

6 February 2025

Greetings from a warm and sunny Port Kembla! This **Port Kembla Hydrogen Hub Update #31** contains information on the following key projects and initiatives:

- South coast town to become electric bus and truck manufacturing hub 31 January 2025
- Toll acquires hydrogen prime movers 24 January 2024
- Offshore wind farm developer says Illawarra is still in its sights 22 January 2025
- 'Amazing opportunity': Port Kembla's old copper smelter site sold to developers 17 January 2025
- H2 Future Mobility Day #7 15 January 2025
- Renewable energy boost as AGL's big battery planned for Kangaroo Valley 4 January 2025

Previous editions of the Port Kembla Hydrogen Hub Update newsletter are available here.

South coast town to become electric bus and truck manufacturing hub

31 January 2025

https://thedriven.io/2025/01/31/south-coast-town-to-become-electric-bus-and-truckmanufacturing-hub/

The New South Wales state government has announced the creation of a new manufacturing hub for electric buses and electric trucks on the South Coast. The new facility, to be built in Nowra, a city of more than 22,000, from late 2025, will produce electric buses, electric trucks, and hydrogen fuel cell engines. According to a statement from NSW Premier Chris Minns and state Minister for Transport Jo Haylen, the facility, to be built by Australian manufacturer Foton Mobility Distribution, will employ around 100 local workers.

The NSW government's contract with Foton is one of the first orders made through its Zero Emission Buses (ZEB) program, which is also in the process of converting eleven existing bus depots in Greater Sydney to battery electric, building a new battery electric depot at Macquarie Park, and acquiring around 1200 new electric buses by 2028.

Minns' government took the announcement as an opportunity to hit out at their predecessors, the Liberal National Coalition that held power in the state from 2011 to 2023. Minns accused them of "offshoring" public transport, in what he said amounted to a "complete disaster" for New South Wales workers. "Workers across NSW are great at building public transport like these buses, and under our government they're building them here again," Minns said.



NSW Minister for Transport Jo Haylen said this new facility was the first step in a new industry for the state. "There will be many more orders to come for Sydney, Outer Metropolitan and Regional NSW and many good quality, skilled manufacturing jobs that will be created thanks to the Minns Labor Government's support for building our buses, trains and ferries right here in Australia," she said. "Not only is it a great location because we have space, and we have young people that want to stay in this part of the world with skilled quality jobs, build their families, work hard and have a future here in the beautiful South Coast, but also because we're surrounded by universities, by TAFE, by innovation and new technology," she added.

NSW's Minister for Domestic Manufacturing Courtney Houssos also hit out at the previous state government. "The previous government sent contracts like this offshore, costing NSW thousands of jobs and billions of dollars," she said. "By leveraging the power of government contracts like this, we can rebuild local industries, support local workers and grow the NSW economy, particularly in regional communities."

Foton Mobility Distribution is an Australian-owned distributor with strong business ties to Foton Motor, a Chinese commercial vehicle manufacturer. The company's vehicles include the Hydrogen Fuel Cell City Bus, powered by a Toyota-made hydrogen fuel cell, the Foton Electric City Bus, which can charge in 90 minutes (with access to the right charger), the T5 battery electric truck, and the battery electric concrete mixer truck.

In 2023, the ACT government ordered 90 Chinese-made Yutong 'E12' buses for Transport Canberra, which has the stated aim of electrifying its entire bus fleet by 2040, though the government pulled four of its electric buses out of operation this month over technical issues. In November last year, Yutong partnered with Australia's Vehicle Dealers International (VDI) to build its E12s at a facility in Brisbane, including the 90 units ordered by the ACT government.

Meanwhile, in September last year, Western Australia's first locally-made electric bus began taking passengers in the Perth CBD. The new announcement will hopefully prove a boon to the budding electric bus sector in Australia which, as reported by The Driven two years ago, has been criticised for slow uptake. As well as contributing to the state's emissions reduction targets, the electrification of transport could have major benefits for public health. A 2023 study from the University of Melbourne found vehicle emissions may cause over 11,000 premature deaths a year in Australia. Those numbers were reached by scaling recent research on vehicle-emission impacts in New Zealand, the HAPINZ 3.0 study, to the Australian population.

Toll acquires hydrogen prime movers

24 January 2025

https://www.fullyloaded.com.au/toll-acquires-hydrogen-prime-movers/

Pure Hydrogen has announced its majority-owned subsidiary, HDrive International, has sold two Taurus 70ft Hydrogen Fuel Cell (HFC) prime movers to Toll Transport.



Image: Toll has purchased two HDrive Taurus HCF prime movers. Source: Pure Hydrogen

The added investment in HFC vehicles is in line with Toll Group's overall commitment to strategically investing in low-emission vehicle fleets and follows the announcement of the company's \$67 million investment to the purchase and rollout of 28 battery electric heavy vehicles late last year. Toll is also committing \$200 million to a wider refresh of its heavy vehicle fleet across Australia.

The Taurus is the first VTA HFC prime mover in Australia and passed Australian Design Rule standards following extensive testing and consultation with domestic regulators. It can transport

gross 70 tonnes, which is the largest clean energy truck available for Australian roads. Pure Hydrogen has also recently revealed the delivery of a HFC waste collection truck to Australian waste management company Solo Resource Recovery which will be deployed in Adelaide's City of West Torrens.

Managing Director of Pure Hydrogen Scott Brown praised Toll's commitment to exploring different renewable transport methods. "We are excited to collaborate with Toll Transport, a forward-thinking company embracing cleaner, greener transport solutions," Brown says. "This partnership is an additional validation of the market responding to Pure's high-quality zero emission products. "Orders and our sales pipeline are now accelerating as we witness strong interest from both government and corporate customers, including from Asia, Europe and North America.

"The deployment of the Taurus prime movers exemplifies our mission to deliver high-performance, reliable and sustainable transport solutions to meet the demands of modern logistics. "Furthermore, it underlines the growing traction that Pure Hydrogen and HDrive are establishing in the market for our leading range of transport vehicles. "We look forward to providing more updates on our vehicle sales pipeline in the months ahead, as we build momentum in our stated strategy to transition from vehicle development and testing to sales and revenue growth."

Offshore wind farm developer says Illawarra is still in its sights

22 January 2025

Wombarra Wollongong Port Kembla Shellharbour Kiama O 20 40 60 km

https://www.illawarramercury.com.au/story/8871879/bluefloat-energy-addresses-illawarra-windproject-concerns/

Image: The declared Illawarra offshore wind zone (with dotted line showing the original proposed area). Picture from the Department of Climate Change, Energy, the Environment and Water

A renewable energy company says it is still pursuing the opportunity to develop a wind farm off the Illawarra coast despite suggestions to the contrary. As of Tuesday, January 21, the Australian webpage for BlueFloat Energy's South Pacific proposal for the Illawarra offshore wind zone showed

an error message and a dedicated website for the project had expired. Media reports suggested that BlueFloat Energy was moving away from the project after removing references to the Illawarra zone from its website. However, a spokesperson for the Spain-based company said it was not known why the Australian page had disappeared and attributed it to a possible glitch.

The South Pacific proposal remains viewable on BlueFloat Energy's global website, where the company outlines details for a 107-turbine farm producing 1.6 gigawatts of energy to power 800,000 households. "We are still in the process in the Illawarra, as the global site makes clear," the spokesperson said. However, the spokesperson said the Gippsland offshore wind area had become the company's priority since it received a feasibility licence for the declared zone off Victoria's south-east coast. Applications for Illawarra feasibility licences closed in mid-August 2024.

The Offshore Infrastructure Registrar is assessing the bids before providing advice to the Minister for Climate Change and Energy, Chris Bowen, who decides the applications. Successful applicants will be allowed to assess the feasibility of an offshore wind project. Developers must hold a feasibility licence before applying for the commercial licence that allows them to construct and operate an offshore wind project.

A spokesperson for Mr Bowen said the former Coalition government established the process for granting feasibility licences. "We are following that process, as well as ensuring that the Registrar conducts due diligence to ensure offshore wind applications meet community expectations," the spokesperson said. "We're not rushing this process because we want to get it right - for the community and for the industry. "The assertion that there is no interest in the Illawarra offshore wind zone is factually inaccurate."

Other prospective developers have decided against projects in the Illawarra zone, however. The Illawarra Offshore Wind project, a partnership between Australian company Oceanex and Norwegian Equinor, is no longer in existence after the latter decided to focus on the Hunter offshore wind zone. Spark Renewables, an Australia-based, Malaysia-owned renewable energy developer, had expressed interest in building an offshore wind project off the Illawarra but did not apply for a feasibility licence. It is understood the company decided to focus on its onshore wind projects instead.

The number of feasibility licence applications received for the Illawarra offshore wind zone was unavailable. The construction of offshore wind developments in the Illawarra zone is not expected to begin until the 2030s.

'Amazing opportunity': Port Kembla's old copper smelter site sold to developers

17 January 2025

https://www.illawarramercury.com.au/story/8868324/port-kemblas-old-copper-smelter-site-sold-to-developers/

The former site of Port Kembla's famous 198-metre stack, which came down more than a decade ago, has been sold to property developers who will take over the land next year. Port Kembla Copper (PKC) announced last August that it would put up the old copper smelter site for sale to fund remediation work to <u>remove toxic heavy metal from hundreds of homes</u> in the industrial suburb.



Image: The old Port Kembla copper smelter stack coming down in 2014; and, inset, the site which has been sold to a property developer. Pictures by Kirk Gilmour, Real Commercial

On January 16, PKC announced an Australian corporate entity called Port Kembla Group Pty Ltd has bought the site, with the sale due to be complete in early 2026. According to ASIC, the company was registered in October 2024 to an address in Burwood, with the listed directors both born in China. PKG director John Chen said "placemaking" work was underway to ensure the future of the site - one of the largest development sites in Port Kembla - enhanced the suburb's community and employment opportunities. "The Port Kembla Copper Site represents an amazing opportunity to revitalise and enhance a strategic location on NSW's coastal logistic infrastructure," he said. "An experienced team has been engaged to provide a once-in-a-decade opportunity to revitalise the former copper site. He said a new precinct, which is being planned by Sydney-based planning and architectural firms, would service the growing infrastructure and supply needs of a growing community.



Image: The site which was up for sale. Picture from Real Commercial

Removing heavy metals from homes continues

The sale means 300 homes are set to be <u>rehabilitated</u> to remove toxic heavy metals from their roofs and garden soil. Environmental inspections have <u>recently</u> shown what many residents <u>had</u> <u>complained about</u> since the 1990s - that soil, roof dust and indoor dust at some homes has been contaminated by historical smelter emissions. The <u>main contaminant</u> is lead, Port Kembla Copper said, and the multimillion-dollar rehabilitation effort will begin after the old smelter site is sold. PKC started operating the smelter in 2000, and it was then closed in July 2003 after attempts to return it to full operation failed. The almost 200m-tall copper smelter stack was demolished on February 20, 2014, with thousands gathering to watch history being made.

PKC executive advisor Ian Wilson said the sale presented "an excellent outcome for the local community, given it opens up opportunities for commercial and or industrial redevelopment and employment at the site". "While PKC operated the smelter for only three of a total of approximately 100 years operation, it has decided to carry out investigation and remediation of contamination at the site and surrounding residential areas on a voluntary basis," he said. "Our extensive work has made the site suitable for future commercial or industrial uses, and we are pleased we were able to find an appropriate purchaser in a timely manner."

H2 Future Mobility Day #7

15 January 2025

https://wascoenergy.com.au/blog/2024/06/12/hydrogen-diesel-ice-prime-mover/



Image: Kelly Mulvay from Wasco showing the behind cab hydrogen storage tanks and refuelling receptacle

Great turnout at the <u>Port Kembla Hydrogen Hub</u>'s first event for 2025. The H2 Future Mobility Day event held on the 15 January showcased hydrogen internal combustion engine technology. On show

was a Freightliner Coronado prime mover in service with <u>Wasco</u> that has been converted to be a diesel-hydrogen hybrid.

Attendees heard details about how the conversion is undertaken with hydrogen storage tanks installed behind the vehicle cab. Hydrogen is stored at 350 bar pressure These tanks supply hydrogen to the injection unit which is fitted to the vehicle's injection manifold.

The conversion kit used is from technology partner <u>Hydra Energy</u> based in Canada. The hydrogen injection system has been tested for over 300,000 kilometres across a range of environments in British Columbia.



Image: Wasco Energy Australia CEO Mel Whyte presenting to the attendees.

Big shout out to Mel Whyte and Kelly Mulvay from Wasco Energy Australia for providing the display vehicle. A copy of the slide deck containing the event presentations is available <u>here</u>.

Renewable energy boost as AGL's big battery planned for Kangaroo Valley

5 January 2025

https://www.illawarramercury.com.au/story/8858049/renewables-boost-with-kangaroo-valley-bigbattery-planed/?cx testId=2&cx testVariant=cx 1&cx artPos=0#cxrecs s

Plans are underway to build one of the region's largest batteries on farmland in Kangaroo Valley. A 400MW Battery Energy Storage System (BESS) would be installed to the west of the historic town,

less 1km from the Kangaroo Valley pumping and power station, to which it may be connected. It is also close to Origin Energy's pumped hydro power scheme and the Bendeela Pondage which serves it. Battery development company Firm, which was recently bought by AGL, says making projects like this a priority is part of Australia's long-term emission reduction plan.

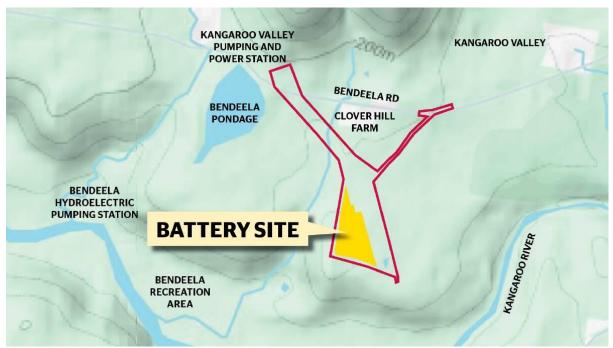


Image: The battery would be accessed from Old Bendeela Rd and would be nearby the existing pumped hydro station.

Firm has applied for the BESS to be assessed as State Significant Development as it will cost more than \$30 million. It says the BESS would contribute to the goal of "firming" power supply from renewable energy, to help "addressing the shortfall in firm capacity during times of peak demand". The site, Clover Hill Farm on Bendeela Rd, comprises about 51 hectares of cleared land. Historically a farm, it is now used for two holiday rentals in an area surrounded by short-stay accommodation. The BESS facilities would use about 15ha, Firm's scoping report states, and vegetation may be planted to screen the battery facility from nearby properties.

There is not yet a visual depiction of how the battery would look. The scoping report from Firm's consultant firm Premise says this would be shown later in the process. "The project's battery technology type and layout will undergo further refinement in the course of the Environmental Impact Statement," it states. "Given the rapid evolution of battery chemistry and associated technology options, coupled with declining costs, there is a growing emphasis on exploration and pursuit of these advancements." A BESS is different to a large community battery in that the BESS supports the electricity network, rather than being used to power homes in a suburb. Firm held an information stall at the Kangaroo Farmers Market in December. More consultation is planned and the scoping documents are publicly available on the NSW Major Projects website.

"The proposed development will provide for energy storage, thereby contributing to grid stability and providing clean and cheap electricity," the scoping report states. "The proposed development is considered consistent with the priorities of the plan as it will provide opportunity for energy storage within the regional context of the site." Firm was acquired by AGL in September 2024, while the documents for the battery system are dated December 2024, indicating the planning process for the BESS was well advanced before the AGL takeover. AGL paid \$250 million to acquire Firm and another company, Terrain Solar, in August 2024, a move described as a "big batteries play". People who want to find out more information can email the company on info@firmpower.com.au.

FURTHER INFORMATION

The Port Kembla Hydrogen Hub is facilitated by the <u>Illawarra Shoalhaven Joint Organisation</u> (ISJO) in partnership with the <u>Department of Primary Industries and Regional Development</u> (DPIRD). For further information about the <u>Port Kembla Hydrogen Hub</u>, please visit the <u>webpage</u> or contact Nigel McKinnon, Deputy Director, Department of Primary Industries and Regional Development by email <u>nigel.mckinnon@regional.nsw.gov.au</u>.