

Back to the future in film: Combining industry and self-knowledge to meet the career challenges of the 21st century

Candace Jones and Robert J. DeFillippi

Executive Overview

Career patterns are changing. As fewer people attach their long-term fortunes to the fates of a single organization, more and more people follow a free agent route. The free agent scrambles, bee-like, from opportunity to opportunity without regard to boundaries. While this career scramble is new to most industries, it has been common to the American film industry for a quarter century. In this article, we look back at successful careers in the film industry to gain insight into the challenges facing free agents in the 21st century.

I keep six honest serving-men
 (They taught me all I knew);
Their names are What and Why and When
 And How and Where and Who.
—Rudyard Kipling, *The Just So Stories* (1902)

Kipling's honest serving men identify the knowledge needed for career success in the 21st century. The career system of the 21st century is most likely to be boundaryless because of downsizing, restructuring, and subcontracting.¹ Boundaryless careers unfold as people move among firms for projects, develop market niches rooted in competencies and strategies, and create opportunities based on prior performance and networks of professional contacts. In contrast, in a bounded or employer defined career, loyalty, skills, and value are attached to the firm.

By answering Kipling's six honest serving men, we can compare bounded with boundaryless careers and create a topological map of important dimensions of the boundaryless career system. We can also chronicle the interplay between industry knowledge and self-knowledge through which boundaryless careers unfold. Industry knowledge is principally concerned with *knowing what* type of career system (culture, rules of game) one is entering; *knowing where* to gain entrance, training, and advancement; and *knowing when* to stay or leave an employment situation. Self-knowledge is concerned with complementary themes of *knowing why* one is pursuing a particular career, *knowing with whom* to initiate contact and relationships, and *knowing how* to perform the tasks and roles needed for capturing opportunities. We extend previous work on self-knowledge based career competencies developed by DeFillippi and Arthur.² Insights into these six competencies for a boundaryless career are derived from

a study of the film industry, characterized by scholars as an exemplar of the boundaryless network organization or network community.³

In past careers bounded by the firm, knowing what meant understanding the firm—its specific practices, jobs, roles, and culture. In the boundaryless career, knowing what shifts knowledge from firm to industry—what levels of uncertainty and competitiveness prevail, what opportunities and threats exist.

The seemingly endless waves of downsizings, restructuring and subcontracting make our discussion, while based upon the film industry, applicable to a growing number of industries and occupations in transition from bounded, employer-specific to boundaryless, project-based career systems. Industries likely to resemble film include advertising, architectural design, biotechnology, computer software, consulting, fashion, law, medicine, public accounting and public relations. These industries rely on project-based organizing, individual performance, and collaboration among highly skilled professionals. We identify the career competencies required for success in boundaryless career systems and examine the strategies and challenges of the boundaryless career in the 21st century.

Six Career Competencies in a Network Community

Boundaryless careers in the film industry show what career challenges arise and how successful careerists develop two broad, complementary areas of knowledge—about industry and self. Table 1 summarizes our ensuing discussion about the competencies, challenges, strategies, and implications of navigating a boundaryless career.

Knowing What

Knowing what involves understanding the industry's opportunities, threats and requirements for career success. In past careers bounded by the firm, *knowing what* meant understanding the firm—its specific practices, jobs, roles, and culture. In the boundaryless career, *knowing what* shifts knowledge from firm to industry—what levels of uncertainty and competitiveness prevail, what opportunities and threats exist. Although *knowing what* is industry and context specific, it involves generic skills such as the ability to discern what criteria are critical to success, and the talent to navigate through the rules of the game defined by industry values, norms, and beliefs.⁴ Thus, *knowing what* involves figuring out what the rules of the game are in order to achieve one's career goals.

Industries with boundaryless careers are characterized by high degrees of uncertainty because of new technologies, globalizing markets, and rapid shifts in consumer preferences.⁵ The film industry has been characterized by high uncertainty since the 1970s; films are expensive to make and their market return is uncertain. In 1974 the average cost of a movie was \$3 million, in 1978 \$6 million, in 1980 \$10 million, and by 1985 it had zoomed to \$16 million.⁶ Major feature films by Disney studios in 1995 cost an average of \$35 million.⁷ The high costs would not be problematic if one could guarantee a rate of return; however, as director Sidney Pollack explains, "When pictures hit, they hit for higher revenues than ever before. There are many huge hits and many terrible flops, but very few moderately successful pictures." This uncertainty poses challenges to those in boundaryless careers and influences what career opportunities are

Challenges

The first influence of uncertainty on boundaryless careers is that those who reduce uncertainty gain a disproportionate share of the opportunities and resources. In a longitudinal study of film producers and directors from 1965 to 1980, only seven percent of producers accounted for 33 percent of feature films produced and seven percent of directors accounted for 40 percent of feature

Table 1
Competencies, Challenges, Strategies, and Implications for Boundaryless Careers

Competencies	Challenges	Strategies	Implications
Knowing What: industry opportunities, threats, and requirements.	Deal with Uncertainty * Remain "employed" * Adapt to bouts of activity & inactivity * Produce quality work quickly	Move Career Across & Up * Learn industry and enhance exposure * Use projects & roles to build reputation	* Inter-industry mobility constrained by professional networks
Knowing Why: meaning, motives, and values.	Manage Career Demands * Keep passion without burning out * Balance career and family	Know Your Values & Goals: * Commit to your craft * Pursue your passion	* Suited best for those whose primary value is the career
Knowing Where: entering, training and advancing.	Create a Career Path * Train and enter the industry * Remain in the industry * Enhance future opportunities	Gain Credibility * Get on-the-job experience * Win industry competitions * Maintain "face-time" in core	* Be responsible for training, entry & advancement * Expect limited support from industry or profession
Knowing Whom: relationships based on social capital and attraction.	Master Relationships * Be strategic and genuine in relationships * Become more than a resume of credits & credentials	Manage Social Capital * Offset instrumentality w/friendships * Use portfolios to showcase skills	* Reassess whether to quit or continue relationships * Know talent pool to assess skills
Knowing When: timing of roles, activities, and choices.	Develop Career Timing * Don't be trapped in role or status * Extend or exploit skills * Move quickly for opportunities	Reframe Perceptions * Break others frame of reference * Control pacing and choice of projects * Make your own breaks	* Synchronize projects and passion if possible * Maintain passion in dry spells
Knowing How: technical and collaborative skills.	Enhance Collaboration	Expand Communication Skills * Become cross-functional * Develop & articulate vision * Communicate with tangible products	* Evade commodity status by creating idiosyncratic value in one's skills and roles

films produced.⁸ Careers rise and fall with market success of films. A common saying among our interviewees is that "you're only as good as your last credit." A film that bombs at the box office may mean "you're out for a while," explains one subcontractor. Thus, career opportunities and financial rewards accrue to film industry superstars who consistently produce hits. The salaries of top box office movie stars can be more than \$10 million per film; yet in 1990, 90 percent of Screen Actor Guild members received less than \$5,000 in compensation.⁹ A major career challenge is keeping employed and reducing income variability. A related challenge is managing the shift between periods of frenetic activity and involuntary unemployment.

The second influence of uncertainty on careers is intense time pressure during employment periods. Since the studio is paying interest on the film during production and post-production, reducing time reduces costs. Gordon Stulberg, who was CEO of Polygram and COO of Twentieth Century Fox, explains that "The longer we held onto the picture while it was being edited, the longer we had to pay interest. The sooner we got the film into release, the sooner we

returned our investment." These time pressures require subcontractors to work faster than when they were employees. Edith Head, who as a costume designer worked under both career systems, notes that "On a Cecil B. DeMille picture, such as *The Ten Commandments*, we had fifteen months to three years to prepare. . . . On a Hitchcock film (during the '70's) . . . we have from two to eight weeks to prepare . . . Today we are trained to work faster." Like many jobs, the pace of work has accelerated due to efficiency demands.

Michael Eisner's career is instructive. He started as an usher at NBC, moved to inserting commercials into the correct time slots for weekly TV shows at CBS, was hired by Barry Diller at ABC, a fledging network, to do Saturday morning children's programming, moved on to oversee prime time scheduling within ABC, joined Diller (who had left ABC two years before Eisner) at Paramount as a production executive, and finally landed the job as CEO of Disney.

The third influence of uncertainty on careers is that it increases the importance of reputations. In the film industry, one's reputation is defined by several attributes: commercial success of films, ability to contain costs, technical/artistic skills, and interpersonal skills. As Sidney Pollack explains, "A director does not want to have a reputation for being wasteful because that is harmful to a career." Thus, his strategy for picking a crew is to "research the background of a tentative crew member religiously." A director not only assesses the crews' creative and technical abilities, but also asks "What pictures have they done? How fast are they? Do they get on well with other crew members?" Paul Maslansky, a line producer, explains the importance of reputations in this way: "It's an incestuous business, and the crewmen who are hired have reputations to uphold . . . After all, other productions will follow this one, and other line producers will do hiring based on the crew's previous reputation." This emphasis on reputation is still prevalent in the 1990s. An experienced production manager notes "It all works as a network. Everyone knows everyone. If you don't know them, you normally know about them. If you don't know, you can find out." A key challenge, then, is to leverage one's reputation for job opportunities.

Strategies

Knowing-what demands strategies for gaining knowledge about the industry's criteria for success in order to understand which projects and roles best develop one's reputation and create future job opportunities. Those within the industry employ a career path of horizontal, upward movement: horizontal across firms and upward in terms of roles and project status. Movement across firms enhances learning the industry's values, norms, and rules of the game rather than those idiosyncratic to a specific firm. Movement across firms also widens one's exposure to industry members and facilitates developing a reputation within the industry. Upward movement in roles and project status demonstrates the ability to handle increasingly demanding tasks and roles and the motivation to expand one's technical competencies. Faulkner's research on studio musicians shows how they move from doing a few episodes on TV, a television series, a TV pilot and then finally a feature film. Even those who work within firms have similar career paths. Michael Eisner's career is instructive. He started as an usher at NBC, moved to inserting commercials into the correct time slots for weekly TV shows at CBS, was hired by Barry Diller at ABC, a fledging network, to do Saturday morning children's programming, moved on to oversee prime time scheduling within ABC, joined Diller (who had left ABC two years before Eisner) at Paramount as a production executive, and finally landed the job as CEO of Disney.¹⁰ These career trajectories suggest a pattern of movement among firms, with loyalty to a profession or industry rather than to a single firm. Career builders demonstrate competence and ability by the series of roles and tasks performed.

Implications

Knowing what demands expansive career boundaries since the requisite

knowledge-base is industry-wide. The interplay of similar competencies defines career boundaries, as many competencies cross industry barriers. While *knowing what* involves generic competencies, the ability to enter the industry and participate requires *knowing whom* to contact for job opportunities. Film and television provide opportunities for transferring between industries because they utilize many of the same technical skills; however, the ability to leap between industries is constrained by network specific knowledge—or *knowing whom*—required to get a job in either industry. A producer explains that when his television series ended, he circulated his resume to feature film people. “They could not believe that I had lived and worked here that long and they’d never heard of me. They are two completely different industries,” he says. Each leap between industries requires penetrating a different network. Thus, the absence of industry-specific personal networks may establish barriers to inter-industry mobility and circumscribe careers.

Knowing what—industry opportunities, threats, and rules of the game—is critical to career success. However, *knowing what* is only part of the story. Self-knowledge is also required because the strategies one chooses to navigate industry opportunities and threats depend on one’s motivation, values and identity. This, in turn, generates the second competency: *knowing why* one is pursuing this career.

Knowing Why

Knowing why involves understanding the motives, interests, and meanings for pursuing a career. In the traditional career system, meanings, motives, and interests were often grafted wholesale from the firm onto the individual (e.g., “I’m an IBMer”). Employer-defined career systems had the advantage of providing relatively stable and predictable set of career demands and opportunities around which one could construct the non-career concerns of hearth and home. By contrast, in the new career system, individuals’ identities, interests, and meanings are grounded in roles and statuses based in occupations, professions, and industries. The boundaryless career system challenges its participants to improvise their home and hearth around the unpredictable vicissitudes of frenetic project activity and involuntary unemployment. Thus, it demands greater self direction and motivation since steady work is uncertain.

Film participants identified a primary motive for pursuing their careers: a passionate commitment to making films. Often the technical and creative challenges initiated and sustained this passion. William Friedkin, the director of *The French Connection*, describes how the chase scene from *Bullitt* motivated him. “When a director puts a scene like that on film, it really stands forever as a kind of yardstick to shoot at, one that will never really be topped. That will always provide a challenge for other film makers.” A casting coordinator describes how getting the “right look” for a director is very exciting, fun and challenging. A cinematographer got “hooked” on commercials and went into cinematography to exploit the “diversity of photographic techniques.” Joseph Levine, a producer, explains that it is not the money that motivates him: “This week I made a deal to make a fascinating film. I don’t think it’s going to make a quarter. But if you’re a producer and you like films, it’s such an appealing thing to do.” Sidney Lumet, a director, concurs: “I never did a picture because I was hungry; I could always earn mine in television. Every picture I did was an active, believable, passionate wish.”

Challenges

Film demands not only passion but commitment, because project-based work places tremendous demands and pressures on personal life. These intense demands and commitments require greater clarity about *knowing why*—the motives and values guiding choices. A production designer explains the need for commitment in this way: “You have to be committed to this because the pressures of being in the film industry are so great that if it’s not what you want to do, it will get the better of you. For the last eight months, I’ve hardly seen my friends, I work enormous hours, I work every weekend so you need commitment.” A major challenge for such an intensely demanding career is to maintain passion and commitment without burning out. An additional challenge is to try and maintain a personal and family life in the midst of intense time demands from the career. A boundaryless career often requires great sacrifices in personal life. In turn, these sacrifices demand clarity about the career as one’s primary focus.

Strategies

The strategies one chooses depend on whether career or balance is the primary focus. One strategy is a whole-hearted commitment to a profession or craft. This commitment demands relentless hours rewarded by challenging work, high pay, and status. Building one’s reputation provides greater control over projects and opportunities—but usually only at mid or later career stages. Balancing career and family under these conditions is difficult if not impossible. Most of the film participants we interviewed acknowledged that their family life had been deferred, denied, or at least compromised during their careers.

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An alternate strategy is to balance family and career by scaling back on career aspirations. A desire to balance career and family leads one to more modest career rewards and opportunities in related but less demanding industries such as regional or local television, commercial film (advertisements and training videos) and cable television. Several interviewees preparing to abandon or suspend their careers in film indicated that family priorities were a primary factor in their decision. A casting director we interviewed moved into regional television to balance family and career: as a mother with three young children she no longer wanted to be on location for feature films and to work long hours for weeks at a time. This career move balanced family and career, but reduced her income and opportunities.

Implications

Boundaryless careers permeate, and often overtake, one’s life; thus, they require a clear sense of one’s personal values and career goals. A boundaryless career is best suited for those who highly value a career and want it to be the central and defining feature of their lives. Although boundaryless careers may become more prevalent in the 21st century, it is unlikely that they will become the only career alternative. Thus, individuals have choices and must be clear about their values and goals when embarking on a boundaryless career.

A passion for film motivates one to enter and remain in a highly competitive industry. Passion is required to meet the challenges of intense time and commitment demands. However, passion alone does not make a career in film. One needs to *know where* to enter the industry, *where* to gain training for competent job performance and *where* to advance one’s career with more interesting and challenging projects. *Knowing where* is the third competency.

Knowing Where

Knowing where refers to the geographic, spatial or cultural (national or regional) boundaries for entrance, training, and advancement within a career system. In the traditional career system, entrance, training, and advancement were controlled by the firm. When a studio's film production was internalized, a career was clear: it started at entry level to get basic training and then advanced within the department as more skills and training were obtained. In contrast, the question of where to enter can be quite perplexing in boundaryless careers since boundaries are diffuse and so many paths into a career are viable.

The film industry exemplifies confusion about where one gains entrance, training, and advancement. The pathways are numerous: television, theater, writing (both novels and plays), film schools, law, accounting, advertising and marketing. Joseph Levine invited Mike Nichols to direct his first movie—*The Graduate*—based on Nichols's skills in directing plays. Director Stanley Kubrick offered novelist Terry Southern a screen writing job because Kubrick liked one of Southern's books. These multiple paths are a source of freedom to fit one's path to personal interests and goals, and a source of anxiety about what makes a path successful.

Challenges

The first challenge is where to gain training and experience. Two paths exist: training through professional film schools such as UCLA, USC, or NYU or through on-the-job training. Although prestigious film schools provide professional networks and excellent training, they are incredibly expensive. Our cinematographer spoke of how such training can cost \$25,000 or more a year. In addition, few film school graduates actually gain employment in the industry—in 1991 only 5–10 percent who graduated did.¹¹ The alternative is through on-the-job training, typically starting as a production assistant. One interviewee described how "getting the first job is the hardest." In the boundaryless career, training does not guarantee entrance to a career system. The challenge then is knowing where to train so that one gains entrance.

The second challenge is remaining in the industry. Since boundaries are diffuse, many enter, but few stay and advance within the industry. A study of the film credits of 2744 subcontractors from 1977-1979 revealed that 70 percent of the subcontractors made one film and were never heard from again in the three year period.¹² In the boundaryless career, entrance does not guarantee advancement in the industry. Thus, spotting and cultivating opportunities to gain projects and improve skills to propel the career forward is a critical challenge.

The third challenge is advancing in the industry through selecting projects that lead to the industry core rather than periphery. Hollywood, the geographic core for the film industry, is where the major studios (e.g., Columbia, Universal, Warner Brothers) and key participants live and operate. A study of U.S. film projects during the late 1970s found that the industry's inner core was largely populated by subcontractors who worked exclusively on film projects financed and distributed by the seven major studios. These participants enjoyed far greater compensation, stability of employment and perceived status than their counterparts employed by the peripheral minor studios.¹³ Although competing for the most desired core projects in an industry is highly attractive, especially for those seeking their first big break, the odds of breaking into such projects

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are long. By contrast, projects in the film industry's more peripheral niches (e.g., regional films, independent productions, television films, exploitation films such as horror or science fiction) provide valuable technical experience for the neophyte and offer better odds of entry. However, these may not lead to the industry core. The challenge is to identify projects that enhance future opportunities.

Strategies

Several strategies are employed to gain training, entrance, and success in this career system. One strategy is to go to Hollywood and work on whatever projects are available. Francis Ford Coppola exemplifies this strategy. He quit film school and started working on exploitation films. He explains: "Having gotten into the nudie racket, I started to move up the exploitation film ladder. I was willing to do anything to get to make more films, and the best opportunity was in the field of the exploitation film—by which I mean nudie, science fiction, horror, and religious films." He then systematically moved into differing roles to broaden his experience. This entry strategy requires developing relationships with those who provide opportunities to neophytes.

A second strategy is to work on independent projects and then submit these to competitions to gain recognition. A *Time* magazine article cites Robert Redford as one of America's most influential men because he established the Sundance Institute and developed the U.S. Film Festival as a means of providing opportunities for filmmakers. The festival offers neophytes the opportunity to meet studio executives and widen their exposure in the industry. Stephen Soderberg, who directed and wrote *sex, lies, and videotape*, exemplifies this strategy. He started his project while a film student at Louisiana, submitted it to the U.S. Film Festival, won the award for best picture, then got an opportunity to do a film financed by a major studio.

A third strategy is to maintain what the industry calls "face-time" with key players. This means going to Hollywood often enough to maintain presence in the minds of those who hire and finance projects. "I go to Hollywood every eighteen months to do the rounds at the big studios to remind them that I exist," says an associate producer. Personal contact with key industry figures is needed to maintain relationships and ensure future employment.

Implications

The boundaryless career places responsibility for training, entrance and advancement on individuals rather than firms. The choice of projects is critical to developing skills and competencies. Poor choices lead to restricted opportunities. Since skills are portable among firms, industry or professional associations may provide the best training and entrance opportunities. For example, the Directors Guild of America provides internship placement for fledgeling directors. However, acceptance is highly competitive. For those who successfully navigate training, entrance, and advancement among the multiple paths available, the rewards are substantial—higher pay, greater freedom, and more challenging projects. However, the risks are also higher; training is funded by the individual—either through schooling or lower salaries—and the likelihood of success is slim.

This ambiguity of *knowing where* one gains access, training, and advancement points to the importance and necessity for *knowing whom*: those people who give the opportunities for initial access and training and for advancement to

more complex, challenging projects. *Knowing whom*, the fourth competency, is critical to career success.

Knowing Whom

Knowing whom involves creating social capital by gaining proximity to those who provide opportunities and important resources.¹⁴ In traditional firm-bounded career systems, one's social capital was defined by connections to key stakeholders in the firm. These connections were a rich source of information and opportunities within the firm, but insufficient for opportunities beyond the firm. In the boundaryless career, social capital is oriented across firms and options for relationships are more varied. Successive projects provide the opportunity to both disengage from unproductive relationships and to enhance and renegotiate productive relationships.

In the film industry, attraction complements social capital because it determines who among those equally proximate gains opportunities and resources. Director Sidney Pollack explains it as "the emotional pleasure of finding someone on the same wavelength." Mel Brooks wanted to keep the writing team from *Silent Movie* together so he started a new project—*High Anxiety*—and they worked for another four months. The attraction aspect of *knowing whom* is similar to concepts of mentoring: development of another through relationships. Kathy Kram's writings have extended the notion of mentoring beyond a supervisory role to a relationship constellation that includes a nexus of peers, subordinates, boss, non-work and family relations to support and advance one's career.¹⁵ Our concept of *knowing whom* is more inclusive than Kram's relationship constellation because it includes "weak ties" that may not involve commitment or caring about the development of others and may be strictly instrumental.

Challenges

The first challenge is being both strategic and genuine in relationships. Strategic implies locating those with social capital who give access to critical resources and opportunities; being genuine implies concern for gaining friendships, caring and connectedness in such a transitory community. The pitfall of boundaryless career systems may lie in their emphasis on social capital, which can lead to treating all social interactions as a means to gain personal ends. This dehumanizes not only others, but life. Robert Altman's movie *The Player* dissects this aspect of the film industry.

A second challenge in emphasizing social capital is that potential employers may undervalue one's contribution by focusing on easily measured or identified signals,¹⁶ such as the number of credits, educational credentials, or box office results. David Picker, former President of United Artists and independent producer, describes how "instead of being familiar with the work of a certain director or cameraman, they (producers) check his last credits." Intangible skills and assets are harder to assess since exposure to others is more limited given project-based organizing. Learning another's skills and abilities requires a concerted effort and time.

Strategies

Three strategies may be used to offset the potentially negative aspects of social capital. The first is to develop friendships with one's professional cohorts. These multiplex relationships may inhibit a strictly instrumental view of others and enhance the attraction aspect of *knowing whom*. However, placing the career as one's primary concern may inhibit balancing career with family or other

concerns. A second strategy is to develop a portfolio that showcases one's skills such as reels of film or renderings of costumes and set designs. The cinematographer explains that "a calling card for a production company, director, or cameraman is a spot reel. It's your portfolio. Your style and visual sense is represented by a spot reel." In this way, the quality and not just the quantity of credits may be more easily assessed. A third strategy is entering and winning industry awards to signal quality work as discussed earlier.

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Implications

Since the right to participate is negotiated with each project, participants must frequently decide whether to continue or quit relationships. Poor relationships can be left more easily; however, good relationships require more work to maintain connections. Thus, each project demands more emphasis on establishing and maintaining relationships, but also more freedom in determining both which relationships are maintained and their direction. In addition, organizational members who hire subcontractors must know the talent pool and trends in the industry in order to accurately assess skills. This requires a more active approach to assessing intangible skills than many firms now employ.

Knowing whom is important to gaining opportunities but has its limits. Social proximity and "power lunching" may open doors for opportunity, but one needs to know when to take advantage of opportunities and when to pass on them. Answering these questions requires understanding the temporal dimensions of one's career—the fifth competency—*knowing when*.

Knowing When

Knowing when refers to the timing and choice of activities within one's career. In traditional employer-defined career systems, temporal issues were dictated largely by the employer's definition of when new roles, promotions, and lateral transfers should occur. The benefit of such a system was that employees could anticipate career transitions because of predictable timetables. However, these same timetables could stigmatize employees who did not advance at the same rate as others. In the boundaryless career system, *knowing when*—the pacing and timing of a career—becomes more difficult to gauge since advancement does not imply hierarchical movement up a ladder. Advancement may depend on differing definitions of career success, such as extending technical skills, engaging in more challenging projects, changing roles to those with more responsibility and complexity, or increasing financial rewards.

Challenges

The first challenge is *knowing when* to stay in a role or function before it limits one's opportunities. In the film industry, staying too long within a role makes it more difficult to move out of that role because other people's expectations limit what they allow you to do. Producer Roger Lewis entered the film industry in advertising and promotion. He explains that all the years he had spend in promotion worked against him when he attempted to get the screenplay *The Pawnbroker* financed. "Everyone knew that I had been in advertising, publicity. . . and when I went to talk to them about the picture I wanted to produce, they wanted me to advise them about ads for their own movies. I'd have been better off if they had never heard of me." Staying in a role and developing expertise can limit one's ability to move beyond that role in the future.

The second challenge is *knowing when* to stretch current skills or exploit established skills. This challenge is answered by *knowing why*: one's motivation. Roger Lewis, for example, was strongly motivated to stretch his current skills and "do something in a first film that was not expected of me." In contrast, a production manager describes how the first assistant director on their current movie exploits his skills. "He has been a first AD (assistant director) for about 20 years and he's happy doing it." To move out of the first AD role requires becoming either a director, which is extremely difficult, or a production manager, which is business rather than creatively oriented.

The window of opportunity is relatively short in the film industry and the role of luck (good or bad) influences when one can take advantage of opportunities. Screenwriter James Salter assumed that, after winning first prize at the Venice film festival, his window of opportunity had opened. However, once back in the States, his movie, which opened during a strike, was poorly attended and "in six weeks all glory had vanished, and we were back where we began."

The third challenge is *knowing when* to jump through the window of opportunity before it closes. The window of opportunity is relatively short in the film industry and the role of luck (good or bad) influences when one can take advantage of opportunities. Screenwriter James Salter assumed that, after winning first prize at the Venice film festival, his window of opportunity had opened. However, once back in the States, his movie, which opened during a strike, was poorly attended and "in six weeks all glory had vanished, and we were back where we began." Moving quickly on luck or good fortune may enhance one's ability to take advantage of it.

Strategies

To extend skills often requires "breaking the frame of reference" of compatriots so that their expectations and conceptions do not unduly limit oneself. Roger Lewis had to demonstrate to those who knew him in the industry that he did not want to exploit his skills in advertising. He could have pursued a career within that specialty had he wished. A second strategy involves getting ready to take advantage of opportunities. A cinematographer suggests that "There's a lot of luck involved, being in the right place at the right time, but there is also the old cliché of 'get ready to get lucky' so when luck comes you can grab it." A production sound mixer explains it more as "mak(ing) your own breaks in this industry you have to promote yourself. You say 'I'm not going to do any more films unless I'm X.'" The risk is that the subcontractor may not get any work. "You may sit at home and the phone doesn't ring; you may be lucky and the phone rings and it's a good project," he continues. "A good project is one that starts you on a roll so then you get another one and another one and another one. I was very fortunate I got on that roll." Thus, a careful development of skills, and a clear understanding of career goals facilitate *knowing when* to take advantage of or pass on opportunities.

Implications

A problem of *knowing when* is that it may clash with *knowing why* because of the need to keep actively engaged in projects. Thus, one may take on projects for which one does not have passion or commitment in order to maintain employment and visibility for future opportunities. "You can't sit around for 5-10 years between pictures," says Roger Lewis. Synchronizing projects and passion is difficult given the uncertain nature of jobs and opportunities. At issue is the ability to maintain one's initial passion for entering the career during dry spells where project, passions, and opportunities do not mesh.

Knowing when requires understanding the timing of choices—to extend or exploit, to stay or leave, to push forward or pull back—and its influence on one's career. *Knowing when* is central to developing the sixth career competency of *knowing how*—building skills and talents so that one can take advantage of both present and future opportunities.

Knowing How

Knowing how refers to the skills and talents needed for competent performance in one's work roles and job assignments. In traditional firm-based career systems, skills and roles develop from firm-specific experiences and have less value to other employers; each year with an employer binds the worker more tightly to the firm. In contrast, in the boundaryless career system, the transferability of skills and experiences across employers is prized.

In the film industry *knowing how* involves both technical and collaborative skills.¹⁷ Technical skills refer to the competence needed to perform tasks well and meet industry standards. "One cannot underestimate the technical end," Sidney Pollack points out. "It's a technical medium like architecture." These technical skills are distinct from one another because they are role and task specific. Mel Brooks talks about how a director uses timing for comedies. Robert Towne describes how the screen writer creates character and mood. Cinematographer John Alonzo explains how one must know "the chemistry, the mathematics, the mechanics of cinematography." Directors Coppola and Friedkin discuss knowing how to set up scenes and match action. An associate producer we interviewed explains how "being good at logistics and being able to juggle a lot of things" is critical for her. Many of these technical skills are unique to the film industry and provide entry barriers to those wishing to move across industries.

Challenges

Creative enterprises such as film, advertising, surgery, and architecture are intensely collaborative and require the coordination of many talents and skills. "The best of film, and the worst of film, is that it is such a collaborative process," notes director Alan Pakula. "You are dealing with incredibly different kinds of people and, even worse than that, you are dependent upon incredibly different people . . . In the end, if the film is successful, it is a synthesis of so many people that it is impossible to remember who did what and when." A cinematographer describes film production as "building a house and running basketball." "You hire all the subcontractors who are specialists at lighting, recording, and, sound—just like a housing contractor. The basketball end of it comes from you've got X amount of time to get X done. You need very competent players in order to win the game." A clear vision of and goal for the final product is critical. Editor Edward Dmytryk notes that "one of a cutter's (i.e., editor's) chief talents must be the ability to interpret the director's desires . . . Some of my toughest moments as a cutter were concerned with trying to figure out just what the hell the director did want."

Strategies

The first strategy for enhancing collaboration is cross-functional training. "Film is a collaborative art form, but it doesn't function unless we all know what the others do," explains cinematographer John Alonzo. "I've made it a point to learn a lot about directing and writing." Director Francis Coppola reiterates this point, "As a director, you may not want to be a great photographer or sound recorder, but you should want to be acquainted with what these skills involve." Learning other roles increases the tolerance and understanding needed for collaboration. "We all should know as much as possible about each other's specialties," suggests production designer Harry Horner, "if nothing else, it widens the tolerance of one to the other."

The second strategy for enhancing team coordination is identifying the vision for the project and taking time to articulate this vision. Cinematographer Gordon Willis always asks the director "What is the movie about? What is it you want to say?" A casting director explains that her goal is to "understand the director's vision and between his vision and my awareness and knowledge to get a genuine look for him for the legitimacy of the show." An animal consultant explains how she aims to create the desired effect; "you need to respond to every aspect of what everybody needs for one particular shot. You try to create the whole that they want."

A third strategy for enhancing coordination across differing specialists is communicating in the primary medium of the industry. In engineering this may be with mathematical symbols and equations, in architecture it may be schematics of buildings, and for the technical crew in film, it is with visual renderings. Production designer Harry Horner does "rough sketches (which) convey the mood to the director . . . I've found it practical to sketch several versions. If the director says, "I don't like it," you can throw it away. It's cheaper to throw away sketches than to shoot the scene several ways and throw the film away." Edith Head, a costume designer concurs. "I've discovered it's much better to communicate with the eye than with the ear. Most directors, producers, and actors and actresses like to see something drawn."

Implications

Boundaryless careers require skills that are transferable across firms. These skills may take two forms: commodities or occupational labor markets exemplified by guilds.¹⁸ If skills become commodities—widely available and easily replaced, this imperils the ability to earn a reasonable income and maintain consistent work. In occupational labor markets, skills are less widely distributed because of entrance restrictions and certification requirements. This helps but does not ensure continuous employment in boundaryless careers, given their diffuse boundaries, environmental uncertainty, and intense competition for opportunities. Thus, avoiding commodity status by creating idiosyncratic value through unique skills and talents is critical for career success in the boundaryless career system.

The skills and competencies of *knowing how* are essential for career success. However, skills alone do not ensure success. These six competencies interact with one another and define the parameters for career success in a boundaryless career system.

Dynamic Interplay Among the Six Competencies

Although we have presented these competencies, strategies, and challenges sequentially, they are more akin to two sets of dimensions on a topographical map. The dimensions of knowing what, knowing where, and knowing when are akin to the topographical map of the industry. Meanwhile, the interspersed dimensions of knowing why, knowing how, and knowing whom map the self-knowledge required for navigating within the industry's career system. When all six dimensions are considered, they provide a rich description of the domain to be traveled. All need to be considered when plotting a path through untraveled territory.

The film industry demonstrates the interplay of self and industry knowledge in the boundaryless career. In contrast, much of the traditional career literature has focused on self-knowledge through interest and skills tests and

underemphasized the importance of industry or contextual knowledge and the interplay between industry and self knowledge. In boundaryless careers, the industry context or *knowing what* demands greater *knowing why*, since intense competition and the challenge of maintaining employment demands passion and commitment to sustaining a career. One needs to be very clear about motivation and values and how these influence choices and timing of activities. *Where* to gain entrance, training, and advancement challenges one to spot and cultivate opportunities to propel one toward one's career goals. However, knowing where depends on *knowing whom*, since access to these opportunities are funneled through networks of professional contacts. Thus, initiating and maintaining relationships are central to career success. However, these networks of professional contacts make movement from one industry to another difficult. *Knowing when*—the timing and choices of career activities requires *knowing how*—assessing one's current skills in order to know whether to extend or exploit them. The boundaryless career points out the necessity for actively sequencing and pacing a career. The interplay of these two knowledge domains—self and industry—is not well understood. By identifying these two domains of career knowledge and their interplay, we promote a more in-depth understanding of boundaryless careers.

The boundaryless career is more complex and ambiguous than a firm-bounded career. This ambiguity can be either a source of great freedom or a source of great anxiety.

Boundaryless Careers and the 21st Century

As employers downsize and subcontract more of their work, the challenges of and similarities to boundaryless careers in the film industry become increasingly relevant for careers in the 21st century. The boundaryless career is more complex and ambiguous than a firm-bounded career. This ambiguity can be either a source of great freedom or a source of great anxiety. Freedom arises from constructing new beginnings with new projects and terminating unsatisfactory career experiences through completing projects and moving on. Anxiety arises because there are no clear cut career paths for success, no identifiable temporal ordering to organize and anticipate one's life, no concrete entity such as a firm to generate commitment or passion to a hard course. By identifying career competencies, strategies, challenges, and their interplay, we enhance our understanding of boundaryless careers: what they demand, who they are most suited for, and how one succeeds in them.

Kipling wrote of his six serving men (What, Why, When, How, Where, and Who) at the very beginning of the twentieth century. We submit that by going back to the future in heeding the advice of his six serving men, and by drawing upon the boundaryless career experience of the past twenty-five years of American film making, we can provide a map of the competencies needed to navigate the uncharted territory of careers in the 21st century.

Endnotes

¹ See the following popular press articles. W. Bridges, "The end of the job," *Fortune*, September, 19: 62-72, 1994; J. Huey "Waking up to the new economy," *Fortune*, June, 27: 36-48, 1994; B. O'Reilly "What companies and employees owe one another," *Fortune*, June 13: 44-57, 1994; L.R. Richman, "The new work force builds itself," *Fortune*, June, 27: 68-79, 1994.

² Robert J. DeFillippi and Michael B. Arthur "Boundaryless contexts and careers: A competency-based perspective," in Michael B. Arthur and Denise Rousseau (editors), *The Boundaryless Career: A New Employment Principle for a New Organizational Era*, (USA:

Oxford University Press, 1996, pp. 116-131). For an application of the competency-based career paradigm, see Michael B. Arthur, Priscilla H. Claman, and Robert J. DeFillippi "Intelligent enterprise, intelligent careers," *Academy of Management Executive*, 9 (4), 1995, 7-22.

³ The data for our insights include 57 interviews (both archival and in-person) covering a twenty year period: 39 from the 1970s, five from 1989, and 13 from 1995. The archival interviews from the 1970s came from four sources: Jason Squire, *The Movie Business Book*, (New York: Simon & Schuster, 1983, 1992; both first and second editions); Joseph McBride

Hollywood Directors 1941-1976 (New York: Oxford University Press, 1977); Fred Baker and Ross Firestone (eds.), *Movie People* (New York: Douglas Book Corp, 1972). These insights were supplemented by the first author's dissertation, which tracked the work patterns and film credits for 2700 subcontractors 1977-79. The 1989 interviews, ranging from 2 to 3 hours, asked five successful film subcontractors about their careers. During 1995, the second author engaged in 13 interviews and participant observation on an elite film project in the United Kingdom.

All interviews were content analyzed by the authors for themes on career competencies. Glazer and Strauss's (*The Discovery of Grounded Theory*, Chicago: Aldine, 1967) grounded theory methodology was employed. We started with an initial framework of DeFillippi and Arthur's three career competencies: knowing whom, what, and why. As we read and coded the interviews, more categories were added as data revealed competencies not covered by the initial three categories. After each data coding, the authors compared notes and coding to ensure consistency. We stopped adding categories when the categories covered the material in the interviews.

See Walter W. Powell, "Neither market nor hierarchy: Network forms of organizing," in B. Staw (editor), *Research in Organizational Behavior*, (Greenwich, CT: JAI Press, 1990, 295-336); Charles C. Snow, Raymond E. Miles, and Henry J. Coleman, "Managing 21st century network organizations," *Organizational Dynamics*, 1990. (Winter): 5-20.

⁴ Margaret E. Phillips, "Industry mindsets: Exploring the cultures of two macro-organizational settings," *Organization Science*, 1994(5): 384-402.

⁵ See Nitin Nohria and Robert G. Eccles, *Networks and organizations* (Boston: Harvard Business School, 1992).

⁶ James Monaco, *Who's who in America film now* (New York: Zoetrope, 1987).

(ed), *Filmmakers on Filmmaking* (Los Angeles: J.P. Tarcher, 1979, vol. 2); Richard Koszarski,

⁷ Laurie Joshua "Stars who don't throw hissy fits" *Forbes* 153(5) February 28, 1994:94-98.

⁸ Robert R. Faulkner and Andy B. Anderson, "Short-term projects and emergent careers: Evidence from Hollywood," *American Journal of Sociology*, 1987: 879-909.

⁹ Robert H. Frank and Philip J. Cook, *The winner-take-all society*, New York: Free Press, 1995, p. 101 footnote).

¹⁰ Ron Grover, *The Disney Touch* (New York: Irwin, 1991).

¹¹ J. Hubbell, "Celluloid sheepskins," *American Film*, April: 11, 1991.

¹² Candace Jones, "Careers in project networks: The case of the film industry," in Arthur and Rousseau, *op. cit.*, pp 58-75.

¹³ Candace Jones. 1993. *Toward a theory of Network Organizations*. Ph.D. dissertation available from University of Michigan: UMI Press.

¹⁴ Holly Rader and Ronald S. Burt, "Boundaryless careers and social capital," in Arthur and Rousseau, *op. cit.*, pp. 187-200.

¹⁵ For mentoring and relationship constellation see Kathy E. Kram, *Mentoring at Work: Developmental Relationships in Organizational Life* (Glenview, Illinois: Scott Foresman and Company, 1985) and "A relational approach to career development," in Douglas T. Hall (Ed.) *The Career is Dead—Long Live the Career: A Relational Approach to Careers* (San Francisco, CA: Jossey-Bass Publishers, 1996).

¹⁶ James E. Rosenbaum and Shazia Rafiullah Miller, "Moving in, up, or out: Tournaments and other institutional signals of career attainment," in Arthur and Rousseau, *op. cit.*, pp. 350-369.

¹⁷ Danny Miller and Jamal Shamsie, "The resource-based view of the firm in two environments: The Hollywood film studios from 1936 to 1965," *Academy of Management Journal*, 1996 (39): 519-543.

¹⁸ Pamela S. Tolbert, "Occupations, organizations and boundaryless careers," in Arthur and Rousseau, *op. cit.*, pp. 331-349.

About the Authors

Candace Jones is an assistant professor in the Organization Studies Department, Carroll School of Management, Boston College. A PhD from the University of Utah, Jones is currently researching interfirm teams and network organizations in the commercial architecture and film industries. Her research focuses on careers and interfirm project teams industries and managing intangible assets. Previous research has been published in *Human Resource Management* and in *Boundaryless Careers: Work, Mobility and Learning in the New Organizational Era*, edited by Michael B. Arthur and Denise Rousseau.

Robert J. DeFillippi is an associate professor of management in the Frank Sawyer School of Management, Suffolk University, Boston. DeFillippi has a PhD from Yale University. He is currently US project manager for a comparative study of the formation of high technology industry clusters in the US, Germany, and the United Kingdom. Previous research on competency-based strategy, career theory and entrepreneurship has been published in *Academy of Management Review*, *Academy of Management Executive*, *Journal of Organizational Behavior*, and *Review of Business*.