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Instant Insight

The U.S.-China Tariff Conflict and the LNG Market

Modelling Consequences Until 2030

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June 2025 | KS--2025-II05

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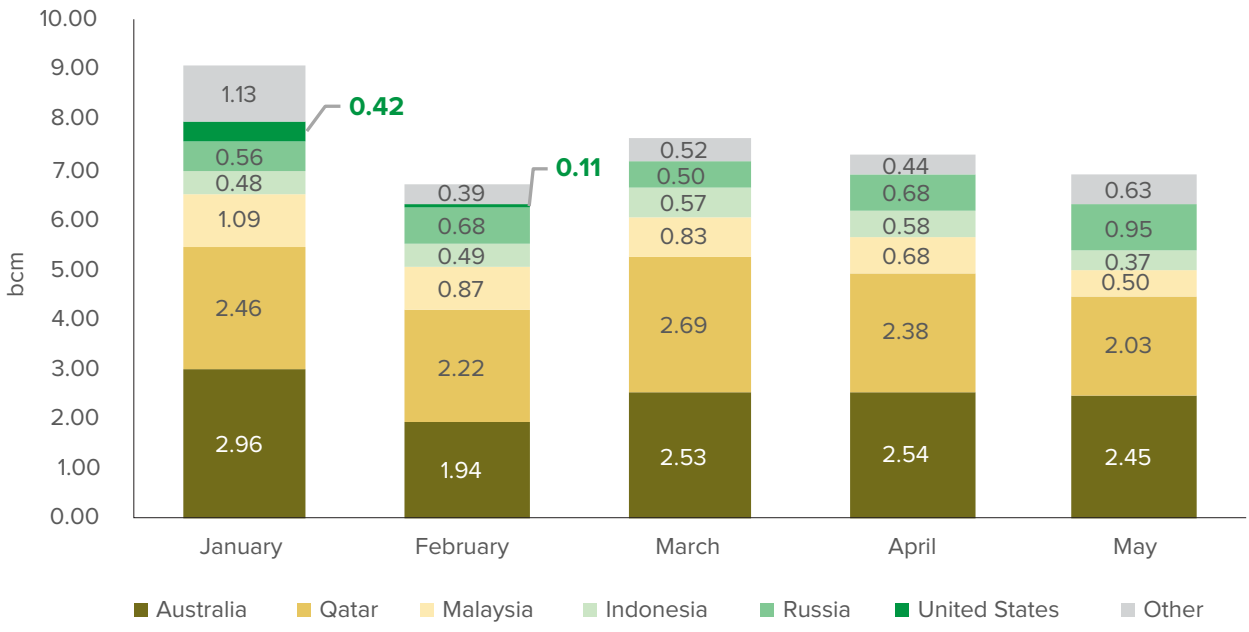
Introduction

In the first half of 2025, the relationship between the U.S. and China significantly worsened due to the introduction of a series of retaliatory tariffs by both countries. As a result, by mid-April 2025, Chinese tariffs on U.S. liquefied natural gas (LNG) rose to 125% (Nakano 2025). In addition, China halted all LNG imports from the U.S. As Figure 1 shows, as of May 25, 2025, no vessels from the U.S. brought LNG to China between March and May 2025.[1]

Figure 1. LNG vessels that arrived in China in 2025 by month and by exporting country during the ongoing tariff conflict.



Source: Author, based on LNG Journal (2025).
Note: "Other" include minor exports from such suppliers as Papua New Guinea, Nigeria, Oman, UAE, Peru, Mozambique, etc.

In the past few years, China has successfully competed with Japan to become the world's leading LNG importer. Its total natural gas consumption in 2024 was estimated at 456 billion cubic meters (bcm), while LNG imports were at 107 bcm (Kabakci 2025; IGU 2025). By 2030, its overall natural gas consumption is estimated to grow to between 540 bcm and 550 bcm, and to peak at about 620 bcm in 2035-2040 (Ji et al. 2018; Nexant 2025; Howe and Li 2025). Therefore, any action undertaken by this leading gas consumer is bound to affect global LNG markets. In terms of the U.S, it accounted for 21.5% of the global LNG supply in 2024 and became the top world supplier by volume (IGU 2025), and by 2030, its total LNG export capacity might reach between 238 bcm and 465 bcm, depending on the success of the construction of the proposed LNG terminals (Jaller-Makarewicz 2024).

This Instant Insight attempts to answer the question: "What are the potential consequences of China's introduction of LNG tariffs and its ban on U.S. LNG imports until 2030?" To answer this, the World Gas Model developed by Nexant is used to run three scenarios.[2] The first scenario is a Baseline Scenario developed by Nexant, describing a business-as-usual development of the world gas market as though no conflict between China and the U.S. took place. In Scenario 2, one modification (a 125% tariff on LNG imports from the U.S. to China) is introduced. Scenario 3, on top of a 125% tariff, runs with blocked out U.S.-China LNG trade routes and cancelled LNG contracts between the two countries.

The sections below describe the outcomes of Scenarios 2 and 3.

Scenario 2 – A 125% Tariff, with Negligible Consequences: Why?

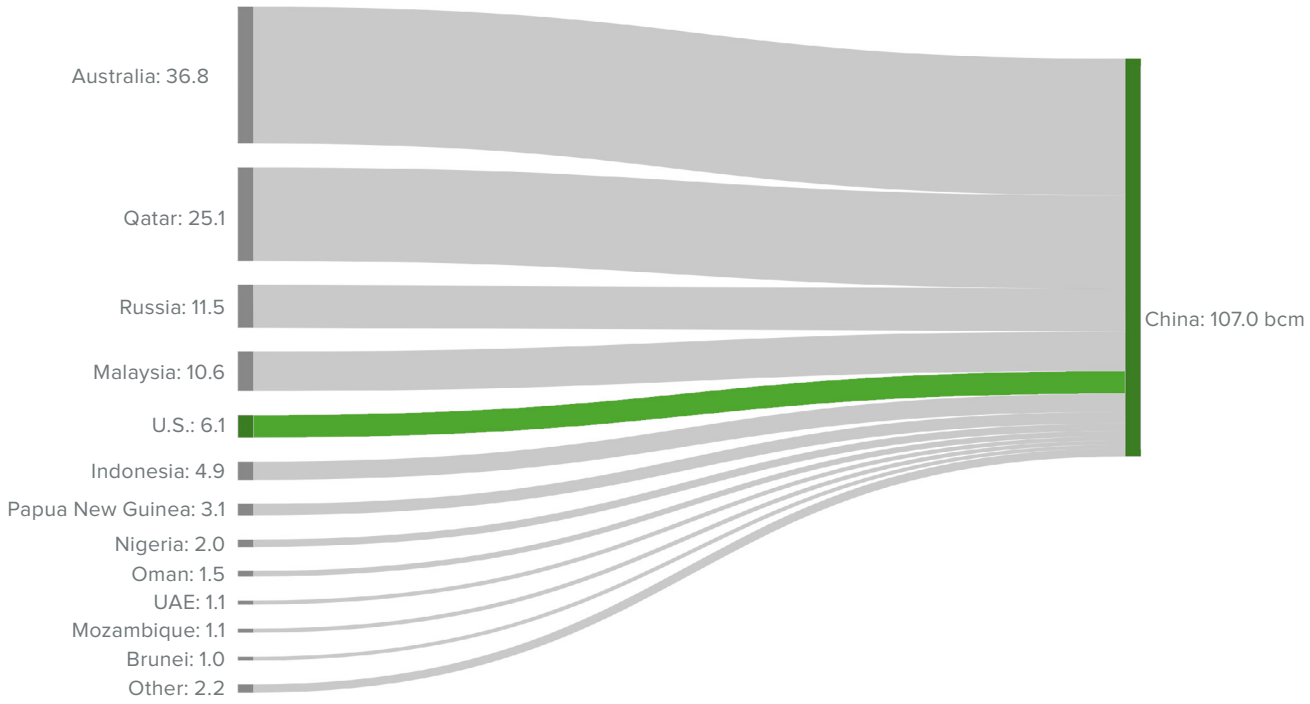
The introduction of the 125% tariff on LNG imports from the U.S. to China seems to have little impact on the model. As in the Baseline Scenario, China is expected to continue procuring the same volumes of LNG from the U.S. through long-term contracts until 2030.

Table 1. Imports of LNG to China from the U.S. (bcm) under long-term contracts in two scenarios.

	2023	2024	2025	2026	2027	2028	2029	2030
Scenario 1: Baseline	4.5	5.3	5.1	4.6	5.3	12.6	17.5	18.1
Scenario 2: 125% tariff	4.5	5.3	5.1	4.6	5.3	12.6	17.5	18.1

The surprising outcome can be easily explained. If we examine the structure of Chinese LNG imports, we will see that U.S. producers hold a minor share in the Chinese portfolio, which is mostly dependent on Australia and Qatar (Figure 2).

Figure 2. China's LNG imports by country in 2024, bcm.

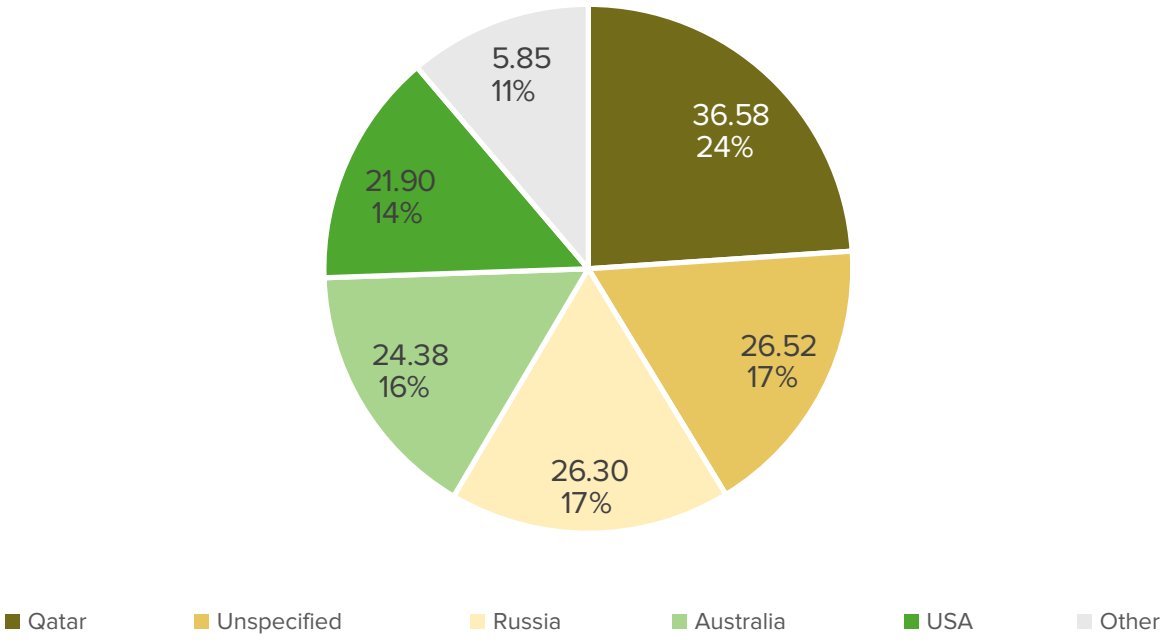


Source: Author, based on IGU (2025) [via sankeymatic.com].
Note: Insignificant discrepancies might occur due to rounding. "Other" includes minor imports from other suppliers such as Trinidad & Tobago, Egypt, etc.

On the horizon until 2030, China will have 80 contracts for the supply of LNG from 11 countries.[3] By 2030, the annual total quantity of 68 contracts, which are still expected to be active, equals 152.8 bcm. Of this volume, only 21.9 bcm, or 14%, is contracted to come from the U.S. (Figure 3), but the exact quantity that China will take off under these contracts might be closer to the 18.1 bcm predicted by our scenarios due to the take-or-pay clause.[4] Because of this clause, Chinese procurement of LNG from the U.S. is expected to remain stable in 2030 in Scenario 2, regardless of the 125% tariffs.

On a side note, China recently removed a 125% tariff on U.S. ethane, a crucial feedstock for petrochemical production. The Chinese manufacturing sector is heavily reliant on its supplies of ethane from the U.S., unlike in the case of LNG.

Figure 3. Distribution of the annual total quantity of the Chinese LNG contracts expected to be active in 2030, by country – % and bcm.



Source: Author, based on Nexant (2025).

Scenario 3 – U.S. and China LNG Contracts Cancelled Out: The Rise of the Spot Trade and a Paradigm Shift

The model demonstrates more interesting results in Scenario 3, which models the situation when the conflict aggravates and when China terminates the existing contracts. A somewhat similar incident already happened in 2019-2020, when China refrained from taking LNG shipments from the U.S. for approximately 400 days during the previous trade conflict with the U.S. (Bloomberg 2025).

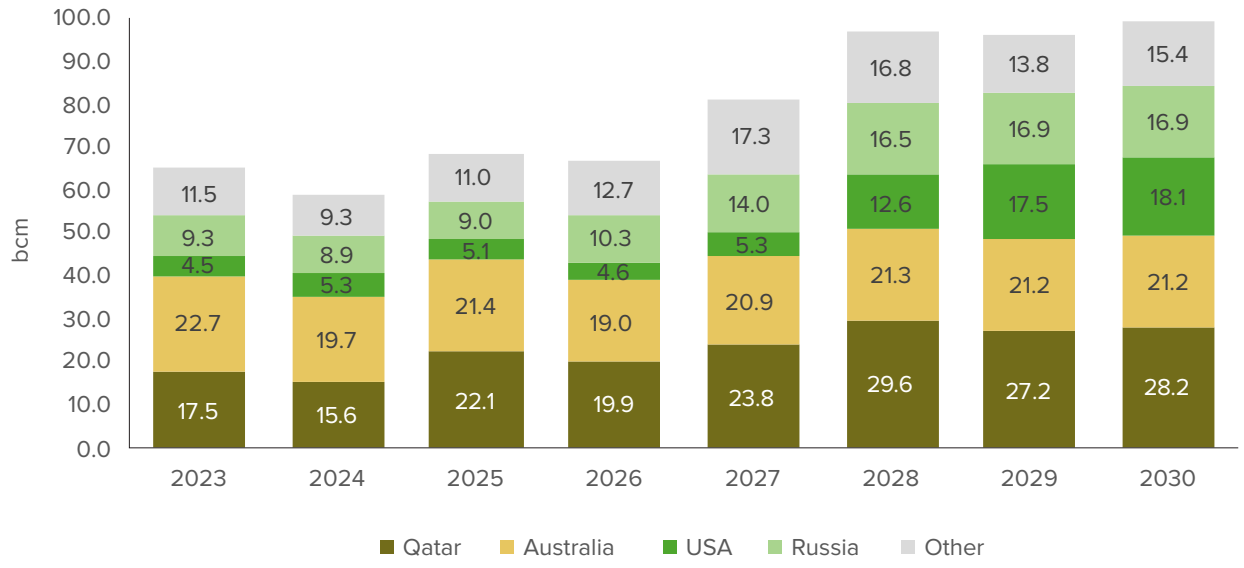
The key findings from Scenario 3 are as follows:

- If U.S.-China LNG contracts remained in place, China would be expected to import 18.1 bcm of contracted LNG from the U.S. in 2030 (see Figure 4).
- In Scenario 3, by 2030, the offtake volumes of U.S. LNG would experience a significant fall to almost zero (see Table 2).
- However, the cancellation of the U.S.-China LNG contracts would not significantly increase the volumes taken from the other countries with which China has long-term agreements (Figure 5). It even decreased the take-off amount of contracted LNG from some other countries in 2030 (Qatar: -1 bcm).
- The modelling showed that China is more likely to procure the needed volumes (+18.2 bcm in 2030) from the spot market (see Table 3 for details). Figure 6 shows the expected increase in imported spot volumes by country. The countries likely to benefit the most are Canada (+6.3 bcm in comparison to the Baseline Scenario), Australia (+4.2 bcm), and Mexico (+4 bcm).
- The total amount of LNG imported by China in Scenario 3 remained the same as that in the Baseline Scenario. This tells us that the effect of halting LNG supplies from the U.S. is somewhat limited: China moves to the spot market to substitute for the needed volumes, and the amounts grow with the passing years.
- As a result, the share of LNG from long-term take-off agreements in Chinese LNG imports drops from 73.5% to 60% (while the share of the spot market jumps from 26.5% to 40%), which means a significant paradigm shift and more need to hedge against the unpredictability (by nature) of the global spot markets.

Table 2. Imports of LNG to China from the U.S. (bcm) under long-term contracts in the Baseline Scenario and Scenario 3.

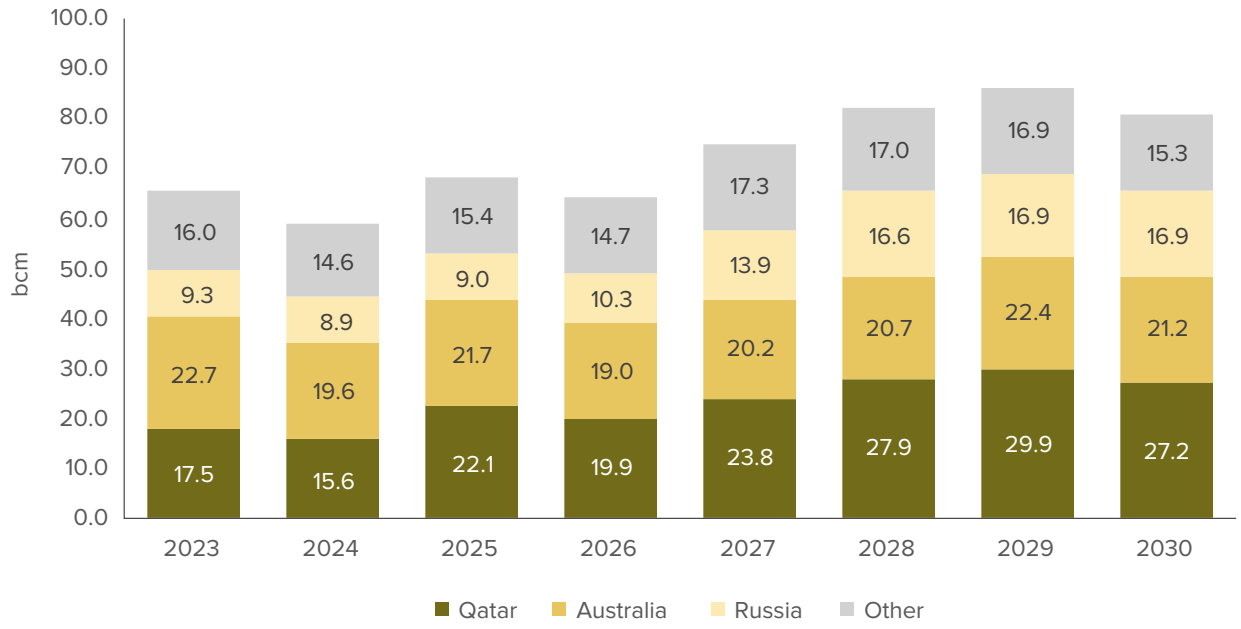
	2023	2024	2025	2026	2027	2028	2029	2030
Scenario 1: Baseline	4.5	5.3	5.1	4.6	5.3	12.6	17.5	18.1
Scenario 2: 125% tariff + cancelled long-term contracts	4.5	5.3	4.4	2.0	0.7	0.7	0.7	0.7

Figure 4. Contracted LNG imports to China up to 2030 (Baseline Scenario).



Source: Author, based on Nexant (2025).
Note: "Other" includes minor suppliers with less than 6 bcm, such as Malaysia, Canada, Indonesia, Mozambique, Oman, etc

Figure 5. Contracted LNG imports to China until 2030 (Scenario 3 with cancelled U.S.-China contracts).

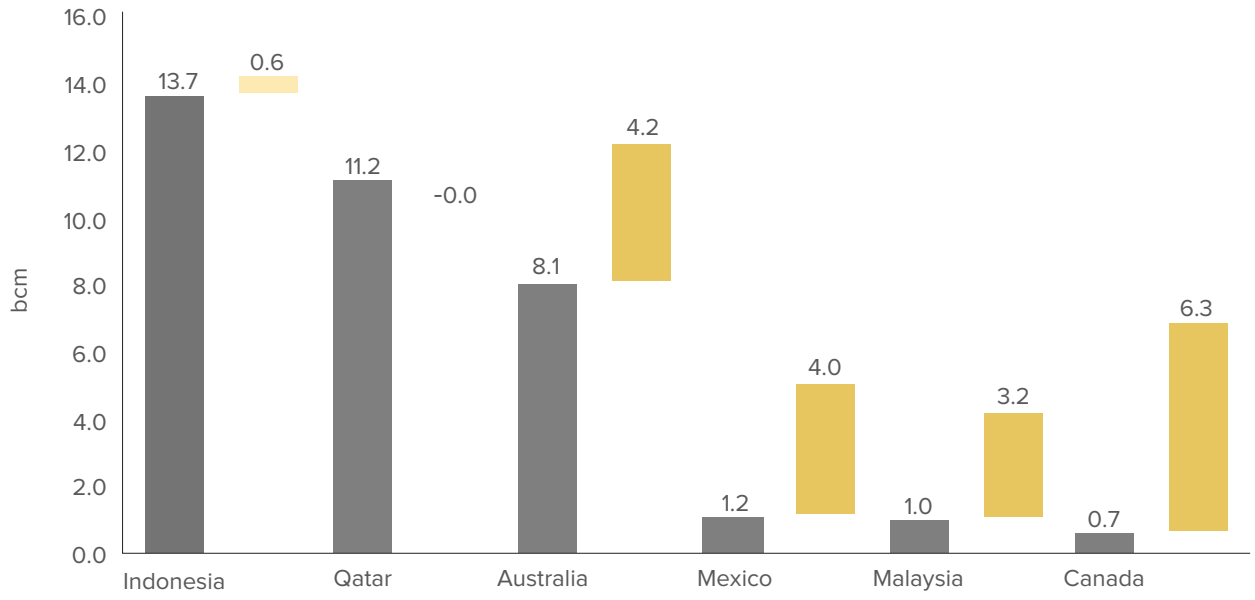


Source: Author, based on Nexant (2025).
Note: "Other" includes minor suppliers with less than 6 bcm, such as Malaysia, Canada, Indonesia, Mozambique, Oman, etc.

Table 3. China's total LNG purchases under the long-term agreements and from the spot market (bcm) in the Baseline Scenario and Scenario 3.

	2023	2024	2025	2026	2027	2028	2029	2030
Total purchases through long-term contracts, bcm:								
Scenario 1: Baseline	65.5	58.7	68.6	66.5	81.2	96.8	96.5	99.8
Scenario 3: 125% tariff + cancelled long-term contracts with the U.S.	65.5	58.6	68.2	63.9	75.1	82.2	86.0	81.3
Total purchases through long-term contracts, bcm:								
Scenario 1: Baseline	32.0	43.2	43.8	48.6	38.9	25.9	35.2	35.9
Scenario 3: 125% tariff + cancelled long-term contracts with the U.S.	32.0	43.2	44.2	51.1	44.1	37.8	43.8	54.1

Figure 6. Increase in China's LNG spot procurements from certain countries in 2030, bcm, in Scenario 3 compared to the Baseline Scenario.



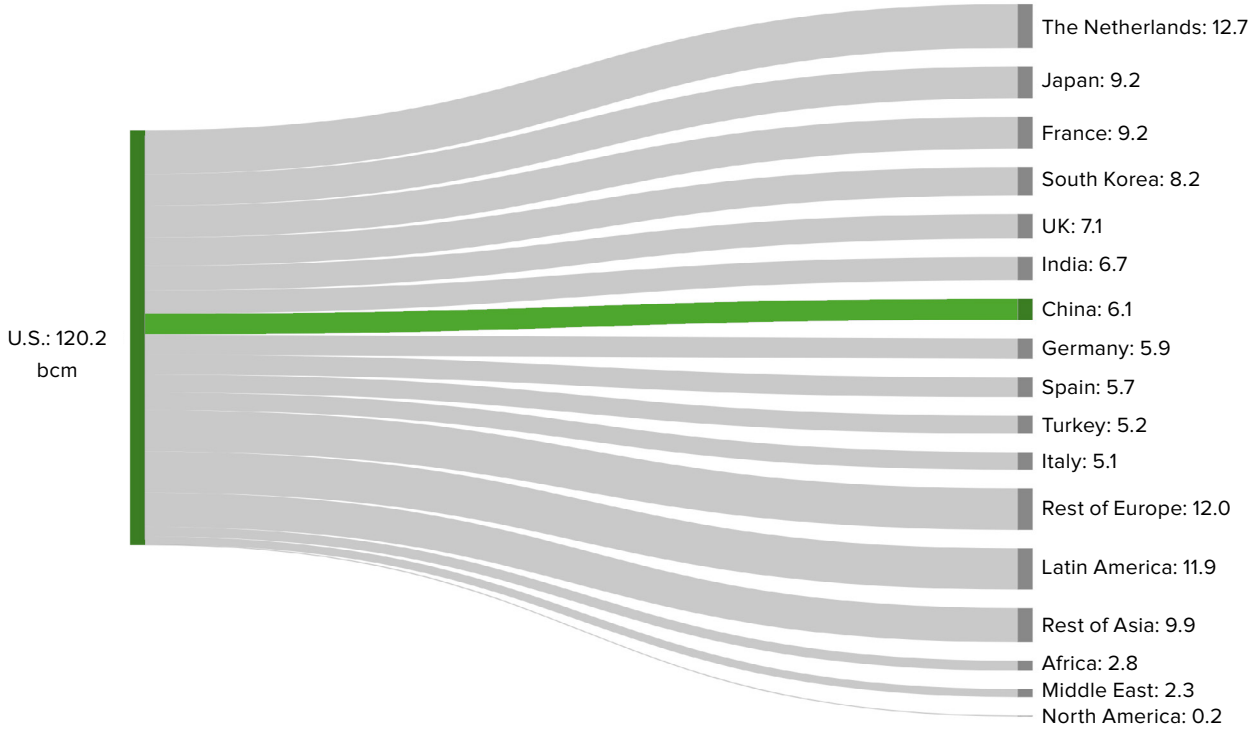
Source: Author, based on Nexant (2025).
Note: Green bars show the expected increase in procured spot volumes in Scenario 3. Gray bars indicate the spot volumes expected to be procured by China from the selected countries in the Baseline Scenario.

U.S. Perspective: Unfortunate Timing

In the sections above, it has been shown that in some scenarios, the consequences of the trade war for the Chinese LNG industry can be significant. However, it will take some time to see if they become game changing.

But what about the U.S.? As shown in Figure 7, the share of LNG exported from the U.S. to China in 2024 does not seem so high – approximately 5.1% of the total volume. However, can it still be critical?

Figure 7. U.S. LNG exports by country/region in 2024, bcm.



Source: Author, based on IGU (2025) [via sankeymatic.com].
Note: Insignificant discrepancies might occur due to rounding.

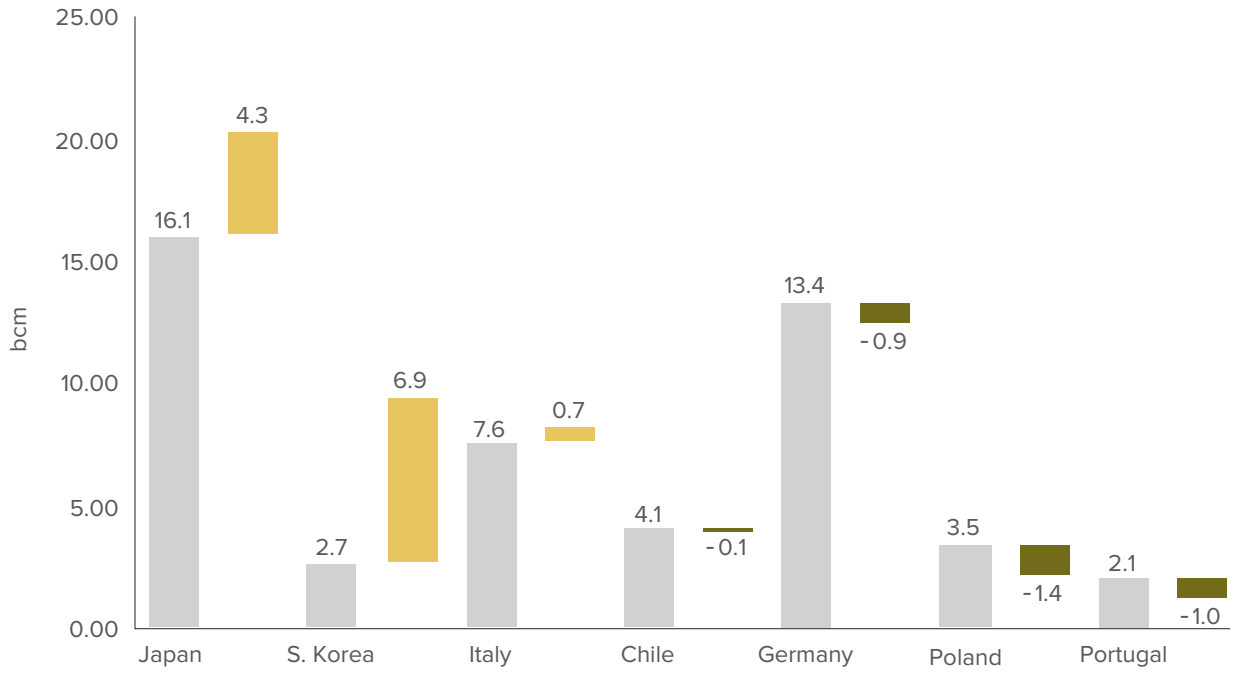
The key findings of the scenarios for the U.S. are as follows:

- In 2030, China was expected to buy much more LNG from the U.S. than in 2024 – 18.1 bcm (or at least 8.5% of the U.S. total projected LNG exports).
- Unlike China, which went to the spot to substitute the U.S. LNG volumes, the U.S. has limited ability to sell the excess gas on the spot market – out of 18.1 "extra" bcm that China was expected to buy, the U.S. finds buyers for only 8.5 bcm in 2030 (which means that 8.8 bcm remains unrealized in Scenario 3).
- The European countries, struggling to secure some natural gas, fail to benefit from the seemingly favorable situation: the excessive U.S. volumes are directed towards Asia – namely, Japan (+4.3 bcm) and South Korea (+6.7 bcm) – in Scenario 3. European countries lose some extra volumes from the U.S. in Scenario 3 (Germany and Portugal: -1 bcm each; Poland: -1.3 bcm) due to the persisting premium of the Japan-Korea Marker (JKM) spot price over the Dutch Title Transfer Facility (TTF) spot price in all scenarios (Figure 8).
- Even though the model was run until 2030, the situation is expected to worsen with time: the LNG market, like most markets, evolves in cycles. In the next couple of years, the market is expected to remain tight, which means that "extra" volumes can easily find buyers. However, as we move closer to 2030 and more liquefaction plants (which are currently under construction) come online, a supply glut is expected (Molnar 2024). It is important to note that Qatar and the U.S. are expected to drive it. Figure 9 shows the expected timeline and volumes of the U.S. liquefaction plants to be launched in the next 5 years.
- As Table 4 shows, by 2030, in Scenario 3, more than 50 bcm (20%) of the total liquefaction capacity of the U.S. is expected to remain idle due to these new circumstances.

Table 4. Key statistics on U.S. LNG in the Baseline Scenario and Scenario 3.

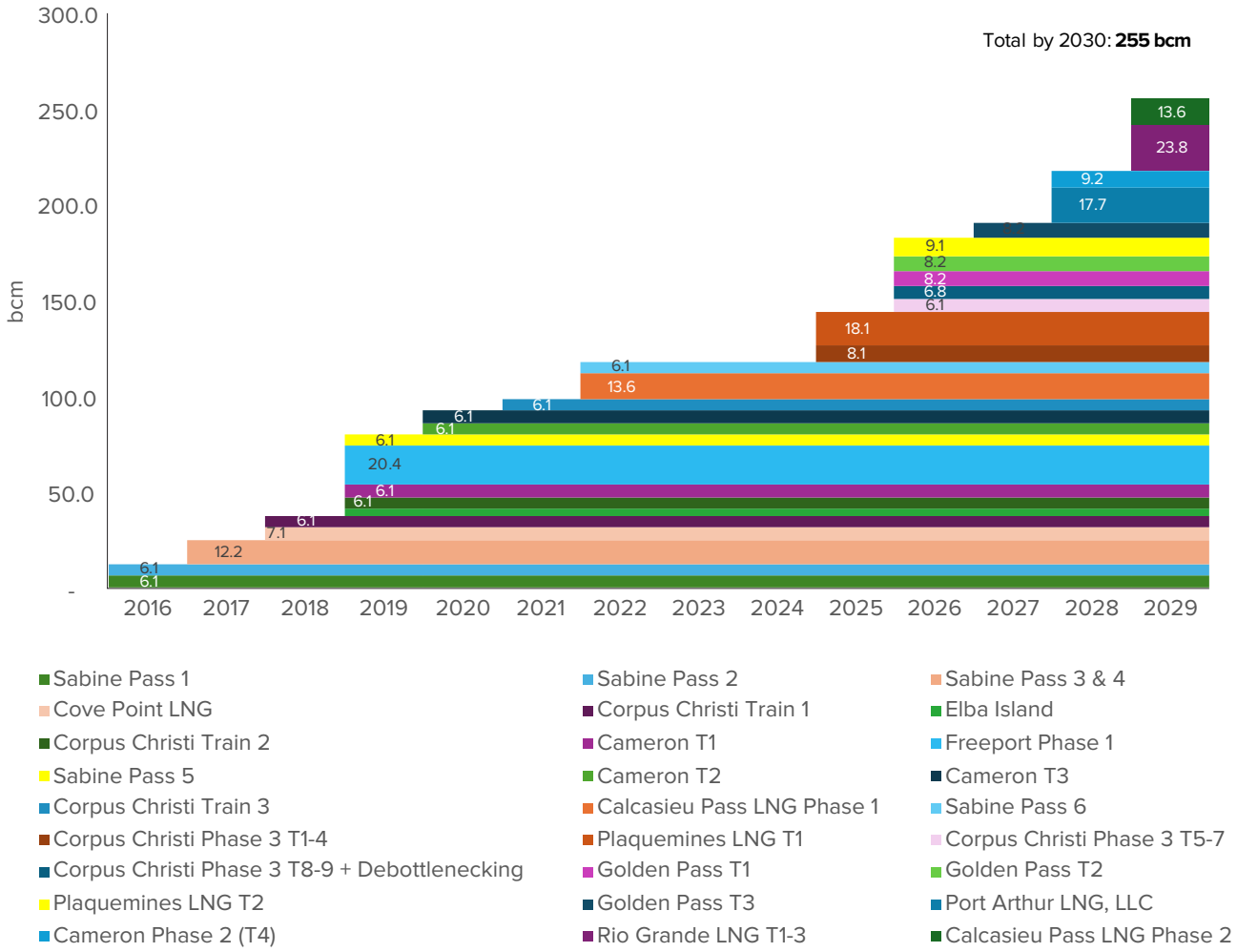
	2023	2024	2025	2026	2027	2028	2029	2030
Total purchases through long-term contracts, bcm:								
Scenario 1: Baseline	37.1	39.8	36.8	40.5	41.7	53.5	65.1	66.4
Scenario 3: 125% tariff + cancelled long-term contracts with the U.S.	37.1	39.8	36.4	37.5	37.0	41.4	49.0	49.1
Total sales on the spot market, bcm:								
Scenario 1: Baseline	77.0	80.9	97.5	119.5	142.1	136.4	138.1	144.6
Scenario 3: 125% tariff + cancelled long-term contracts with the U.S.	77.0	80.9	97.8	122.6	146.9	147.7	151.2	153.1
Unused liquefaction plant capacity, bcm								
Scenario 1: Baseline	0.0	0.0	0.0	0.0	0.0	4.5	26.7	41.9
Scenario 3: 125% tariff + cancelled long-term contracts with the U.S.	0.0	0.0	0.0	0.0	0.0	5.5	30.0	51.2

Figure 8. Change in the U.S. LNG spot sales to certain countries in 2030, bcm, in Scenario 3 compared to the Baseline Scenario.



Source: Author, based on Nexant (2025).
Note: Green bars show the expected increase in spot volumes in Scenario 3. Orange bars show an expected decrease. Gray bars indicate the volumes expected to be sold by the U.S. on the spot market to the selected countries in the Baseline Scenario.

Figure 9. Additions of the U.S. LNG capacity by year on the horizon until 2030, bcm.



Source: Author, based on Nexant (2025).

Conclusion

Based on the scenarios analyzed in this paper, the severity of the consequences of the U.S.-China tariff conflict for the global LNG market can vary depending on the route that the conflict takes. In a scenario where the sides resort to tariff measures only, the impact on the bilateral LNG trade is almost non-existent due to the prevalence of long-term contracts – under the take-or-pay clause of these contracts, the buyer (China) is obliged to import a certain volume of gas, or to compensate the seller (U.S.) for it.

However, in the scenario where the contracts get terminated, the stakes rise. China, with its well-diversified portfolio of LNG sources, is pushed to ramp up its share of gas bought in the spot market from 26.5% to 40%, and to face the associated energy security risks. However, it is still less affected by the consequences than the U.S., which, in its ambition to boost its liquefaction capacity by the end of the decade, is more likely to face the challenges associated with finding new buyers amidst a potential LNG supply glut in the 2030s. As a result, more than 20% of its capacity might remain idle, which raises questions about whether all of the planned U.S. LNG projects would remain feasible to build.

Endnotes

[1] According to the data provided by the LNG Journal (2025), there has been one 0.08 million ton (0.11 bcm) cargo from the U.S. Cameron LNG that was shipped to China on April 27, 2025, and scheduled to arrive at the Jiangsu LNG import facility on the Marvel Falcon vessel on June 07, 2025. However, on June 08, the gas carrier reported arrival in Anegasaki port in Japan, which it then left on June 09, and was en route to Lake Charles in the U.S. This information gives us the right to assume that it was rerouted from China to Japan (VesselFinder 2025).

[2] Details about this model and its use at KAPSARC is provided in Hamdani and Shabaneh (2024).

[3] Some are already active as of May 2025, and some are highly likely to start before 2030.

[4] The contract's annual total quantity (ACQ) is not an absolute number showing an exact take-off volume. Most contracts have a take-or-pay (TOP) clause that guarantees that the buyer will either purchase a specific volume of gas or pay for it. In most Chinese LNG contracts, TOP is set at 85% of the ACQ, meaning that the buyer will need to purchase or pay for 85% of the annual total quantity of the contract. Therefore, the ACQ value can give us an approximate indication of how much Chinese companies expect to procure in 2030.

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