

suggestion as well as this most valuable journal to all those informed about language.

10. Grundzüge etc., p. 117.
11. It is understood that in these polemics the otherwise very meritorious works of this excellent linguist are not being impugned.
12. Die Aspiration und die Lautverschiebung. Eine sprachgeschichtliche Untersuchung von Rudolf von Raumer. Leipzig, 1837.
13. Brücke, Grundzüge etc., p. 82.
14. Bopp, Kritische Grammatik der Sanskrita-Sprache, Berlin, 1834, p. 15 ff.
15. Brücke, p. 83.
16. Pānini's acht Bücher grammatischer Regeln, Her. von Böhlingk. Bd. I. Bonn, 1839, p. 3.
17. I transcribe the Dévanāgarī letters in accordance with Bopp.
18. See the edition of this Prâtiçākhyā by Regnier, Études sur la Grammaire védique in Journal Asiatique. Paris, 1856. Février-Mars, p. 169.
19. Regnier, op. cit., p. 194.
20. The Languages of the Seat of War in the East. London, 1855, p. XXXII.
21. P. 83.
22. That is, the just cited words of Max Müller.
23. Compare also my publication: Über deutsche Rechtschreibung. (Vienna, 1855), p. 65 ff.
24. To repeat the extensive proof, which I gave in my article on aspiration and the sound shift in support of my view would require that I merely reprint here the greater part of what I said there. For were I to leave out a single ancient quotation or an associated argument, then the exposition given there would only lose in effectiveness.

CHAPTER EIGHT

AUGUST SCHLEICHER

INTRODUCTION TO A COMPENDIUM OF THE
COMPARATIVE GRAMMAR OF THE INDO-EUROPEAN,
SANSKRIT, GREEK AND LATIN LANGUAGES

From Compendium der vergleichenden Grammatik der Indogermanischen Sprachen (Weismar: Hermann Böhlau, 1871), xlviii, 829 pp., pp. 1-9

Schleicher is generally regarded as totally superseded. Since he flourished immediately before the neogrammarians, it is scarcely remarkable that their reputation has eclipsed his. Probably the most commonly maintained segment of his writings is his model for displaying languages, the family tree, though it too is held to be superseded by other interpretations of language spread and interrelationships, such as the wave theory. In part Schleicher seems supplanted because so many of his ideas were taken over by his successors.

1. Even though the Stammbaum in its simple form falsifies language interrelationships, Sherman Kuhn has pointed out it is the model by which genealogical classifications have been achieved.

2. The reconstructed form of a proto-language, rather than the earliest known form of a selected language which has developed from it, is now the accepted way of indicating linguistic relationships. In Indo-European linguistics Schleicher broke the practice of citing Sanskrit for this purpose and introduced the starred form.

3. But possibly the most important influence he has had is that on the neogrammarians — his aim (credited to them) to account for relationships to the extent possible and then to admit residues. In his brief sketch of the history of Indo-European linguistics, Compendium 15-16, he has the following comment:

At present two tendencies confront each other in Indo-European linguistics. The adherents of the one have taken as their principle strict adherence to sound laws (e.g. G. Curtius in Leipzig, Corssen in Berlin, the

author of this Compendium, and others); the other trend (Benfey in Göttingen, Leo Meyer in Dorpat, and others) believes that it need not be essentially hindered in the clarification and explanation of language forms by the sound laws that have been determined up to now. In this way it is possible for the adherents of the latter trend to explain many things which seem dark to the others. Particularly from this approach a number of stem-forming suffixes of Indo-European are taken back to a single original form. The two schools also are importantly differentiated through this procedure. The former accepts as old and original much that the second permits to be looked on simply as a change of an original and primitive form. The further historical development of our discipline will show on what side the certain, truly scientific basis for the future flourishing of linguistics is to be sought.

When one notes that August Leskien assisted in the production of the second edition and with Johannes Schmidt brought out the third, it is not difficult to recognize one source of neogrammarian ideas and the continuity of development in linguistics, even though Schleicher did not sharply formulate a need for complete accounting for phenomena and explanation of residues.

The Introduction to the Compendium is given here in a translation from the third German edition, prepared by Herbert Bendall and published by Triebner and Company, London, 1874. Although one of Schleicher's essays may have been useful in representing his theoretical views, the introduction may reflect various reasons for Schleicher's importance.

Schleicher looked on language as a whole. His introduction states specifically that linguists should deal with the construction of sentences — a statement found again in the excerpt from Sievers below; but Schleicher also admits that he cannot handle sentences adequately, and hence he confines himself to sounds and forms. This limitation was largely maintained for the next eighty years, with the emphasis on phonology that Schleicher introduced.

He also attempted to get away from the detail of language to its form, using for this purpose formulae. In this attempt he foreshadows the repeated efforts to increase rigor in linguistics. His formulae for descriptive linguistics, referred to below in the extract from Whitney, were

not maintained though his reconstructed — or fundamental — forms have been. It should be noted that Schleicher looked on these as abstractions, not as real language material; he says specifically that he does not assert they ever existed.

Everywhere Schleicher's presentation is sober and clear. In the third edition of the Compendium he introduced external techniques which have become general, such as glossing citations in the language of the writer rather than in Latin. His conclusions have in part been superseded, as in his identification of Armenian as a dialect of Iranian. But through his lucid summary of the data that had been assembled Schleicher provided the basis for the tremendous expansion of control over historical linguistics during the last quarter of the nineteenth century.

August Schleicher (1821-68) may not have achieved a definitive work because of his short life. The first edition of his Compendium was published in 1861, on the basis of fifteen years of lecturing. Earlier he had published a morphology of Old Church Slavonic, 1852, and a grammar of Lithuanian, 1856-7, produced as a result of field work. For the second edition he modified the Compendium largely in externals. The third was published posthumously from his annotated copy. Since he examined the bases of linguistic study — the relevance of Hegel, or Darwin — and since he made use of the compendious grammars being produced for the various Indo-European dialects — for the Romance languages by Diez, 1836-44, for the Celtic by Zeuss, 1853, and for the Slavic by Miklosich, 1852ff. — he may have removed from his Compendium some of the shortcomings maintained from his predecessors if he had not died relatively early.

Introduction

I. Grammar forms one part of the science of language: this science is itself a part of the natural history of Man. Its method is in substance that of natural science generally; it consists in accurate investigation of our object and in conclusions founded upon that investigation. One of the chief problems of the science of language is the inquiry into, and description of the classes of languages or speech-stems, that is, of the languages which are derived from one and the same original tongue, and the arrangement of these classes according to a natural system. In proportion to the remainder but few speech-stems have hitherto been accurately investigated, so that the solution of this chief problem of the science must be looked for only in the future.

By grammar we mean the scientific comprehension and explanation of the sound, the form, the function of words and their parts, and the construction of sentences. Grammar therefore treats of the knowledge of sounds, or phonology; of forms, or morphology; of functions, or the science of meaning and relation, and syntax. The subject of grammar may be language in general, or one particular language or group of languages; grammar may be universal or special: it will in most cases be concerned in explaining the language as a product of growth, and will thus have to investigate and lay down the development of the language according to its laws. This is its exclusive province, and therefore its subject is the laying-down of the 'life of language,' generally called historical grammar, or history of language, but more correctly 'science of the life of a language' (of sound, form, function, and sentence), and this again may be likewise as well general as more or less special.

The grammar of the Indo-European languages is therefore a special grammar: because it treats of these languages as products of growth, and exhibits their earlier and earliest gradations, and would therefore be more accurately called a special historical grammar of Indo-European language.

Note 1. By comparative grammar is meant not that grammar which is merely descriptive, but that which throws light on speech-forms as far as possible, because as a rule it is not confined to the treatment of any one particular language.

Note 2. The following work embraces only two parts, viz. scientific treatment of sounds and of forms. Indo-European function and sentence-formation we are not at present in a position to handle in the same way as in the case of the more external and intelligible branches — sounds and forms.

II. To assume one original universal language is impossible; there are rather many original languages: this is a certain result obtained by the comparative treatment of the languages of the world which have lived till now. Since languages are continually dying out, whilst no new ones practically arise, there must have been originally many more languages than at present. The number of original languages was therefore certainly far larger than has been supposed from the still-existing languages. The earliest preliminary distribution of languages which we can make is suggested by their morphological constitutions.

There are:

1. Languages which are simply composed of invariable disjointed meaning-sounds, monosyllabic, e.g. Chinese, Annamese, Siamese, Burmese. Such sounds we denote by R (radix). The Indo-European language would be in this stage of development when the

word ai-mi (I go, $\epsilon\dot{i}\mu\iota$) was sounded not so, but as i or i ma (formula R, or R + r).

2. Languages which can link to these invariable sounds of relation, either before, or after, or in the middle, or in more than one place at once (denoted here as s. [suffix], p. [prefix], i. [infix]). These are confixative languages, e.g. Finnish, Tatar, Dekhan, Basque, the languages of the aborigines of the New World, of South Africa (Bântu), and most languages in fact. In this step of development the word ai-mi would be i-ma or i-mi (Rs).

3. Languages which for the purpose of expressing relation can regularly vary their roots as well as their confixes (which have sprung from independent original roots), and can at the same time preserve intact the means of compounding. These are inflexive languages. Such a root is regularly varied for the end of expressing relation is here denoted by R^x (R^1 , R^2 , etc.), a similar suffix by s^x .

Hitherto we have become acquainted with only two speech-stems of this class, the Semitic and the Indo-European. The latter has for all words only one formula, viz. $R^x s^x$ (s^x meaning one or more than one regularly variable suffix), and consequently a regularly variable root with a regularly variable expression of relation at the end of the suffix, e.g. ai-mi, $\epsilon\dot{i}\mu\iota$, \sqrt{L} .

The Indo-European is therefore a suffix-language, together with the neighboring languages of the Finnish stem, including Tataric, (Turkish) Mongolian, Tungusian, Samoiedish, as also with the Dravidian (Dekhan) — all included in the formula Rs.

Note 1. The Semitic, which is not akin to the Indo-European, has more word-forms, namely R^x and pR^x , forms quite strange to Indo-European, which has only one. Besides, its vowel-system is perfectly distinct from the Indo-European, not to mention other marked differences. Cf. Aug. Schleicher, "Semitisch und Indogermanisch" in Beitr. ii. 236-244. An attempt to deduce the fundamental language of the Semitic speech-stem has been made by Justus Olshausen in his "Lehrbuche der hebräischen Sprache", Brunswick, 1862.

Note 2. The augment in Indo-European is no relation-affix, no prefix, but an adherent, though originally independent word, which may moreover be omitted.

III. The life of a language (generally called its "history") falls under two heads:

1. Development in prehistoric times. As man has developed, so also has his language, i.e. the expression of his thoughts by sounds: even the simplest language is the product of a gradual growth: all higher forms of language have come out of simpler ones, the confixative of the monosyllabic, the inflexive out of the confixative.

2. Decline in the historic period. Language declines both in sound and in form, and in its decay changes of meaning take place alike in function and construction of sentences. The transition from the first to the second period is one of slower progress. To investigate the laws by which languages change during their life is a most important problem in the science of language, for unless we are acquainted with them we cannot possibly understand the languages in question, especially those which are still living.

Through different developments, at different points in the province of one and the same language, the self-same tongue branches out into the ramifications of the second period (whose beginning however is likewise earlier than the origin of historic tradition), and diverges into several languages (dialects); this process of differentiation may repeat itself more than once.

All these changes took place gradually and at long intervals in the life of the language, since generally all changes in language unfold themselves gradually.

The languages which spring immediately from an original language we call fundamental; almost every fundamental language has split up into languages; all these last-named languages may further branch into dialects; and these dialects into sub-dialects.

All the languages which are derived from one original language form together a class of speech or speech-stem; these again are sub-divided into families or branches of speech.

IV. The name of Indo-European has been given to a distinct set of languages belonging to the Asiatico-European division of the earth, and of a constitution so consistent internally, and so different from all other languages, that it is clearly and undoubtedly derived from one common original language.

Within this Indo-European class of speech however certain languages geographically allied point themselves out as more closely related to one another: thus the Indo-European speech-stem falls into three groups or divisions.

These are:

1. The Asiatic or Aryan division, comprising the Indian, Iranian (or more correctly Eranian), families of speech, very closely allied to one another. The oldest representative and fundamental language of the Indo-European family, and generally the oldest known Indo-European language, is the Old Indian, the language of the oldest portion of the Védas; later on, after it had become fixed in a more simplified form, and subject to certain rules, as a correct written language, in opposition to the peoples' dialects, called Sanskrit. We are not acquainted with Eranian in its original form: the oldest known languages of this stem are the Old Baktrian or

Zend (the Eastern), and the Old Persian, the language of the Achaemenid cuneiform inscriptions (the Western). To this family besides is related the Armenian, which we know only from a later date, and which must have branched off even in early times from the Eranian fundamental-language.

2. The south-west European division, composed of the Greek, next to which we must perhaps place the Albanian, preserved to us only in a later form; Italian (the oldest known forms of this language are the Latin — especially important for us is the Old-Latin, as it was before the introduction of the correct literary language formed under Greek influence — the Umbrian and the Oscan), Celtic, of which family the best known, though already highly decomposed, language is the Old Irish, Erse dating from 700 A.D. Italian and Celtic have more in common with one another than with the Greek.

3. The North-European division, composed of the Slavonic family with its closely-allied Lithuanian, — the most important language for us of this group, — and the German, widely separated from both. The oldest forms of this division are the Old-Bulgarian (Old Church-Slavonic in MSS, dating from 1100 A.D.); the Lithuanian (and of course the High-Lithuanian, South-Lithuanian, Prussian Lithuanian, first known to us 300 years ago, but clearly of far greater antiquity; and the Gothic from the fourth century. Beside the Gothic, however, are the oldest representatives of German and Norse, Old High German, and Old Norse, which we may bring forward when they present earlier forms than Gothic.

The greatest number of archaic particulars in point of sounds and construction of language is found in the Asiatic division, and within it, in the Old Indian; next in point of archaisms (i.e. preservation of similarity to the original language, by having fewer strongly-developed and peculiar forms) comes the S.W.-division, in which Greek is found to be most faithful; and lastly the N.-European group, which, if regarded as a whole, may be shown to have the most characteristic development, and to be the least faithful to the original language.

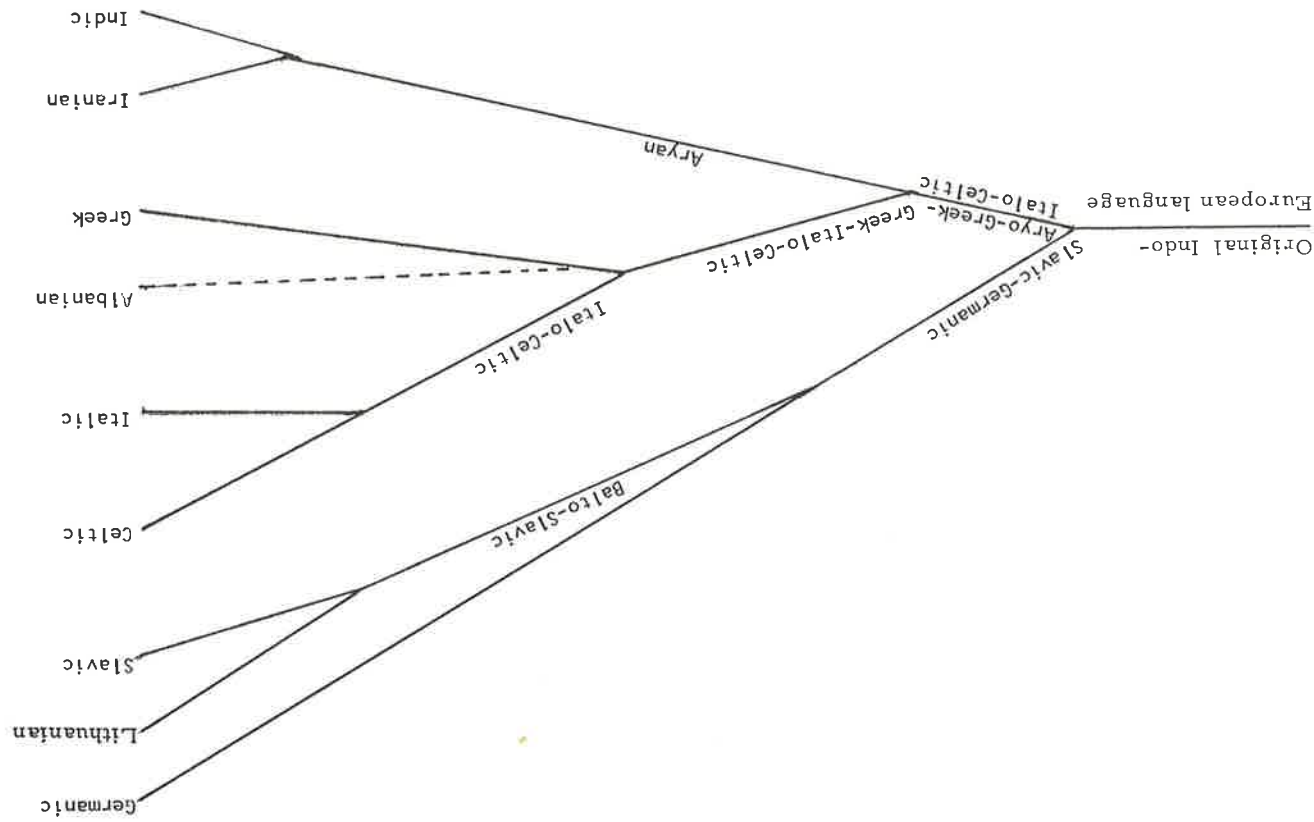
By combining these facts with the above-named relationships of the Indo-European languages, and drawing inferences as to the process of separation of the Indo-European body of language in ancient times, we get the following result: The Indo-European original language differentiates first, through unequal development in different parts where it prevailed, into two fundamental languages, viz. The Sclavo-Teutonic, which afterwards divided itself into Teutonic and Sclavo-Lithuanian, and the Aryo-Graeco-Italo-Keltic, the remaining portion of the Indo-European language, which divided itself into Graeco-Italo-Keltic and Aryan; and the Graeco-Italo-Keltic soon split up into Greek and Italo-Keltic, while the first, the Aryan,

remained undivided for some time. Later still the Sclavo-Lithuanian, the Aryan (Indo-Eranian) and the Italo-Keltic, further divided themselves. It may be that at most or at all of the divisions there arose more languages than we now know of, since probably many Indo-European languages have died out through the lapse of time. The further eastward an Indo-European people lives, the more archaisms are found in its language; the further westward they have gone, the fewer archaisms, and the more numerous new-formations are found in the language. From these and other indications we infer that the Sclavo-Teutonic race first began its wanderings westwards; next followed the Graeco-Italo-Keltic; and of the Aryans who remained behind, the Indians journeyed south-eastward, the Eranians south-westward. The home of the Indo-European original race must be sought in the highlands of Central Asia.

It is only of the Indians, who were the last to leave the parent stem, that it is quite certain that they expelled an aboriginal race from their later dwelling-place, a race of whose language much passed into their own; a similar process is highly probable in the case of many other Indo-European peoples.

The most ancient divisions of the Indo-European, up to the origin of the fundamental languages belonging to the families of speech formed from the speech-stem, may be seen in the following table.... The length of the lines shows the duration of the periods, their distances from one another, the degrees of relationship.

Note. In the present work an attempt is made to set forth the inferred Indo-European original language side by side with its really existent derived languages. Besides the advantages offered by such a plan, in setting immediately before the eyes of the student the final results of the investigation in a more concrete form, and thereby rendering easier his insight into the nature of a particular Indo-European language, there is, I think, another of no less importance gained by it, namely that it shows the baselessness of the assumption that the non-Indian Indo-European languages were derived from Old-Indian (Sanskrit), an assumption which has not yet entirely disappeared. This view has found supporters up to the present date, especially as regards Old-Baktrian (Zend). The term 'Sanskritist', not seldom applied to Indo-European philologists (meaning that we concede to Sanskrit a position which it does not deserve, by deriving other languages from Sanskrit, or explaining them by it, instead of studying them fundamentally), is likewise shown to be quite inapplicable by the plan employed in the Compendium. The disadvantage of having in certain cases Indo-European original forms inferred which are more or less doubtful, does not weigh at all against the advantages which, according to our view, are attained by the arrangement of the subject used hereafter.



A form traced back to the sound-grade of the Indo-European original language, we call a fundamental-form (f.f.) [e.g. Lat. *generis*, f.f. *ganasas*; Gk *γενους*, f.f. *ganasas*]. Hence it is only when forms of different sound-grades are brought to one and the same sound-grade, that we can compare them with one another. When we bring forward these fundamental-forms, we do not assert that they really were once in existence.

CHAPTER NINE

C. LOTNER

EXCEPTIONS TO THE FIRST SOUND SHIFT

"Ausnahmen der ersten Lautverschiebung,"

Zeitschrift für vergleichende Sprachforschung auf dem Gebiete des Deutschen, Griechischen und Lateinischen 11.3 (1862), 161-205

Lotner's cataloging article has never been given the acclaim of Grassmann's or Verner's, which it prepared for. Yet Lotner carefully screened the evidence and listed the three large sets of "real" exceptions, after eliminating the apparent ones traceable to "false comparisons", onomatopoeic words and borrowings. In his treatment of the apparent exceptions Lotner reflects the status of historical linguistics shortly after the middle of the nineteenth century; for that reason, and because the first section of his article is his permanent contribution to clarification of the first sound shift, this section is presented rather fully here. The "real exceptions", which Lotner discusses in the remaining sections of his article, may be found in the articles of Grassmann and Verner. After Lotner's publication there was no further confusion about the apparent exceptions. His clarification of these, and his thorough descriptive presentation of the evidence remain the essence of his achievement.

This is not to say that Lotner's article is thoroughly praiseworthy. The tone of it is occasionally intemperate; at the conclusion he added a short paragraph apologizing to Curtius for an unwise phrase in an earlier article. He also misled Grassmann about the "third set of exceptions," which were clarified by Verner, by introducing the glib notion of a *Wahlverwandtschaft* — elective affinity — between the resonants and the mediae. Yet with its faults, the article is an example of the interplay of descriptive and historical linguistics: Lotner's descriptions simplified the explanations of Grassmann and Verner. The article also illustrates that linguistics did not advance by a series of leaps; rather, careful scientific attention to the data led in time to its mastery.

C. Lotner submitted the article from London. To my