2024-2025 NACOE Research Program

Project	Project Title PAVEMENTS		
Number			
P58	Alternative cementitious binders for cost-effective and sustainable transport infrastructure		
P43	Long Term Pavement Performance Project_Y11		
P34	Development of Performance Based Evaluation Protocol for Non-Standard Granular Pavement Materials_Y6		
P183	Digitising the workflow for Construction Materials Test Data_Y2		
P181	Phd Project - Industry Research Training Group (IRTG) QUT 2 PhD projects - Construction of Pavements on Expansive Soils and Decarbonisation		
P179	Intelligent construction technology for better roads in QLD		
P168	Improved resilience of unbound granular pavements_Y3		
P165	Development of a Soft Soils and Expansive Soils databases_Y4		
P164	Optimised and advanced Geotechnical Solutions (merge of the scope of new Geotech project)_Y3		
P161	Maximising the use of TSD data for pavement		
P160	Method for determining design parameters of reinforced paved flexible pavement_Y2		
P152	Increased use of RAP in asphalt _Y1		
P149	Moisture susceptibility of asphalt mixes_Y1		
P148	Next generation bituminous binders (eg hybrid-and bio-) to inform performance related characterisation of binders		
P140	Investigate premature failure of Raised Reflective Pavement Markers (RRPM) and improvement options_Y3		
P139	Slopes – Development of wireless sensor network to predict and prevent rainfall-induced landslides_Y4		
P137	Stability of bridge abutments – on the influence of pore pressures on scouring of supporting slopes_Y3		
P135	Optimisation of quarried/recycled pavement material blends_Y4		
P134	Investigation of warm mix asphalt compaction temperature_Y3		
P133	Performance relationships & specifications for asphalt pavement design in QLD_Y4		
P132	Queensland's foamed bitumen mix design and structural design procedure:review and improved methods_Y3		
P122	Improved characterisation of lightly bound materials_Y4		
P121	Evaluation of the performance benefits of geosynthetic reinforcement in asphalt layers_Y5		
P111	Improved Crumb Rubber Modified Binder Sprayed Sealing Practices_Y5		
O40	Review of TMR's Harmonisation with Austroads Technical Suite		



Project Number	Project Title	ASSET MANAGEMENT		
A69	Roughness test loop in QLD (and other distress types)_Y2			
A68	Impact Assessment of the Introduction of Low and Zero Emission Heavy_Y2			
A67	Network lifecycle model for Embodied Carbon and Emissions (Stage 2)_Y2			
A65	Assessment of road space requirements for combination vehicles over 30m_Y1			
A62	Asphalt service lives - Component 2 - development of a ravelling model_Y1			
A56	Pavement Drainage Performance_Y3			
A51	Improved model for seal life estimates in asset management and updating of Element 17 Management Plan, Stage 2_Y2			
Project Number	Project Title	STRUCTURES		
S75	Bearing and expansion	n joints performance_Y1		
S73	Navigating Sustainability for Structures_Y2			
S70	Implementation of Learnings S53, S54, S64_Y2			
S62	Management of Structures with Concrete Halving Joint - Scale model testing project_Y4			
S76	Performance Based Concrete Specifications for Durability Performance_Y1			
Project	Project Title	ROAD SAFETY		
Number		NUAD SAFETT		
R154	Queensland Fatal Cras	sh Location Analysis		
R153	Speed Data & Metrics - Investigation into the suitability for use in speed reviews			
R152	Unprotected multilane right turn treatments risk mitigation guidance update			



Project	Project Title		
Number		NETWORK OPERATIONS	
R151	Traffic Signal Timing Evaluation Based on The Connected Vehicle Data		
R150	Feasibility study of arterial road network optimisation using perimeter control		
R137	Routine maintenance (RMPC) ITS & electrical work activities review_Y2		
R100	TMR traffic data access portal_Y6		
Project	Project Title		
Number		SUSTAINABILITY	
P117	Sustainability Assessment Tool_Y6		
042	Cooler roads (opportunities & impacts)		
041	PFAS Current status and opportunities		
O36	Use of Limestone cement in stabilisation_Y2		
O33	Potential use of Coal Mining Waste as a stabilising agent (CQU collaboration)		
O28	Recycled materials database_Y3		

