# An Analysis of Humorous Utterances in *Young*Sheldon Based on Relevance Theory

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Abstract: Humor reflects the wisdom of the speaker and their positive attitudes towards life. The study of cognitive mechanisms of language humor is an important research topic in the field of cognitive linguistics. Relevance Theory holds that understanding humor is a cognitive process of seeking relevance and it is conducive to making a reasonable illustration of the general rules of how humor can be understood. Based on Relevance Theory, this study analyzes the humorous utterances in the American sitcom Young Sheldon (season 4) by employing a qualitative research method, aiming to explore the cognitive mechanism of humor generation. The findings indicate that: (1) Humor tends to be generated when there is an implicature caused by rhetoric in ostensive information; (2) The inconsistency between maximal relevance and optimal relevance generates a humorous effect; (3) Humor is likely to be created when a contextual effect is insufficient, especially between an adult and a child. To further explore detailed cognitive steps in humor generation, more research combined with other cognitive theories can be conducted in the future.

Keywords: Relevance theory, Humorous utterances, Young Sheldon

#### 1. Introduction

The development of information technology has accelerated cultural exchanges between countries. The American sitcom *Young Sheldon* has gained a large audience around the world, especially in China with its funny plot and humorous style. According to Merriam-Webster, humor is a sense of the ludicrous or absurdly incongruous. Humor is not only charisma but also a language art, which brings fun to our lives and creates a relaxing communication environment for us. As a special kind of interpersonal communication, humor is welcomed by the public.

The theories of humor can be traced back to the Plato era in ancient Greece and have been further developed afterward. There are three main theories about humor in Western, respectively Superiority Theory, Relief Theory, and Incongruity Theory<sup>[1]</sup>. Incongruity Theory is concerned with the cognitive processes of humor generation and it has been generally popular since the 19th century<sup>[2]</sup>. In time, linguistic theories were introduced into humor research and the Semantic Script Theory of Humor<sup>[3]</sup> was the first humor theory based on linguistics. With the development of linguistics, more and more linguistic theories are applied to humor research to promote people's understanding and appreciation of humor.

Although there are studies of humor in the Pragmatics field, most of them are based on Cooperative Principle<sup>[4]</sup>. However, communication is natural, and not every communicator creates humor by violating maxims on purpose. According to Relevance Theory, communication is a process of seeking relevance and it involves ostension and inference based on our cognitive environment<sup>[5]</sup>. The cognitive process of humor is complicated and not every relevance generates humor. Therefore, it's important to figure out under what condition the humor is generated, especially in those popular sitcoms. More studies of different genres need to be conducted to explore the mechanism of humor generation. This study aims to explore how humor is formed in the sitcom *Young Sheldon (season 4)* within Relevance Theory. From this paper, people would learn how to appreciate humor utterances in sitcoms from a cognitive pragmatic perspective and would have a better understanding of the humor cultures of different countries.

## 2. Literature Review

It was not until the end of the 1970s that linguistics played an important role in humor studies<sup>[6]</sup>. The linguistic perspective of humor can be roughly divided into rhetorical, semantic, and pragmatic

perspectives<sup>[7]</sup>. The pragmatic perspective of humor focuses on the use of language, in which communicative intentions and context are taken into consideration.

Scholars have paid great attention to the cognitive process of humor utterances. Relevance Theory<sup>[5]</sup> and Conceptual Integration Theory<sup>[8]</sup> are the main theories applied. Zhang held that verbal humor often arises from the integration process of contextual hypothesis<sup>[9]</sup>. Elisabeth found that humor appreciation is affected by socio-cultural contexts, such as background knowledge, values, and attitudes of the individual<sup>[10]</sup>. Padilla Cruz showed that vigilance mechanisms have an essential impact on the audience's various interpretative hypotheses of puns and their processing strategy<sup>[11]</sup>. Ghodsi and Heidari-Shahreza investigated humor categories in a corpus of online Persian jokes based on the cognitive and communicative principles of Relevance Theory and the findings indicated that humor might be better understood on the premises of explicit and implicit interpretation<sup>[12]</sup>. Zuo revealed that cognitive backgrounds hinder to some extent the interpretation of humor from the affective level of communication<sup>[13]</sup>.

It's found that previous linguistic studies of humorous utterances mainly focused on how humor is formed and cognition factors affecting the understanding of humor. However, verbal humor takes language as the carrier and obtains the pragmatic effect of humor in certain situations and contexts. In other words, the generation and understanding of humor is not only a matter of encoding and decoding but also involves the inference of the hearer. Although there are numerous studies about humor, it's not safe to conclude what is the humorous mechanism and how humor is understood by people. Therefore, more studies of verbal humor based on different genres and cases need to be conducted to further explore detailed humorous mechanisms from cognitive and pragmatic perspectives to enrich this field.

### 3. Theoretical Framework: Relevance Theory

#### 3.1. Communication of Relevance Theory

Sperber and Wilson proposed the Relevance Theory in their book *Relevance: Communication and Cognition*<sup>[5]</sup>. According to Relevance Theory, communication is an ostensive-inferential process involving inference on the part of the hearer and ostension on the part of the communicator rather than simply a matter of encoding and decoding. For the communicator, communication is an ostensive process of informative intention; while for the hearer, it's an inferential process of the communicative intention of ostensive information.

## 3.2. Two Principles of Relevance

The cognitive principle and communicative principle are two principles of Relevance Theory. Sperber and Wilson reduced all maxims proposed by Grice to a simple principle of relevance: every act of ostensive communication communicates the presumption of its optimal relevance<sup>[5]</sup>, which then developed as communitive principle of relevance. And the other principle of relevance is cognitive principle. The cognitive principle holds that human cognition tends to be geared to the maximization of relevance, while the communicative principle refers to that every ostensive stimulus conveys a presumption of its optimal relevance<sup>[14]</sup>.

## 3.3. Context of Relevance Theory

The context of Relevance Theory is an expansion of the cooperative principle<sup>[15]</sup>. Grice's Cooperative Principle emphasizes the physical context in communication, while Relevance Theory extends to the cognitive context. According to Relevance Theory, context is a psychological construct and a subset of the hearer's assumptions about the world<sup>[5]</sup>. An individual's cognitive context is made up of logical information, encyclopedia information, and language information and it is characterized by individual differences<sup>[14]</sup>. In other words, cognitive context is a set of assumptions in the mind of an individual, and communicators' utterances as an ostensive stimulus trigger the cognitive context of the hearer. The greater the contextual effect of cognition, the more relevant the hypothesis. Inference of information is seen as a process involving the cognitive context consciously or unconsciously.

## 4. Data Collection and Research Method

American Sitcom Young Sheldon has gained a growing number of audiences around the world since

Young Sheldon (Season 1) debuted on Columbia Broadcasting System (CBS) in 2017, especially in China. Young Sheldon (Season 4) was updated in 2020. Some funny conversations in Young Sheldon (Season 4) are adopted as data for this study. To make a thorough analysis of how verbal humor is generated and understood within Relevance Theory, a descriptive method is applied in this study. In the following parts of corpus analyses, the situational background of each conversation is provided.

### **5. Cases Analysis of Humor Utterances**

Verbal humor is the product of language and cognitive context. Compared with the Cooperative Principle, Relevance Theory extends communicative context from physical context to cognitive context and thus it is a more proper way to study humor.

## 5.1. Humor and Rhetoric in Ostension

Humor is generated in the cognitive process from ostension to inference, especially when there is an implicature caused by rhetoric in ostensive information.

Case 1: Sheldon fell off his bike and got one of his arms fractured. Missy, his sister, writes something on Sheldon's bandage to express her sorry:

Missy: I hope your arm gets better soon.

Sheldon: (looks at what Missy has written on the bandage) That's the wrong "Your".

Missy: What are you talking about?

Sheldon: It's supposed to be Y-O-U-R. What do you mean? "I hope you arm gets better."

Missy: oh?

Sheldon: You defaced my body with a grammatical error.

Missy: I guess that's your problem. Y-O-U-R.

Sheldon fell off his bike and got one of his arms fractured. Missy, Sheldon's sister, wants to express her sorry for Sheldon's hurt and she writes something saying "I hope you arm gets better soon". Missy is 11 years old and she is going to graduate from elementary school this year. Her knowledge of grammar and spelling is not very good, so she mistakenly writes "your" as "you". This mistake is noticed by the perfectionist Sheldon. He angrily says to Missy "You defaced my body with a grammatical error." From the perspective of Missy, this grammatical error is not a big deal. She first uses the plain tone "oh" to answer Sheldon's fuss, and finally says "I guess that's your problem. Y-O-U-R." Actually, Missy's answer is an ostensive stimulus that conveys information intentions and communication intentions. The utterance "your problem" is a pun. A pun is a figure of speech and it deliberately uses similar words or phrases to create confusion for rhetorical effect<sup>[16]</sup>. On one hand, it can refer to the grammatical error "you problem"; on the other hand, it can mean Missy's anger about Sheldon's fuss, that is "I don't care whether this word is right or wrong. If you are overconcerned about it and then that's your business". The pun of Missy makes the audience's double inference possible, thus generating humor.

## 5.2. Humor and Principles of Relevance Theory

Human cognition tends to be geared toward the maximization of relevance, while what communicators expect is optimal relevance. The inconsistency between maximal relevance and optimal relevance generates a humorous effect.

Case 2: Sheldon works as a part-time docent in the train store, and the manager wants to give him some advice based on his performance:

Manager: well, you see now, that there is a problem. People, when they come here, they want to enjoy it. They don't want to get lectured in the bathroom. And you have been correcting me in front of the visitors all morning long.

Sheldon: would you prefer I send you a memo of your mistakes at the end of the day?

Because that's what I did for the teachers at my school. I think it bought us all closer.

Manager: No. Sheldon, it's great to have knowledge. But you don't need to show it off all the time.

Sheldon: oh, I don't mind.

Manager: You see, trains are all about balance, right? Now you put too much water into a steam engine and it can't do its job. You let that water run low—boom, it will blow up. Now, a good engineer makes sure he uses just the right amount of water. Not too little, not too much. Does that make sense?

Sheldon: The fireman adjusts the water, not the engineer.

At first, the manager gives an ostensive stimulus by saying "People don't want to get lectured in the bathroom. And you have been correcting me in front of the visitors all morning long." Generally, the hearer will infer that it's not proper to lecture visitors when they are in the bathroom and that correcting the manager in front of visitors makes the manager lose his face. The manager's utterances can be regarded as optimal relevance. However, it seems that the manager's ostensive behavior doesn't make mutual manifestness.

It's necessary to mention cognition ability to help us to further explore. Sheldon is just a boy with high intelligence but little sensitivity. For him, literate meaning can get the maximum context effect with the least processing effort. Thus, his interpretation of utterances tends to be superficial and direct without considering the implied meaning. Facing Sheldon's wrong inference, the manager makes adjustments, and this time he tells Sheldon a story in a metaphorical way to make his intentions seemly clearer. However, Sheldon makes a failed inference again. Sheldon's failed inferences are due to two reasons. The first one is that the manager's utterances are not explicit enough and he ignores the limited cognitive ability of a boy. The second one is that Sheldon finds out the maximally relevant information rather than the optimal one. The inconsistency between maximal relevance and optimal relevance brings audiences to burst into laughter.

## 5.3. Humor and Cognitive Context

Contextual effects are the result of interaction between new and old information as premises in a synthetic implication. The weaker contextualization between old information and new information in an individual's cognition generates humor.

Case 3: In Season 4, Sheldon goes to the University of Texas after finishing fifth grade at age 11. Dr. Linkletter, the colleague of Dr. Sturgis, is asked to take care of Sheldon in the college. It is Sheldon's first day of college and he goes to the office of Dr. Linkletter to express his refusal to be treated as a child:

Sheldon: I just wanted to let you know that I don't need you to babysit me. I'm perfectly self-reliant.

Dr. Linkletter: Excellent. I'm not very comfortable around children even with your level of maturity.

How old are you? Six? Seven?

Sheldon: Eleven.

Dr. Linkletter: I see. Then it's good I kept the receipt for this bottle of bubbles shaped like a bear.

Sheldon: I should get going. My philosophy class starts in a few minutes.

Dr. Linkletter: Ah, yes, the great thinkers. Socrates, Plato. Speaking of which, I got you some Play-Doh.

Sheldon's utterance that "I just wanted to let you know that I don't need you to babysit me. I'm perfectly self-reliant" is an ostension to express his refusal to be treated as a child anymore. This ostension as new information should have changed the cognitive environment of Dr. Linkletter and he should infer the communicative intention behind the ostension is that Sheldon wants to be treated as an independent college student rather than a child. However, Dr. Linkletter seemly fails to choose the most relevant assumption in his cognitive environment because he still asks whether Sheldon wants toys of the child, such as "the bottle of bubbles shaped like a bear" or "Paly-Doh". The old information existing in Dr. Linkletter's cognition is that child is a child. Such old information causes the assumption that Dr. Linkletter made lacks sufficient contextual effects and is even contrary to Sheldon's communicative information. Humor arises from a weaker connection between old information and new information in an individual's cognition.

#### 6. Conclusion

Relevance Theory is conducive to making a general illustration of how humor can be understood from a cognitive pragmatic perspective. Based on Relevance Theory, this study analyses humorous utterances in *Young Sheldon* (season 4). Findings show that: (1) Humor tends to be generated when there is an implicature caused by rhetoric in ostensive information; (2) The inconsistency between maximal relevance and optimal relevance generates a humorous effect; (3) Humor is likely to be created when a contextual effect is insufficient, especially between an adult and a child.

There is a limitation existing in the study. Due to the time limitation, only some typical scenes of *Young Sheldon* (season 4) are collected and analyzed in the study. In the future, the study of humorous utterances in *Young Sheldon* or other genres can be conducted in a mixed research method. Relevance Theory can be combined with other cognitive theories, such as mapping or blending, to deeply and thoroughly explore the detailed mental processing steps of humor generation among communicators, which will help us have a better understanding of humorous utterances.

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