**' = Era**

**' = Provider**

**' = Rocket**

**🛰️ 1. The Dawn of Space & the Space Race (1957–1975)**

**Rockets, rivalry, and revolutionary firsts.**

The Space Age began with a spark — and quickly became a firestorm of ambition, anxiety, and awe. In a world polarized by political ideologies, space transformed into a high-stakes arena where technology, strategy, and symbolism collided.

The earliest artificial satellites soared above Earth, capturing the world’s imagination and escalating global tensions. Not long after, humans would ride rockets into the unknown, marking milestones that once belonged only to science fiction.

This was a time of bold declarations and daring missions. Everything was new: the machines, the methods, even the very concept of leaving Earth. Yet through all the risk and uncertainty, nations poured resources and genius into pushing beyond the sky.

**So who dared first? Who shaped this age of ‘firsts’?**  
➡️ *Choose your Provider to uncover the bold pioneers who launched the Space Age.*

**1. Soviet Space Program**

**provider\_id: ussr\_era1**  
**Launches:** 884  
**Country:** USSR  
**Type:** Government

**Description:**  
A pioneering force in early spaceflight, this program was responsible for several major breakthroughs in the early days of space exploration. Operating behind a veil of secrecy, it rapidly advanced rocketry and orbital technology, pushing the boundaries of what was thought possible.

Its missions captured the world’s attention, shaping public perception of the space race and setting new standards for ambition and innovation.

**Key Contributions:**

* Firsts in satellite and human spaceflight
* Development of robust orbital systems
* Highly active launch schedule

➡️ *Choose a rocket to explore one of their legendary launch vehicles.*

**1. Voskhod**

**Launches:** 259  
The **Voskhod** was a Soviet spacecraft designed for crewed missions, following up on the successes of the Vostok program. It was the first spacecraft capable of carrying a crew of three cosmonauts and was notable for its technical advancements, such as the absence of a spacesuit, allowing the crew to operate in a pressurized cabin. Voskhod missions were a testament to Soviet innovation during the height of the Space Race, including the first-ever spacewalk, which took place during Voskhod 2.  
**Key Features:**

* Multi-crew capacity
* Historic spacewalk (first-ever EVA by Alexei Leonov)
* Pioneering crewed missions in space

**2. Kosmos 11K63**

**Launches:** 115  
The **Kosmos 11K63** was a Soviet orbital launch vehicle used primarily for military and scientific satellite deployments. Though originally intended for military reconnaissance satellites, it proved versatile and was used for a wide range of payloads, including communications satellites and scientific missions. The Kosmos 11K63 represented the Soviet Union’s effort to build reliable and reusable rockets during the early years of the space race.  
**Key Features:**

* High versatility for both military and scientific purposes
* Capable of launching small payloads into low Earth orbit
* Reliable and consistent for its time

**3. Kosmos-3M**

**Launches:** 97  
The **Kosmos-3M** was a smaller Soviet rocket designed for launching small payloads into orbit, primarily used for scientific satellites. Known for its simplicity and reliability, the Kosmos-3M was widely used throughout the 1960s and 1970s, with a focus on communications and Earth observation. Despite its smaller size, the Kosmos-3M was a critical workhorse for the Soviet space program, especially during the era of expanding satellite networks and early space exploration.  
**Key Features:**

* Small payload capacity
* Reliable, low-cost option for satellite missions
* Focused on scientific and Earth observation payloads

**2. United States Air Force**

**provider\_id: usaf\_era1**  
**Launches:** 629  
**Country:** USA  
**Type:** Military

**Description:**  
The Air Force played a foundational role in the militarization and technical development of space in the early era. With high launch volumes and strategic priorities, it helped test the limits of payload delivery, satellite deployment, and high-altitude technologies.

Its legacy in space tech laid the groundwork for many modern launch systems and defense strategies still in use today.

**Key Contributions:**

* Pioneered satellite reconnaissance
* Tested various early launch vehicles
* Supported national security objectives in orbit

➡️ *Choose a rocket to see how military needs shaped early spaceflight.*

**1. Thor SLV-2A Agena D**

**Launches:** 61  
The **Thor SLV-2A Agena D** was a pivotal early rocket for the United States, designed for launching satellites into orbit, including reconnaissance satellites. A modified version of the Thor missile, it was used extensively during the 1960s and 1970s. The rocket’s role was crucial in both military and scientific contexts, as it supported early satellite deployments and reconnaissance missions for the U.S. military during the height of the Cold War.  
**Key Features:**

* Modified military missile system
* Key satellite launch vehicle for early reconnaissance missions
* Highly adaptable for various payloads

**2. Atlas SLV-3 Agena D**

**Launches:** 48  
The **Atlas SLV-3 Agena D** was another important U.S. launch vehicle during the early space era, notable for launching reconnaissance satellites, scientific payloads, and other space vehicles. It played a major role in the development of U.S. space capabilities, becoming a key vehicle for national security, as well as expanding scientific exploration beyond Earth’s atmosphere. The Atlas SLV-3 was a critical part of America’s early satellite and space missions.  
**Key Features:**

* Heavy-lift capability for larger payloads
* Significant role in military satellite launches
* Utilized for high-profile space science missions

**3. Thor DM-21 Agena-B**

**Launches:** 40  
The **Thor DM-21 Agena-B** was a key missile-based launch vehicle developed by the U.S. Air Force, used for both military and space science applications. The rocket was instrumental in deploying early communications satellites, as well as other space science payloads. The Thor DM-21 was a versatile system, often employed for classified military satellites as well as for civilian scientific missions during the Cold War.  
**Key Features:**

* Versatile system, used for both military and scientific payloads
* Adapted for high-altitude missions and satellite deployment
* Important in developing early satellite networks

**3. NASA – National Aeronautics and Space Administration**

**provider\_id: nasa\_era1**  
**Launches:** 121  
**Country:** USA  
**Type:** Civilian

**Description:**  
Formed at the height of the space race, this new civilian agency quickly became a central figure in global space exploration. With a mandate focused on peaceful scientific advancement, it undertook missions that captured the public imagination and inspired generations.

This provider’s early work combined cutting-edge engineering, intense pressure, and cultural impact — all directed toward pushing humans beyond the stratosphere.

**Key Contributions:**

* Major milestones in human spaceflight
* Pioneering planetary science missions
* Extensive use of test flights and unmanned craft

➡️ *Choose a rocket to dive into one of their iconic machines.*

**1. Saturn V**

**Launches:** 13  
The **Saturn V** is arguably the most famous rocket in history, responsible for launching the Apollo missions to the Moon, including the historic Apollo 11 mission that landed the first humans on the lunar surface. Developed by NASA, it was the most powerful rocket ever built, standing as a symbol of American ingenuity and the drive to achieve the seemingly impossible. The Saturn V remains the pinnacle of space exploration achievements in the 1960s and 1970s.  
**Key Features:**

* Most powerful rocket ever built
* Enabled the first humans to land on the Moon
* Integral to the success of the Apollo space program

**2. Titan II**

**Launches:** 10  
The **Titan II** was a dual-use rocket developed by the U.S. Air Force and adapted for the civilian space program. It was most famously used in the Gemini program to launch crewed missions to low Earth orbit. The Titan II’s success helped NASA pave the way for the Apollo missions, as it demonstrated the capability for reliable and precise crewed spaceflight.  
**Key Features:**

* Used for the Gemini space program
* Powered early crewed spaceflight missions
* A stepping stone toward more advanced space travel

**3. Scout B**

**Launches:** 10  
The **Scout B** was a smaller, solid-fuel rocket designed for launching lightweight payloads into space. It was used primarily for scientific missions, including small satellite launches and experiments in space. The Scout B was a key part of NASA’s early scientific space endeavors, offering a cost-effective and efficient way to explore space with smaller payloads.  
**Key Features:**

* Small, lightweight design for scientific payloads
* Cost-effective for small satellite missions
* Used for early space exploration and experimentation

**🚀 2. Stabilization & Early Cooperation (1975–1990)**

**From rivalry to rendezvous — and the rise of new voices.**

The red-hot tension of the Space Race began to cool, but space exploration didn’t slow down — it evolved. In this era, rockets still roared, but diplomacy echoed louder. The Apollo-Soyuz handshake in orbit marked more than a photo op; it symbolized a shift from conquest to collaboration.

Spacecraft grew smarter, more sustainable. Missions stretched longer, and orbital platforms like Salyut and Mir became homes above Earth. Meanwhile, fresh players emerged: Europe found its voice through Arianespace, and global ambition began to reshape the skies.

This period wasn’t just about planting flags. It was about building infrastructure, forging partnerships, and making space a shared human endeavor.

**So who helped redefine the mission? Who turned competition into cooperation?**

➡️ *Choose your Provider to explore the programs and rockets that reshaped the space frontier.*

**1. Soviet Space Program**

**provider\_id: ussr\_era2**  
**Launches:** 1408  
**Country:** USSR  
**Type:** Government

**Description:**  
With the fire of firsts behind them, the Soviet Union evolved its space program into a consistent, high-output machine. Crewed missions became longer and more complex, satellites more capable, and launch vehicles more reliable. This era showcased Soviet strength in orbital infrastructure and logistics, helping maintain a continuous presence in space.

**Key Contributions:**  
• Long-duration habitation on Salyut and Mir  
• High-frequency, dependable launches  
• Development of heavy-duty and specialty rockets

➡️ Choose a rocket to explore one of their spaceflight stalwarts.

**1. Soyuz U**

**Launches:** 533

A true workhorse of Soviet (and later Russian) rocketry, the Soyuz U was an incredibly reliable vehicle used for a wide variety of missions — from crewed flights to orbital stations to scientific and military satellite launches. It was essential in supplying space stations like Salyut and Mir, and its legacy lasted well beyond the Cold War.

**Key Features:**  
• Exceptionally high launch rate and reliability  
• Used for crew transport, cargo, satellites, and test flights  
• Longest-serving rocket in the world at its peak  
• Supported the Intercosmos program, flying international cosmonauts

**2. Kosmos-3M**

**Launches:** 263

Though it originated in the earlier period, the Kosmos-3M remained a backbone for small-payload missions through the late 1980s. Its two-stage, liquid-fueled design made it ideal for launching Earth observation, scientific, and military satellites into low Earth orbit.

**Key Features:**  
• Small, two-stage orbital launch vehicle  
• Reliable, low-cost, and efficient  
• Used for navigation, communications, and atmospheric research  
• Key component in the USSR’s dense launch cadence

**3. Molniya-M**

**Launches:** 157

Designed to conquer high-latitude communications challenges, the Molniya-M launched satellites into elliptical orbits that offered extended coverage over northern territories. It became the backbone of the Soviet Union’s long-range communications and early warning systems.

**Key Features:**  
• Specialized for Molniya orbit (highly elliptical)  
• Enabled communications across remote and polar regions  
• Often used with early warning and intelligence satellites  
• Strong lifting power with four strap-on boosters

**2. United States Air Force**

**provider\_id: usaf\_era2**  
**Launches:** 244  
**Country:** USA  
**Type:** Military

**Description:**  
While NASA pushed frontiers of science and exploration, the USAF stayed focused on precision, defense, and reliability. Their rockets enabled early GPS, military communications, and reconnaissance satellites to flourish. Behind many civilian achievements were USAF vehicles doing quiet but critical work.

**Key Contributions:**  
• Developed and launched strategic military satellites  
• Innovated multi-stage and upper-stage combinations  
• Enabled new capabilities in surveillance and geolocation

➡️ Choose a rocket to see how the military helped space systems mature.

**1. Atlas SLV-3D Centaur**

**Launches:** 26

A sophisticated upgrade to earlier Atlas-Centaur models, the SLV-3D version featured improved performance and flexibility. The Centaur upper stage — powered by liquid hydrogen — allowed for precise insertion into high orbits, supporting a mix of scientific and defense payloads.

**Key Features:**  
• Upper stage powered by liquid hydrogen/oxygen  
• Used for weather, intelligence, and interplanetary missions  
• Enabled high-precision orbit placement  
• Supported payloads for both USAF and NASA

**2. Delta 2914**

**Launches:** 26

Part of the long-running Delta rocket family, the 2914 variant was a medium-lift vehicle that carried a variety of payloads — from weather and communications satellites to early GPS experiments. Its solid boosters and customizable stages made it adaptable and reliable.

**Key Features:**  
• Modular configuration for varied missions  
• Used for weather satellites (NOAA, TIROS), navigation, and comms  
• Reliable solid boosters for lift and control  
• Crucial in transitioning to more commercial space operations

**3. Titan IIIC**

**Launches:** 15

Titan IIIC was the heavy-lifter in the Air Force's rocket lineup. With solid rocket motors and a powerful core, it could carry bulky, complex payloads. It supported classified missions, secure communications, and experimental spacecraft — often under tight Cold War secrecy.

**Key Features:**  
• High thrust with two massive solid rocket boosters  
• Used for military communications (DSCS) and SIGINT payloads  
• Supported early space-based missile warning systems  
• Complex vehicle with multiple stages and large fairing options

**3. Arianespace**

**provider\_id: arianespace\_era1**  
**Launches:** 33  
**Country:** Europe  
**Type:** Commercial

**Description:**  
Europe’s entry into the launcher arena came with a bold mission: to offer competitive, independent access to space. Arianespace broke ground as the first commercial launch provider, opening the doors to global satellite customers and proving Europe could build, launch, and lead.

**Key Contributions:**  
• Introduced commercial launch competition  
• Established Europe's independence from US/Soviet rockets  
• Supported international telecom and science payloads

➡️ Choose a rocket to see how Europe launched its way onto the global stage.

**1. Ariane 3**

**Launches:** 11

Building on the success of its predecessors, Ariane 3 added strap-on solid boosters to boost payload capacity and improve orbital accuracy. It was used to deploy telecommunications satellites and marked the beginning of Europe’s reliable dual-payload strategy.

**Key Features:**  
• Enhanced lift via two solid rocket boosters  
• Dual-launch capability for geostationary satellites  
• Core player in commercial telecom satellite deployment  
• Marked Europe’s growing global competitiveness

**2. Ariane 1**

**Launches:** 10

Europe’s first homegrown orbital launch vehicle, Ariane 1 set the stage for a new kind of player in the space world. With a mix of solid and liquid stages, it launched experimental, scientific, and communications satellites — often for international customers.

**Key Features:**  
• Three-stage design with liquid fuel  
• Focused on telecom and scientific satellites  
• First non-superpower to provide launch services  
• Paved the way for a self-reliant European space sector

**3. Ariane 2**

**Launches:** 6

An incremental upgrade over Ariane 1, this version featured improved engines and avionics. Though flown fewer times, it played a key transitional role and helped validate new technologies for the upcoming Ariane 4.

**Key Features:**  
• Upgraded propulsion and guidance  
• Carried medium-weight telecom payloads  
• Served as a stepping stone to higher-capacity rockets  
• Solidified Europe's technical capability and launch reliability

**🌍 3. International Collaboration & the ISS Era (1990–2010)**

**One orbit. One outpost. Many nations.**

The end of the Cold War opened the door for unprecedented cooperation. Where competition once dominated, now collaboration flourished. Engineers, astronauts, and scientists from around the world came together to do something once unthinkable: build a shared home in space.

Orbit wasn’t just a destination anymore — it became a community. The dream of a permanent human presence above Earth came alive, module by module, mission by mission.

While humans worked together in orbit, robotic explorers stretched farther than ever. Mars revealed its secrets. Asteroids were studied up close. New eyes turned toward the edge of the solar system.

This was a period of shared dreams, joint risks, and stunning achievements — not by one nation, but by many.

**But who brought the pieces together? Who made this new era of unity possible?**  
➡️ *Choose your Provider to find out who turned space into a global project.*

**🌐🚀 4. The New Space Era & Commercial Revolution (2010–Present)**

**Private rockets, planetary dreams, and a new kind of space race.**

In recent years, space has been transformed. No longer the exclusive domain of government programs, it now thrives with a mix of private ambition, public investment, and global competition. The result? Faster progress, lower launch costs, and a burst of creativity unlike anything before.

Reusable rockets returned from orbit and landed on Earth like something out of a movie. Crewed missions took off from new launchpads. Smaller nations launched big missions. Even individuals — not just astronauts — began to venture to the edge of space.

At the same time, our sights stretched further: the Moon, Mars, deep space telescopes, and plans for future outposts across the solar system. Space is once again the frontier of human ambition — only this time, the cast is bigger, and the rules are changing.

**Who’s writing this next chapter? Who’s shaping the future?**  
➡️ *Choose your Provider to meet the movers, dreamers, and disruptors of today’s space revolution.*