Smokefree 2025
Research Symposium

# Smokefree sign observation
## and other real world research

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# Aims

To:

- Study smokefree signage and other tobacco-related items in a range of settings
- To explore ways to extend tobacco control research further into real-world situations

# Background

- Outdoor smokefree areas are expanding internationally, but little is known about the signage used in such areas
- Tobacco control research is largely ‘at arms length’
- Medline search results for ‘tobacco’ and:
  - Surveys: 15593
  - Experiments: 2553
  - Interviews: 2392
  - Documents: 674
  - Focus groups: 449
  - Natural experiment: 18
  - Photos: 13
  - Field observations: 5

# Methods: Signage studies

5 field observation studies during 2014 – 2016 (some combined with use of Google Street View [GSV])

- 50 schools in 24 lower North Island (LNI) cities/towns/rural districts: Field and GSV
- 10 LNI public hospitals by observation & GSV, 20 random NZ hospitals *only* by GSV
- 20 sports stadia and racecourses: Field and GSV
- 54 children's playgrounds in 17 LNI local authorities
- All outdoor smokefree signage in Karori and East Porirua

# Results: 50 schools

- 32% (16/50) had smokefree signs at the main entrance
- Observations using GSV had only modest sensitivity (eg, 44% for main entrance signs)

# Hospitals

## Field observation and GSV at 10 LNI hospitals

- 9/10 of hospitals had smokefree signs at main entrance
- 40% of hospitals had any signs that stated that the '*grounds*' were smokefree
- Good GSV sensitivity (100%) for main entrance signs

## GSV use for random 20 NZ hospitals

- 50% had a smokefree sign at the main entrance

# 54 playgrounds

- 22% had *any* smokefree signage on an entrance path to the playground

- Qualitatively, the smokefree signage was generally poorer than for signage banning dogs, based on:
  - smaller sign size,
  - less use of clear symbols
  - being far wordier

# 10 sports stadia and 10 racecourses

- 60% of the sports stadiums had smokefree signage at their main entrances
- None of the racecourses did (0/10)
- The utility of GSV was modest
  - sensitivity: 33% for main entrance and 67% for any smokefree signage

# All potential smokefree signs in two suburbs

95 potential settings where smokefree signage might occur were surveyed

- In Karori N=50, in East Porirua (EP) N=45

For play areas, where city smokefree policies applied:

- Kaori had higher ‘any signage per setting’ (83% vs 17% for EP, p=0.018)

# Methods: Extending tobacco control research

- Observations outside 14 cafes/bars in 2013, and 55 in 2014, for smoking and tobacco packs
- Observations of smoking related signs, activity, ashtrays etc, were compared to GSV for 400m sections of 12 Wellington streets
- Automated wearable cameras (KidsCam/Marcus Gurtner)
  - Photos every 10 seconds
  - Worn by 34 students (from households with smokers)
  - Photos from 3 days vetted to find those taken in ‘private’ areas: homes, private gardens or private vehicles

# Results: Street observations

For every 5 street sections surveyed:

- 1 smoking-related health promotion item (eg, below)
- 12 regulatory items (eg, smokefree sign)


# Results: Kidscam photos

- 99 photos with tobacco related items/activities were seen in 140,818 ‘private area’ photos
- Most of these photos (63%) were of tobacco-related paraphernalia only (tobacco pouches, loose tobacco, cigarette packets, cigarettes, rolling papers, filter tips, and cigarette butts)

# Discussion: Signage

- Field observation is better than GSV except for large signs; GSV is low cost
- Signage for *all* types of settings could be better:
  - In coverage (schools, playgrounds, playing fields, stadia, racecourses)
  - In content (eg, specifying hospital grounds)
  - In design: size, clarity, use of symbols
- There are big opportunities for health promoters, officials and policymakers to improve smokefree policy *implementation*

# Discussion: Extending tobacco control research

- Widening the array of data sources helps meet the increasing call for multi-method evaluations

- Systematic photos can provide detailed contextual information relating to:
  - ritualistic aspects of smoking and accompanying behaviours
  - the use of complementary products/dependencies (e.g. alcohol)
  - the types of public and ‘private’ areas in which smoking-related activities occur
  - the frequency and duration of smoking in such places

# References


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