

CHILDHOOD BILINGUALISM AND LEARNING GERMAN AS A FOREIGN LANGUAGE

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0. INTRODUCTION

The term “bilingualism” is usually understood as a situation or condition in which two linguistic codes are made use of by the same speaker or speech community, and “bilingual” has been impressionistically conceived as a person who has the kind of ability to manipulate two linguistic systems and actually practices it; the two terms, however, are seldom adequately defined in the literature on the subject (see Cohen 1975). The lack of an adequate definition for “bilingualism” is perhaps due to the fact that it is an abstract concept; a “bilingual”, being a physical entity, appears to be somewhat easier to define (see Tse 1983).

Another term, “diglossia”, which was first advanced by Ferguson (1959), has been employed to refer to the *functional differentiation* between two languages (or two varieties of the same language) at the societal level (see Ferguson 1959), or, in an extended sense, to all the “*functionally differentiated language varieties of whatever kind*” (Fishman 1971a: 540)—whether they are the officially recognized different “languages” of a speech society, the prestigious, “standard”, “high” language and the vernacular, “substandard”, “low” language(s) of such a society, or merely the different varieties, registers, dialects, etc., of the same language, which are functionally differentiated in different speech “domains” in connection with a society (see Fishman 1971b, Findling 1971, Gumperz 1964b, Cohen 1975, etc.). Since the introduction of the term by Ferguson “diglossia” has gained favor among sociologists and sociolinguists; “bilingualism”, however, has been preferred by psychologist and psycholinguists (Fishman 1971a: 539).

The distinction in nomenclature between *bilingualism* and *diglossia* reflects a shift of interest from questions like “*What happens in the individual who speaks two languages?*”, “*How does he come to master the two systems?*, *Which of the two dominates?*,” etc., to the question “*Who speaks what to whom and when?*” (see Fishman 1965b). In other

words, bilingualism must be "contextualized", i.e., it must fit into a social context (see Fishman, Cooper, and Ma, et al. 1971: "Introduction").

Sometimes, a distinction has been drawn between the terms "bilingualism" and "bilinguality"—as by Nababan (1980), who maintains that the latter term, "bilinguality", should be reserved to refer only to such an *ability* (competence) of the speaker (though he may not actually use it) and the former, "bilingualism", to both the possession of such an ability and the actual *practice* (performance) of it (in this case, when one can actually use a second language, some kind of competence of the language is certainly presupposed).

In any attempt to define the term "bilingualism" or "bilingual" the ultimate question one faces is: *To what extent of language proficiency and/or language use may a person or a speech community be termed "bilingual"?* This question, as well as similar ones, is by no means to be easily and definitely answered. As bilingualism is in essence a continuum and, as such, lends itself to different degrees (see Macnamara 1969 and Cooper 1971), it is difficult to specify at what point of the continuum a speaker or society should be labeled "bilingual". Macnamara (1969) establishes a matrix of four aspects of each of the four language skills (i.e., listening, speaking, reading, and writing) and defines accordingly the term bilingual as a person who possesses "at least one of the language skills . . . even to a minimal degree" (p. 82) (cf. also Cohen 1975 for a similar definition). Such a definition as formulated by Macnamara (1969) and Cohen (1975), especially when given with the modification "even to a minimal degree," is not to be completely adopted by the writer for the present study because, theoretically, the definition is much too broad (as such, anyone who knows a little about any foreign language becomes a "bilingual", which is against the normal case) and, practically, there is no way to further define the "minimal degree." The writer defines a "bilingual", therefore—especially for this study—as a person who possesses at least the *oral* skills (i.e., listening and speaking—one decoding and the other encoding) of two languages, L_1 and L_2 , to the extent that he has no difficulty in communicating orally with native speakers of both.

Furthermore, bilingualism lends itself to various forms. It may refer to the ability and behavior of an individual speaker, or to the situation of a group of speakers, a speech community, or a society (thus, "societal bilingualism": see Fishman 1971c, 1971a); and, in this latter case, the bilingual situation may be *stable* or *transitional* (see Fishman 1971a). In addition, bilingualism may exist in one and the same speech community (thus, "intra-societal bilingualism") or between different speech communities in their interaction with one another (thus, "inter-societal bilingualism"); between these, however, the socio-

linguist's recent interest seems to fall on the first (see Fishman, Cooper, and Ma, et al. 1971, Kelly 1969, etc.).

Semantically, bilinguals seem to fall into three types (Weinreich 1953): *coordinate*, those for whom corresponding pairs of forms in the two languages involved represent different sememes, which have been differently acquired and may have different semantic contents; *compound* bilinguals, for whom corresponding forms in the two languages signify in the mind of the speaker the same sememe; and *subordinate* bilinguals, for whom a form in L_2 signifies a corresponding form in L_1 , which in turn signifies a sememe formed or acquired in L_1 (see Macnamara 1970).

Where the social functions of bilingualism and diglossia interact, Fishman (1967, 1971a) distinguishes four situations, the last of which being a rarity. These are: 1) both diglossia and bilingualism, 2) diglossia without bilingualism, 3) bilingualism without diglossia, and 4) neither diglossia nor bilingualism. Sometimes, the term "balanced" is given to those who are "equally skilled in two languages in all aspects and all styles of the language skills" (Macnamara 1969:83). In this case of "balanced bilingual(ism)" the person may also be called an *ambilingual*, i.e., one who is equally conversant in both languages and in all situations or, in other words, equally "fluent" in all *domains* of language use. Such a case, however, is very rare, for, as will be seen in the results of this study, one language is almost always bound to *dominate* the other in different speech domains.

Childhood bilingualism refers to a bilingual (diglossic) situation that exists in or since childhood. The term sometimes carries, however, a somewhat negative implication of the maintenance of such a situation *only* in or during childhood and of the loss of such an ability or behavior in the later stages of life. In this study, this is not taken for granted, although some of the subjects investigated will actually lose, totally or in part, the bilingual qualities which they acquired at an early stage of life. Malherbe (1969) distinguishes bilingualism between "natural" and "artificial" types; the kind of childhood bilingualism to be dealt with in this study is obviously of the "natural" type, since "the surrounding social needs and pressures which cause the child to acquire a second language are strong and pervasive" (Malherbe 1969:42-43).

Finally, as the Chinese residents in Austria constitute only an almost insignificant proportion of the population (see 1.2), bilingualism as occurring to this Chinese community is mostly intersocietal in nature. Other bilingual communities, as the German-Hungarian one of Oberwart (Felsőör), described in detail by Gal (1979), do often occur,

which lend themselves to insightful study of the subject.

1.1 The Subjects

The subjects of the study is a population of about 50 Chinese children at various ages and of different linguistic, social and family background in Vienna, who for one reason or another has come (or immigrated) to Austria for shorter or longer time, and who will or will not leave the country in the future. These are the Chinese children who are from Taiwan, Hongkong, or some other countries (areas), and for whom Mandarin Chinese (or a certain Chinese dialect) is retained—if not in the child, then at least in the parents. The term “Chinese” here is, therefore, linguistically, rather than politically or genealogically, defined. And, among these, the then 2-year-old (now four) daughter of the writer is the main—and in some sense most important and typical—subject of study. For the others the writer either knows the children in person, or knows the parents well enough as to be able to observe the language of their children.

1.2 Methods And Procedures

Early as the time when the main subject (the writer's daughter, known as “Ting-ting”) was born (on October 2, 1980, in Taipei) and during its infancy, the father, as a linguist, has made sporadic observations and taken written and tape records of the language of the child. Since September 1982, when the child was brought to Vienna by her father, records have been regularly kept for a study of language development. These include notes taken and utterances transcribed and recorded (in tapes).

The language of the other subjects was taken during a period of about one year (ca. Feb. 1983 - Jan. 1984) and has been for the most part preserved in tape recordings. These recordings were taken on the very spot where an inartificial occasion of communication existed—at home, in the kindergarten, and at various gatherings of the Chinese community (not a China town). Descriptions and analysis are therefore based on such data.

There exists no official record with regard to the total number of Chinese inhabitants in Austria. One reason for the lack of an official record is perhaps due to the difficulty in defining who is a Chinese and who is not (see 1.1 above). An unofficial record states that there are about 800–1,000 Chinese residents in Austria, and most of them (over 60%) live in Vienna. Let's say, then, there are 600 Chinese in Vienna, and that for each family

there are, on the average, two children. The result is than 300 adults and 300 children. The writer's population of fifty, therefore, constitutes one-sixth of all Chinese children in the capital. Some of the children were born in Austria and are therefore naturalized (usually with the parents), and others are not. The occupational, socioeconomic and educational status of the parents lends itself to great diversity. The sampling of subjects is therefore random and reliable.

1.3 Delimitation

Although the study has handled the language of a population of about 50 subjects, it has not, except for the main subject, handled the language development of the population in a longitudinal manner: observations since the births of the children have not been made, and no follow-up study after the observation period has been made, either. The study is, therefore, chiefly horizontal in nature. In addition, as the writer has taken his own child as the main subject of study, some of the statements and conclusions made about this particular subject may be idiolectal or idiosyncratic and therefore may reasonably not be so generalized as to apply to the whole population of subjects, and not to be projected to all Chinese children acquiring German.

2. The Language

The general, national language as spoken in Austria is German, but German of another kind. Austrian German is characterized by certain significant features at phonetic, lexical, syntactic and semantic levels which distinguish itself from the standard variety of the German language, *Hochdeutsch* (High German). Owing to geographical adjacency to the southern German region of *Bayern* (Bavaria, centered around *München*), the general, especially mid-western dialect of Austrian German comes much closer to that of Bavaria than to the high language.¹

There is, as the writer observes, substantial difference in pronunciation, intonational, rhythm and tempo between Austrian German and the standard Germany variety. Among these, *Wienerisch*, the dialect of Vienna, appears to be a distinct dialect of Austrian German, which distinguishes itself from all other varieties of the latter.

1. For a general description of Austrian German, see "Deutsch in Österreich," in Ebner, *Wie Sagt Man in Österreich?*, 207–22. Mannheim (Germany): Dedenverlag.

Phonetically, the German language is characterized, though to some extent impressionistically, by relatively less variation in intonation, rhythm and tempo as compared with such “rhythmic” languages as (British) English. The sounds of German sound very “hard” to the non-german ear; the sentence “flat”; and many combinations of sounds are just tongue-twisting both to the English and to the Chinese speaker. It lacks, so to speak, the impressionistic quality of fluency and “liquidity.” The word-initial /z/ of *Hochdeutsch* (spelled *s*, as in *Sie* ‘(polite form of) you’, *so* ‘so’, *sagen* ‘say’, *Sache* ‘thing’, *Saal* ‘hall’, *Samstag* ‘Saturday’, etc.) gives the acoustic impression of being “hard,” “rigid,” “cold,” or any other epithet of the kind (so the writer was told by his Canadian classmate—one who perhaps for some reason fostered an unconscious prejudice against Germans or the German language—at the language center of the University of Vienna). Many of the consonant clusters, as /pf/² (as in *Pferd* ‘horse’, *Kopf* ‘head’, *Pfennig* ‘penny’, *Pfiff* ‘whistle’, *Karpfen* ‘carp’, etc.—not to mention the addition of some other consonants to the cluster, as /-mpf-/ in *schimpfen* ‘scold’ and /pfl-/ in *Pflanze* ‘plant’, *Pflicht* ‘duty’, etc.), /kn-/ (as in *knapp* ‘tight’, *Knecht* ‘slave’, *Knie* ‘knee’, etc.), /tsv/ (as in *zwei* ‘two’, *zwischen* ‘between’, *zwölf* ‘twelve’, *zwanzig* ‘twenty’, *zwar* ‘indeed’, *Zweck* ‘purpose’, etc.), /-ln/ (as in *sammeln* ‘collect’, *wandeln* ‘walk, wander’, *Tafeln* ‘blackboards’, etc.), /ʃv/ (as in *Geschwister* ‘brothers and sisters’, *schwarz* ‘black’, *Schwein* ‘pig, swine’ *Schwester* ‘sister’, *schwimmen* ‘swim’, etc.), and so on.

Some of the “hard” sounds of standard German, however, have been to some extent “softened” in Austria. This tendency is most obviously perceived in the softening of all word-initial /z/ sounds to its voiceless counterpart /s/ (if for some not totally voiceless, then at least to a great extent devoiced), thus producing /si:/ for /zi:/ *Sie* ‘(polite form of) you’, /se:/ for /ze:/ *See* ‘sea(f.); lake(m.)’, /so/ for /zo/ *so* ‘so’, /’sa:gən/ for /’za:gən/ *sagen* ‘say’, /’se:ən/ for /’ze:ən/ *sehen* ‘see’, and the like. This makes the pronunciation of such words much easier for English and Chinese speakers because, in English, word-initial *s* is always pronounced as /s/ and, in Chinese, there is a similar voiceless ʈ but no voiced counterpart.

Austrian German lends itself in general to more variation in intonation, rhythm, tempo and tone, which gives the language an impressionistic feeling of fluency, liquidity, softness and musicality. Some utterances of certain dialects of Austrian German even carry

2. /pf/ may also be considered as a single consonant.

non-phonemic tonal contours.³ The Vienna dialect, however, owing to a particularly heavy accent of its own, together with some deviation in lexicon, is not to be easily understood by non-Viennese or by those who have exposed themselves only to *Hochdeutsch*.

Here it must be noted, however, that *not all* people living in Vienna speak the typical Vienna dialect; otherwise there would be great difficulty in communication, especially for foreigners, who come for some reason to Vienna and who either do not know German or have learned only the standard dialect of Germany. As Vienna is a historically and culturally old city, and as Austria borders eastern Europe, the city becomes naturally somewhat internationalized. Immigrants from eastern Europe—from Hungary, Yugoslavia, Czechoslovakia, Poland, etc.—constitute a significant percentage of the residents of Vienna. Many of these immigrants are to preserve their mother tongues for shorter or longer time; others have been or are being fused into the melting pot of Austrian language and culture. This provides a progressive impetus for linguistic change. Among the younger generations of the East-European immigrants, certain forms of creole are being developed—creoles that mix German vocabulary and syntax with elements from a number of outside sources, but whose inflection and syntactic structure are much simplified. At the markets, in the streets, and in the ghettos of the immigrants the writer has often encountered such “simplified versions” of German. These are creoles because they are being transmitted from the older generation to the younger ones.

The average Viennese inhabitant, however, speaks what may be called “General Austrian German,” i.e., a version that, by and large, can be understood by Austrians from all parts of Austria, despite the existence of some minor dialectal differences. This is subsumed under the title of the *Hochsprache* ‘high language’ of Austria. The Viennese, particularly, use this with an idiosyncratic Viennese accent. The typical Vienna dialect, *Wienerisch*, is now heard only at the homes of some natively born residents and on some culturally specific occasions, such as when one drinks at *Heurigen* (a drinking occasion characterized by midnight chats and merry making). A few examples will suffice to show the peculiarities of the dialect of Vienna: *wünsch’ wohl g’speist z’håb’n* ‘(I) wish to have had a good meal’; *a schön’s Wetter z’måch’n* ‘to have a good weather’; *Dees kummt ma spanisch vur* ‘This sounds strange to me’; *Håb’n S’ an’ Idee!* ‘Have an idea! (Think about it!)’ *daß i net lâch* ‘that I do not laugh’; *Sunst håben S’ kaane Schmerz’n?* ‘Otherwise you have no pain?’; *Håb’n S’ kaan’ Türk’n g’seg’n?* ‘Have you seen no Turk?’; *Gehst denn net!*

3. This is benefited from Dr. Karl Uher, native Viennese and one of the writer’s best friends there.

'You can't do that! (It's not permitted to do that!); etc. All these and similar utterances of *Wienerisch*, when spoken exactly by a Viennese with a native accent, are not to be easily comprehended even by speakers of standard German. The following is the rewritten version of these sentences in the general language done by the writer:

- (1) a. wünsch' wohl g'speist z'håb'n
ich wünsche mich, gut gespeist zu haben
- b. a schön's Wetter z'måch'n
(ein) schönes Wetter zu haben
- c. Dees kummt ma spanisch vur.
Dies(es) kommt mir seltsam vor.
- d. Håb'n S' an' Idee!
Haben Sie eine Idee!
- e. daß i net låch
daß ich nicht lache
- f. Sunst håben S' kaane Schmerz'n?
Sonst haben Sie keine Schmerzen?
- g. Håb'n S' kaan' Türk'n g'seg'n?
Haben Sie keinen Türken gesehen?
- h. Gehst denn net!
Denn geht es nicht!

Much can be said about the above examples of the Vienna dialect as compared to the general version of German. Let us note only the following points: 1) in speech, there is a high frequency of occurrence of contracted form; (self-evident) vowels, especially the schwa (i.e. the unstressed central vowel / ə /), as in *wünsch'*, *g'speist*, *håb'n*, *g'seg'n*, and the like, are often omitted; the omission of other sounds, as of /u/ in the first syllable of *zu haben* 'to have' in (a) and *zu machen* 'to make' in (b), and of the vowel /i:/ in the personal pronoun *Sie* 'you (polite form)', is self-evident in the sense that it does not hinder communication. 2) Lexically, there is a change in the basic vocabulary: *a* is substituted for *ein* 'a, one', *dees* for *dies(es)* 'this', *ma* for *mir* 'to me', *i* for *ich* 'I', *net* for *nicht* 'not', etc. 3) Morphologically, there is a simplification of inflectional endings, often by omitting them altogether, as *an'* in (d) (for *eine* 'a, one') and *kaan'* in (g) (for *keinen* 'no (in the sense of 'not any')'). 4) Phonetically and phonologically, there is also a systematic change

of sounds: /ɔ/ to /u/ in *kommt*→*kummt*, *vor*→*vur* and *sonst*→*sunst*, /ai/ to /a:/ in *ein*→*a'* *keine*→*kaane*, *eine*→*an'* and *keinen*→*kaan'*. Form contraction is a common phenomenon, so are omissions of vowel sounds and syllabification of consonants, as *hab'n* for *haben* (where the unstressed /ə/ is omitted and the final /n/ is made syllabic, thus making the whole word /'habm/), *S'* for *Sie* (pronounced as a syllabified /z/, or to some extent devoiced), etc. 5) Phonetic modification of specific sounds also happens. In addition to the normal "dark a" sound (either short or long) of the general dialect of German, there exists in *Wienerisch* "clear a" (spelled and transcribed as *a°* above).⁴

In sum, German, a language spoken by a little more than one hundred million people, like any other major language, lends itself to various modification and incessant change. Among the few major varieties of the German language, (General) Austrian German is one (Swiss German and Dutch German being respectively another) which distinguishes itself from the so-called *Hochsprache* of Germany in some significant ways. And, among all the slightly different versions of Austrian German (for example, those of the Viennese, of the *Tiroler*, the *Burgenländer*, the *Ober-* or *Niederösterreicher*, etc.), that of Vienna, or *Wienerisch*, is one which stands out in all levels of structure, and one in which communication with speakers from other areas may sometimes be difficult. Those non-native inhabitants of Vienna, especially their children, are naturally exposed to this variety of German and their language is certainly affected by it.

3. The Language Development of the Main Subject

3.1 The Linguistic Background of the Parents

In any language-development study of children, especially a longitudinal one, the researcher usually has to trace some distance back to the linguistic background of the parents (if necessary, also of the family members). Since the family is usually the first environmental setting in which the child firstly encounters language, it plays a crucial role in the formation of the linguistic experience of it. It has therefore been found that in a family where there is parental language retardment of some kind (as when one of the parents or both are deaf-mutes), there is usually also linguistic retardation in the children. Besides, a substantial part of a person's idiolect is from the parents, on whose model the child has learned to speak.

4. See Mayr, Max (1980), *Das Wienerische Art und Redensart*, 27–39: "Das A". Wien: Amalthea Verlag.

The linguistic environment of the main subject is normal. The father (the writer himself) speaks actually the dialect of Hunan (more exactly, of Hengyang) as a mother tongue ("mother" in the sense that he used to, and occasionally still, communicate with the parents only in this dialect). In addition to this, he started some time as far back as he could remember in his childhood to speak another dialect, Cantonese, as a "second mother tongue" (in the sense that his competence of the latter amounts to the former, and in certain areas of communication even surpasses it), in a place where Cantonese is spoken as a native language. Then he came to acquire Mandarin Chinese as a third system, which again amounts to native competency except for a few imperfections. As to foreign languages he has learned English (at first British English and later American English) since primary school days and has then been teaching the language for some years. In addition, he came to learn German in Vienna. The linguistic background of the mother looks simpler. Natively born in Taiwan, she has been speaking Mandarin Chinese since childhood, though the native tongue of the parents is Hokkian (i.e., Fukienese). As a foreign language she has learned chiefly German, though some English in addition. At home, Mandarin Chinese is almost the only means of communication between husband and wife and between the child and its parents.

3.2 First-language Development

A detailed description of the acquisition of the mother tongue (Mandarin Chinese) of the main subject will require much more space than this article can provide. The writer will note here only a few points about the early first-language development of his child, which, he thinks, will relate occasionally to the child's later development of a second language (German)—although much more can be said about this early period of the child's linguistic development.

A corpus for L_1 -development of the child appears in Appendix I, from which the following important results and generalizations can be obtained:

1. The first phonetically well-defined sound, which was uttered by the child during the first month of its lifetime, was, idiosyncratically, some variety of the rounded low-mid front vowel / œ / (rounded counterpart of Cardinal No. 3). This, however, is suspected of being paralinguistic since the sound later did not recur and it does not fit into the system of the language.
2. A second vowel, which was uttered repeatedly (usually in combination with a consonant, as /ma: :/, /da: :/, /na: :/, /ha: :/, etc.) in the first six months of the

child's life, was a central /a/. This justifies the existence of a universal *a*-sound, which not only occurs in all hitherto known languages, but is the easiest for the child to produce.

3. Phonological patterns occur early in the child's language production. The early utterances, either significant (as /ma:ma/) or paralinguistic (as /ha: : /), lend themselves already to phonological structure: CV, CVCV, etc. Besides, it must be noted that the same pattern recurs, as /ma:ma/, /ba:ba/ and /da:da/, which appear in a /CV:CV/ structure (i.e., a repetition of the same CV syllable, only the vowel of the first is lengthened). This reveals the child's innate capacity for linguistic *systems*.
4. *Language develops socially*; whatever (or whoever) comes first into the domain of the child's life is linguistically developed prior to others—in this particular case, a doll (*wa-wa*), the grandma (*nai-nai*), the need of making water (*niao-niao*), the rice she eats (*fan-fan*), the need of going to bed (*chiao-chiao*), and the like.
5. Tones, which are difficult for speakers of non-tonal languages, develop early in utterances of the native child. This means that the child of any tone language has the innate capacity of acquiring such suprasegmental elements together with the segmental ones (i.e., the phonemes) through listening and imitation. As seen in the corpus in Appendix I, this child developed idiosyncratically firstly at the time of the eighth month a tonal configuration of LOW-LEVEL + HIGH-LEVEL for such NP's as *wa-wa* 'doll', *nai-nai* 'grandma', *niao-niao* '(want to) make water', *chieh-chieh* 'elder sister', *mei-mei* 'younger sister', etc. The low-level tone in all the first elements of these repetitive NP-constructions, however, is outside the basic tonal structures of Mandarin Chinese (which are high-level, high-rising, falling-rising, and high-falling). The subject obviously developed this particular tonal configuration through exact imitation of the parents, because they, when they first showed the child those things and told it how they were named, said exactly so. The combination of a low-level with the high-level for repeated NP's becomes, therefore, part of the dialect only of the family, if it does not exist in all other families.
6. As justified above, the child of any language has an amazing capability for imitation.
7. In the acquisition process of the first language (and also of a second), syntactic structures always develop from the simplest (usually a bare or repeated head-noun) to the more complex, as seen in the corpus.
8. Of the lexicon, function words come almost always after content words (note that in item 44 of the corpus there is not yet any conjunction between the two NP's, *ba-bi*

'papa' and *Yü-ting* '(name of the child itself)', which should have been joined to each other by a conjunction meaning "and").

9. Reduplication or repetition is a very common phenomenon in the language of the developing child. Reduplication has a two-way function and is in part the result of imitation. On the part of the parents, they think that deeper impression of a linguistic form can be made on the mind of the child when the same sound is repeated; on the part of the hearer (the child), perception of the form will be made much easier when the form is repeated. In addition, repetition of forms happens not only with nouns like *fan-fan* 'rice' (which is normally not repeated in the same situation as *wa-wa*, *nai-nai*, etc.), but also with elements of the other grammatical functions, as *yang-yang* 'itchy', *pa-pa* '(be) afraid', *tang-tang* 'hot, burning', *yao pao-pao-pao* 'want to run', *kuai-kuai* 'fast', etc.
10. In language production, the focus is always on the *function* of communication rather than on *form*, that is, on *what* is expressed rather than on *how* it should be expressed. There is therefore the principle of convenience and expediency. The child says things in whatever way in which the communicative function of language is fulfilled, and deletes whatever is unnecessary or secondary to communication. The self-evident subject of an utterance is therefore often omitted, so is an article, a conjunction, or the like. This is justifiable from the high frequency of subjectless sentences as *yao huei chia* '(I) want to go home', *yao pao-pao-pao* '(I) want to run', etc., from the occurrence of normally "ungrammatical" sentences as *ch'ü ma-mi* '(I'm) going (to) mama', and from the omission of less important grammatical classes (as the proper conjunctive element of the compounded subject *ba-bi Yü-ting* 'papa (and) I' in the last item of the corpus).
11. It may be concluded that, by the age of two, most of the child's important linguistic competence of the first language—almost all sounds of the phonological system, the basic tonal and intonational contours, a basic lexicon for use in daily life, together with a basic command of phrase structure and word-order—have been developed. This justifies partly the writer's conclusion that the first two years of the life-time of a child are crucial to its development of the first language and that, as will be shown later, in the time that immediately follows, a second language that amounts to bilingual status in the child will most naturally and easily develop, given the proper linguistic environment.

3.3 Second-language Development

The development of a second language (German) in the main subject of study has been an interesting and revealing process. This happened in a period of two years (September 1982 – August 1984) in the German-speaking country of Austria. The child, then one year and eleven months old, arrived in the capital of the country, Vienna, in mid-September, 1982 (the mother had already been there for a little more than one year) and was to stay there for at least two years. She arrived there with no previous knowledge of German. The next month, when she had just celebrated her second birthday, she was sent to a public Austrian kindergarten downtown Vienna, where she began to face a completely different culture and language.

The little child must have had a very hard time staying for the first few weeks in the Austrian kindergarten, for it had no linguistic means even to express its immediate needs (of hungry, thirst, etc.). The parents taught the child nothing of the language since, as a matter of fact, language could hardly be “taught” to a two-year-old child, unless it had the imminent need to *acquire* it.

The child did. A few weeks later, some German words began to slip from the tongue of the child. Those were all the words or expressions for basic needs in life and for the people and objects that the child came daily in contact with. In sequential order, they are:

(2) a. *Puppe* ‘doll’

b. *Tante* ‘aunt(ie)’ (the kindergartner)

c. *Lulu* ‘making water’

d. *nein* ‘no’

e. *esse* ‘eat(1st.sg.pres.)’

f. **drinke* (inexact form for *trinke* ‘drink(1st.sg.pres.)’)

g. *weg!* ‘(go) Away! Get out of here! Leave me alone!’

h. *O ja!* ‘Oh yes’

i. *weh-weh!* (expressing pain)

j. *nohomei* (*Wienerisch* form for *nochmal* ‘once again’, uttered with exactly the Vienna intonation)

k. *bitte* ‘please’

l. *hoppla!* ‘Watch out!’

m. *hallo* ‘hello’

n. *Wiedersehen* bye-bye! ‘Bye!’

- o. *das!* 'That (one)!'
 - p. *Suggie* (child form for) *Zucker* 'sugar, candie'
 - q. ?*Zuggie* (child form for) *Zucker* 'sugar, candie' or *Zug* 'train'
 - r. *muzzie* (child form for) *schmutzig* 'dirty'
 - s. **Wassa* (inexact form for) *Wasser* 'water'
 - t. *Hund* 'dog'
 - u. *Katze* 'cat'
 - v. *Siggie* '*Siggi* (the name of a cocoa drink)'
- w. *du!* 'you!'
- x. *bravo!* 'bravo! great!'
- y. *geh!* 'Go (away)!' 'It's permitted!'

It is interesting and revealing to scrutinize these early German utterances of the subject, especially in comparison with the development of the early utterances of the first language. To begin with, it is interesting that the form *Puppe* 'doll' developed as the first lexical item in the child's experience with the second language. From a socio-linguistic point of view, the situation is easily explained. The real story goes like this: On the first day when the child was brought to the kindergarten by her parents, she cried (as any other child may) and would not stay. The kindergartner held her in her arm and gave her a doll, saying, "*eine Puppe—das ist eine Puppe*" ('a doll—this is a doll'). This was actually the first German utterance that the child "learned." It certainly did not acquire the whole sentence with correct German inflection (which would be too complicated for her), but only the name for the object, *Puppe*. As a doll is perhaps the first personal belonging for all children, it is no surprise that the linguistic form for it develops very early in the child's language experience.

The second form which developed was the word for the kindergartner, *Tante*. This from a sociolinguistic point of view is again interesting and meaningful. Since the kindergartner was the first person whom the child there came in close contact with, the linguistic form naturally developed for her prior to all others. The same interpretation holds perhaps also for the development, in sequential order, of the next few forms in corpus (2): *Lulu*, the child form for going to lavatory, which is an immediate need for the child; *nein* 'no', the form for denial and rejection; *esse*, '(I) eat', for expressing something like "I'm hungry; I want to eat something"; **drinke* '(I) drink', for "I'm thirsty; I want to drink something", though with a mispronunciation of the unaspirated word-initial consonant cluster /dr/ for

/tr/ (the latter being more difficult for the child to pronounce); *weg!* 'Away!', the form for use when one is upset and wants to be alone, or for rejecting disturbance; *O ja!* 'Oh yes!', for confirmation in general, or for an agreement or consent made in a casual manner, like "That's all right!"; *weh-weh!*, the expression of pain, as when one gets hurt or stumbles over something, which happens very often among children; **nohomei* 'once again', a form with which to ask someone else to repeat something; *bitte* 'please', the most frequently and widely used word in the Austrian culture,⁵ which is often used even when the kindergartner speaks to the little children; and so on. In sum, at this point, it must be noted that the development of all forms—and in such an order—takes on almost always a social, environmental and/or cultural significance. Only in such a meaningful linguistic setting can the language of a child—either of the first or of a second—be properly and naturally developed.

One finds interesting results comparing the early developments of the two systems (i.e., L_1 , Chinese, and L_2 , German) in this particular case of the subject. Significant correlations seem to hold between the two processes. When one compares corpus (2) of L_2 with the previous corpus of L_1 (in Appendix I), some important results regarding the language development of this child—and presumably of all children of the same background—may be obtained, namely:

1. The linguistic form for 'doll' developed as the first meaningful lexical unit in both languages.
2. The forms for two persons, *nai-nai*, 'grandma' in L_1 and *Tante* in L_2 , developed respectively as the second significant forms in both processes. In exactly the same order (in both languages as a third item) developed the form *naio-niao* and *Lulu*, expressing the same basic need. So did the expressions for the other basic needs of life: *fan-fan* 'rice' and *esse* '(I) eat' developed as a fourth and fifth meaningful utterance, respectively, for example.
3. Interesting enough is that the form for negation and refusal (in Chinese, *bu*; in German, *nein*) developed in the observed child firstly in L_2 rather than L_1 . The German form *nein* developed very early in the child's experience of L_2 , when the corresponding L_1 form *bu* had not occurred. This explains probably the fact that in

5. The communicative functions of *bitte* are many, which correspond by and large to English 'please', 'you're welcome!', 'excuse me', 'come in (please)!', 'with pleasure!', 'don't mention it!', '(I beg your pardon?)', 'help yourself (to the food, etc.)!', etc.

the setting of daily life in the family, where the child gets along only with the parents and a few other family members and has therefore less necessity of saying no, there is relatively less need of developing the form for refusal in the early stage. In the kindergarten, however, where contact between people is much more complicated, the need of a linguistic form to deny, to refuse and to refute becomes much more necessary and pending.

4. Further, it has been observed that in the language of this child (and probably with most others) the linguistic expression for negation and refusal developed prior to that for confirmation and acceptance. As far as the writer's record of his own child goes, for example, the L₂ form *nein* 'no' occurred about one month prior to *ja* 'yes'. The L₁ forms *bu* 'no' and *shih* 'yes' did not develop until much later—and, again, the negative prior to the confirmative (*bu* developed at the age of about three, and *shih* is only a recent development in the speech of the child). This justifies the statement, such as of Critchley (1970), that for any child "a language of 'no'" almost always precedes "a language of 'yes'."⁶
5. In the case of early childhood bilingualism, as of the main subject here, who began acquiring a second language before the first language was fully developed, some L₁ forms or expressions, which should have been developed by a certain time, will however not properly develop because of a substitutional development of parallel forms or expressions in the second language. In other words, the L₁ forms are "choked up" owing to the development of L₂ forms with the same communicative function. For this particular subject, for example, the L₁ forms for such everyday expressions as *shih* 'yes', *bu-shih* 'no', *hsieh-hsieh* 'thank you', *dzai-chien* 'goodbye', etc., which should have been developed by the age of three, did not develop however until a much later time of almost four, when she had acquire the second language rather fully and when she was conscious of the existence of two different systems. The parallel German forms, however, developed in due course: *ja* as a substitute for *shih*, *nein* for *bu-shih*, *danke* for *hsieh-hsieh*, *auf Wiedersehen* for *dzai-chien*, and the like. The delay in the development of L₁ forms in this case was evidently due to the development of predominant forms in L₂ (language predominance is to be fully discussed in a later section).

6. See Critchley, MacDonald (1970), *Aphasiology and Other Aspects of Language*, "The City of Yes and the City of No", 368-82. London: Edward Arnold (Publishers) Ltd.

Stages of L₂-development and language consciousness

The development of the second language in the main subject of study may be divided into three functionally distinct stages. These are:

1st Stage: Oct. 1982 – Apr. 1983 (ca. 7 months)

2nd Stage: May 1983 – Aug. 1983 (ca. 4 months)

3rd Stage: Sep. 1983 – Aug. 1984 (ca. 1 year)

The division of the whole process of L₂-development of the child is by no means totally arbitrary, for it is based on an actual observation of the situation in which the language was acquired and manipulated by the subject being studied. Each of the stages has therefore its own characteristics.

The first stage

During the first stage of the child's second-language experience, which began with the day it was sent to the Austrian kindergarten, the subject exposed herself to whatever was exposed to her: the new language together with the new culture. The forms or expressions she acquired during this period take on a heavily loaded social significance. The first L₂ form she uttered, *Tante* 'aunt', for example, meant for her not only the person referred to (i.e., the particular kindergartner), but also perhaps *hoppla!* 'watch out!', *weh!* (an expression for pain), and the like. This is justified by the observation that, whenever some kid in the group stumbled over something, or whenever someone got hurt, she (as well as some other kids who saw it) almost always said "Tante!"—even when the kindergartner was not present. What's more interesting, the child uttered the same expression even at home, where there certainly was not such a person. This is to say, the form *Tante* meant for her, aside from the denotation of a kindergartner, also a call for attention and help in the face of immediate danger, for care in the face of need, for providing safety in the face of fear, etc.

A second feature of the first stage is that, except for a few, all the utterances were made up of only one word (see the previous corpus of (2)), i.e., almost all of them were single-word expressions or the so-called one-word sentence. At this point it must be noted that many of the one-word utterances of little children from a functional point of view should be considered as full statements (i.e., propositions) rather than as isolated lexemes because they stand for complete propositional concepts of the child who utters the forms. As the child said "Das!" (lit. 'That/This!'), for instance, it meant, judging from the

situation of communication, "I want that one." The complete proposition was in the mind, though the child did not yet have the kind of language—language in terms of the adults—to express it.

A third characteristic at this stage is the lack of inflection. For any highly inflected language like modern German it is impossible to expect anyone who sets out for it to produce the language with all the correct inflectional endings of the proper sentence. At least two items in the child's early speech, however, seem to have been correctly conjugated: *esse* '(I) eat' and **drinke* '(I) drink'. These are still to be considered as solid forms, which are perhaps the result of direct imitation, for, at the same time, there was no form in the speech of the child as *ißt* '(you/he/she) eat(s)', though once for a while there was the fluctuation between *esse* (the proper form for the 1st.sg.) and *essen* (the infinitive form and the form for 1st. and 3rd.pl., and for the polite form of 2nd.sg. and pl.), sometimes saying *esse!* and some other time saying *essen!* for the function of 'I want to eat (this, that, something)'. As another example the child said, instead of the correctly conjugated form *schlafe* '(I) sleep', almost always the infinitive form *schlafen*. All this and similar evidence indicates that, when any child, native or non-native, comes to acquire such a highly inflected language as German, it acquires the lexical items together with the forms in which the lexemes happen to show up for that particular communicative function; and not, as one supposes, acquires lexemes and forms separately. That is to say, the lexeme, the form, and the semantic function are acquired altogether as a single unit.

A fourth feature is that, as with the early development of the mother tongue, grammatical markers are almost always deleted. Instead of *nimmt den Ball* 'Take the ball', for example, the child almost always said *nimm Ball* (lit., 'Take ball'), where the definite article, together with its case information, is deleted.

A final characteristic of the first stage is the unawareness of the existence of two systems. This is interesting, for the child, while speaking two completely different languages, was not conscious that actually there were two. Thus it may well be said that, mentally, the two systems were fused into one in the child, though in actual application the child somehow had the innate capability to keep the two apart and switch between them.

The second stage

The second stage of the development of L_2 in the main subject is characterized by the emergence of short but grammatically full sentences, by the occurrence of case in-

flection, by a better manipulation of the grammatical gender of nouns, and by more frequent use of pronouns and function words. Part of the utterances of this period appear as follows:

- (3)
- a. *daher!* 'from there!'
 - b. *komm!* 'Come!'
 - c. *dank schön* (inexact form for *danke schön* 'Thanks a lot')
 - d. *komm mir her!* 'Come to me (here)!'
 - e. *du nie!* 'You can never (do that)!'
 - f. *na geh!* 'Oh go!' 'Oh, that'll do!'
 - g. *ja?* 'Right?'
 - h. *ein, zwei, drei, los!* 'one, two, three, go!'
 - i. *der Mond da!* 'The moon there!'
 - j. *eine Puppe das!* 'That's a doll'
 - k. **die Hande* (incorrect form for *die Hände* 'the hands')
 - l. **das meine Papa* (inexact form for *das (ist) mein Papa* 'That('s) my papa')
 - m. **meine Muttie komm* (inexact form for *meine Muttie kommt* 'My mother is coming')
 - n. *Schau mal das!* 'Just look at that!'
 - o. *ist gut* '(It) is good'
 - p. *mach das!* 'Do it!'
 - q. **ich gehe wasche* (inexact form for *ich gehe waschen* 'I go to wash (my hands)')
 - r. *mein Papa da* 'My papa there'
 - s. *nimm den Ball!* 'Take that ball!'
 - t. *Papa schau! die Tante mach das!* 'Papa look! The auntie does (is doing, did) that!'
 - u. *naß!* '(It's) wet!'
 - v. *was ist das?* 'What is it?'
 - w. *Essen auf dem Tisch* '(The) meal (is) on the table'
 - x. *ich komme morgen wieder* 'I come tomorrow again'

Interesting and significant conclusions can be drawn from a comparison of corpus (2) and corpus (3). Whereas almost all utterances in (2) are one-word sentences, most of (3) are composed of two or more words and some are even longer. It was in this period that basic structures of sentences began to evolve. Aside from the early one-word

imperative sentences in the structure of V (as *geh!* 'Go!', *komm!* 'Come!', *schau!* 'Look!', etc.), emerged now the structures V+O (as *schau mal das!* 'Just look at that!', *mach das!* 'Do it!' and *nimm den Ball!* 'Take the ball!'), S + V (as **meine Mutter kommt* 'My mother is coming'), V+Comp (as *ist gut* '(It) is good'), S+V+O (as *die Tante macht das* 'The aunt (i.e. the kindergartner) does it'), Comp+V+S? (as *was ist das?* 'What is it/this/that?'), etc.—all the basic structures of the language. A number of utterances, however, remained an "unorthodox" kind⁷ until the missing grammatical category—in most cases the verb *sein* 'be'—developed, as *du nie!* (lit. 'You never!', = 'You may never do that!'), *der Mond da* 'The moon (is) there', *eine Puppe das* (lit. 'A doll that', = 'That is a doll'), **das meine Papa* 'That (is) my papa', *mein Papa da* 'My papa (is) there', *Essen auf dem Tisch* '(The) meal (is) on the table', *du schlimm!* 'You (are) bad!', *du böser Mann* 'You (are a) bad guy', etc. Among these, *ist gut* (lit. 'is good', = 'It's good/That's alright') is normal, idiomatic German, which should from a colloquial point of view be considered as a complete sentence; and *mein Papa ist das* (lit. 'My papa is that', = 'That is my papa') is a possible ordering in German.

In both corpora (2) and (3) of the early language production of the child, "errors" or "mistakes"⁸ of various forms are bound to occur (the more conspicuous of them being marked by an asterisk *). They are, however, errors of a developmental kind, which means that they are the results of natural development when a child acquires a language. The term "developmental errors" usually applies to those which are made in acquiring one's mother tongue. Since, as stated previously, the child in discussion was actually developing or *acquiring* the German language as a *parallel* system to the mother tongue at a time in early childhood when the native language had not yet fully developed and, moreover, in a linguistic community where the language is spoken as a native language and as the sole means of communication,⁹ those errors should therefore be considered as developmental in contrast to those as committed by normal second-/foreign-language

7. As versus traditional, grammatically full sentences, an unorthodox sentence may appear without a subject, without a verb, without proper conjunctions, or without a complete predicate, as long as the prime communicative function can be fulfilled, e.g.:

And so on to Bangkok. Spit and hiss of water, the gramophone quiet. The lights out along the deck, nobody about.

—Graham Greene, *The Shipwrecked*

8. These, of course, are taken from the adult's norm. From the language norm of the child, they may not be "mistakes" or "errors".

9. The Austrians seldom speak English to foreigners, nor do the kindergartners to non-native children.

learners, who are developing or *learning* the language primarily as a *secondary* system. In other words, the case involved is one of *bilingualism* and not of language learning in an ordinary sense.

We are justified in considering the case in question as one of second-language *acquisition* for a number of reasons, though normally one *learns* a second language and *acquires* the first. The reasons are: 1) the process of development took place in early childhood, long before the critical age; 2) the environment was a native one; 3) the time or degree of exposure to the second language was about the same as that of the first, if not more;¹⁰ 4) almost all errors show developmental characteristics. We will make clear the last point here by some further discussion that follows.

From an *a priori* point of view it is usually difficult, though not entirely impossible, to define what “errors” or “mistakes” actually are in the speech of children in infancy and early childhood. The difficulty lies in a number of areas—in defining and delineating the normal, “right” code of speech for the child, i.e., in establishing a language norm if there could be any; in separating what belongs actually to the already internalized system of the child and what is only casual, sporadic failures in linguistic performance (as slips of the tongue) or merely a partial, imperfect imitation of adults’ speech (a slip both of the tongue and of the ear); and, in practice, in collecting early-childhood language corpora. In any analysis or description of the language—especially of the “errors”—of children, one has to, therefore, resort to the code and norm of the adult, i.e., to what the grown-ups think the language of the child “should be.” In so doing, more often than not, the results obtained and conclusions arrived at can be at some distance—closer or farther—from reality.

A few examples will make the writer’s point clearer. In corpus (2) there is a single-word utterance **drinke*, spelled in the way it was uttered but marked in the written form for presentation with an asterisk, showing that the spelling from the point of the normal orthography of the language is considered as “incorrect.” This does not mean however, that the original utterance of the child was absolutely or necessarily “wrong” (i.e., it was necessarily an “error” either in the sense of the child or in the sense of the adult)¹¹

10. The main subject (the writer’s child), for example, stayed about eight hours a day, five days a week, in the Austrian kindergarten; while she stayed, on weekdays, no longer than that at home with the parents (sleep hours excluded).

11. Children and adults have different language norms.

because a number of possibilities circle the problem. First there is the question of whether the utterance was an *error* in the proper sense of the word or it was only a slip of the tongue on that particular occasion of expression or merely the result of imperfect imitation. In the former case of being an error, the substitution of a word-initial consonant cluster /tr-/ by its unaspirated counterpart /dr-/ should have occurred also elsewhere as in such words as *tragen* 'carry', *Traum* 'dream', *Treppe* 'staircase', and the like, which are part of the basic vocabulary of children, making them **dragen*, **Draum*, **Dreppe*, etc. But no evidence of this kind existed because at the point of L₂-development of the child the latter forms had not yet developed. Thus there is no way to determine whether the misformed element belongs to the *system* of language of the subject studied.

Besides, a form like *trinke*, when uttered in isolation as a substitute for a complete predication, may take on one of several possible meanings. It may be part of *ich trinke (etwas)* 'I'm drinking (something)', by which the child may also express the meaning of an intention or a request: "I'm thirsty and want to drink something. Will you please give me something to drink?" (as said to the kindergartner). But, as the fuller, grammatically "correct" form had not developed yet, the child used naturally what it could to express what it intended to say. Another possibility is that the form *trinke* has been used as an imperative in the second person singular (*trinke!* 'Drink!'), but this is less likely because, in colloquial speech and especially the speech of the child, the informal form of the second person singular imperative is *trink!*, where the final *-e* of the more formal form is omitted. Another example, *die Tante mach das* of (3t), where the form of the verb *mach* is correct when the sentence is an imperative (in this case the definite article will usually be omitted,¹² *Tante* appears notionally in the vocative case, a pause with the value of a comma should appear after the vocative noun, and an exclamation mark should normally be placed at the end of the sentence in writing, producing *Tante, mach das!* 'Auntie, do it!') but incorrect, when it is not, will provide substantial difficulty for the error-analyst to decide whether the form of the verb *mach* (2nd.sg. imperative, colloquial), instead of *macht* (3rd.sg.pres. indicative), is an error or not. Luckily, in the context of *Papa schau! die Tante mach das!* 'Papa, look! The auntie does (is doing) it', it is easier to judge that the second part of the utterance is an indicative rather than an imperative and, as such, *mach* should be changed to *macht* when the time reference is present and to *machte* 'did' or

12. Sometimes it may also occur, as: "Der Herr, was möchten Sie?" ('Sir, what do you want, please?')

hat . . . gemacht 'has done/did'¹³ when the time reference is past or perfect.

Some other deviations from adult speech as found in the corpora (2) and (3) are the use of *dank* for *danke* in (3c), *Hande* for *Hände* in (3k), *meine* for *mein* in (3l), *komm* for *kommt* in (3m), *wasche* for *waschen* in (3q), etc. When all these and other "errors" are corrected in the way the adult thinks they should be, they become no doubt "better" language—but no longer the child's language. The developing child is bound, therefore, to make mistakes.

In addition, results of the observation of the language of the developing child confirm the general statement that the final linguistic code of the child is the result of slow, continuous development and evolution. It is the result of a long, continuous process of self-adjustment, self-correction, internalization, and generalization, discarding whatever does not conform with the general code of the speech community and consolidating whatever does in its way to approximate the general, adult code. Let us look closely at some more details of the corpora:

1. *Development of verb forms:* Conjugation of German verbs is much more complicated than that of English and as a result it is generally much more difficult to acquire the correct verb forms of German than those of English. For any verb, for example, there exist several different forms in the Indicative Present:

<i>ich komme</i> 'I come' ¹⁴	<i>wir kommen</i> 'we come'
<i>du kommst</i> 'you come'	<i>ihr kommt</i> 'you come'
<i>er/sie/es kommt</i>	<i>sie kommen</i> 'they come'
'he/she/it comes'	

And, as in Mandarin Chinese, there exists also a particular pronoun form for the polite address in the second person, singular and plural (the plural form of Mandarin Chinese, *?ning-men* 您們, being less acceptable), which in isolation can be distinguished only in writing:

Sie kommen 'you(sg. & pl.) come'

For the imperative there exist also different forms for the second person singular and plural:

komm! '(you) come!' *kommt!* '(you) come!'

-
13. German present perfect corresponds English present perfect and simple past. German simple past, however, is much more limited in use than English simple past.
 14. German has no progressive tense forms; simple forms, therefore, also signify progressive meaning, depending on the context. *ich komme*, for example, corresponds either *I come* or *I am coming*.

as well as a polite form for both singular and plural:

kommen Sie! '(you, sg. & pl.) come (,please)!'

With such complexities in the conjugation of verbs (not to mention the preterite and the subjunctive, which involve both a change in stem vowel and suffixation, as *ich kam* 'I came', *du kamst* 'you(sg.) came', *ich käme* '(if I) came', *sie kämen* '(if they) came', etc.), it is certainly not possible to expect the developing child to be able to manipulate all these forms correctly. Among them, the child developed, pragmatically, first the imperative singular:

komm! 'Come!'

schau! 'Look!'

schau mal das! 'Just look at that!'

mach das! 'Do it!'

geh! 'Go (away)!'

**nimm Ball!* 'Take (the) ball!'

Then, perhaps on the basis of an imperfect imitation of adult speech in the first person singular (like *ich esse, trinke, schaue . . .* 'I eat, drink, see . . .'), developed in the utterances of the child as a second category of verb forms this 1st.sg.pres. indic., as *esse* '(I) eat/am eating' and **drinke* (for *trinke*) '(I) drink/am drinking' in corpus (2), meaning actually perhaps "I'm hungry (thirsty) and I want to eat (drink) something." Then, still later, emerged the infinitive or name-form *essen* '(to) eat', *trinken* '(to) drink', *schlafen* '(to) sleep', *waschen* '(to) wash', and the like. This contradicts the misconception that the name-form (i.e., infinitive or "dictionary form") of a verb is usually the first and easiest to develop.

2. *Acquisition of the articles and case markers:* The German language is well-known for its 4-way distinction of case—the nominative, the genitive, the dative, and the accusative (referred to in all grammars of German in this order as the 1st., 2nd., 3rd. and 4th. case respectively). The picture is a little simpler than that of Latin (which has six) but presents still much difficulty to the non-native learner of German. Verbs and prepositions occur only with specific cases to whose category they belong, and very often the taking of one case instead of another is one of history and idiom rather than of reason and analogy. Within the boundary of the German sentence, all articles, pronouns, nouns and adjectives must agree with one another in this 4-way distinction of case. This from a theoretical point of view is by no means easy for the developing child. In practice, however, any native child, perhaps owing to its innate

capability for the first language, seems to have less difficulty. In corpus (2) we find such utterances as *komm mir her!* 'Come to me here!' and *nimm den Ball!* 'Take the ball!', in which a personal pronoun in the dative case, *mir* 'to me', and a definite article in the accusative, *den*, was correctly used. Afterwards, other forms like *zeig mir* 'Show me', *gib mir das* 'Give me that', *alles von mir* 'All from (belongs to) me', *Sag mal mir* 'Just tell me', *ich gebe das dir* 'I give you that', *hilf mal mir bitte* 'Just help me please', and the like, developed also in due course in the speech of the child. As to the articles, there developed firstly the bare form of nouns, as *nimm Ball* 'Take (the) ball', and later the form with a correctly inflected article, *nimm den Ball* 'Take the ball'. Between these two, there has been a period of hesitation and fluctuation, in which the child produced **nimm das Ball*, by analogy of the somewhat universal demonstrative function of *das*.¹⁵

3. *Acquisition of gender:* The three-way distinction of grammatical gender plagues the non-native learner of German even more than the four-way distinction of case. This is because the number of preposition and commonly used verbs (to which specific cases are assigned) is relatively limited and some of the choices can be inferred from analogous instances or from meaning. Nouns, or the names of all things, are much more in number, however. Aside from the relatively few cases of natural gender, the gender of most German nouns is grammatical and arbitrarily assigned; there is no reason, for example, to think of the sun as female (thus, *die Sonne* 'the sun') and the moon as male (thus, *der Mond* 'the moon')—quite the opposite in our culture!—or the same word *See* as male when it means the lake (thus, *der See* 'the lake') and as female when it means the sea (thus, *die See* 'the sea'). Even more unreasonable is to consider the two words for young girls, *Mädchen* 'girl, lass' and *Fräulein* 'miss' both as neuter (thus, *das Mädchen*, *das Fräulein*). Since in German as well as in many other Indo-European languages all beings of the universe, concrete or abstract, are assigned specific grammatical sexes, the situation places a very heavy load on the memory of those whose language has not (as Chinese and modern English). And, as all the articles, pronouns, nouns and adjectives of the German sentence inflect with this 3-way distinction of sex of every noun in the sentence, one can hardly construct even one completely correct sentence without a clear-cut recognition of the gender of

15. German *das* may be a definite article (3rd.sg.neuter, nom. and acc.), a demonstrative pronoun, a demonstrative adjective, or a relative pronoun.

all the nouns in the sentence. What's more difficult, all such information must be controlled and processed all at once at the fraction of a second of speaking. In order to produce a simple sentence like

Sie gehen in ____ Restaurant und bestellen ____ Wiener Schnitzel, ____ Kalbsbraten, ____ Kotelett, ____ Wurst und einige Brote. ____ Trinken bestellen sie ____ Aperitif, ____ Milch, ____ Kaffee, ____ Bier und ____ Apfelsaft. Aber sie bestellen ____ Suppe und ____ Salat.¹⁶

the non-native learner has to keep in mind all the different grammatical genders of the things involved—say, that Vienna veal cutlet (*Wiener Schnitzel*) is neuter (sometimes masculine), that a restaurant is neuter, that roast veal (*kalbsbraten*) is masculine, that cutlet (*Kotelett*) is neuter, that sausage (*Wurst*) is feminine, that aperitif is masculine, that milk (*Milch*) is feminine, and the like—for the correct use of articles. And all this must be done in a fraction of a second! It is therefore no easy job for the non-native. How, then, does the native child come to manage this? The question is by no means easy to answer. From a general point of view, all children are born with the innate capability to acquire their native language, no matter how simple or complex the language is. Yet this does not happen overnight. The acquisition of the grammatical gender of nouns in German children, as the writer observes, is the result of a long, gradual process of identification, differentiation, analogy and self-correction. It is a process of accumulation and practice. The native child usually begins its linguistic experience without much consciousness to the sex of persons and things it encounters, using normally only the bare form of nouns without sex distinction, as *Tante komm(t)* 'Auntie, come!/Auntie is coming', *Puppe da* '(The) doll (is) there', *schau! Mond!* 'Look! (the) moon!', *Hund ist da* '(The) dog is there', *nimm Ball!* 'Take (the) ball', etc. Later on, as the child begins to recognize that there is still something (i.e., an article with gender inflection) that goes with most of the names of persons and things, it begins to imitate it, producing *die Tante* 'the auntie' (the kindergartner), *die Puppe* 'the doll', *die Suppe* 'the soup', and a few others. Soon the child developed also the feminine possessive adjective *meine*, saying *meine Tante* 'my auntie', *meine Puppe* 'my doll', *meine Muttie* 'my mother', *meine Suppe* 'my

16. The answer is:

Sie gehen in *das* Restaurant und bestellen *ein (einen)* Wiener Schnitzel, *einen* Kalbsbraten, *ein* Kotelett, *eine* Wurst und einige Brote. *Zum* Trinken bestellen sie *einen* Aperitif, *eine* Milch, *einen* Kaffee, *ein* Bier und *einen* Apfelsaft. Aber sie bestellen *keine* Suppe und *keinen* Salat.

soup', etc. And, by analogy, it produced also forms like **meine Papa* 'my papa' (as in (31), **das meine Papa* 'That('s) my papa'), **meine Essen* 'my meal', **meine Löffel* 'my spoon', **meine Haus* 'my house', and the like, naming all things as though they all were feminine, until the correct form, *mein Papa* (masculine), *mein Essen* (neuter), *mein Löffel* (masculine), *mein Haus* (neuter), etc., finally developed. Among those, one form, **meine ba-bi* (*ba-bi* being an idiolectal form for 'papa' in the writer's family) persisted until a very late stage of the child's L₂ development. The predominating use of the feminine forms even in case of mistakes is socio-psycholinguistically interesting. Judging from the first linguistic contacts with L₂ of the child in which it acquired two feminine forms, *Tante* and *Puppe*, prior to all other forms, one finds it natural and predictable that the child will easily overgeneralize the rule for *meine Tante* and *meine Puppe* to produce *meine Muttie* (which happens to be correct) as well as **meine Papa*, **meine Löffel*, **meine Haus*, etc. (which happen to be wrong). With the elapse of time the child began to recognize that what it said deviated to some extent from the speech of others who said *mein Papa* instead of **meine Papa*, *mein Haus* instead of **meine Haus*; and the like, the child then revised his own system to conform with the general system of the speech community, thus producing a correct form like *mein Papa da* 'my papa (is) there' of (3r), which appeared almost three months later than (31), **das meine Papa* 'That('s) my papa', shown in the same corpus. We conclude here that the language of the child, the final product, is the result of a process of recognition, imitation, practice, approximation and consolidation. It is also a process of trial-and-error, of generalization and analogy, and of self-adjustment and self-correction. Nothing comes out of thin air—and overnight.

The third stage

The third (last) stage of the second-language development of the main subject distinguishes itself from the previous two not only in terms of language structure, but, more significantly, in terms of language consciousness. Formerly it has been mentioned that the child was even not aware that it was using two different linguistic systems until a very late period of time. Such an unconsciousness to the existence of two languages lasted almost a whole year until the end of the second stage. Switch between the two codes (to be discussed more fully in a later section) was therefore not only natural but unconscious. The parents, for the very reason of language-development psychology, never told the child (whose language was being investigated) that at this time "you are speaking German" and,

at another time, "speaking Chinese" instead; otherwise the child would be conscious of the existence of two distinct systems and hesitate in the face of a communication situation which should be used. They never used any translation method to "teach" their child any German, either. As a matter of fact, communication between husband and wife was conducted almost exclusively in Mandarin Chinese rather than in German, for, if they did, the communication situation would sound very unnatural and artificial. The child, however, would occasionally utter some German to its parent or to itself (as in the case of murmur). Very often the child, especially when she had just got home from the kindergarten where language contact in German between children and between children and the kindergartners had been intensive, murmured altogether in German rather than in Chinese at home, as the father was preparing dinner and she herself was indulged in her toys. An example of such murmur, taken exactly as it appears in tape-recording made some time at the end of the second period, is as follows:

- (4) (the child alone in the living room) . . . *alles komm glei' komm pe la, alles komm pe komm pe la . . . auf der komm pe komm pe la . . . hm . . . hm . . . schau!* (the father comes into the room and the child stops murmuring)

The above is suspected of being the words of a simple song, which the child has learned in the kindergarten and has sung very often there. Many of the words were indistinctly uttered and are therefore unintelligible to the researcher—sounds like *pe*, *la*, etc. Some, however, are clear enough to be heard and written out: *alles komm glei'* (for *alles komm gleich!* 'All come at once!'), *auf der . . . (?)*, and the final imperative *schau!* 'Look!' (which is very clearly articulated).

To be able to murmur in a language means, so to speak, to have *internalized* the language. Here the word *internalize* means to acquire a language in such a way that it becomes part of one's *own* system, and no longer as a secondary, subsidiary system that stands outside the primary system. To internalize means also that the system that has been acquired or learned can be called up for use by the user for the immediate need of communication. It means that the system can be called up for use at his disposal, at any time and on any occasion—and, without much effort and consciousness. Translation does not enable one to internalize a language because, in translation, the one who translates is almost always conscious of the two systems he is bridging. In order to internalize a certain language one must have been so intensively trained that language consciousness is reduced

to a minimum. This is the case of murmuring. When one murmurs, one is usually not conscious of the language he uses. When one murmurs, one is usually not doing translation of any kind, but has to encode the concepts and propositions he has in his mind with a language of which he is normally unaware at the very moment of speaking. In order to be able to do this, the concepts themselves—at least part of them—must be formed in the language in use and not another; so must the propositions, which are to be realized as the surface sentences of speech.

This is almost exactly the case of the subject. She began to attend Austrian kindergarten at a time when the mother tongue had not fully developed, and therefore must have acquired, not a means of translation, but the language itself. Many of the concepts, especially the culturally specific ones, must have been formed directly in that language. The parents did not do any translation for her, either. They never once told her what something is called in one language and how it is named in the other. It was therefore the child's own privilege to decide to use which to express what.

Previously we have mentioned one characteristic of L₂ development of the main subject in terms of language consciousness, namely, that it was at the beginning of the third stage (or some time toward the end of the second) that the child began to be aware of the existence of two systems. This may be evidenced from the following corpus, which is a dialog between the child and her father, taken from a tape-recording made some time at the beginning of the third stage:¹⁷

(5) T: ... *Schau!*

F: *Was ist das?*

T: *Schau!* 方方的 *Was das?* 不要講德文嘛!

F: *Ja, Warum?*

T: 那個是方方的，對不對?

F: *Ja, das weiß ich.*

T: 不要講德文嘛!

F: *Warum? Warum nicht Deutsch?*

T: *Nein!*

F: *Nein? (both laugh)*

17: Transcribed exactly as it appears in the tape.

T: *Nicht* /d₃a:d₃/ . . . *nicht* /d₃a:d₃/ . . . /'a:'lai/, 過來 ! /lɔ'sai/, 過來 ! . . . *Ich trinke* 那個 . . .

F: *Was ist das, weiß du?*

T: /ŋhŋ/! (*expression of agreement*)

F: *Dort?*

T: *Brauch nich' das gern?*

F: *Was ist das, denn?*

T: *Aha! . . . Tante so machen . . .*

F: *So machen?*

T: /ŋhŋ/! . . . *neich . . . neich . . . Brauch nich' das gern?*

F: *Warum brauch nicht?*

T: *Ich brauch' nich' das.*

F: *Du brauchst nicht das?*

T: *Weisen so . . . das machen so machen!*

F: *Hast du schon mal das gesehen?*

T: /ŋhŋ/! *Mach das ja.*

F: *Mach das auf?*

T: /ŋhŋ/!

F: *Gut!—dann mach das auf! (brief pause) Paß auf! (laugh) Nein, das geht nicht, das geht nicht, das geht nicht . . .*

T: *Ich—ich mach—machen so!—machen . . . mach . . . nein!*

F: *Nein, nein, nein, nein, nein! Du kannst das nicht selbst machen!*

T: *O ja!*

F: *O ja!*

T: *Mein Bon—BON!*

(T=Ting-ting, the subject; F=father)

Several significant observations can be made of the above corpus. Firstly, code switch is much easier for the child than for the adult, a fact which can be justified from the frequent, natural and unconscious shift of code between German and Chinese in the speech of the child. Switch of code happens most naturally, as in *ich trinke* 那個, when the syntax and lexicon of the two languages blend at the outset of a discourse, or only when the problem is brought to the surface of awareness; elsewhere, as in the midst of a discourse, it is relatively low. Thirdly, the linguistic code (in this case, a second code), once triggered, moves on by itself—something which happens perhaps only with (bilin-

gual) children who have come to acquire a language since early childhood. Fourthly, grammar and form are less important for the child than is the pragmatic need of getting meaning across. As such, inexact pronunciation of words (represented by misspellings, as **neich*, perhaps for *nein* 'no' or for *nach* 'after'; **weisen*, for *wissen* 'know', etc.), grammatical ill-formedness of various types (as **weisen so . . . das machen so machen!*, reconstructed as *wissen Sie, es ist so . . . man kann das so machen!* 'you know, it is so . . . one can do it this way!'), elliptical structures (as *was das?*, for *was ist das?* 'What is it?'; *brauch nich' das gern?*, for *brauchst du nicht das gern?* 'Don't you need it (gladly)?'; *so machen?*, for *kann man so machen?* 'Can one do so?'; etc.), incorrect recognition and/or application of the gender, number, or case of nouns (as **meine Bonbon!*, for *mein Bonbon!* '(It's) my candy!') and inexact conjugation of verbs (as **ich mach—machen so!*, for *ich mache so!* 'I do it so!'), and the like, all occur. But the function of communion, it must be noted however, is not hindered despite all such "mistakes"; anyone who knows German can easily understand the meaning as intended and expressed by the child.

As a conclusion to this section, the writer would like to make one further comparison of the characteristics of the three stages in terms of language production on a stimulus-reponse (S-R) basis. The results, as then observed, are as follows:

Table 1: Language response in terms of stimulus

	S=L ₁	S=L ₂	S=∅
1st stage:	***L ₁	**L ₁	***L ₁
2nd stage:	**L ₁	**L ₂	**L ₁
3rd stage:	*L ₂	***L ₂	**L ₂

S=(language) Stimulus, L₁=first language (Mandarin Chinese),

L₂=second language (German), ∅=no stimulus, *=sometimes (ca.30%)

=usually (ca.70%), *=almost always (more than 90%)

The tabulated results require a little explanation: starting from upper-left representation of "***L₁", it means, during the first stage, when the stimulus was given in the first language (S=L₁, i.e., when someone said something to the child in Chinese), the response was almost always made also in the first language. Horizontally, when the stimulus was given in

L_2 (as when on a social occasion some bilingual Chinese children said something to her in German), the child usually responded still in Chinese. When there was no outside stimulus (i.e., $S=\emptyset$, as when the child was all by herself, murmuring, or when she started to say something to others), she said it certainly almost always in the native language. The situation has been somewhat changed in the second period, however, during which, when the stimulus was given in L_1 , the child normally responded also in L_1 —but once for a while she might answer in L_2 , even though the stimulus had been given in L_1 . When someone started to say something to her in L_2 ($S=L_2$), the response was usually made also in L_2 —though occasionally some Chinese words and expressions might slip out of the tongue (especially when the person involved was a Chinese bilingual of L_1 and L_2). And, when no one initiated the discourse ($S=\emptyset$), the child usually started it in L_1 —although occasionally she might begin a talk or murmur in L_2 . Finally, the situation was further changed at the third stage. When someone started saying something to her in Chinese ($S=L_1$), she might sometimes answer in German ($R=*L_2$); when the stimulus was given in German ($S=L_2$), the response was almost always made in German ($R=***L_2$); and, even when nobody said anything to her, she would still usually say something in German ($R=**L_2$). What happened in corpus (5), therefore, was an exceptional instance because, in such a situation, which was purposely created for linguistic observation, the child evidently sensed the artificiality and uneasiness in speaking German to the father, who had seldom done the same thing before.

During the last months of the child's stay in Vienna, she could understand and express almost all that is required, linguistically, for living in a German world. She understood almost all that was said by the kindergartners and nursing maids of the kindergarten. She communicated with her fellow kindergarten kids with ease and fluency. She had absorbed part of the Austrian culture and had some good Austrian friends both in the kindergarten and outside. She used the newly acquired language to talk, to agree, to reject, and even to convince and to coax (as when she said to some kid, who was younger than she: *"Du bist brav, ja? Ich komme morgen wieder bringe dir Zucker. Gut, ja?"*) ('You behave well, yes? I come tomorrow again (and) bring you candy. Good, yes?').

All this does not mean, however, the language competence of the non-native child amounts to that of the native child. Exact assessment of the command of L_2 of the child has not been made. There are different factors surrounding the two situations: 1) The degree of exposure is not the same: that of the native child is a complete one and that of the non-native child is only a partial one; 2) The linguistic background is not the same:

the native child has the language as the only system (monolingual), whereas the bilingual child has to take care of two; 3) The native child acquires its native language usually with the environmental support of a family, whereas the non-native child does it without such a support (see 3.1 for a fuller description of the linguistic background of the child in the family); 4) The motivation is not the same, either: while the native child has to develop the language as the sole means of communication, the bilingual child may only have to develop it as an auxiliary means and may sometimes resort to its first system. Despite all this, nevertheless, the child managed to develop the second language as an almost parallel linguistic system to the first: adequate for daily interaction, fluent in speaking, and “perfect” (in the sense of the child) in pronunciation and idiomaticity. In addition, she even acquired the Viennese accent (see section 2) of German, which sometimes the parents did not understand. The whole process is not only a fact, but a miracle.

4. The Linguistic Status of Some Fifty Bilingual Chinese Children in Vienna: A Brief Survey

So far the writer has presented and discussed in considerable detail the linguistic development, especially of the second language, of the main subject, his daughter, who is in some ways typical for the study. While a second linguistic code of the child was being developed, so was the first: it does not mean that somewhere and some time the native language of the child, which had not yet been developed by the time of the acquisition of the second language, ceased to further develop abruptly; otherwise it is no longer bilingualism but an abrupt change of code, which means simply the abandoning of one and the picking up of another. In the sections to follow the writer will present and discuss, though in less detail, the current linguistic situation of some fifty bilingual Chinese children in Vienna. The description and results, so assumes the researcher, will be projected to all other similar Chinese children in Vienna as well as in the whole of Austria (for a fuller description of the linguistic background of the population of subjects and related information, see the sections 1.1, 1.2, and 1.3).

The writer during his stay in Vienna (1982–84) had the chance to be acquainted with some Chinese families there. Many of those families had children who were bilinguals. Some of them, due to one reason or another, remained monolingual. Length of stay appeared of course to be one of the major but not the sole reason for which childhood bilingualism took place. Some children turned to be Chinese-German bilinguals after a certain period of stay (say, for a couple of years and not necessarily very long). Others

remained monolingual even after a rather long period of stay. Bilingualism depends, therefore, upon a number of factors, of which length of stay is only one. It depends, for example, partially on the linguistic situation of the family in which the child grows up, on the willingness of the child as well as of the parents to identify themselves with the language and culture, on the age of the child at which the child begins exposing itself to the language, on the kind of social company available for the child, and on the type of personality of the child. An ideal situation of bilingualism is therefore the result of the best combination of all these variables.

4.1 Language Dominance and Language of Contact

The phenomenon of linguistic dominancy is one of the most interesting in the bilingual child and its family. Thoeoretically, the two systems of the bilingual child should be in all respects parallel. Either of them should be used to fulfil exactly the same communicative functions. Actually, however, the two codes involved are never "parallel" in the strict sense of the word: one is bound to *dominate* the other. This is what we mean by the term *language (linguistic) dominance*.

According to the writer's survey and observation of the population of subjects, the picture of language dominance is by no means a simple one. The writer has made a personal record of the language of twenty Chinese children in Vienna with respect to the linguistic background of their family, the kind of school they attended, the length of time of stay in Austria, etc., and comes out with the following results:

Table 2: Language dominance of 20 Chinese children in Vienna

<u>Name of</u> <u>Subject</u>	<u>Age</u>	<u>Sex</u>	<u>Birth-</u> <u>place</u>	<u>School</u> <u>attended</u>	<u>LD of the</u> <u>parents</u>	<u>LD of the child</u>			<u>Length of</u> <u>stay in V.</u>
						<u>CL1</u>	<u>CL2</u>	<u>TDL</u>	
1. Wu	4	M	T	A.k.	C	C	G	G	3
2. Hsiao	9	M	V	E.s./A.s.	C	G/E	G	G	-
3. Chang ₁ *	8	M	V	A.s.	C/G	G	G	G	-
4. Chang ₂ *	5	F	V	A.k.	C/G	G	G	G	-
5. Chang ₃ *	3	F	V	A.k.	C/G	G	G	G	-
6. Everlyn*	3	F	V	A.k.	G/C	G	G	G	-
7. Chen ₁	7	F	T	A.k./E.s.	C	C	G	C	4
8. Chen ₂	5	M	T	A.k./E.s.	C	C	C	C	4

9. Liou	6	M	V	A.k./A.s.	C	C	G	G	-
10. Cheng	5	M	T	A.k.	C	G/C	G	G	4
11. Chian	4	F	V	A.k.	G	G	G	G	-
12. Huang	7	M	T	J.k./Am.s.	C	C/J	E/C	C	2
13. Yü	9	M	V	E.s.	G/C/K	G/K/E	G/E	?	-
14. Chiang ₁	5	M	T	C.k./A.k.	C	C	C	C	1
15. Chiang ₂	3	F	T	A.k.	C	C	C	C	1
16. Hsü	3	M	V		C	C	C	C	1
17. Chen'	12	F	T	A.k./A.s.	C	G	G	G	8
18. Tseng	8	F	T	A.k./A.s.	C	G	G	G	6
19. Chen'' ₁	4	F	T	-	C	C	C	C	1
20. Chen'' ₂	2	F	T	-	C	C	C	C	1

Ting-ting	4	F	T	A.k.	C	C	G	C	2
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Abbreviations: LD=language dominance, CL1=contact language 1, CL2=contact language 2, TDL=total dominating language, V(.)=Vienna, M=male, F=female, T=Taiwan, A.k.=Austrian kindergarten, A.s.=Austrian (primary) school, E.s.=English school, Am.s.=American school, C.k.=Chinese kindergarten (in Taiwan), J.k.=Japanese kindergarten (in Japan), C=Chinese, G=German, E=English, J=Japanese, K=Korean, /=and, “-” means in the column of “School attended” that the child had so far attended no school, and in the column of “Length of stay in V.” that, as the child was born in Vienna, it had stayed there since then. Lower-case numerals indicate children of the same family. Asterisk (*) indicates that the child is a half-blood. In “C/G”, “G/C”, and the like, ordering of the elements is significant.

Very interesting observations can be made of the above data. First is the existence of two contact languages of the bilingual children. A *contact language* is defined here as the one by which the bridge of communication is built. Like a *lingua franca*, a contact language makes it possible for speakers of partially different linguistic background to communicate with one another. Specifically here, “CL1” (contact language 1) refers to the language by which the child establishes contact with the parents (and the parents only), whereas “CL2” (contact language 2) refers to the one by which the child establishes linguistic contact with people other than the parents—with schoolmates, friends, playmates, etc., and even among brothers and sisters.

As is seen in the data, the distinction between two contact languages is not only beneficial but necessary for discussion. The contact languages for these two different communicative situations—one with the parents and the other with others—are for many children different, and therefore there is the need of establishing two contact languages.

A second necessity is the establishing of a so-called “total dominate language” (TDL) of the bilingual child. This is done in reaction to the consideration that, even when the child uses two (or more) linguistic codes in its contact with the already set up two different categories of subjects (i.e., parents and not-parents)—in other words, even when the child has an “almost equal command” of the two (or more) languages involved—one of the languages will still tend to dominate the other(s) in terms of the very competence of the child.¹⁸ This means, simply put, that the child, despite an almost equal command of two or more systems, still, by and large, commands one of them at best. The concept of a *totally dominating language* is therefore also necessary. Still next is the language dominance of the parents, which has been found closely correlated to the language command of the child (see 4.2 below).

A few examples will make the writer's point clear. Subject No. 2, Hsiao, a 9-year-old boy, for instance, speaks sometimes German and sometimes English to his parents, but almost always German to others (even to Chinese children). Therefore, his CL1=German and English (in shown order), and CL2=German, though he commands, by and large, German better than English. The parents of the child (whom the writer knows well) are both Chinese, the father being from Hongkong and the mother from Taiwan. The father has as his mother tongue Cantonese but has attended English schools (both in Hongkong and elsewhere) for a long time and therefore speaks English well enough. The mother has Mandarin Chinese as a mother tongue but has also for some reason come to speak English pretty well. And, when the two got married, they came to use Mandarin Chinese as a contact language between husband and wife. Therefore, the dominating language of the parents is (Mandarin) Chinese. The couple has moved from Taiwan to Austria for a long time and the child was born there in Vienna. For some reasons, however, the child was first sent, not as normally to the Austrian kindergarten (which is called actually *kindes-tagesheim* (lit. “day-time home for children” and lasts for five years (from 2–6 years

18. Ambilinguals, those who are equally conversant in all domains of language use in two languages, are very rare.

old)), but to the English School in Vienna, where the child acquired the language in its early childhood. Later on, the child was sent to the Austrian primary school, where he began to have more intensive contact with German (though he, being born in Vienna, had been exposed to the language long enough before that). German, then, became a full-fledged system in him. Chinese, though still the contact language between the parents, was much subdued in the speech of the child; he speaks it only occasionally with his parents—and in an obviously foreign accent—but most of the cases either in German or in English, which both the parents also command.

Another typical case of full acquisition of the second language (German) with subdued development of the first (Chinese) is the case of subject No. 11, Chian, a 4-year-old girl, born also in Vienna, who had by the time of investigation attended Austrian kindergarten for three years and had come to master German as though it were her native tongue.

A tape-recording of the language of both subjects (Hsiao and Chian, as described above) has been gathered by the author on a social occasion of Chinese families in Vienna, appearing on which were also many of the other subjects in Table 2 (namely, subjects nos. 7, 8, 12, 14, 15, 19, 20, and the little daughter of the author). The children were playing, laughing and tracing in a flock while their parents were chatting. One finds how close the speech of subjects nos. 2 and 11 comes to native speech (i.e., the Vienna variety of German: see Chapter 2), when one listens to the tapes gathered. (Owing to the scope of the paper, it will not be possible to include a section on the presentation and discussion of the material. Anyone who is interested in it may ask personally for it from the author.)

The most complicated case of bilingualism—multilingualism, more precisely—is perhaps the case with subject no. 13, Yü, a 9-year-old boy, who was also born in Vienna but whose case is much more interesting and revealing than all the others. The parents of the child are of different native language and nationality: the father is a Chinese from Taiwan and the mother is Korean. And, interestingly enough—as the author has been told—the husband and wife seemed to have no contact language at the time when they fell in love and got married (!). The two got to know each other some fifteen years ago in Germany, when they came from Taiwan and Korea respectively to study there. The man could by then understand and speak English pretty well but the lady only very little, and both could not yet communicate in German by the time of marriage. Then soon came the child. The mother, not yet able to speak German, Chinese (which never developed in her), and English, nursed the child naturally in her mother tongue, Korean, though both her German and English were much improved later. Further, the acquisition

of Korean as a mother tongue was reinforced by an additional factor of the mother of the wife (an elderly lady who understood only Korean and who came over to stay with the family soon after the birth of the child.) The child, then, acquired the native tongue of the mother as the first language, although the father, who did not (and does not still) understand Korean, could talk to his child only in Chinese, German, or English, which the child evidently did not understand (or understood only very little) and which did not develop in him until much later. “Very often,” said the father, “we just did not know what language to use while we all were sitting in the living room.” Furthermore, as one finds in the data, the child had attended only the British School in Vienna by the time of the survey. The contact language between the child and his parents was, at the time of the investigation, either German (to both parents), Korean (to mother only), or English (mostly to father). His second contact language was German (for life outside the family) and English (for life at the British school). As the child commanded the three languages, by and large, with the same degree of fluency, it is therefore difficult to decide which language—at least at the time when the survey was being made—he commanded *best*. Thus a question mark has been placed at the column of total dominate language (i.e., TDL being uncertain). This does not mean, however, that the child commands the three languages almost equally well *in all areas of language use*. As the three have been acquired at somewhat different periods of time, in different environmental settings, and in different communicative situations—that is, in different speech “domains” (see 0.):¹⁹

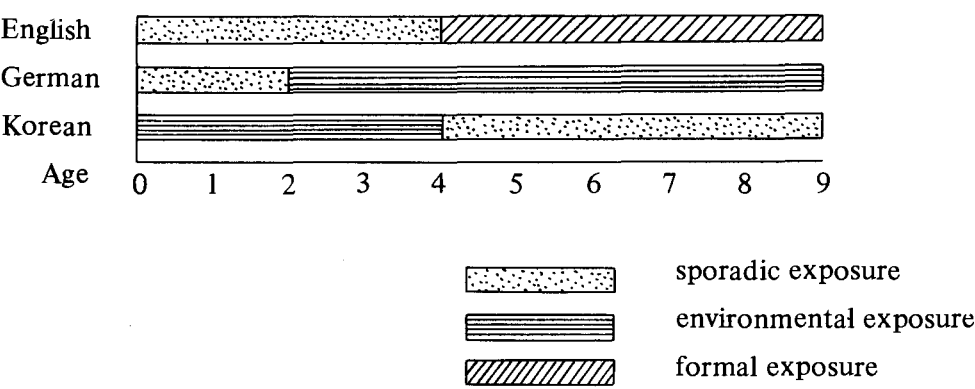


Fig. 1

19. In the figure below: “sporadic” as the term implies; “environmental” refers to the setting for daily life; “formal” refers to formal (school) education or instruction.

the child would, for example, express most easily whatever concerns study and school life in English (thus it is his "school language"), whatever concerns culturally specific aspects of life in Vienna (as what happens at *Heurigen* and *Prater*)²⁰ in German, and whatever concerns home life (especially home events with the mother and the grandma) in Korean. The child keeps, more likely than not, his childhood reminiscences in Korean than in any other language! This from a psycholinguistic point of view has to do with the formation of concepts through language.

4.2 Correlation between Language Command of Parents and Children

In families with biliugual children, it has been found that there is a somewhat close correlation between the language command of the child and that of the parents. The writer has tried to evaluate the language competence of both parents and children of some bilingual families in terms of a 5-level system,²¹ and the results are as follows:

Table 3: Correlation between L₂ command of children and parents

Subject	Child	Father	Mother
1. Wu	*****	****	***
2. Hsiao	*****	****	****
3. Huang	*	*	*
4. Yü	*****	*****	****
5. Chiang ₁	*	*	*
6. Chian	*****	*****	*****
7. Hsü	∅	**	*
8. Chen'	*****	***	***
9. Chen'' ₁	∅	*	∅
10. Chiang	***	***	****

*****=excellent, ****=good, ***=sufficient,

**=inadequate, *=very little

20. *Heurigen* is the kind of drinking and merry-making occasion which is typical of Viennese life, and *Prater* is the biggest, most famous amusement ground in Vienna.

21. This is done in accordance with the widely used grading system for all schools and all examinations in Austria: 1. sehr gut, 2. gut, 3. befriedigend, 4. genügend, 5. nicht genügend.

Here, “excellent” means a full command of L_2 , for use in all domains of language use in which the child falls; “good” means an intermediate level of proficiency less than a full command but more than “sufficient”; “sufficient” refers to a level of language command which is adequate for living in that linguistic community, i.e., enough for expressing oneself, for communicating with others, and for conducting daily interactions with native speakers of the speech community. The next two levels are as the labels imply. The correlation between the language command of the parents and that of the child is clearly revealed in Table 3 above.

4.3 Identification

Observation and tests have also been made of the bilingual children’s degree of identification with the language and culture in which they live, i.e., with Austria, its language and its culture. A small questionnaire (though far from a good one, as the researcher now looks back at it) has been devised and given to twenty bilingual Chinese children. The results are:

Table 4: Degree of identification

<u>Questions</u>	<u>Answers</u>			
	<u>“ja”</u> ‘yes’	<u>“nein”</u> ‘no’	<u>?</u>	<u>Ø</u>
N=20				
a. “ <i>Sprichst du Deutsch?</i> ” (Do you speak German?)	20	0	0	0
b. “ <i>Bist du Österreicher (in)?</i> ” (Are you Austrian?)	7	11	2	0
c. “ <i>Sprichst du auch Chinesisch?</i> ” (Do you speak Chinese, too?)	13	5	1	1
d. “ <i>Bist du Chinese?</i> ” (Are you Chinese?)	16	2	0	2

These questions, asked orally in German, are, as they appear to be, much too plain, so that the motivation of testing the psychologically subconscious sense of identification may not be elicited. Of the four questions, question (a) was answered by all twenty subjects with “ja” (“yes”), which means that they all can understand German (otherwise

they could not have understood the question given in German)—and that they confess this fact. For question (b) we get only 7 answers of 'yes' and 11 of 'no', with an addition of 2 uncertain answers (as "*weiß nicht*" ("I don't know"), "*vielleicht*" ("Perhaps"), and the like). This means that most of them still did not consider themselves to be Austrians, though some of the children may not have had a clear-cut idea as to the meaning of "*Österreicher(in)*" ("Austrian")—i.e., the basis on which the word is grounded (linguistic? cultural? political?). The answers to question (c) indicate that most of them (13 out of 20) confessed that they spoke also Chinese and 5 children did not, with one uncertain answer and one digressive answer, "*Mein Papa spricht Chinesisch*" ("My papa speaks Chinese"), which is classified as "unanswered" and indicated by the symbol "Ø". To the fourth question, which again is a "too-outspoken" question on identification, answered most of them (16 out of 20—an overwhelming majority) with 'yes' and only 2 with 'no', with an addition of 2 Ø's (one quiescence and one digression, "*Ich mag Chinesen*" ("I like Chinese")). This means that the identification to Chinese nationality (perhaps also language, culture and genealogy) is still high. One last point to mention is that, with question (c), the five who answered with 'no' appeared to be against the fact because, as the writer observed, all of them could understand and speak more or less Chinese.

4.4 Code Switch

Code switch, as the term implies, is the change of system or code in the midst of a discourse or within a given domain. The change is usually abrupt. With bilingual children, as has been observed, the change of code is often also natural, unconscious and unintentional. (With adults, however, this may not be so because, in the adult's case, there are usually more factors involved—the need of a professional terminology and some expressions in the other language(s), the intention of showing off, the vanity of identifying with the speakers of the language(s), etc.) More important, switch of code happens much more easily in children than in adults. According to the writer's observation, code switch happens very often in the speech of the bilingual children and, what's more important, the bilingual child can almost always switch between the codes much more easily than a bilingual adult—a fact which justifies the high flexibility in linguistic manipulation of the child. Such a flexibility in the child to switch between the two systems may take on two different meanings, each contradicting the other: either the two systems are not yet fully developed, so that the child has to make use of both, or they are so well developed, that they can shift between them at will. The decision as to which of these exists varies from case to case.

4.5 Language Typology and Transfer

German, being a member of the west Germanic branch of the Indo-European family, is typologically rather far from Chinese. According to the observation of the subjects, however, the kind of German, which has developed as a second or even first system in them, is *not* in essence different from that of the normal native child of German. This means that the non-native child can, under proper circumstances and at due time, develop a second language as a separate, independent system for itself. Interference from L_1 to L_2 in such cases is therefore only very little.

Conversely (i.e., from L_2 to L_1), however, the writer has observed some cases of interference, one of the most notorious of which appears as follows:

- (6) L_2 $\longrightarrow$ L_1
- | | |
|-----------------------------------|---------|
| A: <i>Ich gehe in die Schule.</i> | A: 我上學。 |
| 'I go to school.' | |
| B: <i>Ich auch.</i> | *B: 我也。 |
| 'Me too.' | |

This is a typical syntactic interference from German to Chinese because SUBJECT + *auch* is considered in German as a sentence with complete predication, whereas SUBJECT + *yeh* in Chinese is not. The writer himself, however, has actually heard **wo yeh* 我也 (from *ich auch* 'me too'), **ni yeh?* 你也? (from *du auch?* 'You too?'), **shih-de, wo ma-ma yeh* 是的, 我媽媽也 (from *ja, meine Mama auch* 'yes, my mama too'), and the like, very often on different social gatherings of Chinese, uttered by bilingual Chinese children of different ages.

Another common and important effect of the second language on the first has to do with the phonological development of the mother tongue. It is well known that the tones and tone sandhi of the Chinese language are most difficult for non-native learner of Chinese to acquire, and these are what by which any foreign speaker of Chinese may easily be recognized as "foreign" (i.e., speaking the language with a foreign *accent*). The native Chinese child living in a native speech community should normally have acquired the basic word-tones of the language as well as some configurations of tone sandhi by the age of about three (so is the case of the main subject). Some of the bilingual children, however, never acquired this aspect of their own language fully, or acquired it only much later than normally. These children, therefore, speak their own language with a "foreign"

accent. One can thus immediately recognize, for example, children nos. 1, 9, 10, 11, 17 and 18 in Table 2 as speaking their own language "with a somewhat different accent" from the normal native-born child.

Some other factors concerning the language development of a bilingual child include the personality of the child (as introvert vs. extrovert), the extent of social contact of the parents, the kind of lodging in the foreign land (as apartment vs. suburb-house living), etc., which, owing to the scope of the paper, cannot be further dealt with.

5. Implications for Learning and Teaching

German as a highly inflected modern language of the Indo-European family is in essence rather difficult for the grown-up non-native learner to learn. This is so not only with Chinese speakers, whose language is typologically far different from German, but also with English speakers, whose language is closer. Between German and English there is transfer—both positive and negative—in different aspects of language structure (a full discussion of which being outside the scope of this paper). And, according to the field observations of the writer at the language center of the University of Vienna (of which the writer himself was a student of the German course), English speakers did not learn German significantly more easily than Chinese ones. Although there is some positive transfer from English to German in some areas of phonology, morphology and the lexicon, at the syntactic level, however, transfer from English to German is more negative than not. With word order, for example, the English speaker has to "change the whole world" of his linguistic habits to adjust his English to German.²² German is difficult, therefore, not only for the Chinese learner.

The major difficulties in learning German for the adult Chinese speaker include: 1) word order and word-order change, 2) the acquisition of the grammatical gender of nouns and corresponding inflections, 3) the manipulation of the 4-way distinction of case, 4) the internalization of some aspects of the verb—the proper use of the subjunctive mood, the use of reflexive verbs and separable verbs, the use of the tenses, the identification of verbs which are formally very similar and of verbal prefixes (adverbial particles prefixed to verbs), the irregular conjugation of strong verbs, the collocation of many verbs with specific cases, etc., 5) the manipulation of the article system, 6) the pronunciation of some sounds and sound combinations (as previously discussed in Chapter 2),

22. This was said by one of the writer's classmates at the language center, a Canadian.

and 7) the suspension of the adverbial element of a separable verb, which is crucial to the total meaning of the whole sentence (clause), until the very end of the sentence (clause), thus causing much difficulty in oral comprehension.

All these and other difficulties in learning German are, of course, chiefly for the non-native adult learner of German, who is well over the critical age for language acquisition and who plods on learning a foreign/second language. For the bilingual children investigated, however, there seems to have been no or only little difficulty because almost all of them have begun the process at some time in early childhood, when the cerebral structure for language acquisition is flexible and beneficial.

We arrive therefore at the following conclusions (implications) for teaching and learning with respect to the above-mentioned areas of difficulty in the light of the language acquisition process of the Chinese-German bilinguals that has been expounded in the preceding chapters:

1. As the "second-slot-verb" word order of German is one of the most important syntactic features of the language, it must be emphasized from the very beginning of the teaching-learning process to fill the verb in the second "slot" (position) of the German sentence. This habit of always placing the verb in the second slot is, however, not easily formed by the Chinese learner of German because it clashes with the syntactic habits of his own. Negative transfer or interference from Chinese to German at this point of structure is therefore very high. For example, when one has the Chinese sentence (a) in his mind, he is very likely to produce the ungrammatical German sentence (b):

a. 火車明天早上九時三十分從台北車站開往高雄。

b. *Der Zug morgen früh um neun Uhr dreißig vom Bahnhof Taipeh fährt nach Kaohsiung.

He would probably not notice that, in German, the verb must always assume the second slot of the sentence, no matter what constituent assumes the first, as: *Der Zug fährt morgen früh um neun Uhr dreißig vom Bahnhof Taipeh nach Kaohsiung*, *Vom Bahnhof Taipeh fährt der Zug morgen früh um neun Uhr dreißig nach Kaohsiung*, *Morgen früh um neun Uhr dreißig fährt der Zug vom Bahnhof Taipeh nach Kaohsiung*, etc. Among these, the first is the unmarked, and the choice of any of the others depends upon the focus.²³ The beginning learner of German, however, is apt

23. Almost all kinds of constituents can be fronted to the subject position for emphasis or focusing.

2. With subordinate clauses, the word order of German appears to be even more “unnatural” both to the Chinese and to the English speaker because, in that case, the verb of the subordinate clause goes to the very end of the clause:

'I don't know whether (that) the train'

• *Informal:* Ich nehme die Straßenbahn. Die fährt zum Hauptpostamt.

length of the pause indicate either by the comma or by the period. Judging from this fact that children do not acquire relative clauses until relatively late in their language development and from the observation that children, even when they seem to form a relative clause, they form a pseudo one as (b) or (c) above, the teaching and learning of this aspect of German syntax should therefore be postponed until a later time when the normal nonrelative structures have been fully acquired and internalized.

3. With non-simple forms (tenses) of verbs (i.e., those which are made up of two or more words), the ordering of the elements of the verb appears even more difficult and sounds tongue-twisting to the Chinese learner, especially one with English background, for example, the Future Perfect Passive:

Ich werde gelobt worden sein. 'I shall have been praised.'

1 2 3 4 1 2 3 4

Here it must be noted that the four elements of the German verb do not correspond, as one might recklessly take it for granted, with those of the English verb. The English past participle, *praised*, comes always at the end of the verb phrase no matter how many auxiliary elements precede it; the German, *gelobt*, however, assumes the second position of the verb phrase or, in other words, follows immediately the first auxiliary element. As to the rest of the German verb, *sein* (infinitive form of the German verb-to-be) and *worden* (the auxiliary past participle form of *werden* 'become'), assumes respectively the last and third positions of the verb phrase. Thus, contrastively speaking, the elements of the German verb phrase correspond by and large to English **shall praised been have*. That is to say, in terms of English, the German rule is to place the first auxiliary in the first position, and then reverse all the other elements. This order, as has been observed and tested by the writer, is by no means easy for the Chinese student to acquire and, even for those with English background, it appears to be no easier. In the latter case, the difficulty lies in assigning a clear-cut one-to-one syntactico-semantic relationship between each pair of the auxiliary elements of the two languages (i.e., *werde*-*shall*, *gelobt*-*praised*, *worden*-*been*, *sein*-*have*), especially in the latter two pairs, where one can hardly ascertain that, in all cases, German *worden* and *sein* correspond respectively English *been* and *have* because *worden* is only one of the two past participle forms of *werden* 'become' and *sein* is

the infinitive form of the verb-to-be, though one can say that, in their auxiliary uses, *worden* fulfils here the function of passive and *sein* that of perfective. In this light we may perhaps safely conclude that, at this particular point of structure, the (positive) transfer from English to German is zero or even negative. It is advisable, therefore, that the non-native learner of German do not seek help from English at this point, for, when he does, the reasoning process becomes even more complicated than remembering the German form directly. This, judging from the acquisition of the language of the native or bilingual children, is true, for, when they come either to encode or to decode verb forms like *ich bin* 'I am', *ich bin gewesen* 'I have been', *ich werde gewesen sein* 'I shall have been', *ich werde gelobt worden sein* 'I shall have been praised', and the like, they normally do not think of the exact meaning of each of the components of the verb phrase but usually acquire the form and function of the combined unit as a whole.

4. The three-way distinction of grammatical gender of German is one of the most difficult aspects for the non-native learner to acquire. For the native speaker this seems to be no problem because 1) the assignment of correct grammatical genders to all nouns is the result of a long, accumulative process, which may last for many years until a full-fledged vocabulary, which is sufficient for all purposes of daily communication, has been developed; 2) even for the native child, the acquisition of gender is the result of an evolutionary process of several stages (this can be justified by the acquisition process of the writer's bilingual child, as expounded in Chapter 3), which, in sequential order, are: a) lack of gender distinction i.e., the use of bare forms of nouns in all contexts, as *das ist Puppe* 'that is (a) doll', *nimm Ball* 'take (the) ball', etc.; b) the use of incorrect gender markers or the fluctuation between different case markers for the same noun, as *das ist ein Puppe* 'that is a doll', *der Puppe ist da* 'the doll is there', *nimm das Ball* 'take the ball, etc.; c) hitting upon the correct form, as *das ist eine Puppe* 'this is a doll', *die Puppe ist da* 'the doll is there', *meine Puppe!* 'my doll! the doll is mine!', *nimm den Ball!* 'take the ball!', etc.; d) production of errors due to false analogy or overgeneralization, as the production of *meine Papa* by false analogy of *meine Mama* and *meine Tante*, etc.; e) differentiation and solidification (i.e., it is in this final stage that the child begins almost always to produce the correct form, making only occasional mistakes); 3) there is sufficient opportunity for practices from the speech community. For the non-native adult learner of German, however, none of these three advantages of the native child

exists: all at once he is faced with too many things and names of things, he has to hit the correct form at once since he has no time to go through the evolitional process, and usually he does not have a speech community in which to practice and strengthen what he has learned. In consideration of these difficulties of the non-native adult learner, the following guidelines should perhaps be observed by the teacher: 1) do not try to introduce all at once too many nouns (for example, no more than one dozen in the first hour of a beginning class); otherwise, teaching and learning would only be made futile; 2) solidify as far as possible the limited number of nouns introduced, together with their gender specification, and check this at every point of practice; 3) errors are tolerable but should be as far as possible corrected. This is very important right from the beginning of the teaching-learning process because, without the correct recognition of the gender of each German noun, one can hardly expect to produce even a single completely right sentence of the language, since all the articles, pronouns, (attributive) adjectives, demonstratives, etc., inflect with the noun. Incorrect identification of the gender of nouns result therefore in all kinds of errors. The non-native learner of German will not be able to produce a completely correct sentence until he is sure of the gender of *every* noun to be used in the sentence. Important as it is, there is unfortunately no rule governing the gender of the great majority of German nouns; only the gender of some nouns can be conjectured from their formal configurations, for which rules (though each with exceptions) may be formed: 1) nouns ending in *-e* (in German almost always sounded) are usually (but not always) feminine, as *Puppe* 'doll', *Tante* 'aunt', *Sache* 'thing', *Auge* 'eye', *Nase* 'nose', *Zunge* 'tongue', *Lippe* 'lip', *Lage* 'location', *Aufgabe* 'task, assignment', *Straße* 'street', *Blume* 'flower', *Liebe* 'love', *Höhe* 'height', *Küche* 'kitchen', *Kirche* 'church', and many others (common exceptions being *Gebäude* 'building', *Gedanke* 'thought', *Gebirge* '(range of) mountains', *Gatte* 'spouse, husband', etc.); 2) all nouns ending in *-ung*, *-keit* and *-tion* are feminine, as *Prüfung* 'examination', *Geschwindigkeit* 'speed', *Situation* 'situation', and many others; 3) most foreign words (naturalized or unnaturalized) are feminine (the *-tion* words being a major class); as well as such minor rules as 4) most *-er* words are masculine, as *Lehrer* 'teacher', *Bauer* 'farmer', *Fächer* 'fan', and the like, and 5) most *-nis* words are neuter, as *Zeugnis* 'certificate', *Ergebnis* 'experience', *Verhältnis* 'circumstances', *Geheimnis* 'secret', *Gedächtnis* 'remembrance' and a few more (such words, however, are limited in number; exceptions being *Kenntnis* 'knowledge', etc.). Aside from these and perhaps a few more rules,

the grammatical genders of German nouns, which are hundreds and thousands in number, are almost completely arbitrary and conventional: there is no reason, for example, why the sun should be feminine (*die Sonne*) but the moon masculine (*der Mond*), why the hand should be feminine (*die Hand*) but the foot masculine (*der Fuß*), why the head should be masculine (*der Kopf*) but the hair on it neuter (*das Haar*), why the lake should be masculine (*der See*) but the sea—in German the same word—feminine (*die See*) and something similar, *Meer* ‘sea, ocean’, neuter (*das Meer*), why a door should be feminine (*die Tür*) but a bigger door, a gate, neuter (*das Tor*), why wine should be masculine (*der Wein*) but beer neuter (*das Bier*), . . . , or why *Mädchen* ‘girl, lass’ and *Fräulein* ‘miss’, which are undeniably feminine, should be neuter.

None of these seems “reasonable”, yet all of them *are* German. The teacher’s task is, then, to help the non-native student, as far as possible, remember the exact gender of each German noun. At this point, the usual practice—and so far the best and “clumsiest” one—is to introduce any noun together with a gender marker (usually the definite article in the nominative case), saying “*der Kopf, die Hand, das Ohr, das Haar, die Auge, das Gesicht, der Körper, der Fuß, der Hals, der Magen, die Lunge, die Leber, das Knie, die Niere; die Sonne, der Mond, der Stern; das Land, die See, das Meer, die Luft, der Bach, der Berg, der Fluß, die Wiese, der Wald, das Tal; das Buch, der Bleistift, die Tafel, die Kreide, das Papier, das Studium, die Schule, die Universität; das Essen, das Getränk, die Suppe, das Kotelett, das (der) Wiener Schnitzel, der Wein, das Bier, die Wurst, der Salad, die Salami, der Appetit, die Frucht, der Löffel, die Gabel, der Apfelsaft, der Koffee, der Tee, das (Eß)Stäbchen . . .*” and not, as some teachers may do, only the noun alone: “*Kopf, Hand, Ohr, Haar . . .*” That is, whenever a noun is mentioned, it is mentioned together with the definite article, even though the definiteness of the person or thing referred to is not intended.

5. The four-way distinction of (surface) case of nouns, which is also to be agreed with in all the articles, pronouns, adjectives, etc., is another tough problem for the Chinese student to cope with. Certain verbs, prepositions and adjectives go with specific cases of nouns and therefore should be idiosyncratically memorized. Since the declension of German is an interaction of three grammatical features, gender, case and number, the user of the language has to, theoretically and conceptually, distinguish the choice of functions and forms among $3 \times 4 \times 2 = 24$ possibilities. In practice, how-

ever, as the plural forms for all genders are the same and some forms of the singular happen to coincide, there are actually far less than 24 formal (not functional) distinctions for a declinable lexeme. The definite article, for example, has six forms, *der, die, das, des, dem* and *den*, all of which are used for more than one grammatical function (*der*, for example, is not only the masculine nominative singular, but the feminine genitive singular, the genitive plural without gender distinction, and the feminine dative singular, thus: *der Mann* 'the man', *der Frau* 'of the woman', *der Männer, Frauen und Mädchen* 'of the men, women and girls', *der Frau* 'to (for) the woman'; another form, *den*, is not only the masculine accusative singular, but also the dative plural without gender distinction, thus: *die Frau liebt den Mann* 'the woman loves the man', *das Spiel gefällt den Kindern* 'the game pleases the children'). This is already too complicated for the Chinese (or English) learner of German to manipulate. Again at this point, judging from the previous observation that the native or bilingual child does not acquire all the case forms at once, that it acquires, in sequential order, first the nominative (which the child uses at first as an all-purpose form, as *der Ball!* 'the ball!', which may mean, depending on the speech situation, either *der Ball ist da* 'the ball is there' or *ich nehme den Ball* 'I take the ball'; as the accusative form *den* has not yet developed, the child uses the nominative form for both instead), then the accusative (as the somewhat later development of *nimm den Ball!* 'take the ball!'), then the dative (as found in the later development of utterances like *komm mir her!* 'come to me (here)!', *das Essen auf dem Tisch* 'the food (is) on the table', *mir gefällt nicht* '(it) doesn't please me/I don't like it', *mir ist gut* '(it) is good for me', *Das gehört mir* 'that belongs to me', etc.), and finally, much later, the genitive (as *der Ball meines Bruders ist da* 'the ball of my brother is there'). In the light of this "natural" order of development of the native (bilingual) child, the German teacher is advised to arrange his materials in the same order and should never present all case forms all together.

6. As the structure and function of German verbs appear in some respects again much more complicated than those of English and Chinese, substantial difficulties may arise for the Chinese learner even with English background. Such difficulties regarding the acquisition and use of German verbs lie mainly in the areas of 1) the conjugation of verbs, especially of the irregular strong verbs, 2) the use of the subjunctive, 3) the separable verbs, 4) the reflexive verbs and 5) the formal similarity between some verbs. To deal with each of these areas of difficulty, the German teacher may contrive

particular, sometimes personally preferred, techniques and materials. The writer makes however the following suggestions: for 1) above, care must be taken not to complicate the learning process by providing at the beginning a full conjugation of the German verb, which would run several pages and would do nothing but confusing the student and scaring him away. For 2), the introduction of the subjunctive should be retained until a much later time, when the students have familiarized themselves with the basic indicative and imperative forms; this complies again with the order of development of the native child, who does not acquire the subjunctive forms of his own language until much later. For 3), separable verbs,²⁵ since they occur so often both in the spoken and written language and cannot normally be replaced by another verb (this is a different situation from English, where most of the two (there)-word verbs—that is, VERB + PARTICLE combinations—can be replaced by a single-word verb without much loss of meaning and idiom), should be introduced and thoroughly drilled at due time in the beginning of the teaching process, because a late introduction of this facet of the German verb will leave the development of the separable verbs forever behind. Thus, whenever the communication situation requires, the teacher should introduce sentences containing separable verbs like *abfahren* 'leave, depart', *ankommen* 'arrive', *aufpassen* 'be careful (of)', *aussehen* 'seem, look', *beitragen* 'contribute', *darstellen* 'represent', *einkaufen* 'shop', *festhalten* 'hold fast', *herkommen* 'come here', *hineingehen* 'go in(to)', *hingehen* 'go there', *kennenlernen* 'get to know', *losgehen* 'start, begin', *mitkommen* 'come with', *nachdenken* 'think (over)', *umgeben* 'surround', *vorbereiten* 'prepare', *vorbeigehen* 'pass by, miss', *wegwerfen* 'throw away', *weiterfahren* 'drive farther', *zuhören* 'listen (to)', *zurückkommen* 'come back', *zusammenfassen* 'summarize', and the like. This should be done because there is at this point of structure a great peculiarity of German syntax, which, as far as the writer has observed, is very difficult for non-native learners of German to acquire—that is, the separation of the two parts of each of these verbs and the tagging of the particle element always to the very end of the sentence, as:

25. Not all PARTICLE + STEM verbs are separable, and a few are in one sense separable and in another sense not. The inseparable prefixes are *be-*, *emp-*, *ent-*, *er-*, *ge-*, *hinter-*, *miß-*, *ob-*, *ver-* and *zer-*, and the few middle cases are words like *überlegen* (separable when it means 'lay over', with stress falling on the particle; inseparable when it means 'consider', with stress falling on the stem).

Der Zug *fährt* morgen früh um neun Uhr dreißig vom Hauptbahnhof *ab*.

'The train departs tomorrow morning at nine-thirty from the main station.'

Ich *kam* am Donnerstag, 11. September 1982 in Wien *an*.

'I arrived in Vienna on Thursday, September 11, 1982.'

Deutsch *sieht* mir schwer *aus*. 'German looks difficult to me.'

This means, in language production (speaking and writing), the speaker (or writer) must have the verbs (*abfahren*, *ankommen*, *aussehen*) in mind but keep the particle part of each verb (*ab*, *an*, *aus*) in mind until he comes to the very end of the sentence, no matter how long the sentence is and how many words come between the two parts of the verb; and, in perception, especially listening, one must wait until the very end of the sentence in order to get the whole verb and understand the meaning of the sentence. Such habits, however, are not easy for the non-native learner of German to form; he either forgets to split the verb, or forgets to tag the other part of the verb to the end of the sentence. This aspect of the German verb should therefore be emphasized and thoroughly drilled right from the beginning of the learning process.

A fourth peculiarity of the German verb is the so-called "reflexive verbs", represented categorially by the marker *sich*, as *sich interessieren (für)* 'be interested (in)', *sich wünschen* 'wish', *sich beschäftigen (mit)* 'be engaged (in)', *sich erinnern (an)* 'remember', *sich unterhalten (über)* 'talk (about)', *sich ansehen* 'see, watch', and the like. These verbs are especially difficult for the Chinese speaker (even one with English background) to handle. The difficulty lies in 1) German reflexive verbs are much greater in number than English ones, 2) the reflexive component ("*sich*") of many of such reflexive verbs is totally or partially devoid of any semantic content, and 3) many verbs may at the same time be used reflexively and non-reflexively with little or no change of meaning (thus, the *sich* element becomes optional). Besides, the reflexive element (a reflexive pronoun) sometimes appears in the accusative case (as *ich habe mich geirrt* 'I made a mistake', *ich fühle mich glücklich* 'I feel happy', *ich setzte mich* 'I sat down', and the like) and sometimes in the dative (as *ich wünsche mir ein Haus am Meer* 'I wish to have a house by the sea(shore)', *ich möchte mir das Haus ansehen* 'I'd like to see the house', *es kommt mir niemals vor* 'it never happens to me', and the like). In all these, one's knowledge of English is no reliable guide, despite the fact that there are some parallels: *I wash myself* vs. *ich wasche mich*; *I set myself down* vs. *ich setze mich*, and a few more. In most of the cases,

German reflexives are matched by English non-reflexives, as: *ich freue mich* 'I'm happy'; *wir treffen uns* 'we meet (each other)'; *ich erinnere mich* 'I remember'; *ich meldete mich* 'I reported'; and many others. It is hardly possible for the Chinese learner of German, with the corresponding English verb in his mind, to hit the exact German verb (or *vice versa*), for there is no English equivalent like **I feel myself happy*, **I wish myself a house by the sea*, etc. It is therefore impossible, through one's knowledge of English, to "predict" the occurrence of German. As such, it is advised that, in practical teaching, the teacher is not to make use of the students' knowledge of English at this point. He should, instead, point out the differences between the two languages at this point of structure, provide some commonly used German reflexive verbs that must be used in the reflexive form, and suggest enough practice for the students to internalize the feature. He should perhaps not begin his presentation of this aspect of the German verb by analyzing the possible "meaning" of the reflexive element, or by asking why and looking for an ultimate reason for it.

There is also substantial difference, both in form and in function, between German and English with respect to tense and aspect: while English has the "simple" and progressive aspects, German has only the simple form for both (thus, *ich komme* corresponds either to 'I come' or to 'I am coming', depending on the context); although both languages have the Present Perfect, it differs in function (thus, *Sie haben das gut gemacht* corresponds to 'you (polite form) have done it well' and 'you did it well'; *ich habe ihn gestern getroffen* finds its parallel only in 'I met him yesterday' and not **I have met him yesterday*, though formally it actually parallels the latter); while English has the Perfect Progressive aspect, German has none; while English makes extensive use of the Simple Past, German, especially in oral speech, uses it much less frequently (for which it uses the Present Perfect, instead: *ich habe ihn vor kurzem getroffen* 'I have met/met him lately' sounds more colloquial than *ich traf ihn vor kurzem* 'I met him lately', and *du hast die Arbeit gut gemacht* sounds much more colloquial and idiomatic than *du machtest die Arbeit gut*). It is helpful and to some extent necessary that the instructor point out these tensal-aspectual differences between the two languages if his students have a preknowledge of English. Furthermore, in the light of the acquisition process of the bilingual or native children, it will perhaps be best to present German tenses and aspects in this order: first the Simple Present, then the Present Perfect, then the Simple Future, and

then the Simple Past . . . and finally the passives.

Still another aspect of the German verb, the subjunctive (*Konjunktive*), is one of the most difficult for any non-native learner of German to master. While modern English has only a few relics of the subjunctive, German subjunctives are much more complicated both in form and in function: where English has *be* (the obsolete subjunctive present for all persons), German has *sei, sei(e)st, sei(e)t* and *seien*; where English has *were* (the subjunctive past for all persons), German has *wäre, wär(e)st, wär(e)t* and *wären*; where English has the same form for indicative and subjunctive past (*I saw her yesterday* vs. *If I saw her tomorrow, I would . . .*), German has different ones (*sah* 'saw (ind.)' vs. *sähe* 'saw (subj.)'); where English uses the subjunctive only to express a wish, a condition, a supposition, a conjecture, and the like, or merely for the purpose of euphemism, German uses it also for reported (indirect) speech, thus rendering it a much higher frequency (e.g., *er sagte, die Ware sei (wäre) zu teuer* 'he said that the article is too expensive', *ich glaube, ich hätte genug Zeit* 'I think (that) I have enough time', and the like). Pedagogically, judging from the observation that even the native or bilingual child does not come to master the subjunctive until a much later time in its linguistic development, the writer advises that this facet of the German verb be retained until a later period of the teaching process. Actually, the developing child usually says **ich glaube, ich habe genug Zeit*, and the like, instead of the required subjunctive form, and much less would the child use euphemistic forms like *Entschuldigung, ich hätte eine Frage* 'Excuse me (, please). I have a question', and the like.

The conjugation of German verbs places a very heavy load on the memory of the non-native learner. While a learner of English only has to memorize three basic forms of an irregular strong verb, the infinitive, the preterite, and the past participle (*go, went, gone; see, saw, seen; do, did, done; give, gave, given; etc.*), the German learner has to memorize much more: the infinitive, the preterite, the past participle, the 3rd.sg.pres., the subjunctive past, and the imperative—all may have different stem vowels and each of them is further subject to change with respect to person and number. Thus, for a German verb like *befehlen* 'order, command', for example, one must, aside from the infinitive form, memorize *befiehlt* (3rd.sg.pres.), *befahl* (preterite), *beföhle (befähle)* (subjunctive past), *befohlen* (past participle), and *befiehl* (imperative); for *essen* 'eat' he must memorize *ißt, aß, äße, gegessen* and *iß*; for *backen* 'bake' he must memorize *bäckt, backte (buk), bücke, gebacken* and *back(e)*; and the

like. In addition, he must know the conjugation rules well enough as to be able to derive the forms to each of these with respect to person and number: to *aß* '(I/he/she/it) ate', there are *aßest* '(you, sg.) ate', *aßt* '(you, pl.) ate.', *aßen* '(we/you (polite form, sg. & pl.)/they) ate'; to *äße*, there are *äßest* and *äßen*; to the imperative *iß!* 'eat!' (sg.), one must know there are also *eßt!* (pl.) and *essen Sie!* (polite form, sg. & pl.); and one should perhaps also know that the subjunctive present is formed by adding an -e (thus: *es gebe* '(if) there be', *esest* '(if you(sg.)) eat', *eset* '(if you(pl.)) eat', *esse* (identical with the indicative) '(if I/he/she/it) eat', etc.). With such complexities as these, the teacher should of course not "cram" them all at once into his students but should let them take piece by piece—and digest. In the light that native children do not cram up the paradigms of their own language, the non-native learner shouldn't, either. Full command of one's own or another language is the result of lasting evolution, approximation and education.

With German passives, as they occur much less frequently than English ones, it is advisable that the teacher tell his students this fact early at the time when German passives are introduced. Unlike English, which makes frequent use of the passive construction to achieve such stylistic effects as euphemism, impersonality, objectivity, etc., German passives are only sparingly used: where in English one says *it is said*. . . ., in German one says *man sagt*, . . . (lit. 'someone says. . .'); while the English speaker says *it is thought*. . . ., the German speaker says *man glaubt*, . . . 'One thinks, . . .', and the like. It is therefore unidiomatic and "foreign" for the Chinese learner of German, basing on his preknowledge of English, to produce German sentences like *es wird gesagt, daß*. . . 'It is said that . . .', *es wird geglaubt, daß*. . . 'It is thought that. . .', *wieviel Zeit wird gebraucht, diese Arbeit fertig zu machen?* 'How much time is needed to finish this work? (better: *wieviel Zeit braucht man, diese Arbeit fertig zu machen?* 'How much time one needs to finish this work?'), and the like.

A final difficulty of German verbs lies in their formal similarity. Two facts are responsible for such difficulty: 1) all verbs end in *-(e)n*, and 2) too many verbs are PARTICLE-VERB compounds. These produce much distraction and confusion to the non-German mind when it tries to remember German verbs. Related to the verb *nehmen* 'take', for example, there are *abnehmen* 'take off', *annehmen* 'accept', *aufnehmen* 'take (pictures); record; pick up', *ausnehmen* 'except', *durchnehmen* 'deal with', *einnehmen* 'receive (money)', *entnehmen* 'withdraw (money)', *hinnehmen*

'accept', *übernehmen* 'undertake; assume', *unternehmen* 'undertake; attempt', *vernehmen* 'perceive', *vornehmen* 'deal with', *zunehmen* 'increase', *zurücknehmen* 'withdraw, retract', *zusammennehmen* 'gather, collect', etc. To memorize these German words, as one may test for himself, appears to be much more difficult than memorizing their English counterparts.²⁶ It is therefore at this point advisable that the basic meanings of the particle element of some of these words, when possible, be generalized and made known to the students in order to help them remember more easily.

7. Finally, there are certainly also difficulties in some other areas aside from what has been so far discussed, which, due to the scope of the paper, cannot be dealt with in detail. One such area of difficulty is the use of German prepositions. Here, again, the Chinese student's preknowledge of English may appear to be of no help—and even of interference and confusion. This is because, except for a few coincidences, German and English prepositions seldom correspond either in form or in function. To take a few examples, German *an* (when combined with the dative definite article, *am*) corresponds in different contexts to English *at*, *on*, *upon*, *by*, *against*, *to*, *up to*, *near*, etc., as: *am Sonntag* 'on Sunday', *am Fenster* 'at/by the window', *am Abend* 'in the evening, at night', *am Morgen* 'in the morning', *am Ufer* 'on the shore', *am Apparat* '(speaking) on the telephone', *am Wochenende* 'at weekend', *am Tisch* 'at the table', *an der Wand* 'on the wall', *fahren an den Neusiedlersee* 'drive to the New-settlers' Lake', *am Meer* 'at sea, by the seaside, on the seashore', *etwas an der Decke hängen* 'hang something from the ceiling', etc. In all these and many others it is hardly possible for the student to infer, by analogy, the choice of the German preposition from the use of the English preposition in each context. In teaching, it would therefore be futile and distracting to direct the student's attention to the possible, hypothetical association between his L₂ (English) and L₃ (German) in this respect because there is actually little. For example, where English speakers say "for example", German speakers say "zum Beispiel" instead (which literally means "to the example"); where English speakers say "at home", German speakers say "zu Haus(e)"

26. At this point the writer has the embarrassing experience of saying, while at table with some Austrian guests—ladies and gentlemen—in a Chinese restaurant in Vienna, "*Chinesischer Tee führt immer ab*" ('Chinese tea always loosens the bowels') (!), when actually he intended to say, "*Chinesischer Tee nimmt immer ab*" ('Chinese tea makes one lose weight'). He was only confusing the verb *abnehmen* '(cause one to) lose weight' with another, *abführen* 'loosen the bowels'. His Austrian friends, especially the ladies, were, as one may imagine, openmouthed.

(lit. "to house"). In practical teaching, it is better to present and drill such expressions as *zum Beispiel*, *zu Hause*, *am Apparat*, *am Vormittag* 'before noon, in the morning', *bei Tage* 'in the daytime', and the like, as a single syntactico-semantic unit than analyze them into PREPOSITION + (ARTICLE) + NOUN combinations and look for the "exact meaning" of the preposition in each case.

Summary and Conclusion

In the "Introduction" of the paper the writer has provided some tentative definitions for the terms "bilingualism" and "bilingual" and associated them with some closely related concepts. In the first chapter the author states briefly the subjects, methods and delimitation of the study. In the second chapter the writer gives a brief description of the variety of German as spoken in Austria, especially as spoken in Vienna, where the study of the language of the bilingual Chinese children was made. Chapter three describes in considerable detail the language development of the main subject, the writer's daughter. It describes, in other words, how the child developed to be a bilingual. As the development of L_1 and L_2 is a continuum, L_1 -development of the subject, as well as the linguistic background of the parents, has also been briefly described. In the description and discussions, implications for language acquisition from socio- and psycholinguistic points of view have always been made clear. Chapter four presents the results of a brief survey of a population of about fifty subjects. A number of interesting and significant phenomena, such as language dominance, contact language, correlation between the language proficiencies of parents and children, sense of identification, code switch, transfer and interference, etc., have been discussed in some detail. The last chapter, chapter five, deals with the pedagogical implications for teaching (learning) German to (by) adult Chinese speakers in the light of the foregoing observations made on the bilingual children, in terms of areas of difficulty. While some of the ultimate problems concerning a person's acquisition of his native tongue remain a mystery, the acquisition of a second or third language, which in most or even all domains of language use parallels the first, can be viewed to some extent a "miracle". The linguist's task is to explain as far as possible this miracle and the language teacher's, to create it.

APPENDIX I: A corpus of the L₁-development of the main subject

Utterances	Structure	age (months)
1. [œ ———]	V	1
2. maaa...daaa...baaa...ngaaa...	CV	3
3. ma:ma...ba:ba...da:da...haaa...waaaaa...	CV:CV	6
4. wā-wā (“doll”)	N	8
5. nāi-nāi (“grandma”)	N	10
6. niāo-niāo (“urinate”)	Nn	11
7. fān-fān (“rice”)	Nn	12
8. chiāo-chiāo (“sleep”)	Nn	12
9. chieh-chieh (“elder sister”)	N	12
10. mei-mei (“younger sister”)	N	12
11. beh-beh (“quilt”)	Nn	13
12. tang-tang (“candy”)	Nn	13
13. ba-bī (“papa”)	N	13
14. Yáng-yang (“itchy”)	A	14
15. ch’iou-ch’iou (“ball”)	Nn	15
16. pà-pà (“scared”)	A	16
17. gài bèi-bèi (“pull the quilt”)	V+O	18
18. suèi chiāo-chiāo (“sleep”)	V	18
19. ch’īh fān-fān (“eat rice”)	V+O	18
20. dá ch’iou-ch’iou (“hit the ball”)	V+O	18
21. hē tāng-tāng (“take the soup”)	V+O	18
22. ō ng-ñg (“go to stool”)	V	18
23. mái tang-tang (“get (some) candy”)	V+O	18
24. ch’í ts’ēh-ts’ēh (“ride the bike”)	V+O	18
25. bó-nián (“auntie”—wife of elder brother)	N	19

V=vowel/verb, C=consonant, N=noun, Nn=duplicated noun, A=adjective,
O=object, S=subject, Ad=adverb, M=modal verb, Imp=imperative, L=locative,
Excl=exclamation.

Tone markings: ā (high level) ǎ (low level) á (rising)
 ǎ (falling-rising) à (falling) à (slight)

26. <i>tàng-tàng</i> ("hot")	A	19
27. <i>dà ch'iqu-ch'iou</i> ("big ball")	A+N	19
28. <i>hsiao di-di</i> ("small brother")	A+N	19
29. <i>hēi hou-hou</i> ("black monkey")	A+N	19
30. <i>kàn dièn-shih</i> ("watch TV")	V+O	19
31. <i>guāi-guāi</i> ("well behaved")	A	19
32. <i>wō-wō guāi</i> ("Dog, behave well!")	Imp	20
33. <i>hēn tùng</i> ("(It's) very painful.")	Ad+A	20
34. <i>wō-wō hēn guāi</i> ("The dog has behaved very well")	S+V	22
35. <i>yào páo-páo-páo</i> ("(I) want to run.")	M+V	22
36. <i>Ting-ting ch'ih fàn-fàn</i> ("Ting-ting (I) eats rice.")	S+V+O	23
37. <i>bā-bī lái</i> ("Papa, come!")		
38. <i>yào húi-chiā</i> ("(I) want to go home.")	M+V	23
39. <i>ch'ù mā-mī</i> ("(I) go to mom.")	V+L	23
40. <i>tsuò fēi-chī</i> ("take the plane")	V+O	23
41. <i>háo-hǎo kàn eh</i> ("Looks so nice!")	Excl	24
42. <i>yào ò dà-bièn</i> ("(I) want to go to stool.")	M+V	24
43. <i>tàng-táng háo-hǎo ch'ih</i> ("Candy tastes so delicious!")	*	24
<i>bā-bī Yü-ting dzuò ch'ēh-ch'ēh pǎo kuài-kuài</i> ("Papa (and) Yü-ting (I) drive fast in the car.")	*	24

*= the utterance may be differently analyzed according to different models of grammar. (Similarly, the "structure" of some of the other utterances in the corpus may be differently specified, and very often there is a dilemma to adopt one way or the other.)

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