## Moscow State University The Faculty of Computational Mathematics and Cybernetics

Silicon valley

Kozlov Yaroslav,

414

## Contents

- 1. Place
- 2. History
- 3. The infrastructure of Silicon valley.
- 4. Sillicon valley companies
- 5. The most iconic people in Silicon valley.
- 6. References

Place.

On official geographical maps of the united states, the territory called silicon valley does not exist. However, perhaps, any self-respecting businessman, venture capitalist, or start-up-man in the world will probably answer that there is such a place, is it in California USA and is a world-leading center of gravity for developers of high-tech projects in the development of global innovation.

Under the Silicon valley mean the territory is the place where a unique experience of creating and promoting high-tech startups, the world's best platform on which, for over half a century successfully interact with investors, developers, startapery, representatives of leading international technology companies and business media.

Initially, the term "Silicon valley" meant the territory located about 20 miles from San Francisco in the area of five small cities-Palo Alto, Sunnyvale, Mauthen view, Cupertino, and Santa Clara. Currently, Silicon valley is considered a much larger area from San Francisco to San Jose inclusive. Silicon Valley today is the northern part of the Santa Clara Valley, partly the San Francisco Peninsula, the eastern shore of the San Francisco Bay, there you can also include Campbell, Belmont, San Manteo, Polo Alto, Fremont, Los Altos, Los Gatos, Menlo Park, Milpitas, Morgan Hill, Redwood City, Saratoga, the area between the ranges of Rush Ridge, Monte Bello and the Coast Range bounded by the Coyote Peak Mountains, as well as the valleys of West, Almaden, Energin, Palm and Mission. To some extent, this includes Santa Cruz, Scots valley, Livermore, and Pleasanton. The center or unofficial capital of Silicon valley is considered to be San Jose.

Apparently, the history of Silicon valley dates back to 1951. in the Stanford industrial Park, which was created on the land of Stanford University transferred to them for long-term lease (up to 99 years) high-tech companies.

The first residents of the new innovation center were Varian Associates, Hewlett-Paskard, Eastman Kodak, General Electric, Lockheed Corporation, and other high-tech companies and startups.

Less than half a century ago, in 1971, the concept of "Silicon valley" began to enter world use with the light hand of journalist don Hoefler, who first used it as part of a series of articles called - Silicon valley USA.

Do not confuse the concepts of "Silicon valley" and "Silicon valley", somehow linking them together. Since Silicon Valley is located in California, and silicon Valley, or the San Fernando valley, is another iconic-cereal place in the United States, where most porn movies are shot.

The first global and successful project in Silicon valley was Hewlet-Packard. Currently, the company is one of the world's leading manufacturers of personal computers and other peripherals.

The infrastructure of Silicon valley.

The basis is the state of California (the capital of Sacramento), the largest cities are Los Angeles, San Francisco, San Jose, Oakland, San Diego, San Bernardino, and riverside. California ranks first among the US States in terms of gross product - more than \$ 2 trillion, which is comparable to the GDP of the entire Russian Federation in 2014. (the nominal GDP of the Russian Federation in 2014 amounted to 1.861 trillion dollars, according to PPP-3.745 trillion dollars). California is home to the most billionaires - about 80 of the Forbes 400 list. California is the most populous state in America - 38.4 million. people who live in 480 cities and rural areas. The state has the third largest area in the United States.

The climate is Mediterranean, with relatively cool summers and warm winters, and a large number of Sunny days per year.

The largest cities in Silicon valley are San Francisco, San Jose, San Manteo, Polo Alto, Fremont, Santa Cruz, Scots valley, Livermore, and Pleasanton.

Infrastructure-Silicon valley is one of the three largest technology centers in the United States (along with similar centers in new York and Washington).

The intellectual core is Stanford University, a private research University, one of the most prestigious in the world and highly ranked in academic rankings of universities in the United States and around the world. Located South of San Francisco, near Polo Alto. Stanford admits about 7,000 undergraduates and 8,000 graduate students each year. Many of the graduates later join the ranks of Silicon valley residents, working in local companies, sometimes leading them or initiating their own projects and startups, some of which become successful

companies, the most successful-global companies of the world level. This also includes the University of San Jose (about 30,000 students study, up to 130 educational programs) and the University of Santa Clara (the oldest private University in the state), as well as the University of California at Santa Cruz (one of the top 10 public universities in California (the most famous is the University of Berkeley)).

## Silicon valley companies.

At the moment, about three thousand enterprises have their head offices, representative offices, development or production centers in Silicon valley. More than three hundred companies are associated with the production of computers, more than a thousand are engaged in the creation of software.

Pioneers, founders, and the most successful companies in Silicon valley:

Varian Associates is one of the pioneers of microwave technologies. They were the first to sign a lease agreement with Stanford University in 1951, and in 1953 they moved into an already built office in Silicon valley.

Hewlett—Packard — Hewlett — Packard Company (HP). Perhaps the first successful global multinational company from Silicon valley. Information technology, hardware and software, personal and tablet computers, smartphones, servers, storage devices, network equipment, printers, scanners, etc. Founded in 1939. Headquarters in Polo Alto. One of the most expensive companies, traded on the NYSE, the stock Ticker is HPQ.

Eastman Kodak-Eastman Kodak Co. (USA). The first company to create a digital camera. Founded in 1881. In 2013, it completed the bankruptcy procedure. Traded on the NYSE, the stock symbol is EC.

General Electric – General Electric (USA). Global, multi-industry Corporation, manufacturing-electrical, power, medical equipment, home appliances, transport engineering, aircraft engines, etc. Established in 1978. Traded on the NYSE, the stock Ticker is GE.

Lockheed Corporation, Lockheed Martin Corporation (USA). A global company operating in the defense and aerospace industries, the main customer and consumer is the US government. Founded in 1912. Located in Burbank, California. Traded on the NYSE, the stock symbol is LMT.

Intel – intel Corporation. (USA). Manufacturer of electronic devices and computer components – microprocessors, flash memory, SSD drives, network equipment, servers, chipsets. Established in 1968. Headquarters in Santa Clara. It is traded on NASDAQ, with the stock Ticker being INTC.

Apple – Apple Ink. (USA). Production of PCs, tablets, audio players, phones and software is an industry leader. Founded in 1976. Headquarters in Cupertino. One of the most expensive companies, traded on NASDAQ, the stock symbol is AAPL.

The most iconic people in Sillicon valley.

Frederick Emmons Terman-Professor at Stanford University, (son of Lews Terman, Creator of the IQ test), who is considered by many to be the father and ideologue and one of the first "business angels" of Silicon valley. In 1951, he led the creation of the Stanford industrial Park, on land donated by the University to house high-tech companies. For several decades, he participated in the development and formation of the main business incubator in the world. He encouraged his

students to create their own companies, some of which he invested his own funds in.

William Shockley - winner of the 1956 Nobel prize in physics. He invented the planar bipolar transistor and ran one of the first laboratories in Silicon valley. The initiator and participant of numerous scandals, was not as lucky as many of his former partners and employees, who left him, launched their own successful startups and created companies, in particular, Fairchild Semiconductor, Intel and many other projects, in total more than a hundred companies.

William Miller is a Professor of management and computer science at Stanford University. The founder of several successful startups and companies, one of the organizers of the joint Venture Silicon Valley Netvork network business community in Silicon valley. At the same time, he opened his first company at the age of 60!

The most successful silicon valley entrepreneurs are bill Hewlett, Dave Packard (Hewlett – Packard), Gary Hendricks (Symantec), Gordon Moore, Robbert Noyce and Andy grove (Intel), Larry Ellison (Oracle), Steve jobs and Steve Wozniak (Apple), bill gates (Microsoft), Pierre Omidyar (ebau), Jerry young and David Filo (Yahoo!), Larry page and Sergey Brin (Google), Evan Williams, Jack Dorsey, BIZ stone and Noah glass (Twitter), mark Zuckerberg (Facebook), Elon musk (PayPal, Tesla motors, SpaceX) and many, many others.

The most successful entrepreneurs in silicon valley, who come from the former USSR and Russia – Sergey Brin (Google), Jan Kum (WhatsApp), Valentin Gapontsev (IPG Photonics), Yuri Milner (investor – Facebook, Zynga, Twitter, Spotify, Groupon, etc.), Max Levchin (PayPal), Sergey Belousov (Parallels and Acronis), Grigory Shankman and Alex Miloslavsky (Genesys Telecommunications Laboratories and Exigen services), Stepan pachikov (paragraph and Evernote), David Yan (ABBYY, fine reader and Lingvo programs), Yuri frayman (viewdle), and many others. \*(According to various estimates, between 30,000 and 60,000 professionals and their families living in Silicon valley are from Russia.

Silicon valley is one of the three largest technology centers in the United States (along with new York and Washington), with about 400,000 it professionals working there. For every 1,000 employees in the valley, there are about 300 IT professionals. About 40% of all US engineers working in the field of electronics, computer science and computer engineering work in California.

In Silicon valley schools, the percentage of children with the highest IQ, measured by the methods adopted in the United States, is many times higher than the national average.

## References

https://ru.wikipedia.org/wiki/Кремниевая долина

https://zen.yandex.ru/media/papapomog/silikonovaia-dolina--chto-eto-pochemu-tak-nazyvaetsia-i-istoriia-5d39753995aa9f00ae39887e

https://businessrevisor.ru/2019/09/how-silicon-valley-got-its-name/

https://pikabu.ru/story/25 faktov o kremnievoy doline kotoryie vyi mogli ne znat 3111148

https://pikabu.ru/story/25\_faktov\_o\_kremnievoy\_doline\_kotoryie\_vyi mogli\_ne\_znat\_3111148