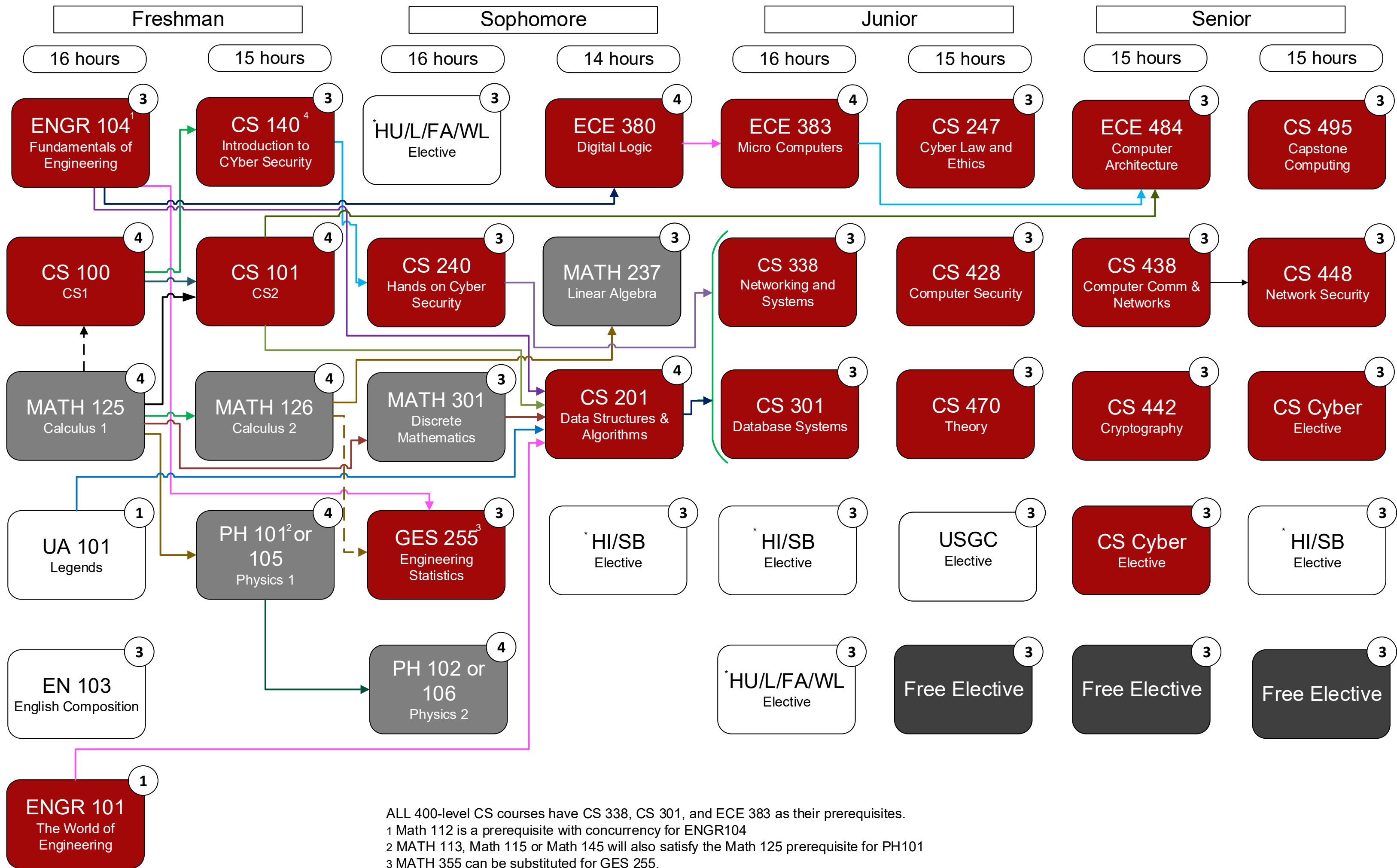# 2025 Cyber Security Curriculum

NOTE: This curriculum is effective for all students enrolling in CS 100 in Fall 2025 or later.

⟶ = course prerequisites. ----▶ = prerequisites with concurrency.

| Freshman | | Sophomore | | Junior | | Senior | |
|---|---|---|---|---|---|---|---|
| 16 hours | 15 hours | 16 hours | 14 hours | 16 hours | 15 hours | 15 hours | 15 hours |

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| **ENGR 104**[1] (3) — Fundamentals of Engineering | **CS 140**[4] (3) — Introduction to CYber Security | *HU/L/FA/WL (3) — Elective | **ECE 380** (4) — Digital Logic | **ECE 383** (4) — Micro Computers | **CS 247** (3) — Cyber Law and Ethics | **ECE 484** (3) — Computer Architecture | **CS 495** (3) — Capstone Computing |
| **CS 100** (4) — CS1 | **CS 101** (4) — CS2 | **CS 240** (3) — Hands on Cyber Security | MATH 237 (3) — Linear Algebra | **CS 338** (3) — Networking and Systems | **CS 428** (3) — Computer Security | **CS 438** (3) — Computer Comm & Networks | **CS 448** (3) — Network Security |
| MATH 125 (4) — Calculus 1 | MATH 126 (4) — Calculus 2 | MATH 301 (3) — Discrete Mathematics | **CS 201** (4) — Data Structures & Algorithms | **CS 301** (3) — Database Systems | **CS 470** (3) — Theory | **CS 442** (3) — Cryptography | **CS Cyber** (3) — Elective |
| UA 101 (1) — Legends | PH 101[2] or 105 (4) — Physics 1 | **GES 255**[3] (3) — Engineering Statistics | *HI/SB (3) — Elective | *HI/SB (3) — Elective | USGC (3) — Elective | **CS Cyber** (3) — Elective | *HI/SB (3) — Elective |
| EN 103 (3) — English Composition | PH 102 or 106 (4) — Physics 2 | | | *HU/L/FA/WL (3) — Elective | Free Elective (3) | Free Elective (3) | Free Elective (3) |
| **ENGR 101** (1) — The World of Engineering | | | | | | | |

ALL 400-level CS courses have CS 338, CS 301, and ECE 383 as their prerequisites.

1 Math 112 is a prerequisite with concurrency for ENGR104

2 MATH 113, Math 115 or Math 145 will also satisfy the Math 125 prerequisite for PH101

3 MATH 355 can be substituted for GES 255.

4 CS 140 is a spring only class

* At least 3 credits from courses approved for the Literature designation.

* At least 3 credits from courses approved for the History design.

* CS 495 prerequisites: (CS 403 or CS 470) and (CS 4xx excluding CS 403 and CS 470).

Last Update: July 2025

122 Total Hours