

[SB Nation](#)

- [Login](#)
- [Sign Up](#)



SB NATION
BRUINS NATION

Bruins Nation, a UCLA Bruins community

- [Home](#)
- [Fanposts](#)
- [Fanshots](#)
- [Sections](#)
 - [UCLA Football](#)
 - [UCLA Athletics](#)
 - [UCLA Basketball](#)
 - [UCLA Recruiting](#)
 - [Full Archive](#)
- Library
 - [BN 3.0 User Guide](#)
 - [Bruinsphere](#)
 - [About Us](#)
 - [Disclaimers](#)
 - [Blogroll](#)
- [Bruins](#)
 - [Stories](#)
 - [Schedule](#)
 - [Roster](#)
 - [Stats](#)
 - [Yahoo Bruins News](#)
 - [Yahoo Bruins Team Page](#)
 - [Yahoo Bruins Report](#)
 - [Yahoo Bruins Transactions](#)
- [Tickets](#)
- [Odds](#)
- [Shop](#)
- [About](#)
 - [Masthead](#)
 - [Community Guidelines](#)
- More
 - [Odds](#)
 - [About](#)
- [NFL](#)

AFC North

- [Baltimore Ravens](#)
- [Cincinnati Bengals](#)

- [Cleveland Browns](#)
- [Pittsburgh Steelers](#)

AFC South

- [Houston Texans](#)
- [Indianapolis Colts](#)
- [Jacksonville Jaguars](#)
- [Tennessee Titans](#)

AFC East

- [Buffalo Bills](#)
- [Miami Dolphins](#)
- [New England Patriots](#)
- [New York Jets](#)

AFC West

- [Denver Broncos](#)
- [Kansas City Chiefs](#)
- [Oakland Raiders](#)
- [San Diego Chargers](#)

NFC North

- [Chicago Bears](#)
- [Detroit Lions](#)
- [Green Bay Packers](#)
- [Minnesota Vikings](#)

NFC South

- [Atlanta Falcons](#)
- [Carolina Panthers](#)
- [New Orleans Saints](#)
- [Tampa Bay Buccaneers](#)

NFC East

- [Dallas Cowboys](#)
- [New York Giants](#)
- [Philadelphia Eagles](#)
- [Washington Redskins](#)

NFC West

- [Arizona Cardinals](#)
- [San Francisco 49ers](#)
- [Seattle Seahawks](#)
- [St. Louis Rams](#)
- [NFL Mock Draft](#)
- [Fantasy Football](#)
- [Daily Fantasy Football Advice](#)
- [NFL Odds](#)
- [See NFL Tickets](#)
- [NBA](#)

Eastern - Atlantic

- [Boston Celtics](#)
- [Brooklyn Nets](#)
- [New York Knicks](#)
- [Philadelphia 76ers](#)
- [Toronto Raptors](#)

Eastern - Central

- [Chicago Bulls](#)
- [Cleveland Cavaliers](#)
- [Detroit Pistons](#)
- [Indiana Pacers](#)
- [Milwaukee Bucks](#)

Eastern - Southeast

- [Atlanta Hawks](#)
- [Charlotte Hornets](#)
- [Miami Heat](#)
- [Orlando Magic](#)
- [Washington Wizards](#)

Western - Southwest

- [Dallas Mavericks](#)
- [Houston Rockets](#)
- [Memphis Grizzlies](#)
- [New Orleans Pelicans](#)
- [San Antonio Spurs](#)

Western - Northwest

- [Denver Nuggets](#)
- [Minnesota Timberwolves](#)
- [Oklahoma City Thunder](#)
- [Portland Trail Blazers](#)
- [Utah Jazz](#)

Western - Pacific

- [Golden State Warriors](#)
- [Los Angeles Clippers](#)
- [Los Angeles Lakers](#)
- [Phoenix Suns](#)
- [Sacramento Kings](#)
- [D-League and International](#)
- [WNBA and NCAA WBB](#)
- [Sonics Rising](#)
- [NBA Odds](#)
- [See NBA Tickets](#)
- [MLB](#)

AL West

- [Houston Astros](#)
- [Los Angeles Angels](#)
- [Oakland Athletics](#)
- [Seattle Mariners](#)
- [Texas Rangers](#)

AL Central

- [Chicago White Sox](#)
- [Cleveland Indians](#)
- [Detroit Tigers](#)
- [Kansas City Royals](#)
- [Minnesota Twins](#)

AL East

- [Baltimore Orioles](#)
- [Boston Red Sox](#)
- [New York Yankees](#)
- [Tampa Bay Rays](#)
- [Toronto Blue Jays](#)

NL West

- [Arizona Diamondbacks](#)
- [Colorado Rockies](#)
- [Los Angeles Dodgers](#)
- [San Diego Padres](#)
- [San Francisco Giants](#)

NL Central

- [Chicago Cubs](#)
- [Cincinnati Reds](#)
- [Milwaukee Brewers](#)
- [Pittsburgh Pirates](#)
- [St. Louis Cardinals](#)

NL East

- [Atlanta Braves](#)
- [Miami Marlins](#)
- [New York Mets](#)
- [Philadelphia Phillies](#)
- [Washington Nationals](#)
- [Minor League / Rookies / Prospects](#)
- [Sabermetrics](#)
- [Fake Teams](#)
- [MLB Trade Rumors](#)
- [FanDuel One-Day Fantasy Baseball](#)
- [Daily Fantasy Baseball Advice](#)
- [MLB Odds](#)
- [See MLB Tickets](#)

- [NHL](#)

Eastern - Atlantic

- [Boston Bruins](#)
- [Buffalo Sabres](#)
- [Detroit Red Wings](#)
- [Florida Panthers](#)
- [Montreal Canadiens](#)
- [Ottawa Senators](#)
- [Tampa Bay Lightning](#)
- [Toronto Maple Leafs](#)

Eastern - Metropolitan

- [Carolina Hurricanes](#)
- [Columbus Blue Jackets](#)
- [New Jersey Devils](#)
- [New York Islanders](#)
- [New York Rangers](#)
- [Philadelphia Flyers](#)
- [Pittsburgh Penguins](#)
- [Washington Capitals](#)

Western - Pacific

- [Anaheim Ducks](#)
- [Arizona Coyotes](#)
- [Calgary Flames](#)
- [Edmonton Oilers](#)
- [Kings, Sharks, & Ducks](#)
- [Los Angeles Kings](#)
- [San Jose Sharks](#)
- [Vancouver Canucks](#)

Western - Central

- [Chicago Blackhawks](#)
- [Colorado Avalanche](#)
- [Dallas Stars](#)

- [Minnesota Wild](#)
- [Nashville Predators](#)
- [St. Louis Blues](#)
- [Winnipeg Jets](#)
- [Kings, Sharks, & Ducks](#)
- [Fantasy Hockey](#)
- [NHL GameCenter LIVE](#)
- [NHL Odds](#)
- [See NHL Tickets](#)
- [CFB](#)
 - [View team list](#)
 - [Advanced College Football Stats](#)
 - [Every Day Should Be Saturday](#)
 - [College Football Recruiting](#)
 - [College Football Odds](#)
- [Recruiting](#)
- [CBB](#)
 - [View team list](#)
 - [Bracketology](#)
 - [College Basketball Odds](#)
- [UFC](#)
 - [MMA Fighting](#)
 - [Bloody Elbow](#)
 - [MMA Mania](#)
 - [MMA Fighters](#)
 - [MMA Fight Schedule](#)
 - [MMA Rankings](#)
- [Soccer](#)
 - [World Cup 2014](#)
 - [English Premier League](#)
 - [Spanish La Liga](#)
 - [Italian Serie A](#)
 - [German Bundesliga](#)
 - [MLS](#)
 - [NWSL](#)
 - [View team list](#)
 - [Odds](#)
- [NASCAR](#)
- [Fantasy](#)
 - [FanDuel One-Week Fantasy Football](#)
 - [Fantasy One-Day Fantasy Basketball](#)
 - [One-week Fantasy Football Advice](#)
 - [Daily Fantasy Basketball Advice](#)
- [Golf](#)
- [Tickets](#)
 - [NFL Ticket Exchange](#)
 - [NHL Ticket Exchange](#)
 - [NBA Resale Marketplace](#)
 - [Baseball Tickets](#)
 - [College Football Tickets](#)
- [Shop](#)
 - [NFL Shop](#)
 - [NBA Shop](#)
 - [College Shop](#)
 - [MLB Shop](#)
 - [NHL Shop](#)
 - [NASCAR Shop](#)
 - [Soccer Shop](#)
 - [UFC Shop](#)
- [Tennis](#)
- [Longform](#)
- [Cycling](#)
- [Boxing](#)
- [Horse Racing](#)
- [Podcasts](#)
- [Local](#)
- [Running](#)
- [Water Polo](#)
- [Wrestling](#)
- [Outsports](#)
- [Video](#)

- [Odds](#)
- More
 - [NASCAR](#)
 - [Fantasy](#)
 - [Golf](#)
 - [Tennis](#)
 - [Longform](#)
 - [Cycling](#)
 - [Boxing](#)
 - [Horse Racing](#)
 - [Podcasts](#)
 - [Local](#)
 - [Running](#)
 - [Water Polo](#)
 - [Wrestling](#)
 - [Outsports](#)
 - [Video](#)
 - [Odds](#)

- [SB Nation](#)
- [All 307 blogs](#)

• ☐ Like <3.1k

• ☐ Follow

• ☐ 8+1

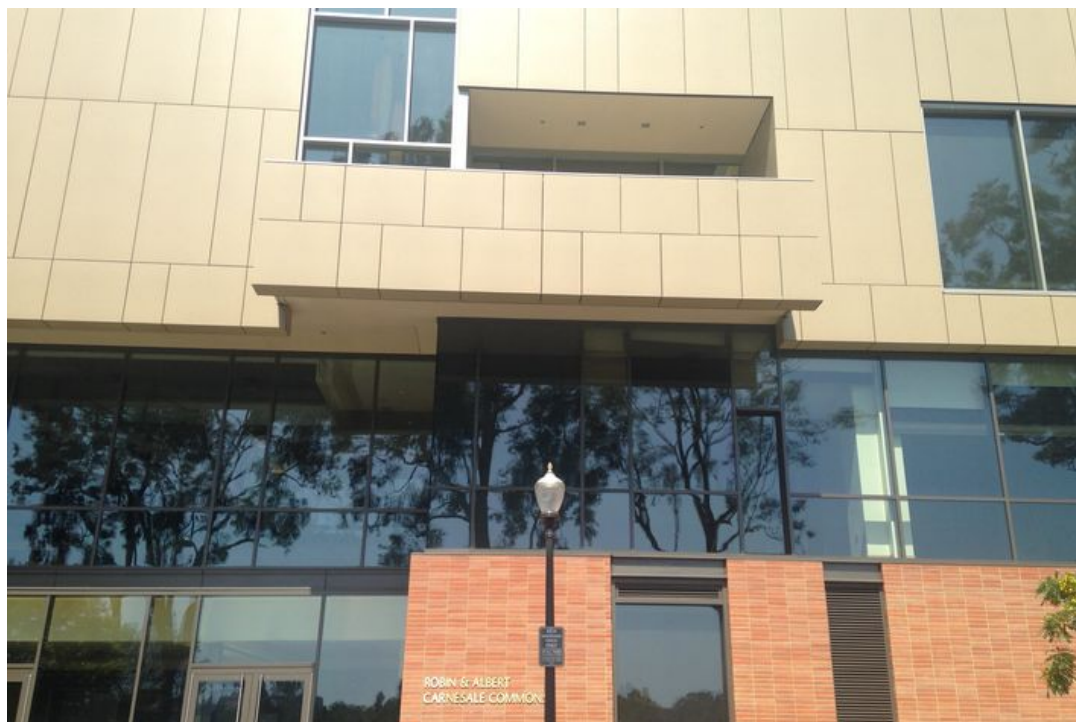
• ☐ [Search](#)

☐

- [Fanshots](#)
- [Fanposts](#)
- [News](#)
- [BN Community](#)

UCLA Campus Report: A Brain Prosthesis That Helps Recover Memory, More

By [Achilles](#) on Jul 13 2014, 8:00a [2](#)



Carnesale Commons - Achilles

[×](#)

Get the latest UCLA Bruins news with Bruins Nation

Follow Bruins Nation on Twitter

Follow @BruinNation 9,031 followers

Like Bruins Nation Facebook

Like 3.1k

This week's post includes the development of a 'brain prosthesis' to help injured patients recover memory, news from a concussion summit aimed at helping football players and a report that says young smokers are not aware of the dangers of hookah smoking.

[□ Tweet Share on Twitter \(5\)](#) [□ Share Share on Facebook \(17\)](#) [□ Share Share with Bruins friends 2 Comments](#)

An occasional report from around campus that recognizes that UCLA is a school with a world-class reputation for research and innovation and whose people make real impact on the real world:

This week's post includes the development of a 'brain prosthesis' to help injured patients recover memory, news from a concussion summit aimed at helping football players and a report that says young smokers are not aware of the dangers of hookah smoking.

UCLA to develop 'brain prosthesis' to help brain-injured patients recover memory

As part of a major federal initiative, UCLA has been awarded \$15M to create a wireless, implantable device that could restore memory to millions

[UCLA has been tapped by the Defense Advanced Research Projects Agency to spearhead an innovative project](#) aimed at developing a wireless, implantable brain device that could help restore lost memory function in individuals who have suffered debilitating brain injuries and other disorders.

The four-year effort, to be led by UCLA's Program in Memory Restoration and funded by up to \$15 million from DARPA, will involve a team of experts in neurosurgery, engineering, neurobiology, psychology and physics who will collaborate to create, surgically implant and test the new "neuroprosthesis" in patients.

Memory is the process by which neurons in certain brain regions encode information, store it and retrieve it. Various illnesses and injuries can disrupt this process, causing memory loss. Traumatic brain injury, which has affected more than 270,000 military members since 2000, as well as millions of civilians, is often associated with such memory deficits. Currently, no effective therapies exist to address the long-term affects of these injuries on memory.

"Losing our ability to remember past events and form new memories is one of the most dreaded afflictions of the human condition," said UCLA's lead investigator, Dr. Itzhak Fried, a professor of neurosurgery at the David Geffen School of Medicine at UCLA and a professor of psychiatry and biobehavioral sciences at the Semel Institute for Neuroscience and Human Behavior at UCLA.

Developing models of the brain's 'memory works'

The ambitious, first-if-its-kind project at UCLA builds on Fried's [2012 research](#) — published in the New England Journal of Medicine with UCLA's Nanthia Suthana and colleagues — demonstrating that human memory can be strengthened by stimulating the brain's entorhinal cortex, a region involved in learning, memory and Alzheimer's disease. Considered the entrance to the hippocampus, which helps form and store memories, the entorhinal cortex plays a crucial role in transforming daily experience into lasting memories.

"The entorhinal cortex is the 'golden gate' to the brain's memory mainframe," Fried said. "Every visual and sensory experience that we eventually commit to memory funnels through that doorway to the hippocampus. Our brain cells send signals through this hub in order to form memories that we can later consciously recall."

In a key part of the project, the research team will stimulate and record the activity of single neurons and of small neuronal populations in patients who already have brain electrodes implanted as part of epilepsy treatment. UCLA's Mayank Mehta, a professor of physics and neurobiology, and Harvard Medical School's Gabriel Kreiman will then work with Fried's group, using this information to develop computational models of the hippocampal-entorhinal system and determine how to intervene with electrical stimulation to help restore memory function.

Turning the models into a workable 'neuroprosthesis'

The models will be transformed into therapeutics using technology developed by researchers from UCLA's Henry Samueli School of Engineering and Applied Science. This group, led by associate professor of electrical engineering Dejan Markovic, will work with engineers from Lawrence Livermore [National](#) Laboratory and Stanford University to develop electronics for the implantable neuromodulation device. As part of the UCLA-led project, Lawrence Livermore will be awarded a separate \$2.5 million grant from DARPA to build the device, which will have the ability to record and stimulate neurons to help restore memory.

Parents, coaches and doctors learn ways to prevent concussion among young football players

Former Bruin, NFL players talk about their head injuries at UCLA-hosted event

"Welcome to the future of high school football," Terry O'Neil said as he greeted nearly [90 coaches, physicians, sports advocates and parents who came to Carnesale Commons July 8 to learn about what they can do to help players reduce the risk of concussion](#).

The diverse group gathered to learn about football techniques that would be legal under a [bill](#) authored by [Assemblyman Ken Cooley](#) aimed at preventing concussions in high school football players by reducing high-impact contact during field practice.

The event was cosponsored by the [UCLA Steve Tisch BrainSPORT Program](#), Cooley and O'Neil's organization, [Practice Like Pros](#), a nonprofit that's educating college and high school coaches about the benefits of adopting professional teams' approaches to reserving full-contact for game day.

"Two-thirds to three-quarters of all concussions happen during practice with a player's own team mates, not during games," explained speaker Dr. Christopher Giza, director of the BrainSPORT program and a professor of neurosurgery and pediatric neurology at the David Geffen School of Medicine at UCLA and Mattel Children's Hospital UCLA. "We need to teach new techniques that don't use the head as a weapon and customize helmets for smaller athletes to help kids safely play the sports they enjoy."

[Patrick Larimore](#) understands the issue intimately. UCLA's former football team captain and defensive MVP in 2011, he suffered six concussions during his career, along with depression, disrupted sleep and painful headaches, before making the agonizing decision to shelve his National Football League dreams and leave football in 2012.

"Playing linebacker, I got hit every day," recalled Larimore. "Every time you suffer a concussion, it increases the risk of suffering another. I'm an example of that. I owe it to the young kids playing now to spread the word about the dangers of traumatic brain injury."

Former NFL Hall of Fame quarterback Warren Moon agrees. During his 33-year career, he also suffered six concussions, starting at age 11 during Pop Warner football in Baldwin Hills before going on to play for Hamilton High, the NFL's Houston Oilers, Minnesota Vikings, Seattle Seahawks and Kansas City Chiefs.

According to Moon, athletes' glory days shouldn't end in high school. "We want kids to move onto the next level of football, be it college or pro. We want them to live healthy lives with productive futures."

"I've seen colleagues suffer from Alzheimer's, Parkinson's, dementia and short-term memory loss," Moon added. "I never know when these symptoms might creep into my life. I'm watching myself for those signs all the time."

Harmful hookahs: Many young smokers aren't aware of the danger

[Despite warnings from the Centers for Disease Control and Prevention that hookah smoking can be just as dangerous as cigarettes](#), many young adults believe that using the water pipes is not harmful to their health, according to a [UCLA School of Nursing](#) study.

Researchers visited three Southern California hookah lounges and asked patrons between the ages of 18 and 30, "Do you believe smoking hookah is harmful to your health?" Fifty-seven percent said they thought that it was not. When asked why they thought hookahs were not harmful, 47 percent of the participants said they believed that the smoke gets filtered through water, and 35 percent said they thought that fruit used to flavor the tobacco detoxify tobacco's harmful chemicals. Still others, 16 percent, said they assumed hookahs are not harmful because the tobacco is not addictive and does not contain nicotine.

Unfortunately, none of those beliefs are true.

"With hookah smoking on the rise, particularly among young adults, our goal was to identify factors influencing perceptions, attitudes and preferences toward hookah smoking," said Mary Rezk-Hanna, a UCLA nursing doctoral student and lead researcher for the study, which was [published in the July–August issue](#) of the journal Nursing Research.

Other [recent studies](#) have shown that even as cigarette use continues to decline, hookah smoking is increasing, especially among college students. It is the only form of tobacco use that is not regulated in the United States, and its exemption from clean indoor air legislation, such as the California Clean Air Act, is contributing to its rapidly growing popularity. In California alone, there are more than 2,000 shops that sell hookah tobacco and related products, in addition to 175 hookah lounges and cafes, and a disproportionate number of them are in Los Angeles, near universities and colleges.

When asked why hookah smoking is more attractive than cigarette smoking, 60 percent of the participants in the UCLA study said it is a trendy way of socializing. And although 43 percent of hookah smokers said they believe the practice is indeed harmful, "socializing with friends appeared to outweigh health concerns," Rezk-Hanna said.

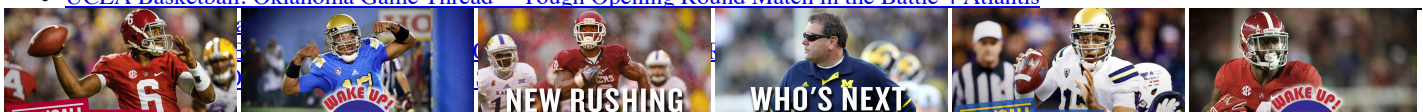
In the U.S., hookah smoking is heavily marketed to young adults of all ethnic backgrounds as an attractive social phenomenon and a non-addictive, healthier alternative to cigarette smoking.

"This study underscores the urgent importance of more research and campaigns to increase public knowledge on the dangers of hookah smoking, especially among young adults," Rezk-Hanna said. "Understanding the basis of these perceptions and beliefs is of particular relevance for helping healthcare professionals design effective prevention and intervention strategies that target young-adult hookah smokers."



More from Bruins Nation

- [UCLA Football: CFB Rankings- Still in Line for a New Year's Game, but No Bonus Points for Crushing Southern Cal](#)
- [Spaulding Roundup: Montgomery Out Vs. UCLA, Bruin Playoff Notes](#)
- [UCLA Basketball: Oklahoma Preview -- First Big Challenge in the Battle 4 Atlantis](#)
- [UCLA Basketball: Oklahoma Game Thread -- Tough Opening Round Match in the Battle 4 Atlantis](#)



Recommended

Rockies 2014 season review:
Franklin Morales ate innings for
Colorado

Monday Open Bar: Bergie-bility?

Kings Gameday: Forever Backed
Up

Why MA drivers are tickled
green with Amica®
Amica® Sponsored

[□ Tweet Share on Twitter \(5\)](#) [□ Share Share on Facebook \(17\)](#) [□ Share Share with Bruins friends 2 Comments](#)



Latest News

- [Stanford Prep: News and Notes](#)
- [#Hundley4Heisman, Senior Day, & Trench Talk](#)
- [UCLA Oppo Preview: Stanford's Consistent Defense](#)
- [UCLA Oppo Preview: Cracks in Stanford's Foundation](#)
- [BN Pac-12 Football Power Poll: Week 14](#)
- [Bruins Lose to Oklahoma, 75-65](#)
- [Oklahoma Game Thread: Tough B4A Matchup](#)
- [UCLA-Stanford: 2014 Cardinal's Previews](#)
- [Football Notes: Ty Montgomery Out @ UCLA](#)
- [Playoff Rankings: Bruins Move Up to No. 8](#)

In This Article

Topics

- [ucla campus report](#)

Players

- [Patrick Larimore \(LB-UCLA\)](#)

Team Shop



- UCLA Bruins Double Arches Pullover Hoodie - Charcoal
\$34.95 [Buy Now navigateright](#)



- adidas UCLA Bruins Gray No. 17 Replica Football Jersey
\$64.95 [Buy Now navigateright](#)



- adidas No. 17 UCLA Bruins True Blue Replica Football Jersey
\$64.95 [Buy Now navigateright](#)



"I lose my keys
ALL. THE. TIME."

[Buy Tile Today ▶](#)

There are 2 Comments. [↗](#)

[Show speed reading tips and settings](#)

Shortcuts to mastering the comment thread. Use wisely.

C - Next Comment

X - Mark as Read

R - Reply

Z - Mark Read & Next

Shift + C - Previous

Shift + A - Mark All Read

Comment Settings

Live comment alert: [Hide it!](#)



☐ comment collapsed

I know that no one has commented, but that's kind of awesome science. Plus...on the silly side...it's kinda cool having a dude with the last name "Fried" working on brains. As in, "My brain is Fried." LOL Maybe in the future, it will mean that you've gotten your memory back. Good work.

Lawrence Ross

by [alpha1906](#) on [Jul 14, 2014 | 1:22 PM](#)

☐ What is the general view of Carnesale's legacy?

I considered him to be pretty mediocre chancellor, but that was in relation to Charles Young. I definitely hold him jointly responsible with Doughnut for the Karl Dorrell fiasco.

The reason I ask is that I noticed that the picture in this article is for "Carnesale Commons". I had assumed that Block's name would not appear on any building, unless a drain pipe was added somewhere. Could we actually wind up with "Block Quad" or something equally disturbing after he leaves?

by [islandbruin2](#) on [Jul 15, 2014 | 10:47 AM](#)

Join the conversation!

[Log in](#) or [sign up](#)

Comments are closed for this post.

- [↑ Top of comments](#)
- [↑ Top of page](#)
- [↑ Bruins Nation](#)
- [↑ Articles](#)

RECOMMENDED

Rockies 2014 season review: Franklin Morales ate innings for Colorado

Broadcast Math

56th Annual O.M.B.A.C. Over The Line Championship

Top 100 Indians: #78 Jose Mesa

Chris Simon and Darcy Verot raising hell in the KHL

INDYCAR: Power Rankings (Texas)

Software Review: ESPN iScore Baseball Scorekeeper for iPhone

Getting to know Denver Nuggets forward Darrell Arthur: the movie buff

New Lower Rates for MA Drivers

Amica® Sponsored

Best Casino Slots!

Williams Interactive Sponsored

[Learn more](#)

Powered by [for you](#)



Trending Discussions

- [BEAT SOUTHERN CAL: UCLA vs. SC Game Thread](#)
- [Southern Cal-UCLA: 2nd Half Game Thread](#)
- [UCLA 38, Southern Cal 20 - Bruins Smash Trojans](#)
- [Oklahoma Game Thread: Tough B4A Matchup](#)
- [The Morning After, Part 11: Southern Cal](#)
- [#DefendourLogo: Thank You Sam - #BruinLegend](#)
- [UCLA Women's Soccer - 2nd Round Game Thread](#)
- [Game Thread: Subs Get Their Shot Against Cupcake](#)
- [The "Eye Test": Bruins Dominate Southern Cal 38-20](#)
- [CFB Other Saturday Games: Open Thread pre 5pm](#)



Bruins Nation

- [FanPosts](#)
- [FanShots](#)
- [Masthead](#)
- [Guidelines](#)
- [Facebook](#)
- [Twitter](#)
- [YouTube](#)
- [Subscribe](#)
- [Tickets](#)

[Browse Blogs](#)



- [About SBN](#)

- [Company Blog](#)
- [Have a News Tip?](#)
- [Contact Us](#)
- [Blog Openings](#)

[SBNU v1.5.0, December 18, 2013](#) [Guiding Principles](#) [Terms of Use](#) [Privacy Policy](#) © 2014 Vox Media, Inc. All Rights Reserved All Systems Operational [Check out our status page for more details.](#)



[Advertise With Us](#) [Jobs @ Vox Media](#)

[Back to Top](#) ↑