ASSEMBLING THE FUTURE

Executive Summary

Queensland is facing a once-in-a-generation infrastructure pipeline over the next seven years, placing unprecedented pressure on the state's construction sector.

Yet construction productivity has declined by nine per cent since 2018, constraining the delivery of more than 77,000 new homes and impacting the sector's capacity to deliver projects on time and on budget. This decline is not only driven by regulatory and procurement settings, but also by the reality that construction methods have remained largely unchanged for decades. As demand accelerates, the industry is paying the price through stagnant productivity, increasing cost pressure and a growing shortage of skilled trades.

The Queensland Productivity Commission (QPC) report identifies regulatory burden, procurement inefficiencies and fragmented approvals as core constraints. The state government's response to review the role government procurement can play in bringing Modern Methods of Construction (MMC) into a business-as-usual approach is a critical step toward addressing these systemic challenges.

The Property Council has long held the view that government has a pivotal role to play in leading skills development, innovation and productivity by delivering public sector projects through MMC. Government-led adoption can create the scale and certainty needed to build a sustainable MMC industry, enabling the private sector to follow with confidence.

At present, the private sector alone cannot achieve the scale required to make MMC commercially viable particularly for housing delivery models and a number of barriers continue to stifle broader uptake alongside traditional construction methods.

This paper outlines a set of targeted recommendations for the state government to accelerate the adoption of MMC, lift construction productivity, and increase housing supply to meet Queensland's future needs.

Context

Australia's housing market has been constrained for several years, with extreme price and rental growth across all aspects of the market.

South East Queensland has seen some of the greatest growth in Australia, with well over 50 per cent increases in median dwelling prices and the detached housing market even higher again. Rental vacancies are near all-time lows, as limited supply has been unable to keep with the demand for new housing throughout the state.

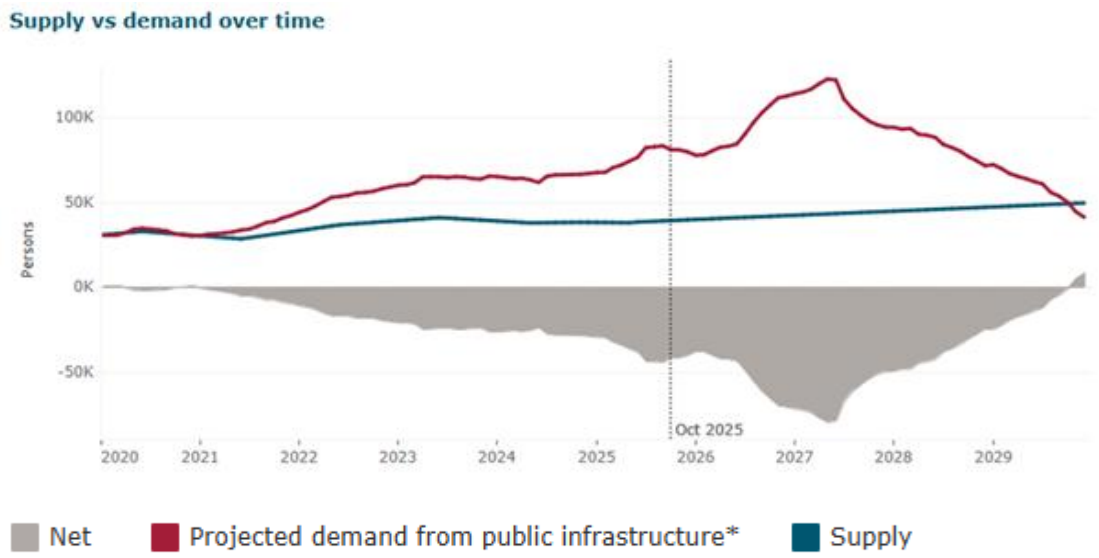
At the same time, Australia's productivity has cratered, with Queensland consistently among the weakest states. Positive steps, including the removal of the backwards and productivity-

starving Best Practice Industry Conditions (BPICs), have been taken by the government, but the scale of infrastructure spend over the coming years will place greater strain on the construction sector.

While Brisbane 2032 attracts significant focus, it represents only a small share of Queensland's total construction task. The real challenge is a highly concentrated public infrastructure pipeline, of which the Olympics is just one component albeit one with an immutable delivery deadline. When combined with the broader public investment program, this creates a top-heavy pipeline that intensifies competition for labour and materials and places pressures across both public and private construction markets.

Publicly funded projects currently account for 72 per cent of funded work in the market. Chart 1 below shows the forecast of supply and demand of public sector infrastructure workers in Queensland, showing the vast shortage of workers over the forward estimates.

CHART 1: Public Infrastructure Workforce Supply Dashboard, Queensland, 2020-29, Infrastructure Australia



Equally, over the past two decades, only 1.8 per cent of permanent migrants have been employed in construction trades, and construction trades are not in the top ten occupations for either permanent or temporary migration.

Both public and private sector proponents are going to compete for an increasingly scarce labour force. Unless something changes, it is inevitable there will be further inflationary impacts.

Understanding MMC

MMC refers to a wide variety of construction methods that are different to traditional onsite construction. It describes a broad and evolving set of construction approaches that deliberately shift a significant portion of the building process away from dispersed,

weather-exposed, labour-intensive construction sites and into controlled, high-precision factory environments. These factories are where repeatable processes, digital coordination, and manufacturing discipline can drive far greater speed, reliability and quality, safety and with more predictable outcomes than traditional on-site, sequential construction.

A major misconception about MMC is that it is a single product or technology. It is a series of products including panelised systems and sub-assemblies, through to fully volumetric modules that leave the factory almost complete. What unites these products is the manufacturing: design for manufacture and assembly (DfMA), precision engineering, rigorous quality assurance and logistics-driven delivery.

Within modular construction, the construction is done in modules or panels and is then transported and assembled on-site. This comes in 2D (panelised) or 3D (volumetric) forms. Bathroom pods, particularly in student accommodation buildings, hotels and aged care facilities, are already widely used by industry. These modules can also be stacked on top of each other on site to create Class 2 apartment buildings or Class 3 buildings.

MMC also includes the digital backbone that supports it, including real-time factory quality assurance records that integrate into compliance and certification processes. Importantly, MMC does not constrain itself to one technology or sector, as it can be used for myriad buildings including social housing, schools, health facilities, corrections, defence, remote area builds and disaster-response accommodation. It is not about choosing one construction method over another, but rather about creating procurement and regulatory pathways that allow these manufacturing-led solutions to compete fairly on speed, quality and cost certainty.

QPC final report and recommendations

The QPC final report contains important and effective recommendations relating to construction sector productivity. With productivity as the overarching challenge facing residential, commercial and other forms of construction, the recommendations stemming from this final report highlight the bottlenecks, regulatory and otherwise, that need to be amended, including several key recommendations that relate to MMC:

Recommendation 10 Better prioritisation and coordination

> Queensland Treasury should work with key procuring agencies to establish an infrastructure body to improve decision-making on the prioritisation and coordination of public infrastructure projects in Queensland

Recommendation 17 Guidance around risk appetite

> To support better contracting and appropriate collaboration and innovation, guidance should be provided to government agencies on the Government's preferred approach to risk.

Recommendation 22 Options to further utilise standard codes

The Queensland Government should continue to progress changes to the Queensland Housing Code (QHC)

Recommendation 41 Deposit caps

The Queensland Government should undertake further analysis into the impacts of any changes to deposit requirements for domestic building contracts.

Recommendation 44 National Competition Policy commitments

Queensland Government should progress commitments under the revitalised National Competition Policy.

Recommendation 45 NCC performance-based provisions

The Queensland Government should advocate for NCC performance-based provisions to be production-neutral.

Recommendation 46 Government procurement

Procurement policies should be production-neutral to ensure they do not disqualify innovative solutions such as MMC

Recommendation 47 Skills and training

To address the shortage of MMC skills and training in the construction workforce, TAFE Queensland should review relevant vocational education and training courses to ensure MMC is appropriately represented

It is pleasing that in the Queensland Governments initial response, they agreed, or agreed in principle, with all recommendations, demonstrating the government's commitment to improving productivity and increasing housing supply.

Why is MMC a good thing?

MMC can play a major role in delivering on the huge pipeline of infrastructure investment over the coming years, as well as supporting traditional in situ construction. It is critically important to note that MMC is not positioned as a *replacement* for on-site construction, but a *complement* to it. On-site trades remain essential, but a hybrid model will allow the sector to deliver more with the same or even fewer inputs, easing pressure on labour markets and improving overall system capacity.

Productivity

MMC offers a structural response to long-standing productivity challenges in Queensland's construction sector. On-site construction deals with fragmentation, sequencing and weather-dependency, constraining output and contributing to cost escalation and delivery delays. By shifting more activity to more controlled manufacturing environments, MMC enables parallel processes, where site preparation and component fabrication can occur simultaneously.

For jurisdictions like Queensland, these productivity gains are particularly important. MMC allows already scarce labour to be deployed more efficiently and helps to reduce rework, particularly important considering Queensland's decentralised population.

This also helps pipeline planning and capital allocation. Governments can sequence projects more effectively, industry can invest with greater confidence in manufacturing capacity and supply chains can be better managed and stabilised.

As demand continues to outpace traditional delivery models, MMC provides a practical pathway to lift productivity and scale, without compromising on quality or safety.

Quality and consistency

One of MMC's most significant advantages is its ability to deliver consistent and higher quality outcomes compared to traditional site-based construction. Factory-controlled environments allow building products and systems to be produced with quality assurances processes that are difficult to replicate on site. This results in buildings with more reliable performance across structural integrity and durability.

Consistency has particular value in public infrastructure, government works and large-scale housing programs, where performance failure or defects can carry long-term operational and financial consequences. MMC enables systematic testing of components before they reach site, reducing the likelihood of latent and underlying defects and post-completion remediation works, which can have significant cost and time implications on delivery.

Over time, higher quality and consistency allows a shift toward a more industrialised model that values performance outcomes, rather than bespoke processes. This does not mean that outcomes will be uniform; rather, repeatable systems will be capable of being adapted across different sites and uses. In doing so, MMC supports improved long-term asset performance, lower maintenance costs and improved value for money for industry and government alike.

Safety and workforce outcomes

MMC has the potential to materially improve safety outcomes across the construction sector by reducing exposure to high-risk on-site activities. By relocating many of these aspects of the delivery phase into factory settings, MMC allows work to be undertaken in more predictable conditions with bespoke equipment and processes.

Improved safety outcomes are closely linked to better workforces, and therefore productivity gains. This can also help make construction careers more attractive to a broader and diverse workforce, including women, older workers and those seeking more predictable hours. Considering the skills shortage in Queensland, this is also a critical advantage.

MMC also supports further upskilling career pathways and opportunities, rather than a reliance on transient and project-based labour. MMC directly helps to address the structural workforce challenges that traditional construction methods have struggled to resolve.

Environmental and energy benefits

MMC supports improved environmental performance across the full lifecycle of buildings and infrastructure, with better waste segregation and higher recycling rates some of the benefits. Precise manufacturing reduces over-ordering and excess waste, and standardised building products can be designed for disassembly, reuse or recycling at end of life.

MMC also enables higher performance in buildings. Greater precision improves airtightness, thermal performance and integration of energy-efficient systems. This supports lower operational energy consumption and improved comfort for occupants, contributing to emissions reduction targets over the building's lifespan rather than only at construction stage.

For governments and industry responding to sustainability expectations, MMC provides a practical mechanism to embed environmental performance into delivery. As energy and resource constraints intensify, the ability of MMC to minimise waste and deliver higher-performing assets positions it as a key enabler of more sustainable construction outcomes at scale.

Scalability

MMC is uniquely positioned to support scalability in construction delivery, enabling the sector to respond more effectively to sustained demand rather than isolated projects. Traditional construction models are inherently difficult to scale as they rely on site-specific labour mobilisation and bespoke processes that reset with each new project. MMC, by contrast, benefits from repeatability and standardisation, both at scale.

As demand increases, manufacturing capacity can be expanded and unit costs reduced through volume and learning effects. This creates system-wide efficiencies that extend beyond individual projects. For Queensland's anticipated pipeline of housing and infrastructure, scalability is critical to avoiding bottlenecks that drive cost escalation and delay.

Scalability also supports regional development and supply chain resilience. Distributed manufacturing facilities can serve multiple projects across different geographies, reducing reliance on FIFO labour and strengthening local economies.

Importantly, system-wide benefits only emerge when MMC is adopted consistently. Clear demand signals, pipeline visibility and procurement settings that reward repeatable solutions are essential. When supported at scale, MMC enables the construction sector to operate more like an integrated system that improves productivity and capacity across the economy.

Barriers

MMC currently faces systemic and regulatory barriers to its broader uptake. This section outlines these barriers and the improved outcomes for the construction sector if these barriers are overcome.

Consumer stigma, lack of education and proof of product

Despite strong performance evidence, MMC continues to be burdened by outdated perceptions that conflate modern systems with poor-quality prefabrication of the past. Many consumers still associate modular or off-site construction with temporary buildings, inferior materials, or limited design flexibility, particularly in residential markets. This stigma is reinforced by a lack of visibility and education regarding high-performing local projects and limited understanding of how MMC can deliver superior outcomes in durability and general performance. Without comparable examples, MMC is often viewed as a compromise rather than a value proposition.

Inconsistent understanding of performance-based compliance can undermine confidence early in project planning. The issue is compounded by fragmented guidance and the absence of a clear, shared reference point across agencies. Without targeted education and accessible tools, MMC is treated as "non-standard," introducing uncertainty even where it demonstrably meets or exceeds regulatory outcomes. This is particularly evident in public sector decision making, where project teams are accountable for delivery certainty and have limited tolerance for perceived novelty.

Overcoming this perception challenge requires greater transparency around build quality, compliance pathways and lifecycle performance, as well as more consistent exposure to repeatable, well-designed public projects. Normalising MMC through mainstream delivery is critical to shifting consumer confidence and positioning it as a credible, permanent construction solution.

High capital needs and uncertain pipeline

MMC requires significant upfront capital investment in manufacturing facilities, equipment and process development, with returns heavily dependent on scale and continuity of demand. Unlike traditional construction, where capacity can flex more readily, MMC investors require confidence in a sustained pipeline to justify expenditure. In the absence of aggregated, long-term demand signals, manufacturers face difficulty securing finance or committing to local expansion. Stop-start project delivery and one-off pilots do little to address this challenge, as they fail to create the utilisation required to reduce unit costs over time. Uncertainty around future workload also discourages innovation and workforce development within the sector. Providing clearer visibility of forward demand across public-sector programs would help crowd in private investment and enable economies of scale. Without pipeline certainty, MMC risks remaining small, fragmented and cost-competitive only in limited use cases.

Industrial relations

Industrial relations settings and workforce perceptions present both a challenge and an opportunity for MMC uptake. In some cases, MMC is viewed as a threat to traditional construction jobs, particularly where off-site manufacturing is misunderstood as displacing on-site labour rather than transforming it. This can create resistance during planning and delivery, especially in the absence of clear workforce transition pathways or defined roles for skilled trades within MMC-enabled projects. However, MMC also offers safer working conditions, more predictable hours, and opportunities to broaden workforce participation,

including for women and older workers. Addressing union concerns requires early engagement, transparency around job impacts, and a clear articulation of how MMC supports skills upgrading rather than deskilling. Aligning MMC delivery with established training, credentialing and industrial frameworks can help reposition MMC as a productivity-enhancing evolution of construction, not a replacement of the workforce that underpins it.

Regulatory misalignment and compliance burden

MMC proponents face a complex and often inconsistent regulatory environment, with compliance processes largely designed around traditional construction sequencing. Differences in interpretation across jurisdictions, certifiers and agencies create uncertainty and duplication, particularly for systems manufactured off-site but installed in multiple locations. Building familiarity through structured guidance, skills development and case-led learning is critical to enabling informed procurement decisions and ensuring MMC is assessed alongside conventional construction approaches. This burden is amplified where digital records, testing data and certifications are not consistently recognised or transferrable.

For manufacturers seeking to scale, regulatory variability undermines confidence to invest and limits the ability to standardise products. Streamlining compliance through clearer guidance, consistent definitions and compatible digital documentation can reduce friction. Without regulatory alignment, MMC will continue to face disproportionate hurdles compared to conventional construction.

Fragmented planning and approvals

Planning and approval processes often operate in silos that are poorly aligned with the delivery logic of MMC. Modular and prefabricated systems require early design finalisation, but planning pathways frequently introduce late-stage conditions or discretionary changes that disrupt manufacturing schedules. Inconsistent treatment across local councils' further compounds uncertainty, with similar MMC proposals assessed differently depending on jurisdictional familiarity or risk tolerance. This fragmentation can erode program certainty and diminish the time and cost advantages that MMC is intended to deliver. In regional and remote contexts, delays can be particularly costly, undermining project viability altogether. Improving coordination between planning, building and infrastructure approval processes is critical to ensuring MMC solutions are assessed efficiently and consistently.

Skilled workforce shortages and challenges

The transition to MMC exposes existing skills shortages while also highlighting gaps in training pathways tailored to off-site construction. Traditional trade qualifications do not always align neatly with manufacturing, assembly, digital quality assurance and installation roles that underpin MMC delivery. This mismatch can limit productivity and reinforce perceptions that MMC requires entirely new skill sets, rather than evolving existing ones. Workforce shortages in regional and remote areas further constrain deployment, particularly where installation and maintenance expertise is scarce. At the same time, the absence of clearly defined career pathways reduces MMC's attractiveness to new entrants, including women and younger

workers. Addressing these challenges requires a coordinated approach to training, accreditation and workforce planning that reflects the end-to-end MMC lifecycle. Without deliberate capability development, workforce constraints will continue to limit the speed and scale at which MMC can be adopted.

Financing models do not reflect standard development

Conventional financing models are typically structured around traditional construction cash flows and milestone sequencing, creating friction for MMC projects. Upfront manufacturing costs, early design finalisation and off-site payments often fall outside standard lender expectations, increasing perceived risk and tightening credit conditions.

This disconnect can undermine project feasibility even where MMC delivers clear program or cost benefits. Developers are therefore incentivised to revert to familiar delivery models that better align with established financing templates. Adjusting financing frameworks to better recognise MMC risk profiles, certifications and performance evidence would materially improve bankability. MMC may then be limited to a narrow set of proponents capable of absorbing higher capital and risk burdens.

Role of local manufacturing

Cost pressures can drive proponents to source MMC components internationally, where established industries benefit from scale and lower unit costs. While importing may reduce short-term expenses, it has greater exposure to increased supply chain risk.

Local manufacturing supports sovereign capability, regional employment and faster iteration to meet Australian standards and climate conditions. However, domestic manufacturers face higher costs without sufficient demand certainty to achieve scale. Balancing these dynamics requires a deliberate focus on building local capability while remaining open to global innovation and competition.

Insurance challenges and liability

Insurance remains a material barrier to MMC uptake, especially in high-risk regions such as Far North Queensland. Insurers can be cautious where MMC is perceived as novel, particularly in cyclonic or flood-prone environments, despite strong evidence of performance when properly designed and certified. Uncertainty around defect liability, warranty coverage and responsibility across manufacturers and builders can translate into higher premiums or exclusions. This risk aversion is exacerbated by limited local claims history for MMC projects, reinforcing conservative underwriting assumptions. Improving confidence requires clearer allocation of risk, robust certification and better use of performance data to demonstrate resilience. Without addressing insurance barriers, MMC will remain difficult to deploy in regions where it could otherwise offer significant advantages in speed and capability to disaster response.

Case Studies

Several international jurisdictions use varying levels of MMC throughout their projects, procurement phases and in substantially differing circumstances. There are lessons for government to take from these approaches in Japan, Hong Kong, the United Kingdom, Canada and Sweden, across supply chain risks, space-constraints in major metropolitan centres, financial barriers and limitations with on-site manufacturing capacity.

JAPAN

Japan's MMC maturity is anchored in an industrialised housing model where repeatable product platforms and factory-based quality systems have been developed over decades, allowing MMC to function as a mainstream delivery pathway rather than a niche alternative. Procurement and delivery models in Japan tend to reward process certainty and standardisation, which suits offsite manufacturing. High-volume producers have sustained output by investing in efficient production and customer-oriented design that supports mass-customisation at scale.

MMC scales when government and market buyers procure outcomes and certainty, rather than prescribing narrow technical inputs that force bespoke redesign each time. Sustained demand enables manufacturers to repay capital investment and refine quality assurance to make it more reliable.

HONG KONG

Hong Kong's *Modular Integrated Construction* (MiC) program provides one of the clearest examples of how procurement policy + approvals architecture can rapidly normalise MMC. Since 2017, the Hong Kong Government has actively promoted MiC through capital works projects, and from 1 October 2024 it requires MiC adoption for defined building types on public works above specified thresholds, with a target adoption rate and formal exemption process.

Critically, Hong Kong couples these procurement settings with a system-level compliance pathway, giving a pre-acceptance mechanism for MiC building products or components, to resolve non-site-specific issues and increase confidence for subsequent project approvals. The pre-acceptance regime is time-bound and sets expected processing timeframes.

Hong Kong also institutionalises capability and market coordination through a cross-departmental governance structure, with a dedicated MiC section providing project support and guidance early in design. MMC uptake accelerates when buyers create clear demand signals, approvals become predictable through a reusable certification pathway and agencies coordinate decisions.

UNITED KINGDOM

The United Kingdom provides one of the clearest examples of how policy-led procurement reform can be used to mainstream MMC across multiple public sectors. The UK has developed a Construction Playbook, which establishes a presumption in favour of MMC and platform-based delivery across central government projects, supported by detailed guidance on

contracting, risk allocation and early design fixity to suit manufactured solutions. The playbook explicitly recognises that MMC requires a shift away from late-stage design evolution toward product centric thinking and earlier decision-making.

The NHS has taken this further through operational mandates. The National Health Service (NHS) has created a tool to assist clients and contractors with a strategy for MMC for healthcare infrastructure projects.

If the project is over £25 million in England, the NHS has a mandatory requirement of 70 per cent of works in new builds and 50 per cent of refurbishment works utilise MMC, as well as using the assessment tool to facilitate this process. It can be used for new-build, refurbishment and mixed project typologies, and acknowledges that outcomes and outputs will be different from project to project.

Homes England's Affordable Homes Programme requires strategic partners to target MMC adoption, explicitly linking public funding to industrialised delivery at scale. In education, the DfE's £15 billion Construction Framework 2025 incorporates prefabricated and modular delivery within its scope.

CANADA

Canada's MMC story is defined less by national mandates and more by a portfolio of public programs, demonstrations, and place-based projects, particularly in affordable housing and remote delivery contexts. Modular test cases highlighted that modular could accelerate delivery and improve quality control, but affordability outcomes depend heavily on whether volume is sufficient to generate factory efficiencies.

Australia's vast land mass and decentralised nature is often cited as a primary challenge for enhancing MMC adoption, but Canada is a comparable country where the MMC market is more mature. Canada also provides a practical example of procurement and funding models that match MMC's sequencing. A post-occupancy evaluation of the movable modular building in Vancouver describes a partnership model involving local government, a statutory authority and a credit union, leveraging government land and modular delivery to provide rapid, replicable non-market housing. The evaluation reports the modular approach enabled a markedly faster construction schedule over three months compared to 14-16 months for a similar in situ build.

The lessons from Canada are ensuring the delivery of repeatable typologies to create the volume that makes factory production cost-effective and an alignment of government funding and contracting milestones to MMC's offsite expenditure profile, so proponents aren't penalised for doing work earlier in the program.

SWEDEN

Sweden is widely regarded as a mature market for industrialised construction, particularly for timber-based prefabrication, underpinned by cultural acceptance of standardised building solutions and strong performance expectations. Prefabrication is integrated across urban and

rural housing markets, with modular solutions increasingly applied to multi-family housing and public sector assets such as schools and healthcare facilities.

A key Swedish enabler is the perception of regulation as strict but transparent, where compliance helps build market trust and creates a level playing field for key providers. This assists builders and developers to understand the process with greater clarity.

This demonstrates the power of repeatability and lifecycle value in buyer decisions. Where public buyers procure for long-term outcomes like performance and maintenance consistency, suppliers can justify investment in production lines, digital platforms and continuous improvement shifting MMC from one-off innovation to a stable operating model. Sweden also highlights that market confidence grows when MMC is commonplace and visible, reducing penalties in approvals, financing and insurance assessments.

Sweden particularly suggests Queensland can unlock adoption by focusing early on asset classes that suit standardisation, while ensuring compliance documentation is consistent and portable across projects.

Recommendations:

The Property Council has prepared these recommendations based on extensive engagement with industry, our members and other stakeholders. Supported by the final report from the QPC, and with consideration to the broader report, we recommend the Queensland Government consider the following measures with high priority:

1. Set technology-neutral MMC procurement targets through staged pilot tenders

a. Introduce agency-led MMC targets through pilot procurements that welcome conforming and alternative solutions, explicitly assess cost certainty, productivity, waste reduction and delivery risk

2. Adopt digital compliance and certification as a single source of truth

a. Develop a government-led MMC certification playbook with clear stage-gates, inspection requirements and digital records to improve approval certainty and reduce risk
b. Establish a cross-jurisdictional voluntary certification scheme to recognise MMC products and systems certified in other Australian states, providing a clear pathway for Queensland where equivalent NCC outcomes are demonstrated
c. Adopt a nationally consistent definition of MMC and within relevant legislation, working with other state and territory building ministers to ensure the NCC provides clear guidance in terms of MMC compliance

3. Prepare rolling 10-year whole-of-government infrastructure plans

a. Support confidence in MMC investment by aggregating forward demand across housing, health, education, corrections, transport and major events to provide market certainty, support scale, and enable manufacturers and builders to invest with confidence

4. Develop MMC-specific workforce and capability pathways

a. Expand and invest further in QBuild, and establish targeted TAFE, university and other credentialled programs. Focused on manufacturing, installation, quality assurance and digital compliance, these should skill new, and upskill existing, tradespeople

5. Promote awareness and confidence in MMC through a coordinated industry profile

a. Establish a joint government–industry MMC profile and communications program that showcases proven projects, performance outcomes and lessons learned, building confidence among government agencies, industry, financiers, insurers and the community.

Further suggestions

There are several other recommendations that will encourage the uptake of MMC at scale. Supporting a more diverse construction sector, through workforce and technology development, will help alleviate the housing crisis and improve productivity. The following additional measures we propose for the government to implement are:

1. Establish an infrastructure body to improve prioritisation and coordination, including market sounding

a. Enhanced productivity and efficiency, via the accelerated adoption of MMC, should be a central focus of this body

2. Shift from upfront subsidies to volume certainty via multi-year framework agreements

a. Provide base-load demand through multi-year government frameworks to improve financial viability, reduce unit costs over time, and support investment in local manufacturing capacity

3. Expand RAAC facilities in Far North Queensland as MMC hubs

a. Leverage existing assets to trial, assemble and deploy MMC solutions for regional, remote and disaster-response use cases, including temporary and relocatable buildings

4. Back regional logistics and site-efficiency improvements that enable MMC

a. Invest in enabling infrastructure (like roads and bridges) and planning settings that reduce transport constraints and on-site handling complexity for modular and prefabricated elements

5. Establish an MMC-specific finance and incentive pathway

a. Explore co-investment, mezzanine finance, sustainability incentives and certification benefits (e.g. innovation or Green Star-type credits). This could include utilising a national interest framework or specific government funds to de-risk investments in MMC factories and supply chains

6. Prioritise MMC where it demonstrably delivers value

a. Focus initial uptake on social and key-worker housing, regional and remote delivery, disaster and temporary accommodation, and repeatable public assets, while maintaining optionality for conventional construction where appropriate

7. Provide guidance regarding the risk appetite for contracting and innovation

a. Adopt performance-based specifications, rather than tight technical specifications, to encourage tenderers to incorporate innovation, such as MMC, where it can improve project outcomes

8. Design and implement targeted incentive packages

a. These incentives could include streamlined approval processes, funding support for manufacturing capability, or tax offsets for developers who adopt modular construction methods

9. Build Queensland's MMC capability pipeline through support for QBuild

a. Partner and invest in an external R&D program that seeks to deliver MMC to support the existing QBuild framework

b. Expand and invest further in QBuild to skill new and upskill existing tradespeople in modular construction methods and incorporate more women in construction

Policy implementation timeline

The below is an implementation timeline to unlocking MMC in Queensland.

Immediate

1. **Set technology-neutral procurement targets through staged pilot tenders**
2. Expand RAAC facilities in Far North Queensland as MMC hubs
3. Prioritise MMC where it demonstrably delivers values

Short term

1. **Adopt digital compliance and certification as a single source of truth**
2. **Promote awareness and confidence in MMC through a coordinated industry profile**
3. Establish an infrastructure body to improve prioritisation and coordination, including marketing sounding
4. Back regional logistics and site efficiency improvements that enable MMC
5. Provide guidance around risk appetite for contracting and innovation

Medium term

1. **Develop MMC-specific workforce and capability pathways**
2. Shift from upfront subsidies to volume certainty via multi-year framework agreements
3. Design and implement targeted incentive packages
4. Build Queensland's MMC capability pipeline through supporting QBuild

Longer term

1. **Prepare rolling 10-year whole-of-government infrastructure plans**
2. Establish an MMC-specific finance and incentive pathway

REFERENCES

Landmark reforms to tackle construction industry productivity - QLD Treasury –Productivity decline

HAssoc. MMC Final 15102025 0.3c – Amplify report

'Hospital 2.0' MMC and the New Hospital Programme: unlocking the limitless potential of prefabrication | AECOM Insights – UK health MMC

Modern Methods of Construction | ABCB – Australian Building Codes Board

Asking Property Prices - Brisbane – Brisbane/SEQ House Prices

Beyond Product Substitution: Comparative Lessons for Systemic MMC Adoption – Japan

Lessons from Japan: A comparative study of the market drivers for prefabrication in Japanese and UK private housing development – Japan and UK

Modern Methods of Construction discussion paper 7 August 2025.pdf – Housing Industry Association

HIA calls for NCC reform to unlock MMC and reduce regulatory burden | Built Offsite – HIA on the National Construction Code

Queensland Productivity Commission backs MMC reforms as Master Builders reinforces urgent need for change | Built Offsite – Master Builders Association Queensland

Modern Methods of Construction taskforce Homes NSW | NSW Government – HomesNSW Taskforce

20220901 MMC Guidance Note – United Kingdom

Germany Prefabricated Construction – Germany prefab/MMC

buildings-15-03374-v2 (1).pdf – a look at MMC across Japan, Germany, Sweden, Singapore, UK, US, Australia

A Guide to the Swedish Market for Prefabricated Homes and Modular Construction • CE Sweden – Sweden

Key Lessons on Modular Housing From Across Canada | CMHC – Canada

Research Insight: Evaluation of a Movable, Modular Affordable Housing Project – Canada specific case study

Modular Integrated Construction - Buildings Department – Hong Kong

Technical Circular (Works) No. 4/2024 - Modular Integrated Construction (MiC) – Hong Kong

QMPPR-2024_Full-Report_web-Final-7MB.pdf – Queensland Major Projects Pipeline