

15 September 2025

Productivity Commission
Locked Bag 2, Collins St
East Melbourne VIC 8003

Via Email: ncp@pc.gov.au



Building the Plumbing
Workforce of the Future

Interim Report - Building a Skilled and Adaptable Workforce

Thank you for the opportunity to make a submission in response to the Productivity Commission's Interim Report on *Building a Skilled and Adaptable Workforce* (the Interim Report). This submission is from the Plumbing, Heating Ventilation, and Air Conditioning (HVAC) and Fire Protection Industry (the Industry) as represented by the Plumbing Industry Climate Action Centre (PICAC), the Master Plumbers and Mechanical Services Association (MPMSAA), the Plumbing and Pipe Trades Employees Union (PPTU), the National Fire Industry Association (NFIA), the Air Conditioning and Mechanical Contractors' Association (AMCA), the International Association of Plumbing and Mechanical Officials (IAPMO), and the Association of Hydraulic Services Consultants Australia (AHSCA).

The Interim Report is part of a series of inquiries and reports being conducted by the Productivity Commission (the Commission), aimed at improving the productivity of the Australian economy. Industry recognises the need to ensure that the Australian economy, and the construction sector in particular, is productive now and in the future, with stakeholders pleased to be able to contribute submissions to two key relevant elements of that reform work. These include a response from Industry to the Commission's paper in June 2025 and to the Interim Report on National Competition Policy in September 2025, which focused on the harmonisation of standards and occupational licensing.

Those submissions, which are attached here for reference, make clear Industry's perspective on some of the major themes covered by the Commission in this Interim Report. Industry has sought to emphasise the critical point that for high-risk trades like plumbing, HVAC and fire protection, occupational licensing is vitally important. When it comes to plumbing, fire protection and HVAC work, there is a fundamental connection between safe buildings, community protection and well-designed occupational licensing systems. These are supported by strong entry-level competency requirements, including holistic Certificate III apprentice level training and backed up by robust regulatory oversight and enforcement for high-risk trades like plumbing, HVAC and fire protection.

Unit 6 / 306 Albert Street
Brunswick VIC 3056

T +61 3 9356 8902 F +61 3 9356 8929
E info@picac.vic.edu.au www.picac.vic.edu.au

www.facebook.com/PICACaus www.twitter.com/PICACaus



In this Interim Report, the discussion around occupational licensing extends to the Occupational Entry Requirements (OERs), which underpin occupational licensing across the economy. In this response, Industry builds on its points about the importance of occupational licensing for its key trades and makes several points about OER's in the Industry context. One of those key points is about the need to recognise that an occupational licensing system requires robust OER's to be effective.

The rationale for strong and meaningful OERs in high-risk trades like plumbing, HVAC and fire protection is compelling. For decades in Australia, policy makers and regulators have recognised that the disease, hazard and property damage risks associated with plumbing and fire protection work (which are outlined well in the attached earlier submissions), are such that it is not conscionable to leave consumers and the community at the mercy of the free market. It is imperative that only those with the demonstrable competence, skills and knowledge to work on plumbing and other building services like the fire protection or heating and cooling systems, have the capacity to do so safely.

Industry stakeholders, led by AMCA, strongly reject the Commission's recommendation to lower the occupational entry regulations for air-conditioning and refrigeration trades. The current requirement of a Certificate III level apprenticeship is both appropriate and necessary to safeguard public safety, ensure environmental compliance and maintain the technical standards of the industry.

Industry agrees with the Commission's premise that there is scope to make the current occupational licensing models and OER requirements that are applied across the economy, including the various scopes of licenced work within the Industry, more consistent and harmonised. **There is real potential and opportunity to improve productivity through greater regulatory harmonisation.** We have seen the national approach successfully adopted in the training sector, where there is a national training framework in place, with students in all jurisdictions completing the same entry level qualification of a *Certificate III* in plumbing or fire protection or HVAC. However, driving up regulatory harmonisation requires a level of leadership and policy intent which has not been evident to date. For example, the Australian Building Codes Board (ABCB), whose responsibilities include "regulatory reform in the construction sector", has not demonstrated a great appetite for driving national harmonisation.

In addition to occupational licensing and OERs, the Interim Report considers and makes recommendations regarding how to **improve school student outcomes, skills and education pathways.** Industry welcomes this holistic approach to long term skills development. Industry supports the policy focus on the need to harness and best utilise the rapidly evolving AI technologies and apply them productively in an education context.

The focus by the Commission on national consistency in terms of training materials and the like is also positive. Fundamental skills development in terms of literacy and numeracy play a key role in determining training success, particularly in increasingly complex trades like plumbing and fire protection. In Industry's experience, the literacy and numeracy skills of those commencing an apprenticeship in our Industry is variable. The national reform directions outlined have the potential to drive up the quality and consistency in the core skills of those leaving school and entering the VET sector, which would be a positive development for the Industry.

Industry also welcomes the discussion in the Interim Report about making tertiary education pathways more flexible and accommodating of a wider range of skills recognition and competency verification mechanisms. Industry agrees with the points made in the Interim Report about the **importance and value of greater 'tertiary harmonisation'**, both within and between the Vocational Education and Training (VET) and Higher Education sectors (University sector). If there were systems in place which supported and encouraged a more seamless transition between and within VET and higher education, over time, more qualifications could combine elements of both sectors. This would widen the recruitment base for skilled trades, facilitate cross sector mobility and provide career pathways and options for existing practitioners seeking to broaden their skills and opportunities.

One step towards more integrated pathways is having a more effective credit transfer and Recognition of Prior Learning (RPL) system, to support flexible and diverse education pathways. With a view to increasing flexibility and with the broader tertiary harmonisation objective in mind, **Industry welcomes the review of the current rules and restrictions around credit transfer.** Industry also supports many of the points made in the Interim Report about the importance of recognising a wide range of existing skills and competencies that individuals can bring with them to a new trade or occupation.

Performed well and with robust assessments by qualified assessors, RPL can be an effective means of recognising skills built from experience and provide a strong framework to ensure people can have their skills recognised. However, where the RPL process lacks rigor and integrity, the risk is that the resultant qualifications also lack integrity. This can lead to non-competent individuals being awarded qualifications, which, in the context of the risks and hazards relating to plumbing and fire protection work, can have dire outcomes for the safety of the community and the quality of the built environment.

In the attached submission, Industry seeks to make several key points, focusing primarily on sections two and three of the Interim Report. The submission addresses education and training pathways and fit for purpose occupational entry requirements.

For context, Industry makes the threshold points that consumer protection and risk should be the primary consideration, with licensing and registration being based on demonstrable and verifiable practitioner competence is the key to consumer protection and community safety. Occupational licensing and OERs may amount to over regulation in some parts of the Australian economy, but not the plumbing, fire protection and HVAC Industry, where they are the community's first line of defence against a range of very significant risks and hazards.

Other key points Industry seeks to make include:

- Certificate III level apprenticeship training is the appropriate entry level requirement for high-risk trades like plumbing, HVAC and fire protection
- The current requirement of a Certificate III level apprenticeship for refrigeration and air conditioning is appropriate and necessary to safeguard public safety, ensure environmental compliance, and maintain the technical standards of the industry
- Adding flexibility to training pathways is a positive reform direction
- Industry supports bringing more opportunities to more apprentices in more places
- Industry is strongly supportive of proposals aimed at improving the level and consistency of foundational skills of school leavers
- Industry strongly welcomes the greater policy focus on the potential benefits of greater 'tertiary harmonisation'
- Appropriate alternative pathways can be effective and appropriate where the RPL process is maintained with rigor, transparency and overall equivalence of skills (for those coming through the Cert III apprentice pathway); and where competence can be verified by way of a pre-registration exam (Victorian model)

Should you wish to discuss this submission further, please do not hesitate to contact me via email:

[Redacted email address]

Yours sincerely

[Redacted signature]

[Redacted signature block]

Shayne La Combre
Chief Executive Officer

Plumbing and Fire Protection Industry Submission

Interim Report - Building a Skilled and Adaptable Workforce

1. Context

1.1 Consumer protection and risk should be primary consideration

Any discussion about productivity, licensing, occupational entry requirements and worker mobility in the context of the Plumbing, HVAC and Fire Protection Industry in Australia, should be framed around risk.

As well as being costly to rectify, in plumbing and fire protection, instances of non-compliance can be deadly. Safety, for consumers, workers and the community, is at the core of why plumbing and fire protection work is regulated. Safety is why all plumbing work (whether constructed off site or on, or as a standalone unit or as a subset of a larger one) should only be undertaken by suitably skilled and qualified people.

Plumbing is a series of connections and cross connections, an ecosystem which is only as safe and robust as its weakest link. Risk, for workers and the community, is associated with every element of plumbing, be it a gas installation and the associated carbon monoxide and other gas related poisoning hazards; water borne bacteria and disease outbreaks including legionella; scalding risks from not fit-for-purpose taps or fittings; lead leaching out of corroding pipes; or the obvious risks associated with ineffective or non-functioning fire protection systems.

Effective and safe plumbing (products and practices) is the first line of protection (for households, community facilities, offices, schools, hospitals and so on) against a wide range of potential risks and hazards. The very life blood of our community and our economy, our ability to access abundant, unadulterated water, is plumbing and plumbing products dependent.

Plumbing and water treatment failures can be catastrophic. They can result in mass casualties as occurred after an outbreak of severe acute respiratory syndrome (SARS) in Hong Kong in the last decade, which saw 321 people infected by SARS resulting in 65 deaths. Investigations into the outbreak found that poor plumbing design coupled with faulty plumbing materials caused the loss of a water barrier seal in a U-shaped water trap. The water barrier seal evaporated, allowing air to escape from within the sanitary drainage system and into the building. The economic cost of the SARS outbreak in Hong Kong was \$60B. In another example, in the city of Flint Michigan in the United States, thousands of people were impacted by lead contaminating the city's water supply, a problem directly attributable to corrosive pipework.

Closer to home in Australia we have had issues with lead also, such as in Western Australia where lead in the water delayed the opening of the Perth Children's Hospital for three years (2015-18) and as recently as this month there were reported instances of higher-than-acceptable lead in water detected at the Hospital. Just over 25 years ago, 15 backpackers lost their lives in the devastating fire at the Childers Palace Backpackers Hostel. The Queensland Coroner found that the building had no functioning fire sprinkler system and no working smoke alarms.

Fire protection systems sit passive, with their safety and dependability when required being totally dependent on the skills and knowledge of those charged with the responsibility for servicing, testing, and maintaining the system.

Good hygiene, so much in focus following the global COVID-19 pandemic, is also plumbing dependent. Poorly or inappropriately constructed plumbing systems can mean sterility of pipework and therefore hygiene can be compromised.

Industry supports the premise that regulations, including occupational licensing and entry level requirements, should have a strong rationale, be well designed and administered, and be effective in terms of addressing an underlying problem or market failure. The benefits of regulation should outweigh any costs that arise. In this context, Industry would caution against a narrow focus on compliance costs and stress the need for the full costs and benefits of any proposed change to be considered.

In occupational licensing for example, there are clear costs attached to a licensing framework, for practitioners and for government in terms of administering the scheme. These costs add to the overall cost of engaging a plumber, HVAC professional, or gasfitter. However, the costs avoided (litigation, re-work, non-compliant work which is dangerous, fire damage, water ingress, carbon monoxide poisoning and flooding) by ensuring only competent people work on plumbing, or fire protection or HVAC, are incalculable and dwarf any compliance costs attached to the licensing scheme. **There may be sectors of the economy where occupational licensing and OERs amount to over regulation and could be re-considered; however plumbing and fire protection is not one of them.**

1.2 *Practitioner competence is the key to safety*

The primary way to ensure the safety of plumbing and related systems is to ensure the competence of those who install, maintain, service and test these systems. This is the key reason occupational licencing and registration exists in the Industry. Occupational licence and registration should be supported by additional compliance measures including inspection, audit or other means to ensure that the plumbing system is both fit for purpose and of a standard that protects the health and welfare of the broader community.

Australia maintains the highest levels of sanitary drainage and water supply requirements in the world and is recognised internationally for its work in water efficiency and re-use, in addition to work in the onsite treatment of sanitary waste and stormwater to achieve environmentally sound disposal. Fire sprinkler systems and other protection measures, installed by trained, qualified and licensed fire protection practitioners, save countless Australian lives every year.

As these systems become increasingly more complex, more integrated and co-dependent, there is an imperative to ensure suitably trained and qualified individuals carrying out this work. The rapid pace of innovation and technological change in energy systems means new energy products are entering Australia and becoming available to consumers who may lack an understanding of product safety risks. As the nature of change increases in respect to the plumbing product, systems and installations, so does the requirement to constantly develop and maintain competency increases.

In this context, Industry strongly supports the reform directions at a state and territory level relating to expanding and better utilising Continuous Professional Development (CPD) training. The Industry is changing rapidly and the days when a point in time qualification was adequate to ensure ongoing practitioner competency are long gone. Industry's view is that errors stemming from outdated knowledge invariably leads to rework, which is a primary source of lost productivity on construction sites. Implementing mandatory CPD is therefore framed as an economic imperative to reduce defects, minimise disputes, and support efficient project delivery.

2. Safe and effective training pathways

2.1 Certificate III Level Apprenticeship Training is the right entry level requirement

In the Plumbing and Fire Protection Industry, in all Australian jurisdictions, the minimum qualification requirement for licensing is a Certificate III level qualification. In some jurisdictions, the requirement is to have completed the Certificate III. Which, when completed in conjunction with an apprenticeship, usually takes four years. There are exceptions, such as Victoria, which provides an alternative pathway to registration and licensing through RPL, supported by a pre-registration exam.

There are very good reasons for this requirement. Industry's strong view is that to ensure the requisite level of practitioner competence necessary to mitigate the extensive and dire risks described above, with the full Certificate III level apprenticeship being the most effective pathway. The apprenticeship model provides the time for the layered build-up of skills and competencies. It allows for theory taught in the classroom to be applied in real world settings, embedding knowledge. To think of plumbing and related trades as a series of skill sets would be to misunderstand the complexity and level of interplay between the various elements and components which comprise and make safe the complex modern systems which move air, water, gas and energy around a building. For example, only a practitioner with a holistic understanding gained through an apprenticeship, can understand how one part of the integrated system of building services work together and how changes to one can impact another.

Industry strongly supports the existing apprenticeship model for the plumbing, HVAC and fire protection trades, particularly for those entering training or the workforce for the first time.

Industry would not be supportive of any reform proposals which would see the apprenticeship model fragmented or otherwise diminished.

Industry is also very supportive of the need to ensure that training is delivered in a way which is current and utilises modern delivery methods to best advantage.

2.2 Adding flexibility to training pathways is a positive reform direction

Industry agrees with the points made in the Interim Report about better recognising the existing skills of workers from other sectors. For example, where an individual has an existing relevant training and work background, and where the underpinning skills of that worker align well with those required of plumbing practitioners, there may be scope to better recognise that existing skill set by requiring a shorter apprentice pathway. A truncated or otherwise tailored plumbing or fire protection apprenticeship could be appropriate and low risk for those with an existing trade qualification.

The Industry strongly welcomes the focus on training and apprenticeships in the Interim Report, which touches on some of the current challenges, including systemic, financial and social. Industry would strongly support a collaborative process with industry and relevant government organisations and agencies to identify problems, reform opportunities and priorities to improve the training and apprenticeship system for the construction industry in Australia. Issues that should be considered include the attraction and retention of prospective students and apprentices, including the efficacy of pre-apprenticeship and mentoring programs. In addition, design, capacity and quality of the training system should also be considered and how they could be improved to meet the needs of existing workers and development pathways to encourage a career in construction.

There is significant scope to improve training pathways across the training continuum and to do more to attract people into the key trades (including plumbing), to provide ongoing career pathways. There is a growing need to think about whether the training frameworks are structured in the right way to attract Gen Z; not only whether there are more opportunities to do more with school-based programs to promote careers in key trades like plumbing, but also the entire emerging clean energy sector. It is vitally important that school students (irrespective of gender, socio economic or cultural background) are informed about the opportunities in these growth areas and understand their pathway options into VET training and a career in a key, in-demand sector, or trade. One of the challenges with attracting students into trades is the length of the commitment (four years).

A student who is unsure of their career direction may be reluctant to commit for such a significant period. We would encourage targeted programs aimed at familiarising prospective apprentices with what is involved, from foundational skills through to advanced learning. This could be a general or foundational introduction to the basic principles of multiple trades, which would inform student career choices. It could serve as a “try before you buy” step and provide a recognised credential to students. This could include plumbing and electrical for example, but could also be an opportunity to expose students, in particular school leavers, to identified, in demand, non-traditional trades like fire protection or HVAC-R (Heating, Ventilation, Air Conditioning and Refrigeration).

2.3 Growing overall training capacity and the key role industry training plays.

To ensure productivity in the construction sector, it is critical that the training sector which underpins it is financially viable and sustainable. The construction sector needs the VET sector as a whole to be viable, not just TAFEs.

Industry RTOs and other independent providers are integral to addressing skills shortages and delivering high-quality training aligned with industry needs. The independent skills training sector plays a critical role in workforce skilling, reskilling and upskilling. Recent data from the National Centre for Vocational Education Research (NCVER, September 2023) showed that in 2023, 5.1 million students were enrolled in nationally recognised VET training. 77.6% of students were enrolled in nationally recognised training at private training providers, 15.1% at TAFE institutes and the remainder enrolled with community education providers, enterprise providers, schools and universities (Total VET students and courses 2023).

In many instances, like PICAC, they **achieve better outcomes than TAFEs do**. Independent RTOs consistently deliver superior outcomes, including higher student and employer satisfaction, better completion rates and stronger employment outcomes.

Not-for-profit Industry RTOs are a key part of the broader VET sector and state government level policy has placed them under additional pressure. A key part of the challenge for non-TAFE providers (Industry RTOs) in the current environment are state-level funding caps and per-course funding rates.

The number of funded places and the unit price for delivery are capped and set at a state level. In Industry’s view, the caps on places are restricting uptake, and creating a level of unmet demand for training. With rising inflation over recent years, the costs of delivering training (e.g. staff, resources, insurance, energy etc.) have increased significantly and subsidy rates have not met those increases. Current state subsidy rates are often insufficient to meet the true cost of delivery, especially for specialist programs in HVAC, fire protection and energy transition technologies. This makes it increasingly difficult for many RTOs to participate at scale and undermines the training pipeline.

Industry RTO's, like PICAC, also play a key role in upskilling the workforce which is critical to productivity. Ensuring there are adequate training resources to accommodate upskilling demand is very important, especially where there is a licensing outcome attached to the upskilling training (fire protection commissioning and certification for example). **A shortage of trainers can result in bottlenecks** and waiting lists. Given how critical plumbing, HVAC, fire protection and related skills are to the energy transition and to the economy and community more broadly, it is important that State-based training **funding enables independent industry RTOs to continue** to deliver specialised training and key skills in these areas.

Managing capacity, particularly when it fluctuates, is a crucial issue in the context of demand stimulus measures, such as **Free TAFE, which adds demand but does not add training capacity**. They create waiting lists and those providers that would be able to assist with augmenting capacity, like Not-for-Profit RTOs, will be reluctant to or find it harder to participate, which then reduces overall capacity further.

Many TAFEs are struggling to meet this demand amidst critical shortages of trainers and assessors. There is anecdotal evidence to suggest that students are delaying their education in the hope of securing a Free TAFE place, bypassing high quality independent providers. By limiting students to only being able to upskill for free through TAFE, rather than through any quality provider, skills shortages are being exacerbated rather than alleviated, as capacity constraints within TAFE limit the system's ability to deliver training at the scale required.

2.4 More opportunity to more apprentices in more places.

Broadening employment opportunities through identifying and removing barriers for people and communities is a high priority for Industry. Attracting more students, apprentices and workers to the areas of identified critical need can be challenging in part because roles are not well defined. In refrigeration and air conditioning for example, where there are identified shortages of skills, or in the rapidly evolving yet somewhat undefined clean energy sector, knowledge and awareness of career opportunities is not as high as it could be.

There are broad issues associated with VET sector training which can act as “barriers” to student uptake. Often cited in this context are things like apprentice pay rates and the availability of and access to training (particularly for regional or remote students). There are also, at least for some sections of the community, cultural barriers. The trades and jobs which comprise the broadly defined energy sector are traditionally and heavily male dominated. Whilst we do not know the extent to which this acts as a barrier for women as much today as it did even a decade ago, Industry recognises that there is great scope and opportunity to grow female participation rates in the sector.

For other groups in the community, the barriers are less about gender and more about a lack of history or family background in this type of work. For many trades, including plumbing and fire protection, participation in the sector is often multi-generational. People, traditionally and mainly men, have followed a father, brother, uncle, or friend into trades like plumbing and electrical. For many parts of the community, particularly newly arrived migrant communities, that pathway does not exist and its absence can act as a barrier to even contemplating a career in the energy sector or related trades.

There is great scope to better promote what careers in emerging sectors, like clean energy, actually are. There is also scope to leverage the potential of VET for secondary students (VETSS). It is vitally important that school students (irrespective of gender, socio economic or cultural background) are informed about the opportunities in these growth areas and understand their pathway options into VET training and a career in a key, in-demand sector, or trade.

One of the issues associated with attracting students into trades is that there is a variability in terms of their level of understanding of what is required for an apprenticeship. It is important to ensure that students considering an apprenticeship have a good understanding of key things like the duration of the commitment, and a range of other things they may not have been exposed to. For example, using different tools, working a full day, traveling to different sites, managing their time between work and training etc. An ongoing goal for the Industry is to grow the level of awareness in the broader community regarding the career options available in the sector. In HVAC for example, there is an identified (by Jobs and Skills Australia) and significant shortage of skills, particularly in refrigeration and air conditioning.

A lack of awareness among school leavers and others about the opportunities in the sector is often cited as a key reason behind this shortage. Industry believes this could be addressed to a large extent by structured pre-apprenticeship programs and early **career awareness initiatives** in schools. Industry would be interested in collaborating with governments at state and national level to raise awareness of existing and emerging career options in plumbing, HVAC, fire protection, renewable gasses and so on.

Whilst more work and progress is needed, Industry has had some success, in terms of tailoring programs to attract identified cohorts of students. Industry actively seeks ways to, for example, **recruit more women into the traditionally male dominated sector**, to provide more opportunity to First Nations Australians, and to bring training and opportunity to parts of the economy particularly affected by the current transition away from manufacturing.

2.5 Driving up female participation rates

Plumbing is, historically, a very male dominated industry. To attract women into the industry, it is vitally important to ensure that women can work and learn in a safe, welcoming, and supportive environment. Industry is very active in this space.

In 2022 the PPTEU and RAW GTO (Group Training Organisation) developed a pilot program to attract more women into the plumbing trade and, most importantly, support them throughout their apprenticeship journey. The program is aimed at recruiting young women into apprentice level plumbing training and then supporting the women through a tailored RAW GTO **apprentice support** package.

In another Industry example, the Master Plumbers and Mechanical Services Association of Australia (Master Plumbers) has developed a specialist Women in Plumbing program. Women in Plumbing is a Master Plumbers and Plumbing Apprenticeships Victoria (PAV) initiative that supports female students, apprentices, and plumbers at every step of their journey, including providing paid pre-apprenticeships, direct entry to Plumbing Apprenticeships Victoria (Master Plumbers Group Training Organisation) and an array of **networking, mentoring, training and social opportunities**.

Recently, PICAC has been successful in securing a federal government grant through its 'Building Women's Careers (BWC) Program', designed to drive systemic structural and cultural change in training and work environments. PICAC's Building Futures: **Breaking the Barriers for Women in the Plumbing Industry' project** will aim to create, promote and deliver a national training program within the Australian Plumbing Industry **addressing the cultural and attitudinal changes needed** to make the industry attractive, welcoming and culturally safe for women.

This first focus of this project is for employers, by developing and implementing a national framework which supports a structured approach to promote the culturally safe environment, **reduce gender discrimination and promote career pathways**. The second is aimed at individuals, with an education program addressing the role an individual plays in promoting the change in current industry culture.

Industry has developed tailored programs for pre-apprentice level students, many from **disadvantaged backgrounds** and developed culturally informed training pathways for First Nations students and students from CALD backgrounds. First Nations Australians, a group which faces significant disadvantage in Australian society, have, and will continue to be, a focus of Industry effort. The Industry has had some great success in this area, and our tailored programs have delivered dozens of highly trained, skilled and qualified **First Nations plumbers** and fitters, many of whom have gone on to start their own plumbing businesses.

Industry is also actively considering ways to further broaden the appeal of the plumbing trades. In Australia, about 30 per cent, or 7.5 million people, were **born overseas**. Industry is seeking new ways to engage with this cohort, who may have had no previous exposure to plumbing, to think of the plumbing and fire protection trades as a potential career for them or for their children.

3 Occupational licensing and entry requirements

The Interim Report notes the breadth and extent of occupational licensing in the Australian economy and argues that occupational licensing reform could promote labour mobility and improve productivity, as workers move to places where their skills are most needed and valued. The focus is on the costs and other perceived downsides to occupational licensing requirements (hindering productivity growth by restricting the labour pool and impeding the allocation of labour towards more productive firms).

However, there are also very significant benefits for the community from occupational licensing and in plumbing and fire protection, those benefits are extremely important and should not be discounted. The lives saved, or disease outbreaks or other disasters like fires avoided, are impossible to put a monetary value on. The costs avoided (litigation, re-work, non-compliant work which is dangerous, fire damage, water ingress and flooding, etc) by ensuring only competent people work on plumbing, or fire protection or HVAC, are incalculable, and dwarf any compliance costs attached to the licensing scheme.

The critical link between licensing and community safety when it comes to plumbing, fire protection and related work is outlined in detail in Industry's previous submission (attached). **Given the seriousness of the risks ultimately mitigated by licensing in our sector, the need for licensing in our Industry should not up for consideration.** However, there is always scope to improve and update licensing models to ensure that they are as effective and efficient as they can be.

In that context, Industry is broadly supportive of the objective of developing a national licensing framework for plumbing HVAC and fire protection work in Australia. However, as described in Industry's June 2025 submission on national licensing there are some relevant challenges, primarily relating to the current lack of regulatory harmonisation, which would need to be addressed for more consistent, national licensing to be effective in the plumbing, HVAC and fire protection sector.

For example, in the HVAC sector, while AMR has delivered some benefits by reducing duplicative licence applications, it has not resolved the problem of inconsistent licence categories and scopes of work across jurisdictions. For mechanical services, this is particularly evident in the divergence between refrigeration and air conditioning, mechanical plumbing and duct installation licensing, coupled with the overlay of professional engineering registration. These differences create administrative barriers that undermine the intention of AMR.

If each state and territory define licence scopes differently, AMR cannot create a truly national labour market. Instead, it simply overlays a recognition framework onto a fragmented base. The result is that workers may still be unable to undertake equivalent work across borders, even when their competence is identical. This reduces labour mobility and imposes significant costs on employers who must navigate inconsistent systems.

AMCA members report significant compliance costs and waiting periods when relocating staff interstate, factoring in administrative processes, application fees and lost time. These costs far exceed other regulatory requirements businesses face when establishing interstate operations. More importantly, the administrative delays create project bottlenecks and lost opportunities.

An instructive example is an AMCA member company bidding on a national maintenance contract. In a few of these cases, businesses determined it was easier to subcontract to local firms at a profit margin loss rather than navigate AMR and licensing requirements for their existing workforce. This outcome highlights that while well-intentioned, AMR is not delivering the productivity and workforce mobility it was designed to achieve.

Furthermore, the effectiveness of AMR is already diminishing. As jurisdictions continue to modify their licensing categories, exemptions, and requirements, the coherence of AMR is gradually eroded. This trajectory mirrors the fate of the earlier National Occupational Licensing Scheme (NOLS), which collapsed due to states' reluctance to harmonise. Without national-level intervention, AMR will continue to lose relevance and effectiveness.

Industry's key point is that a national licensing model and Automatic Mutual Recognition (AMR), would make sense and could be effective if there was an existing level of regulatory harmonisation across the states and territories, upon which the national license could be based. The problem is that currently in the Industry that requisite level of regulatory harmonisation across jurisdictions does not exist.

In the absence of a platform of regulatory harmony, there is a risk that the pursuit of common ground reduces the national licensing exercise to a lowest common denominator approach. This could have the effect of lowering standards, increasing community risk and driving up sector costs (remediation and repairs). The Industry is moving at great pace, with new products and innovations entering the sector all the time. Currency of skills is critical to being able to embrace, utilise and take best economic and environmental advantage of these new and emerging products and systems.

Any moves which resulted in a lowering of entry level requirements, or a narrowing of licensed work scopes to align with the lowest common position upon which jurisdictions can agree could leave the workforce under-skilled. This could compromise Australia's ability to meet the challenges of decarbonisation (under skilled workforce), achieve national housing targets and mitigate and respond to climate change and its impacts.

3.1 Entry pathways for air conditioning and refrigeration practitioners

The Interim Report focusses on the entry pathways for air conditioning and refrigeration (AC&R) mechanics, which vary by jurisdiction. There are several relevant points to make here.

Air-conditioning and refrigeration work is inherently complex and carries significant risks. Practitioners are required to undertake electrical work, handle dangerous and environmentally sensitive substances such as refrigerants and operate in hazardous environments including at heights and in confined spaces. Each of these areas requires a strong technical foundation, rigorous training, and comprehensive on-the-job experience that can only be delivered through a formal apprenticeship pathway at Certificate III level.

Although not fully prescribed by all jurisdictions, importantly, the Certificate III qualification is the effective industry standard across all states and territories, regardless of whether a state jurisdiction imposes a Certificate III requirement in its occupational licencing model. This is because the Ozone Protection and Synthetic Greenhouse Gas Management Act mandates that an Australian Refrigerant Handling Licence — which is required to lawfully handle refrigerants — can only be issued to those who have completed a Certificate III in air-conditioning and refrigeration.

Reducing the entry standard would compromise the competence of new entrants, increase the likelihood of workplace accidents and heighten risks to consumers and the broader community. The potential consequences of inadequately trained workers mishandling refrigerants, electrical systems, or safety-critical installations are severe—not only for individual health and safety but also for the environment through refrigerant leakage.

Moreover, maintaining a nationally consistent Certificate III level entry requirement preserves the professional standing of the trade and provides assurance to employers, clients and regulators that workers are properly qualified to perform their duties. Any erosion of this standard would undermine industry confidence, exacerbate skills shortages by devaluing the trade and weaken pathways for career progression in one of Australia's most critical technical sectors. For these reasons, Industry strongly urges the Commission and Government to uphold the existing Certificate III apprenticeship as the minimum entry requirement for air-conditioning and refrigeration work.