The Upside-Down Truth: The Fostering of the Most Intimate Perception

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Abstract: The present study mainly discusses the perceptual memory module in psychology, analyzing people's memory points and neural operation patterns in the brain through their different feelings towards objects or words from different angles, in order to analyze the suitable angles for object placement in different scenarios. The applicable scenarios here include advertising promotion, cultural images, and so on. Although it is the same object or text, people may have different feelings due to its placement in different directions. Individuals may experience varying feelings toward the same object depending on its location in their daily lives. Readers can consider whether the placement of a single advertising slogan on a promotional poster will unconsciously affect consumers' shopping desires? Why is the bullet screen designed above the viewing screen? This article will answer the above questions through two sets of psychological experiments. The study's findings demonstrate the dynamic interplay between spatial context and human experience by showing that object position has a substantial impact on individual perception. This paper offers useful suggestions to better match object placement with user requirements and preferences in light of these findings.

1 INTRODUCTION

The stage of memory research in psychology can be traced back to 1875, during which the representative figure was Ebbinghaus. Since then, he began measuring the phenomenon of "forgetting" in humans. After the mid-1950s, psychologists began to divide memory into sensory memory, short-term memory, and long-term memory. In recent years, it has been further divided into explicit memory and implicit memory, and so on. This article mainly discusses the sensory memory module in psychology, (Although it can only retain short memory information, it can provide us with a broader space for memory content.) and studies how people perceive the same things from different perspectives. In addition, factors that affect sensory memory include individual attention, physical function and health status, as well as emotional ability. Then the topic will be discussed from two perspectives, analyzing when and what perspective can make people feel more familiar. This article will use psychological research methods such as VR surveys and literature review.

2 LITERATURE REVIEW

2.1 Introduction to the Sensory Memory

Sensory memory refers to the momentary image maintained after the cessation of sensory stimuli. It involves the brief storage of raw sensory information obtained from the environment, usually only a few hundred milliseconds to a few seconds before it automatically fades away. Therefore, sensory memory is also known as instantaneous memory. Its main type is visual memory, followed by other sensory memories such as hearing and touch, which respectively process information received from senses such as ears and skin (Larivière et al., 2014).

2.2 The Correlation Between Different Orientations and People's Memory Familiarity

People often use spatial orientation as a metaphor when understanding and memorizing information. Many people subconsciously believe that things expressed in the "up" direction are more important, and secondly, the "down" direction is used to present

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less important things. In addition, because the information above is often associated with positive and important concepts, it also plays a role in enhancing people's memory effectiveness. This study focuses on the memory and developing brain, using methods such as structural brain imaging and coordinated measurements between laboratories. Through longitudinal design (record every minute at intervals of one minute) and complex data modelling (divided into 5 groups according to the age range of 18-22), it examines in real time how different brain structures support memory. The sample of this experiment is ordinary college students, with a male to female ratio of 1:1 and an age range of 18-22 years old as limiting factors. A balanced gender ratio in the sample can to some extent avoid the additional influence of gender on the overall research results. In order to avoid the influence of samples nervous emotions on the results, this experiment combines online and offline methods - using survey questionnaires and laboratory records to jointly analyze the results of this experiment and finally completes the big data collection of the relevant platform. The highlight of this experiment is the use of neuroimaging techniques, which makes its conclusions more accurate and reliable. According to the experimental results, it can be known that the neural structure of the human brain produces different fluctuations and reactions when observing the same object from different angles, and these long and short fluctuations will affect a series of memory situations later on (Tober, 2011).

For example, researchers used a poster advertising design to confirm our hypothesis and experiment, and the results showed that placing the product above the advertising screen made it easier for people to remember it and improve their memory accuracy. (Usually, people first see information located above the screen and quickly remember it, such as brand label but the content seen below the screen is more likely to be converted into long-term memory). The difference in memory accuracy between the two is 20% and 35%. Next, it will be described in detail the impact of the perspectives of "up" and "down" on people's memory familiarity associations.

2.2.1 The Impact of "Upper" Orientation on People's Memory Familiarity Association

As a visual high position, the upper part is often more likely to attract people's attention. Therefore, in the process of memory, people tend to choose the information or objects above them more easily, which can form a higher degree of memory familiarity. Even the information in the upper part of people's brain nerves is more easily connected to their long-term memory network. This association not only helps with the storage and retrieval of information, but also improves the accuracy and persistence of people's memory, making it more likely to become a long-term memory rather than a short-lived and easily disappearing one (Sorokina et al., 2006).

2.2.2 The Influence of the Orientation “Below” on People's Memory Familiarity Correlation

In the process of memory retrieval, the information in the lower direction may be more easily activated and recalled. This may be because the information in the lower direction is more closely related to people's spatial cognition and emotions, thereby improving its extractability.

From a spatial perspective, it is easier for people to determine the position, direction, and distance of an object below, and this cognitive ability is crucial for people's daily lives. In terms of emotional connection, the downward orientation is often regarded as a symbol of inferiority or lowly status in some cultures, which may lead to negative emotional effects on some people and greatly deepen their memory difficulty. Therefore, in some architectural designs, the downward orientation may be more likely to reflect people's emotional needs. We can use the orientation below to increase people's spatial cognition and memory effects to design an object, or guide certain groups of people to undergo memory training for special scenarios (Luce, 2001).

For example, we arrange a row of numbers in order, in the same space, with the same shape, size, and color. And participants are often more likely to notice the numerical group displayed below, and are also more likely to remember the content of the numerical group below (Charoenthammachoke et al., 2020).

2.3 The Impact of Different Visual Perceptions on Perceived Risk

2.3.1 The Definition of Perceived Risk

Perceived risk usually includes two factors, the uncertainty of decision results and the severity of the consequences of wrong decisions. It was originally due to the implicit uncertainty of the results in consumer purchasing decisions, and this uncertainty became the initial concept of risk. Initially, because

any consumer purchasing behavior may not be able to determine whether the expected results are correct, and these results may make consumers unhappy, it is called risk. Later perceived risk refers to an individual's subjective assessment and expected outcome of the potential negative consequences of an event or behavior (Capari et al., 2024).

2.3.2 The Impact of Different Visual Perceptions on Perceived Risk

Different visual presentation methods include regular images, regular videos, and virtual reality technology. This article mainly introduces in detail the impact of virtual reality technology on people's perception of risk.

Virtual reality technology, also known as VR, provides people with an immersive visual experience, allowing participants to experience risk scenarios firsthand. It provides a better platform for participants to cope with potential risks through sound effects and a comprehensive visual experience of the environment they are in (Ke et al., 2002).

For example, researchers designed a VR visual experiment that combines the different visual effects of "up" and "down" on people's memory. The experimental group gathered a group of college students on campus as "subjects"(the total number is 100, set as male female year-on-year), who were asked to wear VR glasses while viewing the same set of pictures in the upper and lower positions (These images are uniformly composed of numbers 1-9 and different colors. For example, the background of the number "9" is yellow, and participants need to remember the corresponding background color of the number. At the same time, these numbers will not be uniformly located in the center of the VR glasses screen. Some will be designed to be located above the visual area, while others will be located at the bottom of the screen) and finally studied their memory points through a survey questionnaire. Experiments have shown that images located below are easier for participants to notice at first glance, while images located above are easier for people to remember. The experimenter also observed that during the 5-second presentation time of each image, the subjects first paid attention to the number, and then noticed the color behind it. Among the complete 100 sets of images, the subjects' accurate memory array was related to their mental state, personality, preferences, and other information for the day. For example, a participant prefers a blue background, and most of the numbers they remember are from the blue background image. In addition, another participant likes the number "3", she remembers more of the background of the number "3" (Sharma et al., 2012).

3 DISCUSSION AND SUGGESTION

3.1 The Impact of Visual Design in Different Directions on Product Sales

Based on the experimental results mentioned earlier, it can be concluded that if we want a product to be more eye-catching, we should place its concept image below the product marketing poster. However, if we want the product to be more easily remembered by people, we should place its image above the poster.

In addition, researchers can also divide product sales into micro and macro perspectives. The macro section is responsible for showcasing the overall image and brand concept of the product. This can allow consumers to have a more comprehensive and objective experience of the product design. For example, when advertising shampoo, panoramic photography can be used to allow buyers to clearly see the overall bottle design of the shampoo, which to some extent can increase consumers' desire to purchase.

The micro perspective, on the other hand, places more emphasis on detailed descriptions. By magnifying a certain advantage of a product, consumers can gain a better understanding of its features and develop an interest in purchasing. For example, when selling gloves, the detailed description of the gloves can be enlarged to allow buyers to see the material and workmanship of the gloves more clearly, thereby generating a desire to purchase them.

The comprehensive application of perspective design can enhance people's intimacy and familiarity while allowing subjects to choose their target audience to a certain extent. Combining products from a suitable perspective can develop targeted consumer audiences and stimulate buyers' shopping desires. In many ways, different perspectives of "up" and "down" can bring different visual effects to the same product, resulting in different feelings for the same person.

Next, we will discuss the limitations of current research on the "memory" module by combining the two main memory experiments mentioned above (Tenopir et al., 2008).

3.2 Limitation of Current Studies

Firstly, it is inevitable that current research on related memory modules is still limited by technology and influenced by key equipment, including the familiarity cultivated by technicians and the maturity of the surrounding environment. But the following three points are still the main objective issues facing us:

1. Theory lags behind practice - In current research on memory, conscious activities and ideologies such as remembering, recalling, forgetting, and suppressing memories have always been important topics of phenomenological discussion, all of which involve the reconstruction of consciousness. However, from the current phenomenon, there are still many shortcomings in the theoretical field.

2. Limited research subjects and methods - Many psychological experiments need to be conducted in the laboratory, but this itself deviates from real life, especially in memory research, where people's nervous emotions may also affect their memory outcomes.

3. The complexity of deep memory recall - Many memory loss phenomena are "suppressed memories" that cannot be recalled briefly. If the subject tries to recall, they will recall relevant content. However, due to the limitation of experimental time, there is often not enough time for participants to recall, which is also one of the factors that affect the experimental results (Shashikiran, 2016).

3.3 Distinguishing the Sense of Familiarity Brought by Text from an up and down Perspective

(1) Looking up perspective - When advertising copy adopts a looking up perspective, it often creates a sense of familiarity, which is different from the natural feelings that people have towards their loved ones from the bottom of their hearts, but rather a strong resonance and admiration from within. It can make people unconsciously want to have a deep emotional connection with it.

For example, when narrating a great leader, using words from a perspective of looking up can deepen the description of their achievements and spirit, making it easier for people to develop admiration for them. Although this emotion is not a sense of familiarity, it can bring readers closer to the text, making them more engaged and immersed in it

(2) Viewing from a top-down perspective - Compared to looking up, looking from a top-down perspective gives people a sense of superiority. Text from this perspective often brings deeper thinking and a deeper sense of trust, because from this angle, everyone is in the visual "main position", which invisibly increases the reader's confidence and composure. Although it may create a certain sense of distance, if used appropriately, it can also deepen trust and communication between people (Zhang et al., 2024).

For example, when depicting a grand scene or significant event, using top-down perspective text can help readers better understand the depicted content. At the same time, it can also make readers more immersed and feel the connection between things. This association is not a direct sense of familiarity, but it can resonate with readers during the reading process (McKiernan, 2000).

4 CONCLUSION

It found that through two sets of experiments that upper visual perception is more conducive to the formation of long-term memory in people. But people often don't notice it immediately, and the visual below is often more likely to catch people's attention. But this memory is relatively short-lived, and people often overlook its long-term memory association due to familiarity. Finally, we conclude that if we want people to see an object at first glance, we should place it above their line of sight, and if we want a person to remember an object for a longer period of time, we should place it below their line of sight

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