Getting indoor temperature "Just Right"

for health, energy, and climate justice

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Pōneke Wellington Campus

Emma-Lita Bourne is dead Now will anything change?

A coroner has sparked a political and media storm by saying a cold state house contributed to a toddler's death. But who takes notice of what coroners say? And does anything ever change? By Adam Dudding.

living in when she fell ill in the

winter of 2014; to the leak in the

because of unaffordable electricity:

to the sibling with rheumatic fever.

findings: "Whether the cold living

conditions of the house became a

And there is this line in the

circumstances of Emma-Lita's

the reaction was anything but.

contributing factor to the

death cannot be excluded."

ceiling of the South Auckland

home, to the heater unused



Otara toddler Emma-Lita Bourne, who died last August after being hospitalised with pneumonia. The coroner said cold, damp housing may have contributed to her death.

YOUNG GERL dies of coverage, breast-beating and an unpredictable finger-pointing, and fresh complication of recognition that poverty in New pneumonia. Zealand is a real thing that kills A coroner reports the people. Once again a coroner has urual awful clinical lit a fuse then quietly stood back. Telling the public what went details - "covern saturation". "Intro-exial haemorrhage", "beain wrong and what can be done better is in a coroner's job description, yet stem death testing" - but something else as well: There are they are not always thanked for it. references to the "cold, damp"

In 2013, Eric Crampton, a state house Emma-Lita Bourne was researcher at business thinktank the New Zealand Initiative, blogged a list of recent coronial. recommendations, presumably so his readers could sneer at their wackiness i"warning labels on Coke"; "national manhole safety guidelines"; "hard hats when climbing ladders"; "mendatory hivis clothing for cyclists"), then suggested coroners get training in cost-benefit analysis before making

silly, expensive suggestions. It is an understated phrase but Of the 29,000-odd deaths in New Zealand each year, 20 per cent are referred to the coroner

Since the publication of Coroner Brandt Shortland's report there has A proportion of those lead to an been an explosion of news inquiry and a subset of those lead

to formal recommendations.

These are not binding so. spurious or otherwise, many are ignored. Yet even without enforcement powers, coronees can

Orago University researcher Jennifer Moore looked at reports for 2007-2012 and found that from a sample of 426 recommendations, 20 per cent were rejected outright. 31 per cent were implemented, and 49 per cent were "supplanted" that is, action had already been taken. In her study, Moore said coroners should target their recommendations more clearly so they were harder to ignore.

She also said coroners should get better at identifying trends rather than focusing narrowly on individual cases.

Yet she named clearcut lifesavers. including the successful coronial. recommendation for the construction of a median barrier on Wellington's notorious Centennial Highway (see sidebar).

Moore looked only at formal

This pretty little girl who was ill one day and dead the next - that's every parent's nightmare. Prof Philippa Howden-Chapman

recommendations but cases such as Emma-Lita Bourne's demonstrate the symbiotic relationship between coroner and media, and a coroner's ability to create waves with a few carefully chosen sentences.

It's not news, of course, that poverty is a killer.

As Nelson paedistricism Nick Baker, former chair of the Health Quality and Safety Commission puts it, "growing up in deprivation. you're more likely to die", not only because of poor housing but because of access to resources. income, the safety of cars, riskier behaviour and numerous other.

Commission figures show that in 2009-2013, death rates in those aged 28 days to 24 years were dramatically skewed by neighbourhood wealth. When split into deciles of deprivation, the death rate of those young people living in the poorest areas was nearly three times greater than that of those in the richest areas.

Somehow, though, says Otago public health professor Philippa. lowden-Chapman, this case has sparked a much bigger reaction than any statistical table could.

That may be because housing from the Auckland bubble to National's reshaping of state petroision - is a hot topic.

It is possibly because of the mana. of coroners and the fact that Shortland directly named housing conditions as a "contributing factor". But it is also because

Emma-Lita struck a chord

"Unless people are empathetic or have got imagination, they can easily partition what other people's lives are like from their own daily experience. But this pretty little girl who was ill one day and dead the mext - that's every pacent's nightmare, so people find that easier to empathise with, It's a specific, tragic piece of evidence that helps us to see the costs of having really pour-quality housing for low-income households. Howden-Chapman says.

Shortland made it clear those involved - especially the mother and the medical staff - managed Emma-Lita's illness impeccably.

"He says: "I can see no fault here except that this child was in terrible housing' And that's very unusual," says Howden-Chapman.

She thinks it will be "very interesting" if other comners mention housing as a "contributory factor" in future reports. A coroner can whisper and trigger an avalanche, or shout at the top of their voice with no effect.

When former chief coroner Neil MacLean retired in February he spoke of how frustrating it was to bang on about the suffocation of babies in their parents' beds or the dangers of quad bikes and see little or no change. Yet occoners are not "toothless tigers". They can still achieve a lot with soft power and encouraging public discussion is one of the tools in their armoury".

Baker says whether it's huffing or housing, driveway deaths or cotdeaths, coconers have proved 'incredibly strong allies in terms of supporting a community to do the right thing by their kids"

He says a coroner can make a recommendation or drop hints but after that someone else has to take the next steps.

WARRANTS FOR Column: Phil Goff p13

Coronial hits and misses

Highlighting risks and making recommendations to reduce them are part of a coroner's job, but they don't have enforcement powers. Some findings have a major impact, others sink without trace.

Huffing

After two Dunedin teenagers ignited a roomful of gas while inhaling LPG in 2012, chief coroner Neil MacLean trawled coronial records and found at least 63 people had died while 'huffing'



butane since 2000. Major stores voluntarily restricted sales of butane and there has been a dramatic reduction in deaths since.

Quad hikes

Coronial recommendation to reduce fatal guad bike accidents have included bans on child riders and compulsory rollcages, but nothing much changes. In February outgoing chief coroner MacLean bemoaned the

lack of action. which he blamed partly on 'powerful industry groups'.



Centennial Highway

In 2001 coroner Garry Evans recommended construction of a median barrier on Wellington's Centennial Highway, after eight deaths in a year. A barrier was built in 2004. By 2014 the barrier had been hit.



more than 20 times, saving, it's estimated, up





Coca-Cola warnings

to have been ignored.

It was arquably New Zealand's most famous death of 2013: An Invercargill woman who drank up to 10 litres of Coca Cola a day died of a heart condition. The bizarre case was reported worldwide, but coroner's David Crerar's recommendation - tougher label warnings on carbonated beverages, and less caffeine in Coke, appear

Aotearoa, 2014

What do young people say about cold homes in winter?

"The lounge is real warm and great but every night I have to embark on the dangerous journey up the stairs to my bedroom, I would say its the NZ equivalent of Mt. Everest."

O'Sullivan, K.C., Howden-Chapman, P., Sim, D., Stanley, J., Rowan, R.L., Harris Clark, I.K., Morrison, L.L.A., and the Waiopehu College 2015 Research Team, 2017. Cool? Young people investigate living in cold housing and fuel poverty. A mixed methods action research study. SSM - Population Health 3, 66-74.



Cold housing is a youth problem

- Specific effects for youth include: health, mood, sleep, school performance, some say it can affect social relationships
- Those who aren't affected are concerned for those who are

"Considering I have at least 5 friends who complain about [cold housing] I feel it is a problem. I've been at their houses the night and it was absolutely numbing. We were in sleeping bags under many blankets. In winter they are constantly sick with coughs and general colds and are miserable." (Interview 2, Male)

Hey Govt! Youth call for action!

"It's so cold at my house during the winter. If they could do something for everyone not to be as cold it would benefit there education too. Being sick really limits where you go."

"The government should do more to help people living in a house that's with bad and cold conditions."



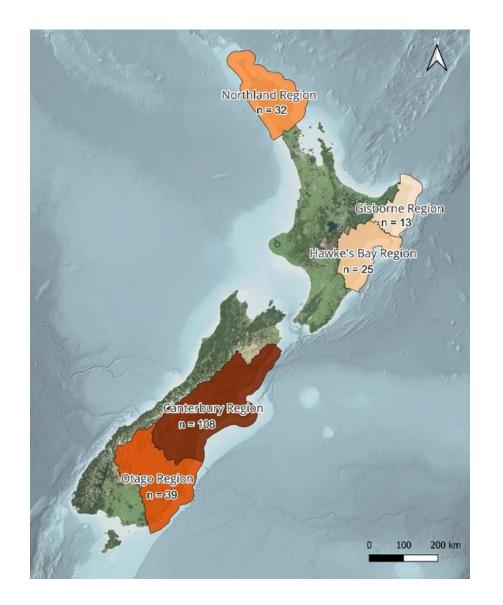


"I started taking anti-anxiety medication, and one of the main stressors at that time was how cold I was" Tertiary student

> "Get stressed about homework because it's too cold to do it, too cold to think" Year 10 student

HOusing, energy poverty and MEntal health

Heating Up, Cooling Off





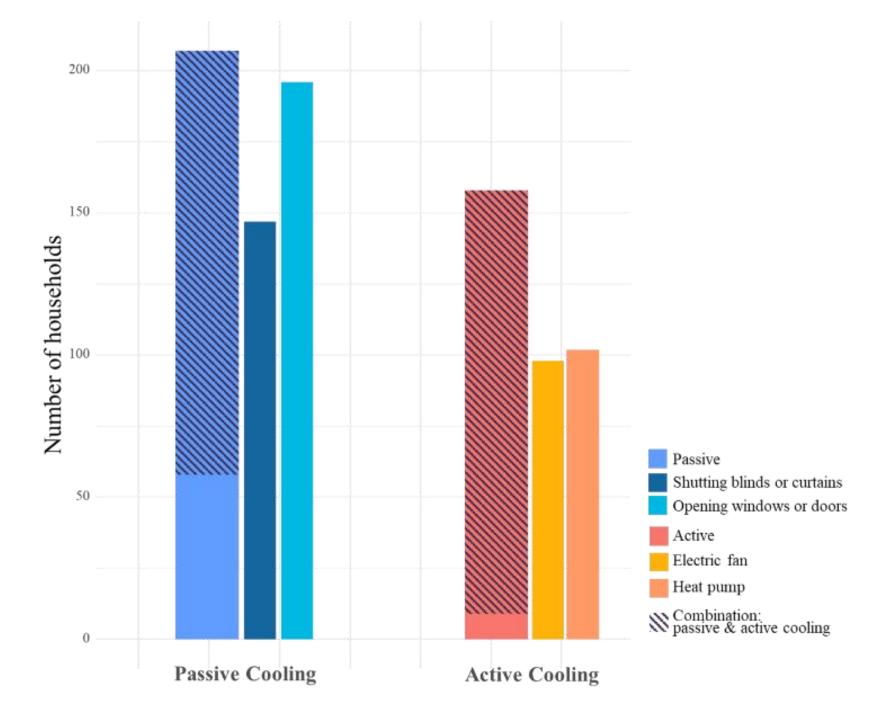






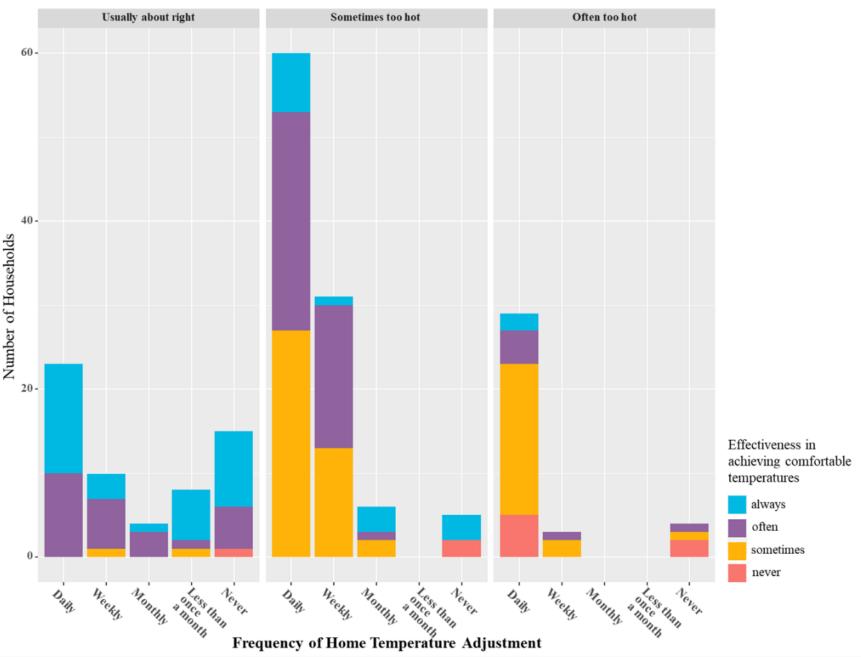


Almost everyone in Aotearoa takes some action to cool their home during summer.



Current cooling measures are only effective around half of the time.

Perceived Home Overheating



Disparity in experienced overheating

Renters (85%) Owner-Occupiers (69%).

Māori (84%) non-Māori (69%).

Households with children (80%) households without children (67%).



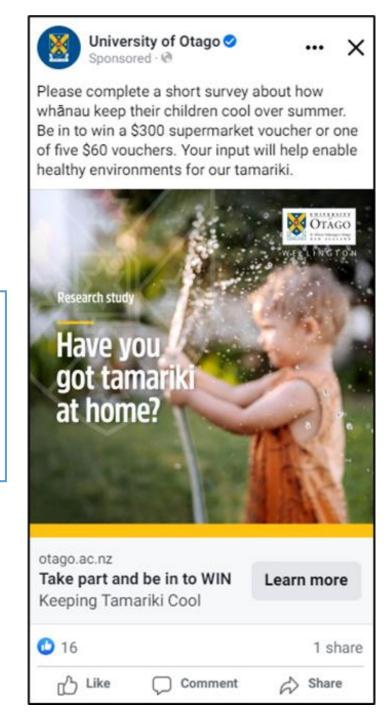
Disabled peoples' experiences of managing indoor summer heat in Aotearoa NZ

Keeping Tamariki Cool

"shade or inside in air conditioning in the hottest part of the day, giving them lots of iced water and ice blocks, setting up a cool paddling pool or taking them to a swimming pool, beach or river."

"The cost to access pools. Safe water isn't always available, whether due to contamination or conditions. The cost to run air conditioning is also a factor."

"Don't get me wrong I love hot summers but it does affect wellbeing. Worrying the room is too hot for the baby (her room can get in the 30s [Celsius] in summer)."



HEATING UP & COOLING OFF

summer overheating and cooling practices at home in Aotearoa New Zealand

RESIDENTIAL OVERHEATING

DISPARITY

Unmanaged indoor overheating poses

ENERGY **POVERTY**

Disparity in experienced overheating and summer energy poverty is observed;

Renters, indigenous Māori, and households with children are at increased risk.

I am recovering from illness, I find the heat of summer does add to my stress & anxiety.

health risks and even potential fatality.

HEALTH

RISKS



we've transitioned from passive to active cooling

COOLING METHODS

Passive cooling without using energy



Active, cooling with electricity or other energy source

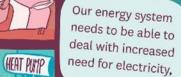
Current cooling measures achieve thermal comfort around half of the time

We need to make our future energy system fair so everyone can keep cool when they need to

We have overheating problems in the rooms upstairs, they are further

ALMOST

of respondents were experiencing some home overheating



from the heat pump

from electrically powered cooling we now use

ENERGY

SYSTEM



INCREASED ENERGY USE

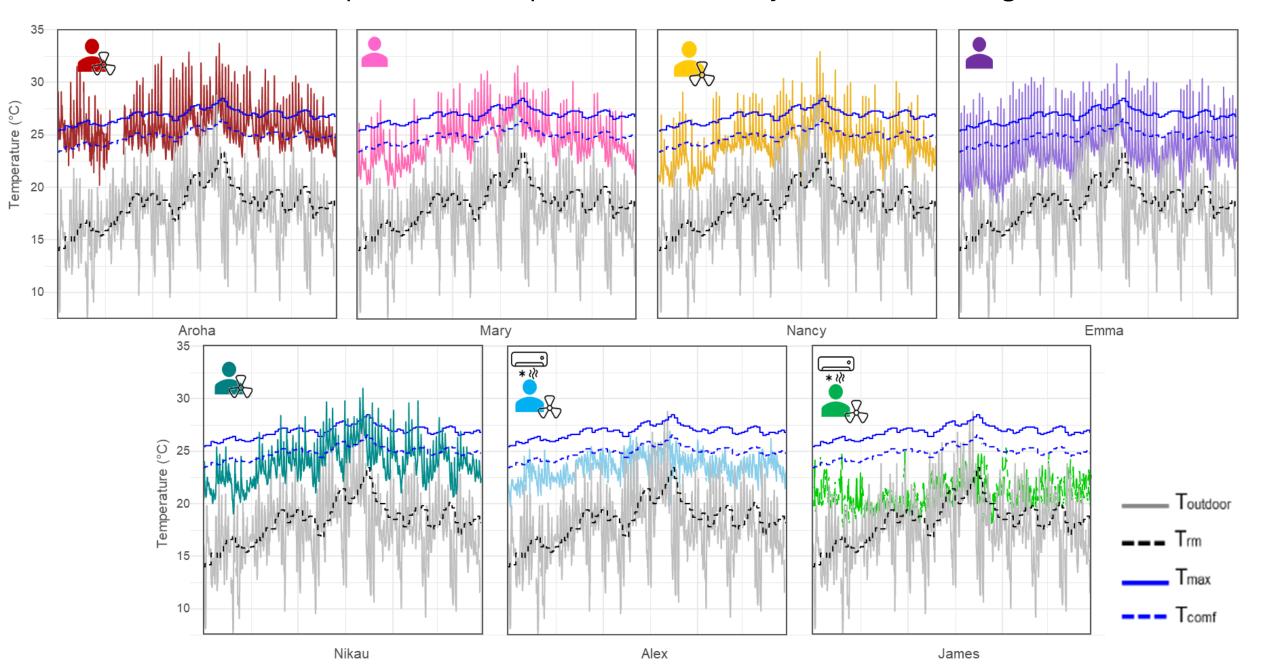








Monitored indoor temperatures compared with CIBSE dynamic overheating thresholds.



Passive cooling

Natural ventilation

"Tiny gaps in the windows!"

"It's either too hot or a wind tunnel."



"That's kind of depressing having curtains shut like in the day.
That's just a fantastic view and everything, and it's such a shame."





Active cooling

Electric fans

"I think the fans should be compulsory. Without it, it's incredible."

"Those hottest days, it just blows around hot air."

Portable air conditioners

"Those portable air conditioners, those are really expensive."

"The power bill just goes sky high."

"To put it on, take it off each time you use it, because of the wind. [...] it's a crazy amount of work just to like, chill out at home"

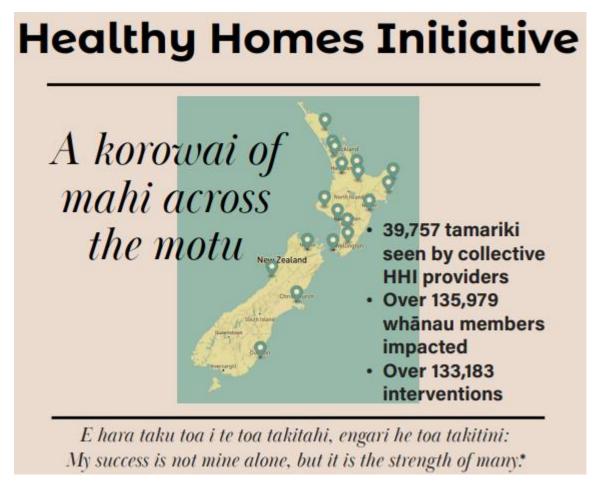






Steps towards "just right"

- Insulation retrofit programmes
- Efficient heating programmes
- Healthy Homes Initiative
- Healthy Homes Standards (rentals)
- H1 Standards Residential Building Code



https://www.hhi.org.nz/site files/32712/upload files/HHI ePanui Winter2024 Introduction.pdf?dl=1

Pierse, N., et al. (2022). Healthy Homes Initiative: Three year outcomes evaluation. Wellington, Te Whatu Ora Health New Zealand. https://www.tewhatuora.govt.nz/about-us/publications/heathy-homes-initiative-three-year-outcomes-evaluation/

























Nā te tangata te kāinga i noho, Nā te kāinga te tangata i whakatīpu While a person resides in their home, the howe also rears the person















Participation in the WUNZ scheme reduced total hospitalisation rates for all children by 6%, children from low-income households Ψ 12%, children in private rentals Ψ 19%.

O'Sullivan, K., Telfar Barnard, L., Viggers, H., & Howden-Chapman, P. (2016). Child and youth fuel poverty: assessing the known and unknown. *People, Place, and Policy, 10*(1), 77-87. doi:10.3351/ppp.0010.0001.0006

The cost to heat a child's bedroom in Wellington during a winter month (NZ\$58) would use around 46% of the Winter Energy Payment

Shorter C, Crane J, Barnes P, et al. The cost of achieving healthy temperatures in children's bedrooms: Evidence from New Zealand. Energy Policy 2022;164:112861. doi: https://doi.org/10.1016/j.enpol.2022.112861



Image: the blowup, Unsplash

Aroha (8) Thriving in Her Climate-Safe Home

Wellington, Aotearoa – September 3, 2054

Eight-year-old Aroha Dunlop is flourishing in her climate-safe home, a standard feature of contemporary living in 2054. Her Wellington residence, completed last month, showcases the seamless integration of advanced green technology into everyday life. The home is equipped with solar roof tiles that generate all its electricity, a rainwater harvesting system for sustainable water use, and smart climate control to maintain yearround comfort. Green walls and a

rooftop garden not only enhance energy efficiency but also support local biodiversity. Local officials and environmentalists highlight the Dunlop home as an exemplar of modern housing. "This residence reflects our commitment to sustainable living and sets a high standard for future homes," remarked Mayor Amelia Thompson. For Aroha, this climate-safe home represents more than just comfort; it's a tangible expression of her family's



dedication to environmental stewardship. "I love how our home helps the Earth," she says, enjoying the benefits of a home designed with the planet in mind. In 2054, climate-safe housing is the norm, making such innovative living spaces both practical and inspirational.

Aotearoa, 2054?

www.chatgpt.com

Ngā mihi ki a koutou

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