This summary highlights the key research questions that will aid in advancing active transport in Australia, and should be prioritised by researchers, government, other policymakers and practitioners to achieve the highest impact.

**Vision**

VicHealth has a vision for vibrant, active and connected communities where people can walk and ride bikes for leisure, running errands or commuting, collectively known as active transport.

Despite the benefits of walking and riding bikes for active transport and the issues associated with a high dependence on cars for transport, only 5% of trips in Australia are on foot or by bike.

To encourage more people to move around on foot or by bike, there is a need to fill gaps in active travel research in a unified way.

VicHealth is working collaboratively with experts in the field to build the evidence base and facilitate change.

In 2020, a group of nationally recognised experts in active travel conducted a research priority setting exercise drawing on the expertise of leading practitioners, policymakers and academics to identify gaps in current research and make recommendations for future research.

The priorities identified in this project provide a framework to advance active transport research in Australia to have the greatest impact.
The benefits of active transport

Walking and bike riding have been shown to contribute to better health, reduced impact on the environment and benefits for the economy.

Walking and bike riding provide independence and freedom, especially for children, teenagers, the elderly and people with a disability.

Walking and bike riding facilitate connection to nature and cleaner air.

An investment of $500 million in walking and bike riding trips will return a value of $6.5 billion to the Victorian community.

Research shows that the benefit-cost ratio of investing in walking and bike riding is 13:1, which is extremely high in comparison to other transport projects.

By walking or bike riding instead of commuting by car, an average Melbourne family can save up to $80 per day.

People can support local business by walking and riding to local cafes and shops.

The transport sector accounts for 25% of global carbon dioxide emissions.

Long-term exposure to transport-related air pollution causes heart disease and lung disease.

Only 45% of the Australian adult population meet recommended physical activity guidelines.

REFERENCES:


Filling active transport research gaps

To help establish recommendations for future research, Monash University conducted a research priority setting exercise in 3 phases:

**Phase 1**
Question generation and collection
Survey of a reference group comprising experts from academia, government, non-profits, private organisations to capture questions.

Responses: 259
Questions gathered: 607

**Phase 2**
Thematic analysis and consolidation
607 questions gathered in Phase 1 were segmented by theme and consolidated to form a shortlist of 50 questions.

**Phase 3**
Prioritisation of research questions
The reference group was asked to rank the shortlist of 50 questions to provide a final prioritised list of the top ranked questions.

**Priority setting**
Led by a Technical Working Group (TWG) comprising experts in the field of active transport

**Key themes**

<table>
<thead>
<tr>
<th>Enhancing infrastructure</th>
<th>Changing behaviour</th>
<th>Building capacity</th>
<th>Improving measurement of benefits</th>
<th>Enhancing policy, governance and funding</th>
</tr>
</thead>
</table>

Increasing active travel in Australia through action and research | 3
Recommended active transport actions and top research priorities

Active transport research in Australia needs to continue to advance through sustainable funding and government support for infrastructure changes to enable walking and bike riding. To ensure that research is targeted in such a way to influence policy and practice in areas providing the highest impact, the Technical Working Group make the following recommendations for active transport research moving forward:

1. Active transport research should be recognised as critical for advancing population health and wellbeing, environmental health and the economy.

2. Active transport research should be solution-focused, addressing problems faced by policy-makers and practitioners that impede the advancement of active transport, including structural, behavioural, social, cultural and economic impediments;

3. Researchers and funding bodies should prioritise evaluation research (including natural experiments) combined with implementation science to assess successful and unsuccessful elements of the implementation of active transport interventions.

4. To address the research priorities identified in this report, there is a greater need for transdisciplinary research determined by and conducted in partnership with communities, practitioners and policy makers;

5. Equity must be prioritised in all active transport research in order to meet the needs of traditionally underserved and or disadvantaged populations/areas (such as people with disabilities, Indigenous communities, people from regional/remote areas, children and older adults)

6. An active transport research community of practice should be established in Australia.
Table 1: Final prioritised list of the top 26 ranked questions (with a mean score of 4 or higher).

<table>
<thead>
<tr>
<th>Description</th>
<th>Rank:</th>
</tr>
</thead>
<tbody>
<tr>
<td>What is required from an evidence and policy perspective to reallocate road space to allow safe spaces for active transport?</td>
<td>1</td>
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<tr>
<td>What are the reasons for community resistance to active transport infrastructure, road space re-allocation and lower urban speed limits, and how can these be overcome?</td>
<td>2</td>
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<tr>
<td>What infrastructure is needed to make neighbourhoods safe for children to walk and cycle and move independently?</td>
<td>3</td>
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<tr>
<td>What are the political barriers and enablers of achieving sustained and appropriate investment in active transport now and into the future?</td>
<td>4</td>
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<tr>
<td>What are the health, social, environmental and economic benefits from active transport, and how can these be measured and valued?</td>
<td>5</td>
</tr>
<tr>
<td>What changes are needed to urban planning policy and legislation at the federal, state and local levels to attain and sustain mode shift to active transport?</td>
<td>6</td>
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<tr>
<td>How can health and wellbeing objectives and outcomes be embedded into transport policies and strategic planning?</td>
<td>7</td>
</tr>
<tr>
<td>How can existing funding mechanisms across all levels of government be leveraged to increase funding for active transport?</td>
<td>8</td>
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<tr>
<td>What are the mechanisms to convince government at all levels to make promoting active transport an essential and shared priority?</td>
<td>9</td>
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<tr>
<td>How can the barriers of the use of active transport to school be overcome?</td>
<td>10</td>
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<tr>
<td>What are the barriers that prevent the uptake and implementation of best practice active transport design guidance and interventions?</td>
<td>11</td>
</tr>
<tr>
<td>What legislative and policy changes are required to support active transport and what are the barriers and enablers of achieving these changes?</td>
<td>12</td>
</tr>
<tr>
<td>What urban policy requirements are needed in new and greenfield neighbourhoods to deliver optimal active transport opportunities?</td>
<td>13</td>
</tr>
<tr>
<td>How can collaboration across all three levels of government be improved to achieve a shared vision on active transport?</td>
<td>14</td>
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<tr>
<td>What are the political barriers and enablers to adopting safer (lower) speed limits?</td>
<td>15</td>
</tr>
<tr>
<td>How can school, undergraduate and professional training of planning, engineering and education professionals be enhanced to advance active transport?</td>
<td>16</td>
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<tr>
<td>What are the minimum levels (quality and amount) of infrastructure required to provide safety and meet the needs of all active transport users?</td>
<td>17</td>
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<tr>
<td>What are the relative contributions of infrastructure, speed limits, education/awareness and programs in influencing modal shift to active transport?</td>
<td>18</td>
</tr>
<tr>
<td>What are the most effective behaviour change interventions to increase active transport in Australia and for whom?</td>
<td>19</td>
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<tr>
<td>Where should active transport infrastructure be implemented for the greatest gains in active transport uptake?</td>
<td>20</td>
</tr>
<tr>
<td>How can public transport service and infrastructure better integrate active transport?</td>
<td>21</td>
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<tr>
<td>What are the barriers and enablers to active transport uptake? How can these barriers be overcome?</td>
<td>22</td>
</tr>
<tr>
<td>What evidence is required to persuade local businesses/traders of the benefits of active transport?</td>
<td>23</td>
</tr>
<tr>
<td>What financial incentives are needed to increase active and public transportation and what financial disincentives are needed to decrease private car use?</td>
<td>24</td>
</tr>
<tr>
<td>What is required to support people in leadership positions to champion and advance active transport?</td>
<td>25</td>
</tr>
<tr>
<td>What are the true costs of motorised transport (to the community and the individual) and should these costs be reflected in user charges?</td>
<td>26</td>
</tr>
</tbody>
</table>

Colours reflect the following themes: 
- Enhancing infrastructure
- Shifting social and cultural norms
- Changing behaviour
- Building capacity
- Improving measurement of benefits
- Enhancing policy, governance and funding
For further information

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