# The California Tech

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### BECHTEL REPORT CARD

Sakthi Vetrivel, Vivek Bharadwaj, & Margaret Thomas | Feature Story

It looks a bit like a prison, doesn't it?" undergraduate junior Lauren Li whispered as she looked up at the concrete facade of the newly constructed Bechtel Residence. She had been living in the residence since it opened its doors in September of 2018. As we walked in, Li tugged on one of the doors with construction tape draped over it. "Oh wait, not that one. That one doesn't work," she chuckled.

Settled on Del Mar Blvd, just west of Hill Avenue, the Bechtel Residence is the newest addition to student housing in over two decades. In stark contrast to the Mediterranean Revival feel of the rest of the Caltech campus, Bechtel looks more like an office building than a student dormitory.

The 95,000 square foot building, complete with a 400-person dining hall, multiple student suites, laundry rooms, study rooms, and community lounges, came to be through a generous pledge from the S.D. Bechtel, Jr. Foundation in the amount of \$25 million in 2012, spread over five years.

Since the donation funding the new dorm was announced, the Caltech community has been absorbed in a logistical whirlwind to determine exactly what to do with the cash and how to best supplement the existing, unique undergraduate housing system.

As Caltech's official statement proclaims, "The design process drew on the input from hundreds of students, faculty, and staff throughout the planning and design phase." But this design process was hardly a straight line from



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Undergraduate junior Lauren Li looked onto her new home for the next year.

Point A to Point B.

Spanning over six years, designs went from "a set of six distinct units of two to three stories in height, connected around a shared courtyard" to one building made up entirely of six-person suites with a central dining hall, to its final form today as a dorm of various sized suites, from singles to twelve-person suites.

During the planning stages for the Bechtel residence, Vice President for Student Affairs Joe Shepherd noted that the students have been leading the charge in thinking through all aspects of the new residence, from how it will relate to the existing house system, to who will live there, to what the dining experience will be. "We should be thinking about how we do that, how we make that change, in the most positive way possible."

Students have indeed been leading the charge. Six generations of student leaders have had input, and with the constant changing of the guard, student government has struggled to keep the facts straight and maintain a consistent viewpoint.

Catherine Jamshidi, the chair of the Interhouse Committee in 2015, recollected, "Yeah, the only stipulation was that the dorm had to be completely suite-style, but we still struggled to work within that." Associate Dean Leslie Nye, who has served at Caltech since 2011, shook her head, "It was actually past students that really pushed for suitestyle living. It wasn't pushed by administration or by the donors or anything." Sarah Crucilla, the current Interhouse Committee chair, looked at the blueprints and remarked, "It's like they just built a building and then said, 'Huh, who should we put there?"

With the lack of continuity in the students working on integrating Bechtel into the community, the planning process has generated a lot of frustration towards the administration due to the perceived lack of student input. Nye recalled, "There were so many meetings with student government leaders and the architects. Students were really actively shaping what this building would look like."

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#### MEN'S SOCCER SCORES FOUR UNANSWERED FOR FIRST WIN OF 2019

Mark Becker | Sports

PASADENA — Led by a pair of goals off the foot of freshman midfielder Sam Klauer (Knoxville, Tenn. / Christian Academy), the Caltech men's soccer team bagged its first win of the season over Providence Christian College on Saturday afternoon.

Klauer became the second Caltech player to notch a multi-goal game in 2019 after junior forward Rohan Mirchandani (Pleasanton, Calif. / Foothill) accomplished the feat earlier in the week. Both of the freshman's strikes ended up being insurance goals, as the Beavers hung four unanswered on the Sea Beggars after falling into a 1-0 hole to begin the game.

The men's soccer team overcame the early adversity thanks to the poise shown by its veteran players. Two minutes after the visitors got on the board, senior midfielder Theo Yang (Columbia, Md. / Long Reach) struck a beautiful free kick from about 30 yards out to knot the game at one goal apiece eight minutes in. Sophomore midfielder Samir Johnson (Portland, Ore. / Jesuit) scored his first goal of the season just 15 minutes later. The reigning SCIAC Newcomer of the Year finished a solid run up the middle initiated by some nice one-touch passing from Michigan-born defenders JD Walker (Grand Blanc, Mich. / Grand



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Blanc) and Josh Finnerty (Walled Lake, Mich. / Detroit Catholic Central).

Klauer's first goal came with just seven minutes to go in the first half. The freshman, who took all of the Beavers' corner kicks in Saturday's contest, successfully curled the ball in front of the opposing net but with no player on either team able to touch it, the ball rolled over the line to give the rookie his first career goal. Just two games into the season, Caltech has found a number of ways to score goals and can now claim direct braces on penalty kicks, free kicks and

corner kicks. Klauer finished his second goal on a similar run to Johnson's in the first half. The midfielder took off down the right side and delivered the Beavers' final goal of the game with 10 minutes to go in the second half. Both Mirchandani and Yang picked up assists on the finish.

After surrendering the early goal to the visiting team, the Caltech defense held strong over the game's final 83 minutes. Junior Gianfranco de Castro (Weston, Fla. / Cypress Bay) got the win between the pipes and made a trio of nice saves in his goalkeeping debut.

#### CELEBRATING THE 50<sup>TH</sup> CLASS OF WOMEN UNDERGRADUATES

SEBASTIAN BEDOYA | OPINION

When Caltech was first established as Throop University in 1891, women were free to attend, though the offerings of the institute differed significantly from what it became. This ended in the first decade of the 1900s, when Throop's president James Scherer, instrumental in the transition to the California Institute of Technology, revoked this right. Caltech then developed for years into a renowned institution with little female influence.

It wasn't until 1964 that a woman, Lorraine Fisher, earned a Ph.D at Caltech. Another 5 years passed before Jenijoy La Belle became the first female professor at Caltech, joining the English department in 1969. Shortly afterward, Olga Taussky-Todd, distinguished in the field of mathematics, became the first tenured professor in 1971. She was not offered this position when she became a research associate in 1957, but this is largely due to her husband becoming a professor and policy against providing professorships for married couples.

Around the same time, in 1970, the undergraduate population welcomed, as *The Tech* put it, "... that long awaited new addition: girls." Though it's shocking this was less than 50 years ago, many prestigious universities did not become co-ed until around the same time. Yale and Princeton had admitted women the year before, while Columbia didn't allow them until 1983. MIT, on the other hand, admitted its first woman undergraduate in 1870 and became officially co-ed in 1882. Not everyone could go to Caltech after all.

Today, we are seeing the beginnings of a Caltech shared by women. We are privileged enough to have Frances Arnold, who last year became the fifth woman to win the Nobel Prize in chemistry and the first female laureate among our faculty. Last year, women made up 45% of the undergraduate population, more than doubling 1990's 21%. Women graduate students have gone from making up 20% of the population in 1990 to 29% in 2018. It will take some time before the graduate and faculty demographics catch up, but with parity becoming prevalent across undergraduate populations, our future is looking ever more female.



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Adang		Avery	Ricketts	Lloyd	Fleming	Page	Dabney	Ruddock	Blacker
Afriyie Buabeng	Leo	Avery	Fleming	Ruddock	Lloyd	Ricketts	Dabney	Blacker	Page
Aguiar	Gabriel	Avery	Ricketts	Ruddock	Fleming	Blacker	Lloyd	Page	Dabney
Ahn	Cheong-Eung	Avery	Ruddock	Lloyd	Ricketts	Page	Fleming	Dabney	Blacker
Amaro	Eric		Page	Dabney	Ricketts	Lloyd	Ruddock	Fleming	Blacker
Anand Arellanes	Emile Sarah	Blacker Lloyd	Page	Avery	Ruddock	Fleming Blacker	Dabney	Fleming	Page Ricketts
Arvelo Ateyeh Avelar Menendez	Juan Abdullah Angel Rodrigo	Avery Avery Lloyd	Ricketts Blacker Fleming	Lloyd Ricketts Dabney	Page Page Blacker	Blacker Lloyd Page	Dabney Dabney Avery	Fleming Fleming Ruddock	Ruddock Ruddock Ricketts
Banciella Bi	Reid Daniel	Avery Avery	Lloyd Ricketts	Blacker Blacker	Page Ruddock	Dabney Lloyd	Fleming Fleming	Ruddock Ruddock Dabney	Ricketts Page
Blagden	Chase	Avery	Blacker	Lloyd	Dabney	Page	Ricketts	Fleming	Ruddock
Blanchette	Chase	Dabney	Blacker	Fleming	Page	Ruddock	Lloyd	Avery	Ricketts
Blank	Eve	Blacker	Fleming	Dabney	Ruddock	Lloyd	Ricketts	Page	Avery
Borkar	Mihir	Dabney	Lloyd	Ricketts	Fleming	Avery	Ruddock	Blacker	Page
Bowden	James	Page	Lloyd	Blacker	Fleming	Avery	Ricketts	Dabney	Ruddock
Bregar	Michael	Avery	Lloyd	Ricketts	Blacker	Page	Dabney	Fleming	Ruddock
Bricken	Maximus	Fleming	Ruddock	Page	Lloyd	Avery	Blacker	Ricketts	Dabney
Brown	Matticus	Page	Blacker	Fleming	Ruddock	Avery	Ricketts	Dabney	Lloyd
Caceres Caceres	Antonio Hernan	Avery Ruddock	Lloyd Fleming	Ricketts Page	Blacker	Page Avery	Fleming Blacker	Ruddock Dabney	Dabney Ricketts
Cachaldora Chakraborty Chan	Joseph Isha Sophie	Lloyd Page Avery	Avery Ricketts Ricketts	Ruddock Dabney Fleming	Ricketts Fleming Page	Blacker Ruddock Dabney	Fleming Blacker Ruddock	Page Lloyd Blacker	Avery Lloyd
Chang	Katherine	Page	Ricketts	Blacker	Ruddock	Avery	Lloyd	Fleming	Dabney
Chavez	Diego	Page	Blacker	Dabney	Ruddock	Ricketts	Lloyd	Fleming	Avery
Chea	Sandra	Avery	Lloyd	Dabney	Fleming	Ruddock	Page	Blacker	Ricketts
Chen	Cynthia	Lloyd	Blacker	Page	Ruddock	Fleming	Avery	Dabney	Ricketts
Chen	Hannah	Fleming	Ricketts	Page	Dabney	Blacker	Ruddock	Avery	Lloyd
Chen	Hannah	Page	Ricketts	Ruddock	Avery	Lloyd	Blacker	Fleming	Dabney
Chenanda	Reeya	Ricketts	Lloyd	Blacker	Avery	Fleming	Ruddock	Page	Dabney
Cho	Ellie	Avery	Fleming	Blacker	Dabney	Ricketts	Lloyd	Page	Ruddock
Choi	Chloe	Lloyd	Fleming	Avery	Blacker	Ricketts	Page	Ruddock	Dabney
Chotzen-Hartzell	Devin	Ruddock	Avery	Fleming	Lloyd	Page	Ricketts	Dabney	Blacker
Christensen	Jens	Fleming	Ruddock	Avery	Blacker	Page	Lloyd	Ricketts	Dabney
Chun	Kaulana	Blacker	Ricketts	Dabney	Fleming	Avery	Page	Lloyd	Ruddock
Chung Coimbra	Norman Kaila	Ruddock	Ricketts Page	Fleming Blacker	Page Ricketts	Dabney Fleming	Avery	Ruddock Lloyd	Dabney Dlasher
Colenbrander Collinson Contaldi	Tyler Daniel Daniel	Lloyd Blacker Avery	Avery Ricketts Ruddock	Ruddock Dabney Fleming	Avery Dabney	Fleming Page Blacker	Dabney Lloyd Ricketts	Page Fleming Lloyd	Blacker Ruddock Page
Contractor Corrales de Oliveira	Adnan Jonathon	Avery Avery Page	Ricketts Avery	Fleming Fleming Lloyd	Blacker Ruddock	Lloyd Fleming	Page Blacker	Ruddock Ricketts	Page Dabney Dabney
Costa Laveron Cua	Luis Miles	Ricketts Ruddock	Fleming Ricketts	Blacker Dabney	Lloyd Page	Page Avery	Ruddock Lloyd	Dabney Blacker	Avery Fleming
Curtis	Isaiah	Blacker	Fleming	Page	Avery	Lloyd	Dabney	Ricketts	Ruddock
Daigle	Robert	Ruddock	Avery	Blacker	Ricketts	Dabney	Fleming	Lloyd	Page
de la Fuente Campos	Jose	Ricketts	Avery	Page	Fleming	Dabney	Blacker	Lloyd	Ruddock
de la Torre Roehl	Isabel	Ricketts	Ruddock	Page	Avery	Dabney	Fleming	Lloyd	Blacker
de Mello	Lucca	Ricketts	Ruddock	Avery	Page	Lloyd	Fleming	Blacker	Dabney
DeBell	Lily	Ruddock	Avery	Lloyd	Ricketts	Fleming	Page	Blacker	Dabney
Dembski	William	Lloyd	Fleming	Dabney	Ruddock	Page	Ricketts	Avery	Blacker
DeVault	Audrey	Avery	Blacker	Lloyd	Ruddock	Ricketts	Fleming	Page	Dabney
Dicker Ding	Evan Rachel	Ruddock Blacker	Dabney	Fleming Ricketts	Avery	Lloyd Page	Dabney Ruddock	Ricketts Fleming	Blacker
Dituri Dubin Dzingeleski	Gabrielle Aaron David	Page Blacker Ruddock	Ruddock Dabney Blacker	Fleming Fleming	Blacker Ricketts Dabney	Avery	Avery Lloyd Ricketts	Ruddock	Page Lloyd
Elmengad Engelbrecht	Ismail Simone	Blacker Avery	Ruddock Fleming	Page Page Ruddock	Dabney Dabney Blacker	Fleming Avery Ricketts	Ricketts Lloyd	Avery Fleming Page	Lloyd Lloyd Dabney
Fabre	Gabriel	Dabney	Fleming Avery	Ruddock	Page	Lloyd	Avery	Blacker	Ricketts
Fan	Jackie	Dabney		Lloyd	Ruddock	Blacker	Page	Ricketts	Fleming
Fine	Eve	Ruddock	Blacker	Page	Fleming	Ricketts	Avery	Lloyd	Dabney
Finnerty	Joshua	Blacker	Page	Avery	Dabney	Ricketts	Ruddock	Fleming	Lloyd
Fisher	Hannah	Avery	Page	Ruddock	Fleming	Blacker	Dabney	Lloyd	Ricketts
Foo	Wei	Fleming	Ruddock	Ricketts	Lloyd	Blacker	Avery	Dabney	Page
Freedman-Susskind	Tea	Dabney	Page	Ricketts	Avery	Ruddock	Blacker	Lloyd	Fleming
Freeman	Bruno	Ricketts	Lloyd	Blacker	Page	Fleming	Avery	Ruddock	Dabney
Frias Franco	Diana	Avery	Dabney	Lloyd	Blacker	Ricketts	Page	Ruddock	Fleming
Gao	Anita	Lloyd	Dabney	Blacker	Fleming	Page	Avery	Ruddock	Ricketts
Garriques	Lauren	Avery	Dabney	Blacker	Lloyd	Ruddock	Ricketts	Page	Fleming
Gawlowicz	Amanda	Dabney	Ruddock	Avery	Blacker	Fleming	Ricketts	Page	
Gessesse	Mahider	Blacker	Lloyd	Fleming	Dabney	Avery Avery	Page	Avery	Ruddock
Glynn	Allison	Ruddock	Ricketts	Dabney	Lloyd		Page	Fleming	Blacker
Goldfinger	Shir	Blacker	Page	Lloyd	Ricketts		Dabney	Fleming	Ruddock
Gomez Gonzales-Rogers	Annabel Aanica	Ruddock Page	Page Lloyd	Ricketts Fleming	Avery Avery	Dabney Dabney	Lloyd Ruddock	Blacker Blacker	Fleming Ricketts
Gonzalez	Michael	Blacker	Dabney	Avery	Ricketts	Fleming	Lloyd	Ruddock	Page
Gorokhovsky	Elia	Ruddock	Page	Dabney	Lloyd	Fleming	Blacker	Ricketts	Avery
Gottlieb	Kevin	Lloyd	Page	Ruddock	Dabney	Fleming	Blacker	Ricketts	Avery
Gowrishankar	Akshay	Lloyd	Ricketts	Dabney	Ruddock	Page	Blacker	Avery	Fleming
Grauer	Hannah	Page	Avery	Fleming	Ricketts	Ruddock	Blacker	Dabney	Lloyd
Griffith	Leah	Avery	Fleming	Ruddock	Page	Blacker	Dabney	Ricketts	Lloyd
Grossmark	Tomas	Blacker	Ricketts	Dabney	Ruddock	Fleming	Avery	Page	Lloyd
Gundakaram	Rishi	Page	Lloyd	Ricketts	Fleming	Blacker	Avery	Ruddock	Dabney
Gungoren Guo	Bilge Amy	Fleming	Lloyd Dabney	Page Page	Dabney Avery	Blacker	Avery Ruddock	Ruddock Ricketts	Ricketts
Hajjar Haraszti Haves	Matthew Alexandra	Fleming Ruddock Ruddock	Page Dabney	Avery Dabney	Lloyd Blacker	Avery Lloyd Fleming	Ricketts Ricketts	Dabney Fleming	Page Lloyd
Hayes Heegaard Heletz	Logan August Moshe	Blacker Ruddock	Blacker Fleming Dabney	Avery Page	Ricketts Ricketts Blacker	Fleming Ruddock Fleming	Avery Lloyd Lloyd	Page Dabney Avery	Lloyd Page Ricketts
Herrera	Melchor	Page	Ruddock	Ricketts	Fleming	Blacker	Dabney	Avery	Lloyd
Hetherington	Valerie	Blacker	Lloyd	Avery	Page	Ricketts	Dabney	Ruddock	Fleming
Hiremath	Sujai	Ruddock	Dabney	Fleming	Avery	Blacker	Lloyd	Page	Ricketts
Holmes	Martin	Ruddock	Page	Dabney	Avery	Ricketts	Lloyd	Fleming	Blacker
Hong	Alexandria	Dabney	Ruddock	Blacker	Avery	Fleming	Page	Ricketts	Lloyd
Hou	David	Blacker	Avery	Lloyd	Fleming	Page	Ricketts	Ruddock	Dabney
Hritz	Jennifer	Ruddock	Lloyd	Dabney	Blacker	Avery	Page	Fleming	Ricketts
Huang	Victor	Page	Avery	Lloyd	Ruddock	Fleming	Ricketts	Dabney	Blacker
Huang Hummel	Wesley Alexandra	Ruddock Blacker	Dabney Lloyd	Page Puddock	Ricketts Fleming	Blacker Ricketts	Fleming Avery	Page Ruddock	Lloyd Dabney
Hurvitz	Isabella Justin Maxximo	Lloyd	Avery	Ruddock	Dabney	Ricketts	Blacker	Page	Fleming
Hyon		Blacker	Fleming	Lloyd	Ricketts	Ruddock	Avery	Dabney	Page
Ibarra		Ricketts	Blacker	Ruddock	Page	Fleming	Lloyd	Dabney	Avery
Imathiu-Jones Ivens	Erik David	Avery Ricketts	Page Fleming	Fleming Avery	Dabney Page	Lloyd Dabney	Ricketts Lloyd	Blacker Blacker	Ruddock Ruddock
Jenkins Ji	Owen Jenny	Ruddock Page	Fleming Fleming Avery	Page Lloyd	Dabney Ricketts	Blacker Ruddock	Avery Dabney	Ricketts Blacker	Lloyd Fleming
Jiang	Abigail	Dabney	Avery	Fleming	Lloyd	Page	Ricketts	Blacker	Ruddock
Jimenez Berumen	Erick	Dabney	Page	Ricketts	Avery	Lloyd	Fleming	Blacker	Ruddock
Johnston	Colton	Lloyd	Dabney	Blacker	Ruddock	Page	Fleming	Ricketts	Avery
Jrade	Ely	Blacker	Avery	Lloyd	Fleming	Ricketts	Ruddock	Dabney	Page
Juarez	Benjamin	Ricketts	Page	Blacker	Avery	Lloyd	Ruddock	Fleming	Dabney
Junker	Calle	Lloyd	Blacker	Ruddock	Ricketts	Fleming	Avery	Dabney	Page
Kang	Elin	Fleming	Page	Ricketts	Avery	Lloyd	Dabney	Blacker	Ruddock
Kangaslahti	Sara	Avery	Page	Ruddock	Lloyd	Fleming	Dabney	Blacker	Ricketts
Kantipudi	Rohit	Avery	Fleming	Lloyd	Page	Ruddock	Blacker	Dabney	Ricketts
Kauber	Catherine		Page	Ricketts	Blacker	Avery	Dabney	Lloyd	Ruddock
Kim Kim	Jiwoo John Sam	Ricketts Ruddock	Page Lloyd	Lloyd Avery	Blacker Fleming	Page Dabney	Fleming Blacker	Ruddock Ricketts	Avery Dabney
Klauer Koh Kong	Jin Ming David	Avery Fleming Ricketts	Ricketts Blacker Avery	Avery Page	Page Page Ruddock	Dabney Lloyd Dabney	Lloyd Dabney Blacker	Ruddock Ricketts Lloyd	Fleming Ruddock Fleming
Kong	Juliette	Page	Avery Ricketts	Page Fleming	Dabney	Blacker	Avery	Ruddock	Lloyd
Koval Krzak	Jan	Ricketts	Avery	Lloyd	Blacker	Dabney	Page	Fleming	Ruddock

Last name	First name	DINNER A	DINNER B	DINNER C	DINNER D	Linner E	DINNER F	DINNER G	DINNER H
LaFayette	Charlotte	Lloyd	Page	Blacker	Ruddock	Dabney	Ricketts	Avery	Fleming
Lai	Alexandra	Ruddock	Page	Blacker	Lloyd	Dabney	Avery	Ricketts	Fleming
Lam	Bill	Lloyd	Page	Blacker	Fleming	Ruddock	Ricketts	Dabney	Avery
Lapteva	Anna	Ruddock	Blacker	Page	Lloyd	Avery	Fleming	Ricketts	Dabney
Lee	Joshua	Ruddock	Avery	Lloyd	Ricketts	Page	Dabney	Fleming	Blacker
Lee	Katelyn	Avery	Blacker	Dabney	Ricketts	Lloyd	Page	Ruddock	Fleming
Lee	Iris	Blacker	Ruddock	Page	Ricketts	Lloyd	Fleming	Dabney	Avery
Lewis	Laura	Fleming	Dabney	Blacker	Lloyd	Ruddock	Ricketts	Page	Avery
Li	Anna	Avery	Fleming	Dabney	Page	Lloyd	Ricketts	Ruddock	Blacker
Li	Shenyi	Ricketts	Dabney	Blacker	Fleming	Avery	Ruddock	Page	Lloyd
Liu	Shoonhsin Grace	Ruddock Dabney	Page	Avery	Ruddock	Blacker Blacker	Fleming	Page Ricketts	Fleming Lloyd
Liu Lopez Lu	Tony Nathan	Fleming Page	Ruddock Dabney Ricketts	Page Fleming Dabney	Lloyd Avery Ruddock	Dabney Blacker Lloyd	Avery Ruddock	Ricketts Lloyd Blacker	Ricketts
Lujambio Lushtak	Julen Samuel	Fleming Blacker Lloyd	Avery Avery	Ricketts Ricketts	Dabney Dabney	Lloyd Fleming	Avery Ruddock Ruddock	Page Blacker	Page Fleming Page
Ma	Andrew	Fleming	Blacker	Lloyd	Ricketts	Dabney	Page	Ruddock	Avery
Madisetti	Sonali	Fleming	Avery	Dabney	Page	Lloyd	Blacker	Ruddock	Ricketts
Martinez	Joseph	Page	Ricketts	Dabney	Ruddock	Avery	Blacker	Fleming	Lloyd
Martinez	Patrick	Ricketts	Dabney	Avery	Blacker	Lloyd	Fleming	Ruddock	Page
Mayavaram	Amrita	Dabney	Avery	Fleming	Page	Ruddock	Ricketts	Blacker	Lloyd
McAlister	Nathan	Avery	Blacker	Ricketts	Page	Ruddock	Dabney	Fleming	Lloyd
McCabe	Gavin	Blacker	Fleming	Page	Dabney	Ruddock	Ricketts	Lloyd	Avery
McDonald	Robin	Lloyd	Blacker	Ricketts	Dabney	Avery	Ruddock	Fleming	Page
McFroshface McGraw	Froshy Kyle	Avery Blacker	Blacker Lloyd	Dabney Ruddock	Fleming	Lloyd Dabney	Avery	Ricketts Page	Ruddock Ricketts
McNichols Mehta Melisso	Tyrone Krish David	Lloyd Ricketts Ruddock	Fleming Page Fleming	Dabney Fleming Dabney	Ruddock Ruddock Page	Page Dabney Lloyd	Ricketts Blacker	Blacker Avery Ricketts	Avery Lloyd Blacker
Mesic Mevada	Esmir Arya	Lloyd Fleming	Page Lloyd	Blacker Ricketts	Fleming Page	Ricketts Avery	Avery Avery Ruddock	Ruddock Dabney	Dabney Blacker
Misra	Mohini	Ricketts	Ruddock	Dabney	Avery	Fleming	Blacker	Page	Lloyd
Mohan	Prashanth	Page	Lloyd	Dabney		Ruddock	Blacker	Ricketts	Fleming
Moran	Noah	Avery	Blacker	Ricketts Ricketts	Fleming	Ruddock	Dabney	Lloyd	Page
Mostafa	Basel	Blacker	Page		Avery	Ruddock	Lloyd	Dabney	Fleming
Muller	Veronica	Dabney	Ruddock	Ricketts	Fleming	Avery	Lloyd	Blacker	Page
Nee	Daniel	Avery	Ricketts	Dabney	Blacker	Ruddock	Lloyd	Page	Fleming
Nguyen	Tyler	Dabney	Avery	Ruddock	Page	Ricketts	Blacker	Fleming	Lloyd
Nielsen	Rasmus	Dabney	Avery	Lloyd	Blacker	Ruddock	Ricketts	Fleming	Page
Obernolte Oh	Sang Hyun	Avery	Lloyd	Ricketts Blacker	Ricketts	Page	Fleming	Page Dabney	Ruddock
O'Neill Ooi Pagon	Sandra Xin Hui Chase	Dabney Ruddock Fleming	Avery Lloyd Avery	Blacker Ricketts Ricketts	Avery Lloyd	Lloyd Fleming Dabney	Fleming Blacker Ruddock	Ruddock Dabney Page	Page Page Blacker
Palumbo Pan	Elsa	Blacker	Avery	Ruddock	Page	Dabney	Fleming	Ricketts	Lloyd
	Katherine	Lloyd	Fleming	Page	Avery	Blacker	Dabney	Ricketts	Ruddock
Park	Eunice	Ricketts Dabney	Blacker	Ruddock	Avery	Page	Dabney	Lloyd	Fleming
Park	Joon		Ricketts	Ruddock	Blacker	Lloyd	Avery	Fleming	Page
Parker	John	Lloyd	Ruddock	Ricketts	Fleming	Page	Avery	Blacker	Dabney
Patro	Jolly	Fleming	Blacker	Ruddock	Lloyd	Dabney	Avery	Ricketts	Page
Paul	Elijah	Ricketts	Ruddock	Avery	Dabney	Page	Lloyd	Blacker	Fleming
Paulino	Malik	Ricketts	Page	Avery	Fleming	Dabney	Blacker	Ruddock	Lloyd
Pawlak	Joshua	Fleming	Dabney	Ricketts	Page	Ruddock	Blacker	Lloyd	Avery
Pearson	Winter		Fleming	Dabney	Ruddock	Avery	Blacker	Ricketts	Page
Pericco	Marcos Martin	Page	Avery Fleming	Avery	Dabney Blacker	Dabney	Ruddock Ruddock	Lloyd	Ricketts
Pham Pierson Pinney	Jack Faith	Dabney Dabney Ruddock	Page Page Ricketts	Fleming Ricketts Lloyd	Avery Fleming Blacker	Ricketts Lloyd Page	Blacker Ruddock Dabney	Ruddock Blacker Avery	Lloyd Avery Fleming
Piper	Kyle	Dabney	Ricketts Dabney	Avery	Blacker	Ruddock	Page	Lloyd	Fleming
Piyapanee	Amanda	Ruddock		Ricketts	Page	Lloyd	Fleming	Blacker	Avery
Pomraning	Geoffrey	Lloyd	Dabney	Avery	Ricketts	Blacker	Page	Fleming	Ruddock
Popova	Anastasia	Blacker	Ruddock	Ricketts	Page	Dabney	Avery	Fleming	Lloyd
Preuss	Anna	Dabney	Ruddock	Avery	Ricketts	Blacker	Lloyd	Fleming	Page
Quintana	Daniel	Page	Blacker	Ruddock	Dabney	Ricketts	Fleming	Lloyd	Avery
Rajagopalan	Kavya	Fleming	Lloyd	Page	Ricketts	Ruddock	Dabney	Blacker	Avery
Rapaport	Eitan	Page	Lloyd	Avery	Ruddock	Blacker	Dabney	Ricketts	Fleming
Rhodes Richter	Pippa	Dabney	Ricketts	Page Blacker	Avery	Ruddock	Ruddock Fleming	Page Page	Blacker Lloyd
Rodriguez Rojko Ronis	Makena Tony Joshua	Avery Blacker Avery	Lloyd Dabney Page	Dabney Ruddock Ricketts	Avery Lloyd	Fleming Lloyd Blacker	Ricketts Dabney	Ruddock Fleming Ruddock	Page Page Fleming
Rose	Michael	Fleming	Dabney	Ricketts	Avery	Page	Ruddock	Lloyd	Blacker
Rosenberg	Reuben	Blacker	Lloyd	Avery	Ruddock	Dabney	Ricketts	Page	Fleming
Rossi	Iyla	Page	Blacker	Ruddock	Lloyd	Ricketts	Dabney	Fleming	Avery
Rubi	Nicolas	Lloyd	Page	Blacker	Fleming	Ricketts	Dabney	Avery	Ruddock
Ryde	Thomas	Fleming	Ricketts	Lloyd	Ruddock	Dabney	Blacker	Page	Avery
Saikumar	Sahana	Lloyd	Ruddock	Dabney	Page	Fleming	Avery	Blacker	Ricketts
Schul	Louise	Lloyd	Ruddock	Avery	Ricketts	Blacker	Page	Dabney	Fleming
Seetharaman	Aditi	Ricketts	Lloyd	Ruddock	Dabney	Fleming	Avery	Blacker	Page
Sevilla	Jason	Dabney	Blacker	Page	Lloyd	Avery	Ruddock	Ricketts	Page Page
Shaikewitz	Lorenzo	Ricketts	Blacker	Ruddock	Fleming	Dabney	Lloyd	Avery	
Siavelis Smith Sneppen	Helen Isaac Albert	Lloyd	Blacker Dabney Ruddock	Dabney Blacker Fleming	Avery Ricketts Dabney	Page Fleming Ricketts	Ruddock Page Page	Fleming Ruddock Lloyd	Avery Blacker
Solovyeva Soro	Nina Johnathon	Avery Ricketts Page	Dabney Blacker	Fleming Fleming Dabney	Ruddock Ruddock	Blacker	Page Fleming	Lloyd Avery	Avery Ricketts
Springer	Emily	Blacker	Page	Ruddock	Fleming	Avery	Ricketts	Dabney	Lloyd
Sreeram	Shiva	Ricketts	Lloyd	Ruddock	Dabney	Blacker	Fleming	Page	Avery
Stavrinides	Pavlos	Page	Avery	Ruddock	Lloyd	Blacker	Fleming	Ricketts	Dabney
Stevens	Aubrey	Fleming	Ruddock	Blacker	Lloyd	Page	Ricketts	Dabney	Avery
Stoyanova	Kristina	Page	Dabney	Fleming	Lloyd	Ricketts	Blacker	Avery	Ruddock
Stromberger	Christian	Lloyd	Avery	Fleming	Page	Dabney	Ricketts	Blacker	Ruddock
Sui	Margaret	Dabney	Ricketts	Fleming	Avery	Lloyd	Page Page	Page	Ruddock
Swann	Aiden	Dabney	Ruddock	Lloyd	Blacker	Fleming		Avery	Ricketts
Swint Taylor Taylor	Madeleine Dallas Kaden	Ruddock Blacker Lloyd	Pleming Dabney	Lloyd Ricketts Fleming	Blacker Lloyd	Page Ricketts	Page Ruddock Blacker	Avery Avery Dabney	Ricketts Fleming Ruddock
Teng Thai	Felianne Kenny	Page Dabney	Avery Fleming Fleming	Ruddock Lloyd	Page Blacker Ricketts	Ricketts Ruddock	Lloyd Page	Avery Avery	Dabney Blacker
Toyota	Justin	Dabney	Lloyd	Ruddock	Blacker	Page	Fleming	Avery	Ricketts
Tran	An	Lloyd	Page	Fleming	Dabney	Avery	Ruddock	Ricketts	Blacker
Tycko	Arielle	Fleming	Ruddock	Blacker	Dabney	Avery	Lloyd	Ricketts	Page
Vale	Maxwell	Fleming	Blacker	Page	Avery	Ricketts	Ruddock	Lloyd	Dabney
Valverde	Michael	Page	Fleming	Lloyd	Ruddock	Dabney	Ricketts	Avery	Blacker
Vazsonyi	Leah	Dabney	Ruddock	Fleming	Avery	Lloyd	Blacker	Page	Ricketts
Venkatesh	Aditi	Fleming	Lloyd	Blacker	Ruddock	Ricketts	Page	Avery	Page
Vo	Amy-Doan	Fleming	Ricketts	Ruddock	Lloyd	Avery		Dabney	Blacker
Wang Wang Wang	Jackie Richard Zhuovan	Page Ricketts	Ruddock Dabney	Page	Ruddock Dabney	Fleming Blacker Ruddock	Dabney Fleming	Avery Ricketts	Ricketts Lloyd
Wang Warren Way	Zhuoyan Jack Alexander	Blacker Ricketts Ruddock	Dabney Ruddock Fleming	Page Fleming Page	Lloyd Lloyd Blacker	Avery Lloyd	Fleming Page Avery	Ricketts Dabney Dabney	Avery Blacker Ricketts
Whitworth	Amelia	Ricketts Page	Blacker	Lloyd	Dabney	Page	Avery	Ruddock	Fleming
Wong	Yu Fung		Ruddock	Avery	Dabney	Ricketts	Fleming	Lloyd	Blacker
Woodward	James	Ricketts	Dabney Dabney	Page	Fleming	Ruddock	Lloyd	Avery	Blacker
Wu	Sulan	Ricketts		Avery	Lloyd	Ruddock	Page	Blacker	Fleming
Wythes	George	Dabney	Blacker	Avery	Ruddock	Ricketts	Lloyd	Page	Fleming
Xanthos	Kyriacos	Fleming	Blacker	Page	Ricketts	Ruddock	Lloyd	Dabney	Avery
Xiang	Travis	Fleming	Dabney	Lloyd	Page	Ricketts	Blacker	Ruddock	Avery
Xiang	Iris	Ricketts	Page	Fleming	Lloyd	Dabney	Ruddock	Blacker	
Yang Yee	Alice Steven	Ruddock Page	Dabney Blacker	Fleming Lloyd	Ricketts Fleming	Avery	Page Ruddock	Ricketts	Dabney Dasa
Zalla Zapata-Sanin Zhang	Benjamin Christian Eilleen	Ricketts  Ricketts  Dabney	Dabney Fleming Lloyd	Page Fleming	Fleming Lloyd Blacker	Avery Blacker Ruddock	Ruddock Dabney Page	Avery Avery	Page Ruddock Ricketts
Zhang Zhang Zheng	Josephine Emily	Page Dabney	Ruddock Fleming	Avery Avery	Lloyd Blacker	Dabney Page	Fleming Ruddock	Ricketts Lloyd	Blacker Ricketts
Zou	Nathan	Ricketts	Fleming	Lloyd	Ruddock	Avery	Page	Dabney	Blacker

#### ROTATION RULES AND FREEDOM OF SPEECH

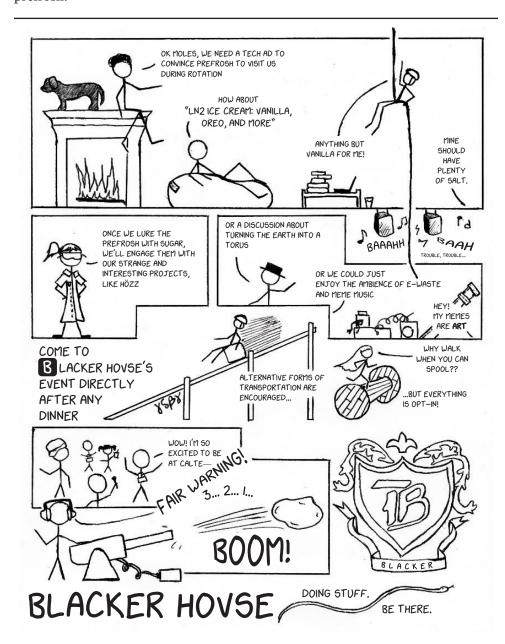
Albert Nazeeri | Editorial

The past few years have seen large changes to the rotation rules. What was originally "The Four Laws of Rotation" was reduced last year to just three, and this year the coup de grâce was administered with rotation now being governed by an unnumbered amount of "Guidelines." In the past, these laws of rotation banned upperclassmen from discussing "stereotypes or rumors of any House except their own" and students were ordered to "consult an IHC member before speaking about a House of which they are not a member." Similarly, prefrosh were told they "should not discuss house stereotypes or rumors." The past rules, unlike the toothless guidelines, were accompanied with a list of concrete consequences: loss of House picks, temporary PNG status, or, my favorite, "any other punishment handed down by the IHC."

The current guidelines, unlike the previous rules, states that "upperclassmen may speak freely" when it concerns the Caltech House system. This generosity on the part of the IHC when it comes to our speech points to a strange situation: when did you need permission from some committee on what you could or could not say? Even though Caltech is a private institution, you are still explicitly granted your First Amendment rights through California's Leonard Law. The idea that some group of students could even think they have the power, one not even given to our Congress, to regulate the speech on this campus should seem ridiculous if not, frankly, revolting. It should be mentioned that the motivation for changing the "Rules" to "Guidelines" was the realization by the IHC that the rules most likely conflicted with the law.

It was argued in the past that these rules were necessary to ensure that no unfair advantage was taken of any member of the Caltech community. Of course, nobody wants a prefrosh to feel uncomfortable in their new house/residence, but somebody else's potential discomfort is insufficient a reason to suspend free speech on campus. In my opinion, the most egregious overreach of the rotation rules happened last year: the rules were extended to the then uninhabited Bechtel Residence. This choice by the IHC meant that all the divergent opinions at town halls, critiques on its hideous grey façade and complaints on the process used to decide aspects of the building were suppressed as to "ensure [Bechtel] is accurately represented by fact."

Now that this campus has found itself unshackled from these rules, what are we to do with this newfound freedom? As upperclassmen we must open carry our opinions on our house, the other residences and Caltech in general and furnish them readily to the wide eyed prefrosh. We must encourage the prefrosh to seek out a wide variety of opinions before they make their housing choices and we must trust that they, future scientists and engineers, can separate the wheat from the chaff. The solution to the potential slandering of a house by an upperclassman isn't repression, rather it is the facilitation of conversation and inquiry on the part of the prefrosh.



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#### CALTECH STUNS WHITTIER IN SCIAC *VOLLEYBALL OPENER*

Mark Becker | Sports

Pasadena — A team performance for the ages earned the Caltech women's volleyball team a 3-1 victory in its 2019 SCIAC opener against Whittier College for the second conference win in the history of the program.

As scholars and scholar-athletes began to make their way back to campus for the fall semester, the Beavers came to life in front of a lively crowd and jumped on the visiting Poets with a 7-2 opening run. After the visitors clawed their way back, Caltech's veteran players took the initiative. The Beavers ended the first set with a pair of kills from junior Krystyna Maruszko (Redondo Beach, Calif. / Marymount) and senior Lauren Li (Bellaire, Texas / Bellaire) to give the home team the early edge.

"The fact that we started so strong makes me optimistic moving forward,' Head Coach Tom Gardner said. "Our team was very well prepared and played well together from the jump.'

The Beavers replicated their first set success in the second frame, this time jumping out to a 7-1 run to put the pressure on the Poets. While the visitors once again worked their way back into the set late, Caltech managed to assume late control thanks to a few key points. Li painted the line with an athletic kill to give her side a 23-21 advantage and freshman Dallas Taylor (Phoenix, Ariz. / Saguaro) eventually closed things out with a powerful kill to give the Beavers a commanding 2-0 lead heading into the third frame. While the Beavers slipped with a lackluster third set, their experience would later shine through with the victory still in reach at the start of the fourth. This time, the Beavers and Poets traded blows up until Caltech forced a Whittier timeout at 18-all with high stakes well in reach for both teams.

"The message was to really just keep playing the way we're capable of while setting the pace early in points," Gardner said. "We weren't too worried about specific situations and did all the things we needed to do to execute, whether it was a good pass or dig before transitioning into some offense."

Caltech took a patient approach to the final 10 points of the match, taking what the opposition afforded them while winning some of the longest rallies of the contest. The Beavers' final three points came from Whittier errors with Li, along with freshman Charley Lafayette (Toronto, Ontario, Can. / Branksome Hall) putting a stamp on the win with an assisted block on match point. Li finished the night with 11 kills and three assisted blocks while Lafayette gave the Poets fits with six assisted blocks of her own. Caltech's proficiency in the middle block has quickly become a strength of this year's team, as evident in the Beavers outpacing the Poets 3:1 in total blocks.

Ultimately, the Beavers managed to keep their cool when it mattered most and showed themselves to be a product of their trials over the past two years since winning their last SCIAC game.

"In volleyball, the first point and the last point are the same," Gardner said. "You don't need to put additional pressure on yourselves to score a point at 24 any more than you do at one. It comes down to each player doing their job in a given situation and executing like we know they're capable of."

Maruszko had a standout performance of her own and stuffed the stat sheet with 32 assists, 12 digs and six kills. Taylor finished the match hitting .353 as the team's most efficient offensive player and sophomore libero Megan Wang (Henderson, Nev. / Advanced Technologies Academy) added 29 digs to her team-leading total of 151 through nine games. Meanwhile, Maruszko upped her assist count to 277 and is already 70 away from fifth on the single-season list.



## The California Tech

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#### BECHTEL REPORT CARD

From Page 1

Caltech's website assures its visitors, "Bechtel was intentionally designed to provide the community with the greatest flexibility in maximizing space and determining its use." But student leaders like Varun Shanker, an undergraduate sophomore and the current undergraduate student body president, take issue "If the goal was to provide the greatest flexibility, maybe there wouldn't be such strict regulations on the exact number of freshman that live there, or some ability for returning students to rank their house preferences to be assigned for the next year. The current housing procedure forces students to choose Bechtel if they have any doubt that they will not be able to secure a spot in another residence. Otherwise, there's the possibility of having nowhere to live." Shanker lamented, "The new rules are written to favor Bechtel, even if students would rather live elsewhere."

Another Bechtel resident, Vincent Park, shared his frustrations over using the space. "Sure, there's a lot of meeting spaces in the building, but no one uses them, since every suite has such a spacious lounge. But also because it's incredibly hard to get permission to use the dining hall or the kitchens to hold any sort of event."

Every new building has its own special set of problems, and Bechtel has been far from immune to these challenges. After opening, residents registered a number of complaints. The building suffered from a lack of hot water for an extended period. There was no heat in certain areas of the building. The windows are too high and inaccessible, rendering them very difficult to clean. The showers were built featuring black surfaces that retain unsightly residue from water deposits. And the walls were painted such that a casual cleaning will strip a few layers of paint.

In fact, the original plan was to hold students responsible for the cleaning of the residence-something not expected of students in any other undergraduate residence at Caltech, but due to how easily damageable every surface seems to be in Bechtel, cleaning crews quickly became a part of the ecosystem.

The exterior of the building has posed a unique set of challenges as well. A plumbing issue required the excavation of a large hole on the west side of the residence. A portion of the sidewalk was closed for an extended period while staff explored solutions. In anonymous posts online, students expressed frus-



Various iterations of the floorplans for Bechtel from 2015, ranging from six separate buildings modeled after the Houses to one large dorm with a dining hall in the corner.

tration with the lack of identification card readers for any entrance except the south door, limiting the building's number of entry points to one. In the face of security issues caused by students propping open entrances without card readers, building administrators relented by agreeing to install card readers at either the east or west doors of the building.

A student who watched the building in all of its construction phases stated they saw the landscape going in, and then portions removed and relocated as the area was overcrowded. Trees that were installed too close to the building had to be moved further away to prevent future damage from the roots invading the structure. And for some reason, all of the gravel around the trees were epoxied into place.

The opening of the Bechtel residence has caused dramatic changes in Institute housing policies. With two hundred and eleven more beds on campus, Caltech was able to house more undergraduates than ever before. Whereas only freshmen were required to live on campus prior to Bechtel's opening, Caltech's residency requirement now mandates that freshmen and sophomores live on campus during their first two years. The current policy is a revised version of an earlier four-year residency requirement introduced just before the opening of the Bechtel residence, which administrators walked back after students pro-

The changes have extended to Rotation, the campus process for assigning new undergraduate students a House affiliation and living quarters during their first year. Diego Olaya, a member of Ruddock and one of the first cohort of undergraduate freshmen to live in the new residence, expressed satisfaction with the focused environment that Bechtel provided, as well as the chance to interact with the two faculty in residence, an opportunity not shared by any of the remaining student Houses besides Avery.

"It's quiet here. There's always things that can be improved; but I would like to live here all four years, if I could," Olaya said.

But even for satisfied Bechtel residents, changes to the housing lottery induced by Bechtel's introduction have ensured a final cruel twist: many of them have lost the ability to live in the residence next year due to the convoluted lottery system, and in contrast to the other student houses, the residence offers no storage space for residents over the summer.

"It's really difficult to have to move your items [to one of the student houses] to store over the summer," says Olaya.

"I definitely know friends who got screwed over [by the housing lottery]," he said. As he spoke, two other undergraduate freshmen walked into the lounge of his suite and expressed frustration with the housing lottery that prevented them from continuing to live in Bechtel; they declined to comment for the story.

Despite the hiccups in the building's rollout, Olaya still believed that the future of the Bechtel residence is bright. "Bechtel will improve. It's the first year of opening, so it's understandable that the committees [and representative groups for students] were not there at the beginning. I'm confident that these administrative bumps will eventually get sorted out."



Bechtel's concrete facade as seen from Moore Walk.

Caltech Facilities



	KOIAII	OIN EV	KOIAIION EVENIS SCHEDOLE
DATE	TIME	House	Event
Every Day	Every Day After Dinner	Blacker	Do Try This at Home
Every Day	Every Day After Dinner	Dabney	Dabney Event Initiative
Thursday	10:30pm-12:30am	Page	Chill @ Page
Friday	10:00pm-2:00am	Ricketts	Open Mic Night
Saturday	8:00pm-10:00pm	Avery	Avery Tea Bar
Saturday	10:30pm-12:30am	Fleming	Dirty Dodgeball
Saturday	11:59pm-2:00am	Lloyd	Capture the Flag and Milkshakes
Sunday	8:00pm-10:00pm	Ruddock	Ruddock Café Ruddock

ZLE: SUDOKU WEBSUDOKU.COM   EASY				3	1				
SUD		4				6			2
PUZZLE: SUDOKU WEBSUDOKU.COM   EASY		6					7	9	
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			4		5		6		
			3	2					1
		5	8					1	
	7			9				5	
					2	1			