The Role of Digital Networked Technologies in the Ukrainian Orange Revolution

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ABSTRACT

This working paper is part of a series examining how the Internet influences democracy. This report is a narrative case study that examines the role of the Internet and mobile phones during Ukraine's 2004 Orange Revolution. The first section describes the online citizen journalists who reported many stories left untouched by 'self censored' mainstream journalists. The second section investigates the use of digital networked technologies by pro-democracy organizers. This case study concludes with the statement that the Internet and mobile phones made a wide range of activities easier, however the Orange Revolution was largely made possible by savvy activists and journalists willing to take risks to improve their country.

THE INTERNET & DEMOCRACY PROJECT

This case study is part of a series produced by the Internet and Democracy Project, a research initiative at the Berkman Center for Internet & Society, that investigates the impact of the Internet on civic engagement and democratic processes. More information on the Internet and Democracy Project can be found at
http://cyber.law.harvard.edu/research/internetdemocracy.

The initial case studies include three of the most frequently cited examples of the Internet's influence on democracy. The first case study looks at the user generated news site, OhmyNews, and its impact on the 2002 Presidential elections in South Korea. The second case documents nontraditional media and the use of cell phone technologies for information sharing and organization of protesters during Ukraine's Orange Revolution. The third case study analyzes the composition of the Iranian Blogosphere and its possible impact on political and democratic processes. The objectives of these initial case studies are to write a narrative description of the events and the technology used in each case, to draw initial conclusions about the actual impact of technology on democratic events and processes, and to identify questions for further research.

INTRODUCTION

For 11 freezing nights in November 2004, hundreds of thousands of Ukrainians took to the streets in peaceful protest of massive presidential electoral fraud. The election pitted Victor Yanukovych, incumbent authoritarian president Leonid Kuchma's handpicked successor, against Victor Yuschenko, a widely supported candidate known for his pro-democratic stance and transparent track record. Large-scale falsified voter returns and voter intimidation orchestrated by 85,000 local officials swung 2.8 million votes in favor of the state's candidate Yanukovych in a second round of balloting.[1] The result of these protests, coupled with savvy negotiations by Yuschenko with Kuchma, resulted in a third round election widely seen as free and fair. Yuschenko was declared the winner, and these events became known as the Orange Revolution, named after the color of Yuschenko's 'Our Ukraine' campaign.

Michael McFaul observed that, "The Orange Revolution may have been the first in history to be organized largely online."[2] Certainly, these events marked an important crossroads where the emergence of open networks and rapid political change converge. Ukraine's digital revolutionary stage drew on several emerging tools. These tools had a broad range of uses, from coordination of activists via SMS to the development of an independent, online media, to web site discussion boards for activists to share best practices and make detailed reports of election fraud.

However, in any discussion of technology and political change, one must be careful to avoid 'cyberutopianism', the notion that digital technology will necessarily lead to a more inclusive political future. Revolutions are complex, historically contingent processes. Toqueville recognized this when he wrote that revolutions are a combination of structural weaknesses of the incumbent regime and successful tactics of the opposition.[3] This paper is not an attempt to explain the various factors that caused the Orange Revolution, but instead explains to what extent digital technologies, specifically the Internet and mobile phones, influenced the Orange Revolution.

A few words of economic and political background are necessary. In Ukraine, the economy expanded greatly in the years before the Orange Revolution. However, the public perceived that this dynamism was not the result of presidential leadership but rather due to Yushchenko in his role as Central Banker turned Prime Minister. In the 1990s, Yushchenko was known for keeping down inflation and for partnering with a former energy tycoon, Yulia Tymoshenko, who had fallen into disfavor with the Kuchma regime.

Largely due to the pressure from Western countries, Yushchenko was appointed Prime Minister in 1999. In 2000, the economy grew by six percent, and by 2001, the growth rate was 9.2 percent. Yushchenko was also able to deliver myriad social services to public servants who had neither been paid nor received pensions. Meanwhile, in May 2001, Kuchma ousted Yushchenko from his post as Prime Minister because Kuchma's backers were not pleased with Yushchenko's transparent approach. Polls showed the majority of Ukrainians opposed the move.[4]

Widespread economic strife is known to be a common factor in provoking political change.[5] This was not the case in Ukraine, at least in part because of Kuchma's structure of patronage. Kuchma relied heavily not on party members or security personnel but on a group of oligarchs to whom he gave control and kickbacks. These oligarchs were particularly hard to control, and when a rising middle class threw their support behind Yushchenko, many of the oligarchs abandoned their old patrons, and his grip on the nation became tenuous. The juxtaposition between the corrupt Kuchma and the reform-minded Yushchenko could not have been starker. Many Ukrainians voted for Yushchenko because they believed that if Yanykovich continued Kuchma's legacy, there would simply never be another election in Ukraine.

PART I: CITIZEN JOURNALISM

The Media Environment in Kuchma's Semi-Autocratic Regime

A prominent supporter of citizen journalism, Jay Rosen, writes that citizen journalists are:

> …the people formerly known as the audience [who] *were* on the receiving end of a media system that ran one way, in a broadcasting pattern, with high entry fees and a few firms competing to speak very loudly while the rest of the population listened in isolation from one an-

other— and who *today* are not in a situation like that *at all*. … The people formerly known as the audience are simply the public made realer, less fictional, more able, less predictable.[6]

As the Internet lowered the cost of self-publication to zero, more voices outside the mainstream media became influential. In the US, citizen journalists in the form of bloggers became a popular source for news and commentary on a national level during Howard Dean's 2004 Presidential campaign. These bloggers were unique in the sense that they were both partisan reports as well as links in a decentralized network of Dean supporters. This independent network, free from direct orders from campaign headquarters, was able to function in creative and productive ways.[7]

However, the efficacy of speech on political change is only relative to the levels of freedom within a particular regime. Kuchma's Ukraine can be characterized as a competitive authoritarian regime, where "…incumbents regularly harass opposition leaders, censor the media, and attempt to falsify elections. Yet elections are regularly held and remain competitive, and opposition candidates can sometimes win."[8] The existence of this type of regime has effects on many aspects of life, from spreading corruption and clientelism to limiting economic growth. However, since the regime did not regularly imprison opposition journalists, it became possible for a vibrant alternative media environment, primarily online, to challenge the tightly controlled message presented by nearly every mainstream media outlet.

To understand the profound importance of the creation of a nearly completely online alternative media environment, it is important to understand the Ukrainian 'self censored' mainstream media environment. 'Self censorship' was not enshrined in law, but it was well known that oligarchs owned all of the major television stations. Station managers received *temnyky,* unsigned directives from the President's office that urged them to cover the news from the President's office in a particular way. Managers knew that if they did not please the 'key viewer,' the President and his regime, they would be in danger of losing their jobs.[9]

Channel 5 was the notable television exception. In 2003, members of the opposition bought a small television station and developed it to promote a view independent from the President's control. Though the station was only avail-

able in 30% of the Ukrainian market, it became well known for its drastically different view on the news compared to other outlets. Radio and newspapers were also less important that television, although their influence on the average Ukrainian was limited.

The Murder of Georghiy Gongadze

Citizen opposition journalism was central to challenging Kuchma's semi-autocratic regime and his self-censored mainstream media environment. Any narrative of citizen journalism in Ukraine must begin four years before the Orange Revolution in September 2000, with the high profile murder of Internet-based opposition journalist Georgiy Gongadze. This event was central to putting the nation on a track towards political change.

As a prominent radio and television journalist, Gongadze had refused to participate in 'self censorship,' and lost his job several times. In April 2000, he co-founded Ukrainian Pravda, meaning truth, with the specific aim of circumventing the government's suppression of freedom of speech. Pravda was one of the first popular online news web site in Ukraine. Gongadze mysteriously disappeared in September 2000 and two months later, his headless body was found in a shallow grave outside of Kyiv. Soon after the body was discovered, Socialist Party Leader Olexandr Moroz, speaking on the floor of Parliament, accused President Kuchma of orchestrating the murder of Gongadze. Tapes released by Kuchma's former bodyguard supported the claim. This marked not only the emergence of the groundbreaking Ukraine Without Kuchma protest movement, but also a significant increase in the public recognition of the Internet as a legitimate news source. As one observer noted, the government's reaction to the Gongadze incident "…was the first time that many Ukrainians had heard of the Internet."[10]

The Power of Online Opposition Journalism and the Two-Step Flow Theory

As Michael Lipsky writes, "If protest tactics are not considered significant by the media, or if newspapers and television reporters or editors decide to overlook protest tactics, protest organizations will not succeed."[11] The experience in Ukraine amplifies Lipsky's point. In the years following the Gongadze murder, as the public became frustrated with mainstream media's inability to report dissent, the Internet became the nearly exclusive portal for samizdat journalism,

the Soviet-era tradition of covertly publishing works that would otherwise be censored or endanger the author. These web sites made an indelible impact by creating an alternative media voice that led an increasing number of people to challenge the official line presented by the mainstream media and the Kuchma regime.

Some of the top online news sites, including Pravda, bozrevatel and ProUA, became legendary following the Gongadze murder. These sites were a hybrid between citizen and professional media in the sense that they were predominantly staffed by professional journalists but often received low pay or were motivated by changing the Ukrainian political landscape. Obozrevatal was considered a tabloid, well known for its humorous and satirical 'Jolly Eggs' section, while ProUA offered the news from a business perspective. Each of these sites continued to capture their unique audience throughout the election cycle and they were distinct from activist sites because they strived to be unbiased, and to reach a broader audience than simply Yushchenko partisans and pro-democracy activists. These sites offered viewpoints very different from the offline media controlled by Kuchma.

Estimates vary as to how many Ukrainians had access to the Internet in the latter half of 2004. However, estimates generally range between two and four percent of the population of 48 million.[12] One of the most fascinating questions about the Orange Revolution is how the Internet became such an influential tool when such a small percentage of the Ukrainian population was online. To what extent did the information environment enabled by the Internet become pervasive enough to convince hundreds of thousands of Ukrainians to sleep outside in tent cities through nights with subzero temperatures in protest of fraudulent election results? We can approach this question through the lens of the classic Two-Step Flow Theory developed by sociologists Katz and Lazardsfeld (1955), which delineates a 'two step' information path. The first step is the direct path between mass media and the general public, while the second path is among elite opinion makers who strongly influence the opinions of the general public. This theory helps delineate how a relatively small group of activists and citizen journalists helped create a distinct information environment that challenged the narrative presented by state sanctioned media.
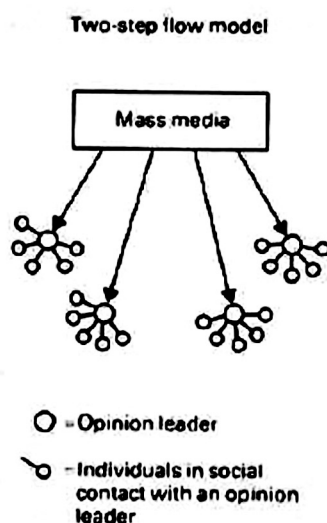
Source: Katz & Lazarsfeld (1955)

Practically, this meant that the citizens who consumed online media had to be particularly connected. Andriy Ignatov, one of the founders of Maidan noted that, "In order to cover a larger audience, we had to attract our target audience from people who are usually better networked than the rest. We strived to reach investigative journalists, human rights lawyers, entrepreneurs, and students. In short, we wanted to reach the most networked people in Ukraine."[13]

Stephen Bandera's empirical study on political participation during the Orange Revolution clarifies this point.[14] Bandera's work is built on a framework developed by the Institute for Politics, Democracy and Internet (IPDI) at George Washington University, which created the term online political citizen (OPC) to better understand the role of the Internet in the 2004 U.S. Presidential Election. IPDI defined an online political citizen as a person who not only actively seeks out news and information sources on the Internet but also is proactive in a variety of ways ranging from forwarding political emails to participating in online chat conversations. The same study also developed the notion of political influentials, people who take part in a list of even more proactive, locally based activities such as making political donations and organizing events.[15] Bandera applied the online political citizen methodology to Ukraine through an online poll that asked whether Ukrainians visited a presidential candidate or political party web site and whether they took part in two of five other activities.[16] Bandera then went on to define Ukrainian

influentials as individuals who took part in at least three of a list of 13 more pro-active activities.[17]

The result of this study was that Ukrainians who use the Internet were more likely to be online political citizens than their American counterparts. However, Bandera also found that the percentage of influentials was significantly lower in the United States.[18] These findings suggest that, compared to America, a larger percentage of Internet users in Ukraine helped to disseminate online political news and information, contributing to the two-step flow of information, even if a smaller percentage of users were activists and organizers themselves. Part two of this paper will describe the work of influentials and their effective tactics for distributing information to the larger public.

The Egg Incident and Viral Satire

As noted above, Kuchma and Yuschenko were vastly different candidates, in everything from physical appearance to track record of integrity. Pro-democracy activists, and the population at large, recognized these differences and created satire and humor to bring them to light. The Internet and mobile phones helped spread jokes, puns and skits virally.

The notion that cultural icons and political gaffes have a longer life because of new technology was noted in the US during Howard Dean's presidential campaign. Dean's 'Big Scream,' when the candidate began yelling while attempting to encourage his campaign troops, had a deep impact because of its long life online.[19] In Ukraine, satire, jokes and puns were often created in online chat rooms but were then distributed via mobile phone or live at protests to hundreds of thousands of people.

In Ukraine, the floodgates of satire were opened two months before the election with the now infamous 'Egg Incident.' On September 24th, while Yanukovych was traveling in a heavily pro-Yushchenko district, someone in the crowd hit him with an egg. In a clearly overstated and melodramatic gesture, Yanukovych fell to the ground, and was carried into a nearby van by his bodyguards. His press team soon released a statement claming he had been brutally assaulted by someone hurling a video camera battery. All video tapes of the incident were confiscated but one survived and was sent to Channel 5, whose slow motion replay of the incident clearly showed that the offending ob-

ject left a yolk and splattered shell behind.

Soon, based on the egg incident, a web site with jokes, puns, and skits emerged. Also, an online game called 'The Boorish Egg' emerged, where players fought pro-Yanukovych henchmen by throwing eggs at them. [20] Online forums such as Maidan became sources not only of campaign strategy and techniques, but also of jokes and farce. It was this creativity that helped many Ukrainians join the political conversation and feel like the discussion related to them. Many of the jokes created online kept protestors upbeat during the many freezing nights of protesting the second round election results. When an ad hoc group of Yushchenko supporters staged protests wearing criminal uniforms, making reference to Yanukovych's past criminal convictions, and later posted the pictures from the event online, their satire went far to illustrate what they saw as the absurdities of Yanukovych as a national candidate.

The ability to diffuse tension through humor and satire was crucial to the success of the Orange Revolution. As Henry Jenkins points out, some of these things may look more like play than civic engagement, "…yet these forms of popular culture also have political effects, representing hybrid spaces where we can lower the political stakes (and change the politics of language) enough so that we can master skills we need to be participants in the democratic process. The Internet vastly accelerated this cultural tool, by making more channels of subversion available to opinion makers and other leaders."[21] Every joke and pun created by this community of activists and directed at Yanukovych further drew attention to the vastly different information environments and political futures that the two candidates represented.

PART II: ORGANIZERS AND PROTESTERS

While online citizen and professional journalists used the Internet to create a very effective alternative media environment to challenge the Kuchma regime, civil society activists were using the Internet, as well as SMS mobile phone technology to coordinate everything from election monitoring trainings to policy discussions to the protests that played the most dramatic role in the Orange Revolution. This section describes how two of the most prominent or-

ganizations, Maidan and Pora, used these tools to promote pro-democracy goals.

Maidan: A Real World Group Uses an Online Space for Discourse, Documentation, and Coordination

The Ukraine Without Kuchma movement offered an opportunity for civil society in Ukraine to organize and gain momentum. Starting in December 2000 with modest street protests in Kyiv, the campaign blossomed and reached its zenith following protests on March 9th, 2001, a Ukrainian holiday marking the birthday of the poet Taras Shevchenko. After clashes between police and protestors, several protesters were arrested, sparking public outrage. By March, the movement had cast a wide net, bringing together socialists and right-wingers who had been divided previously.

Maidan was one legacy of the Ukraine Without Kuchma Movement. Maidan, launched on December 20th, 2000, was a real world group of pro-democracy advocates who used the Internet as a tool to support their organization. The group was founded by several technologically adept and concerned citizens who believed, as the web sites slogan says, "You CAN change the world you live in. And you can do it now. In Ukraine." [22] A *maidan* in Ukrainian means public square, a place where people traditionally gather to celebrate holidays and to take part in other public activities. The main activity of Maidan was election monitoring and networking with other prodemocracy organizations around Eastern Europe. Maidan hosted around twenty seven election monitoring trainings, in nearly every Ukrainian *oblast* (region), with support from Serbia's Otpor movement. They also collaborated on a two-day meeting with Georgia's Kmara Youth Alliance. In the year leading up to the election, Maidan trained over 500 Ukrainians to observe the election.[23] This evidence collected by Maidan was central to proving the existence of massive election fraud.

While Maidan was busy organizing in the real world, they leveraged their online message boards to increase discourse and stay in touch with members. Maidan had message boards on topics ranging from humor to practical advice for activists, a photography gallery, and searchable archives. By the end of the Orange Revolution, this web site had over 20GB of data archives, which became a crucial source for documenting the development of political change.

In addition to this robust conversation, Maidan's web sites were crucial for donor relations with the expatriate Ukrainian community, who could follow the spirited discourse online and then contribute money via credit card.

While Maidan was best known by the public as an online, decentralized group of activists, founder Andriy Ignatov is quick to note that, "…web sites cannot produce an activist organization."[24] It was crucial for Maidan to frequently host real world meetings as their online membership and the robustness of their online message board conversation increased. Many Ukrainians had the impression that Maidan was a completely decentralized organization, like Wikipedia, relying on the generosity of people coming together to make change.

While this is somewhat accurate, Ignatov also pointed out that a community like Maidan still requires centralized leadership that is responsible for outcomes, develops the culture of the organization, and controls its assets. For example, the leadership of Maidan created a set of norms and discourse rules for the web site discussion boards to keep conversations cogent and to prevent ad hominem attacks. Since speaking out on political issues could lead to negative professional and personal consequences, Maidan allowed anonymity but encouraged users to disclose their identity whenever possible.

If cyber-utopians offer a vision of a non-hierarchical, direct democracy in the future, and cyberskeptics see little value to more technology, the Maidan experience demonstrates a middle ground. As political theorist Ned Rossiter cogently points out regarding digitally based organizations like Maidan:

> [Technology] certainly does not make possible a direct democracy, where everyone can participate in a decision, nor representative democracy where decision makers are elected; nor is it really a one-person-one-vote referendum style democracy. Instead it is a consultative process known as 'rough consensus and running code.[25]

For Maidan, the Internet was clearly a vital, multi-faceted tool useful for outreach, training, and awareness raising, as well as fundraising and marketing. However, it is also clear that central, top-down leadership was necessary for the suc-

cess of its mission.

Pora: Spreading Information and Hitting the Streets

The clearest way pro-democracy messages spread throughout Ukraine was via the grassroots campaign of Pora, a pro-democracy movement meaning 'It's Time.' Pora was a well-organized group of volunteers that emerged as an information sharing campaign and during the elections morphed into coordinators of mass protest centered around tent cities in towns throughout Ukraine. Pora also took its inspiration from Serbia's Otpor and Georgia's Kmara youth alliances, as well as older civic movements in Hungary and Czechoslovakia. According to a report issued by Pora in 2005, the organization described the reason for its creation: "Under conditions of far-reaching censorship and absence of independent media, the main idea of Pora was the creation of alternative 'mass media,' in which volunteers deliver election-related information 'from hand to hand' directly to people throughout Ukraine."[26]

By 2004, Pora was led by well trained and technologically savvy activists who used the Internet as a major mobilization tool. Pora promoted "the active use of modern communications systems in the campaign's management."[27] Pora recognized that their web site served as a source to inform the public and as a forum for activists to communicate. The organization and activities of Pora represent the clearest link between the small percentage of Ukrainian elite who were online and the general public. However, if Pora was proud of its use of modern communications tools, it is also clear that Pora successfully leveraged traditional methods of spreading information within a media environment where openness and freedom of speech were limited. These tools included print products (leaflets, brochures, stickers, and small souvenirs), public activities and demonstrations, visual presentations (posters and graffiti), media presentations (clips and interviews), and periodicals.[28] Pora estimated that over 40 million copies of 37 different materials were distributed during the campaign.

Since the 'bread and butter' tools of Pora were quite similar to other movements that took place in the late 20th century, what was the impact of the Internet and mobile phones on Ukrainian grassroots movements like Pora? By September 2004, Pora had created a series of stable political networks throughout the country, including 150 mobile groups responsible for spreading information and

coordinating election monitoring, with 72 regional centers and over 30,000 registered participants. [29] Mobile phones played an important role for this mobile fleet of activists. Pora's post-election report states, "…a system of immediate dissemination of information by SMS was put in place and proved to be important."[30] Some groups provided the phones themselves, while others provided SIM cards, and most provided airtime. Also, the Orange Revolution provided some of the earliest occurrences of what Steven Mann calls 'sousveillance,' referring to "…the monitoring of authority figures by grassroots groups, using the technologies and techniques of surveillance."[31] In a now infamous incident, a university professor in Kyiv who illegally instructed his students to vote for the ruling party was exposed by one of the students in his class with a cell phone.[32]

As online organizations began reporting election fraud, Pora morphed into a protest coordination organization. In towns across Ukraine, tent cities became the sign of the Revolution. In mid-October 2004, Pora openly joined the Yushchenko campaign and began to prepare for public protests and student strikes. This allowed the organization to respond immediately after the first round of election fraud on October 31st, 2004. When it became apparent that the second round of the election was fraudulent, Pora swung into action, bringing nearly 1,500 tents with more than 15,000 inhabitants to Maidan in Kyiv. The Internet played a role by providing rapid reporting in a way that no other medium could. Pravda Editor Olena Prytula writes,

> While the Orange Revolution spread from Kyiv to the regions, Pravda was writing a chapter on the modern history of Ukraine. The news feed from the regions were vitally important. Every ten to fifteen minutes another tent city appeared in some town or other, and the fact was soon reported on the air. News from the regions was read by opposition leaders on Maidan to millions of listeners in the streets of Ukraine.[33]

With the Supreme Court, the Central Election Committee, and the Presidential mansion surrounded by thousands of peaceful protestors, the Supreme Court's only reasonable option was to order a third round of elections.

It is important to note that the majority of the people in-

volved in the Orange Revolution were in their thirties or younger. Democratic movements are often composed of students and other idealistic young people. In a country that had been independent from the Soviet Union for less than 15 years, young people were unable to remember some of the more deeply brutal acts of the Soviets against the Ukrainian people. This may be one reason that the Internet, as a medium more pervasive with a younger audience, became such an influential tool.

In a politically charged environment, any technology that promises to organize people and resources may be seen by authorities as a threat. The government certainly saw the Internet in this light. One legal reason that online sites were able to blossom is that Ukrainian law considers the Internet to be a peer-to-peer communication tool and not a mass media platform. While many mainstream journalists faced the threat of defamation charges, many online journalists were free from this threat.[34] Further, the government simply had not come to consensus regarding the legal and political frameworks it would use to silence journalists that published openly on this new medium. This fact is further explained by the fact that the status quo party was unsophisticated in their use of the Internet, mostly limited to paid supporters disrupting message boards.

Aside from Gongadze's brutal murder, overt crackdowns on journalists and activists, whether or not they used the Internet as an organizing tool, were rare. However, there were two significant incidents where members of civil society were harassed. The first took place in July 2004, and was known as the Sumy Student Protest. Students protesting Kuchma's policies marched over 200 miles from Sumy to Kyiv. Along the way, several protesters had drugs planted on them and were arrested for several days before being released[35]. The second incident took place in September 2004, when Police searched Pora's headquarters and planted explosives. They used this search as an excuse to confiscate Pora's assets, including 10 million leaflets that were meant to be distributed across the country.[36] However, it is helpful to compare oppression in Kuchma's regime with Lukashenko's Belarus, where journalists are routinely imprisoned for libel and physically attacked. The level of persecution that journalists and activists face is certainly a factor in their likelihood to stimulate an opposition movement.

CONCLUSION

While a wide range of factors shaped the events and outcomes of the Orange Revolution, the Internet and mobile phones proved to be effective tools for pro-democracy activists. First, the Internet allowed for the creation of a space for dissenting opinions of 'citizen journalists' in an otherwise self-censored media environment. Second, pro-democracy activists used the convergence of mobile phones and the Internet to coordinate a wide range of activities including election monitoring and large-scale protests. It is worth stating that few observers would argue that the Orange Revolution would not have happened without the Internet. Moreover, given the multiplicity of factors in play during a political revolution, it is not appropriate to infer that in similar circumstances the application of technology will lead to the same outcome as in Ukraine. However, in the case of Ukraine it is evident that pro-democracy forces used the Internet and cell phones more effectively than the pro-government forces, such that in this specific time and place these technologies weighed in on the side of democracy.

The role of emerging communication tools in the Orange Revolution chronicled in this case study point to a larger question for further research: are these tools inherently conducive to the expansion of civic engagement and democratization or will authoritarian governments adapt the technology to their own advantage? If the distributed nature of the Internet and mobile technologies tilts the scales in favor of community organizers and democracy advocates, then there is reasonable case to be made that the spread of digital networked technology will have a positive impact on democratization.

ENDNOTES

[1] Adrian Karatnycky, "Ukraine's Orange Revolution," *Foreign Affairs* 84 (2) (March-April 2005).

[2] Michael McFaul, "Transitions From PostCommunism," *Journal of Democracy,* 16 (July 2005).

[3] Alexis de Toqueville, *The Old Regime and the French Revolution* (New York: Doubleday, 1995[1856]).

[4] Adrian Karatnycky, "Ukraine's Orange Revolution," *Foreign Affairs* 84 (2) (March-April 2005).

[5] See, for example, Samuel Huntington, *The Third Wave: Democratization in the Late Twentieth Century,* (Norman: University of Oklahoma, 1991).

[6] Jay Rosen, "The People Formerly Known as the Audience," *PressThink,* September 17th, 2007. http://journalism.nyu.edu/pubzone/weblogs/pressthink/2006/06/27/ppl_frmr.html#more (accessed August 9th, 2007).

[7] For more on decentralized networks, see David Isenberg, "The Rise of the Stupid Network," *Journal of the Hyperlinked Organization* (August 1997), < http://www.hyperorg.com/misc/stupidnet.html>(accessed December 11th, 2007).

[8] Lucan A. Way, "Kuchma's Failed Authoritarianism" in *Journal of Democracy,* 16 (2) (April 2005): 131-145.

[9] Olena Prytula, "The Ukrainian Media Rebellion" in Anders Aslund and Michael McFaul, eds., *Revolution in Orange* (Washington D.C.: Carnegie Endowment for International Peace, 2006).

[10] Natalya Krasnoboka and Holli A. Semetko, "Murder, Journalism and the Web: How the Gongadze Case Launched the Internet News Era in the Ukraine," In Oates, Owen and Gibson, eds., *The Internet and Politics: Citizens, Voters and Activists* (New York: Routledge, 2006), 192.

[11] Michael Lipsky, "Protest as a Political Resource." *American Political Science Review* 62 (1968): 1114-58.

[12] See, for example, Myroslaw J. Kyj, "Internet Use in Ukraine's Orange Revolution" in *Business Horizons* (2006) 49, 71-80 and Olena Prytula, "Ukrainian Media Rebellion" in Aslund and McFaul *Revolution in Orange* (Washington D.C.: Carnegie Endowment for International Peace, 2006).

[13] Author Interview with Andriy Ignatov July 10th, 2007.
[14] Stephen Bandera, *The Role of the Internet and Ukraine's 2004 Presidential Election,* Development Associate Report, June 2006.

[15] *Political Influentials Online in the 2004 Presidential Campaign,* The Graduate School of Public Management, The George Washington University, Washington D.C. February 4th 2005.

[16] OPC activities were: visit web sites with news about the election campaign, visit or post messages on web sites that discuss politics and current affairs, send or forward email on political topics, receive political news via email, participate in online chat discussions, or transfer funds to the presidential campaign via the Internet. See, Stephen Bandera, *The Role of the Internet and Ukraine's 2004 Presidential Election,* Development Associate Report, June 2006. p.12.

[17] Influential activities were: written or called any politician at the state, local or national level, attended a political rally, attended a public meeting, held or ran for political office, service on a committee for a local organization, served as an officer for a local organization, written a letter to an editor or called a live radio or TV show, signed a petition, worked for a political party, written an article in a magazine or newspaper, gave a speech in public, been an active member of a public policy or political group and donated money to a candidate or party.

[18] Bandera notes that 66% of online users were OPC's while only 35% of Americans were. 75% of US OPC's were Influentials while only 40% in Ukraine.

[19] Patti Richards, "Internet's Snowball Effect Changes Political Campaigns, " *MIT News,* October 20, 2004, <http://web.mit.edu/newsoffice/2004/campaigns-1020.html> (accessed August 10, 2007). It may be that the mainstream media played an equally large role in this phenomenon with continual coverage of the scream, especially on cable news channels.

[20] Myroslaw J. Kyj, *Internet Use in Ukraine's Orange Revolution.* [Chester, PA: Indiana University Kelley School of Business, 2006], 76.

[21] Henry Jenkins, *Convergence Culture: Where Old and New Media Collide* (New York: New York University Press: 2006), 86.

[22] <http://eng.maidanua.org/> (accessed July 11th, 2007).

[23] Author Interview with Andriy Ignatov July 10th, 2007

[24] Ibid.

[25] Ned Rossiter, "Organized Networks and Non-Representative Democracy", in Dean, Anderson and Lovick, eds., *Reformatting Politics.* (Routledge, 2006), pp. 26. For more on 'rough consensus and running code', see David D. Clark, "A Cloudy Crystal Ball—Vision of the Future," *MIT Media Laboratory for Computer Science,* 24th Internet Engineering Task Force, 1992.

[26] *A Case Study on the Civic Campaign PORA, and the Orange Revolution in the Ukraine,* Civic Party Pora, December 2005, <http://pora.org.ua/eng/content/view/2985/325/>, (accessed August 15th, 2007).

[27] Ibid.

[28] Ibid.

[29] Ibid.

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