

The Emergence of a New Cultural Infrastructure:

Lessons from Silicon Valley

Tom Borrup⁺ (USA)

Abstract

Formal organizational structures and patterns of production and distribution of culture typical in most major cities emerged with, and are patterned after, Industrial Age thinking and Eurocentric cultural forms. These modernist, hierarchical, centralized, mass-production-oriented models – that separate art producer from consumer – face unprecedented challenges. In this article I argue that urban cultural infrastructures, and the institutions and organizing principles that comprise them, are being undermined and replaced. Research into the cultural infrastructure of California's Silicon Valley finds more decentralized, non-hierarchical, participatory, and culturally-diverse patterns. These stand out in comparison with nine other U.S. cities. This contemporary cradle of innovation and its cultural infrastructure reflects similar forms of participant-generated self-expression, interaction, and self-organizing emerging from the region's corporate cubicles and start-up garages. I call for more research on how urban cultural infrastructures are likely to evolve and suggest that Silicon Valley, and its core city of San José, offer some indications.

Keywords: *Arts, Culture, Cultural Infrastructure, Globalization, Institutional Models, Participatory Culture*

⁺ Tom Borrup, Adjunct professor, Arts & Cultural Management, St. Mary's University Minnesota, 2929 Chicago Ave., Suite 911, MN. United States. voice: 1-612-871-1180, email: tom@communityandculture.com, website: www.communityandculture.com

We can now treat culture not as one big blanket, but as the superimposition of many interwoven threads, each of which is individually addressable and connects different groups of people simultaneously. . . . In short, we're seeing a shift from mass culture to massively parallel culture.

Chris Anderson, *The Long Tail: Why the Future Is Selling Less of More*

Introduction

Many have written on the social impact of new technologies, globalization, the shift to a knowledge-based or creative economy, and DIY or do-it-yourself culture. Theories have been advanced as to how such change will redefine work, the nature of cities, and the role of arts, culture, and education, especially with regard to economic growth and sustainability. However, there has been little discussion of how these changes affect the evolution of what we might call the cultural infrastructure; the networks of organizations, facilities, and practices of arts and culture that have evolved in both older and newer urban regions.

Richard Florida, best-selling author and creative economy guru, predicts in his latest book, *The Great Reset*, that radically new ways of living and working will emerge over the next two to three decades; changes that will exceed any of the major social and economic shifts experienced since the mid-1800s. What this portends for the cultural sector, as we know it, is a question worth examining.

In this article I put forward one view of the impact these new ways of living and working might have on the cultural sector. The picture stands in contrast to much of what we understand currently to be the formal cultural infrastructure in the United States. The organizations, structures, and patterns of participation we know today emerged with and were patterned after Industrial Age economic thinking along with a Eurocentric cultural focus. Corporate structures; hierarchical in form, centralized in their management, and monocultural (or monolithic) in their product and/or interpretation have reflected the norm. The realities of the emerging creative or knowledge economy, together with globalization and technologies such as the Internet and social media, have begun to suggest different models.

Some new patterns of organizing cultural activity began to reveal themselves during a review of Silicon Valley's cultural sector through research there in 2008 and 2009. In late 2008, I was asked by 1stACT Silicon Valley to conduct an in-depth inventory and analysis of the formal cultural infrastructure of the region and its core city, San José.¹ As Creative Community Builders, our team included Erik Takeshita, Heidi Wagner, Paul Anderton, and myself, working with Brendan Rawson of 1stACT. We developed an inventory and analyzed the region's formal cultural organizations, their focus, and their resources, as well as the role of municipalities and higher education in support of the local cultural infrastructure. We also examined these patterns in relation to nine other U.S. cities of comparable size, age, and economic base.² Completed by mid-2009, the study revealed the

larger patterns described here. These observations suggest a significant shift in how cultural infrastructures, and the organizations and networks that make them up, are likely to evolve.

Silicon Valley, a sprawling metropolitan region, grew exponentially during the past forty years. With a population of 1 million, San José, the valley's "capital city," is the eleventh-largest US city and is at the center of one of the world's wealthiest and most well-educated urban regions encompassing 2.5 million residents. These characteristics constitute a formula most arts professionals consider ripe for building renowned cultural institutions with dedicated, sophisticated, and charitable audiences. During these few decades, Silicon Valley produced innovative technologies, ways of doing business, and methods of communicating that have prompted serious study and rethinking by researchers and theorists from around the globe.

At the same time, professionals in the cultural arena have considered the region at best a laggard. It lacks the institutional structures, resources, and artist star power of other metropolitan areas its size. This is true despite decades of efforts by civic leaders, especially in San José, to build cultural institutions based on Industrial Age models and dominant Western-style modes of arts production and distribution. Time and again efforts there to establish large-scale symphonies, ballets, theaters, and museums have experienced major setbacks. Instead, the region has grown something else.

In this unusual environment, heralded for transforming business structures and practices on a global scale we found the cultural infrastructure far more decentralized, nonhierarchical, participatory, and culturally diverse than in typical US cities and metropolitan areas. One might even say the dominant cultural practices there reflect the increasingly common concept of user-generated content, associated with but not unique to the Internet. While we know that arts organizations and the cultural infrastructure in many US cities are feverishly trying to adjust or just survive, we're not so sure what they'll look like in ten or twenty years or what's coming up that may replace them. While Silicon Valley does not represent a Shangri-la for culture, I believe it offers some clues to what is emerging.

Silicon Valley: A Twenty-first Century Global Region

"The whole culture of the Valley is one of change," wrote AnnaLee Saxenian in *Regional Advantage*, her 1994 comparison of Silicon Valley's high-tech successes with the decline of Boston's high-tech corridor during the 1980s.³

It is helpful to think of a region's industrial system as having three dimensions: local institutions and culture, industrial structure, and corporate organization. . . . The institutions shape and are shaped by the local culture, the shared understandings and practices that unify a community and define everything from labor market behavior to

attitudes towards risk-taking. A region's culture is not static, but rather is continually reconstructed through social interaction.⁴

Saxenian's broad sense of a region's "cultural environment" with its shared understandings and practices is key to understanding Silicon Valley's particular cultural infrastructure. Without this framework, assumptions of what constitutes the cultural infrastructure could easily default to Industrial Age institutional models, notions of excellence, roles for professional artists, and facilities built around singular artistic disciplines.

In some ways Silicon Valley represents the future. Between 1950 and 2000, its population grew from less than 300,000 to 2.4 million. The region achieved a population mix unmatched by other US metropolitan regions and has some significant differences. While Silicon Valley's diversity is not unique in numbers, qualitatively it is composed of communities of color and large immigrant populations that are less disenfranchised politically and economically than similar demographic groups in most other urban regions. They are also dispersed throughout the metropolitan region rather than concentrated in a central city. The region's population is wealthier and more educated than most other regions in the United States.

San José, the "Capital of Silicon Valley," boasts of its position as the most diverse large city in California, the most diverse state in the United States.⁵ Its largest population groups of Hispanic, Asian, and white, each of which is richly diverse in itself enjoy relatively high rates of property and business ownership as well as leadership roles in government and civic institutions.

Of nine comparable communities studied, 2002 Census data on business ownership revealed that San José had the second-highest percentage of minority-owned business firms next to Miami, where more than half the firms are Hispanic-owned. Miami shows a more binary ownership pattern of white and Hispanic, while the city of San José shows a more widely mixed pattern of ownership consistent with its population.⁶

Although there are cities with greater ethnic and cultural diversity, no urban region is so consistently diverse. Santa Clara County, which makes up the bulk of the area known as Silicon Valley, has been noted as a place where over 50 percent of residents speak a language other than English at home and the range of languages is wide.⁷ It also has one of the highest household income levels in the United States along with one of the highest costs of living.

The region is internationally known for technological innovation and for having an open and supportive environment for new ideas and entrepreneurs. New arrivals from around the globe readily connect, organize, invest, and contribute to a vibrant economy and culture. According to Saxenian, in 2000, first-generation immigrants accounted for 53 percent (compared to 30 percent in 1990) of the

scientists and engineers working in Silicon Valley's technology industries, more than twice the proportion in other US technology regions.⁸

In the *Wealth of Networks* (2006), Yochai Benkler examined vast economic and social changes emerging from new technologies, ways of organizing business, and producing and distributing information and culture. Many of these innovations developed in Silicon Valley. Benkler cited "a new model of production emerging in the middle of the most advanced economies in the world."⁹ This, he claimed, represents,

... a shift that allows for an increasing role of nonmarket production in the information and cultural sector, organized in a radically more decentralized pattern than was true of this sector in the twentieth century. ... These new patterns of production — nonmarket and radically decentralized — will emerge, if permitted, at the core, rather than the periphery of the most advanced economies.

Benkler's description seems relevant both to the highly participatory and virtual cultural environments that younger generations now consider the norm and also to the diverse and widely dispersed voluntary cultural organizations we found sprouting across Silicon Valley. This global high-tech capital and prosperous economic environment enables the start-up of new cultural enterprises and fosters participant-generated self-expression by an unprecedented range of people.

Built around an ethos of technological invention, Silicon Valley has attracted and nurtured the talents of innovators and creative workers from around the world. It employs double the number of high-tech workers of any other major US metropolitan area; skilled in forms of manufacturing, information management, communication, and commerce that have revolutionized businesses, economies, and social organization around the globe.¹⁰

"Where does this innovative, entrepreneurial spark in places like Silicon Valley or Austin, Texas, or Seattle, Washington, come from?" asked Richard Florida during a visit to Silicon Valley in early 2010. "Places that are open-minded with regard to cultural trends, places that enable musicians to give it a go, to become entrepreneurial, to form these little start-up companies called bands, there is something special in their economic DNA that also enables them to attract entrepreneurially technology-oriented people," Florida answered.

Cultural Infrastructure

Infrastructure is something we depend on and assume will be there; from water and sewer lines, to roads, parks, schools, libraries, cultural institutions, and now the Internet and wireless communications. In older US cities, most infrastructure was designed and built during the Industrial Age that boomed in the late 1800s and early 1900s. Sunbelt cities, and other more recently blossoming metropolitan regions, have infrastructure constructed mostly since the 1960s.

In this article I define cultural infrastructure in a fairly conventional sense. It's composed of loose networks of practicing artists along with large, medium, and small nonprofit organizations and facilities designed to teach, present, and encourage various forms of cultural expression and group activities. These networks exist within urban-centered geographic regions and in parallel with charitable support systems that include public and private sources. These organizational and charitable networks also exist in parallel with an even wider variety of informal cultural activities that take place within educational, religious, civic, recreational, commercial, neighborhood, family, and social settings. Increasingly, networks of social and creative exchange also exist in virtual space through the Internet and social media platforms. These parallel networks interact to greater and lesser degrees and make up some of the interwoven threads described by Chris Anderson. I would even suggest that the notion of infrastructure itself reflects Industrial Age thinking. A more appropriate concept to encompass these complex networks might be "ecosystem."

A Study of the Cultural Infrastructure in Silicon Valley

Our 2009 report on Silicon Valley's cultural environment included findings and observations based on a detailed inventory of three components of the cultural ecosystem. These included nonprofit cultural organizations, municipal government support for cultural facilities and activities, and cultural facilities and programs sponsored by higher education and offered to the general public.

For comparative purposes, nine other cities were chosen for study that had characteristics relevant to San José and by extension to Silicon Valley. Cities were identified that shared one or more specific characteristics related to population size, recent growth, ethnic diversity, and the presence of technology industries. The cities were Austin, Denver, Miami, Minneapolis, Phoenix, Portland, San Diego, and Seattle. The study also included San Francisco because it is so nearby that it is, in fact, part of the Silicon Valley ecosystem. San Francisco must be viewed for its influence on San José and Silicon Valley and understood in relation to how it is distinct. The comparative study examined the numbers, expenditures, and primary activities of nonprofit cultural organizations.

It is worth noting that the "informal cultural sector," arts activities in primary and secondary public education, and Web-based forms of cultural production, participation, and distribution were not included in the study. The informal sector includes unincorporated, small for-profit, and informal organizations, as well as nonprofits whose primary mission is outside arts and culture but that have active arts programs. Research on Silicon Valley by others has argued that this sector represents an enormously important part of the cultural life of the region,¹¹ and we recognized that significant changes in patterns of cultural participation are affected by demographics and by Web-based activity.¹² While informal and Web-based activities were outside the scope of this examination, their impact was evident.

Our analysis found and examined in depth:

- 667 active nonprofit, tax-exempt organizations based in Silicon Valley that defined themselves primarily as providing programs in the arts, culture, and humanities;
- 15 municipal governments within Santa Clara County, all of which directly and indirectly provided support for cultural activities, organizations, and/or facilities; and
- 13 institutions of higher education that provided facilities and/or cultural programming for general public audiences in the region.

On the last two points, our research found a matrix of flexible facilities and culturally diverse programs built and operated by many of the region's municipalities and higher education institutions. During the past few decades both municipal governments and institutions of higher education built hundreds of millions of dollars worth of cultural facilities. These spaces and programs added considerably to an ecosystem supportive of smaller, diverse, and informal organizations and activities. They presented a diverse range of cultural programs and provided quality facilities to a mix of large, small, formal, and informal groups.

All of the fifteen municipalities in Santa Clara County provided financial resources, facilities, programs, and other direct and indirect support for arts and culture groups and activities within their jurisdictions. Higher education institutions, distributed across the region, also made substantial investments in facilities and programs that serve wide public audiences. Of thirteen higher education institutions surveyed, all present cultural programs available to public audiences, and ten maintain and operate facilities dedicated to cultural programming.

Something Different Is Stirring:

Silicon Valley's Infrastructure of Cultural Organizations

"We are living in the middle of a remarkable increase in our ability to share, to cooperate with one another, and to take collective action, all outside the framework of traditional institutions and organizations," wrote Clay Shirky. In his 2008 book, *Here Comes Everybody: The Power of Organizing without Organizations*, Shirky asserted that Internet and social media technologies present profound challenges to all kinds of organizations. Virtual organizations will push many conventional institutions and enterprises into obsolescence, he claims. "Many organizations we rely on today will not survive this change without significant alteration."

The cultural infrastructures that grew up during the Industrial Age in most large US cities generally included a handful of large, formal cultural institutions that represented stability; the preservation and reinforcement of a dominant culture and the idea of artistic excellence. Innovative arts activity and cultural diversity in those cities tended to emerge later as smaller, secondary activities. Silicon Valley's

ecosystem and cultural organizations represent a tectonic shift. The milieu here instead produced an adaptable do-it-yourself platform for culture, one in which diversity and informal organizational structures are central to cultural vitality rather than on the edges.

Research in Silicon Valley revealed an eclectic ecosystem made up of a multitude of geographically dispersed younger and smaller nonprofit entities along with clusters of somewhat larger organizations located primarily, but not exclusively, in population centers of San José, Palo Alto, and Mountain View; most of which were housed in publicly owned or financed facilities. This multitude of entities reflected cultural interests and activities relevant to Silicon Valley's diverse, well-educated population as well as to changing patterns in cultural participation. Made up of many smaller and heavily volunteer-driven entities (as well as an uncountable number of informal, unincorporated activities), Silicon Valley's cultural platform is animated by what could be described as user-generated content.

Silicon Valley cultural organizations are young. Findings revealed an arts sector in which 70 percent of all the cultural nonprofits were less than twenty years old. Since 1990 the rate at which new organizations were formed, especially those identifying themselves as having a culturally specific focus, increased threefold. Further, of the nearly two hundred organizations that were created with the stated purpose to address nonwhite, culturally specific art forms or audiences, 48 percent were founded since 2000 and nearly 80 percent since 1990.

None of Silicon Valley's larger cultural institutions could be considered large by national standards and many are housed in municipally owned facilities. Comparable cities are home to a multitude of institutions that are far larger, often own their buildings, and are less oriented to diverse populations. Real estate, endowments, collections, union contracts, producing companies, repertoires, and other stabilizing factors tend to keep these institutions anchored in specific cultural forms and traditions. Silicon Valley's arts organizations lacked these traits, were younger, smaller, more diverse, and presumably more adaptable. The largest nonprofit cultural organization in Silicon Valley and the only one exceeding \$10 million in 2008 declared bankruptcy later that year. Two of the remaining top ten in expenditure size underwent mergers or major reorganizations since 2008. One, the India Community Center, labeled itself a cultural organization and is directly modeled after Jewish Community Centers, offering a wide range of social, educational, cultural, and recreational programs.

To use annual expenditures as an indicator of size, 67 percent of Silicon Valley cultural nonprofits reported total annual expenses of less than \$50,000 in 2008. This was the highest percentage among the nine cities examined. The collective expenditures of all Silicon Valley cultural organizations on a per capita basis were equal to less than one-tenth the per capita expenditures in Minneapolis or San Francisco, two cities widely considered to have robust cultural communities. This could reflect an impoverished cultural sector or could be considered cost-effective delivery of cultural programs.

When examined in terms of how they categorize themselves, Silicon Valley and San José organizations exhibited another distinct difference from the other nine cities in our study. In Silicon Valley, 15.9 percent of the groups considered themselves “cultural/ethnic awareness” organizations;¹³ San José alone has a slightly higher percentage of 16.5 percent. The nearest comparable community was San Diego with 11.9 percent, while Denver, with 3.1 percent, was the lowest.

Likewise, organizations that classified themselves as “other, art, cultural and humanities” organizations represented a larger category in both San José and Silicon Valley, as did organizations that chose to label themselves “cultural organizations/multipurpose.” By far, more organizations in Silicon Valley considered themselves outside singular discipline-based categories, such as theater, dance, or opera, than in other cities studied. This suggests that a diversity of cultural practices and nontraditional organizational models were common as opposed to anomalous. Whether Mexican, Vietnamese, or Indian, most of the nonwhite culturally specific groups were not exclusive in their makeup. Boards, staffs, volunteers, and participants included a mix of racial and ethnic groups.

Groups stressing one or more Asian cultures represented 21 percent of the area’s formally organized nonprofits, while Hispanic groups represented only 3 percent. This was proportionate to the Asian American population but widely disproportionate to the Hispanic population. Differing rates of 501(c)(3) incorporation among ethnic groups probably reflect different ways of relating to legal structures, patterns of support, and ways of participating in cultural activity.

The region further distinguished itself through its widespread geographic dispersion of nonprofit arts organizations. Interestingly, nonprofit groups were found in the Valley outside the primary population center of San José at a higher ratio relative to the population than in the city. San José, where 41 percent of the population resides, is home to only 35 percent of the nonprofits. While larger organizations tended to cluster in the downtowns of San José, Palo Alto, and Mountain View, organizations otherwise fanned out in a pattern consistent with general population distribution and along major transportation corridors.

In San José, the ratio of cultural nonprofits per resident was one for every 5,340 residents. In Silicon Valley outside the city, the ratio was approximately one for every 3,575 residents. It came as a surprise to learn that the “suburban” areas have a greater density of cultural organizations than did the urban center, though organizations in San José tended to be larger when measured by annual expenditures. Comparable cities showed a variety of ratios ranging from one nonprofit for every 1,257 residents in Miami, to one nonprofit for every 8,973 people in Phoenix.

Compared to the other cities in our study, Silicon Valley’s cultural organizations in general were more evenly distributed across cultural groups and geography, and addressed a more eclectic range of interests. The relatively recent growth of the

city and its cultural sector was certainly a factor in relation to both its size and eclecticism. However, cities with similar growth patterns, such as Phoenix, Miami, and Austin, did not demonstrate such an eclectic and evenly dispersed pattern.

Comparing Industrial Age and Creative Era Cultural Infrastructures

Our research on Silicon Valley showed us a city and region with a cultural infrastructure unlike other US cities and their metropolitan areas. As a less-hierarchical ecosystem, it can be characterized as a diverse, fast-growing, decentralized network of production and participation in which adaptability, change, and user-generated content are central. Cultural activity there took place primarily outside large-scale nonprofit structures. The majority of organizations also operated outside the larger urban centers, and many activities were found in outdoor spaces and outside the nonprofit sector.

During the late twentieth century, as Silicon Valley became one of the world's most dynamic economic regions, unprecedented global innovations in technology and ways of doing business were unleashed. As a newly emerging major metropolitan area with one of the most diverse populations of any region, Silicon Valley's evolving cultural infrastructure mirrored the region's overall style of growth, population diversity, entrepreneurial behavior, and position as one of the first truly global metropolitan regions. Our research found many similar patterns of development in the forging of a cultural infrastructure. Composed of people from around the world, the fast-growing population that became part of and was responsible for the region's economic success also started up a wide variety of cultural organizations to address their widely varied interests. Equally fast-growing municipal government and higher education sectors responded to community needs and created key elements of the physical and programmatic infrastructure that provide opportunities for the region's cultures to find a home, make their appearance in the public realm, and take root.

Characteristics found among the organizations and across the infrastructure network reflected traits such as innovation, diversity, networking, collaboration, and openness to learning. This ecosystem fostered the rapid start-up of new organizations, fusion of forms, new ideas, and adaptability. It required culturally diverse leadership and risk-taking capital in tune with its strengths, needs, and flexible spaces at a micro level, unlike conventional arts philanthropy.

The accompanying chart displays characteristics of a "creative era" cultural infrastructure as identified through our research in Silicon Valley. These are arrayed in comparison with primary traits of its Industrial Age counterpart.

Conclusion

AnnaLee Saxenian observed that as recently as the 1980s, large mass-production corporations represented the optimal ways to organize production and the ideal of modern economic progress, "while entrepreneurs and small firms were seen as archaic and destined to disappear." This thinking, she goes on to conclude,

was proved very wrong. There is no reason to believe that the cultural sector is immune to the economic and organizational changes in what many economists call the “Post-Fordist Era,” that is, after the Henry Ford legacy of mass production and division of labor.

Historic patterns of population and economic growth, industrial base, and immigration trends can both have an impact on and reveal a great deal about a region’s cultural infrastructure. Some suggest that the culture of a place shapes its business climate.¹⁴ Others suggest the reverse. Certainly they have a dynamic give-and-take relationship.

The cultural infrastructure or ecosystem of Silicon Valley and San José evolved within an environment unique to most US cities and their metropolitan areas. The region grew rapidly to have a population of 2.4 million, thirty to forty miles from San Francisco. It emerged responsive to a population characterized by diversity, recent arrivals, geographic sprawl, and an orientation toward innovation and technological tools that enable instantaneous global exchanges. While the population is highly educated and wealthy in comparison to US averages, Silicon Valley residents, leaders, and philanthropists have not built and supported their own major cultural institutions. Instead, residents were more inclined to self-organize in smaller, less formal organizations more specific to the cultural or creative interests of individuals and ethnic subgroups. Public and higher education sectors have led in significant ways to provide space, resources, and accessible programs that serve a variety of ethnic and income groups within the region’s municipalities.

Do these trends and characteristics create a more fragmented community when compared to San Francisco, Minneapolis, or Seattle? Or does this unique evolution produce cultural resources more closely connected to people’s lives and individual interests — and at lower cost? Does it enable and empower people to engage in cultural practices more directly and thus foster a more creative populace? Or does this distance people from exposure to the great work of art throughout history as well as from their cultural roots? Is this what Chris Anderson’s “massively parallel culture” looks like? If so, does it represent social progress or disintegration?

We can only hypothesize about the answers to such questions. What is clear is that new forms and patterns of organizations are emerging and likely to become increasingly prevalent as new demographics, patterns of social participation, and technologies continue to take hold. As this article suggests, cultural infrastructures will develop differently in different places and at different times. Thus Silicon Valley’s unique patterns are not likely to be replicated elsewhere. However, to the degree that Industrial Age models evolve and/or get left behind, they will be replaced by new forms of organization, production, and distribution. The creative or knowledge-based economy brings with it many new forms, ideas, and responses that are as relevant to the cultural sector as they are to other sectors.

Acknowledgements

Thanks to Brendan Rawson, Paul Anderton, Heidi Wagner, Erik Takeshita, and Anne Focke for their contributions to this research project and article.

Endnotes

1. Silicon Valley is defined in accordance with a 2005 Joint Venture Silicon Valley designation including all of Santa Clara County and select zip codes of adjacent communities in Alameda, San Mateo, and Santa Cruz counties.
2. The entire report can be downloaded from communityandculture.com/?p=15: "There's No Place Like Silicon Valley: An Emerging Cultural Ecosystem for the 21st Century," a report on the cultural infrastructure of California's Silicon Valley by Creative Community Builders for 1stAct Silicon Valley.
3. AnnaLee Saxenian, *Regional Advantage: Culture and Competition in Silicon Valley and Route 128* (Cambridge, MA: Harvard University Press, 1994), x.
4. Saxenian, *Regional Advantage*, 7.
5. Kim Welsh, "Arts and City Success: Remembering Leonardo," *Citiwire.net*, December 21, 2008.
6. U.S. Census Bureau: State and County QuickFacts. Data derived from Population Estimates, 2000 Census of Population and Housing, 1990 Census of Population and Housing, Small Area Income and Poverty Estimates, County Business Patterns, 2002 Economic Census, Minority- and Women-Owned Business, Building Permits, Consolidated Federal Funds Report, Census of Governments.
7. Mike Swift, "Census: Majority of Santa Clara County Families Speak Foreign Language at Home," *San Jose Mercury News*, September 22, 2008.
8. AnnaLee Saxenian, *The New Argonauts: Regional Advantage in a Global Economy* (Cambridge, MA: Harvard University Press, 2006), 53.
9. Yochai Benkler, *The Wealth of Networks: How Social Production Transforms Markets and Freedom* (New Haven, CT: Yale University Press, 2006).
10. Ann Markusen, "San Jose Should Become an Incubator for the Arts," *Mercury News*, September 11, 2008.
11. Pia Moriarty, *Immigrant Participatory Arts: An Insight into Community-Building in Silicon Valley* (San José, CA: Cultural Initiatives Silicon Valley, 2004), and Maribel Alvarez, *There's Nothing Informal about It: Participatory Arts within the Cultural Ecology of Silicon Valley* (San José, CA: Cultural Initiatives Silicon Valley, 2005).

12. See Stephen Tepper and Bill Ivey, eds., *Engaging Art: The Next Great Transformation of America's Cultural Life* (New York: Routledge, 2007), and Alan S. Brown and Jennifer L. Novak, *Cultural Engagement in California's Inland Regions* (San Francisco: The James Irvine Foundation, 2008).

13. Cultural/Ethnic Awareness is a category established by the National Taxonomy for Exempt Entities, along with Museum, Music, Theater, Visual Arts, and others. Organizations filing a nonprofit tax return choose one of these categories to identify themselves.

14. Alvarez, *There's Nothing Informal about It*; Tom Borrup, "Up from the Roots: Re-examining the Flow of Economic and Creative Capital," *Grantmakers in the Arts Reader* 17.2 (Summer 2006).

References

Maribel Alvarez, *There's Nothing Informal about It: Participatory Arts within the Cultural Ecology of Silicon Valley* (San José, CA: Cultural Initiatives Silicon Valley, 2005).

Chris Anderson, *The Long Tail: Why the Future Is Selling Less of More* (New York: Hyperion, 2006).

Tom Borrup, "Up from the Roots: Re-examining the Flow of Economic and Creative Capital," *Grantmakers in the Arts Reader* 17.2 (2006).

Alan S. Brown and Jennifer L. Novak, *Cultural Engagement in California's Inland Regions* (San Francisco: The James Irvine Foundation, 2008).

Yochai Benkler, *The Wealth of Networks: How Social Production Transforms Markets and Freedom* (New Haven, CT: Yale University Press, 2006).

Richard Florida, *The Great Reset: How new ways of living and working drive post-crash prosperity* (New York: Harper Collins, 2010).

Ann Markusen, "San Jose Should Become an Incubator for the Arts," *Mercury News*, September 11, 2008.

Pia Moriarty, *Immigrant Participatory Arts: An Insight into Community-Building in Silicon Valley* (San José, CA: Cultural Initiatives Silicon Valley, 2004).

AnnaLee Saxenian, *Regional Advantage: Culture and Competition in Silicon Valley and Route 128* (Cambridge, MA: Harvard University Press, 1994).

Clay Shirky, *Here Comes Everybody: The Power of Organizing without Organizations* (New York: Penguin, 2008).

Mike Swift, "Census: Majority of Santa Clara County Families Speak Foreign Language at Home," San Jose Mercury News, September 22, 2008.

Stephen Tepper and Bill Ivey, eds., *Engaging Art: The Next Great Transformation of America's Cultural Life* (New York: Routledge, 2007)

Kim Welsh, "Arts and City Success: Remembering Leonardo," Citiwire.net, December 21, 2008.