Speaking Power to Truth

Cultural Dialectics
Series editor: Raphael Foshay

> *The difference between subject and object slices through*
> *subject as well as through object.*
> —Theodor W. Adorno

Cultural Dialectics provides an open arena in which to debate questions of culture and dialectic—their practices, their theoretical forms, and their relations to one another and to other spheres and modes of inquiry. Approaches that draw on any of the following are especially encouraged: continental philosophy, psychoanalysis, the Frankfurt and Birmingham schools of cultural theory, deconstruction, gender theory, postcoloniality, and interdisciplinarity.

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Speaking Power to Truth: Digital Discourse and the Public Intellectual
Edited by Michael Keren and Richard Hawkins

Speaking Power to Truth

Digital Discourse and the Public Intellectual

EDITED BY MICHAEL KEREN AND RICHARD HAWKINS

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Introduction

New Challenges to Knowledge in the Public Sphere

RICHARD HAWKINS AND MICHAEL KEREN

The ability to imagine and to reason logically toward an outcome is an attribute that defines humanity and shapes human civilization. In every society, however, the social function and value of some individuals is defined primarily or exclusively in terms of thinking—of being able to perform intellectual work. The outcomes are learning and knowledge, but also the possibility for action. Almost by definition, once something new is known, the potential exists to do something new or to do it differently. Thus, human civilizations have generally accommodated the idea that the pursuit of knowledge is not an idle pursuit—that it has consequences, which, depending upon many circumstances, may be perceived in a positive or negative way by the power structures that govern these civilizations.

Perhaps because scholars, writers, scientists, and artists can be seen to perform a social function as intellectuals, they have often been characterized as a distinct community or even as a social class. Certainly throughout its history as a proper noun, "intellectual" has typically imbued its nominee not only with knowledge, insight, and expertise but also with social, political, and ethical responsibilities to intervene in issues of the day on behalf of the public good. There is, of course, no necessary connection between intellect

and virtue, especially public virtue. Nevertheless, for as long as there have been intellectuals, there is evidence that they have been involved in public life, sometimes from within the political system, as advisors, experts, or administrators, but also from without, as critics, activists, and advocates.

It is this external and nominally independent role that has long held the closest association with the figure of the "public intellectual," whom, in various ways, the authors in this volume define or describe broadly as a person concerned with symbols and ideas who comments publicly on the social condition with the objective of influencing or guiding its future. In practice, however, it is actually very difficult to place public intellectuals within social role categories, partly because they typically place themselves in the position of attributing social roles to others. The sociological literature has mostly followed the notion proposed by Edward Shils (1970) of the public intellectual as having some contact with the transcendental. Public intellectuals were seen as burdened with a mission: to introduce society to a universal set of norms sanctioned by a higher authority, like the biblical prophet who speaks divine truth to earthly powers. This prototype lies at the core of works by Mannheim ([1936] 1968), Parsons (1970), and others who considered intellectuals to be located in a given society yet versed in a universal culture, nurturing it and feeding its values back to that society.

This somewhat romanticized notion finds its apogee in "speaking truth to power," which has become a cliché for the social function of the public intellectual. However, this aphorism can be challenged in that it is hardly as if "truth" in this idealized form is any stranger to power. Intellectuals can also seek and obtain formal positions of power after the manner of a Disraeli, Wilson, Paderewski, or Havel. Others can decline such positions and, after the manner of Zola or Gandhi, become more powerful than the powers to which they speak. Indeed, one could argue that it is precisely by confusing power and truth in the public mind that totalitarianism can flourish—a process in which, historically, many intellectuals have also been complicit (Arendt 1978).

Knowledge in Contemporary Political Discourse

Power also speaks to truth to the extent that truth is associated with knowledge as established through investigation, experimentation, evaluation, and documentation. The production and dissemination of knowledge is

subject to powerful internal forces of governance and oversight. This fact tends more easily to be perceived negatively in terms of abuses like suppression or censorship. But much the same set of forces also serve the positive function of establishing standards of practice by which knowledge is pursued systematically and new contributions to knowledge are assessed and classified. What historically have been accepted as "truths," in the sense of distinguishing knowledge from opinion or fact from fiction, are themselves products of complex negotiations, often over long periods of time, between progressive and repressive forces that coexist within the inherently disputatious governance structures of knowledge production (Ziman 1978; Gibbons 1999; Latour and Woolgar 1979; Mulkay 1991).

This is particularly noteworthy when we construe a public voice for academics, whose work, unlike that of journalists, novelists, or advocates, is largely conducted and debated well out of the public gaze but whose intellectual credibility has a long historical association with independent evaluation and validation through peer review. Polanyi (1962) proposed that the internal dynamics of the scientific enterprise constitute a "republic," subject to its own enforced norms of behaviour, whose primary responsibilities are confined mainly to the practice of systematic inquiry, as opposed to the utility or social relevance of its outcomes. However, to the extent that such a republic exists, it is an easy target for subversion. For example, Canadian scientists employed by government laboratories are now faced with a dictate from the government in power that prohibits them from disclosing and discussing their scientific findings in media interviews even though they are allowed to present these findings to other scientists at academic conferences that are nominally public. In other words, talking to other scientists is allowed because the public generally does not participate in this discourse anyway. Talking directly to the public at large is not allowed. Thus, the internal dynamics of the scientific community are manipulated for purposes of political message management while avoiding charges of outright censorship.

Powerful internal and external forces shape the process by which knowledge is defined and produced, and not always to the good. The issues are compounded as regards the utilization of knowledge, which can depend on how closely that knowledge conforms to dominant political narratives (Connolly 1983; MacRae 1976; Majone 1989). These narratives are now most strongly inflected by economic imperatives. Already by the 1960s,

Heilbroner (1962) could detect this inflection in the terms of political discourse, in that the perception of the nation-state had evolved from that of a "community" or "society," implying a need to govern, to that of an "economy," implying a need to manage. In such a regime, knowledge becomes valued not as a pathway to social or civic enlightenment but according to its demonstrated ability to add to the national bottom line.

More than at any previous time, the social value of knowledge is becoming harnessed to the ideological construct of "market forces." Over the past thirty or so years, for example, it has become the norm for governments who fund academic research to justify this expenditure by stressing its economic utility (Mowery et al. 2004). The exact nature of this utility is usually crudely or dubiously defined, as the aim is more to bring science into line with dominant liberal or neoliberal social values than to realize any economic value from science. The result is that universities are pressured to demonstrate specific and often short-term economic returns on public investments in education and research and to participate directly in turning knowledge into money (Feller 1990). In the face of such pressures, the public space of intellectual life can appear less the domain of appeals to transcendental notions of ethics, morality, and justice and more that of hard-nosed economics, which its proponents would assume to embody social virtues (Keren 1993).

Substantiating the Intellectual Foundations of Public Speech

Apart from the problem of defining a social role or category for the public intellectual, attributing this role to individuals is also problematic. As with Kenneth Clarke's iconic description of civilization as something you can define only when you see it, it may seem that these figures are much easier to identify than to typify. The situation is further complicated by the fact that not everyone who is engaged in intellectual pursuits seeks or accepts opportunities to become a public figure. Thus, it can be difficult to discuss public intellectuals as a social and political institution apart from specific personalities whose points of view happen to achieve public prominence.

It is even more difficult to link what an individual might say in the putative role of public intellectual with any actual substance, other than position and reputation—in other words, to link public pronouncements with the fruits of systematic thought and investigation, whether in the form of

facts and evidence or genuine insight. The question of evidence is important because, arguably, a unique quality of intellectually inspired contributions to public life, as opposed to the mere adoption and promotion of an opinion, is a sense that the contribution is rooted not just in awareness, which to a superficial extent anyone can acquire quite easily, but also in an epistemology. This assumption of epistemological rigour links contributions to debates of the day with an understanding of what knowledge is with respect to a particular subject, how to recognize it, how to differentiate it from ignorance, and how to define its relevance in different contexts.

It is precisely this issue of substantiation that forms the primary focus of this volume and that distinguishes its arguments and conclusions from most of the literature on this subject. Previous explorations of public intellectuals tend to be biographical, focusing on specific individuals who have assumed this role, or sociological, focusing on public intellectuals collectively as a social institution, or political, focusing on interest groups and movements associated with particular intellectual positions or ideologies. Our focus in this volume is squarely upon the question of intellectual substance. We are concerned to investigate the evolution of intellectual substance per se in the interaction between public life, as embodied in the issues and debates of the day, and intellectual life, as embodied in the production and dissemination of knowledge. In particular, our concerns lie with how the question of substantiation is faring in a public sphere increasingly dominated by an ever-expanding array of electronic media that are increasingly bereft of indications as to the source, credibility, or epistemological framework of the content they carry.

In the sense explored here, the public sphere refers generally to the milieu in which the institutions and practices of social and political governance interact with the general population engaged in everyday life. In the broad tradition of the Frankfurt School, extending from Horkheimer and Marcuse in the 1930s and 1940s to Habermas in the present day, critical theorists have explored various versions of the theme that the public sphere has become defined by communication media. The purveyors of media are seen to acquire great political power, both as gatekeepers and as shapers of the public consciousness. In this regime, who speaks is determined by who grants access to the media, with the content and nature of the speech itself being forged by this power relationship.

Certainly public intellectuals require access to the public via a communication platform of some description, whether it be the speaker's stump, the book, the editorial column, or, increasingly, the sound bite, the blog, or the Tweet. Historically, the access of individuals to communication media has been restricted, whether by political power, by commercial considerations, or simply by production and distribution costs. The basic political economy of what conventionally has been referred to as mass media—books, periodicals, and broadcast media—spawned a copious literature on elites that has strongly inflected most views of the public intellectual as a social institution. In this environment, achieving the social status of public intellectual might seem like the product of a Faustian bargain between the purveyor of ideas and the purveyors of media. Inevitably, the influence of the media also raises questions about the credibility, or reliability, of intellectuals in the public eye and about how the role of the public intellectual is constructed, particularly in relation to concerns regarding the criteria by which the interests that own and control these media select individuals for public exposure in this role.

Departing from this tradition, the present collection of essays ponders the future of intellectuals in a technologically mediated public sphere that is no longer characterized by scarcity but instead by abundance. Ours is an era defined by an expanding diversity of open and interactive communication media to which a majority of the world's population now has access. Apparently in stark contrast to the rise of the traditional mass media, which first fascinated critical theorists in the 1930s, never before has the potential been greater for more individuals to communicate more directly with others in a greater variety of ways and, superficially at least, with fewer, and lower, entry barriers and less restriction and oversight.

This change has spawned multitudes of claims and counterclaims to the effect that democratic processes and the conduct of public affairs are being transformed in this new milieu. The authors represented here take issue with these claims. From a variety of perspectives and in several different contexts, they question assumptions that have crept, whether intentionally or surreptitiously, into recent discussions of media and politics to the effect that truth is a simple function of the amount of speech. This quantitative approach to truth implies that, as technology enables the number of speakers to grow, power relationships will accordingly be transformed, such that democratic principles and goals are promoted and nurtured. This tendency is a particularly insidious new form of technological determinism, in which

social and political dynamics are confused with technological characteristics. Because access to the Internet appears to be "open," the tendency is to argue either that this openness is a product of democratic social forces—a dubious historical assumption—or, worse, that public affairs as conducted in this sphere will adopt similarly open characteristics—a dubious technological as well as political assumption.

In terms of our central concern with substantiation—with what underpins the credibility of those who appear in nominally public intellectual roles, as well as the validity of their statements and the quality of their insights—this new abundance of access to the public sphere raises many intriguing issues. One is that entirely obscure or even anonymous individuals and groups can now have access to the means of communicating with a mass audience on much the same basis as identifiable individuals and established institutions. Another is that the kind of wisdom and sagacity once attributed only to identifiable individuals and institutions is now commonly attributed to crowds or conferred upon disembodied bloggers.

While the authors in this volume do comment upon the social role of the public intellectual, their main concern is with fundamental questions about the basic concepts of truth, knowledge, and power in the contemporary public sphere. Technology is not regarded merely as an enabler of communication but as yet another embodiment of powers that seek to shape and mobilize public opinion to various ends. Much as intellectual life is no guarantor of virtue, neither is access to the public sphere through new technology a guarantor of independence or objectivity, much less veracity. Thus, the authors are concerned less with what public intellectuals are or what they say than with what underpins the credibility of interveners in the public sphere who seek to influence issues of the day with appeals to symbols and ideas.

Such concerns are overtly political and not contingent upon any particular interpretation or resolution of broader philosophical debates about the definition of knowledge or the objectivity of science, questions that have entertained the human mind for millennia and, barring catastrophe, are likely to persist for millennia more. Unavoidably, the reflections presented in this volume must engage with various aspects of sometimes long-standing debates about both public intellectuals and evolving media. However, the aim is to go beyond these debates and to explore their implications for the future in terms of how the fruits of intellectual work will be incorporated

into the public sphere in a world where access to the agora of ideas is puta-
tively unrestricted. Will the intellectual as a community or class be rede-
fined? Will intellectual activity thrive or lose relevance? Will it matter? Or
how will it matter?

Synopsis

The following chapters represent a wide range of perspectives on the issues
raised above and take several approaches to exploring different aspects of
the role, function, and future of the intellectual in the public sphere. These
essays are divided into two parts. The first part applies perspectives ranging
from the empirical to the philosophical to general questions and issues per-
taining to the nature of knowledge, the dynamics of knowledge production,
and the place of intellectuals in public life. The second part focuses in on
some of the real-life challenges that confront public intellectuals who oper-
ate in the new technological milieu. These case histories have a pronounced
existential dimension. Three of them are rooted in the concrete experience
of their authors, who have embraced and/or been thrust into public intel-
lectual roles. These chapters illuminate how this crucial issue of substantia-
tion plays out in contemporary practice in today's media environment and
demonstrate the many pitfalls that may await intellectuals in the evolving
public sphere when they challenge the substance of prevailing views and
popular opinions.

In opening part 1, Richard Hawkins goes to the heart of the knowledge
production process by exploring the often uneasy historical relationship
between science and scientists and the public sphere, and, more generally,
the challenges that arise when knowledge producers in universities assume
the role of public intellectuals. He argues that, in a political sense, this rela-
tionship goes far beyond the public communication of science or the public
debate over scientific issues. As he observes, the fruits of academic investi-
gation must now compete in a new information "ether" in which many of
the traditional knowledge hierarchies have become confused. This makes
it more difficult to substantiate not only the legitimacy of statements and
opinions that claim a basis in science but in fact the very relevance of claims
to scientific validation. Hawkins discusses how this situation can weaken
the status of science and scientists in the public sphere and also how the
internal dynamics of science as a profession and a career can sometimes

subvert attempts to shape social outcomes with appeals to evidence and rigorous analysis.

In chapter 2, Eleanor Townsley argues that, despite the encroachment of new media, long-standing, and traditionally elite, formats for the expression of ideas continue to exert significant force in the shaping of public opinion. Through an empirical comparison of the opinion columns in the *New York Times* and the *Globe and Mail*, Townsley explores the ways that cultural forces (including the media industry itself) work to influence who has the opportunity to speak in the "space of opinion," as well as defining the terms of the debate—observing, for example, that the debate among the purveyors of opinion in the United States reflects partisan polarization to a greater extent than in Canada. While acknowledging that digital formats have contributed to a certain fragmentation of opinion, Townsley suggests that the impact of new media lies more with their ability to multiply the former powers of syndication. Not only do digital formats enable the views of an opinion columnist to reach far beyond the readers of printed newspapers, but the increasing interconnectedness of the landscape of opinion allows for more rapid dissemination and commentary. As Townsley points out, insofar as this broader landscape conditions the shape of opinionated speech, we would do well to focus attention on the implications of the transformation of public intellectuals into media intellectuals.

In chapter 3, Jacob Foster carries the discussion into the new media environment, which is putatively oriented away from an elite media class. Specifically, he casts a critical eye upon the prospect that "epistemic collectivism," or the construction of a collective intelligence from many individual contributions, might, in an age of interactive electronic media, supplant the single, autonomous intellect, thus undermining any future place for individuals in traditional public intellectual roles. He proposes that such a construction fundamentally misunderstands the nature of intelligence, collective or otherwise, and suggests that it is unsubstantiated faith in the inherent superiority of collective intelligence that presents potentially the most significant problem for political discourse. For Foster, the role of public intellectuals in a world of social media is to constitute a "representative meritocracy" capable of mediating between different degrees of collective intelligence on the basis of the recognition of expertise. Far from undermining democracy, he argues, the creation of a "digital republic empowered by

devotion to individual creativity and the critical sense" would rescue collective epistemologies from descending into the mentality of the mob.

Chapter 4 turns to a very different dimension of collectivism, one in which public activism is undertaken anonymously by online communities. Drawing on Kierkegaard's "The Present Age," with its image of a passive "phantom public," and on the work of Internet theorists such as Clay Shirky, Charles Leadbeater, and Geert Lovink, Liz Pirnie explores the topical phenomenon of "hacktivism" and probes the potential of organized online communities to engage the public in political debate. In place of autonomous public intellectuals, who are increasingly swayed by motives of self-promotion, she suggests that we need to look to decentralized networks of individuals who work collectively to translate social critique into real-world expressions of dissent. Through her investigation of the online community Anonymous and its efforts to expose social wrongs, she proposes that this form of action may emerge to fill a vacuum caused by the detachment of conventional political and social institutions from the publics they are intended to serve.

In chapter 5, Boaz Miller sets the stage for part 2 of the volume by situating the discussion of the epistemological role of public intellectuals—their function in setting out knowledge frameworks for the pursuit of social and political outcomes—within the context of calls for action on the part of specific public intellectuals on an issue of growing concern, namely, anthropogenic climate change. Focusing on the arguments advanced by two very high-profile Canadian public intellectuals, one with a scientific background, the other a novelist and social critic, he examines how the two construct very different epistemologies concerning exactly the same issue. In so doing, Miller also reengages the question of scientific evidence and the challenges of deploying it in an effort to sway public opinion. As he demonstrates, both David Suzuki and Margaret Atwood base their pleas for action on the claim that global warming is an incontrovertible scientific fact, and yet neither of the social epistemic frameworks they employ is entirely capable of supporting this claim.

Chapter 6 steps directly into the lived experience of public intellectuals. In 2003, Karim-Aly Kassam was named one of Alberta's fifty most influential people. His contributions to public life draw in part upon his applied research in human ecology conducted in the circumpolar Arctic and the mountains of Central Asia, two regions that furnish illustrations used in his

chapter. By inverting the "speaking truth to power" aphorism, the title of this volume draws attention to the ways in which truth can be usurped by the powerful, not always in the public interest. Kassam nevertheless makes a compelling case that this need not be so—that it is not impossible for truth to usurp power. But he is also very clear about the personal preparation and humility, as well as the institutional integrity, that are required before the public intellectual can muster truth to these ends. Kassam accordingly emphasizes the manner in which individuals become prepared, especially through academic training, to assume roles as public intellectuals. University professors should, he argues, serve as exemplars for students by making a habit of public scholarship—an activity that arises out of a sense of civic responsibility and is in fact fundamental to intellectual life in a democracy. Moreover, rather than continuing to view teaching as separate from research, we must integrate applied research into pedagogical practices so as to encourage students to pursue new insights founded on the direct experience of life and on a commitment to bettering the human condition in ways that recognize and respect the environments and the web of relationships on which people depend for their survival.

In chapter 7, Barry Cooper reflects on his own encounter with public notoriety as a university professor cast into the role of public intellectual. He begins by reflecting on the modern figure of the public intellectual in the light of classical Greek conceptions of the role of the poet-philosopher in political life, as someone who opposed the rule of tyranny through reasoned philosophical critique. Cooper argues that this role gave way, in the twentieth century, to what he calls "the philotyranny of the intellectuals," who, while short on philosophical insights, are long on obscurantist jargon and ideological fealty. He goes on to put flesh on the bone by illustrating, from his own experience, the issues that come into play for academic governance when academic freedom is exercised to take positions that are polarizing or otherwise unpopular among substantial portions of the population. Somewhat ruefully, Cooper concludes that, aside from common sense and the ability to write reasonably clearly, public intellectuals in Canada today must be equipped with a keen sense of irony.

In chapter 8, Michael Keren concludes the discussion by exploring a similar experience, one pertaining not to the academic milieu but to new media and new forms of political discussion. The issue revolves around how those who offer commentary in the digital public sphere react to criticism

of themselves. In this case, the criticism took the form of comments made by the author about the degree of influence that unsubstantiated opinion, of the sort that appears frequently on blogs, will have on political discussion—comments that, from the standpoint of bloggers, represented a dissenting position. Surveying the online response to these comments, Keren argues that public discourse in the new media cannot be compared to the Greek agora, as some scholars suggest, without considering warnings, such as those issued in 1930 by José Ortega y Gasset in *The Revolt of the Masses*, on the dangers of political discourse that lacks inner inhibitions or constitutional constraints. Online discourse engages more individuals in the public conversation than ever before and also broadens that conversation to include private concerns hitherto excluded from the public sphere. All too often, however, the disinhibition associated with online behaviour produces anything but the civil, reasoned discourse demanded of intellectual activity.

Taken together, the authors in this volume show that the most significant issues for the future of the public intellectual as a social institution go well beyond the technological or social evolution of communication media. Intellectuals face many new challenges, generated by a multitude of factors—by public attitudes toward learning and knowledge, by practical needs that require knowledge to be applied to solving problems, and, increasingly, by often new and different commercial imperatives. There are also challenges from within as many of the criteria that have historically defined the objectivity and credibility of intellectuals, in particular concerning science, come under scrutiny, and even attack, from intellectuals themselves.

In reality, power also speaks to truth, sometimes elevating it, often suppressing it. In today's media, opportunities have never been greater for the exploitation of ideas and symbols in countless causes and by increasingly faceless interests seemingly devoid of Ortega y Gasset's inhibitions and constraints. Nevertheless, in the face of these observations, it is by no means clear that any fundamental balance between power and truth in the new media environment is shifting. What is spoken continues to be powerful to the extent that it conforms to prevailing political narratives, which continue to be embodied in media of information and communication. That these media are evolving is beyond question, but this likewise has always been so.

As the essays in this volume suggest, while media may evolve, power still speaks to truth much in the same ways as ever. The substantiation

of knowledge claims, as embodied in ideas and symbols, is not increased merely by disseminating them, or by sharing them, or by broadening the definitions of knowledge, but in some way by transcending the media of communication, as indeed has always been the lot of the public intellectual.

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6 Engendering a New Generation of Public Intellectuals

Speaking Truth to Power with Grace and Humility

KARIM-ALY KASSAM

"I die, I die!" the Mother said,
"My Children die for lack of Bread.
What more has the merciless Tyrant said?"
The Monk sat down on the Stony Bed.

The blood red ran from the Grey Monk's side,
His hands & feet were wounded wide,
His Body bent his arms & knees
Like to the roots of ancient trees.

His eye was dry; no tear could flow:
A hollow groan first spoke his woe.
He trembled & shudder'd upon the Bed;
At length with a feeble cry he said:

"When God commanded this hand to write
In the studious hours of deep midnight,
He told me the writing I wrote should prove
The Bane of all that on Earth I lov'd.

"My Brother starv'd between two Walls,
His Children's Cry my Soul appalls:
I mock'd at the wrack & griding chain,
My bent body mocks their torturing pain.

"Thy Father drew his sword in the North,
With his thousands strong he marched forth,
Thy Brother has armd himself in Steel,
To avenge the wrongs thy Children feel.

"But vain the Sword & vain the Bow,
They never can work War's overthrow.
The Hermit's Prayer & the Widow's tear
Alone can free the World from fear.

"For a Tear is an Intellectual Thing,
And a Sigh is the Sword of an Angel King,
And the bitter groan of the Martyr's woe
Is an Arrow from the Almightie's Bow.

"The hand of Vengeance found the Bed
To which the Purple Tyrant fled;
The iron hand crushd the Tyrant's head,
And became a Tyrant in his stead."

William Blake, "The Grey Monk"

What are the guiding principles that engender a new generation of public intellectuals among our undergraduate and graduate students? This is the question reflected upon herein. While public intellectuals emerge from a variety of professional backgrounds, including literature and the arts, the objective of this work is to reflect on the formation of public intellectuals in the realm of academic scholarship.

Historically, the word *intellectual* has been associated with social tensions arising from its range of meaning. This, in turn, has contributed to the term's significance and complex uses. *Intellectual* has been applied to people who use theory or organized knowledge to pronounce judgment on matters

of public importance, as well as with a class of elites who engage in monopolies of knowledge that allow them to claim special understanding, and therefore privilege, because they are able to promote their own indispensability (Innis 1995). The word *intellectual* has also been used in an effort to transcend the dichotomy between the head and the heart, or between reason and emotion, in social and political discourse. An intellectual, in this sense, employs not only the faculty of reason but also the human capacities of empathy and imagination. Since the latter part of the eighteenth century, these individuals have been understood to act independently of established political, economic, or ecclesiastical institutions of power (Williams 1989). It is this particular use of the word *intellectual*, together with the subsequent action it inspires in young scholars, that is the subject of this essay.

William Blake's art and poetry are among the most effective examples of such independence from, and critical commentary on, institutions of power. In "The Grey Monk," written in the early nineteenth century, he eloquently challenges the hegemony of reason as the intellect's sole criterion of judgment, speaking of reason's limiting capacity when describing the Grey Monk, whose "eye was dry" when the mother cried, "My Children die for lack of Bread."[1] Blake illustrates the barrenness of the intellect if it encompasses only the faculty of reason and compellingly contends that "a Tear is an Intellectual Thing." Embracing the heart as part of the intellect frees not only the Grey Monk but the entire world from "fear." Although Blake's critical engagement lay with the deleterious effects of the Industrial Revolution and the hypocrisy of institutions such as the church and the English monarchy in the eighteenth and nineteenth centuries, his words have resonance for us today.

From the beginning of my academic career, I have been committed to public scholarship, but the events of 11 September 2001 were to permanently alter my scholarly life and simultaneously confirm my role in public discourse. As a Canadian of Muslim heritage, I felt compelled to understand the acts of terror in the context of the growing xenophobia and misunderstanding that threatened the foundations of pluralistic society, which is precisely what both the terrorists and their objective allies sought to achieve.[2] Urged by colleagues and friends, I responded immediately, writing an essay in the local newspaper as well as speaking and engaging in public discussions in church halls, corporate boardrooms, government offices, and school classrooms. I gained insight into the perspectives of Canadians from

a wide variety of religious traditions as well as those who were atheists. These activities have resulted in two volumes of collective efforts to understand the short- and long-term implications of 11 September 2001 (Kassam, Melnyk, and Perras 2002; Kassam 2010b).

One of my most sobering realizations occurred moments before a television interview on an early morning talk show, hosted by a well-known comedian and news anchor, in the year following the events of 11 September 2001. In literature and the performing arts, the arc of tragedy is reflected in the arc of critical humour, which conveys truth by jest. The host commented that the political responses to these shocking events were providing ample material for such critical humour but expressed the fear of being censured by media bosses. Political decisions with massive implications for economic and human rights were thus evading critical scrutiny. It was at this moment that I fully understood the potentially transformative role that a tenured academic can play in democratic society, especially under conditions of stress—a role largely unavailable to individuals who must answer to their employer in the private or public sector. I would argue that this independence, this ability to contribute to public scholarship, is the raison d'être of tenure. Tenure is like a passport that affords protection by establishing one's citizenship in a community of inquirers. Similarly, rigorous and sustained scholarship provides the visa that enables ease of movement across boundaries. Together, they provide the freedom to enter and engage with a wide variety of sociocultural and political constituencies. This is how the public intellectual "speaks truth to power with grace and humility."

Armed with passport and visa, I have travelled to the circumpolar Arctic and to the Pamir Mountains of Afghanistan and Tajikistan, and my experiences there do not lead me to view terrorism as our major concern for the third millennium. Terrorism is only a symptom of something more fundamental—a reaction to the sociocultural and ecological changes that threaten the very foundations of the diversity of life on this planet and destabilize the plurality of cultures and intellectual traditions that this diversity of life supports. In the twenty-first century, humanity faces three simultaneous challenges: a global environmental, energy, and economic crisis. Humanity has no pre-established mathematical models that can provide us with formulaic or technocratic policy responses sufficient to untangle the riddle of our future.

This triumvirate of challenges and their implications for the life of the planet are indeed unprecedented in human history (Kassam and Avery

2013, 2). Scientists have proposed that humanity has entered a new geo-logical epoch, the Anthropocene (the "age of humans"), characterized by humanity's mass impact on a planetary scale (Crutzen and Stoermer 2000). The term recognizes the capacity of human habitation to alter not only the ecological balance of the biosphere but the very physical nature of the planet. Rather than celebrating human achievement, however, the term is an admission of human culpability with regard to the mass extinction of life forms and alterations to climate. Beginning with industrial develop-ment in the eighteenth century, humanity has been altering its habitat at planetary scale that was hitherto not possible. It is not that anthropogenic influence on the planet is a new phenomenon (Cronon 1983; Mann 2005; Sayre 2012; Smith 1980). Human beings from their earliest beginnings interacted with and therefore influenced their habitat. What distinguishes the Anthropocene is the simultaneous compression of the dimensions of space and time on a global scale such that the magnitude and speed of human impact is staggering. Thus, we do not have enough time to critically consider the potential impact and ethical implications of our actions.

This new epoch is also characterized by myopia regarding the scope of human impact or what appears like willful blindness to the death of birth, in which extinction outstrips the pace at which new life forms evolve. The situation is worsened by the absence of a global consensus on an ethical code to guide humanity in its behaviour. The proposed new epoch is an acknowl-edgement that the planet is currently operating in a *no-analogue state* (Crutzen and Steffen 2003, 253). In other words, the conditions that now exist have no equivalent, no point of comparison, with the result that our past experiences may no longer be sufficient to allow us to form a response to what confronts us. Furthermore, the concept of the Anthropocene involves the recognition that the Earth's system includes human societies and that these humans are an integral component of the planet. Therefore, humanity can no longer sustain the illusion perpetuated by industrial society that two separate systems exist—one natural or geo-ecological and the other a human sociocultural and economic construct (Steffen et al. 2007; Kassam 2009a; Sayre 2012).

In much the same way, we can no longer cling to the idea that aca-demic life and public life are two separate activities. University professors cannot regard public scholarship as an occasional activity; rather, it must be integrated into pedagogy and applied research, in order to illustrate to

undergraduate and graduate students alike that public engagement is the cornerstone of intellectual life in a democratic society. Public scholarship arises out of an awareness of civic responsibility and sensitivity to the relationship between education and its real-world application. The academic distinction between research and teaching, while useful, is not a helpful means to stimulate young public intellectuals.

Drawing on ideas informed by human ecological research undertaken among indigenous communities in the circumpolar Arctic and in the Pamir Mountains of Afghanistan and Tajikistan, I offer below a number of pedagogical principles intended to create an enabling environment for young public intellectuals. These principles are biophilia, or love of life; intellectual pluralism; sociocultural and ecological relevance; the creation of an environment for insight; and phronesis, or practical wisdom. I will present three case studies that illustrate how these principles speak truth to power by challenging established metanarratives.

Principles That Engender Public Intellectuals

My teaching is framed by human ecological research, and this research, in turn, is inspired by a scholarly teaching environment. Human ecology describes the relationships between people and their environment—including other animals, plants, and their habitat. It is simultaneously a narrative about how human beings develop a sociocultural system on the foundation of their ecological habitat. Simply put, human ecology integrates human beings into the ecological system they inhabit and thus avoids the facile dichotomy between nature and culture. Both my research and my teaching are shaped by my experiences of indigenous communities living at high latitudes (the circumpolar Arctic and the Subarctic) and high altitudes (the Pamir Mountains of Central Asia), who are in the throes of sociocultural and environmental change and are therefore forced to be among the first to develop adaptation strategies for survival. The concept of the Anthropocene is founded on the recognition that the ecological footprint of humanity is now global, such that the impact of activities in industrialized areas is felt even in such seemingly remote regions as the Arctic and the mountains of Central Asia. These regions have sustained the presence of human cultures for many millennia, and their history is integral to the history of human civilization. Historical evidence of thriving settlements of indigenous

peoples in the Americas and the presence of the Silk Road(s) in Central Asia remain a testimony to human adaptation and achievement.

Situated in varying ecological zones sustaining diverse cultures, these regions are in fact deeply illustrative of the fundamental questions that humanity faces regarding life on this planet. While these societies are inextricably entwined with the technological age of the twenty-first century, those who live in them generally pursue livelihoods, such as hunting, gathering, fishing, agriculture, and pastoralism, that place them in a close ecological relationship to the surrounding environment. Historically, these regions have experienced the effects of colonialism and have been at the frontiers of the Cold War. They continue to deal with imperial machinations in the form of outright war or the unsustainable exploitation of natural resources that threatens their ecosystems and thus their long-term survival. The result has been climate change and chronic poverty, to which external factors are primary contributors. These challenges are fundamentally about the well-being of households and communities, both human and non-human. It is no coincidence that the Greek *oikos*, "household," is the root of the prefix *eco-* in both ecology and economics. In a broader sense, the planet is our *oikos*: it is the dwelling place of humanity.[3] Both economics and ecology continue to have trouble, however, in dealing with complex interconnected systems. Their greatest challenge is the interface of human and non-human communities within their habitats.

Biophilia

While the notion of biophilia, namely, love of life or living systems, has been popularized by biologist Edward Wilson (1984), the idea was first articulated by Erich Fromm (1964), who was writing in the context of the excesses of narcissism and war in the twentieth century. Quoting the confrontation between the Basque philosopher Miguel de Unamuno and the fascist general José Millán-Astray at the University of Salamanca on 12 October 1936, Fromm illustrates the significance of the connection between biophilia and scholarship. The day marked the anniversary of Columbus's discovery of America, and fiery speeches were delivered, including one by Francisco Maldonado, a professor at the university. Decrying Catalan and Basque nationalism as "cancers in the body of the nation," Maldonado declared that fascism would remove them, "cutting into the live healthy flesh like a resolute surgeon free of false sentimentality." At that point,

someone in the audience shouted the fascist slogan, "Long live death!" General Millán-Astray responded with "Spain!" and a fascist chant arose. Until that moment, Unamuno, the rector of the university, had been listening silently, but the fascist chant "Long live death!" stirred an immediate and emphatic response. Unamuno rose and, describing the slogan as a "necrophilus and senseless cry," denounced Millán-Astray, prompting the general to cry out, "Death to intellectuals!" Unamuno then spoke about the university as the "temple of the intellect," in which "Reason and Right" stand opposed to brute force. Unamuno said: "You will win because you have more than enough brute force. But you will not convince. For to convince you need to persuade. And in order to persuade you would need what you lack: Reason and Right in the struggle." He vehemently rejected the celebration of death, a characteristic not only of fascists then but of fanatics today, as an "outlandish paradox" that he found "repellent" (Fromm 1964, 37–38). The love of life and its pre-eminence as a value in scholarly engagement drove Unamuno to speak truth to power, even though, in fascist Spain, this power was backed by military force.

As Unamuno's reference to "Reason and Right" suggests, the ethical dimensions of science cannot be divorced from the practice of the science itself. The current and simultaneously occurring economic, energy, and environmental crises are unparalleled in human history and put all life in peril. These anthropogenic crises are a manifestation of the long-term erosion of the core value of biophilia. It is not sufficient for the university scholar to point out to students that the current predicament is leading to the reckless destruction of life on earth. Rather, it is the role of the scholar to investigate, along with those students, mechanisms that promote the conservation of life and living systems.

Intellectual Pluralism

Problems faced by societies and communities rarely present themselves neatly or in reference to a single discipline. Sociocultural and ecological predicaments such as climate change, chronic poverty, environmental degradation, intolerance, and food and energy insecurity are "wicked problems" that transcend disciplinary boundaries. These problems are "wicked" not because they are inherently evil but because they are so complex. First identified in the fields of social planning and systems science, wicked problems defy easy and singular formulations, resist resolution, and are nearly

impossible to solve because of changing circumstances that are difficult to perceive and therefore to understand (Allen and Gould 1986; Balint et al. 2011; Churchman 1967; Rittel and Webber 1973). Complex interdependencies underlie wicked problems, and attempts to solve them reveal or generate further problems. These problems have an emergent quality (Latour 1987) in that they are contingent and highly context dependent. Scientific uncertainty, combined with conflicting perceptions and values, renders an optimal solution to a wicked problem unattainable. Therefore, responses to these problems are neither right nor wrong but rather are evaluated in terms of their degree of effectiveness. Wicked problems demand engagement with cultural systems, social and institutional structures, and individual actions, all within the ecological context in which these problems manifest themselves (Kassam 2009a). Hence, responses to wicked problems have to be collaborative and participatory, involving a diversity of societal perspectives and a willingness to live with the consequences.

Participatory and collaborative approaches to problem solving engender creativity and thoughtfulness in framing solutions. Here, expertise is not sufficient; diversity is both necessary and provides hope. Cognitive diversity is the multiplicity of perspectives that are drawn from different ways of knowing, arising from a variety of livelihood activities, life experiences, and cultural backgrounds. Diversity is subtle, imbued with possibilities, and imminent; therefore, it has emergent properties, much like wicked problems. Diversity simultaneously bridges the present and the past and opens up the future. It carries with it a constant sense of becoming by enabling adaptation to change. Through the collaboration with a variety of social groups, one not only benefits from cultural and social diversity but also gains in terms of cognitive diversity. Cognitive diversity provides the ability to address wicked problems. Cognitive diversity eschews a conception of reality in which nature is reduced to a single principle. Therefore, it rejects absolutist, monolithic, or unitary explanations. Cognitive diversity among a group of problem solvers contributes to the articulation of thoughtful responses to the challenges humanity is encountering. Individual intellectual abilities are not sufficient: the diversity of our experiences and identities must combine with these abilities if we are to address the challenges we face and articulate possible solutions (Kassam 2010a; Page 2007, 2010).

One effective means of preparing future generations to address the wicked problems generated by the Anthropocene is undergraduate and

graduate teaching and applied research. By building bridges across differ-ent ways of knowing, scholars draw from the diversity of their cultural backgrounds and variety of life and learning experiences. In this sense, interdisciplinary learning is not only about an ecologist working with an anthropologist but about both of them engaging with a Native hunter to tackle the question of sea ice and food security in the Arctic. Indigenous knowledge is in vital engagement with institutionalized "scientific" know-ledge as *communities of inquirers* (such as students and professors) work with *communities of social practice* (such as Elders, farmers, hunters, pas-toralists, and the institutions of civil society). In applied research, the border between inquiry and practice is transcended: insights resulting from inquiry are applied to human societies and thus provide the foundation for policy formulation and subsequent action. Effective policy and action are best achieved through the participation of communities of practice and inquiry.

Relevance to Sociocultural and Ecological Context

As researchers and teachers, our challenge is to make book learning at uni-versities relevant to the needs of human societies. This requires that the teacher adopt a pedagogical framework that facilitates the transforma-tion of students from those who know *about* the major challenges of the twenty-first century into those who know *how* to confront these challenges in particular sociocultural and ecological contexts. This demands that our research activities should inform the content of the courses we teach and our articulation of ideas in the classroom. To place an issue in context, stu-dents need to understand that the past is not merely history but is relevant to the present and to future possibilities. The idea of relevance links educa-tion to experience, or learning to community, combining critical thinking with research in the service of human societies. The very process of learning must be active and both socially and environmentally engaged in order to stimulate insight and generate practical wisdom (phronesis).

An Environment for Insight

Despite increasingly market-driven conceptualizations of universities as corporate businesses, students are not just "consumers" of information; they are also producers of insight. Advising and teaching is the raison d'être of scholarship, and the university is the context in which insights gained through research are shared. While the publication of that research brings

validation by peers, teaching carries the insights generated by research into the future. Furthermore, nuanced insight and a passion for research are best conveyed in the classroom through one's own actions and experiences, which make course material come alive in the minds of students. Critical exchange through teaching produces a dynamic that allows ideas to develop and hybridize into a tapestry of possibilities. In addition, questions arising from classroom discussion often open new vistas of research or provide fresh perspectives on old problems. Thomas Kuhn noted in *The Structure of Scientific Revolutions* (1962) that paradigm shifts within a discipline generally emerge from young scholars and from those situated outside the discipline. Kuhn's observations simultaneously make a case for intellectual pluralism and emphasize the role of the young scholar. This acknowledgement of the importance of young scholars is fundamental, as it speaks to their role in advancing ideas that contribute to the development of public scholarship.

Phronesis

Phronesis, or practical wisdom, is the knowledge of how to secure the "ends of human life." It is about the well-being of the *oikos*—the place of dwelling and the web of sociocultural and ecological relationships that sustain it. Aristotle describes *phronēsis* as an intellectual virtue in his *Nicomachean Ethics* (2004). Aristotle maintained that we grasp the nature of phronesis by observing those who possess it. Although phronesis depends on our ability to reason, unlike theoretical wisdom (*sophia*), it cannot be gained solely through book learning. Phronesis requires practice. By combining critical thinking with practice, students directly experience the way that theoretical perspectives both emerge from and inform the application of their knowledge. In the course of action, the particular hints at the universal.

A conversation about learning without practice is just as vacant as a discussion of rights without responsibilities. Rights such as freedom are intimately linked to responsibilities. An applied perspective on teaching seeks to generate a cadre of young scholars who situate their thinking and ideas in the context of the universe-centered self rather than a self-centered universe. Barber (1994, 88) argued: "The language of citizenship suggests that self-interests are always embedded in communities of action and that in serving neighbors, one also serves oneself." In other words, self-interested goals do not exist in opposition to community but are realized in the course of engagement with the community.

The pedagogical approach I am describing recognizes that responsibility is embedded in knowledge. It can be characterized as participatory, in accordance with the principles described above. It facilitates constructive and thought-provoking interactions between local communities who hold indigenous knowledge and scholars from biological, physical, and social sciences as well as the humanities. Furthermore, on the basis of two decades of experience as a university scholar, I am convinced that a transdisciplinary approach provides the integrated perspective needed to conduct research related to natural resource utilization, conservation, livelihood security, climate change, and food sovereignty.

Challenging Metanarratives: Speaking Truth to Power

Challenging metanarratives—reflecting critically on otherwise unquestioned truths—requires an engagement with power. Described below are three cases in which metanarratives supported by powerful monopolies on knowledge were called into question. The first case illustrates the need for clear thinking and the faculty of empathy when a decision must be made about whether to go to war. The second establishes the importance of intellectual pluralism, or multiple ways of knowing, in addressing critical issues of human survival. The third shows that the retention of diversity even under conditions of significant stress is fundamental to survival. Together, these cases seek to speak truth to power as well as to demonstrate the pedagogical principles described above in action.

The Public Intellectual: First a Scholar, Then an Activist

The first case concerns the failure of effective analysis on the part of most (but not all) intelligence agencies to accurately predict the presence of weapons of mass destruction in Iraq.[4] Both American and British intelligence agencies conveyed to policy makers and political leaders that evidence existed of weapons of mass destruction in Iraq. In contrast, Canadian intelligence agencies, which depended primarily on data gathered by the American and British, came to the opposite conclusion. After analyzing the information, they maintained that the evidence was inadequate to support such an idea (Campbell 2010). This example is compelling because it closely links the notion of "intelligence" to the role of the "intellectual." Moreover,

it clearly illustrates that information is not intelligence. Intelligence is the value added the public intellectual provides through effective analysis.

How did American intelligence analysts come to the conclusion that there was evidence of weapons of mass destruction? Their decision was strongly influenced by their own expectations of the policy needs of those who controlled institutions of power, rather than those of the public they served. In theory, the objective of intelligence is to inform policy makers and in this manner support the formulation of policies that will be of maximum benefit to society. However, "support" can also mean providing analyses that reinforce existing policies and rally others to the cause. The Iraq case illustrates the need for attention to basic social science methods in order to avoid cognitive biases. Jervis (2010, 191) argues that by focusing on the dependent variable, analysts "ignored relevant comparisons, overlooked significant negative evidence, and failed to employ the hypothetico-deductive method."[5] Unless we are careful to abide by scientific methods, we tend to interpret information so that it will accord with what we already believe (or would like to believe). Failing to recognize this, analysts overestimated the extent to which the evidence before them supported their conclusion that Iraq was harbouring weapons of mass destruction.

What did Canadian intelligence analysts do differently, given that they were using the same data as their American and British counterparts? The fact that the conclusions reached by American and British intelligence analysts were erroneous indicates that their approach was flawed. Analysts must develop hypotheses that can be empirically validated. If the proposition is correct, what predictions can be made and what evidence would one expect to be able to gather on the basis of those predictions? Similarly, a scholar would ask what information would cast doubt on, or outright disprove, their conclusions. This type of questioning alerts scholars not to neglect evidence that might falsify their assumptions and to look for areas in which potentially relevant information should be sought. Given the data before them, Canadian analysts thought to ask, What else might this equipment be used for? This approach led them to conclude that the evidence did not necessarily point to the existence of weapons of mass destruction.

Given that human lives and a nation's resources are at stake in the decision to go to war, this example is compelling illustration of what can happen when power speaks to truth, rather than the other way around. More generally, it is rigorous scholarship that informs the words and

actions of the public intellectual. Activism without sound scholarship is merely a case of the tail wagging the dog. The activist believes first and then seeks evidence to support that belief, whereas the public intellectual begins with the evidence and then bases her or his belief and action on that evidence. This is well illustrated by a conversation between President Bush and Prime Minister Jean Chrétien. In his memoirs, Mr. Chrétien recalls that Mr. Bush offered to send his intelligence experts to Ottawa to convince him about Iraqi weapons of mass destruction. The prime minister responded, "'No, don't do that, George. . . . If you have proof, send it to my analysts through the normal channels. They will look at it, and I will decide" (2008, 309).

This case is, however, fundamentally about biophilia. In the long term, the bloodshed and the damage to the *oikos* of communities will generate pain, bitterness, and hatred that will continue to fester, undermining biophilia and ultimately leading to more death and destruction. The case of going to war in Iraq also illustrates a basic lack of empathy (Jarvis 2010), which is the cornerstone of biophilia. A significant literature exists on the ethical criteria for preemptive war, and, in the analysis of Franklin Eric Wester (2004), the Bush administration's justification for war did not live up to these criteria. The fact is that in the age of the Anthropocene, when human action has planetary implications, the notion of preemptive war is not only anachronistic but also ethically vacant. In the case of a conflict, the two parties may have little sympathy for each other's point of view, but the public intellectual must seek to exercise the faculties of imagination and empathy, in addition to reason. By not doing so, the public intellectual forsakes the ability to perceive the world differently and reason accordingly. In other words, his or her assumptions about the other must reflect who the other actually is.

When a nation's leaders choose to go to war using arguments of preemptive defence, this implies that they perceive their own might as greater than that of those upon whom they will wage war. Studies show that those who consider themselves powerful reveal a reduced tendency to comprehend how other people see, think, and feel (Galinsky et al. 2006). In essence, the "other" is merely a construction based on their insecurities and motivations. Their myopia, produced primarily by fear, blinds them to the diversity of perspectives and to pluralistic views of the world. In contrast, the public intellectual must have the capacity not only to think but also feel from the

perspective of others. The next case illustrates how human agency is driven by empathy and the way in which multiple ways of knowing, or intellectual pluralism, contributes to survival.

Intellectual Pluralism and Survival

In the mid-1990s, following the collapse of the Soviet Union's economy, the world's most industrialized and densely populated polar region found itself facing shortages of food and fuel.[6] On the Kola Peninsula, near the Russian border with Finland, and on the Chukotka Peninsula, across the Bering Sea from Alaska, entire communities were at risk of starving or freezing to death. In Lovozero, a town on the Kola Peninsula, the price of essential food items—when these were available at all—fluctuated as the value of the ruble destabilized. Doctors could diagnose illness, but they lacked the medicines to treat those who were ill, and, even under the best of conditions, hospitals could offer only one meal a day to their patients. Russian government institutions were unable to offer much help, which arrived instead from international institutions and from other indigenous communities. Sami cultural groups from Norway, Sweden, and Finland came to the assistance of the Russian Sami, on the Kola Peninsula, while the Chukchi and Yupik living on the Chukotka Peninsula received aid from Iñupiat, Inuvialuit, and Yupik communities in Alaska (see figure 6.1).

While in some ways similar to other international emergency relief efforts, these empathetic responses were unique in that they involved the transfer of the tools and knowledge required for subsistence hunting and gathering. Far from being a matter of sport, the ability to hunt and fish was essential to feeding members of one's household and community. In such circumstances, a university degree was of virtually no use. A different kind of learning was necessary—knowledge of how to live off the land and sea. Although some individuals still had the skills needed to maintain a subsistence lifestyle, this ability had been largely neglected and devalued during decades of industrialization and collectivization. When practical and context-specific indigenous knowledge is actively suppressed by colonizing powers, it is in danger of being forgotten. This type of cognitive interruption is colonization of the mind, which seeks to eliminate intellectual pluralism and destroy cultural identity.

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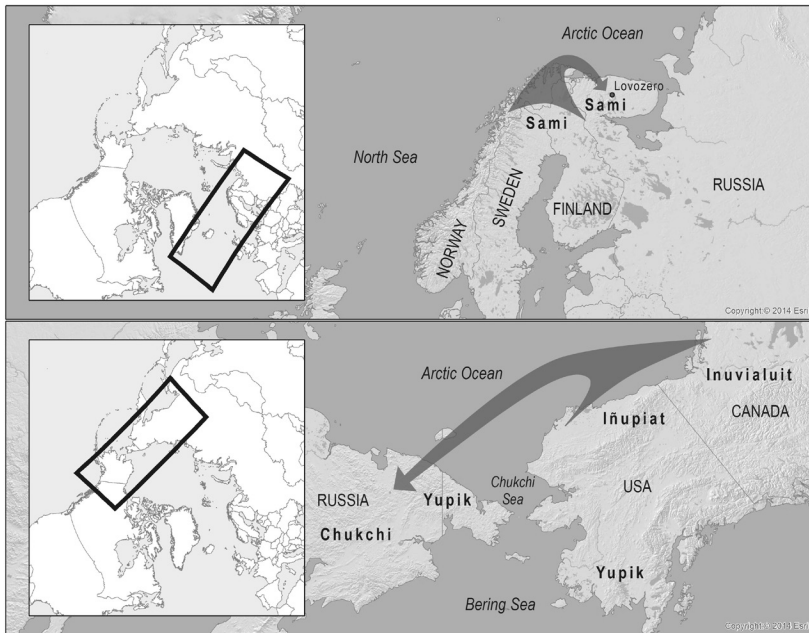
Figure 6.1. International assistance in the Arctic

To offset decades of Soviet policy that discouraged the use of local resources, Iñupiat residents of Alaska'a North Slope Borough found it necessary to send supplies and weapons to their neighbours across the Bering Sea. Before Chukotka's communities could legally hunt marine mammals, however, the Iñupiat also had to persuade the International Whaling Commission to extend quotas so as to permit subsistence hunting. In addition, for a number of years they invited community leaders, hunters, and scientists from the Chukotka Peninsula to the North Slope Borough to facilitate the transfer of knowledge and the strengthening of local institutions that would serve to safeguard hunters' rights and their capacity to use local resources effectively. Hunting demands a concomitant commitment to conservation through planning for sustainable resource use.

This case not only illustrates the empathy felt by one indigenous community for another, even across international borders, but also demonstrates how empathy is manifested in practical action. This action involved the revitalization of multiple ways of knowing by building bridges with international institutions, such as the International Whaling

Commission, and with scientists. By involving scientists as well as hunters, the Iñupiat showed practical wisdom (phronesis), which is essential to wise leadership. Intellectual pluralism was sustained by communities of social practice (indigenous leaders, hunters-gatherers, resource managers) working in tandem with communities of inquirers (scientists) in order to address a crisis.

Under conditions of stress, a public intellectual must move from critical analysis to action. To be effective, actions cannot be based solely on one individual's ability to reason but must instead draw on diverse perspectives. Learning from the example of the Iñupiat, the public intellectual must seek to encourage thoughtful action grounded in a collaborative process that incorporates the principle of intellectual pluralism. Only in this way will it be possible to address wicked problems such as food and livelihood insecurity.

Must Cain Always Kill Abel?

The Old Testament narrative in which Cain, "a tiller of the ground," kills his younger brother, Abel, "a keeper of sheep" (Gen. 4:2), out of a jealous impulse has generated social science scholarship that reinforces conflict between farmers and pastoralists.[7] While studies do confirm that conflict sometimes exists between herders and farmers (Bassett 1988; Blench 1984; Chatwin 1989; Gellner 1985; Hodgson 1974; Khaldûn 1967), there is also compelling evidence to the contrary. Despite the prevailing image of Afghanistan as a country riven by religious and ethnic differences, evidence from the Pamir Mountains suggests that ethnic, cultural, religious, and ecological diversity contributes to mutual survival and food security. This is particularly noteworthy given that the country has, for more than thirty years, been ensnared in a localized global war.

The Pamir Mountains lie in northeastern Afghanistan, in the province of Badakhshan, and extend northward into Tajikistan. Immediately to their south, a long, narrow mountain valley, known as the Wakhan Corridor, extends eastward from the central part of Afghanistan into China, and separates Tajikistan, to the north, from Pakistan, to the south (see figure 6.2). Although sparsely populated, the region is home to two distinct ethnic groups, the Kyrgyz and the Wakhi (Felmy and Kreutzmann 2004; Kassam 2010; Kreutzmann 2003; Shahrani 1978, 1979).
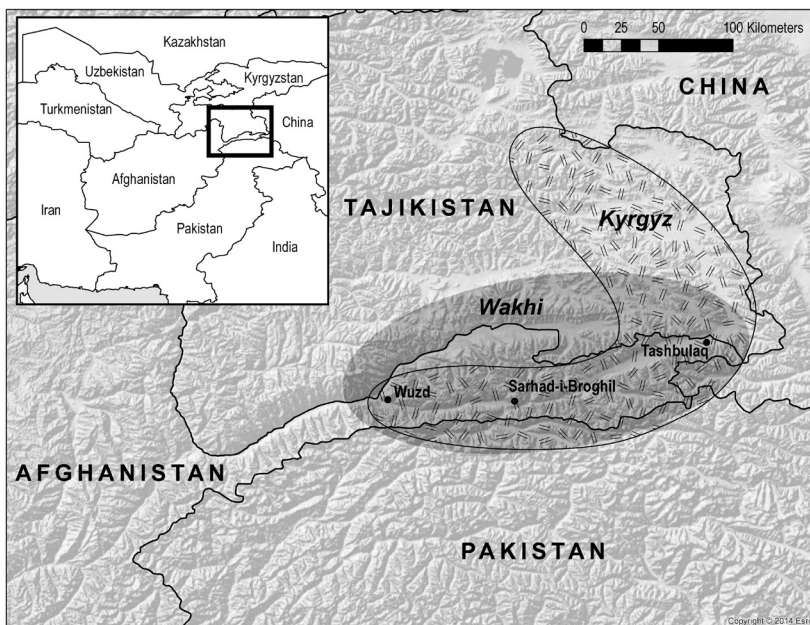
Figure 6.2. Location of Wakhi and Kyrgyz ethnic groups

Striking differences exist between the two groups. The Wakhi are primarily sedentary agriculturalists, who practice irrigated crop farming in valleys located between 2,500 and 3,500 metres above sea level. They grow wheat, barley, millet, peas, and even potatoes, although, in villages at higher elevations, the potato harvest is unreliable. Poorer households often lack a supply of grain sufficient for the entire year and must therefore decide whether to save some of their store of grain for seeding or to use it to meet their immediate needs for food. In addition to farming, the Wakhi do keep some animals, which they feed during the winter with farm-produced fodder. The Kyrgyz, in contrast, are largely nomadic pastoralists, who, in the spring and summer, migrate to high pastures to graze their herds. These consist of sheep and goats, which are generally sold in market, as well as yaks, raised for local consumption and transport, and horses, donkeys, and camels, chiefly used for the transport of supplies. Long periods of high-altitude grazing in the spring and summer, combined with shorter grazing periods in lower-lying areas during the winter months, enable the Kyrgyz to draw on natural resources in dispersed locations. In the summer, however,

the Wakhi also make use of high mountain plateaus as pastures. Thus, while each of the two communities occupies a distinct ecological niche, the two niches overlap seasonally, and this overlap of land use during the spring and summer requires cooperation between the two groups.

Diversity in this region exists not only at the level of ecological habitat but also in language and religion. The Wakhi speak a language that belongs to the Iranian branch of the Indo-European family, whereas Kyrgyz is a Turkic language of the Altaic family. The Kyrgyz are Sunni Muslims, and the Wakhi are Shia Ismaili Muslims. Historically, the presence of Kyrgyz and Wakhi in the Wakhan region is the outcome of a process of competition among various groups for strategic control of resources. At times, the Wakhi, as Shia Ismaili Muslims, have faced persecution at the hands of Sunni groups who invaded and occupied the region, while the Kyrgyz suffered a similar fate at the hands of the Mongols and, more recently, the Afghan nation.

Given long-term warfare in the region, the hegemony of a fundamentalist interpretation of Sunni Islam under the Taliban, limited arable land in mountainous regions, and religious and ethnic differences, one might expect tensions to exist between the Wakhi and the Kyrgyz. Indeed, historically, there has at times been conflict. Today, however, these two communities in fact engage in close relations that ensure their mutual survival. The Wakhi grow wheat and barley, which they trade with the Kyrgyz, and also mill the grain into flour for the Kyrgyz. The Kyrgyz, for their part, respect the pasture lands of the Wakhi and trade animals with them in return for milled grain, as well as trading rope, hide, and other items manufactured from their herds. The Wakhi obtain tea, salt, oil, and other items from the south and occasionally act as middlemen for the Kyrgyz. The Kyrgyz employ poorer members of Wakhi households to tend to their livestock, in exchange for animals. Wakhi from Sarhad-i-Broghil sometimes give their yaks (and occasionally camels) to the Kyrgyz for tending in the winter season. For the care of ten yaks, the Kyrgyz may take a one-year-old yak in payment. These interchanges generate strong relations between neighbours.

In contrast to observations from other studies (Shahrani 1979, 192), these findings do not indicate that the Wakhi and Kyrgyz hold each other in contempt on the basis of religious differences. Rather, by occupying complementary ecological niches, these two different Muslim cultures ensure economic resilience and the common good while simultaneously

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acknowledging differences. When they are in each other's territory, hospitality is extended, and they live at each other's homes while securing supplies and engaging in trade. Kyrgyz and Wakhi who are in regular contact can communicate in either language. Some Wakhi have Kyrgyz names because they were born in or near Kyrgyz pastures. Moreover, the two groups share religious shrines, each drawing inspiration and comfort from its own interpretation of Islam. The Kyrgyz, although among the Sunni majority, have historically faced persecution for not being sufficiently orthodox, while the Wakhi Ismailis—who, as Shia, have historically been targeted as heretics—generally resist the fundamentalist and literalist impulse (Bliss 2006). By recognizing their mutual dependence and viewing their differences as an asset, the two groups have been able to avoid the external pressure from those who seek to impose a narrow and more fanatical interpretation of Islam and maintain a largely peaceful coexistence.

What, then, is the relevance of the Cain and Abel narrative to the case of the Kyrgyz and Wakhi? The jealousy that Cain felt toward his brother is not the issue here: all human beings experience jealousy. What is significant is that, rather than attempting to reflect on his feelings and thus come to terms with them, Cain chose to use violence. More than simply a rejection of the ties of kinship, his slaying of Abel is a denial of his reciprocal connection to his brother, who represents another way of living and thinking. The very idea of mutual reliance is repudiated when Cain is asked, "Where is Abel thy brother?" and, he responds: "I know not: Am I my brother's keeper?" (Gen. 4:9). Cain's response is a refusal of the human capacity for biophilia, a concept that one would expect a "tiller of the ground" to uphold. The case of the Kyrgyz and Wakhi is not about the absence of conflict, given that, historically, conflicts have occurred. Furthermore, the two groups live in a country that has been and continues to be torn apart by a bloody civil war supported by global powers beyond its borders. What is instructive is that, despite these long-term stressors, the Kyrgyz and Wakhi choose to act in a manner that supports mutual coexistence and interdependence while safeguarding cultural difference.

How does this case speak to the role of the public intellectual? A scholar must critically engage metanarratives that seek to ignore sociocultural and ecological complexity. The conflict in Afghanistan is generally presented as an open-and-shut case of violence and the intolerance of diversity. While this interpretation is indeed possible, it also conceivable that endless repetitions

of the primordial conflict between Cain and Abel are not inevitable. It is the role of the public intellectual to uncover complexities and nuances. The case of the Kyrgyz and Wakhi is informed by intricate relationships between diverse ecological habitats, variations in livelihood strategies, and sociocultural and religious differences. This complex interaction among differences yields evidence that contradicts the narrative of perpetual conflict. Instead, it reveals agency at the level of communities—the capacity to act pragmatically and empathetically. This case is not without similarities to that of indigenous communities in the Arctic after the collapse of the Soviet Union. It again illustrates biophilia driven by food security and multiple ways of knowing, in this case arising from the differing ecological and sociocultural roles of the Kyrgyz and Wakhi. Simply put, biophilia ignites empathy, empathy appreciates difference, and difference facilitates survival in the Pamir Mountains of Afghanistan.

Discussion: Prospects for Public Intellectuals

Each of the cases described above speaks to the role of biophilia in securing the aims of human life as described by Aristotle (2004). The well-being of the *oikos*, as the dwelling place of humanity, is central to all three cases. The examples from the Arctic and from the Pamir Mountains suggest that the stewardship of the *oikos* is achieved through practical wisdom (phronesis). Both examples illustrate another way of knowing, and this practice enabled the continuance of life. In addition, the first case emphasizes the direct role of the public intellectual in speaking truth to power. The second case stresses the participatory nature of knowledge generation when communities of social practice work in tandem with communities of inquirers, of which the public intellectual is a citizen. The third case vividly illustrates the fundamental role of both sociocultural and ecological diversity in facilitating survival. All three cases underscore the relevance of context. To address an issue effectively, we must take into account the past and present in order to consider future possibilities, and for this it is essential that we understand the context. Intellectual pluralism also lies at the core of all three cases. Engaging and integrating multiple perspectives requires the capacity not only to reason but also to empathize and imagine. These faculties make it possible to forge connections among diverse ways of knowing, thinking, and living.

This book rests on the premise that the public space in which intellectuals operate has an impact on democratic political discourse. It is the duty of the university scholar to speak truth to power with grace and humility after substantive research and balanced reflection. It is a truism that the best hope for the preservation of biological and cultural diversity—that is, for safeguarding all the fundamental elements that together constitute life on this planet—is the next generation, our students. Their participation in research is an extension of effective teaching. Our teaching, which should provide an enabling environment for insight, is the foundation for speaking truth to power.

Acknowledgements

Notes

1 "The Grey Monk" is among the poems in the Pickering MS, ca. 1807. I am quoting from *Poems and Prophecies* (Blake 1991, 332–33).
2 I use the term *objective ally* to refer to parties that share the same objective while seemingly standing on opposing sides of an issue. Arguably, in the years following 11 September 2001, the Bush administration and Al-Qaida were such objective allies. They used the so-called War on Terror to distract both political leaders and ordinary citizens from the fundamental concerns of the twenty-first century, such as structural poverty, economic and political injustice, and climate change, which take far more human lives and devastate the fabric of families (Kassam 2010b, 244).
3 The *oikos* is simultaneously a description of the sociocultural and biophysical dwelling place and an articulation of the web of relations among humans and of humans with other plant and animal life and with physical forms such as the land, rivers, and mountains upon which human

livelihoods thrive. The planet is likewise an interconnected system that sustains our livelihoods.

4 This case study emerged from personal communication with intelligence analysts and the Canadian Department of Defence staff present at the Canadian Association for Security and Intelligence Services (CASIS) Conference in 2010. I have used publicly available documents to present this case.

5 Simply put, the hypothetico-deductive method is basic to scientific method: it involves formulating an hypothesis that would serve to explain observed phenomena and that can be tested—that is, verified or falsified—through experiment. William Whewell (1837, 1840) is often credited with having laid the foundations for the method.

6 This case study, which is drawn from my research in the circumpolar Arctic, was first presented in *Biocultural Diversity and Indigenous Ways of Knowing* (Kassam 2009a).

7 This case is drawn from the author's research in the Pamir Mountains of Afghanistan (Kassam 2010a). This research provides a more detailed analysis of evidence of the practice of pluralism among the Kyrgyz pastoralists and Wakhi farmers as well as Pashtu pastoralists and the Shugni farmers. For the sake of brevity, only the Kyrgyz and Wakhi cases are presented here.

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