Commonality Between Verbal and Visual Language

A Suggested Method in Teaching 2D Design

Dr. Akmal H. Abdelrahman
Faculty of Applied Arts, Helwan University, Egypt

Abstract:
Islamic architecture is one of the most
The term Visual Language is commonly used in the field of art and design to describe a
form of communication that uses visual elements and/or symbols as opposed to formal
written language to convey a meaning or an idea. The notion of visual language
constantly represents one of the author major concerns, what does it mean and how to be
understood, how to study and grasp its structure and grammar, what are the basic
elements of this language and how it is used as a powerful method of expressing our
emotions and our understanding of the world around us in a different way of
communication. As a teacher and a practitioner of art and design, the author concern
about visual language led him to investigate the relevance between visual language and
verbal language suggesting that both languages have similar and common structures that
would enable art and design students to understand the visual language more accurately
in accordance to their understanding of the verbal one by applying the same structural
concepts. This investigation, which took more than 10 years of research, practice and
experimental teaching, resulted in developing a methodology that could implement the
communality aspects between visual and verbal language in teaching art and design in
the academic arena. This paper endeavours to address the advantages of using the visual
language structural potentials in relation to the verbal language as a suggested
methodology in teaching 2D design for the foundational stages in art and design
institutions. The paper also showcases and analyses some students’ works that
demonstrate how they applied their understanding of visual language suggested
methodology in developing their 2D designing skills.

Keywords:
- Visual language,
- 2D Design,
- Verbal language,
- Visual
communication,
- Graphic Design,
- Mural Design

Introduction
Teaching art and design seems to be more
complicated than teaching other disciplines such
as medicine, engineering or science. Most of these
disciplines emerged and had their roots from explicit scientific facts and theories that developed
through ages of scientific experimentations. In art
and design the story is totally different, as the
knowledge we have and the theories developed in
the field are always questionable and changeable
according to the personal experience of the
artist/designer, and what seems to be a fact is also
arguable according to the sociocultural and the
scientific changes of any community. (Pentak
2013) and others argued that:
"The creative aspect of art also includes
the often heard phrase (there are no rules in
art) this is true. In solving problems
visually, there is no list of strict or absolute
dos and don'ts to follow. Given the varied
objectives of visual art throughout the
ages, definite laws are impossible."
However, some scientific theories should be
studied in the field of art and design such as
Ergonomics for product/interior designers,
aerodynamics for product designers and
perspective for art and design students in general.
These types of scientific theories would not
restrict the student or stop his/her creativity, these
theories stand as important sources of knowledge
that enhance the artist/designer’s capabilities to
develop successful designs in terms of their
functional aspects.
Furthermore, in art and design, although there are
no actual rules to follow or specific formulas to
employ, the notion of experiential knowledge as
well as transferable knowledge plays an important
role in forming the unique characteristic of the
artist/designer, as (Pentak 2013) suggests:
"Artistic practices and criteria have been
developed from successful works, of which
an artist or designers should be aware. Thus,
guidelines (not rules) exist that
usually assist in the creation of successful
designs."
Throughout the history of art practitioners such as
architects, artists and designers developed a
number of theories that stand as a powerful
resource of knowledge in the field. This type of knowledge, which could be classified as experiential knowledge in their time, had been evolved through their practices, and they were keen in documenting their experience to pass it to the following generations in the form of transferable knowledge that could be thought as basic guidelines in the academic arena.

Visual language is one of the most important aspects that carry out what an artist or a designer wants to convey. According to (Malamed 2011):

"Within every picture is a hidden language that conveys a message, whether it is intended or not. This language is based on the ways people perceive and process visual information. By understanding visual language as the interface between a graphic and a viewer, designers and illustrators can learn to inform with accuracy and power."

The author totally agrees with the above statement and takes the value of understanding Visual Language much further. Starting from the point that visual language stands as the interface between a graphic and a viewer the author suggests that studying visual language as way of communication in relation to the verbal language could construct a powerful methodology that could be used in teaching 2D imaging for both mural and graphic design.

The following pages will articulate the author's argument demonstrated by some of his student's works which reflect their understanding of 2D design elements and principles in relation to their understanding of the visual language methodology.

**Understanding Visual Language in relation to Verbal Language**

Understanding visual language seems to be a common concern for many practitioners in the field, the relation between what is conceptual and what is visual, the difference between what is art and what is design, the relationship between form and function, all these issues remained arguable and questionable for ages. The author argues that a well understanding of the main elements of visual language, and grasping its structural manifestations will enhance the student/practitioner capabilities to interact more effectively with the pre-mentioned issues in art and design.

The author initial assumption was that less endeavors to address the link between Visual and verbal language were tackled, but after more thorough researches it was found that some practitioners had the same concern and made significant contributions to articulate the importance of this eloquent link between the two languages. For example, (Nile 2013) argued that "Humans have only three ways of expressing the ideas in their mind we can create sounds, move our bodies and draw images. It is my theory that when any of these meaningful channels takes a structured sequence governed by an underlying rule system (a grammar) it becomes a language. So structured sequential sounds become Spoken Language, structured sequential gestures with a grammar become Sign Language and structured sequential images can literally become Visual Language".

The previous statement summarises the author argument about the importance of linking visual language with verbal language as similar ways of communication. We tend to understand the verbal language more clearly because we are commonly raised to communicate using verbal language and the visual language takes part in our life according to the way we get educated and how much we do engage with the visual symbols around us in our daily life such as what so called Pictograms.

Linguistically, Pictograms are those common symbols indicating such things as airports, public facilities, and non-smoking areas demonstrated by a cigarette in a circle with a diagonal line across it. As suggested by (Colin 2008):

"Our perceptual machinery comes partly from evolution and partly from our visual experiences as we interact with the world; in other words, our pattern perception is partly innate and partly learned"

Moreover, (Hernandez 2010) claims that "The basic visual vocabulary consists of the so called formal elements of style, which include Line, shape, color, light and dark. When artist combine these elements in a characteristic way they are said to have a style. In order to describe and analyze a work of art it is helpful to be familiar with the perceptual vocabulary".

The author thereby, developed his own understanding of visual language which evolved through his own practice and teaching methods. Endeavouring to develop a simple approach to understand the visual language in relation to the verbal language the author summarizes the structural communality between the two languages in a simple comparison as shown in (table1).
Commonality Between Verbal and Visual Language

<table>
<thead>
<tr>
<th>Verbal Language</th>
<th>Visual Language</th>
</tr>
</thead>
<tbody>
<tr>
<td>The basic units are letters/ alphabets</td>
<td>Basic units are dots and lines</td>
</tr>
<tr>
<td>Letters make words</td>
<td>Lines make shapes and forms</td>
</tr>
<tr>
<td>Words make sentences when organized in a certain order</td>
<td>Shapes and forms make visual (objects) that make sense</td>
</tr>
<tr>
<td>Sentences In certain order make text (a paragraph)</td>
<td>Objects make graphical entities (or a compositions)</td>
</tr>
<tr>
<td>Paragraphs make an essay/article</td>
<td>Multiple Entities make a design</td>
</tr>
<tr>
<td>Sometimes essays and poems are hard to be understood</td>
<td>Sometimes paintings in particular are hard to be understood</td>
</tr>
<tr>
<td>Rhetoric is an advanced stage in verbal language</td>
<td>Abstraction stands as a visual representation to the word Rhetoric</td>
</tr>
</tbody>
</table>

For more clarity, (table 2) demonstrates some of the terms mentioned in the table such as graphical entities, composition, and 2D design according to the author argument in explaining the elements of visual language.

<table>
<thead>
<tr>
<th>Verbal Language</th>
<th>Visual Language</th>
</tr>
</thead>
<tbody>
<tr>
<td>A, B, C, E …</td>
<td>Ball, Square, Triangle …</td>
</tr>
<tr>
<td>Words</td>
<td>Shapes and forms</td>
</tr>
<tr>
<td>&quot;Visual language is a way of communication&quot;</td>
<td>Organizing words makes a meaningful sentence</td>
</tr>
<tr>
<td>Organizing words makes a meaningful sentence</td>
<td>Organizing shapes/forms generates Objects</td>
</tr>
<tr>
<td>Sentences In certain order make text (a paragraph)</td>
<td>Organised objects generate a composition and/or graphical entity</td>
</tr>
<tr>
<td>Paragraphs make an essay/article</td>
<td>Multiple entities generate a Design</td>
</tr>
</tbody>
</table>

One of the most important manifestations the author employs in his 2D design teaching methodology is the idea of explaining the differences between a composition and a design in 2D design and what are the potentials of developing more advanced/complicated relations between an object and a graphical entity or between multiple graphical entities to form a Design.

The author argues that a composition is commonly formed by organizing multiple objects (fig 1) where the design is formed by more complicated relations between multiple entities or in another word "Graphical Entities" (fig 2).

The author also argues that a composition may represent a simulation of real objects organised in their original state such as still life, life drawing or a landscape drawing, where a design should represent and reflect the artist/designer’s own vision manifested with his own style.

![Fig 1 Still life by Eman Abdelhamed one of the authors’ students, Pencil on Paper, 2015](image1)

![Fig 2 Unintended calculations, Vancouver, Group of Artists Feb 2011](image2)
Figure 1 represents a still life composition formed out of multiple objects organized in a rectangular shape (entity). The image is a clear simulation of the objects which reflects the student drawing skills and a good command of visual perception. Where in figure 2 the image represents more complex relation between multiple graphical entities to form a design that reflects the artist/designer own vision in using visual elements in his own style.

What is so important (from the author's point of view) in the previous explanation is the significance of grasping the notion of the term Graphical Entity as a form constructed by the sequence demonstrated in Table 2 as

<table>
<thead>
<tr>
<th>Lines</th>
<th>Shapes</th>
<th>Objects</th>
</tr>
</thead>
<tbody>
<tr>
<td>A Graphical entity</td>
<td>A composition</td>
<td></td>
</tr>
</tbody>
</table>

This sequence is relatively important in the teaching methodology as will be explained in the following section.

**Visual and Verbal Language methodology in teaching 2D Design**

For more than 4 academic years the author teaches two different courses using the visual language methodology. The first course is Mural Design, and the second course is 2D visualization studio. Both courses are being taught at two different institutions. The following pages will articulate how the author uses the visual language methodology in teaching these courses and how students implemented this theory in the development of their designing skills.

**Mural Design course at the faculty of Applied Arts, Helwan University**

The aim of this course is to teach students (level 2&3) how to think and develop mural designs for different architectural styles considering the architectural sittings and deal with murals as site-specific works that should integrate with the architectural style for which they are made. The course also aims to develop the students' intellectual and practical skills to employ the design elements in order to achieve the best compositional structures in their mural designs.

The author usually starts the course with clarifying the difference between 2D design Types as Pattern/Ornament Design and Pictorial Design. Pattern design is generally common in decorative and ornamental arts and depends on repetition techniques to generate decorative patterns such as wall paper design, textile design, ceramic tiles and printed fabrics and so on (fig 3). Where the Pictorial Design (which constructs the main argument of this study) generally depends on the organization of the design elements in a certain picture format. The best examples that would demonstrate the notion of Pictorial compositional design are Graphic design, Mural design, illustration, Painting and Photography (fig 4).

The second stage of the course is to articulate the meaning of pictorial composition and to demonstrate its two main types detected in art history as Linear Composition and Tonal Composition. Linear Composition generally depends on line axes that construct a well-formed net, which contains the components of the image. (Fig 5 A & B).

The Tonal Composition depends on the relationship between lights and shadows (Fig 6). The author also refers to that a mixture of the two types of pictorial composition could take place (fig 7). Giving visual examples of the pre-mentioned classical approaches, modern trends in 2D design also merits explanation. This modern type could be named as colour composition which completely depends on the relationship between a group of different colours.
Commonality Between Verbal and Visual Language

Akmal Abdelrahman

Fig 5A Sandro Botticelli, The Adoration of Magi, Tempera on panel 1475-1476

Fig 5B a diagram that demonstrates the linear composition of the image

Fig 6 Caravaggio, The conversion of ST Paul, 1601, Tonal Composition

Fig 7 Eugene Delacroix, La Liberté guidant le, a mixture of the linear and people, 1830tonal composition

Fig 8 Ulrika Leander, Downtown, 1997 an example of coloured base composition

Fig 9 represents samples of analysed classical works made by students, class 2012
During the course, the author involves the exploration of some perception theories such as the Gestalt theory of perception and the Pattern Processing system so the students could engage and link these theoretical concepts of visual perception with their understanding of visual language.

To understand the difference between what is composition, what graphical entity is and what is design, students are asked to analyse a number of classical paintings attributed to the Baroque style as one of the significant styles in mural paintings (Abdelrahman 2009), the task is to simplify the image -whether it is Linear or Tonal- to its basic graphical entities (fig 11 a, b). This task underlines the student's capability of observing multiple design techniques which explore how visual elements are being used to form shapes, objects, graphical entities and finally a Design. Students then are asked to develop initial ideas for mural designs, based on their understanding of the previous stages. The following examples demonstrate how one of the students developed his designs in response to his understanding of the visual vocabularies.
Fig. 11B Hussein Final Design after being digitally applied on the designated wall 2012

Fig 10 A&B demonstrate two trials of the student (Hussein Mohamed) initial thinking for his mural design, it seems that the Idea of forming and organising graphical entities was not fully understood in this stage. Fig 10 C is a sketch that showcases Hussein first thinking about how to form more advanced relations between graphical entities in their abstract state and distinguish each entity with a different tone. In this stage Hussein started to understand the sequence of developing a design through organizing multiple entities that are formed according to the Visual language model stated above. Fig 10 D&E demonstrate how the design was developed and the geometrical entities was transformed into objects that have certain visual reference to narrate the story of the Mural as shown in (fig 11 A&B) the final stage of the design after being digitally applied on its designated wall.

Through the 4 years of teaching this course the author noticed that the visual language theory proved to be an exquisite method of explaining the value of each design element individually and in relation to other elements, it was also an explicit way of demonstrating the notion of what the word pictorial composition means and the different between a composition and a design in 2D implementations and what is the importance of understanding the notion of graphical entities as explained in Page 7, as it was found that students are usually confused in distinguish between an object, an entity and a design. When students grasped the notion of pictorial composition and how to form graphical entities then how to organize these entities to develop a complete design they subsequently start to develop the design thinking and techniques.

The 2D Visualisation Studio course at Faculty of Arts and Design MSA Uni

This course explores the digital technology available to students of design for two dimensional (2D) representations. It starts with an exploration of the Design elements such as line, value, colour, shape, form, texture and space. It demonstrates the 2D design types and it also discusses the language of visual design, digital photography, digital design processes. Moreover, it introduces Raster Image Manipulation (using Adobe Photoshop) including Principles of image representation, digital colour representation.

The author is teaching this course using the visual and verbal language methodology used in the Mural course but with simpler approach. This course is taught to the foundation level at the faculty of Arts and Design so the author focuses on the explanation of the Pictorial Composition major types, the Visual perception theories and a simple explanation of the visual language vocabularies.

The course starts with exploring the 2D design elements as well as how to use the Photoshop program in developing 2D digital images. Using existing images and photographs, students are asked to form a design that could function as a poster, a book cover or a CD cove.

One of the most important lectures in this course is the lecture of Visual and Verbal narration, this lecture articulates the relevance between visual and verbal languages in narrating a story each with its own vocabularies.

The following examples showcase some students' designs that reflect their understanding of the notion of constructing a digital image using multiple photos/images as ready-made entities to convey/narrate a message through different applications of graphical designs.

The following images demonstrate two poster designs for two different students that were designed in the final exam for this course (students are anonymous). Students were asked to make a poster design for King Lear play. They were given a number of photos and asked to use at least 4 photographs to form the design with the appropriate text. As seen in the two images each student used his/her own understanding of the notion of graphical entities and how to organise the given pictures to narrate the story of the poster.

In Fig 10 the student made a visual dialogue/relaion between King Lear’s portrait (as circular/oval object) and the rest of the actors (as a rectangular entity beneath) and placed them all in the scene space using the given images framed with the a rectangular text in a way that made the whole composition seen as one image not multiple images. The author believes that this student took an advantage of understanding the idea of visual structuring methodology in producing this poster.
design.
In Fig 13 the student used some different images to construct his design. He/she used the Silhouette visual pattern (generated by two given images) as the foreground of his design and placed the King Lear’s portrait lightened in the background. The Silhouette figures in their rectangular form were placed in relation to the circular/ oval form of King Lear’s portrait (a visual object) which resulted in generating the design as one imaginative scene.

In both designs the viewer eyes would circulate according to the sequence emerged through the well-structured relations between the graphical entities and the visual objects.
In this course students do not have to go through the analysis process of classical works because they do not develop their designs from scratch, and they do not have to build up graphical entities or visual objects, as they usually use existing images or photographs as pre-mentioned.

Fig 12 & 13 two poster designs made by 2 students attended the 2D visualization course

Results
The aforementioned examples of both courses represented two case-studies of a number of successful trials made by the majority of the two courses students. The result of the two courses for the past four years proves that the visual language methodology was a significant device that played an important role in teaching both courses. The feedback the author received form students of the two courses indicated that using the visual and verbal language methodology enabled the students to appreciate the value of each of the design elements as the fundamentals they can utilise in constructing their own objects, entities and subsequently their design. The Idea of comparing visual and verbal language in terms of their communally structural aspects makes it much easier for the students to understand the significance of visual language.

References
- Pentak, S., Roth, R., & Lauer, D., 2013, Design Basics 2D&3D 8th edition, Wadsworth, Cengage Learning ,USA
- Ware, C., 2008, Visual Thinking for Design, published by Denise E. m. Penrose, USA
Websites