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## CHINA'S HOME-GROWN BEIDOU SATELLITE SYSTEM EYES GLOBAL FOOTPRINT

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Level up:The Beidou satellite navigation system has been billed as an alternative to the U.S.'s Global Positioning System.File PhotoAP

China on Friday outlined plans to further expand the global reach of its home-grown Beidou satellite navigation system, billed as its alternative to the U.S.'s Global Positioning System (GPS).

A white paper released by the Chinese government said Beijing is "strengthening regional cooperation with organisations such as ASEAN, the African Union, the League of Arab States, and the Community of Latin American and Caribbean States".

Beijing has, since 2020, also made an outreach to South Asia and is already working, or in discussion with, a number of countries in the region, including Pakistan, Nepal, Bangladesh and Sri Lanka, over adopting the Beidou satellite (BDS) navigation system. "The Belt and Road (BRI) countries are our priority," Ran Chengqi, Director of the China Satellite Navigation Office, said at Friday's launch of the white paper.

Mr. Ran said the BDS, which now has a "constellation" of 30 satellites in orbit, began its international outreach once the set up was finished in 2018. It is now in use "in more than half of the world's countries". China is also helping several BRI partners, including Pakistan and Sri Lanka, launch communication satellites.

"Saudi Arabia is using Beidou in surveying and mapping, positioning people and vehicle in the desert," he said. "Tajikistan is using BDS to monitor dams and lakes with precision. Lebanon is using BDS at Beirut port for marine survey and construction. In Burkina Faso, it is being used for survey and construction of hospitals".

Pakistan and Russia are two significant Beidou hubs. Mr. Ran said China and Russia have signed a strategic framework on their two navigation systems, taking forward a 2015 deal on interoperability between Beidou and GLONASS

## **Expanding presence**

Pakistan in 2014 became the first foreign country to set up a Beidou network. South Asia and Southeast Asia — both of which are key BRI regions — are a current focus of expanding Beidou's presence.

Beidou has set up a first of three Continuously Operating Reference Stations (CORS) for its network in Thailand in 2013, to serve as a hub for ASEAN. China and Sri Lanka also agreed plans to set up 10 CORS, according to reports in Chinese official media, which said "CORS in Thailand and Sri Lanka will extend the BDS coverage at least 3,000 km more towards Southeast Asia and South Asia.

In 2020, Beijing reached out to Bangladesh and Nepal. That year, Bangladesh Post and Telecommunications Minister Mustafa Jabbar told the official *Xinhua* news agency Dhaka "will consider cooperation with BDS", while China has invited Nepal officials to Beijing for training on

the Beidou system.

Mr. Ran said the next focus was to improve Beidou's capabilities, which have, in China, closed the gap with GPS in terms of accuracy, although its overseas services still lag behind.

Its application in China, he said, now included use in guiding drones, autonomous cars, in agriculture and forestry, as well as launching with Chinese mobile phone companies, using Chinese chips, satellite-powered messaging for smartphones that provides for connectivity in remote areas even in the absence of ground reception.

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