

Agenda

- State of Sustainability results 15 mins
- Choice Modelling study 15 mins
- Questions

State of Sustainability Report 2025

Overview - gas v electric results for:

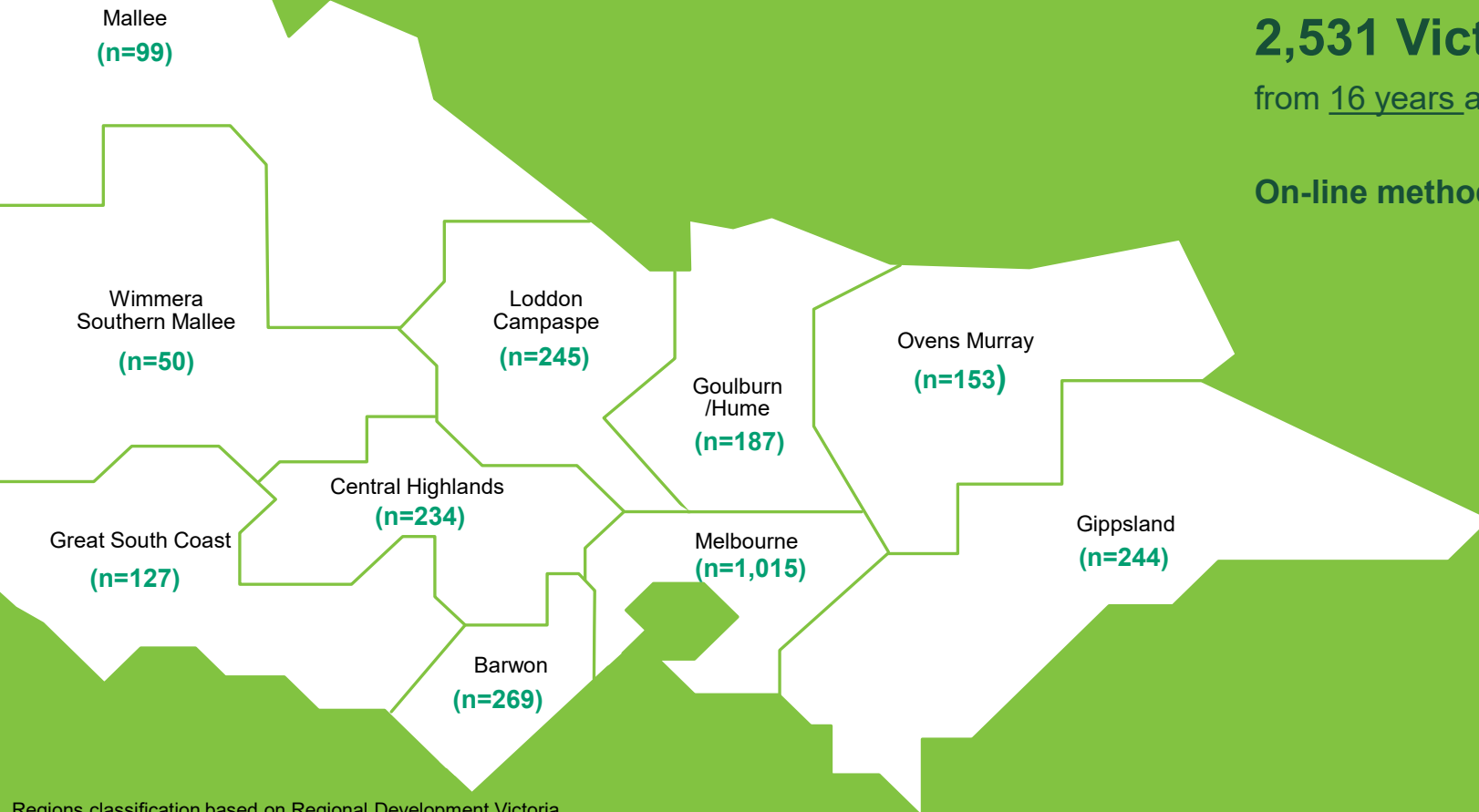
SEC Group - lunch time session
March 2026

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Representative sample
A state-wide sample of
2,531 Victorians
from 16 years and over

On-line methodology



The State of Sustainability Report provides insights on community attitudes and actions

Survey topics 2025



Climate change

Attitudes, level of concern

Impacts – health conditions

Health services used



Sustainable living and circular economy

Understanding of circular economy

Attitudes & behaviours

Repairs deep dive



Urban greening

Access to open space

Support for nature regeneration

Perceived benefits

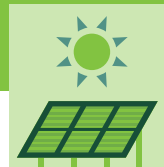


Gas and electricity

Replacement behaviour

Barriers & beliefs

Information sources & influences



Renewable energy

Household uptake

Social licence for infrastructure



Expectations from government



Respondent demographics

Age; Sex;
Location;
Education level;
Own-home/ renters;
Employment;
income; IRSD scale;
Bill-stress indicator

Gas and electricity use

- Figures for gas appliances haven't changed – still high usage of gas
- We see positive shifts in replacement behaviours and around heating

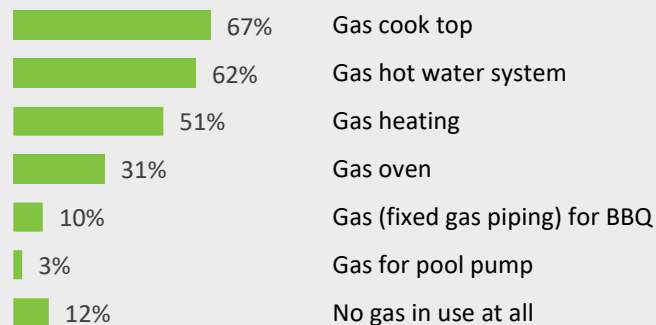
Victoria is the state with the highest gas usage – 88% of respondents use gas

Most have more than one gas appliance in use

40% All gas or mostly gas (same as 2023 and 2024)

Category	Description	% of homes
All gas	All gas appliances - Gas heating - Gas hot water - Gas cook top - Gas oven	13%
Mostly gas	Heating AND hot water is gas	26%
Partly gas	Heating OR hot water is gas	35%
Low level gas	Only cooking is gas	13%
No gas in use	No gas appliances in use	12%

Appliances in use (no real change over last 2 years)



Gas use higher in Melb than regions

Each gas appliance is 5-10 percentage points higher in Melbourne compared to regional Vic.

Renters less likely to have all or mostly gas. 36% v homeowners 43%

D12. In your home, do you have any of the following gas appliances?
Gas cook top; Gas oven; Gas heating; Gas hot water system; Gas for pool pump
Gas (fixed gas piping) for BBQ; Other gas feature (please specify)
No gas at all in use
Bases: 2552



Home owners v renters – a mixed story

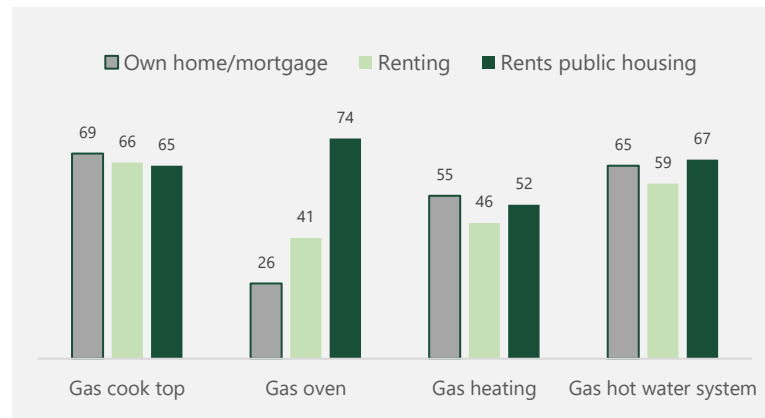
Renters, and renters in public housing, have higher proportions at both ends of the gas dependency scale

- Approx 1 in 5 renters are in homes with all gas appliances, compared to 1 in 10 home-owners
- But they also have slightly higher proportions with no gas, compared to 10% home-owners.

Category	Description	% of homes (average)	Home owners v renters		Public housing renters
			Home-owners	Renters	
All gas	All gas appliances • Gas heating • Gas hot water • Gas cook top • Gas oven	13%	11%	18%	24%
Mostly gas	Heating AND hot water is gas	26%	31%	18%	11%
Partly gas	Heating OR hot water is gas	35%	36%	33%	39%
Low level gas	Only cooking is gas	13%	11%	15%	9%
No gas in use	No gas appliances in use	12%	10%	16%	17%

Gas appliances in use, by home-owners v renters

Public housing renters are more likely to have gas ovens



Gas usage – across regions

Gippsland, Mallee and Wimmera southern Mallee have a higher proportion of homes classified as low or no gas.

	Barwon	Central Highlands	Gippsland	Goulburn	Great South Coast	Loddon Campaspe	Mallee	Ovens Murray	Wimmera Southern Mallee
NET: ALL / MOSTLY GAS	41%	38%	26%	30%	30%	30%	12%	32%	18%
NET: LOW / NO GAS	24%	22%	44%	31%	29%	32%	41%	27%	41%
All gas appliances	13%	12%	9%	11%	7%	7%	4%	11%	4%
Mostly gas - (heating + hot water)	28%	27%	17%	19%	23%	23%	7%	21%	14%
Partly gas - (heating or hot water)	35%	40%	30%	39%	41%	38%	47%	41%	41%
Low - Only cooking gas	10%	12%	15%	14%	12%	15%	14%	15%	10%
No gas appliances	14%	10%	29%	17%	17%	17%	27%	12%	32%
n=	262	228	230	185	125	240	96	150	48

Gas connection type – across regions

D.15 Which of the following describe your gas connection?

[illegible]

Behavioural insight for heating

Although gas fixtures haven't changed – there is change

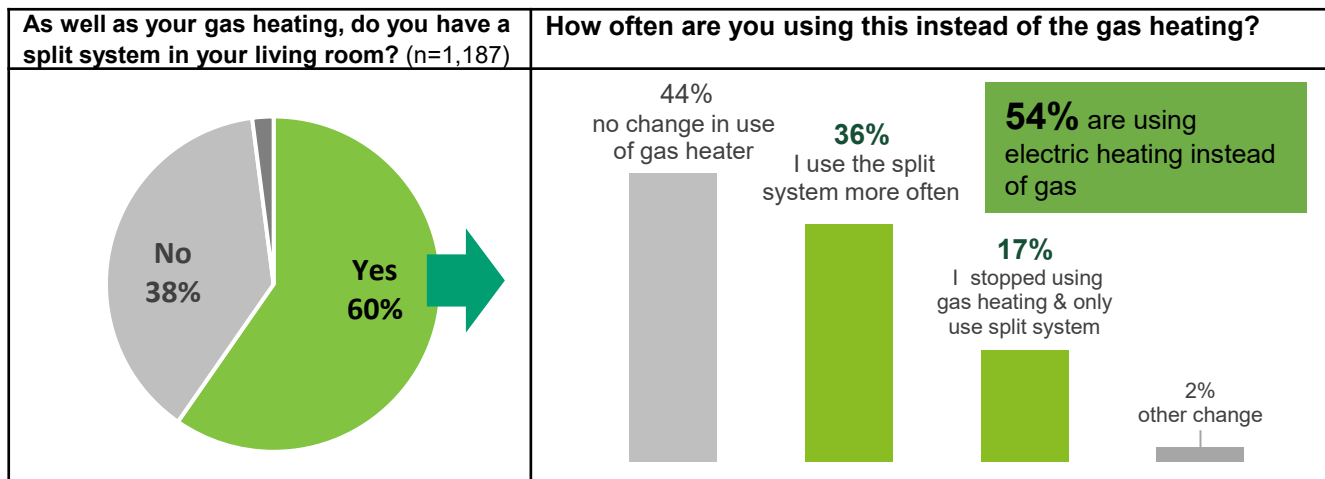
60% With gas heating **also have an electric split system** in the living room

(No big differences between renters & homeowners)

54% Are choosing to use the electric heating more than /instead of gas

(43% for renters)

Interestingly, this behaviour is more common in areas of high advantage (62%) compared to areas of disadvantage (46%)



Willingness



**Attitudes towards
moving away from
fossil fuels**

54%

agree it's important for
households to move
away from fossil fuels
like gas

60% in 2024

65% in 2023

- *Higher for young people: 70%*
- *Lower among the over 55 years: 42%*

**Willingness is
encouraging**

Most

95%

gas users indicated they
would consider switching
one or two appliances

56% **up 3%** from 2024 and 2023

Willing to disconnect
from gas completely

53% in 2024 and 2023



Willingness to switch away from gas, is lower among the over 55's, but they have most gas

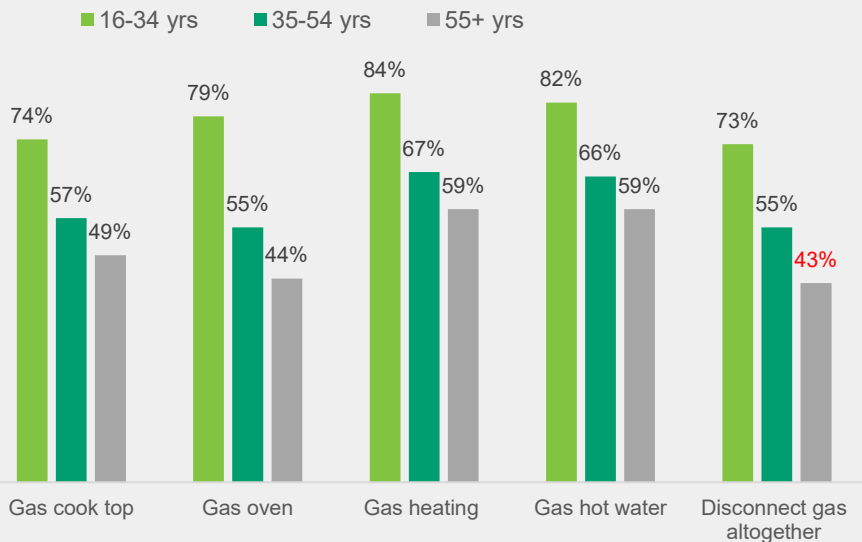
Younger people are more willing to consider changing from gas, and over 55 years less willing.



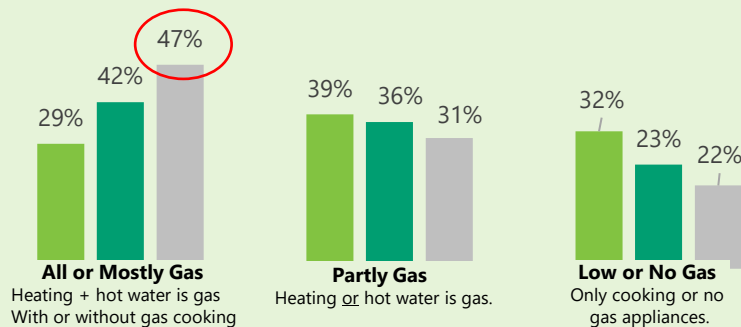
Scale of gas appliances in home

But the over 55's have more gas appliances.
47% are classified as "all or mostly" gas

Willing* to consider switching appliance from gas, by age



16-34 35-54 55+

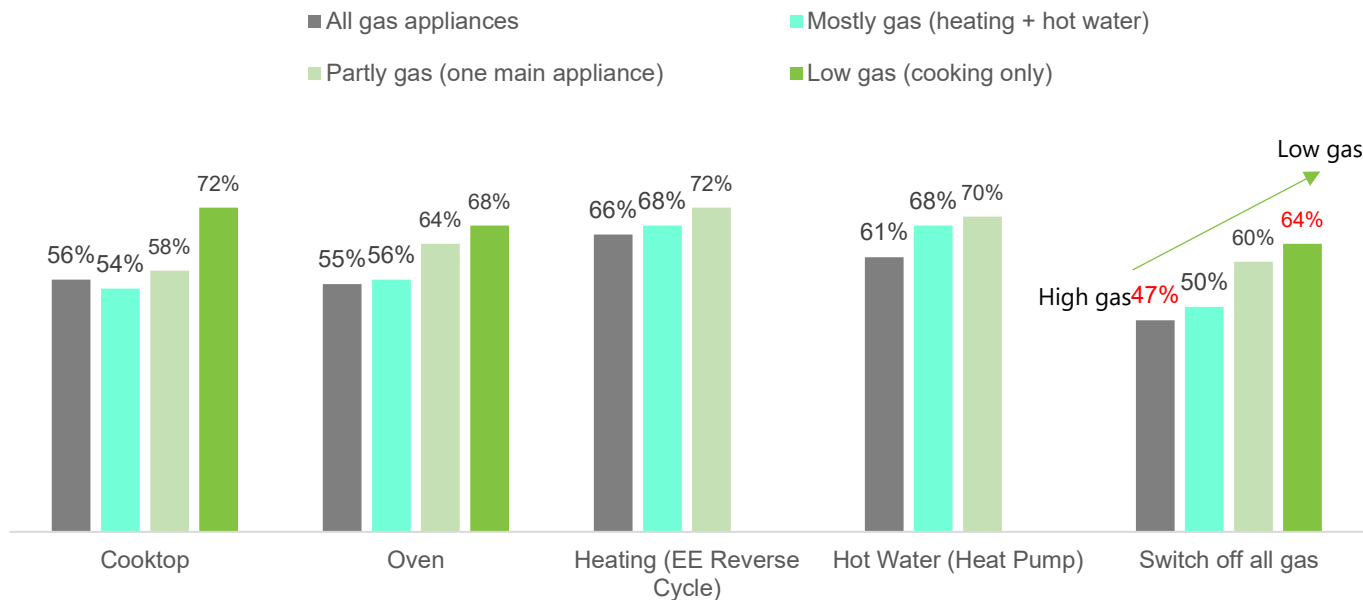


* "Yes" or "maybe" combined
Overall willingness to switch is similar to last year

"No gas" was similar across age group between 12-14%.

Willingness to consider switching changes according to level of gas dependency

Willingness to consider switching each appliance,
% of by level of gas dependency



- Those who have **fewer gas** appliances in their home are **more willing to switch**
- 64% of "low-gas" users are willing to disconnect from gas altogether compared to 47% of "all gas" households.
- Low gas users were also more willing to switch **irrespective of the appliance type**.

Willingness to switch – across regions

D13. If you are currently using gas, would you consider... |

NET: YES + MAYBE by region

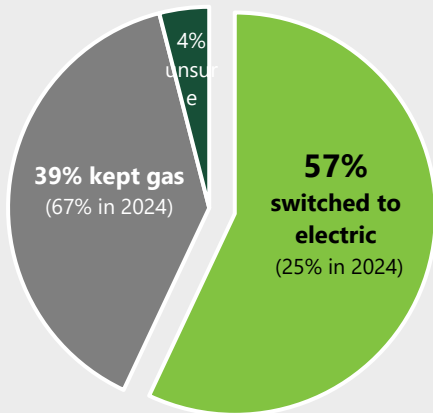
	Barwon	Central Highlands	Gippsland	Goulburn	Great South Coast	Loddon Campaspe	Mallee	Ovens Murray	Wimmera Southern Mallee
Switching to an electric or induction cook top	62%	60%	49%	51%	67%	60%	65%	59%	67%
n=	170	145	122	122	62	156	43	94	25
Switching to an electric oven	60%	58%	63%	55%	75%	65%	67%	62%	93%
	70	76	48	52	35	68	22	49	10
Switching to a reverse cycle heating/cooling system	76%	68%	57%	61%	89%	68%	82%	75%	86%
	131	128	81	75	57	106	26	66	18
Switch to electric or heat pump system	66%	67%	61%	64%	77%	70%	67%	75%	88%
	172	141	107	102	71	130	36	91	17
Disconnecting gas / making your home electric	61%	58%	44%	48%	65%	60%	60%	59%	71%
	230	211	173	154	105	204	70	135	33

Recent replacement behaviours – a positive breakthrough?

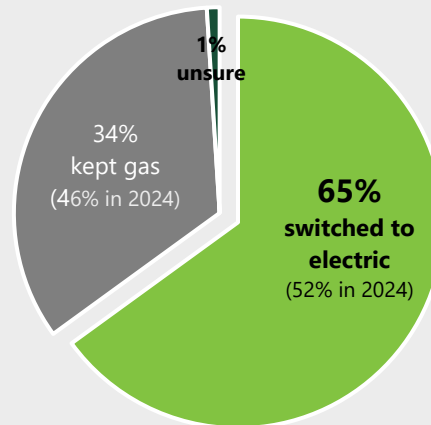
Significant shifts have occurred in replacement behaviours in the past year

- 57% who replaced gas hot water went to electric (compared to 25% last year)
- 65% who changed heating went to electric (compared to 52% last year)

**Replacement behaviour for GAS HOT
WATER system (n=257)**



**Replacement behaviour for GAS HEATING
(n=202)**



Over the last 2 years:

- 16% of Victorians replaced their **hot water system**;
- 9% replaced their **heating**
- 8% replaced both

Of those 125 people who replaced an **electric hot water system**:

- 76% kept electric
- 21% went to gas
- 3% went to something else

Of the 80 people who replaced **electric heating**:

- 73% kept electric
- 20% went to gas
- 7% went to something else

Reasons for switching

Key reasons given for choosing electric

- Government rebates
- Safety considerations / health concerns about gas
- Running costs
- Environmental considerations

"There was an initiative from the government to upgrade."

"Lower running costs with electricity influenced my decision."

"Electric heating appliances produce no direct emissions, which helps to reduce air pollution and greenhouse gas emissions"

"Government rebate and switching from gas to electric"

"Switching to an electric heat appliance made sense. It's better for the environment and pairs well with my rooftop solar panels."

Messaging on energy costs:

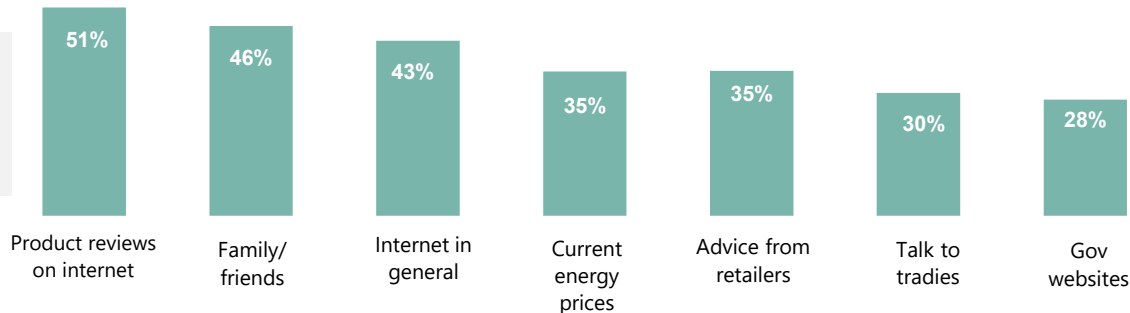
Saying that gas will **cost you \$\$ more** per year than electric
was more effective

than saying that electric will **save you \$\$ per year** compared to gas

Where do they get their information?

Sources of information used by *sole decision makers* (48% of pop'n)

Sole decision makers
are usually younger (four-fifths of them are 16-34 years)

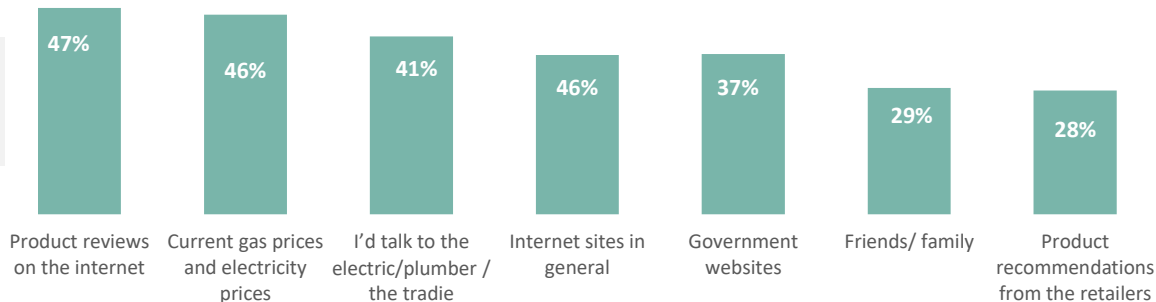


Most influential source?

- Current energy prices
- Tradies recommendations
- Friends /family
- Government websites

Sources of information used by *joint decision makers* (51% of pop'n)

Joint decision making
is most common among those aged 55+ years



Most influential source?

- Current energy prices
- Tradies recommendations
- Retailer recommendations
- Government websites

Impactful actions

2023	2025	Behaviour	I haven't but I'd like to
13%	18%	Did environment volunteering (tree planting, wildlife rescue etc.)	41% <i>45% for women</i>
Not asked	10%	Taken part in a citizen science project (Backyard Bird Count, iNaturalist, Biosecurity Quest etc.)	35%
9%	12%	Switched their bank or super fund to a more environmentally /climate friendly business	25% <i>38% for 16-34 yrs</i>
9%	11%	Contacted their local MP about an environmental issue	25% <i>30% for 16-34 yrs</i>
Not asked	22%	Looked into getting off gas and going all electric	30%

Impactful actions, by region

- Great South Coast have higher take- up of:
- **environmental volunteering;**
 - **citizen science** and
 - **looking into going all electric**

	Barwon	Central Highlands	Gippsland	Goulburn	Great South Coast	Loddon Campaspe	Mallee	Ovens Murray	Wimmera Southern Mallee
Did environmental volunteering	13%	14%	15%	15%	29%	17%	20%	15%	30%
Switched finances to a more pro-environment business	10%	15%	7%	11%	13%	11%	16%	11%	13%
Contacted my local MP about an environmental issue	10%	8%	7%	8%	13%	13%	14%	11%	19%
Took part in a citizen science project	9%	8%	8%	10%	19%	11%	12%	12%	9%
Looked in to going all electric / getting off gas	28%	27%	22%	21%	46%	31%	26%	21%	30%

Renewable energy

- 4 in 10 using renewable energy
- Support for renewable energy infrastructure decreasing most for transmission lines

4 in 10 Victorian households use renewable energy

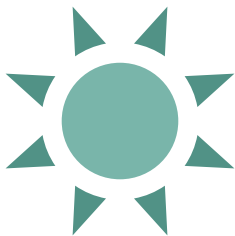
34%

have solar panels
31% in 2023; 29% in 2024

5%

who don't have solar
panels but buy renewable
energy from energy
provider.

*(9% of those with solar panels
also bought renewable energy
but were not double-counted.)*



**More likely
to have solar:**

40% in stand-alone houses

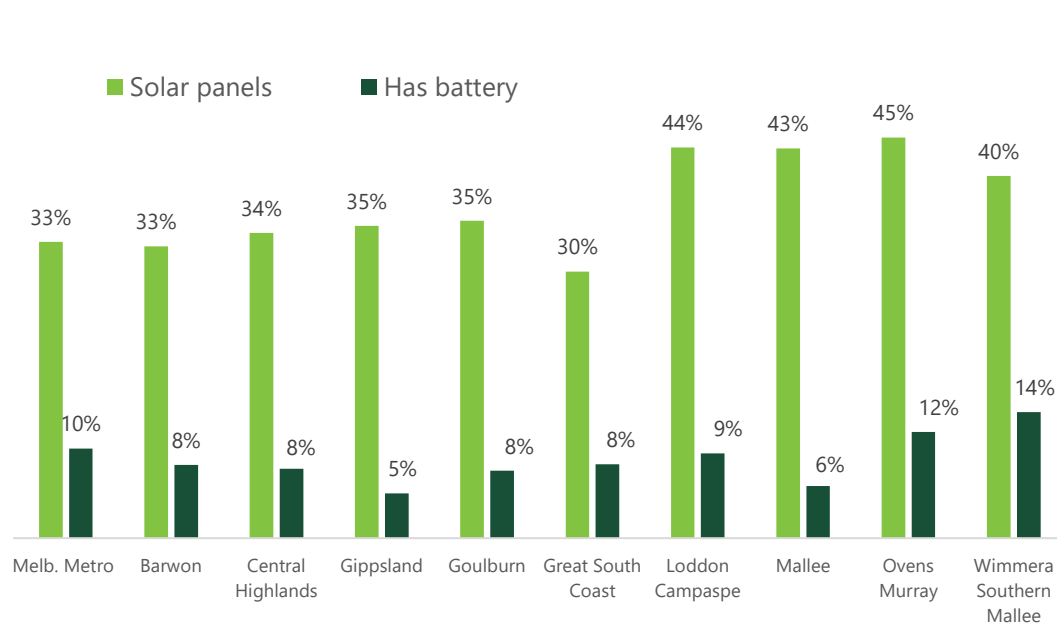
44% homeowners v **9%** renters

9%

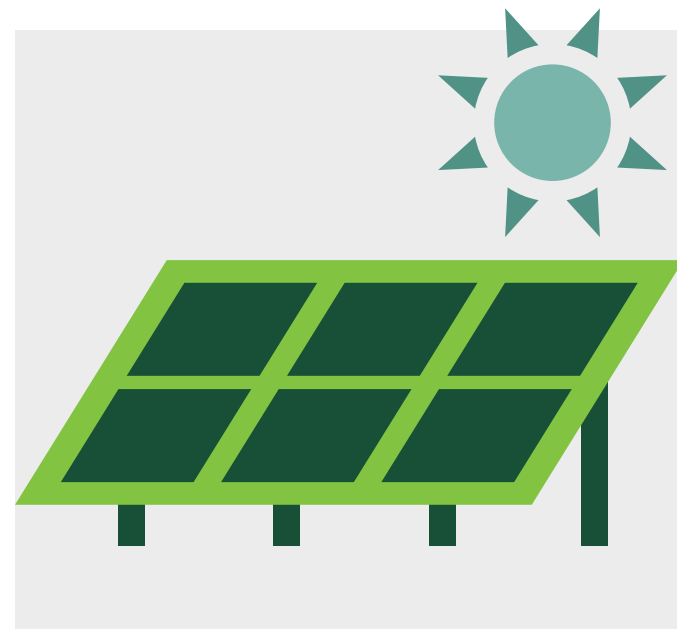
of those with solar
also have a battery

Solar take-up is higher in the regions

Solar panel and battery take-up, by region



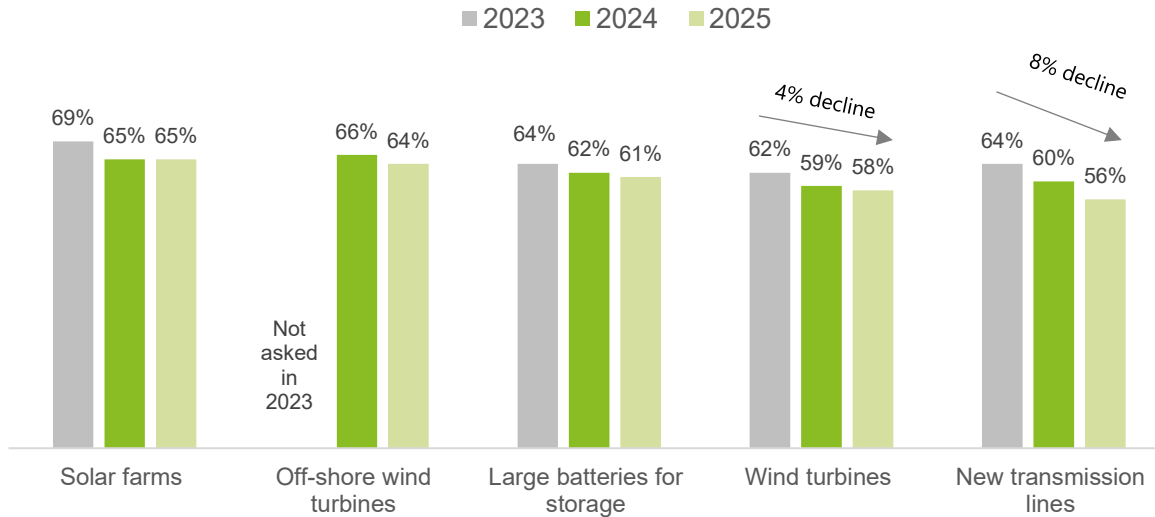
Note: smaller sample sizes in the regions means a lower confidence interval (+/-) and figures will jump a little year on year



The majority of Victorians support renewable energy infrastructure

Support is consistently higher among 16 to 34 year-olds and lower among the 55+ years.

- Older people more likely to have concern about property values (CSIRO) and overall lower pro-environment attitudes compared to younger people



Beliefs about renewable energy / climate change:

41%

Acting on climate change costs too much

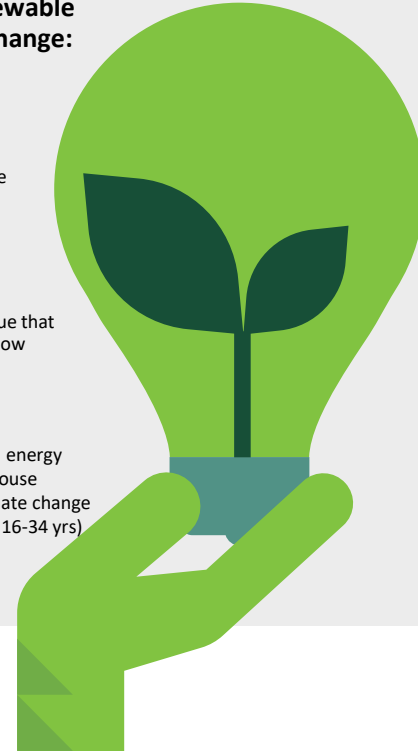
64%

67% 2023

Climate change is an issue that requires urgent action now

60%

The move to renewable energy helps Vic. lower greenhouse emissions and stop climate change getting worse (74% for 16-34 yrs)



D10. For each of the following, please indicate if you already have this in your home, or if you plan to have this within the next two years:

*Solar (or PV) panels to generate electricity

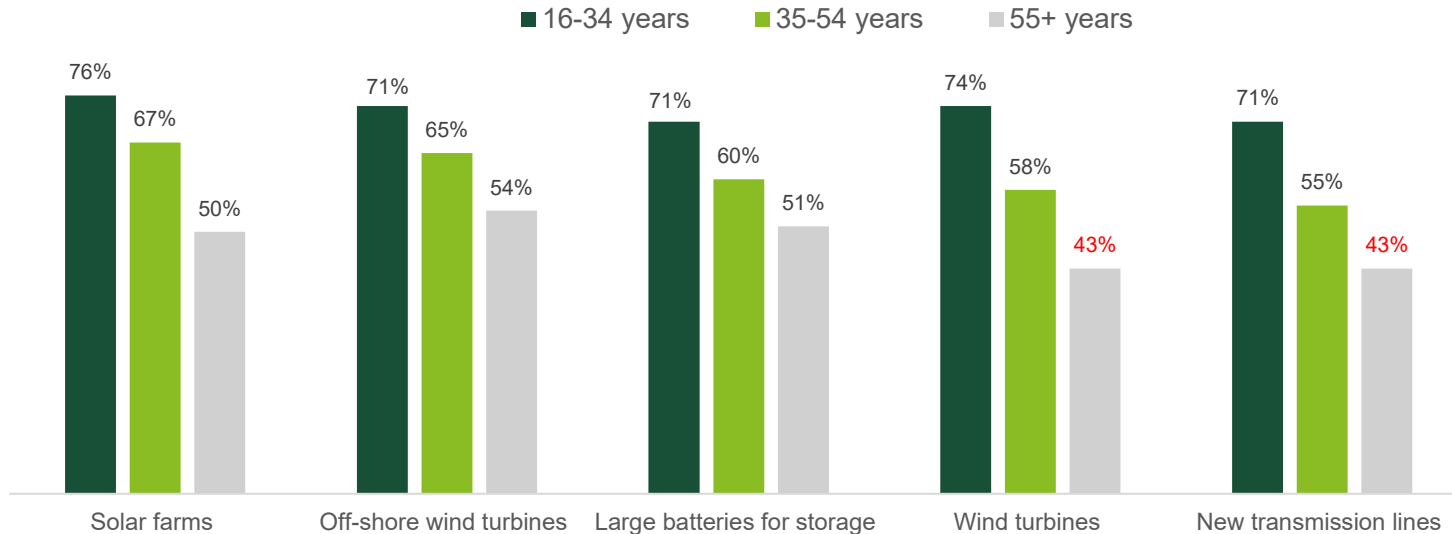
Renewable energy, such as GreenPower, purchased from your electricity retailer

Base: n=2552

D10a. And do you have a home solar battery system connected to your solar panels? Base: (those with solar panels)

Support for renewable energy infrastructure differs across age groups – over 55's less supporting

Willingness to support renewable energy infrastructure, by age



Other differences

Other differences:

Men and more supportive than women:

- off-shore wind, 68% v 61%)
- new transmission lines, 60% v 53%

No differences between metro and regional

No differences between those living in a renewable energy zone and others

Reasons for low support of renewable energy infrastructure

Reasons that were common across all types of infrastructure included:

- negative visual impacts /aesthetic concerns
- loss of agricultural land/natural land
- environmental harms/negative impacts
- non-recyclable waste was also mentioned

Specific to infrastructure type:

- Safety concerns were specific to batteries

Off-shore wind turbines



The whales need the ocean. The turbines emit sonar that causes whales to get disorientated. The turbines leak dangerous chemicals into the ocean.

*They **cost a fortune to build**, they don't last a long time, and the disposal costs are huge as well as to the environment"*

Wind turbines



Cost to maintain and replace

We live in an area that is highly populated by birdlife, large and small. Wind turbines would be disastrous for them."

Large battery storage



A waste of money. They consume natural resources to build, can't be recycled, and have to be thrown away in about 15 years after building

I don't mind roof top solar, But large battery storage - that is completely different. I do not want those around because they aren't safe. They can cause fires.

Solar farms



They don't last a long time

"I don't think such initiative should be in residential areas. I think they are fine if they are located away from the city

unsightly, drop in property values

"i dont want solar farms taking up valuable growing land and creating an eyesore in our beautiful country areas. we need space for animals and vegetation...Put them on buildings in the city, not in our tourist towns that rely on the scenery

Transmission lines



'They are an eyesore on what is supposed to be a beautiful environment. So you are trying to fix one environmental issue by creating two environmental issues.

I think they are ugly, and all transmission should be underground.

Fire risk with sagging lines

Choice Modelling

- Research partners – The Behaviour Architects



Contents

- 1 Introduction
- 2 Energy Attitudes and Perceptions
- 3 Market Activity: Hot Water Systems
- 4 Market Activity: Heating Systems
- 5 Drivers of Switching to Electric Appliances
- 6 Barriers to Choosing Electric Appliances
- 7 The Role of Tradies
- 8 Choice Model Analysis
- 9 Behavioural Strategy

Research aim:

To understand how to accelerate the switch from gas to electric appliances and inform policy, rebates and behaviour change activity.

Specifically:

- to understand the key drivers behind the decision to switch to electric
- to understand which policy levers, messages and rebates design will have most impact on choosing electric

Methodology and sample size

Qualitative research (the understanding)

- 12 in-home depth interviews with recent hot water and heating purchasers
- 8 indepth interviews with tradies (plumbers and electricians) to unpack how professional advice shapes choices

Quantitative research (& choice model)

- Online survey with n=2,016 Victorians
- Sample included only homeowners with a gas connection
- We identified home-owners and investors
- Analysis looks at hh income <\$211k (rebate cut off)

Gas v electricity – beliefs

Gas

- more powerful/ works quicker (over 55's)

Gas is **not**:

- cheaper
- healthier
- better for the environment

50/50

- Efficiency
- Reliability

Rate of change per year / market turn over

- 11% replaced **hot water** in last year
(24% for property investors)
- 12% replaced replace their **heating** system
(29% for property investors)
- Most homes face a replacement decision roughly
 - **every 10 years for hot water**
 - **every 8 years for heating**



A consistent opportunity to shift households to electric systems.



Failing to convince a household of the benefits of electric locks gas in for the next decade.

What prompts replacement? (recoded to single response, slide 22 and 34, v2)

Hot water

- 52% Broken /needs fixing /safety
- **21% Proactive replacement**
- 23% Renovations / new home

Heating

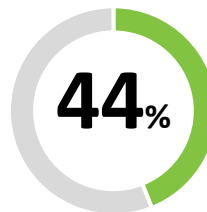
- 59% Broken /needs fixing /safety concerns
- **9% Proactive replacement**
- 26% Renovations / new home

About one in five replaced their hot water systems **proactively**, mainly because their old system becomes costly to run.

These proactive moments are prime opportunities for electrification

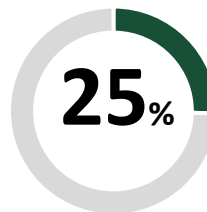
Rebates encourage change

Hot water



44% of homeowners who switched from gas to electric were **prompted** to replace their hot water system to take advantage of government rebates

Heating



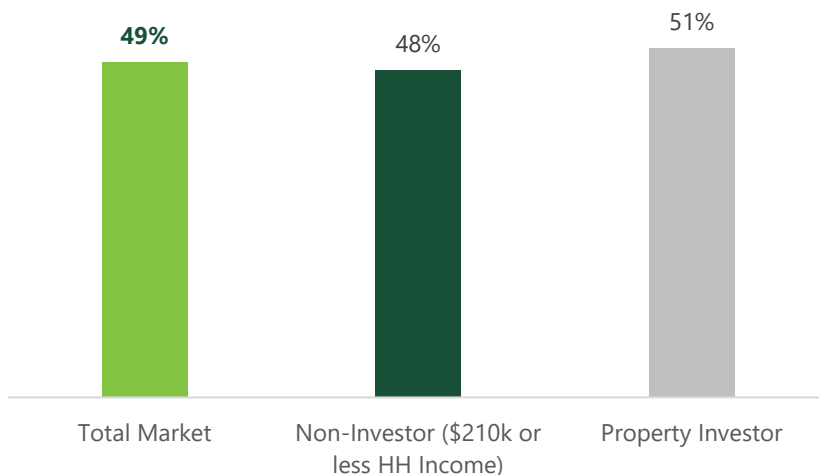
25% of homeowners who switched from gas to electric heating were **prompted** to replace their system to take advantage of government rebates

Replacement: half chose electric instead of gas

Hot water

(replacement behaviour in last year)

Half switched from gas to electric

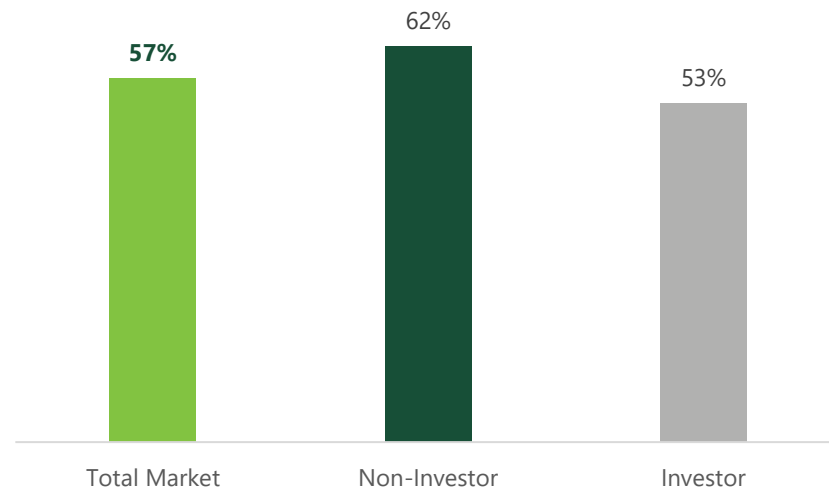


% of Victorians who switched from gas hot water to electric
(amongst those who replaced a hot water system in the last year)

Heating

(replacement behaviour in last year)

57% switched from gas to electric



% of Victorians who switched from gas heating to electric
(amongst those who replaced a heating system in the last year)

Changing to electric takes time to consider

People who choose to switch to electric took more time to make the decision

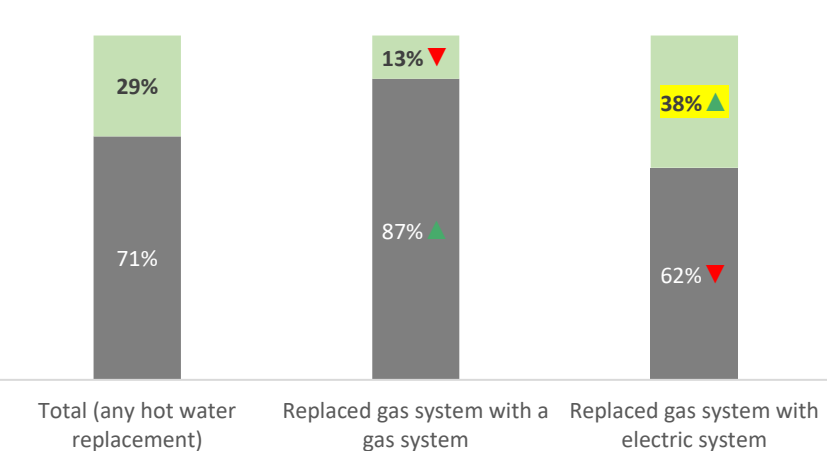
- Most, 87% who chose to replace **gas hot water** with gas, made the decision under a week
- But of those who chose to replace gas with electric, over one-third, 38%, took 2 weeks or more to make the decision

Education needs to start early

- Only 36% are familiar with heat pumps

Hot water

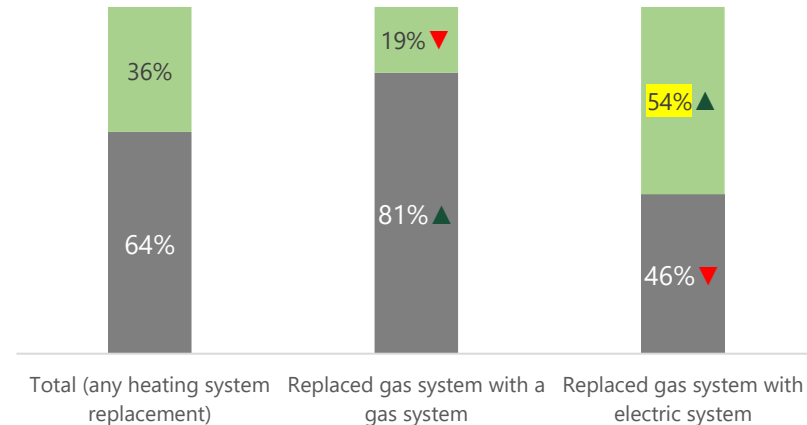
■ NET 1 week or less ■ NET 2 weeks or more



- Most, 81%, who chose to replace **gas heating** with gas, made the decision under a week
- But 54%, of those who chose to replace gas with electric took 2 weeks or more to make the decision

Heating

■ NET 1 week or less ■ NET 2 weeks or more



Tradies have the opportunity to influence decision

Over half of those who replaced an appliance were given recommendations from the tradie

- 56% for hot water, 57% for heating
- No demographic differences here - tradies can influence anyone.

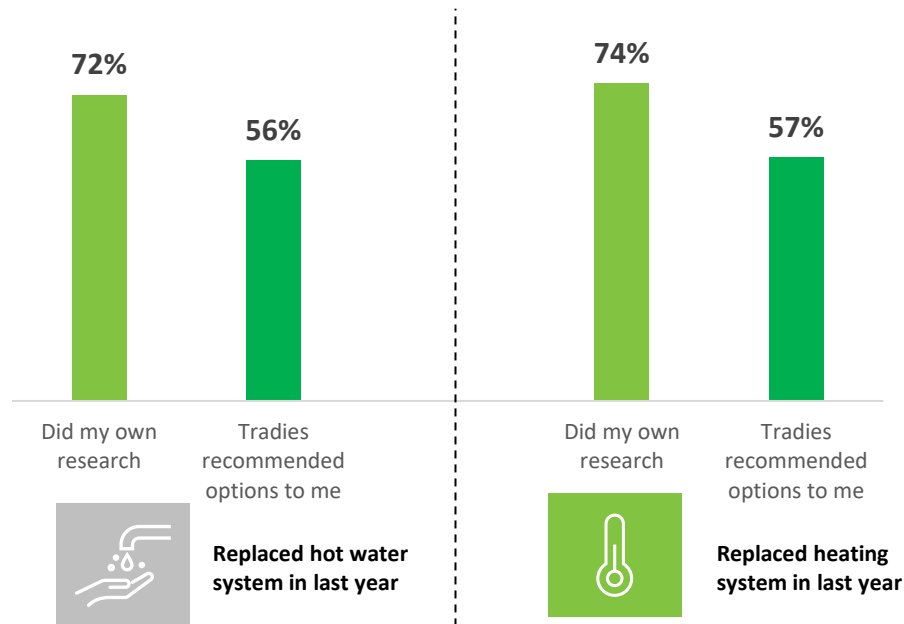
Note that tradie recommendations are not necessarily taken at face value, with three in four Victorians doing their own research before making a decision.



Advice from trusted professionals can be a powerful social trigger, often shaping the decision to go electric in moments where households are uncertain or under pressure.

Tradie recommendations

(amongst those who replaced a hot water system or heating system in the last year)



Summary of factors influencing tradie recommendations

Triggers to recommending electric

- When client priorities align with benefits of electric
e.g. lower running costs or environmental impact
- Contextual cues in the client's home
e.g. other electric appliances, solar
- Awareness of policy changes which signal a move away from gas
e.g. electrification in new builds

When recommending a switch to electric, tradies have ways of highlighting the benefits – e.g. **demonstrating long-term savings using online tools**; or explaining rebate options to **reduce salience of the upfront cost**

Barriers to recommending electric

- Upfront costs are too high for some
e.g. when rewiring is required
- Landlords and real estate agents are reluctant to pay more than necessary
- In urgent scenarios, clients typically want the fastest option – which is often a like-for-like gas replacement
- Clients who have had no issues with gas often prefer it
- Some clients and tradies have **negative perceptions of electric appliances**, particularly the performance and reliability of heat pumps

Whereas **running costs influence people to switch to electric**, it's the **installation costs that drive people to choose gas hot water systems**

"Once you do the numbers with the client, it's a no brainer. If your bill is over \$6,000 with gas and electricity, you save money by changing. We had pushback at the start but I've never had anyone call me and say that we were wrong once it's done. Not one. And I reckon we've done around 150."

Licensed electrician, Heating/Cooling, 18 years industry experience

"If I want to switch from gas to electric, I need a sparky and it's more of a headache in that I have to arrange for an electrician to get the connection to the electric point."

Licensed plumber with refrigerant handling qualification, Hot water systems, 7 yrs experience



8a. Choice Model Analysis: Hot Water

Audience: Owner-Occupiers; HH Income \$210k or Less

Analysis: Purchases for their own home (not investment property)

There are 3 key measures generated from the modelling, each allowing us to gather different insights

Market Size

This is the predicted proportion of households who will take-up a hot water appliance in the next year based on any given scenario.

It reflects how the market could grow or shrink depending on changing market conditions.

Appliance Adoption

This is the predicted proportion of households who will take-up a heat-pump or other appliance in the next year in that scenario.

It reflects both the attractiveness of the heat-pumps as well any changes to market size.

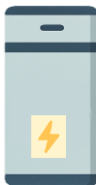
Share of Market

Out of the total market, what % of households would take-up a heat-pump or other options in that scenario.

This metric provides a simple way to compare uptake across scenarios. However, it does not account for changes in overall market size, meaning shifts in absolute demand may be hidden.



The modelling predicts take-up of each appliance based on installation costs / rebates and average running costs

BASECASE						
1	Hot water type					
		Gas Storage	Gas Continuous Flow (Instant)	Electric Heat-Pump	Electric Continuous Flow (Instant)	Electric Hot Water (Storage)
2	Installation Cost (included Appliance)	\$1,680	\$1,640	\$5,380	\$2,691	\$1,660
3	Rebate	-	-	\$2,355*	-	-
4	Average Annual Running Costs	\$595	\$449	\$285	\$755	\$693
7	Heater Availability	Immediate	Immediate	Immediate	Immediate	Immediate
8	Rebate Availability			No known timeframe		
9	Heater Warranty (reliability)	5 years	5 years	5 years	5 years	5 years

Basecase:

The base-case reflects current market conditions and allows us to model how Victorians are likely to choose hot water appliances today, without any policy or market changes. This provides a benchmark for understanding existing demand and decision-making patterns.

Means-tested scenarios:

The subsequent scenarios focus exclusively on Victorians who fall below the \$211k means-testing threshold, ensuring they are eligible for rebates. This allows us to evaluate how incentive-eligible households would respond under different policy and market settings.

Assumptions of the basecase:

- 100% awareness of all combined rebates
- Easily accessible rebates
- Knowledge of annual running costs for each appliance
- How long the rebate will exist is unknown
- All attributes are controlled for by keeping them the same across appliances

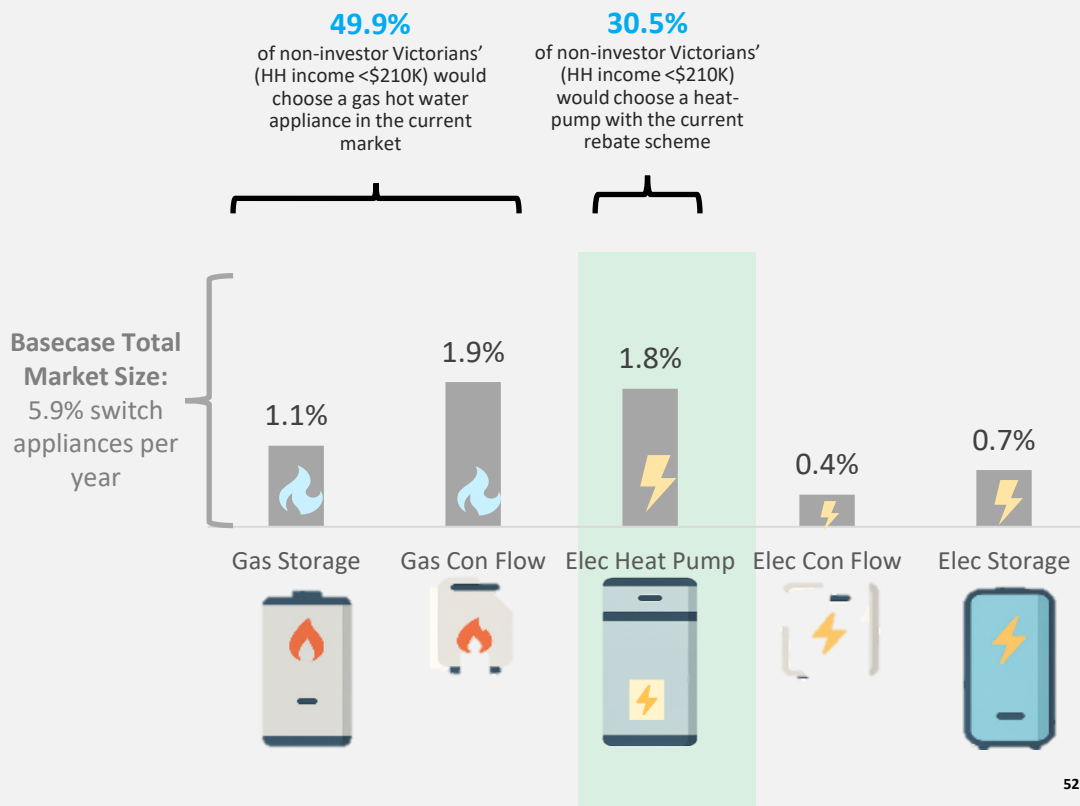
In a transparent market the uptake of electrical appliances is half

Amongst the 5.9% of people who are upgrading their appliance per year; **50% indicated they will choose an electrical appliance with the current rebate system.**

This assumes that people are aware of the rebates and are not being persuaded by tradespeople to buy a gas appliance

Scenario: Basecase

Owner-Occupiers (HH Income \$210k or Less) - % who selected each HW Appliance

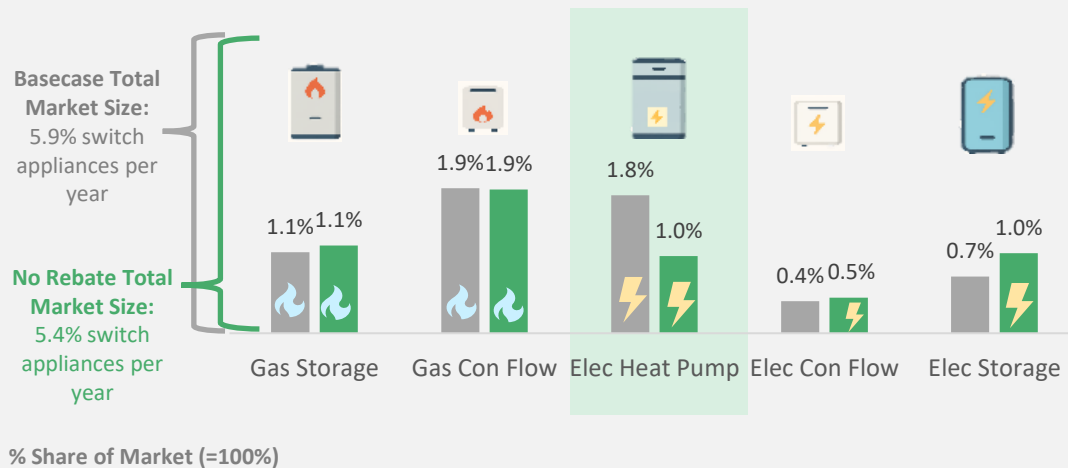


Rebates matter: market reduces slightly and electric heat pump demand collapses with no rebates

Heat pump demand drops sharply (from 30.5 to 18.2%) without support, meaning rebates are essential to maintain momentum in electric hot water uptake.

Scenario: Basecase vs No Rebates Available

Owner-Occupiers (HH Income \$210k or Less) - % who selected each HW Appliance



Basecase	17.9%	32.0%	30.5%	7.1%	12.5%
No Rebates	20.7%	33.9%	18.2%	8.4%	18.9%

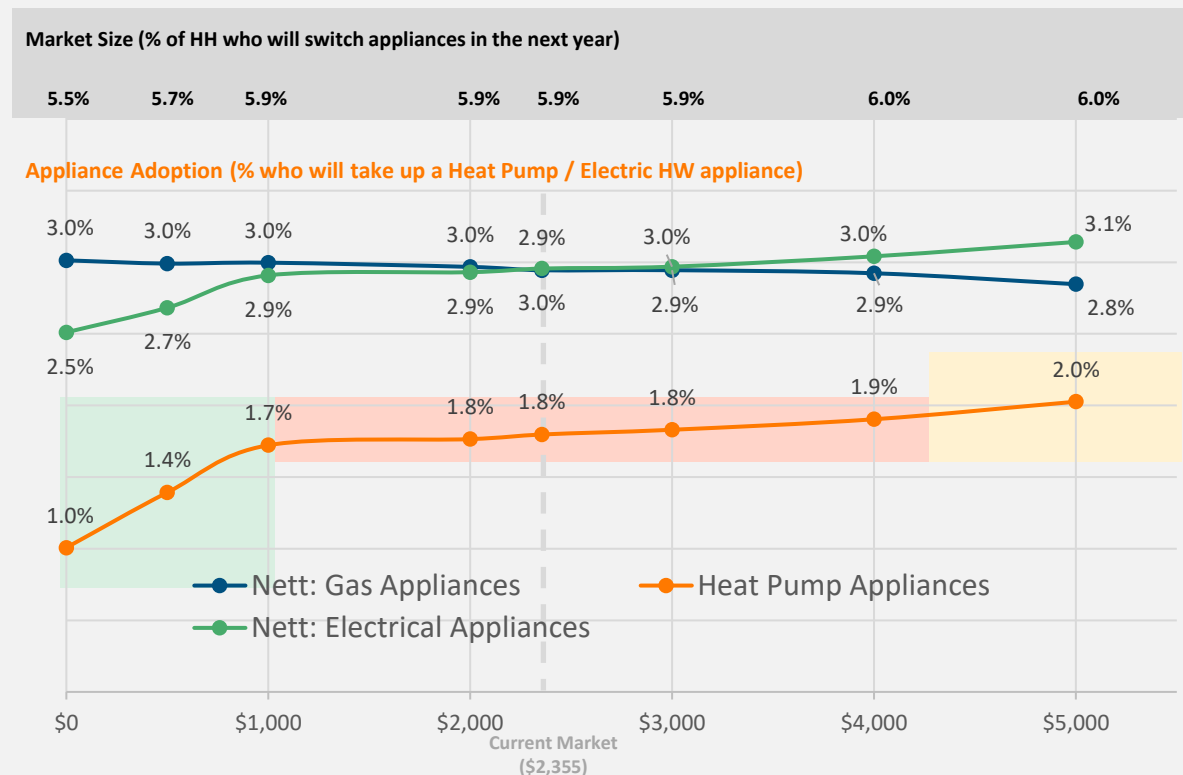
Rebate value plateaus, but dropping below \$1,000 risks backlash

Rebates above \$1,000 do not significantly increase take-up, showing diminishing returns at higher levels.

However, with rebates scheduled to decrease and mandatory electric heat pump switching approaching in 2027, reducing support below one thousand dollars risks resistance and backlash from households who feel forced to pay more for compliance.

Scenario: Basecase vs Varying Rebates

Owner-Occupiers (HH Income \$210k or Less) - % who selected each HW Appliance



Source: Choice Model Analysis. Base: Owner-Occupiers; HH Income \$210k or Less - non-investment property results (N=828)

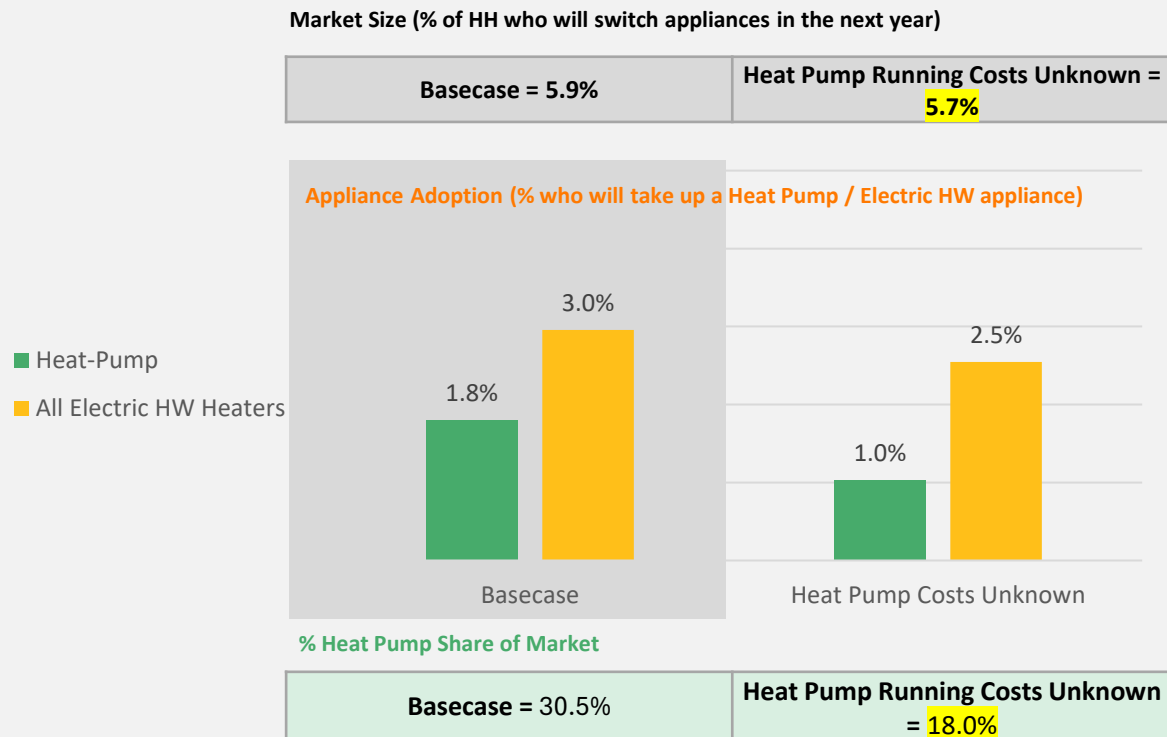
Efficiency: Unclear running costs significantly reduce heat pump willingness to switch

When consumers do not know the annual running cost of heat pumps, but can see the costs for other systems, heat pump adoption drops sharply.

This shows the critical importance of clearly communicating bill savings and annual running costs relative to gas alternatives at every decision point.

Scenario: Basecase vs. Running Costs of Heat-Pump are Unknown

Owner-Occupiers (HH Income \$210k or Less) - % who selected each HW Appliance



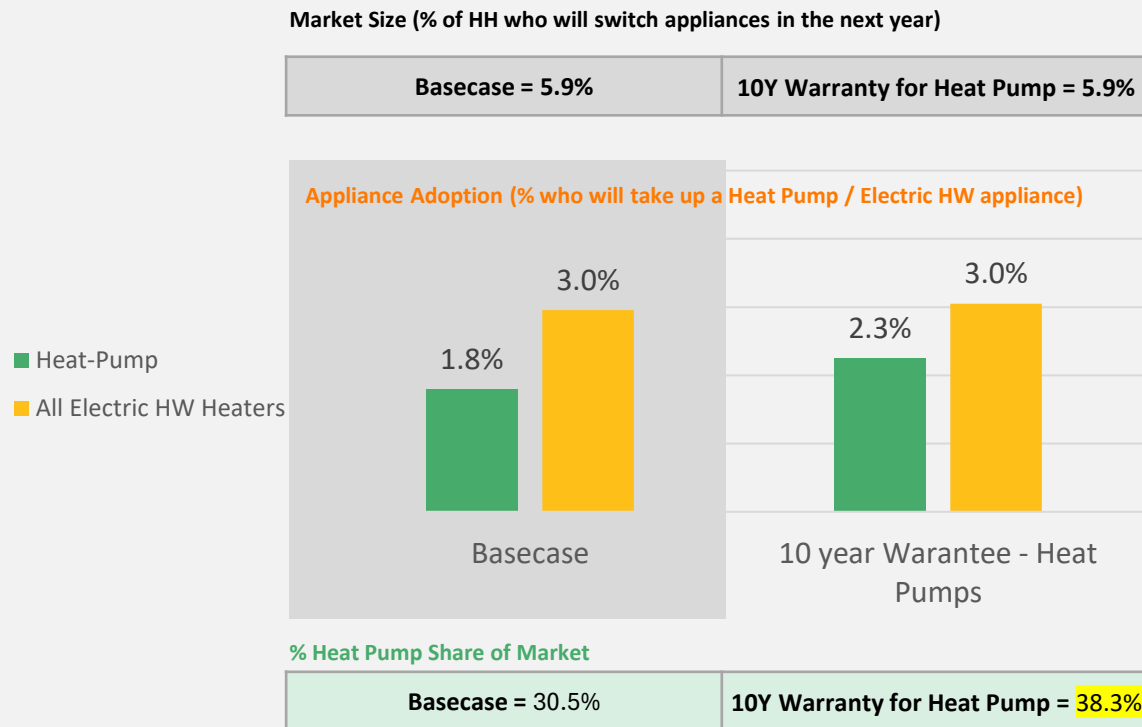
Source: Choice Model Analysis. Base: Owner-Occupiers; HH Income \$210k or Less - non-investment property results (N=828)

Reliability: Long warranties reassure consumers and neutralise heat pump reliability concerns

Reliability hesitation remains a barrier for heat pump adoption.

Anchoring people to long warranties and showing that these appliances are backed for many years builds confidence and positions heat pumps as equally reliable to gas, helping to maximise heat pump adoption.

Scenario: Basecase vs. Running Costs of All HW Heaters are Unknown Owner-Occupiers (HH Income \$210k or Less) - % who selected each HW Appliance



Reliability and health messages most effective at driving heat pump choice

Comparative messages that highlight heat pumps as more reliable, healthier, more efficient and better for the environment help shift consumers toward electric hot water.

Reliability and health messages are the strongest drivers of both **conversion** and **marginal market growth**, so these should feature in broad communications and be clearly visible at point of sale.

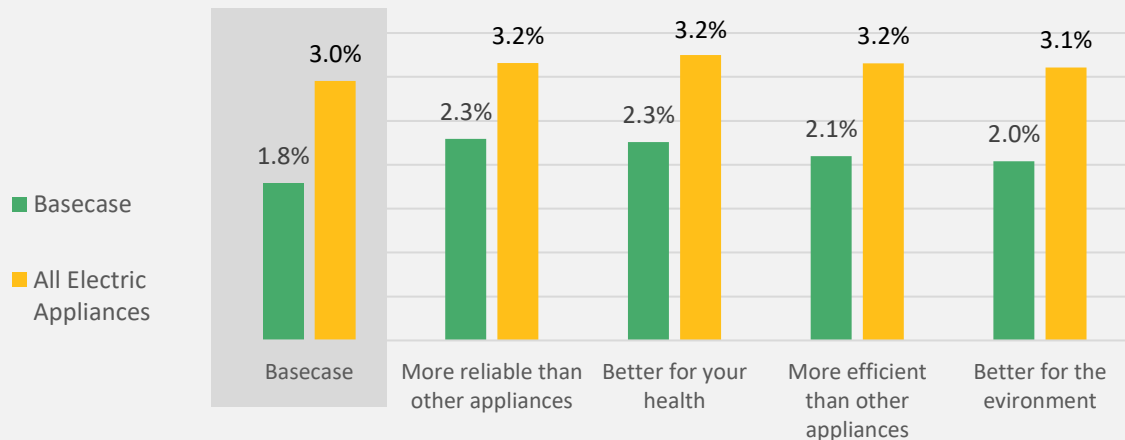
Scenario: Basecase vs. Messaging on Heat Pump HW Appliances

Owner-Occupiers (HH Income \$210k or Less) - % who selected each HW Appliance

Market Size (% of HH who will switch appliances in the next year)

5.9%	6.0%	6.1%	6.0%	5.9%
------	------	------	------	------

Appliance Adoption (% who will take up a Heat Pump / Electric HW appliance)



% Heat Pump Share of Market

30.5%	37.9%	37.1%	35.1%	34.4%
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Choice modelling findings for heating – impacts of variables

Variable	Market size	Gas share of market	Electric share of market (total)	Comment
*Base case / as is now	6.1%	14.9%	85.1%	Of the 6.1% of people upgrading their appliance per year; only 15% would keep gas. (*assumes awareness of running costs and rebates)
No rebates	5.2%	21.5%	78.5%	The market shrinks by 14.6% without rebates; with RCA demand dropping off
Running costs of RCA/split system are not known (Efficiency)	5.7%	23.3%	76.7%	Unknown running costs of RCA marginally reduce market size and weaken RCA appeal
10-year warranty on RCAs	6.3%	12.8%	87.2%	Ten-year warranty messaging boosts heating slightly, less than hot water
Gas phase out by 2027 messaging	6.2%	18.5%	81.5%	Gas phase-out messaging triggers rush to gas and marginal market growth

NOTE on testing influence of tradies and the choice model

“Tradie recommendation” was also tested but we found that consumers did not appear especially sensitive to tradie recommendations *in the choice model*. However, their influence is likely to be understated in this particular methodology, given what we heard about how decision making actually unfolds.

This is to do with timing.

In many cases, tradies make a recommendation before consumers begin actively evaluating their options. This has two important consequences. First, it can narrow the decision set from the outset. Second, it can mean consumers only ever consider gas options, rather than genuinely weighing up heat pump alternatives.

In the choice model exercise, when the consumer has ALL the other important variables in front of them, it seems the tradie influence is minimised. BUT in the “real world”, many consumers are getting their tradie recommendations BEFORE they see all the other objective data that will help them make a decision. The tradie – the trusted expert – makes it easy for them!

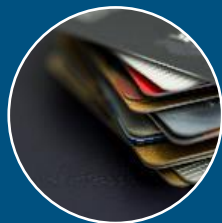
To successfully achieve the mission, a number of key barriers need to be overcome

Victorian homeowners do not electrify simply because it is better for the environment.

They electrify when it becomes **easier**, **cheaper**, and **more certain** than staying with gas appliances.



People think gas is “more reliable” than electricity



Upfront cost remains the dominant barrier to electrification



Confusion and complexity reduce action and create inertia



Trusted advice from tradies and practical proof points drive uptake



Rebates are effective, but complex



When people respond to gas appliance failures they tend to seek out gas experts



People often prefer electric, they just need a little nudge

There are 8 core areas of focus for the strategy

1

Make
electrification
compelling

2

Make the journey
clear and simple

3

Design rebates
to ensure
cost effective
demand

4

Build capability and
supply readiness

5

Strengthen
confidence
(and pride) in
electrification

6

Manage
investors through
rental agents

7

Encourage
tradies
to recommend

8

Governance and
partnerships

1. Make Electrification Compelling

Strategic Overview:

- Frame electrification as the modern, smart and healthy home choice that delivers comfort, control and lower ongoing bills.
- Make bill efficiency of and the reliability of appliances clear and visible.

Key Insights:

- People already prefer electric hot water and strongly prefer electric RCAs, but this does not always translate into purchase
- Reasons to purchase an electric appliance include; cheaper bills, health benefits and environmental benefits
- We must disrupt beliefs that gas is more powerful and reliable, and that heat pumps work less efficiently in colder climates like Victoria
- Solar and battery pairing with electrical appliances are a major reason to go electric

Initiatives:

- Statewide narrative positioning electrification as the new normal for Victorian homes (show trends (i.e. dynamic social norms) of household electric take-up).
- References to modern homes being all electric. Show modern households alongside other new electrical technologies (latest TVs, home assistants, security etc.)
- Provide clear cost saving messages showing percentage reduction in annual bills
- Health messaging, especially for families and asthma households
- Pair solar and battery comms via messaging such as “powering your hot water / heating from your roof”
- Pair hot water rebates with solar / battery rebates
- Provide real-world performance evidence in cold climates
- Highlight ten-year warranties to anchor reliability and confidence
- Generate local case studies and neighbourhood adoption stories



Thank you

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Sustainability Victoria



Summary of insights – energy focus



Prioritisation of climate change slips further - yet the majority of Victorians still concerned about climate change and support ongoing action



Use of shared services is growing, with young Victorians using these types of services at double the rate of older Victorians



88% of homes still use gas but heating behaviours and figures for 'actual' replacement of gas appliances looks promising



Support for renewable energy infrastructure remains around 60% but the attitudinal gap between young and older generations widens

Summary of insights – CE focus



Prioritisation of climate change slips further - yet the majority of Victorians still concerned about climate change and support ongoing action



Use of shared services (borrowing, leasing, hiring) is growing, with young Victorians using these types of services at double the rate of older Victorians



Good levels of trust in recycling & in recycled products, but there's scepticism for general "environmental" claims made by brands.



82% of Victorians see urban green spaces as "essential infrastructure", and there is strong social licence to regenerate and repair environmental damage.

Climate change

- Climate change prioritisation continues to slip
- Almost half of Victorians have recorded a health condition linked to climate change

Almost one-quarter of Victorians rank climate change in the top three priority issues

19%

Victorians

ranked climate change in the top three issues of importance

26% in 2023

23% in 2024

8%

Victorians

ranked climate change as the top priority issue

11% in 2023

8% in 2024

The cost of living is too high, too many problems to worry about climate change



1 cost of living



2 Housing cost



3 Healthcare



4 Roads & transport



5 The job market/employment



6 Climate change

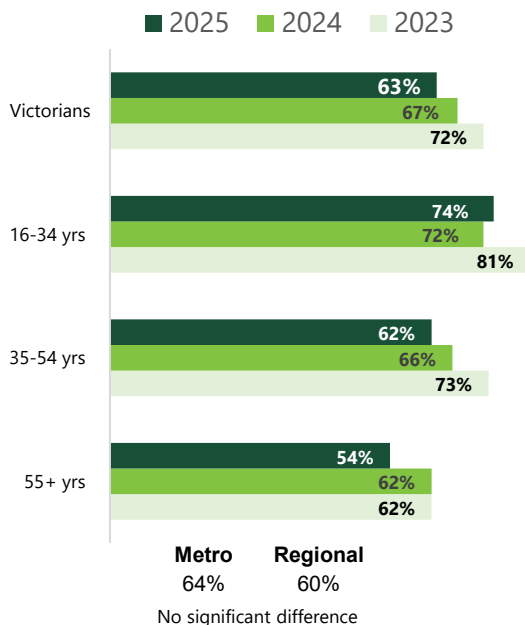


7 Education

63% of Victorians are concerned about climate change

Concern about climate change

(fairly or very concerned)



Say that their concern has increased over the last year

Higher among 16-34 year, 39%

31%

Victorians

35% in 2024



Reasons for increasing concern:



Catastrophic climate events



Changing weather patterns



Lack of local and international government action

"The lack of action by our government (in fact they have gone backwards by continuing to fund gas projects) and the return of Trump"

"...our climate is changing quite dramatically and especially the way it has become warmer and with more catastrophic climate events such as floods, fires, cyclones, hurricanes and extreme heat waves."

A4. How concerned, if at all, are you about climate change?

Base: All respondents 2023 n=2,510, 2024 n=2,552

A5. Which of the following best describes your attitude to climate change over the past year?

Base: All respondents 2024 n=2,552

A6. What is the main reason for the change in your attitude to climate change?

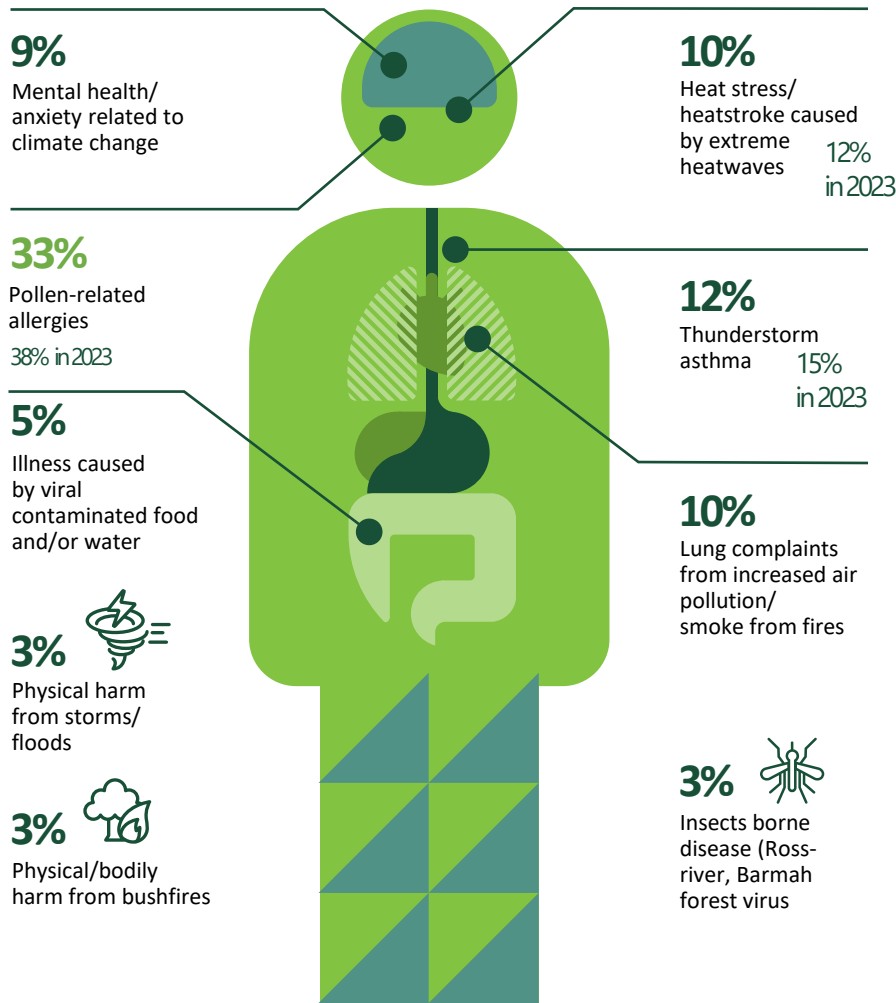
Base: all who registered a change in attitude

Almost half of Victorians have experienced a health condition linked to climate change

Self or family member has had health condition linked to climate change

Total
48% (Experienced at least 1 condition)

- Higher for young people: 60% of 16-34 year-olds
- Higher among those with bill stress: 62%
- Higher among women: 51% vs 45% men
- No differences across Melbourne and regional Vic



Health impacts of climate change and sources of medical assistance.

Most went to the pharmacist for pollen-related impacts

HEALTH IMPACT		SOURCE OF MEDICAL ASSISTANCE FOR THOSE EXPERIENCED THE HEALTH IMPACTS - 2025				
		 GP/LOCAL MEDICAL CENTRE	 PHARMACISTS	 HOSPITALS	 AMBULANCE	 DIDN'T SEEK MEDICAL HELP
Pollen-related allergies	33%	24%	41%	6%	3%	40%
Thunderstorm asthma	12%	29%	21%	17%	7%	41%
Heat stress or heatstroke caused by extreme heatwaves	10%	25%	12%	19%	8%	56%
Lung complaints (e.g.: asthma, lung disease)	10%	43%	20%	23%	8%	25%
Mental illness /depression or severe anxiety related to climate change / climate-anxiety	9%	50%	18%	18%	9%	34%
Illness caused by food and/or water contaminated by harmful bacteria or viruses	5%	50%	28%	26%	5%	19%
Physical / bodily harm from severe storms and/or flooding	3%	24%	25%	18%	15%	34%
Diseases carried by insects (Ross-river, Barmah forest virus, Buruli ulcer)	3%	39%	23%	40%	23%	17%
Physical /bodily harm from bushfires	3%	25%	18%	32%	29%	40%
None of these	52%					

I1. Have you or any of your family been directly affected by any of the following over the past few years (or currently)?

Note: I1 was asked to all respondents in 2025, while only to a partial sample in 2023. Base: 2023 n=623, 2025 n=2,531

I1A. And thinking about the most recent time you were affected by [SELECTED AT I1], did you seek medical assistance from any other following services? Note: new question added in 2025

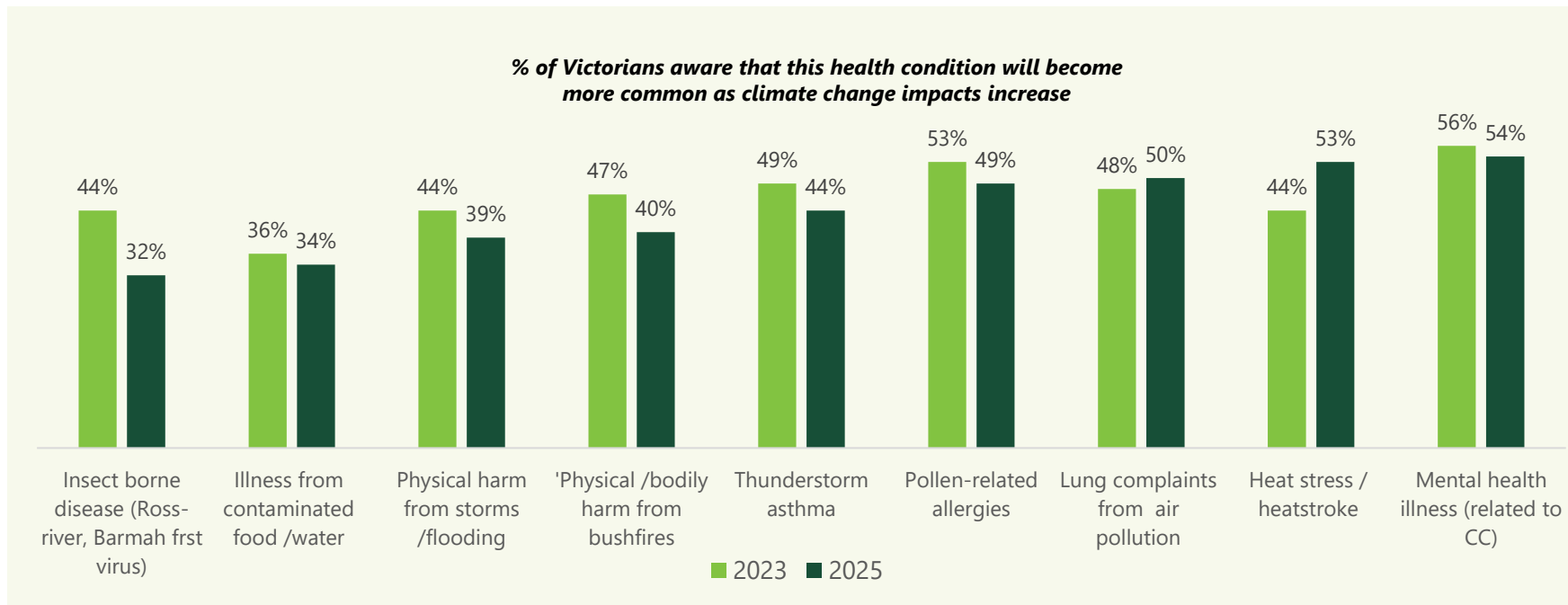
Base: Respondents have impacted or have family members being impacted by health issues 2025 n varies from 64 to 827

  Significantly higher/lower than previous year at 95% CI

Public awareness of health conditions likely to become more common due to climate change impacts is low

Most healthcare professionals agree that these health conditions will become more common as climate change impacts increase

Increased awareness of these conditions – and how to protect against them – is needed across the community



Sustainable living and the circular economy

- Positive attitude to living sustainably is consistently held across demographic groups and regions
- Participation in circular behaviours continues to increase

Victorians continue to value living sustainably



69%

Believe that living sustainably is important and

- 68% in 2024
- 70% in 2023

58%

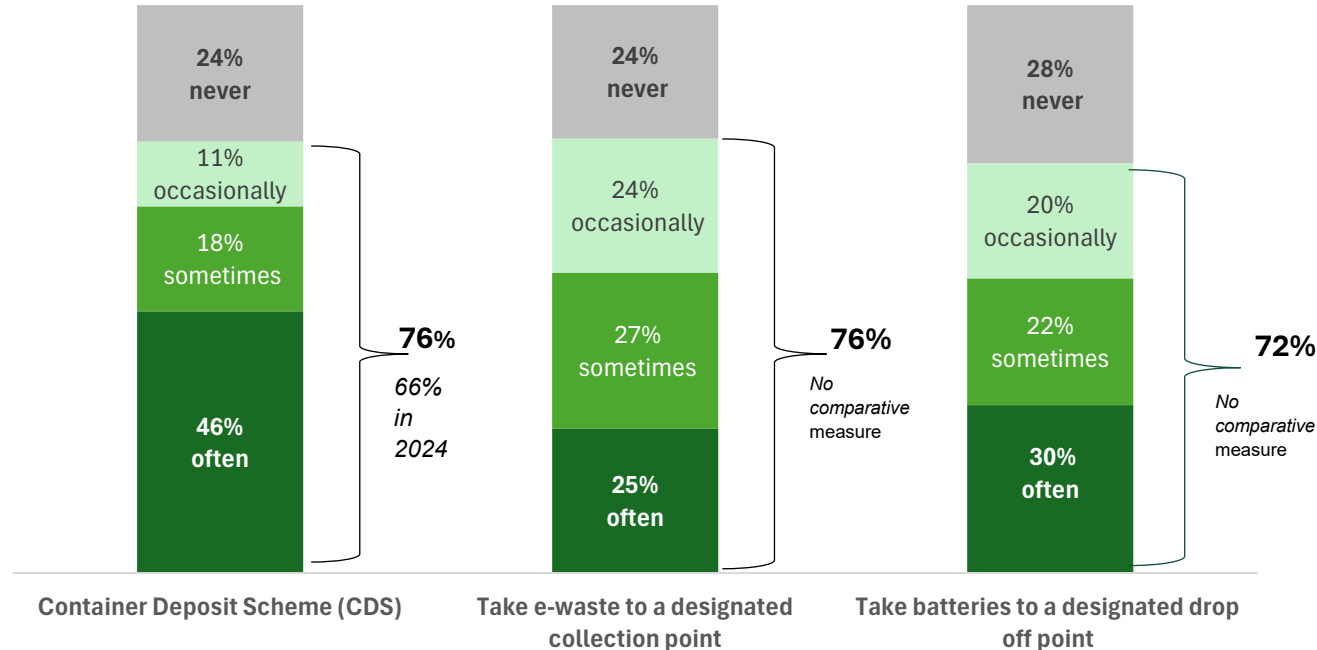
Trying to buy less to reduce their impact on the environment

Behaviours	Total Vic	Believe it's important to live sustainably	Have been trying to buy less	Experiencing bill stress
Re-use / buying less / using sharing services				
Buy/sell /donate second hand items	87%	91%	92%	91%
Used a repair centre, local repair café or professional repair service	31%	34%	38%	31%
Buy repaired/ refurbished electronic devices, rather than buying new ones	28%	31%	35%	37%
Borrow toys from a toy library	20%	25%	26%	13%
Hire or lease baby clothes, nappies kids' equipment	16%	20%	24%	22%
I use a car share scheme	15%	17%	20%	15%
Borrow tools from a tool library	14%	17%	21%	14%
Recycling, extending life				
Has returned containers/have used CDS	76%	79%	80%	76%
Has taken e-waste to a designated collection point	76%	84%	85%	75%
Takes batteries to a designated collection point	72%	79%	79%	65%
Choose products that contain recycled content	63%	71%	75%	68%

Most Victorians use government-initiated recycling programs



Participation in recycling initiatives



CDS usage

*No correlation w/
kerb side glass bin
availability*

*Good usage across the
regions*

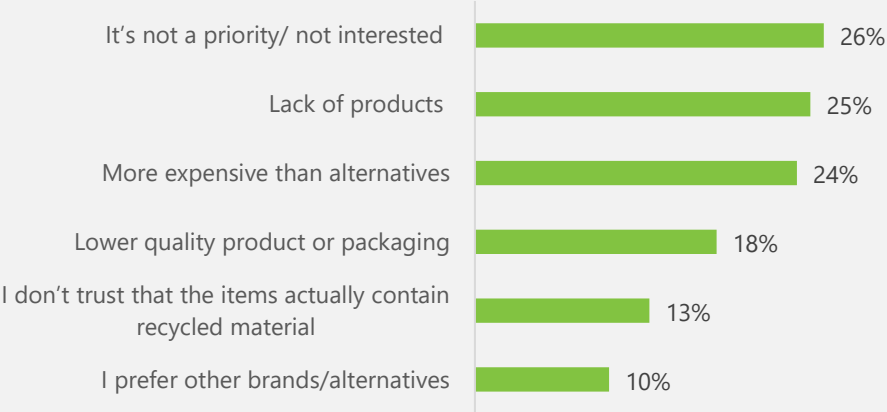
E-waste and battery drop-off

*Higher usage among
the over 55-yars*

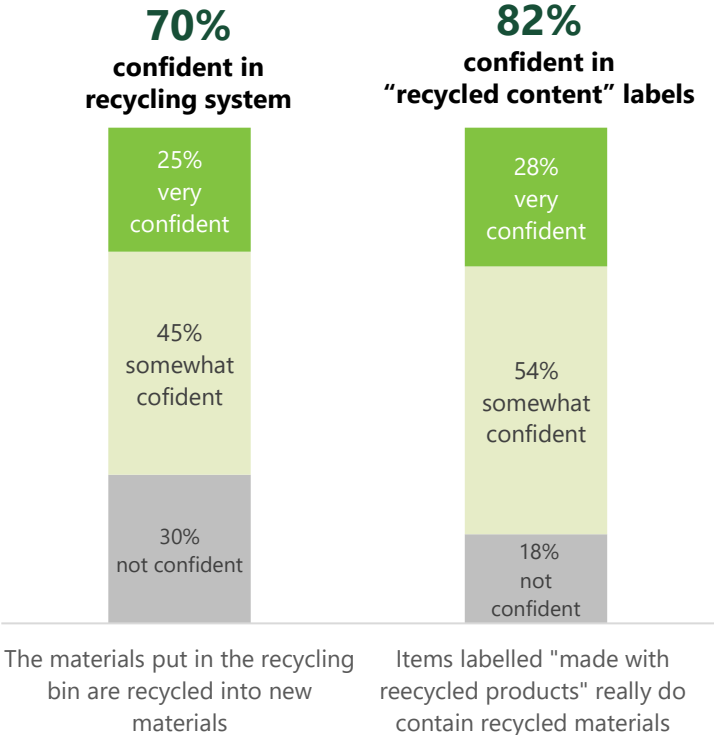
For a circular economy to grow, there needs be a healthy demand for products made from the materials and resources that are recycled

63% “Often/sometimes buy products that contain recycled content”
72% in 2023

Reasons for not buying



Confidence in recycling systems



Low trust in environmental claims made by brands



69%

Victorians

Say it's difficult to tell
which products are truly
environmentally friendly



43%

Victorians

Trust the environmental claims
of a brands own labelling

60%

Victorians

Would trust environmental
claims made by an independent
group

This scepticism appears valid.



In 2023 the Australian Competition and Consumer Commission (ACCC) reviewed the environmental claims of 247 businesses.

Of these, **over half, 57%, were identified as making "concerning" claims.**

"Rather than making legitimate changes to their practices and procedures, some businesses are relying on false or misleading claims". ACCC

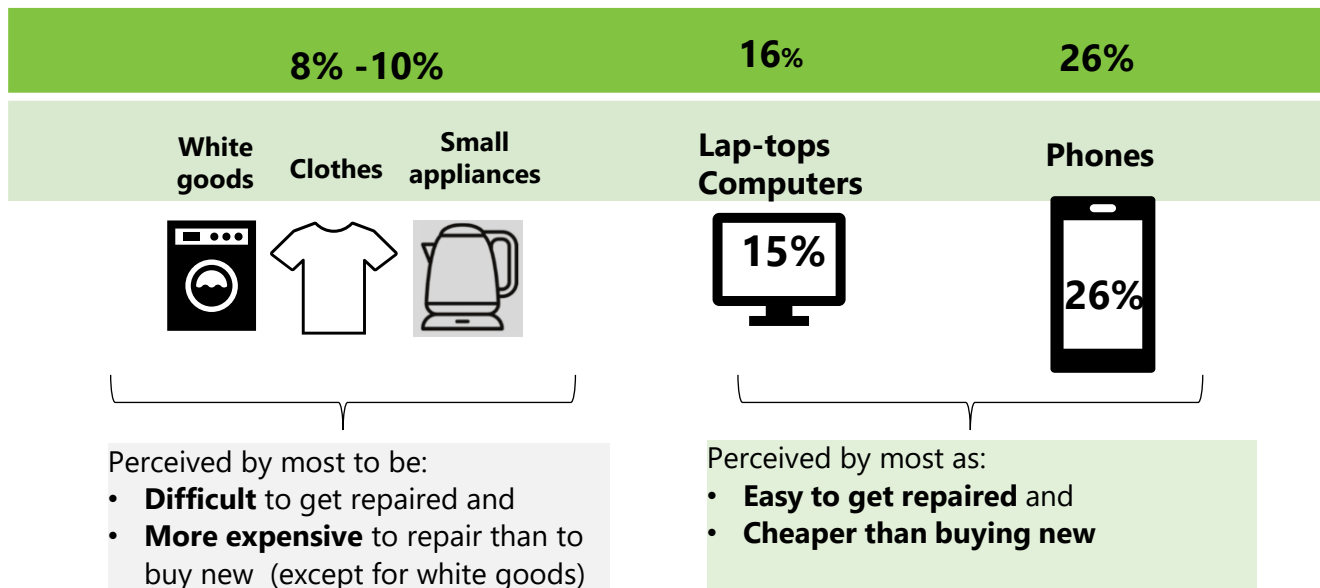
Repairs – deep dive

31% use a repair service often/sometimes

Type of repair service used

- 43% used an independent repair service
- 27% used a repair café/community repair service
- 23% used a service linked to manufacturer

Items repaired



Cost was the main motivation for using repairs

(cheaper to repair than buy new)

84% said cost of repair was cheaper than buying new

If item was not repaired, many would have thrown it in the bin/ for landfill.

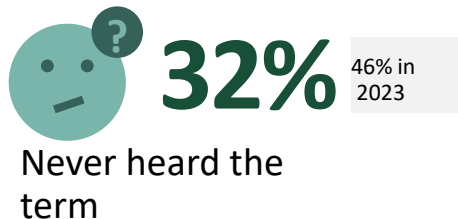
- Phones and laptops, 13%
- Small appliances, 17%
- Clothes, 41%
- White goods, 20%

Impactful actions

2023	2025	Behaviour	16-34 years	I haven't but I'd like to
13%	18%	Did environment volunteering (tree planting, wildlife rescue etc.)	27%	41%
Not asked	10%	Taken part in a citizen science project (Backyard Bird Count, iNaturalist, Biosecurity Quest etc.)	16%	35%
9%	12%	Switched their bank or super fund to a more environmentally /climate friendly business	21%	25%
9%	11%	Contacted their local MP about an environmental issue	16%	25%
Not asked	22%	Looked into getting off gas and going all electric	30%	30%

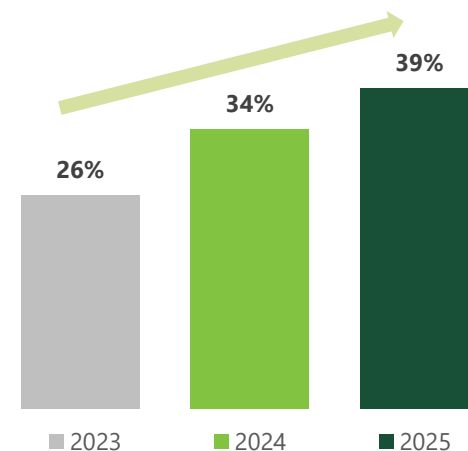
39% of Victorians are familiar with the term circular economy and have some understanding

(13% increase from 2023)



**"CIRCULAR
ECONOMY"**

Familiar with term and has some understanding, by year



Awareness higher among:

- males
- those in metro locations
- those with a degree

No differences across age groups

Participation in 'circular' behaviours increasing year on year

Buying/selling second-hand is well embedded

87% buy /sell/donate second-hand

Shop fronts (82%) and online (68%) used by majority

28% buy repaired/ refurbished electronic devices

42% among 16-34 yrs

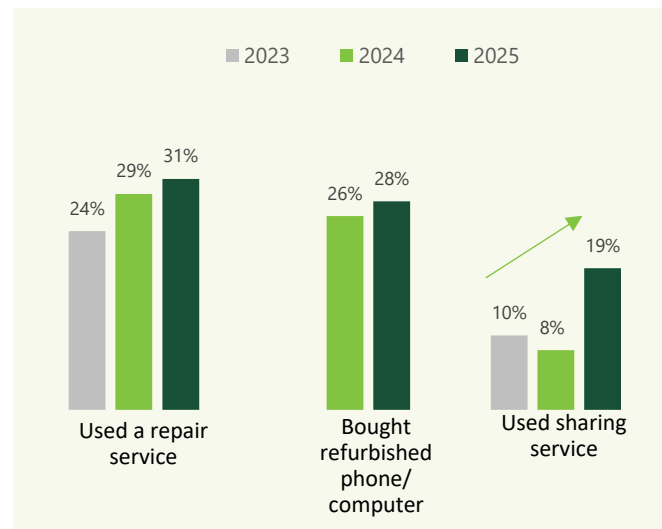
31% used repair services

19% participated in the sharing economy

Buying second-hand clothes means buying fewer new clothes (72%)



Increasing year on year

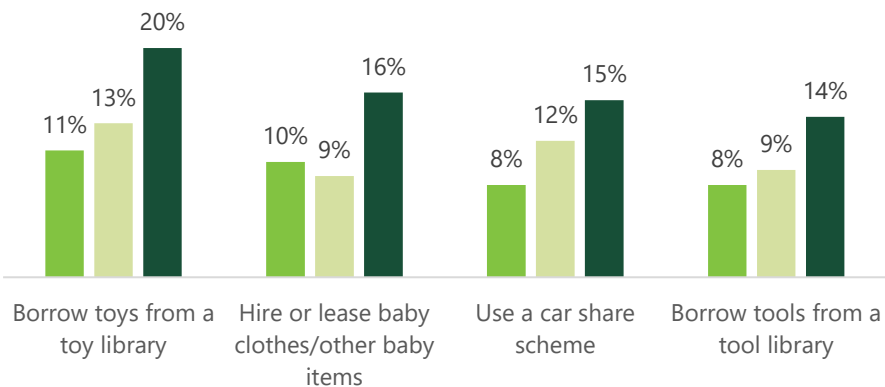


Shared services: tool libraries; car share; toy library; lease children's items

Younger people leading in participation of the sharing economy

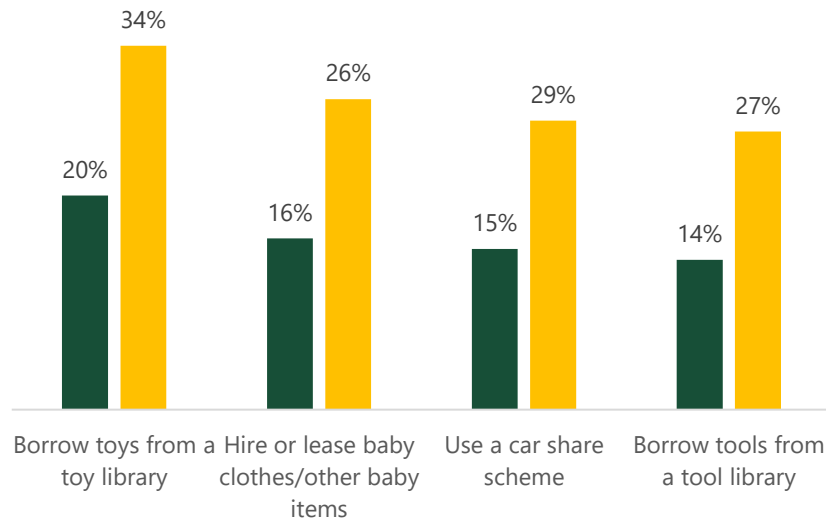
Increased participation in sharing economy

■ 2023 ■ 2024 ■ 2025



Increased participation led by 16-34 years

■ All Victorians ■ 16-34 years



Impactful actions

2023	2025	Behaviour	16-34 years – have done	I haven't but I'd like to
13%	18%	Did environment volunteering (tree planting, wildlife rescue etc.)	27%	41% <i>45% for women</i>
Not asked	10%	Taken part in a citizen science project (Backyard Bird Count, iNaturalist, Biosecurity Quest etc.)	16%	35%
9%	12%	Switched their bank or super fund to a more environmentally /climate friendly business	21%	25% <i>38% for 16-34 yrs</i>
9%	11%	Contacted their local MP about an environmental issue	16%	25% <i>30% for 16-34 yrs</i>
Not asked	22%	Looked into getting off gas and going all electric	30%	30%

Renewable energy

- 4 in 10 using renewable energy
- Support for renewable energy infrastructure decreasing most for transmission lines

4 in 10 Victorian households use renewable energy

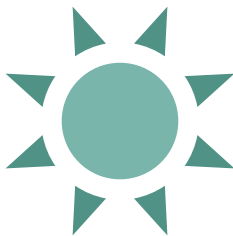
34%

have solar panels
31% in 2023; 29% in 2024

5%

who don't have solar
panels but buy renewable
energy from energy
provider.

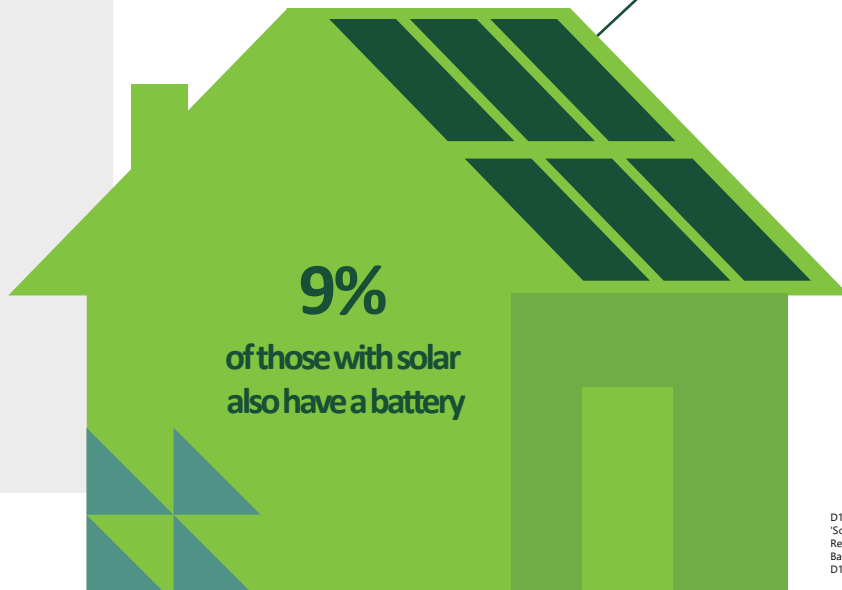
*(9% of those with solar panels
also bought renewable energy
but were not double-counted.)*



**More likely
to have solar:**

40% in stand-alone houses

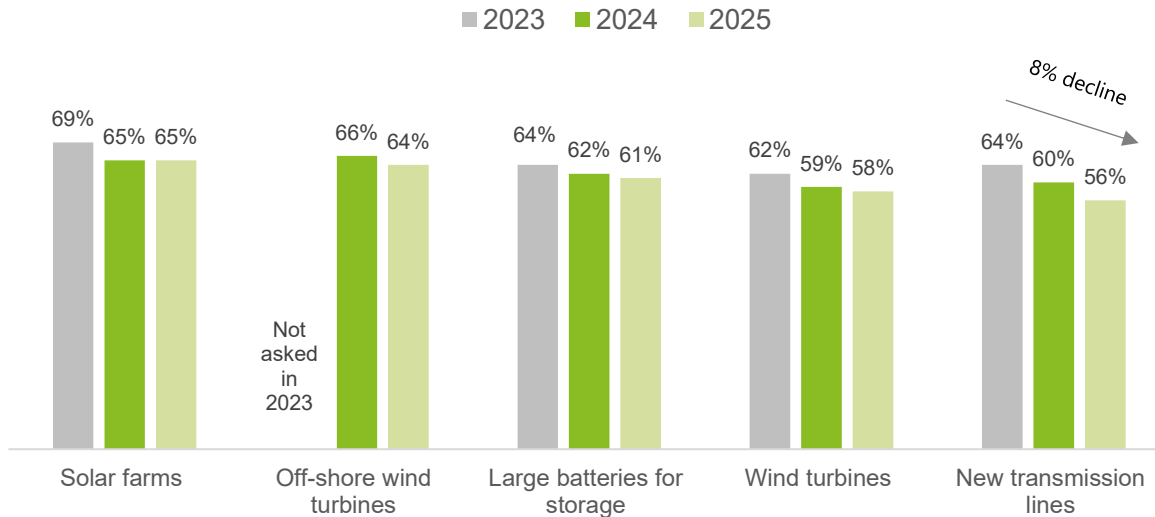
44% homeowners v **9%** renters



The majority of Victorians support renewable energy infrastructure

Support is consistently higher among 16 to 34 year-olds and lower among the 55+ years.

- Older people more likely to have concern about property values (CSIRO) and overall lower pro-environment attitudes compared to younger people



Beliefs about renewable energy / climate change:

41%

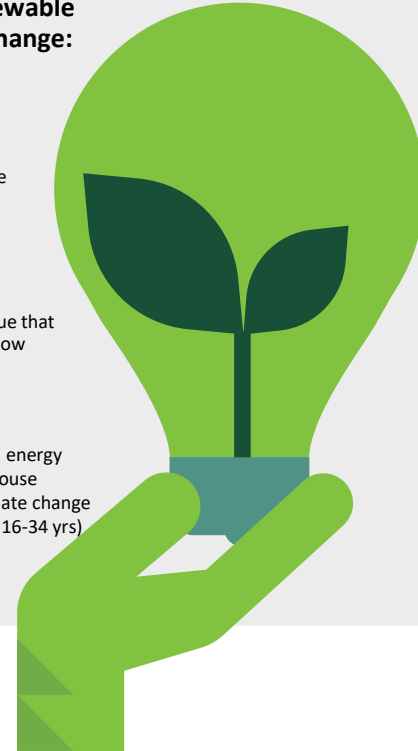
Acting on climate change costs too much

64%

67% 2023
Climate change is an issue that requires urgent action now

60%

The move to renewable energy helps Vic. lower greenhouse emissions and stop climate change getting worse (74% for 16-34 yrs)



D10. For each of the following, please indicate if you already have this in your home, or if you plan to have this within the next two years:

*Solar (or PV) panels to generate electricity

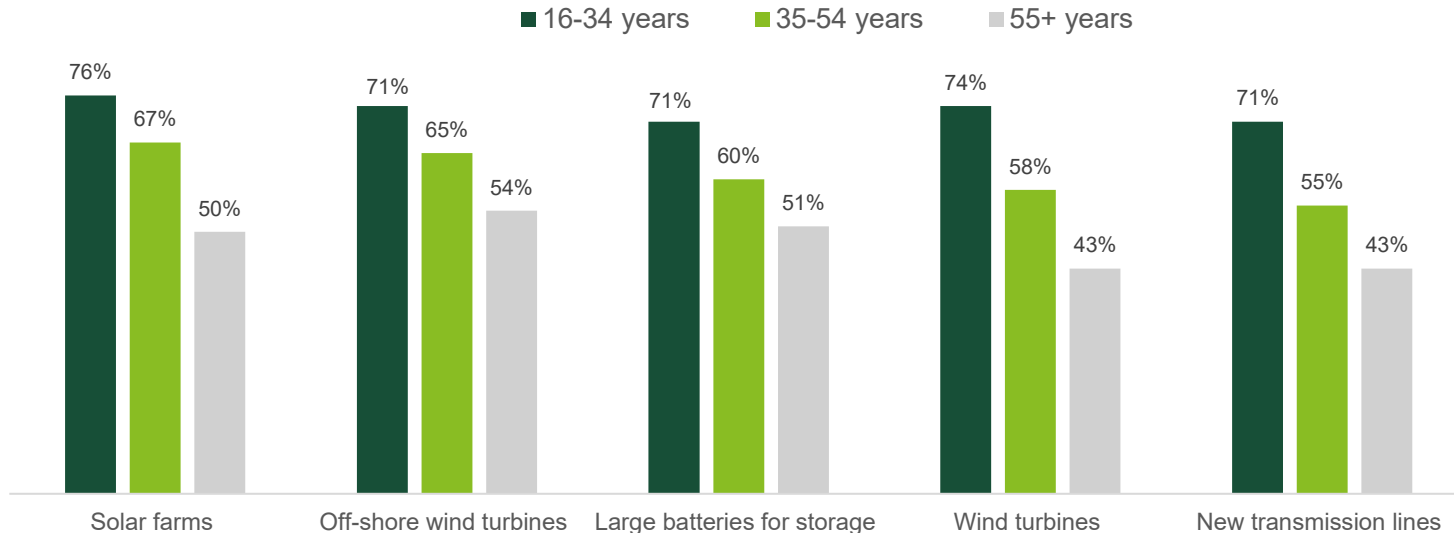
Renewable energy, such as GreenPower, purchased from your electricity retailer

Base: n=2552

D10a. And do you have a home solar battery system connected to your solar panels? Base: (those with solar panels)

Support for renewable energy infrastructure differs across age groups – over 55's less supporting

Willingness to support renewable energy infrastructure, by age



Other differences

Other differences:

Men and more supportive than women:

- off-shore wind, 68% v 61%)
- new transmission lines, 60% v 53%

No differences between metro and regional

No differences between those living in a renewable energy zone and others

Reasons for low support of renewable energy infrastructure

Reasons that were common across all types of infrastructure included:

- negative visual impacts /aesthetic concerns
- loss of agricultural land/natural land
- environmental harms/negative impacts
- non-recyclable waste was also mentioned

Specific to infrastructure type:

- Safety concerns were specific to batteries

Off-shore wind turbines



The whales need the ocean. The turbines emit sonar that causes whales to get disorientated. The turbines leak dangerous chemicals into the ocean.

*They **cost a fortune to build**, they don't last a long time, and the disposal costs are huge as well as to the environment"*



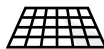
Wind turbines

We live in an area that is highly populated by birdlife, large and small. Wind turbines would be disastrous for them."

Large battery storage



A waste of money. They consume natural resources to build, can't be recycled, and have to be thrown away in about 15 years after building



Solar farms

"They are an eyesore on what is supposed to be a beautiful environment."

I just don't want solar farms taking up valuable growing land. We need space for animals and vegetation, no solar panels to waste soil



Transmission lines

"They are an eyesore on what is supposed to be a beautiful environment."

I think they are ugly, and all transmission be underground.

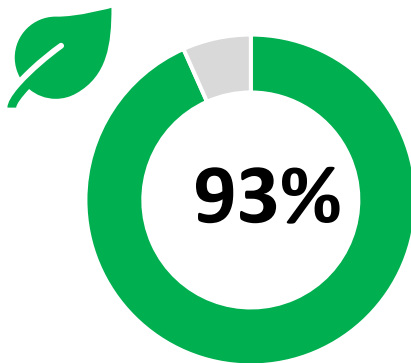
Urban Greening

- Most Victorians have easy access to green spaces
- There is strong social licence for **regenerating and repairing environmental damage** and **restoring** ecosystems, habitats and wildlife

Access to green space is high

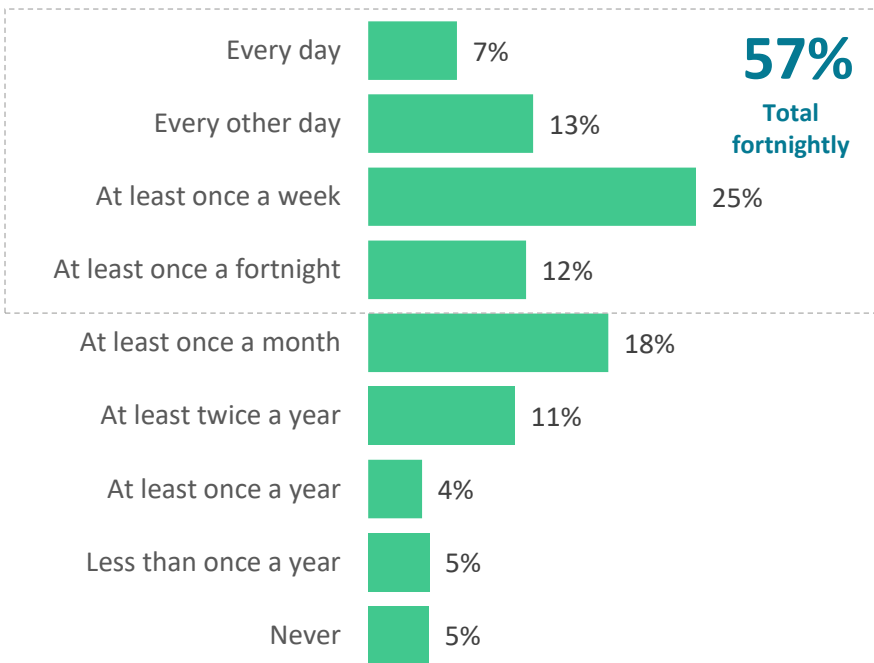
93%

have easy access to green open spaces, parks or gardens within a 15 min. walk from where they live.



Consistent across all demographics and locations

Frequency of spending time in nature



Access to green space is high

Victorians recognise the benefits green space provides, especially older people



Perceived benefits	% Victorians	% those aged 55+ yrs
Health benefits , places to exercise	76%	81% ↑
Mental health benefits – places to relax, unwind	74%	79% ↑
Improved air quality	66%	68%
Social gathering spaces	63%	68%
More beauty	60%	65% ↑
Ecological- habitat for animals / increasing biodiversity	57%	65% ↑
Reducing heat, providing cool, shady places in summer	47%	57% ↑
Reducing carbon from the air /reducing emissions	45%	53% ↑
Improved water quality	24%	22%

More than half gave recognition of these benefits



Women were more likely than men to mention mental health and social interactions

Strong social licence for urban greening and habitat regeneration

77% agree it is necessary to **regenerate and repair environmental damage** and to **restore** ecosystems, habitats and wildlife
- 82% among 16-34 years

83% agree that **urban green spaces** are an **essential infrastructure** to have in cities and towns

88% agree is important to **create and maintain healthy urban ecosystems and thriving biodiversity** in our cities and towns

Green spaces Victorians would like to see more of

Shade and cooling

- Shade trees along suburban streets
- Trees/urban forests for shade and cooling

Popular across all age groups, but most popular among those aged 55+ years

Spaces that support wild-life and insects

- More natural open spaces
- Habitats for urban wildlife
- Gardens for insects, bees and birds
- Native wildflowers and grass plantings
- Ponds /wetlands

Food

- Edible gardens/food in public spaces

Most popular among women

Functional spaces

- Grasses/plants on roadside verges/nature strips
- Pocket parks / small parks between buildings
- Green walls /Roof gardens on public buildings
- Greenery around public transport hubs

Green walls, roof gardens on public buildings and greenery around transport hubs was more popular among 16-34 years

How can government help you live more sustainably?

Common themes:

Help with costs of
sustainably options

Make sustainable
options more
affordable

Promote sustainability
more/ give more
information

Make big polluters
pay not individuals

Promote
community
gardens

Stronger building
laws /regulations

Sample of quotes:

*Make installation of
renewable energy
cheaper and allowed for
renters*
Age:16-34

*Why should it be left to
the people to make the
change, the government
should be forcing large
corporations and
companies to go me
sustainable*
Age:16-34

*Give us better rates on
our solar panels and help
households afford batteries*
Age:55+

*Make supermarkets change
their food packaging to be less
plastic and provide plastic
recycling points which actually
recycle the materials*
Age:55+

*Offer an app or online
service that people can
use to learn on their own
time about these issues.*
Age:35-54

Enforce stronger green building codes
Age:16-34