

Barrier Code	Category	Description of Code
class-size	Enrollment	observations where the student mentions conflicts with classsize, waitlist..etc as barriers.
confidence	motivation	observations where the student mentions their lack of confidence in their ability to do well in the next course also, their lack of confidence in learning/understanding the concepts of the next course.
cs-skills	academic support	observations where the student expressed specific topics in computer science, or CS materials as barriers.
difficulty	academic support	Observations where the student mentions course difficulty for current, future courses or course content as a barrier.
excitement	motivation	observations where students mention lack of excitement for next course or topic.
external	external resources	observations where students mention external factors as a barrier to the next course in sequence (work, transportation, housing etc.)
falling-behind	academic support	Observations where the student mentions falling-behind in a course.
friends	social	Observations where the student mentions the lack of having friends/peers to work on assignments with as barriers.
grades	academic support	Observations where the student mentions grades or performance in current course being a barrier for taking the next course.
health	external resources	Observations where the student expresses health concerns as a barrier.
idk	no answer	Observations where the student states the barriers are unknown
inst-o	department-norms	Observations where other institutional factors around persisting in the major are mentioned.
learning-skills	academic support	Observations where the student mentions personal attributes or skills that improve learning (time management, work ethic, etc.)
modality	Enrollment	Observations where students mention mode of learning and college experience.
no-answer	no answer	left blank
no-barriers	no-barriers	observations where the student does not mention any barriers.
other	other	misc. responses
prep	academic support	observations where students mention their prior experience as a barrier to taking the next course.
prof	department-norms	observations where students mention the professors teaching the next course or teaching style as a barrier.
scheduling-conflict	Enrollment	Observations where students student mention conflicting schedule for classes or enrollment as barriers.
tas	academic support	observations where students mentioned the TA's or ability to seek help when needed a barriers.
workload	department-norms	Observations where students mention pace or volume of work in courses as barriers.

Confidence Code	Category	Description of Code
confidence	self-efficacy	Observations where the student expresses confidence in their ability to learn/understand concepts of the next course or to go on to the next course.
cs-skills	knowledge	Observations where students mention specific skills/topics in computer science.
ease	self-efficacy	Observations where materials and assignments seems to be easy (not difficult) to the student.
excitement	motivation	Observations where students mention the next course/current course being fun and/or general excitement is expressed.
external	modality	Observations where students mention external factors. .
friends	capacity	Observations where students mention friends/peers to work on assignments with or having an impact on their experience.
grades	validation	Observations where students mention grades or performance in current course being the primary reason they'd continue on to the next course
idk	no-answer	Observations where the student states the confidence is unknown.
inst-o	other	Observations where other institutional factors around persisting in the major are mentioned.
learning-skills	capacity	Observations where students express personal attributes or skills that improve learning (time management, work ethic, etc.)
modality	modality	Observations where students mention mode of learning and college experience.
no-answer	no-answer	left blank
not-good	lack-confidence	observation where the student mentions not feeling good about taking the next course, and anyone who writes "nothing" / "none"
other	other	misc. responses
prep	knowledge	observations where students mention their prior experience contributes to them feeling good about taking the next course
prof	capacity	Observations where students mention the professors teaching the next course or teaching style as factors
tas	capacity	Observations where students mention the TA's, teaching staff or ability to seek help when needed
workload	capacity	Observations where students express the pace or volume of work in courses