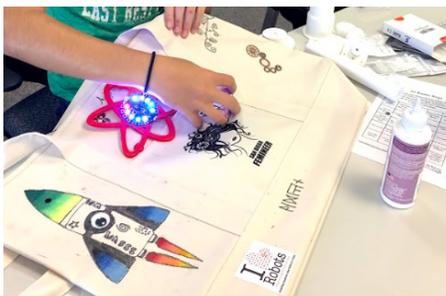


## SDSU College of Engineering Girls Tech Camp Summer 2018

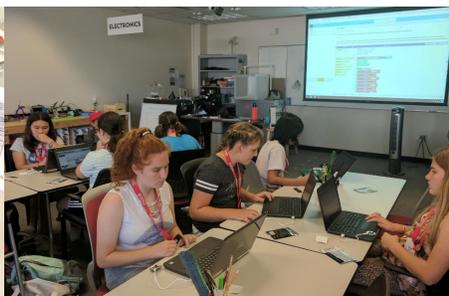


One of the groups of middle school girls with their wearable tech final projects.

The **SDSU College of Engineering Femeiner® Program**, in partnership with the **SDSU buildIT Lab**, hosted three two-day camps this summer where 40 middle school and high school girls learned about and used various innovative technologies and gained experience programming their own Adafruit Playground circuit boards. For a majority of the girls in attendance, this was their first time visiting a college campus and they had little to no experience in programming or Computer Science. The Girls Tech Camp instructors Jenny Wong-Welch (Director of the buildIT makerspace) and Megan Lacy (School Programs Manager of the SDSU College of Engineering Femeiner® Program) led the students through basic coding activities where they explored the different capabilities of the Adafruit Playground circuit boards. Additionally, Daisey Lynch, an incoming SDSU Mechanical Engineering freshman and Femeiner® alumna from Ramona High School, aided the class as an intern and offered her experience as a young woman pursuing a STEM degree. As a final camp project, each of the girls created a wearable tech bag and customized it with their individual code using what they had learned during the camp activities. Their individual codes were then loaded onto their circuit boards, which could be attached to their Femeiner® tote bags or worn as a button with a 3D printed case. Students were able to program their circuit board to display customized LED light colors and patterns in addition to music tones they selected or strung together to create short songs. At the end of each camp, the girls were able to take home their customizable LED name badge, their Adafruit Playground circuit board, a SDSU Femeiner® totebag full of women in STEM promotional items and additional resources on how to become more involved in Engineering and Computer Science. This annual camp series provides an opportunity for young girls to explore their passion for STEM in a like-minded and safe environment and establishes SDSU as a supportive STEM resource within our local San Diego community.



The girls also explored 3D scanning, 3D printing, and virtual reality technology.



The girls troubleshooting and customizing code for their Adafruit circuit boards.



3D printed figurine made from a 3D scan of a Girls Tech Camp participant.