

## FILM AND VISUAL CULTURE

### **Introduction: The Crisis in Film Studies**

The impact of digital technologies and the rise of New Media Studies has had a significant impact on Film Studies which, according to some commentators, is currently experiencing a crisis of legitimation in which its historical, theoretical, methodological and ontological foundations have been called into question. The material basis of that film shared with photography – the effect of light striking and altering a strip of chemically treated paper which creates a physical, indexical connection to the world (the trace of the particular instant in time that has been captured) – has now been severed through digital transpositions into algorithmic numbers. The disappearance of the supposedly specific qualities of film as a medium, the realism of the image and the mechanical reproduction of the camera, has led to widespread pronouncements about the ‘death of cinema’ (see Geuens 2002, Tryon 2007: 73-6); if film was the dominant cultural form of the twentieth century, the twenty-first will belong to ‘new media’.<sup>1</sup>

As a consequence, it is often argued, by both academics and practitioners, that we are living now in an era of ‘post-cinema’, or what Richard Grusin has more helpfully identified as a ‘cinema of interactions’, in which film has become a distributed form, circulating in various guises across a range of different media, and where the distinctive social and cultural ritual of watching a theatrically projected film is in the process of being replaced by a diffused continuum in which the viewer or user interacts with a digital artifact in various locations in a multiplicity of ways. As Grusin argues, in the ‘current historical moment’ film, like other media, is no longer singular and separate but only exists in relation to other media (2007: 215). Although

Hollywood movies are still central to an understanding of what film is and continue to dominate the marketplace – what Thomas Elsaesser calls ‘business as usual’ (2000: 190-91) – it is no longer the Hollywood of old; film production, distribution and exhibition are changing significantly.

Many areas of film scholarship – what David Bordwell characterizes as ‘middle-level research’ (1996: 26-30)<sup>2</sup> – remain unaffected by these changes, but a significant number of studies argue that the impact of new audio-visual technologies is profound and necessitates that Film Studies be fundamentally rethought and redefined, attempting to understand film’s new role within a radically transformed postmodern cultural landscape. The title of Christine Gledhill and Linda Williams’ seminal collection, *Reinventing Film Studies* (2000), indicates its commitment to a major reconceptualisation of the perennial issues that Film Studies has engaged with including medium-specificity, authorship, spectatorship, realism, aesthetics, the centrality of ‘classical Hollywood cinema’ and film history. As Janet Harbord comments in *The Evolution of Film: Rethinking Film Studies*, film’s encounter with digital technologies has given these questions a new urgency (2007: 16). Chuck Tryon’s *Reinventing Cinema: Movies in the Age of Media Convergence* (2009) sturdily charts the changes that are occurring, while Dudley Andrew’s *What Cinema Is!* (2010) is imbued with a deep concern that something precious and unique about film might be being lost. Such concerns inform the most eloquent and wide-ranging account, David Rodowick’s *The Virtual Life of Film*, which argues that because of the ontological changes occasioned by the shift from analogue to digital, film is no longer the pre-eminent modern medium that was constitutive of modernity itself, but has become ‘completely historical’ (2007: 93).

For Laura Mulvey, whose work has been central to Film Studies, the present moment is both challenging and, potentially, highly productive. She argues that film's 'disappearance' into digital multimedia offers a peculiarly valuable vantage point, a 'threshold moment', in which to look both forwards and backwards. It has allowed the affinities between new digital media and the optical media of the nineteenth century to be perceived, thereby releasing those earlier practices that prefigured film 'into their differentiated forms and histories' rather than being inertly homogenised as 'pre-cinema' (2007: xv-xvi). In the process film, as it has conventionally been understood, has begun to be recognized as a century-long phase within a 'larger continuous history ... of "moving images"' (Carroll 1996: xiii), where film becomes one component in 'an integrated history of audiovision' (Zielinsky 1999: 22), understanding its role within a wider configuration of visual technologies (Lyons and Plunkett 2007: xvii-xxv) in order to produce an intermedial or 'convergence' history (Staiger and Hake 2009).

In what follows I will not attempt an inevitably superficial survey of recent literature on film – impossible in such a short space anyway – but focus on some of the more important accounts that have explicitly addressed this perceived 'crisis' in Film Studies caused by the impact of digital technologies. Particular attention will be given to those that engage with broad issues to do with the nature of film itself and thus which attempt to reinvent or reconceptualise the discipline in the wake of New Media.<sup>3</sup> In this way I hope to open out the issues adumbrated in this introduction and to explore film's relationships with wider practices of looking and, explicitly in the final section, explore the connections with Visual Culture. What will become clear is that in the process of reconceptualising the nature of Film Studies, most film scholars now recognise that because image media mutate, recombine and migrate across

disparate contexts, the discussion of any medium is now a ‘necessarily interdisciplinary question’ (Beckman and Ma 2008: 4, original emphasis). However, we need to start with Film Studies’ ‘turn to history’ (Spicer 2004) that this ‘crisis’ has occasioned, examining revisionist histories that have significantly broadened an understanding of how film emerged in high modernity and therefore what it might become.

### **The Turn to History: Film and Modernity**

These revisionist histories contrast with the teleological narratives that characterised earlier film histories, which assumed the sovereignty of the ninety-minute feature film (Gunning 2000: 317). Informed by changes in the nature of history itself as a discipline, the objects of film history (including films themselves) are no longer understood as transparent data or facts, but as problematic forms of ‘evidence’ produced discursively (Sobchack 2000a: 301, 312; see also Sklar 1990, Chapman, Glancy and Harper 2007).<sup>4</sup> Specifically, the present ‘threshold moment’ has encouraged film historians to re-examine film’s relationship to the technological, social and cultural transformations that constituted modernity, exploring film’s role in the reconfiguration of motion, time and space, and also perception.<sup>5</sup>

Leo Charney and Vanessa Schwartz’s *Cinema and the Invention of Modern Life* (1995) was central to this re-examination. The editors contend that film was not simply a new medium but central to how modernity was experienced and understood by a broad public. Film, they argue, ‘arose from and existed in the intertwining of modernity’s component parts: technology mediated by visual and cognitive stimulation; the re-presentation of reality enabled by technology; and an urban, commercial, mass-produced technique defined as the seizure of continuous

movement' (10). Charney's *Empty Moments: Cinema, Modernity and Drift* (1998) explored the philosophical and ontological implications of this process, arguing that film enabled the dialectical relationship between modernity's shocks, surprises, distractions and overwhelming stimuli and its corollary, drift, the experience of vacancy, the sensation of empty moments, to be understood and negotiated. Mary Ann Doane's *The Emergence of Cinematic Time* (2002) also explored film's paradoxical function as the permanent record of fleeting moments, situating the emergence of cinema within the increasing regularisation and standardisation of time in late modernity, the development of 'industrialized time' that was essential to the penetration of capitalist work practices (8). She argues that early film 'actualities' made the contingent and the ephemeral legible, seizing and recording fragments of time and endowing them with a significance (10). In the process, film became the central form where temporality could be captured and made visible in space, an imprint of a pure moment in time that was both a record and, through movement and change, also a display 'that never ceases to strike the spectator as open, fluid, malleable – the site of newness and difference itself' (32).

Tom Gunning's work was seminal to a revised understanding of early film spectatorship. His influential notion of a 'cinema of attractions' argued that rather than naively mistaking the film image for reality, the film spectator was 'astonished by its transformation. Far from credulity, it [was] the incredible nature of the illusion that render[ed] the viewer speechless' (1990: 118; see also Gunning 1995). As a complement to Gunning, Schwartz's *Spectacular Realities: Early Mass Culture in Fin-de-Siècle Paris* (1998) valuably demonstrates how the taste and the perceptive apparatus whereby the new phenomenon of film could be understood was itself created through the popularity of 'spectacular realities', phenomena such as shopping

boulevards, the mass press and wax museums that developed during the second half of the nineteenth century and which, along with film, helped create modern mass society. Ben Singer's *Melodrama and Modernity: Early Sensational Cinema and Its Contexts* (2001) focuses on one form – sensational melodrama, notably serial-queen adventures such as *The Perils of Pauline* (1914) – but also situates this within the material context of sensationalism in other contemporaneous popular amusements: stage melodrama, dime novels, tabloid story papers and publicity, amusement parks and thrill rides and the discursive context of writings by contemporary observers, journalists, theorists and practitioners who made the connection between modern urban experience and film. Singer explores film's connection to the new intensified, sensory environment of the metropolis, its speed, discontinuities and 'audiovisual fragmentation', arguing that cinema became the most powerful form of this new 'aesthetics of astonishment', combining the capturing of powerful fleeting impressions, kinetic speed, novel sights, and visceral stimulation (2001: 130). His empirically grounded research shows how the forces shaping modernity – the shocks, fragmentation and superabundance of sensation famously identified by Walter Benjamin and Georg Simmel – actually operated in detail.

These studies, by implication, alert us to Mulvey's 'perceived affinities', providing an historical perspective on digital culture and how it might be understood, but others explicitly explored that connection. Miriam Hansen's influential 'The Mass Production of the Senses: Classical Cinema as Vernacular Modernism' (2000), valuably extended the discussion of film's relationship to modernity by arguing that 'classical Hollywood cinema' – the cornerstone of Film Studies and conventionally presented as a timeless, universal narrative idiom or 'what film is' – was actually a very specific form of film both historically and culturally. However, through its

worldwide reach, classical Hollywood film became the first ‘global sensory vernacular’, a central element in the ‘changing fabric of everyday life, sociability and leisure’ that provided ‘an aesthetic horizon for the experience of industrial mass society’. In the process, narrative film created new subjectivities by enabling ‘viewers to confront the constitutive ambivalence of modernity’ (333-44).<sup>6</sup> Two studies by Anne Friedberg extended this exploration of film’s connection with modernity into the digital era. In *Window Shopping* (1994), Friedberg traces the cultural contexts of commodified forms of looking and the experiences of spatial and temporal mobility. Rather than understand film as an autonomous aesthetic product, she too argues that it must be read in the ‘architectural context’ of its reception as it emerged in the rich context of various forms of looking that were taking place: in the activities of shopping and tourism in a variety of locations, in dioramas, panoramas and phantasmagorias, in exhibition halls, winter-gardens, arcades, department stores, amusement parks and museums. Film was a key component in what she designates the ‘mobilized virtual gaze’, contributing to a ‘gradual and indistinct epistemological tear along the fabric of modernity’ (2), eventually becoming central to the fabric of contemporary, postmodern life in malls, videos and DVDs, the web, and virtual reality technologies. In *The Virtual Window* (2006), Friedberg examines the metaphorical and material importance of the window and its successor the screen as a framing device that has shaped perception and the understanding of images from Alberti’s *De Pictura* (1435) through to contemporary ‘postcinematic’ visualities of camera phones, BlackBerries and other ‘mobile’ devices (6). Although film, unlike painting or architecture, was for a long period wedded to the single screen as its ‘window on the world’ with split screen technologies the province of avant-garde practices, Friedberg argues that this is now changing in the age of new media where

the multiple screen format has now become the new vernacular. In the process, the specificity of film has become irreparably altered by digital technologies in which screens are converging, losing their apparatical distinctions, thereby promoting a different logic of visibility (217, 242).

### **The Reshaping of Film: Production Technologies and Consumption**

The historical analyses already considered, in contradistinction to the unbridled technophilic euphoria that characterised the mid-1990s<sup>7</sup>, advance an understanding that digital forms are the product of changes that are evolutionary rather than revolutionary, transformations of existing practices rather than unprecedented (see Boddy 2008). Philip Rosen identifies a succession of hybridities rather than a great break (2001: 303), and Brian Massumi argues that the interaction of the digital and the analogue is occurring ‘in self-varying continuity’ (2002: 138). Henry Jenkins’ highly influential *Convergence Culture* (2006) understands the present moment as transitional – ‘not fully integrated and ramshackle’ (18) – where old and new forms ‘collide’ as they jostle for position and power. He argues that ‘Old media are not being replaced. Rather, their functions and status are shifted by the introduction of new technologies’ (14). As Jay Bolter and Richard Grusin contend, new media work by refashioning older media (centrally film) in both form and content and are thus ‘remediations’ of existing forms (1998).

The Hollywood feature film is now a hybrid form, that, in the ‘transitional post-major studio pre-Internet era’ (Tryon: 2-3), employs both analogue and digital technologies. However, feature films are increasingly being shot on digital video (DV) rather than celluloid, which may well soon cease to be manufactured (Enticknap 2005: 224-29). George Lucas has famously described film as an ‘outdated Victorian



technology’ and announced, after *Star Wars Episode 2: Attack of the Clones* (2002), that he would ‘never make another film – on film – again’ (in Enticknap 2009: 416). More low-budget and experimental film-makers such as Mike Figgis are increasingly using digital formats because of their enhanced aesthetic possibilities and their increased speed and efficiency (Figgis 2007). There has been a huge expansion of ultra low-budget film production, partly inspired by *The Blair Witch Project* (1999), that uses inexpensive equipment, standard editing software and that seeks an audience through the Internet, bypassing the normal distribution and exhibition mechanisms (Tryon 2009 93-4, 175). The energies of the film-making process are increasingly shifting from production (filming on location or in the studio) to post-production (Harbord 2007: 88). A range of new companies have sprung up, operating from cyberstudios, which exist to handle the intricacies of computer processing.

World cinema continues to be dominated by the digital special effects-driven Hollywood blockbuster with media ownership still concentrated in a small number of multinational companies, what Robert Stam and Ella Shohat call the ‘entrenched asymmetries of international power’ (2000: 380). However, their account also indicates that this system is changing because global cultural and economic hegemonies have become more subtle and dispersed. Hollywood is no longer the orchestrator of a world system of images, but one mode in the complex transnational construction of ‘imaginary landscapes’ (ibid: 383). In recognition of this shift, Film Studies has become increasingly interested in the concept of ‘transnational cinemas’, exploring the interactions of local and global cultures, and the development of low-budget forms of film-making (often using inexpensive digital technologies) in small, ‘third world’ or post-colonial cinemas that can provide them with a distinctive existence. These studies argue that a new kind of de-centred multinational system has

developed which has altered the earlier paradigm of separate national cinemas and the older opposition between Hollywood and European Art Cinema (Stam and Shohat 2000: 395; see also Naficy 1999, 2001, Ďurovičová and Newman 2010, Galt and Schoonover 2010, Iordanova, Martin-Jones and Vidal 2010).<sup>8</sup> Hamid Naficy contends that in a 'post-diasporic era' of increasing national fragmentation and the physical displacement of peoples across the globe, the contribution of 'accented cinema' created by displaced, exilic, 'asylee', diasporic, ethnic, transnational and cosmopolitan film-makers has become increasingly important and influential (2009: 3-4, 11). Accented cinema, he argues, challenges classic cinema's coherence of time, space and causality through its use of interlocking narratives, fragmentation and the circularity of time and space in often lengthy episodic narratives with multiple points-of-view, multilingual dialogues, multicultural characters and numerous locations.

If modes and locations of production are shifting, so too are forms of film consumption. Cinemagoing continues to be an important social and cultural activity (Corbett 2001: 18, Acland 2003: 45-81, 212-28, Tryon 2009: 64, 77-8). Although some commentators, for instance John Belton, have cast doubt on the real impact of digital technologies calling it a 'false revolution' (2002: 98-114), the success of 3D projections of *Avatar* (that premiered in the UK in December 2009), suggest that audiences may continue to want the 'special thrill' of seeing a feature film in a large auditorium. However, this mode of exhibition has lost its centrality to the industry; only 15 per cent of a film's revenue typically comes from its theatrical release (Caldwell 2009: 9). It has been displaced by a range of different forms of film consumption on a diversity of screens, from IMAX to iPod (Wasson 2007), involving new modes of distribution including the Internet (Wasko 2002, Tryon 2009: 93-124). New forms of film have evolved including the director's cut, the animated prequel,

the film's website with various 'extras' and the DVD release that incorporates additional material including deleted scenes. A 'platform agnostic' generation of film viewers, relatively indifferent to the form in which they encounter a film, are also looking to the Internet as an unlimited warehouse for digital versions of films that can be downloaded 'on demand' onto home computers (Tryon: 94-5). The 'long tail' of digital distribution makes available huge numbers of films that allows for niche marketing (Anderson 2009: 133-35)

Increasingly film consumption is centred in the home. 'Home film cultures' have grown rapidly since the 1980s, fuelled by the widespread release of titles on video and now DVD, leading to the growth of a new form of connoisseurship, the collector who amasses an extensive library of films (Klinger 2006). DVD 'special editions' with authoritative commentaries and extratextual material can add to a film's cultural capital and its sense of significance, promoting a form of knowledgeable cinephilia, though this often takes the form of the cult film rather than the historically significant one (Barlow 2005: 76-7, 110-11). And, as Aaron Barlow argues, DVDs must be understood as a new form of film, one that enables chapter viewing, freeze-framing, forward and reverse slow motion and rapid scanning, even subtitling, all of which are controlled by viewers themselves. DVDs thus alter the way in which a film is experienced by the viewer, promoting modes of attention and engagement that differ significantly from seeing a film theatrically (Barlow 2005: 19, Isaacs 2008: 13-14).

These new forms of interaction are assiduously promoted by media corporations which, in an era of convergence, now work to a different logic that reshapes the relationship between audiences and producers (Jenkins 2006: 12). The new digital technologies have been designed to be more responsive to consumer

feedback, and are more 'participatory', although, as Jenkins acknowledges, in most interactive environments what the user does is pre-structured by the designer and shaped by existing social and cultural protocols. Jenkins claims that the increasing proliferation of fan and Internet communities that dissect and comment on the various versions of a film are gradually gaining more power and influence as companies begin to respond to their needs and desires (ibid.: 258; see also Keane 2007: 76-86).

Nor are these new forms of viewing confined to current films. As Victor Burgin argues in *The Remembered Film*, there are now far more possibilities for controlling and selecting the viewing experience of almost any film including 'classics' and thus 'for dismantling and reconfiguring the once inviolable objects offered by narrative cinema', formerly localized in time and space (2004: 8-9). Laura Mulvey's exploration of this changed relationship to earlier films in *Death 24x a Second* argues that freeze framing alters the connection between the still frame and the moving image, between continuous movement and stillness, and thus has the capacity to restore to film the weighty presence of passing time that earlier theorists, André Bazin and Roland Barthes, associated with the still photograph (2006: 66). Digital processes allow viewers to contemplate the sensuous beauty of specific images, breaking down the linearity of narrative continuity and splitting apart the different levels of time that are usually fused together. However, Mulvey argues, this new relationship to time is not a return to an earlier mode of attention. The older ontology of the singularity of the moment and the unrepeatable succession of events, has been replaced by a new ontology in which 'ambivalence, impurity and uncertainty displace traditional oppositions' (ibid: 12).

### **The Evolution of Film: New Forms and Practices – Digital Film Aesthetics**

Digital technologies have led to the evolution of new forms of film and aesthetic practices. The most sustained and penetrating attempt to analyze 'digital cinema' is Lev Manovich's *The Language of New Media* that understands it as the product of the two interconnected histories of computing and media technologies (2001: 20). Manovich argues that in losing its indexical connection to the material world and becoming electronic art, film is now best understood as an expressive, graphic medium, as a sub-genre of painting (295) or '*a particular case of animation that uses live-action footage as one of its many elements*' (302, original emphasis). The 'logic of replacement', characteristic of analogue film, has given way to the 'logic of addition and coexistence' (325), where data is endlessly mutable, selecting and recombining elements from existing menus, providing a navigable space for the user to surf (287). Analogue film's characteristic manipulation of space and time through montage and the cut has been replaced by the morph or digital composite (143), where elements are not juxtaposed but blended, and boundaries erased rather than foregrounded (155). For Manovich, this mutability of data offers extraordinary new possibilities for film-makers to generate, organize, manipulate, and distribute images (314), including the re-emergence of complex spatial narratives (324).

Few of these possibilities have so far been realized in mainstream cinema that has concentrated on using CGI to create visceral special effects within the existing aesthetic paradigms of classical cinema, albeit with the proliferation of mythic or fantasy worlds, often derived from comics or graphic novels. However, digital techniques have had an impact on film aesthetics in shot length, framing, camera movement, and the varied combinations of CGI and live action (Allen 2002). The existing principles of aesthetic distance and sequential unfolding are gradually giving way to ones based on 'envelopment and temporal simultaneity' (Morse 1999: 64).

‘Impossible’ events are shown as if actually happening and an ultra-detailed photo-realism renders the fantastic with the surface accuracy associated with photography. This has the function of insinuating that the real and the digital exist in the same time and space, and also presenting CGI imagery as a self-validating spectacle, thus demonstrating what Bolter and Grusin call the twin logics of ‘immediacy’ and ‘hypermediacy’ (1998: 6, 14, 21, 155). Increasingly, the ‘real’ is presented as a form of spectacle (Hayward and Wollen 1993: 2, King 2005: 13). This connects film, as Andrew Darley demonstrates in *Visual Digital Culture* (2000), to a range of practices (including music videos, computer games, theme park simulation rides and advertisements) whose mode is hyperreal spectacle, and which solicit audiences into seeking direct and immediate visual pleasures in a poetics of surface play and immersive spectacle rather than intelligibility (2000 169-73, 193 and *passim*).

As Manovich indicated, use of the morph is becoming more frequent. But, as Vivian Sobchack reminds us, although it represents, in its effortless shape-shifting that confuses (often disturbingly) the animate and the inanimate, a fluidity and instability of body shape and identity that is characteristically postmodern, like all digital practices, morphing has a complex genealogy. It is thus an evolutionary practice with powerful historical precedents that link ‘present day digital practice to a much broader history ... of metamorphosis and its meanings’, including early cinema’s magic shows, attractions and trick films (2000b xiv-xv). A rather different digital effect was ‘bullet-time’ used in *The Matrix* (1999) in which, through a combination of conventional camerawork and computer animation, ‘while an event plays out in slow motion, the camera appears to move the action at a higher speed and in a different direction’ (Purse 2005: 152). The effect is both dynamic and immersive, drawing the spectator ‘fully into the diegetic space, disrupting the conventional spatial

relationship between the spectator, the screen, and the filmic world' (ibid: 157-58). In the sequels, *Reloaded* and *Revolutions* (both 2003), this enveloping, immersive effect increased through the use of free-floating cameras within entirely virtual sets (Keane 2007: 125).

If mainstream feature films use digital aesthetics conservatively, much more radical uses occur in more avant-garde cultural practices.<sup>9</sup> A number of studies have documented these new forms.<sup>10</sup> A useful conspectus is provided in Holly Willis's *New Digital Cinema: Reinventing the Moving Image*, which argues that digital film-making is creating new forms of self-reflexive film that have fluid boundaries, breaking out of the confines of the rectangular cinema frame and standard genres. These new (or revived) forms are situated at the intersection of formerly separate realms of film-making: music video, animation, print design, street art, live club events, videoart, installations in galleries and museums, and now digital graffiti (2005: 4). These various locations are creating, along with the Internet, new environments in which viewers engage and interact with film. Like Manovich, Willis argues that digital films are characterized by a radical reorientation of spatial perception, the synthetic digital imagery creating a giddy sense of freedom that produces open and kaleidoscopic structures (ibid.: 67-8). These works help create a new film grammar and syntax built on hybridity and mixed forms, melding disparate film stocks, genres and formats that look back to modernist avant-garde experimentation but also create new 'digitextual' forms (Everett 2003), in their radical challenge to the paradigms of classical Hollywood cinema.

In the process of creating these new forms across multiple platforms, the role of the director is shifting significantly, morphing into the 'digitextualist' attuned to the flow and mix of codes on multiple screens in various locations. David Lynch, who

always stretched the definition of what film could be – *Inland Empire* (2006) proceeds through the associative logic of hyperlinks – has devoted increasing energy and time to experiments with flash animation and low-definition digital video available to view on his website. In the process, Lynch has created a ‘meta-auteur persona, consistently reflecting on the changing nature of authorship and spectatorship and adapting the presentation of his work accordingly’ (Samardzija 2010: 4). Peter Greenaway, whose whole career has been devoted to subverting the ‘four tyrannies’ of traditional filmmaking, the script, actor, camera and frame, has comprehensively abandoned a single format in works that are multiple and densely layered, making him one of the great practitioners of the new form of ‘database cinema’ (Manovich 2001: 237-39). This is best exemplified in *The Tulse Luper Suitcases* (2004), a ‘media mosaic’, consisting of four feature films, an interactive CD-ROM, 92 DVDs, an online game, a television series, numerous museum/gallery shows of the 92 suitcases, books and exhibitions, and the construction of several interactive websites that add new material, rework footage and encourage the user to connect with Greenaway’s earlier work, and other aspects of Luper’s ‘life’, as well as hosting a huge virtual archive that contains databases of images and information. Greenaway thus creates a complex, elusive, fragmentary ‘historiographic metafiction’ whose proliferating networks have generated their own fictional world (Peeters 2008: 323-38).

However, this ‘metacinema’ unfolding across multiple media platforms is not confined to avant-garde practice. Jenkins’s central example of convergence culture and ‘transmedia storytelling’ that creates an encyclopaedic digital ‘multimyth’, is the Wachowski brothers’ hugely successful ‘The Matrix’ franchise (2006: 95-134). This consisted of an initial feature film released in 1999, two sequels released in 2003, nine short animated films made by different film-makers (*The Animatrix*) and a videogame



(*Enter the Matrix*) also released in 2003 – which the distributors, Warner Bros., styled the ‘Year of The Matrix’ – several comic books and short stories released on the website and a ‘special’ ten-disc DVD, *The Ultimate Matrix Collection* (2004), containing six discs of additional material including detailed explanations of digital aesthetic innovations such as ‘bullet time’. A clever mixture of popular fears concerning the impact and direction of technological change, cryptic allusions (including a reference to Baudrillard’s *Simulacra and Simulations*), and an old fashioned narrative of redemption and visceral action sequences, ‘The Matrix’ was less a cinematic text than an evolving popular culture entity, what Bruce Isaacs labels a third order metacinematic ‘hypermyth’ composed of simulacral tropes or cinematic quotations, that engages viewers in various forms in its evolving construction of a simulated, digitextual universe (2008: 118-130). Isaacs argues that it represents the characteristic work of a new generation of directors (his other example is Quentin Tarantino) for whom the cinematic imaginary is better than the real thing, who display a love of cinema not a love of art (ibid: 181).

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What the Wachowskis’ ‘The Matrix’ or Greenaway’s *The Tulse Luper Suitcases* demonstrate is that, if a particular form of cinema is over, film, in its varied ‘virtual life’, continues to be a crucial component of art and popular culture in the digital age. Film, in all its guises, remains central to a contemporary culture in which the conception of stable, enduring, finished works authenticated by an original version is disappearing, replaced by ‘one that recognizes continual mutation and proliferation of variants’ (Mitchell 1992: 52). Just as film was essential, as has been discussed, to the ways in which a broad public could come to terms with modernity, so it remains

fundamental to postmodern digital culture. As Manovich argues, film has prepared audiences for new media because cinematic ways of seeing the world, of structuring time, of narrating a story, of linking one experience to the next, have become the basic means by which computer users access and interact with all cultural data. We continue to see the world through rectangular frames, and cinema's aesthetic strategies have become the basic organizational principles of computer software and even virtual reality machines (2001: 50, 79, 81-6).

However, to understand that film retains an important place in the digital era and that the changes it has experienced are evolutionary rather than revolutionary, is not to underestimate the extent or profundity of those changes. The multiple and proliferating forms of film across a range of media and on a variety of screens has impelled, as noted in the Introduction, a questioning of film's specificity and identity, prompting an uncertainty as to whether 'film is a central text with ancillary products in other media forms, or simply a media platform in a multimedia environment' (Harbord 2007: 43). David Rodowick argues that at an ontological level, a particular form of perception that gave attention to things in themselves and their duration, an appreciation of the sensuous depth of reproduced images and with them the 'complexity and density of phenomenological experience' and a 'deep connectedness with a way of being in the world', with memory and history, is now passing as we move into a digital culture (2007: 69-79).<sup>11</sup> He suggests that because digital images are less tied to the 'prior existence of things' as they neither occupy space nor change through time (137), they change our conception and our phenomenological relationship with images (86-7, 98). As Rodowick acknowledges, digital images often seem colder, less involving (107-08) and their proliferation may involve a retreat from the sensuous exploration of the physical world and the material structure of everyday

life that were so central to the development of photography and film. Although Rodowick concludes that ‘synthetic imagery is neither an inferior representation of physical reality nor a failed replacement for the photographic, but rather a fully coherent expression of a different reality, in fact, a new ontology’ that provides the opportunity for the artist to probe imaginative life and a new kind of sociality (174-76), he also poses the question: ‘When filmmaking and viewing become fully digital arts, will a certain experience of cinema be irretrievably lost?’ (31). In the same vein, Leo Enticknap wonders how future film scholars will be able to understand the aesthetics and impact on audiences of 35 mm film if it only exists as a digital surrogate (2009: 420; see also Dixon 2000: 229).

These are genuine fears, but the specific crisis that Film Studies is experiencing through the impact of digital technologies and its loss of ‘medium specificity’ is mirrored in other disciplines (see, for instance, Krauss 1999) and is itself symptomatic of a deeper uncertainty about new ways of living and experiencing the world (Gunning 2000: 328). As Thomas Elsaesser remarks, the term ‘digital’ is ‘less a technology than a cultural metaphor of crisis and transition’ (1998: 202).<sup>12</sup> Thus the problems many film scholars are wrestling with should engage the attention of those who practice Visual Culture Studies. Mieke Bal characterizes Film Studies, along with Art History, as an object-defined discipline and thus to be distinguished from the interdisciplinary project of Visual Culture and its concern with practices of looking both historically and in the digital age (2003: 7, 9, 11, 13). There are eminent film scholars, such as Dudley Andrew, who wish to maintain Film Studies’ disciplinary boundaries and who fear film’s submergence into ‘some larger notion of the history of audiovisions’ or its disappearance into ‘the foggy field of cultural studies’ (2010: xvii).<sup>13</sup> Even Lisa Cartwright, whose work has been central to Visual

Culture, argues in her essay on film and digital technologies that disciplinary convergence should not mean ‘a flattening of difference and a de-skilling of [film’s] labor force’ (2002: 424).

However, what the studies discussed in this essay demonstrate is that an engagement with broader concerns does not preclude retaining a particular focus on film, nor detailed empirical research into specific forms, practices and historical moments. Anne Friedberg – whose own work exemplifies this process – argues that increasingly film scholars are coming to recognise the importance of Visual Culture Studies which, she argues, has encouraged them ‘to contextualize the study of film and other media in relation to a deeper history of visual representation and within a broader conception of the practices of vision and visibility’ (2006: 253, n. 21). If, as I have suggested, Film Studies is becoming more interdisciplinary, with film scholars increasingly moving into the terrain occupied by cultural history and visual studies and discussing phenomena rather than objects, working with a wider conception of ‘film’ both historically and in the present, then its relationship with Visual Culture will become increasingly close and productive. Indeed, I want to argue that Film Studies’ continuing historical and theoretical project (broadly conceived) is vital to a dynamic and expanding ‘interdiscipline’ of Visual Culture, one that can draw on the resources of a variety of disciplines to ‘construct a new and distinctive object of research’ (Mitchell 2005: 356). I see no reason why the particular knowledge and training of film scholars and the very real achievements of film scholarship need to be sacrificed in this process as they continue to engage with the broader issues of perception and visibility that Visual Culture has helped to identify.

## **Conclusion**

The debates about film's medium specificity and ontology are, as Dudley Andrew's recent polemic (2010) indicates, far from settled. But, as this essay has argued, the impact of digital technologies has impelled film scholars, from a range of perspectives, to try to redefine their discipline and broaden its research agenda. As noted, we appear to be living in a threshold moment when the relationship between the past, present and future of film can be rethought. This has involved both a turn to history – I did not have the space to consider many other provocative and stimulating accounts such as Giuliana Bruno's work on film and architecture (1993, 2002) – and the growth of a range of more explicitly philosophical studies, including, in addition to those I have mentioned, important monographs by Sean Cubitt (2004) and Garrett Stewart (2007), which try to tease out the ontological as well as the aesthetic implications of the shift from analogue to digital. As I have suggested, the major shift that has happened in the past decade or so has been the sustained effort by scholars, notably Manovich, to apprehend and also, importantly, to describe in detail, the *evolutionary* nature of new media, to understand new forms and practices as historical, hybrid and possibly transitional. This has replaced, to a large extent, the disabling future casting that characterized previous studies of new media. Therefore we can look forward to studies of digital cinema that become ever more precise in their delineation of technological and aesthetic changes in the production, distribution, exhibition and consumption of film. But, even more importantly, ones, such as Nicholas Rombes' *Cinema in the Digital Age* (2009), that also engage with the possible cultural meanings of those changes.

As I have shown, in the process of considering the evolution of new forms of film, Film Studies has been forced to revise its central tenets including the centrality of Hollywood. This has necessitated a scrutiny of Hollywood itself – as in Jon

Lewis's provocative collection *The End of Cinema as We Know it* (2001) and Geoff King's work on 'Indiewood' (2009) – but also an important new research agenda that considers the evolution of transnational cinema. In addition to the studies mentioned, important work is being undertaken on other forms of global cinema, for instance Derek Bose's study of Bollywood (2006). What I have characterized as Film Studies' post-digital revisionist project has included the rethinking of auteurism and the role of the director (with Greenaway and Lynch as exemplars of the shift away from the feature film into multi-site modes), but has also involved new work on film genres (e.g. Langford 2005) and on gender, for instance Krin Gabbard and William Luhr's collection (2008) that includes attention to masculinities as well as femininities, queer and ethnic representations. Finally, Bruce Isaacs's work (2008), already referenced, on 'metacinematic hypermyths' suggests a highly productive area for further research and enquiry, one that moves beyond the confines of The Matrix mini-industry or Tarantino to consider how films themselves are part of wider cultural networks that accrete and proliferate endlessly in the highly populated cyberspace of digital culture.

## References

- Acland, Charles. 2003. *Screen Traffic: Movies, Multiplexes and Global Culture*. Durham & London: Duke University Press.
- Allen, Michael. 2002. "The Impact of Digital Technologies on Film Aesthetics." In Dan Harries (ed.), *The New Media Book*. London: BFI.
- Anderson, Chris. 2009. *The Longer Tail: How Endless Choice Is Creating Unlimited Demand*. London: Random House Business Books.
- Andrew, Dudley. 2010. *What Cinema Is! Bazin's Quest and its Charge*. Malden, MA. & Oxford: Wiley-Blackwell.

- Bal, Mieke. 2003. "Visual Essentialism and the Object of Visual Culture." *Journal of Visual Culture*, 2(1): 5-32.
- Barlow, Aaron. 2005. *The DVD Revolution: Movies, Culture, Technology*. Westport, CT: Praeger Press.
- Beckman, Karen and Jean Ma. 2008. "Introduction." In Karen Beckman and Jean Ma (eds), *Still Moving: Between Cinema and Photography*. Durham & London: Duke University Press.
- Belton, John. 2002. "Digital Cinema: A False Revolution." *October* 100: 98-114.
- Cartwright, Lisa. 2002. "Film and the Digital in Visual Studies: Film Studies in the Era of Convergence." *Journal of Visual Culture*, 1(1): 7-23. Reprinted in Nicholas Mirzoeff (ed.), *The Visual Culture Reader*. 2<sup>nd</sup>. edn. 2002. London: Routledge.
- Boddy, William. 2008. "A Century of Electronic Cinema." *Screen* 49(2): 142-56.
- Bolter, Jay David and Richard Grusin. 1998. *Remediation: Understanding New Media*. Cambridge, Mass. & London: MIT Press.
- Bordwell, David. 1996. "Contemporary Film Studies and the Vicissitudes of Grand Theory." In David Bordwell and Noël Carroll (eds), *Post-Theory: Reconstructing Film Studies*. Wisconsin: University of Wisconsin Press.
- Bose, Derek. 2006. *Brand Bollywood: A New Global Entertainment Order*. London: Sage.
- Bruno, Giuliana. 1993. *Streetwalking on a Ruined Map: Cultural Theory and the City Films of Elvira Notari*. Princeton, NJ: Princeton University Press.
- Bruno, Giuliana. 2002. *Atlas of Emotion: Journeys in Art, Architecture, and Film*. London: Verso.
- Burgin, Victor. 2004. *The Remembered Film*. London: Reaktion Books.
- Carroll, Noël. 1996. *Theorizing the Moving Image*. Cambridge: Cambridge University

Press.

Caldwell, John T. 2008. *Production Culture: Industrial Reflexivity and Critical Practice in Film and Television*. Durham, NC. & London: Duke University Press.

Chapman James, Mark Glancy and Sue Harper. 2007. "Introduction". In James Chapman, Mark Glancy and Sue Harper (eds), *The New Film History: Sources, Methods, Approaches*. Basingstoke: Palgrave Macmillan.

Charney, Leo. 1998. *Empty Moments: Cinema, Modernity, and Drift*. Durham, NC. & London: Duke University Press.

Charney, Leo and Vanessa Schwartz. 1995. "Introduction." In Leo Charney and Vanessa Schwartz (eds), *Cinema and the Invention of Modern Life*. Berkeley, Los Angeles & London: University of California Press.

Corbett, Kevin J. 2001. "The Big Picture: Theatrical Moviegoing, Digital Television, and Beyond the Substitution Effect." *Cinema Journal* 40(2): 17-34.

Crary, Jonathan. 1992. *Techniques of the Observer: On Vision and Modernity in the Nineteenth Century*. Cambridge, Mass. & London: MIT Press.

Crary, Jonathan. 2001. *Suspensions of Perception: Attention, Spectacle, and Modern Culture*. Cambridge, Mass. & London: MIT Press.

Cubitt, Sean. 2002. "Digital Filming and Special Effects." In Dan Harries (ed.), *The New Media Book*. London: BFI.

Cubitt, Sean. 2004. *The Cinema Effect*. Cambridge, Mass. & London: MIT Press.

Darley, Andrew. 2000. *Visual Digital Culture: Surface Play and Spectacle in New Media Genres*. London: Routledge.

Dixon, Wheeler Winston. 2000. *The Second Century of Cinema: The Past and Future of the Moving Image*. New York: State University of New York Press.



- Doane, Mary Ann. 2002. *The Emergence of Cinematic Time: Modernity, Contingency, the Archive*. Cambridge, Mass. & London: Harvard University Press.
- Đurovičová, Nataša and Kathleen Newman (eds). 2010. *World Cinemas, Transnational Perspectives*. New York & London: Routledge.
- Elsaesser, Thomas. 1998. "Digital Cinema: Delivery, Event, Time." In Thomas Elsaesser and Kay Hoffman (eds), *Cinema Futures: Cain, Abel or Cable? Screen Arts in the Digital Age*. Amsterdam: Amsterdam University Press.
- Elsaesser, Thomas. 2000. "The New New Hollywood: Cinema Beyond Distance and Proximity." In Ib Bondebjerg (ed.), *Moving Images, Culture and the Mind*. Luton: University of Luton Press.
- Enticknap, Leo. 2005. *Moving Image Technology: From Zoetrope to Digital*. London: Wallflower Press.
- Enticknap, Leo. 2009. "Electronic Enlightenment or the Digital Dark Age? Anticipating Film in the Age Without Film." *Quarterly Review of Film and Video* 26: 415-24.
- Everett, Anna. 2003. "Digitextuality and Click Theory: Theses on Convergence Media in the Digital Age." In Anna Everett and John T. Caldwell (eds), *New Media: Theories and Practices of Digitextuality*. London & New York: Routledge.
- Figgis, Mike. 2007. *Digital Film-Making*. London: Faber and Faber.
- Friedberg, Anne. 1993. *Window Shopping: Cinema and the Postmodern*. Berkeley, Los Angeles & London: University of California Press.
- Friedberg, Anne. 2006. *The Virtual Window: From Alberti to Microsoft*. Cambridge, Mass. & London: MIT Press.
- Gabbard, Krin and William Luhr (eds). 2008. *Screening Genders*. New Brunswick, NJ & London: Rutgers University Press.

- Gaines, Jane M. and Michael Renov (eds). 1999. *Collecting Visible Evidence*. Minneapolis & London: University of Minnesota Press.
- Galt, Rosalind and Karl Schoonover (eds). 2010. *Global Art Cinema: New Theories and Histories*. New York and London: Oxford University Press.
- Geuens, Jean-Pierre. 2000. "The Digital World Picture." *Film Quarterly* 55(4): 16-27.
- Gledhill, Christine and Linda Williams (eds). 2000. *Reinventing Film Studies*. London: Arnold.
- Grusin, Richard. 2007. "DVDs, Video Games and the Cinema of Interactions." In James Lyons and John Plunkett (eds), *Multimedia Histories: From the Magic Lantern to the Internet*. Exeter: University of Exeter Press.
- Gunning, Tom. 1990. "The Cinema of Attractions: Early Film, Its Spectator and the Avant-Garde." In Thomas Elsaesser and Adam Barker (eds), *Early Cinema: Space, Frame, Narrative*. London: BFI.
- Gunning, Tom. 1995. "An Aesthetic of Astonishment: Early Film and the [In]Credulous Spectator." In Linda Williams (ed.), *Viewing Positions*. New Brunswick: Rutgers.
- Gunning, Tom. 2000. "'Animated Pictures': Tales of Cinema's Forgotten Future, after 100 years of Films." In Christine Gledhill and Linda Williams (eds), *Reinventing Film Studies*. London: Arnold.
- Hamlyn, Nicky. 2003. *Film Art Phenomena*. London: BFI Publishing.
- Hansen, Miriam. 2000. "The Mass Production of the Senses: Classical Cinema as Vernacular Modernism." In Christine Gledhill and Linda Williams (eds), *Reinventing Film Studies*. London: Arnold.

- Hansen, Miriam. 2010. "Vernacular Modernism: Tracking Cinema on a Global Scale." In Nataša Đurovičová and Kathleen Newman (eds), *World Cinemas, Transnational Perspectives*. New York & London: Routledge.
- Hanson, Matt. 2004. *The End of Celluloid: Film Futures in the Digital Age*. Mies, Switzerland: RotoVision.
- Harbord, Janet. 2007. *The Evolution of Film: Rethinking Film Studies*. Cambridge: Polity Press.
- Iordanova, Dina, David Martin-Jones and Belen Vidal (eds). 2010. *Cinema at the Periphery*. Detroit: Wayne State University Press.
- Isaacs, Bruce. 2008. *Toward a New Film Aesthetic*. New York: Continuum.
- Jenkins, Henry. 2006. *Convergence Culture: Where Old and New Media Collide*. New York & London: New York University Press.
- Keane, Stephen. 2007. *CineTech: Film, Convergence and New Media*. Basingstoke: Palgrave Macmillan.
- Kern, Stephen. 2003. *The Culture of Time and Space 1880-1918*. Cambridge, Mass. & London: Harvard University Press.
- King, Geoff. 2005. "Introduction: The Spectacle of the Real." In Geoff King (ed.), *The Spectacle of the Real: From Hollywood to Reality TV and Beyond*. Bristol: Intellect.
- King, Geoff. 2009. *Indiewood, USA: Where Hollywood Meets Independent Cinema*. London: I.B. Tauris.
- Klinger, Barbara. 2006. *Beyond the Multiplex: Cinema, Technologies, and the Home*. Berkeley, Los Angeles & London: University of California Press.
- Krauss, Rosalind. 1999. *"A Voyage on the North Sea": Art in the Age of the Post-Medium Condition*. London: Thames & Hudson.

- Langford, Barry. 2005. *Film Genre: Hollywood and Beyond*. Edinburgh: Edinburgh University Press.
- Le Grice, Malcolm. 1999. "Digital Cinema and Experimental Film – Continuities and Discontinuities." In Malcolm Le Grice. 2001. *Experimental Cinema in the Digital Age*. London: BFI.
- Lewis, Jon. 2001. *The End of Cinema as We Know it: American Film in the Nineties*. New York: New York University Press.
- Lister, Martin, Jon Dovey, Seth Giddings, Iain Grant and Kieran Kelly. 2009. *New Media: A Critical Introduction*. 2<sup>nd</sup>. edn. London: Routledge.
- Lyons, James and John Plunkett. 2007. "Introduction." In James Lyons and John Plunkett (eds), *Multimedia Histories: From the Magic Lantern to the Internet*. Exeter: University of Exeter Press.
- Manovich, Len. 2001. *The Language of New Media*. Cambridge, Mass. & London: MIT Press.
- Marchessault, Janine and Susan Lord. 2007. "Introduction." In Janine Marchessault and Susan Lord (eds), *Fluid Screens, Expanded Cinema*. Toronto & London: University of Toronto Press.
- Massumi, Brian. 2002. *Parables for the Virtual: Movement, Affect, Sensation*. Durham & London: Duke University Press.
- Mitchell, William J. 1992. *The Reconfigured Eye: Visual Truth in the Post-Photographic Era*. Cambridge, Mass. & London: MIT Press.
- Mitchell, W.J.T. 2002. "Showing Seeing: A Critique of Visual Culture." *Journal of Visual Culture* 1(2): 165-81; reprinted in *What Do Pictures Want? The Lives and Loves of Images*. 2005. Chicago & London: University of Chicago Press.
- Morse, Margaret. 1999. "Body and Screen." *Wide Angle* 21(1): 63-75.

- Mosco, Vincent. 2004. *The Digital Sublime: Myth, Power, and Cyberspace*. Cambridge, Mass. & London: MIT Press.
- Mulvey, Laura. 2006. *Death 24x a Second: Stillness and the Moving Image*. London: Reaktion Books.
- Mulvey, Laura. 2007. "Foreword." In James Lyons and John Plunkett (eds), *Multimedia Histories: from the Magic Lantern to the Internet*. Exeter: University of Exeter Press.
- Naficy, Hamid (ed.). 1999. *Home, Exile, Homeland: Film, Media, and the Politics of Place*. London: Routledge.
- Naficy, Hamid. 2001. *An Accented Cinema: Exilic and Diasporic Filmmaking*. Princeton, NJ: Princeton University Press.
- Naficy, Hamid. 2009. "From Accented Cinema to Multiplex Cinema." In Janet Staiger and Sabine Hake (eds), *Convergence Media History*. New York & London: Routledge.
- Peeters, Heide. 2008. "The Tulse Luper Suitcases: Peter Greenaway's Left Luggage." In Paula Willoquet-Maricondi and Mary Alemany-Galway (eds), *Peter Greenaway's Postmodern/Poststructuralist Cinema*. Lanham, Maryland: Scarecrow Press.
- Purse, Lisa. 2005. "The New Spatial Dynamics of the Bullet-Time Effect." In Geoff King (ed.), *The Spectacle of the Real: From Hollywood to Reality TV and Beyond*. Bristol: Intellect.
- Reiser, Martin and Andrea Zapp (eds). 2002. *New Screen Media: Cinema/Art/Narrative*. London: BFI.
- Rodowick, D.N. 2001. *Reading the Figural, or, Philosophy after the New Media*. Durham & London: Duke University Press.

- Rodowick, D.N. 2007. *The Virtual Life of Film*. Cambridge, Mass. & London: Harvard University Press.
- Rombes, Nicholas. 2009. *Cinema in the Digital Age*. London: Wallflower Press.
- Rosen, Philip. 2001. *Change Mummified: Cinema, Historicity, Theory*. Minneapolis & London: University of Minnesota Press.
- Samardzija, Zoran. 2010. "DavidLynch.com: Auteurship in the Age of the Internet and Digital Cinema", *Scope* 16. Available online: <http://www.scope.nottingham.ac.uk/article.php?issue=16&id=1171>, accessed 25 March 2010.
- Schivelbusch, Wolfgang. 1986. *Railway Journey: The Industrialization and Perception of Time and Space*. Berkeley, Los Angeles: University of California Press.
- Schivelbusch, Wolfgang. 1995. *Disenchanted Night: The Industrialization of Light in the Nineteenth Century* (trans. Angela Davies). Berkeley, Los Angeles: University of California Press.
- Schwartz, Vanessa. 1998. *Spectacular Realities: Early Mass Culture in Fin-de-Siècle Paris*. Berkeley, Los Angeles: University of California Press.
- Shaw, Jeffrey and Peter Weibel (eds). 2002. *Future Cinema: The Cinematic Imaginary After Film*. Cambridge, Mass. & London: MIT Press.
- Simons, Jan. 2002. "New Media as Old Media: Cinema." In Dan Harries (ed.), *The New Media Book*. London: BFI.
- Singer, Ben. 2001. *Melodrama and Modernity: Early Sensation Cinema and Its Contexts*. New York: Columbia University Press.
- Sklar, Robert. 1990. "Oh! Althusser!: Historiography and the Rise of Cinema Studies." In Robert Sklar and Charles Musser (eds), *Resisting Images: Essays on Cinema and History*. Philadelphia: Temple University Press.

- Sobchack, Vivian. 2000a. "What is Film History?, or, the Riddle of the Sphinxes." In Christine Gledhill and Linda Williams (eds), *Reinventing Film Studies*. London: Arnold.
- Sobchak, Vivian (ed.). 2000b. *Meta-Morphing: Visual Transformation and the Culture of Quick Change*. Minneapolis: University of Minnesota Press.
- Spicer, Andrew. 2004. "Film Studies and the Turn to History." *Journal of Contemporary History* 39(1): 147-55.
- Staiger, Janet and Sabine Hake (eds). 2009. *Convergence Media History*. New York & London: Routledge.
- Stam, Robert and Ella Habiba Shohat. 2000. "Film Theory and Spectatorship in the Age of the 'Posts.'" In Christine Gledhill and Linda Williams (eds), *Reinventing Film Studies*. London: Arnold.
- Stewart, Garrett. 2007. *Framed Time: Toward a Postfilmic Cinema*. Chicago: Chicago University Press.
- Tredell, Nicolas. 2002. *Cinemas of the Mind: A Critical History of Film Theory*. Cambridge: Icon Books.
- Tryon, Chuck. 2009. *Reinventing Cinema: Movies in the Age of Convergence*. New Brunswick, NJ. & London: Rutgers University Press.
- Wasko, Janet. 2002. "The Future of Film Distribution and Exhibition." In Dan Harries (ed.), *The New Media Book*. London: BFI.
- Wasson, Heidee. 2007. "The Networked Screen: Moving Images, Materiality, and the Aesthetics of Size." In Janine Marchessault and Susan Lord (eds), *Fluid Screens, Expanded Cinema*. Toronto & London: University of Toronto Press.
- Willis, Holly. 2005. *New Digital Cinema: Reinventing the Moving Image*. London: Wallflower Press.

Wollen, Tana and Philip Hayward. 1993. "Introduction: Surpassing the Real." In Tana Wollen and Philip Hayward (eds), *Future Visions: New Technologies of the Screen*. London: BFI.

Zielinski, Siegfried. 1999. *Audiovisions: Cinema and Television as Entr'actes in History*. Amsterdam: Amsterdam University Press.

### **Suggested Reading**

Chapman, James, Mark Glancy and Sue Harper (eds). 2007. *The New Film History: Sources, Methods, Approaches*. Basingstoke: Palgrave Macmillan.

Gledhill, Christine and Linda Williams (eds). 2000. *Reinventing Film Studies*. London: Arnold.

Harbord, Janet. 2007. *The Evolution of Film: Rethinking Film Studies*. Cambridge: Polity Press.

Lyons, James and John Plunkett (eds). 2007. *Multimedia Histories: From the Magic Lantern to the Internet*. Exeter: University of Exeter Press.

Manovich, Len. 2001. *The Language of New Media*. Cambridge, Mass. & London: MIT Press.

Rodowick, D.N. 2007. *The Virtual Life of Film*. Cambridge, Mass. & London: Harvard University Press.

### **Biography**

Andrew Spicer is Reader in Cultural History and Director of the Visual Culture Research Group in the Department of Art and Design, University of the West of England. He has published widely on the construction of masculinities, British film



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## Endnotes

<sup>1</sup> Definitions of what constitutes ‘new media’ vary but typically include the Internet, websites, computer multimedia, computer games, CD-ROMS, and DVDs. For a useful overview, see Lister et al (2009: 9-51).

<sup>2</sup> Bordwell contrasts current ‘post-theory’ scholarship with earlier studies that, he argues, aspired to the formulation of abstract ‘grand theory’, a problematic distinction. For a useful overview of the changes in film theory see Tredell 2002.

<sup>3</sup> Space does not permit a consideration of Gilles Deleuze’s two highly influential accounts of cinema – *Cinema 1: The Movement Image* (London: Athlone Press, 1992) and *Cinema 2: The Time Image* (London: Athlone Press, 1989) – that have generated a mini industry of critical exegesis and commentary. See, inter alia, Gregory Flaxman (ed.), *The Brain is the Screen: Deleuze and the Philosophy of Cinema*, Minneapolis and London: University of Minnesota Press, 2000.

<sup>4</sup> See *New Review of Film and Television Studies* 8(3), September 2010; Special Issue: Researching Cinema History.

<sup>5</sup> These accounts are informed by the seminal studies of Crary (1992 and 2001), Schivelbusch (1992 and 1995) and Kern (2003).

<sup>6</sup> Hansen has recently extended her argument: see Hansen 2010).

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<sup>7</sup> Nicholas Negroponte's *Being Digital* (London: Hodder and Stoughton, 1995) is a famous example.

<sup>8</sup> The journal *Transnational Cinemas* started in February 2010.

<sup>9</sup> Documentary film-making has also been evolving into a more open form through the use of digital technologies: see Cubitt 2002: 27; Gaines and Renov 1999.

<sup>10</sup> These include Le Grice 1999, Reiser and Zapp 2002, Shaw and Weibel 2002, Hamlyn 2003 and Hanson 2004; see also Zielinski 1999: 279-303.

<sup>11</sup> For further discussion of this point see Rodowick 2001: 203-34 and Rosen 2001: 301-49.

<sup>12</sup> Vincent Mosco (2004) has explored the various myths that have been constructed around the new digital technologies.

<sup>13</sup> See the contributions to the 'In Focus: What Is Cinema' section of *Cinema Journal* 43(3), Spring 2004.