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WEEKLY EDITION

International Cooperation

New Highlights in China-Africa Cooperation

Edited by LIN Yuchen

Chinese Foreign Minister Qin Gang attended the completion ceremony for the first phase of Africa Centers for Disease Control and Prevention (Africa CDC) in Addis Ababa, Ethiopia, on January 11, saying that China and Africa completed construction ahead of schedule, creating new highlights in China-Africa cooperation.

The first phase of the Africa CDC was undertaken by China Civil Engineering Construction Corporation, who first broke ground in 2020. It also represents Africa's first CDC with modern offices, laboratory conditions and complete facilities.

The Africa CDC is a flagship cooperation project announced by President Xi Jinping at the 2018 Beijing Summit of the Forum on China-Africa Cooperation (FOCAC), and another landmark project for China-Africa cooperation after the African Union Conference Center, said Qin.

Besides healthcare, China-Africa cooperation also extended to an array of fields, ranging from education to infrastructure and technology.

In April 2021, a Chinese-built vocational training center began operation in Gabon, funding 160 students for their training in electronics, machining, and welding.

Since the launch of FOCAC in 2000, China has built more than 6,000 kilometers of rail lines, 6,000 kilometers of roads, nearly 20 ports, and over 80 large power facilities in Africa. *See page 3*



Lantern Festival Around the Corner

Local residents and expats are guessing lantern riddles in Huzhou city, east China's Zhejiang province before the traditional Lantern Festival, which falls on the 15th day of the first month of the Chinese lunar calendar. (PHOTO: VCG)

Editor's Pick

Smarter Spring Festival Travel Rush

By WANG Xiaoxia

China's Spring Festival travel rush, known as the largest annual human migration in the world, kicked off on January 7 and will end on February 15 this year.

About 34.74 million trips were made on the first day of this year's Spring Festival travel rush, and about 2.1 billion passenger trips are expected to be made during the period, an incredible year-on-year increase of 99.5 percent, according to the Ministry of Transport.

With the rapid development of China's science and technology, the Spring Festival travel rush is also witnessing the wider application of advanced technologies in the transportation industry, such as the coverage of 5G networks and the use of intelligent robots.

High-speed railways

China has the world's largest high speed railway network, stretching 42,000 km and capable of accommodating electric multiple unit (EMU) running at

250 - 350 km/h. High speed railways are accessible to more than 95 percent of Chinese cities with over one million population, and play a major role in the Spring Festival travel rush.

For the safe operation of bullet trains during the busiest season in a year, regular inspection and maintenance are essential.

Intelligent robots have been introduced to improve the efficiency and reduce labor costs of this maintenance.

In Xining, Qinghai province, two intelligent robots help the staff to inspect the key parts under the EMUs. They can work 24 hours a day and transmit the monitoring data in real time for analyzing. Higher accuracy and efficiency have reduced the maintenance time of each EMU by nearly 20 minutes.

An ID-based ticket booking system and e-tickets are used at all high-speed train stations. With mobile phone App 12306, people can purchase tickets, change trips, get refunds, order food, book hotel rooms and look for their lost

belongings.

Passengers tap their ID cards against a card reader at the ticket barrier to enter the station. Even without an ID card, passengers can also apply for a digital identity certificate on 12306 App, and scan the QR code to get on board.

Faster security check

No more than two minutes is what it takes for passengers to pass through contactless security checks at Shenzhen Bao'an International Airport.

Contactless security checks means that passengers are not checked by the security personnel, they only need to take off their belts and shoes, put the carry-on items and luggage into the CT scanner, and enter the millimeter wave examination equipment.

Laptops, umbrellas and other items no longer need to be taken out for further checks. If the scanner's alarm is not activated, passengers can pass through. The whole process usually takes no more than two minutes.

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'Chunwan' 2023 More Tech-savvy

By Staff Reporters

"Chunwan," or the Spring Festival Gala, has been held by China Media Group (CMG) every year since 1983 to celebrate the Chinese New Year. This year the gala was equipped with more high-tech to offer a better watching experience for the live audience and those watching on TV and other media platforms.

Many high-tech applications were adopted for the first time, including filming the gala with self-developed 8K Ultra HD cameras, producing audio signals with 3D Color Sound, and live broadcasting the gala with these two technologies. 3D image rendering through virtual

reality (VR) was also used for the first time. Jiang Wenbo, a member of CMG's editorial board, said this technology was developed based on the need of program design in the gala.

In a program targeting teenagers, a painter drew VR 3D images by using an electronic pen and wearing VR glasses, said Jiang, adding that the painter could choose the required colors and calligraphy style used via buttons on the pen, and check the painted image in real time through the glasses. After being rendered and composited, the images were displayed on screen in real time, and audiences could simultaneously watch the generated 3D images being created.

An extended reality (XR) Ultra HD production system was also used during the gala to create a virtual stage for performances like martial arts, Peking Opera and intangible cultural heritages, offering the audience a visual feast. The system could render scenes in real time by following module data and camera parameters, and display the scenes on the stage's Ultra HD screen, said Jiang.

5G and cloud were also used. Audiences from across the country were invited to join in cloud singing performances. Those singing at home could have their performances transmitted to the studio via CMG media cloud and 5G network, said Jiang.

Chinese Premier Holds Symposium with Foreign Experts

Chinese Premier Li Keqiang on January 18 held a symposium in Beijing with the foreign experts working in China.

Li extended Lunar New Year greetings to the foreign experts and their relatives, and thanked them for their contributions to China's reform, opening-up and modernization, and their contributions to promoting exchanges and cooperation with other countries.

Li said he hoped that foreign experts will give full play to their strengths and offer more advice and suggestions for the work of the Chinese government. Experts from countries such as Germany and Singapore shared their advice and suggestions during the symposium.

Li said the Chinese economy in 2022 made progress in coping with challenges and overcoming difficulties amid the combined impact of COVID-19 and other factors. He noted that China achieved reasonable economic growth for the whole year than that of 2020.

More than 12 million new urban jobs were created, which was better than expected, Li said, and consumer prices rose just 2 percent against the backdrop of high global inflation.

He said that China's economy continues to face many difficulties and challenges, but it is believed that with the implementation of optimized and adjusted COVID-19 prevention and control measures, China's economy will recover at an accelerated pace.

"We will further implement a package of policies and measures to stabilize the economy, growth, employment and prices, and strive to get economic operations off to a good start this year," the premier said.

Li stressed that China is committed to giving top priority to development, staunchly pursuing market-oriented reform, better protecting the rights and interests of foreign investors, boosting the confidence of private enterprises, and fostering a market-oriented and law-based international business environment.

He said China remains committed to its basic state policy of opening-up, and it will open up its domestic market further and expand market access for foreign investment.

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WEEKLY REVIEW

High-Performance Hydrogels Application for 3D Printing Gains Ground

According to the Lanzhou Institute of Chemical Physics of the Chinese Academy of Sciences, its researchers have made headway in applying high performance hydrogels in 3D printing functional devices.

Smartphone AI System Detects Visual Impairment

Scientists from Sun Yat-sen University and Shanghai Jiao Tong University developed an AI-driven system on smartphone to detect visual impairment among kids. The study was published in *Nature Medicine* on Jan 26.

Storing mRNA Vaccines at Room Temperature Becomes Possible

Chinese virologists have developed a technique that helps store mRNA-based COVID-19 vaccines at normal temperature for more than half a year, which overcomes the instability of mRNA vaccines without affecting their bioactivity. The study was published in the journal *Cell Discovery*.

Solar-Flare Features Reproduced in Lab

The laser-driven turbulent magnetic reconnection was demonstrated by Chinese researchers in a laboratory, which reproduced key features of solar flares. The findings were published in *Nature Physics*.

WECHAT ACCOUNT



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