Typography Today: Emotion Recognition in Typography

Amic G. Ho*

** City University of Hong Kong, Community College of City University, amicgho@cityu.edu.hk*

Abstract: Typography and typefaces were originally used for visual communication. They had an important role in building visual hierarchies for information organisation, and in commercial design to create brand and logo signatures, among other purposes. Due to its high functionality, for instance, the typeface known as Helvetica was widely used for visual communication in posters and corporate signatures during the 1950s and '60s.

With the rapid development of modern technology, typefaces are taking on a variety of new forms and functions. Many categories and kinds of typography, such as 'type as image' and 'type in motion', have evolved. Typefaces are no longer solely tools of visual communication; their form and appearance can now be manipulated to create certain moods or feelings in an audience.

In recent years, many typographic works have been designed to express particular emotions and feelings or stimulate them in an audience. Various typographic elements, such as colour and typestyle, may be used to convey or evoke the desired emotions. To elicit specific emotions in response to typographic works, designers must fully understand the relationships between emotions and typography. They must successfully select and manipulate such features as colours, shapes, textures and images to enrich viewers' experiences of and emotional responses to typographical works.

Inspired by studies of the relationship between design and emotion in a range of disciplines, some design scholars have developed these ideas further by applying them to graphic design. They have explored the potential contribution of user-centred 'design and emotion' studies to typography, and established new criteria for defining the category of 'emotion in type/typography'. This study investigates the relationship between emotional response and type/typography, and proposes new criteria for categorising typography that accommodate the emotional concerns and effects of typographic design.

Key words: Emotion, Typography, Typographic designer

1. Introduction

This section introduces the topic of emotion recognition in typography (i.e. 'emotion in type/typography'), which has received increasing attention in recent years. The development of communication techniques in the past

decades has increased the amount of information and the number of messages conveyed on a daily basis. Therefore, basic fonts or typefaces notable only for their colour, shape or texture are no longer an effective way of conveying information. To attract viewers' attention, typographic designers have begun to explore other design-related disciplines in search of techniques to improve the process of communication between designers and audiences or consumers. Some typographic designers have been inspired by studies of the relationship between design and emotion in a variety of design-related disciplines, such as user-centred design and empathetic design (Desmet and Hekkert, 2002). Initially, 'design and emotion' research was conducted primarily in product design; in the past decade, however, design scholars have begun to explore its potential in other fields (Desmet and Hekkert, 2009; Fulton Suri, 2003). Inspired by 'design and emotion' studies in various disciplines, and aware of their possible contribution to graphic design, some design scholars have developed these ideas by investigating the application of user-centred 'design and emotion' theories to typography.

Typographic designers first explored the relationship between design and emotion with reference to the interactive communication between audience and designer enabled by 'type in motion'. They claimed that moving typography is a form of 'emotion in type/typography', as its time-based composition allows it to convey emotion cinematically. However, can 'design and emotion' principles also be applied to non-motion typography? Examples of 'emotion in type/typography' can be found on the Internet. Some are in motion, but others are not, which suggests that both moving and static typography may be capable of conveying and/or eliciting emotion. However, little research has been done on the relationship between design and emotion with reference to static typography. It may thus be possible to develop new criteria for 'emotion in type/typography'. This study is designed to explore the nature of 'emotion in type/typography' and ascertain possible criteria for this category that recognise typographical design as influencing, and influenced by, emotion.

2. The Application of 'Design and Emotion' Theories to Graphic Design

The recent increase in the frequency of message transfer and the quantity of information conveyed often overloads audiences with information, making it difficult for them to understand and assess the issues with which they are presented. To attract audiences' attention, designers thus select and manipulate a variety of features, such as colours, shapes, textures and images, to enrich the audience's experience of a typographic work. However, as the amount of information conveyed continues to increase, a basic font or type distinctive only for its colour, shape and/or texture is no longer an effective means of delivering the required messages.

The risk of information overload affects not only typographic design but also other design-related disciplines, including product design. Indeed, product designers were the first to experiment with introducing new elements, such as emotion, into their designs. The consequent evolution of 'design and emotion' studies ushered in a new phase of product design. Can 'design and emotion' principles also be applied to typography?

Some typographic designers have suggested that type in motion is capable of conveying emotion. According to Stone, Alenquer and Borisch (2004), dynamic media enable the typographic designer to add multiple dimensions to typographic communication, thereby enhancing the meaning of a design and its ability to elicit an emotional response. However, little research has been done on the application of 'design and emotion' theories to static

typographic design. Compared to product design and other disciplines, typographic design offers room for further investigation of the relationship between design and emotion.

3. Different Categories of Typography

Design scholars have identified a number of typographical categories, such as 'type as image', 'type as form', 'type as experiment' and 'type in motion'. Fawcett-Tang (2007) categorised typography according to its various functions and forms, distinguishing between 'type as image', 'type in motion' and 'experimental' typography. Scholars addressing the category of 'type as form' have focused on the relationship between typographic form and function. Some typographic designers have emphasised the roles of typeface design and, relatedly, font in facilitating the reading process, which is the basic function of typography (Samara, 2004; Fawcett-Tang, 2007). Due to the large quantities of information conveyed nowadays, however, the functionalist typography that falls into the 'type as form' category is no longer an effective way of attracting viewers' attention. Other designers have explored the role of decorative or stylish typography in commercial design, combining the graphic forms of everyday objects with basic typographic forms. This kind of typography is frequently described as 'type as image' (Fawcett-Tang, 2007), and is easily recognisable, often taking the form of a picture (see, for example, Figs. 1 and 2). According to Samara (2004), communication of this kind does not arise from typesetting, but is the result of transforming words into images and integrating them with the overall visual experience of a typographic work. The ongoing development of digital technology has led to the evolution of the 'type as image' and 'type as experiment' categories, as designers explore new forms and elements of typographic design. Typography in the 'experimental' category diverges from the traditional patterns of typographic design, challenging the limits of recognition and legibility. For example, individual letters may appear as purely abstract forms, and textual characters may be merged with the shapes of familiar objects. However, as most experimental typographic designs use unexpected styles, materials and forms, designers must be especially careful to ensure that viewers understand the intended messages. In recent years, the growth of electronic media has encouraged the rise of another category of typography: 'type in motion'. Messages conveyed using dynamic typography may be two- or three-dimensional, and tend to operate as multimedia applications. Information is conveyed temporally, often using sound and animation techniques.

Figure.1 Example of 'type as image': Sausage Font by Teja Smrekar (2008).

Figure.2 Example of 'type as image': Grass Font by Handmade Font (2008).

Bellantoni's (2000) categorisation of typographic design differs from that of Fawcett-Tang. Seeking to emphasise the emergence of electronic media and its influence on typographic presentation format, Bellantoni proposed another method of categorising typographic design, based on presentation format. To the existing categories ('type as form', 'type as image', 'type in motion' and 'experimental' typography) he added 'kinetic typography'. To some extent, kinetic typography resembles Fawcett-Tang's (2007) conception of 'type in motion'. Both can be presented in a two- or three-dimensional format, and both exist in the kinetic realm, as film titles or multimedia applications for example (Bellantoni, 2000). Designers use various techniques, such as blinking and flashing, to convey the required messages and increase the complexity of expression to include tone and mood. As kinetic letterforms may be viewed from numerous angles, designers are presented with a multitude of new typographic possibilities. Hillner's (2009) categorisation of typographic design resembles Bellantoni's in its emphasis on presentation. Hillner proposed the additional category of 'virtual typography', which highlights the role of screen-based type in allowing the designer to work within both time and a 'virtual' depth of field (Fawcett-Tang, 2007). Like 'type in motion', the category of 'virtual typography' arose as a result of the development of electronic media. According to Hillner (2009), it refers to the visual arrangement of words and letters in a multimedia context. It does not simply entail the spatial positioning of textual information; it also occurs within time, and is an interactive form of typographic communication. This method of text presentation differs from that of conventional hypertext. The timing of information determines its aesthetic quality, because it prepares the recipient for the content of the information. The mode of transition can thus be seen as an aesthetic element. In the process of delivering their messages, typographic designers also make use of time and transition to influence a user's flow of consciousness, or to offer the user control of their own flow of consciousness.

These different categories of typographic communication are based on form (i.e. design features) or presentation format. One must ask, however, whether alternative methods are available for categorising typography. Does emotion offer a potential new category? In recent years, many typographic works have been designed to communicate certain emotions and feelings to an audience. Various typographic elements, such as colour and typestyle, may be used to project or evoke the desired emotions. To elicit an emotional response from viewers, typographic designers must fully understand the relationships between emotions and typography. Some designers select and manipulate features such as colour, shape, texture and image to enrich an audience's experience of and emotional response to a typographic work. Should the resulting typographic design be regarded as 'emotion in type/typography'? Experiments with the typographic evocation of emotion have become a trend in recent years, due to the increasing popularity of 'emotion in type/typography' as a topic of discussion among typographic designers, as witnessed in the volume and frequency of online debate. Designers working on this topic hold different views of the emotional potential of typographic works. 'Emotion in type/typography' is frequently classified as 'type as image', 'type as experiment', 'type in motion' or a combination of the three. It has not yet received a conclusive and clear definition.

4. An Alternative Category of Typography: 'Emotion in Type/Typography'

Before exploring the numerous definitions of 'emotion in type/typography', it is necessary to understand existing theories of how emotion relates to design. According to Ho and Siu (2009a), emotion influences designers' decision making during the design process. In many cases, designers experience emotional responses to

stimulants in the external environment, which influence their decision making regarding aspects of the design process that will in turn have emotional outcomes (e.g. the arrangement of forms or the choice of graphics or colours) (Ho, 2010). As a result, each design outcome will embody certain facets of its designer's emotions. When the design is consumed or used, it may elicit emotions from its users/consumers, which are usually determined by the style, function, form and usability of the design. This shapes users' experience of consuming the product. In other words, a design outcome may affect its user emotionally, by making them happy, annoyed or excited, for example. It may motivate the user to recall or imagine related events or relevant experiences that in turn alter their emotions or elicit new ones. This whole process can thus be regarded as emotional design.

5. Three Basic Criteria Proposed For 'Emotion in Type/Typography'

How does an understanding of the relationship of emotion and design assist the development of basic criteria for 'emotion in type/typography'? The theories described above emphasise the interaction between humans' environment and their emotional responses (Ho and Siu, 2010). First, emotions may be experienced by designers in response to stimulants in their external environment (Fulton Suri, 2003; Ho and Siu, 2010). These emotions may then influence their selection of particular design elements, which may in turn determine users' emotional responses to the design outcome. The criteria for the categories of 'type as image', 'experimental' typography, etc., are based on the appearance and presentation mode of typographic design outcomes. Based on the '3E' ('emotionalise design, emotional design, emotion design') model proposed by the above-mentioned scholars, 'emotion in type/typography' can be categorised according to the three following criteria.

5.1 'Emotion in type/typography' elicits an emotional response from users.

Most typographic-design experts agree that the majority of fonts have the potential to elicit emotional responses from users. However, this claim is not comprehensive enough to constitute a criterion for 'emotion in type/typography'. As typography is a tool for communication, it is designed for mass use; that is, not only by professionals or experts in the field of typographic design. Most fonts and typefaces have a certain level of emotional potency. 'Emotion in type/typography' should thus be easily recognisable to laymen (those who are not practising designers and have never received training in typographic design). Laymen should recognise the emotional concern(s) of a typographic design as soon they see it. This category of typography should thus not include nuanced typographic changes that can only be discerned by professionals. The category 'emotion in type/typography' should be defined by its ability to elicit emotion from all users (including laymen), allowing them to identify the emotional concerns of the design easily and fully on both a visual and a physical level.

to scrape   to crease   to peel   to melt   to splinter
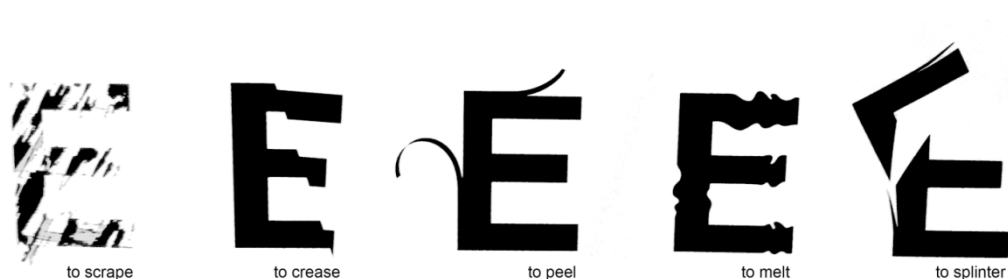
Figure.3 The letter 'E' has been visually altered by the designers Carol Anthony, Linda Dronenburg and Rebecca Sponga, relating it consecutively to the meanings of specific descriptive words chosen by the designers (Carter, Day and Meggs, 2002).

According to Ho and Siu (2009a), the emotional concerns of a design have the capacity to elicit corresponding emotional responses from the users/consumers of the design. These emotional responses are usually determined by the style, function, form and usability of the design, and shape the users' experience of consuming the product. In other words, a design outcome may affect its user emotionally by making them happy, annoyed or excited, for example. Furthermore, it may motivate the user to recall or imagine related events or relevant experiences that in turn alter their existing emotions or stimulate new ones. This whole process can thus be regarded as emotional design.

5.2 Designers' emotions affect their decision making during the design process, and hence influence the typographic design outcome.

According to Ho and Siu (2009b), emotions may influence designers' decision making during the design process. In many cases, designers experience emotional responses to stimulants in the external environment that influence their decision making regarding aspects of the design process that will in turn have emotional outcomes (Fulton Suri, 2003; Ho and Siu, 2010). As a result, each design outcome embodies certain facets of its designer's emotions. When the design is consumed or used, these emotional concerns may elicit corresponding emotions from its users/consumers.

Yoshimaru Takahashi (2008), a prominent designer in Japan, has also explored the application of 'design and emotion' principles to graphic design. In his book Emotional Typography, he described some typographic projects influenced by his own emotional responses to external stimulants (such as his cultural background and immediate physical environment). As shown in Fig. 4, one of his projects reflects his changing emotional response to watching rainfall, which influenced his selection of different kinds of lines to depict the changing appearance and sensation of rain, from drizzle to downpour. The resulting designs for letters express Takahashi's variable emotional response to rainfall, while maintaining a rational and consistent typeface.
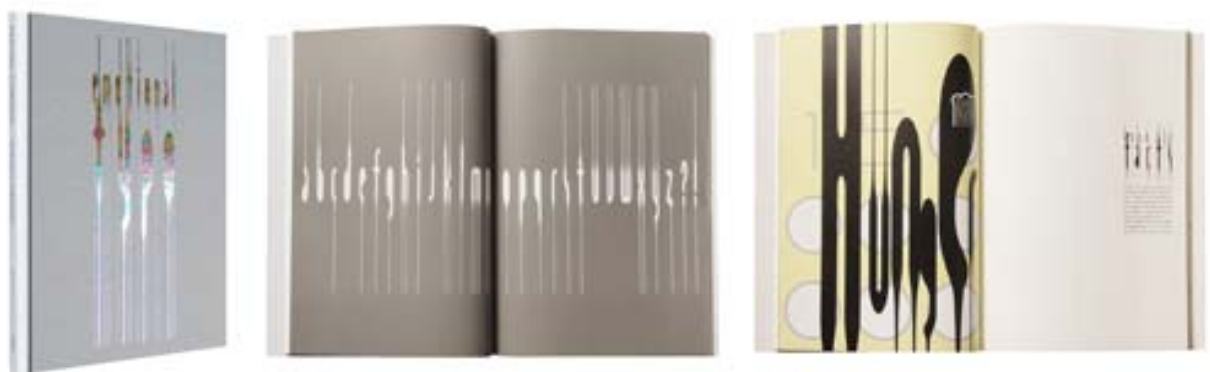
Figure.4 Yoshimaru Takahashi (2008) experienced a changing emotional response to the stimulant of rainfall. He chose different kinds of lines to depict the changing appearance and sensation of rain, from drizzle to downpour.

The resulting designs for letters express his variable emotional response to rainfall, while maintaining a rational and consistent typeface.

5.3 'Emotion in type/typography' as an alternative category for typography.

'Emotion in type/typography' is not defined by the visual attributes of the design outcome, such as 'outcome as form', 'outcome as image' or 'outcome as colour'. Rather, it is an alternative means of classifying typography, referring to typographic designs that are influenced by the emotions of their designers. Designers' emotional responses influence their decision making during the design process, determining their selection and arrangement of forms, graphics and colours, for example. Therefore, each design outcome embodies certain facets of its designer's emotions. As the emotional concerns of a design usually arise from its style, function, form and usability, these characteristics have the capacity to elicit an emotional response from its users/consumers. Therefore, typographic designs in the category of 'emotion in type/typography' can be identified by the emotional interactions among and between the (human) designers and users. This distinguishes the category from others such as 'type as image' and 'type as form', which classify typography according to the form or function of its design outcome. Therefore, static and virtual forms of typographic design, among others, can be included within the category of 'emotion in type/typography'.

6. Conclusions

The aim of this study is to explore the nature of 'emotion in type/typography' (i.e. emotion recognition in the field of typography). Based on the findings outlined here, 'emotion in type/typography' is a developing concept that has not yet been clearly defined. First, graphic designers were inspired by the exploration of the relationship between design and emotion in other design-related disciplines, and then began to investigate the applicability of 'design and emotion' principles in the field of typography. 'Type in motion' was the first category recognised as having features capable of expressing or eliciting emotion. However, this raises the question of whether static typography is also able to deliver emotion. The findings of this study indicate that 'design and emotion' theories may profitably be extended beyond the field of product design to that of graphic design, based on several examples of basic graphic design and static typefaces examined here.

Design scholars have proposed various means of classifying typography according to its functions and forms, resulting in such categories as 'type as image', 'type in motion' and 'experimental' typography. These categories of typographic communication are based on form (i.e. design features) or presentation format. However, is it possible to use alternative methods to categorise typography? Does emotion offer one of the new categories? From the volume and frequency of online discussion, it seems that 'emotion in type/typography' is an increasingly popular topic of debate among typographic designers. It is defined in various ways, and often assimilated under other categories such as 'type as image', 'typography as experiment' and 'type in motion'. There seem to be many typographic designers working on the evocation of emotion, all of whom have different perspectives on the topic. Inspired by existing theories of 'design and emotion', emotion is first identified by this study in the responses of designers to stimulants in their external environment. These emotional responses then influence designers' selection of design elements. Therefore, the criteria for defining 'emotion in type/typography' should not be based on characteristics of the design outcomes, as for categories such as 'type as image' and 'experimental' typography. In this study, three alternative criteria identifying 'emotion in type/typography', based on the above-mentioned

'3E' model, are proposed. First, designs in this category are able to elicit emotional responses from users. Second, their creation is influenced by their designers' emotional responses to external stimulants, which affect their choices of design elements during the design process, and hence influence typographic design outcomes. Third, 'emotion in type/typography' is an alternative means of classifying typography; it is not determined by function and form. However, it can also be identified by design characteristics, like the categories of 'type as image', 'type as form', etc.

As outlined above, this is a preliminary study that explores methods of defining 'emotion in type/typography' and introduces this category to existing classification systems for typographic design. More research should be conducted in this field to investigate the features and applications of 'emotion in type/typography', and to seek further theoretical explanations of its nature. 'Emotion in type/typography' is a typographic-design category that scholars and professionals have only recently begun to explore. However, it is not simply a new category for typographic design, as distinct from 'type in motion' and 'type as image' (which are categorised by function and form), but an alternative method of categorising current and future typographic design, according to the emotional interaction and communication between and among human designers and audiences. It may offer designers a means of exploring new typographic forms and presentation formats. This may in turn suggest innovative applications in the field of typographic design, including environmental graphics, kinetic typography and other new-media typographic forms. It is thus an important emerging research topic in both typography and graphic design, and provides a platform for further typographical exploration by designers, researchers and scholars.

7. Citations

[1] Bellantoni, J. (2000). *Type in Motion*. London: Thames & Hudson Ltd.

[2] Carter, R., Meggs P. B. and Day, B. (2002, paperback, revised). *Typographic Design: Form and Communication*.

[3] Desmet, P. M. A., and Hekkert, P. (2002). *The basis of product emotions*. In: W. Green and P. Jordan (eds.), Pleasure with Products, Beyond Usability (60-68). London: Taylor & Francis.

[4] Fawcett-Tang, R. (2007). *New Typographic Design*. CT: Yale University Press.

[5] Fulton Suri, J. (2003). *The experience of evolution: Developments in design practice*. The Design Journal, 6(2): 39-48.

[6] Handmade Font (2008). *Grass font*, HandMadeFont.com. Retrieved June 26, 2013, from http://www.handmadefont.com/grass.php.

[7] Ho, A. G. and Siu, K. W. M. (2009a). *Emotionalise design, emotional design, emotion design*. Proceedings of International Association of Societies of Design Research. Retrieved 25 June 2013, from http://www.iasdr2009.org/ap/Papers/Orally%20Presented%20Papers/Behavior/Emotionalise%20Design,%20Emotional%20Design,%20Emotion%20Design%20-%20A%20new%20perspective%20to%20understand%20their%20relationships.pdf/.

[8] Ho, A. G. and Siu, K. W. M. (2009b). *Role of designers in the new perspective of design and emotion*. Design Principles and Practices: An International Journal, 4(3): 15-24.

[9] Ho, A. G. (2010). *Exploring the relationships between emotion and design process for designers today*. Proceedings of the 1st International Conference on Design Creativity ICDC 2010. Kobe, Japan: The Design Society.

[10] Hillner, M. (2009). *Basics Typography 01: Virtual Typography*. London: AVA Publishers.

[11] Koch, B. E. (2012). *Emotion in Typographic Design: An Empirical Examination*. Visible Language Journal, 46 (3).

[12] Samara, T. (2004). *Typography Workbook: A Real-World Guide to Using Type in Graphic Design*. 3rd ed. Minneapolis: Rockport Publishers.

[13] Small, D., Ishizaki, S. and Cooper, M. (1994). *Typographic Space*. Conference on Human Factors in Computing Systems, CHI 1994.

[14] Takahashi, Y. (2008). *Emotional Typography*; Kokokumaru Inc.: Japan.

[15] Smrekar, T. (2008). *Sausage Font*, Behance.net. Retrieved 26 June 2013, from http://www.behance.net/gallery/Sausage-Font/665688.