Fictional



Caltech



BY LORI OLIWENSTEIN





Caltech's intellectual gravitas and uninhibited innovativeness are traits that have attracted the attention of a number of novelists over the years. In this sampling of fictional works featuring campus and JPL—with stories that range from space adventures to police procedurals to young adult romances—authors have name-dropped Caltech whenever they want to prove a character's brainpower, add a dash of scientific weightiness, or suggest a driven curiosity.

In some of these books, actual facilities on campus or at JPL are described in detail to provide a backdrop for high-stakes, cutting-edge, or downright futuristic research that propels a plot forward. Characters have drinks at the Ath, spend long days and nights in JPL's spacecraft assembly room, and walk past the Institute's "tile roofs and Moorish arches." One novel sets up a meeting between two characters in front of the long-demolished Throop Hall, "an imposing domed administrative building in the local Spanish Colonial style."

The sometimes-implausible scientific scenarios many of these novels create begin to seem entirely possible when set at the Institute, given the intrepid spirit of researchers on campus and at JPL.





The Unseen World

(W.W. Norton & Company, 2016)

IN BRIEF:

Liz Moore's 12-year-old protagonist is forced to cope with the suddenly declining mental status of her brilliant single-parent father, David—a leading authority in computer science and language processing as well as a Caltech alum. Or is he?

To say more would be to spoil this novel about family and intelligence, both human and artificial.

ON THE PAGE:

...At some point, a missing-person report had been filed for David by his own family. This was enough to trigger further investigation into his past—which, in turn, had led to the further revelation that Caltech—the institution that David had always cited as his undergraduate alma mater—had no record of his name.



■ Tiger Eyes Judy Blume

(Bradbury Press, 1981)

IN BRIEF:

Renowned author Judy Blume looked to Caltech to establish the scholarly bona fides of the love interest of her main character in *Tiger Eyes*. In this young adult novel, Davey moves to Los Alamos after her father dies; there, she meets a young man taking a semester off from Caltech to be with his father, who is dying of cancer.

ON THE PAGE:

"He doesn't like to talk about himself," Mr. Ortiz says.

As if I don't already know.

"And now he's got a full scholarship to Cal Tech,*" Mr. Ortiz continues. "He's a junior and he's going to be a brilliant physicist."

"Hey, Dad..." Wolf says, "give me a break."

Contact

Carl Sagan

(Simon & Schuster, 1985)

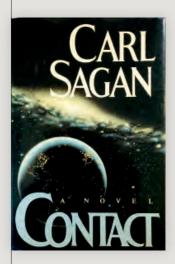
IN BRIEF:

In Carl Sagan's *Contact*, Earth's humans encounter other intelligent beings for the first time. Radio astronomer Eleanor Arroway leads the project to decode and respond to "the Message" received from 26 light-years away ... armed with a PhD from Caltech.

ON THE PAGE:

As a topic for her doctoral thesis, Ellie chose, with the concurrence of the faculty, the development of an improvement in the sensitive receivers employed on radio telescopes. ...

She then installed her new instrument on one of Cal Tech's radio telescopes in Owens Valley and detected, at entirely new frequencies, what astronomers call the three-degree black-body background radiation—the remnant in the radio spectrum of the immense explosion that began this universe, the Big Bang.



The Teleportation Accident

Ned Beauman

(Sceptre, 2012)

IN BRIEF:

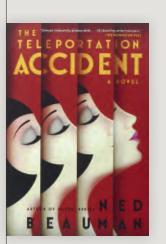
In the midst of his sometimes raunchy, sometimes time-bending adventures, protagonist Egon Loeser runs into a Professor Bailey at Caltech in the mid-1930s. Bailey, it turns out, is trying to build a teleportation device very much like the one Loeser had been building as a theatrical set piece back in Germany.

ON THE PAGE:

Several of the characters are discussing Albert Einstein's visits to Caltech's campus; one asks whether Professor Bailey ever met with Einstein:

"They did, yes. Which is unusual. Professor Bailey is normally quite secretive about his work."

"Why would a CalTech* physicist need to be secretive?" said Plumridge. "He's juggling atoms, not patenting a toaster."



■ The Hunt for Red October

Tom Clancy

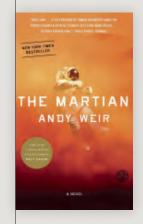
(Naval Institute Press, 1984)

IN BRIEF:

This is the novel with which Tom Clancy launched his literary career, the thriller that introduced his most enduring protagonist, Jack Ryan. Also among the cast of characters chasing down the Red October-a Russian nuclear submarine that is heading toward the United States—is naval-sonar specialist Ron Jones, a former Caltech undergrad. Jonesy, as he is known through much of the book, is the one who notices the almost-undetectable signals coming from the top secret and highly advanced sub whose captain, it turns out, is trying to defect. And with that, the high-stakes pursuit is on.

ON THE PAGE:

Three years earlier, Jones had been asked to leave the California Institute of Technology in the middle of his junior year. He had pulled one of the ingenious pranks for which Cal Tech* students were justly famous, only it hadn't worked. Now he was serving his time in the navy to finance his return.



The Martian Andy Weir

(Crown Publishers, 2014)

IN BRIEF:

JPL and its rocket scientists are front and center in the efforts to rescue astronaut Mark Watney from the surface of the Red Planet in Andy Weir's recent novel-turned-blockbustermovie, *The Martian*. Indeed, when the movie version was released, JPL's news office released an article with the title "JPL's Role in Making "The Martian' a Reality."

"Acclaimed for its attention to scientific and technical detail, 'The Martian' is steeped in decades of real-life Mars exploration that JPL has led for NASA," JPL noted. For instance, JPL designed, built, and operated the Mars Pathfinder lander that "figures prominently into Watney's ability to communicate with Earth and survive his long ordeal."

Throughout both versions of the story, JPL's engineers are portrayed as innovative and focused, willing—and able—to conquer almost any challenge. And (spoiler alert) they do, although not always on their first try.

ON THE PAGE:

Every system and subsystem was working correctly. JPL did a damn good job making these rovers. If I get back to Earth, I'm buying Bruce Ng a beer. Though I guess I should buy all the JPL guys a beer.

Beers for everyone if I get back to Earth.

* The Institute's name has been rendered in different ways over its history; some of those are reflected in the excerpts above.

■ The Delta Star

Joseph Wambaugh

(William Morrow and Company, 1983)

IN BRIEF:

The Delta Star has been described as a book that "mixes the think-tank world of Nobel Prize chemistry with the underworld of cops and killers." What is behind that successful mix? Caltech. Not only is one of the shady characters in this whodunnit a scientific "groupie," as Wambaugh dubs him, but the book's acknowledgments include "many thanks to the faculty, students, and staff of the California Institute of Technology, especially to Professor Harry B. Gray, chairman of the division of chemistry and chemical engineering [CCE], for the generous help, considerable enlightenment, and great kindness."

If that were not enough, Gray has a not-so-cameo role in the plot, even briefly drawing the attention of the detectives behind the murder investigation. JPL, CCE, and the Caltech Associates receive mentions, and Wambaugh spouts impressive stats about the Institute, its faculty members, and their award-winning scientific efforts.

ON THE PAGE:

Mario Villalobos had known about as much as the average citizen knows about the handful of first-rate scientific institutes in America. That is, he had known next to nothing. ... He learned that an extraordinary number of Nobel Prizes had been awarded to Caltech alumni and faculty, and that this small faculty had a higher percentage of members elected to the National Academy of Sciences and National Academy of Engineering than any educational institution in America. There were always Nobel laureates among the active faculty and in such a place it was to be expected that there were many more who had hopes and dreams of becoming one.

Seveneves

Neal Stephenson

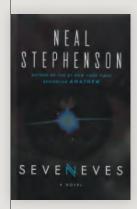
(William Morrow and Company, 2015)

IN BRIEF:

Neal Stephenson's novel tells the story of efforts to save the human species over five millennia after the moon suddenly and inexplicably disintegrates. In the book's earliest pages, this event is described by a number of characters, including Dubois Jerome Xavier Harris, PhD, an astronomer and TV personality who just happens to be in a familiar setting when the lunar lunacy begins.

ON THE PAGE:

The moon blew up while [Dr. Harris] was attending a fund-raising reception in the courtyard of the Caltech Athenaeum.



Deceptive connections?

In **Deception Point** (Pocket Books, 2001), Dan Brown brings to life the powerful William Pickering, director of the so-called National Reconnaissance Office. Some Caltech magazine readers believe this name is a reference to JPL's fourth and longest-serving director, Bill Pickering (BS '32, MS '33, PhD '36); after all, it is a beleaguered NASA that discovers the unusual meteorite that drives the story's plot. But if it is, Brown has left few hints or breadcrumbs to back up that supposition.

If those hints—or actual proof exist, the readers of Caltech magazine will find it. Send an email to magazine@caltech.edu with evidence from the book or outside sources, and check magazine.caltech.edu/post/ your-caltech-novel for updates.



Saturn Run

John Sandford and Ctein

(G.P. Putnam's Sons, 2015)

IN BRIEF:

It is a Caltech intern who, in the year 2066, notices what seems to be a spacecraft decelerating toward Saturn in this science-fiction thriller. The race is soon on between the United States and China to investigate and bring back this ship, which hails from a planet thought to be at least a century ahead of Earth in its technology. Caltech plays a big role here, as does the not-necessarily-qualified intern who nonetheless discovers the original Saturn-bound spacecraft. There is also his boss, astrophysicist Ed Fletcher of the "Caltech Astrophysics Working Group," and there is JPL, which becomes involved in the efforts to build a spacecraft that can arrive at Saturn before anything launched by China.

Caltech is also the alma mater of Ctein (BS '71)—Sandford's writing partner on this project—who double majored in English and physics.

ON THE PAGE:

On the ill-qualified intern:

As one of the Real Scientists put it, "He couldn't change a [expletive] tire," which, in Caltech terms, didn't literally mean he couldn't change a tire, it simply meant he couldn't reliably explain the difference between a Schwarzschild radius and Schrödinger's cat.

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Lucifer's Hammer

Larry Niven and Jerry Pournelle

(Playboy Press, 1977)

IN BRIEF:

In *Lucifer's Hammer*, there is a newly discovered comet about to wreak havoc on planet Earth. A California senator organizes a joint U.S./Russia space mission to study the comet, looking to campus and JPL to play a role in protecting the planet ... a role that is doomed to failure.

ON THE PAGE:

In one early scene, a TV crew heads to JPL to do an interview about comets. Charlie, a cameraman on the crew, remarks to a production assistant named Mark:

"Sure put it the hell far from Pasadena."

"Used to test jet engines there," Mark said. "JPL. Jet Propulsion Laboratories, right? Everybody thought they'd blow up, so they made Cal Tech* put the labs out in the Arroyo." He waved to indicate the houses outside. "Then they built the most expensive suburb in this end of L.A. just around it."



This is by no means a comprehensive roundup of all fictional representations of the Institute. If this article leaves out a favorite, send a note to magazine@caltech.edu.