



A Linguo-Pragmatic Study of Food Technology Terminology in English and Uzbek

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Abstract: A linguo-pragmatic study of food technology terms allows us to understand how certain terms are used in the contexts of food production, processing and storage, as well as how they affect the interactions between the participants in the process. After all, understanding the linguo-pragmatics of food technology terms helps to determine how the terms are used in context. It is important to understand the communicative purposes of the use of terms, that is, to determine what informational and functional tasks are performed by using food technology terms in different situations.

Keywords: linguo-pragmatic study, food technology, food production, processing, storage, terms, context, functional tasks, situations

1. Introduction

A subfield of linguistic studies known as pragmatics examines how language units are used and interact in certain communicative contexts [1]. The speech act's location, duration, objectives, and anticipated outcomes are also seen to be significant if there is a close relationship between the speaker and the listener. The linguo-pragmatics of food technology terms will show the impact of these terms on the mind of the addressee and how the communication process proceeds, and in our case, the interaction between consumers, producers and food industry professionals, and how they understand each other [2]. The field of linguistic pragmatics views language as a tool for human communication rather than as "individual." These days, pragmatics is regarded as an interdisciplinary field since it encompasses not only language fields but also logical, philosophical, sociological, psychological, ethnological, and even cybernetics fields [3].

The study of linguo-pragmatics in food technology terminology provides valuable insights into the intricate dynamics of communication within the domain. Understanding how these specialized terms are used and interpreted in various communicative contexts is essential for effective interaction among consumers, producers, and professionals in the food industry. Moreover, considering the cultural and contextual factors that influence the usage and interpretation of food technology terminology is crucial for facilitating clear and accurate communication across linguistic and cultural boundaries [4].

By delving into the linguo-pragmatic aspects of food technology terminology in English and Uzbek, this study aims to contribute to the broader understanding of specialized language use and communication strategies in professional domains. Through the analysis of linguistic structures, semantic features, and pragmatic functions of food technology terms, the study seeks to uncover patterns, trends, and challenges in

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terminology usage and comprehension.

Furthermore, the comparative analysis between English and Uzbek food technology terminology offers a unique opportunity to explore cross-linguistic variations and cultural influences on language use in the field. By examining translational equivalences and discrepancies in terminology, the study aims to shed light on the complexities of language and communication in multicultural and multilingual contexts. Ultimately, the findings of this research have the potential to inform language teaching, professional training, and intercultural communication practices in the food technology domain [5].

2. Method

This study employed a linguo-pragmatic approach to analyze food technology terminology in English and Uzbek. Authentic texts from academic literature, textbooks, and industry publications were collected for a comprehensive corpus-based analysis.

The linguistic analysis focused on identifying key terminological units, examining their morphological and syntactic structures, and analyzing their semantic features. Pragmatic considerations were integrated to explore how these terms are used in communicative contexts, including discourse strategies and sociolinguistic implications.

A comparative analysis identified similarities and differences in terminology usage between English and Uzbek, with attention to translational equivalences and cultural influences.

Through this approach, the study aimed to provide insights into the linguistic and communicative aspects of food technology terminology, facilitating cross-cultural communication and advancing understanding in the field.

3. Results and Discussion

3.1. Examples of food technology terms and their contextual meanings

Materials of our research are terms in food technology field which have been waiting for being applied a linguo-pragmatic approach. For example, the English term *pasteurization* related to food technology can be used to describe *the process of destroying harmful microorganisms in food by mild heat treatment in order to ensure the safety of consumption and extend the shelf life of food*. When the term *pasteurization* is applied to food, its pragmatic meaning means that this product can be stored for a longer period than usual, and therefore it is not dangerous to produce it in large quantities. We will consider this situation as an example of the pragmatics of a number of food technology terms below [6].

Antioxidant refers to a substance that slows the oxidation of fats in preserved foods. When used in context, the term *antioxidant* refers to a substance used in food technology to prevent oxidation and extend the shelf life of foods. The communicative purpose of this is to emphasize the unique properties of the additive, such as the ability to improve product safety and extend shelf life. In addition, this term, as a result of its perlocution, can affect the mind that this product is safe and of good quality.

The expression *antimicrobial agents* refers to *preservatives against microbes*. These substances are compounds used to preserve food by preventing the growth of microorganisms. The term *antimicrobial preservatives* is used in context to describe substances used to reduce or kill microbes in foods. The communicative purpose of the term is to remind about the safety of the product and ensure the understanding that the product is protected from the development of microorganisms. The term creates trust in the product's safety in the mind of the addressee.

Extraction refers to the action of extracting some components. *Extraction* in the context represents the process of extracting valuable components from raw materials, the communicative purpose of this term is determined by emphasizing the technological process implemented to ensure the high quality of the final product. It subconsciously

creates the impression that the product has been carefully processed. In the end, it is possible that the desire to buy the product will prevail.

Fermentation refers to *anaerobic metabolism*. *Fermentation* in context refers to the process of using enzymes to change the texture and flavor of a product. The communicative purpose resulting from the illocutionary force of this term is to emphasize the naturalness of product processing processes. This term can arouse in the mind of the addressee interest in the natural processing method and additional flavor characteristics of the product. Because now the demand for organic, that is, natural food products is increasing.

The phrase *natural dyes* refers to *colorants derived from plants, invertebrates, or minerals*. The term *natural dyes* refers to natural substances used in industrial situations to color food during processing. The communicative purpose of this term is to emphasize the naturalness and safety of the product, and it draws the addressee's attention to the natural ingredients and safety of the product.

Crystallization is the process of forming crystals. *Crystallization* is used in context to mean the process of formation of crystals in a product. It is correct to say that the communicative purpose of the term crystallization is to emphasize the unique structure and properties of the product. This, in turn, can arouse interest in the unique features of the product.

3.2. *Linguo-pragmatics approach to analyze Uzbek food technology terminology*

We can also analyze the cases of food technology terminology in Uzbek literature and approach them from the point of view of linguo-pragmatics.

“Hafa qilma oyim menday g`o`chchoqti
Chayib bergin saba bilan ko`nakti”.
("Don't be offended, my dear, you are a fool like me
Give it a rinse and get used to it.") [7]

The term *saba* in this passage from Alpomish's epic is a vessel used to put *kimiz* drink made from with fermentation technology in ancient times. The reader of the work knows that even in those times, people used to drink cold drink inside a vessel made of leather. They can understand that at that time Uzbeks have discovered that it is possible to keep drinks cold even in hot weather, and under the influence of this understanding, the views of those peoples about the civilization may change. This case is the perlocutionary act of the term *saba*.

3.3. *Fruit and vegetable technology terminology*

We have considered the terms of general food technology terminology and examples of their pragmatics. Also, in our research, we want to focus on the terminology of fruit and vegetable drying technology, which is one direction of food technology. The pragmatics of fruit and vegetable drying technology terminology involves understanding the communicative purpose, impact, and interpretation of industry terms in contexts related to the consumption, sale, and production of dried fruits and vegetables. While reading the context describing various types of fruit and vegetable drying technology, we tried to analyze a number of terms related to this field from the point of view of linguo-pragmatics [8].

At present, the AD (airflow drying) process is the main method used in vegetable dehydration. Owing to high drying temperature and long drying time, the AD product quality including color, texture, flavor, and nutrition could be altered significantly.

The terms *high drying temperature* and *long drying time* in this context are making a statement in the text about the temperature level and time required for this method of

drying vegetables. It is appropriate for us to approach the illocutionary force created from it with two different points of view, i.e., the producer entrepreneur or the buyer. If the addressee is a manufacturing entrepreneur, the pragmatic meaning of the terms *high drying temperature* and *long drying time* will convey to a person the information that more money will be spent on this technology because more electricity is spent. Under the influence of the perlocutionary force of this term, an entrepreneur may use this drying technology in his activities or, on the contrary, reject it as it requires a lot of money. If the addressee of the text is a buyer, the resulting intention from both of the above terms informs that the product has been sufficiently and qualitatively processed, and that the product prepared in this way can be stored for a long time. Under the influence of this message, the probability that the buyer will decide to buy air-dried vegetables is high. Therefore, terms related to the technology of drying fruits and vegetables can have two different pragmatics in the same context.

The box-type vegetable dryer is widely used in the industry. In this equipment, the vegetables are dried in the box via the hot air from the air inlet. In practice, the drying processes are organized by different stages under different temperatures. With the decrease in mass, the materials in different boxes can be put together. The box-type vegetable dryer has low equipment investment and ensures quality drying. It is more suitable for vegetables with low moisture content and leafy vegetables, such as peanuts, green beans, cabbage, etc.

The term *low equipment investment* in the context confirms that the amount of investment that goes into a box vegetable dryer is small. The communicative purpose of the term small equipment investment is to inform about the low cost of the product. The reason is that the amount of investment for the production process, as well as for the equipment, definitely affects the cost of the product. The term *low moisture content* refers to the moisture content of the vegetable in the text. The resulting intention is to convey that it is possible to increase productivity by drying the product in a much faster time.

MD (Microwave drying) has many advantages, such as strong penetrability, high drying efficiency, low nutrition loss, etc. However, because of the cavity's reflection and different penetration depth in vegetable materials, uneven drying and local burn are common problems in MD.

The term *uneven drying* in this context gives a pragmatic meaning that a number of problems arise as a result of this technology, that is, a certain part of the product is not dried enough, and another part is over-dried, and as a result, part of the product dies.

There are other examples of this kind of terminology, such as:

- 1) **Freeze drying.** *Pragmatic importance:* This term often refers to consumers that the original taste and nutrients of the product are preserved due to low temperature drying.
- 2) **Natural drying.** *Pragmatic significance:* The term is used to denote a natural and traditional method of drying. The term natural drying implies that the drying process takes place more slowly.
- 3) **Sun drying.** *Pragmatic importance:* creates the impression of traditional, manual drying, emphasizes the naturalness of the product.
- 4) **Convective drying.** *Pragmatic meaning:* a technical term used in industry and research to describe a type of drying process involving the movement of air, indicating that the drying process can be shortened by this method.
- 5) **Fragility index.** *Pragmatic meaning:* a technical term used to measure the crispness or fragility of dried fruit and vegetables, it evokes the impression of evaluating the texture of the product.
- 6) **Preservative-free drying.** *Pragmatic significance:* emphasizes the absence of artificial preservatives during the drying process, attracts health-conscious consumers by

referring to the product's health benefits.

- 7) **Blanching.** *Pragmatic significance:* This term can be interpreted as the pre-treatment process used in combination with drying methods to increase the elasticity and durability of vegetables.

3.4. Discussion

As we observed above, the terms related to the technology of drying fruits and vegetables in most cases have pragmatic meanings referring to the theme of product quality or product cost. An integral part of the fruit and vegetable drying technology is the stage of packaging the dried finished product. We considered that it is necessary to analyze the terms on the packaging of finished products. Understanding the pragmatic significance of the terms used on dried fruit packaging can predict how these terms affect consumers' emotions and behaviors [4,9,10].

As part of our research, we analyzed the pragmatics of the terms on the packaging of many dried fruits and vegetables. For example, the use of terms such as *naturally dried*, *preservative-free*, or *high quality* can shape consumer expectations of the product and influence purchasing decisions. For example, terms such as *100% natural*, *no added sugar* or *local product* are used to convey to the buyer the specific characteristics of the product on the packaging. Instead, it is important to understand their impact on consumer confidence and product choice [11,12,13].

Linguo-pragmatics helps to interpret the language used in the packaging of dried fruits and vegetables. For example, terms such as *hand-picked*, *sun-dried*, or *organic* provide insight into how consumers perceive a product's quality, taste, and environmental impact. This shows that the linguo-pragmatic study of the terms in the packaging of dried fruits and vegetables is of economic importance in the society [14,15,16].

In addition, the terms on the product packaging can be divided into pragmatic meanings within the thematic blocks of *healthy food* and *unhealthy food*. The terms *nutrient-dense*, *natural source of fiber*, *packed with antioxidants*, *air-dried*, and *sun-dried* pragmatically convey the meaning of healthy food. The terms *highly processed* and *sweetened* on the other hand warn of the harmful effects of the product and indicate that it is an unhealthy food. The term *glucose syrup* in dried dates sold under the name *Nour palm fruit* gives the impression that this product is not recommended for use by patients with diabetes. The term *fat/sodium/cholesterol free* on the packaging makes the illocutionary act that the product can be consumed by patients with cardiovascular diseases. In the same way, the term *calories* on the package of dried dates refers to how many minutes the consumer needs to exercise on the treadmill to break down the energy generated after eating the dates [17,18,19].

4. Conclusion

Of course, in order to understand these pragmatic meanings, it is permissible to admit that the addressee, the buyer in the situation, must have preliminary medical knowledge, that is, an implicit proposition. It is no exaggeration to say that understanding the pragmatics of the terms on the packaging of dried fruits and vegetables is of great importance in terms of health care in the society. From the above considerations, it is clear that understanding the linguo-pragmatics of the terminology of fruit and vegetable drying technology can provide valuable insights into the exchange of knowledge and experiences in the field, marketing strategies and consumer opinions. Having studied the scientific literature related to the field, we have witnessed that several meanings can be discovered through a multi-faceted approach to some terms of the field.

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