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It all began in 2003 when Chang was in Germany to work and learn German as a

told NBC News.

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career professionals. One night, while out in Munich, Chang sat down for dinner at an Italian bistro. He looked over the menu and decided to order a simple dish tagliatelle tossed in butter with fresh black truffles shaved on top.

Robert Chang was in his late 30s when he decided to forgo the safety of a

fellow of the year-long Robert Bosch Foundation Fellowship Program for mid-

promising career in Silicon Valley for a fascination with fungi and dirt.

Chang, who emigrated from Taiwan when he was 12, had heard about truffles and their earthy, somewhat garlicky flavor, but he had never eaten one. When he took that first bite at the bistro in Munich, his taste buds were tantalized. "It was a flavor and aroma I had never had before, and I was addicted," Chang



"My mother was very encouraging, very supportive," Chang, who is now 45, recalled. "My father was a bit more traditional so he was wondering if I could support a family with something that wasn't a corporate kind of job." Over the last several years, Chang has proven he can. The American Truffle Company, which partners with people willing to invest in and grow truffle

orchards in North America, has been so successful that it's actually trying to

10 and 20 partners each with substantial acreage throughout the U.S. and

minimize its number of clients, Chang said. Currently, the company has between

Canada, from which it takes less than a third of the gross truffle revenue once the

could also be grown in the U.S. Around 2006, the two men hit it off after a

became Thomas' partner to start and run the American Truffle Company.

But Chang's career change garnered mixed reaction from his parents.

meeting in a London pub fueled by pitchers of beers. One year later, Chang

truffles begin producing. Robert Chang digging up 2 truffles in Australia



Chang said. That covers adjusting and testing the soil, purchasing the hazelnut and oak trees inoculated with the truffle organism, and installing an irrigation system. Then the waiting begins — for about five years before the truffles can be

harvested. That's when the trained dogs move in, scouring the orchards to sniff

"The dog is a nice compact package that does this amazingly well," Chang said.

out the fungus, which produces a scent when it is ripe.



grow a temperamental fungus beats chancing it to Mother Nature. Traditionally, truffles were often discovered by chance when scouts Courtesy of the Truffle Dog Company happened upon wild trees with the truffle organism, Chang said. But around 40 or 50 years ago, Europeans eliminated the guesswork by injecting the fungus into trees and planting them in

world."

database of its kind anywhere in the

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Chang attributes his company's success to science and how it is used to grow truffles, as well as to culling, analyzing, and interpreting volumes of data about partners' orchards. But could the American Truffle Company's drive to perfect the science behind truffle cultivation one day over-saturate the market and make truffles as commonplace as, say, mushrooms?

order to even approach the current level of supply and therefore influence the market price," Chang said. No doubt, the high prices that truffles command contribute to the mystique and hype surrounding the coveted fungus. Over the last three decades, Chang said, the price of truffles has increased by an average of 4.5 percent every year, with

worldwide demand far outstripping supply. Between 80 and 100 tons of truffles—



and to following his passion. He was determined to buck the stereotype of Asian

Americans entering technical fields and staying put because they're not exposed

to other disciplines, he said.

engineering majors; he also took classes in Middle Eastern history, finance, and Japanese. It was his burning curiosity, he said, that later pushed him to travel to Germany, to learn German, to work at a German company and, yes, to have dinner at that Italian bistro in Munich where he discovered truffles.

So while at Stanford, Chang didn't just study math and science like many

passionate about what I'm doing, it's an incredibly rewarding experience."

Chang is equally involved on the science side as well. He has used his background, for instance, to connect scientific instruments to the Internet that monitor conditions in partner orchards in 25 countries. That data, transmitted in real-time to the American Truffle Company's server in California, helps the company diagnose any issues that arise in the orchards. "This is exactly the crux of our scientific advantage," Chang explained. "It's the largest truffle

their natural habitat of the Mediterranean region, a method that has mostly proven successful. But try recreating that in the United States or North America, with improperly inoculated trees or in climates and conditions unsuitable for growing truffles, and the results can be abysmal, Chang said. "In locations that do not have these European truffles natively, you can try the same approach, and the failure rate is over 95 percent," Chang said.

"To produce truffles at that scale

lines of 6,000 or 7,000 acres of

producing at their peak level, in

truffle orchards, all of them

would require something along the

sometimes 120 tons—are produced and consumed annually, Chang estimates. But Chang said that is not his company's goal, adding that the American Truffle Company wants to get to the point where it has several hundred acres under management and stop there. "And therefore we're going to keep the price where it is today," he said.

The Truffle Dog Company (TDC) leads training programs for dogs.
Courtesy of the Truffle Dog Company Outside the western world, truffles also enjoy wide popularity in Asia, Chang said.

"My passion has always been with food," Chang said. "Being able to see the

opportunity with truffles, and having that confidence to take that first step, to get

out of the corporate world and go down this entrepreneurial path where I'm

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