Covering Climate: A Comparative Assessment of B.C. Media¹ Shane Gunster, Simon Fraser University

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Explanations for the lack of strong public engagement with climate change often pin the blame on the failure of mainstream media to accurately report the consensus views of climatologists and other natural scientists that, first, the anthropogenic basis of global warming is an accepted fact and not a contested hypothesis, and, second, the impacts of such warming will be severe and possibly catastrophic if strong measures are not taken immediately to reduce greenhouse gas emissions. In his recent book Climate Cover-Up: The Crusade to Deny Global Warming, for instance, James Hoggan (2009) describes the diverse and well-financed efforts of a variety of groups – chief among them corporate beneficiaries of the fossil fuel economy and think-tanks promoting the virtues of neoliberal capitalism - to propagate doubt and uncertainty about the causes and consequences of climate change, even questioning whether or not global warming is actually happening (also see Jacques 2008; McRight and Dunlap 2003). As a number of media scholars have argued, such groups have had a great deal of success in disseminating this 'climate of scepticism' in the mass media (especially in North America), helping generate and sustain a widespread misperception among the general public that climate science is characterized by controversy, debate and fundamental uncertainty (e.g. Antilla 2005; Boykoff 2007; Boykoff and Boykoff 2004; Grundman 2007; Oreskes 2004). Unsure whether scientists agree that climate change is a real problem or not, the public assign it a low priority as compared with more pressing issues whose certainty is not in doubt. The recent release of thousands of private emails from the University of East Anglia's Climate Research Unit (CRU), pointed to by climate sceptics as evidence that scientists manipulated data to exaggerate the extent of global warming and conspired to prevent the publication of research which challenged their views, is but the most recent manifestation of this dynamic.

While I am highly sympathetic to the excavation of the tactics and political economy of what Hoggan and others call the 'denial industry' and agree that the media's coverage of climate science has suffered from many problems, I also worry that this focus upon science may have led us to spend too little time on how the *politics* of climate change has been framed. In this paper, I begin to address this issue by investigating how regional news media in British Columbia covered climate change during the December 2009 Conference of the Parties in Copenhagen, a UN sponsored global meeting in which national leaders met to negotiate an extension (or successor) to the Kyoto Protocol. The conference received a considerable amount of attention from the media and its political focus provides an ideal test case to examine how news media represent climate change as a *political*, rather than a merely scientific phenomena.

The choice of regional media allows us to address a second major gap in the literature, namely, the

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almost exclusive focus of scholars upon how large national media, usually leading US or UK papers, cover climate change. Very few studies, for example, have examined Canadian media (Robinson 2008) and, to my knowledge, nothing has been published on B.C. media, a rather peculiar absence given the important status climate change has played in provincial politics over the past few years. This gap is especially acute given the emerging consensus that public engagement with climate change (as with other environmental issues) depends upon furnishing the public a strong sense of its (potential) impact upon their local environment, as well as possible actions that can be undertaken in a local context (eg. CRED 2010, Leiserowitz 2005, Lorenzoni and Pidegon 2006, Segnit and Ereaut 2007).

Finally, very little work has been done comparing how mainstream and *alternative* media frame the politics of climate change despite the fact that the latter's commitment to more engaged, participatory and democratic forms of journalism (Hackett and Carroll 2006) dovetail perfectly with calls for increased grassroots mobilization and climate activism (e.g. Brulle 2010; Ockwell et al 2009). While CanWest's ownership of all the major daily newspapers in British Columbia as well as its control of community papers and local television stations has led one critic to describe the city as having "the most highly concentrated media ownership of any major city in a G7 country" (Edge 2007: 263)², independent media are also firmly established in the province, offering alternative news and opinion on local, national and international issues. Inclusion of alternative media in this study will allow us to explore the extent to which their coverage of Copenhagen differs from that offered by mainstream news.

In order to secure a broad, representative sample of B.C. media, eight different sources covering a range of different media formats, ownership structures and news genres were selected:

- *The Bill Good Show* (CKNW-Corus Radio Network): airing weekdays from 8:30am to 12pm, *The Bill Good Show* is ranked as the top political talk radio program in the province, featuring a wide range of guests, topics and calls from listeners.
- *The Early Edition* (CBC Radio One): airing weekdays from 5:30 to 8:30am, *The Early Edition* is the Vancouver morning variety program for the CBC and features both political and non-political interviews, as well as ten minute national news summaries at the top of each hour and five minute local news summaries at the bottom. For this project, all of the interviews and the 7:00am and 7:30am newscasts were coded.
- *The News Hour on Global* (Canwest): airing weekdays from 6 to 7pm, *The News Hour* is the top ranked supper hour news program in the province with a 60% share of the news audience (2008/2009) and out-polls its nearest competitor by a 3 to 1 margin (CanWest 2010).
- *Vancouver at Five* (CBC Television): airing weekdays from 5 to 5:30pm, *Vancouver at Five* is the first of three thirty-minute supper hour newscasts targeted to a Vancouver audience.
- *Vancouver Province* (Canwest): a mass circulation tabloid newspaper published weekdays and Sundays (weekly circulation: 976,588 in 2009 (Canadian Newspaper Association 2009)).
- *Vancouver Sun* (Canwest): a mass circulation broadsheet newspaper published weekdays and Saturdays (weekly circulation: 1,053,434 in 2009 (Canadian Newspaper Association 2009)).
- *The Georgia Straight* (independent): an alternative Vancouver newspaper which publishes both a weekly print edition as well as online, *The Georgia Straight* offers a combination of alternative news,

² The recent bankruptcy of CanWest and subsequent dispersal of its media holdings – including the recent sale of key television assets to Shaw – will certainly change the B.C. media landscape. However, these events occurred after the period under study in this paper (December 2009).

opinion and lifestyle features.

• *The Tyee* (independent): an online daily news magazine publishing independent news and opinion pieces, as well as an an associated blog (*The Hook*).

These eight sources encompass the most important and influential sources of provincial news in British Columbia, including talk radio, local television news, newspapers and both print and online alternative media, which are provided by corporate, public and independent news organizations.³

All items published by these sources on the topic of climate change during the Copenhagen summit – from Monday, December 7 (the opening day) to Tuesday, December 22 (three days after it concluded) – were collected based on the following keywords: "climate change", "global warming", "Copenhagen", "greenhouse gas emissions" or "CO2 [carbon dioxide] emissions". In total, 279 items were collected from the eight sources, confirming that climate change received moderate (if not extensive) attention from most regional media over the sixteen days.

Source	#	Description of items
Bill Good Show	39	each segment (defined as the content between commercial breaks) averaged 6:40 in length
The Early Edition	29	8 interview segments, with an average duration of 5:45, and 21 news items with an average duration of 1:37
The News Hour	13	average length of item is 2:29
Vancouver at Five	8	average length of item is 1:24
Vancouver Province	61	38 news items, 1 editorial, 7 columns, 5 op-eds, 10 letters
Vancouver Sun	er Sun 69 32 news items, 3 editorials, 8 columns, 8 op-eds, 1 i lifestyle feature, 16 letters	
The Georgia Straight	29	12 news items, 5 columns/blogs, 11 guest op-eds, 1 letter
The Tyee	32	2 news items, 2 editorials, 24 columns/blogs, 3 op-eds, 1 book excerpt

Table 1. Summary of M	edia Sample
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Overall, these sources yielded a good sampling of both news and opinion pieces with an almost equal balance of each with the remaining 10% consisting of letters to the editor. While many previous studies have failed to distinguish between news and opinion items (or focused only on the former), we wanted to differentiate between them given the very different roles which they occupy in the news media and the distinct ways in which they shape public opinion.

³ While all of the chosen sources are produced in Vancouver, most also have a broader regional focus and are consumed by the public outside of the Lower Mainland. In order to keep the sample size reasonable, local media which play a significant role in other provincial markets (e.g. *The Times Colonist* or *Monday Magazine* in Victoria) but which have little penetration in Vancouver were not included.

A mixed methods approach was applied to the analysis of all of the items. First, the content of each item was coded by a graduate student research assistant for a comprehensive list of characteristics including: item focus, representation of climate science, GHG emissions information, climate change impacts, arguments for and/or against taking action to reduce emissions, the promotion and/or criticism of different types of solutions to climate change, emissions reduction success stories, assessment of actions by different levels of government in Canada and climate change activism.⁴ While the different formats of these items does moderate the extent to which one can engage in a precise statistical comparison of media sources, this quantitative data does provide a good overall snapshot of the similarities and differences between different media. Second, a qualitative critical discourse analysis was undertaken which analysed all of the items to identify recurring patterns in the representation of climate change with a special emphasis upon the political aspects of the coverage.

The paper is divided into three sections. First, we will briefly examine how the science of climate change was covered and, in particular, the extent to which the CRU controversy shaped accounts of the certainty (or uncertainty) of anthropogenic global warming. Second, we take a broad, largely quantitative look at how the eight sources represented climate change politics, identifying points of convergence and divergence between the different media. Finally, we conduct a qualitative analysis of the divergent representations of politics which emerged from the mainstream media on the one hand, and alternative or independent media on the other.

News versus opinion: Diverging accounts of climate science

In the aftermath of the CRU controversy, some feared that sceptical narratives about climate science, which had abated somewhat in the aftermath of events such as Hurricane Katrina, the release of *An Inconvenient Truth* and the Fourth Assessment Report of the Intergovernmental Panel on Climate Change (IPCC), would make their return to the public sphere just in time to sabotage the Copenhagen summit. While the CRU controversy may have played some role in U.S. coverage (Hollar 2010), it played a relatively insignificant role in the news sample for this study, confirming Thomas Bowman's contention that "for all practical purposes, overcoming uncertainty about the scientific evidence is no longer the defining communications challenge [with respect to climate change]" (2009: 65).

While the controversy (and the larger 'debate' about climate science) did receive some attention in newspaper columns and op-eds as well as from callers to *The Bill Good Show* and letters to the editor, it received very little attention in news media coverage. Simply put, the issue of scientific certainty was not a major issue in the sample during the summit: 80% of all items did not even mention it, implicitly positioning anthropogenic warming as an accepted fact; of those that did raise it, 60% characterized the science as certain, 23% contained opposing perspectives on the question with only 17% – that is, 10 items, or less than 4% of the total sample – unequivocally dismissing climate science as uncertain. Most importantly perhaps, not a single one of the 125 news items characterized the science as anything other than certain. In large part this finding reflects the fact that, at least during the summit, very few (if any) institutional actors chose to challenge the science, instead adopting a consensus position that the unsavoury actions of a few scientists did nothing to undermine the basic tenets of climate change. While the blogosophere may have been afire with stories about hoaxes and conspiracies, there was simply no

⁴ As this study is part of a larger, ongoing research project, a formal intercoder reliability has not yet been conducted on these results. However, informal results from early testing suggest that such reliability will be high enough to guarantee the accuracy and validity of the coding.

institutional conduit to transmit this scepticism into the news and journalists appeared largely unwilling to lend a sympathetic ear to earlier generations of climate sceptics.

Scepticism was a persistent feature of *The Bill Good Show*, raised in just under a third of segments on climate change, but only in the context of callers challenging the views of the host and guests such as climate scientist Andrew Weaver. Bill Good had very little patience with such callers, regularly dismissing their views as not only irrational but also repeatedly suggesting that they appeared to be part of an orchestrated campaign. Indeed, one of Good's guests during this period was Donald Gutstein, author of a 2009 book on corporate propaganda: Good was largely sympathetic to Gutstein's thesis that the ideological roots of such scepticism could be traced back to public relations efforts surreptitiously launched by powerful interests which were resistant to government action on climate change (12-09-09, 8-9am)⁵. Both Good's personal interventions as well as his selection and framing of guests served to defend the integrity of scientific institutions and privilege the expert knowledge of scientists on this topic.

Paradoxically, perhaps, Good's impatience with sceptics may have helped reinforce a key element of the sceptical narrative which is the claim that such views (and the many scientists who allegedly hold them) are unfairly excluded from the mainstream media, an argument which a number of callers explicitly advanced. The relative popularity of this topic in letters to the editor in the *The Sun* and *The Province* – 11 of 26 letters directly addressed it, with 6 challenging the science and 5 defending it – may have likewise served to bolster the impression that scepticism about the science is more pervasive among the general public than news coverage tends to reflect.

The one venue which did prominently feature sceptical views was the opinion page of both daily newspapers. Both published a small number of pieces directly challenging the science, including a lengthy op-ed by prominent sceptic Christopher Booker (2009) in *The Sun* and a piece by Sarah Palin (2009) in *The Province*. Guest columns featuring provocative titles such as "Put science of global warming on public trial" (Smerconish 2009) and "The scare tacticians: 'Scientists' should face criminal prosecution" (Warren 2009) also appeared. While *The Province* published opposing viewpoints from climate scientists such as Michael Mann (2009) – one of the scientists at the centre of the CRU controversy – *The Sun* did not provide any pieces which directly took on the sceptics with respect to the science. These pieces stood in stark contrast with the overall coverage of climate science (and climate change) in the newspaper as uncontroversial, leaving one to wonder whether those writing the columns or selecting the op-eds actually read the news printed in their own paper.

For those alarmed by the past success of sceptics in using journalistic commitments to balance to secure the inclusion of their views in news about climate change, these findings represent a positive development insofar as the CRU controversy did not play much role in shaping news about Copenhagen in B.C. media. However, the fact that recent polls on the topic suggest the (American) public is, once again, growing increasingly sceptical about anthropogenic climate change (e.g. Leiserowitz et al 2010; Newport 2010) raises the troubling prospect that so-called 'hard news' on this topic may actually play very little role in shaping how the public understands it. Instead, sceptical columns and op-ed pieces, combined with impressions of a cynical public gleaned from call-in shows and letters to the editor, may be more than enough to cultivate and harness the scepticism which is more directly fuelled by online sources. Moreover, the fundamental disjuncture between opinion and news on this topic is a perfect fit with broader conservative narratives about a 'liberal' news establishment which filters information to fits

⁵ Broadcast segments on radio and television are identified by the date and time of the program in which they appeared.

its own ideological biases, reinforcing patterns of fragmented media consumption in which the only news one chooses to consume is that which confirms what one already knows (Slater 2007). At the very least, these findings suggest that concern about the vulnerability of journalists to climate scepticism might be better directed towards the role that columnists and pundits (and the editors who approve and select them) are playing in keeping doubts about climate change alive and well.

Moving on from questions about scientific certainty, how did the media cover other aspects of the science, including the current and future impacts of climate change, and the origins of greenhouse gas emissions? Overall, items which focussed on the causes and consequences of climate change were much less common than those which examined its political dimensions: less than 18% of items had science as their primary focus as compared to 73% which looked mainly at politics. Coverage of science was particularly thin in alternative media with only 4 of 61 items focussed upon the scientific aspects of climate change. Those items which did focus upon science can be divided into four basic clusters: summaries of scientific research, usually prompted by the release of a report; stories about the current and future impact of climate change on various human populations; interviews with scientists; and, as already noted, relatively a small number of items debating the validity of anthropogenic climate change.

While there were comparatively few items with a scientific focus, the mainstream media did provide a small number of surprisingly good pieces exploring various aspects of climate science, including: paleoclimatology research suggesting greater climactic sensitivity to CO2 than expected (Agence-France Presse 2009b; Alleyne and Pearce 2009), rapid melting of the Himalayan glaciers (Demick 2009), sea level rise in South East Asia (Sargent 2009), growing concerns about ocean acidification (Baron 2009b), and a report describing the increasing vulnerability of plant and animal species to climate change (Boswell 2009). Such pieces generally consisted of straight-forward summaries of existing scientific research.

Especially noteworthy were a series of reports on The News Hour which offered very powerful and emotionally compelling stories about the current and future impacts of climate change upon the developing world and, in particular, those already living in deep poverty. One item described the impact of rising sea levels, storm surges and flooding upon the coastal population of Bangladesh (Anon. 2009a), another warned of disastrous water shortages in Peru as a consequence of melting glaciers (Thompson 2009), while a third detailed the devastating consequences of drought in Northern Kenya (Anon. 2009b). "For many Canadians," observed anchor Tony Parsons, "the dire consequences of climate change seem a long way off. But that is not the case in Africa where prolonged drought and rising temperatures mean food shortages and inter-tribal warfare." Accompanied by stark images of sunbaked earth and the corpses of dead animals, a reporter explained: "climate change: you see it best from the air. Hundreds of miles of bare earth, dry rivers. On the ground you feel it, burning heat and getting hotter. And you smell the result, hundreds of thousands of cows and goats, dead and dying from hunger and thirst Climate change makes a dangerous situation worse." In each case, people from these regions spoke eloquently about their own direct experience of climate change and how it is already having destructive impacts upon their everyday lives. While such stories can foster the impression that climate change will only affect those in other regions, such items are especially significant in challenging public misconceptions that climate change is largely a problem of the future and that its impacts will, for the most part, be confined to the non-human world (Leiserowitz 2005; Sundblad et al 2007). Such stories also add an empathic dimension to public engagement with climate change which, in turn, can activate and enhance our capacity and willingness to engage in moral reasoning (Berengeur 2010).

Before giving too much credit to Canwest, though, it is worth noting that most of the good science stories were not domestically produced and neither did they have a local or regional focus. Instead, they were composed by other news organizations such as Reuters, NBC, BBC or Agence-France Presse, and

then purchased by Canwest: 3 of 4 science-based news items on *The News Hour*; 4 of 7 in *The Sun*; and 5 of 7 in *The Province* were pick ups from other media companies.

Overall, references to the impacts of climate change were quite common, with a little less than half of all items (45.2%) mentioning impacts; many of these references, however, were relatively generic and largely decontextualized, noting the potential for rising sea levels, melting glaciers or increasing droughts while giving little information about where and when these impacts will occur and who they will affect. As Table 2 shows, references to *specific* impacts upon particular regions or human populations were much less common. Descriptions of climate change impacts are much more powerful and compelling if they are contextualized in geographic and/or human terms. Items such as the *News Hour* stories about storm surges in Bangladesh or drought in Kenya are far more likely to be meaningful to readers (and to be remembered by them) than formulaic references to rising sea levels or stock video footage of collapsing ice sheets which are often inserted into climate change stories.

Climate change impacts upon:	Current*	Future**	Total***	% items in sample****
B.C.	18	15	24	8.6%
Canada (excluding B.C.)	7	14	16	5.7%
Developed world (excluding Canada)	15	11	18	6.5%
Developing world	23	30	35	12.5%
Humans	21	38	43	15.4%
Total (one or more specific impacts)	54	60	78	28.0%

Table 2: Impacts of Climate Change

* total number of items containing references to current impacts upon ...

** total number of items containing references to future impacts upon ...

*** total number of items containing references to current and/or future impacts upon ...

**** percent of total items containing references to current and/or future impacts upon ...

Likewise, one cannot underestimate the potential (and need) for *regionally specific* stories which document the (likely) impact of climate change upon areas and people which are familiar to the audience. Reflecting upon a successful campaign to raise climate change awareness in California, Nancy Cole and Susan Watrous note "when it comes to a global problem with impacts that are hard to see, geography matters; regional information addresses impacts that are tangible to residents" (2009: 187). "You have to use really specific examples to reach people and communicate urgency," observed Katherine Hayhoe, one of the authors of the California campaign" (Cited in Cole and Watrous 2009: 187). In the case of British Columbia, for example, the pine beetle infestation, collapse of the Fraser salmon fishery or the growing numbers and intensity of forest fires have the potential to serve as powerful *icons* (O'Neill and Hulme 2009)

of the fact that climate change is already upon us. The specificity of these impacts packs a powerful rhetorical punch, both in responding to the arguments of sceptics as well as making the case for action. Consider B.C. Premier Gordon Campbell's response to 'Climategate' on *The Bill Good Show*:

The science is pretty clear. And there is frankly no better case study of that than right here in British Columbia where we're losing 80% of our pine forest because we were waiting for over a decade for a cold winter to come which never came ... It's costing our economy literally billions of dollars, not just in the short-term but in the long-term We've had floods, we've had fires. Last summer, we had the largest fire season in the history of the province, over \$400 million that's almost 8x what a regular forest fire season in BC would be. So these changes are here, we have to act on them. (12-07-09, 9-10am)

Statements such as this were, unfortunately, all too rare in the coverage. Instead, references to the impact of climate change upon B.C. appeared only sporadically in all types of regional media, depriving British Columbians of context which could have helped position climate change as a *local* rather than a primarily global issue and established linkages between the discussions in Copenhagen and the environment and economy at home.

A second weak spot was a lack of specific information about emissions sources. Such data is essential for the public to engage with the issue of climate change in any meaningful way at both the personal (lifestyle) and political level. Especially important is comparative data about emissions which allows individuals to get a much better understanding of not only the specific causes of climate change, but also the potential trade-offs and compromises which will be necessary in deciding how to reduce emissions in a fair and effective manner. What, for example, is the relative contribution of our dietary, transportation, leisure and housing choices to our carbon footprint? How do different industrial practices and sectors (e.g. oil and gas extraction) compare to transportation, buildings and land-use in terms of GHG emissions? Where are emissions rising, where are they falling, why, and by how much? Only 39 of 279 items contained information relevant to these questions. Particularly surprising was the almost complete absence of data on per-capita emissions, an essential part of climate justice arguments which insist that the developed world bear primary responsibility for emissions reductions given their disproportionate contribution to the problem. Such data is readily available and particularly relevant for Canadians given the fact that our per-capita emissions are second only to Australia, and much higher than other countries with a comparable climate and lifestyle (Conference Board of Canada 2008). Yet percapita figures appeared in only 8 of 279 items throughout the sample period. Alternative media were as weak as mainstream media on this count with The Georgia Straight and The Tyee containing only one per-capita reference each. Also largely absent from the mainstream media was any historical accounting of emissions (i.e. the concept of 'climate debt') or any attempt to distinguish between the 'luxury' emissions of the developed world and the 'subsistence' emissions of much of the developing world. Without a clear picture of who and what is contributing to the problem of climate change it becomes very difficult to develop informed opinions about how the problem should be addressed or even to recognize one's own responsibility for it, both as a consumer and as a citizen.

Seeking solutions, finding none: Climate politics as bad news

A common criticism often levied against the mass media's portrayal of environmental issues is their tendency to privilege solutions based on lifestyle change, technological innovation and market dynamics while largely ignoring or dismissing the need for more direct forms of political intervention (Smith 1998). Such a consumer frame not only conforms with the commercial media's dependence upon advertising revenues but is also resonant with the individualistic and broadly neo-liberal ethos which has dominated North American social and political culture over the past three decades. Political events such as the Copenhagen summit, however, create opportunities for alternative narratives to emerge insofar as news media are forced to address the prospect and the need for coordinated government action to respond

to environmental crisis. Temporarily at least, a political frame can displace competing perspectives on the environment and this was certainly the case with respect to coverage of Copenhagen: as noted above, over 73% of all items in the sample had a political focus as compared to less than 18% on climate science and a minuscule 3.2% which explored other aspects of climate change, including lifestyle and consumption practices. The emphasis upon politics was especially prominent in alternative media with close to 90% of their stories concentrating upon the political dimensions of the summit and climate change more broadly.

Beyond simply emphasizing the topic of politics, most items also accorded priority to political action as a means of reducing GHG emissions, as compared to proposals for voluntary, lifestyle change or the development and introduction of new technologies. An emphasis upon solutions played a very important role in media discourse during this period: over 70% of all items contained the promotion and/or criticism of different types of solutions to climate change (as distinct from mere mentions) and this ratio was roughly consistent across all media sources and types. We coded for the presence of explicit, clear and normative arguments about three types of solutions: political (actions taken by government which are mandatory in nature), voluntary/lifestyle (voluntary actions undertaken by individuals or businesses) and technological (mandatory or voluntary actions which focus upon the use/development of technological). Political solutions appeared in close to 90% of those items which referred to a solution, as compared to 27.5% for technological solutions and less than 10% for voluntary/lifestyle solutions. Moreover, in the vast majority of cases in which they appeared (95%), political solutions were promoted while they were only rarely (13%) subject to criticism. Explicit arguments against government intervention, much like scepticism about climate science, were largely restricted to opinion items: in The Sun and The Province, for example, 71% of all news items contained arguments promoting political solutions, with only 1.4% opposing such solutions; the frequency of promotional arguments across all editorials, columns and opeds was equally high (72.7%), but close to 1/3 of those items also criticized such solutions. Technological solutions figured strongly in The Bill Good Show, in large part as a consequence of several segments exploring the growth of the renewable energy sector in British Columbia, as well as in many of the columns and op-eds in the daily newspapers. However, the theme of technological salvation played a relatively minor role in news discourse, with little more than 10% of news items promoting technological innovation as a solution to climate change.⁶ The biggest surprise, though, was the almost complete absence of voluntary and/or lifestyle-based solutions which appeared in less than 7% of news and opinion items combined.

Items were also coded for the presence of specific arguments in favour of (strong) action on climate change and those used to oppose such action. In the former case, six broad arguments were identified which are commonly marshalled to support the need for action: 1) action is necessary to avoid (potential) adverse consequences of climate change on Canada (including British Columbia); 2) action is necessary to avoid (potential) adverse consequences on the world (excluding specific references to Canada); 3) action is necessary because we have a moral obligation to take responsibility for past and present emissions; 4) action is necessary to preserve and/or enhance one's international reputation

⁶ The relatively low incidence of items focusing upon technology may, in part, be a product of our keywords. In our research, for example, we came across a number of items which explored renewable energy but which were not included because they did not contain any of our keywords and thus did not draw any explicit connections between such technological innovation and climate change.

(especially Canada); 5) action is favoured because it will provide economic opportunities; 6) action is favoured because it will bring non-climate change related benefits (e.g. energy security, reduce other forms of pollution, etc). While this list is not exhaustive, it captured a large majority of relevant arguments. One or more of these arguments were present in 35% of the sample items. This ratio was consistent across all sources with the single exception of *The Georgia Straight* in which such arguments were almost twice as likely (62%) to be present, and which was the only source to include all of them. Table 3 shows the relative frequency of each argument, both for the overall sample (as a % of total items which contain the argument) as well as the rank order of each argument in each media source.

	%	BG	EE	NH	VF	Prov	Sun	GS	Tyee
Avoid adverse consequences to world	17	3	2	1	n/a	1	1	1	1
Moral obligation b/c caused emissions	12	n/a	2	2	n/a	2	2	2	2
Avoid adverse consequences to Canada	9.3	2	4	n/a	n/a	4	2	3	3
Economic opportunity/green economy	9	1	1	n/a	n/a	5	4	4	3
Act to preserve international reputation	4.3	n/a	4	3	n/a	3	5	5	n/a
Action brings additional benefits	2.2	3	n/a	n/a	n/a	n/a	n/a	6	5

 Table 3: Arguments for Action, Ranked in Order of Frequency

As the table illustrates, the comparative emphasis upon these arguments did not significantly differ across media sources with the most common argument being the need to act to avoid the adverse consequences of climate change, described in both Canadian and global terms. More positive framing of environmental initiatives as facilitating the green economy was comparatively rare, with the exception of the two radio programs which both contained multiple segments featuring local 'green' entrepreneurs, politicians and pundits who actively sought to reframe climate action as providing B.C. with valuable economic opportunities. While many have argued that the best way to promote climate action is through 'win-win' arguments which emphasize the multiple benefits in brings in addition to reducing emission levels and thus appeal to broader constituencies than simply those alarmed by climate change (Foust and O'Shannon 2009), such arguments were entirely missing from the mainstream media, aside from a couple of mentions on *The Bill Good Show*.

Each item was also coded for the presence of seven arguments which are commonly used to criticize strong (Canadian) action on climate change: 1) action is unnecessary because climate science is uncertain; 2) action will harm the economy; 3) action by Canada is unimportant given the country's small contributions to global emissions (as compared to China or the U.S.); 4) Canada should do nothing other than harmonize its approach with the U.S.; 5) global action represents little more than a transfer of wealth from the developed to the developing world; 6) changing lifestyle and/or industrial practices is too difficult/expensive; 7) actions are unfair because they impose higher burdens upon some than others. The frequency of these arguments was somewhat less than those in favour of action: one or more of them appeared in 26% of all items. They appeared with much higher frequency (56.4%) on *The Bill Good Show* than any other source. In large part, this can be attributed to the strong presence of callers who were sharply critical of the Copenhagen summit. As Table 4 shows, the most consistent argument against climate action which appeared was that it will have harmful effects upon the economy, suggesting

that the environment *versus* the economy frame which has dominated media discourse about the environment remained prevalent during this period. Conversely (and as noted earlier), arguments about 'bad science' played a very minor role in the coverage, appearing in only 13 of

	%	BG	EE	NH	VF	Prov	Sun	GS	Tyee
Bad for the economy	13	2	1	1	1	1	1	1	1
Unfair wealth transfer to 3 rd world	10	1	n/a	n/a	1	4	2	2	n/a
Canada must harmonize with U.S.	5.7	4	2	n/a	1	2	4	2	1
Science is uncertain	4.7	3	n/a	n/a	n/a	4	4	2	1
Imposes unfair burden on some	4.3	6	n/a	n/a	n/a	2	3	2	2
Canadian emissions negligible	1.4	4	n/a	n/a	n/a	n/a	7	n/a	n/a
Unable to change lifestyles/practices	1.4	6	n/a	n/a	n/a	n/a	6	n/a	n/a

Table 4: Arguments Against Action, Ranked in Order of Frequency

279 items (and, in 3 of those, such arguments were raised solely for the purpose of debunking them). Such arguments did not appear in any news items but were entirely restricted to call-in segments, columns, op-eds and letters to the editor. Unlike arguments in favour of action (which appeared in roughly equal numbers in both news and opinion items), anti-action arguments were much more prevalent in opinion (34%) than in news (16%). To put this another way, news items were twice as likely to contain arguments favouring action as compared to opposing it, while pro- and anti-action arguments were present in equal numbers in opinion items.

If the need and desirability of political action to address climate change was a dominant theme of the Copenhagen coverage, the utter *failure* of existing political institutions and processes to deliver such action was another. A full exploration of this dynamic and the very different portrayal of politics and political action by mainstream and alternative media will be undertaken in the following section. For now, though, it is worth noting that the most consistent political theme in all regional media was criticism of the Canadian government. From Vancouver mayor Gregor Robertson on The Early Edition lamenting Canada's "despicable record on emissions" (12-14-09, 7-8am) and headlines in The Sun and The Province proclaiming "Canada ranks poorly in climate change study" (Cryderman 2009) and "B.C.'ers feel 'shame' at climate meet" (Chan 2009) to Tyee columnist Murray Dobbin's searing portrait of "Canada's ugly new face", critical stories about Canada saturated the coverage. Close to 40% of all sample items painted Canada in a negative light: of those items which contained some assessment of Canada's performance, 80% were entirely disapproving, 14% contained mixed reviews with only 6% praising the country's actions. The censure of Canada was based on a wide range of reasons, including failure to implement effective domestic policies on reducing GHG emissions, adoption of weak reduction targets (and switching the base year for those targets from 1990 to 2005), rejection of the previously ratified Kyoto Accord, uncompromising support for the tar sands, and presiding over high levels of emissions growth over the past two decades.

Virtually no attention, though, was devoted to the exploration of alternative policies or programs which the country could or should have adopted in order to improve its performance. Except for a single

column in The Sun, for example, no consideration at all was given to any of the proposals made by federal opposition parties despite the fact that both the Liberals and the Green Party had made environmental policies on climate change the central focus of their campaigns during the previous election. In the one instance the Liberal program was mentioned, political columnist Barbara Yaffe (2009) dismissed it as little more than empty rhetoric given the failure of previous Liberal governments to tackle emissions reductions seriously. Instead, the only attention Liberal politicians received during the summit was when they criticized lax Parliamentary security in the wake of a Greenpeace protest and a botched bit of political theatre in which they were forced to apologize for a photo-shopped image of the Prime Minister as Lee Harvey Oswald which appeared on their website. The federal New Democrats and the Greens did not receive any coverage at all. Bipartisan promotion of specific climate policies received slightly more attention with, for example, matched op-ed pieces in The Sun authored by resource economist Mark Jaccard (2009) and business leader John Wiebe (2009) making a strong case for a capand-trade regime and increased government investment in renewable energy. However, aside from these two pieces (and a highly self-interested op-ed from the head of the Canadian Manufacturers and Exporters Association (Myers 2009)), substantive engagement with questions of Canadian policy and regulation were almost entirely absent from B.C. media. Such omissions are especially troubling given the robust discussion of diverse range of policy options offered by a wide range of Canadian nongovernmental organizations from the David Suzuki Foundation and the Pembina Institute (Bramley et al 2009) to the C.D. Howe Institute (Samson and Stamler 2009) to the Canadian Centre for Policy Alternatives (Campbell and Stainsby 2008) along with many others. On the one hand, then, the public was bombarded with messages about how poorly the Canadian government had performed on this file while on the other hand, there was virtually no discussion or debate of which policies, laws and regulations might actually be effective in bringing down emissions levels.

As one might expect, treatment of the B.C. government as well as the City of Vancouver was somewhat more positive in the wake of Premier Campbell and Mayor Gregor Robertson travelling to Copenhagen to boast about provincial and municipal initiatives undertaken to fight climate change. Both levels of government received much less treatment than Canada with 14% of items containing assessments of the provincial government and only 6% discussing the city's record (as compared to the over 40% of items which discussed the federal government). Overall, the representation of B.C. initiatives was mixed, with 80% of items containing favourable assessments and 60% unfavourable, while Vancouver's actions were portrayed quite positively with all 17 items containing positive reviews and only 4 offering a critical assessment. Increased public engagement with climate change during the summit offered an ideal opportunity to assess the effect of B.C. policies such as the carbon tax in reducing emissions, as well as investigate some of the contradictions of the provincial approach to climate change, including its support for Gateway transportation initiatives, oil and gas development and the under-reported construction of the Enbridge pipeline to bring bitumen from the tar sands to Asian markets. With the notable exception of Province columnist (and occasional guest-host of The Bill Good Show) Michael Smyth (2009a, 2009b), these contradictions received little coverage in the mainstream media. They were, however, covered in a more consistent and substantive fashion in several in-depth items which appeared in both The Tyee and The Georgia Straight (e.g. Paley 2009, Mills 2009, Kimmett 2009a, 2009b). Such stories provided an important alternative to the largely celebratory narrative which otherwise dominated news of the Premier's trip to Copenhagen (including his much publicized receipt of an award from a B.C. renewable energy association).

Coverage of Vancouver was highly laudatory of the city's exemplary record of reducing its emissions by 11% since 2000 (e.g. Mercer 2009). Stories about the city, however, were also comparatively rare (with items mentioning Vancouver only occurring two or three times in each source during the summit),

relatively superficial (with very little explanation of the policies through which such emissions reductions had been achieved) and, most importantly perhaps, all too often compartmentalized from other items criticizing inaction or failure on the part of other levels of government. Vancouver's record on emissions could, for example, have served as a powerful antidote to the pervasive suggestion that steep increases in Canadian emissions were unavoidable given high levels of economic and population growth. Concrete evidence that specific government initiatives are effective can invigorate a sense of the political sphere as a space for practical action on climate change. It can encourage the public to question why some governments are more effective than others in this area. Success stories (however partial or limited) can help move the public towards engaging with climate change as a problem which can (and must) be addressed through political action. It proves that the pursuit of political solutions, a key part of media narratives as noted above, does not have to inevitably end in failure. Conversely, the marginalization of such narratives in favour of stories which dwell upon nothing but the failures of political actors and institutions can destroy the capacity of the public to invest any hope in the political process. It is worth noting that in the case of Copenhagen, the level of coverage provided to different governments was inversely proportional to their success in tackling climate change.

Chris Turner's remarkable 2007 book *The Geography of Hope: A Tour of the World We Need* and his recent May 2010 piece in *The Walrus* entitled "The New Grand Tour", both of which explore *existing* policies, practices and technologies which could easily be adopted on a much wider scale, remind us of the power that good journalism holds to help us learn from and be inspired by others while simultaneously wondering why we have failed to take similar action. The global setting for Copenhagen provided an ideal backdrop for investigating the programs and policies of other jurisdictions to help the public better understand why Canada's record is so poor as compared with other countries, especially those of Northern Europe. Unfortunately, regional media coverage was largely bereft of such content with less than 9% of all items containing examples of governments (Canadian or otherwise), individuals, businesses or non-governmental organizations which have actually reduced GHG emissions. Such actions were widely on display on Copenhagen at events such as the conference of the ICLEI (Local Governments for Sustainability) which showcased many of the successful initiatives undertaken by subnational governments to fight climate change. These examples of successful government action, though, went largely ignored, with less than 10 of 279 items (2.9%) containing any reference to actions undertaken by non-Canadian governments which have reduced emissions.

'No they can't' or 'yes we can'? Competing visions of climate politics in media narratives

"Imagine trying to get two hundred disparate people to unanimously agree on how to live their lives for the next fifty years. That would be complicated enough. This is worse." (*Vancouver at Five*, 12-16-09) Punctuated by images of exhausted and grim looking negotiators, these words by the CBC's Adrienne Arsenault symbolize the sweeping sense of hopelessness and impossibility which pervaded mainstream media coverage of the Copenhagen summit. In most mainstream media stories and reports, the political sphere appeared as little more than a space of endless bickering and intractable gridlock, with participants both unwilling and unable to deliver any effective action on climate change. The United Nations framework mandating the consensual negotiation of a global treaty was depicted as hopelessly naive in the cutthroat arena international *realpolitik* where national self-interest always prevails over the common good. Compounding such impressions for the Canadian public was the federal government's widely reported status as climate pariah, an obstructionist (if largely irrelevant) player which was loudly criticized for doing whatever it could to block any progress towards a meaningful agreement. The theme of irreconcilable divisions was also acted out on a national stage as the provincial

governments of Ontario and Quebec arrayed themselves against the Conservative government, charging that its poor record on climate change stemmed from its partisan defence of oil sands development. For their part, Conservative politicians (and their ideological allies in the media) defensively shot back that previous Liberal governments had an even worse record on the issue, further cultivating a 'plague on both your houses' cynicism.

Whether smug or despairing, columnists and op-ed writers generally agreed that, in the face of such overwhelming economic, political and even cultural intransigence, the chance that dialogue and deliberation could produce some kind of compromise or even mutual political understanding on the issue was next to none. Writing at the conclusion of the summit, Craig McInnes (2009), a thoughtful and politically progressive columnist from the *The Sun* with considerable sympathy for environmental issues, put it like this:

What Copenhagen demonstrates again is that we don't have a system of international governance that allows a global interest to override national interests, especially when the objecting nations have the military or economic clout to go their own way. With climate change, we have an issue in which a significant portion of rich and powerful countries, including Canada, perceive that their own self-interests are at odds with the global interest of reducing greenhouse gas emissions quickly enough to ward off catastrophic climate change There is no clear road to an agreement among the richest countries of the world, including Canada, that would require us to curb economic growth. At least not yet. Voluntarily limiting growth, risking jobs and hobbling business goes against the grain of everything we know about how to measure success, individually, as communities and as a country.

McInnes allows that democratic pressure from citizens could change all this, but concludes by noting that, at least in Canada, people are unlikely to take such action. At one level, this column (and others like it) do nothing more than offer a critical, sober and accurate assessment of the real impasse which plagues climate politics at the global level. If it is thoroughly depressing in its sentiments, this is only because it honestly reflects the thoroughly depressing state of international climate change negotiations. However, the accumulation of news and opinion which does nothing but focus upon the endless gridlock and inertia of dominant political institutions hammers home the far more corrosive message that this is all climate politics can ever be, an exercise in public relations in which those with power must pretend they are committed to action while nothing concrete ever gets done. Cynical political narratives are, of course, hardly unique to climate change: from financial reform and third world development to child poverty and homelessness, one finds equally pessimistic renderings of politics which take root in the gap between rhetoric and inaction, challenging the hope that political action could be anything other than a bureaucratic administration of the status-quo.

In the case of Copenhagen, these depressing visions were anchored in a vision of the political sphere as the almost exclusive purview of nation-states which have neither the will nor the capacity to do anything other than pursue their own national self-interest, itself narrowly defined as defending the economic interests of core domestic industrial and commercial sectors. In such a context, the belief that a climate treaty could be negotiated based upon conceptions of an environmental common good, principles of social justice or even the basic tenets of climate science *must* appear naive. Any hope that the political sphere could accommodate the process of coming together to develop a unified, collective response to risk that threatens all of humanity was dashed with story after story about the deep divisions between countries, their inability and unwillingness to compromise, and their dogged pursuit of national self-interest. In the case of Canada, for instance, the country's dependence upon carbon-intensive industries (not to mention its huge size and cold climate) were regularly trotted out in both opinion and news pieces to rationalize our failure to implement strong targets and policies. Such national interests

were almost always depicted in reified form as themselves beyond the sphere of political debate and action, a non-negotiable 'reality' which climate politics must simply accept and accommodate. Conversely, the 'realities' of climate science which define maximum thresholds and tipping points beyond which the risk of environmental catastrophe becomes ungovernable were largely missing from the picture. In particular, they faded almost entirely from view in the summit's final days as the news media framed conference participants as engaged in a classic prisoner's dilemma (or giant game of chicken), with developed nations characterized as (justifiably) refusing to take on major emissions reductions while others such as China continued with 'business-as-usual'. In fact, the alleged intransigence of China – coupled with its status as the world's worst polluter, symbolized in the offreepeated claim that it was constructing one new coal-fired power plant each week – rather than the uncertainties of climate science (or improprieties of climate scientists) became the favoured symbol of those arguing against strong action in Copenhagen. Once you accept the premise, as mainstream media did, that political agency on climate change rests entirely in the hands of national governments, the cynical conclusion that climate politics is a hopeless exercise, mired in the swamp of irreconcilable national self-interests, falls automatically into place.

For their part, alternative media were no less critical of the summit's politics or its final outcome. Indeed, it is fair to say that the anger and frustration on display there was more visceral than the more temperate prose on the pages of The Sun or The Province. One of the Straight's bloggers, for instance, likened the conduct of national leaders to Neville Chamberlain's policy of appeasement, accusing Harper and Obama as having the blood of millions on their hands for trying to pass off the final agreement as "comprehensive" and "meaningful" (Smith 2009). In more sober but no less critical terms, regular Straight columnist Gwynne Dyer explained that "each year in which we don't reach an adequate global climate deal is probably costing us on the order of fifty million premature deaths between now and the end of the century" (2009). Moreover, unlike the mainstream media which largely confined its attention to specific political institutions and processes, the alternative media offered a much broader indictment of contemporary economic, social and cultural structures. In a lengthy essay published in The Tyee, for instance, Michael M'Gonigle (2009) developed the argument that real progress on climate change was impossible until fundamental questions of economic and growth, and the role of states and markets in protecting and promoting it, were addressed. In effect, M'Gonigle called for the renovation of virtually all aspects of our society, not the least of which was the very language and concepts through which we think and talk about it. It was a powerful and well-argued (if throughly depressing) piece, and exemplary of the willingness of the alternative media to pose tough questions and tackle big ideas in order to force its readers to think about the politics of climate change (and the limits of those politics) in profound ways.

Yet unlike the posture of indignant yet impotent resignation which characterized so much of the mainstream media's account of climate politics, alternative media both offered and demanded a far more active and engaged political sensibility in which outrage with existing institutions was cause for action and not despair, a potent fuel with which to energize multiple forms of popular, democratic mobilization. Diagnostic assessments of the limits of conventional politics and existing institutions inspired calls for *more* rather than less political engagement, a demand that we actively confront those with power and influence rather than abandon the political field to their control. Such engagement not only feeds upon the hope, nourished by historical example and consciousness, that democratic pressure can compel those institutions to behave differently, but also awakens our political imagination to the utopian prospect of inventing new institutions and even new forms of politics in response to environmental crisis. Such an expansion of the conceptual and affective spaces for climate politics produces an orientation that is simultaneously more critical and pessimistic about the limits of existing structures and practices, yet also

more optimistic about the opportunities for collective political agency and intervention.

While environmental activists are often tarred with the 'doom and gloom' label for their stark warnings of impending ecological apocalypse, the infusion of activist sentiments into the environmental journalism of alternative media produced news and opinion that was, on the whole, far more hopeful and inspiring than what was offered by mainstream media. Both *The Georgia Straight* and *The Tyee* opened their op-ed pages to political activists directly engaged in the politics of climate change at both a global and a local level. Unlike most mainstream media stories and columns in which activists typically appear as one source (or soundbite) among many, alternative media provided them with the space to weave their ideas and their passion into a coherent set of arguments and, more importantly perhaps, serve as powerful exemplars of an engaged political subjectivity. In this case, the multiple points of symbiotic contact between alternative media and social movements may have been the single most important factor responsible for the very different visions of politics developed by mainstream and alternative media.

Exemplary in this respect was the Canadian Youth Delegation, a group of young Canadians who travelled to Copenhagen as representatives of the Canadian Youth Climate Coalition to join with other activists in pushing for a strong global treaty and pressure the federal government to play a more constructive role in negotiations. In a passionate op-ed in *The Georgia Straight*, delegation member Tria Donaldson (2009) described her disappointment with the summit:

Millions of people around the world, myself included, are suffering from what I call 'Copenhagen syndrome' – a feeling of hopelessness and directionless [sic] after the disastrous round of climate-change negotiations in Copenhagen. So much time, energy, and emotion was invested in the Copenhagen summit because it was supposed to be 'the end' – the moment when the world came together and created a deal that would set the solutions in motion, if not save the world entirely.

After explaining why a deal was so important in terms of mitigating the damaging impacts of climate change, she described her initial high hopes for the summit. "As a young person, I thought that governments of the world would take this threat to my future more seriously." In a clever rhetorical strategy, she invoked a naive faith in politics in order to intensify her experience of betrayal at the hands of those who should have acted differently. But rather than cynically accepting this revelation about the *realpolitik* of global negotiations, she frames that experience of betrayal as motivation to continue the struggle. "All I know," she concludes, "is that I am in the second phase of Copenhagen syndrome. After the mourning period, it is time to fight. And COP 16 is not that far away."

Equally remarkable was the thoughts of another member of the delegation, Jamie Biggar (2009), published as a response to the critique by M'Gonigle noted above. While Biggar largely agreed with M'Gonigle's claim that fundamental economic and political transformation was required for meaningful and effective interventions on climate change, he ventured that climate politics is increasingly filled with examples of activism and political radicalization which might make such transformation possible. "Climate treaty summits have a funny way of radicalizing people whose gut instinct is to be part of the establishment," he wrote, citing climate scientist James Hansen's adoption of the tactics of civil disobedience to challenge the U.S. coal industry. "The list of establishment types who no longer believe that regular channels can solve the problem is getting longer." After a thoughtful and extensive reflection on the question "how do we get what we can from the dominant institutions that exist today while we build the dominant institutions that we need tomorrow," Biggar ended, like Donaldson, on a hopeful note. "I'm thinking about the thousands of Canadians," he wrote,

that have worked together over the last months and are now making phone calls and hitting the streets – many of whom, maybe most, had never been politically engaged before in their lives. I know that for many of these people, certainly for myself, this is the first time that they have felt

like they were part of something so much bigger than themselves. There's something powerful brewing, M.M., something that almost shakes with its energy and potential.

Brilliantly shifting between a normative injunction to practice a different kind of politics and an empirical description of those politics in action, pieces such as these invite the public to join with likeminded others in a collective, political response to the failures and shortcomings of existing political institutions. While direct invitations to political engagement were few and far between in the mainstream media, their routine appearance in alternative media had the overall effect of positioning activism rather than apathy as the most logical (and satisfying) approach to political alienation.

Beyond these literal political overtures, there was also a powerful congruence between the call for political engagement with climate change and the greater intellectual demands for conceptual engagement placed upon its readers by the alternative media. Many pieces in The Georgia Straight and The Tyee, especially longer investigative features and essays, had a much higher level of complexity and sophistication than most mainstream media stories, particularly news reports, which tended to be brief as well as fragmented in form. Rather than simplifying ideas for ease of consumption or glossing over context in favour of eye-catching phrases, images or events, alternative media news and opinion tended to spend more time digging into the background and details of a particular issue. Consider, for example, a feature by Dawn Paley (2009) in The Georgia Straight on the Burrard Thermal station, an aging natural gas power plant which has become a contested icon in the battle over whether to turn over B.C. rivers to the development of private 'run-of-river' hydroelectricity projects. At over 1,600 words, the story was twice the length of the longest news items in either The Sun or The Province, over three times longer than the average Sun news story and almost five times the average in The Province. It contained interviews with a wide range of sources from local politicians, area residents and plant workers to academics and environmental organizations, patiently detailing the arguments of those who favour closing the plant given its GHG emissions and pollution as well as those who want to keep it running to minimize B.C. Hydro's reliance upon private power producers. Neither a quick nor particularly easy read, the piece demanded more than a superficial scan from readers, treating them as citizens both able and willing to devote some time to learning about the local dimensions of climate change politics.

Many of the opinion pieces in The Tyee and The Georgia Straight were equally challenging, both assuming and interpellating a readership that was intelligent, informed and intellectually engaged with the issue of climate change, receptive to arguments which relied on both empirical evidence and more abstract forms of moral, political and philosophical reasoning and, above all, eager to engage with climate politics as active citizens, not passive observers. Where mainstream media depicted a reified public sphere in which the capacity to exercise political choice has been largely stripped from us, alternative media adopted a moralized language of crisis, agency and collective responsibility, insisting that the choice of whether to mobilize global resources to confront climate change or continue with business as usual is one that properly belongs to everyone. Departing from the so-called "regime of objectivity" (Hackett and Zhao 1998) which prioritizes an ostensibly neutral account of the world, alternative media were far more likely to use facts and figures as the building blocks of argument and opinion, normalizing an active and engaged orientation to the world in which one is motivated and even compelled to make political choices and assume some measure of accountability for them. The diet of media served up by The Georgia Straight on the first day of the talks is illustrative of this dynamic. First up was an editorial penned by The Guardian (Georgia Straight Staff 2009) newspaper in collaboration with more than twenty other papers which drew upon a range of scientific, historical, economic and political evidence to make the case for a fair, ambitious and binding global treaty; next was an op-ed from Bob Geldof (2009) stressing the potential for innovative solutions to climate change in Africa to spur the continent's social, economic and political development; third, another op-ed from Gerry Barr

(2009) arguing the need to conceptualize climate justice as a human rights issue; and, finally, a blog entry (Lupick 2009) noting Canada's receipt of the Fossil of the Day award which explained the background and rationale for the award in far greater detail than ever appeared in the mainstream media. These items were filled with more detailed empirical evidence than most news stories, but in each case this evidence was embedded within the exposition and development of a political argument. This is not to say that polemic entirely displaces journalism, but that the luxury of being a casual, disinterested observer of politics is a much harder identity to sustain in the discursive universe of alternative media. Instead, items such as these give our political faculties a regular workout, forcing us to make use of our capacity for political reasoning and, hopefully, schooling us in the art and the pleasures of political deliberation.

Images and accounts of collective action were reasonably common in media coverage of the summit, appearing in just over 15% of all sample items during the period. Scenes of often violent clashes between protesters and police in Copenhagen itself, along with reports about more peaceful demonstrations in other cities around the world did help convey the impression that growing numbers of citizens are dissatisfied with the lack of political action on climate change. Mainstream media's coverage of protest was generally sympathetic with little of the social and cultural marginalization of demonstrators one often finds in media representations of civil disobedience. Yet embedded in larger narratives of climate politics dominated by closed door negotiations between governments, such actions also appeared as largely ineffectual. More importantly perhaps, they seemed to be driven by little more than the simplistic demand that governments do more. Protest, in other words, was depicted as a kind of inchoate rage against the system. Almost entirely absent in this coverage was any sustained attention to the constructive, deliberative aspects of activist political engagement as expressed through venues such as the People's Climate Summit – Klima forum 09 - a gathering of hundreds of non-government organizations from around the world, including environmental groups, labour unions, farmers, students and local community organizations. While The Province printed one surprisingly good news report on the alternative conference (Agence France-Press 2009), it was otherwise entirely ignored by mainstream media.

In contrast, both *The Tyee* and *The Georgia Straight* emphasized these alternative deliberative fora in their coverage, illuminating a positive, solutions-focused dimension to climate activism and exploring how political protest was firmly grounded in an alternative vision of climate politics as a thoroughly *democratic* exercise (e.g. Hiskes 2009; Ravensbergen 2009; Beresford 2009). In direct contrast to the gridlock and intransigence of the formal negotiations, these stories helped (re)establish the viability of setting priorities, building policies and negotiating compromises through creative and innovative processes of consultation, dialogue, participation and collaboration, each of which was guided by values of empathy and the common good, rather than personal (and national) self-interest. Challenging representations of the primary divisions of climate politics as constituted through national identity, these fora (and coverage of them) offered alternative political narratives defined by emerging affinities between 'ordinary' people from all countries based upon basic principles of justice and equity. Beyond the virtues of any particular proposal or policy, the real significance of such coverage lay in how it challenged dominant images of climate politics as a space of delay, division and failure, instead providing compelling evidence that alternative forms of political engagement are not only possible, but actively practised by those committed to charting a different course on climate change.

Final thought: The interdependence of scientific and political engagement

In recent years, many who study and practice climate change communication have expressed concern that appeals to the public based upon terrifying scenarios of ecological collapse and human suffering are

not only ineffective but ultimately counter-productive, leaving people less rather than more motivated to tackle the issue of global warming. As one recent study concluded, "the very images that made participants have the greatest sense of climate change being important were also disempowering at a personal level. These images were said to drive feelings of helplessness, remoteness and lack of control" (O'Neill et al 2009: 373). The blame for this dynamic is almost always attributed to the message and/or messenger along with the injunction to ease up on the fear. The question that is almost never raised, however, is whether the real problem is not communication which accurately and honestly depicts the truly horrifying consequences of climate change, but rather the absence of solutions which are commensurate with the scale of the threat. The problem isn't too much fear, but too little capacity to respond to that fear in any meaningful way. The problem, in other words, is too little politics.

Writing about the need for communication about climate change to promote civic engagement, Robert Brulle cites a useful distinction between threat and challenge messaging from the literature on the psychology of risk. On the one hand, threat messages "are those in which the perception of danger exceeds the perception of abilities or resources to cope with the stressor." Challenge appraisals, on the other hand, "are those in which the perception of danger does not exceed the perception of resources or abilities to cope" (Tomaka et al in Brulle 2010: 92). When risks are perceived as threats (i.e. beyond our capacity to respond), they generate maladaptive behaviour in the form of denial, paralysis or apathy. However, when they are understood as challenges (i.e. within our capacity to respond), they will often "galvanize creative ideas and actions in ways that transform and strength the resilience and creativity of individuals and communities" (Fritze et al in Brulle 2010: 92).

Getting the science right is clearly a crucial part of motivating civic engagement with climate change. Even more important, however, is getting the politics right – which means, on the one hand, providing critical assessments of the performance of existing political institutions, practices and structures and a wide range of analysis, opinion and debate on the role that government can and should play in the use of legal, regulatory and policy interventions to mitigate (and adapt to) climate change; on the other hand, it must also involve mapping the political topography of those forms of civic participation and engagement which lie at the margins and in the interstices of institutional politics, and awakening the public to a political power that lies within its reach but which it has yet to grasp. Denial, indifference and pessimism: these are as much the symptoms of our anaemic political culture as our scientific illiteracy. Indeed, the real crisis may not be that some of us deny the reality of climate change, but rather that most of us have accepted the 'reality' that politics and existing political institutions have no answer to this problem. So climate change is perceived as a threat, not a challenge.

If mainstream media in B.C. were largely innocent (with a few notable exceptions) of the charge of fomenting climate scepticism during the Copenhagen summit, they were surely guilty of presenting a monochromatic image of climate politics as a failed enterprise, inevitably doomed by the inescapable and irresolvable clash of national self-interest which sets the developed world against the developing world with little hope for negotiation or compromise. Invigorated by their conceptual and organizational affinities with social and political movements of climate activism, alternative media offered a no less pessimistic account of institutionalized climate politics, but portrayed it as only one of many possible futures, nurturing the hope that by adopting a different form of climate politics we might confront climate change not as a threat, but as a challenge that lies within our collective power to address.

Works Cited

- Agence France-Presse (2009). "Common folk also fighting global warming," *The Province* (December 10), p. A21.
- Agence France-Presse (2009b). "New study revises global warming to a higher degree," *The Province* (December 21), p. A18.
- Alleyne, Richard and Fred Pearce (2009). "Earth sensitive to CO2 changes," *The Vancouver Sun* (December 7), p. B4.
- Anonymous [Reporter] (2009a). "Sea level rise in Bangladesh," *News Hour on Global* (December 7), 6-7pm.
- Anonymous [Reporter] (2009b). "Drought and climate change in Kenya," *News Hour on Global* (December 9), 6-7pm.
- Antilla, Liise (2005). "Climate of scepticism: US newspaper coverage of the science of climate change," *Global Environmental Change Part A* 15.4 (December): 338-352.
- Baron, Ethan (2009). "Experts tackle three climate questions," The Province (December 20), p. A17.
- Baron, Ethan (2009b). "Acidification threatens the world's fish species," *The Province* (December 13), p. A24.
- Barr, Gerry (2009). "The road to environmental justice starts in Copenhagen," *The Georgia Straight* (December 7), np.
- Beresford, Charley (2009). "Police, demonstrators flood the streets of Copenhagen," *The Tyee* (December 13), np.
- Berenguer, Jaime (2010). "The effect of empathy in environmental moral reasoning," *Environment and Behavior* 42.1 (January): 110-134.
- Biggar, Jamie (2009). "In Copenhagen: The New Radicals," The Tyee (December 18), np.
- Boswell, Randy (2009). "Canada home to five of 10 species in peril," *The Vancouver Sun* (December 15), p. B1.
- Booker, Christopher (2009). "Blindfolds are hiding the crucial issues at the Copenhagen conference," *The Vancouver Sun* (December 11), p. A19.
- Bowman, Thomas (2009). "A Turning Point in Climate Change Communication Priorities," *International Journal for Sustainability Communication* 4: 64-77.
- Boykoff, Maxwell (2007). "From convergence to contention: United States media representations of anthropogenic climate change science," *Transactions of the Institute for British Geographers* 32.4 (October): 477-489.
- Boykoff, Maxwell and Jules Boykoff (2004). "Balance as bias: global warming and the US prestige press," *Global Environmental Change* 14: 125-136.
- Bramley, Matthew, Pierre Sadik and Dale Marshall (2009). *Climate Leadership, Economic Prosperity: Final report on an economic study of greenhouse gas targets and policies for Canada*. The Pembina Institute and the David Suzuki Foundation.
- Brulle, Robert (2010). "From Environmental Campaigns to Advancing the Public Dialog: Environmental Communication for Civic Engagement," *Environmental Communication* 4.1 (March): 82-98.
- Campbell, Colin R. and Cliff Stainsby (2008). *Greenhouse Gas Emission Reduction Scenarios for BC*. Canadian Centre for Policy Alternatives.
- Canadian Newspaper Association (2009). "Circulation Data Report (2009)" Accessed from http://www.cna-acj.ca/en/system/files/2009CirculationDataReport 1.pdf on May 18, 2010.
- CanWest (2010). "A jumpstart every night: Audience share (%)". Accessed from www.canwestglobal. com/advertising/broadcast/television/stations/globalbc/pdf/GlobalBCNewsHour.pdf on May 18,

2010.

Centre for Research on Environmental Decisions (CRED) (2010). *The Psychology of Climate Change Communication: A Guide for Scientists, Journalists, Educators, Political Aides and the Interested Public.* New York: Columbia University.

Chan, Cheryl (2009). "B.C.'ers feel 'shame' at climate meet," *The Province* (December 17), p. A16. Conference Board of Canada (2008), "Environment: GHG Emissions Per Capita." Cited from

- http://www.conferenceboard.ca/hcp/details/environment/greenhouse-gas-emissions.aspx#_ftn3. Cryderman, Kelly (2009). "Canada ranks poorly in climate change study," *The Vancouver*
- Sun (December 14), p. B1
- Demick, Barbara (2009). "Glacier at 'third pole' receding at record pace," *The Vancouver Sun* (December 17), p. B13.
- Donaldson, Tria (2009). "After Copenhagen, Canadians must keep fighting for climate action," *The Georgia Straight* (December 21), np.

Dyer, Gwynne (2009). "The aftermath of Copenhagen," The Georgia Straight (December 21), np.

Edge, Marc (2007). Asper Nation. Vancouver: New Star Books.

- Foust, Christine and William O'Shannon Murphy (2009). "Revealing and reframing apocalyptic tragedy in global warming discourse," *Environmental Communication* 3.2 (2009): 151-167.
- Geldof, Bob (2009). "At Copenhagen, Africa can and must be part of the solution to climate change," *The Georgia Straight* (December 7), np.
- Georgia Straight Staff (2009). "Copenhagen climate change conference: 'Fourteen days to seal history's judgement on this generation," *The Georgia Straight* (December 7), np.
- Grundman, Reinder (2007). "Climate Change and Knowledge Politics," *Environmental Politics* 16.3 (June): 414-432.
- Hackett, Robert and William Carroll (2006). *Remaking Media: The Struggle to Democratize Public Communication*. New York: Routledge.
- Hackett, Robert and Yuezhi Zhao (1998). Sustaining democracy? Journalism and the Politics of Objectivity. Toronto: Garamond Press.
- Hiskes, Jonathan (2009). "In a frenzied Copenhagen, crucial climate talks begin," *The Tyee* (December 7), np.
- Hoggan, James (2009). *Climate Cover-Up: The Crusade to Deny Global Warming*. Vancouver: Greystone Books.
- Hollar, Julie (2010). "Climategate' overshadows Copenhagen," Extra 23.2 (February): 6-8.
- Jacques, Peter (2008). "The organisation of denial: Conservative think tanks and environmental scepticism," *Environmental Politics* 17.3 (June): 349-385.
- Kimmett, Colleen (2009a). "Gateway at odds with B.C.'s carbon goals, protesters say," *The Tyee* (December 8), np.
- Kimmett, Colleen (2009b). "Campbell's carbon tax praised in Copenhagen," *The Tyee* (December 16), np.
- Leiserowitz, Anthony (2005). "American Risk Perceptions: Is Climate Change Dangerous?" *Risk Analysis* 25.6 (2005): 1433-1442.
- Leiserowitz, Anthony, Ed Maibach and Connie Roser-Renouf (2010). *Climate change in the American Mind: Americans' global warming beliefs and attitudes in January 2010.* Yale University and George Mason University. New Haven, CT: Yale Project on Climate Change.
- Lorenzoni, Irene and Nick F. Pidgeon (2006). "Public Views on Climate Change: European and USA Perspectives," *Climatic Change* 77: 73-95.
- Lupick, Travis (2009). "Canada takes 'Fossil' award on first day of Copenhagen climate conference,"

The Georgia Straight (December 7), np.

M'Gonigle, Michael (2009). "The Elephants of Doom in Copenhagen," The Tyee (December 8), np.

- Mann, Michael (2009). "Climategate' is just a bid to cloud the issue," *The Province* (December 20), p. A22.
- McInnes, Craig (2009). "After Copenhagen," The Vancouver Sun (December 22), p. B1.
- McRight, Aaron and Riley Dunlap (2003). "Defeating Kyoto: The Conservative Movement's Impact on US Climate Change Policy," *Social Problems* 50.3 (2003): 348-373.
- Mercer, Katie (2009). "Vancouver leading the way," The Province (December 11), p. A3.
- Mills, Carmen (2009). "With B.C. building Gateway to climate chaos, it's time for direct action," *The Georgia Straight* (December 11), np.
- Myers, Jayson (2009). "Don't let Copenhagen impede progress," *The Vancouver Sun* (December 8), p. A15.
- Newport, Frank (2010). "Americans' Global Warming Concerns Continue to Drop," *Gallup* (March 11). Accessed from http://www.gallup.com/poll/126560/americans-global-warming-concerns -continue-drop.aspx on May 18, 2010.
- O'Neill, Saffron and Mike Hulme, "An iconic approach for representing climate change," *Global Environmental Change* 19 (2009): 402-10.
- O'Neill, Saffron and Sophie Nicholson-Cole (2009). "'Fear Won't Do It': Promoting Positive Engagement with Climate Change Through Visual and Iconic Representations," *Science Communication* 30.3 (March 2009): 355-379.
- Ockwell, David, Lorraine Whitmarsh and Saffron O'Neill (2009). "Forcing People to be Green or Fostering Grass-Roots Engagement? Reorienting Climate Change Communication for Effective Mitigation," *Science Communication* 30.3: 305-327.
- Oreskes, Naomi (2004). "Beyond the Ivory Tower: The Scientific Consensus on Climate Change," *Science* 306.5702 (December 3): 1686.
- Paley, Dawn (2009). "Burrard Thermal: A victim of private power," *The Georgia Straight* (December 10), np.
- Palin, Sarah (2009). "Obama should boycott this politicized conference," *The Province* (December 10), p. A18.
- Ravensbergen, David (2009). "In the heart of Copenhagen, a 'people's climate forum'," *The Tyee* (December 11), np.
- Samson, Roger A. and Stephanie Bailey Stamler (2009). *Going Green for Less: Cost-Effective Alternative Energy Sources*. C.D. Howe Institute.
- Sargent, Richard (2009). "Thai villages fighting back rising seas," The Province (December 10), p. C16.
- Slater, Michael (2007). "Reinforcing Spirals: The Mutual Influence of Media Selectivity and Media Effects and Their Impact on Individual Behavior and Social Identity," *Communication Theory* 17.3 (August): 281-303.
- Segnit, Nat and Gill Ereaut (2007). *Warm Words II: How the climate story is evolving and the lessons we can learn for encouraging public action*. London: Institute for Public Policy Research.
- Smerconish, Michael (2009). "Put science of global warming on trial," *The Province* (December 9), p. A18.
- Smith, Charlie (2009). "World leaders in Copenhagen tell citizens, 'Go home and get a nice quiet sleep'," *The Georgia Straight* (December 18), np.
- Smith, Toby (1998). *The Myth of Green Marketing: Tending our Goats at the Edge of the Apocalypse*. Toronto: University of Toronto Press.
- Smyth, Michael (2009b). "Greenhouse gases spewing in 'green' B.C.," The Province (December 22), p.

A6.

- Smyth, Michael (2009a). "Campbell won't be talking about back-sliding," *The Province* (December 8), p. A6.
- Sundblad, Eva-Lotta, Anders Biel and Tommy Garling (2007). "Cognitive and affective risk judgements related to climate change," *Journal of Environmental Psychology* 37: 97-106.
- Thompson, Anne [Reporter] (2009). "Melting glaciers in Peru," *News Hour on Global* (December 8), 6-7pm.

Turner, Chris (2010). "The New Grand Tour," The Walrus 7.4 (May): 24-33.

Turner, Chris (2007). The Geography of Hope: A Tour of the World We Need. Toronto: Random House.

- Robinson, Jennifer (2008). "The Framing of Climate Change in Canadian, American and International Newspapers: A Media Propaganda Model Analysis," *Canadian Journal of Communication* 33: 233-255.
- Warren, David (2009). "The scare tacticians: 'Scientists' should face criminal prosecution," *The Vancouver Sun* (Dec 18), p. A17.
- Yaffe, Barbara (2009). "Liberal attack on Harper's environmental record is full of hot air," *The Vancouver Sun* (December 10), p. B5.