

District Space Utilization Analysis



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RIGHT-SIZED

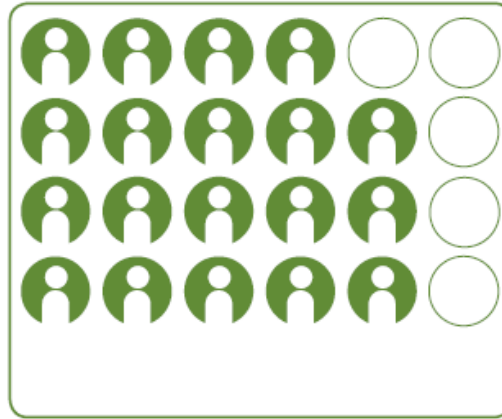
Meets State Standards



of seats = # of students
100% capacity / load

OVER CAPACITY

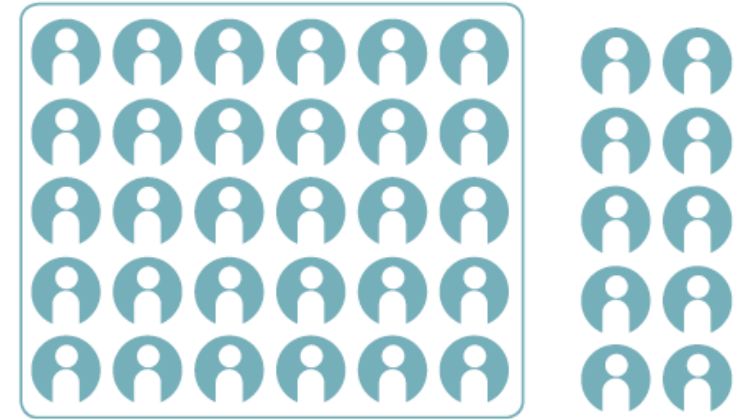
Worse Than State Standards



of seats > # of students
over 100% capacity / load

UNDER CAPACITY

Better Than State Standards



of seats < # of students
under 100% capacity / load

CAPACITY LOAD RATIOS

Capacity load ratios represent the direct relationship between the amount of space available, by type, which may be used to serve students, and the number of students participating in campus programs. The higher the percentage the worse the room operational efficiency.

Pre and Post COVID Facility Space Utilization

Higher Education Trends

- ✓ Flexible working and academic learning spaces are the new norm.
- ✓ Spikes in interest in remote instruction is likely to partially persist past the end of the pandemic.
- ✓ Evolving student preferences in the types of space that students want to use on campus

Source: EAB

Due to COVID-19, KCCD is establishing a new space analysis methodology based on the **Fall 2021 Semester**. The “new normal” reflects an increased student preference for hybrid and online instruction. Therefore, the reduction of in-person course demands potentially can result in a different campus footprint with alternative uses of space post pandemic. KCCD is reviewing classroom and lab course trends via *FacilitySoft* to identify efficiency opportunities and be responsive to instructional climate shifts. Complementary uses may include but are not limited to the following:


- Building/Program Consolidation
- Public and Private Partnerships
- Commercial Leases
- Public Agency Collaborations

“The pandemic recovery may involve reimagining campuses with unused spaces as community hubs and large-scale resource centers.”

-Inside Higher Ed: The Campus After COVID



FacilitySoft is a dynamic capital management system with Planning, Maintenance, and Building Modules. The Building Module contains a space utilization dashboard and analysis tool to provide a visual illustration of the semester course / classroom schedule at the campus, building, and room levels. This data supports effective space utilization and scheduling.



Space Utilization Reporting Tool

Select a Semester from the pull-down menu to begin

Select Semester and data date... ▾

Go

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BC Main Campus - Space Utilization Reporting Tool

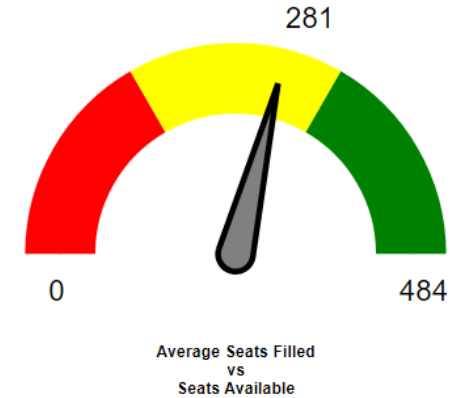
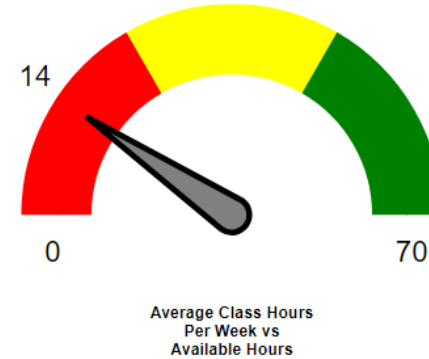
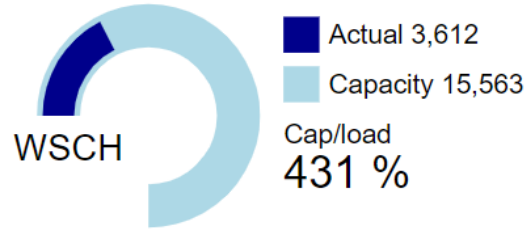
Building: MATH SCIENCE
Semester: Fall 2021 Data Date: 1/6/2022

[Back to Campus](#) | [View Building Floor Plans](#)

Select Semester and data date...

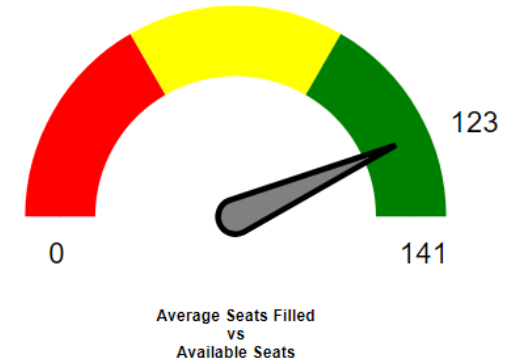
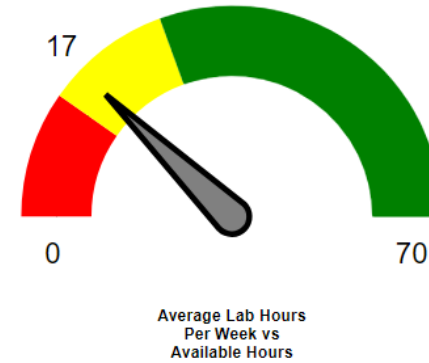
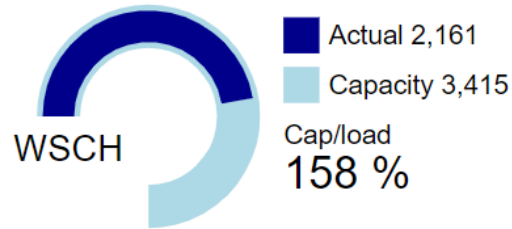
Lecture Rooms	Cap/Load	Productivity
Math Science 2	380 %	222
Math Science 3	2,259 %	99
Math Science 18	1,843 %	112
Math Science 26	416 %	304
Math Science 103	268 %	154
Math Science 104	255 %	141
Math Science 105	604 %	77
Math Science 106	373 %	88
Math Science 108	299 %	97
Math Science 109	234 %	116
Math Science 110	578 %	162
Math Science 111	321 %	190
Math Science 156	618 %	55

Lecture Rooms Average Productivity: 140



Lab Rooms	Cap/Load	Productivity
Math Science 6	156 %	218
Math Science 9	125 %	99
Math Science 10	82 %	124
Math Science 12	318 %	150
Math Science 14	139 %	102
Math Science 17	226 %	92
Math Science 21	204 %	86
Math Science 24	177 %	111

Lab Rooms Average Productivity: 123



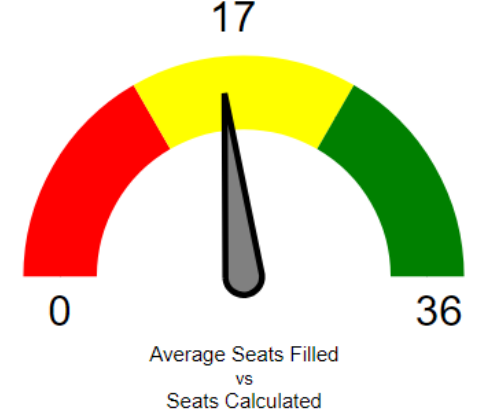
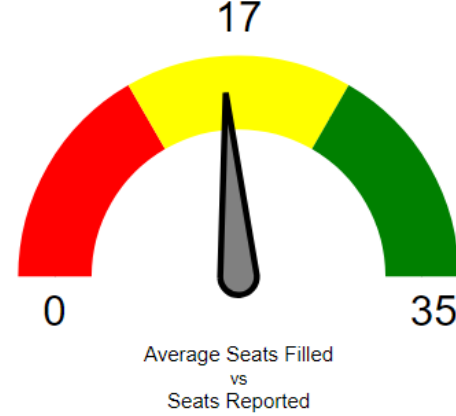
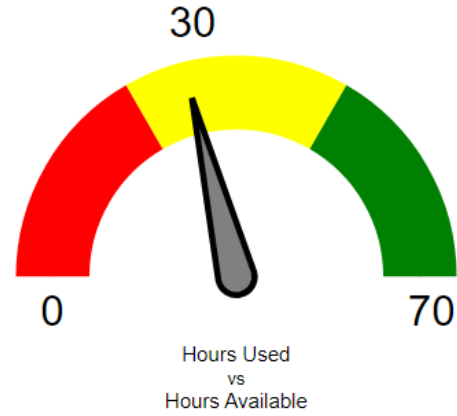
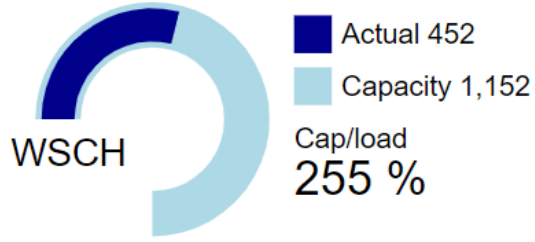
BC Main Campus - Instructional Space Utilization

Building: MATH SCIENCE
Semester: Fall 2021 Data Date: 1/6/2022

[Back to Building](#) | [View Building Floor Plans](#)

Select Semester and data date...

Room#: Math Science 104 Room Use: 110 ASF: 727 Average Seats Filled: 17 Reported Seats: 35 Calculated Seats: 36 Room Productivity: 141



Time	Mon	Tue	Wed	Thu	Fri	Sat	Sun
7am							
8am	8:00 AM-9:25 AM CRN: 71917 Fund of Algebra-BSTEM Majors	8:00 AM-9:25 AM Fund of Algebra-BSTEM Majors	8:00 AM-9:25 AM Fund of Algebra-BSTEM Majors	8:00 AM-9:25 AM Fund of Algebra-BSTEM Majors			
9am							
10am	9:35 AM-11:00 AM CRN: 71917 Fund of Algebra-BSTEM Majors		9:35 AM-11:00 AM Fund of Algebra-BSTEM Majors				
11am	11:10 AM-12:35 PM CRN: 71903 Ordinary Differential Equatlns	11:10 AM-12:35 PM Elementary Linear Algebra	11:10 AM-12:35 PM Ordinary Differential Equatlns	11:10 AM-12:35 PM Elementary Linear Algebra			
12pm							
1pm	1:00 PM-2:05 PM CRN: 74099 Precalculus I	1:00 PM-1:50 PM	1:00 PM-2:05 PM Precalculus I	1:00 PM-1:50 PM			
2pm							
3pm	2:35 PM-3:25 PM	2:35 PM-3:40 PM Math For Elem School Teaching	2:35 PM-3:25 PM	2:35 PM-3:40 PM Math For Elem School Teaching			
4pm							
5pm							
6pm	6:00 PM-8:05 PM CRN: 71839 Precalculus II Students: 27	6:00 PM-8:05 PM Elem Probability and Statistics Students: 24	6:00 PM-8:05 PM Precalculus II Students: 27	6:00 PM-8:05 PM Elem Probability and Statistics Students: 24			
7pm							
8pm							
9pm							

Three Year Comparative Data

The following slides provide the *FacilitySoft* semester scheduling information for Fall 2018, Fall 2019, and Fall 2021 in a spreadsheet format. This presentation provide a view into the pre-COVID and current in-person course offerings. This study reviewed the lecture and laboratory spaces at all three Colleges and the Delano Center.

Next Steps

Consider classrooms, classroom technology, academic calendaring, room scheduling practices, course delivery models and pedagogical modality to ensure instruction can be performed safely, flexibly and consistent

Campus Level Utilization Macro Level Review



Campus Level Space Utilization

Macro Level Review– Bishop/Mammoth, Weil Institute, and Tehachapi Center Data currently not available.

College	Fall 2018 Lecture Cap Load Ratio	Fall 2019 Lecture Cap Load Ratio	Fall 2021 Lecture Cap Load Ratio	Fall 2018 Lab Cap Load Ratio	Fall 2019 Lab Cap Load Ratio	Fall 2021 Lab Cap Load Ratio
Bakersfield College	100%	122%	366%	71%	78%	184%
Cerro Coso College	273%	324%	1127%	191%	214%	406%
Porterville College	143%	155%	545%	70%	74%	164%
Delano Center	Not Available	162%	674%	Not Available	104%	418%



Building Space Utilization

Mid-Level Review

Building Space Utilization

Mid-Level Review

Bakersfield College – Building Level

Does not include the Weil Institute or Delano data.

Building	Fall 2018 Lecture Cap Load Ratio	Fall 2019 Lecture Cap Load Ratio	Fall 2021 Lecture Cap Load Ratio	Fall 2018 Lab Cap Load Ratio	Fall 2019 Lab Cap Load Ratio	Fall 2021 Lab Load Ratio
Agriculture	92%	112%	261%	115%	87%	296%
Auto Technology	NA	NA	NA	114%	141%	512%
Business	94%	143%	296%	61%	73%	234%
Center for Student Success	195%	357%	0%	31%	79%	389%
Family and Consumer Ed	82%	87%	597%	36%	43%	543%
Fine Arts	84%	92%	316%	74%	76%	141%
Forum	194%	240%	884%	NA	NA	NA
Horticulture Lab	NA	NA	NA	157%	124%	591%
Humanities	74%	93%	293%	91%	110%	NA
Intdustrial Technology	219%	162%	418%	141%	135%	236%
Language Arts	90%	107%	351%	49%	51%	127%
Library	NA	NA	NA	103%	84%	247%
Math Science	115%	163%	431%	76%	73%	158%
Performing Arts Center	NA	NA	NA	77%	80%	268%
Science Engineering	126%	135%	392%	59%	71%	126%

Bakersfield College Delano Center – Building Level

Building	Fall 2018 Lecture Cap Load Ratio	Fall 2019 Lecture Cap Load Ratio	Fall 2021 Lecture Cap Load Ratio	Fall 2018 Lab Cap Load Ratio	Fall 2019 Lab Cap Load Ratio	Fall 2021 Lab Load Ratio
Building 1000	Not Available	109%	388%	Not Available	64%	301%
Building 1100	Not Available	149%	523%	Not Available	50%	180%
Science/Technology	Not Available	205%	987%	Not Available	144%	580%

Cerro Coso Community College – Building Level

Bishop/Mammoth and Tehachapi Center Data currently not available.

Building	Fall 2018 Lecture Cap Load Ratio	Fall 2019 Lecture Cap Load Ratio	Fall 2021 Lecture Cap Load Ratio	Fall 2018 Lab Cap Load Ratio	Fall 2019 Lab Cap Load Ratio	Fall 2021 Lab Cap Load Ratio
East Wing	258%	247%	1132%	NA	NA	NA
Learning Resource Center	495%	Out of Service	0%	161%	Out of Service	679%
Main Building	NA	470%	1121%	108%	152%	144%
West Classroom Wing	NA	NA	NA	267%	312%	719%

Porterville College – Building Level

Building	Fall 2018 Lecture Cap Load Ratio	Fall 2019 Lecture Cap Load Ratio	Fall 2021 Lecture Cap Load Ratio	Fall 2018 Lab Cap Load Ratio	Fall 2019 Lab Cap Load Ratio	Fall 2021 Lab Cap
Academic Center	118%	129%	499%	NA	NA	NA
Allied Health	356%	388%	668%	NA	NA	NA
Career Technology	117%	143%	440%	NA	NA	130%
Communication Arts	NA	NA	NA	62%	56%	193%
Fine Arts	NA	NA	NA	106%	120%	243%
Learning Resource Center	164%	259%	439%	131%	127%	252%
Science Mathematics	126%	125%	548%	53%	58%	123%
Trade and Industry	135%	124%	1423%	NA	NA	NA

Room Level Space Utilization Review

Lecture & Lab Micro-Level

Bakersfield College – Micro Room Level

Lecture Rooms

Building	Room	Fall 2018 Lecture Cap Load Ratio	Fall 2019 Lecture Cap Load Ratio	Fall 2021 Lecture Cap Load Ratio	Building	Room	Fall 2018 Lecture Cap Load Ratio	Fall 2019 Lecture Cap Load Ratio	Fall 2021 Lecture Cap Load Ratio
MATH SCIENCE	2	90%	111%	380%	LANGUAGE ARTS	109	91%	104%	0%
	3	227%	314%	2259%		110	86%	74%	226%
	18	84%	132%	1843%		111	78%	104%	292%
	26	126%	132%	416%		113	95%	121%	255%
	54	308%	211%	0%		114	64%	80%	233%
	103	86%	195%	268%		116	160%	143%	1247%
	104	79%	206%	255%		119	0%	0%	0%
	105	89%	166%	604%		201	106%	105%	352%
	106	104%	153%	373%		202	137%	173%	723%
	108	98%	122%	299%		203	62%	78%	282%
	109	136%	119%	234%		204	185%	161%	291%
	110	91%	192%	578%		217	72%	86%	323%
	111	103%	125%	321%		218	79%	111%	636%
	156	311%	345%	618%		219	114%	139%	1886%
SCIENCE/ENGINEERING	48	126%	163%	621%		222	131%	244%	498%
	51	151%	95%	414%		223	69%	88%	287%
	53	113%	141%	322%		224	92%	101%	264%
	56	121%	155%	346%		225	0%	0%	0%
INDUSTRIAL TECHNOLOGY	201-A	102%	119%	418%	FORUM	102	194%	240%	884%
	201-B	0%	0%	0%	AGRICULTURE	2	89%	117%	273%
	203	240%	288%	0%		9	96%	107%	174%
	204	769%	0%	0%					
	207	210%	181%	0%					

Bakersfield College – Micro Room Level

Lecture Rooms

Building	Room	Fall 2018 Lecture Cap Load Ratio	Fall 2019 Lecture Cap Load Ratio	Fall 2021 Lecture Cap Load Ratio	Building	Room	Fall 2018 Lecture Cap Load Ratio	Fall 2019 Lecture Cap Load Ratio	Fall 2021 Lecture Cap Load Ratio
FORUM	102	194%	240%	884%	HUMANITIES	3	95%	145%	282%
AGRICULTURE	2	89%	117%	273%		4	75%	109%	345%
	9	96%	107%	174%		5	96%	120%	570%
FINE ARTS	47	75%	85%	186%		6	88%	227%	729%
	51	77%	74%	184%		7	108%	166%	1168%
	58	71%	73%	293%	CENTER FOR STUDENT SUCCESS	117	239%	495%	0%
	60	117%	127%	688%		122	290%	331%	0%
	65	78%	91%	407%		128	138%	157%	0%
BUSINESS	4	94%	143%	296%		3	179%	2619%	0%
FAMILY & CONSUMER ED	15	77%	97%	527%					
	23	86%	81%	663%	DELANO CENTER				
HUMANITIES	103	67%	95%	327%					
	104	61%	62%	160%	SCIENCE/TECHNOLOGY	109	0%	215%	1195%
	105	66%	73%	173%		117	0%	210%	767%
	11	73%	93%	562%		118	0%	193%	1004%
	12	60%	86%	266%	BUILDING 1000	1011	No Study	145%	507%
	13	59%	87%	284%		1012	No Study	87%	314%
	14	77%	73%	341%	BUILDING 1100	1104	No Study	129%	523%
	15	59%	58%	222%		1105	No Study	176%	0%
	19	64%	78%	425%					
	2	74%	112%	525%					
	20	89%	111%	172%					
	21	74%	97%	280%					
	22	110%	106%	211%					
	23	89%	101%	192%					

Bakersfield College – Micro Room Level

Lab Rooms

Building	Room	Load Ratio	Load Ratio	Load Ratio	Building	Room	Load Ratio	Cap Load Ratio	Cap Load Ratio
MATH SCIENCE	6	67%	62%	156%	INDUSTRIAL TECHNOLOGY	2	196%	156%	171%
	9	64%	60%	125%		202-A	0%	0%	0%
	10	48%	38%	82%		205	0%	0%	0%
	12	67%	73%	318%		205M	42%	65%	169%
	14	87%	78%	139%		208-M	80%	0%	0%
	17	100%	91%	226%		3	177%	132%	175%
	21	790%	134%	204%		4	173%	207%	477%
	24	60%	169%	177%		5	82%	100%	234%
	58	80%	64%	0%		7	749%	734%	781%
AUTO TECHNOLOGY	AT-1	94%	124%	469%		9	207%	191%	227%
	AT-2	137%	156%	551%	LANGUAGE ARTS	107-B	105%	94%	293%
SCIENCE/ENGINEERING	12	39%	43%	77%		107-C	42%	41%	68%
	13	47%	62%	113%		115	33%	45%	139%
	18	84%	49%	88%		221	43%	42%	145%
	26	57%	131%	136%	AGRICULTURE	12	319%	108%	133%
	27	36%	46%	74%		13	56%	65%	74%
	30	98%	107%	177%	LIBRARY	147	0%	287%	0%
	31	59%	75%	193%		417	NA	1277%	NA
	37	50%	58%	74%		127	62%	98% Lecture	178%
	38	67%	95%	1032%		148	301%	56% Lecture	376%
	4	162%	112%	155%		217	719%	497% Lecture	647%
	42	88%	105%	156%	FINE ARTS	1	143%	243%	258%
	45	55%	103%	0%		10	69%	60%	134%
	46	515%	1585%	0%		20	153%	127%	146%
	7	33%	43%	120%		23	89%	79%	118%
	8	68%	56%	204%		28	54%	54%	88%
PERFORMING ARTS CENTER	107	72%	72%	612%		8	72%	88%	281%
	115	NA	59%	439%		9	39%	53%	344%
	115-A	NA	0%	0%					
	2	124%	147%	203%					
	8	60%	58%	171%					

Bakersfield College – Micro Room Level

Lab Rooms

Building	Room	Fall 2018 Lab Cap Load Ratio	Fall 2019 Lab Cap Load Ratio	Fall 2021 Lab Cap Load Ratio	Building	Room	Fall 2018 Lab Cap Load Ratio	Fall 2019 Lab Cap Load Ratio	Fall 2021 Lab Cap Load Ratio
BUSINESS	11	64%	75%	362%	DELANO CENTER				
	2	65%	70%	252%	SCIENCE / TECHNOLOGY	102	0%	184%	4443%
	5	66%	70%	225%		107	0%	102%	480%
	7	56%	76%	425%		114	0%	0%	0%
	8	57%	75%	132%		119	0%	137%	351%
FAMILY & CONSUMER ED	12	47%	51%	609%		126	0%	175%	608%
	20	25%	32%	440%	BUILDING 1000	1013	No Study	64%	301%
CENTER FOR STUDENT SUCCESS	206	36%	158%	426%	BUILDING 1100	1103	No Study	50%	180%
	3-A	28%	52%	356%					

Cerro Coso Community College – Micro Room Level

Lecture Rooms

Building	Room	Fall 2018 Lecture Cap Load Ratio	Fall 2019 Lecture Cap Load Ratio	Fall 2021 Lecture Cap Load Ratio
MAIN BUILDING	102	0%	512%	2724%
	104	0%	471%	1438%
	105	0%	572%	675%
EAST WING	203	395%	336%	803%
	204	199%	214%	0%
	205	173%	347%	0%
	206	329%	187%	1133%
	208	301%	236%	7292%

Lab Rooms

Building	Room	Fall 2018 Lab Cap Load Ratio	Fall 2019 Lab Cap Load Ratio	Fall 2021 Lab Cap Load Ratio
MAIN BUILDING	103	0%	0%	79%
	146	0%	358%	0%
	331	89%	177%	0%
	334	140%	92%	446%
WEST CLASSROOM WING	101	138%	150%	736%
	113	0%	0%	0%
	120	319%	424%	747%
	145	461%	0%	0%
	147	254%	0%	2453%
	192	241%	368%	581%
	198	0%	393%	465%
LEARNING RESOURCE CENTER	631	1029%	0%	635%
	709	115%	0%	702%

Porterville College – Micro Room Level

Lecture Rooms

Building	Room	Cap Load Ratio	Cap Load Ratio	Cap Load Ratio
ACADEMIC CENTER	AC-105	108%	103%	589%
	AC-106	107%	117%	569%
	AC-107	150%	176%	633%
	AC-117	83%	106%	546%
	AC-118	119%	120%	365%
	AC-119	122%	121%	242%
	AC-120	149%	176%	2827%
	TRADE AND INDUSTRY	TI-2	0%	0%
TI-3		135%	124%	1792%
CAREER TECHNOLOGY	CT-1301	101%	124%	391%
	CT-1303	98%	125%	1157%
	CT-1304	102%	196%	245%
	CT-1308	173%	149%	534%
SCIENCE MATHEMATICS	101-A	135%	129%	8792%
	101-B	107%	137%	1059%
	102	268%	234%	721%
	114	103%	113%	481%
	115	100%	98%	394%
	120	108%	86%	303%
	121	66%	64%	206%
	125	137%	161%	1758%
ALLIED HEALTH	2021	255%	236%	691%
	2031	767%	680%	871%
	2051	549%	353%	326%
	2061	238%	563%	3005%
LEARNING RESOURCE CENTER	512	164%	259%	439%

Lab Rooms

Building	Room	Cap Load Ratio	Cap Load Ratio	Cap Load Ratio
FINE ARTS	FA-1	83%	152%	124%
	FA-3	55%	48%	151%
	FA-4	418%	462%	798%
CAREER TECHNOLOGY	CT-1307	0%	0%	130%
SCIENCE MATHEMATICS	210	51%	51%	139%
	212	49%	56%	96%
	220	55%	67%	126%
	222	59%	60%	145%
LEARNING RESOURCE CENTER	513	131%	127%	252%
COMMUNICATION ARTS	CA-2	62%	56%	193%

Questions

