

Interdisciplinarity versus Anti-Intellectual and Anti-Democratic Impulses

by

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Abstract: The scholarship of interdisciplinarity provides a potentially powerful response to anti-intellectual and anti-democratic impulses. It recognizes that proof and disproof are generally impossible, and that scientists can be biased in their evaluation of the evidence. Yet it proposes a set of strategies for transcending scholarly disputes in order to achieve more comprehensive understandings. Interdisciplinary scholarship also guides individuals to understand the perspectives of those we disagree with, and suspect that there is some kernel of truth in widely-held beliefs. Interdisciplinarians can urge a reasoned skepticism of both expert advice and democratic processes. We can potentially integrate across differences in values. If we can educate students in interdisciplinary attitudes and strategies – ideally in K-12 as well as in the university – we can prepare future generations for constructive and respectful discourse. Much of this article will focus on what we should teach our students and how we might change the academy to do so. However, the literature on interdisciplinarity also suggests some important institutional changes in the wider world. Citizens’ fora – often recommended in the literature on transdisciplinarity – would allow typical voters to evaluate the evidence relevant to particular public policy questions. The interdisciplinary literature asserts that one need not have disciplinary expertise to draw intelligently upon disciplinary insights, or to integrate across competing insights. Interdisciplinary online resources could attempt to synthesize competing points of view on contentious issues.

Keywords: anti-intellectualism, anti-democratic, bias, perspectives, democracy, postmodernism, values, education, citizen’s fora, integration

For me, [interdisciplinarity is] the only game in town for coping with the defining intellectual challenges of the 21st century. I encourage you to continue to keep your eyes on that prize. I don’t think I exaggerate when I say the future of the human race may depend on it. (Newell, 2017, p. 4)

Interdisciplinarity as a/the Answer to Anti-Intellectualism?

In 2008, William Newell traced the history of interdisciplinary education,

noting how this history intersected with social movements and public policy concerns.¹ In the quote above, Newell appreciates the potential importance of interdisciplinarity beyond the academy. This article will explore how interdisciplinarity may indeed provide answers to pressing public policy concerns. Recent events in the United States and Europe suggest that a large part of the electorate has developed a deep suspicion of both expert advice and the democratic process. This article investigates how an interdisciplinary education might usefully address these worrisome developments. It also suggests that the scholarship of interdisciplinarity can usefully inform improvements in the institutions of democratic governance.

It is hard to judge how important it is to respond to anti-intellectual and anti-democratic tendencies. History on the one hand tells us that such currents are not entirely novel. Perhaps the tide of anti-intellectualism will ebb again as the politicians who have ridden it fail to deliver on dramatic promises. However, history also warns us that societies tend to rise and fall, and that complacency is an oft-observed characteristic of societies in decline. Societal decline is generally a surprise to most, and misguided complacency may only be appreciated after the fact. Mounk (2017) is one author who has forcefully argued that societal commitment to democracy is fading, and that we should not assume that liberal democracy will last forever. While certain individuals and organizations have stoked anti-intellectual and anti-democratic sentiments, these sentiments seem to reflect beliefs deeply-held by many. Prudence suggests that we confront such beliefs. This article suggests that there is a critical role for the scholarship of interdisciplinarity in such an enterprise.

The scholarship of interdisciplinarity provides a potentially powerful response to anti-intellectualism. It recognizes that proof and disproof are generally impossible, and that scientists can be biased in their evaluation of the evidence. Yet it proposes a set of strategies for transcending scholarly disputes in order to achieve more comprehensive understandings. The public may have absorbed the lesson that scientists can be mistaken, but needs also to appreciate that there are sound strategies for moving toward superior understandings through time. Interdisciplinarity thus recommends a constructive skepticism in place of nihilism.

Interdisciplinary scholarship also guides us all to understand the perspectives of those we disagree with, and to consider that there may be some kernel of truth in widely-held beliefs. Both those who demonize anti-intellectuals and those who reject academic analysis should value alternative perspectives. After all, it would hardly be surprising if the academy occasionally down-

¹ It is a masterful article that deserved far less editorial advice than I provided as newbie co-editor that year.

played the concerns of those without university degrees, given that most members of the academy spend most of their time interacting with other university-educated people. Yet an understanding of the academic process, which forces scholars to marshal arguments and evidence, suggests that bias does not entirely drive academic understandings. Interdisciplinary scholarship has long argued that scholars can reduce bias by reflecting on how biases might afflict our thinking and seeking to transcend them. Scholars, then, could do a better job of addressing the concerns of those without university experience.²

As noted at the outset, suspicion of academic expertise is often wedded to suspicion of democratic processes: If one doubts expert advice, it is a small step to imagining that any opinion is as good as another; one may then have little confidence that public debate will yield desirable policy outcomes. However, as they can with academic advice itself, interdisciplinarians can urge a reasoned skepticism of democratic processes. Democracy at its best is a blunt instrument for translating individual preferences into public policy: Voters must often vote for individuals they dislike or disagree with in the hope that they will push policy much of the time in the direction the voter prefers. Every politician represents a complex combination of personality characteristics and promises; voters can reasonably differ in how they weigh people's attributes and attitudes. Interdisciplinarity encourages both respect for voter's decisions and reflection on why we each make the choices we do.

Institutionalizing interdisciplinarity within the academy is an important first step in combatting anti-intellectualism. If we can educate students in interdisciplinary attitudes and strategies – ideally in K-12 as well as in the university – we can prepare future generations for constructive and respectful discourse. Much of this article will focus on what we should teach our students and how we might change the academy to do so. However, the literature on interdisciplinarity also suggests that some important institutional changes in the wider world will be necessary. Interdisciplinary online resources could attempt to synthesize competing points of view on contentious issues – making it easier for voters to transcend extreme positions. Citizens' fora – often recommended in the literature on transdisciplinarity

² When I presented this material at the AIS conference at UMBC in 2017, I was questioned as to whether I am perhaps too optimistic about integration. Paul Hirsch and Sharon Woodall in particular urged me to stress that valuing different perspectives is an important step forward even if integration proves challenging. Hirsch also urged me to emphasize that we may achieve integration on some issues even while integrating across broader societal disagreements remains challenging. I thank them for their advice to stress that even a far less optimistic vision of interdisciplinarity than my own still supports many of the arguments made in this article.

– would allow typical voters to evaluate the evidence relevant to particular public policy questions. The interdisciplinary literature asserts that one need not have disciplinary expertise to draw intelligently upon disciplinary insights, or to integrate across competing insights. Decisions emanating from such a forum could be grounded in evidence and scholarly analysis, yet be freed from the disdain shown toward both intellectuals and elected politicians. (Use of a lottery to fill some government positions, as in ancient Greece, might also be recommended, and for similar reasons; see below.)

This article will flesh out the ideas above and address some potential counter-arguments. In so doing, the article will clarify the nature of the interdisciplinarity that is called for at this historical moment. We start by carefully distinguishing among interdisciplinarity, postmodernism, and anti-intellectualism. This sets the stage for discussions of interdisciplinary analyses of expertise, ethics, and discourse. We then engage institutions that would encourage reasoned discourse. These various sections draw on existing understandings within interdisciplinary scholarship; the succeeding section briefly explores how interdisciplinary research is critical to enhancing our understanding of democratic processes. We then discuss how to address scholarly bias. The next section examines human progress from an interdisciplinary point of view – reflecting the fact that much contemporary suspicion of democracy reflects skepticism about human progress. We then explore some progressive public policies that require interdisciplinary understanding. The last substantive section then returns to the question of interdisciplinary education, urging this in K-12 as well as postsecondary education. A very brief concluding section follows.

Interdisciplinarity and Postmodernism

Voters in many countries have come to disdain expert advice – and indeed fact-checking. Though they may never have heard of postmodernism, the attitudes they express nevertheless resonate with skeptical postmodernism: that there is no objective means of discriminating among different positions and thus that one should simply make whatever arguments one wishes in favor of policies one has selected intuitively rather than logically.³

³ Perrin (2017) argues that the link between “post-truth” and postmodernism is misguided – but his reading of postmodernism is quite different from mine. Jennifer Delton wrote a letter to *The Chronicle of Higher Education* on August 15, 2017 responding to Perrin, noting that postmodernist ideas that “truth” was “unstable, contingent, contested” could easily guide students to question received wisdom without giving them the tools or inclination to defend important ideals. She suggests that postmodernism bears some responsibility even if its ideas have been misinterpreted.

As I argued in 2007, interdisciplinary analysis only makes sense if we think that we can achieve more comprehensive understandings. I thus urged affirmative postmodernism, as identified by Rosenau (1992). This recognizes the biases and limitations that inevitably afflict scholarship – indeed interdisciplinarity is grounded in an understanding that disciplinary research is imperfect. Yet it appreciates that we can advance scholarly understanding by amassing arguments and evidence. Scholars slowly rule out lines of argument that seem at odds with the evidence and may gradually achieve consensus if only rarely absolute unanimity. An interdisciplinary scholarship that identifies with affirmative postmodernism can potentially respond powerfully to anti-intellectualism, whereas a skeptical postmodernism cannot.

It was undoubtedly easier to communicate to the public decades ago a positivist view of science that held that scientific advance occurred by marshaling absolute proofs or disproofs of scientific hypotheses. Philosophers of science now appreciate that this view was too simplistic: It is always possible to sketch a reasoned disagreement against any body of evidence and argument. Yet the public often still expects absolute proof or disproof. Debates regarding both climate change and creationism are marred by misplaced celebrations of the simple fact that a small minority of scientists are skeptical of human-caused climate change and the fact that evolutionary biologists struggle to understand certain evolutionary developments. Disagreements and anomalies lie at the heart of the scientific process.

The public needs to appreciate that scholars cannot prove or disprove their hypotheses. Yet public discourse suffers if the public embraces the diametrically opposing view that scholars have no sound basis for preferring one hypothesis over another. Foucault – who devoted much of his career to stressing the cultural and political influences on scientific thinking – recognized that we must nevertheless accept that there is some hope that reasoned discourse and scholarship can yield superior understandings of our world; otherwise, we have no response to totalitarianism and its desire to pursue one worldview without question.

We need to educate the public that scholarship is neither perfect nor impossible. Scholars are indeed human and thus buffeted by a host of potential biases – including political affiliation and educational status. However, scholars engage in a conversation in which we critique each other's arguments. The public is often frustrated that scholars disagree, but it is of course through this constant disagreement that we clarify our arguments and evidence and – at least some of the time – slowly work toward consensus. The standards by which scholarly communities judge research are not perfect but do exert some strong pressure toward grounding our hypotheses in care-

ful observation of the world we study. It is too easy to find examples of scientists who are wrong or biased or even corrupt. We need to counter with examples of sound scholarship that recognized previous errors. Interdisciplinary scholarship, which integrates the best parts of multiple insights, can be especially powerful here.

Interdisciplinary scholarship has much to contribute to public understanding of the scholarly enterprise. First, we can usefully apply the technique of transformation⁴ to the objectivity/subjectivity continuum. That is, we should recognize a whole continuum of possibilities between perfect objectivity and complete subjectivity. The fact that we can neither prove nor disprove theories does not mean “anything goes.” Different types of scholarly inquiry fall at different places along the continuum.

Collins (1998) argued persuasively that intellectual skepticism arises historically whenever there are competing schools of thought and no obvious means to choose among them. Thus, skeptical ideas emerged in ancient Greece as Stoics, Epicureans, and Aristotelians and those from other schools of philosophy argued among themselves. Yet that intellectual ferment generated some of the most penetrating insights in the history of philosophy. Scholars or voters who see only endless disputation within modern scholarship are naturally tempted also toward extreme skepticism. The only antidote to extreme skepticism is integration: We then generate more comprehensive understandings.

Note that in our approach here we do not simply reject anti-intellectualism or skepticism but rather seek to understand them. That is, in true interdisciplinary fashion, we seek to identify elements of anti-intellectualism that can be absorbed into a more comprehensive understanding of the scholarly project. We need not condescend to skeptics in appreciating some of the grounds for skepticism, but can seek to wed legitimate concerns regarding the scholarly enterprise to an appreciation of strategies for transcending bias, integrating, and achieving more comprehensive understandings.

This interdisciplinary understanding of the scholarly enterprise needs to

⁴ Bill Newell published the first discussion of techniques of integration for the establishment of common ground in 2000 (“Transdisciplinarity Reconsidered”) and outlined the strategy of transformation in detail in 2007 (“Decision Making in Interdisciplinary Studies”). He had been discussing at conferences how to “demystify” the process of integration since at least 1991. As he reports in his 2008 article “The Intertwined History of Interdisciplinary Undergraduate Education and the Association for Integrative Studies: An Insider’s View,” he started presenting papers on this topic as far back as 1991 (for a long time without getting any other scholars interested in demystifying integration).

be communicated both to students and to the wider public. Since the understanding is nuanced (and thus not well suited to ten-second video clips or tweets), it will likely need to be communicated repeatedly.

At the same time that we urge our students to appreciate a continuum between complete subjectivity and perfect objectivity, our analysis suggests a set of institutional changes that in fact would move the scientific process toward the objective end of the continuum:

- Institutionalizing interdisciplinarity itself, for interdisciplinary analysis provides a set of strategies for evaluating disciplinary insights (placing them in the context of disciplinary perspective; contrasting them with insights from other disciplines; recognizing the key strengths and weaknesses of all methods and theory types; see Repko, Szostak, & Buchberger, 2017) that complement disciplinary evaluations. Interdisciplinarity then allows the integration of these insights into more comprehensive understandings.
- Encouraging scholarly incentives toward replication and meta-analysis.
- Discouraging opportunities – such as the ridiculous way in which drug companies can suppress negative clinical findings – for special interests to influence scientific outcomes.
- It is perhaps not too great a leap to move from supporting institutions that discourage selfish bias in scholarship toward urging campaign finance reform in order to reduce selfish bias in political discourse (see below).

Interdisciplinarity and Expertise

Interdisciplinarity highlights a particular challenge in translating scholarly insights into public policy. Scholarly experts tend to know a lot about a constrained set of phenomena. One of the key challenges in public policy is that policies with one purpose can have deleterious side effects on quite different phenomena. Or, the policy may not even have the desired impact because of the unforeseen interaction of the policy with phenomena not usually engaged by the scholars advocating the policy. The interdisciplinary strategy of organization can be crucial here: That is, we need first to visualize how the phenomena implicated in a particular policy interact with yet other phenomena. Then we need to integrate the various disciplinary or cross-disciplinary understandings of each linkage on our diagram of how relevant phenomena interact.

Drezner (2017) worries that “thought leaders” have supplanted “public

intellectuals” in contemporary political discourse. He defines the latter as people with a nuanced understanding of many things, whereas the former are people with a fixed set of ideas that they tirelessly advocate. He speaks here not just of politicians driven by ideology but of scholarly specialists who think that their discipline holds the key to enlightened public policy. He appreciates that we benefit from both kinds of people, but worries about a public debate dominated by the first type. Though he does not speak much of interdisciplinarity, there is a strong case to be made for “interdisciplinary public intellectuals” who can draw on understandings from multiple disciplines and yet have a healthy skepticism about disciplinary insights. Such intellectuals can integrate and communicate the best of contemporary scholarship, while noting its limitations.⁵ Such intellectuals, by not exuding more confidence than scholarly understanding should allow, and directly confronting scholarly biases, might prove a powerful force for restoring an appropriate public respect for intellectuals.

Voters will still have to evaluate the arguments of both public intellectuals and thought leaders. Here too interdisciplinary scholarship has a crucially important insight: One needs only some sense of the discipline’s perspective (worldview) and of interdisciplinary strategies for evaluation in order to analyze disciplinary insights. By teaching students both interdisciplinary strategies and a sense of disciplines, we thus empower them to analyze any argument they come across in their lives. Students who are not thus empowered will be sorely tempted to just believe what is convenient – and disdain the entire scholarly enterprise if necessary to justify their belief set.

Interdisciplinarity and Ethics

The ethical challenge of our time is this: to continue to encourage an acceptance of diversity while also encouraging important ethical attitudes such as honesty, responsibility, and self-awareness. This seeming dichotomy between appreciating diversity but asserting certain values is difficult to bridge. When young people in North America are surveyed about ethical attitudes, they often respond that any values a group might adopt are okay. Interdisciplinarity provides a powerful path forward. On the one hand, interdisciplinarity encourages respect for different perspectives. On the other hand, though, interdisciplinarity holds out hope of transcending differences and achieving more comprehensive understandings. Interdisciplinarity tells us, then, that there need be no hard choice between respecting diversity and

⁵ We will discuss below the advantages and feasibility of making such interdisciplinary understandings readily accessible.

seeking an integrated ethical understanding that would celebrate certain values.

Interdisciplinary scholarship has focused more on integrating scholarly insights than values. One might reasonably suspect that at least some differences in values are particularly challenging to integrate across. Yet the same integrative techniques can be applied. Whereas scholarly insights may be rooted in myriad types of theory, there are only a handful of ways in which we evaluate values or ethical precepts. I have argued elsewhere (Szostak, 2005) that we may be guided by five different sources of ethical evaluation: intuition; traditions (we can include peer pressure here); a calculation of the likely effects of a certain attitude; an attitude's correspondence with particular rules that we hold dear (e.g. the Golden Rule); or an attitude's correspondence with values we have previously adopted. Often but far from always, strong arguments can be constructed in all five ways that support a particular attitude such as "Honesty is generally desirable."⁶

Democratic discourse is strengthened dramatically if we can encourage both politicians and voters to value a shared set of ethical precepts:

- To value honesty. Voters should expect politicians to respond honestly to questions the vast majority of the time.
- To value humility. Arrogance steers both voters and politicians away both from respecting others and from carefully evaluating all evidence and arguments before making decisions. Humility need not prevent politicians from thinking themselves capable of making hard decisions, but would guide them to evaluate these decisions after the fact. (Humility could also guide (especially disciplinary) scholars away from unconstructive arrogance.)
- To value open-mindedness. Our culture often criticizes "fence-sitters" and values those who seem decisive. (Even more troubling, there is now a social expectation of strong political partisanship.) Strong opinions form part of many people's sense of identity. They can then interpret disagreements with them (or those they vote for) as personal attacks. However, decisions that do not take into account differing points of view are often misguided. We need to discourage people from simply latching on to congenial attitudes, and especially from demonizing those whom they disagree with.
- To value both personal and social responsibility. Polarized political discourse often stresses one or the other. Most people, though, have an intuitive appreciation of a duty both to their own family and to the wider community. Public intellectuals need to speak more

⁶ Szostak (2005) identified an "ethical core" of dozens of ethical statements that receive strong support from each of the five types of ethical analysis.

forcefully about how that duty to the wider community includes upholding democratic values. People have fought hard in many lands for rights such as freedom of speech; those of us who have enjoyed such rights for generations too often take them for granted.

- To value self-knowledge. This is perhaps the most important of all. Human beings have an amazing capacity for self-deception. We can act out of fear or hate or jealousy – or just the natural human tendency to identify with small groups – and then rationalize our actions afterward. Yet we want our public policy to reflect careful thought rather than our basest emotions. Note that recognition of the ethic of social responsibility (above) in the absence of self-knowledge invites support for arguments that all of the injustice in the world is the fault of somebody else and can be addressed costlessly if we just vote the right way. We can then rationalize not doing anything positive to help others.

Interdisciplinarity not only allows us to pursue ethical integration generally but supports many of these key values. The interdisciplinary research process itself encourages self-reflection (see Repko & Szostak, 2017, especially chapter 13). It thus indirectly encourages honesty since the non-reflective often mislead others because they mislead themselves. The interdisciplinary recognition that there is generally a kernel of truth in opposing lines of argument encourages both humility and open-mindedness.

We could extend this list. Special note might be made of empathy. This is encouraged by the interdisciplinary practice of perspective-taking. If we try to put ourselves in the place of those we disagree with, we are more likely to understand the sources of our disagreement. Moreover, if we put ourselves in the place of those we see as a threat, it is harder to demonize them.⁷

If we do not face up to the ethical challenge of our times we can hardly be surprised if people with a sense that something is amiss flail outward at the wrong targets. If a person values honesty or responsibility – as we all should – and senses that our embrace of societal diversity has weakened our advocacy for such values, then we can hardly be surprised if diversity itself comes under suspicion. There are of course many reasons for racism and homophobia (which would not survive careful exercises in self-knowledge)

⁷ “Educating for citizenship certainly entails helping students become more civically engaged in the traditional ways....But [we] also believe that citizenship education embodies more abstract qualities: learning how to become more comfortable with ambiguity and complexity, how to disagree without being disagreeable, and, perhaps above all else, how to be more empathetic” (Smith, Nowacek, & Bernstein, 2010, p. 2). They then proceed to emphasize both breadth of knowledge and learning how to learn in new areas. These are all attitudes and skills encouraged by interdisciplinarity. Newell (2013) explored how interdisciplinarity encouraged civic learning.

but one constructive way of battling these attitudes is to first be honest about the ethical challenge of our times and then argue persuasively that we can embrace both diversity and the key values on which social harmony and democracy rest.

Interdisciplinarity and Discourse

Rhetoricians have long recognized three broad types of persuasive argument: appeals to logic, appeals to authority, and appeals to emotion. Many observers of the present political scene worry that the last two have come to swamp the first in influencing most voters. As academics that fill our papers with citations, we can hardly wish away appeals to authority. Appeals to authority prevent us from having to re-make every argument that we build upon. As humans, we should also be self-aware enough to know that we are never guided entirely by cold logic over emotion. Yet we can nevertheless expect that democracy will function best – that we will best be able to acknowledge and then transcend our differences – if arguments from logic predominate. It is no simple task to alter the way that voters make decisions. Nevertheless, interdisciplinarity has much to contribute to this task.⁸

Logic can only predominate if voters listen to and evaluate differing arguments. Newell (2017) commented on both the intellectual vitality and the collaborative discourse that characterize the community of interdisciplinarians. Some of the latter may well be a matter of personality. Yet interdisciplinarity as described above likely encourages practices that are respectful and constructive.

Respectful and constructive discourse is of critical importance within the academy. It may be even more important outside of the academy.⁹ Familiarity with a few arrogant academics can deter voters from engaging with scholarship forever. Those members of the public who may feel that they are at a discourse disadvantage – because they doubt their knowledge base or debating skills – are most likely to disdain scholarly discourse and then engage in anti-intellectualism, bullying, conspiracy theory (which by its nature tends to rely on belief more than evidence), and exhibiting a preference for emotive behaviors over facts. We spoke above of the need to empower future voters when we educate them. We must then continue to empower them

⁸ Montás (2017) blames the lack of civics education in college on disciplinary specialization which guides us away from “educating the whole person” or pursuing broad societal goals; students should know some history and political philosophy.

⁹ The philosopher Jurgen Habermas (1990) has famously urged the “ideal speech situation.” This involves a devotion to achieving consensus, lack of any sort of coercion, and the expectation that any participant can ask any question, and others will attempt a reasoned response.

by participating in respectful public discourse with them. This is no easy task for scholars since we are always tempted to advertise our expertise. (Self-knowledge is useful here again for scholarly arrogance is generally a cover for scholarly insecurity: We might thus pretend to know more than we do.) Interdisciplinary scholarship encourages an appropriate humility (see above) whereby we can communicate our understandings with an appropriate degree of confidence and engage respectfully with constructive critiques.

A pressing challenge to reasoned dialogue is the vitriolic attacks now common, especially on social media, toward anyone who says anything that offends another's ideology. We need to transcend the vitriol to identify any sensible points that might be made and deal politely with these. I have engaged in a bit of political activity in my life and have often found that this strategy earned a grudging respect from some of those that voiced a strong distaste for my views. Indeed, they often were embarrassed by their own behavior when I responded constructively. The alternative of shouting down anti-intellectual speakers is an admission that reasoned discourse is impossible.

Reasoned discourse is perhaps most challenging around questions related to diversity. We noted above that the pursuit of ethical integration provides one partial solution to misplaced attacks on cultural diversity. We recognized at that time the danger of diversity being seen to trump other ethical values. It follows that we need to be willing to engage in constructive discourse around diversity-related issues. I might well prefer that some people did not raise questions about crime rates among illegal immigrants or whether some ethnic or religious groups integrate better than others into wider societies. I can reasonably worry that such questions encourage suspicion more than understanding. However, I can hardly forbid them. Some people may have the worst possible motives for raising such questions, but these questions nevertheless seem the sort of questions that could benefit from careful interdisciplinary analysis. Such analysis might even point toward policies that would facilitate cross-cultural understanding. As with the principle of free speech more generally, our embrace of the principle of reasoned discourse will guide us to engage reasonably with questions we may wish we could just ignore. Refusal to do so will fuel anti-intellectualism: We cannot choose the questions that others wish to engage.

The literature on interdisciplinarity has often suggested that cross-cultural understanding is similar in many ways to cross-disciplinary understanding: Both need to transcend differences in both terminology and perspective. I have elsewhere bemoaned the fact that interdisciplinarity was once widely thought to be impossible (since one could only master one discipline) and

is now widely thought to be easy. Some assume that cross-cultural understanding is easy and inevitable while others fear that it is impossible. Interdisciplinary scholarship should guide a more nuanced appreciation of the challenges of cross-cultural understanding, which can guide measured discourse around solutions. We might make special note of the distinction we often draw between multidisciplinary and interdisciplinarity: The shared sense of public purpose on which democracy relies may require not just the juxtaposition of the views of different cultural groups but also an important degree of integration.¹⁰

Institutionalizing Reasoned Discourse

Much of our article so far has focused on encouraging a set of values. A strong and healthy democracy likely depends on a supportive and inter-related set of cultural values and institutions, where “institutions” are defined as the formal rules (laws, regulations, and so on) of a society. There is, I would note here, the potential for enhanced interdisciplinary understanding of how institutions and values can and should reinforce each other. I devote this section to discussing institutional innovations that both reflect interdisciplinary values and can be justified by interdisciplinary scholarship.

Alston (2017) argues that dramatic change in institutions – and perhaps especially institutions of governance – tends to occur only when the beliefs of those who exercise most influence over institutions themselves change dramatically; such beliefs in turn are only likely to change in response to some unforeseen shock. I think it fair to say that there have been electoral shocks in many mature democracies in recent years, and that these have shaken the belief sets of many politicians, intellectuals, and others (businesspeople, union leaders, lobbyists) who influence institutional change. Many of these people would like to respond to anti-intellectual and anti-democratic impulses, whether because they see these as a threat to democracy or because they want to maintain their own power. Alston suggests that intellectual leadership can play a critical role in such historical moments in identifying and urging a particular set of new beliefs and institutions; these may then

¹⁰ Etzioni (2017) urges us to respect people’s natural tendency to identify with small groups, but also to seek to identify common values that unite us. Though he does not use the phrase “both/and” advocated by Newell in many publications, Etzioni urges us to value both unity and diversity. Lilla (2017) worries that an emphasis on “identity” steers students away both from caring for people with different identities and from open dialogue: It is accepted that one’s experience of identity determines one’s ideas. I would note that support for both democracy and a range of social programs depends on a strong sense of unity.

change little until the next crisis hits. Interdisciplinary public intellectuals may be able to seize the present historical moment in order to encourage some of the values celebrated above – for example, honesty, responsibility, self-awareness – and the compatible institutions outlined below.

Citizen's Fora

Randomly selected groups of citizens can be gathered, exposed to all sorts of expert advice, and invited to make public policy recommendations. Such an institution has myriad advantages:

- It places power in the hands of typical citizens, rather than experts or politicians. These get to ask questions of experts – who will need to respond respectfully if they hope to persuade.
- It reinforces the important principle that citizens are capable of reasoned policy discourse. It also addresses one of the key challenges of democratic discourse: Most voters lack the time or inclination to become deeply knowledgeable about complex public policy issues. This is one key reason that they may rely more on emotion or appeals to authority in making decisions. Members of citizen's fora can be exposed to a range of expert advice. They can then identify areas in which they wish to learn more.
- Such fora will almost inevitably be interdisciplinary, for different experts will have different expertise and provide different advice. Forum members will then likely seek integration. Note in this respect the psychological observation that all humans have innate skills at creating common ground (Bromme, 2000). Nevertheless, members of such fora could usefully be exposed to interdisciplinary strategies. The scholarship of transdisciplinarity has identified communicative strategies by which stakeholders can interact with diverse experts in the pursuit of consensus (McDonald, Bammer, & Deane, 2009; Bergmann et al., 2012).
- Note that most complex public policy issues require integration across both values and scholarly insights. Such fora can thus potentially yield consensus in both realms. I have long suspected, for example, that many whose values are implacably opposed to illegal drug use would develop a more nuanced outlook if more aware of the costs and benefits of different drug policies (recall that one of the ways we reach ethical judgments is to investigate the consequences of particular attitudes or actions).

The trick is to make these fora powerful. They have been rare enough historically that politicians have often ignored their advice. However, this may

be an institutional innovation where we can harness the contemporary wave of suspicion of authority to good use. At this historical moment, politicians might be particularly wary of ignoring clear advice from informed voters – as long as the broader public identified with randomly selected forum members (which will become more likely if politicians raging against entrenched elites fail to please voters).

Unbundling Political Decisions

One challenge facing modern voters is the sheer range of activities undertaken by modern governments. No voter can possibly have a well-informed appreciation of every policy issue at stake in an election. Even if they did, few voters might find that they agreed with any politician on each of dozens of distinct issues. Informed voters often face a situation in which they vote for the person they disagree with the least. Less informed voters are understandably tempted to hope that one politician or party sees the world exactly as they do.

Political party allegiance is waning in many countries. Young people especially are drawn to political action groups focused on particular issues. There is a danger here of fragmenting public discourse. Yet there is also an opportunity if we can somehow mobilize reasoned discourse around particular issues, and have this discourse guide public policy on those issues. We already have institutions in society – school boards leap to mind – that allow voters to focus their attention on one area of public policy at a time. There may be scope for further unbundling of political responsibilities, especially at the local level. One key interdisciplinary task is then to ensure that solutions to one problem do not exacerbate other problems: Reasoned discourse around particular issues must be placed in a broader context that recognizes effects on other policy goals.

Politicians are often tempted to over-simplify complex issues. Yet at other times they ignore straightforward policies to address pressing issues, such as placing a price on carbon emissions. A dedicated community of discourse focused on particular problems can ameliorate both the oversimplification of complexity and the avoidance of simple but misunderstood solutions. Such communities of discourse need to be broadly representative; unfortunately, people with extreme views are much more likely to make their views known. Again, there is value in attempting to integrate across diverse views.

Election by Lottery

A similar set of arguments to those employed with respect to citizen's fora above can justify choosing some of our "elected" officials by lottery. These

might prove to be an important voice of reason in countries characterized by polarized political discourse, for officials chosen by lottery with the time to gather relevant information may develop nuanced understandings of issues. They may then be much more likely to seek to integrate across ideologically-guided proposals. In addition, they are much less likely to be beholden to special interests than elected politicians – though they might still succumb to lobbying or bribery. As with citizen’s fora, the challenge is to get politicians to give up some of their power. Here again the present level of suspicion of elected politicians might be turned to good use. Officials selected by lottery should escape much of the disdain shown for elected officials – whose motives for seeking office are maligned, and who must always worry about campaign finance – and can thus serve to legitimize decisions.

Access to Balanced Information

There is scholarly debate about the degree to which social media encourage political polarization. Certainly, some people may increasingly engage only with information that simply reinforces their prior beliefs and biases – and big data increasingly allow well-funded political advisors (or companies) to target emotive messages to people identified by certain personality characteristics or demographic profiles. Nevertheless, many/most people may still consciously strive to engage with different points of view. Whatever the empirical reality may be, there is clearly value in facilitating access to unbiased information.¹¹

Here of course interdisciplinarity can again be hugely important. Only an interdisciplinary approach can take insights from multiple disciplines, evaluate them, and attempt some integration. Imagine a world in which the average voter could easily access websites where interdisciplinary scholars attempted to provide balanced coverage of key public policy issues, carefully highlighting the strengths and weakness of differing theories and hypotheses.¹² Interdisciplinary scholars could also model reasoned debate on such websites. Many voters, tired of shrill political debate, would find such sites liberating.

¹¹ There is also, of course, value in teaching critical analytical skills so that citizens can readily evaluate the ideas they encounter on social media. See Repko, Szostak, and Buchberger (2017, especially Chapter 8) on how interdisciplinarity imparts such critical analytical skills.

¹² With appropriate funding such websites might even strive to connect the news of the day to relevant analyses of the issues. They might then more-than-compensate for the decline of traditional media outlets (though the decline of investigative journalism is troublesome).

Both interdisciplinary scholars and the average voter would be better able to evaluate and synthesize the scholarly literature if our libraries did not organize this in disciplinary silos. It is both entirely possible and highly desirable to organize scholarly understandings around the phenomena we study and the relationships among these rather than disciplines (Szostak, Gnoli, & López-Huertas, 2016).

Referenda

Referenda also likely have a place in empowering the average citizen. They are most useful when the interests of the average voter clearly diverge from the interests of the average politician. However, referenda as usually constructed give the average citizen limited options, and those who formulate referenda do not generally engage the average citizen in formulating that choice. Voters in a referendum often become only marginally more acquainted with the issue than when they vote in a general election. Referenda campaigns seem – like elections themselves – dominated by appeals to emotion more than careful analysis of the options. Moreover, referenda by their nature polarize rather than seek consensus. We might wish to explore referendum designs that provide voters with more choices and perhaps even some scope for synthesis.

Campaign Finance Reform

Interdisciplinary scholarship warns us of biases and guides us to mitigate them. We can expect politicians who are dependent on large donations to be biased toward the interests of those who finance them. Limiting the scope for large donations thus limits an important source of bias.

Transdisciplinarity

We can empower citizens by involving them in academic research about issues they care deeply about: involve farmers in research about agricultural policy and the impaired in research about policies for the impaired.¹³ The literature on transdisciplinarity stresses that stakeholders should be integrated into the research effort throughout: They should be involved in decisions

¹³ Callon, Lascoumes, and Barthe (2009) distinguish deliberative democracy – where personal preferences are hopefully aggregated to determine public policy – from “dialogic democracy” where citizens interact with scholars in the framing of public policy possibilities. They suggest that the latter is under-appreciated. They also argue that individual citizens raise profound questions that can usefully guide research.

about research questions and methods and interpretation of findings. There are challenges to be sure. Stakeholders are generally far more interested in policy recommendations than in academic publications. Yet stakeholders can guide academic researchers toward both problems and solutions that they would otherwise have missed (Bergmann et al., 2012).

We might achieve a similar sort of synergy by more closely connecting academic researchers and government bureaucrats. We might, for example, more often transfer academics to work for governments and vice versa. We might gain both more practical academic research and governance that is more informed by scholarship as a result. Moreover, since bureaucracies must regularly engage with citizens regarding their lives, academic research is again (albeit somewhat indirectly) brought into contact with the concerns of individual citizens.

Interdisciplinarity and Research about Democracy

It deserves emphasis that interdisciplinary research could further illuminate many of the issues addressed in this article. I provide here just a couple of brief examples of such research, each of which has implications for how we might encourage the attitudes and institutions discussed in the earlier sections of this article.

Drutman (2016) is critical of the assumption of rationality that has dominated much political science thinking in recent decades. He wistfully recalls that political scientists did not routinely stress rationality decades ago. He worries that voters are ill-informed, lack the well-defined policy preferences that rational choice theory assumes, and tend to blame politicians for outcomes that were not their fault. He notes that Achen and Bartels (2016) argue instead that emotions and group identity drive voters: They would thus be immune to the sort of efforts we have described above to improve discourse or ethics. The interdisciplinary strategy of transformation would recognize that there is a continuum between complete rationality and complete non-rationality and that individual voters lie at varying intermediate positions along this continuum. Interdisciplinary research would seek a deeper understanding of how different voters blend rational and non-rational strategies. A deeper understanding of voter behavior could inform our pursuit of the various goals outlined earlier in this article.

Drutman also argues that we need a better understanding of the nexus between culture, psychology, social groups and political preferences. This calls for the application of the interdisciplinary strategy of organization: We need to map how these diverse phenomena interact. Likewise Mounk (2017)

worries that political scientists in seeking to identify causal relations among the variables they investigate have often neglected to account for how these variables relate to yet other variables. One important result of this practice is that political scientists may exaggerate the stability of democratic systems, failing to appreciate how changes in the economy or culture might destabilize them. If true, Mounk's concerns could serve as an example of a general tendency I identified in Szostak (2017) for relationships between variables studied in different disciplines to destabilize systems of stability posited within disciplines. As we grapple with unanticipated shocks to democratic processes, we could benefit from a far better understanding of both the source of these shocks and how they are likely to play out over time. This article might then be seen as a project to re-stabilize our democracy.

The economist Robert Shiller (2017) urges social scientists to pay more attention to narratives: People naturally think in terms of stories and scholars often use stories as a rhetorical device. One implication of this analysis is that people may be "wired" for conspiracy theory. It is easier to comprehend the changes that affect their lives as being the result of malevolent actors than as reflecting changes in impersonal economic or technological realities. Schiller's point, though, is that social scientists could potentially understand much more about why narratives in general and key types of narrative in particular move us. Schiller hypothesizes that new narratives may take a decade or more to become popular but then can suddenly transform the way that many people see the world.¹⁴ If so, then our efforts to improve public discourse should take the role of narrative into account. We might, for example, seek to shape narratives that encourage respectful discourse. This calls for interdisciplinary cooperation between humanists and social scientists.

Intellectual Bias

Interdisciplinary scholarship warns us to be aware of scholarly biases of all sorts. While scholars of interdisciplinarity focus naturally on disciplinary biases, we have also long been aware of the danger of biases that might afflict the entire scholarly enterprise. In addition, we have long warned individual scholars to interrogate their own biases.

It is thus worth asking whether highly-educated scholars might be guilty of performing analyses – at least some of the time – that emphasize the interests of the educated. Such a bias might be even more likely since most

¹⁴ There is a connection here to the influential work of Lakoff (2002) on "framing," which also seeks to understand how voters bring particular perspectives to public policy issues.

(though far from all) professors had educated parents. (Similarly, there might be an urban bias in scholarship.)

Economic theory has long appreciated that unskilled workers might suffer from freer trade with countries that possess an abundance of unskilled labor. Economic theory suggests that the gains from trade are large enough that at least in theory the skilled could compensate the unskilled for their losses. Have economists perhaps lauded the overall advantages of trade far more loudly than they have advocated transfers to the unskilled to compensate them for job losses they might suffer as a result? Have we perhaps therefore ignored some of the social and psychological costs associated with retraining or relocation in order to get a new job?

We can make a similar argument about how immigration affects the unskilled. Though immigration generally has a very limited impact on wage rates, we know that immigration of unskilled workers can depress unskilled wages in certain localities. Do educated scholars downplay the effects of immigration of unskilled people on wage levels in the job market for unskilled workers?

While trade and immigration have become lightning rods for voter dissatisfaction, we should not ignore broader concerns about economic growth and employment prospects. Do educated scholars downplay the social and psychological costs of unemployment and underemployment, because these have been more commonly visited on the unskilled historically? Will this change if developments in artificial intelligence (deep thinking) lead to massive layoffs of educated workers, as some fear?

Most government spending accrues to the educated – including massive subsidies for post-secondary education itself. One of the ironies of public discourse is a widespread misperception that a large fraction of government expenditures is devoted to welfare for the poor (a misperception that serves the interests of far too many) when in fact the middle class tends to be the main beneficiary. Middle class professors may be far too sanguine about this situation.

In all of these examples, there have of course been scholars who have focused their efforts on the lived experience of those with limited formal education. The question, though, is whether on average scholars tend to care more about – and intrinsically better understand the nature of – the challenges faced by the educated. Both our appreciation of scholarly bias and the value we place on understanding the perspective of others should guide us to ensure a balanced scholarly effort.

Interdisciplinarity and Progress

The contemporary level of discontent with democratic institutions is rooted in a sense that human societies are no longer progressing. Democracy is

both an end in itself – an alternative to authoritarian rule – and a means to other ends. It is hoped that democracies will generally make public policy choices that benefit the population. A widespread sense that things are getting worse rather than better thus understandably causes many to suspect that democracy itself is not working well.

Interdisciplinarity can be important here in a couple of ways. First, an interdisciplinary understanding of our complex modern world can highlight the fact that governments are just one of many actors in the world. We should not blame every problem in the world on governments nor celebrate them for every success. In particular, technological change has likely had a far more profound effect on labor market outcomes in recent decades than have government policies.

Interdisciplinarity can also guide a more multifaceted appreciation of human progress itself. The literature on progress tends to be very selective: Some authors focus on average incomes and detect progress while others focus on biodiversity and see decline. I argued (Szostak, 2012) that we can identify progress across a wide range of societal goals – but also that there are plausible policies that could address areas of regress in order to achieve a more broadly-based progress. We simply should not casually accept claims that human progress has been arrested.¹⁵

Yet we should not be triumphalist either. We need to celebrate human progress where it exists while working to address problems elsewhere. As noted in the preceding section, we need to be especially cognizant that some groups may have suffered, at least relatively.¹⁶

Interdisciplinarity and Public Policy

We suggested above several institutional changes that would encourage reasoned discourse in general. The fact that judgments of democracy reflect judgments of the effectiveness of public policy guides us also to reflect on whether certain changes in public policy might reinvigorate faith in democracy. Can we employ interdisciplinary analysis to address pressing public policy challenges and thus indirectly reinvigorate faith in democracy?

I am excited to see an increasing number of thinkers and governments – from across the political spectrum – speculate on the advantages of a

¹⁵ Pinker (2011) focuses on various sorts of violence, arguing that these are much less common today than in the past.

¹⁶ That being said, it is technology far more than trade that has replaced industrial jobs across the developed world. In the absence of reasoned public debate, it is all too easy for those with some reason to complain to misallocate responsibility for changed realities.

guaranteed basic income. Such an approach might replace myriad overlapping welfare programs, while being structured so that the poor would still face a financial incentive to work. (I am also a big believer in public works programs for the unemployed.) Properly designed, such a program might be good for the economy while transforming cultural attitudes toward the poorest members of the society. And a streamlined welfare system would be easier to navigate and easier for the average voter to evaluate. Such a dramatic change in public policy would have implications far beyond any one discipline: It needs then to be studied in an interdisciplinary or indeed transdisciplinary manner.

A variety of other innovative policies can be imagined. A set of policies (centered on pricing carbon emissions) could dramatically improve our environment without laying waste to our economy. There is a set of policies – including basic income and public works programs but also shareholder democracy, tax reform, certain types of financial regulation, policing tax havens, etc. – that may each on its own be unexciting, but that could together reverse recent trends toward income inequality (which arguably threatens both economic growth and democratic legitimacy). The list could go on. As noted more than once above, the present historical moment generates opportunities for change. Our fight against anti-intellectualism will be more persuasive (and more important) if interdisciplinary scholarship carefully identifies workable public policies.

If people sense that the world is moving in the wrong direction but are unaware of viable public policies that can address pressing problems, many may be tempted by emotive appeals in support of policies that blame “others” for everything that is wrong in the world. We have discussed issues around cultural diversity above. Foreigners are another easy target for emotive appeals. This is especially likely since trade negotiations in recent years have moved beyond relatively easy discussions around tariffs on manufactured goods toward much more challenging discussions of national regulations that tend to be the most serious barrier to trade in services. People can reasonably worry about complex trade negotiations behind closed doors – and the possibility that corporations can more easily influence them than can workers or consumers. Yet there are also potentially huge benefits from encouraging increased trade in services. Academic advice thus needs to be nuanced (the strategy of organization may be critical here in ensuring that both costs and benefits of trade liberalization are appreciated). Yet the present discourse around globalization often suggests that increased international interaction is inevitably problematic rather than potentially beneficial. We need to ensure not only that we generate good public policy proposals but that we do not inadvertently support public policies that might do more harm

than good.¹⁷

The Importance of an Interdisciplinary Education

Scholars associated with AIS have long advocated a more interdisciplinary approach to university education. There has been less attention to the K-12 system, but Lenoir and Klein (2010) co-edited a special volume of this journal that compared interdisciplinary approaches at both K-12 and university levels across several countries. This article has argued that we should seek to expose all citizens to interdisciplinary attitudes and strategies. It is thus critical that interdisciplinary education begins within the K-12 system. There would be myriad advantages to taking an interdisciplinary approach in K-12 beyond its effect on voter behavior. Just as interdisciplinarity can lend coherence to general education programs at the university level (Carmichael, Dellner, & Szostak, 2017) it could do so to “social studies” in K-12 (which seems to me as a parent to be an unstructured mishmash of topics, some of them worthy but many needing a wider context). As Lenoir has noted in many publications, interdisciplinarity could inform many useful connections across the “subjects” around which K-12 education is structured.¹⁸

Concluding Remarks

At the start of this article we quoted Newell that interdisciplinarity was “the only game in town” for addressing key intellectual challenges of the 21st century. The strategies and attitudes associated with interdisciplinary scholarship could provide the most powerful antidote to contemporary cur-

¹⁷ I argued in 2014 that the concept of globalization is best broken into its constituent parts and these studied independently. Such an approach encourages clarity in exposition and the identification of more precise public policy implications. I recognized in 2016 (in response to an insightful critique by Zachary Piso) that the ideological meanings associated with globalization might be lost in translation, but wondered if this was such a bad thing. I might note here that there is an important overlap between the scholarship of postmodernism and the scholarship of globalization; it is thus not surprising that interdisciplinary scholarship can appreciate important arguments within both but urge caution toward certain implications of each discourse. I might note here that the more comprehensive understanding urged by interdisciplinary scholarship is generally recognized as being nuanced.

¹⁸ I have often thought, for example, that we could expose students to income tax forms, providing them with an important practical capability while impressing on them the value of basic mathematical and reading comprehension skills – and of being able to connect the two.

rents of anti-intellectual and anti-democratic thought. It is thus of critical importance that these attitudes and strategies be taught to the widest range of students in both K-12 and postsecondary education. They need also to be communicated outside of the educational system. Interdisciplinarity also encourages a set of institutional changes both within and beyond the academy that can enhance the quality and thus the results of public discourse. These institutions and attitudes are mutually reinforcing. Together they can generate superior public policies, which will further enhance public appreciation of both academic expertise and democratic processes. Interdisciplinary public intellectuals can play an important role in both encouraging and modelling a set of interdisciplinary attitudes and in communicating respectfully a set of comprehensive but nuanced public policies.

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