

Karen Johnson Freeze, 22 October 1945-19 March 2009 a tribute

Citation for published version (APA):

Oldenziel, R., & Schot, J. (2012). Karen Johnson Freeze, 22 October 1945-19 March 2009 a tribute. Technology and Culture, 53(2), 435-441. https://doi.org/10.1353/tech.2012.0079

DOI: 10.1353/tech.2012.0079

Document status and date:

Published: 01/01/2012

Document Version:

Publisher's PDF, also known as Version of Record (includes final page, issue and volume numbers)

Please check the document version of this publication:

• A submitted manuscript is the version of the article upon submission and before peer-review. There can be important differences between the submitted version and the official published version of record. People interested in the research are advised to contact the author for the final version of the publication, or visit the DOI to the publisher's website.

• The final author version and the galley proof are versions of the publication after peer review.

• The final published version features the final layout of the paper including the volume, issue and page numbers.

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Karen Johnson Freeze, 22 October 1945– 19 March 2009

A Tribute

RUTH OLDENZIEL and JOHAN SCHOT

It was the American Karen Freeze (fig. 1) who wove the social fabric of our scholarly community in eastern, central, and southeastern Europe. Karen showed us that, despite received notions, this region has never been iso-lated from western Europe—even during the most divisive years of the cold war. She embodied the shared history of "eastern" and "western" Europe. Karen was the perfect person to help us include the eastern European experience—and scholars—in the Tensions of Europe Network. Her knowledge of eastern and western Europe came from both scholarship and experience. For extended periods, she lived and worked in Denmark, Germany, the Netherlands, the Czech Republic, and Russia. She was fluent in Czech and Danish, and well-versed in Russian and German. Karen's Ph.D. dissertation was entitled "The Young Progressives: The Czech Student Movement, 1887–1897" (Columbia University, 1974). Later, she taught modern eastern and central European studies and European women's history at Brandeis University and Harvard University.

The Czech Republic became a second home for Karen. In 1983, she met Pavel and Radka Světlíkovi, a Czech pastor and his wife, who became, like many others, part of her extended family. After the Velvet Revolution, the three collaborated on many projects. Together, they founded the Czech branch of the international charitable environmental organization A Rocha.

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TECHNOLOGY AND CULTURE



Portrait of Karen Freeze.

Karen had spent her childhood exploring the wilderness of the Pacific Northwest; she was a devoted conservationist. For ten years she co-directed the annual English language summer camps in rural southern and northeastern Bohemia. And while her postdoctoral professional life took her in new directions, she always maintained her strongly felt Czech connections.

In 1975 Karen began working at the Harvard-Danforth Center (now the Derek Bok Center) to help young undergraduate teachers improve their teaching skills. In 1980, she became a research associate for case development at the Harvard Graduate School of Business Administration, where she researched and wrote case studies on technology management. Her essay "From a Casewriter's Notebook" was reprinted for use in training new case writers.¹ In 1989 she became director of research for the Design Management Institute in Boston, where she wrote and supervised case studies and

1. Karen Freeze, "From a Casewriter's Notebook."

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articles on the role of design in product development in U.S. and European business.² She continued to enjoy case-study work throughout her life, as it allowed her to delve into the lives and creative work of people whose vision and projects compelled her. Her extensive interviews and in-depth biographical research led her, for example, to the fascinating life of Peter Goldmark, the inventor of—among other things—the long-playing record.³ Case-study work also satisfied her love of narrative, "thick description," and detail. After leaving the Design Institute, she taught history and management at the Technical University of Liberec (1995–97), Eastern Nazarene College, Quincy, Massachusetts (1997–98), the University of Washington (1998–2002), and Charles University in Prague (2005). In 2008, she completed a commissioned case study on Samsung Electronics's design strategy.⁴

Our collaboration with Karen began in 2003. At that point, the Tensions of Europe Network was thriving, but lacked critical eastern European representation, despite past efforts to include the region. We were thrilled when Karen agreed to take on the role of coordinator for central, eastern, and southeastern Europe. It was Karen who brought eastern European scholars into the network and, in doing so, introduced a fresh scholarly perspective. Always tactful, she educated us about our western-centric views. She helped to expand our collective view of European history of technology scholarship. She did this by literally turning our attention to exploring the long-neglected regions of eastern, central, and southeastern Europe.

Karen's diplomatic skills were instrumental in her new position; she helped build the very international community of scholars with whom we work today. In 2004, the year of the ten-country expansion of the European Union, Karen helped grow the network as well. As the chair of the program committee for the first Tensions of Europe conference, she brought together more than 150 delegates. Held in Budapest in March 2004, the conference became a memorable event where new contacts between East and West were forged. A year later, the Tensions of Europe Network was able to proudly—and truthfully—claim pan-European membership, which reviewers and funders rewarded.

2. For example, case studies on: Braun AG's KF 40 machine, on design choices and the development process of an innovative coffeemaker in a premier German firm; Polaroid Corporation camera design and development; the VT320 video text terminal; shavers; Crown Equipment Corporation (a lift-truck manufacturer); the design of an electric teakettle by Polymer Solutions; and the design of an innovative insulin-delivery device by Novo Nordisk. Although many of the case studies never appeared in academic journals, Karen did publish several articles, including "Through the Back Door: The Strategic Power of Case Studies in Design Management Research and Education" and "Bahco Tools: Product Design and Development at a Swedish Hand Tool Company."

3. Freeze, "Peter C. Goldmark: Engineer as Social Visionary."

4. Coauthored with Kyung-won Chung, the research was published in 2008 by the Design Management Institute under the title "Design Strategy at Samsung Electronics: Becoming a Top-Tier Company."

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Karen's community-building became the framework for a new generation of scholars. In the summer of 2005, the Foundation for the History of Technology issued a call for collaboration in the form of a joint program for Ph.D. students. While earlier efforts had failed, Karen's meticulous preparatory work ensured that this call was heard—and fully answered. Her work went beyond organization and diplomacy; Karen literally taught us to include that challenging phrase, "eastern, central, and southeastern Europe," in our vocabularies. The cold war had left us with the generic phrase "eastern Europe"; Karen broke through that cold war stereotype, leading us to a nuanced understanding of eastern Europe's richness, its diversity, its profundity.

In founding the joint Ph.D. program in the fall of 2005, we traveled with Karen and Jan Korsten from Prague (Czech Republic) via Plovdiv (Bulgaria) to Saint Petersburg (Russia) to explore new collaborations. Karen's bulky, outsized suitcases left an indelible impression on us; the unwieldy baggage was a jarring contrast to her elegance and inner grace. We tried to convince her to travel lighter, but she wouldn't hear of it. Her suitcases, after all, needed to sustain her during long stretches of time she spent away from home. But we also saw the weighty suitcases as symbolizing the extraordinary cultural knowledge she carried with her throughout her life. These efforts were institutionalized via a three-country Ph.D. program: at Eindhoven University of Technology in the Netherlands, at Charles University (with Lud'a Klusáková) in Prague, and at the University of Plovdiv in Bulgaria (with Dobrinka Parusheva and Ivan Tchalakov). Karen helped to extend the network—she identified young scholars, acted as an intermediary, and forged new alliances.

Karen's diplomatic and networking expertise also prompted interest in her long-neglected scholarship on the history of technology. During the last years of the cold war, she had been working on a case study of the openend spinning machine (named BD-200) developed in post-Stalinist Czechoslovakia. In 2007, she published "Innovation and Technology Transfer during the Cold War: The Case of the Open-End Spinning Machine from Communist Czechoslovakia" in this very publication, *Technology and Culture*.⁵ The article showed that the BD-200 had been a huge engineering and commercial success, generating hundreds of millions of dollars in hard currency through sales of machines and licenses to the West and Japan. The innovative machines were sold throughout the world after 1967. For decades, the Czech technology accounted for three-quarters of all open-end spinning machines worldwide. The machine had been developed in a rare, close collaboration between the Czech manufacturer and the United Kingdom's leading consumer of this technology; Karen was asked to explain the suc-

5. Freeze, "Innovation and Technology Transfer during the Cold War."

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cess of the joint project despite the context of Czechoslovakia's political isolation from the West (it was right after 1968!).

Karen's response is as multifaceted as it is enlightening. She points to the positive effects of centrally planned command economies under communism. This, she explains, led to vertical integration among researchers, engineers, designers, machine builders, and machine users in the textile industry. Centrally planned command economies also fostered a pricing system in which R&D costs were not calculated in the BD-200 market price. In the article, Karen also highlights the effective project management: creating interdisciplinary teams to work on parallel projects with overlapping problems. She draws on her deep knowledge of product development and management, acquired through years of experience. Finally, she shows that the iron curtain was, in fact, not made of metal at all; it was a loosely woven fabric that allowed people and machines to pass through, and users and producers to intermingle.

Karen developed a history that is exemplary, truly transnational, and shared, but simultaneously sensitive to local circumstances. Her answers are based on extensive research, including the use of archival sources, indepth interviews, and published as well as unpublished material. Her original manuscript for the article was far too long. The revision process was painful and difficult; she had so much to say! In the end, she freed herself to finish by planning a follow-up article on the later history of the BD-200. John M. Staudenmaier recalls that one of the great joys of editing that article was the deep kinship he and Karen cultivated while laboring toward an article-length finished manuscript. The result, John writes, is one of T&C's finest articles published from Detroit. Indeed, the article highlights the quality of Karen's scholarship. Her standards were particularly high. She admired people whose work she considered excellent, and she spurned sloppy research. In one of her footnotes (14), for example, she writes that an author's analysis "exhibits serious weaknesses: a faulty understanding of the spinning process; little knowledge of the history of the OE innovation itself; failure to consider political and socioeconomic circumstances in communist countries; and sloppy numerical data." This reveals what her own scholarship was all about: she valued a contextual approach combined with deep insights into the workings of a machine.

After studying textile technology, Karen explored theater technology, including stage design, production, and special effects. These studies interwove the many threads of her personal and professional life. Theater technology is a domain in which Czech scenographers and directors excelled. Later, Karen conducted research in the Netherlands, where she interviewed Jan Wolff, the legendary musician, planner, and director of Amsterdam's modern music center, the Muziekgebouw. It was the interplay of individual performance, technological innovations, and the building's acoustics that MEMORIAL

fascinated Karen. The research encompassed two other passions: her love of music and her fondness for historical research. We remember the sparkle in Karen's eyes when she shared the magical history of theater and music technology.⁶

Most of us are familiar with the tradition of the American scholar abroad—the scholar who, ironically, comes to know Europe even more intimately than her European counterparts. Karen was a part of this tradition: highly educated and sensitive to cultural differences, though extraordinarily modest. As a young American, she fell in love with the Czechs. She helped Europeans understand their history by subtly bridging the scholarly divisions that the cold war had created. Karen's work benefited those on both sides of the Atlantic. She helped people throughout Europe to overcome their differences, and she coaxed Americans to confront their geopolitical assumptions about the world. Perhaps the best testimony to her impact on both continents is the memorials held in her honor in the cities she loved so much: Seattle and Prague.

The Foundation for the History of Technology and the Society for the History of Technology created the Karen J. Freeze Fellowship Fund to encourage scholarly research and facilitate active participation of early career scholars in central, southeastern, and eastern Europe. When Karen learned of the fellowship—just before she died—she was very pleased. The initiative integrates everything she worked for throughout her career. The fellowship's sponsors are the very two organizations Karen cherished most: the Tensions of Europe Network and the Society for the History of Technology.

While fighting cancer in the final years of her life, Karen demonstrated her most memorable qualities: passion, kindness, and courage in times of adversity. True to her integrity, she continued to nurture her diverse circles of friends. She maintained her dignity; her beautiful mind and religious faith endured. It was moving to witness her faith in God throughout her illness. Her appreciation of the small things in life illuminated her devotion: she spoke with eloquence about a Christmas ornament, a piece of classical music, and the wonders of nature.

It was Karen's irreverent side that took us by surprise and rounded out her character. While exchanging views on the 2008 U.S. elections, for example, we touched on the improbable rise of Sarah Palin. Karen had this to say: "We had SO [*sic*] hoped that Palin would implode and hang herself, but she didn't. Nonetheless, her 'folksiness' and second-only-to-Bush use of the English language drove us nuts. I was a soccer mom too, at one point (if taking my kids to the games and watching them qualify), but that wouldn't qualify me for vice-president of the USA!"

6. Initial results were presented at several conferences, including, among others: "Technology and Opera: Raising the Bar without Destroying the Spirit in Contemporary Opera Production," "Czechoslovak Theater Technology under Communism: Ambassador to the West," and "Theater Technology under Communism: A Czechoslovak Export."

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Indeed, in addition to her tremendous intellect, generosity, and capacity for friendship, Karen was a devoted parent; she brought to bear all of her qualities in raising Chris and Katie Freeze. As musicians, Chris and Katie now live in the cultural world their mother studied and prized. Their musical talents and careers are their own accomplishment, and a tribute to Karen Freeze.

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We mourn the loss of a wonderful colleague, a dear friend, a devoted parent. Most of all, we will miss the international scholar who was in our midst too briefly. Her legacy of community-building and knowledge, cultural fluency and faith, will endure.

Bibliography

Freeze, Karen J. "From a Casewriter's Notebook." *Harvard Business School Bulletin*, June 1986, 54–63.

——. "Through the Back Door: The Strategic Power of Case Studies in Design Management Research and Education." *Design Management Journal* 3, no. 4 (1992): 26–34.

——. "Peter C. Goldmark: Engineer as Social Visionary." Invited paper, History of Telecommunications Conference, Institute of Electrical and Electronics Engineers (IEEE), Memorial University, Saint John's, Newfoundland, 25–27 July 2001.

-------. "Bahco Tools: Product Design and Development at a Swedish Hand Tool Company." *International Journal of New Product Development and Innovation Management* 3, no. 4 (2001/2002): 343–59.

——. "Technology and Opera: Raising the Bar without Destroying the Spirit in Contemporary Opera Production." Conference paper, ICO-HTEC Thirtieth Annual Symposium, Moscow, August 2003.

——. "Innovation and Technology Transfer during the Cold War: The Case of the Open-End Spinning Machine from Communist Czechoslo-vakia." *Technology and Culture* 48, no. 2 (2007): 249–85.

——. "Czechoslovak Theater Technology under Communism: Ambassador to the West." Paper presented at the Third Plenary Conference of the Tensions of Europe Network in Rotterdam, the Netherlands, 7–10 June 2007.

——. "Theater Technology under Communism: A Czechoslovak Export." Conference paper, ICOHTEC Thirty-fifth Annual Symposium, Victoria, British Columbia, 5–10 August 2008.

—, and Kyung-won Chung. "Design Strategy at Samsung Electronics: Becoming a Top-Tier Company." Case study, Design Management Institute, 2008.