Transport Academic Partnerships

Annual Report 2025-2026

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A message from the TAP Chair

This year's annual report marks the first report under the Transport Academic Partnership (TAP) Agreement 2025–2030 and the eleventh year of research delivered by the TAP university partners under the TAP Program.

During the 2025–2026 financial year, TAP continued to focus on the Department of Transport and Main Roads (TMR) priority outcomes of improving approaches and interventions in road safety, providing accessible and efficient transport services, developing better methods of measurement of the impact of new transport technologies, and better transport for regional Queensland.

The purpose of this report is to highlight TAP's key successes and challenges in the 2025-2026 period. The program is built around the central themes of safety, reliability, increased productivity, efficiency, and responsiveness to deliver improved transport for Queensland.

The work program and projects undertaken throughout 2025–2026 were focused on improving safety and access, enhancing the customer experience, and creating a transport network that supports our vision of having safe and connected communities that are sustainable, thriving, and inclusive.

Andrew Mahon

Deputy Director-General

Policy, Planning and Investment Division

Department of Transport and Main Roads

Messages from the TAP Partners:

Motor Accident Insurance Commission

The Motor Accident Insurance Commission (MAIC) has continued our involvement in the TAP Program due to the recognised value derived from the transport-related research work conducted by our academic partners throughout the years.

MAIC's grant funding prioritises injury prevention and rehabilitation, supporting initiatives aimed at reducing motor vehicle crashes and improving treatment for Queenslanders injured on our roads. Through programs such as TAP, MAIC continues to drive advancements in prevention, treatment, and rehabilitation to benefit individuals affected by road accidents.

MAIC looks forward to our continued association with the TAP Program, throughout the course of the TAP Agreement 2025-2030.

Gaenor Walker

Acting Insurance Commissioner

Motor Accident Insurance Commission

Queensland

Queensland University of Technology

During 2025–2026, the Transport Group at the Queensland University of Technology (QUT) continued to deliver a substantial program of transport research in collaboration with government, academic and industry partners. Key collaborators included TMR, MAIC, iMOVE, the Department of Infrastructure, Transport, Regional Development, Communications, Sports and the Arts (DITRDCSA), UniSC, the University of Queensland (UQ), the Pontifical Catholic University of Valparaíso (Chile), and Compass IoT.

Through the TAP Program, QUT is contributing research across road safety, traffic operations, travel behaviour, accessibility, active transport, and transport modelling. The work reflects QUT's ongoing commitment to sustainable and safe travel, and to supporting an integrated, multi-modal, efficient and inclusive transport system that benefits the Queensland community.

Across the year, QUT delivered practical research outputs and recommendations, designed to improve transport system performance. Deliverables included statistical analyses, revised models, universal design principles for accessible people movers, software tools, and evidence-based recommendations. The Transport Group continues to use the opportunities provided through the TAP Agreement to strengthen research impact and deliver practical outcomes for TMR and the broader transport sector.

TAP has also helped attract additional resources for university partners. For example, the Brisbane City Council (BCC) funded research to improve road network traffic operations. QUT also secured iMOVE grants totalling more than $800,000. These contributions demonstrate the value of the partnership and its ability to leverage broader investment in transport research.

Professor Alex Paz

Transport and Main Roads Chair

School of Civil and Environmental Engineering

Queensland University of Technology

University of Queensland

The University of Queensland (UQ) is a proud participant in the TAP Program, under the collaborative framework established with the TMR, QUT and UniSC. We believe our research and expertise at UQ, not just in transport engineering but across our schools and faculties, can support better solutions and outcomes to the long-term transport challenges facing Queensland.

This collaborative program has made it possible for researchers at UQ to make significant strides in several government priority areas such as road safety and enhanced productivity. Projects included; improving the prediction and detection of earth slope failures that impact roadways in North Queensland and improving road user safety during construction. UQ also investigated improved planning models for better transport links in regional cities in Queensland and undertook an evaluation of the 50 cent fare and METRO service changes in the public transport network.

Through this research and other direct engagements with TMR, UQ seeks to enhance the practice of transport planning, engineering, and management across Queensland. We are proud to work with TMR to find solutions to these long-term research needs.

Professor Mark Hickman

Transport and Main Roads Chair

School of Civil Engineering

University of Queensland

University of the Sunshine Coast

The University of the Sunshine Coast (UniSC) is honoured to contribute as an active partner in the TAP Program under the 2025-2030 TAP Agreement. Together with TMR, we are contributing new knowledge, innovations, and training future transport professionals.

In 2025-2026, UniSC undertook new research on improving accessibility in regional areas, providing transport for Queensland's ageing population, as well as evaluating social impacts in strategic transport planning. Another project leveraged Artificial Intelligence (AI) for the maintenance of road pavements. These projects build on engineering, computer science, social science, and urban planning capabilities at UniSC's Sustainable Mobility Laboratory, MAIC/UniSC Road Safety Research Collaboration and Centre for Human Factors and Systems Science.

The university is developing a pipeline of transport engineers and planners to fulfil infrastructure delivery in Queensland. I am particularly proud of Sambhav Chalise, a TMR intern who completed an engineering honours thesis project investigating alternative, low-carbon materials for road pavements. We look forward to continued engagement with TMR and advancing transport research and capabilities in the coming years. Collaborations through TAP can achieve real-world impact towards safe, sustainable, and inclusive transport systems in Queensland and beyond.

Professor Lynette Cheah

TMR Chair of Sustainable Transport

School of Science, Technology and Engineering

University of the Sunshine Coast

About this report

The TAP Agreement 2025–2030 (Agreement) was renewed in July 2025 for a further 5 years. The new Agreement introduced a revised partnership structure and welcomed UniSC as a new partner and broadened the program's focus to include a stronger emphasis on road safety, productivity and network efficiency, stewardship and advances in AI.

The new $4.35 million Agreement continues to enable strategic transport research and development projects that build capability across the university sector, the Queensland Government and industry. These projects help address future transport challenges and contribute to an integrated, safe, efficient and reliable transport system for Queensland.

The Agreement sets out the partnership objectives, performance measures and reporting arrangements. Following stakeholder feedback, 2 Key Performance Indicators (KPIs) numbered 10 and 11 were added, to provide a clearer picture of each university partner's quantitative and qualitative performance. These KPIs also help assess TMR's satisfaction with progress against the Annual Work Program and the overall effectiveness of the partnership.

The 2025–2026 Annual Report is the first report under the new Agreement. It outlines collaborative research activity between TMR, MAIC and the TAP university partners. This report confirms program alignment with TMR's strategic priorities, including an increased focus on transport safety, productivity, accessibility, and an improved customer experience.

Key achievements during the reporting period and before publication include:

- Completion of 13 research projects.
- Leveraging of over $1.738 million in additional funding.
- Publication of 124 transport-related outputs.
- Increased engagement of higher-degree research students.

Throughout this report, KPIs 1 to 9 assess QUT and UQ performance against the 5-year average of the previous TAP Agreement 2020–2025. As UniSC joined the partnership under the renewed Agreement, its 2025–2026 performance is reported separately and is compared with its 2024–2025 performance under its previous separate agreement.

The TAP Annual Work Program 2025–2026 comprised 20 projects:

- Eleven new projects (prioritised by the TAP Steering Group)

- Two multi-year projects (initiated under the previous 2020–2025 TAP Agreement).
- Seven projects from previous annual work programs, continued under approved variations.

One of the 7 continuing projects was initiated by Griffith University under the previous Agreement. This project was completed in 2026, under the supervision of the TAP Program Team. A detailed description of TAP projects is available in Annexures A, B and C.

Total expenditure for TAP for the 2025–2026 period was $743,000, allocated to the 3 TAP University partners. In addition to providing research funding, the Agreement provides advice, expertise and other complimentary services. The research and development outcomes are intended to support agency priorities and contribute to the broader Queensland Government innovation agenda.

Program oversight is provided by the TAP Steering Group, which includes representatives from TMR, MAIC and the TAP University partners. The Steering Group is chaired by Andrew Mahon, Deputy Director-General (Policy, Planning, and Investment), TMR. The Steering Group meets at least twice each calendar year and is responsible for:

- Developing and endorsing the TAP Annual Work Program.
- Assessing project nominations against agreed criteria to prioritise projects.
- Developing and maintaining the current and future Agreements.

World University rankings[1]

Overall, in 2026 UQ ranked among the 65 top universities in the world and ranked 68 for systems engineering. QUT ranked 34th in the world for transportation science and technology. The University of the Sunshine Coast rated highly for research quality, particularly around sustainable transport and logistics.

Caption 1: The University of Queensland – St Lucia

Project highlights

Improving mobility in regional Queensland – UniSC

Transport disadvantage is widely recognised as a multi-dimensional condition shaped by limited-service availability, poor access to key destinations, and affordability constraints. These challenges disproportionately affect low-income households, people with disability, non-drivers, and communities in outer-urban and regional areas.

This TAP-funded project examined how transport equity can be improved in regional and outer-urban areas. It identified practical, evidence-based approaches to reducing transport disadvantage and improving access to essential services through 3 complementary activities: a review of international evidence, spatial analysis of transport disadvantage across South-East Queensland, and community engagement in Caboolture as a representative outer-urban case study.

[1] Academic Ranking of World Universities 2026 – Shanghai Ranking Consultancy

Rather, it reflects the interaction of accessibility, affordability and land use patterns. The findings show that transport disadvantage in South-East Queensland is not solely a function of service provision.

Evidence from international practice, spatial analysis and community engagement also indicates that effective responses must be multi-dimensional, place-based and explicitly equity-focused.

Caption 2: Country road intersection

The research concluded that a coordinated trial integrating public transport improvements, demand-responsive services, active transport investment and targeted affordability measures could deliver measurable benefits. These include improved accessibility, reduced reliance on private vehicles, and stronger social and economic participation.

Preliminary results suggest that trial sites such as Caboolture provide a strong testbed for implementation, with potential transferability to similar outer-urban and regional areas across Queensland. A trial would therefore represent not only a pilot initiative, but also a strategic foundation for embedding transport equity as a core outcome of future planning and investment decisions.

Development of crash predictive models for road design - QUT

This project considered available methods for predicting the effect of geometric road design parameters on crash rates. It also assessed the potential cost of developing each method to determine the most suitable approach for calibrating crash models to Queensland conditions.

The work aimed to support road designers in comparing crash cost savings and strengthening the assessment of design exceptions. A recent survey of TMR regions and districts on the use of design exceptions highlighted the need for more quantifiable safety evidence.

Caption 3: An intersection in Brisbane

Road design engineers may be reluctant to approve design exceptions due to potential legal implications if safety outcomes are not as expected. Adopting a more robust quantitative method, such as the approach described in this project, will help address these concerns.

Mobility in Queensland: Impact of 50 cent fares on transport equity, accessibility, and mode shift – UQ

This project evaluated the impacts of introducing 50 cent public transport fares in Queensland, while also examining how COVID-19 influenced public transport use and recovery patterns. It quantified how the 50 cent fare initiative has affected patronage and travel behaviour by analysing demographic, socio-economic and geographic response patterns.

The project drew on a range of data sources, including *go* card transaction data, the Queensland Travel Survey and Australian Bureau of Statistics demographic data. It is anticipated that the findings will directly inform TMR's strategic objectives by supporting more efficient, equitable and sustainable transport networks.

Caption 4: University students travelling on public transport

The project will also strengthen the evidence base for advancing community connectivity and improving equity through more accessible public transport.

Evaluation of separated cycle tracks in Queensland - UQ

This project documents lessons learned from the planning and implementation of separated cycle tracks and walking networks in Queensland priority development areas. It examines changes in cycling and walking activity compared with similar developments, such as Ripley Valley and Greater Flagstone and identifies success factors that can inform future projects.

The research compared the provision and uptake of separated cycle tracks and walking network facilities across selected priority development areas in Queensland. Additionally, TMR has undertaken initial work to develop an evaluation methodology for this stage of the project and has assisted with data collection.

Caption 5: Cyclists on the Bicentennial Bikeway in Brisbane

Heavy vehicle safety - QUT

Heavy vehicles are central to freight transport, but their increasing size and operational complexity continue to raise road safety considerations. As vehicle configurations diversify and freight demand grows, policymakers must balance productivity gains with potential impacts on crash risk.

This multi-year project aims to develop a method for determining the effect of heavy vehicle size on crash rates. This current stage has focused on revising the previous crash data sample using updated data sources from 2017 to 2024.

An interim conclusion has found that vehicle size and configuration can influence crash involvement and severity, particularly as freight demands increase and regulatory frameworks continue to evolve. Understanding the safety implications of larger vehicle configurations, such as larger combination vehicles, high productivity vehicles and multi-combination vehicles is essential to balancing economic productivity with road safety. The findings challenge assumptions that larger vehicle configurations inherently pose greater crash risk suggesting instead that vehicle design, route selection and driver regulation play a critical role in influencing safety outcomes.

It is anticipated that these early findings will highlight the relationship between policy and safety, showing that regulatory changes permitting larger vehicles can improve freight efficiency without a proportional increase in crash risk, provided vehicle design standards and operating controls are rigorously enforced.

Caption 6: Heavy freight vehicles.

Performance snapshot

The Agreement outlines 3 objectives:

- Build transport research excellence and capability in Queensland
- Foster a collaborative partnership and strong alliance between government, industry and the academic sector
- Fund and enable transport related R&D activities that deliver positive outcomes for the transport system and the Queensland community

TAP's success in achieving its objectives is assessed against 11 Key Performance Indicators (KPIs), which are reported at the end of each financial year. Each objective is supported by qualitative and quantitative KPIs, providing a balanced view of the work delivered by the university partners. The 2025–2026 performance snapshot compares results with the 2020–2025 average and incorporates findings from a new survey instrument.

As UniSC were not party to the 2020–2025 TAP Agreement, they have not been assessed against the same baseline averages as QUT and UQ. Instead, UniSC's performance is considered using performance requirements from the previous separate agreement that was in place with TMR in the 2024-2025 period.

Performance analysis

Given this is the first report under the new Agreement, where possible an average figure for UQ and QUT has been calculated using the KPI results achieved across the life of the previous TAP Agreement 2020–2025.

Objective 1: Building research excellence, innovation and capability in Queensland

This objective focuses on building transport research excellence, innovation, and capability in Queensland as part of strengthening Queensland's transport research ecosystem.

In 2025–2026, TAP continued to support the evolution of university research, which plays a vital role in driving innovation, informing public policy, and educating future transport professionals. QUT and UQ also collaborated across disciplines, engaging their internal faculties such as UQ's School of the Environment, and QUT's Centre for Accident Research and Road Safety (CARRS-Q). Additionally, UniSC's Science, Technology and Engineering Faculty, provided support for UniSC's TAP Chair to operate and deliver their annual work program.

QUT and UQ performance review: KPIs 1-4

Table 1 - Objective 1 is demonstrated through 4 KPIs

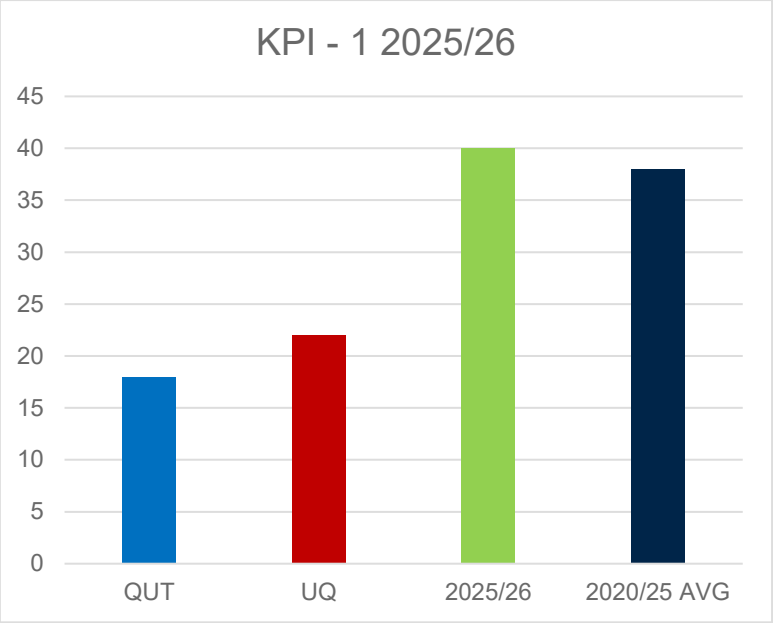
KPI 1	Number of transport-related academic staff employed and number of non-transport-related academic staff providing support (paid or in-kind) to TMR. **Increase >5% on 2020-2025 average -** for QUT & UQ
KPI 2	Number of higher-degree research Students (PhD, Masters by Research and Honours Research) undertaking transport-related research at the Universities, including, synopsis of study area, agencies engaged and their involvement and relevancy to the Objectives. **Increase 107% on 2020-2025 average -** for QUT & UQ
KPI 3	Number of university students enrolled in transport-related subjects. **Decrease <2% on 2020-2025 average -** for QUT & UQ
KPI 4	Name and number of transport-related workshops or seminars delivered by universities that contribute to the objectives of the Agreement. **Increase >17% on 2020-2025 average -** for QUT & UQ

KPI 1: Australia's university system has evolved to realise a range of functions, which individually and collectively help drive outcomes for Queensland's prosperity. University research not only leads to new products and innovation but also informs public debate, improves our health and wellbeing and helps solve complex problems.

Innovative research in Australian universities also informs how we educate the next generation of university-trained professionals, researchers and leaders.

There has been a 5% increase in the number of transport-related academic staff, compared with the 2020-2025 average, across UQ and QUT. The number of staff ensures that the quality of transport-related education remains consistent and that the universities can undertake long term planning (course offerings).

Figure 1: KPI 1 – Academic staffing increased by 5% to 40 staff in 2025–2026, compared with the 2020–2025 average. This growth supports consistent delivery of transport education and longer-term workforce and course planning.

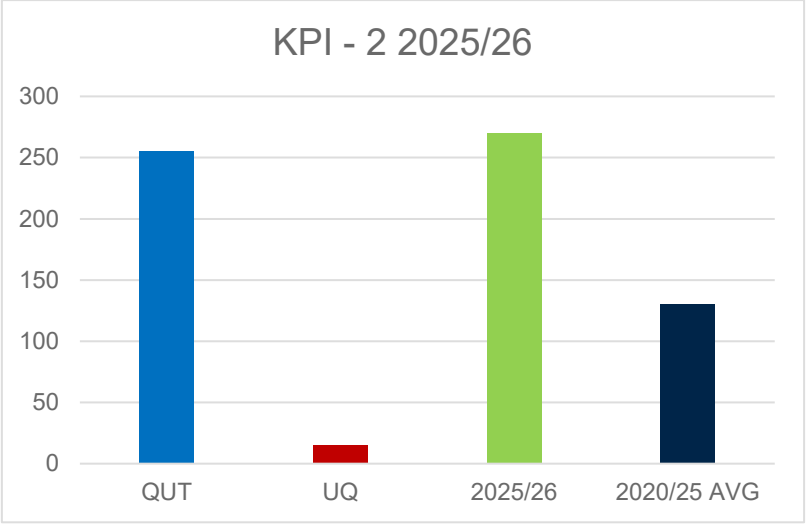


KPI 2: The number of higher-degree research students (PhD, Masters by Research, and Honours Research) undertaking transport-related research at QUT and UQ has increased by 107% in 2025–2026, compared with the 2020–2025 average.

This growth has directly benefited TMR with 3 PhD students embedded in the department through the TAP Program. As demand for research in specific transport related areas grows, this number is expected to remain high. Given that PhDs can lead to significant positive societal impacts, whether through research that shapes policy, innovation that drives economic growth, or education that empowers future generations, this is a very encouraging sign for TMR.

Figure 2: KPI 2 – The number of higher-degree research students undertaking transport-related research increased by 107% in 2025–2026, compared with the 2020–2025 average, with QUT recording the strongest growth. This increase

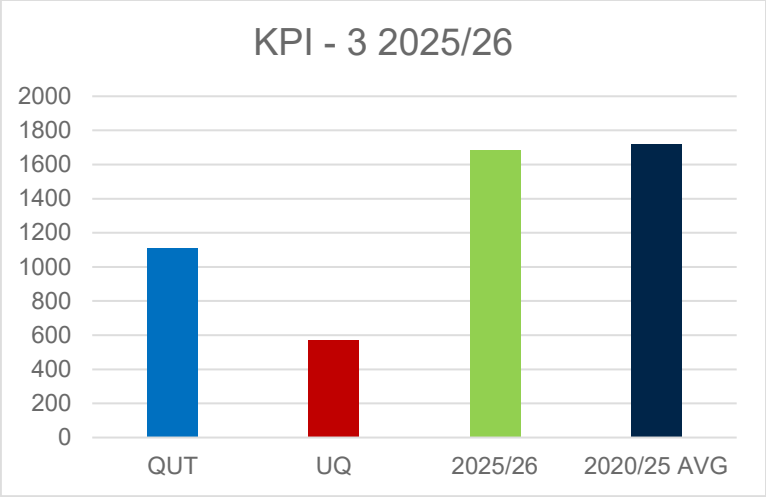
strengthens the pipeline of specialist transport researchers and expands research capacity.



This growth, due in part to QUT's strategic focus on sustainability, liveability, understanding infrastructure, and a cross-disciplinary approach to research that appeals to international higher-degree research students.

KPI 3: The number of students studying transport-related subjects (1684) slightly decreased (less than 2%) in the 2025–2026 period. While this went against the national trend (10% increase), the decrease may be accounted for as a natural variation experienced by universities on a year-to-year basis.

Figure 3: KPI 3 – Enrolments in transport-related subjects at QUT and UQ decreased slightly, by less than 2%, compared with the 2020–2025 average. The result indicates broadly stable student participation despite normal year-to-year variation.

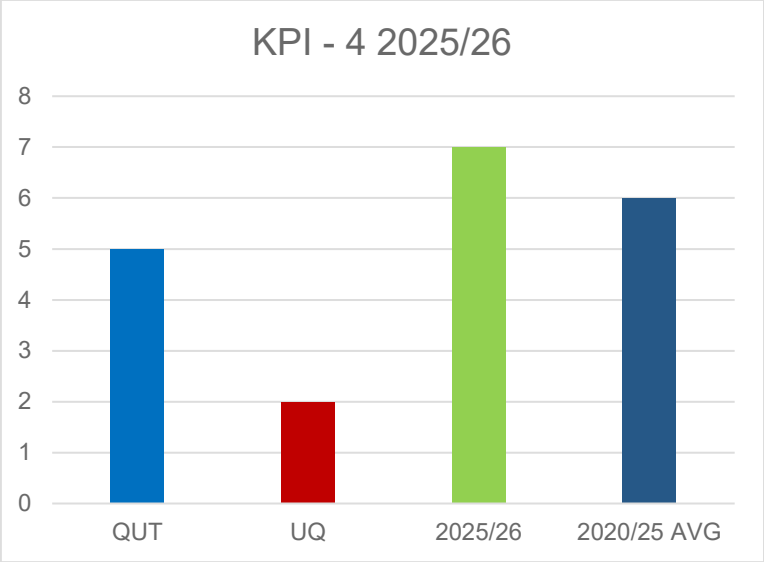


KPI 4: QUT and UQ delivered 7 transport-related workshops, seminars and showcases in 2025–2026, a 17 % increase from the previous 5-year average. These

events remain vital for building research capability and fostering collaboration between academia and TMR.

Events such as these also provide both face-to-face and online opportunities for TMR staff to directly engage transportation experts from around the world. The TAP Poster Showcase which highlights current academic research, was held over 2 sessions and included in person and online attendance opportunities.

Figure 4: KPI 4 – The number of transport-related workshops and seminars delivered by the universities increased by 17% compared with the 2020–2025 average. These events support knowledge sharing, professional capability and collaboration between university researchers and TMR staff.



Highlights from 2025-2026

- The TAP Poster Showcase, which featured projects on motorcycle safety, universally designed autonomous people movers, train carriage loading models, community safety, and improved traffic management.
- The TAP Showcase Technical Sessions which featured in-depth presentations from the TAP Partners and their associated higher-degree researchers. These included tools to assess the performance of Queensland's arterial network, integrating road network operations and AI-driven predictive maintenance for transport infrastructure. The sessions were aimed at TMR's technical professionals and provided information about potential future collaborations.
- A seminar by Professor Darcy Bullock from Purdue University, USA on traffic signal analytics using connected vehicle data.
- Autonomous Vehicles and Smart Shuttles co-hosted with the Royal Automobile Club of Queensland (RACQ).

UniSC performance review: KPIs 1-4

UniSC continues to grow the number of transport -related academic staff that support TMR's vision and objectives. There are 9 staff members working across a range of disciplines including road safety, urban design, engineering and sociotechnical systems.

UniSC also increased the number of students that are currently enrolled in transport-related subjects such as Road and Traffic Engineering and Sustainable Transport Systems. In total 188 students are enrolled in transport-related subjects offered by the university. UniSC also delivered several transport related seminars and webinars that were well received by TMR. These included:

- Improving Mobility in Regional Queensland
- Assessing Social Impacts in TMR Planning
- Unlocking the Connected Vehicle Future – Analytical Estimation of Connected Vehicle Penetration Rates for Detector Free Adaptive Signal Control.

As part of the commitment to capacity building, UniSC supported 2 undergraduate engineering students working towards their honour's theses related to transport. The thesis topics relate to carbon performance assessment and enhanced electric vehicle battery life.

Objective 2: Fostering collaborative partnerships and strong alliances between government, industry and the academic sector

This objective seeks to strengthen strategic partnerships and foster dynamic collaboration between government, industry and the academic sector to drive innovation, shared research outcomes and impactive policy development.

QUT and UQ performance review: KPIs 5-6

Table 2 - Objective 2 is demonstrated through 2 KPIs:

KPI 5	List of activities where the university's staff have worked on joint collaborative R&D initiatives with government, industry and/or the academic sector, understanding the Annual Work Program, including in-kind support. **Increase >11.5% on 2020-2025 average -** for QUT & UQ

KPI 6	List of organisations that participate in projects supported by the Agreement. **Decrease <12% on 2020-2025 average –** for QUT & UQ

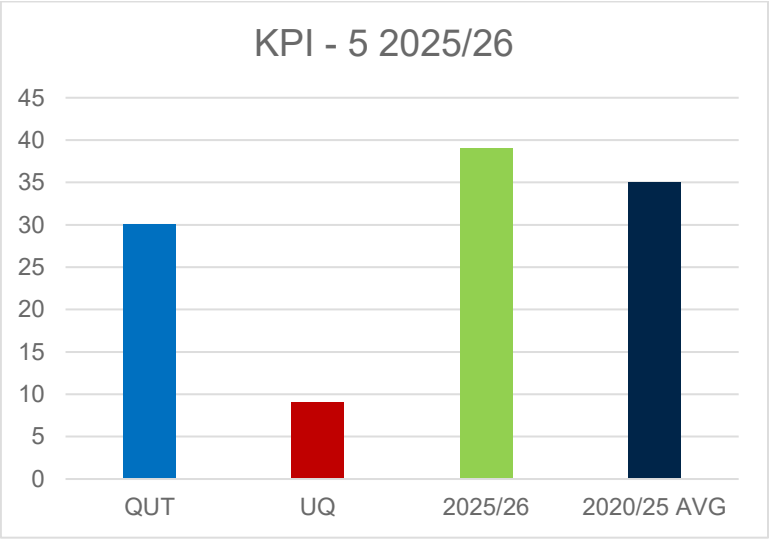
KPI 5: The number of collaborative R&D activities undertaken by QUT and UQ has increased by over 11 % throughout the compared period with 39 activities undertaken in the 2025–2026 financial year. This is a positive outcome and shows that businesses and organisations both value and understand the importance of continued collaboration.

QUT continues to work with the Standing Committee on the Transportation Research Board (TRB), (Effects of Information and Communication Technologies on Travel Choices). The TRB is a division of the United States National Academies of Sciences, Engineering, and Medicine and was established in 1920. Its mission is to mobilise expertise, experience, and knowledge to anticipate and solve complex transportation challenges, supporting safer, more efficient, and sustainable transportation systems. These memberships and associations undertaken by the universities, benefit TMR by providing knowledge sharing opportunities and by raising awareness of new global research initiatives.

University staff at QUT also participated on a broad range of technical committees aimed at improving transport and sharing knowledge.

UQ activities included work with the BCC, work with Transmax, iMOVE and a partnership with UQ Research and Training for 2 scholarships for students undertaking transport related research.

Figure 5: KPI 5 – Collaborative R&D initiatives involving government, industry and academia increased by more than 11% compared with the 2020–2025 average, with 39 activities undertaken in 2025–2026.

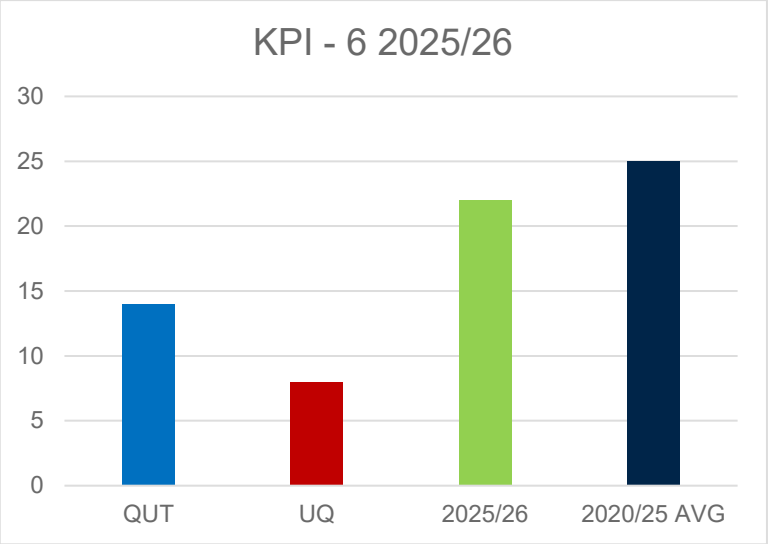


KPI 6: QUT and UQ continued to work with industry and the academic sector throughout the 2025–2026 period. Although there was a 12% decrease from the 2020–2025 long term average, the 22 current collaborations and the broad extent of collaborations have confirmed there are strong thriving global networks of transportation experts who regularly share their research findings and directly undertake collaborations with our local Queensland researchers.

QUT has built on its relationships with both national and international agencies through activities including research with the University of Nevada, Purdue University, the University of Florida and Pontificia Universidad Cattolica de Valparaiso in Chile.

Figure 6: KPI 6 – The number of organisations participating in TAP-supported projects decreased by 12% compared with the 2020–2025 average, with 22 collaborations recorded in 2025–2026. Despite the decrease, the partnerships.

continue to span government, industry and national and international research networks.



Both QUT and UQ extended their collaborations with iMOVE and the RACQ and have engaged on a variety of projects with a wide range of organisations including TRB, DITRDCSA, Bicycle Queensland, BCC and the Gold Coast City. This wide-ranging participation means that the TAP University Partners have knowledge of emerging issues and ensures the relevance and quality of academic research is maintained.

Collaborations have also been undertaken with local governments, state government agencies, cooperative research centres, other Australian and international universities, industry, advocacy groups and advisory bodies.

UniSC performance review: KPIs 5-6

UniSC is endeavouring to foster partnerships and alliances between government, industry and the academic sector. UniSC has committed to undertaking activities designed to engage members of the transport community through the TAP Annual Work Program. The UniSC Chair also has an extensive international research profile and is a coordinating lead author for the United Nations Intergovernmental Panel on Climate Change Special Report on Climate Change and Cities.

Objective 3: Fund and enable transport related research and development activities that deliver positive outcomes for the transport system and the Queensland Community

The performance measures for this objective are intended to demonstrate the value of the research and development activities delivered through the Agreement, including capacity of universities to leverage other funding sources and the number of outputs delivered.

QUT and UQ KPIs, 7, 8 and 9 are reported separately and are measured against the 2020–25 average. Table 4 reflects the outcomes of the 2 new KPIs that have been applied to all TAP Partners.

Table 3 - Objective 3 is demonstrated through 5 KPIs.

Note that Table 3 lists the original 3 KPIs below and apply to QUT and UQ.

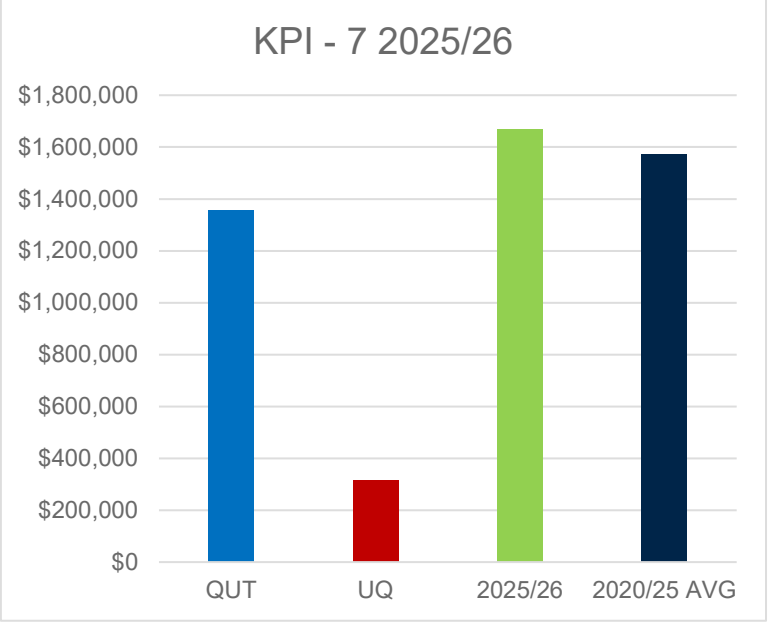
Table 4 lists the 2 new KPIs that are applied to all TAP Partners.

QUT and UQ performance review: KPIs 7-9	
KPI 7	The universities demonstrate they have matched funding provided by the Agencies through in-kind support and funds leveraging. **Increase >6% on 2020-2025 average** - for QUT and UQ
KPI 8	Number of transport-related outputs (published papers, conference papers, formal reports (not published), formal advice or peer reviewed papers) provided by the universities through this agreement. **Increase >13% on 2020-2025 average** - for QUT and UQ
KPI 9	The R&D activities delivered by the Transport Chairs and dedicated staff funded by the Agreement are completed within the agreed timeframe and budget. **Increase > 35% on 2024-2025** - for QUT and UQ

KPI 7: The amount of leveraged funding secured by the TAP University Partners has continued to increase, enabling universities to recruit and retain highly qualified academics with ongoing specialisations to undertake transport research in Queensland.

QUT and UQ have collectively contributed $1,669,209 of both in-kind and leveraged funding contributions over and above their TAP commitments in 2025-2026. They have used this to support the delivery of the Agreement objectives and work program projects. UQ received funding from both iMOVE and the Australian Research Council (ARC), and QUT continued to generate a significant amount of leveraged funding having bid successfully for funding grants from BCC, iMOVE and DITRDCSA.

Figure 7: KPI 7 – In-kind and leveraged funding increased by 6% compared with the 2020–2025 average. The additional investment expands the resources available to deliver transport research and supports the recruitment and retention of specialist academic capability.



KPI 8: QUT and UQ continue to make significant contributions to national and international transport journals, with a notable 12.75 % increase in transport-related publications in 2025–2026 compared with the 2020–2025 baseline. This growth reflects increased research activity and aligns with broader growth in transport innovation, traffic management and transport technology activity identified by the Australian National University in 2025. The trend highlights the growing relevance and impact of TAP-supported research in informing Queensland's transport future.

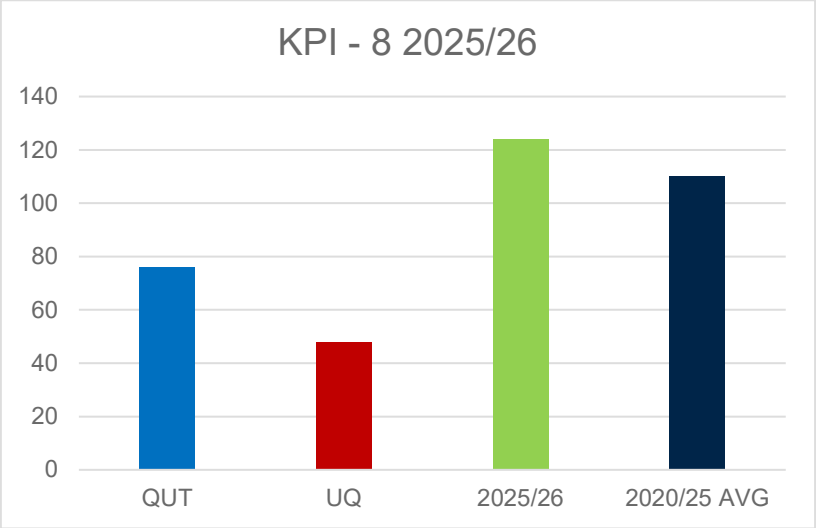
In July 2025, researchers, publishers, funders, librarians and policymakers met at the Royal Society in London to consider the future of scientific publishing. Discussions reinforced the central role of publishing in disseminating knowledge, while also noting the growing pressure created by its influence on career progression.

The convenors noted that peer review is under increasing pressure due to rising submission volumes and shrinking reviewer pools, creating a stronger need for prioritisation. Against this backdrop, the sustained publication output from QUT, UQ

and their students demonstrates the quality and relevance of their research contributions.

UQ contributed 46 publications across topics including map-matching using wireless traffic sensor data, graph neural network models for predicting traffic incidents, and physics-informed deep learning for traffic state estimation on signalised arterial roads. QUT contributed to 76 publications, including research on traffic management, data analysis and infrastructure sustainability.

Figure 8: KPI 8 – Transport-related publications increased by more than 12.5% compared with the 2020–2025 average. This sustained output demonstrates the growing volume, relevance and reach of TAP-supported research.



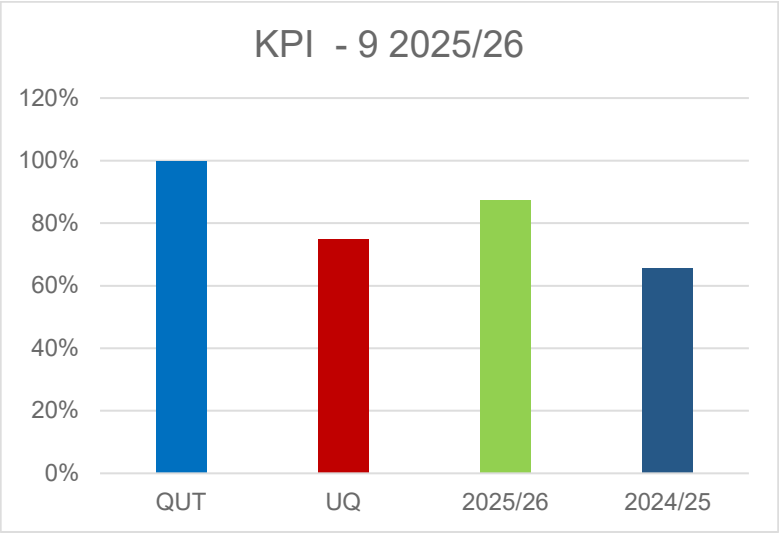
KPI 9:

In 2025–2026, there were 14 projects undertaken by QUT and UQ, with 1 joint project undertaken by UniSC and QUT. Of these 14, 9 were completed in the financial year, 2 were subsequently completed prior to this report being finalised, and 3 are ongoing.

A project undertaken by Griffith University under the previous TAP Agreement, was concluded in the 2025-2026 period. Overall, almost 88% of projects were delivered as planned, extended by formal variation or finalised. KPI 9 has been measured against the number of completed projects for the 2024–2025 period. This is due to changes made in the way project completion dates were recorded in the earlier years of the previous TAP Program (2020-2025).

Figure 9: KPI 9 – Completion of R&D activities within the agreed timeframe and budget increased by 34% compared with the 2020–2025 average, and QUT

completed 100% of its projects. The result highlights improved project delivery and strong performance against agreed commitments.



UniSC performance review: KPIs 7-9

UniSC undertook 5 projects in the 2025–2026 period (one jointly with QUT). Three projects were completed and 2 projects are ongoing (with an agreed variation). UniSC has also delivered their projects on time and to a high standard and quality and are building their engagement portfolio with industry stakeholders.

Projects included research themes around mobility, public transport planning and accessibility. UniSC has generated an additional $50,000 of program funding and in-kind contributions and allocated 2 domestic scholarships for transport-related research.

KPIs 10 and 11 were new to the 2025–2030 Agreement and are relevant to all TAP Partners.

Table 4: Objective 3 – 2 additional KPIs:

KPI 10	On time delivery of key project milestones as outlined in the Annual Work Program and in line with formal variations. **New KPI**
KPI 11	Rating of TMR's satisfaction of the University's progress of the Annual Work Program meeting a measure determined by the TAP Steering Group. **New KPI**

TAP Partners' performance review: KPIs 10-11

KPI 10:

Under the Agreement, the University Partners deliver projects that have been prioritised on the annual work program. Each project is aligned to (mutually agreed) key milestones, which have been linked to both the overall performance of the partner and an incentive payment.

KPI 10 is a quantitative measure, used to assess whether the partners are meeting their obligations and delivering project outputs in a timely manner.

KPI 11:

KPI 11 is measured qualitatively through a survey instrument. Overall feedback received indicates that TMR staff are satisfied with university progress under the Agreement and the delivery of agreed annual work program projects.

Key survey findings:

TAP is viewed as a valuable, cost-effective program that streamlines engagement with research organisations and supports projects that may not otherwise be funded. Respondents highlighted the practical value of research outputs, including insights and recommendations aligned with TMR's operational needs.

Areas for improvement:

- Some projects experienced resource constraints, timeline pressures and a need for stronger project management discipline.
- Feedback also identified some variability in outcome quality across university partners.

Future opportunities:

Respondents expressed strong support for continuing the TAP program and suggested expanding its scope to address emerging priorities, including accessibility-related investments, data capture and cost-benefit analysis.

There was also interest in universities playing a greater role in helping TMR address complex challenges that require innovative solutions.

Conclusion

Research and development are intrinsically linked to increased productivity and economic growth. The renewal of the TAP Agreement 2025-2030 reflects the commitment of TMR and the TAP Partners towards the development of a transport system that is inclusive and accessible to all.

Throughout the 2025-2026 year the TAP Partners have provided valuable research to support the delivery of TMR's strategic directions to enable accessible travel focused on keeping people safe, active and independent. The Partners (in collaboration with TMR) have aimed to deliver focused research of how to improve transport for the end user, by helping to enable a transport system that meets the user's needs and can address what users care about most.

The ongoing success of the TAP Program is due to the continued efforts of our University Partners, both staff and students, and the supportive, thoughtful, and positive contributions of TMR staff.

Performance highlights include:

- QUT, UQ and UniSC leveraged and matched more funding than previous financial years, with over $1,738 million contributed to the program in total. They did this by encouraging more coordination between agencies and funders dealing with transportation in contemporary ways, across all modes.
- QUT and UQ and their research students published over 124 papers and journals/articles/papers (globally).
- QUT and UQ staff reported an increase in the number of higher-degree students undertaking transport-related research at their respective universities.
- UniSC increased the number of students studying transport-related subjects by over 48 %.

In addition, the positive approach of TMR staff has assisted the TAP Partners to deliver quality research outcomes, including research in the areas of:

- Road safety.
- Travel and driver behaviours.
- Traffic management.
- Accessibility and inclusion.
- Travel demand management.

2025-2026 highlights

This year QUT, UQ and UniSC were successful in progressing several research initiatives including:

- Heavy Vehicle Safety Study.
- Crash prediction models.
- Evaluation of the implementation of 50 cent fares.
- Connected Regional Communities.
- Designing bus shelters for tropical conditions.
- AI driven predictive maintenance.

Future directions

There is an increasing need for interdisciplinary approaches to research to address existing and emerging transport challenges. Both TMR, MAIC and the University Partners have a role in developing the capacity of our future researchers to work together to address complexity and strengthen research outcomes.

Areas of future research will include a stronger focus on:

- Road safety and asset management (infrastructure longevity) research.
- Productivity and network efficiency.
- Freight and logistics.
- Efficient infrastructure planning and delivery.
- Human to machine interface.
- Data-driven policy development and evaluation.

TMR's commitment to continuous improvement and innovation cannot be achieved in isolation. The TAP Agreement will continue to support and invest, meeting TMR's long-term vision.

The TAP Partnership now includes UniSC with Transport Chair Professor Lynette Cheah joining the partnership. As the new academic partner of TMR, UniSC will concentrate on elevating transport research, training in sustainability, road safety, human factors and AI driven initiatives. UniSC will also launch a new engineering master's degree program in civil engineering and renewable energy in 2026.

UniSC are committed to deliver collaborative research projects with TMR, in alignment with the research themes of *Healthy People* and *Healthy Planet*, while maintaining a global outlook, to support the delivery of sustainable, resilient, inclusive transport in Queensland, especially in the thriving Sunshine Coast and Moreton Bay regions.

International Focus

With the assistance of their TAP Partners, Brisbane has successfully secured 2 high profile transport-related research conferences:

- 2028 - The 27th International Symposium on Transportation and Traffic Theory (ISTTT) will be held in early July 2028. The ISTTT is widely regarded as the most prestigious and competitive conference in traffic flow theory and related areas.
- 2029 - The 18th World Conference on Transport Research (WCTR) will be held in July 2029. The WCTR is the world's premier transport research conference, held every 3 years and attracting leading researchers, practitioners, industry representatives and government agencies from around the world.

Hosting events like these will help build a transport research focus in Queensland in the lead up to the 2032 Olympics and Paralympics. TMR and the TAP Partners will be able to demonstrate our insights, expertise and innovations to a global audience in the transportation sector.

Annexure A: TAP 2025–2026 Work Program: Project Status Report

Table 4: List of TAP projects for 2025–2026

No.	Project	Status
1	Heavy vehicle safety study – Phase 1	Complete
2	Development of crash predictive models for road design	Complete
3	Inclusive transport in regional Queensland – development of an equitable access trial	Complete
4	Developing an evidence base of long-term emissions abatement initiatives for the Queensland transport sector	Complete
5	Design principles for low-carbon transport infrastructure	Complete
6	Evaluation of separated bicycle tracks	Complete
7	Designing better bus shelters for tropical conditions	Complete
8	Connected Regional Communities Study - Phase 2	Complete
9	Review of luminous intensity in traffic signal stands - Replacing incandescent bulbs with LEDs	Complete
10	Understanding the economic benefits of bus stops at key destinations	Complete
11	A scoping review and rapid evidence assessment of AI-enabled cybercrime risks in the transportation industry*	Complete*
12	Mobility in Queensland - Impact of 50 cent fares on transport equity, accessibility and mode shift	Complete
13	Evaluation of changes to the bus network from METRO	Complete

14	AI Driven predictive maintenance for transport infrastructure	Ongoing
15	Strategic Public Transport and social outcomes study	Ongoing
16	Providing passenger transport for Queensland's ageing population - Phase 2	Ongoing
17	Review of operations and safety at two aspect signalised slip lanes	Ongoing
18	Exploration of Emerging Technologies to pre-emptively identify slope and environmental hazards on 'Range Roads'	Ongoing
19	Heavy vehicle fleet safety standards – CLOCS-A	Ongoing
20	Strengthening Public Transport for climate change & wet weather^	Finalised^

*Project is complete (undertaken by Griffith University) ^Project has been finalised (not continued), and unspent funding has been reallocated.

Annexure B: Transport Academic Partnership 2025–2026 Work Program: Project Status Report

University Partners work with TMR to undertake and deliver an annual work program of research and development projects. In 2025–2026, there were 20 projects undertaken by the TAP University Partners. Of these, 13 were completed and 5 projects are ongoing. One project has been finalised (with the associated funding reallocated to the revised project^). One completed project* was undertaken by Griffith University under the previous TAP Agreement 2020-2025.

The TAP work program projects include:

- projects that meet agencies' strategic priorities
- trial projects such as proof of concept or pilot projects
- joint projects with other universities and/or industry partners and other ad-hoc/emerging issues
- Australian Research Council Linkage Projects and other leveraged funding opportunities.

The work program can also include in-kind and knowledge transfer activities, capability building, training, professional development, and work experience opportunities. Table 12 outlines the 2025–2026 projects, defining their scope, alignment to TMR strategic priorities and status at the end of the period.

Table 5: Transport Academic Partnership 2025–2026 Work Program Status Report

No.	Project	Scope/description	TMR Strategic Objectives	Status at end of 2025–2026 FY	Partners
1	**Heavy vehicle safety study - Update with latest crash data (2 years)**	This project updated an existing crash data sample (from mid-2007 to mid-2017) with a more recent sample (mid-2017 to mid-2024) and reanalysed the data. The project updated the data set and used the information to determine the size of heavy vehicles and verify the correlation to the crash rates in Queensland. This was the first stage of a 2-year project.	This project is: • Safe and secure • Efficient and productive • Sustainable • Capable, adaptive and aligned	**Complete – June 2026 (Stage 1)** **Output:** Report with recommendations **Outcome:** Increased understanding of crash patterns involving heavy vehicles to support decision making and reduce collision frequency.	University: QUT TMR: Engineering and Technology. Infrastructure Management and Delivery.
2	**Development of crash predictive models for road design - scoping project**	This project considered methods and models available to support road designers make better decisions based on crash rates and infrastructure costs. Additionally, it used the models to predict the effect of geometric parameters on crash rates to calculate costs and implement the most effective remedy.	This project is: • Safe and secure • Efficient and productive • Sustainable • Capable, adaptive and aligned	**Complete – June 2026 (Stage 1)** **Output:** Report with recommendations **Outcome:** Increased understanding of the best method for developing crash prediction models for road design. Road design engineers having confidence in objective safety evidence to make decisions.	University: QUT TMR: Engineering and Technology. Infrastructure Management and Delivery.

No.	Project	Scope/description	TMR Strategic Objectives	Status at end of 2025–2026 FY	Partners
3	**Inclusive transport in regional Queensland – development of an equitable access trial**	This project investigated the concept of universal mobility to determine how best to deliver a foundational level of mobility to all members of a society regardless of factors such as geographic location or income level, through partnerships and policies.	This project is: • Responsive • Capable, adaptive and aligned • Accessible and integrated • Sustainable	**Complete – June 2026** **Output:** Comprehensive report. **Outcome:** A better understanding of transport disadvantage and how it can be used to provide scalable pathways and remove barriers.	University: UniSC TMR: Passenger Transport and Strategic Policy. Policy, Planning and Investment.
4	**Developing an evidence base of long-term emissions abatement initiatives for the Queensland transport sector**	This project provided TMR with an evidence base to assess and compare the cost-effectiveness of various decarbonisation initiatives relevant to the transport sector, to ensure that public investment delivers the greatest emissions reduction at the lowest cost while supporting Queensland's economic growth and infrastructure priorities.	This project is: • Efficient and productive • Responsive • Sustainable	**Complete – June 2026** **Output:** Final report **Outcome:** TMR will be better positioned to participate in whole-of-government emissions modelling and other related projects (such as the Transport Sector Plan).	University: UQ TMR: Passenger Transport and Strategic Policy. Policy, Planning and Investment.
5	**Design principles for low-carbon transport infrastructure**	The project developed an evidence-based, technically grounded set of design principles for low-carbon transport infrastructure development in Queensland. These principles will inform design and practice within the transport infrastructure sector.	This project is: • Efficient and productive • Responsive • Sustainable	**Complete – June 2026** **Output:** High level literature review. **Outcome:** TMR will be better positioned to make informed policies to support low-carbon design and development.	University: UniSC TMR: Engineering and Technology. Infrastructure Management and Delivery.
6	**Evaluation of separated cycle tracks in new developments**	This project undertook an evaluation of the impacts of Economic Development Queensland's (EDQ) separated cycle track implementation in Caloundra South, Hamilton North Shore and Carseldine. Additionally, UQ conducted an intercept survey to gain an understanding of whether new infrastructure would actively encourage users to shift travel choices away from car usage.	This project is: • Efficient and productive • Responsive • Sustainable • Accessible and integrated	**Complete – June 2026** **Output:** Final report **Outcome:** The research provided TMR with evidence-based insights and recommendations to shape and support future guidance for inclusion in future Action Plans.	University: UQ TMR: Transport Strategy and Planning Branch. Policy, Planning and Investment Division.

No.	Project	Scope/description	TMR Strategic Objectives	Status at end of 2025–2026 FY	Partners
7	**Designing better bus shelters for tropical conditions**	The project reviewed passenger comfort at existing bus stops in North Queensland and recommended improvements to outdated infrastructure.	This project is: • Efficient and productive • Responsive • Sustainable • Accessible and integrated	**Complete – June 2026** **Output:** Final report and recommendations **Outcome:** Identification of evidence-based improvements to bus shelter design for specific North Queensland conditions.	University: UQ TMR: Passenger Transport and Strategic Policy. Policy, Planning and Investment Division.
8	**Connected Regional Communities Study - Phase 2**	This study provided an understanding of the factors driving transport disadvantage, and explored the barriers experienced by communities with unmet transport need across regional Queensland. It also identified system-wide service gaps and recommend solutions suited to local communities to improve mobility for regional customers now and into the future.	This project is: • Creating liveable regions and active cities • Customer focused • Innovative • Investing in the future	**Complete – June 2026** **Output:** Technical report identifying methodology **Outcome:** Provided an understanding of the extent of transport disadvantage in rural and regional communities and to formulate solutions.	University: UQ TMR: Transport Planning and Prioritisation, Policy, Planning and Investment Division.
9	**Review of luminous intensity in traffic signal stands - Replacing incandescent bulbs with LEDs**	This project determined if the current luminous intensities for Traffic Signal Lanterns when using LEDs are appropriate for the changing landscape and whether they are using the best available technologies. In the current version/standard, the yellow aspect luminous intensity requirements are multiplied by 2.5x vs red and green, which the luminous intensity requirement for 300mm aspects is multiplied by a factor of 3 as opposed to 200mm aspects.	This project is: • Creating liveable regions and active cities • Innovative • Investing in the future	**Complete – June 2026** **Output:** Final report. **Outcome:** Improved and safer operation of vehicles (particular the existing fleet) on Queensland roads.	University: UQ TMR: Traffic Signal Technologies, Statewide Network Operations. Network Services and Operations
10	**Understanding the economic benefits of bus stops at key destinations**	This study examined the economic benefits of bus stops at key destinations by assessing customer perceptions of their value, location and accessibility. The findings will help inform future planning and investment decisions for bus stop infrastructure.	This project is: • Creating liveable regions and active cities • Customer focused • Innovative • Investing in the future	**Complete – June 2026** **Output:** High level cost benefit analysis and report (case studies). **Outcome:** Improved understanding of the economic value of bus stop infrastructure and TMR's tenure.	University: UQ TMR: Transport Strategy. Policy, Planning and Investment Division.

No.	Project	Scope/description	TMR Strategic Objectives	Status at end of 2025–2026 FY	Partners
11	**A scoping review and rapid evidence assessment of AI-enabled cybercrime risks in the transportation industry**	This project delivered a scoping review and rapid evidence assessment of AI-enabled cybercrime risks in the transport industry. The review mapped evidence from academic databases, industry and government reports, and grey literature to identify how AI may be used by malicious actors and to inform TMR's understanding of emerging cyber security risks.	This project is: • Customer focused • Creating liveable regions and active cities • Innovative	**Complete* -** Delivered under the 2020-2025 TAP Program **Output:** Report **Outcome:** The analysis will inform broader TMR strategies, including TMR's approach to how risk is managed when AI is adopted in the transport industry.	University: Griffith TMR: Strategic Partnerships and Business Delivery
12	**Mobility in Queensland - Impact of 50 cent fares on transport equity, accessibility and mode shift**	This project evaluated the impacts of introducing 50-cent public transport fares in Queensland while examining how COVID-19 shaped usage and recovery patterns. The project utilised *go* card transaction data supplied by TMR, integrated with the Queensland Household Travel Survey and ABS Census data, to inform future policy.	This project is: • Responsive • Capable, adaptive and aligned • Accessible and integrated	**Complete – July 2026** **Output:** Final report **Outcomes:** Improved understanding of fare impacts and user responsiveness particularly around accessibility for disadvantaged groups.	University: UQ TMR: Passenger Transport and Strategic Policy. Policy, Planning and Investment Division.
13	**Evaluation of changes to the bus network from METRO**	This project used *go* card and other data sets to determine the impacts of the new BCC Metro on travel patterns. It also established a methodology to better assess the impact of infrastructure changes on travel patterns. (Links to project No.12)	This project is: • Responsive • Capable, adaptive and aligned • Accessible and integrated	**Complete – July 2026** **Output:** Final report **Outcomes:** Improved understanding of the impact of network and public service changes and passenger level of service.	University: UQ TMR: Passenger Transport and Strategic Policy. Policy, Planning and Investment.
14	**AI-Driven predictive maintenance for transport infrastructure**	This project aimed to develop an AI approach for proactive and efficient management of transport infrastructure assets. The first stage involved a comprehensive literature review to identify the best approach and algorithm for developing predictive models. Stage 2 revolved around developing and implementing an operational model.	This project is: • Creating liveable regions and active cities • Building prosperity • Customer focused • Innovative • Investing in the future	**Ongoing** **Output:** Literature review and final report **Outcome:** Improved safety using predictive analytics and it will enable a more efficient use of resources.	University: UniSC TMR: Metropolitan Region. Infrastructure Management and Delivery Division

No.	Project	Scope/description	TMR Strategic Objectives	Status at end of 2025–2026 FY	Partners
15	**Strategic Public Transport and social outcomes study** **Phase 1**	This hybrid project identified, communicated and realised the benefits of public transport using socioeconomics and best practice investment strategies.	This project is: • Creating liveable regions and active cities • Customer focused • Innovative • Investing in the future	**Ongoing** **Output:** Final report. **Outcomes:** Better assist TMR to position the strategic planning needed to identify, communicate and realise the socioeconomic benefits early in the planning process.	University: UniSC TMR: Corridor and Passenger Transport Planning. Policy. Policy, Planning and Investment Division.
16	**Providing passenger transport for Queensland's ageing population - Phase 2**	This project aims to grow departmental understanding of the passenger transport needs of an ageing population in Queensland. Phase 1 was undertaken by QUT.	This project is: • Creating liveable regions and active cities • Innovative • Investing in the future	**Ongoing** **Output:** High level cost benefit analysis and report. **Outcome:** A better understanding of the future needs of an ageing population and how to target interventions at specific groups.	Universities: QUT & UniSC TMR: Passenger Transport and Strategic Policy. Policy, Planning and Investment Division.
17	**Review of operations and safety at two aspect signalised slip lanes**	This project aims to gather evidence and to analyse data to inform best practice and achieve better safety and efficiency for all road users at slip lanes.	This project is: • Customer focused • Creating liveable regions and active cities • Innovative • Investing in the future	**Ongoing** **Output:** Final report **Outcome:** Increased departmental capacity and knowledge about understanding of driver comprehension of 2 aspect slip lane signals that could inform future education campaigns and policy improvements.	University: UQ TMR: Engineering and Technology Branch. Infrastructure Management and Delivery Division.
18	**Exploration of Emerging Technologies to pre-emptively identify slope and environmental hazards on 'Range Roads'**	This project will research current best practice 'Range Road' slope treatments (traditional / conventional and/or innovative) adopted by road authorities to improve the resilience of the transport network and to create safer roads.	This project is: • Creating liveable regions and active cities • Customer focused • Innovative • Investing in the future	**Ongoing** **Output:** Literature review and final report **Outcome:** Improved safety using predictive analytics and it will enable a more efficient use of resources.	University: UQ TMR: Program Delivery and Operations. Infrastructure Management and Delivery Division.

No.	Project	Scope/description	TMR Strategic Objectives	Status at end of 2025–2026 FY	Partners
19	**Review and evaluation of international and domestic applications of heavy vehicle fleet safety standards (Stage 1)** **CLOCS – A**	The aim of the project is to review and evaluate where heavy vehicle fleet safety interventions have been adopted and implemented domestically that assist with providing better vision of people walking and riding bikes or scooters.	This project is: • Creating liveable regions and active cities • Innovative • Investing in the future	**Ongoing** **Output:** Final report **Outcome:** Improved and safer vehicles (particular the existing fleet) on Queensland roads, particularly those associated with construction.	University: UQ TMR: Engineering and Technology Branch. Infrastructure Management and Delivery Division.
20	**Strengthening Queensland Public Transport in Response to Climate Change and Severe Weather Events**	This project reviewed current climate change science, Government policies, and international practices; as it pertains to public transport infrastructure and services.	This project is: • Customer focused • Creating liveable regions and active cities • Innovative • Investing in the future	**Finalised^** **Output:** Literature review and report **Outcome:** Increased departmental capacity and knowledge about the impact of climate change in the transport context, on infrastructure (roads, bridges and railway tracks).	University: UQ TMR: Passenger Transport and Strategic Policy. Policy, Planning and Investment Division.

*This project was funded under the 2020-2025 TAP Agreement and was finalised in the 2025-2026 period. ^This project was finalised in 2025, and the unspent funding was reallocated to another TAP research project.

Annexure C: TAP Sourcing Strategy projects

The TAP Sourcing Strategy provides a simplified and streamlined procurement process for R&D projects that align with the objectives of the Agreement but cannot be prioritised as part of the annual work program.

To be considered eligible, projects must meet one or more of the following criteria:

- research and/or experimental development must be a key project component
- build on previous research undertaken by the university
- has the potential to lead to future research projects
- investigate solution to known research gaps for the department
- outputs benefit the department and the university (shared/mutual interest).

Nine projects were either procured, completed or ongoing through the strategy in 2025–2026. The total value was approximately $1,670,300 (excl. GST).

Table 6: TAP Sourcing Strategy projects active/commencing/complete in 2025–2026

No.	Project	Scope/description	TMR Strategic Objectives	Status at end of 2025–2026 FY	Partners
1	**Heavy Vehicle Safety on Motorways by Applying AI-based Drone Video Analytics** **Project cost $500,000 (Year 1)**	Objectives of this project include determining the effect of heavy vehicles on safety and motorway operations and identify potential hazards and suggesting improvements to further enhance safety.	This project is: • Creating liveable regions and active cities • Customer focused • Innovative • Investing in the future	**Ongoing** **Output:** Final report **Outcome:** Improved and safer roads (particular the existing HV fleet) on Queensland roads by using AI and drone technology.	University: QUT TMR: Road Design. Engineering and Technology Branch. Infrastructure Management and Delivery Division.
2	**Investigating interactions between heavy vehicles and young novice drivers on Queensland roads** **Project cost: $78,500 (Year 2)**	This project will use an ecological model to investigate young novice drivers' interactions with heavy vehicles. The ecological model will provide an understanding of the various environmental factors, road user characteristics, and contextual factors, such as organisational and legislative factors, which influence young driver behaviour.	This project is: • Safe and secure • Customer focused • Creating liveable regions and active cities • Innovative	**Complete – September 2026** **Output:** Final report with recommendations **Outcome:** Mechanism to reduce the overrepresentation of young drivers involved in crashes on Queensland roads.	University: Griffith TMR: Land Transport Safety and Regulation, Road Safety Research.

No.	Project	Scope/description	TMR Strategic Objectives	Status at end of 2025–2026 FY	Partners
3	**Universally designed autonomous people mover research – Phase 5** **Project cost: $120,000**	This project sought to research, design and prototype an autonomous vehicle that, utilising the principles and goals of Universal Design, is accessible to everyone. The research also explored the various factors that contribute to transport inequity, to identify interventions TMR can take to promote transport equity across the transport network.	This project is: • Creating liveable regions and active cities • Customer focused • Innovative • Investing in the future	**Complete – February 2026** **Output:** Final report and draft publications **Outcome:** Building TMR's understanding about the mobility opportunities that support a physical and psychologically safe and dignified transport experience for people with disability	University: QUT TMR: Technical Accessibility. Accessible Transport Network.
4	**AusRAP – Manual Data Collection** **Project cost: $235,000**	TMR has committed to publishing AusRAP star ratings for the national land transport network (NLTN) and high-speed roads that carry 80% of travel in Queensland. This project included an analysis that determined a hybrid data collection approach using the automated data.	This project is: • Safe and secure • Innovative • Investing in the future	**Complete – February 2026** **Output:** Completed data file **Outcome:** TMR will be able to calculate the star ratings for major roads with better accuracy to improve funding prioritisation.	University: QUT TMR: Safer Roads Infrastructure Management and Delivery Division. Engineering and Technology Branch.
5	**Safety evaluation of slip lane configurations at signalised intersections using AI based video analytics** **Project cost: $411,000 (Year 2)**	This research project aims to undertake a comprehensive safety evaluation of different slip lane configurations at signalised intersections for vehicle-pedestrian and vehicle-vehicle interactions by utilising advanced video-based traffic conflict analysis.	This project is: • Safe and secure • Customer focused • Innovative • Creating liveable regions and active cities • Investing in the future	**Ongoing** **Output:** 2025–2026 Interim report **Outcome:** It is envisioned that this project will make intersections safer by analysing the data to inform best practice and implement the best types of interventions.	University**:** QUT TMR: Infrastructure Management and Delivery Division. Engineering and Technology Branch.
6	**Nudgeathon** **Project costs: $30,000**	Nudgeathon is an annual behavioural change competition run by behavioural economics researchers at QUT. Teams develop solutions to real-life issues. Using principles of behavioural science, teams from international and domestic universities, government agencies and corporate organisations work on a problem brief and present their solutions to a panel of expert judges from academia, government, and industry.	This project is: • Creating liveable regions and active cities • Customer focused • Innovative	**Complete – October 2025** **Output:** Video presentations **Outcome:** Providing TMR with potential strategies to impact road safety outcomes for young people in Queensland.	University**:** QUT TMR: Customer Services, Safety and Regulation, Road Safety Research

No.	Project	Scope/description	TMR Strategic Objectives	Status at end of 2025–2026 FY	Partners
7	**Cultural inclusion of people with disabilities in the provision of public services and work opportunities** **Project cost: $50,000 (Year 2)**	This project looked at neurodiversity as natural variations within the human brain and how TMR as a service provider can provide customised critical information, products, and infrastructure can provide improved education, health and employment.	This project is: • Customer focused • Innovative • Creating liveable regions and active cities Investing in the future	**Complete – November 2025** **Output:** Literature and Legislation review report **Outcome:** Inform implementation of the TMR Accessibility and Inclusion Strategy and Accessibility Action Plan and measure its success.	University: Griffith TMR: Technical Accessibility. Accessible Transport Network.
8	**Towards next generation motorway control: Weather responsive Variable Speed Limits** **Project cost $216,833 (Year 1)**	This project focuses on enhancing motorway safety in adverse weather conditions by developing a weather-responsive variable speed limit framework. This project is motivated by the significant impact of weather conditions on Queensland motorways.	This project is: • Safe and secure • Customer focused • Innovative • Creating liveable regions and active cities • Investing in the future	**Complete - 2026** **Output:** Final report (Year 1) **Outcome:** It is envisioned that this project will make roads safer by using technology to change speed signs to better suit the prevailing conditions.	University: QUT TMR: Traffic Signal Technologies, Statewide Network Operations. Network Services and Operations
9	**Road Safety Climate Scale – Longitudinal Analysis – Phase 3** **Project cost $28,999 (Year 3)**	To support TMR's understanding of cultural change this project investigated the multifaceted concept, comprised of norms, values, beliefs, and underlying assumptions, all of which are expressed through safety climate. Safety climate is defined as the shared perceptions and beliefs regarding the safety conditions of a working environment and these shared perceptions and beliefs affect safety.	This project is: • Customer focused • Innovative • Creating liveable regions and active cities • Investing in the future	**Complete – June 2026** **Output:** Final report **Outcome:** The ability to provide a validated measure of safety climate (culture) to understand public perceptions and beliefs about road safety in Queensland across 5 key factors and how those perceptions change across the life of the life of the Queensland Road Safety Strategy.	University**:** Griffith TMR: Customer Services, Safety and Regulation, Road Safety Research