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# SYLLOGE ON CHINA

**Focus: Nuclear, Space, Missiles and other Security Issues**

**An Initiative by Indian Pugwash Society and Centre for Nuclear Issues and Arms Control (MP - IDSA)**



INDIAN PUGWASH SOCIETY

## **US mulls broader curb on Chinese tech sector**

Global Times, September 12, 2022

While the US will continue to cope with inflation, Washington's reported move to further decouple from China on chip and medicine supply chains, the two fields where China plays a major role in the global industry chain in terms of production capacity and cost control, will backfire on the US itself, experts said. The Biden administration plans to broaden curbs on the US shipments to China of semiconductors used for artificial intelligence and chip-making tools, Reuters reported, citing several people familiar with the matter without revealing their names. The reported measure would be an escalation of the tensions after the US CHIPS and Science Act in August and put more pressure on the supply chain, including many American tech companies that are closely connected with the Chinese market, Xiang Ligang, an independent technology analyst, told the Global Times.

<https://www.globaltimes.cn/page/202209/1275095.shtml>

## **China roadmaps new lunar exploration missions amid US rising anxiety**

Deng Xiaoci

Global Times, September 12, 2022

While the US Artemis I mission – the inaugural unmanned mission to kickstart the US' ambitious plan for human exploration to the moon and Mars – got stuck on the launch pad due to repeated fuel leaks, Chinese scientists are making new breakthroughs in the country's Moon exploration missions and achieving more major findings on the existence of water on the Earth's natural satellite. Samples retrieved by China's Chang'e-5 mission have revealed high water content in lunar minerals, which would offer the world direct evidence for the existence of water on the Moon, verifying previous monitoring outcomes via only remote sensing technology but coming short of analyzing actual lunar samples.

<https://www.globaltimes.cn/page/202209/1275081.shtml>

## **China, Japan are partners, pose no threat to each other: Wang Yi**

Global Times, September 12, 2022

China and Japan are partners and pose no threat to each other, and the political consensus should be implemented in policies, Chinese State Councilor and Foreign Minister Wang Yi said while making the remarks in a video speech to a forum held to commemorate the 50th anniversary of the normalization of China-Japan diplomatic relations. The remarks were made at a time when Japan is seemingly moving toward a wrong direction to follow the US to contain China, observers noted. In the speech, Wang made five suggestions to build China-Japan bilateral ties in the new era. Wang called for the two sides to safeguard the political foundation embodied in the four political

documents. "As to some historic issues and the Taiwan question, there is no room for ambiguity, not to mention retrogression," Wang noted.

<https://www.globaltimes.cn/page/202209/1275102.shtml>

## **Broader US chips export curb to propel Chinese replacement in autonomous driving: experts**

Qi Xijia

Global Times, September 13, 2022

China's fast-growing autonomous driving sector could be the latest target under a broader US ban on exports to China. But experts said frequent US technology crackdowns have pushed local companies to accelerate research and development of domestic replacements. A broader curb on US shipments to China of chips used for artificial intelligence (AI) and chipmaking tools, which apply to Nvidia Corp, a major chip supplier for China's autonomous vehicles, is likely to slow down China's fast-growing autonomous driving industry, VOA reported. The US Commerce Department sent letters to three US companies -- KLA Corp, Lam Research Corp and Applied Materials Inc -- forbidding them from exporting chipmaking equipment to Chinese factories that produce advanced semiconductors with sub-14 nanometer processes, unless they obtain Commerce Department licenses, Reuters reported.

<https://www.globaltimes.cn/page/202209/1275163.shtml>

## **Chinese scientists plan boron-powered supersonic missile that can fly and swim**

Stephen Chen

South China Morning Post, September 13, 2022

China is developing a supersonic anti-ship missile that will be able to travel further and faster than any traditional torpedo, according to researchers involved in the project. The 5 metre (16.4 feet) missile will be able to cruise at 2.5 times the speed of sound at about 10,000 metres (32,800 feet) – the same altitude as a commercial airliner – for 200km (124 miles) before diving and skimming across the waves for up to 20km. Once it is within about 10km of its target, the missile will go into torpedo mode, travelling underwater at up to 100 metres per second (200 knots) using supercavitation – the formation of a giant air bubble around it which significantly reduces drag, according to the researchers.

<https://www.scmp.com/news/china/science/article/3192288/chinese-scientists-plan-boron-powered-supersonic-missile-can-fly>

## **China's reaction to North Korea's nuclear weapons first-use law tipped to be muted**

Kawala Xie

South China Morning Post, September 13, 2022

China's reaction to a new North Korean law sanctioning the launch of preventive nuclear strikes will be muted, analysts said, despite Beijing's support for denuclearisation of the Korea peninsula. This comes after Pyongyang passed a new law outlining scenarios for pre-emptive nuclear strikes if attacked by "hostile forces", declaring it would not abandon its nuclear weapons programme. Earlier, addressing the need to maintain a nuclear arsenal, North Korean leader Kim Jong-un accused the US – as the No 1 nuclear power and the first-ever user of atomic weapons – of not just trying to denuclearise the country, but to overthrow his government as well.

<https://www.scmp.com/news/china/diplomacy/article/3192253/chinas-reaction-north-koreas-nuclear-weapons-first-use-law>

## **Shanghai confirms 14-nm chips being mass produced now**

Qi Xijia

Global Times, September 14, 2022

Authorities in Shanghai, the hub of China's semiconductors industry, said 14-nanometer chips are now being mass produced in the city. The achievement is a milestone for Shanghai in building a modern technology center, and a major event for China's chips-making sector to break the blockade of the US government, amid the intensified China-US tech competition, experts said. Shanghai-based firms have achieved mass production of semiconductors with 14-nm process and made breakthroughs in 90-nm lithography machines, 5-nm etching machines, 12-inch large silicon wafers, central processing units and 5G chips, Wu Jincheng, director of the Shanghai Municipal Commission of Economy and Digitalization, said at a press conference.

<https://www.globaltimes.cn/page/202209/1275240.shtml>

## **China's top weapons scientist says nuclear fusion power is 6 years away**

Stephen Chen

South China Morning Post, September 14, 2022

The Chinese government has approved construction of the world's largest pulsed-power plant with plans to generate nuclear fusion energy by 2028, according to the top nuclear weapons scientist leading the project. "Fusion ignition is the jewel in the crown of science and technology in today's world," said Peng Xianjue, a professor with the Chinese Academy of Engineering Physics, in an

online meeting organised by Beijing-based think tank Techscope on September 9. “Being the world’s first to achieve energy-scale fusion energy release will lay the most important milestone in the road to fusion energy for human beings.”

<https://www.scmp.com/news/china/science/article/3192435/chinas-top-weapons-scientist-says-nuclear-fusion-power-6-years>

## **China’s Nuclear Expansion and its Implications for U.S. Strategy and Security**

Patty-Jane Geller

The Heritage Foundation, September 14, 2022

The U.S. Department of Defense considers China the pacing threat to the United States as its military buildup, economic coercion, and political warfare threaten the U.S.-led world order that serves the interests of Americans. While the United States has devoted significant attention and resources to the Indo-Pacific, the nuclear element of competition with China has only begun to enter the public discourse. The United States has enjoyed nuclear superiority over China’s minimum nuclear deterrence posture since China first acquired nuclear weapons in 1964. But in 2021 it was revealed to the public that China is building up its nuclear forces as part of a strategic breakout to eventually achieve nuclear parity—if not superiority—to the United States.

<https://www.heritage.org/missile-defense/commentary/chinas-nuclear-expansion-and-its-implications-us-strategy-and-security>

## **Nuclear proliferation caused by AUKUS will make the world sweat in the face of teetering security**

Global Times, September 14, 2022

Exactly one year ago, Australia, the UK and the US jointly unveiled the creation of their enhanced trilateral security partnership called "AUKUS." Under their deal, London and Washington agreed to help Canberra build and operate Australia's own fleet of nuclear-propelled submarines. One year on, as AUKUS is propagandized to respond to a so-called threat that does not exist at all, the group has been fueling the real threat of nuclear proliferation, arms race, and even war. Whenever AUKUS is touched upon, there is an unavoidable issue that cannot be skirted around - the transfer of nuclear materials among the three countries is essentially nuclear proliferation, which is uncontrollable. Australia, the UK and the US are all signatories to the Treaty on the Non-Proliferation of Nuclear Weapons (NPT). However, the three countries have ignored the AUKUS-related discussions at the International Atomic Energy Agency (IAEA) Board meetings and in relevant intergovernmental processes, while trying to set up a separate agenda on the issue, with the aim of whitewashing their proliferation activities.

<https://www.globaltimes.cn/page/202209/1275275.shtml>

## **IAEA chief's AUKUS report lacks legal basis, absurd: Chinese UN mission**

Global Times, September 14, 2022

China's permanent mission to the United Nations in Vienna urged the chief of the International Atomic Energy Agency (IAEA) not to pull chestnuts out of the fire and not to endorse the nuclear proliferation practices of the US, UK and Australia. The remarks came after the IAEA Director General Rafael Grossi submitted a report on the nuclear-powered submarine cooperation under AUKUS to the agency's Board of Governors. The Chinese mission said the IAEA report selectively cited the AUKUS countries' self-justifying statements while leaving out the international community's major concerns about the nuclear proliferation risks related to the trilateral deal. The report also ignored many countries' solemn positions that AUKUS violates the objective of the Treaty on the Non-Proliferation of Nuclear Weapons (NPT), Xinhua News Agency reported.

<https://www.globaltimes.cn/page/202209/1275276.shtml>

## **SCO can set example of conflict mitigation**

Farkhod Tolipov

Global Times, September 14, 2022

From the onset of the Shanghai Cooperation Organization (SCO), there has been a view about this organization in the West that it is a geopolitical competitor to the Western world, some observers even gave a label to SCO - an "Eastern NATO." However, SCO leadership and representatives have regularly rejected such allegations and speculations. They always emphasize that SCO is not going to become a military alliance like NATO. At the same time, this organization has an explicit or implicit geopolitical dimension of its modus vivendi. This can be noticed from the SCO Declarations. These Declarations often send a message that member-states stand for a multi-polar world order, opposite to hegemony, etc. The geopolitical aspect can also be assumed from the consideration of the membership structure: The organization includes no Western state as a member or even an observer. The SCO is going to accept a new member - Iran, a state also under US sanctions.

<https://www.globaltimes.cn/page/202209/1275267.shtml>

## **China conducts first flight test for domestically developed reusable liquid rocket engine**

Deng Xiaoci

Global Times, September 14, 2022

China's aerospace technology researchers announced that for the first time the country has conducted a verification flight test on a domestically developed reusable liquid oxygen kerosene

engine. The successful maiden flight test marks a major breakthrough in engine reusability development, the Global Times learned from the developers. The reusable engine model was developed by Xi'an Aerospace Propulsion Institute, a subsidiary of the 6th Academy of the state-owned aerospace giant China Aerospace Science and Technology Corporation (CASC). In the verification flight test, the engine first served as the main engine in the maiden flight and after being inspected and maintained, successfully supported another repeated flight test, realizing the reuse of liquid rocket propulsion for the first time in the country's aerospace history, according to the Xi'an-based developers.

<https://www.globaltimes.cn/page/202209/1275201.shtml>

## **China leads world in number of nuclear power units under construction**

CGTN, September 15, 2022

China continues to lead the world in the number of nuclear power units under construction, according to a blue book issued by the China Nuclear Energy Association (CNEA). As of the end of August, China has 53 commercial nuclear power units with a total installed capacity of 55.59 gigawatts, while another 23 units of 24.19 gigawatts in total are under construction. Nuclear power accounts for about 5 percent of the country's total electricity generation, up from 2 percent a decade ago, CNEA Secretary General Zhang Tingke told China Media Group. China has made important progress in the export of the Hualong One nuclear power units with its own third-generation nuclear power technology, Zhang said, adding that two Hualong One units have been put into operation in Pakistan.

<https://news.cgtn.com/news/2022-09-15/China-leads-world-in-number-of-nuclear-power-units-under-construction-1dlnp5va5xe/index.html>

## **China ready to work with Russia to support each other on issues concerning core interests: Xi**

China Military Online, September 15, 2022

China is ready to work with Russia in extending strong support to each other on issues concerning their respective core interests, Chinese President Xi Jinping said during a meeting with his Russian counterpart, Vladimir Putin. Xi met with Putin at Forumlar Majmuasi Complex in Samarkand to exchange views on China-Russia relations and international and regional issues of shared interest. Since the beginning of this year, China and Russia have maintained effective strategic communication, Xi said. Bilateral cooperation in various fields has moved forward steadily, with activities of the Year of Sports Exchanges well underway, and a robust momentum in sub-national cooperation and people-to-people exchanges, he said.

[http://eng.chinamil.com.cn/view/2022-09/15/content\\_10185011.htm](http://eng.chinamil.com.cn/view/2022-09/15/content_10185011.htm)

## **China approves 2 nuclear plants, to come up at cost of \$11.5 billion**

Sutirtho Patranobis

Hindustan Times, September 15, 2022

China approved two new nuclear power plants in the south of the country earlier this week, taking the total number of newly sanctioned nuclear power units to 10 in 2022, the highest yearly number in more than a decade. The projects approved this week will cost about 80 billion yuan (\$11.5 billion), reported Yicai.com, a business news portal. China had last approved a larger number of nuclear power plants in 2008, when it gave the go-ahead to 14 new ones. The State Council, China's cabinet, approved the second phase of the Zhangzhou project in the southeastern Fujian province and the first phase of the Lianjiang project in Guangdong province in the south during a meeting chaired by Premier Li Keqiang.

<https://www.hindustantimes.com/world-news/china-approves-2-nuclear-plants-taking-tally-to-10-this-year-highest-since-2008-101663248597629.html>

## **China may raise military stakes if US passes Taiwan Policy Act: analysts**

Kawala Xie

South China Morning Post, September 15, 2022

China may ramp up military measures in response to the US Congress' Taiwan Policy Act after the bill was approved by a Senate committee, according to observers. The bill has been described as the most comprehensive restructuring of US policy towards the island since the Taiwan Relations Act in 1979, which defined the non-diplomatic relations between the US and Taiwan. It proposes allowing Taiwan to have the same treatment as the US' other major non-Nato allies by allocating US\$4.5 billion in security assistance over four years. It also sets up a broad economic sanctions scheme to target Beijing officials and financial institutions in case of "hostilities" towards Taiwan.

<https://www.scmp.com/news/china/diplomacy/article/3192640/china-may-raise-military-stakes-if-us-passes-taiwan-policy-act>

## **China approves development of sub-orbital aerospace transportation system with capability of global delivery within one hour**

Deng Xiaoci

Global Times, September 15, 2022

China has officially granted state approval for the development of the sub-orbital aerospace transportation system, which by completion could realize global delivery within one hour and lay



the foundation for space travel for the general public, according to the China Academy of Launch Vehicle Technology (CALT), the country's top rocket manufacturer that filed for the application. According to the post on the CALT official WeChat public account, the project for the general design and control technology for the sub-orbital aerospace transportation system has passed reviews and gained approval, citing a notice released by the National Natural Science Foundation of China (NSFC). It was the first major aerospace project to have been enlisted in the NSFC's discipline of transportation vehicle engineering under its engineering and materials science department, according to the CALT.

<https://www.globaltimes.cn/page/202209/1275366.shtml>

## **Xi meets Pakistani PM Muhammad Shehbaz Sharif**

China Military Online, September 16, 2022

Chinese President Xi Jinping met with Pakistani Prime Minister Muhammad Shehbaz Sharif at Forumlar Majmuasi Complex in Samarkand. Xi pointed out that China and Pakistan are close neighbors linked by mountains and rivers and with a shared future. The two countries have all along stood with each other through thick and thin, Xi said, adding that no matter how the international situation evolves, China and Pakistan are always each other's trustworthy strategic partners. China will work with Pakistan to advance their all-weather strategic cooperative partnership and accelerate the building of a closer community with a shared future between the two countries in the new era, he said. Xi stressed that the two sides must continue to firmly support each other, foster stronger synergy between their development strategies, and harness the role of the Joint Cooperation Committee of the China-Pakistan Economic Corridor (CPEC) to ensure smooth construction and operation of major projects.

[http://eng.chinamil.com.cn/view/2022-09/16/content\\_10185195.htm](http://eng.chinamil.com.cn/view/2022-09/16/content_10185195.htm)

## **Biden signs new act to curb China investment; closed mindset will harm US industry: analyst**

Global Times, September 16, 2022

US President Joe Biden signed an executive order to strengthen a review of foreign investment in sectors involving sensitive data and cyber security, another move targeting China amid Washington's increasing pressure on Chinese tech development. Observers said the latest order, combined with a series of "decoupling" policies toward China recently, is not too surprising, but it demonstrates the dangerous and closed mindset of the world's largest economy. The move will only impede US technological advancement, they said. The order directs the Committee on Foreign Investment in the US (CFIUS) to further scrutinize foreign investments and transactions related to areas such as sensitive data and artificial intelligence. A particular concern cited is the

security of supply chains and whether an investment might give a foreign entity control of critical manufacturing capabilities, mineral resources or technologies, according to media reports.

<https://www.globaltimes.cn/page/202209/1275433.shtml>

## **China's suborbital space plane project gets major funding boost**

Zhang Tong

South China Morning Post, September 16, 2022

China's biggest funder of scientific research said it would support the development of civilian hypersonic flight technology that can carry passengers anywhere on Earth – or to near space – within an hour. The National Natural Science Foundation of China approved on September 7 an unspecified amount of funding for a suborbital transport project to develop the hypersonic transport system. The system will feature winged aircraft that take off and land on a runway just like an ordinary plane, but with the ability to cruise faster than five times the speed of sound at high altitude, according to the China Academy of Launch Vehicle Technology (CALT), one of the project's lead contractors.

<https://www.scmp.com/news/china/science/article/3192766/chinas-suborbital-space-plane-project-gets-major-funding-boost>

## **Yoon meets with China's top legislator; remarks show Beijing's message over sensitive issues like THAAD 'received'**

Wang Qi

Global Times, September 16, 2022

South Korean President Yoon Suk-yeol met with China's top legislator Li Zhanshu in Seoul, saying that he hopes to further develop ties with China against the backdrop of the two countries' 30th anniversary of establishment of diplomatic ties, and stressed the need for close communication to make sure the US THAAD installed in South Korea will not be a hurdle to bilateral ties, South Korean media reported. Analysts said that since President Yoon took office this year, China-South Korea relations have gone through an adjustment period. With Li's visit to South Korea, it is likely that the two sides will come to a better agreement on some major issues, given that the South Korean leader's remarks seem to indicate that Seoul has received and better understood Beijing's position on some sensitive issues, and that following the US is not completely in South Korea's national interests.

<https://www.globaltimes.cn/page/202209/1275429.shtml>

## **Chinese envoy reiterates intl communities' deep concerns over nuclear-powered submarine cooperation under AUKUS**

Global Times, September 16, 2022

China's Permanent Representative to the United Nations in Vienna, Wang Qun, reiterated most of the International Atomic Energy Agency (IAEA) member states' deep concerns over the seven problems regarding the nuclear-powered submarine cooperation under AUKUS, the trilateral pact between the US, the UK and Australia and noted that if the IAEA Secretariat is ultimately used as a "Trojan horse" by the US, UK and Australia, the international communities' interests will be undermined. The nuclear-powered submarine cooperation under AUKUS involves the illegal transfer of nuclear-weapon materials and is an act of naked nuclear proliferation, Wang said. But for a long time, the three countries have been evading the essence of their nuclear proliferation practices, confusing right and wrong and misleading the international community, he said. Wang made the remarks during an interview after a formal agenda of the IAEA Board of Governors decided by consensus on the nuclear-powered submarine cooperation under AUKUS at China's proposal.

<https://www.globaltimes.cn/page/202209/1275409.shtml>

## **Chinese scientists discover new findings from Chang'e-5 samples, provide new insights into lunar volcanic activity**

Global Times, September 16, 2022

Scientists with the Chinese Academy of Sciences (CAS) have conducted more studies and research into lunar samples from the Chang'e-5 robotic mission, which revealed the basalt thickness at its landing region and they estimated that the region has experienced volcanic eruptions at least four times, according to a recent article published on the CAS website. The Chang'e-5 mission successfully brought 1,731 grams of lunar minerals back to Earth. The landing site in the Northeastern Oceanus Procellarum basin (43.06°N, 51.92°W) of the Moon was considered to have one of the youngest basalt units on the lunar surface with rich heat-generating elements such as uranium, thorium and potassium. Previous studies have indicated that these elements were the main cause of lunar volcanic activities, which explains the significance of the new findings by Chinese tests. They are also expected to further enhance people's understanding of lunar volcanic activity and internal thermal evolution history.

<https://www.globaltimes.cn/page/202209/1275382.shtml>

## **China sanctions CEOs of Raytheon Technologies, Boeing Defense over arms sale to Taiwan region**

Global Times, September 16, 2022

The Chinese government is set to impose sanctions on Gregory J. Hayes, Chairman and Chief Executive Officer of Raytheon Technologies Corporation, and Theodore Colbert III, President and Chief Executive Officer of Boeing Defense, Space & Security, following recent US arms sales to China's Taiwan region, the Chinese Foreign Ministry announced. Mao Ning, spokesperson from the ministry, said at media briefing that the sanctions were imposed in order to safeguard China's sovereignty and security interests, as the two companies were involved in the latest US arms sale to the Taiwan region.

<https://www.globaltimes.cn/page/202209/1275410.shtml>

## **Next stop: space? Chinese firm aims for suborbital tourist trips by 2025**

Echo Xie

South China Morning Post, September 17, 2022

China may be able to send its first paying passengers on suborbital trips to the edge of space as early as 2025, according to a top rocket scientist. Yang Yiqiang, who was the general director of the Long March 11 rocket project in 2018 and founder of a government-backed company to explore commercial use of rockets, said commercial space tourism would be in “full bloom” in 2027. “With the refinement of the business model, China is expected to start suborbital travel in 2025, which costs around 2-3 million yuan (US\$285,00-US\$427,000),” state-run Global Times quoted Yang as saying.

<https://www.scmp.com/news/china/science/article/3192880/next-stop-space-chinese-firm-aims-suborbital-tourist-trips-2025>

## **Chinese scientists develop long-distance underwater communication in South China Sea**

Stephen Chen

South China Morning Post, September 17, 2022

Chinese researchers say they have developed and tested in the depths of the South China Sea underwater communication technology that would allow submarines and drones to maintain contact over more than 30,000 sq km (11,600 square miles) – about the area of Belgium. A listening device picked up sound signals from 105km (65 miles) away at a depth of 200 metres (656 feet) during a field test in an important passageway for submarines, according to the study by

the team at northwestern China. The data transmission rate reached nearly 200 bits per second (bps), on par with the bandwidth of very low-frequency radio sent by a naval command to nuclear submarines using the world's largest land-based antennas.

<https://www.scmp.com/news/china/science/article/3192719/chinese-scientists-develop-long-distance-underwater>

## **China likely to start suborbital space travel in 2025, with tickets costing 2-3m yuan: rocket scientist**

Global Times, September 17, 2022

China's commercial space sector is entering its best development phase, and the country is expected to start suborbital space travel in 2025, with fares likely to fall between 2-3 million yuan (\$286,400-\$429,600), a senior rocket scientist said. Previously, Virgin Galactic announced plans to open space trips priced at \$450,000 per seat, media reports said. The sector in China has entered the 2.0 era, driven by applications and market forces, from the 1.0 era that featured basic manufacturing and research and development, and it will likely catch up with the development level of the US within 10 years, Yang Yiqiang, a senior rocket scientist and founder of CAS Space, a Beijing-based rocket company, told the Global Times.

<https://www.globaltimes.cn/page/202209/1275455.shtml>

## **Shenzhou-14 taikonauts complete second spacewalk, conducting extravehicular rescue verification for first time**

Global Times, September 17, 2022

China's Shenzhou-14 taikonauts conducted their second extravehicular activities (EVAs) on September 17, with astronauts Chen Dong, Liu Yang and Cai Xuzhe successfully finishing their tasks at 05:47PM after five hours of close cooperation. Cai and Chen have already returned to the space station lab module Wentian, while Liu has been inside Wentian assisting the EVAs by the two taikonauts, according to the China Manned Space Agency (CMSA). Cai opened the airlock cabin of the Wentian lab module of the China Space Station at 01:35PM. Both Cai and Chen successfully exited the space station lab module Wentian by 03:33PM. "I'm feeling good," Cai said while waving his hand, according to CCTV. The two astronauts installed a foot limiter and the extravehicular workbench.

<https://www.globaltimes.cn/page/202209/1275461.shtml>

## **U.S. and China should discuss controls on drones**

Lyle Goldstein

Nikkei Asia, September 18, 2022

China is already a drone superpower and has been for well over a decade, controlling a large portion of the world's growing market for unmanned aerial vehicles. It has made enormous effort to integrate drone technology into all parts of the People's Liberation Army as well as its coast guard and other forces. Even before the Ukraine war, Chinese analysts were extremely impressed by Azerbaijan's skillful employment of drones against Armenia during fighting in 2020. In Ukraine, they have paid close attention to use of the U.S.-made Switchblade drone, which can track a target and then ram it to set off an explosive warhead.

<https://asia.nikkei.com/Opinion/U.S.-and-China-should-discuss-controls-on-drones&cd=1&hl=en&ct=clnk&gl=in>

## **Large amount of liquid water activity existed on Mars 1b yrs ago, found 1st mission**

Cui Fandi

Global Times, September 18, 2022

The latest scientific research results released by China's first Mars exploration mission showed that a large amount of liquid water activity once existed in the landing zone of Zhurong, China's first Mars rover, about 1 billion years ago. The discovery of liquid water activity means that there may have been some conditions suitable for the origin or existence of life on Mars in the past billion years, experts explained. At the same time, the Tianwen-1 mission has also laid a solid foundation for subsequent interplanetary exploration by China. According to the China National Space Administration (CNSA), the Tianwen-1 Mars probe had been in orbit for more than 780 days, traveling a total of 1,921 meters, completing its scientific exploration tasks and acquiring 1,480 gigabytes of raw scientific exploration data, China Central Television (CCTV) reported.

<https://www.globaltimes.cn/page/202209/1275475.shtml>

## **US Embassy, Consulates in China excessively collect Chinese employees' information, may turn over data to US intelligence agencies, posing data leakage risk: source**

Fan Lingzhi and Cao Siqi

Global Times, September 18, 2022

The US Embassy and Consulates conducted background vetting on Chinese employees once in several years. Such vetting touches on personal privacy and the Chinese employees were told that all information may be turned over to the US intelligence agencies. Although the US Embassy and

Consulates said Chinese employees can register their information voluntarily, in reality, if they refuse, their work would be affected. Have the US Embassy and Consulates violated the privacy of Chinese employees? The Global Times recently interviewed several Chinese employees who had worked at the embassy and consulates, who said the job looks decent but is not that good at all. Under the cover of background vetting, the US Embassy and Consulates forced Chinese employees to submit their personal, family members and even their neighbors' information. The vetting made them feel like they were being interrogated.

<https://www.globaltimes.cn/page/202209/1275534.shtml>

## **China Nuclear Deal Held Up Over Argentina's Reactor Fuel Demand**

Jonathan Tirone

Bloomberg, September 19, 2022

Months after an announcement that China will build and largely finance an \$8 billion nuclear power plant outside Buenos Aires, the deal is hung up over Argentina's demand that its engineers be permitted to manufacture the reactor fuel domestically. Becoming the first nation licensed to make fuel for China's Hualong One reactor would greatly advance Argentina's atomic program. It would also signal that China is willing to license technology to trading partners, following a commercial pathway blazed by US.

<https://www.bloomberg.com/news/articles/2022-09-19/china-nuclear-deal-held-up-over-argentina-s-reactor-fuel-demand?leadSource=verify%20wall>

## **The sea is not Japan's dustbin, nor the Pacific Ocean its sewer: Chinese FM**

Global Times, September 19, 2022

Chinese Foreign Ministry once again called on Japan to stop its dubious and irresponsible plan of dumping Fukushima nuclear-contaminated water into the sea, as the radioactive substance in the nuclear-contaminated water, although it had already been treated through a filtration system, was once tested to be two times higher than the discharge standard. According to Kyodo News, the Tokyo Electric Power Company (TEPCO), which is in charge of construction of the facility to be used for releasing the nuclear-contaminated water, said that the company found the level of radioactive substance Strontium 90 as high as three times of Japan's national standard, even though the samples on July 28 had been treated through a filtration system called ALPS (Advanced Liquid Processing System). The report came after the repeated claim of both the Japanese government and TEPCO that nuclear-contaminated water is "safe" to be dumped into the ocean because it would go through the multi-nuclide removal system ALPS and radioactive substances such as Strontium 90 and Carbon 14 that cause genetic mutation in the ecosystem can be reduced to a "safe" level.

<https://www.globaltimes.cn/page/202209/1275581.shtml>

## **S. Korea proceeds with THAAD to enhance alliance with US, 'risks China ties'**

Zhang Han

Global Times, September 19, 2022

The South Korean government has reportedly advanced the deployment of the US Terminal High Altitude Area Defense (THAAD) anti-missile defense system, by granting more land to the US for the operation of the unit in Seongju, a move that represents a risky path of enhancing Seoul's alliance with Washington at the cost of China ties, analysts said. Observers warned that escalation of the situation and further deployment of THAAD risks dragging China-South Korea relations into the abyss again, which is against South Korean interests, as the US is never a reliable ally. China and South Korea had a series of diplomatic interactions, as the two countries celebrate their three decades of diplomatic relations. China's top legislator Li Zhanshu said during his visit to South Korea that handling sensitive issues properly is crucial to the healthy and stable development of bilateral ties. Earlier in August, Chinese State Councilor and Foreign Minister Wang Yi met with South Korean Foreign Minister Park Jin and exchanged views on the issue, agreeing that both sides' security concerns should be respected and the two countries should make efforts to properly handle THAAD-related issues so that they will not become a hurdle in bilateral relations.

<https://www.globaltimes.cn/page/202209/1275609.shtml>

## **Chinese Defense Minister meets Pakistani Chief of Army Staff**

China Military Online, September 19, 2022

Chinese State Councilor and Defense Minister General Wei Fenghe held a meeting with General Qamar Javed Bajwa, chief of Army Staff of the Pakistan Army, in Xi'an, capital of northwest China's Shaanxi Province. Gen. Wei Fenghe expressed his condolence over the severe floods hitting Pakistan. "China and Pakistan are all-weather strategic cooperative partners, under the guidance of the leaders of the two countries, the friendship between China and Pakistan has become stronger as time goes by. We must tide over difficulties together, fully trust each other, and unswervingly support each other's core interests on the way forward," Gen. Wei said, adding that no matter how the world situation changes, the rock-solid friendship between China and Pakistan will last forever, and the two countries will always be trustworthy and most reliable true friends and good brothers.

[http://eng.chinamil.com.cn/view/2022-09/19/content\\_10185744.htm](http://eng.chinamil.com.cn/view/2022-09/19/content_10185744.htm)



## **US to make Japan 'a stronger pawn' to counter China's reunification as Biden to meet Kishida in UN**

Wang Qi

Global Times, September 20, 2022

Amid current geopolitical turbulence, US President Joe Biden and Japanese Prime Minister Fumio Kishida are scheduled to hold a summit on the sidelines of the UN General Assembly in New York, where the Taiwan question will likely be discussed. Chinese experts believe that the summit's intent lies in loosening restrictions on Japan's military development and increasing its reliance on the US, so as to make Tokyo a stronger pawn in the Asia-Pacific to sabotage China's reunification process. Da Zhigang, director of the Institute of Northeast Asian Studies at Heilongjiang Provincial Academy of Social Sciences, told the Global Times that Biden is likely to show support for the Kishida administration over its plan to increase military spending, ditching an exclusively defense-oriented strategy and amending article 9 of Japan's post-World War II "pacifist constitution," which renounces war as a right of sovereignty and the refuses to settle disputes using military force.

<https://www.globaltimes.cn/page/202209/1275704.shtml>

## **Yuanwang-5 completes recent telemetry, tracking and command missions**

China Military Online, September 20, 2022

On September 19, Yuanwang-5, China's homegrown third-generation spacecraft tracking ship, returned to its home port of the China Satellite Maritime Tracking and Control Department (CSMTC) after completing its recent telemetry, tracking and command (TT&C) missions. Yuanwang-5 had spent 69 days at sea, sailing more than 14,000 nautical miles, and completed two TT&C missions for the Wentian lab cabin module (LCM) and Yaogan-33 02 satellite. As an indispensable part of China's maritime TT&C network, Yuanwang-5 has been operating at sea for over 110 days in accumulation since early 2022. During its stay at the home port, Yuanwang-5 will receive material supply, as well as equipment maintenance and repair, so that it can set sail at any time to carry out follow-up tasks.

[http://eng.chinamil.com.cn/view/2022-09/20/content\\_10185991.htm](http://eng.chinamil.com.cn/view/2022-09/20/content_10185991.htm)

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