

Difficulties in Translating Medical Terms from English into Arabic

-A practical study on Breast Cancer Terms-

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Abstract:

This paper deals with the difficulties experienced by translators and the hurdles they face when translating medical texts. It starts by defining the "Term" and giving the difference between "Term" and "Terminology" as well as the way that scientific terms are coined. Moreover, it gives an overview of "Arabisation", its issues and reasons and proves how "Standardisation" is very important. Furthermore, the research demonstrates the special language characteristics and shows the dissimilarity between the "Glossary" and "Dictionary".

Thus, the study was carried out on "Medical Terms" in which it reveals how the term is composed (the root, the prefix, the suffix and the linking letters) and what does each part mean. Besides, it shows how to analyse the medical term and indicates the strategies used for translating medical terms. Therefore, the research ends with analysing the translation of some medical terms taken from a book written by **Professor Mike Dixon** entitled (*Understanding Breast Cancer*) and translated by **Hanadi Mazboudi**.

Keywords: *Medical terms, Arabisation, Standardisation, strategies, Source Language (SL), Target language (TL), Breast Cancer Terms, glossary, dictionary, Latin, Greek.*

ملخص:

تُظهِرُ هذه الورقة البحثية الصُّعوبات التي يواجهها المترجم أثناء ترجمته للنصوص الطِّبية، حيث تبدأ الدِّراسة بتعريف "المُصطلح" وإظهار الاختلاف بين "المصطلح" و"علم المصطلح" وكذا الطريقة التي يتم بها وضع المصطلح العلمي. كما تُعطي هذه الدِّراسة لَمحةً عن "التعريب" مشاكله ودواعيه وتُوضِّح أهمية "توحيد المصطلحات"، كما تطرقت إلى الاختلاف الموجود بين "المُعجم" و"القاموس". وجرت الدراسة على مصطلحات طِبيَّة حيث بيَّنت مُكوِّنات المصطلح العلمي من جذر ولاجئة وسابقة وحروف الربط وما معنى كل جزء. بالإضافة إلى ذلك، يتجلى من خلال هذه الدِّراسة كيفية تحليل المُصطلح الطِّبي والاستراتيجيات المستعملة عند ترجمته.

وتنتهي الدِّراسة بتحليل نماذج من ترجمة بعض المُصطلحات الطِّبية مأخوذة من كتاب "سرطان الثدي" الذي ألَّفه البروفيسور مايك ديكسون وترجمته هنادي مزبودي.

الكلمات المفتاحية: مصطلحات طِبيَّة، تعريب، توحيد المصطلحات، استراتيجيات، اللغة المصدر، اللغة الهدف، مصطلحات سرطان الثدي، مُعجم، قاموس، اللاتينية، الإغريقية.

Introduction:

The West has witnessed a developed and advanced science and technology. Therefore, all the modern inventions and innovations are in foreign languages. However, this has created a gap between the Arab and Western Worlds, which resulted in monopolising many scientific fields. In order to keep up with the pace of science in the Western World, the Arab World is in a dire need for translation and Arabisation of the modern scientific terms that are required to understand this development.

In this regard, many translators and students in translation face several difficulties in dealing with scientific terms due to the lack of standardisation of Arabic scientific terms and the multiplicity of Arabic terms that are equivalent to the same scientific term in the foreign language.

In fact, Medical Texts are amongst the most difficult scientific fields when translated into Arabic. Hence, different translations of the same terms are found in specialised glossaries and dictionaries, which leads to a state of confusion and create some ambiguity for the translator.

Therefore, the reasons behind this non-conformity in coining the same Arabic term for the same foreign term is the difference in the Source Language (SL). Thus, the terms are translated from either French or English, noting that there is the American and British English, which are quite dissimilar to each other. As for the Arabic Language, which is the Target Language (TL), the Middle East uses different Arabic Terms from those used in The Maghreb even though the meaning is the same.

In view of what translators face as hurdles when translating foreign medical terms into Arabic and the problem of coining foreign scientific terms from Greek and Latin, I thought of carrying out this research on the difficulties of translating medical terms from English into Arabic.

Therefore, what are the problems confronted by translators when translating medical terms in the Arab World? To what extent is the importance of standardisation and generalisation of Medical Terms when transferring them into Arabic? What are the techniques and strategies adopted by translators?

This is what I will try to highlight in this research paper by describing and analysing some examples taken from a medical book entitled "*Understanding Breast Cancer*" by Professor **Mike Dixon** and translated by **Hanadi Mazboudi**.

What is a term?

Many words stand for what is known “مصطلح” in Arabic, according to the different languages; it is “Term” in English, Dutch, Norwegian, Swedish and Welsh. “Terminus” or “Term” in German. They use “Terme” in French and “Termine” in Italian, “Termino” in Spanish, and “Termo” in Portuguese. In Russian, Bulgarian, Romanian, Slovene, Czechoslovak and Polish they use the word “Termin” and “Termi” in Finnish language. In fact, the word “Term” is common in European Languages; it transcended the national linguistic framework and is considered by some researchers as a good example of globalisation in European civilisation. (حجازي، 1995، ص 9)

The definition of the word “Term” in the Compact Oxford English Dictionary is as follows: “A word or phrase used in definite or precise sense in some particular subject, as a science or art; a technical expression (more fully term of art)”. (The Compact Oxford English Dictionary 2nd ed., 1998: 801)

Moreover, some terminologists notably (*Hulmet Felber*) see the term, as “A term is any conventional symbol representing a concept defined in a subject field.” (Felber, 1984: 26)

Even though some words are not necessarily homonyms with other words, the word is characterised by the meaning it gets when it is coined by specialists with regard to its relation with the field it belongs to. Therefore, when the meaning of a word is related to its field, it is called “Term”. (Evers, Mars 2010: 19)

In this regard, Mustafa Al-Shihabi said that the scientists have agreed on using a term to express a scientific meaning. However, terminology gives new meanings to words rather than their linguistic or original denotation. Therefore, terms are not used randomly and are set within a specific context and have a certain, similarity or connection between their linguistic and terminological denotation. (الشهابي، 1991، ص 6)

In the same context, the International Organisation for Standardisation (IOS) in its recommendation N° 1087 issued by the technical committee N° 37 has defined the “Term” as any symbol which have been agreed on to signify a specific meaning, it consists of a related system of sounds or their characters and it could be a word or phrase. (علم المصطلح لطلبة العلوم) (الصحيّة والطبيّة، 2005، ص 26)

However, the English terminologist Sager gave another definition saying,

"Terms are the linguistic designations assigned to concepts. Because terminology deals with specialized domains of knowledge, terms refer to the discrete conceptual entities, properties, activities or relations that constitute knowledge in a particular domain. Ideally, then, behind each term there should be a clearly defined concept which is systematically related to the other concepts that make up the knowledge structure of the domain. Moreover, the choice of the term should reflect this concept effectively and the form of the term should be generally acceptable within the language in question." (Bowker, 2009 : 286)

We conclude from the definitions mentioned above that, the “Term” is a word with many aspects, which expresses different meanings related to fundamental concepts of a specific domain. However, each word has a strong relationship with the language

of specialisation. Therefore, the word is the basis for illustrating the knowledge and the scientific field under study.

What is terminology?

European famous scientists have perceived the importance of unifying terms in their field of speciality in order to avoid terms chaos and reduce the multiplicity of terms expressing the same concept. Therefore, they did some research and studies, which resulted in what they have called “*Terminology*”.

In the view of Ali Al-Kasimi “*Terminology*” is the science that looks into the relation between scientific concepts and the linguistic terms, which express these concepts. (أورمضان، ص 13، 2011-2012)

Moreover, Wüster, the founder of the general theory of terminology, defined “*Terminology*” as the science that controls the lexis of the specialised language used in a specific science. (أورمضان، ص 14، 2011-2012)

Strategies of coining a scientific term in Arabic:

Many linguists, researchers and translators have faced the problem of unfeasibility of finding equivalents to scientific terms in Arabic. Thus, they have devised the methods and strategies which a translator need to use in order to arabise (translate into Arabic) the scientific term in a correct and efficient way, taking in consideration the Arabic language grammar rules. The methods are as follows:

- 1- Translation (Direct or semantic translation).
- 2- Derivation (with all its different types).
- 3- Metaphor
- 4- Blend and compound (with all their variant kinds)
- 5- Loan (Borrowing)

History of Arabisation?

Arabs have known Arabisation since the pre-islamic era when they borrowed some words from Latin, Greek and Persian to use them in the Arabic language (اليافي، 1991، ص 17-18). In fact, Arabisation was a notable issue in the linguistic environment due to the controversy it created (مزيان، 1993، ص 55-56).

However, Mohamed Daoud gave another definition in which he has said, “Arabization is the process of promoting of Modern Standard Arabic (MSA) to the level of a fully functional language in educational, administrative, and mass-media domains, to replace the language of the former European colonial powers. Historically, Arabization was viewed throughout the Arab World as a fundamental component of the struggle for independence.”(Daoud, 1991: 7).

Moreover, Arabisation is considered as a requirement for modern scientific and technical developments, it is a means of cognitive process through which Arabic language could be revitalised and generalised in many fields. Indeed, Arabisation is necessary to enrich the use of Arabic language (بنعبد الله، 1975، ص 5-6).

Arabisation issues and reasons:

The issues faced by Linguists when translating some terms into Arabic lie in the disagreement of specialists about the Arabised terms as well as the multiplicity of Arabic terms that are equivalent to the same scientific term in the foreign language. Hence, these issues are:

- 1- Lack of scientific accuracy. (كرزابي، 2014-2015، ص 15)
- 2- The inability of generalising Arabic terms. (بديع يعقوب، 1982، ص 220)
- 3- Risks of Arabic terms multiplicity. (بن عليان القرشي، 1993، ص 147)

According to Mohamed Al-saed Ali Belassi the reasons for Arabisation are (علي بلاسي، 1989، ص 123-124):

- 1- Necessity, because Arabs had contacts with other peoples.
- 2- Easiness of pronouncing foreign languages terms in comparison to Arabic terms.
- 3- The admiration of certain nations by each other, which resulted in borrowing some words from their languages.
- 4- The desire to feel the pride and showmanship.

Hence, the relation between the Term, Translation and Arabisation is very strong and can be described as interdependent and requiring. Thus, if there was no term, there would not be a translation and if there was an impracticality in translation we would not go for Arabisation. Since the term is considered as a pillar of both translation and Arabisation, it is also the basis of the scientific and technical text.

Special Purpose Language (SPL)/ Language for Specific Purposes (LSP)/ Specialised Language (SL)/ Specific Language:

The Specialised Language (SL) is the language used in the scientific discourse and it is related to the field in which it is used. However, it is known by specialists. In fact, scientific language differs from the specialised language and it is not easy to distinct between the two, because scientific language uses scientific terms that are not necessary specialised. In this regard, Dr. **Salah Belaid** said in his book entitled "*Scientific Arabic Language*". Scientific language is characterised by certain specifications. It is separate from Literature language due to its logical, accurate and conceptual features, which do not exist in the language of literature. In addition to that, the scientific language does only use the simplest and most functional syntax in comparison to the other language. (بلعيد، 2003، ص 83)

Characteristics of Special Language (SL):

Special Language is accurate and unambiguous which distinct it from general and literary languages. However, technical and scientific terms have common features with specialised language. As self-evident, terms are the basics of the different languages of specialisation. Therefore, when general terms are used in specialised languages they gain a specific, but not general connotation (حجازي، 1995، ص 9). Moreover, some of the specifications of specialised language are accuracy, objectivity, conciseness, simplicity and clarity. (أورمضان، 2011-2012، ص 62)

The position of the term within the specialised language:

There is quite a strong link between the term and the other elements of which the sentence in the specialised language is formed. The term plays an essential role in the linguistic system.

In fact, the term reflects the lexical, semantic and contextual level i.e. the way the term is used in the text. Thus, there are three types of contexts (علم المصطلح لطلبة العلوم الصحيّة والطبيّة، 2005، ص 64):

- 1- Descriptive context.
- 2- Marginal context.
- 3- Meta-descriptive context.

The difference between the glossary and dictionary:

The difference between the glossary and dictionary is not that obvious for general people. In fact, some of them consider a *glossary* as a *dictionary*, while others understand the similarity between both of them. However, the difference between the two is very explicit for linguists, terminologists and translators.

What is a glossary?

The word *Glossary* is defined differently, it is either “an alphabetical list, with meanings, of words or phrases in a text that are difficult to understand”, according to the **Cambridge Advanced Learner’s Dictionary** (Cambridge 2nd ed., 2008). Or a noun given to certain dictionaries that deals with a specific field or a particular bilingual dictionary, as defined in the French Dictionary **Larousse** (Larousse encyclopédie).

Moreover, Ahmed Azouz gave another definition for *Glossary* and mentioned that it is a group of lexical words used by people of the same language. Thus, these terms are utilised by individuals in particular situations, it also shows how these terms are spelled and pronounced. Besides, a *Glossary* gives the meaning, usage, synonyms and word building (derivations) of the words, or one of these. (عزوز، 2009، ص 1043)

On the other hand, Abdelkader Al-jalil sees that a *Glossary* is a reference for three types (بوليفة، 2007-2008، ص 33):

- 1- Language units: they are either one-word or compound words.
- 2- Classification system : Words are ordered according to the alphabet or phonetics, in either sections or chapters
- 3- Semantic explanation: it lies in the author’s scientific competence, the method used in bringing benefits and the desire to convey the lexical meaning.

What is a dictionary ?

In *lisan Alarab* (Arabic dictionary), the word *Kamus* (قاموس) means “the sea” or “the great sea”(87 ص 2014-2015، كرزايي)، which really illustrates the concept of the word dictionary. However, it is also defined as an alphabetical order of words and their meanings. Furthermore, the encyclopedic dictionary gives scientific and historical interpretation of the word, which signifies persons, objects and places’ names. Thus, the lexicon provides its users with information about the type of the word, its synthetic structure (grammatical gender), its spelling and pronunciation, its meaning, usage and linguistic levels.(أورمضان، 2011-2012، ص 33)

In this context the Cambridge Advanced Learner’s Dictionary defined it as follows:

“A *Dictionary* is a book that contains a list of words in alphabetical order with their meanings explained or written in another language.” (Cambridge 2nd ed., 2008).

In **Larousse** the word “*Dictionary*” is defined as a didactic book that consists of a group of entries, each entry represents a word. The words are separate from each other and are often in an alphabetical set order. (Larousse, encyclopédie)

Procedures of making a glossary:

The process of making a glossary is called “*Lexicography*” and is based on “*Lexicology*”, it includes sorts of glossaries, their content and how they are made (بوليفة، 2007-2008). Lexicography follows five main steps: ص 33 (2008).

- 1- Collecting information and facts.
- 2- Choosing entries.
- 3- Ordering entries accordingly.
- 4- Editing sections.
- 5- Publishing the final copy. (حجازي، 1977، ص 86)

An overview of Medical Translation history:

The Arabic Islamic translation had been developed in the middle ages, which had contributed greatly to the advance of science in Europe in the Renaissance era. Thus, medicine was the ancient and most important science at that time. Therefore, After the Islamic Conquests, the expansion of the Islamic State and the openness of Arabs to other peoples, the thought of translating sciences from other languages such as Persian, Latin and Greek into Arabic had started. However, the movement of translation was limited in the Umayyad era and promptly developed and flourished in the Abbasid era. Hence, the history of medical translation is divided into three main periods, which are the era of translation, the era of Arab contribution to medicine and the era of regression in which medicine and other sciences were transferred to Europe. (Yaseen, 2013: 29-33).

As medicine is very important it is considered as a part and parcel of the human everyday life and it is impossible to be neglected. However, the language of medicine is not easy and require clarity (كرزايي، 2015-2014، ص 59). In fact, it is prominent nowadays that medicine is monopolised by Europe and had not come back to Arabs since its transfer.

Hence, it has become a necessity to translate the latest and recent research done by doctors and specialists into Arabic in order to keep abreast of the scientific development and to do this; there is a need for specialised translators to achieve an exact and correct translation.

However, translators should start by studying medical terms from Greek medicine because most terms’ roots are of Greek origin (بوليفة، 2008-2007، ص 24). In fact, the lack of understanding the medical term and the difficulty of dealing with it are among the greatest hurdles faced by translators when they perform medical translation. Thus, it is very important to study these terms in their original language before starting to translate.

What is a medical term?

Medical terms are words used by healthcare practitioners such as doctors and nurses. They are mainly based on Latin and Greek origins, they are also constant and common worldwide (أحمد الهادي، 2011، ص 5). Moreover, the medical term belongs to either a main field

or subfield relating to health. Furthermore, it is characterised by a complex and difficult pronunciation. However, specialists and non-specialists do not use the same terms in the specialised medical discourse due to the complexity it creates in the text. Therefore, they use specific terms to designate some complicated phenomena about diseases while normal persons who do not know the medical field use words from general language to talk about these cases (Chebouti, 2014: 28).

On one hand, **Davies** has defined the medical term as a study of words that are used in order to state facts and share ideas in the medical domain. Thus, this study is linked to the use and current meaning of these terms, which includes words, compound nouns, abbreviations and acronyms that have a relation with medicine (Argeg, 2015: 60). Medical terms are classified in terms of their origin into three categories:

- 1- Terms coined from another familiar English word.
- 2- Terms borrowed from another language.
- 3- Terms that are neologized (Argeg, 2015: 60).

On the other hand, **Robert Taylor** thinks that the specialisation of medical language lies in the fact that all its words are as correct and true as the current knowledge and what it allows. In his view, to write a correct medical language it is to avoid using general words and take in consideration accuracy as well as carefulness in utilising abbreviations and acronyms (Pedersen & Halliday, 2009: 24).

Language register in medical European languages is considered as an indefinite and tangled number of synonyms i.e. different words are used to define the same concept and this usually happens either in dealing with some medical fields such as anatomy, clinical medicine and pathology or in mentioning the situation and use of the scientific term or phrase (Newmark, 1979: 1405).

In fact, the field of medical science is very rich with terms and when translators learn them, they feel as if they have learnt all the words of that language. However, the study of these terms is of paramount importance and it includes:

- Helping with the translation of medical terms and abbreviations that are used in medical discourse.
- Helping with communicating fluently with health sector employees.
- Assisting in gaining fundamental knowledge of medical terms, which makes the patient able to understand the doctor's demands in a better way and understand medical reports correctly. Therefore, it would permit patients to ensure their medical file and well-understand their treatment's steps.

How to form a medical term?

The medical term is composed of four main parts, *the Root, The Prefix, the Suffix* and *the combining/linking vowels* (6 ص أحمد عبد الهادي، 2011). However, the origin of several of these parts go back to Latin and Greek. Thus, each medical term might contain either one part or two and could reach to four at the same time.

- 1- **The Root:** it is also know as the *word root* or the *stem* of the word, it is the basic of the medical term and it includes the main meaning, most terms are derived from ancient Greek, Latin and Roman. However, the other parts of the term are either of Arabic,

Anglo-Saxon or German origin (Argeg, 2015: 64). The root is a part of a word to which affixes¹ can be added either before or after in order to give another word with a specific and different meaning (6 ص، 2011، أحمد عبد الهادي). It is considered as:

- The core element of the medical term.
- It demonstrates either a physiological or an anatomical part of the body.
- It can be used multiple times in the medical term.
- It is always joined to a vowel (o, a, e, u, i) in order to make a combining form.
- It defines the general meaning of the medical term when adding a prefix or suffix (Argeg, 2015: 66).

The Prefix: it is a part of a word and it comes at the beginning, each prefix has a specific meaning. It is characterised as follows:

- It always comes at the beginning.
- It is short in form.
- It signifies a particular meaning.
- It does contain a linking letter.
- It changes the general meaning of the medical term when added to the word root.
- It usually denotes a figure, time, place, colour or size...etc. of a word.
- It is found in general English words as well as medical and scientific terms.

In fact, it is very useful to well-understand the *prefixes* used in medical terms because they help very much in tackling medical translation problems.

The Suffix: it is used at the end of the word to give it a new meaning. Each suffix has a certain meaning (Argeg, 2015: 67). It also has specifications:

- It is always used after the word root.
- It is short when comparing to the whole term.
- It does not change when the term changes.
- It is linked to the word root with a vowel (7 ص، 2011، أحمد عبد الهادي).

The medical term has to contain at least one word root. However, it not necessary to have an affix. Some medical terms contain a word root with both a prefix and suffix at the same time. Therefore, the role of affixes is either to change or modify the meaning of the word root (Argeg, 2015: 67).

Combining/Linking (letters) vowels (o, a, e, i, u):

They are used to join the word root with the prefix and it sometimes links two word roots together in order to facilitate the pronunciation of the term (Argeg, 2015: 67).

Here are some Linking vowels specifications:

- It is used to coin a combining form when adding it to the word root.
- It is omitted when the suffix starts with a vowel (o, a, e, i, u).

¹ - **Affix:** a letter or group of letters which are added to the beginning or the end of a word to make a new word.

- It is constant when two word roots are used even if the second root begin with a consonant (this rule is applied in the case of joining the affix with the root and not two word roots).

When translators understand the meaning of affixes and roots, which the medical term consists of, they would be able to tackle the problem of understanding the meaning of terms in the Source Language (SL). Thus, the translation process will be easy.

Analysing the medical term:

It is very important to analyse and divide the medical term in order to know its components and understand it before beginning the translation (7 ص 2011، عبد الهادي، أحمد).

Strategies for medical terms translation:

In fact, English and French languages dominate the medical filed in Arab countries, and are also used in teaching medicine at their universities. Therefore, medical diagnosis and reports, as well as medical consultations and prescriptions are often in English or French (أحمد (عبد الهادي، 2011، ص 7).

However, medical English is distinct from medical Arabic. Thus, the translator should know the difference between the two languages to achieve a correct and successful translation. Therefore, the characteristics of medical English are as follows:

- 1- **Lexical feature:** medical English uses terms that are purely medical and can be divided into:
 - a- **Greco-Latin Terms:** English language is very rich with complex words as to their form. They are words, which consist of Greco-Latin roots (Répás, 2013: 5) with affixes (Yaseen, 2013: 22). Hence, Nicolah Dorbechan has categorised prefixes according to their signification into nine categories:
 - Prefixes of negation
 - Prefixes of emphasising the degree.
 - Prefixes of reversion
 - Prefixes of additive or replicative
 - Prefixes of location or direction
 - Prefixes of numbers
 - Prefixes of attitude
 - Prefixes of repetition
 - Pejorative prefixes

On the other hand, suffixes are categorised as follows:

- Arabic suffix with an Arabic term.
- Arabised suffix with an arabised term.
- Arabising an English term with a suffix (ص ص 219-220، باشا، 2016).

- b- **Collocations:** they are two words that come together one after the other in a specific order (grammatically linked) used to denote one meaning (Argeg, 2015: 84) such as the terms (*Benign* and *Malignant*) which go with the term (Tumour). In Arabic we say: ورم حميد، ورم خبيث

- c- **Abbreviations and acronyms:** abbreviation is the short form of the word or phrase, its spelling changes according to the language and its grammar. However, acronyms are words formed from the first letters of a group of words (Argeg, 2015: 83). English language uses many abbreviations and acronyms (Yaseen, 2013: 25). Examples of abbreviation **MRI** (*Magnetic Resonance Imaging*) which is in Arabic (التصوير بالرنين المغناطيسي), and acronym **AIDS** (*Acquired Immune Deficiency Syndrome*) in Arabic (أعراض نقص المناعة المكتسبة).
 - d- **Eponyms:** every word given to the person, which is either a law or a rule or a theory or even a disease. Such as Alzheimer's disease according to the name of the person who discovers the illness (disease).
 - e- **Neologism:** they are new coined lexical units or they might have been existed before and have a new meaning. In medical English, neology is common in the field of naming medicines (medication). Such as *Penicillin* and *Amoxicillin* (Yaseen 2013: 25).
 - f- **Blend:** they are terms formed by linking parts of different words together to coin a new word (Yaseen, 2013: 26). Like the term (*Caplet*) which is a blend of the words (*Capsule*) and (*Tablet*).
 - g- **Language for general purpose (LGP) terms Vs. Language for Specific Purpose (LSP) terms:** terminologists have distinguished two types of terms, they are words which belong to the general language, they are easy to understand and are daily used such as organ names (*Kidney, Heart*) and other words that belong to the Specific language and are difficult to understand. This require special medical knowledge (Yaseen, 2013: 26) (*Renal, Failure*).
- 2- **Grammatical feature:** it is at sentence level since medical English is complex (Yaseen, 2013: 26).

Problems of translating medical terms:

The translator faces many difficulties when dealing with medical texts either at lexical or grammatical level. Here are some hurdles confronted by translators, which sometimes prevent them from doing a correct translation.

- 1- **Equivalence problem:** most of the time the translator uses bilingual medical dictionaries, which are not often updated in the target language (TL). It includes grammatical and cultural equivalence (Argeg, 2015: 86).
- 2- **Non-equivalence problem:** it is common knowledge that languages are different from each other, which makes it difficult to find adequate equivalents to some terms and concepts in the (TL). Thus, the translator sometimes encounters some problems in finding lexical equivalents to terms, objects and events in Arabic (Argeg, 2015: 90).
- 3- **Problem of neologism:** the translator in this situation ends up in not being able to find an equivalent term to the neologised word in the source language (SL) and it does not exist in the dictionary (Argeg, 2015: 97).
- 4- **Problem of polysemy:** In fact, the several meaning that some words have in the Source Language (SL), which are equivalent to the same word in the Target language (TL), would be an impediment against the translator's job. In this situation, choosing the inadequate equivalent in the TL can create a serious problem in sensitive fields.
- 5- **The problem of inconsistency in medical translation into Arabic:** It means there are several Arabic terms for one English term due to the individual work of different institutions and academies. Moreover, medical dictionaries (Arabic-English) were made

in different Arab countries and each editor follows his/her academy. That is why they contain different meanings for the same English medical term. However, this problem can be avoided by standardisation of medical translation as it deals with the health and life of human beings. Therefore, the translator of medical terms has to work hard and brilliantly in understanding the source text then find an adequate lexical equivalence in the TL because medical texts should be accurate as much as possible (Argeg, 2015: 90).

Examples about analysing some medical words from the corpus (Understanding Breast Cancer by Mike Dixon):

Example 1: Adenocarcinoma

1- Adenocarcinoma (Dixon, 2010: 209): “a malignant epithelial tumor arising from glandular structures, which are constituent parts of most organs of the body. The term is also applied to tumors showing a glandular growth pattern. These tumors may be subclassified according to the substances that they produce.”(Oxford Concise Medical Dictionary (OCMD) 6th ed., 2002)

Analysis of the term: the term “*Adenocarcinoma*” is composed of the prefix (*Adeno*) (Harper, online dictionary, 2001-2022), which is of Greek origin and it means “Gland” and (*Carcinoma*) (Harper, 2001-2022) which is a Greco-Latin word spelled (*Karcinoma*) in Greek and it means (*Malignant Tumour*). This last consists of two parts (*Carcin*) (Harper, 2001-2022) and it means (*Cancer*) and the suffix (*Oma*) (Harper, 2001-2022) in Greek equivalent to the word (*Men*) (Harper, 2001-2022) in Latin which signifies the term (*Tumour*) (Harper, 2001-2022).

Term translation into Arabic:

Many translation have been suggested to this term such as (الورم الغدي السرطاني) and (سرطانة غدية) as cited in the Unified Medical Dictionary “UMD” (UMD, Online version).

Analysis of the Arabic translation:

As we notice above, the English term is one word and the equivalents in Arabic are long and compound words, they seem as literal translation to each part of the English term. Thus, the word (ورم) can be omitted in the formation of the Arabic sentence without losing the meaning so that it will be simple and could be used easily if translated (سرطانة غدية).

Example 2: Amenorrhoea

2- Amenorrhoea (Dixon, 2010: 209): “the absence or stopping of the menstrual periods. It is normal for the periods to be absent before puberty, during pregnancy and milk secretion, and after the end of the reproductive period.” (OCMD, 2002).

Analysis of the term: the term “*Amenorrhoea*” consists of the prefix (*a*) (Harper, 2001-2022) of Greek origin that means (no), or (without) (Harper, 2001-2022) and the part (*Men*) (Harper, 2001-2022) which signifies (Month) and the suffix (*rrhea*) (Harper, 2001-2022) which means (flow) or (discharge) from the Greek (*Rohia*) (Harper, 2001-2022).

Translation of the term in Arabic:

Several Arabic translation were suggested for this term among which we mention (ديكسون، تر. مزبودي، 2013، ص 190) (انقطاع الطمث) or (البعليكي 1970، ص 43) (انحباس الطمث). However, the Unified Medical Dictionary suggested (انقطاع الحيض) (UMD, Online Version).

Analysis of the Arabic translation: As we observe, the translation of the English term in Arabic is composed of two words, while the English term is one word. Thus, this a direct translation and it conveys the exact meaning of the English term though more than one word are used as an equivalent.

Example 3: Axilla

3- Axilla (Dixon, 2010: 210): “(pl. axillae) the armpit” (OCMD, 2002) .

Analysis of the English term: this term is derived from Latin (*Axillaris*) (Harper, 2001-2022) which means the lower part of the body or the armpit.

Translation of the term in Arabic: the suggested Arabic translations are (الإبط) (الجمعية السعودية) (ديكسون، تر. مزبودي، 2013، ص 191) (تحت الإبط) as in the UMD and (الخيرية لمكافحة السرطان، 2013، ص 7).

Analysis of the Arabic translation: as we can see the term “*Axillaris*” is the scientific word for “Armpit”, the Arabic equivalent is (إبط) and the suggested translation is (تحت الإبط) which a literal translation of the word “Armpit”. However, the term (إبط) is common in Arabic texts.

Example 4 : Bone Scan

4- Bone Scan (Dixon, 2010: 211): “test to check for cancer in the bones.”

Analysis of the English term: the term is composed of two words (*Bone*)¹ and (*Scan*)².

Arabic translation of the term:

These are the suggested translations of the English term (تفريسة العظام) in the UMD, (فحص) (العظام) and (مسح العظام) (ديكسون، تر. مزبودي، 2013، ص 191) (مسح العظام) in El-Mawrid Dictionary and Oxford Dictionary.

Analysis of the Arabic translation: we notice that the term “Bone is (عظام) in Arabic. However, the term “Scan” has three equivalents, تفريسة, فحص and مسح. The common and pervasive translation of the English term is (مسح العظام).

Example 5: BRAC 1 and BRAC 2 gene

5- BRAC1 and BRCA2 gene (Dixon, 2010: 211): “genes associated with susceptibility to breast and ovarian cancer. Women with mutations in either of these genes have a 56-85% risk of developing breast cancer at a relatively young age.” (OCMD, 2002)

¹ - **Bone:** the hard part inside a human or animal body that makes up its frame.

² - **Scan :** to examine carefully.

Analysis of the Arabic translation:

As we can see, the English term is one word. However, the Arabic equivalents are words of two or three parts. Thus, (Cellula) was sometimes translated (هَلَل)¹ and other times (النسيج الضام)². In fact, the meaning of the English term is absent in both translations. Hence, the term (هَلَل) is equivalent to (Cellula) but only in its shape and divergence and does not signify the right meaning of the English term. Moreover, the Arabic term used is not common. Furthermore, the term (النسيج الضام) is much specialised and not familiar as well as not frequently used. Therefore, the Arabic term (الالتهاب الخلوي) is the best translation for (Cellulis) though it is a word-to-word translation.

Example 08: Chemotherapy

8- Chemotherapy (Dixon, 2010: 211): “The prevention or treatment of disease by the use of chemical substances. The term is increasingly restricted to the treatment of cancer with antimetabolites and similar drugs (see cytotoxic drug), in contrast to radiotherapy, but is also still sometimes used for antibiotic and other treatment of infectious diseases.” (OCMD, 2002)

Analysis of the English term: the term (Chemotherapy) composed of (chemo) (Harper, 2001-2022), which means the reaction of chemical substances and the word (therapy) (Harper, 2001-2022) and it signifies treatment.

Arabic translation of the English term:

These are the translation suggested for the term (العلاج الكيميائي) (ديكسون، تر. مزبودي، (العلاج الكيميائي) (UMD, Online Version) and (المعالجة بالمواد الكيميائية) (البعليكي، (المعالجة كيميائية) (2013، ص 192 (1970، ص 171).

Analysis of the Arabic translation: as we observe, the English term is one word. However, the Arabic term is compound. After doing a documentary research, we have found that the term (العلاج الكيميائي) is commonly used in Arabic texts and scientific articles.

Example 09: Computed Tomography

9- Computed Tomography (CT) (Dixon, 2010: 65): “a form of X-ray examination in which the X-ray source and detector (CT scanner) rotate around the object to be scanned and the information obtained can be used to produce cross-sectional images. A higher radiation dose is received by the patient than with some conventional X-ray techniques, but the diagnostic information obtained is far greater and should outweigh the increased risk. CT scanning can be used for all parts of the body, but is particularly useful in the head, chest, and abdomen. The data obtained can be used to construct three-dimensional images of structures of interest.” (OCMD, 2002).

Analysis of the English term: it is composed of the word (computed) of Latin origin (*computare*) (Harper, 2001-2022) it means the count and computation, and the word (tomography) which itself consists of two parts (*Tome*) of Greek origin (*Tomos*) (Harper, 2001-2022) and it denotes a part or section. As well as, the suffix (*graphy*) which is in Greek (*graphia*) (Harper, 2001-2022) and it signifies the act of writing or imaging by any special means.

¹ - It means “Cobweb”.

² - It means “Connective tissue”.

Arabic translation of the English term:

Only one translation was suggested for this term and is (التصوير المقطعي المحوسب) (UMD, Online Version).

Analysis of the Arabic translation: We notice that the English term is composed of two words and the Arabic equivalent has three words. So to denote the word (computed) the Arabic word (محوسب) was used and was derived from the word (حاسوب), while the word (tomography) was translated with two indirect compounds.

Example 10: Ductal carcinoma in situ (DCIS)

10- Ductal carcinoma in situ (DCIS) (Dixon, 2010: 213): “the earliest stage of breast cancer, detectable by mammography, which is confined to the lactiferous (milk) ducts of the breast.” (OCMD, 2002)

Analysis of the English term: it is composed of compound words and are (Ductral) which consists of (*Duct*) (Harper, 2001-2022) of Latin origin and it means tube, pipe or duct and the suffix (*Al*) (Harper, 2001-2022) which signifies related to something and the word (*carcinoma*) which we mentioned before in **Example 02**. As well as, the word (*in situ*) (Harper, 2001-2022) of Latin origin and is derived from (*situs*) (Harper, 2001-2022) which means place, location and position.

Arabic translation of the English term:

Several translations of this term were suggested and are (سرطان بالعدد النَّدِّيَّة) (الجمعية ديكسون، ثر. مزبودي، 2013،) (السرطانة الأبدية في القنوات) (السعودية الخيرية لمكافحة السرطان، 2013، ص 48) from the *UMD*. (ص 194)

Analysis of the Arabic translation: as we notice, every part of the English term was translated separately. However, the word (*in situ*) was translated (—) which means to be stable in a place. Hence, the common word is (لابدية) which much signifies the exact meaning of the English term and explain that this type of cancer is centralised, stable and does not move. Moreover, the use of the word (قناة) illustrates the position of the cancer.

Conclusion:

I tried through the practical study carried out on some English terms to clarify the process of using the Arabic term in medical field. Therefore, I have started from the parts that the English term consists of. Moreover, dealt with the difficulties, which the translator into Arabic encounters in order to find an equivalent in Arabic.

Thus, I explained the different strategies and techniques used in order to overcome these difficulties. Here are some of the results I have achieved through this research:

- 1- The necessity for translators into Arabic to know most English terms in a specific medical field as the first step before starting to translate.
- 2- The necessity for translators into Arabic to analyse the English medical term.
- 3- The necessity for translators into Arabic to take in consideration the rules of English medical language.
- 4- The necessity for translators into Arabic to differentiate between the General and Specialised English (GL vs. SL).
- 5- The necessity for translators into Arabic to consider the word order of the English medical term.
- 6- The necessity for translators into Arabic to be aware of medical acronyms and abbreviations in order to be able to translate into Arabic.
- 7- The necessity for translators into Arabic to use the possible techniques and strategies in translating the English medical term and avoid "*Borrowing*" only in the case of ascertaining that there is no Arabic equivalent.
- 8- The necessity for translators into Arabic to avoid explanatory and interpretative translation as much as possible, and be very concise and accurate in the translation.

These were some of the results, I obtained through this study, and I hope I have managed to give solutions to some problems faced by translators into Arabic in their translation of medical terms. I also hope that this research would open up new prospects for researchers, translators and students in translation studies in the field of medical translations.

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