NH3 Clean Energy

ASX Announcement 1 May 2026

Substantial Public Benefits of WAH_2 Clean Ammonia Project Forecast by ACIL Allen

NH3 Clean Energy Limited (ASX:NH3) ('NH3' or 'the Company') is delighted to advise that it has received a public benefits assessment report for the WAH_2 project ('WAH_2 Project') commissioned as part of the supporting documentation for project financing applications to Australian government backed policy-based lending groups Northern Australia Infrastructure Facility ('NAIF') and Export Finance Australia ('EFA').

The work was carried out for NH3 by ACIL Allen Pty Ltd ('ACIL Allen'), a leading independent economics, policy and strategy advisory firm. The report forecasts substantial public benefit from the WAH_2 Project thereby supporting the financing applications previously indicated to the market.

HIGHLIGHTS

ACIL Allen forecasts that Phase 1 of the WAH_2 Project[1] would:

- Boost Australia's Gross Domestic Product ('GDP') by A$7.3 billion over the life of the project, at an average of A$253 million per year;
- Increase Australia's real income by A$6.2 billion over the life of the project, at an average of over A$212 million per year;
- Create an average of 80 full time equivalent jobs over the life of the project;
- Pay Commonwealth and State Government tax payments of A$2.6 billion over the life of the project, at an average of A$88 million per year;
- Reduce global emissions by 13.5 million tonnes of carbon dioxide equivalent ('TCO_2e') over the life of the project through the use of clean ammonia produced by the project to displace conventional fossil fuels; and
- Deliver the above benefits at a Benefit Cost Ratio ('BCR') of 3.07 (including taxes), meaning the public benefit of the project is more than three times the public cost.

NH3's Chairman, Charles Whitfield, commented:

> *"These positive results demonstrate the strategic importance of the project to Australia - meeting its objectives of building viable clean energy industries, aiding our international energy partners in their emissions reduction and bringing investment, jobs and wealth creation to regional Australia. All this assists the compelling case for government support as well as NH3's planned applications for debt financing from the policy lead financing groups."*

[1] Please refer to NH3's 25 February 2025 ASX announcement 'Pre-FEED Results Indicate Doubling of Value for WAH2 Project' for further background to the key parameters of the WAH2 Project. The cautionary statement included in the Summary Pre-FEED Report attached to that announcement applies equally to any forward-looking statements in this announcement.

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EXECUTIVE SUMMARY

NH3 commissioned ACIL Allen to undertake an independent Public Benefit Assessment of Phase 1 of the WAH_2 Project to support the Company's planned applications for debt financing from NAIF, a Commonwealth Government financier with a mandate to offer concessional terms, and EFA.

ACIL Allen's Economic Impact Assessment of the WAH_2 Project demonstrates the significant economic benefits of producing high value products from locally-sourced natural gas that are forecast to flow from the project. It shows domestic energy can be used to both reduce carbon emissions within and outside of the boundaries of the Australian economy while simultaneously producing additional economic growth, employment and tax revenues for government.

The forecast A$7.3 billion boost to Australia's GDP over the planned life of the project represents the total value of the production of goods or services.

The forecast A$6.2 billion increase in Australia's real income over the planned life of the project represents the welfare of residents in the economy through their ability to purchase goods and accumulate wealth.

The large taxation income streams forecast, which flow mainly to the Commonwealth Government, would be effectively funded by foreign purchases of NH3's clean ammonia.

The core public benefit of the WAH_2 Project, beyond the direct and indirect economic benefits and impacts summarised above, is the use of the clean ammonia produced to reduce emissions and contribute to decarbonisation objectives held by industries and governments in Australia and the Asia Pacific region.

ACIL Allen forecasts that the net impact of Phase 1 of the WAH_2 Project would be a reduction in global emissions of 0.54 million TCO_2e per year, totalling 13.5 million TCO_2e over the life of the project. This is equivalent to taking around 120,000 cars of the road or avoiding driving 2.2 billion km^2 for each year of the Phase 1 project.

Cost benefit analysis was conducted to determine if the public benefits of Phase 1 of the project outweighed the public cost – which would support a decision to invest in the project to realise those public benefits. ACIL Allen calculated a BCR of 3.07 (including taxes), a very strong result meaning the public benefit of the project is more than three times the public cost.

ACIL Allen also recognised the significant qualitative benefits of the WAH_2 Project related to progressing the development of the Maitland Strategic Industrial Area, helping underwrite the establishment of carbon capture and storage in the Pilbara, and reducing Western Australia's economic leakage through the onshoring of marine fuel production and bunkering.

These positive results provide strong support for applications for debt financing from NAIF and EFA previously indicated to the market.

Further information on the results, methodology and assumptions used in ACIL Allen's Public Benefit Assessment are provided in Appendix A.

[2] US Environmental Protection Agency 'https://www.epa.gov/greenvehicles/greenhouse-gas-emissions-typical-passenger-vehicle'

WAH_2 Project

1. About the WAH_2 Project

The WAH_2 Project is NH3's flagship project to supply low-emissions ammonia to the decarbonising powerhouse economies of the Asia Pacific, including Japan and South Korea as well as being a source of decarbonised 'bunker' fuel for powering bulk carriers carrying iron ore from Australia to Asia. The project is well placed as Asia's energy transition drives an increasing demand for low emissions energy.

1.1 WAH_2 Tracking

Timing	Stage	Status
Q3 – Q4 2022	Complete scoping study	Achieved on time & budget
Q1 – Q2 2023	Complete WAH_2 Preliminary Feasibility Study Report Secure Option to Lease from WA Government over preferred project site Progress commercial discussions	Achieved on time & budget
Q3 2023 – Q2 2025	WAH_2 Pre-FEED Studies MOUs or other conditional commercial agreements for project inputs and offtake prior to FEED entry. FEED entry mid 2025	Achieved 1 month post guidance Mostly achieved
Q3 2025 – Q4 2026	FEED Studies Unconditional commercial agreements for project inputs and offtake prior to FID. FID end 2026	Commenced

Authorisation

This announcement has been authorised for release by the Board of Directors.

About NH3 Clean Energy Limited

NH3 Clean Energy Limited (ASX: NH3) is an Australian company focused on *Future Energy* project development and *Future Energy* materials exploration and project development.

The Company is developing a business to deliver decarbonised hydrogen (low-emissions ammonia) into export and domestic markets at scale, via its WAH_2 Project. The Company plans to use renewable energy to the greatest extent practicable.

NH3 100% owns the McIntosh Nickel-Copper-PGE project and the Halls Creek Gold and Base Metals project in Western Australia. The Company has an earn-in arrangement for its McIntosh graphite property.

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WAH2 Phase 1 Economic Impact Assessment

Results Summary

The quantitative results of the economic impact analysis are provided below. The results are presented in terms of their impact on real output (the value of the goods and services produced by the project, and in support of the project), real income (the economic welfare gains from the project), employment (total jobs supported by production and income, on a direct and indirect basis), and taxation (the real value of taxes paid to Commonwealth and State Governments attributable to the Project over its life).

		ACIL ALLEN
Impact on real output	**Total**	**Average**
Pilbara	$6,602.3m	$227.7m
Rest of Western Australia	$198.5m	$6.8m
Rest of Australia	$528.3m	$18.2m
Total	$7,329.1m	$252.7m
Impact on income	**Total**	**Average**
Pilbara	$534.4m	$18.4m
Rest of Western Australia	$845.7m	$29.2m
Rest of Australia	$4,771.0m	$164.5m
Total	$6,151.1m	$212.1m
Impact on employment	**Long Term (2054)**	**Average**
Pilbara	44.5 FTE	47.4 FTE
Rest of Western Australia	3.6 FTE	20.8 FTE
Rest of Australia	27.8 FTE	12.2 FTE
Total	75.9 FTE	80.4 FTE
Impact on taxation	**Total**	**Average**
Payroll tax (WA)	$39.9m	$1.4m
Commonwealth income tax (Cwth)	$1,644.1m	$56.7m
Other income taxes (Cwth)	$405.5m	$14.0m
Other Commonwealth taxes (Cwth)	$466.2m	$16.1m
Total*	$2,555.7m	$88.1m

Key Project Model Parameters and Assumptions

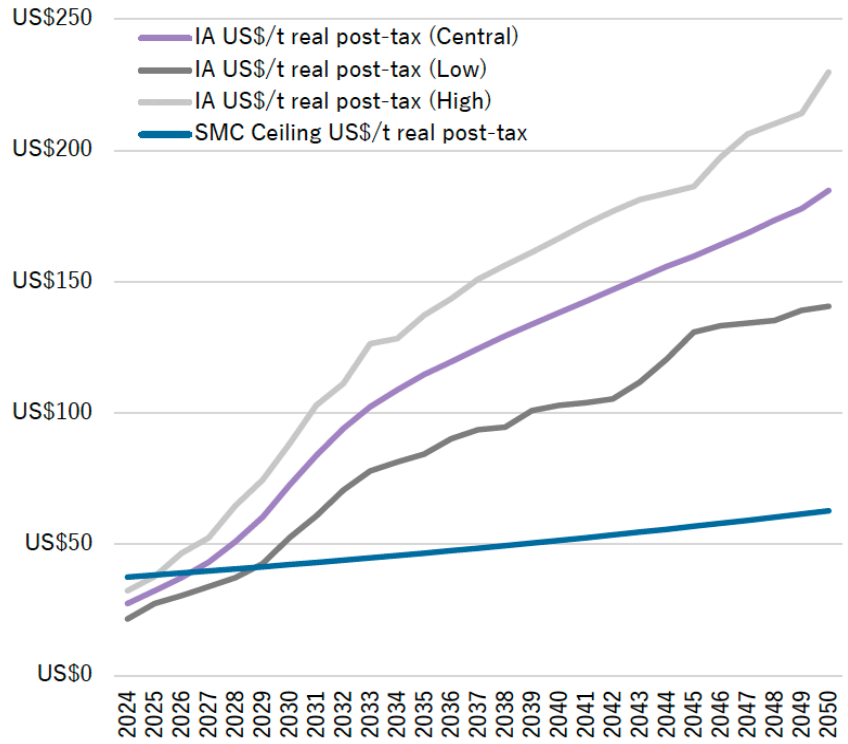
There are a number of headline modelling assumptions that ACIL Allen has used to build up its discounted cashflow model of Phase 1 of the WAH2 Project. These inputs and assumptions have been sourced from NH3 as project owner, combined with ACIL Allen's own research and a number of other macroeconomic assumptions.

Assumption	Value	Source & discussion
Construction period	2026-2029	NH3 Project Commercial Model, Pre-FEED Study (provided in confidence)
Modelling period (operations)	25 years	NH3, ACIL Allen
AUD / USD	0.66	NH3 Project Commercial Model. ACIL Allen is comfortable with this as a long term assumption noting the current AUD/USD exchange rate is likely influenced by short term and geopolitical factors.
CPI	2.5% p.a.	Standard assumption, to align with RBA target of 2-3%.
Assessment discount rate	7% p.a. real	ACIL Allen, in line with requirements for NAIF public benefits assessments
Project gearing	70%	NH3 Project Commercial Model & discussion with NH3 executive during Inputs and Assumptions process
Interest rate	8% p.a.	NH3 Project Commercial Model & discussion with NH3 executive during Inputs and Assumptions process
Project capital cost	US$1,105m	NH3 Pre-FEED Study.
Ammonia offtake price	US$600 / t	ACIL Allen's review of publicly available information suggests this is a conservative offtake price, particularly with no low carbon premium incorporated (current grey price is US$650-US$700 / t).
Company income tax rate	30%	As per ATO.
Personal income tax rate	25%	Adopted as simplifying assumption. This is paid on gross wages (ie is not additive to wages and salaries).
Payroll tax	5.5%	In line with Western Australian Government policy.
Project carbon price	Variable	Based on Infrastructure Australia *Economic Cost of Carbon for Economic Analysis* Guideline

Technical Appendix: Economic value of carbon abatement

ACIL Allen has adopted Infrastructure Australia's economic value of carbon abatement standard values for use in the alternative case for the CBA. The values are presented below. Further details can be found here. An additional value – an equivalent carbon price based on the application of the Commonwealth Government's Safeguard Mechanism ceiling price methodology (described to the right) – is presented for comparison.

Infrastructure Australia Long Run Marginal Abatement Cost of Carbon in the Australian Economy, Converted to US$, Post-tax Basis



Estimation of long run Safeguard Mechanism Carbon Price

The Safeguard Mechanism is a Commonwealth Government regulatory system which caps the absolute level of carbon emissions from Designated Facilities (facilities with >100kt p.a. of emissions in a baseline) on a periodic basis. To provide protection to industries which may face short and medium term challenges abating emissions due to technology constraints or high costs, there is a ceiling price placed on Safeguard Mechanism Certificates ('SMCs') set at AU$75/t in 2023 and rising by CPI + 2pp each year to at least 2030. ACIL Allen has applied this methodology, carried it forward to 2050, and converted the ensuing price to real US$ on a post-tax basis to compare to the Infrastructure Australia curves.

All things being equal, this approach suggests it will be more economic for emitters at the margin to purchase cap priced SMCs from 2029 onwards versus the Infrastructure Australia carbon price, which would suggest the SMC ceiling will need to be progressively raised over time to achieve emissions abatement outcomes.

Cost Benefit Analysis Overview

ACIL Allen has completed a Cost Benefit Analysis in line with the Northern Australia Infrastructure Facility's Public Benefit Guideline. The Cost Benefit Analysis is complementary to the Economic Impact Assessment, in that it analyses and presents results for benefits and costs which are "public" or "outside of the proponent.

Introduction

ACIL Allen has completed a Cost Benefit Analysis (CBA) for Phase 1 of the WAH2 Project, in line with the Northern Australia Infrastructure Facility (NAIF)'s Public Benefit Guideline. This framework calls for analysis and consideration of the benefits and costs of a project which are:

- Focussed on **Northern Australia**, being the area of greatest interest to NAIF through its funding and project support
- Are **Outside of the Proponent** in that they do not contemplate the private benefits (revenue, profit) and costs (project development and operational costs) associated with a project

This framework is suitable for consideration of the WAH2 Project as it allows for analysis and quantification of a number of benefits to NH3's clean ammonia production and use which are not captured in the economic impact analysis. These benefits and costs are principally centred on the **net carbon emissions impacts of the project**, accounting for the emissions associated with both the production of NH3's clean ammonia and the avoided emissions associated with use of ammonia in the Australian economy.

A summary of the benefits and costs considered in the framework is provided to the right. The outputs of the CBA are expressed as a Benefit Cost Ratio (BCR), which compares the present value of the analysed benefits to the present value of costs. A ratio of greater than one implies the project's benefits exceed the costs, and the same applies in reverse.

The CBA for the project contains five primary benefits and two primary costs, plus the presentation of one additional benefit (tax payments, which are sometimes excluded or considered separately due to them being sensitive to private benefits).

Calculated Benefits and Costs

A summary of the Benefits and Costs considered, as well as an introduction to the approach and methodology used to estimate these, is provided below. Colour coding is used to relate the description of costs and benefits to the analysis contained on the following pages.

Benefits	
Fuel emissions reduction	The reduction in attributable emissions for bulk shipping (noting these are Scope 2 emissions). The approach and methodology is described on the following page.
Regional employment	Wages and salaries paid to NH3's regional employees, during the operational phase of the project.
Regional contract expenditure	Expected value of local procurement to support NH3's operations once the project is established. This is an early estimate only and subject to change.
Reduced consumption of scheme water	Monetised value of the avoided consumption of scheme water enabled by NH3's investment in Water Corporation's wastewater processing infrastructure. NH3 is only taking ~1/3 of production for its use, making the rest available for this.
Traditional Owner payments	ACIL Allen's estimate (using past projects in the region) of payments by NH3 under an Indigenous Land Use Agreement for the project (actual details remain to be determined).
Costs	
NH3 production emissions	The increase in emissions attributable to ammonia production which are not captured by the infrastructure. Further details provided on the following page.
Construction environmental impact	Estimated costs of land disturbances to develop the project's supporting infrastructure, principally at this stage the infrastructure corridor to the Port of Dampier.
Additional Benefit	
Taxes paid by project	The taxes paid by NH3 on Phase 1 of WAH2 provide additional financial capacity to Government to fund infrastructure and services to the public, and as such are counted as a public benefit. However these are reported separately for clarity.

Cost Benefit Analysis Details and Assumptions

Stream	Description	Modelling Methodology	Key Parameters / Values
Fuel emissions reduction	Displacement of heavy fuel oil used as fuel for bulk carrier ships. Ammonia is a clean burning fuel which means any displacement of carbon-intensive fuels accrues a benefit to the project.	ACIL Allen estimated the emissions associated with combustion of heavy fuel oil using benchmark energy demand and fuel efficiency performance for Capesize vessels, assuming a laden and ballast cycle of movement between the Pilbara and iron ore ports in China. This was then converted into a fuel requirement (52 short tons per day laden, 44 tons ballast) and assuming a 10 day journey this could be used to calculate total fuel burn. This is then converted to tonnes of emissions using a standard rate for HFO. The number of journeys facilitated by the ammonia produced by NH3 is then estimated using similar parameters. It is assumed ammonia bunkering sales displace HFO based journeys, resulting in a benefit.	**HFO Fuel Burn** Trip time: 10 days each way Capesize fuel burn: 52 short tons / day laden, 44 tons / day ballast Emissions factor (HFO): 3.11 / ton **Ammonia Energy for Shipping** Capesize vessel engine load: 30MW Energy content: 5.17MW / t Trip time: 10 days each way Ammonia consumed per trip: 2,787.1t
Regional employment	The monetised value of operational employment created directly by the WAH2 Project.	ACIL Allen calculated a regional employment estimate by back-calculating the employment cost ratio of operational costs by an assumed all-in staff cost rate, and then removed superannuation and taxes. NH3 currently assumes 100% of operational staff will be residential.	N/A
Regional contract expenditure	The monetised value of local procurement during the operational phase, directly supporting the WAH2 Project.	ACIL Allen worked with NH3 to develop assumed Source of Supply parameters for the project, which identify where the project's suppliers are expected to be based. This is then applied to the projected operational expenditure to yield a value.	**Key parameters** Repairs & maintenance: 40% local Corporate costs: 10% local
Reduced consumption of scheme water	Monetised value of the additional treated wastewater capacity created as a result of NH3's capital investment in Water Corporation infrastructure to support the project.	ACIL Allen was advised by NH3 it would only take ~33% of the capacity of the water infrastructure it expected to invest in to support the WAH2 Project, with the rest made available to the community for watering of public open space and gardens. This would replace scheme (ie drinking quality) water used for this purpose. ACIL Allen monetised the value of the new capacity using the market rate set by the Water Corporation for scheme water in Dampier.	Additional capacity: 1.3GL p.a. NH3 consumption: 0.48GL p.a. Available for public: 0.82GL p.a. Water value: $3.54/kL
Traditional Owner payments	Payments made by NH3 to Traditional Owner groups in the area.	This value is derived by ACIL Allen utilising its past experience on major projects in the Pilbara region, based on a ratio of operational costs.	N/A
NH3 process emissions	Monetised value of the emissions produced by NH3 during the WAH2 Project which are not captured for sequestration.	ACIL Allen used NH3's Pre-FEED Study estimates of ammonia production and on-site power generation emissions, as well as capture rates for CO2 from this study. This was then monetised at the Infrastructure Australia value of carbon rate.	Emissions captured (ammonia): 95.07% Emissions captured (power): 0.0%
Construction environmental impact	The monetised environmental impacts of the project's footprint in the Pilbara region. This is assumed to be monetised for WAH2's pipeline corridor only, given the project's plant infrastructure is developed in a Strategic Industrial Area.	ACIL Allen estimated a length and width of a pipeline corridor connecting Maitland to the Port of Dampier, and assumed 50% of the lands would be subject to environmental clearing. This yielded a total impact of 83.7ha. The environmental impact was costed using a contemporary environmental offset value for the Pilbara based on work commissioned by the Commonwealth Department of Climate Change, Energy, Environment and Water (DCEEW).	Offset cost: $22,099 / ha (2022 dollars) Offset cost (2026 terms): $23,798 / ha.
Direct tax benefit	The direct taxes paid by NH3 on the profits generated by Phase 1 of the WAH2 Project. This is a benefit as this is taxes paid as a result of export income generated by the project, which is available to Government for use to provide benefits to Australians.	Direct taxes are calculated as a direct financial modelling output, taking into account the parameters and assumptions of the project including assumed gearing and the company income tax rate. Details of the taxes payable on the project are provided in the financial modelling section.	N/A