

Quarterly Update

July 2023

Gas Industry Co is the home of New Zealand's gas governance, advice, and data.

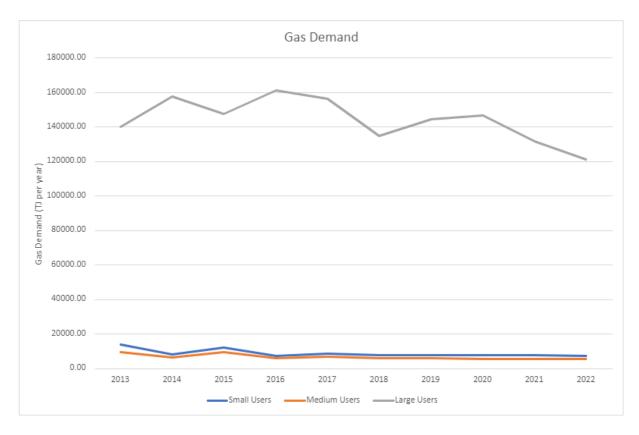
Gas Industry Co is the industry co-regulator, working with industry and government for safe, efficient, reliable, fair, and sustainable gas delivery.

1. Gas Today

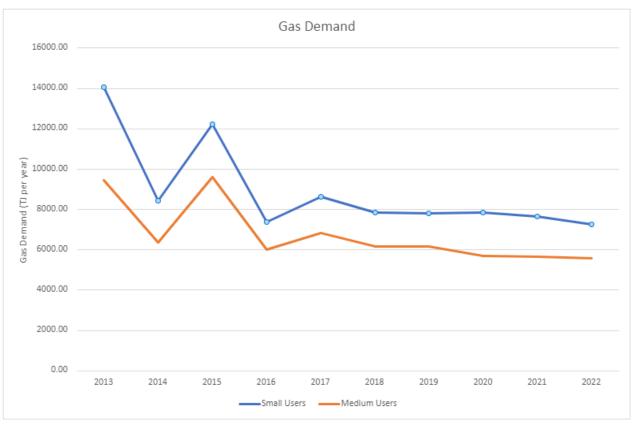
Security of Supply: Sufficient gas is available this year

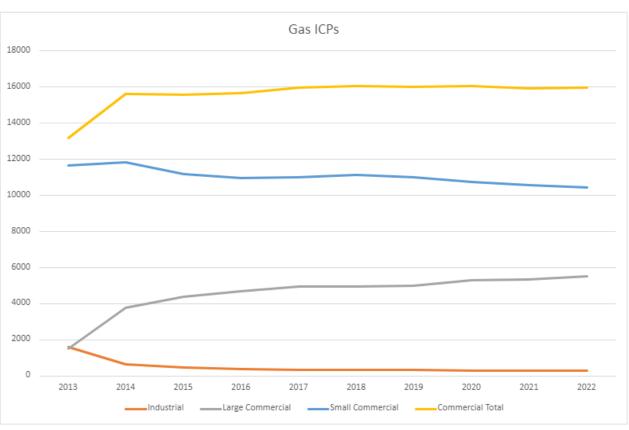
In the financial year ending 30 June, less gas has been supplied than in any year since the mid-1980s.

The decline in gas volumes is not driven by declining residential demand. Residential connections are trending steadily, while the number of switched connections ticked upwards in May.



Residential consumer preference for gas is broadly stable, while the carbon cost pushes consumer gas prices higher. Consumer behaviour is evidence that the market is likely to sustain a switch to renewable gases, such as biogas, for at least some purposes even if renewable gas is more expensive than electrification per unit of energy. Looking ahead to the transition, this means residential gas networks are not expected to experience a decline spiral in which rising costs are absorbed by a declining number of customers.





Supply volumes are expected to increase next year, as developments come into production in response to demand. Sufficient gas is available for expected demand this year.

Gas consumption for methanol production, the largest use of gas in New Zealand, was stable through the quarter. Electricity consumption of gas declined in May, then rose during June.

Gas storage has been at higher levels as electricity generation has been supported by high lake levels. That market is showing elevated forward prices, so forward conditions for the gas market remain uncertain, with prices signalling ongoing risks that more gas will be needed for electricity generation.

The pace of further development of gas fields will depend on forward supply contracts and domestic investment confidence. Ongoing investment in gas fields is needed to ensure sufficient gas is available to meet demand. Updates to field reserves are expected in July.

Gas Transition Plan work update

Gas Industry Co worked with MBIE on development of the gas transition issues paper, which will further inform the development of a gas transition plan. Public consultation will be welcomed on the issues paper after it is published.

The draft issues paper presents initiatives to facilitate a transition in which emissions reduce while gas consumers continue to have access to required energy.

Gas Industry Co has developed a substantial body of knowledge about issues in the transition and the available pathway for the sector. Report topics include:

- renewable gases including, separately, hydrogen and biogas,
- a technical study of the feasibility of carbon capture, and a study of the regulatory framework for emissions capture,
- whether regulatory changes are needed for the transmission system, and
- options for security of supply if insufficient natural gas is available.

The reports contain detailed economic and technical data that are likely to be valuable to industry participants planning for the transition. It is intended to publish reports commissioned during the past year on the Gas Industry Co website once the issues paper is published.

Targeted engagement with industry around specific draft initiatives will continue in the second half of 2023.

2. Gas Industry Insights

Gas Industry Co has comprehensive gas sector information in our data portal

Data available for market participants includes daily gas production by major fields and consumption by the largest users. Monthly information about Ahuroa gas storage is displayed, along with average quarterly gas prices and supply.

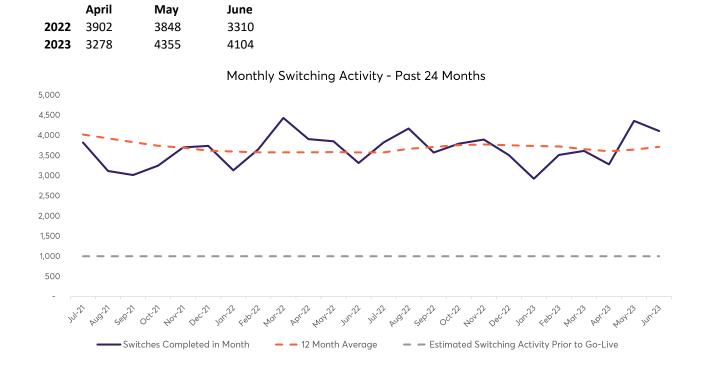
Market analysts looking for detail about prices can quickly locate emsTradepoint daily gas prices and delivered quantity.

Detail to support security of supply, and help markets understand energy availability, is provided through a portal recording planned gas production outages.

Quarterly Data

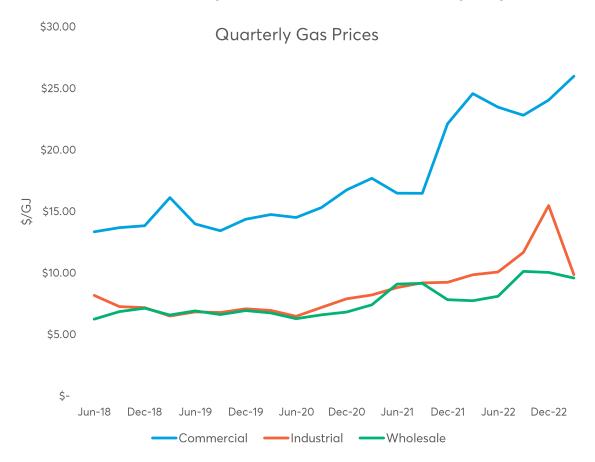
Residential switching annual churn rate of 15%

Over the past 12 months an average of 3,710 switches per month were completed, which translates to an annual churn rate of about 15 percent.



Around 79 per cent of consumer switches are completed within three business days and 97 percent are completed within seven business days.

Commercial and industrial prices have increased over the past year

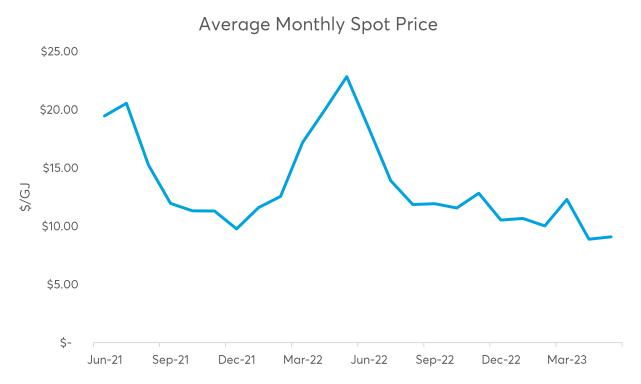


MBIE quarterly prices for commercial, industrial, and wholesale sectors have changed at different rates during the past 12-months. These prices are representative of all natural gas produced in New Zealand and exclude GST.

Around 95% of gas is traded via long-term bilateral contracts. In the chart above, prices rose steeply between September and December 2021 for the smaller volumes of gas being purchased by commercial consumers coming off contract and have remained elevated since.

Industrial prices rose sharply between September and December 2022, but settled back down by March 2023.

Monthly Spot Prices: trending down

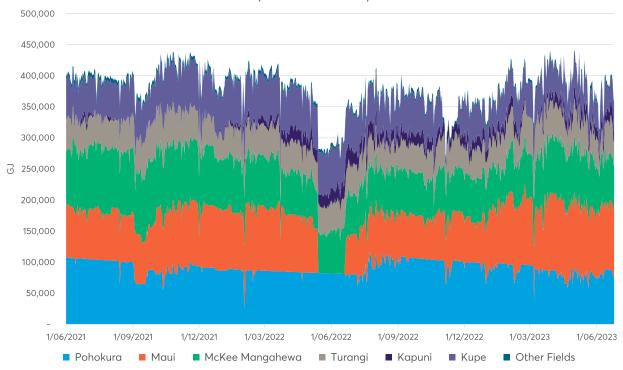


^{*} Spot price includes daily trades and forward prices. Shown prices exclude GST but include carbon costs.

This graph shows the average, maximum and minimum price per month on gas delivered via emsTradepoint. This covered approximately 4% of the total gas produced in 2022.

Gas Production

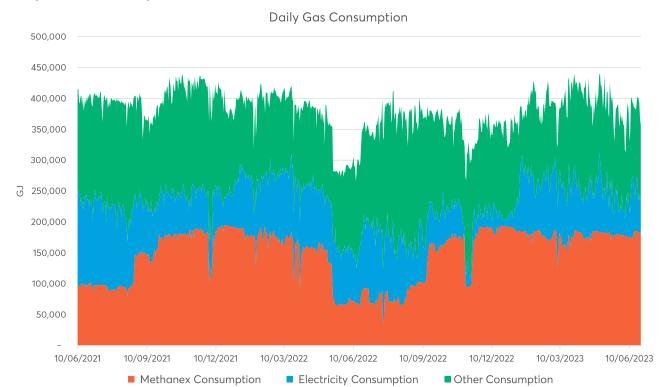
Daily Gas Production by Field



^{*}Excludes gas sold through private pipelines.

This graph breaks down the production of gas delivered through the open access pipeline network by field. Overall production declined through May, primarily driven by declines at Maui and McKee/Mangahewa, but largely recovered in June. Most gas is sold through long-term contracts and production volumes do not vary in response to short term (spot market) price variation.

Daily Gas Consumption



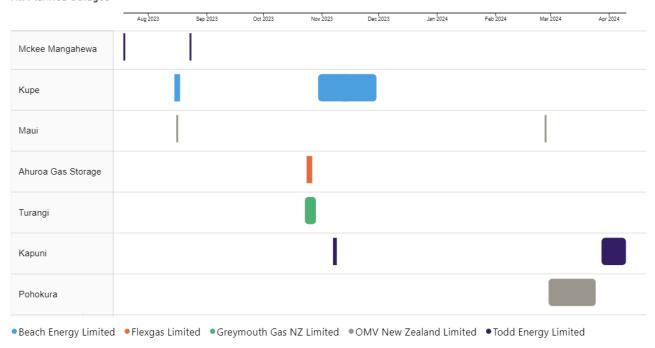
*Excludes gas transported through private pipelines

This graph breaks down the consumption of gas delivered through the open access pipeline network. The two largest users of gas are methanol production, followed by electricity generation and cogeneration.

Methanex's consumption has been stable through the quarter, while electricity consumption declined during May before rising during June.

Upcoming planned outages

All Planned Outages



This graph shows all planned outages that have been disclosed through our new <u>outage disclosure</u> <u>page</u>. For more information on planned gas production outages, see our <u>website</u>.

3. Our Work in Progress

The Gas Industry Co Statement of Intent for the next three financial years has been published on our website

Our Statement of Intent for the Financial Years 2024-2026 includes a work programme and associated costs for the following financial year, and indicative activity for the subsequent two years.

A copy of it is available here.

Critical Contingency Exercise

Each year, the Critical Contingency Operator (CCO) is required by the Gas Governance (Critical Contingency Management) Regulations 2008 to carry out an exercise to test tasks and activities associated with critical contingencies (crucial outages in the gas supply network). The annual desktop exercise, 'Exercise Karaka', was held on 10 May 2023.

The exercise scenario this year involved damage to the Maui pipeline near Putāruru (a theoretical contractor had ruptured the pipeline with a digger). The damage, and subsequent isolation of the pipeline at this location, meant that gas could no longer flow from Taranaki production locations to consumers in the Eastern branch of the North Island transmission system past Putāruru. The CCO commenced curtailing the first CCM consumer bands to ensure that any remaining gas in the isolated part of the transmission system could be conserved for the most critical users.

The exercise provides a valuable opportunity for critical parties to test their processes and staff competencies in managing critical contingency events. It was encouraging to see these parties actively engage in the valuable learning opportunity that the exercise provides.

Key lessons from the event included:

- Firstgas has a good understanding of its role and responsibilities for critical contingency events. It took the opportunity to test some new staff in critical roles and identify improvements.
- Retailers are prepared to respond to a critical contingency and have processes and systems in place.
- Retailers have processes in place should a media appeal to domestic consumers be required.
- There is an improved level of confidence that retailers are maintaining consumer emergency contact details.

The exercise was completed successfully and tested the core critical contingency phases and information flows associated with an event, such as declaration, demand curtailment, regional status, and public information statements. Retailers were issued with curtailment instructions and provided consumer compliance updates.

The CCO's report for Exercise Karaka can be found on their website here.

Upcoming changes to gas governance arrangements

Gas Industry Co is working on a coordinated set of changes to the Reconciliation Rules and Switching Rules that cover market-led activities including:

rollout of advanced gas meters,

- D+1 (daily allocations),
- the upcoming trial of hydrogen blending and injection of biomethane in gas distribution and transmission respectively.

Gas Industry Co intends to publish a short consultation paper about advanced gas metering to get feedback on initial proposals for changes. Then, in September, we aim to publish a Statement of Proposal on changes covering all of the above issues. Gas Industry Co will also use the opportunity to propose changes collected on rule change registers over the last few years.

This will ensure our gas governance arrangements remain fit for purpose for the next period.

Review of Retail Gas Contracts finds substantial alignment

An independent assessment of retailer contract terms was carried out early this year.

The Retail Gas Contracts Oversight Scheme was introduced in 2010. It is designed to improve outcomes for small gas consumers - those using less than 10 terajoules of gas per year.

Standard published gas supply arrangements offered by gas retailers are assessed against 18 contract benchmarks and a set of reasonable consumer expectations developed by Gas Industry Co.

The independent assessor's benchmark assessment report found overall substantial alignment with all 11 sets of retailer terms and conditions being substantially aligned with the benchmarks. This result is consistent with the trend of retailers' alignment with the benchmarks over time.

As in the previous assessment, in 2018, the benchmarks with the highest concentration of non-alignment are clear price increases, clear disconnection processes, and clear description of liability and redress.

Gas Industry Co has written to gas retailers, highlighting areas of non-alignment and requesting they prioritise corrective action. Gas Industry Co intends to follow up with retailers on their progress.

The Scheme's benchmarks and reasonable consumer expectations were last amended in 2015 and will be reviewed to determine whether they are still fit for purpose. Gas Industry Co will consult on any changes proposed to take effect prior to the next independent assessment taking place.

Gas Industry Co will also monitor industry alignment with Gas Industry Co's guidelines to enhance consumer outcomes, including changes made to industry processes. The guidelines were implemented in 2022. The outcome of this monitoring will be considered in the review of the scheme's benchmarks and reasonable consumer expectations, alongside any applicable legislative changes.

The Independent Assessor's Benchmark Assessment Report - 2023 can be found on Gas Industry Co's website here. More information about the scheme is available here.

Unaccounted for gas

Unaccounted for gas (UFG) is the difference between the volume of gas injected into each distribution network and retailers' submissions for the volume their customers have used. Unaccounted for gas typically arises from retailer estimation error, metering or energy conversion inaccuracies, or technical losses on the system. The cost of unaccounted for gas is spread across all retailers depending on their customer mix.

The below graph shows that UFG (12-month rolling total) has increased significantly since late 2019. In response, Gas Industry Co carried out a review of UFG at individual gas gates and set up monthly monitoring at each gate as new data for gas injections and retailer submissions arrives. This initial work has helped to curb further increases and, as a result, UFG peaked in June 2022.

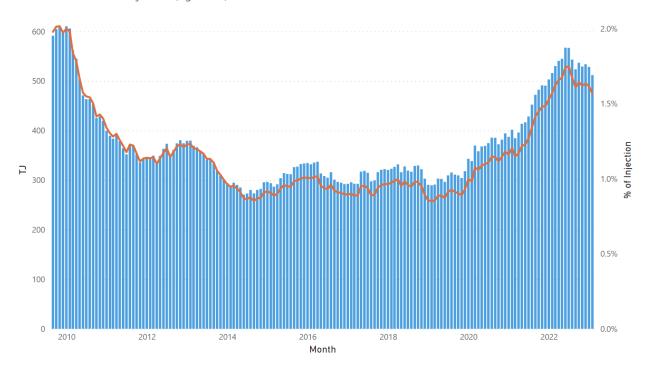
As noted in the previous quarterly report, regular monthly meter reads for small to medium sized commercial gas users (i.e. allocation group 4) remains a risk for further UFG reductions.

Gas Industry Co has also learned that not all industry participants have been strictly compliant with their meter reads for these customers. A self-breach notice has since been received relating to one industry participant and Gas Industry Co in its role as Market Administrator is carrying out a further information request to assist in determining the materiality of this issue.

This work will serve to either highlight or rule out meter reading compliance for small commercial businesses as a contributing factor to UFG. It may also serve as an opportunity to review rules around the frequency of reads to reduce the administrative burden for industry.

Rolling 12 Month UFG

• UFG TJ • UFG % of Injection (right axis)



About Us

This report is Gas Industry Co's quarterly report to the Minister of Energy and Resources.

Gas Industry Co is the industry body that co-regulates gas to ensure New Zealanders enjoy safe, efficient, fair, reliable, and environmentally sustainable gas delivery.

We work closely with industry players and regulatory agencies to develop arrangements and regulations and we provide trusted advice to industry and government about issues in the gas industry.

To get in touch or to find out more about the work we do, please contact us on 04 472 1800 or at info@gasindustry.co.nz or head to our website www.gasindustry.co.nz