DOW JONES, A NEWS CORP COMPANY ▼

DJIA ▼ 22349.59 -0.04%

S&P 500 ▲ 2502.22 0.06%

Nasdag ▲ 6426.92 0.07%

U.S. 10 Yr ▲ 7/32 Yield 2.254%

Crude Oil 4 50.66 0.22%

This copy is for your personal, non-commercial use only. To order presentation-ready copies for distribution to your colleagues, clients or customers visit http://www.direorints.com

http://www.wsj.com/articles/SB124692204445002607

TECH

How I Spent My Summer: Hacking Into iPhones With Friends

Teens Bond by Jailbreaking the Mobile; 'A Trust Issue' for MuscleNerd

By Yukari Iwatani Kane Updated July 7, 2009 11:59 p.m. ET

PHILADELPHIA -- Like many teenagers, Ari Weinstein spends his summers riding his bike and swimming. This year, the 15-year-old had another item on his to-do list: Foil Apple Inc.'s AAPL -0.98% ▼ brightest engineers and annoy chief executive Steve Jobs.

Ari is part of a loose-knit group of hackers that has made it a mission to "jailbreak" Apple's iPhone and iPod touch. The term refers to installing unapproved software that lets people download a range of programs, including those not sanctioned by Apple.



Ari Weinstein, 15, in the computer lab of Germantown Friends School, where he just finished 9th grade. YUKARI KANE/THE WALL STREET JOURNAL

Since Apple began selling its latest iPhone 3GS on June 19, Ari and six online cohorts spent hours a day probing the new product for security holes. This weekend, one of the members of the group, dubbed the Chronic Dev Team, released the jailbreaking software they've been working on. Ari says the program is a test version with some bugs, but that users have successfully downloaded it. A quarter-million people have visited the site, he says.

MORE

- Digits: The iPhone 3GS Hacking Debate 07/07/09
- Microtrends: Smartphoniacs 07/07/09

JOURNAL COMMUNITY »

• **Discuss:** Will you buy the iPhone 3GS?

"Coding and testing things that may or may not work, and figuring things out, is a really rewarding experience," says Ari, a Philadelphia resident who began hacking when he was 11.

Ari's hobby has ruffled the feathers of famously secretive Apple, which exerts tight control over its gadgets and sells programs for its iPhones exclusively through its App Store site.

"The vast majority of customers do not jailbreak their iPhones, and for good reason," an Apple spokeswoman says. "These modifications not only violate the warranty, they also cause the iPhone to become unstable and not work reliably."

Mr. Jobs, in the past, has called dueling with hackers a "cat-and-mouse game" and has said

it is Apple's "job to stop them from breaking in."

So far, Apple hasn't stopped them. A year ago, when the Cupertino, Calif., company launched its iPhone 3G, a team of hackers released jailbreaking software for the device less than a week later.

The software, which can be downloaded from a Web site, gives users access to a store that sells programs that Apple doesn't. These include applications that block ads on the iPhone's mobile Internet browser, for example, or let the phone double as a laptop-computer modem.

Power to the hackers! They bring us increased security and lots of cool/free software and ideas. Without them, … Apple/MSFT wouldn't have to work harder.

- Carmen David Carosella

In February, Apple filed a 27-page statement to the U.S. Copyright office arguing that modifying phones violates the Digital
Millennium Copyright Act. Digital-rights advocates say they believe it isn't illegal because people own their phones outright.
The copyright office is expected to rule in the fall

Ari says he takes ethics seriously and says he has researched the Millennium Copyright law online. But he has concluded his actions aren't wrong. He also has a lawyer, who he says volunteered his services after Ari created iJailbreak, a piece of free software that worked on the original iPhone, two years ago.

"Apple doesn't have the right to tell me what I can put on my phone," says Ari, who uses non-Apple-sanctioned programs that let him change the look of his home screen and administer Web sites from his phone. "I only do hacking that helps people."

Ari became interested in technology as a preschooler, when he would flip through the manual for a cable set-top box and change the settings on the family computer. "I remember it being a big relief when he went to kindergarten," says his mother, Judy Weinstein, 43, a social worker.



At age 7, Ari teamed up with two other boys to create playing cards, decorated with hand-drawn characters, to sell online. The business never took off. But Ari says he learned to build Web sites, among other things: The site he created wasn't on the child-approved list of his AOL Internet service, he says, so to access it, he had to figure out how to get around AOL's parental controls.

"That's when we knew we should start teaching him ethics," says his dad, Ken Weinstein, 45, a real-estate developer.

Ari started hacking in sixth grade after looking for a way to download free games on his iPod mini. Two years ago, he received an iPod touch for his bar mitzvah and says he jailbroke the device in an evening. He later simplified the process into the iJailbreak software.

He says the program has been downloaded a million times. Some users donated cash, a standard way of showing appreciation for free software, and Ari says he received "several thousand dollars" in all.

Ari attracted the attention of Will Strafach, a Connecticut teen who created an online chat room for people interested in reverse engineering the iPhone. That eventually morphed into a team named after Mr. Strafach's Internet name, Chronic. "When I get out" of school, Mr. Strafach says, "I want to work for Apple."

Ari, who goes by AriX online, soon began to work with the Chronic Dev Team's half-dozen teenagers and twentysomethings. The group communicates almost exclusively via a private online chat room, where they can talk and send files. Team members say they don't know all the others' real-life identities. One of them, Mr. Strafach says, lives in Austria.

Earlier this year, Ari and his team tried to hack more efficiently by working with another group -- iPhone Dev Team, an invitation-only bunch in their 20s and 30s who have typically been the first to roll out iPhone hacks.

Members of the iPhone Dev Team worried about working in a large group. In part, they were concerned that if information leaked out about the security holes they were probing, others could exploit them first. Or, Apple could plug the holes. In March, the two groups stopped communicating.

"It just came down to a trust issue," says Eric McDonald, an iPhone Dev Team member known as MuscleNerd.

In June, Apple announced its 32-gigabyte iPhone, with added layers of security and encryption. Ari bought one immediately, in part with the \$20 an hour he earned helping family friends with computer problems.

"I'm happy to contribute," says Michael Cohen, a real-estate investor who recently hired Ari to help set up his wife's new computer. "He obviously has a future in this stuff."

Mr. Strafach's group also sought help from George Hotz, a 19-year-old Cambridge, Mass., hacker who had worked before with Chronic Dev. Known as geohot, Mr. Hotz is widely acknowledged as the first person to "unlock" the iPhone nearly two years ago, so people could use the phone with any wireless carrier.

Mr. Hotz, who took a paid internship with Google Inc. in April, joined the hackers in early June. In emails, he says he has done the project on his own time and was happy to help "a bunch of cool guys with a good attitude." Google declined to comment on Mr. Hotz's work with Chronic Dev.

More than a week ago, both Chronic Dev and iPhone Dev said they figured out how to jailbreak Apple's new phone. The iPhone Dev Team wanted to wait to release its software so Apple can't plug the security hole in the device immediately.

But Chronic Dev and Mr. Hotz released theirs as soon as it was ready. "A lot of people bought their phones expecting to jailbreak their phones, and now that we have the capability to do it, we should let them," Ari says. "A lot of people have thanked us."

Write to Yukari Iwatani Kane at yukari.iwatani@wsj.com

Copyright ©2017 Dow Jones & Company, Inc. All Rights Reserved

This copy is for your personal, non-commercial use only. To order presentation-ready copies for distribution to your colleagues, clients or customers visit http://www.djreprints.com.