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# Online versus face-to-face deliberation: Who? Why? What? With what effects?

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## Abstract

Although there has been much speculation regarding the strengths and weaknesses of face-to-face versus online deliberative settings, no studies have systematically compared the two. Drawing on a national sample of Americans who reported deliberating face-to-face and/or online, we examine these two deliberative settings with regard to the participants, the motivations, the process, and the effects. Our findings, although tentative, suggest that the two settings are distinct in several important ways. Relative to face-to-face deliberation, online deliberation over-represents young, male, and white users, attracts more ideological moderates, generates more negative emotions, and is less likely to result in consensus and political action. At the same time, online deliberators perceived online settings as more politically and racially diverse. Implications for understanding the democratic potential of different forms of deliberation are discussed.

## Keywords

face-to-face deliberation, online deliberation, political discussion, public sphere

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## Introduction

Deliberation has been touted as crucial to a responsive and effective democracy. Theorists argue that deliberation fosters understanding, creates 'the opportunity of exchanging error for truth' (Mill, 1956: 21), and promotes the 'capacity for representative thinking and ... more valid ... final conclusions' (Arendt, 1968: 241). Deliberation is also said to increase efficacy, knowledge, and participation (Fishkin, 1995; Gastil and Dillard, 1999; Jacobs et al., 2009), legitimize the political system, and contribute to social cohesion (Gutmann and Thompson, 1996).

In order to translate these benefits into real world practice, scholars and practitioners have been organizing citizens' juries, deliberative polls, and problem-solving groups. Promoting meetings that include all individuals affected by an issue, however, requires effort and finance (Fishkin, 1995). Once assembled, moreover, such meetings might attract an unrepresentative handful of citizens (Fraser, 1990), excluding those less interested who are nonetheless affected by the issue (Benhabib, 1996). Even when traditionally marginalized citizens are included, such as those from the lower class and gender, racial, ethnic, or sexual minorities, stereotypes or fear of isolation might silence their voices (Sanders, 1997). Consequently, deliberation might reflect the social power structure and reinforce preexisting inequalities.

The internet has offered new hopes to deliberative scholars who saw its equalizing and pro-democratic potential. Some predicted that the internet would provide an improved forum for debate, one that involves geographically disparate citizens, where issue relevance matters, social status is less important, and arguments are evaluated based on their strength (see Papacharissi, 2002). The internet would not only make deliberation easier but would also overcome the constraints of face-to-face meetings (Price and Cappella, 2002). Other scholars have conversely emphasized the internet's potential to damage deliberative ideals by facilitating exposure to like-minded views, encouraging incivility, or decreasing satisfaction (Sunstein, 2001). The online public sphere would be inferior to face-to-face one, which would strengthen community bonds and expose people to diverse views.

Scholars have often theorized about the differences between offline and online deliberation and anecdotal evidence has extolled their *relative* benefits or threats. Researchers have also analyzed participants, processes, and effects that *either* offline (Luskin et al., 2002) *or* online deliberation (Price and Cappella, 2002; Stromer-Galley, 2003) involves. The fewer studies that have compared the two settings have focused on their effects on knowledge, conformity, and polarization without attending to motivations, experiences, or evaluations (Luskin et al., 2006).<sup>1</sup> More comprehensive analyses are needed if we are to understand the democratic potentials – and avoid the pitfalls – that deliberation in these two settings entails.

In this study we do not aim to review deliberative theory or to comprehensively outline the research. Rather, drawing on a national sample of American citizens who reported participating in deliberative meetings in the past year, we provide a comparison between online and offline settings. Because the sample was largely intended to study face-to-face deliberation, the number of online deliberators is small ( $n = 105$ , 7%). The sample does, however, permit us to shed light on some unaddressed questions

such as: How many citizens participate in offline and online deliberative forums and who are they? What are the reasons for joining such forums? Are there differences in how online and offline deliberation is experienced? Do these forums differ with regard to the functions they serve? And do online and offline deliberation vary in their impact on political and civic engagement?

## Benefits of internet-based political discourse

Although definitions differ among scholars, deliberation is generally seen as a public discussion about sociopolitical topics that should include (or represent) everyone affected by an issue, offer equal opportunities to participate, and include citizens who express diverse views, are open to alternatives, debate the issue in publicly spirited ways, and center on arguments rather than on coercive power. Often, deliberation is aimed at reaching a consensus or generating action (see Fishkin, 1995; Mendelberg and Oleske, 2000).

As traditionally theorized, however, deliberation was far from inclusive. For Kant, public sphere, which encompassed people who saw themselves as equals and formed an alternative to the church and the state, excluded minority groups as inadequate to participate (see Negt and Kluge, 1993). Also, for Habermas (1991), whose public sphere was based on literary gatherings among the commercial class in 18th century Europe, the public included white, educated, upper-class men, who shared similar values and 'referenced the same symbols for their public experiences' (Pearce and Littlejohn, 1997: 98). Those men were also seen as able to set aside their particularities. Kant presumed that citizens could reach consensus by transcending private differences in the public arena (Negt and Kluge, 1993). Habermas (1991) similarly stated that public sphere was open to property-owners who were able to 'emerge from the confines of their private spheres as if they were scholars' (Habermas, 1991: 105). Also, legitimate debate topics included procedural and legislative affairs, and thus politics was reduced to 'allocative or economic kind of activity operating in a world of scarce values' (Warren, 1992: 9). This privileged rational argumentation, overlooking the emotionality inherent in politics (Pantti and van Zoonen, 2006). In such a deliberative public, moral, religious, or lifestyle differences are relegated to the proprietary private sphere and with them, 'passions are erased from the realm of politics.' Yet, 'it is not enough to eliminate the political in its dimension of antagonism and exclusion from one's theory to make it vanish from the real world' (Mouffe, 2000: 31).

These problems may be reflected in deliberations as organized by civic institutions, non-governmental organizations, or public advocacy groups. After all, the citizens who self-select to such deliberations are those who have the resources necessary to spend time discussing politics. Even when disadvantaged citizens from under-privileged or under-represented groups do deliberate, in face-to-face setting that entail audiovisual cues, stereotypes or stereotype threat may silence their opinions or lead them to underperform (Aronson et al., 1999). Also, deliberations are often led by moderators who ensure that participants offer arguments and adhere to politeness standards. This may not only limit the naturalism present in everyday discussions, but also reinforce the notion that legitimate debate should be rationally-driven (Benhabib, 1996; Fraser, 1990), a notion that

ignores conflict and reflects 'a certain dislike for all-too-human intensities of democratic politics' (Walzer, 2004: 87).

According to some scholars the internet may resolve these problems. With regard to inclusiveness, the internet allows for many-to-many communication, transcends geographical confines, grants users unprecedented control over content, and allows them to easily seek out and share information. Therefore it might allow greater reach and increased representation than face-to-face meetings (Papacharissi, 2002). A similar argument could be made about the requirement that deliberation entail diversity. Online, people are not constrained to deliberate only with those who live nearby (Stromer-Galley, 2003) and may encounter previously unknown individuals who may be brought together by shared interests but who differ with regard to socioeconomic status or political viewpoints (Wojcieszak and Mutz, 2009).

Deliberators are also expected to attend to dissimilar perspectives. Online deliberators might appreciate diversity because if people join online forums due to shared interests and establish common ground on non-contentious matters, they might feel comfortable speaking up, less threatened by differences, and more open to dissimilar views (Bornstein and Rapoport, 1988). Such common ground might be less frequent in face-to-face deliberations, which are likely to be organized to discuss a contentious problem. Even if online forums also revolve around a divisive topic, discussants might appreciate opinion diversity and be willing to engage with it (Stromer-Galley, 2003), yet it is unclear whether this would depend on the setting. Also, consider the requirements that arguments be judged impartially. Online forums might be superior, in that anonymity and absence of non-verbal cues can reduce stereotypes (McKenna and Bargh, 2000), thus not only encouraging disadvantaged individuals to participate, but also preventing interlocutors from judging opinions based on factors other than the arguments themselves (Blader and Tyler, 2003). Lowered sense of social presence, moreover, may encourage people to express dissenting views because it reduces risks associated with disagreement (Bargh et al., 2002). As a result, online deliberation might not only offer more diverse perspectives, but also elicit more positive experiences.

Another concern regards achieving a fair outcome. Because face-to-face deliberations are likely to be organized around a community problem, they might more frequently aim at agreement than online discussions. Whether citizens perceive that the outcome reflects their position is another matter. Because face-to-face meetings might exert more pressure to reach a decision, offline deliberators might be less likely to see the outcome as consensual. Yet, because online anonymity might increase conformity toward a group norm (Postmes et al., 1998), online deliberation might lead to more perceived agreement.

What about political engagement? Although both online and offline political talk encourage participation in its traditional forms (McLeod et al., 1999; Price and Cappella, 2002) and in such non-institutionalized activities as rallying or protesting (Brunsting and Postmes, 2002), online deliberation might be more effective. Online anonymity might lead people to see others as similar and the group as unanimous, which may increase self-efficacy and mobilize to action. Also, with regard to traditional participation, internet users often inadvertently encounter political information, such as voting records and opportunities for civic recruitment, and can easily move to action, by emailing officials

or forwarding petitions. With regard to non-institutionalized participation, the internet connects dispersed citizens, facilitates communication within extensive and easily accessible networks, allows people to recruit new members, organize supporters, distribute information about possibilities for engagement, and makes it possible for dispersed individuals to plan protests and other grassroots activities (Garrett, 2006).

## Perils of internet-based political discourse

While some scholars extol the internet's potential, others suggest that the online environment might undermine deliberative democracy. With regard to equal participation, online deliberation may reinforce inequalities (Jennings and Zeitner, 2003) just as effectively as face-to-face deliberation. Although internet discussions could encourage disadvantaged individuals to speak up, those individuals might not join such discussions in the first place. On the one hand, the inequalities in internet access drawn along gender, income, and racial lines have been declining. Nevertheless, 'demographic disparities among groups have persisted over time' with regard to internet adoption (National Telecommunications and Information Administration, 2010: 3) and the so-called 'digital divide' (Norris, 2001) has continued in the US and worldwide. Also in our sample, those less educated and less wealthy are more likely to be 'currently disconnected' from the internet than the educated and well-off citizens (see Table 1). Just as face-to-face deliberation, online forums could thus disproportionately represent male, young, white, affluent, and educated citizens, who are more politically interested or knowledgeable and also have the skills needed to fully use the possibilities offered by the internet.

Also, online deliberation might prove less politically diverse, because the same features that enable users to connect with dissimilar people facilitate their interactions with like-minded associates (Sunstein, 2001). Internet users might easily locate unanimous groups and partisans may anonymously voice controversial views without fearing repercussions experienced among dissimilar people in immediate environments (Hill and Hughes, 1997). Hence, explicitly political online chat rooms and message boards are indeed more like-minded than other types of online groups, in which politics comes up (Wojcieszak and Mutz, 2009).

Further, deliberators should attend to dissimilar perspectives. Face-to-face settings might generate empathy and increase perspective taking ability to greater extent than online settings, because interlocutors are physically present and interact on an interpersonal level (Sally, 1995). Deliberation also requires civility and respect. Although online anonymity could encourage marginalized views to be heard, it may also decrease the salience of social norms and encourage such 'antinormative and disinhibited behavior' as 'flaming,' insults, or aggressive verbiage (Postmes et al., 1998: 695). As a result, online deliberations may generate negative emotions, thwart understanding, and preclude consensus.

This review suggests that online and offline settings differ. Yet, extant research has not systematically compared the participants in online and face-to-face deliberation, the processes occurring within these two settings, and the effects that they produce. In other words, studies do not elucidate whether online deliberation may advance deliberative ideals relative to face-to-face deliberation (but see Wojcieszak et al., 2009). To begin to

remedy this situation, we draw on a national sample of adult Americans who reported participating in face-to-face and/or online deliberation. Because the sample was intended to inform face-to-face practices, the small sub-sample that talked online is limited in its generalizability and statistical power. It does permit us, however, to ask four research questions as the first step towards assessing online and offline deliberation. First, what are the characteristics of online and face-to-face deliberators ('Who deliberates?')? Second, are reasons for joining online discussions different from those that motivate face-to-face deliberation ('Why do people deliberate?')? Third, do affective experiences and perceived diversity depend on the setting ('What are the experiences?')? Lastly, do online and offline deliberations serve different functions and do they produce different outcomes ('What are the effects?')?

## Method

This analysis draws on data from a national survey of American adults aged 18 and over (for details, see Jacobs et al., 2009). The survey, conducted by the Center for Research and Analysis at the Roper Center at the University of Connecticut, was part of a larger project on public deliberation funded by Pew Charitable Trust. The telephone survey consisted of a Random Digit Dial representative sample of 1001 adults, plus an over sample ( $n = 500$ ) of those who reported having attended a formal or informal meeting to discuss a local, national, or international issue within the last year. Interviewing took place between February 10 and March 23, 2003, using a Computer-Assisted Telephone Interviewing (CATI) system. Using AAPOR RR3, the response rate is 43.4% for the general population survey and 45.8% for the oversample.

## Measures

*Participating in deliberative forums.* The survey first assessed whether respondents engaged in face-to-face and/or computer-mediated deliberation, by asking: 'Since the beginning of last year, have you attended a formal or informal meeting organized by yourself, by someone else you know personally, or by a religious, social, civic, governmental, or political group to specifically discuss a local, national, or international issue – for example, neighborhood crime, housing, schools, social security, election reform, terrorism, global warming, or any other public issue that affects people?' A parallel question asked whether respondents had 'participated in any Internet chat rooms, message boards, or other on-line discussion groups organized to specifically discuss a local, national, or international issue.'

Overall, 25% reported having attended at least one face-to-face meeting, and only 4% reported having participated in at least one online deliberation. Including the 500 person oversample of face-to-face deliberators (some of whom also deliberated online) gives us a sample of 779 deliberators. Among them, 674 participated only face-to-face (the 'F2F' group), 23 joined online discussion forums only ('Online' group), and 82 engaged both face-to-face and online ('Both' group). The remaining 722 respondents did not deliberate ('Non-Deliberators' group). The comparisons between face-to-face deliberators, online deliberators, and, on occasion, non-deliberators are based on these four groupings. Because the survey asked separately about offline and online deliberation, those who



participated in both settings were asked all the questions twice. Here we adopt a mixed model, in order to address statistical problems due to clustered observations within a person in 'Both' group (contact the authors for details).

*Individual characteristics.* The survey accounted for various individual characteristics. Socio-demographics include gender, race, age, education, income, job status, and church attendance. Attitudinal measures include ideology, party identification, social and political trust, and also political knowledge, efficacy, tolerance, and interest. Political behavior items include media and internet use, voting, civic participation, campaign participation, contacting elites, and political consumerism (i.e. boycotting). Descriptive statistics for these items, broken down by the sub-samples, are presented in the results section (see also Table 1).

*Reasons to participate.* Respondents who reported attending a face-to-face or online deliberative forum indicated, on a scale from 0 ('Not important at all') to 10 ('Very important'), how important various reasons were in their decision to attend: (1) it was their duty as a citizen or a community member; (2) the issue affected respondents' community; (3) it was an opportunity to meet and talk with people with shared interests; (4) respondents were personally asked to participate; (5) the issue directly affected them or their family; and (6) the issue discussed sounded interesting.

*Emotional experiences.* Respondents were asked, on a scale from 0 ('Not often at all') to 10 ('Very often'), how often they felt 'angry,' 'enthusiastic,' 'anxious,' and 'more understanding of different viewpoints' during the last face-to-face and online meeting they attended.

*Perceived diversity.* Respondents indicated, on a scale from 0 ('Not diverse at all') to 10 ('Very diverse'), how diverse were the people at the last face-to-face and/or online meeting by income, age, gender, and race/ethnicity, as well as how diverse were the opinions expressed during deliberation.

*Functions of deliberation.* Respondents indicated, again on a scale from 0 ('Not important at all') to 10 ('Very important'), the importance of the following goals to the offline and/or online deliberation they attended: (1) allowing people to air different opinions, (2) teaching participants about the issue, (3) reaching agreement about the issue, and (4) providing an opportunity to decide on concrete follow-up actions.

*Reaching consensus.* The survey assessed whether, during the last face-to-face and/or online deliberation, any decision was made regarding what should be done to address the issue. Overall, 54% of face-to-face deliberators and 30% of online deliberators said that such a decision was made (coded as 1). Those respondents were then asked whether or not they agreed with the decision, and whether other participants agreed (0 = no, 1 = yes). Among those respondents, 92% of face-to-face deliberators and 88% of online deliberators agreed with the decision and 92% and 94%, respectively, perceived that others agreed.

*Follow-up action.* The questionnaire asked respondents whether they have engaged in any charitable, civic, or political activities as a direct result of the last face-to-face and/or



computer-mediated meeting they attended. Respondents also indicated, on a scale from 0 ('Not likely at all') to 10 ('Very likely'), the likelihood that they would attend another face-to-face and/or online deliberation in the next six months.

*Data limitations.* Before presenting the results, two limitations should be acknowledged (both are addressed in our conclusion). First, the small number of online deliberators overall, and especially of online *only* deliberators, limits both the analyses we can perform and the certainty with which we can draw conclusions. Second, because the data depend on self-reports, we cannot distinguish between *perceptions* and *actual* conditions. Hence some findings may tell us more about how deliberators *experienced* the forums than about what the forums actually looked like. Nonetheless, while these limitations should be kept in mind, we believe the advantages provided by being able to compare these deliberators in a single study, especially given the dearth of such comparative research, justify the effort.

## Results

Our study aims to describe the differences between citizens who participated in face-to-face and/or online deliberative forums. Hence, our central purpose is to provide a detailed albeit tentative description of the differences between deliberation in these two settings in order to shed light on their relative advantages and disadvantages.

### *Who deliberates?*

Table 1 addresses our first research question, detailing the characteristics of the four groups: participants in both settings ('Both' group), only online deliberators ('Online' group), only face-to-face deliberators ('F2F' group), and non-deliberators. With regard to socio-demographics, males, younger citizens, and those with a full time job are slightly more likely to deliberate online than face-to-face. Frequent church-goers deliberate face-to-face more than those less religiously inclined; a pattern reversed among online only deliberators, who are less likely to attend religious services.

What are the attitudinal characteristics? Here, some clear contrasts emerge. Relative to the other groups, online only deliberators are *less* knowledgeable, *less* trusting, *less* efficacious, *less* tolerant, and *less* interested in politics. They also have *lower* trust than those who do not deliberate at all. Yet, this group actively exchanges information via email or instant messaging, while relying on traditional news media less than face-to-face deliberators. A novel finding emerges with regard to Independents (i.e. who do not identify themselves with the two dominant parties in the US, the Democrats and the Republicans) and ideological moderates (who do not 'strongly' identify with either Liberals or Conservatives, ideologies generally used to describe the US ideological continuum), who are as active as partisans and strong ideologues online. With regard to political behavior, those who deliberate in both settings are the most active. Although online deliberators are less likely than face-to-face ones to take part in traditional civic and electoral activities, they do engage in the newly emerged political activism, boycotting.

**Table 1.** Who deliberates? Characteristics by online and/or face-to-face deliberation participation

	BOTH Group (n = 82)	ONLINE Group (n = 23)	FTF Group (n = 674)	Non- Deliberators (n = 722)	Test statistics
<b>Social demographics</b>					
<b>Gender</b>					
Male	55%	60%	44%	44%	$\chi^2(df = 3) = 6.44^\dagger$
<b>Race</b>					
White	79%	87%	77%	78%	$\chi^2(df = 3) = .97$
<b>Age</b>					
Year (interval)	42.36 <sup>a</sup>	43.26 <sup>a</sup>	47.05 <sup>a</sup>	47.28 <sup>a</sup>	$F(3, 1447) = 2.67^*$
<b>Education</b>					
HS graduation or less	7%	13%	16%	32%	$\chi^2(df = 9) = 93.84^{***}$
College	27%	39%	27%	31%	(Some cells have $n < 5$ )
College degree	31%	26%	31%	23%	
Above college degree	33%	22%	23%	12%	
<b>Income</b>					
Below \$30,000	17%	13%	17%	24%	$\chi^2(df = 12) = 37.74^{***}$
\$30,000~\$50,000	9%	26%	19%	14%	(Some cells have $n < 5$ )
\$50,000~\$75,000	24%	17%	18%	17%	
\$75,000~\$100,000	15%	17%	14%	9%	
Above \$100,000	21%	9%	15%	11%	
<b>Job status</b>					
Full-timers	66%	61%	56%	49%	$\chi^2(df = 6) = 20.44^{**}$
Part-timers	11%	22%	13%	12%	
Other	22%	17%	28%	37%	
<b>Party identification</b>					
Democrats	40%	35%	33%	33%	$\chi^2(df = 6) = 2.89$
Republicans	23%	35%	30%	29%	
Other	37%	30%	37%	38%	
<b>Strength of ideology</b>					
Strong conservative/ liberals	40%	39%	41%	39%	$\chi^2(df = 6) = 23.07^{**}$
Weak conservatives/ liberals	18%	17%	23%	29%	
Moderates	40%	39%	28%	21%	

(Continued)

Table 1. (Continued)

	BOTH Group (n = 82)	ONLINE Group (n = 23)	FTF Group (n = 674)	Non- Deliberators (n = 722)	Test statistics
<b>Church-going</b>					
5-points Likert-type	4.31 <sup>ab</sup>	3.74 <sup>ab</sup>	4.46 <sup>a</sup>	3.85 <sup>b</sup>	F(3, 1447) = 9.43 <sup>***</sup>
<b>Attitudinal characteristics</b>					
Political knowledge (0–5)	3.30 <sup>a</sup>	2.70 <sup>bc</sup>	2.92 <sup>b</sup>	2.42 <sup>c</sup>	F(3, 1497) = 27.93 <sup>***</sup>
Social trust (0–3)	1.96 <sup>ab</sup>	1.48 <sup>ab</sup>	2.07 <sup>a</sup>	1.77 <sup>b</sup>	F(3, 1337) = 10.68 <sup>***</sup>
Political trust (0–3)	1.60 <sup>b</sup>	1.45 <sup>ab</sup>	2.02 <sup>a</sup>	1.88 <sup>b</sup>	F(3, 1305) = 5.60 <sup>**</sup>
Political efficacy (0–9)	5.90 <sup>a</sup>	4.65 <sup>ab</sup>	5.44 <sup>a</sup>	4.32 <sup>b</sup>	F(3, 1421) = 31.50 <sup>**</sup>
Political tolerance (0–2)	1.65 <sup>ab</sup>	1.50 <sup>ab</sup>	1.64 <sup>a</sup>	1.52 <sup>b</sup>	F(3, 1315) = 3.26 <sup>*</sup>
Political interest (0–10)	8.16 <sup>a</sup>	7.17 <sup>ab</sup>	7.12 <sup>b</sup>	5.66 <sup>c</sup>	F(3, 1492) = 46.90 <sup>***</sup>
<b>Behavioral characteristics</b>					
TV news watching (0–5)	2.04 <sup>a</sup>	2.09 <sup>a</sup>	2.10 <sup>a</sup>	2.23 <sup>a</sup>	F(3, 1462) = 2.69 <sup>*</sup>
Newspaper reading (0–5)	1.53 <sup>ab</sup>	1.43 <sup>ab</sup>	1.50 <sup>a</sup>	1.31 <sup>b</sup>	F(3, 1464) = 8.24 <sup>***</sup>
Radio listening (0–5)	1.93 <sup>a</sup>	1.70 <sup>a</sup>	1.82 <sup>a</sup>	1.72 <sup>a</sup>	F(3, 1464) = 1.43
Email/instant message (1–5)	3.57 <sup>a</sup>	2.70 <sup>ab</sup>	2.12 <sup>b</sup>	1.30 <sup>c</sup>	F(3, 1093) = 54.32 <sup>***</sup>
<b>Access to the internet</b>					
Currently connected	100%	100%	77%	66%	$\chi^2(df = 3) = 61.70***$
Disconnected/DK	0%	0%	23%	34%	
<b>Internet use</b>					
Do not use	0%	0%	23%	34%	$\chi^2(df = 9) = 119.53***$
Less than 1 hour	12%	13%	27%	28%	
Between 1 and 4 hours	59%	52%	40%	29%	
Less than 4 hours	29%	35%	10%	9%	
Civic participation (0–4)	1.63 <sup>a</sup>	1.26 <sup>ab</sup>	1.56 <sup>a</sup>	0.92 <sup>b</sup>	F(3, 1491) = 94.77 <sup>***</sup>
Contacting elites (0–4)	2.84 <sup>a</sup>	2.22 <sup>ab</sup>	2.10 <sup>b</sup>	1.16 <sup>c</sup>	F(3, 1460) = 98.43 <sup>***</sup>
Electoral participation (0–2)	1.13 <sup>a</sup>	0.87 <sup>ab</sup>	1.05 <sup>a</sup>	0.70 <sup>b</sup>	F(3, 1482) = 42.34 <sup>***</sup>

(Continued)

**Table 1.** (Continued)

	BOTH Group ( <i>n</i> = 82)	ONLINE Group ( <i>n</i> = 23)	FTF Group ( <i>n</i> = 674)	Non- Deliberators ( <i>n</i> = 722)	Test statistics
Boycotting					
Yes	68%	74%	59%	54%	$\chi^2(\text{df} = 3) = 44.82^{***}$
No	32%	26%	39%	44%	
Voted in 2002					
Yes	82%	74%	81%	61%	$\chi^2(\text{df} = 3) = 73.18^{***}$
No	18%	26%	18%	38%	

Notes: †  $p < .10$ , \*  $p < .05$ , \*\*  $p < .01$ , \*\*\*  $p < .001$ . Descriptive statistics include missing cases (not represented). Test statistics are calculated after pair-wise deletion of missing values.

Groups sharing the same superscript (rows with *F*-ratios) are not statistically different from one another, after adopting Bonferroni family-wise adjustment ( $p < .05$ ).

### Why do people deliberate?

What motivates people to deliberate? Answering the second research question, we find that across *all* groups, citizens deliberate primarily because the issue affects others and the community ( $M = 8.06$ ,  $SD = 2.67$ ). Feeling that it is one's duty as a citizen ( $M = 7.47$ ,  $SD = 2.94$ ) and being affected by the issue ( $M = 7.45$ ,  $SD = 3.17$ ) are also frequently noted, followed by interest in the issue ( $M = 6.59$ ,  $SD = 3.37$ ). Interacting with people who share similar interests ( $M = 5.91$ ,  $SD = 3.34$ ) and being asked to participate ( $M = 4.57$ ,  $SD = 3.94$ ) are least important to joining deliberation, online or offline.

Do these motivations depend on the setting? Relative to online deliberators, offline ones are more likely to deliberate because it is their duty as a citizen or a community member and because they were asked to participate. Conviction that the issue affects others also more often encourages face-to-face than online deliberation, and is rated as central by those who participated in both. Moreover, online and offline participation are equally encouraged by being affected by or interested in an issue or by the desire to encounter people with a similar interest (see Table 2).

### What is the deliberative experience?

Although motivations are important, it is the process (or how the process is perceived) that primarily determines whether or not deliberation is successful. Our third research question, therefore, addresses perceived diversity and reported affective experiences. Participants generally see others as diverse by age ( $M = 6.03$ ,  $SD = 2.59$ ), gender ( $M = 5.77$ ,  $SD = 2.91$ ), and income ( $M = 5.71$ ,  $SD = 2.58$ ), and also with regard to viewpoints ( $M = 5.26$ ,  $SD = 2.84$ ) and race/ethnicity ( $M = 4.69$ ,  $SD = 3.15$ ). Are there differences

**Table 2.** Why do people deliberate? Mean comparison of reasons for deliberation

	Online deliberation. By BOTH Group	Face-to-face deliberation. By BOTH Group	Online deliberation. By ONLINE Group	Face-to-face deliberation. By FTF Group	Log-likelihood test [ $\chi^2$ (df = 3)]
Feeling dutiful (n = 777)	5.98 <sup>a</sup>	8.09 <sup>b</sup>	4.68 <sup>a</sup>	7.67 <sup>b</sup>	44.43 <sup>***</sup>
Affecting me or family (n = 778)	7.52 <sup>a</sup>	7.76 <sup>a</sup>	5.74 <sup>a</sup>	7.46 <sup>a</sup>	7.32
Affecting community (n = 775)	7.11 <sup>a</sup>	8.87 <sup>b</sup>	5.45 <sup>a</sup>	8.16 <sup>c</sup>	37.79 <sup>***</sup>
Interesting topic (n = 774)	7.33 <sup>a</sup>	6.99 <sup>a</sup>	6.86 <sup>a</sup>	6.45 <sup>a</sup>	6.14
Shared interest (n = 777)	5.51 <sup>a</sup>	6.07 <sup>a</sup>	5.18 <sup>a</sup>	5.96 <sup>a</sup>	2.36
Someone asked (n = 773)	3.04 <sup>a</sup>	5.15 <sup>b</sup>	2.86 <sup>a</sup>	4.74 <sup>b</sup>	18.72 <sup>***</sup>

Notes: \*\*\*  $p < .001$ . Significance tests were done after controlling for the within-cluster effect (i.e. 'Both Group' measured twice).

Groups sharing the same superscript are not statistically different from one another, after adopting Bonferroni family-wise adjustment ( $p < .05$ ).

The log-likelihood test compares the log-likelihood of the testing model against that of the unconditional model.

between face-to-face and online settings? As detailed in Table 3, both are seen as entailing similar levels of gender and age diversity, and online deliberation is perceived as slightly less diverse with regard to income. Two notable findings are based on the assessments of those who attended *both* offline *and* online deliberation. First, those participants perceived more racial/ethnic diversity when deliberating online than offline. Secondly, they were also exposed to more diverse viewpoints online than offline, a perception shared by those who deliberated only online relative to those who attended only offline deliberations.

With regard to other factors, across all groups, citizens report enthusiasm ( $M = 6.50$ ,  $SD = 2.64$ ) and understanding different views ( $M = 6.12$ ,  $SD = 2.76$ ) more frequently than anger ( $M = 3.65$ ,  $SD = 3.28$ ) or anxiety ( $M = 2.97$ ,  $SD = 3.09$ ). Do online and offline deliberations elicit different experiences? While both settings are equally likely to induce anger, online deliberation elicits less anxiety but also less enthusiasm. Drawing on the telling assessments from participants in both settings, online deliberation is more likely to induce anger.

In addition to generating positive emotions, deliberation should also encourage people to attend to dissimilar views. While there are no differences between face-to-face and online deliberation in this respect, offline only deliberators report understanding different viewpoints slightly more than the other groups (see Table 3).

### What are the effects?

Our final research question addresses the effects produced by deliberation. Across all groups, teaching factual knowledge is the primary goal ( $M = 7.76$ ,  $SD = 2.71$ ), followed by reaching agreement ( $M = 7.05$ ,  $SD = 2.87$ ), and taking action to address the problem ( $M = 6.91$ ,  $SD = 2.92$ ). Although providing an opportunity to air different viewpoints is crucial to deliberation, this aim was reported as less important ( $M = 5.26$ ,  $SD = 2.84$ ).

Do the goals depend on whether deliberation is face-to-face versus online? Table 4 shows that teaching about the issue in a neutral, factual way is perceived as less central to online versus offline discussions. The two settings are similar, however, with regard to allowing people to air various opinions and discuss different viewpoints. Reaching

**Table 3.** What are the deliberation experiences? Mean comparison of deliberative experiences.

	Online deliberation. By BOTH Group	Face-to-face deliberation. By BOTH Group	Online deliberation. By ONLINE Group	Face-to-face deliberation. By FTF Group	Log-likelihood test [ $\chi^2$ (df = 3)]
<b>Affective experiences</b>					
Enthusiastic ( $n = 778$ )	6.03 <sup>a</sup>	6.73 <sup>a</sup>	4.70 <sup>b</sup>	6.59 <sup>a</sup>	14.37 <sup>***</sup>
Anxious ( $n = 776$ )	3.27 <sup>a</sup>	3.54 <sup>a</sup>	2.52 <sup>a</sup>	3.75 <sup>a</sup>	4.46
Angry ( $n = 775$ )	3.93 <sup>a</sup>	3.45 <sup>ab</sup>	3.48 <sup>ab</sup>	2.77 <sup>b</sup>	12.98 <sup>***</sup>
Understanding different views ( $n = 773$ )	5.86 <sup>a</sup>	5.96 <sup>a</sup>	5.26 <sup>a</sup>	6.20 <sup>a</sup>	3.79
<b>Perceived diversity</b>					
Gender diversity ( $n = 767$ )	6.00 <sup>a</sup>	6.18 <sup>a</sup>	6.06 <sup>a</sup>	5.69 <sup>a</sup>	2.53
Race diversity ( $n = 761$ )	6.10 <sup>a</sup>	5.00 <sup>ab</sup>	5.00 <sup>ab</sup>	4.51 <sup>b</sup>	14.14 <sup>***</sup>
Age diversity ( $n = 769$ )	6.63 <sup>a</sup>	6.54 <sup>a</sup>	5.85 <sup>a</sup>	5.92 <sup>a</sup>	7.44 <sup>†</sup>
Income diversity ( $n = 709$ )	6.57 <sup>a</sup>	5.89 <sup>a</sup>	6.00 <sup>a</sup>	5.61 <sup>a</sup>	7.00 <sup>†</sup>
Viewpoint diversity ( $n = 770$ )	6.56 <sup>a</sup>	4.80 <sup>b</sup>	5.96 <sup>ab</sup>	5.14 <sup>b</sup>	19.66 <sup>***</sup>

Notes: \*\*  $p < .01$ , \*\*\*  $p < .001$ . Significance tests were done after controlling for the within-cluster effect (i.e. 'Both Group' measured twice).

Groups sharing the same superscript are not statistically different from one another, after adopting Bonferroni family-wise adjustment ( $p < .05$ ).

The log-likelihood test compares the log-likelihood of the testing model against that of the unconditional model.

**Table 4.** What are the outcomes? Mean comparison of consequences of deliberation

	Online deliberation. By BOTH Group	Face-to-face deliberation. By BOTH Group	Online deliberation. By ONLINE Group	Face-to-face deliberation. By FTF Group	Log-likelihood test [ $\chi^2$ (df = 3)]
<b>Functions of deliberation</b>					
Teaching factual knowledge (n = 770)	5.65 <sup>a</sup>	7.57 <sup>b</sup>	4.59 <sup>a</sup>	7.45 <sup>b</sup>	45.48***
Airing differences (n = 772)	8.24 <sup>a</sup>	7.65 <sup>a</sup>	7.64 <sup>a</sup>	7.72 <sup>a</sup>	2.78
Inducing agreement (n = 768)	5.32 <sup>a</sup>	7.02 <sup>b</sup>	5.50 <sup>ab</sup>	7.31 <sup>b</sup>	39.30***
Action taking (n = 764)	5.44 <sup>a</sup>	6.89 <sup>b</sup>	5.09 <sup>ab</sup>	7.15 <sup>b</sup>	32.27***
<b>Deliberation outcomes</b>					
Decision made? (n = 776) <sup>[Dichotomous]</sup>	0.34 <sup>a</sup>	0.65 <sup>b</sup>	0.17 <sup>a</sup>	0.53 <sup>b</sup>	27.60***
Did you agree?					
Yes	30%	59%	13%	49%	
No	4%	4%	4%	3%	
Filtered	66%	38%	83%	48%	
Did others agree?					
Yes	32%	59%	17%	49%	
No	2%	6%	0%	2%	
Filtered	66%	35%	83%	49%	
Follow-up actions (n = 776) <sup>[Dichotomous]</sup>	0.35 <sup>ab</sup>	0.52 <sup>a</sup>	0.09 <sup>b</sup>	0.30 <sup>ab</sup>	4.46
Future deliberation (n = 777)	8.45 <sup>a</sup>	9.29 <sup>b</sup>	6.09 <sup>c</sup>	8.46 <sup>a</sup>	31.50***

Notes: \*\*\*  $p < .001$ . Significance tests were done after controlling for the within-cluster effect (i.e. 'Both Group' measured twice).

Groups sharing the same superscript are not statistically different from one another, after adopting Bonferroni family-wise adjustment ( $p < .05$ ).

The log-likelihood test compares the log-likelihood of the testing model against that of the unconditional model. Two outcome variables with <sup>[Dichotomous]</sup> are assumed binomial distribution.

consensus about the issue, its causes, and/or how it might be addressed is slightly less important to online than to offline deliberations, and this is especially so according to those who took part in both. Consequently, face-to-face deliberations more often lead to a consensual outcome. Among those who deliberated offline only, 53% reported that the last meeting ended with a decision regarding what should be done to address the issue, as compared to 17% online only deliberators. Those who joined both settings were also more likely to reach a decision when deliberating face-to-face. Although consensus is important, perceiving it as fair is more crucial. Here, face-to-face deliberation emerges



as more consensual, both with respect to respondents' agreement with the group decision as well as with respondents' perception that others agreed.

Accordingly, face-to-face deliberations more frequently lead to actions to address the discussed problem. Among those who participated in both settings, roughly half reported engaging in charitable, civic, or political activities following deliberating face-to-face, as compared to 35% who did so after deliberating online. Among those who deliberated only online, 9% reported following up with concrete actions. Theorists hope that citizens will not only join deliberation, but also that this will become intrinsic to their democratic participation. Overall, deliberators intend to participate again ( $M = 8.47$ ,  $SD = 2.38$ ). Although face-to-face settings impose higher costs (e.g. time and psychological commitment), those who deliberated offline only are more likely to do it again than online only deliberators. Not surprisingly, those who took part in both settings are most willing to deliberate in the future. Notably, this group is substantially more likely to join face-to-face than online discussions.

## Discussion

The claimed benefits produced by deliberation have initiated 'a plethora of deliberative efforts' (Mendelberg, 2002: 154). Those efforts have mostly aimed at organizing face-to-face deliberation, because the 'exemplars of deliberation, and many of the ideals and normative standards that we associate with it, are based on situations involving face-to-face talk among small numbers of people' (Page, 1996: 2–3). Some scholars, however, have argued that it is the online environment that may better meet deliberative ideals because it overcomes limitations inherent in face-to-face deliberation, such as resources needed to aggregate citizens, costs imposed on participants, limited minority participation, and threats that stereotypes silence underrepresented voices. Other scholars have conversely cautioned that the internet might undermine normative standards by reinforcing inequalities, facilitating exposure to consonant ideas, weakening community bonds, and encouraging incivility.

Although evidence exists to buttress all these points, research has analyzed face-to-face and online deliberation independently. Our analysis attempted to fill this gap. Drawing on a national sample, we directly compared face-to-face and online deliberation with regard to participants, motivations, process, and effects. Although exploratory, our analysis offers some noteworthy results and adds to the literature on online environment and deliberative practices in the United States.

With regard to 'who participates,' there are several central findings. Although hopes were that the internet would provide an inclusive forum, structural constraints continually determine who deliberates. As critical deliberative theorists have noted with regard to face-to-face settings, online forums seem to reflect the power- and class-based divides that especially pertain to socioeconomic factors. The educated and affluent citizens are more likely than the less educated and the less wealthy to have internet access. Also, white, employed, and well-off males join online forums more often than other groups and thus – naturally – their perspectives are better represented than the opinions held by the traditionally underrepresented citizens. As some studies have suggested, 'the pessimistic

view that the Internet would simply map onto or perhaps exacerbate already existing inequalities in civic engagement is warranted' (Jennings and Zeitner, 2003: 330).

Importantly, online forums may not exacerbate partisan or ideological divides. Although deliberation tends to attract citizens with strong partisan and ideological attachments (Patterson, 2003), independents and moderates also actively deliberate. Independents are more likely to attend face-to-face meetings than Democrats or Republicans. Inasmuch as Independents refuse to affiliate with either one or the other major party, this finding may indicate that deliberative forums may be attracting citizens whose viewpoints are broader or more alternative than the general 'mainstream.' Because our data do not offer any information as to the opinions expressed within these forums, these speculations need to be corroborated with content analyses. Studies that compare perspectives voiced within the two settings are also needed to shed light on whether the setting itself may affect the issues discussed, the views expressed, their range, and so forth. We also find that moderates are as likely to attend both settings and join online discussions as strong ideologues, which may indicate that deliberative forums are open for sound discussion across divides. Determining whether moderates polarize while talking with strong ideologues or whether they bridge ideological divides is a fruitful area for future research.

Some noteworthy patterns emerge with regard to attitudinal and behavioral characteristics. Not surprisingly, those endowed with civic skills or prior knowledge deliberate more. Contrary to what would be expected, online deliberators report less *traditional* political engagement than face-to-face deliberators. Nonetheless, a new online-citizenship model might have emerged, in that those deliberators exchange information; contact elites, perhaps due to numerous online platforms for expression; and exercise consumer power for political reasons, perhaps due to information on how to protest and what to buy or not to buy (Micheletti and Stolle, 2007; Zukin et al., 2006).

Illustrating the current sociopolitical climate in the US, in which boundaries between religion and politics are increasingly blurred, our analysis underscores the mobilizing influence exerted by church attendance (Denton, 2005). Those who frequently attend religious services also frequently debate politics, primarily face-to-face. Countering the general knowledge, we also find that non-deliberators have *higher* political trust than those who deliberate online and in both settings. This finding might paradoxically restore the democratic utility of political distrust, in that this attitude might encourage citizens to communicate with each other, increase their surveillance over political process, and mobilize them to action (Warren, 1999). This finding may also indicate that citizens could have lost faith in the government fulfilling its responsibilities, and see the need to take action themselves.

With regard to 'why citizens deliberate,' face-to-face deliberation seems to be motivated by community-oriented concerns, while discussing online is relatively free from external pressures. Our findings on 'what are deliberative experiences' might be related to those motivations. Because face-to-face deliberation might strengthen local social capital (Putnam, 2001) and because local communities are relatively homogeneous (Bishop, 2004), online deliberation, freed from geographical constraints, provides more opportunities to interact with politically and racially diverse citizens. Importantly, those who participated in both settings are particularly likely to see online deliberation as more diverse. Because those citizens can actually *compare*, their reports might accurately portray the differences between

these two settings. All in all, although the internet facilitates connections with like-minded groups, people may be using it to expose themselves to greater diversity than is present in their immediate communities.

What outcomes does deliberation produce? Online debates seem less structured and/or less constrained than face-to-face ones in that the former teach fewer facts and generate less agreement, especially according to those citizens who deliberated in both settings. Online deliberation, in other words, does not demand consensus and follow-up actions. Inasmuch as arriving at a consensual decision and feeling the group commitment increases satisfaction or self-efficacy, online deliberators – who lack these reinforcements – are less willing to deliberate in the future. Importantly, those who participated in both settings are much more likely to attend face-to-face than online deliberations.

As with any study, ours comes with several key limitations. For one, our findings depend on self-report and it is possible that some exogenous factors encourage individuals to deliberate and also determine certain experiences or drive certain assessments. Because, given its novelty, our study was concerned with describing and contrasting face-to-face and online settings, we did not conduct multivariate analyses that could rule out some third variables or identify potential mediating and moderating factors. Analyses that use stringent controls are the logical next step that will provide more detailed information on the two deliberative processes.

In addition, reliance on self-report does not allow making any claims regarding the quality and the processes occurring in the deliberative settings. With regard to online deliberation, much online interaction does not generate continuing discussions, but involves users who participate sporadically or whose utterances remain unaddressed (Hill and Hughes, 1997). Face-to-face settings may also silence opinions perceived as unpopular or unqualified – which may also be the case online, with flaming for example – and rely on participants who *appear* better informed or more persuasive based on expert look, greater self-confidence, or other cues conveyed face-to-face. While our data cannot determine whether the deliberative settings meet the theoretical requirements, some scholars argue that individual perceptions and subjective experiences might matter more to stimulating the benefits of deliberation than the presence of processes that scholars judge as ideal (e.g., Mutz, 2002).

Further, the comparisons between face-to-face and online deliberations are based on the reports provided by those who debated offline ('F2F' and 'Both' groups) and those who joined online discussions ('Online' and 'Both' group). This approach presents two challenges. First, we face an unbalanced sample problem, in that the sub-sample sizes are different, with a small number of online only deliberators and a larger group of those who participated offline only. This might make the comparisons between the 'Online' and the other groups statistically unstable. At the same time, our most telling findings come from the larger group that deliberated both face-to-face and online and that is especially suitable to judging their differential qualities. Using propensity score matching (Rosenbaum, 2002) we additionally examined whether our results are stable. We found that unequal cell sizes do not undermine our conclusions (contact authors for details).

Further, the cross-sectional design precludes any claims regarding causal direction. Fortunately, our dataset contains items that assess political participation that was a

direct follow-up to deliberation. Hence, at least with this one measure, we can tap the effects, albeit self-reported, produced by deliberative engagement.

More broadly, findings from the US context may not be applicable elsewhere. This is because the US has a two-party system and a citizen's party affiliation is generally associated with his/her political ideology. Deliberation in countries with multi-party systems may thus be markedly different. Also, inasmuch as the perspectives voiced during deliberation reflect mainstream politics, these perspectives may be narrower in range in the US than elsewhere. Comparing deliberative settings in different national contexts would be a worthwhile, while also challenging, endeavor that could shed light on the constraints imposed on deliberative practices.

Despite these limitations and despite being only a glimpse into citizens' discursive activities, our study offers findings with both practical and theoretical implications. First, because most online deliberators also deliberate face-to-face, the online environment supplements the traditional deliberative sphere, rather than replaces it. We see this finding as optimistic in that the internet provides another forum for political discussion, one that connects diverse citizens across the country or the globe and alleviates the pressures associated with single-issue community participation.

Secondly, the contrasting predictions regarding the two settings might be posed in black and white terms. Similarly to face-to-face deliberation, while advantageous in some respects, online deliberation presents its own challenges. Those mostly pertain to its potential to reinforce inequalities and also to generating negative emotions and not offering the satisfaction that comes from reaching a decision and addressing a problem. At the same time, online settings meet the central deliberative requirement: they involve diverse citizens and expose them to dissimilar views. This finding is somehow surprising given the pessimistic prophecies regarding homogeneity and reinforcement occurring in online groups. At the same time, dissimilarity may generate anger or anxiety. Yet – as online communication becomes more prevalent – citizens may grow accustomed to talking politics with different associates, and the negative emotions will dissipate as a result. That is, the limitations that online deliberation now involves may be transient.

Although our study should be considered as only a beginning of an important effort to disentangle the dynamic processes occurring in deliberative settings, our analysis provides an uplifting portrayal of the possibilities open to those who engage in political discussions. Because online deliberation does not replace face-to-face deliberation but rather supplements it, these two deliberative forums differentially – but equally – contribute to healthy democracy.

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## Notes

1. One exception is a study by Wojcieszak, Baek and Delli Carpini (2009) who assessed the effects of deliberation format (i.e. face-to-face versus online) on the interrelationships among such factors as motivations to deliberate, perceived diversity, elicited emotions, enhanced understanding, etc. The authors also used network analysis to explore which factors are central to the two types of deliberative formats and how they influence the overall experience.

## References

- Arendt H (1968) *Between Past and Future: Eight Exercises in Political Thought*. New York: Viking Press.
- Aronson J, Lustina MJ, Good C, Keough K, Steele CM and Brown J (1999) When white men can't do math: Necessary and sufficient factors in stereotype threat. *Journal of Experimental Social Psychology* 35(1): 29–46.
- Bargh JA, McKenna KYA and Fitzsimons GM (2002) Can you see the real me? Activation and expression of the 'true self' on the internet. *Journal of Social Issues* 58(1): 33–48.
- Benhabib S (1996) Toward a deliberative model of democratic legitimacy. In: Benhabib S (ed.) *Democracy and Difference: Contesting the Boundaries of the Political*. Princeton, NJ: Princeton University Press, 67–94.
- Bishop B (2004) Trends in polarization, public opinion. Paper presented at Polarization of American Politics: Myth or Reality? Princeton University, 3–4 December.
- Blader SL and Tyler TR (2003) A four-component model of procedural justice: Defining the meaning of a 'fair' process. *Personality and Social Psychology Bulletin* 29(6): 747–758.
- Bornstein G and Rapoport A (1988) Intergroup competition for the provision of step-level public goods: Effects of preplay communication. *European Journal of Social Psychology* 18(2): 125–142.
- Brunsting S and Postmes T (2002) Social movement participation in the digital age: Predicting offline and online collective action. *Small Group Research* 33(5): 525–554.
- Denton RE, Jr (2005) Religion and the 2004 presidential campaign. *American Behavioral Scientist* 49(1): 11–31.
- Fishkin JS (1995) *The Voice of the People: Public Opinion and Democracy*. New Haven, CT: Yale University Press.
- Fraser N (1990) Rethinking the public sphere: A contribution to the critique of actually existing democracy. *Social Text* 25/26: 56–80.
- Garrett RK (2006) Protest in an information society: A review of literature on social movements and new ICTs. *Information, Communication & Society* 9(2): 202–224.
- Gastil J and Dillard JP (1999) Increasing political sophistication through public deliberation. *Political Communication* 16(1): 3–23.
- Gutmann A and Thompson D (1996) *Democracy and Disagreement*. Cambridge, MA: Belknap Press of Harvard University Press.
- Habermas J (1991) *The Structural Transformation of the Public Sphere: An Inquiry into a Category of Bourgeois Society*. Cambridge, MA: MIT Press.
- Hill KA and Hughes JE (1997) Computer-mediated political communication: The usenet and political communities. *Political Communication* 14(1): 3–27.
- Jacobs LR, Cook FL and Delli Carpini MX (2009) *Talking Together: Public Deliberation and Political Participation in America*. Chicago, IL: University of Chicago Press.
- Jennings MK and Zeitner V (2003) Internet use and civic engagement. *Public Opinion Quarterly* 67(3): 311–334.
- Luskin RC, Fishkin JS and Iyengar S (2006) Considered Opinions on U.S. Foreign Policy: Evidence from Online and Face-to-Face Deliberative Polling. Available at: [cdd.stanford.edu/research/papers/2006/foreign-policy.pdf](http://cdd.stanford.edu/research/papers/2006/foreign-policy.pdf) (accessed 3 September 2010).
- Luskin RC, Fishkin JS and Jowell R (2002) Considered opinions: Deliberative polling in Britain. *British Journal of Political Science* 32(03): 455–487.
- McKenna KYA and Bargh JA (2000) Plan 9 from cyberspace: The implications of the internet for personality and social psychology. *Personality and Social Psychology Review* 4(1): 57–75.

- McLeod JM, Scheufele DA, Moy P, Horowitz EM, Holbert RL, Zhang W, Zubric S and Zubric J (1999) Understanding deliberation: The effects of discussion networks on participation in a public forum. *Communication Research* 26(6): 743–774.
- Mendelberg T (2002) The deliberative citizen: Theory and evidence. In: Delli Carpini M, Huddy L and Shapiro R (eds) *Micropolitics: Political Decisionmaking, Deliberation and Participation*. Greenwich, CT: JAI Press, 151–193.
- Mendelberg T and Oleske J (2000) Race and public deliberation. *Political Communication* 17(2): 169–191.
- Micheletti M and Stolle D (2007) Mobilizing consumers to take responsibility for global social justice. *The ANNALS of the American Academy of Political and Social Science* 611(1): 157–175.
- Mill JS (1956) *On Liberty*. Indianapolis, IN: Bobbs-Merrill.
- Mouffe C (2000) *The Democratic Paradox*. London: Verso.
- Mutz DC (2002) Cross-cutting social networks: Testing democratic theory in practice. *American Political Science Review* 96(1): 111–126.
- National Telecommunications and Information Administration (2010) *Digital Nation: 21st Century America's Progress toward Universal Broadband Internet Access*. Washington, DC: US Department of Commerce. Available at: [http://www.ntia.doc.gov/reports/2010/NTIA\\_internet\\_use\\_report\\_Feb2010.pdf](http://www.ntia.doc.gov/reports/2010/NTIA_internet_use_report_Feb2010.pdf) (accessed 3 September 2010).
- Negt O and Kluge A (1993) *Public Sphere and Experience: Toward an Analysis of the Bourgeois and Proletarian Public Sphere*. Trans Labanyi P, Daniel JO, and Oksiloff A. Minneapolis: University of Minnesota.
- Norris P (2001) *Digital Divide: Civic Engagement, Information Poverty, and the Internet Worldwide*. New York: Cambridge University Press.
- Page BI (1996) *Who Deliberates? Mass Media in Modern Democracy*. Chicago, IL: University of Chicago Press.
- Pantti M and van Zoonen L (2006) Do crying citizens make good citizens? *Social Semiotics* 16(2): 205–224.
- Papacharissi Z (2002) The virtual sphere: The internet as a public sphere. *New Media & Society* 4(1): 9–27.
- Patterson TE (2003) *The Vanishing Voter: Public Involvement in an Age of Uncertainty*. New York: Vintage Books.
- Pearce WB and Littlejohn SW (1997) *Moral Conflict: When Social Worlds Collide*. Thousand Oaks, CA: Sage.
- Postmes TOM, Spears R and Lea M (1998) Breaching or building social boundaries? Side-effects of computer-mediated communication. *Communication Research* 25(6): 689–715.
- Price V and Cappella JN (2002) Online deliberation and its influence: The Electoral Dialogue Project in Campaign 2000. *IT and Society* 1(1): 303–329.
- Putnam RD (2001) *Bowling Alone: The Collapse and Revival of American Community*. New York: Simon & Schuster.
- Rosenbaum PR (2002) *Observational Studies*. New York: Springer-Verlag.
- Sally D (1995) Conversation and cooperation in social dilemmas: A meta-analysis of experiments from 1958 to 1992. *Rationality and Society* 7(1): 58–92.
- Sanders LM (1997) Against deliberation. *Political Theory* 25(3): 347–376.
- Stromer-Galley J (2003) Diversity of political conversation on the internet: Users' perspectives. *Journal of Computer-mediated Communication* 8(3). Available at: <http://jcmc.indiana.edu/vol8/issue3/stromergalley.html> (accessed 3 September 2010).
- Sunstein C (2001) *Republic.com*. Princeton, NJ: Princeton University Press.
- Walzer M (2004) *Politics and Passion: Toward a More Egalitarian Liberalism*. New Haven, CT: Yale University.



- Warren ME (1992) Democratic theory and self-transformation. *American Political Science Review* 86(1): 8–23.
- Warren ME (1999) *Democracy and Trust*. Cambridge: Cambridge University Press.
- Wojcieszak ME and Mutz DC (2009) Online groups and political discourse: Do online discussion spaces facilitate exposure to political disagreement? *Journal of Communication* 59(1): 40–56.
- Wojcieszak ME, Baek YM and Delli Carpini MX (2009) What is really going on? Structure underlying face-to-face and online deliberation. *Information, Communication & Society* 12(7): 1080–1102.
- Zukin C, Keeter S, Audolina M, Jenkins K and Delli Carpini MX (2006) *A New Engagement?* New York: Oxford University Press.

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