Cinematic Techniques & Architectural Representation

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INTRODUCTION

The language of architecture by way of which we communicate the notions of construction methodology, complex geometry, social, environmental and even political ideas, is undergoing a series of changes that will affect the way in which we understand the discipline and therefore the industry.

Architects or historians present design and research intentions for the purpose of representing ideological, theoretical or even just plain practical aspects of building and construction. The tools and methods used to communicate these ideas are handed down from a discipline that is accustomed to borrowing from the developments in other closely related arts and sciences. As with the development of orthographic and perspectival drawing techniques in the renaissance, new technologies related to representation are now becoming available with the current developments in computer graphics and animation and their accessibility to architects designers and planners as well as historians and educators.

These tools are not only more powerful and available they are also universally understood because they make use of a common language developed over a recent number of years and to some degree, like a living language, are still under construction.

The Graphic User Interface. Desktop Metaphors, the Mouse and the Internet have all contributed to a global language that can facilitate access to this technology. However, this technology can both serve to entrench the established methods or liberate new forms of expression.

Construction methods, site analysis, aesthetic and sociopolitical circumstances surrounding the design and construction of a building are traditionally communicated by way of representations that have always maintained a language of their own. To bridge these dialects is not always obvious and in some cases can prove ineffective.

Architectural presentations are steadily moving towards the linear presentation formats that are more commonly seen in other arts and industries such as Film and Television or WEB Design and contemporary Hyper-Media.

Narrative forms of representation in Film are inarguably the most effective means to convey a story. Based on a series of events, film strings together an idea and can communicate a general feeling or even an instantaneous sensation. Differentiated only by the length of time that each event takes or the length of time taken to explain the event, the absolute linearity of the re-telling is a condition of the medium of film.

The narrative itself can be of an explicative scientific nature or entirely for the purpose of entertainment. Whether narrative or documentary, literary or commercial, a film is categorically expository in form because whether the film is expressive, evocative or even provocative, the emotional trigger is conveyed through sequentially explicative events. As such, film is a medium inherently dependent on a time-space reference, as well as semiotic references that are consequently subordinate to established iconography and cultural symbolism.

Bruno Taut understood this notion as early as early as 1920; when he classified films into three distinct categories, although overlapping and complementary to each other.

"The categories are as follows:

(1) The generally stimulating film, which kindles the artistic imagination;

(2) The instructive film, produced as an aid to the teaching of art, craft, or architecture;

(3) The film as an autonomous work of art."[1]

Squarely placing his own film *"Der Weltbaumeister"* (an architectural drama never realized), within the third category of film as art, Bruno Taut explains within the second category that

for "Architecture: films of buildings and groups of buildings, shot by moving the camera around them, coming closer to show detail, and finally entering."[2] are better methods to represent architecture and that with film rather than the traditional perspective. "The student of architecture, like the layman, will thus acquire a lively notion of the true essence of architecture. He will free himself of the pictorial notions fostered hitherto by perspectival renderings and will learn to comprehend the building as a unified organism that grows inevitably out of the determinant factors of function, location, and the rest."[3] Taut suggests filming during theatrical performances as a demonstration of the relationship between architecture and drama and to compliment sectional drawings with animated views.

These suggestions, made more than eighty years ago at a time when even color was not an established standard in film, are only now being implemented in architecture.

The stillness

Unlike the still life painting, the landscape or the photograph, Film does not rely on the power of the gaze for the transfer of meaning. Although architecture has traditionally relied on the still image as a form of representation, new alliances are being formed with the development of motion graphics and animation and their accessibility to architects. "Artists and producers of both new and older media are remaking and incorporating one another's forms to create a variety of hybrids. Websites are looking more and more like TV but they also draw from books, magazines and encyclopedias; computer games incorporate cinematic techniques, perspective painting, and arcade games; graphic artists are referencing the computer interfaces of websites in their print designs; and theater and dance companies are beginning to employ video conferencing, internet projections, computer graphics, and complex computer/body interfaces to extend, magnify, and complicate audience perceptions and experiences."[4]

Conversely, the stillness of traditional architectural representations, not unlike the photograph, retains the values of the static image and its nostalgic reference. Vivian Sobchack asserts that "Paradoxically, as it objectifies and preserves in its acts of possession, the photographic has something to do with loss, with pastness, and with death, its meanings and value intimately bound within the structure and investments of nostalgia."[5] This is made especially clear in the film Blade Runner and its use of photographs as a signifier of personal identity. In the case of the replican, whether these are true or fabricated. In the same film, a photograph of an apartment also serves as an investigative tool in a fascinating if not technologically inexplicable extraction of the third dimension from an obviously two-dimensional image.

This technology is not available to us, –yet. However, for architecture and architectural education, technology may be advancing at a faster rate than its users are able to digest.

Without training in the specific form or application of these new technologies, architects are inclined to adapt their rudimentary forms to existing or traditional architectural methods without questioning or even exploring what possibilities may exist in the work that has been developed by other disciplines that have explored the same or similar paths.

THEORY & ISSUES

Film has always maintained the power of displacing the viewer in space and time and the depiction of architecture in film is practically unavoidable. Architecture will appear in most films by default, simply because it becomes the background to an event. When architecture becomes the focus of film, the representation of Architecture in Film can be a displacement of the same if not greater interest and complexity than the conventional subject of the film itself. However in the world of reality, where architecture is still defined, a different sort of displacement is evident in relation to architecture and its representation on Film. Architecture, either in its mystical form or in its concrete absolute, is primarily represented as the shell or container of the subject. A form of shelter, not from the weather or the elements, but rather an enclosure of the topic or subject matter that is being communicated within the film. In this way architecture acts as a barrier or protection from the possible peripheral distractions that might undermine any focus on the subject of the film. If and when the architecture itself becomes the subject of the film, a phenomenon of displacement can occur. Although, not always deliberate on the part of the film maker, nor for that matter, necessarily obvious to the viewer, the role of architecture as a symbol to this end is thereby displaced.

THE EXPLICATIVE EXPOSITORY AND THE EXPRESSIVE EVOCATORY

The establishing shot in any narrative film can be said to function within the narrative as a site analysis might function for the architect in the design of a building in the context of a specific neighborhood or community. Context, in architectural terms, performs a similar role as part of an architectural presentation, to establish a relationship between the character of the surrounding area and the proposed intervention.

Current technological advances in camera size, location setup and mobility coupled with a general public acceptance of the documentary format has made it possible for the so-called documentary style to find its way into many commercial and the full feature film. Even the most banal of films can find it necessary to include the captivating effects of the precariously jerky, deceiving yet convincingly truthful hand-held camera that is the signature style of the documentary. More often than

not, created for the purpose of lending an air of credibility to an otherwise oversimplified story or production.

Two important factors separate the documentary film from the narrative story in their relation to the representation of architecture. or for that matter. in their use as formats for architectural presentations.

First, although there has been a blurring of the line between the Narrative and the documentary form in film itself, architecture remains loyal to the pseudo scientific aspects of the documentary. Reality and the representation of reality are at the core of an architectural presentation when the credibility of professionals may be questioned. For this reason alone. the documentary format would be favored.

"However, the majority of navigable virtual spaces mimic existing physical reality without proposing any coherent aesthetic program. What artistic and theoretical traditions can the designers of navigable spaces draw upon to make them more interesting? One obvious candidate is modern architecture. From Melnikov, Le Corbusier, and Frank Lloyd Wright to Archigram and Bernard Tschumi, modern architects have elaborated a variety of schemes for structuring and conceptualizing space to be navigated by users: Villa Savoye (Le Corbusier), Walking City (Archigram), and Park de la Villette (Tschumi). Even more relevant is the tradition of 'paper architecture' – designs that were not intended to be built and whose authors therefore felt unencumbered by the limitations of materials, gravity and budgets. Another highly relevant tradition is film architecture. – the standard interface to computer space is the virtual camera modeled after the film camera rather than the simulation of unaided human sight."[6]

Moreover, the language of film and television are established and without question dominate now and are likely to continue over generations to come.

Second. the relationship between film and architecture is a precarious one.

As Anthony Vidler makes plain and clear "It is architecture that has had the most privileged and difficult relationship to Film"[7] Almost as if in denial of its opposite. film and architecture have danced a ritual of praise and dissent, but always in mutual respect. There is an implied innocence in the fabrication of reality and the construction of a simple movie set that is part of a simple story of simple people. Yet an entire generation of architects trained in the maxims of modernism can not accept the idea of a false façade. Not unlike the Miesian precept: "truth in materials" a truth that never really was or could be in its relation to ornament. Violated by Mies himself in his treatment of the façade of the Seagrams building, this truth left all subsequent generations after the *Modern* in doubt of these purist ideals. Reality in relation to construct of the existing

world had to be reviewed, redrawn and re-presented. Constructed reality as in the films: *One from the Heart* by Coppola or Kurosawa's *Dodeskaden* concoct a forced vision with a common thread that will always revert to an oversimplification of all matters relating to the background, indeed an apparent neglect for architecture itself. By way of their underlining or even deliberate emphasis on the subordinate background, these films use architecture by neglect in order to make their point. Conversely, films like *Tokyo Story* by Ozu and Mikhail Kalatozov's *I am Cuba*, use architecture specifically to drive their point. Ozu's notoriously stationary and low-angled camera views in Tokyo Story categorically disqualify this film as documentary style. Instead, Ozu makes use of architecture as a symbol sometimes representing progress, as in the cityscapes, and other times representing the opposite of progress in defense of the maintenance of traditional values, as in the family gathering over the traditional tatami room. To Ozu, Architecture cannot be neutral when represented in film.

In Federico Fellini's "neoreal", he "wants his camera to look at any kind of reality: not just social reality, but also spiritual reality, metaphysical reality, anything man has inside him"[8] constitutes a form of reality.

If film makers can see all of this in architecture. why shouldn't architects and their educators see as much or at least make use of the same techniques to communicate as well. Certainly, beyond the theoretical, many practical and even pragmatic aspects are applicable today. Cameras are reduced in size, the price of technology is diminished and developments arrive faster that we can absorb. However, if Academia remains reluctant to accept these changes and we are not receptive to possibilities outside our own disciplinary boundaries, the promise of visionaries like Bruno Taut or institutions like the Bauhaus would fade-out.

GENERAL STUDIO INFORMATION

For a number of years, an experimental design studio in the graduate and undergraduate program is exploring the possibilities inherent in the use of film techniques for the representation of architecture.

"From the point of view of film production, architecture is an almost unavoidable element of film. It ranges from being a mere background against which action takes place, without particular care for or emphasis on the architectural (spatial, formal, and symbolic) features or qualities of that background, to the other extreme, where architecture is almost the inspiring force behind the film. Fritz Lang's Metropolis is a rather obvious example of the latter."[9]

The following is a general description of the Studio. The semester is designed to explore architecture by way of film. two

disciplines that are closely related and at the same time distinctly separate. Architecture has a long history as a frame of reference in Film and Film in turn, has always been a powerful reference to architects.

The studio is organized into three segments that progressively inform a final project. Each segment contains one or more exercises in relation to different aspects of the Cinematheque project.

The projects focus on elements of architecture that corroborate this relationship with film, as well as resolving practical, contextual and functional issues. To this end the projects for this semester are organized cumulatively to cover computer skills.

Project I

The first project will focus on cinematic ideas found in film. These will be used as a conceptual foundation for your design project. It will be a 2D digital media presentation exercise and our first encounter with the WEB review. Select a film director from the list below and using the computer, prepare a presentation of that Director's work, including technique and philosophy relating to the use and representation of space in Film.

Woody Allen, Federico Fellini, Mikhail Kalatozov, Satyajit Ray, Jacques Tati, Bernardo Bertoluchi, Terry Gilliam, Wong Kar Wai, Alain Resnais, Giuseppe Tornatore, Luis Bunuel, Peter Greenaway, Stanley Kubrick, Martin Scorsese, Orson Wells, Charles Chaplin, D.W. Griffith, Akira Kurosawa, Ridley Scott, Wim Wenders, Francis F. Coppola, Werner Herzog, George Lucas, Steven Spielberg, Zhag Yi-Mou, Sergei Eisenstein, Alfred Hitchcock, Yasuhiro Ozu, Andrei Tarkovsky.

Project II is a site and program analysis.

The **site** analysis must address, amongst other phenomena, sound, natural light, view and access. The analysis will involve a dimensional survey that is to become a digital and physical site model.

All work will be presented in WEB format including the physical site model.

The **program** analysis will focus on the program as outlined in this document. The program section will define optimum proportions, layout, sizes and contents of the spaces both inside and out based upon the use of the spaces that make up the Cinematheque.

Project III Draws upon projects 1&2

Architecture that is unbuilt is largely in the mind of the creator. As such, architecture and film are closely related in their forms of representation, that is to say, the way in which both disciplines present an idea.

The design of the **Cinematheque** must demonstrate continuity from an organizational idea through details. In addition the project must show an ability to solve the problems presented by the program, the site, structure, issues of life safety, hvac, materials and systems. Additionally, presentation techniques derived from the film director studies will be developed as the studio progresses. Animation will be used as a method of analysis and description of both space and building systems.

For more information visit:

The Cinematheque

In 1890 the world's first movie studio opened in West Orange not long after Edison invented the Motion Picture Camera, also in New Jersey, but it was the Lumiere brothers in France that perfected the art of movies as entertainment and it was in Paris that the Cinematheque was born. Presently known as the Musée du Cinéma Henri-Langlois at Palais de Chaillot, place du Trocadéro, 16th arrondissement. A Cinematheque is a Film Center, Archive and Museum, either government sponsored or a non-profit (not for profit) organization. Often including small production facilities, recording studios and sound stages, the Cinematheque offers public and private non-commercial screenings and scheduled film showings that are otherwise difficult if not impossible to see at commercial movie houses.

SPRING 2001 GRADUATE STUDIO

In its first manifestation, the Cinematheque program required students to include a large sound stage and considerable parking. However eager, enthusiastic and satisfied as students may have felt about their projects, the focus and application of cinematic techniques seemed deficient in the final projects. Especially in their reference to a particular film director. They also proved ambiguous in their correlation to specific cinematic techniques, although this may have been the result of the critics' weariness or discomfort with the novelty of the presentation method itself. However, the project development, variety and resolution were generally more than satisfactory. Students were especially enthusiastic about the Website assignments and the Film Director Analysis. Both of these assignments presented better than expected results.

Guest critics included Michael Blackwood (film maker/producer) and Frederick Marx (documentary film maker and Academy Award nominee) as well as a number of architects.

SPRING 2002 GRADUATE STUDIO

The program remains the same with the exception of the sound stage.

A large space for which few students seem to really have a good understanding of the actual use and even more difficulty in accommodating any real connections to the community for which it was intended.

Students in this group are apparently overwhelmed by the problems presented by parking requirements.

Guest Critics for the final review include architects specializing in IMAX theater design.

SPRING 2003 GRADUATE STUDIO

This year the studio explores a different site and a program that shares parking with a neighboring tenant.

The site is across the street from the train station and is situated as to mediate between a business district and an existing and tightly nit ethnic neighborhood.

Consequently, the Cinematheque must once again serve both a local community and the International Image. Additionally, students will not design a sound stage.

SPRING 2004 UNDERGRADUATE STUDIO

This year the studio explores the Cinematheque project as an undergraduate Studio.

Conditions are presently under construction.

CONCLUSION

The Immobile

Architecture and Film are inherently linked by virtue of each other's opposing approach to the static, the immobile, motion itself and time, and although "Information sounds neutral, as if there were such a thing as knowledge without context, use, motive, or consequence"[10], it is this relationship between architecture and film as information that is critical to architectural education.

Conceptually, it is the reproduction of an idea, only it is an idea of itself. Maybe, it is merely a reproduction with diminishing value or self destructive, as conceived by Walter Benjamin and not unlike his notion that "The Cathedral leaves its locale to be received in the studio of a lover of art..."[11]

Richard Meran Barsam clarifies and differentiates reproduction from re-presentation in reference to Frederick Wiseman's Meat (1975); "Consumers, workers and management all react differently to the film, yet all, including the filmmaker, agree that it faithfully represents reality. Nonfiction film is the art of re-presentation."[12]

Whether reproduction or representation, the spirit of the Bauhaus that brought Dance, Theater, Architecture and Art back to its senses is the same spirit of Modernism that created the background to so many films and consequently to so many dreams, as Mark Lamster interprets, "For better or worse, film makers can't stay away from modernist buildings. – Perhaps there's something in Hollywood's collective psyche that demands to be understood as transgressive, dangerous, wild even criminal – and it is this that has led to the unfortunate stereotyping of modern design and those who enjoy it."[13] However, the unquestionably Epic grandeur Kalatozov's "representation" of architecture remains engraved in the memory of the viewer. Apart from a nearly obsessive passion for architecture, director Mikhail Kalatozov and cinematographer Sergei Urusevsky build an environment in Soy Cuba, that is a tribute to Modernism. The influence of Architecture on Film and the reverse are clear as Architect Jean Nouvel explains how he is influenced by film makers like Wim Wenders, saying that "Cinema, has taught us to see images in relation to time"[14]

There can be no doubt that architecture has had and continues to have an important influence on film but the power of film on architecture, the architects that conceive that architecture and the people that use it, is overwhelmingly superior.

This representation could be mapped by way of informatics or what Huffman refers to as the "geography of Space" "Equally important in a discussion of an electronically created terrain and virtual architecture is the consideration of a critical and theoretical discourse that connects video, informatics and the geography of space."[15]

Some generalized conclusions such as a the re-presentation itself, Architecture in Film can be examined in three basic forms; Architecture as a backdrop to the event, architecture as an epic character or actor within the event and architecture as a myth or mystical figure.

In this case the Epic. as it is larger than life, is represented by Bernardo Bertoluchi in the forbidden palace of *The Last Emperor*.

The backdrop is represented by Wim Wenders in the *Buena Vista Social Club*. and the myth is represented by Stanley Kubrick's *2001 a Space Odyssey*.

The techniques explored are numerous and would demand detailed explanations that are impractical in this paper.

Although experimental in nature. there is no doubt that there is more that needs to be done in the exploration of the techniques that have evolved in other disciplines such as film and Television. and how they may be of service to architects and the discipline of architecture in general. This is especially urgent in light of the development of new technologies in relation to computers and new media.

"David Harvey (1989: 308) writes that film is, 'in the final analysis. a spectacle projected within an enclosed space on a depthless screen.' such a foreboding 'final analysis' effects a closure that is absent from the cinema itself, which necessarily possesses the potential to leak out, continuously, all over the city; and vice versa (a theme reflexively screened in Woody Allen's The Purple Rose of Cairo)."[16]

NOTES

[1] Bruno Taut, Artistic Film Program (*Künstlerisches Filmprogramm. 1920*) Film Architecture: Set Designs From Metropolis To Blade Runner Editor Dietricht Neumann (Prestel 1999)

[2] *ibid*

[3] *ibid*

[1] Lawrence K. Grossman and Newton N. Minow: A Digital Gift to the Nation: Fulfilling the Promise of the Digital and Internet Age, (The Century Foundation Press, NY 2001)

[5] Vivian Sobchack. The Scene of the Screen: Envisioning Cinematic and Electronic "Presence"; Electronic Media and Technoculture. John Thornton Caldwell (Rutgers University Press, Depth of Field Series, NJ 2000)

[6] Lev Manovich. The Language of New Media; (The MIT Press 2001).

[7] Anthony Vidler. The Explosion of Space: Architecture and the Filmic Imaginary

[8] Federico Fellini. The road beyond Neoralism; FILM: A Montage of Theories. (Editor Richard Dyer MacCann 1966).

[9] Diana Agrest. Architecture From Without

[10] The Domain of Images. James Elkins. (Cornel University Press 1999).

[11] Walter Benjamin. The Work of Art in the Age of Mechanical Reproduction; Film Theory & Criticism. Editor: Gerald Mast and Marshall Cohen. (Oxford University Press 1979).

[12] Richard Meran Barsam Nonfiction Film: Form and Function; from Nonfiction Film: A Critical History: Film Theory & Criticism. Editor: Gerald Mast and Marshall Cohen. (Oxford University Press 1979).

[13] Architecture & Film. Editor: Mark Lamster. (Princeton Architectural Press 2000).

[14] Odile Fillion Cinema & Architecture: Méliès. Mallet-Stevens. Multimedia. Editor François Penz and Maureen Thomas. Life into Art. Art into Life: Fusions in Film. Video and Architecture. (British Film Institute 1997).

[15] Kathy Rae Huffman "Video and Architecture"; Ars Electronica Facing the Future, Editor: Timothy Druckrey with Ars Electronica. Informatics is the study of computer systems. networks. memory banks and terminals. (MIT Press 1999).

[16] David B. Clarke. The Cinematic City: Editor David B. Clarke (Routledge 2002)