

# Türkic and American Indian

*Abrar Karimullin (1925-2000)*

Professor, Kazan University

## Proto-Türks and American Indians

Tracing a hypothesis

Kazan, Insan, 1995, ISBN: 5-85840-275-5 (In Russian)

### Foreword

From the contents of the article, it is visible that it was started in the 1960es, possibly a samizdat draft was circulating for decades, but finally it was published in 1995, when were temporarily opened channels free of censorship, and A.Karimullin was long a retired academician with non-strippable privileges. In the period from the 1960es to the 1990es the "Amerilogy" was already reanimated from its near-frozen state, many A.Karimullin charges were already obsolete, but the article and its bibliography remained in its juvenile condition. The retrospect anthology have not change, though, and the disarray in the [Native American philology](#) still remains robust, with many philologists not impressed that agglutination (also euphemized as "polysynthesism") and synharmonism survived for 10-17 KY. The current dispute about significance of the linguistic morphology, which defines the fundamental properties of all Native American languages, and allows them be classed into sensible groups, keeps classification smoldering along the lines so thoughtfully laid out by A.Karimullin back in the 1960es, and keeps interpretations of the genetical research muddled.

This article in itself is a monument of anti-colonial current in Russian domains. While in his publications A.Karimullin was giving a sugary lip service to the infamous decree of the ruling party against "ancientization" of Türkic history and other acts of the country's "national policy", his deeds defied the edicts to the utmost degree. A.Karimullin's works on Itil/Volga Bulgars and links with Native Americans far outstripped the allowable boundaries, and were circulated in their original form long before they could be despoiled enough to penetrate the censorship barriers. Unfortunately, like his whole and later generations, A.Karimullin was robbed from the opportunity to know his own traditional Arabic script of the Türkic peoples, and even being a philologist, he could read Türkic, Arabic, and Persian materials only in Russian sanitized translations.

The agenda-loaded scholars of the post-WWII period took a position that there are too many cognate listing floating around, each one directly or in disguise challenging the IE-centered listings and methods. On an administrative level the offhand dismissal tended to work so far, but it could not prevent both amateurs and professionals from looking deeper and discovering, and in a long run the dismissals were proving to be unconvincing. An English-language reader may be surprised to see Sioux-Türkic-English (Germanic) lexical cognates, like the "dawn". A Russian-language reader may be surprised to see Sioux-Türkic-Russian cognates. These cognates, which do not have common IE precursors, demonstrate propagation of the words which already existed in a basic vocabulary 20,000 years ago, before the future Americans commenced their far-flung voyage, and 20 millenniums before the discovery that everybody equipped with 2 ears was a \*proto-Indo-European/\*Iranian speaker. Technology and events are about to overcome any insular denials.

An interesting insight can be gained from the numerical valuations cited by A.Karimullin. Supposing that the base vocabulary of the hunter-gatherers who reached the American shores was around 2,000 word roots, and that the eyeball quantity and

quality of 200 Türkic roots is accurate to an order of magnitude which would remain stable after fine-tuning additions and deletions, a simple calculation shows an attrition rate for agglutinative languages of 12.5%/millennia for 17.2 KY case, and 33.1%/millennia for 10.1 KY case. The accepted attrition rates were tentatively established for flexive languages, and their applicability to the agglutinative languages was never demonstrated. The current mainstream opinion of experts in agglutinative languages is that they are inherently more conservative than the flexive languages, and that the application of flexive attrition rates underestimates significantly the diversion age for the agglutinative languages. The attrition factor for flexive languages is taken as 9 to 17%, and that range agrees with the eyeball estimate of 12.5% for 17.2 KY of isolated development for Native American agglutinative languages, which corroborates the earlier genetical dating, and significantly conflicts with the later genetical dating. The numbers should be treated cautiously, they are only as good as the underlying studies and assumptions, and subsequent doubling of the traceable vocabulary, reasonably expected after application of more consistent phonetical transcription and of the rules of phonetical alteration, would bring the estimated attrition rates to a more reasonable 8.9%/millennia for 17.2 KY case, and 14.7%/millennia for 10.1 KY. In the end, better studies of the Native American agglutinative languages, and application of phonetical alteration algorithms, will provide an exceptional isolated polygon for long-term paleophilology. These results would be much more trustworthy than the current estimates based on the comparing of the Swadesh listings.

Posting comments and additional information are shown [in blue](#) or preceded with [blue headings](#). Some names may be misspelled in the reverse translation from Russian, any comments will be appreciated.

*Abrar Karimullin*

## **Proto-Türks and American Indians**

*Neither knowledge, nor reasoning never begin with complete truth - it is their objective.*  
A.I.Gertsen

### **Letter**

Once I was told that in the Pushkin House in Leningrad was stored a letter of N.I.Ilminsky. This news grabbed my attention, as then I was engaged in the history of the second half of 19th century eastern publishing in Russia, with which that man was also involved in some measure.

Till the 60es of the 19th century N.I.Ilminsky was actively engaged in the study of languages, literature, and culture of Türkic peoples, under his editorship published a number of the Kazakh and Uzbek literary monuments, and other compositions of eastern authors, cooperated with the Tatar educators K.Nasyri, G.Mahmudov, Kh.Faizkhanov [1]... But, from the 1860es, his activity changed fundamentally: from a Türkologist scientist he became an ideologist of orthodox Christian missionary work, and all his remarkable talent and erudition were discharged against a secular culture, and also against education of Tatars, against Tatar democratic book.

Also, earlier I chanced to encounter the epistolary heritage of Ilminsky, widely available in the archives and libraries in Kazan, Moscow, and Leningrad, they contain many of his assertions about Tatar culture and publications, which are not publicized in his published works. Spotting his unknown letter could give new information about the problem of interest to me, and I waited with impatience for a chance to get acquainted with it.

In Leningrad, on the admiral Makarov's quay, Pushkin House was a Russian Literature Institute of the USSR Academy of Sciences, where are collected richest monuments of Russian culture: manuscripts and letters of Russian scientists, writers, educators, ancient hand-written books...

I searched for the N.I. Ilminsky's manuscripts in the card files and catalogues. And in the manuscript fund 141 under No 73 in the archive file was catalogued N.I. Ilminsky's letter to a certain Otto Rochrig. I ordered and got acquainted with it. It turned out that this letter, and other documents in that file, came from Kazan. They were stored by M.A. Vasiliev, a known Kazan writer, and he got them from N.J. Agafonov, a known Kazan bibliographer and bibliophile, a collector of ancient books, documents, and manuscripts, who was an editor of the "Kazan stock exchange sheet", a publisher of the "Volga Kama" newspaper, and an author of numerous articles about Kazan citizens, Russian writers, and scientists. [2]. He also worked as a bookkeeper of the Kazan University, with which undoubtedly was connected how these documents came to him, and were saved from being lost.

As was apparent from the pencil marks on the manuscript sheets, with it at one time got acquainted outstanding Arabist academician I.Yu. Krachkovsky. I should note that in his works Krachkovsky does not mention this manuscript. Apparently, the reason was that the Arabist scientist was not connected directly with that research area, these materials were not of interest for him. A review of the file has shown that it did not contain any new information for my theme, a history of book printing. But I was curious about the Otto Rochrig letter from the file, addressed to the Tatar scientist Ibragim Halfin, moreover written in America, and in addition written in the Tatar language using Arabic script. The manuscript of Ilminsky was connected with this letter.

Ibragim Halfin (1778-1829) was an outstanding Tatar scientist, educator, a member of a known dynasty of Halfins, who left a deep trace in the national Turkology. His grandfather, Sagit Halfin, was a deputy in the commission preparing a project of the New Rules (1767), undertaken by Catherine II. Under an imperial decree of 1769 he was appointed a teacher of the Tatar language in the 1-st Kazan gymnasium (*classical school*) for training (*Russian colonial*) officials in eastern languages. He was an author of a first textbook on the Tatar language for Russian educational institutions, published in 1778 by the printing house of the Moscow university, and a large two-volume Russian-Tatar dictionary... After the death of Sagit Halfin his son, Ishak (*Is-hak*) Halfin, replaced his father in the 1-st Kazan gymnasium teaching eastern languages. He is known as a translator onto the Tatar language of the Russian statute "Charter of Fidelity Department" and "Charter about provinces", published in the Tatar language in several editions in Petersburg at the end of the 18th century, in the Asian print shop (*This seems to indicate that the Tatar language remained a ruling language in Russia well into 1700es. Catherine II was ethnically German, for her the Russian was a foreign language - Translator's Note*).

A son of Ishak Halfin, Ibragim Halfin, followed the steps of his grandfather and father. From 1800 he was a teacher of Tatar language in the same gymnasium, and with the opening of the Kazan University he was a lecturer, then an adjunct-professor of the university. During his work at the university Ibragim Halfin communed closely with progressive scientists of the university, among whom was an outstanding Russian Orientalist H. Fren, who taught Ibragim and acquainted him with the achievements of the European Orientalistics, and Ibragim Halfin taught H. Fren the Türkic languages. This friendship of scientists continued after H. Fren's departure to Petersburg. To that period belongs the edition in Kazan of the invaluable historical monument of the Türkic peoples, "Family tree of the Türks" by Abul-Gazi, jointly prepared by them and published with textual editorship by Ibragim Halfin. In the literature was already noted many times that the publication of that work lifted the Russian Oriental studies to a new height, and the publication received high valuations of European scientists. Ibragim Halfin also authored

other works, including the "Alphabet and Grammar of the Tatar language" (Kazan, 1809), "Life of Djingis-khan (*Chingiz-khan*) and Aksak-Timur, with attachment of different fragments illuminating the history, all words of which are arranged alphabetically for the students" (1822). For decades these his works remained the only guidebooks for the study of the Tatar language in the Russian educational institutions, they served as examples for the new works on the grammar of the Tatar language, written by A.A.Trojan, M.I.Ivanov, A.K.Kazem-bek, S.Kuklyashev and others.

The historical and linguistical works of Ibragim Halfin received a wide appreciation among the European Orientalists, historians and linguists. His works drew attention of historians, and Türkologists of France, Germany, and England like Sylvester de Sasi, A.David, Parch, Shpuler, Charles Ray... The works of Ibragim Halfin were also widely used by the German historian Joseph Gammer-Purgeshtel in his works about the history of the Türkic peoples, much appreciated by Karl Marx and Fridrich Engels [3], and in this sense can be stated that the name of Ibragim Halfin was also known to the founders of the "scientific" communism. (*And the mentioning of Ibragim Halfin's name under "founders" protection would serve for the author as an insurance policy to preclude a decapitation or a compatible peril for espousing a heretical subject. This is not a loyalty oath, it is a skilful technique of running circles around a sitting cannibal - Translator's Note*).

So, the documents from the Pushkin House are one more stroke in the activities of Ibragim Halfin, this time testifying of his works being known not only in Europe, but also beyond the ocean. This very fact is of interest for the history of Tatar people's culture as an example of cultural interactions.

The archival file begins with a letter from Otto Rochrig. It is written on a letter form, in the upper part of the sheet is a typographical picture of the Philadelphia city from the bird's eye. Otto Rochrig writes to Ibragim Halfin that he has his two books mentioned above, and expresses a desire to get acquainted with his new works on Tatar language. Further, he informs that for a long time he was engaged in the study of the Tatar language, about his work on description of the Türkic manuscripts in the libraries of Paris, about his acquaintance with the works of the known Türkologists. The reason for his letter to Ibragim Halfin O. Rochrig explains as his need for a deep study of the Tatar history, language dialects, geography of their distribution, and also classification of Türkic languages, and therefore he wishes to come into scientific contact and exchange new works on Turkology. The letter is dated by 1861. Ibragim Halfin by then was not alive any more. From the text of the letter is apparent that it was already O.Rochrig's second letter to I.Halfin. His first letter did not survive, but apparently its contents were of the same nature.

The letter to I.Halfin was addressed to his workplace in the Kazan University. As the addressee already was not among the alive, the letter undoubtedly went to N.I.Ilminsky, who since September 6, 1861 started to work in the just reopened faculty of Türko-Tatar language at the Kazan University. Apparently, this also explains why O.Rochrig's first letter was not preserved: it was written before 1861, when the university still did not have the eastern languages faculty, after a transfer of eastern subjects to the Petersburg University in 1855. Therefore, there was nobody to answer the letter addressed to I.Halfin, and it apparently was lost, or maybe was sent to the university archives (*A little bit puzzling: would not be a family first to be given a letter addressed to a deceased? Next of kin? It should have been a university, not a prison - Translator's Note*)

These documents present a large historical value for Türkologists, as an example of interaction of scientists of that time, and also for Ibragim Halfin biography.

If the first letter remained without an answer, the second letter the University Council sent to N.I. Ilminsky to answer, after the faculty of the Tūrko-Tatar language has reopened. The response letter from Ilminsky contains interesting information both on him, and on the O. Rochrig's letter, and also other information presenting interest for Türkologists. The letter is unsigned and undated, apparently it is a fragment of a draft of the letter, left by Ilminsky for his personal archive. Soon came O. Rochrig answer to Ilminsky, dated September 26, 1863. The answer is written in Russian with addition in Tatar in the Arabis script.

Despite of Rochrig's offer to establish scientific contacts, his last letter remained unanswered, because Ilminsky's interests were then already far from Turkology, he left the faculty of university he was heading, and plunged completely into Christian missionary activity. Unfortunately, it is not known what books Ilminsky sent to Rochrig, and what he wrote about what Türkologists.

I've got acquainted with these documents, and my curiosity was satisfied: there was no information on my theme, and that could be the end of it. However, a question began stirring me, who was this Otto Rochrig? I studied bibliography of the Tatar linguistics, and knew practically all works of foreign scientists on Turkology, but among them I did not remember this name. Besides, I was interested, how come a surgeon, a professor of medicine, has an interest in Turkology, moreover he was living in America which does not have Türkic peoples, nor a school of Turkology? Moreover that was during a civil war of the America North with the South.

### **Otto Rochrig (1819-1908)**

I started searching for information on O. Rochrig and his printed works. In the K.E. Saltykov-Schedrin Public library in Leningrad I came across his work about comparative study of the Tatar language with Finnic languages [4]. So, I thought, O. Rochrig's interests to the Tatar language is not accidental. His work was published in 1845 in Paris. And the Ilminsky letter showed that in the world of oriental studies O. Rochrig was known not only in Europe, but also in Russia. I turned to every possible domestic and foreign encyclopedias and other type of reference books in the Kazan, Moscow, and Leningrad libraries, but they did not add anything new about O. Rochrig. The only reference to him was in the Brockhaus and Efron encyclopedic dictionary, where his name was mentioned in an article about the language of American Indians. Maybe I have not noticed something, missed something in these directories? Therefore I addressed for help to the information departments of the M.E. Saltykov-Schedrin library, of the V.I. Lenin State Library of the USSR, of the Foreign Literature State Library, to the library of the USSR Academy of Sciences, but received unfavorable responses.

What else could be done? The only alternative was to address to the bibliography centers of America. And on my inquiry came an answer from the USA Library of Congress, signed by its director Paul L. Goretsky, to whom I bring sincere gratitude for his help (*LOC site does not list Paul L. Goretsky in any spelling as a LOC Librarian, which would be an equivalent to the Russian title "director", hence, no idea about a timing of that letter - Translator's Note*). To the answer of Goretsky was enclosed a xerox copy of a page from the American directory "Who is who in America in 1897-1942" with a brief information about Otto Rochrig. His full name was Frederich Lewis Otto Rochrig, he was born on June 19, 1819 in Halle, Prussia. Has received education at Halle (*Wittenberg*), Leipzig, and Paris universities in medicine and philology, specialized in eastern languages.

With a view of perfecting his knowledge in eastern languages, in 1841 he agreed to go to Turkey as an attache at the Prussian embassy. From the 1849 he was a professor in a France college, from 1851 he was a lecturer of Royal Oriental Academy of France. Then



he left for America, where since 1853 he worked as deputy director of Astor Library in New York, from 1858 he was a professor of medicine and therapy in a medical college in Philadelphia, in 1861-1867 he was a military surgeon in the army military hospitals, since 1868 he was a director of the Washington governmental medical library. And from 1869 he switched completely to the Orientalistics. In 1869-1885 he was a professor of Sanskrit and Live Eastern Languages in Cornell university, in 1869 he also worked as a director of the New York Foreign Languages Training Bureau, a lecturer of Semitic and live Eastern languages in the Stanford University ([California](#)), and from the 1895 he also held other posts. He died in 1908 in the age of 89 in California, in Pasadena [5].

All these facts once again confirmed that Otto Rochrig was not a stumbler in Orientalistics, that his addressing Ibragim Halfin was deeply necessitated by science.

The P.L.Goretsky answer also had a list of O.Rochrig book publications available in the library of Congress, among which, in addition to his work published in 1841 in Paris mentioned above, are listed five more books, published already in America. These works are the textbooks of English and German languages [6], a catalogue of books on the languages and literature of peoples in Asia, Africa, and Oceania, held by New York Astor Library [7]. And the other two books are about the language of Sioux Indians [8] and Türkic languages [9] which were of interested to us.

Knowing precisely the titles of O.Rochrig works, I again addressed the largest libraries in Moscow and Leningrad. Unfortunately, on my inquiries the answer was the same: "Not present in the library".

Once, working in M.E.Saltykov-Schedrin Public Library, I decided to order these editions on a fluke, without codes, because the orders for old editions were accepted without a catalog code, a storage address of a book in the library. And as it happened, on one of the inquiries, namely for a 19-page work on the language of Sioux Indians, I was given a thick folio, about eight hundred pages, representing a Year-book on the works done by expeditions of the Smithsonian Institute in 1871 [10] studying the American natural resources. Naturally, I thought that the library workers made a mistake, and instead of a thin brochure [11], they have gave me a volume which name does not resemble at all the title of the work. The book was a report from the Institute, with descriptions of flora and fauna, and it also included reports about geological expeditions; it could have been returned immediately after seeing its title page. Nevertheless, for curiosity I thumbed through the book, and on page 435 I saw O.Rochrig's name, and his work about the language of the Sioux Indians. Well, all right, I thought, so O.Rochrig was interested not only in Türkic languages, but also in the languages of American Indians. With that I could have stopped.

O.Rochrig knew many languages - Latin, ancient Greek, German, French, English, Arabic, Persian, Turkish, he also could read in other Türkic languages, and he also knew Ugro-Finnic languages. As is seen from his letter to N.I.Ilminsky, to a some degree he also learnt Russian. Being such a polyglot, and also a linguist, living in America, and having met with Indians, he naturally took an interest in their language. So, I thought, everything is logical, I can return the book, the language of Sioux Indians did not interest me. Nevertheless, I continued scrolling through his work, and then I saw: Rochrig was comparing the language of Indians with the Türkic language - and I did not expect that! There and then I, as they say, from cover to cover, with a greatest interest and a new vision, read the whole work, and re-read it again, and again...

Because this observation by O.Rochrig presents a huge interest not only for Turkology, not only for a general philology, but also for the history of the Indians' origin, of the settling of America, and for the history of other peoples, we shall stop on his work in more detail.

In the beginning of the article O. Rochrig writes that love for different languages and dialects of different groups lead him to the necessity of comparing them, to their classification based on the similarity at different levels: lexicon, phonetics, morphology, syntax. He was especially struck by the fact that the language of Sioux Indians stands separately among the [languages of North American Indians](#), natives in respect to the peoples who settled there after the discovery of America in the 16th century. That incited him to search for those languages that were close to the Sioux language. After a careful comparison of the lexicon, Otto Rochrig came to a conclusion that *"the Sioux or Dakota vernacular can be attributed to the Uralo-Altai family of languages, which covers a very wide area, and its carriers were settled in the extensive territory and represented by numerous branches of peoples in the Eastern Europe, Siberia and Central Asia, some of its branches are even located in the heart of Europe, these are the Hungarians, and also the numerous and widely spread vernaculars of Finno-Ugric group. Some typical morphological features of the Uralo-Altai group of languages have undoubtedly found an obvious footprint in the Sioux language"* ([Here and on the citations are reversed translation from Russian, and may stylistically differ from the original phrasing - Translator's Note](#)). In his words, these similarities *"are just amazing"*. O. Rochrig's sees these similarities in the identical syntax of these languages. Further, he asserts that the same similarities are observed in the morphology of Sioux language and the Uralo-Altai languages. Both those and these languages are agglutinative, they have no prefixes. A phenomenal similarity between them O. Rochrig sees in the method of adjective superlative degree formation by repetition of words, unparalleled in other languages, a trait which *"is peculiar to only Uralo-Altai family, especially the Türkic languages"*, that *"to our greatest surprise, the same forms exist in the language of Sioux Indians which express the external quality of subjects and of the phenomena"*. So, *"sap-sapa"* (very black), *"sem-sepa"* (very beautiful) in the Sioux language in the formation method are identical with Türkic *"kap-kara"* (very black), *"chip-chiber"* (very beautiful), *"sap-sary"* (very yellow), *"ap-ak"* (very white), etc.

Further, O. Rochrig also sees these similarities in the phonetics: both Türkic and Sioux languages follow the laws of synharmonism. The article demonstrates some morphological forms identical in form and function. So, the ending, the suffix *"ta"* (in a hard articulation) and *"te"* (in a soft articulation) in Sioux language corresponds to the Türkic *"da"*, *"dä"* - *"ta"*, *"tä"*, the suffixes of temporal - local case. The Sioux word *"ekta"* matches the Türkic *"yakta"* ("side", "in the direction"). This form also exists in the modern Tatar language, as *"ken yakta"* ("in the southern side"), *"sul yakta"* ("to the left"), etc. Both the Sioux language and the Türkic languages have an active word-formation suffix *"sa"*, *"se"*, which matches the Tatar *"chy"* (hard form), *"che"* (soft form), for example, in words *"tashchy"* - mason, *"balykchy"* - fisherman, *"yalganchy"* - liar, *"chulmekche"* - potter, etc.

For the proof of his hypothesis about a relationship of Sioux language with the Türkic, Otto Rochrig also turns to the lexical examples. So, in the Sioux language *"tan"* - *"tang"* means "dawn", which completely coincides both in the form and in the meaning with the Tatar *"tan"* - *"tang"* ([And Germanic English "dawn" too - Translator's Note](#)). Further, O. Rochrig examines the morphological forms of this word. So, from the *"tang"*, in the Sioux language are formed words *"tani"* - *"tangi"* - with a meaning "to learn", "to make clear", "to illumine"; and from *"tang + la"* - with a meaning "to understand", "to make clear" which match the same meaning in the words *"/t/anla"* - "(you) understand". In the 1-st person of a singular from the word *"tan"* - *"tang"* in the Sioux language is formed the word *"tanim"* - "I understand" (compare Tatar *"tanyim"* - "I understand"), in the second person is formed the word *"tannisun"* - "(you) understand" (compare Tatar *"tanyq + syn"* - (you will/shall) learn).

The origin of the Türkic words *"khan"*, *"kagan"*, *"aga"* O. Rochrig connects with the Sioux words *"Wakan"*, *"Wakan"*, where the sound "w" in the Sioux language also usually drops out. Further, O. Rochrig cites other examples which, in his opinion, demonstrate the

relationship of the Sioux language with the Türkic. These are words "ate" - in Tatar - "äti", "ata" - "father", "ine" - in Tatar "ine", "iney", "eni" - mother, mom: "tete" - in Tatar - "teti" - "breast", "sosok (nippel)" in Russian; "koke" - in Tatar - "kuke" - i.e. "cuckoo", etc.

On the basis of these and other examples, and the analysis of Sioux language against the Türkic languages, O.Rochrig comes to a conclusion that the language of Sioux Indians *"belongs to the Uralo-Altai family of languages, and in this family stands most closely with the Turko-Tatar group"*, that Sioux American Indians are immigrants from the *"Great Asia"*. Otto Rochrig notes, that for further substantiation of that conclusion the lexicon of the American Indian toponymy, where the archaic forms of Sioux lexicon have been preserved, should be also investigated.

Rochrig's familiarity with the languages of Sioux Indians began during the civil war in the United States of America (1861-1865). When the war between the North and South began, he sided with the North's struggle for eradication of the Negro slavery, and worked as the surgeon in a military hospital. That hospital was in the Dakota state, populated by Sioux Indians. Naturally, he met Sioux Indians who were taking part in the war on the side of the North. He writes in his article that he was struck by the speech of the Indians, which reminded him the speech of the Turks, which he studied and listened to for a number of years during his stay in Turkey as a translator. As we already know, he studied Türkic languages in France. Even before moving to America, he proved to be an erudite Türkology linguist, and for his achievements in that field he was awarded an accolade from the French Oriental Institute. His name was also known to the Russian Orientalists of that time. And after moving to America, O. Rochrig went on studying eastern languages. Working in the Astor Library of New York he compiled a description of the books on the languages, literature, and culture of Asia, Africa, and Oceania peoples, that certainly expanded the level of his knowledge about the languages of the peoples of the world, and also acquainted him with the modern languages. That became a fruitful soil, and surrounded the Indians, he could not fail to notice the similarities of the Sioux language with Türkic languages. This discovery has fascinated him so much that in the end it guided his further scientific interests.

Despite of the work overload in the military hospital during the war, he was finding time, between operating on wounded, for meetings with Indians, to practice their language, collect linguistic materials, visit their wigwam dwellings, learn about their customs... It can be said that directly from the field military actions, under impression from the meetings with Indians, he writes to Ibragim Halfin. He is interested in classification of Türkic languages, whether the scientists in Russia know about Sioux language, maybe they resolved long ago the problem of its belonging to a particular group of languages?

In 1865 the civil war ended, North has won. Before he even demobilized from the army, Otto Rochrig takes a vacation from the army and goes to live with the Indians, and from June 4 till November 26, 1866 he stays with them. He lives with Indians in their wigwams, hunts with them, dances ritual dances with them, sings their songs, continues to study their language. During that time he collects examples of their language, writes down their legends, describes their ceremonies. Otto Rochrig accumulated a huge material about the life, customs, language, and folklore of Sioux Indians. Later he wrote about it: *"To describe all events that happened with these most interesting tribes during my stay among Indians would take whole volumes"*. Apparently, from all that rich material he managed to print only an article in the university year-book, of which a separate off-print was made. Possibly, O.Rochrig managed to publish other works on Sioux Indians and their language in some periodicals, in different collections, or year-books, but unfortunately we did not find any information about that in the American directories, and the responses from the libraries of those universities where he worked



and to where we sent inquiries did not bring any positive results. They also did not know whether O.Rochrig's manuscripts were preserved in the archives or American libraries.

O.Rochrig was also a physician, a doctor of medicine, but a meeting with Sioux Indians turned completely him into a linguist philologist. He left medicine, and completely switched to the Orientalistics. Even in the directory "Who is who in America" he was described as a "philologist - Orientalist".

After demobilization from the army O.Rochrig turned to a study study of Sanskrit language, and of the language of Oceania islands inhabitants, undoubtedly motivated by his interest in the Sioux Indians language, aiming to define the place of that language among other languages of the world. Probably, he was searching for traces of Sioux language in the languages of Oceania islands' inhabitants. Notably, he did not hasten to publish his observations. His work was published in 1871, almost ten years after the start of his interested in the Sioux Indians language, when he became convinced that he have not found any traces of that language in Sanskrit and languages of other peoples.

Otto Rochrig knew theoretically all main languages of the world. He was a man of great erudition, a recognized philologist. In his conclusions he was a very cautious scientist, he did not pursue sensations, did not hasten to publish his observations and conclusions until he himself was firmly convinced in the accuracy of his conclusions. If we did not know about that side of O.Rochrig nature, of the history of his scientific explorations, of his biography, and only having met with his work on Sioux language, we would have reasons to question his conclusions about similarity and genetic relationship of Sioux language with Türkic languages, which he included in the Altai-Ural linguistic family (*Ural-Altai protolanguage hypothesis does not have sufficient lexical and morphological evidence and now linguistically "Ural-Altai" is treated as "Uralic and Altai" - Translator's Note*).

Who are these Sioux Indians, where they live, what is known about their languages? Among the North American Indians is a large group of Sioux-Hoka languages, the Sioux language belongs to them. The group also includes Hoka, Yuki, Vappo, Keres, Tunika, Keddo, Cherokee, *Muskochi (Muscogee)* Indians, and others [12]. Among them the Sioux numerically hold a first place. In the 17-18th centuries they occupied extensive territory in the Missouri river basin, and the Great steppes from Mississippi to the Rocky mountains, from California to Arkansas. Sioux language, in turn, is subdivided into a few groups: Dakota-Assiniboin, Mandan, Winnebago, Hidatsa, Apsaraka (*Crow*), etc.

Sioux were warrior tribes, they inspired a fear in the white colonizers, they fought heroically for their lands, for the freedom of people against armed to the teeth white colonizers. In 1862, 1872, and 1890 they rose against white oppressors; these uprisings continue at the present time (*reference to 1973 Wounded Knee fight? - Translator's Note*), which sometimes mass media reports. Millions of Indians were exterminated by the colonizers. From a multi-mullion strong tribe, according to 1963 valuations, all that remains of them is about 77 thousand people (*150,000 in 2007 - Translator's Note*). Now they are scattered, confined in reservations, and live far apart in the states North and South Dakota, Carolina, Montana, and Nebraska, a part of them also live in southern areas of Canada. Torn off from their lands, they have to work on the farms of the whites, or run a subsistence economy, being a poorest part of the American population. Only few of them manage to get education and profession. The American literature is rich with novels and stories about American Indians, including the Sioux, where, from the standpoint of white colonizers, they are depicted as aggressive, exotic and obstructive natives. This biased sin mars even the works of such prominent writers as F.Cooper, M.Read, and others. A rich literature in English about Indians of Northern America is about the wars with Indian tribes, and to the description of their life, customs, anthropological features, their history from the times of America colonization; it depicts a

superiority of a white man. There are books about their myths, folklore, and observations about their music. But unfortunately, we have not found almost any works on the language of the Sioux Indians, especially on comparative study of their languages. Nevertheless, we could locate two works, one of which is an English-Dakota dictionary by John P. Williamson, published for missionary schools in 1886 [13], and another a work by S. Riggs, actually it is the same dictionary re-published in 1890 in Washington [14].

Apparently, in the subsequent years no study work was done on Sioux language at all, otherwise a 1968 publication would not be limited to just a simple reprint of the Riggs dictionary [15].

It should be also noted that in the rather comprehensive American bibliographic indexes about the language, culture, and ethnography of American Indians, the O. Rochrig's work on Sioux language is not mentioned anywhere. Apparently, that is explained by the fact that not only the Sioux language, but the North American Indian languages in general, remain outside the attention of the American philologists; and also by the fact that the Rochrig's work was published fairly far from philological compendiums. Taking into account that that publication was an Institute report about the study of American natural resources, and that was an official, governmental edition, not covered in the bibliographic directories, not ordered by the libraries, and only distributed to official establishments, it is not difficult to understand why that work remains unknown not only to the Türkologists of the world, but also to the American philologists.

When we obtained the above two dictionaries, a quick review brought about more than a hundred words similar in form and semantics with the words in the Türkic languages. Here are some of them:

Sioux Dakota language		Türkic languages	
Yudek	Drink	Yotyk, yotky	Drink
Yuhep	Swallowing	Yotu, yotyp	Swallowing
Icu	To drink	Echu	To drink
Yasu, yaco	To sentence, to make	Yasau	To sentence, to make
Kuwa, ozuye	To advance against	Kua, kuu	Expell, banish
Kuwa, ozuye	To advance against	Uza, uzu	Overtake
Capo, capaho	Visor, coverlet	Kapu, kepe, kapka	Visor, gate, top
Yuta	Eats	Yotu, Yota	To swallow
Wata	To shatter	Wata, Watu	Shattering, to break
Koda	Comrade	Kogda	Brother-in-law
Ichi	Together, partner	Ichi, Ish, Ishe	Together, partner
Kapsun	To bite with teeth	Kabu	To take into a mouth
Kan	Sinew, vein	Kan	Blood
Mi	I	Min	I
Bagana	Mark	Bagana, baganalau	To stake out, column
Canke	Trace, road	Changy	Ski track, ski, ski road

Baha	Old person	Baba, babai	Grandfather
Ik, ich	Two	Ike	Two
etc.			
<p>[1] Here and further, the American Indian words are spelled following the sources, though the spelling of different authors is different. Notably, the spelling of American Indian words even by the English-language authors does not follow the rules of the English language (open, closed syllables, etc.)</p> <p>[2] The American Indian words are mostly considered versus the examples of the Tatar language, sometimes turning to other Türkic languages, or to the ancient Turkic, but without survey of other Türkic languages. In many Türkic languages, except for Chuvash, all these words are almost identical and generally transparent.</p> <p><i>(The reverse translation from Turkic to Russian and back to English may deviate from the dictionary definitions, but should retain the semantic meaning of the words - Translator's Note)</i></p>			

A close study that would examine a polysemy of the words, the laws of the sound change, could find many more words in the Sioux language that are similar in the semantics and form with the Türkic words. For example, the word "basdi" in the Sioux language means "cut off", "to cut with a knife". In the modern Tatar language "basty" means "attacked", "plundered", "intruded with force", in the Karagas language "bais" means "wound", in the Sakha (*Yakut*) "bas" is "wound", in the Turkmen and Turkish "bas" also means "wound".

Sioux Dakoto language	Translation
Basku, baso, basipo	To cut off, a cut (of something)
Baskica	Cut by pressing
Baskita	Slaughter with knife
Baskin	Attacking with knife
etc.	

Even (*Russian*) people unfamiliar with Türkic languages would easily catch the etymology of this word, because of the Russian word "baskak" (*Turkic loanword meaning "tax collector". The semantics is analogous to the "cut" in the English expressions "my cut, your cut, 10% cut" - Translator's Note*).

A dictionary book by Ervin Gudde [16] on California toponymy has toponyms formed from the Sioux Indians language, but already in the "style" of folk etymology of the American English language (*Likely, mostly they were first adopted by Spanish-speaking settlers, and then assumed by English-speaking settlers through codification in various legal documents - Translator's Note*). So, on the coast of California one of the lagoons is called "Batequitos". According to the author of the work, this name comes from an American Indian word "bateqe tos" meaning "marshland", "low land". In the Tatar language "batynki" means "low, depressed", and "tesh" means "place". In the Tatar language the combination "batynky tesh" is quite active, and like the Sioux word it means "low lying, marshy land". The same work gives a word "bolinas" in English

spelling, from the American Indian "bolenas", which in form and sense is identical to the Tatar word "bolyn" - "lagoon", "meadow". One more example from that dictionary is the word "chiquita", which comes from the American Indian "chiketo", "chiko", which in the Sioux language means "very small, tiny", with the same meaning this word is in the Tatar language as "cheki" - "small". In the names of the California rivers, and in the USA as a whole frequently comes up the word "aha" (current, flow) - in the Tatar "aga" is "current, flow", and likewise frequently comes up the word "hu" - (water) "flows", which in Bashkir means "water" (*Common Türkic "su", with "h/s" alteration among Türkic phyla - Translator's Note*). One of the rivers is called "milk" - "milk", the name comes from a translation of an American Indian word "sue" meaning "milk". And really, because of calcite sediments, the water in the lower part of the river is light opaque, reminding milk. And the word "sue" is very close to the Tatar word "sut" meaning "milk". One lake has a name "yamul". In the opinion of Gudde this word was formed from an American Indian word "ha" = "hu" (water) and "mool" (much, abundance), and in the Türkic languages the word "mul" has a same meaning "abundance", i.e. "yamul" means "abundance of water" or "plenty of water", or just a "lake".

In Florida, next to the Sioux Indians live Timucha Indians, whose language John Swanton describes as "absolutely distinct from the languages of other Indians, including Sioux" [17].

A small article of that author about the kinship terms in the Timucha language lists relationship terms which in the form and sense are practically almost identical with the Türkic terms:

isa	mother
isanam	my mom
isaya	your mom
iti	father
itinam	my father
itaye	your father, his father
ule	a name given to a child by a woman
ulema	my child
inihi	married woman
qui	child (in Kazakh language "kui" means "child", "lamb")

Coming from the Türkic languages, understanding of these words practically does not present any difficulties. Even the suffixes of the composite words coincide with such suffixes in the Türkic languages. Close parallels of these words in almost the same form and with the same meaning also are found in the Sioux language. Possibly, John Swanton it is not correct when he says that Timucha language is not similar to any language of other Indians?

It is probably impossible to find a person studying American Indians who would not know an interesting work "Search of two worlds" by an American anthropologist T.Kreber [18], who describes the life among white people of a last mohican from the American Indian tribe Yana. In that work we were attracted by the name of the Indian, who on the question "who is he?" answered that he is "Ishi". T.Kreber says that this word means "Man". This is a usual answer when encountering representatives of totally different tribe, many peoples' names are coming from the type of his answer, for example, ethnonyms: "Doig" (*Doich/Deich?*), "Nivh", "Nenets", etc. The word "ishi" resembles very much the Sioux word "ichi" with a meaning "comrade". In the Tatar "man" also is "keshe", which has an extra "k" in comparison with "ichi". Can be that T.Kreber from "cichi" made "ichi",

missing "k"? (*Other Türkic languages also have a variety of versions: kishi, kiji, keshe, kisi, kihi, kizi, all with initial "k" - Translator's Note*).

Despite the many works about Sioux Indians, their language is nearly unstudied. This is also true about the languages of other American Indians. Because of that, most different opinions are floating about the relationships and classifications of the American Indian languages. Some Americanist linguists estimate a total of more than a thousand of American Indian languages, others name about five hundred languages and vernaculars. With of Indian languages classification the situation reaches a comic proportions. Because of obscurity of many Indian languages, some Americanists in their classification were relying not on the materials from the languages of these Indians, but on the similarity or distinction of their ceramics, types of clothing or dwellings, and even on weaving forms and use of hammocks, let alone the attempts to classify the languages by anthropological attributes: hair color, forms of the separate parts of the face, etc. Especially poor were the works on Central and South America Indian languages [19]. And because of the lack of uniform descriptive principles and systematization, the use of accumulated material for comparative studies and classifications is severely limited. As the Soviet Americanists noted, "the dictionaries of South American Indians, compiled by scientists of various nationalities, could provide a richest material for illustration of misunderstandings of all degrees and directions. Hardly worse are the attempts of cabinet scientists to reduce all the works to the inaccuracies in knowledge, and with such juggling construct a grammar of these languages. The authors of the grammatical books usually composed them following the norms of morphology and syntax of the West-European languages. That is done almost without regard to the special features inherent to the American Indian languages" [20]. Further, it is also truly noticed that "the various classifications offered by modern American linguists, viewed as language dictionaries, in effect differ little from those offered by Catholic missionaries and first attempts by the 19th century travelers in formulating the linguistic groups" [21]. Attempting to compare the Riggs and Williamson dictionaries, we encountered sharp divergences between them in the transcription of the words and in the phonetics. Even a two-volume substantial work by F.Boas [22] about classification of American Indian languages, used as an authoritative edition, is predominantly based on the classification by territorial and geographical factors, causing that obviously related languages appear in different language groups, for example, the classification of the Mayan languages, Southern Aztec groups, and Sioux-Hoka languages.

After we got acquainted with Otto Rochrig's work on Sioux-Dakota language, we immediately recalled the work of a known Soviet expert on the Maya Indians history and language, Yu.V.Knorozov "Ancient Maya Script System (Decoding experience)" [23], which subsequently developed into Yu.V.Knorozov monograph "Script of Maya Indians" [24].

In his first journal publication, Yu.V.Knorozov gives a reading of about 300 words of Mayan script, which struck us with many similar, and even identical with the Türkic lexicon words in both the form, and in contents. On revisiting again these works, we found about 50 such words, which can be easily understood knowing any of the Türkic languages, without bothering in search for equivalents with the maze of the Türkic archaisms.

Here are some examples from the Yu.V.Knorozov decipherings and their parallels in the Türkic languages:

Mayan language		Türkic languages	
Yash [1]	New, green	Yash, yashel	Young
K'un	Sun [2]	Ken	Day [3]

Ich	Inside	Ech	Stomach, guts
Osh	Three	Och [4]	Three
Kuch	Burden	Kech [5]	Force
K'ull	Raise arm	Kul [6]	Hand
Chab, chabkuna	Fell a tree	Chap, chabu [7]	Chop
Ch'akaan	Felled (tree)	Chapkan	Cut down (tree)
Chukul	Fell a tree	Chuku	To chisel
Ah-chy	Hunter	Auchy [8]	Hunter
[1] other sources note also a meaning "green" [2] other sources note also a meaning "day" [3] In Kazakh language also "sun" [4] Tuva, Kazakh - "ush" [5] Tuva "kuchu", Sakha ( <i>Yakut</i> ) "kuus" [6] Tuva "hol", Kazakh "kol" [7] Kazakh "shabu" [8] Tuva "Ahchy"			

At first encounter with Yu.V.Knorozov work, such close parallels appeared improbable to me, I saw that as a random coincidence.

But when I became familiar with the Otto Rochrig's work, the work of Knorozov immediately came to my mind, reviewed it again, this time from a different angle. And that prompted me to search of an answer to the question raised in the Otto Rochrig hypothesis about genetical relationship of Sioux language, and some other American Indian languages, with the Türkic languages.

At first I reviewed the works in Russian about the culture and history of the Maya and other Indians in Central and South America [25].

I became familiar with almost all publications of the USSR Academy of Sciences Mikluho-Maklai Ethnography Institute about American Indians, and also with the numerous journal publications, and fiction literature about the Mayan life, Incas, Aztecs, with the travel descriptions to the Indians published in Russian.

These books lead me through the once blossoming cities of Maya, Aztecs, and Incas, acquainted me with the greatest monuments of architecture, noisy sports and ritual celebrations, monumental cult buildings; with these books I traveled with archeologists searching and excavating in jungles cities, forgotten and ruined by time and elements, I saw their sacred senots (*atriums ?*) and religious rituals, richest gold ornaments, I was horrified by the atrocity and perfidy of Costera and Pissaro adventurist gangs, I saw the ashes of the Maya books burnt by the Catholic missionaries, execution of people who held on to them, I saw the great past of Maya and other Indians, and their deprived position under the bloody hands of the conquistadors.

The conquistadors and Catholic church did everything possible to eradicate from the memory of American peoples their history and culture, they plundered not only the material wealth, but also the souls of the people, they istalled their customs and traditions... I have been struck that the Maya, Aztecs, and Incas, without a knowledge of the mankind great discoveries that accelerated progress, like an iron, a potter's wheel, and a wheel, have left monuments of their culture, huge pyramids compatible to Egyptian... From the ashes of the Catholic church fires and conquistadors survived



"Chilam balam" and "Popo-I-Vuh", the monuments of Indian literature and history, in the translations of which, like from other works about Indians, I tried to spot American Indian words interspersed there [26].

I learned, for example, that in the Maya, like in the modern Tatar language, a frog is called "baca" (*Spanish, Italian, Latin "rana" - Translator's Note*), and this word is widely used in forming the names of the lakes and reservoirs, for example, in Quintana Roo district of Yucatan peninsula [27] (*Vaca lake = Cow Lake ?*). There is there even gulf "Bakalar" - i.e. "frogs" - a frogs' gulf. A word "bacalar" is perfectly identical to the Tatar word "bakalar", where "baka" is a frog, and "lar" - is a plural suffix, exactly like in the Mayan language the "lar" is a plural suffix. And in the toponymy of the Tatar ASSR (*administrative appellative in former USSR - Translator's Note*), in the Middle Volga region are plenty of lake and cove names formed with the word "baka", like in "Bakaltai" (*"Frogs' Mountain"*), etc.

Tens of the words, very close and frequently totally phonetically and semantically identical to the words of the Türkic languages were spotted in the works on the history and culture of Maya Indians:

Mayan language		Türkic languages	
Kosh	Kind of bird	Kosh	Bird
Imish yashche	Green fruit tree	Jimesh	Fruits
		Yemesh	Green, unripe
		Yashel jimesh	Fruit
Ichin	Well	Echu	To drink
Yash k'in	New sun	Yash ken	New day, new sun
Aak	White, light	Ak	White, light
Ik	Two	Ike	Two
Mol, mool	Plenty, harvest	Mul	Abundance, plenty
Muluk	Rich year	Mullyk	Abundance
Pa, Pao	Water	Su, hu	Water
Ku	Spirit	Kot	Spirit, soul
Chachak	Very beautiful	Chechek	Flowers, very beautiful
Tsik	Fencing, tract	Chik	Fencing, tract
Chul	Water	Chul	Water (Tuva)
Bin	I	Min	I
Ichil	Inside	Ech	Stomach, guts
Imi	Female breast	Imi	Female breast
Chalan	Snake	Elan (Jylan)	Snake
Vat	To break	Vat, vatu	To break
Ooch	Food	Ash	Food
Ba	Fish	Balyk	Fish
Akan	Uncle	Aga	Maternal uncle, respected man
Sots	Flying	Sots	Bat [1]

	something		
Shagan	Kind of tree	Chagan	Kind of tree
Al	Son, child	Ul	Son
etc.			
[1] Mishar dialect of the Tatar language			

It should be noted right away that the Mayan words cited from those works are written in Russian transcription (*re-transcribed to English*), which does not always match the phonetics of these words in the Mayan language, visible for example from the comparison of the same words in the Knorozov transcription and in the Russian translations of Landa de Diego work. The discrepant spelling replaced "ch" with "ts", "u" with "o", "a" with "o", "ch" with "sh", "i" with "e" and vice-versa, omitted some consonants, and even omitted vowels. For example, we shall cite different transcriptions of the Mayan word "snake" as "Tsilan", "Chalan", "Tsalan" "Chilan", etc.

Many toponyms of Yucatan peninsula strongly resemble Türkic words, like "Kotoch", "Tsilan", "Tulum", "Yashil", "Ichmul", "Tas", "Tapich" - "Tepich", "Kachi", "Shaman-sama", "Chigen", "Sayil", etc.

Many examples from Mayan language mentioned in these non-linguistic and non-philological works are given in explanatory fashion, their examination should be mindful of that. So, the "kosh" (bird) is noted as a kind of a bird, while in the Tatar the "kosh" means a bird in general. These works did not record exactly what kind of a bird was meant. This explanatory character of the "translations" of the Mayan words complicates the search for parallels (equivalent words) in the Türkic languages. So, the American Indian word "yashchilan" is explained as a "location". And from this compound word which consists of the Mayan "yash" (young, green) and "chilan" (snake), is clear that it means "green snake" or "young snake" and it is a name of that location, not the term "location", etc.

In addition, because of incompatibility of many phonemes in different languages, the transmission of the words from one language in a script of another language always contains a danger of phonetic distortion,. Moreover, words of one language are frequently transmitted in another language in a deformed fashion, so that even experts usually have difficulties in catching their original meaning. Researchers noted that the transmission of Mayan words in Spanish-lingual sources, and in other-lingual sources, are rendered by different graphemes and different phonemes. The same words differ at different authors, who may even write in the same language; moreover, frequently the words are recorded with "incomplete" sonority. Even locations, which would seem to already be phonetically more "universal", even in Russian different authors give differently: "Itsmul" - "Ichmul", "Chichan - Tsichan ", "Kotuch" - "Kotoch".

In this respect is enlightening a review of the toponymy, formed from the Türkic words, in Russian, to observe how they differ from the initial names. So, from "sary tau" (Yellow mountain) came "Saratov", from "Sary su" (Yellow water) came "Tsaritsyn" (*lit. "tzar's city"*), from "Kumer" (coal) came "Kemerovo", from "Temen" (ten thousand) was formed "Temnikovo", "Tyumen", etc., a non-specialist would hardly establish the initial sound of these words or their etymology.

Comparing the Mayan words with the words of Sioux language, we find that they have words identical in sound and in sense, like "aak" (white), "ik" (two), "hao" (water), "bin" (I), "ich" (stomach), "imi" (female breast), "akan" (uncle), and others. In addition, both these languages are agglutinative, and their euphony is synharmonic, but somehow these languages are assigned to different groups of the American Indian languages

*(Uralic and Altaic languages are agglutinative and synharmonic. In Russian philology, synharmonism serves as one of the main criteria in attributing words and languages to the Türkic (Altaic) group, especially so in etymological studies of the loanwords in Russian - Translator's Note).*

Could these similarities have been spotted by the American Indologist philologists *(here and on: Indologist = Native American Indologist, vs. Indian Indologist - Translator's Note)* ? Can it be that our observation flagged out solely chance concurrences? It turned out that this similarity was already asserted, and an opinion was expressed that the language of Maya Indians originates from the language of Sioux-Hoka Indians, that Maya ancestors earlier lived in America *(modern USA)*, and were a part of Sioux-Hoka, and then they moved to the south, to the Central America [28]. Encyclopedia also noted that Aztec Indians come from the Sioux-Hoka family of languages [29]. Since the author does not illustrate lineage with linguistic examples, we shall cite our own examples which exhort this position. Our task was facilitated by a fact that the Mayan language was investigated better than others. A number of dictionaries and grammar books exist for this language [30]. But among them not a single work attempted a comparative study of the Mayan language with the languages of other Indians. Following that trail resulted in a stumbling on a work of different character, which became a godsend for us.

### **Stig Wikander (1908-1983)**

Fairly recently, in the 1967, a Swedish magazine "Ethnos" published an article of an Orientalist from the Upsala University Stig Wikander entitled "Is there Maya group of the language related to the Altaic Family?", with a continuation published in 1970 and 1971 [31]. In Sweden, the Orientalistics is quite advanced, including studies of languages, culture, and history of Africa and Oceania peoples. The Upsala University, or rather its library, accumulated a rich collection of eastern manuscripts in Türkic, Arabic, and Persian languages [32]. S. Wikander is a wide profile Orientalist, he authored a number of works on eastern languages, including the Türkic languages. To study the live eastern languages, he visited eastern countries, including Turkey. In the above article about the connections of the Mayan language with the Altaic languages he writes: *"The first time when I heard the talk of Maya Indians, I was stunned with similarity of their language with the Turkish, with similarity of their intonation which just before that I heard in Istanbul. Such an impression certainly could be deceptive. When I started studying the Mayan language, the texts in their language, I immediately encountered a mass of words which looked precisely as Turkish"* [33].

Because Stig Wikander extensive article was published in a specialized magazine for a narrow circle of readers, and is not represented in our libraries, I think it is necessary to stop on it in detail. His observations and conclusions are directly related with the theme of this article. Stig Wikander writes about a presence in the Mayan language not only of *"plethora of obviously identical words"* with Turkish, but also about the identity or similarity of the grammatical system of these languages. In his cycle of articles he first gives a comparative study of lexicon for these languages, promising to address the grammar in coming works.

He writes that most widespread in Central and South America bird is called "tucan", which matches the Turkish "dogan" *(actually, the Turkish "ğ" is silent, the word is pronounced "do'an", but in other Türkic languages "g" is pronounced - Translator's Note)*, the ancient Türkic "togan" with a meaning "falcon" both in the Mayan and in the Türkic languages. In the pre-Spanish America a largest animal in the Mayan language was called "tzimin", which according to Wikander, has a common origin with the Türkic "deve", "taba" in the sense "camel", and for Maya "northern deer" *(northern deer in meso-America or SE USA? - Translator's Note)*. In the Mayan language "kasnak" (belt),

as asserts Wikander, matches the Türkic "kahnak" with the same meaning. In Tatar (*and in Russian - Translator's Note*) "kushak" means the same. If Knorozov the Maya word "green" - "young" reads as "yash", Wikander reads it as "uah" (yah) and identifies it with a Kuman (*Cuman, Couman*) word "yash", with the Türkic "yesyl". Among the Wikander examples are words which we also saw in the Sioux Indian language:

Mayan and Sioux Indian language	
im	to suck
imi	nipple, female breast
chu	milk (Rochrig, "seu")
chupar	suckling (In Tatar - "chuper", "chumer" - to suck, suck noisily)

Wikander notes that adverb forms in the Mayan and Türkic languages are identical, also identical is the word formation. The Maya words "alan", "yalan" correspond to the Türkic "al", "alt", "alchok" (under, in front); "ichi", "ichil" in Türkic are "ich", "ichre" (inside); "toe" in Türkic is "tagi", "tagur" ("yes", "until then, as"). Further, the author stops on the phonetics of the Mayan and Türkic languages, discusses similarity and differences; the differences, in the opinion of Wikander, arose from the transition of some sounds to others, Wikander points out that "L" in the Mayan language changes to "R" in Türkic languages, the glottal "k" in Türkic languages is frequently replaced with velar "r" in Türkic languages. Talking about systemic changes, Wikander also illustrates his statements with examples:

Mayan language		Türkic languages	
Bicil	Intestines, guts	Bagirsak	Intestines, guts
Bul	Foam	Buram	Foam, whirlpool
Bul	To tear	Burmak	To weave, twist
Bolan	Large mass	Bol	Plentiful
Chopol	Perverted	Capur	Speckled
Yoklel	Smouldering coals	Yak	To burn
Chek	To cover	Cek	To move
Chik	To appear	Cik	To appear, leave
Tic	To plant	Dik	To stick, plant
Tur	To stop	Dur	To stop
Tuy	Hair lock	Duy	Hair

If Wikander had also turn to the Volga region's Türkic languages, he would find closer examples for these words both in phonetics and in the sense. For example, in the Tatar language "tic" is pronounced not as "dik", but as "tyk" (to stick), exactly like in the Mayan language; "tur" (to stop, stand) is pronounced not as "dur", but as "tor", like in the Mayan language.

The scientist further notes that in the Mayan language initial "p" is widely used, which in his opinion is an unusual event or absent in Türkic languages. This Wikander's statement does not reflect all Türkic languages. In some Türkic languages, for example, in Azeri, Turkmen, Uzbek, and in some dialects of the Tatar language "p" is frequently used in the beginning of the words. (*Starostin data base for 13 Türkic languages and 1820 words contains the following frequencies for initial "p": Turkmen, Cuvash, Gagauz, Turkish, Azeri, Karachai Kumyk, Tatar, Kazakh, South Alaic, Uzbek, Uygur, Tuvinian, Yakut, Khakassian, Kirgiz ~ respectively 0.60%, 5.27%, 0.55%, 0.22%, 0.22%, 0.71%, 0.22%, 2.75%, 0.71%, 0.33%, 0.05%, 5.93%, 0.11%. Thus, only Cuvash and*

*Khakassian demonstrate a higher palatalisation, with Kazakh being a runner-up. Wikander's comment is correct in respect to Azeri, Turkmen, Uzbek, and Tatar. - Translator's Note).*

Without dwelling on the author's other observations in phonetic comparisons between the Mayan with Türkic languages, the following are some more examples from lexical comparison:

Mayan language		Türkic languages	
Acan	To shout, a shout	Agit, agla	To shout, a shout
		Akyru	To holler, to shout
Aak	Current, to flow	Ak	Current, to flow
		Agym	Current
Bet	To stop	Bit	To stop
		Bet, beteru	To finish
Bagir	Breast	Bagir	Breast
		Beger	Breast
BikFit	Little boy	Eget	Guy
Bllim	Sign, knowledge, seal	Belem	Knowledge
Bin	To rise, (you) rise	Men	To rise, (you) rise
Box	Naked	Bos	Empty
Ceh	Deer	Kiylk	Deer
Chem	Boat	Gemi, kami, keime	Boat
Cuch	Load, Burden	Guc, kech	Force
Kat	To change	Kat, katu	To mix
Kil	To come	Kil, kilu	To come
Oc	Pes	Okce	Heel
Poloc	Stout, well-fed, large	Ulug	Large, great
Poy	Toy	Oupa, uiyn	Game, play
Pudz	To disappear	Uc	To depart
Q'anil	Blood	K'an	Blood
Ti	To bite	Tish, dish,	Tooth
Toqmaq	Beater	Tukmak	Beater
Tzucul	Dwelling	Chokyr	Pit, den
U	Moon	Ay	Moon
Uayoh	To doze	Uyu, oyu	To doze
Wach	To untie	Ach	Open
Yaklel	To flare, burn	Yak, yagu	To burn
Yom	To connect	Yum, yom	To connect
Chal	Cliff	Chal	Embankment, slope
Tas	To bring	Tasy, tashu	To drag

Baldiz	Wife's younger sister	Baldyz	Wife's younger sister
Bats	Monkey	Bicin	Monkey
Bil	To know	Belgu, belu	To know
		Bilge	Sign
Boya	Paint, picture	Buyu	A paint, to paint
Ciioł	To enjoy	Gull, kelu	To laugh
Ch'i	Edge, coast	Chik	Edge, border
Ike	Two	Ike	Two
Its, itz	Plant juice	Ic, echu	To drink
Pulut	To smoke, smoke	Bulut, bolyt	Cloud
Sat	To spend	Sat, satu	To sell

The words shown *(in the original article)* in Russian alphabet are taken from the Tatar language . Wikander gives variations of these words in the Mayan language, but the Tatar parallels are closer. The Türkic variations are shown in Russian letters from lexicon of the Tatar language *(In this posting all Cyrillics is Latinized - Translator's Note)*.

In his comparison, S.Wikander gives about two hundred similar words between these languages *(Assuming a root dictionary of 2,000 words, that list covers about 10% of the Mayan lexicon - Translator's Note)*. For a number of Mayan words he finds parallels in the Tungus languages, some parallels are from the Japanese and Korean languages *(Also belonging to the Tungus group - Translator's Note)*. But the overwhelming majority of parallels comes from the Türkic languages. After analyzing lexicon and phonetics, the scientist comes to a conclusion about impossibility to explain these similarities with only diffusional influence of one language on another, because no such contacts existed in the known past, the American Indians did not (closely) contact with Europe before the discovery of the New World. The final conclusion of Stig Wikander is that the Mayan languages and the Altai languages both in phonetical and in lexical relation have much in common, which testifies to their genetically common origin in the past.

Wikander in his work also gives examples from Kechua *(spelled Quechua in Spanish alphabet - Translator's Note)*, similar or identical with the words of the Türkic languages. The Mayan language is included into the Maya-Kiche group of languages, which in turn is related to the Southern Aztec family of languages. The ancestors of the Maya, Aztecs, and Incas approximately in the 5th millennium BC started to move from the Northern America, from the California area, started settling the Central America, and also spread in different areas of the South America.

Now, the overwhelming majority of Central and South America Indians speak Kechua *(Quechua)* language, a common for them language, which by its origin is connected in the past with the languages of Sioux-Hoka group. The Kechua language was a prevailing language in the Inca empire, the nearest neighbors of Maya, they are related to Maya. During the growth of the Inca empire, which was fast developing before the arrival of the conquistadors, this language gained a wide circulation, which caused a leveling of languages of other annexed linguistically related American Indian tribes. This process was broken with the arrival of the Spanish conquerors. The Kechua language, related to the languages of the Maya-Kiche group, undergone a number of changes, and continues to function now. Today the Kechua language, with some variations, is used in Peru, Ecuador, Bolivia, and partly in some areas of Argentina and Chile, and in some them it is a second state language alongside with Spanish [34].



Wikander in his work gives words of the Kechua language that are close to the Türkic words:

Kechua language		Türkic languages	
Bulan	To rotate, twirl, whirlpool	buram	(I) twirl, rotate
Col, gol	To save	Kurtar	To save
Ogri	Thief, larceny	Ogri	Thief
Por	To burn down	Ort	To burn down
Poy	Game, toy	Oy	Game, toy
Pus	Flowing water	Us	Poring out
Puz	Slaughter a sacrifice	Uz, oz	To cut off
Tok	To break, to strike	Toqu	To strike
Tsar, tzap	To catch	Cap	To plunder
etc.			

### Benigno Ferrario (1887-1956 ??)

Universidad de la República, Montevideo

Membres de la Société des Américanistes (Mai 1927)

Asociación de Investigadores en la Lengua Quechua Membres de la Société des Africanistes (10 janvier 1931)

Ferrario, Benigno. La protohistoria a la luz de la glotología — Tucumán : Instituto de Antropología, 1911

Diccionario etnolingüístico y guía bibliográfica

We uncovered one more work which asserted that Wikander was not a first scientists who noticed similarities between Kechua (*Quechua*) and Türkic languages. On the 19th International congress of Orientalists held in 1935 in Rome, one B.Ferrario delivered a report on possible relationship of the Kechua with Türkic and Altai languages. [35]

B.Ferrario was a professor from Uruguay, we do not have any other information about him (*Unfortunately, even today there is a void of information about philologist B.Ferrario. The scraps shown above was all that I managed to find - Translator's Note*). To support his hypothesis he examines morphological forms of these languages, types of word-formation suffixes, conjugation of verbs, and also partially cites lexical examples. From all that we list here his lexical examples, leaving out for now his other observations about grammatical categories:

Kechua language		Türkic languages	
Ipa	Father's sister	Apa	Senior sister
Ucuk	Tiny	Kucuk	Tiny
Acikya	To explain	Acıq	Open, clear
Kok	Sky, firmament	Kok	Sky, sky color
Wage	Father's uncle	Aga	Uncle, respected man
Tata, tayta	Father	Ada, ata, dada	Father
Misi	Cat	Misik	Cat
Sunqa	Beard	Sukal	Hair

Cubca	Hair lock	Tuk (chech)	Hair lock
Na	Thing, something	Ne	Thing, something
As	Small, few	Az	Little, few
Ari	Thin	Arig, ariq	Thin, lean
Qo	Expell, drive	Qo, qomak	Expell, drive
Kaca	To transfer to another place	Kec, gec	Move over, change seats
etc.			

B.Ferrario's report is also interesting that he notes a presence in Uruguay of the American Indian tribes speaking a language close to Kechua.

### Georges Dumezil (1898 - 1986)

Kechua language drew attention of the French Orientalist, our contemporary George Dumezil, who authored two articles on comparative study of that language with the Türkic languages [36].

G.Dumezil examined similarity between these languages in the field of numerals. Analyzing alternation of vowels and consonants in these languages, he showed a genetic relationship of the name for the numerals in these languages for numbers from one to six. Then the author turned his attention to the similarity and affinity of these languages in the morphological categories and in lexical examples. Among his examples we see the words which we have already encountered in the Mayan and Sioux languages. Here are examples from the G.Dumezil's work:

Kechua language		Türkic languages	
Saqla	Beard	Sacal	Beard
Cani	Price	San	Number
Thugu	To spit, to pour	Tukur, tugu	To spit, to pour
Tuqu	To strike, to whip	Tik, tuqu	To prick, to stick
Pak, paku	To look	Bak, bagu	To look
Tawqa	Heap	Tag, taw	Mountain
Qhacun	Daughter- in-law	Katun, katin	Married woman
Qarwin	Gullet	Karin	Stomach
Cunqa	Last	Son	Last, last10th finger of hands
etc.			

Apparently, the works described above represent a total scholarship in research on comparative study of the American Indian languages with the Türkic languages. How come that other linguists, who studied Indian languages, did not notice these facts? The question is quite reasonable. The answer, apparently, can be only one: among other linguists were no the scientists familiar with the Türkic languages. Any Türkologist, appearing among Maya, Inca and Sioux Indians, could not fail to notice the similarity of their speech with the Türkic languages, that happened with O.Rochrig and S.Wikander. The fact that the works of these authors remain outside of attention span of the

American Ideology philologists can be explained by the same reason. Otherwise, whether the authors are right or wrong, their works would not remain unnoticed by the American philologists. *(An interesting fact about one word from the G.Dumezil's list, the word "katun", also spelled and articulated "khatun", "khotun", "khotan", and the like. "Katun" was a title for a spouse of Khan or Kagan, and so was named her enclave or estate. Eastern Europe is full of topology that carries that name, indicating the location of the Quinn estate in the Late Antique times, when the Alans, Huns, Avars and Bulgars controlled these territories - see Wikipedia. The status of the Katun was of the same level as of the supreme Kagan. Moreover, in the gynocratic Türkic societies the title to the country's land belonged to the Katun clan; the Kagan ruler was an elective position akin to CEO in modern world; like a CEO, theoretically he could be dismissed from the position, and in usual practice he was simultaneously dispatched to the other world. A Kagan could have a number of wives and concubines, but only one Katun. In times of trouble, or when princes were underage, the Katun clan could take over the rule of the country, producing such famous names as Massagetan Tomaris, Alanian Boarix, and Kharka (Kreka in Priscus), a wife of Attila - Translator's Note).*

### **John Josselyn (active 1638-1672)**

It turned out that even prior to O.Rochrig, one man noticed that the language of Northern America Indians resembles Türkic languages. It was J.Josselyn, an Englishman who in 1638 with his brother came to New England, where he lived for tens of years, mostly among Indians. From his notes we know that he went with them to hunt mustangs, was singing and dancing at their celebrations, knew closely their customs, he kept a diary for many years, writing down his observations, and after return to England from these observation he wrote a book, which in 1672 was published in London with a title "Rarities of New England" [37] *(There were no wild mustangs in the N.America, let alone New England, prior to Pueblo Revolt against Spanish colonizers in 1680, unless historians do not know something they definitely should. And after 1680, J.Josselyn would have to travel across half of the continent to hunt them. Something does not fit - Translator's Note).* J.Josselyn writes, that "American Indians (the subject is a Sioux-Hoka Indian tribe) in appearance, manners, and customs resemble "Tatars" who speak Turkish language". As we see, the author does not confuse the "Tatars" in general with all eastern peoples, which at the time was particularly peculiar to Europe. He further writes that the language of Indians has numerous words very similar to the "Tatar" words, and he notes that intonation of their speech is Turkish. Unfortunately, J.Josselyn does not support these observation with examples of language.

This book is interesting not only because for the first time it states a similarity of Indian languages with the Türkic languages, but also in another relation. The book reproduced a picture [38] of a totem sign of one American Indian tribe. When I saw that illustration, I was frightfully surprised, and suspected a mystification! I could not trust my eyes! Really, I had a reason to be surprised: in front of me was a picture of a dragon - almost a copy of the arms of Kazan [39].

This emblem, practically identical with the arms of the city of Kazan, is depicted on the coins of the *(Middle Age)* Itil/Volga Bulgars, as a symbol it was also known among other Türkic peoples, and also in antiquity, including among the peoples of Central Asia *(First mentioned by Arrian among the Scythians, it was brought by the Huns to the Western Europe not later then the 4th century AD, adopted by their German subjects, and as a Late Antique military emblem reached England, Scandinavia, and France, see Draco Standard. The Romans could have gotten it with their Scythian mercenaries. But Sioux-Hoka? Like the mustang story, the rest of the Türkic spice could be D.Defoe-type book-selling exotic tales about exotic places - Translator's Note).*

Two more works are also known to discuss the astonishing similarity of the languages of the American Indians, including the Mayan language, with the Türkic languages. One of them belongs to John Macintosh, who in the work published in Washington in 1853 discusses the origin of Northern America Indians and puts forward a genetic relationship of Sioux-Hoka Indian language with the Türkic languages [40]

As we can see, the question of similarity of some American Indian languages with languages of peoples of Asia, first of all, with the Türkic languages, already examined a number of scientists. Some observations about the similarity of some Indian languages with the languages of Asia and Europe are also noted in the works of a Soviet scientist N.F.Yakovlev, he states the presence of the most ancient connections between the languages of Caucasus, Asia and America [44], he sees "*identical or similar features*" between these languages. He explains this phenomenon by "*the most ancient migratory and cultural connections that linked two continents during a particular epoch*". The author, first of all, addresses phonetical and morphological similarities, but unfortunately almost does not cite examples in support of his hypothesis. Among his rare lexical examples we noted two words: "ket" ("kit" - leave, go there) and "kel" ("kil" - go, come here) which are completely identical in the form and phonetics in the Kechua language, and in the Türkic languages.

I have familiarized with dictionaries of many South America American Indian languages, have read a number of travel descriptions to various American Indian tribes, diaries and memoirs of white people who were living among them [45]; in that literature I found many words close in form and sense to the Türkic languages words, they are not cited here in order not to overload this discourse with new examples.

It is believed now that American Indians also settled many islands in the Pacific ocean. As noted Spanish monks who accompanied conquistadors, the Indians were brave seafarers, on great rafts carrying hundreds of people they sailed in the Pacific ocean, far from the coasts of the America.

A traveler of our days, an outstanding scientist, anthropologist and archeologist Thor Heyerdahl confirmed it by sailing on "Kon-tiki" raft. On the Easter island he found, for example, "speaking" plates "rongo-rongo" that are graphically resembling the Mayan ancient writings destroyed by the Spanish inquisitors, of which in the European libraries have the only three surviving exemplars. T.Heyerdahl's and other's attempts to read these "rongo-rongo" were till now unsuccessful. And in reading the ancient Mayan writings, despite of the success made by our scientist Yu.Knorozov, not all questions are solved yet. As noted V.Vahta, a main reason for that is that "nobody in South American archeology and ethnography undertook a serious search for a linguistic key to the rongo-rongo contents yet" [46].

Thor Heyerdahl and other scientists report a presence of a significant layer of American Indian words in the languages of the many tribes occupying Pacific ocean islands. It gives reasons to think that the settlers on these islands were Maya, Aztec, and Inka Indians from the continental Americas, among others. In that light can be attempted etymological understanding of the "Kon-Tiki", the name of the basalt log raft in the Thor Heyerdahl book, borrowed from an Inca legend. As notes Thor Heyerdahl, "Kon" in Inca language means "Sun". As was already seen above, in the Mayan language "K'in" also means "sun", "day". And "Tik" means "God", "Leader". Inca language has a word *teki* in sense "leader, heading, going in the head", from which comes the word "tiki". In the Türkic languages the word "teke" means simultaneously a ram-producer, and a leader of the sheep herd (*and "kun" also means "day" and "sun", see above - Translator's Note*).

I.K.Fedorov also finds a certain similarity between Kechua and Polynesian languages, including with [Aymara](#) language [47]. It seems that finding a language key to the rongo-rongo inscriptions is about to happen, and the solution is already knocking at the door.

This is a brief status review for the comparative studies on American Indian and Altai and Türkic languages. Also should be noted a work of a Polish scientist T.Milevsky, who from the typological study of phonetics, asserts a presence of similarity between the Asian languages and languages of American Indians [48].

Scientists have an opinion about settling of America from Asia. Specifically, settling through the territories of Chukotka and Aleutian islands. We would like to support this opinion only partially, because of a number of factors pointing to the settling of America via the Pacific ocean. This question needs a separate consideration. Nevertheless, it should be noted that this hypothesis is supported by linguistic material. Some scientists find in the languages of some American Indians traces of the Chinese, Japanese and Korean languages [49].

The idea about possibility of such contacts is supported by archeological finds in Central America of objects of Japanese origin.

The works devoted to the study of the Japanese, Chinese, and Korean linguistic traces in the languages of American Indians are few, and they have fewer lexical examples of these languages among the Indian languages. Notably, they do not assert a morphological or phonetic similarity typical for these languages. The works of O.Rochrig, S.Wikander, and B.Ferrario list about forty words from the Japanese, Chinese, and Korean languages found in Indian languages.

To understand the enormous difficulties which the scientists face in the comparative studies of American Indian languages with the Altai languages, we will digress into the history of settling America. In the opinion of the majority of scientists, the settling of America from Asia occurred 20-30 thousand years ago (*Genetical timing is split between 2 of 3 waves, with estimated age of the earliest migration coming from Altai between 10,100 and 17,200 YBP by coastal paths, second wave coming from SE Siberia (Tungus area) between 7,000 and 9,500 YBP by northern paths, and the last Na-Dene wave estimated at 5,000 YBP by ice or land bridge - Translator's Note*). Some scientists move that date even to 50-100 thousand years. It is believed that the settling of America occurred in glacial ages, namely, in the last glacial age (*LGM = 20,000 YBP - Translator's Note*), when a significant amount of ocean waters became glaciers on the poles, and that opened an overland road from Asia to America. Though the theory of settling America through the Chukchi bridge and/or Aleutian islands is generally recognized by many historians, it also has some weak points, which caused a series of new hypotheses.

There is a theory about settling America from Europe, another theory from Africa, theories that it was populated by Phoenicians, Assyrians, Trojans, Romans, Etruscans, Greeks, Jews, Hindus and others, that these migrations came through Atlantida, which supposedly at that time was in the place of the Atlantic ocean... To confirm these theories, their authors cite examples of the presence in America of grandiose monuments supposedly built on examples of the Egyptian pyramids, etc. In some American Indian languages are being found Bask words, the Bask people now live in Spain, they were famous seafarers, some of them sailing in the ocean could certainly at some time land in America. When in deep American boonies was found a Jewish settlement, it started assertions that Maya and Kechua Indian culture was created by them. But investigation have shown that they moved to America after its discovery, to escape prosecutions in Europe.

Was advanced a hypothesis about existence in the Pacific ocean of its Atlantida, between Asia and America, it was named Mo. Supposedly, it was a bridge between Asia and America. There was even a theory that a grandson of Chingiz-khan Kublai-khan (aka Hublai-khan, 1216-1294) with a huge army on 800 vessels set out for a conquest of Japan, but in a storm lost his way, and Kurosiwo current brought them to America, and there they supposedly created huge buildings.

That on the coasts of the western America were found ceramic objects of Japanese origin, that in Indian languages are elements of the Japanese, Chinese, Korean, and Bask languages - all that can be understood. And anthropologically the Indians do not constitute a uniform race. There are American Indian tribes of dwarfish statue, reminding pygmies of Africa; in the southern extremity of Latin America lived tall, stately Patagonians. Among the Indians are plenty of Mongoloids, but also are Caucasoids, and are tribes in anthropological relation between these two races [50].

As we can see, the various hypotheses about the settling of America have certain reasons, facts which can't be explained by a theory that holds the settling the continent only through Chukotka, through Aleutian islands, only from Asia. The Indian mythology corroborates that. Central America Indians have a legend that in the past white people were their leaders and brought them to Yucatan, they departed back into the ocean, promising to return. Shortly before the landing of the Spaniards in Yucatan, a leader of the Maya Indians dreamt (and dreams had a prophetic meaning for them) that their white leaders would soon return. And when the Spanish adventurer Cortes with a handful of bandits set ashore, the Indians met them as their leaders, with great honors, which Cortes with a handful of gangsters used, and they succeeded in subduing and plundering a numerous people.

It is believed now that among Maya and Aztec Indians were white-skinned people. When anthropologists examined the blood group of the Indians, they found that Indians do not have people with blood group "A". But a serological examination of the leaders' remains has shown that they had blood group "A", which is typical for the ([European](#)) peoples of the Old World.

That summarizes facts that stimulated new and new hypotheses about settling America in extreme antiquity. There are more. Among them we shall point to the Thor Heyerdahl travel on reed boats "Ra 1" and "Ra 2" from the African coast to the Central America. By his deed the Norwegian scientist demonstrated a possibility of settling of America from Africa. He found a number of similarities in the technique of building cane boats in the reservoirs of Peru, Mexico, and Chile in America, and in Niger, Chile, and Chad in Africa. To "weave" boats from reeds, Kechua Indians from the area of lake Titicacas were invited to Egypt. That allowed him to posit that the road to America was known to the peoples of Africa, Asia, Europe. The road was also known to the peoples of Scandinavia [51]. New facts [52] established the existence in the remote past of Africa and Europe contacts with America in the pre-Columbus period.

In light of the new facts, it is already impossible to assert that the settling of America went only through Chukotka, Bering strait, and through Aleutian islands; to assert that the settlers did not come to America from Asia by the sea route, and also from Europe, and from Africa, and through Oceania. A possibility of penetrating America from Asia through Oceania can be also asserted because of the geological changes of the landmass during the historical period, when America could be reached by coastal navigation through Oceania [53], as were populated the islands of Oceania, Australia, and New Zealand.

Returning again to the subject of language, the Indo-European linguists have an opinion that even a regular and peaceful life, not subjected to calamities or natural



cataclysms causing major changes, in the conditions when peoples live almost without contacts with other peoples, the lexicon loses about 15% of its words per century and replaces them with new words. Supposedly, in two thousand years no initial words practically remain, or they change beyond recognition. And then, if the settling of America by its native inhabitants took place even around 10 thousand years ago, two millennia later the Indian languages should not retain any words brought by them from the Old World. The ancestors of Indians, who have left the Old World tens of thousands years ago lived isolated from Asia, Europe, and Africa, save for accidental infiltration of strangers from those continents in the next decades, which could not result in the change of the typology of Indian languages or a replacement of their language. It can be asserted that the language of American Indians was developing in its native, absolutely different in comparison with the Old World environment, under influence of different natural, climatic, and geographical conditions, and they did not know many social forms of development experienced by the peoples of the Old World.

All these many millennia, the carriers of the Altai, Türkic, and Indo-European languages lived in different environment, had a different from Indians way of life, were in a tight contact with the peoples of the large regions in Europe, Africa, and Asia. That could not fail to lead to huge changes not only in their lexicon, but also to the change in phonetics and grammar. Before discovery of America, and as much after its discovery, contacts between American Indian languages and Türkic could not occur. Realizing that, even a presence of 5-6 words in the Indian languages that are close or identical with the Türkic words should seem to be as surprising as a thunder on a clear day. As we already saw, hundreds of such words exist, besides that a lot of identical traits are in phonetics and grammar. The accent system is also identical, in the American Indian languages and in Türkic the accent falls on the last syllable, like in French.

Certainly, in unrelated languages can be found words pronounced identically, but as a rule semantically they have different contents. Is hardly possible to find five - six words identical in phonetical pronunciation and semantics among unrelated words. The onomatopoeic words are exclude beforehand, they can exist between unrelated languages, trthough in different languages even the onomatopoeic words differ, which is connected with the properties of diverse languages. For example sneezing, which appear to be a phenomenon physiologically identical among humans, has different phonetic coloring or phonetic distinction:

Russian - apchkhi  
Tatar - aptcheh  
English - atchoo  
German - hatshi  
French - atshuen

A docent of the Kazan University D.J. Bakeeva, specialized in the comparative study of English and Tatar languages, observed similarity in phonetics between these languages only in six words [54]:

English - Tatar

done (done) - dan (glory)  
girl (girl) - gel (flowers)  
tall (high) - tal (willow)  
tan (suntan) - tem (skin)  
tar (to do) - tar (narrow)  
baby (child) - bebi (child)

From these words only one word in both languages is similar in phonetics and meaning: it is "baby". And then the English word "baby" has an accent on the first syllable, and in Tatar "bebi" has it on the second syllable (*This type of studies, aimed at creating barriers between "us" and "them", are not worth their weight in ashes. Just this article contains a number of words that are unlikely borrowings, like "dawn" and "earth", that an English-speaking reader would instantly spot. A reverse in the political objectives under the same political conditions would produce a ton of "similarities", likewise scientifically worthless. It is hard to allow that Dr. A.Karimullin did not know better. This and the following section must be a loyalty litmus test to pass censorship, though spiced with some philological satire - Translator's Note*).

In spite of the fact that Russian and Tatars from time immemorial lived in a tightest contact, hardly will be possible to find between these languages one-two words which would be similar or identical in pronunciation, including an accent, and in sense. That is, certainly, excepting Russian loans from the Tatar and vice-versa, and also common borrowings from other languages and onomatopoeic words, and the words that undergone folk etymology. To check this can all readers of these lines, should they take a Russian-Tatar or Tatar-Russian dictionary. (Try it!). Certainly, for this is needed some philological education, for there are loans where is not so easy to find their roots, which could be mistaken for independent parallels. For example, "to coach" (*Russian "kochevat"*) (from Tatar "kuchenu", "kuchu" - in sense "to travel"), ("horse" (*Russian "loshad"*)) (from Tatar "alasha" - "gelding"), "bay" (*Russian "chalyi"*), "chestnut" (*Russian "kauryi"*), "darkness" (*Russian "tma"*), etc.

Presently it is viewed as recognized that Indo-European linguistic genealogical tree includes apparently utterly different languages: Italian and Baltic, Celtic and Romance, Slavic and Indo-European, Tocharian and Hettian-Luvian branches, each of which has up to ten languages. For the proof of genetic relationship between these languages frequently is cited the ancient Indo-European word "five" - "penkwe" (*actually, not "penkwe" but "\*penkwe", supposedly used 8,000 years ago by a homogenous monolingual group which split and multiplied to produce the today's variety - Translator's Note*), which in Latin sounds "kvinke", in ancient Greek "pente", in Sanskrit "pancha", in Hindi "panch", in Russian - "pyat", etc. (I can't contain myself not to tell that "five" in the Tatar language is "bish" which is somehow close with "panch". But the number "fifty" in Tatar is formed not from "five" (50 = "ille"), unlike the Russian 50 = "five" + ten" (Russian "pyat + desyat").

A non-specialist perceive as unpersuasive that Russian, Hettian, Armenian, Prussian, Lithuanian, Latin, English, Albanian, Kurdish, Tadjik, Irish, etc. languages have one common origin, all belong to Indo-European languages. Between many of these languages the distinctions are so great that they even raise doubts about their relationship in the past among a number of linguists. So, the phonetics, morphology, syntax of Russian and English, English and German differ from each other as a sky from the earth, and so do the differences at many languages of the tree. Due to the research of thousands and thousands linguist scientists of dozens of countries during several hundreds years it became possible to establish that these languages descend from one common parent language, and are genetically related. Between some of these languages the distinctions are large at all levels, while between some American Indian and Türkic languages no such distinctions seemingly exist; the overwhelming are the similarities and identity in grammar and morphological forms, and in language typology, intonation, accents, lexicon, etc.

The comparative study of the American Indian languages with the Türkic languages practically are making its first shy steps, the studies still are the first drops in the ocean of the future research. But even in this drop is clearly visible a presence of such similarity and identity between them that it seems to us they are not random.

Those who are engaged in ethnogenesis of American Indians, and many such works exist, limit their study by only anthropological aspect. I have not seen a single work on ethnogenesis of the Indians that involved linguistic archeology, without which is usually difficult to correctly solve the ethnogenesis problem (*the situation changed drastically since 1980es - Translator's Note*).

Everyone who writes about Indian songs, notes that their music is a pentatonic melody [55], which is a prominent musical feature of some Türkic peoples (including Tatar folk music), and a number of other peoples in Asia, Mongols, Chinese, Japanese, Koreans and others (their languages stand far from the Türkic languages). The pentatonic folk music of these non-Türkic peoples can be understood because in the past they lived in a close contact with the Türkic peoples, in the ethnogenesis of some of them Turks played not a last role. And the Japanese, Korean, Mongolian languages belong to the Altaic family of languages. Apparently, the pentatonic music of the American Indians can be explained coming from their genetic relationship with the Uralo-Altai languages (*or Uralic and Altaic languages, as they are presently called, see [L.Johanson article](#) - Translator's Note*).

In that respect can be made comparative study of American Indian and Türkic folklore and customs. Maria Estman lived among Sioux Indians seven years, and published a compendium of their legends [56]. In her compendium my attention attracted one legend about creation of the Earth, which not only in a typological plane, but also in the images and a plot is very close with a legend of the Kachin Tatars, written down by N.F.Katanov at the end of the last century [57] (*Variation of this creation myth among Khakases and other Turks see Bezertinov - Translator's Note*). It is a legend about a Bird God creating the Earth. For that purpose it dived into the ocean and from the bottom in its beak brought a piece of ground, which then grew into Earth. It is interesting that that legend is widely distributed among the American Indians, among the Oceania tribes, among the peoples in Asia, but is not known in the folklore of European and African peoples. In addition, existing publications discuss the close forms of life and customs of American Indians versus those among Kirgizes, Tuvinians, and Yakuts...

Comparative study of selected American Indian languages with the Türkic languages, and with other Old World languages promises much, both for the history of the Indians, and for the history of peoples in other parts of the world. First of all, research will help the resolution of the question about the Uralo-Altaic family of languages, the discussion already lasts for more than two centuries. Research will also give an opportunity for clarification and particulars for a number of questions about the history of settling the Americas, ethnogenesis, classification of American Indians, and possibly the histories of migration and settling of Oceania islands.

This work attempts to briefly acquaint readers with the status of the Indian languages comparative study, and to share some observation about possible relationship of some American Indian languages with the Türkic languages.

Studying the history of the book printing, I unexpectedly encountered an O.Rochrig's letter to Ibragim Halfin, and that brought me to the American Indians. I am happy with that occasion, because it opened one more splendid world.

Discovery of America, alongside with great inventions, was a powerful stimulus in the development of Old World culture, which was enriched with great achievements and experience of American Indians and accelerated the progress of the mankind. Sufficient to mention that the Old World received from the New World Indians previously unknown agricultural products, i.e. the Indians made a great contribution to the agriculture. Almost half of the food stuffs used by the mankind, without which our life would be poorer, were discovered and domesticated by Indians. That on our tables are potatoes,

tomatoes, pepper, corn, zucchini, kidney-beans, peanuts, cocoa, sunflower and other cultures we are obliged to Indians. We are obligated to them also for the rubber and other commercial crops. Unfortunately, from them we also adopted tobacco.

It would be appropriate to finish this book with the words of a Russian scientist, archeologist, and historian G.Matyushin, who from the study of a skull of an ancient man, found near Davlekanov village in Bashkiria and reconstructed by the known anthropologist artist professor M.Gerasimov, wrote that "at us was looking, as if stepped out from the pages of the Fennimore Cooper novel, a fearless hunter of bison!"

### **An Indian in Southern Ural?**

Yes. And more than that, this pra-Indian, if it can be so phrased, by all his anthropological appearance was connected not only with the Asian contemporaries, but as much with the people of the European type.

Discovering at the Davlekanov village allows to assume that in the formation of the so-called Paleo-Indian, Amerikanoid population of the New World took part not only the natives of Asia, but also the inhabitants of Europe [58].

### **Instead of conclusion**

In October of 1974 at an enlarged meeting of the Kazan University Tatar language faculty with participation of the scientists from the Kazan Pedagogical Institute, for the first time I reported my findings and conclusions about the possible relationship of some American Indian languages with the Türkic languages. It turned out that the presence of lexical parallels in the language of ancient Maya, one of the American Indian languages, with the Türkic languages, noted a medical doctor from Sochi, M.Aribjanov, who at that session also shared his observations. Though these reports were listened to with elevated attention, no wide discussion followed up. Our scientists were not ready to accept our conclusions, though no speaker could offer an objection to our observations, our arguments, and examples. It was stated that the question about possible relationship of these languages demands further study and new proofs.

Then in 1976, I published a brief, small compressed article, laying out my findings and observations, in the scientific compendium of the Kazan Pedagogical Institute "Problems of Türkic linguistics", where were also used the materials collected by M.Aribjanov.

The first to respond to that article was a Doctor of Philology, an eldest scientist of the Lithuanian SSR Academy of Sciences V.Misyavichus, who knows Karaim language of the Türkic group of languages. Her 1976 article, mostly an account of our work, was published (*in Lithuanian*) in the journal "Science and Life " ("Moklasir Gyvenimas" *in Lithuanian*), she concluded supporting a credibility of our hypothesis.

In 1977, in a second issue of "Soviet Turkology" journal surfaced a review by the known Türkologist linguists F.S.Safiullina and S.M.Ibragimov on the above compendium, where reviewers repeated our hypothesis without stating any objections or negative remarks about our observations. In 1978, in the third issue of the same journal a Doctor of Philology and senior scientist of the of the USSR Academy of Sciences Linguistics Institute, an outstanding expert on lexicographic history of the Türkic languages K.M.Murzaev, referring to our and M.Aribjanov articles, expressed an opinion that these works deserve close attention. He repeated that view in his monograph "Lexicology of Türkic languages" [59], where the scientist examined our observations and suggestions in wider perspective of the genesis history of the Türkic languages and their provenance areas in extreme antiquity.

A known linguistic scientist, professor M.Z.Zakiev, who is specializing in the history of Türkic languages, also reviewed our works, in his works he connects the sources of the ancient Türkic language with the languages of ancient Asia and American Indian languages. An editorial review of M.Z.Zakiev's monograph "Tatars halky telenen barlykka kilue" [60] (*that came out in the same 1978 third issue of the "Soviet Turkology"*), where the author relied on our research [61] and the studies of K.Z.Zinnatullina and R.A.Yusupov [62], also noted that this approach promises to be fruitful.

In 1976 the Geography of America Commission of the USSR Geographical Society published our article "Question of genetic relationship of some American Indian languages with Türkic languages" [63], accompanied by a review article of a known scientist L.N.Gumilev entitled "Dakotas and Huns, (To the A.G.Karimullin's article "Question of genetic relationship of some American Indian languages with Türkic languages")". L.N.Gumilev, a historian of ancient Türkic peoples and peoples of the Far and Middle East of the Asian continent, who new Türkic languages, accepted our hypothesis; moreover, on the basis of our observations he raised a question and possible connection of Dakota Indians with the Hunnu (Huns).

Almost ten years later a few participants of a session, where I and M.Aribjanov reported our observations, stated that initially they were stunned and not ready to acknowledge our hypotheses, but by then our hypotheses do not surprise them any more, because they were able to observe themselves, and find lexical parallels between the Indian and Türkic languages.

Our work arose a considerable interest among linguists and other Türkic peoples. It started to be articulated in print and by other Turkic-speaking publications. Among such works we can point to the articles of S.Nurjakiyanov "Relationship of Türkic languages with American Indian languages" [64] and E.Kajybekov "Are Indian languages related with the Altai languages" [65] which, re-stating our article, advance forward: compare the examples from American Indian languages cited in our work with the lexicon of the Kazakh language, and raise a question about the relation of the Altai languages with the Indian languages. Not a single work that referred to our articles raised any objections or doubts about what was posited by us and our conclusions.

Unexpected scientific discoveries, as a rule, at the beginning are not recognized. At first such discoveries are not recognized because of a surprise factor, without any proof, "just because", that "This cannot be, because it cannot ever be". From the time of Otto Rochrig publication (1871) have passed more than a hundred years. Though, as we already know, some other West-European scientists have seen the affinity of some Indian languages with the Türkic languages, their observations also remained outside of the attention span of other linguist scientists. As we know, ignoring is a form of non-recognition of discoveries.

In our country (*former USSR*), apparently we with M.Aribjanov are the first scientists who observed the affinity of American Indian languages with the Türkic languages. From the cited reviews of the bibliography on our observation is apparent that they started getting support from the expert Türkologist linguists. Probably, it is possible to state now that already started a second stage in the recognition of this discovery, when the scientists began expressing: "There is something in this".

A third stage of a discovery is a stage of a final recognition, characterized by a formula "This is how it should be". To help the approach of this stage, further research should be conducted on a wide front, supported by inflow of new researchers interested in studying this interesting scientific problem. Is necessary a new research methodology, development of statistical indexes and linguistic comparison parameters, criteria and quantitative valuations of a degree of their "similarity" etc., which would yield new

qualitative results. It becomes possible now to apply means of modern computer information technology.

The work offered to a reader pursued a modest objective, consideration of new aspects in the genetic relationship of these languages, and discussion of some aspects of similarity in the ethnographic and folklore elements, which do not however carry typological or genetical character, and by that to wake up a keenness of a reader to this most interesting problem of the search for the sources of genetic relationship of the Türkic and American Indian languages.

Abrar Karimullin  
Kazan, March, 1994

#### **List of references:**

- [1] Zagoskin N.P. Biographic dictionary for professors and teachers of Kazan Imperial University. (1804-1904). Frst part. Kazan, p. 90-92
- [2] Karimullin A.G. Note on archives and documents. - Historical archive, 1958, No 5, p. 223-224.
- [3] Mihailova S.M. Forming and development of enlightenment among the Volga region Tatars. (1800-1861.) Kazan, 1972, p. 135-139.
- [4] Roehrig F.L.O. Eclaircissements sur quelques particulares des langues Tartares of Finrioises. Paris, 1845. 26 pp.
- [5] Who is who in America. 1897-1942. Washington, 1943, p. 1050.
- [6] Roehrig F.L.O. The German student's first book. New York, 1853. 32 pp.; The shortest road to German. Ithaco, 1874. 255 pp.
- [7] Roehrig F.L.O. Astor Library New York. Catalogue of books in the Astor Library, relating to the languages and literature of Asia, Africa and the Ocean Islandes. New York, 1854, 424 pp. (In different publications in different European languages the surname of the author is written: Roehrig, Rating, Rohrig, Roehrig.)
- [8] Rochrig F.L.O. The language of the Dakota or Sioux Indians. Washington, 1872, 19 pp.
- [9] Rochrig F.L.O. De Turcarum linguae indole ac natura scripsit. Philadelphiae, 1860. 30 pp.
- [10] Annual report of the Board of regents of Smithsonian Institution, shown the operations expenditures and condition of the institution for the year 1871. Washington, Government printing office, 1872.
- [11] Rochrig F.L.O. The language of the Dakota or Sioux Indians. Washington, 1872. 19 pp.
- [12] Peoples of America. Vol.1. Moscow, 1959, p. 28-29.
- [13] Williamson R.J.A. English - Dakota school dictionary. Topy Ouye Press, 1866.144 pp.
- [14] Riggs S.R.A. Dakota - English dictionary. Washington, Government printing office, 1890. X, 665 pp.
- [15] Riggs S.R.A. Dakota - English dictionary. Minneapolis, Ross and Haines, Inc., 1968. X, 665 pp.
- [16] Gudde E.G. California Place-Names. Berkley and Los-Angeles, University of California Press, 1944. XXVIII, 431 pp.
- [17] Swanton J.R. Terms of relationship in Timuca. Washington, 1916, pp. 451-462. (Extract from the Holms Anniversary volume).
- [18] Kreber T. Search in two worlds. Biography of the last member of the American Indian Yana tribe. Moscow, Thought, 1970, 207 p.
- [19] For those interested to get closer acquainted with the Sioux Indians can be recommended:  
1) Najin Mato. My people Sioux. Memoirs of the leader of American Indian tribe Oglalo-Sioux. Abbreviated translation by A.Makarova. Moscow, Young guards, 1964, 182 p.  
2) Eastman M. Dahcotoh, or life and legends of the Sioux. New York, John Wiley, 1849. XI, XXXI, 268 pp.  
3) Hassarik B. The Sioux life and customs of Warrior society. Oklahoma - Norman, University of Oklahoma Press, 1964. XX, 337 pp.  
4) Hyde G.E. A Sioux chronicle. Oklahoma, University of Oklahoma Press, 1956.420 pp. a.o.
- [20] Peoples of America. Ethnographic compendium. Moscow, 1959, p. 16.
- [21] Ibid., p. 19.
- [22] Boas F. Handbook of American Indian languages. Parts 1-2. Washington Government printing office. 1911-1922. Part I,. VI, 1062 pp. Part II. 903 pp.
- [23] Knorozov Yu.V. "Ancient Maya Script System (Decoding experience)", Moscow, USSR Academy of Sciences Publishing House, 1955, 95 p.



- [24] Knorozov Yu.V. "Script of Maya Indians", Moscow-Leningrad, USSR Academy of Sciences Publishing House, 1963, 663 p.
- [25] Some of them:
- 1) Diego de Landa. Relación de las cosas de Yucatán ("On the Things of Yucatán") . Moscow-Leningrad, USSR Academy of Sciences Publishing House, 1955.272 p.
  - 2) Bartolome de Las-Casas. "Account of the Destruction of the Indies". Moscow, Science, 1966. 228 p.
  - 3) Popol Vuh. Título de los Señores de Totonicapán (Titles of Totonicapan Lords). Translation from Kiche language. Moscow-Leningrad, 1959.252 p.
  - 4) Sozina S. Muisca: One more Civilization of Ancient America. Moscow, 1960.200 p.
  - 5) Gulyayev V.I. America and Old World in pre-Columb epoch. Moscow, Science, 1968.181 p.
  - 6) Aptekar G. History of the American people. Colonial period. Translation from English. Moscow, 1961.200 p.
  - 7) Gallenkamp C. Maya: The Riddle and Rediscovery of a Lost Civilization. Translation from English. Moscow, Science, 1966. 215 p.
  - 8) Inka Garsilaso de la Vega. Comentarios Reales de los Incas (History of the Inca state). Moscow, Science, 1974. 747 p.
  - 9) Stingl M. Indianie na wojennej ścieżce. Praha: Albatros, T. Strez, Vimperk.1970. (Russian translation title: Indians without tomahawks. Moscow, Progress, 1971. 390 p.)
  - 10) Stingl M. In Indian mountains of Cuba. Moscow, Thought, 1974.102 p.
  - 11) Vayan D., History of Aztecs, Gosinoizdat, Moscow, 1949. 242 p., etc.
- [26] These two monuments were translated into European languages. Author's note. Pessel M.
- [27] Pessel M. Lost world of Quintana Roo. Moscow, Thought, 1969, 286 p.
- [28] Central and North American languages; Mexican and Central American languages. - In: Encyclopaedia Britannica, 14-th ed. Vol. V. London - New York, 1929, pp. 138-142.
- [29] In the literature this group of languages has double name: "Hkan-Sioux" and "Sioux-Hoka".
- [30] Lopez O.D. Maya Grammar. Metoda teorico, practice. Merida de Yucatan, 1914, 130 pp.; Tozzer A.M. Maya Grammar with bibliography and appraisal of the works noted. Cambridge, "Museum", 1921, 301 pp.
- [31] Wikander S. Maya and Altaic. I. Is there Maya group of the languages related to the Altaic Family?
- Wikander S. Ethnos (Stockholm), 1967, vol. 32, pp. 141-148;
- Wikander S. Maya and Altaic. II. Ethnos, 1970, vol. 35, pp. 80-88;
- Wikander S. Maya and Altaic. III. Orientalia Suecana (Stockholm), 1970/71, vol. 19/20, pp. 186-204.
- [32] Zettelfsteen K.V. Die arabischen, persischen und türkischen Handschriften der Universitätsbibliothek Zu Uppsala. - Monde Oriental, vol. 22, 1928, pp. I-XVIII, vol. 29, 1935, pp. 1, 1-180.
- [33] Ibid.
- [34] American Indians. Ethnographic compendium. Moscow, 1955, p. 21.
- [35] Ferrario B. Delia possibile parentela fra le lingue altaiche ed alcune-americane. - Atti del XIX Congresso Internazionale degli Orientalisti, Roma, 23-29 September, 1935. Rome, 1938, pp. 210-213.
- [36] Dumezil G. Remarques sur les six premiers noms de nombres du Turck. - Studia Linguistica, Revue de Linguistique Generale et comparee. Anne 1954, No1, pp. 1-15;
- Dumezil G. Remarques Complementaires sur le six premiers Noms de Nombre du Turc et de Quechua. - Journal de la Societe des Americanistes, Vol. XLIX, 1955, pp. 17-37;
- Dumezil G. Remarques Complementaires sur le six premiers Noms de Nombre du Turc et de Quechua Bulletin de la Societe de Linguistique de Paris. Cinquante deuxieme, 1956, fasc. 1, 1957, pp. 208-210
- [37] Josselyn J. New Englands rarities. London, 1672.114 pp.
- [40] Macintosh J. The origin of the North American Indians. New York, 1853. 39 pp.
- [41] Araujo R. I chol kin. Merida, 1965.
- [42] Latham R.G. Opuscula. London, 1860.
- [43] Platzmann J. American asiatische Etymologien via Behrings strasse from the East to the West. Leipzig, 1871
- [44] Yakovlev N.F. Ancient linguistic connections between Caucasus, Asia and America. - Works of N.N.Mikluho-Maklay Ethnography Institute, new series, volume II. 1947, p. 196-204.
- [45] Biokka E. Yanoama, Moscow, Thought, 1972, 205 p.;
- Matteson E. The Piro (Arawkan) language. Berkley and Los Angeles, 1965. X, 467 pp.;
- Rubin J. National bilingualism in Paraguay. Haunye - Paris, Mouton, 1968.134 pp.;
- Hiller W.R. Ito-Aztecan cognate sets. Berkley and Los Angeles, 1967.83 pp.;
- Robelo C.A. Dictionario de azteques. Mexico, 1965, 548 pp.
- [46] Heyerdahl T. Adventures of one theory. Moscow, 1969, p. 305-348.

- [47] Fedorov I.K. Question of similarities between Kechua, Aymara and Polinezian languages. - In: From Alaska to Tierra del Fuego. Moscow, 1967, p. 362-369.
- [48] Milewsky T. Études Typologiques sur les langues Indigènes de l'Amérique/Typological Studies on the American Indian Languages. Krakow, 1967, 135 pp.
- [49] Sapir E. Similarity of Chinese and Indian languages. - Science. New series, vol.XII, 1925, 16 oct.
- [50] Some examples from Japanese and Korean languages are in S.Wikander's cited works.
- [51] Alexeev V.P.Geography of human races. Moscow, Thought, 1974. 352 p.
- [52] Ingstad H. At the Wake of Leib the Happy Leningrad, Gidrometeoizdat, 1969. 246 p.
- [53] Gluhov Yu. Long before Columbus. Pravda, 1975, 13 Apr.; Tchernyshev V. Mysterious figurine. Pravda, 1974, March 2.
- [54] Bakeeva D.H. Teaching English in Tatar groups. - Scientific Notes of Kazan State University, Vol. 115, 1955, Book 4, p. 91-9656.
- [55] Boas F. Teton Sioux music. - Journal of American Folk-Lore, vol. 38, 1925;
- Densmore Fr. The Rhythm of Sioux and Kippewa Music. Art and Archeology, vol. IX, 1925, a.o.
- [56] Eastman M. Dahcotoh, or life and legends of Sioux. New York, John Wiley, 1849. XI, XXXI, 268 pp.
- [57] Katanov N.F.Kachin legend about creation of the world. (Written down in Minusinsk district of Enesei province in Kachin dialect of the Tatar language on June, 2, 1890). - News of Archeology, History and Ethnography Society at Kazan Imperial University, v. XII, 1895, issue 2, p. 185-188.
- [58] Matyushin G. "Indians" in Ural. - Around the World, 1969, No 10, p. 30
- [59] Murzaev K.M. Lexicology of Türkic languages.Moscow, Science, 1984, c.119
- [60] Zakiev M.Z., Tatars halky telenen barlykka kilue (Formation of the Tatar people language). Kazan, 1977
- [61] Ibid., p. 32-36
- [62] Soviet Turkology, 1978, No 3
- [63] Questions of the USA geography. Leningrad, 1976. p. 114-122
- [64] Binim zhene enbek, 1984, No 9
- [65] Ibid., 1985, No 6