

26	81%	78.64%
27	75%	72.82%
28	69%	66.99%

При выборе алгоритма определения QRS-комплекса нужно учитывать его вычислительную сложность, реализационную сложность, насколько точно алгоритм может распознавать QRS-комплекс при наличии шумов.

В системе электрокардиографа “Көмекші” мы хотим разработать приложение, которое может рисовать ЭКГ по полученным значениям от платформы HeartBIT. Мы хотим отмечать распознанный алгоритмом QRS- комплекс красным цветом, чтоб пользователь приложения мог проверить точность распознавания алгоритма. В системе электрокардиографа “Көмекші” планируется определить следующие: частоту сердечных сокращений, наличие аритмии сердца оценивая R-R интервалы.

1. **Зудбинов, Ю.И.** Азбука ЭКГ. — третье издание. Стилистика текста [Текст]: учеб. пособие/Ю.И.Зудбинов. — Ростов н/Д. 2003. — 160с. – ISBN 5-222-02964-6.

2. **А.В. Рослякова, П.Г. Чупраков.** Сравнительный анализ алгоритмов обнаружения R-зубца электрокардиосигнала. // Вятский медицинский вестник. — 2012. — №2. — С. 29-35.

3. **JCTB Moraes, MM Freitas, FN Vilani, EV Costa.** A QRS Complex Detection Algorithm using Electrocardiogram Leads.// Computers in cardiology. — 2002;29. — С.205-208.

4. **А.В. Крамаренко, Ю.А. Крамаренко.** Сверточно- корреляционный алгоритм выделения QRS-комплекса: публикация. [Электрон. ресурс]. – Режим доступа: <http://treDEX-company.com/ru/svertochno-korrelyatsionnyj-algoritm-vydeleniya-qrs-kompleksa>

5. **Джон Р.Хэмптон, перевод с английского Ф.И. Плешкова.** Основы ЭКГ. Стилистика текста [Текст]: медицинская литература. — М. 2006. — 224с. – ISBN 5-89677-052-9.

PECULIARITIES OF OIL AND GAS TERMINOLOGY TRANSLATION

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Abstract

This research paper mostly describes the peculiarities of technical translation in Oil and Gas industry, especially in drilling sphere. This paper is written in the limits of theory and practice of technical translation. Many things have been done in complex, especially: highlighting the theme of oil and gas in modern world; analyses of difficulties, a defining the most appropriate translation methods. All this things are very important for the technical literature. The usage of the translation methods shown in the research paper thoroughly reveals the peculiarities of terminology in oil sphere. The main aim of this work is to show the main distinctive peculiarities in terminology translation.

Аңдатпа

Бұл мақала техникалық аударма ісінің теориясына және тәжірбиесіне сүйене отырып, Мұнай және Газ өнеркәсібі, соның ішінде бұрғылау саласындағы ерекшеліктерді баяндайды. Бұл мақаланың ерекшелігі: қазіргі замандағы мұнай және газ өнеркәсібінің ықпалын, мұнай және газ саласындағы терминдерді аударған кездегі аудармышылар соқтығысатын қиындықтарды, ең көп қолданылатын аударма тәсілдерін айқындайды. Және бұл мақаланың негізгі мақсаты мұнай және газ саласындағы терминдердің аудару айырмашылықтарына және ерекшеліктеріне талдау жасау.

Introduction

The aim of the research: to make analysis of translation peculiarities of terminology in oil-and-gas sphere.

Subject: different translation methods and translation correspondences of oil-and-gas terminology.

Object: Technical terminology in oil-and-gas industry.

Research objectives:

- to highlight the theme of oil and gas in modern world;
- to characterize the scientific and technical translation;
- to distinguish linguistic difficulties in the translation of terminology;
- to define the most appropriate translation methods and translation correspondences of oil-and-gas terminology.

Sources for the research: Scientific articles; Informative materials (lectures); Dictionaries; Theoretical significance: contribution into the field of practical translation.

Practical value of the research: the results can be used in practical translation and in teaching practical translation.

Petroleum is one of the most valuable natural resources in the world. Some people call petroleum as “black gold”, but it may be described as the lifeblood of industrialized countries. Fuels made from petroleum provide power for automobiles, airplanes, factories, farm equipment, trucks, trains and ships. Petroleum fuels also generate heat and electricity for many houses and business places. Altogether, we use a huge variety of products made from petroleum, few people ever see substance itself. Most of it comes from deep within the earth as a liquid called crude oil. The word petroleum comes from Latin words meaning rock and oil. People gave it this name because they first found it seeping up from the earth through cracks in surface rocks.

Kazakhstan is one of the largest petroleum countries around the world (62% of all territory). Considering the perspectives of oil and gas industry in Kazakhstan, our country should prepare in time excellent specialists for successful cooperation with foreign partners.

Peculiarities of science-technical translation

According to Komissarov V.N., a special theory of translation studies 3 rather factors, which is necessary to consider them during the analysis of translation of science-technical texts [1]. At first, an original text belongs to special functional style and it may affect to the process of translation, and demanding from a translator the usage of peculiar methods and ways of translation.

Secondly, basing on the original text may predetermine stylistic features of the text, consequently, it is a necessity to make the same style in another language. In the further interaction of both factors, there can be revealed the features of translation connected either with the peculiarities and differences between linguistic signs of the same styles in the original language and in the target language or with special conditions and tasks during the process of translation of science-technical texts. In other words, a special theory of translation studies the influence of linguistic peculiarities to definite functional style during the process of translation.

The main peculiarities of science-technical style are its informative function (content), logically connected idea (an accurate consecutiveness and connection between the main idea and the other part of a text).

The problem of adequate translation and translation itself is the major aspects in science-technical translation. In essence, here is being discussed the question of an accuracy in translation. There are no generally accepted views among the theoreticians concerning this important problem. Although the number of reports and sayings about the problem and adjacent notions (equivalence, calque, word-for- word translation, identity etc.) are more than enough and they are contradictory. It must be mentioned that the problem of adequacy in the translation should not be considered as the same. At least, this problem can be examined in complex with the next factors:

1. **The form of a text in translation.** It is known that there is a definite kind of forms, for which should made high accuracy translation. First, it is the law documentaries, accurate scientific calculations and other things, which are thoroughly prepared for the translation. But in practice, there are more often such cases when experienced translators, who know everything in the theory of

translation, may add something useful from their side. Principally, it is the materials, which should not correctly have been prepared in literary and methodical way. It goes without saying that translator cannot change the content of such materials, but may improve the style, puts logical accents more accurately, offers more correct and successful ways of translation;

2. **Terms.** It is very difficult to make complete adequate translation of notions and modern terms, which are connected with up-to-date technology. Example: this valve system is known as a Christmas tree because of its many branchlike fittings. The only appropriate method of translation, which can be used here, is a descriptive translation, with its thorough explanations and notes. Fedorov A.V called this method of translation as microapplication [2]. Microapplication is the correlation of words and word-buildings when small distribution of some verbal groups or known syntactical reconstruction are natural during the translation process;

3. **Difficulties in the translation of notions.** Sometimes a task to complete translation of a definite conception from Russian into English and vice-versa is difficult and often impossible. Example: “Ships which are subjected to the provisions of this Annex and which carry noxious liquid substances in bulk shall be surveyed as follows”. In this case we can speak only about semantic adequacy when linguistic expressions of these notions are various: “Суда, перевозящие вредные жидкие вещества наливом и подпадающие под положения данного приложения, подлежат следующим освидетельствованиям”.

Linguistic difficulties in the translation of terminology

There are a lot of words, conceptions and phrases which are consisted of rather various linguistic means and such moments different kind of vocabularies cannot help to translators and do not have suitable variants of the translation. Helideck, M.O.L turbine inlet filters, AC-SCR systems. In this case the translator, as a rule, makes descriptive or word for word translation, which significantly reduces a quality of translation and even distorts the meaning of a text. Obviously, in the previous case many things depend on the translator’s experience and level of personal knowledge. For instance, the translation of experience”сдать под ключ”, neither the word-for-word translation, nor vocabularies can give the correct translation form of this form of this term. There is an accepted variant of translation form of this term. There is an accepted variant of translation in USA, which sounds as “to construct a building” on the terms of the “term key arrangement” and translators have to know this variant. The other example: “Совместное предприятия создано на базе НИИ”, in which the notion “на базе” is used in English as “...on the premises of the research institute”, it’s rather distinctive variant of translation in comparison with its Russian equivalent. There are no ways to overcome linguistic difficulties right away during translation. But the most predominant and successful way is constant and thorough self-work of the translator at studying original science-technical literature, self-made reference books, writing outs etc.

Terminology in science-technical sphere is the hardest and the most significant aspect in the science and technology, in general. There are three factors, in which the translator’s complicated work is mainly determined in the area of science-technical translation either from Russian into English or other language.

1. The limits of science-technical terminology are extremely vast; they almost coincide to limits of the notions, being used in the science and technology. It’s almost impossible to know all the terms in oil-and-gas industry not only for the translator, but even for a specialist.

2. The science-technical terminology always changes with the further development of modern technologies and the process of publishing special vocabularies, reflecting new terms almost falls behind for several years. But this process helps to reduce even in small degrees such important problem like backwardness and only a few of translators can have opportunity to use these materials. Besides, in fact, these materials contain the translation only from English into Russian.

3. The problem of term`s unification is still intricate the same is to “docking” the terms, expressing the same notions in both languages.

The main mistakes made by translators are consisted in the wrong understanding and in the technical essence of a translation subject, in general, or a term, in particular. Subsequently, there is a wrong choice of term, leading to distortion of the meaning. For instance, the English term “pressure equipment” may be mistakenly translated, as “оборудование, усиливающее давление – equipment strengthening the pressure”. However, it`s correct translation sounds on practice, as “оборудование для высокого давления – an equipment for high pressure”, in other words, the equipment which is specially constructed for work under the high pressure”.

The other example: “enhanced recovery” can be translated into Russian, as “расширенная добыча – extended recovery”, it is wrong variant, because this term means “добыча нефти искусственным поддержанием энергии пласта – oil recovery with artificial support if stratum energy.” So, it is necessary to know either the term itself or its technical meaning. The other source of mistakes in particular terminology translation is a complete non-similarity of the terms both in Russian and English languages.

The third mistake in the translation of special terms is the usage of not ordinary and standard terms and jargons, either in English or Russian languages. Rednecks – the members of a drilling crew. The etymology of this term points clearly at its slang roots. It must be mentioned that it often happens when translator cannot find a necessary word in one dictionary according to the subject. The principle thing for a translator is to understand the technical meaning of a notion or term.

The usage of translation correspondences and methods in oil- and-gas terminology

In this research paper the experimental data includes 50 oil and gas terminology in English and their 50 Russian translations. 21 of them are translated by calque (42%); 10 of them are rendered by descriptive translation (20%); 7 of them are rendered by transliteration (14%); 6 of them are rendered by transcription (12%); 6 of them are rendered by literal translation (12%). The research illustrates, that calque is the most effective method in terminology translation, especially the equipment. There are various words, in general use, which may mislead a translator from correct using a term. It must be mentioned that not every word can be the term, but only those words, which have one and the only meaning. All of them are steady phrases in a definite sphere. Let`s see in examples. The word thermocouple is translated with the help of Calque, as “термопара” and there is the following explanation of the term: “электрический прибор для измерения температуры, состоящий из различных металлов, соединенных на концах”.

Weather window – the part of the year when the weather is suitable for operations which cannot be carried out in adverse sea and wind states, e.g. pipeline or platform installation – погодное окно,

часть года, когда погода позволяет вести операции по морской добыче: прокладка труб или установка оснований,

Plate column – тарельчатая колонна,

Thermal cracking – термокрекинг,

Caloric value – теплотворная способность,

Electric generator – электрогенератор,

Drill pipe – бурильная труба,

Cutting tool – режущий инструмент,

Power Plant – энергетическая установка,

Hoisting machinery – (грузо) подъемный механизм,

Drilling site – место бурения,

Drill ship – буровое судно,

Remote control – дистанционное управление,

Control valves – регулирующий (распределительный) клапан,

Water injection well – скважина закачивания воды,

Mineral rights – не минеральные права, а права собственности на полезные ископаемые,

Landed price – не приземлившаяся цена, а реальная цена стоимости нефти, включающая все расходы по доставке с места производства или покупки до нефтеперерабатывающего завода.

There are some obstacles for translators, who should avoid them and correctly use one of the methods of translation, because the following words have already had its own form of translation in the Russian language. That's why translators can make literal translation. For example:

Benzene – бензол, не бензен;

Orthoxylene – ортаксилол, не ортаксилен;

Dispersant – диспергатор, не дисперсант;

Styrene – стирол, не стерен;

Flange – фланец, не флендж;

Besides, in the majority of cases translator does not have visual experience, which can help to find some connections between the subject itself and the term. Translator should take into account the

history, culture and mentality of the nation, which gave a definite naming to a subject. They can make descriptive method of translation like for following terms:

Rough neck – the floorman in a drilling crew who sets the slips to hold the drill pipe, handles the tongs or elevators and other equipment around the rig floor – рабочий буровой бригады;

The literal translation of this word: “красная шея”;

Its synonym – redneck – “красная шея”;

Wild cat – разведочная скважина – is a well drilled in an area where no oil or gas has been found. Its literal translation into Russian: “дикая кошка”;

Monkey board – балкон верхового рабочего – a place for the up-workers. The literal translation: “дощечка для безьяны”;

Christmas tree – assembly of valves and fittings located at the head of a well to control flow of oil and gas – ёлка, фонтанная арматура, сооружение из труб и клапанов, буровая вышка. Its literal translation in Russian: “рождественская ёлка”;

Dog leg – a deliberate or accidental sharp bend in a well – резкое искривление.

The literal translation of this word in Russian “собачья нога”;

The next constructions in the terminology translation are given with an explanation of peculiarities in Russian language:

Mud engineer – не грязный инженер, а инженер по промывочным жидкостям, отвечает за соответствие спецификаций бурового раствора;

Transliteration and transcription

These methods of lexical units` translation are the most convenient and preferable for a translator. The usage of transcription in the translation is a formal phonemic recreation of initial lexical units, by means of phonemes in translating language and phonetical imitation of initial word.

Transliteration is a formal letter-for-letter recreation of the lexical units with the help of translating language alphabet. As an example, here are some transliterated terms:

Detergent – детергент

Overshot – овершот

It must be mentioned here about frequent using of transliteration in translation mainly of chemical elements, borrowed many years ago. There is also used almost the same method of translation as transcription. Such vast distribution and popularity in the usage of this method is explained by peculiarities in the modern world when everyone prefers the following ways of communication, like: TV, radio or personal meetings. Only in this way recipient better perceives the transcription.

Kerosene – керосин

Conclusion

To sum up everything written above, we can say that the calque is the most appropriate translation method in oil-and-gas terminology translation. Transliteration and transcription is the most frequent used method in the rendering of terminology. The descriptive method of translation is more often used than literal translation. The literal translation is the rarest used method of translation in oil-and-gas terminology.

Translation of science-technical terminology is very strenuous and laborious process, this process demands a special preparation and knowledge. That`s why translators have to pay attention to each detail, considering such aspects as stylistic and linguistic features of TL and SL and choosing the appropriate methods of translation.

References:

1. Комиссаров В.Н.. Современное переводоведение. Учебное пособие. – М.: ЭТС. — 2001. — 424 с.
2. Федоров, А. В. Основы общей теории перевода: лингвистические проблемы. – М: Высшая школа, 1983. – 303 с.
3. English-Russian dictionary. Retrieved from: <http://www.lingvo-online.ru/en/Translate/en-ru>.

USING NEW INFORMATION AND COMMUNICATION TECHNOLOGIES IN TEACHING FOREIGN LANGUAGE IN SENIOR CLASSES

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Abstract

Information and Communication technologies have nowadays been scrutinized as the most convenient and improved method of teaching English as a foreign language. The paper examines the experience of the application of ICT in the classroom of English in senior classes using the electronic textbooks and Internet resources, possible problems and their solutions, reveals opportunities to improve the quality of education by wise using of mobile devices on the lessons of English, the raise of motivation in the classrooms with use of ICT. M-learning as one of the beat