



A11Y 8/28/2

AB928 STEM STUDY GROUP



DATA QUESTIONS

- List of majors that require Calculus 1 **AND** 1 semester of Physics
- List of high-unit majors within the STEM majors that require Calculus 1/one semester of Physics (70 or more units) including but not limited to, Engineering, Public Health, Computer Science
- Disaggregated (by race and gender) data on transfer intent, eligibility, and actual transfer from CC to UC and CSU within the list of STEM majors







451 identified STEM programs **32** identified majors (by TOP code)

- Using the CID for calculus I or the Calculus sequence (MATH 210, MATH 900 S), identified all course titles that were relevant to first term Calculus.
- Using that list, identified all programs where those courses were program applicable.
- Further narrowed the list of programs to those that also had program applicable coursework in physics (4 Digit TOP code = 1902).
- The list is ALL Programs where this methodology holds true.

TOP code	Number of programs
Engineering, General	64
Physics, General	55
Mathematics, General	52
Biological and Physical Sciences (and Mathematics)	49
Biology, General	48
Computer Science	47
Chemistry, General	44
Environmental Science	27
Astronomy	8
Liberal Arts and Sciences, General	7
Physical Sciences, General	6
Engineering Technology, General	5
Environmental Studies	5
Chemistry for UC Transfer	4
Geology	4
Nutrition, Foods, and Culinary Arts	3

TOP code	Number of programs
Physics for UC Transfer	3
Biotechnology and Biomedical Technology	2
Electro-Mechanical Technology	2
Environmental Technology	2
Oceanography	2
Other Interdisciplinary Studies	2
Computer Programming	1
Earth Science	1
Geography	1
Information Technology, General	1
Liberal Studies	1
Other Biological Sciences	1
Other Physical Sciences	1
Public Health	1
Transfer Studies	1
Viticulture, Enology, Wine Business	1

Overall Transfer Outcomes

for students who entered with a declared major in one of those 32 TOP codes*

2015-201<u>6 cohort</u>

20% 16% 45% Transfer Persisted Transfer Directed Prepared from Y1 to Y2 41% 11% 6% uc/csu **STEM** Any Transfer Degree Degree

Transfer directed Successful completion of transferable Math and English coursework

Transfer prepared Student earned 60+ transferrable units and a 2.0+ GPA.

Persistence

Student was enrolled at a California Community College during the 2016-17 academic year.

*This dataset excludes any students who were undecided or who later changed majors into one of these TOP codes.

Transfer Outcomes by IPEDS Race Category

for for students who entered with a declared major in one of those 32 TOP codes 2015-2016 cohort



high-unit programs

TOP code	Min number of units
Environmental Science	87
Engineering - Civil Engineering Track	84
Engineering, Mechanical, Aerospace, Manufacturing Track	80
Engineering	78
UCTP Chemistry	78
Mechanical Engineering UC Pathway	76
Engineering	76
Pre-Engineering	74
Engineering - Civil/Mechanical Option	74
Engineering - Electrical Track	74

TOP code	Min number of units
UCTP Chemistry	72
Engineering	71
UCTP Physics	71
Chemistry UCTP	70
Chemistry	70
Environmental Science	70
UCTP Chemistry	70
UCTP Chemistry	70
Engineering with Emphasis in Civil Engineering Applications	70

