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The US-China Tech War: Where Does Turkey Stand?

Çağdaş Üngör

The techno-geopolitical rivalry between China and the United States has intensified in recent years. Turkey's souring relations with the US over the past decade has prevented the former from reaping the spoils of the Sino-US tech war as an American ally. Ankara has its own ambitions in the so-called Fourth Industrial Revolution and is prioritising gaining access to advanced technology under affordable price arrangements in which Chinese tech companies offer important opportunities. Since Turkey is a NATO member and an EU candidate, its incremental move towards China's technology ecosystem should be of concern to EU decision-makers. Brussels should promote policies to foster collaboration with Turkey so that today's geoeconomic challenges can be tackled together.

President Recep Tayyip Erdoğan is personally invested in most of Turkey's current technological ventures. He drives Turkey's first domestically produced electric car (Togg), video calls with the likes of the first Turkish astronaut in space and takes out time each year to visit the annual "Teknofest" youth festival, where he hails the latest achievements of the Turkish defence industry. Of course, these gestures reflect Ankara's larger ambition for Turkey to take its place among the top tier of global innovators of the 21st century. Whether Turkey can achieve the goals set out in its National Technology Initiative (Milli Teknoloji Hamlesi) amid the ongoing Sino-US tech war, however, is a question that few are willing to ask.

Issues related to the Chinese-American competition in the technology sphere have

certainly become more relevant since Donald Trump's re-election as US president. While the geopolitical tension between China and the US dates back at least to the Barack Obama administration, the anti-China tech war was launched during Trump's first presidential term (2017-21) with the espionage charges levied against China's telecommunications giant Huawei marking the occasion in 2019. In the wake of that major salvo, Chinese-American tech rivalry only intensified and extended to other areas such as semiconductors and batteries. Bolstered by bipartisan support in the US, anti-China measures continued under the Joe Biden administration, which signed off on important legislation such as the CHIPS and Science Act and the Inflation Reduction



Act in 2022. These measures were aimed at reinforcing US leadership in the tech domain by bringing research into and the manufacture of advanced semiconductors and batteries back onto American soil.

Today, the Sino-US rivalry is especially fierce in three technology sectors: artificial intelligence (AI), electric vehicles (EV) and 5G technology. Washington has banned Huawei from operating in the US, forced ByteDance (the Chinese parent company of the TikTok social media platform) to sell its American business and imposed 100 per cent tariffs on Chinese EV brands. In retaliation, Beijing has launched its own measures, including restrictions on the export of rare earth minerals to the US.

The latest battle in the Chinese-American technology war erupted over the launch of the large language model DeepSeek by a young Chinese tech company located in Hangzhou. China's own version of ChatGPT not only appears to have achieved the technological sophistication of its American counterpart for just a fraction of the latter's budget; it has also showcased the resilience of Chinese high-tech companies amid continued US sanctions. The DeepSeek launch sent shockwaves through Silicon Valley, causing huge financial losses on US stock markets in January 2025.

Such developments suggest that who ultimately wins the technology war being waged by Beijing and Washington is far from certain. What is clear, however, is that Chinese-American techno-geopolitical rivalry has an impact on the rest of the world and particularly in developing countries that are lagging in the innovation sphere. As far as Turkey is concerned, its reliance on international collaboration to realise its ambitions in the high-tech sphere means that it, too, is affected by the US-China geopolitical competition when making its policy choices.

Turkey: Making the Best of the Sino-US tech war?

Given the fuzzy nature of Turkey's foreignpolicy orientation for more than a decade now, it is not easy to grasp how Ankara perceives the ongoing tech war between China and the United States. Turkey has long been a US ally and member of NATO, but the fact that the alliance declared China to be a "strategic competitor" at its 2022 Madrid Summit seems to have made little impact on the Turkish government. Ankara sees China's rise as offering opportunities rather than posing an explicit threat, and it continues to embrace groupings such as the Shanghai Cooperation Organization (SCO) and the BRICS+, of which China is a leading member. This geopolitical ambivalence is also reflected in how Turkey views the Sino-US tech war.

Turkey has ambitions of its own regarding the cutting-edge technologies of the 21st century, as is evidenced by the country's advances in drone technology, the launch of the domestic EV brand Togg and the first "Made-in-Turkey" quantum computer. Nevertheless, Turkey cannot easily be included among the leaders of the global innovation sphere. In fact, it is lagging even in its own neighbourhood, as the Middle East is home to innovation leaders such as Israel and emerging tech hubs like the United Arab Emirates. Turkey seems particularly vulnerable in AI and 5G technologies, while its manufacturing capacity for advanced (5 nanometre) semiconductors is practically non-existent. So far, the broader context of US-Chinese geopolitical rivalry has not helped ameliorate any of these vulnerabilities.

Had it maintained its traditional pro-Western foreign-policy line, Turkey could have benefited significantly from the ongoing Sino-US dispute. Since the COVID pandemic, Western multi-nationals have been stepping up the promotion of "friendshoring" or "near-shoring" policies with the aim of diversifying their China portfolio. This so-called "China plus One" strategy has already turned Asian countries like India, Malaysia and Vietnam into alternative investment destinations for high-tech manufacturing. Although Turkey enjoys such advantages as geographical proximity to Europe and a large pool of skilled but rela-

SWP Comment 12 March 2025 tively cheap labour, it has been unable to reap the spoils of the Sino-US Tech War for political reasons.

Indeed, the AI rules introduced by the Biden administration in January 2025 clearly show that Turkey is not a "winner" in the ongoing Sino-US tech war. This new framework restricts the flow of America's most advanced industrial chips to a list of just 18 trusted US allies, which include Germany, France, Australia and Japan. Turkey's absence from the list is most probably related to Ankara's geopolitical ambivalence between Beijing/Moscow and Washington. Grouped in the so-called Tier 2 countries, Turkey may face restrictions in the future when importing high-end chips produced by American companies such as NVIDIA.

At the same time, the insignificant role that Turkey plays in global technology supply chains has spared the country the harshest US treatment. The sanctions related to advanced semiconductors are a case in point. While the Turkish defence industry is known to have experimented with chip innovation - most notably through its "Çakıl" and "Yonca" projects the design and manufacture of 5-7 nanometre chips remain years beyond Turkey's current capabilities. As there is no Turkish equivalent of the Dutch ASML company, which is the world's leading supplier of semiconductor machinery, or Taiwan's TSMC, the largest semiconductor foundry on the globe, it was able to bypass the sanctions imposed by Washington over the sale and manufacturing of sensitive chips. This means that, unlike American allies that have a strong presence in the semiconductor value chain (such as Japan and South Korea), Turkey is not under any specific pressure to take sides in the technology rivalry between China and the US. Similarly, Turkish companies are not faced with shrinking markets or declining profits owing to the geopolitical tension. But the Turkish industry's total reliance on the global chip market is a problem in and of itself - one that renders Turkey vulnerable to the potential of the Sino-US Tech War to

disrupt supply chains and cause price fluctuations on global markets.

Moving into the Chinese tech ecosystem?

Given the developments of the past five years, it is valid to question what role Turkey will play in the Chinese technology ecosystem in the future.

Back in 2020, when the Turkish government announced its purchase of a "Chinese vaccine" to alleviate the impact of the raging COVID pandemic, many at home and abroad were shocked by the decision. Some pointed to Ankara's "Eurasian" leanings as the reason for this move, while others sensationalised the dangers of buying "cheap and low quality" Chinese goods. Since then, however, Turkey's growing collaboration with China in the tech field has ceased to surprise. As of 2025, Turkey is hosting the manufacturing plants of some of China's biggest tech companies, among them Xiaomi and OPPO. The Chinese tech giant Alibaba is a major shareholder in Turkey's biggest e-commerce company, Trendyol, and Huawei is likely to build the country's 5G network in 2026. Chinese smart phone brands and TikTok are very popular among Turkish teenagers, while their parents are becoming increasingly fond of Chinese automobiles, the annual sales of which have grown exponentially in Turkey in recent years. And even though Turkey has its own EV brand, the Togg is not expected to rival its international competitors particularly those from China — in terms of price and/or quality anytime soon.

Turkey is keen to develop its own "local and national" (*yerli ve milli*) technologies of the 21st century — a line heavily promoted by the Turkish government. But since it is not among the global innovation leaders, it has to reach cooperation deals with other countries. Such agreements are often aimed at securing easier access to cutting-edge technologies while maintaining affordable price arrangements. Not surprisingly, heavily

subsidised Chinese companies offer a series of advantages in this area.

With regard to technology transfers, Ankara perceives China to be a more forthcoming partner than the US or European countries. This was apparent in 2013 when a Chinese defence company was awarded an air missile deal in an official Turkish tender because of its relatively favourable attitude towards technology sharing. However, the agreement was later cancelled owing to strong protests from Turkey's NATO partners. Nonetheless, Chinese companies' promises of technology transfers remain an important criterion for Turkish decision-makers. In September 2024, more than a decade after the cancelled air missile deal, it was precisely such a promise that prompted Ankara to embrace the investment by China's EV giant, BYD.

Turkey's incremental move towards Beijing's innovation ecosystem is most evident in the country's automotive sector. When the Turkish auto manufacturing industry was launched in the mid-20th century, the main investors were major American and European companies such as Ford, Mercedes, Renault and Fiat. By the 1990s this portfolio had expanded to include Japanese and South Korean companies. Since then, however, foreign investment in the Turkish automotive sector has stalled. Today the industry is faced with dual challenges: the technological shift away from the production of combustion engine cars towards EVs and the rise of China as a global powerhouse in the automotive industry. BYD's US\$1 billion investment may be miniscule compared with that of major Western brands in Turkey; but if other Chinese car companies follow in BYD's footsteps, the country's move towards China's technology ecosystem is likely to be expedited.

The BYD investment is also important within the context of the Sino-US tech war as the EV market has become a major battleground between China and Western countries. Chinese EVs face both 100 per cent tariffs in the US and countervailing duties in the EU. In this restricted environ-

ment, the EU-Turkey Customs Union agreement — along with Turkey's geographical proximity to Europe — will give Chinese companies access to the EU car market. And amid the growing rivalry across the globe over lithium batteries and their precious ingredients, this investment will likely reinforce Turkey's dependence on Chinacentred supply chains, which are shaped by automotive giants like CATL and BYD.

Another sign that Turkey is moving closer to the Chinese technology ecosystem is Huawei's growing role in the country's telecommunications infrastructure. While the Chinese giant has been the primary target of US measures against China since 2019, the data privacy issues and espionage charges brought against the company have not caused any public controversies in Turkey. Turkish parliamentary deputies do not shy away from visiting Huawei headquarters during their China trips and engineering students of the prestigious Istanbul Technical University work at Huawei's Research and Development Centre. More important, Huawei's role in Turkey's telecommunications infrastructure includes partnerships with the country's biggest mobile operators, Turkcell and Türk Telekom. While the official tender to launch Turkey's 5G network is not yet closed, Huawei is likely to remain the biggest technology provider in this sphere. It remains to be seen if Turkey's Huaweiinstalled 5G network will prove a problem for the country's NATO partners.

Finally, the launch of China's large language model DeepSeek may have an impact on Turkey's choices in the field of AI as this much cheaper version of ChatGPT is technologically on a par with its American counterpart. More important, compared with its US rival, it is far easier for developing countries to replicate and build on DeepSeek's open source model. Going forward, it cannot be ruled out that DeepSeek will inspire Turkish engineers to follow China's lead in the AI field.

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Outlook

Under the new Trump administration, Sino-US geopolitical tensions are likely to escalate further and thereby generate new vulnerabilities for third countries. Given the prospect of more sanctions and tariffs, it is possible that decoupling in the technology sphere will intensify and reshape the global playing field of innovation, leaving little room for manoeuvre for countries like Turkey. But since Turkey is geographically close to Europe, has the status of EU candidate and belongs to the Customs Union, Brussels' decisions in the tech domain may be even more significant for Ankara. If new and effective policies were to be implemented in the EU, Turkey's incremental move towards the Chinese technological ecosystem would be neither a predestined phenomenon nor a foregone conclusion.

The newly elected US government under Donald Trump has created a tumultuous geopolitical environment so far in 2025, with adverse effects on both Transatlantic ties and the prospects for economic growth and security in Europe. In order to stay resilient and minimize risks in this turbulent world, Turkey and the EU should step up their cooperation in the scientific and technological domains. This would also allow the two parties to avoid the pitfalls of US and Chinese leadership in the Fourth Industrial Revolution. Ankara and Brussels already have several existing mechanisms at their disposal to boost R&D funding and academic exchanges, such as the Horizon and Erasmus programmes. Such schemes have been crucial in forging ties between the Turkish and European scientific talent pools, as well as helping kick-start innovative tech companies in both Europe and Turkey.

Decision-makers in Germany and other major EU countries should draw up policies to initiate cooperation with Turkey — particularly in the fields of AI, 5G and semi-

conductors - in order to halt that country's move towards China's tech ecosystem. Failure to do so may result in Chinese tech companies gaining undue leverage in the Turkish market, which has close ties to the EU through the Customs Union Agreement. Furthermore, China's growing role in the Turkish tech industry could, in the long run, whittle away at the influence of European norms and values with regard to the digital space in Turkey. Despite the country's democratic backsliding, Turkish tech regulations remain largely inspired by EU legislation; but that situation could change with the growing significance of Chinese tech companies in Turkey. And if that were to happen, the Chinese model might win over more Turkish policymakers to the authoritarian outlook of Beijing, which prioritizes state goals over individual rights and privacy.



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