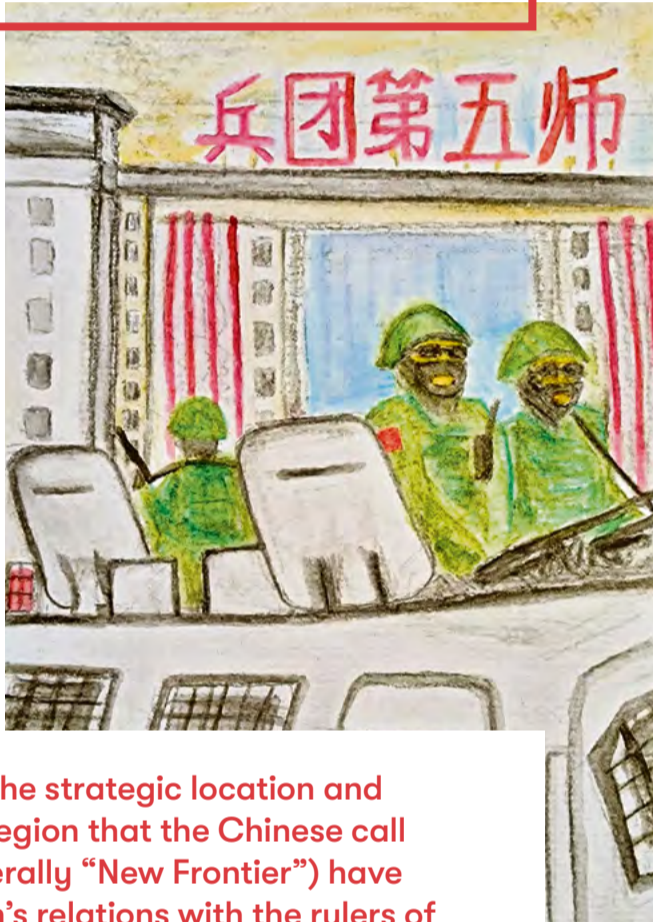


Xinjiang as Eurasia's Energy Hub

A Governance Perspective

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From the outset, the strategic location and resources of the region that the Chinese call Xinjiang (新疆, literally “New Frontier”) have shaped the region’s relations with the rulers of China proper. Currently, the Chinese debate hints at a potential future for Xinjiang as an energy hub (i.e., a centre of transnational energy activity). This notion is based on the region’s role in China’s fossil economy and on the central government’s plans to position Xinjiang as a vital producer and exporter of renewable electricity. For these plans to facilitate a more sustainable future, does it matter how Xinjiang is governed? Are infrastructure links benign and neutral?

Recent developments in China’s energy policy suggest that the Xinjiang Uyghur Autonomous Region (hereafter Xinjiang) will play an increasingly important role in the country’s energy system. This positioning relates to Xinjiang’s resource endowment of fossil fuels, its preferable location for the generation of electricity from renewable energy sources, and its energy infrastructure connections with neighbouring countries.

The importance of these characteristics are reflected in a 2020 White Paper that includes China’s “New Energy Security Strategy.”¹ This Strategy foretells large-scale transformations that the country’s energy sector will undergo in the near future, and it calls for an enhanced engagement in international cooperation, in particular under the Belt and Road Initiative.

Furthermore, the Chinese government’s dual goal of peaking carbon dioxide emissions before 2030 and becoming carbon neutral around 2060 – the so-called “dual carbon”

(双碳, *shuang tan*) goal – focuses on stabilising and then reducing the volume of carbon dioxide that is emitted in the course of the combustion of fossil fuels (i.e., coal, crude oil, and natural gas). Thus, the country’s large coal industry and numerous facilities that process crude oil and natural gas have to transition to emission-avoiding modes of operation, while new installations for the generation of renewable energy will have to be added.

Finally, the Chinese leadership frequently points to the need to enhance the country’s energy security. Recent comments by President Xi Jinping re-emphasise this focus and also suggest that the availability of domestic resources will determine China’s low-carbon energy transition.² Generally, the concept of energy security concerns the reliable availability of affordable and environmentally sustainable energy supplies. The Chinese leadership’s particular interpretation of energy security has practical implications for economic and infrastructure planning: a geographical diversification of supply routes under the Belt and Road Initiative, the emission-avoiding utilisation of domestic coal, and the diversification of fuels,

especially the use of domestically available renewable energy sources.

Xinjiang has the potential to play a vital role in Chinese schemes to enhance the country’s energy security for two reasons. First, its geography facilitates the import of oil and natural gas via pipelines from Central Asia, contributing to the diversification of supply origins and routes. Second, its geographical features and industries that produce vital components for the utilisation of wind and solar power make Xinjiang a crucial player in China’s decarbonisation strategy. These considerations have enhanced Xinjiang’s position in the Chinese energy debate. Zhang Xin, an influential regional industrial leader and member of the National People’s Congress, even suggested that the region should become an “energy hub.”³ In any case, investment in various segments of Xinjiang’s energy sector is set to increase in the coming years.

The function of an energy hub is to generate, transfer, and store various forms of energy. Thus, a regional energy hub is an interface between different energy infrastructures and load centres.⁴ To operate the energy hub smoothly by balancing its inputs and energy services, a finetuning of the regulatory framework is necessary, especially when large volumes of variable renewable electricity have to be absorbed. Besides these day-to-day regulatory aspects, governance structures need to guide the long-term trajectory of the low-carbon energy transition. In fact, constant government involvement and monitoring of the transformation process are necessary, mainly because, other than in the past, the transition from one fuel to another is not instigated by the more cost-effective or convenient usage of the new fuel. The government has to create incentives and a favourable regulatory environment for the deployment of renewable energy sources. The incremental trajectory and countless uncertainties require frequent government interference and policy adjustments. Therefore, the low-carbon energy transition is described as a governed transition.⁵

To realise the establishment of an energy hub in Xinjiang and ensure its contribution to the government’s dual-carbon goal, the region will need to undertake a large-scale industrial transformation, receive and allocate huge sums of investment, and establish new energy infrastructure, potentially expanding interconnections with neighbouring countries. This prospect warrants a closer look at existing infrastructures and the region’s governance system that will have to facilitate the implementation of new energy policies and cope with potential challenges.

Legacies of development policies

For more than two millennia, consecutive Chinese dynasties have been interacting with Xinjiang and the broader region at the centre of the Eurasian mega-continent. Yet, only in the 1950s, a stronger Han Chinese presence manifested itself in this part of the world and began to determine Xinjiang’s mode of governance and its socio-economic development.

The Xinjiang Production and Construction Corps or *bingtuan* (兵团), formed by Han Chinese settlers from other parts of the country, have played an important role in the region’s political economy. The responsibilities of these military-agricultural colonies concerned three interrelated policy objectives: territorial security, economic development, and the management of ethnic relations. In 2010, about 2.6 million people (12 percent of Xinjiang’s total population) belonged to the *bingtuan*.⁶ A number of urban *bingtuan* settlements have merged with surrounding areas, bringing more people under the control of its administration and thus enlarging this “corporate state” within the state that is directly administered by the Chinese Communist Party.⁷ These entities are able to exclusively channel resources and opportunities to their predominantly Han Chinese constituencies.

In addition to Xinjiang’s hybrid administration, throughout the region’s modern history, modes to exploit the region’s products and natural resources have shaped its evolving institutions and governance structures. Hence, Xinjiang’s socio-economic development and its persistent problems must be understood as a complex interaction between the central government’s policy objectives and the region’s unique governance structure.

No doubt, previous state-led development programmes provide some clues for the evaluation of Xinjiang’s emerging role in China’s low-carbon energy future. Generally, these strategies sought to combine Xinjiang’s socio-economic progress with national security considerations, related to both external threats and instances of domestic instability. During the reform era, starting with the 7th Five-Year Plan (1986–1990), Xinjiang and other interior regions and provinces provided crucial energy supplies to China’s eastern coast, enabling China’s fast entry into the global economy in the 1990s and early 2000s.

However, the rapid economic development of the coastal areas caused severe imbalances in the economy. To address these inequalities, the Chinese government implemented the so-called “Open Up the West Development Programme” (西部大开发, *xibu da kaifa*) from the turn of the century onwards. Xinjiang was part of this development programme that primarily consisted of energy projects and environmental measures. Moreover, since its commencement in 2013, Xinjiang has also been a vital component of China’s transcontinental Belt and Road Initiative.

A central legacy of these state-led programmes is the neglect of Indigenous interests and only marginal participation of members of non-Han ethnicities in the drafting and management of the schemes. Since the early 1980s, the reform and modernisation era and its exclusionary setup in Xinjiang have led to ethnic tensions that resulted in protests and violence. The underlying sentiment can be described as “resistance to a Xinjiang shaped by Beijing.”⁸

The Chinese government sought to achieve stability through economic development, combined with ever increasing suppression.⁹ This approach eventually led to the establishment of mass detention centres. These facilities are mainly administered by the *bingtuan*.¹⁰ Furthermore, an unprecedented, intrusive form of surveillance is deployed over the entire population of the region, backed up by a heavily expanded force of paramilitary troops and their pervasive presence in people’s daily lives. Xinjiang’s governance structures are neither benign nor sustainable.

Cross-border infrastructure to reconstruct the larger region

The construction of Xinjiang’s cross-border infrastructure is closely linked with the central government’s development policies for the region. As such, the programmes follow the dual purpose of addressing economic development needs and enhancing the security situation of Xinjiang. By doing so, the Chinese government submits Xinjiang’s neighbouring countries to a region-building project that derives its objectives from the domestic, Xinjiang-focused state-building efforts. Thus, cross-border cooperation externalises the Chinese government’s development-security logic.¹¹ In other words, governance objectives that the Chinese government seeks to realise in Xinjiang become implicitly part of China’s bilateral relations with the countries that maintain close economic ties with Xinjiang and/or share a common border with it. This particularly concerns the Central Asian countries (Kazakhstan, Kyrgyzstan, Tajikistan, Turkmenistan, and Uzbekistan). China thus utilises bilateral relations for the solution to problems that the leadership has detected in Xinjiang (i.e., terrorism, separatism, and extremism).

Two transnational pipeline projects coincided with the “Open Up the West

Fig. 1 (above): Chinese paramilitary personnel in the streets of Shuanghe City, which was founded out of a *bingtuan* settlement in 2014. (Artwork by the author)

Programme” during the first decade of the 21st century. The construction of the Kazakh-Chinese oil pipeline was the first large cross-border energy project. Plans to build the pipeline were already discussed during the late 1990s. Eventually, the changed geopolitical situation after 9/11 and Chinese concerns regarding seabound oil imports after the beginning of the Iraq War in 2003 accelerated the project. Indeed, around the turn of the century, the geopolitics of China’s rise and the complexities of securing energy supplies for the country’s expanding economy merged and crystallised in the region.¹² The pipeline became operational in 2006. Subsequently, the construction of the first line of the Central Asia-China gas pipeline began in Turkmenistan in 2007. Both pipeline systems were extended in the following years, while Chinese energy companies further strengthened their presence in Central Asia.

The China-Pakistan Economic Corridor is another example of transnational infrastructure. It forms an important component of the Belt and Road Initiative that was launched in 2013. At least in its initial conceptualisation, the Corridor included the construction of an oil pipeline. It was designed to link the Pakistani port of Gwardar with Kashgar, traversing challenging physical terrain and entering China at the Khunjerab Pass – at an altitude of almost 4700 metres. The China-Pakistan Economic Corridor currently includes other energy-related projects, such as coal, wind, and hydropower projects as well as electricity transmission lines.¹³ Even if the oil pipeline will not be built, the Corridor emerges as a complex, networked energy and transport linkage that connects Pakistan to Xinjiang.

Indeed, these infrastructures not only link Xinjiang’s neighbours to the energy and infrastructure policies that China pursues in Xinjiang; they also transmit the Chinese government’s prevalent governance modes and objectives, all of which are inherent in the realisation of the projects. These structures thus project ideational and real power.¹⁴

In fact, infrastructure and modes of governance, which are embedded in infrastructure construction and management, build long-lasting legacies. Energy infrastructures in particular create socio-technical landscapes that exist at the intersection of governance and territory.¹⁵ Large infrastructure projects transform the utilisation of the landscapes where they are deployed, often with significant societal and environmental impacts. They change how people interact with and within these landscapes, while also influencing environmental services that these landscapes provide to the communities. Moreover, the “obduracy” of infrastructures – their long-term utilisation and presence – extends practices related to these projects for many years.¹⁶ In Xinjiang, governance comes with a specific manifestation of Chinese state power.

Fig. 2 (left): Laying of the Central Asia-China gas pipeline, which began in 2007. (Artwork by the author)

Fig. 3 (below): China’s border gate at the Khunjerab Pass, at the border with Pakistan. (Artwork by the author)



The political ecology of imagining Xinjiang as an energy hub

Recent research provides an overview of the Xinjiang’s current energy situation, describing its potential for the development of non-fossil, renewable energy sources (e.g., wind, solar, and hydropower). However, the authors do not question the effectiveness of additional investments in the region’s energy sector to realise Xinjiang’s low-carbon transition. They primarily discuss Xinjiang’s favourable conditions for a further extension of its energy sector, considering the region as a “strategic lynchpin for maintaining the country’s energy security.”¹⁷ By doing so, the authors only touch upon one aspect of energy security, i.e. the availability of fuels. This limited analysis omits the two other components of the concept, as it does not consider the costs of expanding Xinjiang’s energy sector nor the sustainability of the sector’s large-scale transformation. This latter aspect relates to the societal acceptance of the transformation and environmental impacts.

Moreover, by closely linking Xinjiang’s energy future with the Chinese government’s dual-carbon goal, a project of truly global significance, these investments seem to reiterate the notion of an ecological modernization of China. This was the key narrative of earlier development programmes: “Economic growth and ecological protection will feed each other in a virtuous mutually sustaining circle.”¹⁸ Thus far, this assumption has proven erroneous in western China.

The legacies of earlier state-led, large-scale development programmes point to the danger that a strengthening of Xinjiang’s posture in China’s energy system will most likely increase incentives for the government to further enhance state control over Xinjiang’s economy and population. This will amplify the marginalisation of the region’s Indigenous ethnic groups, which has been caused by a continued demise of traditional livelihoods, the destruction of socio-environmental spaces, and a denial of their participation in the imagination of Xinjiang’s (energy) future.

Concluding remarks

Infrastructure links are not neutral. Energy infrastructures transform the communities and regions that they traverse, creating new socio-technical landscapes. They rely on governance structures that shape and maintain a country’s political and administrative system. Infrastructure cannot be built and operated without these governance structures, as large-scale construction projects require an organisational framework to channel personnel, funding, and material resources. After the construction process, governance structures support the functioning of the infrastructure links. Hence, infrastructures come with an obdurate presence of governance structures that they embed, preserve, and – in case of cross-border linkages – even export.

Continued efforts by the Chinese government to economically integrate Xinjiang with the rest of China and intrusive methods of state control have brought about vast violence against the region’s Indigenous peoples and inflicted severe damage on the environment. Chinese-led transnational infrastructure projects that connect neighbouring countries with Xinjiang export Chinese modes of governance. Undoubtedly, countries that link their political economy to Xinjiang’s economic development seek to benefit from its resources and geography. Yet, they need to be cognisant of the region’s distressing political ecology. The imagination of Xinjiang as an energy hub, especially one playing an important role in China’s dual-carbon trajectory, merely upgrades previous development strategies, greenwashing decades of environmental degradation and human rights violations.

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Notes

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