

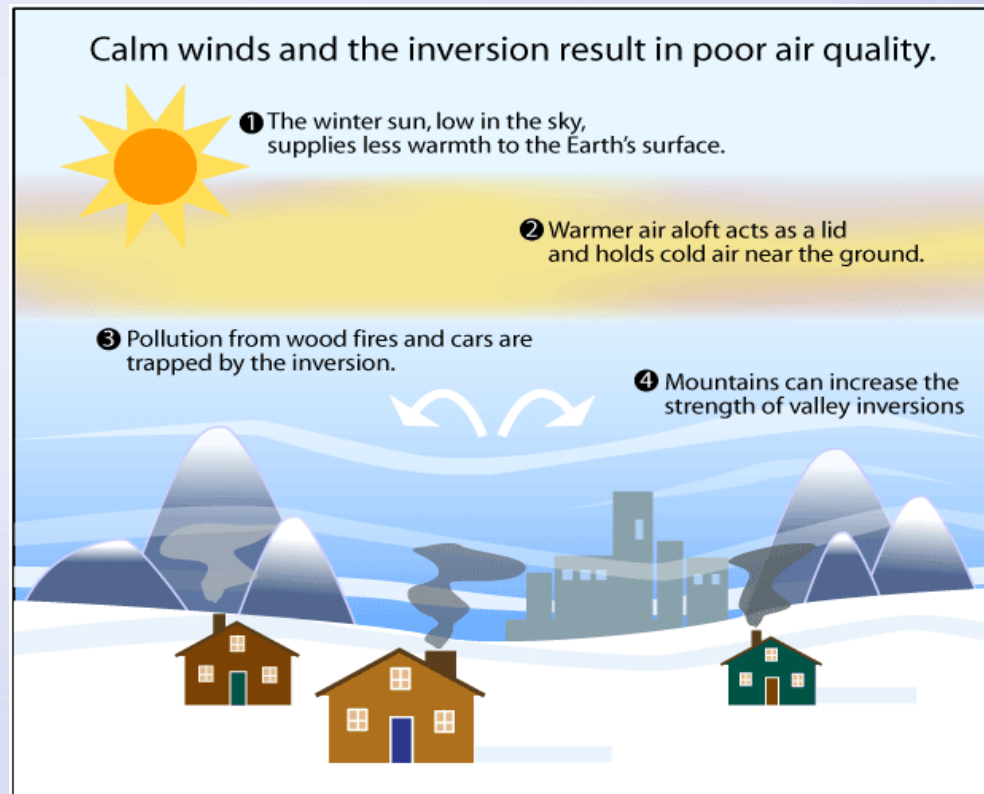


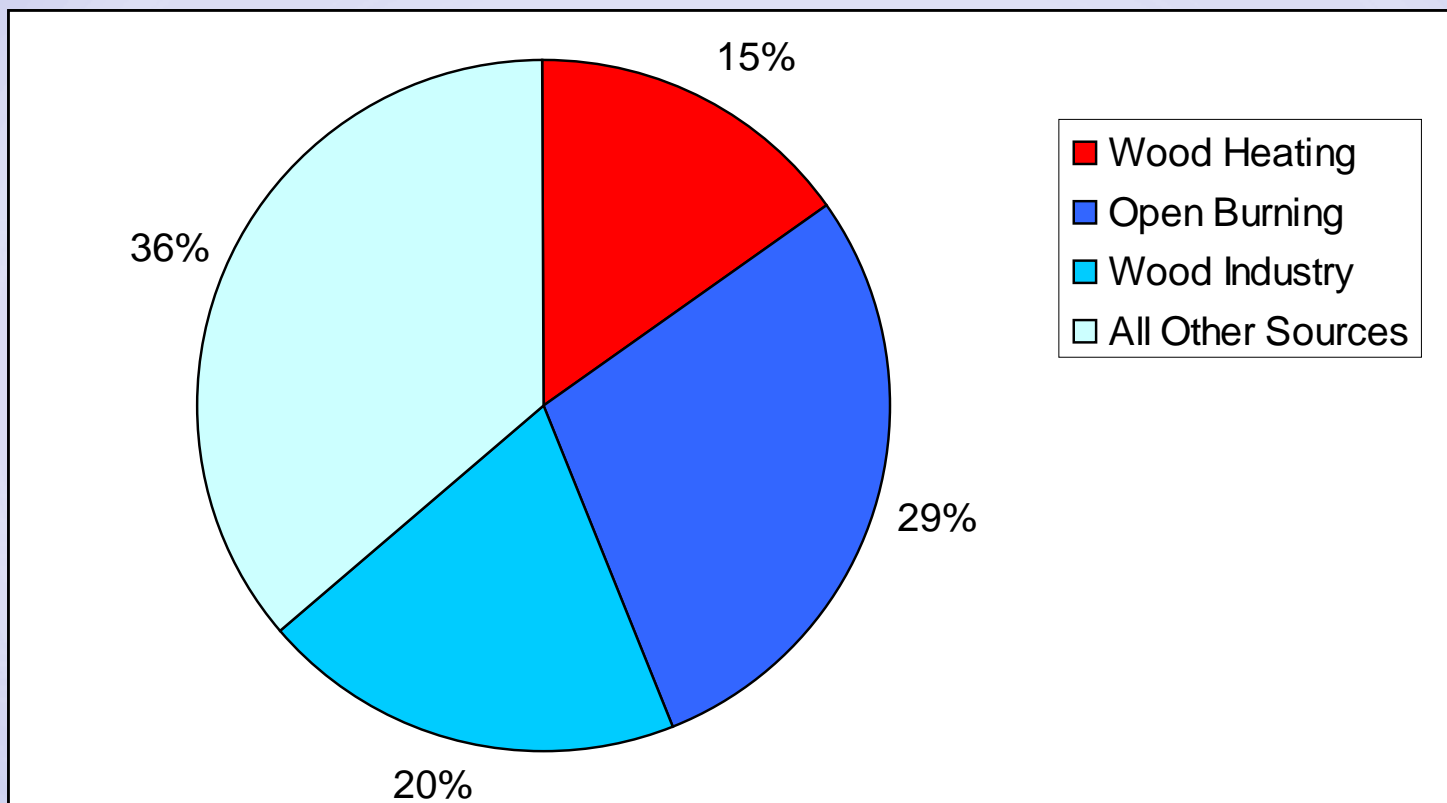
Provincial Support and Local Action on Residential Wood Smoke

Rebecca Freedman
Health Protection
February 23, 2010

The Issue:

- Wood smoke is concentrated where we live
- Valley communities are susceptible to inversions
- Excessive wood smoke and fine particulate pollution is created by inefficient old appliances and improper burning practices





Percentage of PM_{2.5} emissions from different sources in B.C. (Source: 2005 B.C. Criteria Air Contaminant Emissions Inventory).

“Other sources” includes emissions from transportation (on and off-road), the pulp and paper industry, marine transportation, and other industrial and area sources. No sector, other than the three identified on the chart, contributes more than 7% of B.C.’s total PM_{2.5} emissions.



Reports

- [Residential Wood Burning Emissions in British Columbia \(2004\)](#)
 - [Residential Wood Burning in British Columbia – Public Behaviour and Opinion \(2006\)](#)
-
- [Residential Use of Wood-Burning Appliances in Canada: Emissions, Health Effects, and Intervention Strategies \(2009\)](#)
 - [Strategies for Reducing Residential Wood Smoke \(2009\)](#)



Home
Heating
Security

Residential
Backyard
Burning

Exchange
Program –
incentives to
upgrade

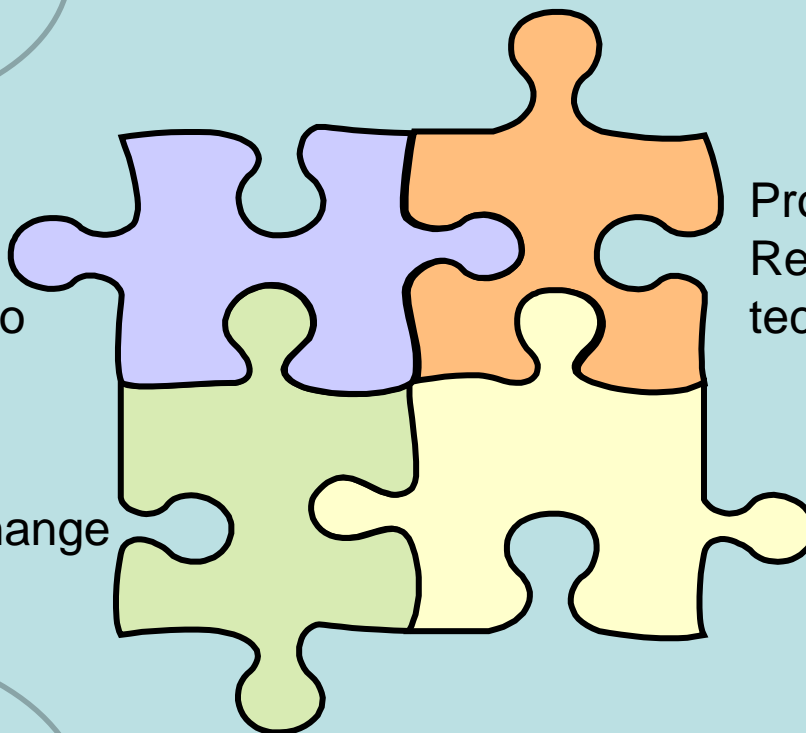
Provincial
Regulation -
technology

Education &
Behaviour Change
- operation

Bylaws –
operation and
installation

Home Heating
Efficiency and
Environmental
Impact

Open Burning,
Wildfires, etc





Wood Stove Exchange Program



Program Strategy

Increase Barriers for Inaction:

- Local Bylaws
- Community awareness of health and safety issues

Remove Barriers for Action:

- Rebates and in-store discounts
- Favourable financing options

“Use Less Wood and Be Good to your Neighbourhood”

WOODSTOVE CHANGEOUT PROGRAM



Program starts March 1, 2009

Exchange your old, uncertified woodstove (pre-1994) for a new EPA-certified wood, pellet or gas heating appliance.

Receive a \$350 rebate and a \$50 retailer discount*

*at participating local retailers

SMARTER BURNING, CLEANER LIVING

- Save firewood and time (efficient woodstoves use 1/3 less wood)
- Reduce woodsmoke emissions by up to 90 percent

For further information about the program, please call 250-746-3130.

FREE “BURN IT SMART!” Wood Heat Workshops

Tuesday, March 3 ~ 6:30-9:00 PM ~ Cowichan Aquatic Centre

Wednesday, March 4 ~ 6:30-9:00 PM ~ Fuller Lake Arena

Learn tips and techniques on how to get the most from your wood heating system. Bring wood from your woodshed and we will test the moisture content of the wood. Please pre-register for these workshops. Call 250-746-3128 or email brown@northcowichan.bc.ca



Community Toolkit

<http://www.env.gov.bc.ca/epd/woodstove/index.htm>

- Information for communities/FAQ
- Information for individuals
- Proposal information and requirements
- Barriers research
- Implementation Information and Program Basics
- Highway 16 Positioning and Marketing Recommendations
- Pilot Evaluations: community members and program participants; program partners and coordinators
- Wood Stove Exchange Evaluation Tools and Tips



Other Coordinator Resources

- www.cleanairkit.ca - marketing and promotion ideas
- Sharepoint site – document sharing, discussion board, program announcements, training session presentations
- By-weekly calls





2009/10 Island Participation

- Cowichan Valley Regional District, North Cowichan, and Duncan
- City of Nanaimo
- Port Alberni
- Campbell River

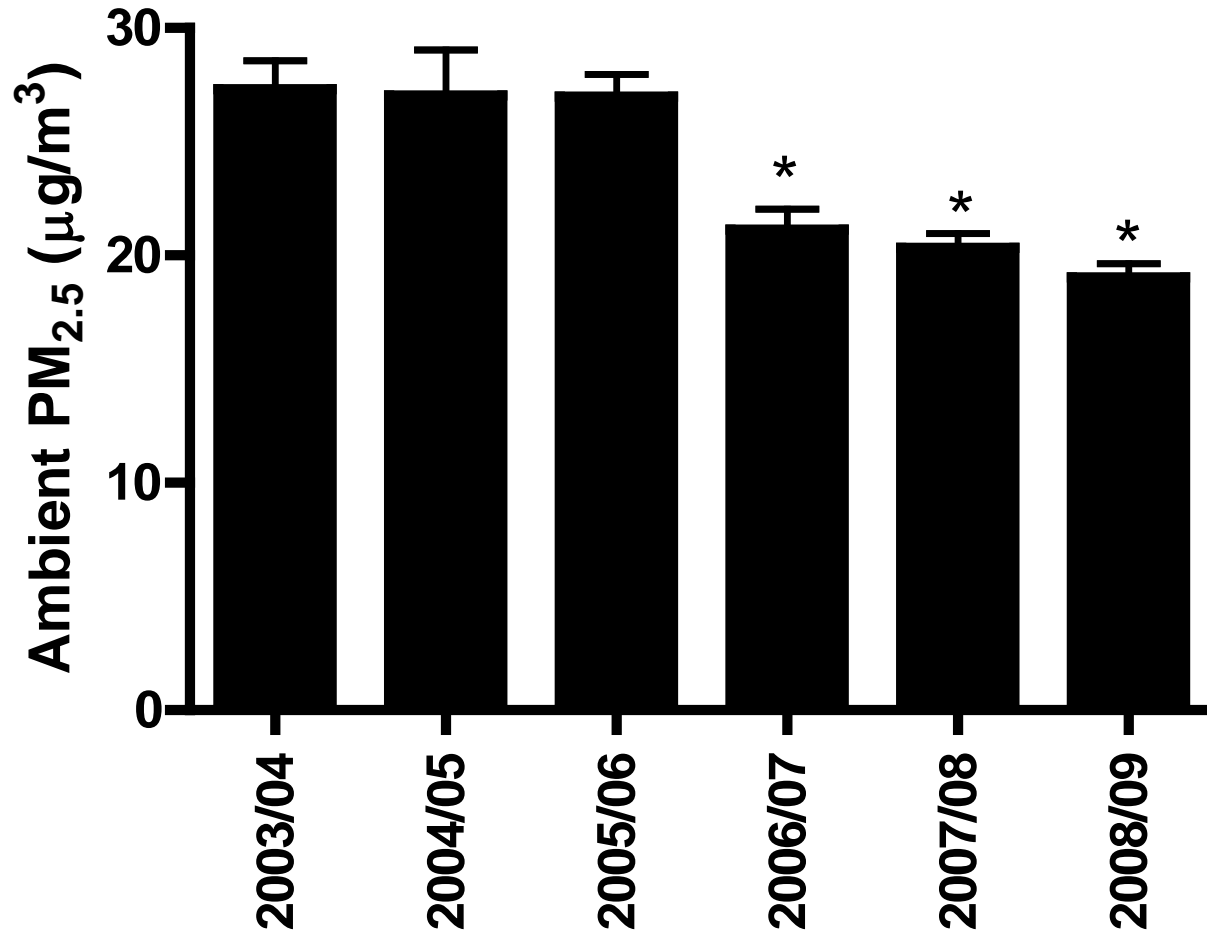




Exchange Program Results in B.C.

- 10 years of exchange programs (1995-2004)~ **1350** exchanges
- Skeena Pilot Year 1 (2007)~ **200** exchanges and a reduction of **12.4 tonnes/year** of fine particulate matter (PM 2.5)
- Provincial Exchange 2008 (7 community programs) ~**600** exchanges and a reduction of **37.2 tonnes/year** of PM 2.5
- Provincial Exchange 2009 (16 community programs) ~ **1000** exchanges and the potential to reduce **62 tonnes/year** of PM 2.5
- Provincial Exchange 2010 (23 community programs) ~ **1500** exchange goal and the potential to reduce **93 tonnes/year** of PM 2.5

Winter Ambient PM_{2.5}, Libby, MT



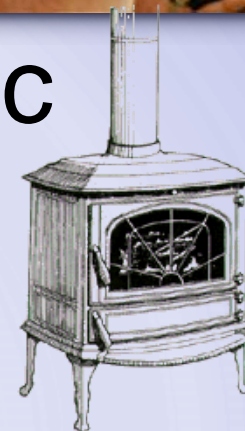


Beyond 2010

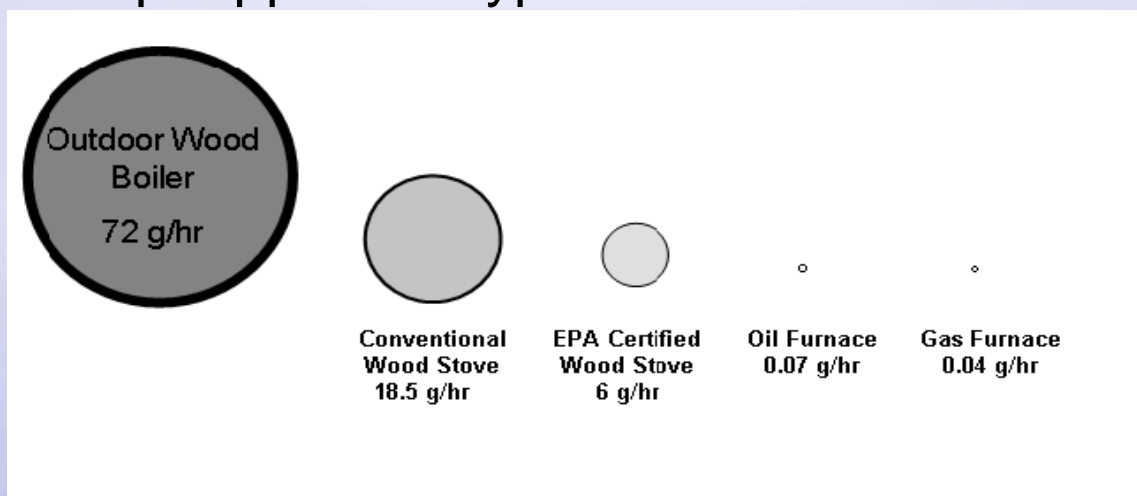
- Continued industry support for March/April programs
- Continued provincial support for coordinator resources
- Evaluation and planning to strengthen education and behaviour change
- Regulatory changes



Solid Fuel Burning Domestic Appliance Regulation



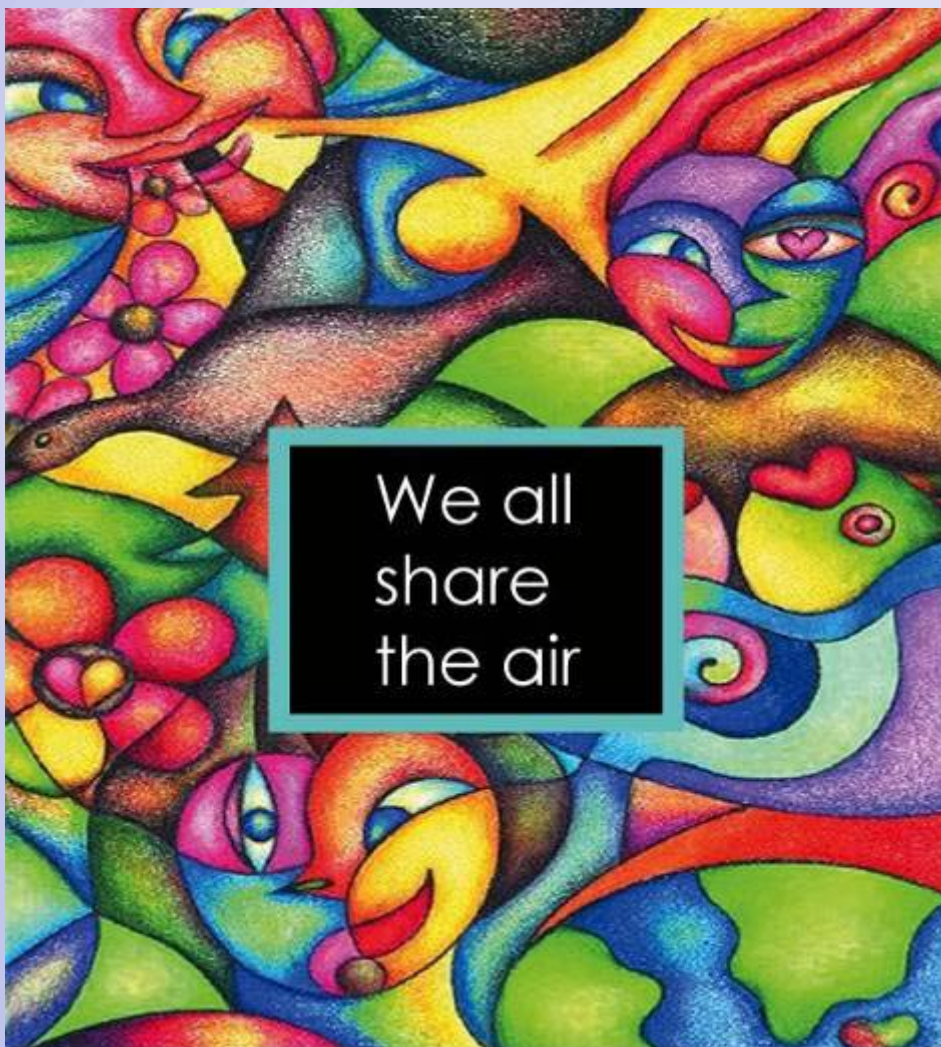
- Introduced in 1994
- Mandates that wood stoves sold in BC meet EPA or equivalent CSA emission standards for fine particulate matter
- Review of regulation will consider tightening emission standards and/or expanding scope of regulation to some currently exempt appliance types



Local Bylaws

- Environment Canada's [model municipal bylaw](#) **regulatory control strategies focus on:**
- Restriction on Some Fuels
- Installation of Woodburning Appliances;
- Non-certified Appliance Removal;
- No Burn Days;
- Nuisance;
- Opacity; and
- Outdoor Solid-fuel Combustion Appliances.





BC's Air Action Plan:

- www.bcairsmart.ca/

Air Quality Website:

- www.bcairquality.ca

Inventory of bylaws in BC:

- www.bcairquality.ca/reports/pdfs/aq_bylaws_bc.pdf