

Chapter 5(b) Perception

By

Hasmadi bin Hassan

PBMSK

hasmadi@ump.edu.my

Factors Influencing Perceptual

- **External Factors.**
 - The responsible for learning the probability of certain object. If one expects a given object to occur, it will easy to recognize.
- **Internal Factors.**
 - Connected with the internal organization of categories one uses when perceiving

External Factors

- Size
- Contrast
- Frequency
- Past experience

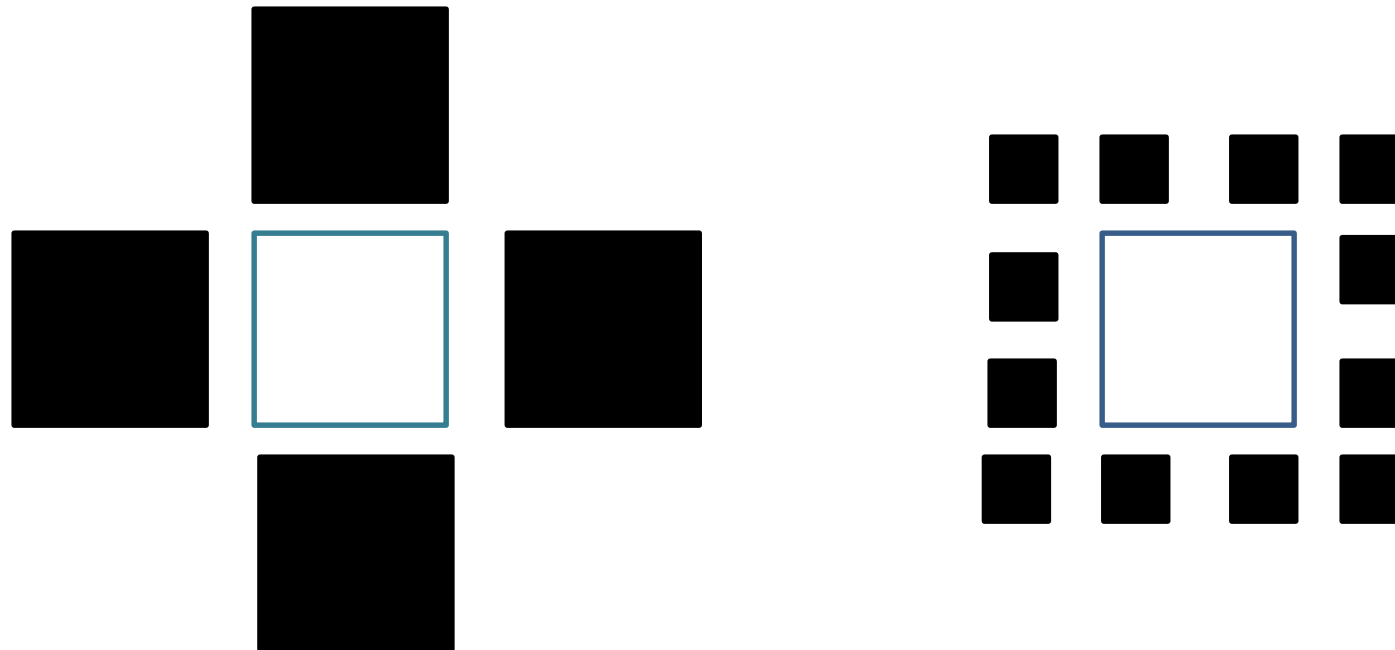
Size

Which block you can read faster?

Human Behavior

Human behavior

Contrast



Internal factors

- Self-concept
- Beliefs
- Expectations
- Personality and perception

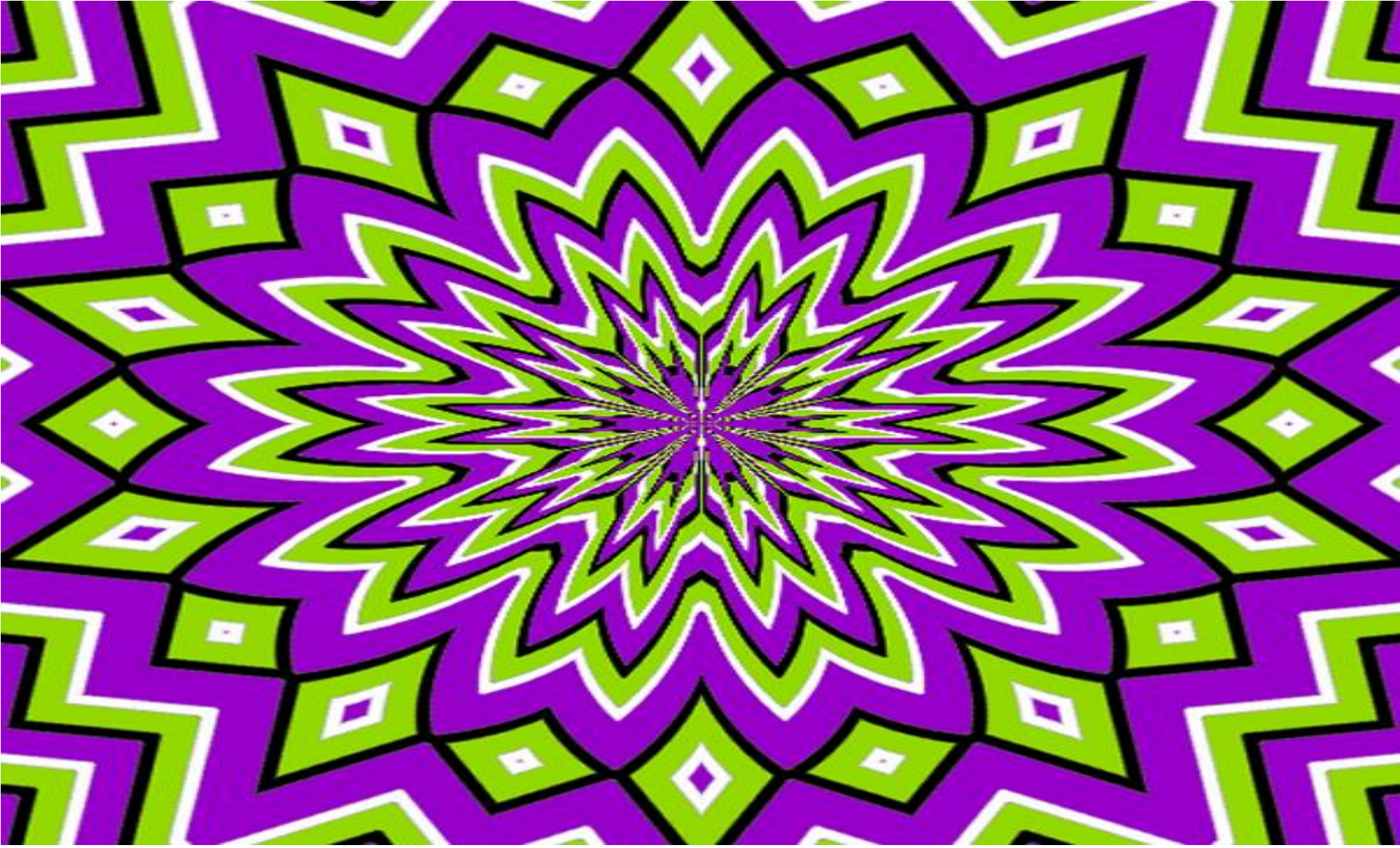
The World of Illusions

An illusion is an image or representation believed to be real in our mind's eye, but that is not actually real. In other words, because of the way our eyes and brain work, our eyes are tricked into seeing something that is not really there or into seeing something happen that did not really happen.



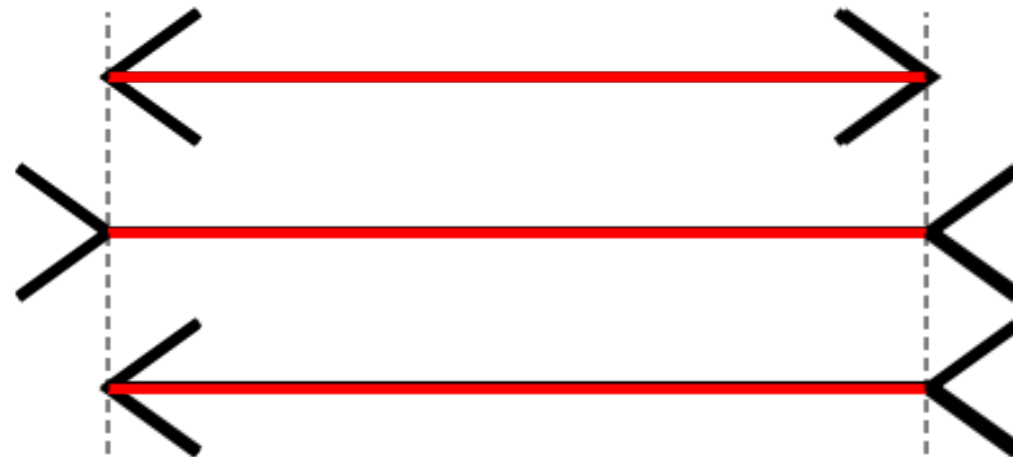
Do you see a musician or a girl's face?

YourCoolProfile.com

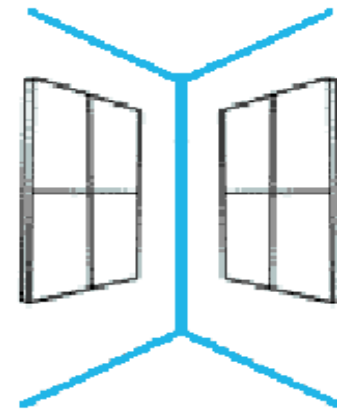


MÜLLER-LYER ILLUSION

An optical illusion involving two lines and arrowheads at the ends of each line. When two lines and arrowheads of equal length are used, the one with ends pointing out is thought to be longer than the one with ends pointing in.

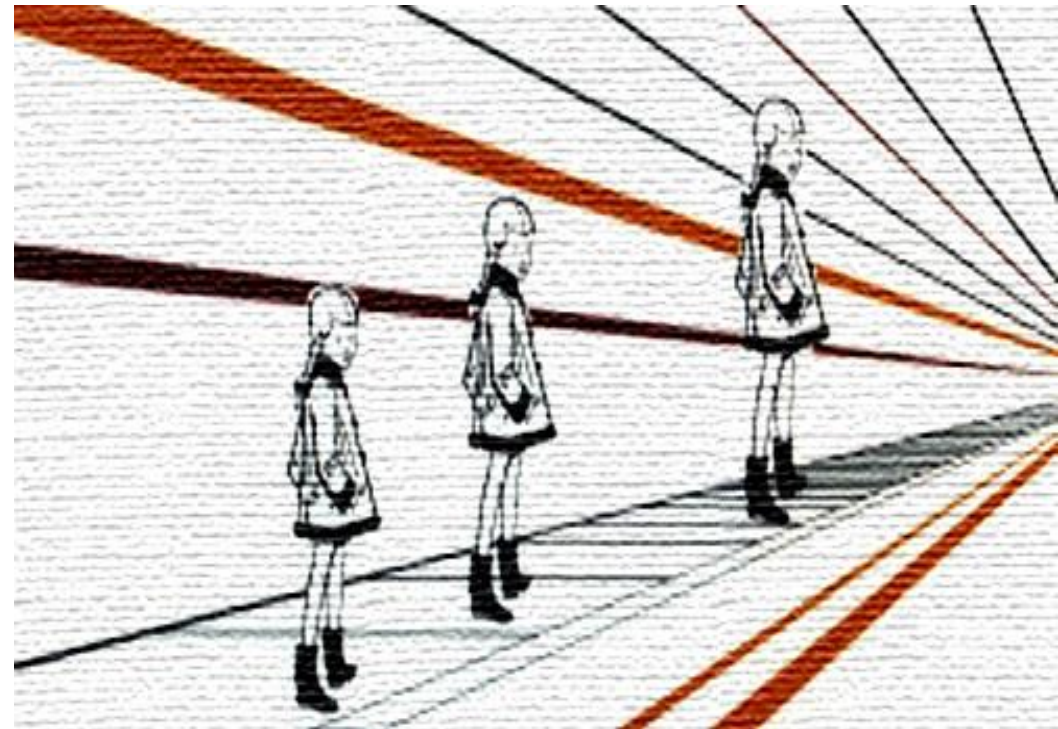
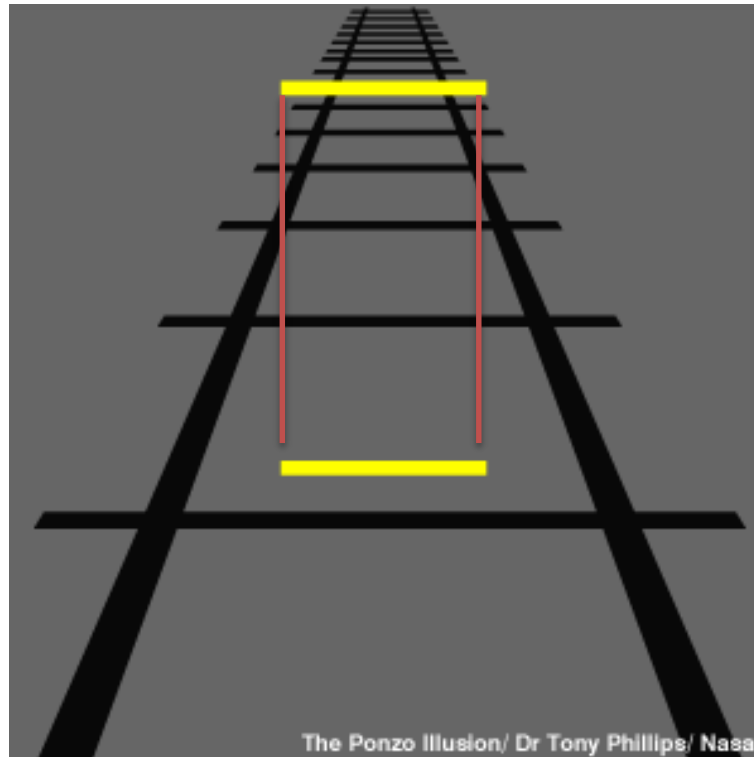


We are also used to seeing the inside corners of rooms with the lines of the roof and floor sloping outward away from them. In these situations, the brain knows that the corner is the furthest part of the image from us. The brain realises that this line is really longer than it appears when compared to the rest of the room. When the brain compares lines from these two situations to each other, it reduces the size of the line with the inward sloping tails (the corner of the building) because it thinks this line is closer to us. It increases the size of the line with the outward sloping tails (the corner of the room) because it thinks this line is further away. This makes the line with the outward facing tails look longer.



The Ponzo Illusion

The mind's tendency to judge an objects size according to the background.



Extrasensory Perception

- **Extrasensory perception (ESP)** involves reception of information not gained through the recognized physical senses but sensed with the mind.
- ESP is also sometimes casually referred to as a sixth sense, gut instinct or hunch, which are historical English idioms
- Parapsychology is the scientific study of paranormal psychic phenomena, including ESP.
- Parapsychologists generally regard such tests as the ganzfeld experiment as providing compelling evidence for the existence of ESP
- Example to donate psychic ability are

Psychic

Telepathy

-Mind-to-mind communication
-Is the transmission of information from one person to another without using any of our known sensory channels or physical interaction

Clairaudience

receiving messages in thought form from another frequency or realm

Clairvoyance

Perception of remote events
Is used to refer to the ability to gain information about an object, person, location or physical event through means other than the known human senses

Precognition

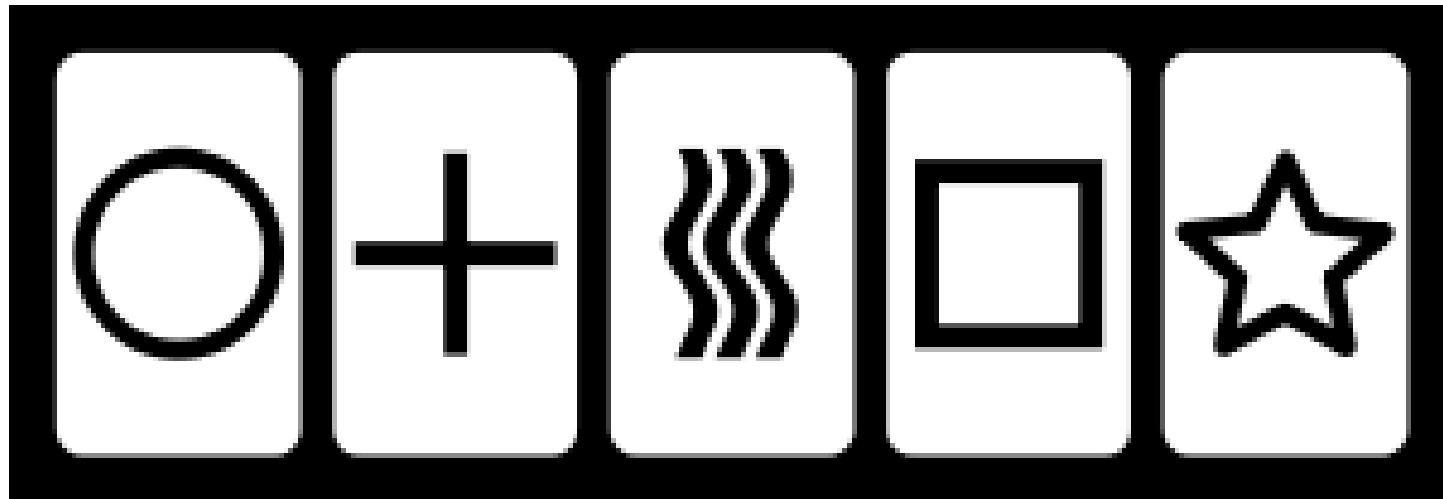
Ability to see future events

Ganzfeld experiment

- technique used in the field of parapsychology to test individuals for extrasensory perception (ESP)
- It uses homogeneous and unpatterned sensory stimulation to produce an effect similar to sensory deprivation
- The deprivation of patterned sensory input is said to be conducive to inwardly generated impressions.
- The technique was devised by Wolfgang Metzger in the 1930s as part of his investigation into the gestalt theory
- Parapsychologists such as Dean Radin and Daryl Bem say that ganzfeld experiments have yielded results that deviate from randomness to a significant degree, and that these results present some of the strongest quantifiable evidence for telepathy to date.
- The ganzfeld experiments are among the most recent in parapsychology for testing the existence of and affecting factors of [telepathy](#), which is defined in parapsychology as the paranormal acquisition of information concerning the thoughts, feelings or activity of another person

The Case against ESP

- **ESP Cards**



- **The score card game**

- **Zener cards** are cards used to conduct experiments for (ESP), most often clairvoyance. Perceptual psychologist Karl Zener designed the cards in the early 1930s for experiments conducted with his colleague, parapsychologist J. B. Rhine.
- **The design** Originally, tests for ESP were conducted using a standard deck of playing cards. However, there are many confounding variables involved with this methodology. When this methodology is used, a participant is only credited a correct prediction for guessing both the number and suit of the card. This means that the chance of correctly guessing a card is greatly reduced, and there is a lot of ambiguity involved with statistical analysis. Another problem with using playing cards is that many people will have a preference for a particular card, number or suit and will constantly suggest that as their prediction for the next card that will appear. This led to the development of a set of cards known as Zener cards, invented by Karl Zener.
- There are just five different Zener cards: a hollow circle (one curve), a Greek cross (two lines), three vertical wavy lines (or "waves"), a hollow square (four lines), and a hollow five-pointed star. There are 25 cards in a pack, five of each design.
- When Zener cards were first used, they were made out of a fairly thin translucent white paper. Several subjects or groups of subjects scored very highly until it was discovered that they had often been able to see the symbols through the backs of the cards. A redesign made it impossible to see the designs through the cards under any conditions. A subsequent deck featured an illustration of a building at Duke University on its reverse side, but the use of a non-symmetric reverse design allowed the deck to be exploited as a one-way deck

The Continuing Controversy Ganzfeld Procedures

- In a typical ganzfeld experiment, a "receiver" is placed in a room relaxing in a comfortable chair with halved ping-pong balls over the eyes, having a red light shone on them. The receiver also wears a set of headphones through which white or pink noise (static) is played. The receiver is in this state of mild sensory deprivation for half an hour. During this time, a "sender" observes a randomly chosen target and tries to mentally send this information to the receiver. The receiver speaks out loud during the thirty minutes, describing what he or she can see. This is recorded by the experimenter (who is blind to the target) either by recording onto tape or by taking notes, and is used to help the receiver during the judging procedure.
- In the judging procedure, the receiver is taken out of the ganzfeld state and given a set of possible targets, from which they must decide which one most resembled the images they witnessed. Most commonly there are three decoys along with a copy of the target itself, giving an expected overall hit rate of 25% over several dozens of trials.

Criticisms of the ganzfeld experiments

- *Isolation* — Richard Wiseman and others argue that not all of the studies used soundproof rooms, so it is possible that when videos were playing, the experimenter (or even the receiver) could have heard it, and later given involuntary cues to the receiver during the selection process. However, Dean Radin argues that ganzfeld studies that did use soundproof rooms had a number of "hits" similar to those that did not.
- *Randomization* — When subjects are asked to choose from a variety of selections, there is an inherent bias to choose the first selection they are shown. If the order in which they are shown the selections is randomized each time, this bias will be averaged out. The randomization procedures used in the experiment have been criticized for not randomizing satisfactorily.
- *The psi assumption* — The assumption that any statistical deviation from chance is evidence for telepathy is highly controversial. Strictly speaking, a deviation from chance is only evidence that either this was a rare, statistically unlikely occurrence that happened by chance, or *something* was causing a deviation from chance. Flaws in the experimental design are a common cause of this, and so the assumption that it must be telepathy is fallacious