

# National Pavements Technical Group

Who We Are



## National Pavements Technical Group

#### Who Are We?

 Industry Sector Group established 2008 consisting of pavement experts from Waka Kotahi, Consultants, Contractors & Industry Associations

#### **Purpose**

- Identify, develop, document, maintain & facilitate best practice for road pavement design, materials & construction activities in New Zealand
- Provide a formal industry gateway for NZTA documents
   & directives

#### **Objectives**

- That the wider industry, inclusive of contractors, clients & consultants, is made aware of & is encouraged to use best practice for designing & constructing pavements
- That best practice methods are reviewed & revised as required, to enhance pavement performance, efficient use of materials & construction methodologies



### Current Members

Bryan Pidwerbesky (Chair)

David Alabaster

Greg Arnold

Allen Browne

Mark Cruden

Andrew Deakin

Thorsten Froebel

Riaan Theron (Deputy Chair)

Ken Hudson

Robert Patience

Sarah Patrick

Mike Chilton

Michelle Farrell

Danny Wyatt

Vacant

Fulton Hogan

Waka Kotahi

Asco Asphalt

**Hiway Group** 

**MC** Engineering

**Bartley Cons** 

Higgins

**BECA** 

Stantec

**Downers** 

**GHD** 

**AQA Rep** 

**CCNZ** Rep

**CETANZ** rep

Local govt rep





## Corresponding Members

Nick Schilov – Hiways

Milad Ebrahimi - Aecom

Angela Parsonage – Aecom

Shaun Magee – Downer

Ramiz Iskander

John Kaczon – Pinnacles Civil

Louwrens Viljoen – Arup

Chris Pacey – Fulton Hogan

Jaime Clark – Fulton Hogan

Emile van Zyl – Fulton Hogan

Charlotte Turner – Fulton Hogan

Simon Hughes-Johnson – Bartley Consultants

Graham Salt – Geosolve

Sean Bearsley – Higgins

Giulio Chapman Olla

Rob Damhuis - Waka Kotahi

Ross Peploe - Bartley Consultants

**Greg Seed - Bartley Consultants** 

Pritesh Karan - Bartley Consultants

Kent Johnson - Bartley Consultants

Martin Gribble – Stantec

George Tsatsas – Stantec

Adam Leslie – Waka Kotahi

Clare Dring - FH

Paul Anderson – WSP

Bruce Steven - BECA

Stanley Lee – BECA

Stacy Goldsworthy – Winstone Agg

Arnold de Bruyn – GHD

Damien Douglas – WSP

Sheryn Reilly – WSP

Reda Roufail – WSP

Danvir Maharaj – WSP

Greg Bailey - WSP

Matt Sharp - WSP

Janus Grove - FH



### Major Achievements

**Draft plateau density testing best practice (T/24)** 

**State Highway Pavement Delivery System review** 

Delivery of T/19 spec (Design & Indirect Tensile Strength Testing of Modified & Bound Pavement Materials)

Delivery of updated F/1 (Earthworks)

Delivery of B series specs: B/5, 6, 7, 8, 9

Reviewing & input to B/10 HiLab spec



## Strategy

#### Where we want to get to

Predictable performance
Timely intervention
Evidence based pavement solutions
Tiered risk-based approach
Sustainable resource use
Knowledgeable industry

#### Where we are now

Designs don't challenge the status quo
Developing ability to predict performance
Poor knowledge transfer of success & failure
Inconsistent use of best practice
Diminishing aggregate resource

#### How we'll get there

Promote recent specs & guidelines
Co-ordinated conference strategy
National pavements research strategy
Active input into rehab design manual revision
M/4 review

M/3 review T/24 plateau density

NZ Vibration Hammer variability

Understand constructability limits

Create technical process map for all tech docs

B/2 review



## Our 3 Strategic Goals



**Share Existing Knowledge** 



**Develop New Resources** 





**Build Knowledge** 



## Share Existing Knowledge

**Set up Comms working party (sub-group)** 



Develop and implement communications plan



Coordinated conference attendance delivering NPTG papers or workshops per year (eg CCNZ, CETANZ, NZTA/NZIHT conferences)



**Host a NPTG seminar** 



# Develop New Resources

Work with NZTA to create or update at least two guidelines per year

Project	Description
M/4 Review	New version drafted
M/3 Review	Ensure appropriate aggregates used for subbase
NZ Pavement Rehab Guide Revision	NPTG members on every section's panel
T/24	Standardised plateau density process
В/9	Specification for HiLab materials & constructon
national guideline on use of marginal aggregates	



## Build Knowledge

#### **Objectives**

- To identify research opportunities that address major problems in the industry
- To identify research opportunities that align with central & local government strategic directions
- To frame research directions to support the work towards the review & revision of best practice & specifications (steering role)

#### Priorities 2023/24

- Intelligent compaction: Implementation benefits vs costs
- Dense graded aggregate (DGA): Where is DGA best used (eg rural, urban, suburban, highways, arterials). Field trials underway.
- Bitumen replacement: Support WSP, Auckland Univ research funded by MBIE
- Cement replacement: Natural materials, pozzolans
- Carbon footprint of a range of pavement alternatives over 40-year analysis period

# We're here for Industry

- We want to hear about your challenges
  - A conduit between Industry & NZTA
  - Contact NPTG Chair: <u>bryan.pidwerbesky@fult</u> <u>onhogan.com</u>
- Thankyou

