN 364R, or ECEN 425.

11. Complete 1 course from the following: ARTHC 111, ARTHC 202 or TMA 294



Key

- Elective classes
- Core classes
- Prerequisite
- May be taken concurrently
- ** Must be completed before applying to program

CS 252 Computational Theory	CS 345 Operating Sys Dsgn Req: 224 & 240	CS 430 Formal Verification CS 330 or Math 290	CS 462 Distributed Systems Req: 324, 340	CS 479 Machine Translation
CS 256 Intro to HCI	CS 356 Adv. Tech in HCI Req: 256 & 260	CS 431 Languages & Compilers	CS 465 Security Req: 324 or 360	CS 486 Verification & Valid Req: 312
CS 260 Web Programming Req: 142 or 111	CS 393 Collaborative Problem Solving	CS 450 Computer Vision	CS 466 Blockchain Tech Req: CS 312	CS 556 Inter Soft Systems
CS 270 Intro to Machine Learning	CS 401R** Topics in CS	CS 452 Database Modeling Req: 240	CS 470 Artificial Intelligence 312,Math 313,Stat 121	CS 574 Transformers for NLP
CS 329 QA& DevOPs Reg 240	CS 412 Programming & Convex Optimization	CS 453 Info Retrieval Req: 240	CS 471 Voice User Interfaces	CS 575 Intro to Network Science
CS 330 Prog Languages Req: 240	CS 416 Adv. Algorithms CS 312	CS 456 Mobile and Ubiquitous HCI Req: 240, 256	CS 473 Avd. Machine Learning 312,Math 213, Stat 121	
CS 340 Software design CS 260 and 240	CS 428 Software Engineer Req: 340	CS 460 Networks Req: 324 or 360	CS 474 Deep Learning 312, Math 213, Stat 121	

Any 400 level course listed, under elective G	CS 580 Predictive Modeling	CSANM 353 Previsualization	EC EN 425 Real Time Op Sys
CS 498R Undergraduate Special Projects	CSANM 210 Visual Narrative	CSANM 354 Materials &Surfacing May only use once	
CS 501R Advanced Topics In CS	CSANM 252 Intro to 3-dimensional Graphics	CSANM 355 Photo for Anim	Elective I (Choose 1 course)
CS 513 Robust Control	CSANM 258 Scripting for Animation	CSANM 452 Sen. Film 3 May only take once	ARTHC 111 Art History
CS 556 Inter Soft Systems	CSANM 340 Intro to Game Design	CSANM 454 Advanced Shading	ARTHC 202 World Civ 1500+ (Also can fulfill ARTS and CIV 2
CS 574 Transformers for NLP	CSANM 342 Real-time techniques May only use once	CSANM 458R 3D Effects	
CS 575 Intro to Network Science	CSANM 351R Lighting for 3D Graphics	DESAN 364R Digital Sculpting	TMA 294 History of Animation

Handshake

At A Glance

Handshake is BYU's own job board. Employers who want to hire BYU graduates or offer internships to current students post their job openings to this website and students can apply. Just like LinkedIn, employers can view student profiles and students can network as they apply for jobs and internships.

Login to Handshake.byu.edu with your netid@byu.edu

1. Download Handshake App

- Select Continue with School
- Type in "Brigham Young University"
- Select School Login
- Input your BYU e-mail address: netid@byu.edu (it will forward emails to the e-mail you have on file with BYU)
- Handshake will send you a link via e-mail to enable your account in the app
- Navigate the app to perform all the funcions of the website that have been previoiusly mentioned

2. Complete Your Profile

- Fill in the Summary/Bio section
- Fill in your past jobs and experiences, including all the bullet points you use on your resume
- Add a professional headshot and background photo
- Information from your transcript is already uploaded
- Make your profile discoverable to employers

Remember: Every word in your profile will be searchable by students and employers

3. Apply For Jobs

- Search collections related to your major
- Search for job titles, employers, or skills
- Apply for interesting jobs that meet your skill set

4. Research Companies

- Under the Jobs tab there is an Employers tab
- Use keywords or locations to search for companies that are the right fit for you
- Plan to attend employer info sessions on BYU Campus, connect with employers at Career Fairs or set up informational interviews with them.

Remember: When looking at companies or jobs, Handshake will tell you what other BYU Students have worked there. Use this resource to network and discover more information!

5. Explore Fellow Students

- Use the People tab to find peers
- Search for fellow BYU students to view their profiles and job positions
- Attend events

Employers are
5x more likely
to view a profile that has at least one job, skill, and organization.

6. Attend Events

- The Events tab will be your key to finding info sessions interviews, and Career Fairs
- Make sure to save events you are interested in and RSVP so you do not forget to attend
- Spread the word to your friends on social media
- Use Collections to filter results in your major

BYU Career Services
1134 WSC
(801) 422-3000
careers.byu.edu

Career Services studio!

Handshake Profile Rubric

Name: Reviewer: Date:

Meets and/or Exceeds Expectations	Partially Meets Expectations	Does Not Meet Expectations
Profile includes a photo that is professionally appropriate for the student's intended industry.	Profile includes a photo but it is not professionally appropriate.	Profile does not include a photo.
My Journey section includes specific information about the student's skills, experience, and goals. The section is free from grammatical and spelling errors.	My Journey section is vague. Summary contains one or more grammatical/spelling errors.	Student has not written anything in the My Journey section.
Expected graduation date has been added to Education section.		Expected graduation date has not been added to Education section.
Experience section includes at least 2 entries. Each entry includes title, employer, dates, location and a description of the work done.	Experience section includes 2 entries but no description of work is provided.	Experience section contains less than 2 entries.
The Job Hunt, Cities, and Industries fields of the Your Career Interests section are complete.	Fill out entire Career Interests section on profile (especially types of jobs) and where you are interested in living sections (partially).	The Job Hunt, Cities, and Industries fields of the Your Interests section are not complete.
Profile includes at least 3 skills.	Profile includes 1-2 skills.	Profile does not include any skills.
A resume is uploaded to profile and is viewable by employers (public).	A resume is uploaded to the profile but not viewable by employers.	A resume is not uploaded to the profile.

All other fields/categories make your profile more robust, which makes it more likely to be viewed by employers and promote your brand.

Possible Careers with a Computer Science major

(Not a comprehensive list)

AI Engineer
AI Ethics Consultant
Animation Tool Developer
Applications Developer
Bioinformatics Developer
Business Intelligence Analyst
Cloud Architect
Computational and Information Scientist
Computer Programmer
Computer Vision Engineer
Cybersecurity Analyst
Data Scientist
Database Manager
DevOps Engineer
Embedded Systems Programmer / Engineer
Front-End Developer
Information Architect
IT Project Manager
Multimedia Programmer
Natural Language Processing Specialist
Network Architect
Product Manager
Professor*
Research Scientist
Robotics Software Engineer
Security Architect
Site Reliability Engineer
Software Engineer
Software Test Engineer
Software Development Manager
Systems Engineer
UI/UX Engineer / Researcher / Designer
Video Game Developer & Designer
Web Designer / Programmer

*Usually requires a graduate degree

More information is available at the Counseling and Career Center and from CareerOneStop: http://www.careeronestop.org/