



NOOSPHERE
VENTURES
Technology Knowledge Humanity

VENTURE INVESTMENTS IN THE SPACE MARKET

Q2 2021 REPORT

www.noosphereventures.com

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OUR METHODOLOGY AND DATA SOURCES



Venture Investments in the Space Market reports on venture type of investments at all stages and equity investments in space startup companies on a quarterly basis.

Our report dataset is sourced from databases such as PitchBook, Crunchbase, FactSet, NewSpace Hub, CB Insights and other sources.

The dataset only includes publicly reported deals, it does not include proprietary investment information.

OUR DEFINITION

A company in the space market is a business entity that provides products or services, including, but not limited to:

- satellite manufacturers constructing space satellite platforms of all sizes for commercial, scientific and military purposes
- providers of payloads, satellite parts or spacecraft components
- launch vehicle manufacturers and launch service providers
- rocket engine manufacturers
- companies related to the satellite sector, including satellite operators and satellite service providers, companies with products and services based on GPS and GNSS systems, satellite connectivity and other satellite technologies to provide services
- companies involved in exploring and commercializing outer space, such as space tourism, space mining and setting up space colonies
- companies manufacturing satellite ground equipment such as antennas, VSAT, SSPAs & BUCs, etc. intended primarily for the B2B market
- data analytics companies actively using satellite imagery and other Earth observing methods to create products and services, remote sensing and geospatial analytic products and services

Q2 2021 VENTURE INVESTMENTS: THE KEY NUMBERS

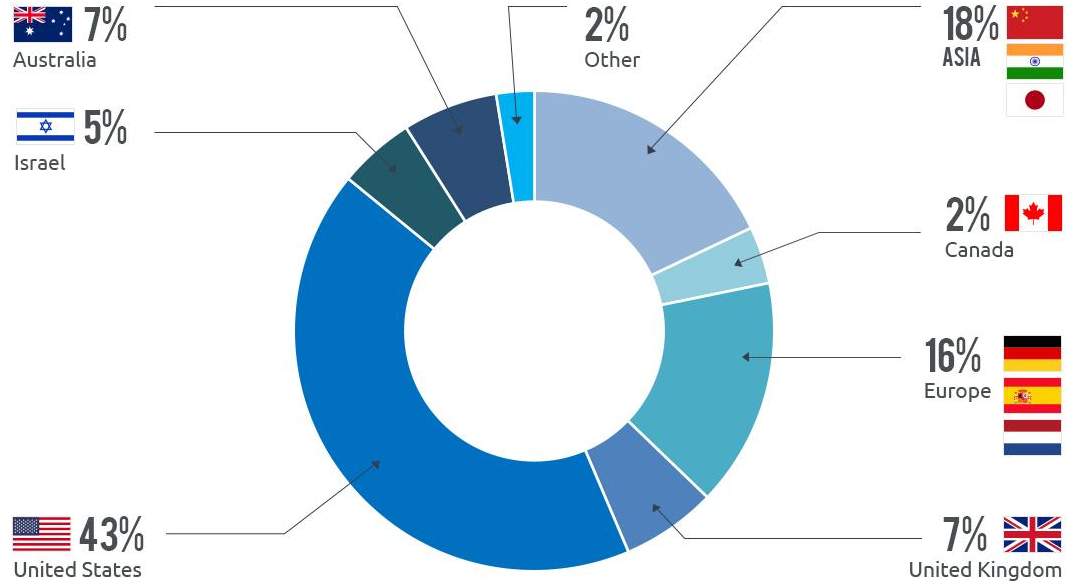
78 Rounds closed

\$2.2B Total funding*

290+ Venture capital firms participated in the deals

APPROX. 55% Funding of Launch Vehicle projects

INVESTED COMPANIES BY GEOGRAPHIC AREA



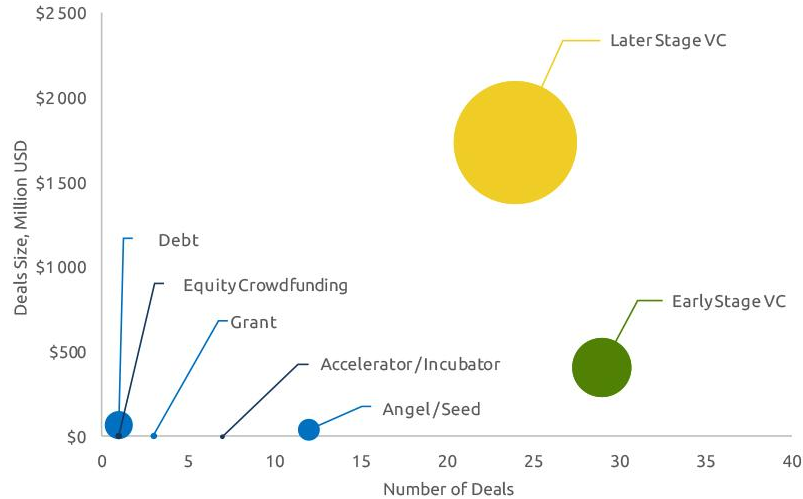
Countries with two or more deals are shown

NUMBER OF DEALS BY LOCATION OF EACH COMPANY HEADQUARTERS

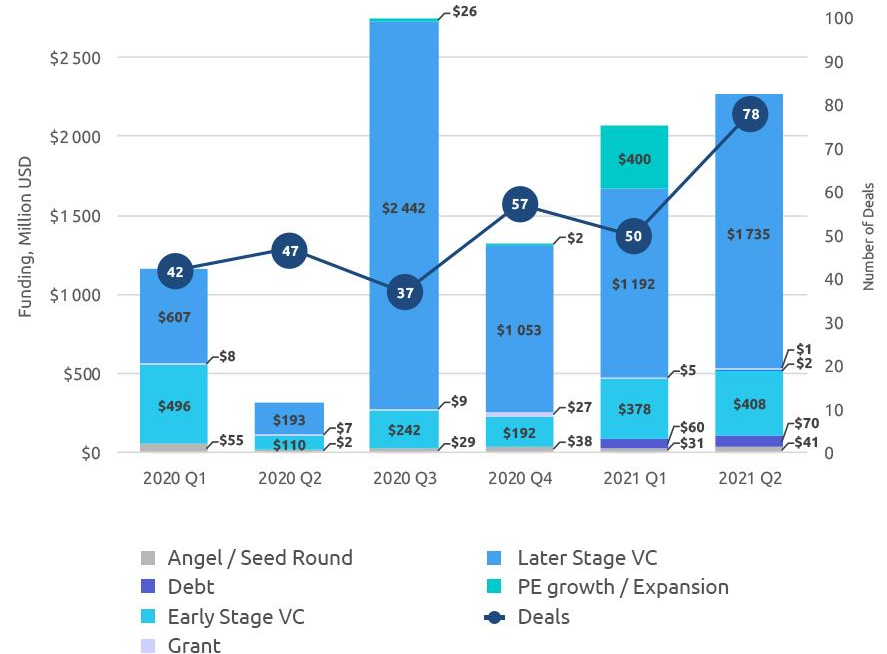
* Add-on of SpaceX amended round (from \$850M to \$1.164B) included in Q2 2021

Q2 2021 VENTURE DEALS BY STAGE

DEAL TYPES

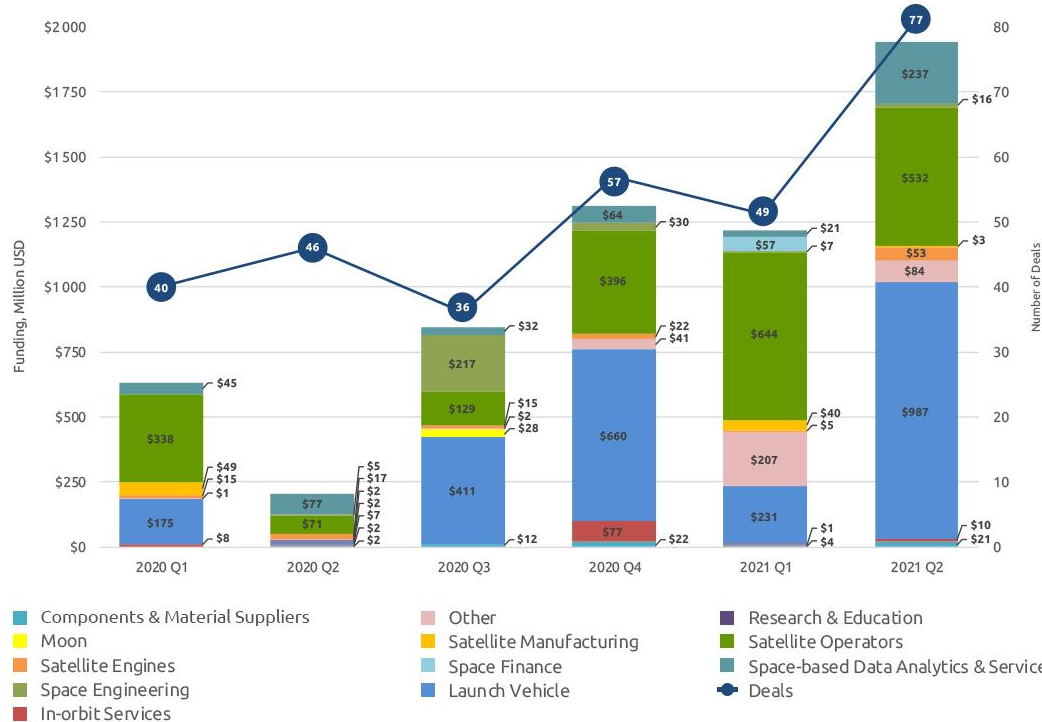


DEALS BY STAGE

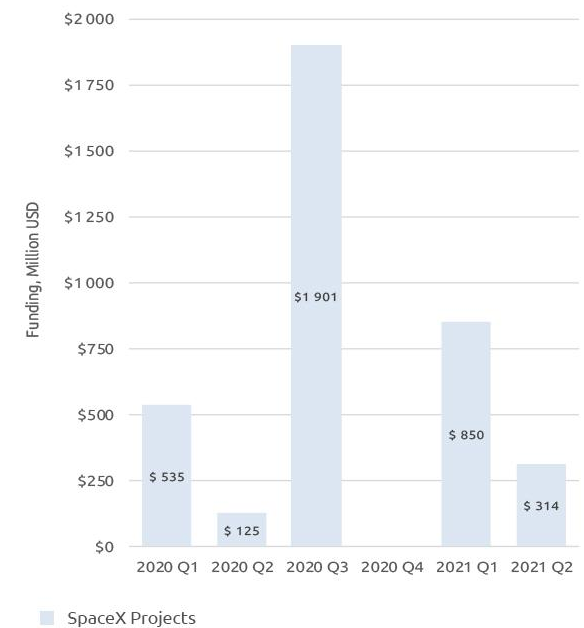


Q2 2021 VENTURE DEALS BY INDUSTRY

DEALS BY INDUSTRY (excluding SpaceX deals)

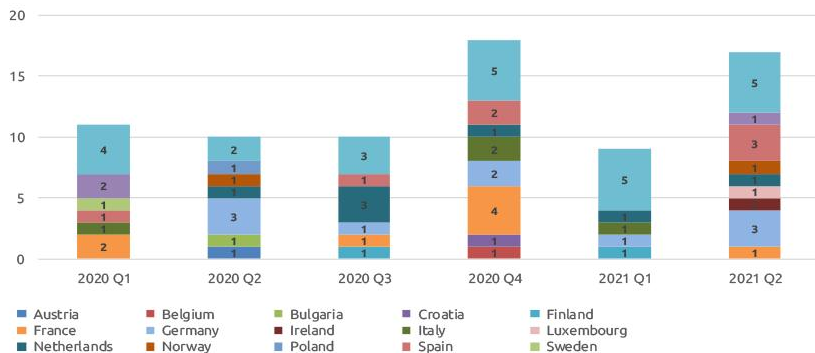


SPACE X DEALS

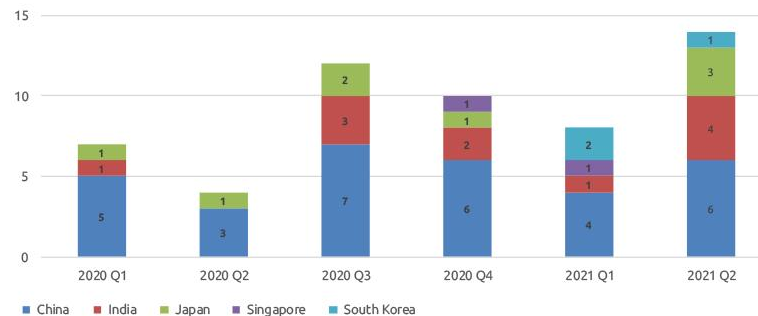


Q2 2021 VENTURE DEALS BY GEOGRAPHIC AREA

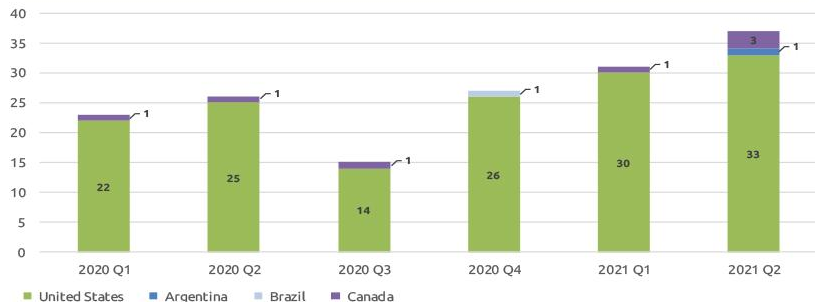
NUMBER OF DEALS IN EUROPE AND UNITED KINGDOM



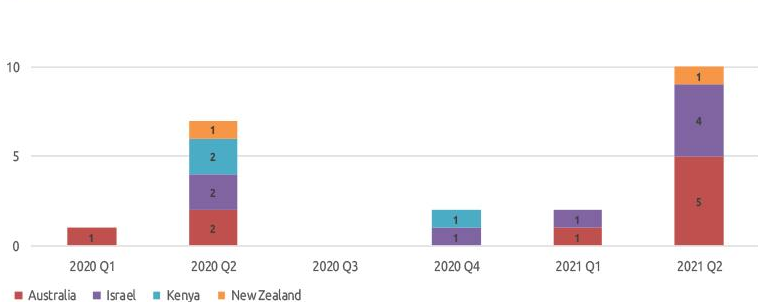
NUMBER OF DEALS IN ASIA



NUMBER OF DEALS IN NORTH AND SOUTH AMERICA



NUMBER OF DEALS IN OTHER REGIONS



Q2 2021 LARGEST VENTURE INVESTMENT DEALS



SPACEX PROJECTS

\$1.2B | **\$6.7B** Total Raised

SpaceX filed an amendment to its previous funding of \$850M. The company continues to develop its ambitious programs, an internet satellite constellation Starlink, and a massive rocket Starship.



LAUNCH VEHICLE

\$650M | **\$1.3B** Total Raised

Following the announcement of its fully reusable, entirely 3D printed rocket, Terran R, the company intends to use the funding to scale this program and long-term infrastructure development.



SATELLITE OPERATORS

\$250M | **\$364M** Total Raised

The funds will be used to expand the production of geostationary communications microsattellites MicroGEO, built to improve access to internet connectivity.



SATELLITE DATA SERVICES

\$100M | **\$100M** Total Raised

The company is working on weather services and an intelligence platform, bringing together the power of a high-resolution weather radar and satellite network, with advanced weather prediction modeling.



LAUNCH VEHICLE

\$75M | **\$275M** Total Raised

The funds will be used to support design work on a medium-class launch vehicle, called Beta leading toward a conceptual design review.



SATELLITE OPERATORS

\$70M | **\$470M** Total Raised

The company expects this financing will help accelerate the roll-out of inter-satellite links, cutting edge technology that reduces data latency for customers, especially in the aviation industry.



LAUNCH VEHICLE

\$68M | **\$177M** Total Raised

Isar Aerospace aims to be the first European company to build a satellite launcher. The company is currently developing a launch vehicle named Spectrum capable of lifting 1000kg into LEO.



OTHER

\$65M | **\$100M** Total Raised

The resources will be used to accelerate the global deployment of next-generation radars for tracking small debris and satellites in LEO, and to expand the development of scalable LEO mapping and Space Situational Awareness platform.



LAUNCH VEHICLE

\$62M | **\$62M** Total Raised

The company is developing a series of Gravity rockets to provide launches to LEO and SSO within a short time frame.



SATELLITE OPERATORS

\$60M | **\$90M** Total Raised

The round provides the company with capital for the continued scaling of its on-orbit satellite communications network. Additionally, the funds will be used to enhance the team and US expansion.

Q2 2021 VENTURE INVESTMENTS LIST



COMPANY	STAGE	DEAL AMOUNT, USD MILLIONS	TOTAL FUNDING, USD MILLIONS
COMPONENTS & MATERIAL SUPPLIERS			
Astrix Astronautics	Angel / Seed	NM	NM
Frontier Aerospace	Later Stage VC	\$6	\$6
Hadrian	Early Stage VC	\$10	\$10
Hangsheng Satellite	Later Stage VC	\$5	\$5
Nitrexo	Grant	NM	NM
Obruta Space Solutions	Accelerator / Incubator	NM	NM
IN-ORBIT SERVICES			
Atomos Space	Early Stage VC	\$5	\$5
ClearSpace	Early Stage VC	\$4	\$4
LIFT ME OFF	Early Stage VC	NM	NM
SCOUT	Early Stage VC	NM	NM
LAUNCH VEHICLE			
Agnikul	Early Stage VC	\$11	\$15
B2Space	Angel / Seed	\$1	\$2
CAS Space Exploration (China)	Early Stage VC	\$31	\$91
Dawn Aerospace	Later Stage VC	NM	\$5
Firefly Aerospace	Later Stage VC	\$75	\$275
Gilmour Space Technologies	Later Stage VC	\$47	\$64
Isar Aerospace	Later Stage VC	\$68	\$177
Launcher	Early Stage VC	\$12	\$16

Q2 2021 VENTURE INVESTMENTS LIST



COMPANY	STAGE	DEAL AMOUNT, USD MILLIONS	TOTAL FUNDING, USD MILLIONS
LAUNCH VEHICLE			
Link Space Aerospace (China)	Early Stage VC	\$16	\$16
Oriental Space (China)	Early Stage VC	\$62	\$62
Pangea Aerospace	Early Stage VC	\$4	\$6
Relativity Space	Later Stage VC	\$650	\$1 335
Skyroot Aerospace	Early Stage VC	\$11	\$13
OTHER			
AstronetX	Angel / Seed	NM	NM
Digantara	Accelerator / Incubator	NM	NM
Helios	Early Stage VC	NM	NM
LeoLabs	Later Stage VC	\$65	\$100
New Ascent	Accelerator / Incubator	NM	NM
Orbital Assembly	Equity Crowdfunding	\$1	NM
Ramon.space	Later Stage VC	\$18	\$18
RESEARCH & EDUCATION			
Hudson Space Systems	Equity Crowdfunding	NM	NM
SATELLITE ENGINES			
ienai SPACE	Early Stage VC	\$1	\$1
Orbion Space Technology	Later Stage VC	\$20	\$32
Phantom Space	Early Stage VC	\$5	\$5

Q2 2021 VENTURE INVESTMENTS LIST



COMPANY	STAGE	DEAL AMOUNT, USD MILLIONS	TOTAL FUNDING, USD MILLIONS
SATELLITE ENGINES			
Phase Four	Later Stage VC	\$26	\$40
Prime Lightworks	Equity Crowdfunding	\$1	NM
SATELLITE MANUFACTURING			
Alba Orbital	Angel / Seed	\$3	\$4
MinoSpace	Early Stage VC	NM	\$16
SATELLITE OPERATORS			
Albedo	Angel / Seed	\$10	\$10
Astranis	Later Stage VC	\$250	\$364
Axelspace	Later Stage VC	\$24	\$67
GalaxEye	Angel / Seed	NM	NM
HawkEye 360	Later Stage VC	\$55	\$155
Kepler Communications	Early Stage VC	\$60	\$90
Muon Space	Angel / Seed	\$10	\$10
OroraTech	Early Stage VC	\$7	\$8
Satellite Vu	Angel / Seed	\$5	\$7
Satlantis	Later Stage VC	\$17	\$19
Spire	Debt	\$70	\$469
Unseenlabs	Later Stage VC	\$24	\$32

Q2 2021 VENTURE INVESTMENTS LIST



COMPANY	STAGE	DEAL AMOUNT, USD MILLIONS	TOTAL FUNDING, USD MILLIONS
SPACE ENGINEERING			
CONTEC	Early Stage VC	\$11	\$11
Quasar	Early Stage VC	NM	NM
RBC Signals	Angel / Seed	\$1	\$3
Sperospace	Accelerator / Incubator	NM	NM
Warpspace	Early Stage VC	\$4	\$6
SPACE-BASED DATA ANALYTICS & SERVICES			
ArchiStar	Later Stage VC	\$6	\$14
Arlula	Accelerator / Incubator	NM	NM
Auravant	Later Stage VC	\$2	\$3
Boomitra	Angel / Seed	\$4	\$4
Boston Geospatial	Accelerator / Incubator	NM	\$1
BreezoMeter	Later Stage VC	\$30	\$42
Climavision	Early Stage VC	\$100	\$100
Dynaspace	Angel / Seed	NM	NM
F Squares Technology	Early Stage VC	NM	NM
Firemaps.net	Early Stage VC	\$5	\$5
Fraym	Later Stage VC	\$7	\$18
GorillaLink	Accelerator / Incubator	NM	NM
Horizon Technologies	PE Growth / Expansion	NM	NM
Hydrosat	Angel / Seed	\$5	\$10















Q2 2021 VENTURE INVESTMENTS LIST



COMPANY	STAGE	DEAL AMOUNT, USD MILLIONS	TOTAL FUNDING, USD MILLIONS
SPACE-BASED DATA ANALYTICS & SERVICES			
Kettle	Early Stage VC	\$25	\$30
LiveEO	Early Stage VC	\$6	\$8
Pachama	Early Stage VC	\$15	\$24
PlanetWatchers	Later Stage VC	\$4	\$7
Sagri	Early Stage VC	\$1	\$1
SatSense	Early Stage VC	\$2	\$4
SkyWatch	Later Stage VC	\$17	\$28
Ursa Space Systems	Later Stage VC	\$7	\$40
SPACEX PROJECTS			
SpaceX	Later Stage VC	\$314	\$6 688

Q2 2021 LANDMARK M&A DEALS



TARGET COMPANY	INDUSTRY	ACQUIRER	DEAL SIZE	ANNOUNCEMENT	POSSIBLE CONTRIBUTION
 ORBCOMM	Satellite Operators	GI PARTNERS	\$1.1B	08 April 2021	GI Partners is a leading US-based investor in the data infrastructure business. The investment will support the company's strong momentum in the industrial IoT and help to accelerate growth, execute on its long-term strategic plan and global market expansion and provide added flexibility as a privately-held company.
 DRAGONFLY aerospace	Satellite Manufacturing	Dr. Max Polyakov	NA	26 April 2021	This purchase cements Dragonfly Aerospace's status as a critical component of the vertically integrated space ecosystem, being built by Dr. Polyakov and Noosphere Ventures that includes Firefly, the competitively-priced space launch provider, EOS Data Analytics (EOSDA), a satellite data and analytics company with its own radar and optical satellite constellations, and SETS, a space electric thruster systems firm.
 INTEGRATED MICROWAVE	Components & Material Suppliers	 knowles	NA	01 May 2021	With this acquisition, the Knowles Precision Devices Microwave group can offer a complete range of RF and Microwave filtering solutions supporting VHF to Ka band.
 Apollo Fusion	Satellite Engines	 ASTRA	\$145M	03 June 2020	This acquisition allows Astra to provide launch and space services beyond LEO, to medium Earth orbit, geosynchronous, and lunar orbits.
 TrustComm	Other	 OneWeb	NA	10 May 2021	According to OneWeb's Head of Government Services, the acquisition underpins a strategy to rapidly scale a satellite communications service to the U.S. Department of Defense and other government agencies, as they look to integrate high throughput, low latency solutions to meet new connectivity demands.
 Prototech	Space Engineering	 Akers Capital LLC	NA	10 June 2021	The acquisition provides access to a portfolio of industrial technology solutions and R&D capabilities that underpin Aker's strategic development in energy transition.
 SYNOPTA	Components & Material Suppliers	 GENERAL ATOMICS	NA	14 June 2021	According to the President of General Atomics Electromagnetic Systems Group, Synopta will supplement the diverse portfolio of laser communications, sensors, and ground systems, which enable the delivery of dependable solutions to governments and other customers, expanding to the United States and other countries.
 SPACECOM MAKING SPACE FEEL CLOSER	Satellite Operators	 4iG	\$127M	15 June 2021	The acquisition will allow 4iG to continue building its telecommunications portfolio and expanding its space industry business.

Q2 2021 NEWLY ANNOUNCED SPAC DEALS

ANNOUNCEMENT DATE	May 12, 2021
TARGET COMPANY	Arqit
USE OF FUNDING	Arqit plans to use financing for the launch and construction of two satellites in 2023 to protect against growing hacking threats.
SPAC	Centricus Acquisition
TRANSACTION STRUCTURE	
Sources:	
- SPAC cash in trust (IPO Proceeding)	\$345
- PIPE Investments	\$71
- Existing cash	-
Uses:	
- Cash to Balance Sheet	\$376
- Debt Repayment	-
- Cash to Existing Equity Holders	-
- Fees & Expenses	\$40
Existing Equity Holders Valuation	\$900
CLOSING DATE	H2 2021

VENTURE FUNDS TARGETING THE SPACE MARKET



FUND



FOUNDED

2014

2007

2006

2020

ICONIC INVESTMENTS



CURRENT FOCUS

Current investment plans are to add various companies from different segments of the space ecosystem to our portfolio. These include:

- Component suppliers for small satellites.
- Small satellite manufacturers.
- Space tugs and debris removal systems.
- Ground and communication services.
- Earth observation and data analysis.
- Moon projects and commercial deep space exploration missions.

Singular focus on early-stage space ventures put them in the position to weed out unqualified proposals for investment. Fewer than 5% of applications satisfied their investment criteria.

The fund invests in both downstream (software), and upstream (hardware) NewSpace opportunities, along with technologies which rely on satellite data such as drones and the Internet of Things, or which have potential space applications such as artificial intelligence, robotics and nanomaterials.

The fund aims to invest in both upstream and downstream technologies: the former include all those products and services that constitute the space infrastructure, while the latter includes ground applications enabled by space technologies.

ABOUT NOOSPHERE VENTURES



NOOSPHERE VENTURES

Is a team of professionals who believe in New Space and are building streamlined space businesses. We invest in world class teams, who are creating breakthrough technologies, transformative business models, and strong intellectual properties aimed at changing the world.

CONTACTS

If you have a relevant business that is looking for venture capital funding, submit your business plan for review to pitchdeck@noosphereventures.com

Our profession team have excellent investment and technical backgrounds, and our expertise helps to assess the prospects of projects and pursue them for many years to come.

For questions and feedback about the report get in touch here at:
industry@noosphereventures.com

OUR SPACE PORTFOLIO



ABOUT NOOSPHERE VENTURES

We are engaged in the strategic development and expansion of the space sector.

We invest in teams and companies from seed to emerging growth stages and provide a powerful combination of capital and alternative resources for space companies. We are happy to lead deals or syndicate with other quality investors.

So far, we have invested over \$200M in Firefly Aerospace, a launch vehicles provider, as well as lower amounts in other projects.

“The democratization and commercialization of space attracts a lot of speculative money, which tends to have a short-term approach. Our strategy, on the contrary, is to build a company with a long-term future.

I am a strong believer that investing in world-class entrepreneurial teams, breakthrough technologies, transformative business models, and strong intellectual property can change the world – and I am convinced that we’re doing just that.

– Dr. Max Polyakov

<https://spacenews.com/noosphere-ventures-aims-to-build-an-integrated-space-powerhouse-qa-with-managing-partner-max-polyakov/>

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DR. MAX POLYAKOV

Managing Partner of Noosphere Ventures