# Developing a theoretical framework for understanding the communicative value of typographic elements in moving image products.

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#### **Abstract**

It is accepted that design is moving away from static, two-dimensional outputs to multiple hybrid media which play out in four dimensions. This shift away from design as an art of composition to one of choreography "involves understanding how the conventions of typography and the dynamics between words and images change with the introduction of time, motion, and sound"(Pullman in Heller 1998:109). Time-based media enable words to move as if living, thereby extending the expressiveness of traditional typographic language. The communicative value of time and motion as powerful and persuasive design elements must be explored and understood in order for designers to create meaningful four-dimensional design products.

This paper will briefly describe a theoretical framework for understanding and analysing the communicative value of moving typographic elements. The framework is loosely based on film theory and is designed to enable students to critically evaluate the choice and use of animated or dynamic typographic elements in a moving image product.

## Introduction

This paper is concerned with the moving word. The assumption is that words which are made to move as if living extend the expressiveness of traditional typographic language. Time and motion thus become powerful and persuasive design elements. The ideas presented in this paper are derived from a previous study regarding the communicative value of film title designs. The study presented an historical overview of film title design, explored the influence of distinctive design ideologies on the creation of film title sequences and analysed the role of animated typography in title sequences. For the purpose of this paper, focus will be placed only on the communicative value of animated typography and the analysis of this using a theoretical framework.

In order to study the communicative value of any design product, one must firstly define the function of the product. For film title sequences, three predominant functions can be identified. Firstly, the principle duty of the title sequence is to introduce functional information rooted in contractual imperatives, such as billing and credits. Secondly, the titles provide an opportunity for the director to create a receptive mood and manifest a predominant style for the film. Finally, the titles are the key to indicating what the film deals with. They have the power to shape information so the audience understands the underlying content (*Film 100* 1999; Gollin 1992; Lester 1995; Soberanis 1997; Van Nierop 1998). In context of this paper the storytelling value of the title sequence is assumed to be enhanced through animated typography.

Attributing a motion-base to abstract objects such as letters and words gives them the appearance of physical as well as emotional properties, "allowing the designer to think of typography not as a static form but as a dynamic event" (Small 1998b:29). Words can be seen as actors that engage in a performance, where non-textual qualities such as gestures and movements facilitate the communication of the story. For example, in Preminger's 1955 film *The Man with the Golden Arm* (Figure 1), title designer Saul Bass demonstrated that content could be meaningfully communicated by enriching the graphic elements in the sequence with a temporal dimension. The feeling of tension captured through the interaction of white lines and text hints at the intricate emotional content of the film. This design according to Lester (1995:162) identifies Bass as a pioneer in the use of animation techniques to achieve a range of psychological and emotive effects that support the storytelling value of a title sequence.

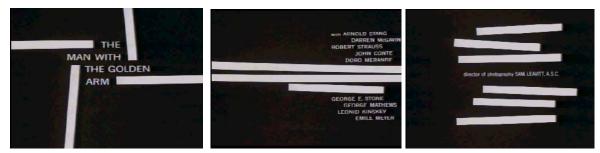


Figure 1. Stills from the title sequence for The Man With The Golden Arm

## Toward a theoretical framework for creating meaning through motion

"Almost without exception, the major filmmakers can be identified by the fact that nothing happens on screen that does not directly relate to their dramatic purpose ... figures moving toward camera heighten drama, figures moving languidly away from camera increase a sense of sadness and romance. Movement within a static frame is thus a critical element of composition, for through such movement the film builds its creative impact" (Bobker 1977:65).

Kinetic symbolism is used to suggest ideas and emotions and can be seen as a valuable communication element in the creation of meaning. For example "with vertical movements, an upward motion seems soaring and free because it conforms to the eye's natural tendency to move upward over a composition. Movements in this direction often suggest aspiration,

joy, power, and authority ... Downward movements suggest opposite ideas: grief, death, insignificance, depression, weakness, and so on. Because the eye tends to read a picture from left to right, physical movement in this direction seems psychologically natural, whereas movement from the right to the left often seems inexplicably tense and uncomfortable. The sensitive filmmaker exploits these psychological phenomenon to reinforce the dramatic ideas" (Giannetti 1999:95).

In general film theory, movement is not recognized as an aesthetic or production code, but is regarded as an optical illusion created through the use and manipulation of other codes. Established film codes can be divided into two groups: codes of content and codes of form. Codes of content refer to what the viewer perceives in an image: theme, story, mise-enscène, lighting, music, sound effects and acting. These codes are referred to by Fourie (1997:124) as non-filmic codes, "since they are not peculiar to film, but are techniques borrowed from other media". Alternately codes of form are "the actual filmic or visiolinguistic codes - specifically those of camera point of view and editing. These are the distinctive codes of film, in the sense that they impart meaning to images in a unique manner" (Fourie 1997:124).

The illusion of movement is created through camera point of view and editing codes. Du Plooy (in Fourie 1996:142) describes three different representations of movement. Picturisation through primary movement describes how a passive, objective camera point of view creates the appearance that screen objects are moving along one or more of the x-(horizontal), y-(vertical) or z-(depth) axes. Alternately, picturisation through secondary movement describes how an active, subjective camera point of view may imply that the camera is participating in the screen events. This effect is created through movements made by the camera lens, by the camera whilst its base remains stationary, by the camera together with its base and movements of hand-held cameras.

Finally, picturisation through tertiary movement describes how editing techniques create the illusion of motion. The most common editing techniques used for creating tertiary movement are the cut, fade and dissolve which are used to combine individual shots into scenes and sequences. Other editing techniques (or special effects) such as the wipe, the wash, focus and defocus, photographic effects and slow motion can also be employed to convey meaning.

Meaning implied through various movements can be further enhanced using the attributes of direction and velocity. These attributes serve as indexical signs in the interpretation of the mood and identification of the underlying content of the film. This basic framework (Table 1) which considers the type of movement and the attributes of direction and velocity, can be used to analyse how animated type strengthens communication in a title sequence.

MOVEMENT			
Filmic codes	Type of movement	Direction	Velocity
Camera point of view:			1
Passive	Primary	x, y, z axes & diagonal	fast ←→ slow
Active (zoom, pan, tilt, crane dolly & track, hand-held)	Secondary	x, y, z axes & diagonal	fast ←→ slow
Editing techniques:			 
Cut	Tertiary		fast
Dissolve / Fade	Tertiary		slow

**Table 1.** Theoretical framework

## Identifying the types- and attributes of movement

Picturisation through primary movement

In the title sequence for Cronenberg's *Crash* (1996) (Figure 2) primary movement is represented, as words move towards the viewer along the depth axes. This invasive, forward direction of the motion disturbs the viewer's sense of intimate space, suggesting the explicit, often offensive and highly controversial content of the film.



Figure 2. Stills from the title sequence for Crash

Velocity in the sequence establishes the rhythm and pace of the film. Words move slowly and consistently, maintaining a constant, predetermined course. The action is mechanical and echoes predominant themes and moods in the film: "Mechanical objects are seen as an extension of the sexuality of the twisted characters of the film ... the presentation of the events in the film is deliberate and calculated" (Van Nierop 1998:124). In contrast, the title sequence for Russell's *Altered States* (1980) (Figure 3) causes the viewer to experience a sense of confusion, as if in a daze. Direction and velocity are

effectively used to communicate the content and mood of the film. Large, transparent letters move into the screen from opposite directions along the horizontal axis. As the letters pass slowly and hypnotically over one another the character of each becomes difficult to discern. The resulting effect vividly depicts the hallucinatory states of the main character in the story.







Figure 3. Stills from the title sequence for *Altered States* 

## Picturisation through secondary movement

Secondary movement indicates that the camera point of view is subjective. The most subjective of these is the hand-held camera. This technique is used effectively by designer Kyle Cooper in the title sequence for Fincher's *Seven* (1995) to heighten the sense of fear in the audience. Jumpy and ragged shots in the sequence characterise a hand-held camera, creating a rocking sensation that is hard to ignore. For this reason the hand-held camera technique is often used to intensify the emotion in a scene or entire film as the viewer experiences a greater sense of participation.

# Picturisation through tertiary movement

As the following examples will illustrate, velocity is predominantly associated with enhancing the communication of tertiary movement. In the titles for Young's *Dr. No* (1962) (Figure 4) the cut technique is employed to suggest motion in the typographic elements. Instantaneous transitions give the sequence a lively, energetic pace. In this way the words and letters appear to dance on screen. The dynamism captured through the technique hints at the fast-paced, intense action of a Bond film.





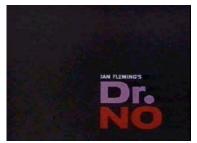


Figure 4. Stills from the title sequence for Dr. No

In contrast, a dissolve is used for quieter, major transitions which provide a sense of continuous action, since elements of different shots are seen simultaneously. In the title sequence for Cameron's *Aliens* (1986) (Figure 5) a dissolve effect is used to animate the

4th International Design Education Forum Conference Proceedings, 'Mapping New Territories in Design Education', 10-11 September 2001 held at Museum Africa, Newtown, Johannesburg, South Africa

typography. A slow, steady and quiet transition occurs as lines appear on screen and morph into the name of the film. The sequence has an eerie quality which hints at the presence of the paranormal, effectively communicating the menacing atmosphere of the film.

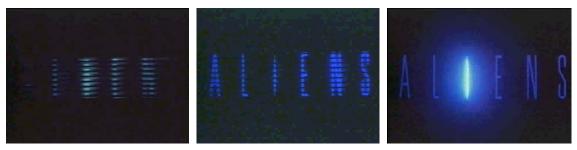


Figure 5. Stills from the title sequence for *Aliens* 

## Establishing the communicative value of animated typography

Two title sequences have been selected for analysis using the above framework. They are for Hitchcock's *Psycho* (1960) (Figure 6) designed by Saul Bass and for Fincher's *Seven* (1995) (Figure 7) designed by Kyle Cooper. Various factors influenced the choice of these sequences: In both designs the communication function of the title sequence is strengthened through animated typography. Camera point of view and editing techniques are used in both sequences to create the illusion of motion. Both films deal with similar content, theme and mood. Finally, the two sequences created more than three decades apart represent the distinctive design ideologies of their times. From an historical point of view the two sequences reflect the design trends as well as the technological capabilities of the periods in which they were created. The diversity with which movement can be established as a communicative design element is illustrated through this factor.

## Psycho



Figure 6. Stills from the title sequence for *Psycho* 

Primary movement dominates *Psycho's* title sequence with words and shapes moving along the horizontal and vertical axes. The movement is significant in three ways. The first direction in the sequence is right to left along the horizontal axis. This direction is disturbing since it opposes our intuitive reading patterns and causes a sense of unease and discomfort. The second directional clue occurs when the horizontal motion is interrupted by

a vertical motion. This sudden change in direction disrupts the rhythm and jolts the viewer's senses. Finally the conflict between converging and diverging directions infers predominant themes of discord, instability and binary opposition in the film.

The animation of the elements thus serves to reinforce the theory of *Psycho's* two-part structure of normality versus abnormality and neurosis versus psychosis (Bordwell 1989:237). The binary opposition of salvation versus damnation is signified through the divergent vertical movements where words appear to be pulled off the top or bottom of the screen. The directional significance of heaven- versus earthbound movement can be interpreted as the struggle between good and evil.

Velocity in the sequence presents itself as if in a state of flux. Moments of frenzied typographic activity are contrasted with moments of unexpected inertia. A sense of unease and nervousness is established, reflecting Bordwell's (1989:230) description of the film as "presenting emotional collisions that are quick, subtle and drastic. Like a musical piece, *Psycho* has emotional chords and dissonances, with haunting harmonies placed on a simple yet eerie melodic line".

The sequence is reminiscent of a game of 'cat and mouse', where fiendish grey lines pursue and disfigure seemingly innocent white words. The action is precise and mechanical, suggesting the cold and calculated actions of the film's main character. Words are shrewdly sliced, preempting the story of how the villain with no hysteria or articulated frenzy, will cleanly pierce the flesh of his victim, leaving little or no trace of blood or malice. The temporal dimension in the typographic elements clearly demonstrates how inane objects can be embodied with human qualities to enhance the communicative value of the design.

#### Seven







Figure 7. Stills from the title sequence for Seven

Primary-, secondary- and tertiary movement are represented in this sequence. In contrast to *Psycho*, primary movement is not characterised by drastic directional shifts, but is a more subtle movement, intimated through words shuffling restlessly upon an unstable baseline. The words appear to loose their balance and a sense of unease and discomfort is experienced by the viewer. This unsteady, anxious shuffling seems to depict that all is not right, and that something evil is about to confront the viewer.

Secondary movement in the sequence is achieved through a hand-held camera technique. Typography jolts on screen, seemingly as the recorder of the events looses objectivity due to his fore knowledge of the terror about to be encountered. This technique effectively heightens the viewers sense of instability, anguish and fear.

Finally, tertiary movement is represented through the use of editing techniques and special effects. True to the postmodern technique of fast editing (Lester 1995:181), instantaneous cuts are used to generate a sense of movement. The velocity of the sequence as words appear and disappear in rapid and irregular succession contributes to the nervous, erratic energy of the design and establishes the overriding mood of the film. Special effects used include the impression of a flashing white light that makes the words appear to pulsate. The velocity and varying intensity of the flash indicates the extremes of a rapid beating heart and a slow, controlled breathing. The emotional roller-coaster ride on which the deranged killer takes the viewers is insinuated through this effect.

Further directional and velocity attributes which enhance the communicative value of the titles occur towards the end of the sequence. Firstly the credits begin to roll backwards and secondly the intensity with which the words tremble and shudder increases. Respectively the attributes disturb our sense of reality and suggest the heightened sense of evil and brutality as the story will reach its climax.

The intensely jittery and scratchy typography effectively expresses the mood of the film, as it conjures up feelings of distress in the viewer. Provocative and nervous twitching motions embody the grievous nature of the killer in the film, and re-enforce the implication that he, meticulously and obsessively, may have prepared the titles himself. The increment in the intensity of the typographic twitching and scratching echoes the increasing severity of the killer's crimes as the story unfolds. The agitation increases to a level where the viewer can no longer discern the full extent of each movement, but merely bears witness to the result. This bloody trail of lines and smudges is reminiscent of the effect a photographer achieves when capturing moving lights using a slow shutter speed. The idea inferred is that the killer is never seen carrying out his vulgar deeds, and the detectives and audience alike only experience the after effects of the crimes. A twisted game of 'hide and seek' is hinted at, in which neither the detectives in the story nor the audience sitting in the cinema foresee the contorted conclusion to which the horrific tale eventually succumbs.

#### Conclusion

This paper has illustrated how animated typography is able to enhance communication. Film title sequences showed how various temporal expressions were used to convey specific messages, establishing moving typography as a means to enhance the functionality of a design. The research presented in the paper has implications for both design education and the broader design context.

Developing a theoretical framework for analysing moving typography based on film theory, suggests a shift towards a more functional inclusion of "the grammar of film and film editing as part of the basic communication structure" (Wild 1998:44) in graphic design education. Expanding the knowledge base of graphic design students in this way has value with respect to both studio and academic arenas. The former, in terms of developing observation and evaluation skills, the latter in terms of broadening students' frame of reference.

In providing students with a basic theoretical framework, it is assumed that they will be able to firstly hone their observation skills because they are made aware of what to look for in a design. Secondly the theoretical foundation will help students understand the value of what they are seeing. In this way critical evaluation skills are developed. Application of this type of theory to practice should increase the students' capacity to make meaningful choices with regard to designing moving image products.

An expanded knowledge base also exposes students to the theory, history and criticism of time based media. In this regard students are introduced to a genre of design not often dealt with in formal design theory and history. Expanding their frame of reference prepares students to intelligibly and confidently interpret the communication functions of contemporary design products, particularly those within broadcast and digital media.

In the broader design context disseminating this kind of research potentially develops a greater awareness and understanding of the role animated typography plays in delivering market specific messages to viewing audiences. Examples demonstrating this include contemporary designer Jonathan Barnbrook's television advert for *Vick's* cold and flu medication where textual descriptions of the product features are animated to visually enhance their meaning. The typeface used to suggest swollen tissues, actually swells, whilst the letters in the word 'stuffy' squeeze together before they separate in relief. Further to broadcast media, two products designed by Hilton Tennant of *Delapse*, demonstrate exploration into the storytelling capacity of animated typography. They are the *Made in Africa* campaign developed in 1999 for SABC2's promotion of local entertainment and the new title sequence for M-Net's actuality programme *Carte Blanche*, designed in 2000.

To conclude, it seems appropriate to reiterate a key sentiment expressed in the paper's abstract. The argument for expanding information designers' knowledge base is supported by the notion that their design activities are becoming increasingly complex: "Once the designer's art was composition. Now it is choreography. In a fluid, four-dimensional world, the problem is not so much to get the fixed thing right as to find an elegant sequence of evolving relationships" (Pullman 1998:109).

# **Biographical outline**

Nicole Cunningham is currently a full-time lecturer in Information Design at the University of Pretoria. Her position involves co-ordination, management and development of course content for Information Design 100 and 200, as well as lecturing in these subjects and others. Prior to the permanent lecturing appointment she taught in a part-time capacity whilst managing the design studio Cunningham Creative Partners, which was established by her in 1993.

She has presented various short courses and workshops, for both educational institutions and private business concerns. Amongst these is a short course in "Design project management, layout and typography" presented in collaboration with Bluprint design studio in 2000 to The Law Society of South Africa.

She is currently enrolled in the MA Information Design programme at the University of Pretoria, in which she is exploring the expanded role of the graphic designer in the digital domain.

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