# The Written Script and Impact of Modernization： The Romanization of Chinese＊ 

## 1．Introduction

Sociopolitical changes in the recent history of China have resulted in many changes in Chinese customs．In the same course of time，the Chinese writing system also underwent changes，though the changes were gradual and slow．The writing system can be said to be the most stubborn of all institutions except language．Language is a socio－psycho－physiological complex which cannot be legislatively controlled，hence linguistic changes，including assimilation，are always gradual．The writing system，on the other hand，can be abruptly changed，by superimposing a new system on the old．However，this may result in high social cost，even bloodshed．Because of the cultural inheritance a writing system invariably gathers，it is extremely difficult to replace it with a new system．

It was only when some progressive Chinese realized that the old writing system was outmoded that they began to look for ways to modernize it．It had taken foreign cultural influences to make this vanguard see the shortcomings of the old system．It took strong foreign politico－military impact to convince more people that there was indeed a need for modernization． However，not all people recognized this need．Conflict was therefore inevitable．

In this paper I shall examine the linguistic background－why the old Chinese writing system is no longer efficient；the historical background－how the impact of modernization stirred up the script reform movement；the development of new scripts－how the concept of romanization was developed；and the controversies－what the conservatives think about romanization．Being limited by the theme of the seminar，I shall refrain myself from discussing the question of the implementation of romanization．

## 2．Linguistic Background

Communities of different languages often，but not always，develop or adopt writing systems which are most suitable for recording their languages．A language whose morphemes are predominately monosyllabic，may use a morphemic writing，for example Old Chinese and some Tibeto－Burman languages in Southwest China．A language that has limited syllable types，may use a syllabic writing，such as Japanese and Cherokee，the former currently having slightly over 100 syllable types and the latter less than 100 （according to the syllabary in Gleason 1965：414）．If a language is basically polysyllabic and／or has a large inventory of syllable types， and alphabetic writing（phonetic writing in broad phonetic transcription，phonemic writing，or morpho－phonemic writing）may be used，such as in Hebrew and Greek．Conventionally，writing systems are categorized into these three types，but from the semeotic point of view，there are only two writing systems in the world：morphography，designating meaning with heterographs for homophones，and phonography，designating sound with homographs for homophones and heterographs for heterophones（Chang Yü－hung 1975）．The notion of morphography versus phonography is particularly valid for our discussion here．

[^0]The assignment of a writing system to either morphography or phonography is merely statistical or impressional．There is in practice no demarcation between the two types of writing systems．Even a newly designed writing system is a mixture of both，if it is to function satisfactorily．The Chinese system of writing has been called pictography，ideography， logography，etc．No matter by what name it is called，the nominators have morphography in mind．However，there have been numerous cases of phonographic use of Chinese characters since the very earliest writing records available．The mixture of the types of writing systems in Chinese is attributed primarily to the functional change of the Chinese characters．

As can be seen in the picture－writing of the American Indians，the recording of the Mo－so classics in Southwest China，and other primitive writings，a pure morphography is never a complete record of language，and a complete record of language must start with phonetizing of the existing morphographs．The earliest records of Chinese certainly passed the stage of being purely morphographic．In order to record functional words and many new or foreign common and proper names，any existing character can be used，and many have been used，to designate a sound or sequence of sounds（phonetic designation）．Although new characters have been added to the inventory after the oracle bone period（c．1300－1028 в．c．），${ }^{1}$ the addition is proportionately very much smaller than the innovation and introduction of new lexical items， and during the past one hundred years only a handful of new characters were invented，mainly terminology in chemistry．It follows that most characters in current use are already phonetized （though some of them may be remorphographized for further semantic designations）．This applies to Japanese and Korean as well as Chinese．

The phonetization tendency of Chinese characters goes hand in hand with the simplification tendency of the characters．All the written signs are developed from drawings and symbols，using Gelb＇s definition（Gelb 1963：253）．Chinese is no exception．The pictographic shape of some Chinese characters was preserved as late as the second century b．c．Drawings are by nature complicated and variable，and pictographs are not much simpler．When writing functions as a tool for recording language and as a subordinate expression of thought，the only requirement for the written signs is that they be simple．Studying the development of the structure of Chinese characters，we can see that this requirement is being gradually met by simplifying existing characters，though the goal has not yet been reached．The characters are structurally still too complicated，with an average of 13 strokes each．Even the simplified characters are not easing the problem much．Thus in spite of the publication of the Complete List of Simplified Characters （簡化字總表）in May 1964 in China，and the publications of the List of Simplified Characters （簡體字表）in July 1969 and the Complete List of Simplified Characters（簡體字總表）in March 1974 in Singapore as norms，unauthorized simplifications have been used in both countries． One way of simplification is to change the function by using structurally simpler characters for homophonous characters．Stimulated by the recent writing reform and assisted by the nearly complete agreement of the spoken language with writing，there is now an accelerating tendency to phonographize characters in this way in China．

The functional change of Chinese characters is reinforced by the linguistic change of the Chinese language．As Chinese was predominately monosyllabic，morphography for Chinese meant a character per syllable per meaning．The correspondence is ideal but not real，especially when the Chinese language has been becoming more and more polysyllablized．With the polysyllablization of the Chinese language，the original writing system gradually loses its intended function that each character designates a meaning，and phonetization of characters to an uncontrollable extent is expected．Many correspondences are now $n$－characters per $n$－syllables per meaning．

The Japanese，formerly using the method of $n$－characters per $n$－syllables per meaning without rules（Manyō gana 萬葉假名），first realized the limitation of the Chinese characters and

[^1]developed around the 8th and the 9th centuries a syllabary（allographically two syllabaries）as an auxiliary to characters．They were followed by the Koreans in promulgating their phonographic alphabet，ŏnmun（諺文，or han－gŭl），in 1446．The Vietnamese and the Chinese made no changes， even within tradition，till long after the arrival of the Westerners．

## 3．Historical Background

Contacts between the Chinese and foreign linguistic communities with phonographic writings started very early．Under the influence of Indian Buddhism in the 1st century，the Chinese first became aware of the possibility of breaking a syllable into two parts，initial and final． Up to the end of the 6th century the Chinese syllable finals of Changan（長安）were classified into around 200 rimes by scholars．Later，being enlightened by the Sanskrit vyañjanam，the Chinese Buddhist monks also classified initial consonants into 30 to 36 （depending on time and location）representative characters．The main purpose was for phonetic annotation．The annotational tradition did affect the choice of the National Phonetic Symbols（國語注音字母） in 1913 as phonetic annotational signs for Chinese characters，but the Indian culture never revealed the shortcomings of Chinese characters to Chinese scholars．On the other hand the Chinese suffered military humiliations in the hands of the Uighurs，the Turks，the Tibetans， and others，and were conquered by the Mongols and the Manchus．Many of their conquerors used phonographic writings．Still，instead of advocating a script reform，the Chinese culturally assimilated the intruders．It appears that the Chinese would not think of reforming their writing system unless they received both military shock and cultural shock simultaneously．

As early as about 1，000 years ago in the Sung Dynasty，Deng Su（鄧肅，1091－1132）， comparing Chinese with foreign writings，realized the demerits of the Chinese writing as being complicated and slow．${ }^{2}$ Then at the turn of the 16th century came the Jesuits who， especially Matteo Ricci（利瑪竇，1552－1610）and Nicolas Trigault（金尼閣，1577－1628），took one step ahead of the Buddhist monks and Chinese phonologists by segmenting Chinese syllables into phonemes and writing them down in Roman letters．Fang Yi－zhi（方以智），one of the scholars who was influenced by Trigault，in 1639 even advocated the principle of script reform： phonographization．${ }^{3}$ However，not having felt the strong impact of Western modern culture， the Chinese paid no attention to Deng＇s realization nor to Fang＇s advocation．Comparing the Jesuit influence with the longer and deeper Indian influence，it is apparent that were China not shaken by foreign powers，the Jesuit influence would not have aroused a script reform movement （even if the persecution of Christianity since the early 18th century had not ended Western influence in China）．However，the Jesuit influence should not be underestimated．Without their enlightenment，Western and Japanese aggression in the 19th and the 20th centuries would not have led to the script reform movement，not to mention romanization．

Since the official prohibition of Christianity in China in 1723 China had been closed to over a hundred years of Western cultural developments，especially in science and technology． After the Opium War（1839－1842）and the Anglo－French occupation of Peking in 1860，some Chinese intellectuals began to realize that some aspects of Western learning，including the writing system，were worth studying．In non－governmental circles，ideas of institutional reforms started to spread．In spite of the slow progress of the superficial modernization under the Ch＇ing government＇s self－strengthening movement，the first language textbook written in a mixture of Roman letters and quasi－Roman letters，and aiming at a script reform，appeared in 1892 （盧意章，中國第一快切音新字）．Subsequently，several other designs with the same claim were published immediately and shortly after the first Sino－Japanese War（1894－1895）．Japan＇s victory was an even greater shock to the Chinese．The latter had attributed the power of

[^2]the Western countries to their universal education and attributed the universal education in Europe to the writing systems of the Westerners；now they attributed the high literacy of the Japanese to their simple syllabary．These foreign systems，being phonographic，were regarded， as did Deng Su 1，000 years ago，time saving．The drive toward a strong China resulted in more designs of writing systems．

Meanwhile，ideas for literary reform were being developed．I just mentioned that the linguistic change of Chinese reinforces the functional change of Chinese characters．Analogously， the literary reform movement has reinforced the script reform movement．One of the requirements for literary reform was that writing should be colloquial；that is，writing should correspond faithfully to the contemporary language．The requirement for literary reform made the advocation for a script reform unquestionable，for it was the goal of the early script reformers to design a new writing system that corresponded faithfully to language．The combined literary and script reform movement was soon joined by the language reform movement．The Chinese had long noticed the dialect problems in China（Fang Shih－tuo 1965：1－5）and implemented the teaching of Mandarin to officials in the early 18th century（cf．Li Jinxi 1935：26－27），but the idea of language unification had not occurred to the Chinese till about 1902 （ibid．25－26）after the Japanese set an example of national unification via language unification．Language reform was more welcome to both the Manchu and the Republican governments than the script reform and prepared a sounder foundation for later developments of script reform．

The first proposal for romanization made by the Chinese script reformers was brought out in 1906 （朱文熊，江蘇新字母）．Again it was the Japanese who showed the way．The Japanese romanization movement，started in 1869 ，reached a peak in 1905 with the establishment of the Propagation Committee for Japanese Latinization．${ }^{4}$ The Chinese saw that if the Japanese needed Roman letters instead of kana，the Chinese should be in very bad need of Roman letters instead of characters．This idea did not have much influence then，but was rapidly popularized and accepted by Chinese intellectuals during the May Fourth Movement（1917－1921）${ }^{5}$ when the Western ideas of science and democracy were stressed，when the literary reform gained greater popularity，and when more Chinese intellectuals had contacts with the Western culture．

The romanization movement in the early 1920 ＇s was not successful，partly because of technical difficulties in the National Language Romanization（國語羅馬字）itself．However， in 1920 ，the Soviet Union started an anti－illiteracy movement which reached its climax in 1928－1932，and domestically in China there was a peak of another literary movement in 1933－1934 fighting against the conservatives．The situation gave the romanization movement an opportunity to revive．But this time the writing system was the Latinized New Writing（拉丁化新文字），which was first used in the Chinese community in Vladivostok of Russia，and was the prototype of Hanyu Pinyin now in use in China and Singapore for phonetic annotation．

The ups and downs of the Chinese script reform movement have been conditioned by the sociopolitical conditions in China．There were four major stimulations on China made by the foreign impact，in this respect，before 1949．The first one was the Opium War，the second one the first Sino－Japanese War，the third one the May Fourth Incident（1919），and the fourth one the mass invasion of Japan starting 1931．Each incident stirred to a peak the script reform movement，one higher than the other．Each upheaval was immediately followed by conservative reaction，one weaker than the other．These upheavals corresponded proportionately with the intensifying impact of modernization on the Chinese communities．

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## 4．Development of the Concept of New Scripts

In the course of the script reform movement there developed a theory of writing that recognized writing as a tool for transmitting information rather than something divine．The movement itself had been guarded with this theory．Being a tool，writing had to be useful and effective．${ }^{6}$ With the misconception that Western writings were short hands，most of the writing systems proposed after the first Sino－Japanese War were short hands．Having the concept of balancing encoding and decoding in mind，Wang Zhao（王照，1859－1933）was annoyed by the short hand rush．In 1900，he pointed out that the merit of spelling was easy to learn but not necessarily easy to write；that the greater the difference between signs was，the easier they were to be recognized；and that the Western short hands were not regular writings．In other words，a new writing system must be a workable one both for reading and writing．

In 1626，Trigault，the French Jesuit，pronounced that his transcription of Mandarin into Roman letters provided the beginners and children with a method of pronouncing Chinese characters．His admirers found that the phonemic transcription was more convenient than the traditional way of using two characters to annotate the pronunciation of a third character．It is not clear whether his admirers had direct influence on the script reformers in the late 19th century in this respect，but they did influence the contemporaneous conservatives who only accepted the new scripts as annotational signs．

The Chinese concept of a new script as a writing system must be attributed to the translations of the Bible into dialects by the 19th century Protestant missionaries in China． These missionaries demonstrated the possibility of writing Chinese without characters．${ }^{7}$ All the pioneers viewed the function of their writing systems as auxiliary to Chinese characters as well as annotational．They were not designed to substitute the characters completely．The aim of a script reform then was to popularize education so as to promote the knowledge of those who could not afford too much time learning characters．The argument was that as spelling was easier to learn than characters，pupils could use the ten odd years which they saved from not having to learn characters for studying science and technology．${ }^{8}$ It was believed that，unlike the old Chinese system of writing，spelling was easier to learn and，unlike the literary Chinese，it was the faithful recording of speech．Any native speaker who has learned the rules of spelling can read and write．

The idea that Chinese characters should be completely abolished was introduced by Qian Xuan－tong（錢玄同，GYYK 19－22），Li Jin－hui（黎錦睴），and others（GYYK 157－158）in the 1920 ＇s．In spite of the eventual triumph of the literary reform movement，the colloquialism of writing is constantly threatened by the use of Chinese characters，which are＇the Latin in Chinese＇（Li Jinxi 1933，preface：108）and are＇dependent on the Chinese classics＇（ibid．）．To avoid being haunted by the ghost of characters，a new alphabetic writing system should not be just transliteration of characters．On the other hand，it must not be merely the mechanical recording of speech either．A new writing system is expected to be an independent one with its own development，but not to depart from colloquialism（Li Jinxi 1923，Ni 1948：39）．${ }^{9}$

The first genuine script reform in romanization appeared in 1906．Before this though some reformers adopted Roman letters，they invented signs à la Roman letters as well．The fore－runner，Zhu Wen－xiong（朱文熊），stated that adopting the extant universal alphabet of the world，viz．Roman letters，was better than creating a new alphabet．${ }^{10}$ His successor，Liu

[^4]Meng－yang（劉孟揚）argued in 1908 that the Chinese language would not lose its identity just by the adoption of Roman letters．${ }^{11}$ And finally Qian Xuan－tong $(1923: 19,22)$ declared that the Western culture was in fact the modern World culture and implied that no writing system except romanization would get the Chinese closer into the stream of culture of the modern world．This line of thought has since been followed in spite of the once overwhelming Russian influence on China．

At the beginning，the script reformers had an eye on mass education only．They seemed not to notice the flexible structure of spelling．Yang Xuan－ji（楊選杞）in 1659 noticed this nature of spelling，${ }^{12}$ but，not being a script reformer，he did not apply it to practical usage．It was after the May Fourth Movement that people realized that spelling in general is convenient for indexing，telecommunication，printing，typing，transliteration，lexical borrowing，etc．Also，it was recognized that since the modern world was culturally dominated by the Western world，and many conventions and mechanical products were based on Roman letters，it would be cheaper and faster if the Latin system was used．Romanization is even considered essential in a time of the highly developed Western science and technology and other disciplines，where translation of jargons hinders developments．

## 5．Controversies

The conflict in the process of today＇s modernization in general is simply that between modernism and traditionalism．The script reform is no exception．What the script reformers have been fighting for is the practical aspect of the function of writing，that is，they stress writing as a tool more for transmitting information among the living people within the same linguistic communities than for transmitting cultural inheritance；on the other hand the conservatives see writing as a tool for cultural transmission within and across linguistic communities and，most importantly，between the dead，the living，and the to－be－born．It is a matter of temporary versus historical，of local versus universal，and of encoding versus decoding．Unfortunately，militants from either camp have presented only evidence favourable for their own ideology．Most of them have been psychologically blind to arguments on the other side of the shield，and avoided raising questions which would weaken their own arguments．

Chinese characters have been accused of being the barrier to literacy．It was this belief which brought about the script reform movement．The opponents to the reform movement have refused to believe this theory，and the high illiteracy rates in the highly developed countries ${ }^{13}$ must have increased their doubts．Both sides mixed up the distinction between the nature of the writing system and the contact between men and scripts．It goes without saying that， for native speakers，phonography is easier to learn than morphography（and that a new or normalized phonography，such as Malay or modern Russian，is easier to learn than an old and complicated phonography，such as Thai or English）．However，＇How then shall they call on him in whom they have not believed？and how shall they believe in him of whom they have not heard？and how shall they hear without a preacher？And how shall they preach except they be sent？＇（Romans 10：14－15）．Bad education will not teach the pupils to learn and master the skill of spelling，and lack of practice in reading and writing will make a literate＇deliterized＇（回生復盲，English translation from DeFrancis（1967：146））．The question of whether romanization will help end illiteracy in China is still too early to be answered．Currently，China is still

[^5]using characters，and contributors to newspapers up to 1974 were still talking about the task of anti－illiteracy．${ }^{14}$

Functionally speaking，morphographs have longer lives and receive wider recognition than phonographs（Chang Yü－hung 1975）．This phenomenon is the strong point of the conservatives in love with Chinese characters．It has to be borne in mind，however，that this advantage of Chinese characters is dependent upon a lingua franca，or at least a common artificial language， which in our case here is the literary Chinese． $2^{5}=32$ is an almost universal sentence but not necessarily Jack $+J i l l$ ，so is 帝令多雨（oracle bones）in the world of Chinese characters but not王大隻魚（oracle bones）nor 立入禁止（Japanese）nor 倪弗懂個（Shanghainese）nor 寫翻的嘢 （Cantonese）nor 雉䧕如袹（Vietnamese chư－nôm）．Moreover，non－normalized old phonographs， such as in Thai or English，also have comparatively longer lives than constantly normalized ones，though incomparable with morphographs；and some widely borrowed phonographs，such as bazooka and Kodak，receive even wider recognition than Chinese characters．Those who were opposed to the literary reform in the 1920＇s argued that since the spoken language changed very often，＇if it was adopted for writing purposes，both the old and the new literary works would be incomprehensible to posterity＇（Chow＇s（1964：282）interpretation of the conservative view）． Nowadays，although the old literary works have become more and more incomprehensible， colloquial writing is taken for granted，but most of the people are still afraid that after romanization 王大隻魚 etc．will be incomprehensible to posterity．

Being unable to see the fading power of the characters as media of transmitting cultural inheritance in the course of time，the conservatives naturally consider the reformers vandals．The reformers have a different opinion，however．If a script＇revolution＇had occurred and overthrown Chinese characters，the transmission of Chinese culture via writing obviously would come to a stand－still．A careful reformer would not venture on this kind of script reform，and even the most radical Chinese reformers have found it beyond their ability．Since the 1920＇s and idea has been brewed that the characters will be abolished only when romanization is popularized． The reformers are convinced that by that time the new script will be mature enough to be used as an independent writing system，and the transmission of cultural inheritance will by then be carried by the new script through careful translations．As for the date of implementing the new script，it is still in the indefinite future．${ }^{15}$

In connection with the view that Chinese characters are understood by all the Chinese irrespective of the unintelligibility between dialects，the conservatives have accused the reformers of threatening the unity of China（Li Jinxi 1935：30－31，DeFrancis 1967：131）．The accusation， viewed from a certain angle，is true，but the reformers have their versions of unification too． There are three ways of linguistic unification（Tuo 1939：89）．The first way，which is the traditional way，is to unify the national script but not the language．The second way is to unify local scripts with dialects or minority languages，temporarily disregarding the nationwide script unification and language unification（but universal phonetic values have to be assigned to the same written signs in all languages and dialects）．The third way is to immediately unify the national script with national language without touching dialects．The early script reformers， having anti－illiteracy in mind，took the second choice．Both Lu Gang－zhang（盧隐章，中國切音字母．1906）and Lao Nai－xuan（勞乃宣，簡字全譜．1907）supplemented dialectal signs to their （in Lao＇s case it was Wang Zhao＇s）Mandarin signs with the expectation that a dialect speaker， after he has learned to read and write his own dialect，would find it easier to learn Mandarin， so that the gap between speakers of different dialects would be filled．The idea apparently was adopted by the Conference on Unification of Pronunciation（讀音統一會）of the Ministry of Education in 1913，and was carried further in Taiwan for a short while after 1945 （cf．Fang 1965：133 ff）．It was also advocated and carried out by the supporters of the Latinized New

[^6]Writing. The choice probably is not a wise one and has very likely been given up in China concerning Sinitic languages now. Anyhow, the third choice is in practice currently in China, Taiwan, and the Chinese stream of education in Singapore. As Chinese language unification has moved far ahead of romanization, it is believed that by the time romanization is mature, there will be no more mutual unintelligibility between dialect speakers nor between ethnic groups in China.

On the other hand, the claim that the unification of China by Chinese characters needs examination. As the universal function of characters has depended upon literary Chinese, it is not difficult to see that the unification of China in the respect of writing has depended upon literary Chinese and the ideas expressed by it. And as literary Chinese was mastered by intellectuals only, it follows that the unification of China in the past was in the main the unification of intellectuals. The other $90 \%$ of the population who were illiterate and were at the bottom of the sociopolitical hierarchy, just followed suit.

Lu Gang-zhang's first design of new script (1892) did not gain much popularity among the literati partly because it was based on Roman letters. Wang Zhao's new script, on the contrary, was once informally supported by the Manchu government partly because it was based on the constituents of Chinese characters. The contrast well illustrates the emotion and attitude of most Chinese intellectuals toward Roman letters: they are foreign. This does not mean that these Chinese intellectuals would accept a Chinese-like new script in place of characters. It only indicates that it will be harder for romanization to win the sympathy of most Chinese intellectuals. Roman letters have been regarded as foreign, and are not recognized as being international and being used by the majority of the linguistic communities in the world.

Having this concept in mind, the conservatives certainly would not yield to the belief that Roman letters are more suitable for mechanization. They might accept that the up-to-date science and technology provide Roman letters with more convenience. But who knows what future developments would provide for Chinese characters? One opponent (Peng Tse-chih, 12 Dec. 1974) wrote about the present status of mechanizing Chinese, 'A manual or electric Chinese typewriter is 10 to 15 words [he equated a character to an English word] per minute faster than an English typewriter using the same kind of motive power, and in learning to type on it one spends only half of the time spent in learning English typewriting.' Unfortunately, he gave no details.

## 6. Conclusion

Since the incident of the Tower of Babel, language has developed without limitation within human physiological and psychological constraints. One therefore would not expect an ideal writing system which can cope with the constant linguistic changes. A writing system with 26 Roman letters definitely is very far from ideal in many respects (Gleason 1965:421; Chang Yü-hung 1975). However, ever since the rise of the Roman Empire, its alphabet has been widely adopted by most newly emerged nations of the world, as well as by the writing of many non-official languages. The $26-$ letter Western culture dominated the world, and its influence is still extant. Besides Roman letters, the Westerners also introduced to the Chinese people a unique modern Western value system, viz. the mentality of high efficiency and utilitarianism. High efficiency is universally desired, but Western utilitarianism requires consideration. Apparently, solving immediate contemporary problems is deemed by the Chinese script reformers as the most urgent task. Thus romanization, which is easier than characters to manipulate in this connection, to them is beyond question. There is yet no sign in the near future that there will be a romanized Chinese system of writing, but the prospect seems good in spite of all the dissension, accusations, and unsolved problems in the implementation.


[^0]:    ${ }^{*}$ I am indebted to Dr．Lee En－Han for his criticism and suggestions regarding the sociopolitical and intellectual aspect of this paper．I am also thankful to my other colleagues in different disciplines with whom I have discussed various questions in preparing the paper．［編按：本文原刊載於 Seah Chee－Meow（ed．）1977．Asian Values 6 Modernization．Singapore University Press．］

[^1]:    ${ }^{1}$ According to 陳夢家．1956．殷虛卜辭綜述（中國科學院考古研究所考古學專刊甲種第二號）．北京：科學出版社． p． 35 ．

[^2]:    ${ }^{2}$ 「外國之巧，在文書簡，故速；中國之患，在文書繁，故遲。」 Quoted from Zhou Youguang（1964：25）．
    ${ }^{3}$ 方以智，通雅（1963）：「字之紛也，即緣通與借耳，若事屬一字，字各一義，如遠西因事乃合音，因音而成字，不重不共，不尤愈乎？」Quoted from Luo（1930：308）．

[^3]:    ${ }^{4}$ Incidentally，this was roughly the time when the first peak of the Chinese script reform movement was reached in 1904 with the official adoption of Wang Zhao＇s new script（1900）as medium for popularizing Mandarin．
    ${ }^{5}$ Another coincidence：the Society of Japanese Romanization was established in 1921.

[^4]:    ${ }^{6}$ 沈學，盛世元音（1896）：「夫字，士人之利器，以愈利為愈妙。」林輅存，上都察院書（1898）：「蓋字者，要重之器也，器惟求于適用。」 Both quoted from Zhou（1964：2）．
    ${ }^{7}$ 金尼閣，西儒耳目資。列音韻譜問答（1626）：「初學幼童見西號以定音。」 Quoted from Luo（1930：281）．
    8 盧觰章（1854－1928），中國第一快切音字。序（1892）：「省費十余載之光陰，將此光陰專攻算學，格致，化學以及種種之實學。」 Quoted from Ni（1948：27）．
    ${ }^{9}$ Cases of phonographic writing departing from colloquialism are illustrated by the＂visual morphemes＂in English（Dwight L．Bolinger．1946．Visual morphemes．Language 22：333－340）．
    ${ }^{10}$ 朱文熊，江蘇新文學。自序（1906）：「與其造世界未有之新字，不如採用世界所通行之字母。」 Quoted from

[^5]:    Zhou 1964：38．
    ${ }^{11}$ 劉孟揚，中國音標字書弁言（1908）：「試觀英，美，法等國，其字均同，．．．［sic］然仍英自英，美自美，法自法也。豈我國之音標字取用英文字體，遂謂我非中國乎？」 Quoted from ibid．， 39 ．
    ${ }^{12}$ 楊選杞，聲韻同然集（1659）：「于閱未終卷，頓悟切字有一定之理，因可為一定之法。」 Quoted from 羅常培，聲韻同然集殘稿絨（BIHP 1．3：339－343，1930），p． 339.
    ${ }^{13}$ E．g． $20 \%$ in the U．S．（聯合報國外航空版． 30 Oct 1975 （Thur．），p．5，rr．14－16）and 100,000 in Sweden（星洲日報． 17 Oct 1975 （Fri．），p．2，rr．10，8－9）．

[^6]:    ${ }^{14}$ 漢字的整理和簡化（北京：文學改革出版社，1974），passim．
    ${ }^{15}$ Zhou（1964：45）．
    聯合報國外航空版． 4 Sept 1975（Thur．），p．1，rr．12－14．

