

Next Generation Space Defense

MilsatMagazine

December 2021

***United Launch Alliance Atlas V
launch of USSF's STP-6 mission***



AFFORDABLE MILSATCOM CONNECTIVITY



The quest for technological superiority and innovation makes sense when armed forces are trying to preserve and reinforce their strategic advantage. The Digital Transformation of the military continues to shape the future of global security. Seamless collaboration and communication are crucial for helping defense agencies realize a more modern way of working and managing themselves more effectively; sharing vast amounts of critical information (including voice, data and video) in real time makes military maneuvers more efficient and effective.

Combat troops need fast, reliable and secure communications in areas beyond the bounds of traditional fixed and wireless networks. **SATCOM-on-the-Move (SOTM)** communications is a game-changer for today's Net-Centric battlefield, enabling soldiers and homeland security personnel to gain instant access to critical information while staying in touch with command headquarters.



2021 was a great year for Gilat's achievements in the Defense segment worldwide.

STRATEGIC FOCUS: THE DEFENSE MARKET

Gilat offers government and defense organizations a set of advanced **SOTM / SATCOM-on-the-Pause (SOTP)** solutions for all types of platforms to ensure assets in the field are connected at all times to central operations. Our high-performance and quick-to-deploy systems provide fast and reliable broadband connectivity for any mission,



as well as supporting a diverse range of civilian services. More specifically, Gilat's End-to-End SATCOM solutions have been designed specifically to meet the needs of today's Net-Centric battlefield, including: flexible, secure platforms for huge amounts of data and high-bandwidth applications to connect soldiers, platforms and terminals across land, sea and air; continuous and resilient connectivity to ensure that information is available when, where and how it is needed; with all necessary technology, equipment, applications, products and solutions under one roof.

Gilat's full scale, state of the art SATCOM solutions are fully equipped to provide the constant flow of two-way secured broadband that include intelligence, live video, voice, command and control information and enemy/friendly forces locations and operational commands. Offering antennas, modems, BUCS, manpacks and unmanned platforms, Gilat supports any SOTM/SOTP use case and any platform.



To further Gilat's strong position in the Defense Market, BG (Res.) **Eyal Zelinger** was hired at the end of 2020 to lead the company's Defense Division as Global Defense Vice President. Retired from the **Israel Defense Forces (IDF)**, Eyal was brought onboard to maximize global opportunities for Gilat's Defense business.

Prior to his retirement at the rank of Brigadier General, he served as the Chief Signal Officer and C4i/J6 Chief of Staff.



Eyal Zelinger

YEAR IN REVIEW: GILAT SATELLITE NETWORKS

Gilat's military SATCOM expertise and operational experience positions Gilat as an excellent choice for today's modern militaries as shown in the following awards during 2021.

MULTIPLE DEFENSE GLOBAL AWARDS

Gilat's global footprint in the Defense Market expanded, thanks to a number of large-scale deals.

In the Far East, Gilat received a contract to provide satellite communication equipment to defense forces in Asia via a large system integrator. Gilat's renowned, multi-application platform, **SkyEdge II-c**, **Capricorn VSATs** and **TotalNMS**



Gilat's SkyEdge II-c



Gilat's TotalNMS

will serve the needs of the defense forces to provide tactical SATCOM solutions for fixed and mobile platforms as well as enable efficient communication channels during emergency and disaster response in addition to the critical C4I (**Command, Control, Communications, Computers, & Intelligence**) needs. Multiple hubs and hundreds of VSATs will be deployed in redundant configurations to meet the critical security needs, as well as the high quality and key regulatory requirements.

This significant contract was awarded to Gilat due to the company's superior technology, highly secure solution, proven global track record and commitment to the local market. Gilat also demonstrated that its SkyEdge II-c platform answers the most stringent military requirements and thus provides the technological capability to enable today's demand of digital warfare, wherever and whenever digital information is required.

On the other side of the world, in Latin America, Gilat was awarded multiple projects for the armed forces. Gilat works closely with its partner, **Newsat**, the defense integrator in **Latin America** (LATAM), to provide end-to-end projects, including installations and remote maintenance to the armed forces for fixed, airborne, maritime and mobile military applications.

Gilat's one-stop-shop for defense satellite communication technology includes Gilat's SkyEdge II-c platform, modems, antenna terminals and BUCs. Gilat provides multiple fixed and mobile communications solutions in Latin America to support the General Command, Army, Navy and Air Force security, diversity and contingency needs, thus providing the confidence required for special and critical operations.

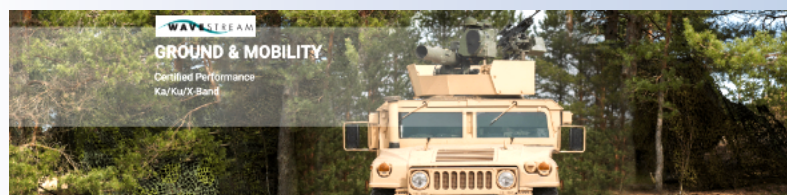
Gilat was selected in LATAM based on the firm's ability to provide the required increased high network availability and backup capabilities for multiple applications and critical operations that are required to support joint or individual operations. Newsat brings strong knowledge and expertise in managing and integrating the complex and battle proven military projects, leveraging Gilat's equipment for satellite communication which is specifically tailored to meet a wide variety of global defense needs.

In another region of the world, Gilat was awarded a contract to be the sole SATCOM equipment provider to address the most advanced present and future defense connectivity requirements. qGilat was tabbed for its unique ability to meet the demands of today's modern battlefield. As digital transformation has increased the importance of satellite-based communication solutions on the battlefield, Gilat's advanced technology exhibits superior performance and efficiency, thereby meeting the long-term requirements of the defense market.



U.S. DEFENSE PROJECTS

Throughout 2021, Gilat received numerous awards to provide amplifiers to defense organizations around the world. The next generation, high-power, solid-state amplifiers are designed and manufactured by **Wavestream**, a wholly owned subsidiary of Gilat, for integration into mission-critical Ground, Sea and Airborne SATCOM systems.

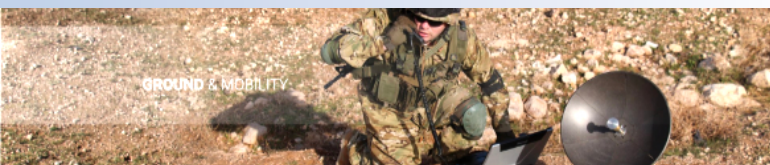


YEAR IN REVIEW: GILAT SATELLITE NETWORKS

Gilat received a large order from the United States Army for a military communication program contract. With this award, an industry record shipment milestone was achieved by surpassing 5,000 units of Wavestream, high-power, **50W Ka-band military Block Upconverters (BUCs)** delivered to this military program over a 14-year period.

Furthermore, a Tier-1 US terminal provider awarded Gilat a contract to provide several hundred **Solid State Power Amplifiers (SSPAs)** for SATCOM terminals for militaries worldwide. The Wavestream **MicroStream Ka-band SSPAs** were selected due to their ability to provide the required power and linearity in the low **SWaP (Size, Weight and Power)** solution essential for tactical and expeditionary military users. The terminals will serve tactical defense users throughout the world.

Gilat received another order from the U.S. Army to supply high-performance BUCs for tactical communications. Additional **50W Ka-band Wavestream BUCs** are supplied for program sustainment that is well into its second decade.



The **Wavestream Matchbox 50Ka MIL** was originally fielded by the U.S. Army in **WIN-T Increment 1** as early as 2007 and is still active in service today. With more than 5,000 amplifiers shipped to date, this is easily the largest deployment of high-performance, Ka-band BUCs supporting **Comms-on-the-Quick-Halt (COTQH)** tactical communications around the world.

Gilat also received a significant order from a customer in support of a military communications program run by the **U.S. Department of Defense (DoD)**. The new generation of **Wavestream Block Upconverters (BUCs)** were selected based on their ability to successfully meet the DoD program's requirement for interoperability on multiple satellite constellations at multiple frequencies.

The **Wavestream Matchbox 20W Ka-band BUC** is the most compact, outdoor-rated, Ka-band BUC ever developed by Wavestream. This unit rounds out the Wavestream Ka-band Matchbox product portfolio as a small, but powerful, BUC that is capable of connecting to multiple **Low Earth Orbit (LEO)** and **Geostationary Orbit (GEO)** satellite constellations

in multiple Ka-band frequency lineups. Additionally, the brand new **MicroStream 20W Ku BUC** is designed to be tightly integrated within the electronics enclosure of the terminal and has been specifically developed with **SWaP** in mind. It is indicative of the incredibly flexible capability set that Wavestream offers its customers when it comes to deeply integrated RF solutions.

MEETING DEFENSE ORGANIZATIONS NEEDS

Wartime and tactical missions often take forces into unfamiliar territory crawling with unpredictable and unknown threats. Access to real-time intelligence on the ground — where and when troops need it — can make all the difference between a successful and an aborted mission.

Gilat is proud to provide defense organizations around the world with quick-to-deploy, ruggedized, SOTM solutions that can be carried in a backpack or mounted on fighting vehicles. More specifically, Gilat provides fully integrated VSAT systems that ensure seamless connectivity for both COTM and COTP missions and support voice and data communications, military C4I and border patrol activities with full interoperability among land, sea and airborne forces.

Gilat continues to dedicate strategic resources to providing defense organizations with the technology, expertise, local presence and support they need in order to meet their current and future military needs.

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Gilat Satellite Networks is a leading global provider of satellite-based broadband communications. The company



Doreet Oren

is committed to providing affordable broadband connectivity to millions of users in all parts of the world as well as providing technology-based defense solutions in order to help countries solve complex security challenges.

