18 Mobile Multimedia: Uses and Social Consequences

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In chapter 22 of this volume, Kenneth Gergen analyzes how mobile telephony is transforming the political process and democracy. For him, the structure of political communication in Western societies has gone through a series of highly significant changes during the past fifty years. Between the government and the individual voter, there has always been a layer of face-to-face relationships in which people deliberate social issues and political issues. The fourth layer, a more recent addition, is mediated communication that was originally monological: the public was informed, but had only limited possibilities in participating in opinion formation in media. However, with mobile phones, the nature of mediated communication changes. For example, people are able to organize political protests, as the ousting of Joseph Estrada, the former president of the Philippines shows (see Rheingold 2003a). The history of how he left his position was largely a story of urban crowds organizing massive demonstrations with mobile phones and text messages. With messages such as "Go 2EDSA, Wear blck," people organized a series of demonstrations at Epifanio de los Santos Avenue (EDSA), a major Manila thoroughfare (Rheingold 2003a, pp. 157–160). We can call this picture optimistic. Mobile communication is an important constituent of what Gergen calls "the proactive *Mittelbau*," opinion-formation and action that is rooted in the independent realities of civil society rather than in the opinions of political elites or mass media.

However, the second picture Gergen paints is more somber. In this vision, the civil society is being slowly replaced by small communication clusters, which increasingly take the role previously played by face-to-face conversation in public venues. Political communication shifts from civil society to these "monadic clusters," as Gergen calls them. Instead of participating in society, people move through the day largely disengaged from those around them, turning instead to their friends when in trouble or in need of advice or encouragement. In these clusters, people focus on immediate life and microrelationships at the cost of civic concerns. If they focus on issues relevant to democracy, they construct their opinions with their friends and acquaintances rather

than in political parties or by participating in community decision making. People are distanced from politics, disrupting dialogue necessary for a healthy democracy.

The first sociological studies on mobile multimedia tend to point toward Gergen's second picture. For example, Scifo (2005) firmly situates camera phones and mobile multimedia in ordinary communication among friends and acquaintances, and Koskinen (2007b) has characterized mobile multimedia as machinery that produces banality: people capture and share ordinary things, but account and explain them into something exciting to justify sending them. In a darker tone, Rivière (2005) builds on French psychoanalysis, and connects ordinary uses of multimedia to the pleasure-seeking primary processes of human psyche. For her, multimedia phones increase intimate and sensational, spectacular communication: ''they increasingly use intimate play context, which have no rational purpose but rather aim at sensations, and in which the search for immediately shared pleasure is more and more visible'' (Rivière 2005, p. 212). However, mobile multimedia may also contribute something of more lasting value to society. For example, it may increase the feeling of belonging, make people more aware of their visual and aural environment, ease occupational problem solving, and enable citizen journalism. Why should it not contribute to the proactive Mittelbau also?

This chapter explores mostly English-language literature on mobile multimedia and by doing so tries to fit this phenomenon to the picture Gergen gives us. My aim is to open debate on what mobile multimedia is doing in society by opening its *Apparatgeist*, as Katz and Aakhus (2002, p. 11) have called frameworks aimed at understanding the uses and consequences of mobile technologies. I wish to include the views of not just experts like researchers and journalists, but also of lay people to bring these frameworks into view to understand mobile telephony.

With the exception of Japan, mobile multimedia has not achieved anything like the success of text messaging (SMS). Still, the question of its consequences is already significant. Multimedia phones—or colloquially, ''cam phones''—are already virtually ubiquitous. In 2004, more than two hundred million camera phones were sold, and the figure for 2005 may be over three hundred million. When this chapter was written, there were no reliable figures for phones with a TV capability, but these phones are becoming increasingly more common with so-called third generation network technology (or 3G). If we believe the industry, multimedia will be one of the main forces that drive the adoption of these faster networks. In an attempt to answer the questions Gergen poses, this chapter explores a small but growing body of social science research on mobile multimedia rather than building on original data. There is an extensive body of literature on multimedia in engineering, but I refer to this literature only if it is based on extensive, well-documented user studies, with at least a few weeks' field period. Usability studies and design studies with mock-ups of user interfaces have not been included. For reasons of space, I skip legal concerns related to mobile photography,

and also marketing studies exploring the acceptability of services (see www.textually .org/picturephoning).

In this chapter, ''mobile multimedia'' refers to a whole set of new devices and technologies that have entered our pockets during the past few years. There are several competing multimedia technologies on the market, but from the standpoint of the Apparatgeist theory, I divide mobile multimedia into *mobile multimedia messages*, *moblogs*, and *mobile mass media*. The first term covers personal technologies that people can use to capture and share photographs, text, audio files, and, sometimes, short video clips (the best known technology is MMS, multimedia messaging system). Moblogs refer to messages shared through Web sites. The last category covers mobile television and mobile movies aimed to distribute professionally created and edited content to mobile phones that function as terminals for accessing this content.

Personal and Social Uses of Mobile Multimedia

By far, the best studied area of mobile multimedia is its personal and social uses. In her study of how young Milanese use MMS, Scifo (2005) learned that it is primarily a small group activity. Based on her interviews, she notes that multimedia messaging almost exclusively takes place in a network of strong relationships, in which it primarily is used for sentimental purposes. With multimedia messages, people give others access to places, individual and social situations, and emotions. For example, they share images of familiar objects and people, private life (as in objects, relatives, and haunted places), and social networks. If Scifo is right, multimedia roots small groups tighter to Gergen's immediate life, whether physical or social, and makes it an object of joint concern.

This interpretation gets support from several other sources. For instance, in terms of contents, images captured with multimedia phones focus on familiar objects such as family members, friends, self, pets, and travels (Okabe and Ito 2004; Kindberg et al. 2004). By and large, mobile multimedia seems to continue the tradition of ordinary snapshot photography, but makes it even more ad hoc in terms of what people choose to shoot (Chalfen 1987; Koskinen, Kurvinen, and Lehtonen 2002, pp. 21–26). For example, as Kindberg and colleagues (2004) argue, people tend to capture issues relevant for small groups rather than society at large. They classified 82 percent of 349 messages they gathered from British and American phone users as affective rather than functional. Emotional content and entertainment dominates audio and video, too, although people may use these features for functional tasks (such as sending driving instructions) as well (see Kasesniemi et al. 2003; Koskinen 2005). Also, it appears that as relationships get more intimate, messaging tends to get even more mundane. While friends and acquaintances tend to capture and share things, events and observations that are at least minimally interesting for the recipient, couples share pictures and

sounds about almost anything they happen to see or hear just to maintain "visual co-presence" (Ito 2005). However, although most multimedia pictures focus on immediate life, this does not imply that immediate life comes in simple packages. What people see as important may result from years of symbolic and imaginary work: while "Paris" may be a sign on the map for one person, for another it may be an elaborate, cherished experience created over several years (Battarbee and Koskinen 2004). Also, messages may be designed using complex constructs. For example, people often take advantage of artifacts they find from media and culture, including documents, snapshots, post-cards, greetings, and chain messages, which are sometimes downloaded from the Web (Ling and Julsrud 2005).

A good deal of multimedia content seems to be for private purposes only. In their phones, people carry a mobile archive of memories. This archive is "always within easy reach, something to look at again and again, when feeling nostalgic, or just to pass an interstitial moment in one's daily routine" (Scifo 2005, pp. 365–366). In a more social vein, camera phones have been characterized as "capture and show" rather than "capture and send" devices (Kindberg et al. 2004, p. 12). In this function, camera phones work better than digital cameras simply because many people carry mobile phones with them practically all the time.

However, some contents are sent from one phone to another: they become messages. Do they follow different premises than those messages that are kept private or shared from the screen only?

One body of research has explored this question. Koskinen and his colleagues have studied how people use multimedia phones to interact with their fellows. In *Mobile Image* (Koskinen, Kurvinen, and Lehtonen 2002), they gave an advanced mobile phone and a camera to four groups of five people for approximately two months each. People could beam photographs from the camera to the phone via an infrared link, and send them as an attachment in mobile e-mails. In this study, images became methods used in ordinary interaction. For example, in Message 1, Johan requests a photograph from his friends. He had been in a floorball tournament a day before (floorball is a form of indoor hockey played mostly in Scandinavia), which his team had won. He knew that his friends had been taking pictures all along the tournament. In Message 2, Erik sends the requested picture and continues to ask for a lunch companion. The example shows how multimedia messages can "chain" in sequences that function much like turns in conversation (see figure 18.1).

In *Mobile Multimedia*, a sequel to *Mobile Image*, Koskinen and colleagues have analyzed interaction in more detail. For example, Kurvinen (2002) shows how people share not just serious emotions—such as love—with multimedia, but also more fleeting ones, such as the apathy following a party. In another paper, he has focused on how people tease one another with pictures (Kurvinen 2003). In this analysis, pictures and other multimedia elements are something people use in interaction for practical

Messages 1–2. Prize (2000/11/08 11:46:54 and 2000/11/08 12:17:08)		
	Multimedia content:	*Text:*
Request	–	Hi! Does anyone have good pictures from Yesterday? For example, at least 100 pictures were taken with Toni's camera. Has anyone a picture of me with the trophy? Johan
Response		It's easy to smile when you win. Lunch companion is available near to the School of Business. Erik

Figure 18.1
Messaging with multimedia. Source: Author.

purposes, not something that drives use from behind the backs of people. It goes without saying that in these studies of multimedia-in-action, messaging overwhelmingly takes place between couples, friends, and acquaintances (Koskinen 2007a). Following Simmel (1949), it can be described as sociability, interaction with no purpose outside itself (see Koskinen, Kurvinen, and Lehtonen 2002). Thus, the main conclusion from these studies corroborates things learned from interview and diary studies: mobile multimedia binds already closely knit networks tighter together (Koskinen 2007a).

I take these observations to mean that mobile multimedia provides people a sociable channel through which they can entertain each other in Gergen's monadic clusters. People do send information and solve problems through messages, but these exchanges by and large take place in the same tightly knit networks as more common emotional and entertaining exchanges. In occupational uses, of course, mobile multimedia may maintain occupational rather than only ordinary practices. For example, carpenters studied by Ling and Julsrud (2005) photographed details of their work not just for later reference but also for clarifying their problems and solutions to coworkers. I have also learned about a musician who uses his mobile phone to collect and share his musical ideas by, for example, recording a new rhythm with it for later reference. These observations and anecdotes suggest that certain occupational groups will

develop multimedia cultures that differ from ordinary uses. Still, it can be argued that even these occupational uses transform small groups into self-reliant "telecocoons" (Matsuda 2005) rather than connect them to surrounding society, not to mention developing new forms of consciousness and taking stance to it. However, there seems to be at least one group that benefits from mobile video more than others. The deaf can use their mother tongue, sign language, with videophones (Kasesniemi et al. 2003).

Moblogs and Citizen Journalism: Mobile Multimedia and the Proactive Mittelbau

People can share images and other multimedia content with their phones not just by showing messages from the screen or by sending them to another phone. They can also send their messages via the Web. These contents even can be viewed with mobile phones provided they have proper software that parses the Internet contents into the small screen of the mobile phone. Software in newer phones makes it even possible to create Web sites with the phone. If one sends text to these sites to augment images, a photo album turns into a "moblog," a Web-based diary-like site from which readers can follow the writer's life and opinions. Perhaps moblogging could support the proactive Mittelbau?

As such, moblogging seems to be unusual even in Japan, where mobile Internet first became popular (for inside stories, see Matsunaga 2000; Natsuno 2003). In Japan, moblogging first took off around 2002. However, a Japanese survey from 2002 tells that only 0.6 percent of Web phone—mobile phones with an access to the Internet—owners had created a Web site. More prevalent uses of phones (more than 30 percent of users had tried at least once during the past year) were e-mail, music file downloads, image downloads, and visits to games or fortune-telling sites (Okada 2005, p. 49). When it comes to journalistic uses of moblogs in Japan, these seem to center on sharing newsworthy events in personal life and "stalking" celebrities with cam phone pictures rather than serious journalism. Even group diaries seem to be a rare occurrence, although Ito reports about the "*Sha-mail* Diary Confederation" (*sha-mail* refers to a popular handset) in which twenty-nine writers shared their diaries and *sha-mail* photos in 2004 (Ito 2004). The global situation today does not change this picture. In a recent study of moblogs, Döring and Gundolf (2005) observed that although by 2004 there were already hundreds of thousands of moblogs globally, only few were active after the first week. Most moblogs are personal in content, focusing on trite things of everyday life. Topical moblogs typically reflect interests in topics familiar from snapshot photography, such as children and pets.

In more institutional settings, moblogs may come to have more encompassing and long-term effects. For example, moblogs may change the way in which a whole community understands itself. A pertinent example comes from a community-

development study of the Shibamata neighborhood, located at Tokyo's easternmost edge. This neighborhood had enjoyed a constant stream of tourism after the popular movie and TV series *Otoko wa tsuraiyo* (*It's Tough to Be a Man*) was located in the neighborhood in 1969. When the series ran out in 1996 after the death of Kiyoshi Atsumi, the actor who played the main character, tourism started to decline, and the local community had to redefine its charms. In 2004, a group of researchers led by Fumitoshi Kato (Kato and Shimizu 2005) sent a group of students for field work with camera phones in Shibamata. They set up a moblog site for the neighborhood and created a series of postcards from student pictures to display the attractive qualities of the neighborhood. Some of these pictures were linked to audio files that could be accessed on the Web by scanning a bar code with a camera phone. As Kato and Shimizu observe, whenever someone sends multimedia messages to a moblog, one gives clues about oneself. In Shibamata, moblogs are above all social things:

"Community-moblog" can be understood as a "place" for one's face-work. . . . In posting a photo, a member is constructing and maintaining the relationships with others. An individual's postings are not only displaying to other members what he/she has been, but also, he/she is displaying about him/herself, and his/her understandings about the relationships with other members. By sharing the "community-moblog," members define, redefine, the situation within which they are embedded. (Kato and Shimizu 2005)

This study points to one way in which multimedia phones might be a proactive force in social change. It has similarities to several critical art projects (see Dewdney and Lister 1988). Under certain conditions, community moblogs with a critical edge might sustain social movements and perhaps even smart mobs discussed by Rheingold (2003a).

Another way in which mobile multimedia may empower the Mittelbau is through citizen journalism. As soon as there are hundreds of millions of camera phones in society, things previously unseen by news media become increasingly photographed. Perhaps the best known recent example comes from London bombings by the terrorist organization Al Qaeda in July 2005. Pictures and videos from dark "tube" tunnels were sent immediately around the world. This footage mostly came from eyewitnesses' and victims' camera phones. It ended up on Weblogs in a couple of hours and was picked up by major news media like the BBC, CNN, and London's the *Sun* shortly afterward, raising issues of reliability and copyright of images sent on the fly, as well as privacy and excessive risk-taking by would-be citizen journalists (Noguchi 2005; Snoody 2005). It is also fairly easy to imagine moblog sites maintained by consumer groups where people could send photographs of dangerous goods or misleading advertisements they spot in shops. Such sites would collect evidence for consumer magazines, turning camera phones into instruments of consumption criticism. However, it is just as easy to imagine racist groups spreading propaganda with camera phones.

Thus, although early Japanese and emerging Western evidence suggests that camera-phone journalism largely concentrates on ordinary events and stalking celebrities (Ito 2004), this is not the whole picture. As Dunleavy (2005) notes, with London bombings, camera phone images became an accepted part of quality journalism: camera phone pictures were run on the front pages of the *New York Times* and the *Washington Post*. Another event that proved the value of camera phones (and amateur video) was the Asian tsunami at the end of 2004. Although media reacted quickly to the disaster, government response was slow and less reliable than the ad hoc responses from citizen journalists in Sri Lanka and Thailand. Although early fears about everyone becoming paparazzi may to some extent have been proven to be true, as in the case of rewards promised by tabloids for fresh cam phone photos, camera phones also have proved their social value in journalism. By the end of 2005, there were at least three Web-based photo agencies that sold pictures submitted by ordinary citizens to media (for example, www.celljournalist.com and www.scoopt.com). The first international conference on moblogs and journalism took place as early as 2002 in Tokyo (Rheingold 2003b), and at least one journalistic book based on observations on camera phone photos has been published (Margolis 2005).

With the possible exceptions of moblogging in Japan and citizen journalism, moblogs have not yet become a particularly popular form of sharing mobile multimedia content. Still, new forms of social action may be taking shape in the cross-section of wired and mobile digital technologies. However, it is just as likely that moblogs will simply function like photo albums: for monadic clusters, they serve as reservoirs of memories, filled with stories of the self, family, and friends, as well as trophies such as homes and cars. If anything, experience from personal and social uses points to the latter vision rather than to significant transformations in politics. Incentives to share multimedia with the wider society are today mostly provided by institutions of the caliber of *People* and the *National Enquirer*. Still, as the London bombings show, under some circumstances, multimedia messages may make a more valuable contribution to society. I am probably not much off the mark if I predict that the moblog culture will grow in two main directions, one increasingly personal and social, another increasingly tied to more significant institutions such as journalism. Personal content may occasionally become interesting enough to catch the public eye, but mostly under special circumstances like the tsunami disaster or the London bombings.

Mobile Multimedia as Mass Media

I first analyzed mobile multimedia mainly as a personal technology that, under certain circumstances at least, may also feed into national and even international news sources. However, even then, multimedia phones are firmly in the hands of ordinary people who create content with them. With the possible exception of moblogs, people

share content with only a few of those people whose contact information they have in their phones. Now, there is another way in which significant institutions such as the media have an interest in multimedia phones. Multimedia phones can be used as terminals for receiving digital video and TV program stream, and an increasingly number of newspapers around the world can be accessed with multimedia phones. Such content is produced and edited by professional moviemakers, advertising agencies, journalists, and editors, for whom mobile phones provide another increasingly attractive channel.

Probably the first experiments in making movies for mobile phones were known as "micromovies" (see Boyd Davis 2002; Metso et al. 2004). This term describes small-scale movies that can be viewed with various mobile devices including mobile phones. In contrast to traditional cinema, which is made for large audiences and is watched in theaters or TV screens, micromovies are more personal and are shown in mobile terminals that usually have an input equipment that is sufficiently elaborate for playing computer games. Consequently, while most micromovies are just movies produced for a small screen, some movies have interactive features. For example, the viewer can select from several possible plots at predetermined spots, or use personal information stored in the phone to select from alternative courses of the story. There have even been several micromovie festivals at least in France, the United States, and Finland, and movie prizes even have been given to the best works in these festivals.

Of course, showcases in media art do not mean success in society. Micromovies have been popular within a small group of technology enthusiasts and digital artists rather than the public at large. However, in one country, South Korea, mobile movies has become a mass phenomenon. Ok (2005) describes how SK Telecom launched the mobile movie service "June" in 2002, and started to broadcast live TV feed, news broadcasts, sports shows, movies, TV drama, and animation through the service. At present, the movie/TV category produces 17 percent of June revenues. Ok distinguishes two content categories in this service. "Migrated cinematic imaginary" consists of reusing already existing material, while "original cinematic imaginary" consists of new content exclusively produced for the mobile phone. An example of a successful movie in the latter category is *Five Stars*, which, unlike traditional movies, has a game-like structure with an open ending. The narrative focuses on who will be loved by the main character; viewers can vote for their favorites on a Web site also accessible with a mobile phone. About 75,000 users ordered this drama following the first fifteen days of the launch, and in all, 400,000 users have watched it.

The billion-dollar question at the end of the first decade of the new century is how will mobile TV develop. In an interview for Finnish Broadcasting Company in December 2005, the head of Nokia's multimedia unit Anssi Vanjoki estimated that by the end of 2008 about 20 percent of all mobile phone users globally will have a handset with TV capacity. However, at the end of 2005, mobile TV was still in its infancy even in the

most advanced mobile markets. For example, media companies, mobile carriers, and handset manufacturers have carried out studies in many European countries including Sweden, Finland, and the United Kingdom (see Södergård et al. 2003; BBC 2005). Also, the first field studies of technology were conducted in 2000–2001, but large-scale consumer studies are only currently underway. Some commercial services are already working, and more networks and content are coming to the market within a year or so for the most advanced mobile countries and cities. I suspect that TV will achieve some measure of success: forces pushing it—public broadcasters, media empires, and mobile phone operators—are powerful enough to withstand losses for years.

However, the commercial value of mobile TV is yet to be proven. An example comes from Finland, in which all major Finnish TV companies were recently involved in a study in which 487 consumers participated in a field trial with sixteen TV channels in three occasions (www.finnishmobiletv.com). In the first study, participants watched TV on average for about five minutes daily, mostly late in the evening. In two subsequent studies, the time increased to about twenty minutes. However, 58 percent of participants thought that mobile TV is going to be popular in the future. As expected, the heaviest users were young men with experience in mobile services, mobile Internet, smart phones, and camera phones, and had a habit of listening to music while on the move. Also unsurprisingly, the reasons for watching mobile TV were avoiding boredom (for example, while waiting for something and being stuck in traffic jams), staying updated (watching news), maintaining background entertainment when doing other things, and creating their own space.

Inevitably, a few marginal industries already have been taking advantage of multimedia technology—mostly MMS—with modest success. Just like ringtones and logos, downloading and sending background images (or *wallpapers*) for phones has gained a degree of popularity in several countries. The most reliable estimates are from Japan, where 34.8 percent of multimedia phone owners had downloaded images from the Internet at least once by 2002 (Okada 2005, p. 49). Of course, Japan may be an exceptional case, and we should be cautious of extrapolating from Japan to other countries. However, targeted mostly at teenagers and the young urban set, similar wallpaper industries exist in other countries as well. Finally, there is the marginal case of porn, which was probably the first industry to exploit the new channel, following the lead of sex lines and chatrooms (see Pertierra 2007). I received the first mobile multimedia porno ad from Switzerland as early as summer 2002.

We should remember that with the partial exception of civic journalism made possible by moblogs, mobile mass media is subject to the same limitations and social constraints as any journalism. All content in media is edited, designed, and dramatized. Governments do try to influence and sometimes, regulate, any program stream including one that takes place in mobile phones. Governments and other institutions try to control ordinary uses of camera phones too, for example, by banning them in military

compounds and government agencies, and Saudi Arabia has banned camera phones altogether. However, it is far more difficult to control a ubiquitous technology embedded in millions of mobile phones than mass media. In its most ordinary uses, mobile mass media will probably be an individualizing technology, something designed to be followed and enjoyed alone. I find it difficult to imagine how the fall of New York's Twin Towers could have united hundreds of millions of people into a global, if temporary, community if they had seen these dramatic pictures from mobile phones. However, one should remember that most research on mobile mass media comes from some of the most stable societies in the world. It is difficult to get Finns on the street for any social or political cause. How would people in more labile societies with massive urban crowds accustomed to demonstrations react to mobile television?

Mobile Multimedia in Society

In this chapter, I analyze mobile multimedia in society by reviewing three dimensions of its *Apparatgeist*, as Katz and Aakhus (2002) have called interpretations people develop to make sense of mobile technologies. I also evaluate their significance by relating them to an analysis of mobile telephony Kenneth Gergen presents in this book. When it comes to the first Apparatgeist dimension, personal and social uses, the main message of my analysis is in line with Gergen's more somber picture. People capture ordinary things in immediate life and share them with their friend and acquaintances in monadic clusters that become even emotionally and relationally more self-reliant than before. It ties friends, acquaintances, and couples closer together by giving them means to share sensations as well as trivial and entertaining observations rather than information needed in solving problems in life. Though multimedia messages mainly focus on sensuous and emotional aspects of immediate life, it is too early so say whether messaging is just about harmless reproduction of ordinary things as Scifo (2005) and Koskinen (2007a) imply, or whether it turns the users to seek sensations and pleasure, as Rivière (2005) suggests. Probably both interpretations are right, given that quite often multimedia messages are about ''pleasurable'' things like food and having good times with friends and partners.

Since Japanese evidence largely concurs with early European and American evidence, we may see personal and social uses as the baseline for understanding mobile multimedia. Do other aspects of the Apparatgeist change this baseline?

Mobile multimedia phones appear to have brought about some changes to journalism, but convincing evidence is limited to two major news events, the Asian tsunami at the end the of 2004 and the London bombings in July 2005. Similar events will no doubt occur in the future, but if they have a lasting impact on journalism remains to be seen. It also remains to be seen whether mobile multimedia will erode journalistic standards, as some people have suspected, perhaps referring to the ever-increasing

phenomenon of gossip columns that already have gotten a boost from camera phone photography (see Dunleavy 2005). With the exception of Korea, mobile TV and mobile movies have had even less success than mobile multimedia, which is also a marginal phenomenon in the bigger picture of mobile telephony, at least if compared to the huge success of text messaging. Mobile mass media function as any mass media. They give people means to follow edited media stream wherever they happen to be, splitting the audience into individuals.

What about how mobile multimedia relate to Gergen's more hopeful vision of the proactive Mittelbau? A precedent comes from text messaging, which may have significant consequences in society. In the Philippines, President Joseph Estrada reputedly fell victim to SMS in 2001. Although Pertierra and colleagues (2002, pp. 101–124) have shown that other media was as important in mobilizing the demonstrations, with the president's and church opponents inviting people to demonstrations in church services, TV, and radio, mobile phones no doubt played their part in this process. There is no evidence of camera phones being used in organizing such activities, but there is no reason to think why they could not be used in this function either. I suspect that moblogs appear to be meaningful for small groups primarily. They function much like traditional photo albums that reserve memories, make the past reviewable, and make it possible to share significant moments in life with one's family and friends. Interest in such albums seldom goes beyond family members and friends, who know the background stories needed for understanding them.

This chapter places mobile multimedia in society by exploring its Apparatgeist. If I read the literature right, mobile multimedia phones primarily contribute to the grouping of society into small, monadic clusters rather than giving new means for organizing the proactive Mittelbau. These monadic clusters create microcultures around people, things, and events they face in immediate life. Civic affairs become little more than matters of passing commentary. Still, it is important to remember that most studies have focused on groups of friends. No studies of multimedia in the hands of social activists have yet been conducted, and studies of transitional societies are also still yet to be done. It remains to be seen whether mobile multimedia can become a technology that changes the consciousness of its users toward society and, following Katz and Aakhus's (2002) formulation, whether it alters minds and societies following the lead of text messages and mobile phones—or whether it just reinforces our existing habits and institutions. If we believe voices from the mobile industries and mass media, multimedia will change the way in which we experience our world and interact with it. After reviewing the Apparatgeist of mobile multimedia, I would like to argue to the contrary. People will surprise the mobile industries once again by defining mobile multimedia as yet another ordinary technology that is good primarily for personal and social activities.

References

Battarbee, K., and I. Koskinen. 2004. Co-experience—user experience as interaction. *CoDesign Journal* 1: 5–18.

BBC. 2005. Major UK mobile TV trial starts. http://news.bbc.co.uk/1/hi/technology/4271474.stm.

Boyd Davis, S. 2002. Interacting with pictures: Film, narrative and personalization. *Digital Creativity* 13: 71–82.

Chalfen, R. 1987. *Snapshot versions of life*. Bowling Green, Ohio: Bowling Green State University Press.

Dewdney, A., and M. Lister. 1988. *Youth, culture, and photography*. London: Macmillan.

Dunleavy, D. 2005. Camera phones prevail: Citizen shutterbugs and the London bombings. www.digitaljournalist.org/issue0507/dunleavy.html.

Döring, N., and A. Gundolf. 2005. Your life in snapshots: Mobile weblogs (mblogs). In *Thumb Culture: The Meaning of Mobile Phones for Society*, edited by P. Glotz, S. Bertschi, and C. Locke. Bielefeld: transcript Verlag.

Ito, M. 2004. A new set of social rules for a newly wireless society. *Japan Media Review*. Annenberg School for Communication, USC. http://www.japanmediareview.com/japan/wireless/1043770650.php.

Ito, M. 2005. Intimate visual co-presence. Presented at the Workshop Pervasive Image Capture and Sharing: New Social Practices and Implications for Technology at Ubicomp'05, Tokyo. http://ubicomp.org/ubicomp2005.

Kasesniemi, E.-L., A. Ahoren, T. Kymäläinen, and T. Virtanen. 2003. *Elävän mobiilikuvan ensi tallenteet. Käyttäjien kokemuksia videoviestinnästä*. Espoo: VTT Tiedotteita 2204. [*Moving Pictures. User Experiences about Video Messaging*, in Finnish].

Kato, F., and A. Shimizu. 2005. *Moblogging as face-work*. Presented at the Workshop Pervasive Image Capture and Sharing: New Social Practices and Implications for Technology at Ubicomp'05, Tokyo. http://ubicomp.org/ubicomp2005.

Katz, J. E., and M. Aakhus. 2002. Introduction. In *Perpetual Contact: Mobile Communication, Private Talk, Public Performance*, edited by J. E. Katz and M. Aakhus. Cambridge: Cambridge University Press.

Kindberg, T., M. Spasojevic, R. Fleck, and A. Sellen. 2004. How and why people use camera phones. http://www.hpl.hp.com/techreports/2004/HPL-2004-216.html.

Koskinen, I. 2005. Sound in mobile multimedia. Proceedings of Designing Pleasurable Products and Interfaces DPPI 2005, Eindhoven, the Netherlands.

Koskinen, I. 2007a. *Mobile Media in Action*. New Brunswick, NJ: Transaction Publishers.

Koskinen, I. 2007b. Managing banality in mobile multimedia. In *Place, Identity, and Media*, edited by R. Pertierra. Manila: University of the Philippines.

Koskinen, I., E. Kurvinen, and T. K. Lehtonen. 2002. *Mobile Image*. Helsinki: IT Press.

Kurvinen, E. 2002. Emotions in action: A case in mobile visual communication. Proceedings of the 3rd International Design and Emotion Conference, Loughborough, England.

Kurvinen, E. 2003. Only when Miss Universe snatches me. Teasing in MMS messaging. Proceeding of Designing Pleasurable Products and Interfaces, Pittsburgh, Pa.

Ling, R., and T. Julsrud. 2005. The development of grounded genres in multimedia messaging systems (MMS) among mobile professionals. In *A sense of place*, edited by K. Nyíri. Vienna: Passagen-Verlag.

Margolis, J. 2005. *MOB_LOG: Scenes from My Mobile*. London: Artnik Books.

Matsuda, M. 2005. Mobile communication and selective sociality. In *Personal, Portable, Pedestrian*, edited by M. Ito, D. Okabe, and M. Matsuda. Cambridge, Mass.: The MIT Press.

Matsunaga, M. 2000. *i-mode. The birth of i-mode*. Singapore: Chuang Yi Publishers.

Metso, A., M. Isomursu, P. Isomursu, and L. Tasajarvi. 2004. *Classification of mobile micromovies*. Proceedings of the 2004 IEEE International Conference on Multimedia and Expo, ICME 2004, Taipei, Taiwan.

Natsuno, T. 2003. *i-mode strategy*. Chichester: John Wiley & Sons.

Noguchi, Y. 2005. Camera phones lend immediacy to images of disaster. The *Washington Post*, July 8, p. A16. www.washingtonpost.com/wp-dyn/content/article/2005/07/07/AR2005070701522 .html.

Ok, H. R. 2005. Cinema in your hand, cinema on the street: The aesthetics of convergence in Korean Mobile (phone) Cinema. Proceedings of Seeing, Understanding. Learning in the Mobile Age. Communications in the 21st Century: The Mobile Information Society, Budapest, Hungary.

Okabe, D., and M. Ito. 2004. Camera phones changing the definition of picture-worthy. *Japan Media Review*. Annenberg School for Communication, USC. www.ojr.org/japan/wireless/1062208524 .php.

Okada, T. 2005. Youth culture and the shaping of Japanese mobile media: Personalization and the *Keitai* Internet as multimedia. In *Personal, Portable, Pedestrian*, edited by M. Ito, D. Okabe, and M. Matsuda. Cambridge, Mass.: The MIT Press.

Pertierra, R. 2007. The transformative capacities of technology: Computer mediated interactive communications in the Philippines—promises of the present future. In *Social Construction and Usages of Communications Technologies: Asian and European Experiences*, edited by R. Pertierra. Manila: University of Philippines Press.

Pertierra, R., E. F. Ugarte, A. Pingol, J. Herrandez, and N. L. Dacanay. 2002. *Txt-ing Selves. Cellphones and Philippine Modernity*. Manila: De La Salle University Press.

Rheingold, H. 2003a. *Smart Mobs: The Next Social Revolution*. Cambridge, Mass.: Perseus.

Rheingold, H. 2003b. Moblogs seen as a crystal ball for a new era in online journalism. *Online Journalism Review*. www.ojr.org/ojr/technology/1057780670.php.

Rivière, C. 2005. Seeing and writing on a mobile phone: New forms of sociability in interpersonal communications. Proceedings of Seeing, Understanding, Learning in the Mobile Age. Communications in the 21st Century: The Mobile Information Society, Budapest, Hungary.

Scifo, B. 2005. The domestication of the camera phone and MMS communications. The experience of young Italians. In *A sense of place*, edited by K. Nyíri. Vienna: Passagen-Verlag.

Simmel, G. 1949. The sociology of sociability. *American Journal of Sociology* 55: 254–261. E. C. Hughes, trans. (Original essay published in German in 1917.)

Snoody, R. 2005. How mobiles changed the face of news. *BBC Review of 2005*. http://news.bbc .co.uk/nolavconsole/ukfs_news/hi/newsid_4550000/nb_rm_4553802.stm.

Södergård, C., ed. 2003. *Mobile television. Technology and user experiences*. Espoo, Finland: VTT Publications 506. www.vtt.fi.