Why and How Should Initial Alphabetization in a “Strong Language” Precede Teaching and Learning in a “Language of Wider Communication” even in Strongly Multilingual Countries? A Survey of the Current State of an Old Debate

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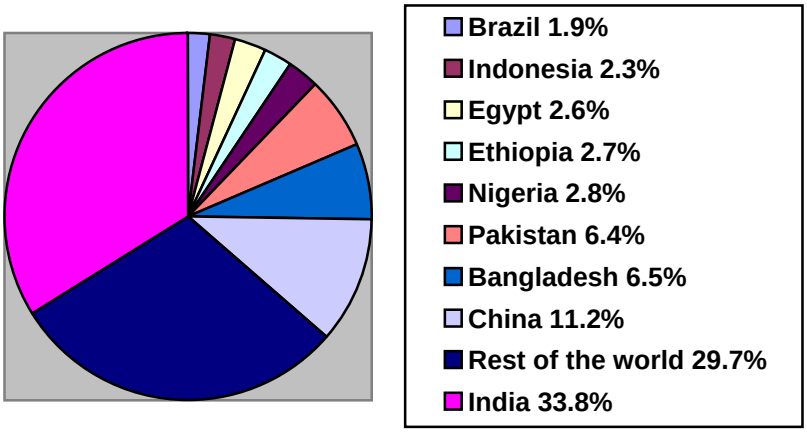
1. Introduction

The purpose of this thesis is to examine the current state of the debate about the importance of basic alphabetization in a "strong language", followed by literacy in a "language of wider communication". The stress will be placed on adult education programs since they are often neglected when considering the fight against illiteracy.

The regional focus will lie on African countries because the language situation and the language policy are, in general, quite problematic: the countries are linguistically extremely diverse, but there are often only one or two official languages, one of which is usually foreign. There will also be examples from other parts of the world in order to demonstrate a certain universality of some aspects.

In today's world, there are an estimated 799 million illiterates (see Figure 1). However, the illiteracy is divided rather unevenly. According to EFA (2005, 130) "of the world's adult illiterates, over 70%, or 562 million persons, live in only nine countries […] with some 34% in India alone".



World illiterate population: 799 million
Note: Figures may not add to totals because of rounding.

Figure 1: World adult illiterate population, percentage by country, 2000-2004[1]
Source: adopted from EFA Global Monitoring Report 2005, UNESCO

[1] 2000-2004 data are derived from the March 2004 literacy assessment by UNESCO Institute for Statistics, which uses directly reported national figures together with UIS estimates. For countries that did not report literacy data for the 2000-2004 reference period, UIS estimates for 2002 were used (see EFA 2005).

This figure clearly demonstrates that in particular the poor and developing countries struggle with high to very high illiteracy rates. “Education for All” and the “Millennium Goals,” with the aim of universal primary completion, are not going to be realized in the near future. The progress towards this goal is slower than was hoped for. Additionally, even the children who attend a school are often still illiterate after their graduation, or they lose their rudimentary literacy skills in the following years due to low quality education. This is why adult education and literacy programs are still an important part of the educational sector as long as the formal school systems do not become more efficient.

The first chapters deal with possible definitions of the terms “mother tongue” and “strong language”, which are vital to clarify; they give a brief overview about organized formal and non-formal mother tongue education in Africa, and they describe the situation in multilingual countries. The next part (chapter 5) mentions the arguments which are often given against the introduction of mother tongue education. After this, the advantages of mother tongue education are discussed comprehensively. In chapter 7, the question of how mother tongue adult education programs can be implemented is answered. Here, the main aspects of the process of planning and implementing sustainable and successful education programs are presented in detail. Particular stress is given to the research findings concerning the environmental influence on the cognitive development and its consequences for the education program. Chapter 9 presents aspects for the success of an adult education program which can not be influenced directly: the functions certain languages have or do not have in a society and the consequences for those languages. Finally a short overview about the literacy rates of selected African countries demonstrates the benefits of a supportive attitude towards mother tongue education.

2. “Strong Language” and “Mother Tongue”

Writing a thesis about the topic of alphabetization in the “strong language” makes it imperative to define what is meant by this term. “Strong language” refers to the language which is mastered best by a person. It is the language which is spoken every day in the private surrounding, the language in which one dreams and in which feelings and thoughts are articulated in a natural and familiar way. In the vast majority of cases, the mother tongue is a person’s strong language. Because the mother tongue is the language which is acquired first in life, in a natural way and without conscious learning, it remains the strong language throughout life, even if other languages might be mastered on a highly professional level as well. It is usually the language of the parents and/or the people in the close community. In certain situations, however, a different language can become the strong language. For example, when a family emigrates and the young children speak the language of the new country better than the language they acquired first in life, meaning better than their mother tongue, the language of the new country becomes the strong language. Because it is more of an exception that a language different from the mother tongue becomes the strong language, and because the mother tongue is usually of specific significance to a person, especially when it comes to linguistic and minority rights, the term “mother tongue” is used particularly in the first parts of this thesis. In addition, this term is more frequently used in current discussions. That the mother tongue is more than merely the language one has acquired first in life is made clear by the following definition of the different properties of mother tongue in a historic UNESCO document that reviewed the first world level action concerning vernacular languages in 1953 (quoted in Ouane 2003, 68):

> “Psychologically speaking, the mother tongue is a system of signs, symbols and meanings which provides the first recognition, understanding and expression of facts, events and relationships. Sociologically speaking, the mother tongue represents the link with the family, group and community in which citizenship ensures continuity and extension and not substitution. On the educational level, the MT provides the substrate and conceptual substance which gives sense and direction to thought and action.”

It is agreed that a person can have more than one mother tongue, for example when the parents speak different languages.

The expression “language of wider communication” usually refers to a language which is used for international communication. In the case of the African countries, it means, in general, the foreign official language. It can also refer to an African language, which is important for inter-African communication. In this thesis, this term will refer to the foreign official language because of its controversial nature: on the one hand it is regarded as being of specific significance for international communication and, on the other hand, as being a problematic heritage of the former colonial ruler.

3. Mother Tongue Education in a Historical Perspective

The use of mother tongues for educational purposes is not an entirely new idea. In the 17th century, the European missionaries started to spread Christianity in the Sub-Saharan area. To reach the population in a more effective way they used the native vernaculars of the people living there (Calvet 1974; Charles-Roux, 1939, quoted in Salhi 2002, 324). They often translated the Bible into indigenous languages, services were conducted in African languages and hymns were sung in local tongues (Salhi 2002, 324). They already recognized the potential of the native people’s mother tongues for the purpose of transmitting information and values. During the colonial era, however, the local languages were almost entirely neglected. The situation was especially bad in the areas occupied by the French. The local languages were regarded as primitive and unaesthetic and not worth learning. The only way of “civilizing” the Africans, the French believed, was by teaching them in the French language. Djité (2000, 28) describes this situation in Côte d’Ivoire as follows:

> “The imposition of standard French was legitimised along the lines of the ‘civilised’ versus the ‘uncivilised’, and the French colonial administration had no doubt that they were conferring the greatest gift possible upon their subjects in the colony.”

French was seen as the language of reason, logic and human rights (Skutnabb-Kangas/Phillipson 1986b, quoted in Phillipson/Skutnabb-Kangas 1994, 337). However, the situation in the British colonies was bet-

ter. Even though the true reasons behind the British language policy might be questionable, local languages were more promoted and also used in primary education. After the independence of the former colonial states, they kept the status quo in regard to the language situation. Because of various arguments, which will be named and proved wrong in the following chapters, the West African governments clung to the French language and continued their attitude of neglect towards the local languages. Nevertheless, the importance of literacy in one's mother tongue was acknowledged early on by organizations like UNESCO and the UN. In 1960, the UNESCO Convention against Discrimination in Education stated in Article 5 that:

> "…the members of national minorities [have the right] to carry on their own educational activities, including […] the use or the teaching of their own language, provided […] that this right is not exercised in a manner which prevents the members of these minorities from understanding the culture and language of the community as a whole and from participating in its activities".

Since the last decade, the situation is finally changing but slowly. The local languages are introduced as the medium of instruction in the first years of primary school and as a subject for the following years. In adult education programs, the advantages of the use of the mother tongues were noticed already in the 1950s. Fagerberg-Diallo (2002, 167 and 170) mentions the first mass literacy campaign in Senegal which was introduced in 1951 using national languages. However, the debates about this topic are still continuing and they are not likely to stop soon since language politics are always power politics, and many different interests are involved and have to be taken into account.

4. Multilingual Countries – an Exception?

Taking the so-called Western states into focus, it seems that the vast majority of these states and also of their people are monolingual. Most of the countries have only one official language for education and administration and the entire population seems to be able to communicate through this one language efficiently. The notion of monolingualism is, however, a fallacy. There are an estimated 6000 to 7000 different languages spoken in our linguistically diverse world (UNESCO 2003, 12). All countries in the world are multilingual (see Gordon 2005). Iceland was for a long time the only monolingual country; however, according to Gordon (2005), there now exists a Danish-speaking minority. There are always groups of people who speak different languages apart from the official language. In most of the cases this is due to the fact that the states consist of different native communities. In addition, migrants and refugees nourish the multilingualism in many countries by adding their native language to the variety of already existing languages. However, this linguistic diversity is distributed rather unevenly: “Over 70 per cent of all languages in the world are found in just 20 nation states, among them some of the poorest countries in the world.” (UNESCO 2003, 12)

This short description of the world’s language situation makes it clear that multilingualism and the possible problems resulting from it for parts of the population should be an issue in all countries. This is, however, not always the case. Many governments seem to renounce the fact that there are minority groups (and in some countries even powerless majority groups) which are excluded from great parts of the public life and from an active participation in the community because they are not able to understand the language they encounter in the newspapers, the radio and the administration and other civil institutions. These governments appear to believe that the minority groups will “melt” with the rest of the people if they only live together long enough (in the case of immigrants for example). In the francophone African countries and their multiethnic population, the multilingual character of these countries was simply neglected for many decades, and this attitude is changing only very slowly. The worst thing that

can happen to a multilingual country is that its multilingual character is not officially acknowledged as such and thus the country is treated as a monolingual one, thereby denying the majority of the population a public voice.

Another fact that one has to keep in mind is that talking about the problems of multilingualism usually means discussing the problems of the minority groups (see Fyle 2003, 116). When considering, for example the francophone African countries, the language situation is often as follows: there is one official language, French, which is spoken natively by only a very small part of the population and there is often a lingua franca[2], in Senegal, for example, it is Wolof[3], which is understood and spoken by a great part (sometimes by the majority) of the population, and there are very many minority languages spoken by sometimes only a few thousand people. These three levels of languages can be found in many countries. The official language is the international one, the language of wider communication, which is often regarded as an important link to the Western world. In some countries, especially in former British colonies such as Kenya, there is a second (or even more) African language(s) with the status of an official one(s). This language is usually very important for inter-African communication. The lingua franca is a means of communication within a country (sometimes also shared with neighboring countries) on a regional, often national, level, for example in trading and work settings. The only use of minority languages is usually the communication within the community and family. It is often restricted to the private sector, traditional services and cultural use. Wolff (2003, 199) comments on the situation in Niger:

> "As a former French colony, Niger shares with a number of other African countries one particular blessing or burden, depending on how one looks at this double-edged sword, the use of French as the official language, i.e., *la francophonie.* It may be a blessing in terms of international relations, but it is a heavy burden in terms of internal communication. For basic education it is a disaster."

[2] The lingua franca is often a language which is spoken natively by a large part of the countries' population and by an additionally large part as a second or third language. It has developed to this status naturally.

[3] Wolof is the native language of more than 40% of the population and it is spoken and understood by 80% (Salhi 2002, 328).

The linguistic reality in Niger clearly demonstrates how the vast majority is linguistically excluded. Hovens (2002, 252) carried out a study in Niger in which 75% of those interviewed answered that they speak more than one language. Hausa[4], spoken by some 70%, is the most prevalent. French, on the other hand, is reported to be spoken "sometimes at home" by only 9%.

What does this three-level system mean for the people? The few (lucky) ones who are native speakers of the official language do not need to be bothered by multilingualism. They do not need to speak another language because their mother tongue is the language of education, administration and public life. Their voice will be heard and understood (at least by the important elite of the country, a status which they probably share). The native speakers of the lingua franca are also understood by a large part of the population. However, they have to learn and become literate in the official language to fully participate in and have an influence on the country's affairs on all levels, and they are often denied their right of alphabetization in their mother tongue. Nowadays, mother tongue education is often introduced in the first years of primary school even in most francophone African countries. For secondary and higher education, however, the official language is often still used exclusively. The minority groups have the longest way to go to be able to participate actively in their country. They need to know the lingua franca to communicate with the people outside their own community and in school they encounter the official, usually foreign, language, often for the first time. This is due to the fact that minority groups are often living in rural areas where the dissemination of the official language through newspapers and radio channels might not have reached them yet. To complicate their situation even more, alphabetization programs are sometimes only held in the lingua franca, or the language spoken by the majority of the students, especially in areas where many different minority languages are to be found. For the ostensible reason of effectiveness, the program's planners often choose the lingua franca or the language of the participants' majority. The problem arises that a majority

[4] Hausa is a lingua franca in West Africa where it is spoken by more than 25 million people. It is the language of communication and trade across many borderlines (Hovens 2002, 252).

of the people have to learn at least one more language in addition to their mother tongue in order to be able to fully take part in the public and working life due to the fact that their own languages have usually little or no functions in public life. They are not considered in language planning and policies. In comparison to the official language, these languages have a lower status and they do not experience the same support, for example use in the media and administration. This feeling of neglect and indifference adds to the already difficult and unequal situation of the speakers of these language groups.

After mentioning all these possible problems in multilingual countries, one should be aware of the fact that “from the perspective of these societies and of the language communities themselves, multilingualism is more a way of life than a problem to be solved” (UNESCO 2003, 12). Ouane (2003, 55) also mentions the “normality of multilingualism” for many societies. He explains how the people switch between different languages, for example in different sectors of economic life, without any problems. According to his observations “multilingualism is not merely functional or commercial, but penetrates into and shows through the whole of the social fabric”. Stroud (2003, 26) points out that multilingualism in many countries and also across national borders “means that millions of people, rather than being divided by their multilingualism in African languages, are actually linked into a regional speech community through these languages”. The challenge for the planners of education programs with basic literacy is to take this existing multilingualism into account and to try to offer programs in the languages that are spoken by as many participants as possible either natively or at least on a highly professional level.

5. Why Literacy in the Mother Tongue?

When a government and the ministry of education in a former colonial country had to consider the question of whether mother tongue instruction (meaning the use of local languages) should be introduced in the formal or in the non-formal educational sector, they usually had no problems finding a variety of arguments against the introduction. Some of these are still uttered in discussions about the medium of instruction. This chapter names and discusses the most common and frequently used arguments against alphabetization in the mother tongue.

5.1 One Language = One Nation?

In all of the African countries, multilingual and multicultural societies are prevalent. As mentioned in chapter 4, this is not an exceptional situation since purely monolingual countries, are nonexistent. However, there is the decisive fact that these countries were artificially created by the former colonial rulers under non-consideration of native communities and tribes living in these areas. Wiegelmann (2002, 11) describes this situation for Senegal as follows:

> „Die 1885 von den Kolonialmächten etablierten Grenzen sind in erster Linie mit dem Ziel der Stabilisierung ihrer eigenen Kräfteverhältnisse auf dem afrikanischen Kontinent gezogen worden. Historisch gewachsene ethische, kulturelle und religiöse Strukturen und Grenzen sind dabei kaum berücksichtigt worden und konfliktgeladene Verhältnisse wurden durch die koloniale *divide et impera*-Politik teilweise sogar verschärft.“

The borders were established in a manner that suited the colonial governments, dividing communities and families. Therefore, people with different cultures and languages were forced to live together in one country. During this time, the official language was, of course, the European one of the colonial ruler. After independence, the new leaders of these countries wanted to create unity among their people “according to the conventional nation state ideology [which states that] the ideal state is homogenous, consists of one nation/ethnic group only, and has one language” (Skutnabb-Kangas/Phillipson 1994, 4). They believed that they would need a common element to achieve this unity. This element was thought to be one official language of education and administration (oddly enough, this

official language was usually the former colonial language). They felt the "desire to communicate effectively with all parts of the country, and the need to […] build national unity" (Salhi 2002, 317).[5] They even feared, in some countries until today, that a "tribal war" might erupt if one of the local languages is chosen as a new official language and thus is elevated above all others (Djité 1991b, quoted in Djité 2000, 17). Similar arguments for the justification of the inaction in language policies and planning in the francophone countries were named by Salhi (2002, 317):

> "…, some post-independence states viewed the introduction of local languages both as a threat to the political power of the elites, and as a sign that they might become dominated by ethnocentrism. It may appear strange that the influence of a native tribe could work to keep French as the official language of a country, but the language of the colonization is seen as neutral or atribal in that it does not belong to any of the indigenous linguistic groups which might be seen as competitors."

He also argues that French "has become a national heritage for individual countries" (ibid., 318) and "remained a prestige language after independence in many African countries" (ibid., 323) with "connotations of modernity, rationality and the scientific spirit, whereas the local languages symbolize revivalism and obscurantism" (ibid., 328).

Ouane (2003, 78) mentions another argument for the existence of this exoglossia[6]. He says that some governments regard this as an ideal way of not having to choose a new official language from all the indigenous ones. He adds that for those who favor this solution "the colonial languages, on account of their recent shared history, have acquired residence rights, the right of naturalization and the right to claim and obtain a place in the linguistic heritage".

This point of view has been criticized by Hutchison (1998; quoted in Küper 2003, 90) who said that a foreign language can never be a neutral vehicle. Language is a means of transmitting culture and values, of expressing

[5] "The desire to communicate" has probably never been a real reason for the maintenance of French. It is more likely that it was their interest in keeping the vast majority of the country illiterate and without a public voice.

[6] "Exoglossia" means the promotion of only a single non-indigenous language as official language.

one's thoughts and feelings and one's view of the world. This cannot be accomplished with a foreign language in a way that it could be through the people's mother tongue. In this respect, a foreign language cannot be regarded as neutral. Küper (2003, 97) answers the "national unity" argument best by pointing to the conflicts in Rwanda, Somalia and Burundi. According to him, these are the African countries which have only one national language, but nevertheless they are facing severe problems preserving their national unity. He also argues that "education in local languages can contribute very much at the political level to improving relations between the political leaders and the basis of the population" (ibid., 96). This is probably due to the fact that the people feel accepted and acknowledged. They themselves and their languages are valued by the official parties. By experiencing this kind of respect of their government, it is more likely that they in return might accept and respect the government as well. Skutnabb-Kangas/Phillipson (1994, 7f) also see the danger for conflict not in granting minorities linguistic rights, but rather in denying these rights. They quote Hettne (1987, 66f), who claims that "the problem is not that ethnic groups are different, but rather *the problem arises when they are no longer allowed to be different*". Therefore, the idea of an artificially created unity through the neglect of the existing diversity is a fallacy. Imposing only one official language, effectively closing one's eyes to the multicultural and multilingual reality, does not solve any problems but only creates many more.

5.2 Economic Growth and Fewer Costs through Monolingualism?

A common argument against the introduction of mother tongues in education in the African countries is an economical one. It is often claimed that introducing a large variety of languages would increase the expenditures for education programs because of higher material costs.[7] It would be far easier and cheaper to produce teaching materials in only one language. In addition, there is often a lack of skilled professionals, and many indigenous languages are not yet available in a written form. There are more arguments of this kind concerning the higher costs of multilingual pro-

[7] These arguments weigh especially heavily since the vast majority of the African countries are struggling from economic crises and very low GNPs.

grams. However, these are arguments of a short term perspective to this problem. Educational success, however, has to be seen in a middle- or long-term perspective. What is the economic value of the school drop-outs and the adult graduates who are still illiterate because they did not understand the language of instruction? Investing more money initially for programs which have a higher rate of success seems to be the more economical choice. In addition, there are many methods of producing low cost materials, especially with the help of new technologies. This will be discussed later.

Some people are still under the impression that a monolingual country has better chances of economic growth and prosperity. Skutnabb-Kangas/Phillipson (1994, 4) ascribe this impression to the fact that, generally speaking, the “monolingual” Western states (though we know by now that there is not a single state which is purely monolingual) tend to be richer than the multilingual non-Western states. This fact leads some people to the interpretation that the higher prosperity is caused by the monolingual character of the states making operations (industry, education, information, etc.) more efficient. However, this argument has long been proven wrong through Joshua Fishman’s thorough study of 120 countries (quoted in Skutnabb-Kangas/Phillipson 1994, 4).

5.3 Lack of Social Demand

Adults who are considering participation in a literacy program will weigh the usefulness and the advantages of investing time in it. Their daily life situation is often a very complicated one. They have to deal with severe problems: economical, political and sanitary. They need to see a very good reason for joining an adult education program. In many cases they hope that their situation (especially their economic situation) will improve after the completion of the program. Many people believe that through literacy in the official language, their chances of obtaining better paid jobs will increase. However, they often see no use in literacy in their mother tongue because it is scarcely used in public life. In Niger, for example, the situation is described by Wolff (2003, 195) as follows:

> "…, there appears to be little social demand for literacy and education in national languages. It is very difficult to see what gain there would be for mother tongue communities if they became literate in their own […] language. Written materials, if used at all in administration and/or education, are practically all in French. Further, a command of spoken and written French appears to be the main key to jobs in government and administration, and the official language is associated with upward social mobility".

As can be seen in this quotation, the national languages, being the mother tongues of the vast majority of the people, do not have any real functions apart from their often exclusively oral use within the community. The situation for the native speakers of the lingua francae is slightly better, for their language fulfills at least some functions in the trading and working sector. However, the demand for literacy in this language is still not evident for many people, the oral usage of the lingua franca being sufficient in most of the situations. Obanya (2003, 124) states that "the point often made against [literacy in the mother tongue] is that literacy should lead to some form of upward social mobility and that further up the social ladder of most African societies indigenous languages have no place". Sall (2002, 102) describes the situation in Senegal as follows: "Par ailleurs la non utilisation des langues nationales dans l'administration et les services publics n'est pas de nature à encourager les travailleurs à s'alphabétiser dans les langues nationales". Without real functions and social demand it often seems difficult to understand the need for literacy in the mother tongues.

5.4 The Negative Attitude towards Mother Tongue Instruction

Experience of attempts to foster mother tongue education in Africa has shown that a great part of the population is often suspicious of literacy programs in the mother tongues. In some cases, education and literacy is understood as being literate in the European language (see Wolff 2003, 211). After all the decades of colonialization and the following period of post-colonialization which, in regard to language policy, has not resulted in great change, indigenous peoples often do not see any value or use of their own languages anymore. They know that they have to learn the European language to climb the ladder of economic success. The foreign language is still the language of high prestige, associated with economic

well-being and a good education. Duponchel (quoted in Djité 2000, 25) noted that the Ivorians preferred the use of French in comparison to their native language and that they were incorporating French into their own language. According to him, parents were speaking French to their children at home. Some people even feel that mother tongue literacy is a trick of the elite to keep the general population uneducated and themselves in the position of power. There often is created a negative attitude towards the abilities of the indigenous languages, especially in the domain of literacy and education (see Adegbija 2003, 177). The people believe that they are offered a second rate education while the rich elite are allowed to be educated in the official language (Djité 2000, 25). Djité (2000, 33) states: “the suspicion remains that the mother tongue education would create two unequal education systems, one for the masses and the other for the elite, thereby denying the former equal opportunity […]”. French is often regarded as “[T]he only way to provide access to science and technology and to reap the benefits of modernization” (Djité 2000, 17). Even a former president of Côte d’Ivoire described the local languages as “a folklore that reminds us of the shame of the past and paralyses our economy” (cited in Person, 1981; quoted in Djité 2000, 29). In literacy programs where mother tongue literacy leads to literacy in French, some people think that they are just wasting precious time with the first part of the program. They want to be literate in the prestigious language, nothing more. So, why make all the efforts to offer mother tongue literacy and education programs for adults when a large part of the population seems not to be interested in literacy in the mother tongue?

6. The Importance of the Use of Mother Tongues in Adult Literacy Programs

After the introduction of the most common counter arguments, it is now time to specify the important role which the mother tongue or the strong language plays in adult education programs. First of all, the possibility to be educated and literate in one's mother tongue is regarded as a basic right (Okech 2003). Skutnabb-Kangas/Phillipson (1994, 2) even talk about "Linguistic Human Rights":

> "Observing LHRs implies at an *individual* level that everyone can identify with their mother tongue, and have that identification respected by others, irrespective of whether their mother tongue is a minority language or a majority language. It means the right to learn the mother tongue, including at least basic education through the medium of the mother tongue, and the right to use it in many […] contexts."

As early as 1953, UNESCO published, among others, the following principles for adult education programs:

- "adult illiterates should make their first steps to literacy through their mother tongue, passing on to a second language if they desire and are able;
- If a given locality has a variety of languages, ways and means should be sought 'to arrange instruction groups by mother tongue".

(quoted in UNESCO 2003, 31)

The 1976 Recommendation on the Development of Adult Education (quoted in UNESCO 2003, 24) is pointing in the same direction. The role of the mother tongue is reinforced through an explicit recommendation of mother tongue instruction. It also adopts a broader perspective on language learning by acknowledging the importance of adult education activities in the mother tongue for the development of the people's own cultures without neglecting languages other than their mother tongue. In the language plan for Africa of the Organization of African Unity (OAU 1986), the importance of the indigenous languages is mentioned at different points. It reads, for example, that the members are:

- "convinced that the adoption and practical promotion of African languages as the official languages of the state are certain to have great advantages over the use of non indigenous languages in democratizing the process of formal education […]

- aware that illiteracy is an obstacle to the economic, cultural and social development of African countries, and that mass literacy campaigns cannot succeed without the use of indigenous languages."

In the Hamburg Declaration on Adult Learning, the following is stated (UNESCO 1997, 5):

> "Adult learning should reflect the richness and the cultural diversity and respect traditional and indigenous peoples' knowledge and systems of learning; the right to learn in the first language should be respected and implemented".
>
> "[Indigenous peoples and nomadic peoples] are not to be denied the right to enjoy their own culture, or to use their own language".

UNESCO (2003, 14) also stresses the importance of the mother tongue as a medium of instruction as well as a subject of instruction as a component of quality education. In its General Conference Resolution 12 of the year 1999, UNECSO adopted the term "multilingual education" and "supported the view that the requirements of global and national participation, and the specific needs of particular, culturally and linguistically distinct, communities can only be addressed by multilingual education" (quoted in UNESCO 2003, 17). In 2001, the International Conference on Education emphasizes in their Proposals for Action that:

> "Communication, expression and the capacity to listen and dialogue [should be encouraged], first of all in the mother tongue, then, [if the mother tongue is different from the official or national language,] in the official [or national] language in the country, as well as in one or more foreign languages." (quoted in UNESCO 2003, 32)

This is only a selection of many more announcements from different organizations of different countries about the necessity of mother tongue and multilingual education.

Stroud (2003, 21) sees legitimization for the use of local languages in the three main purposes of education. First of all, he names authenticity, which is only given though the local languages because they are the only way to truly express cultural roots and to articulate the individual and social identities of their speakers. The second important concept is that of

ownership. Speakers have inherited the local or indigenous vernacular across generations and they can rightfully claim ownership of these languages. The third notion of the use of local language is based on the concept of relevance because a legitimate local language is a functionally adapted code for management of the everyday needs and priorities of the community. Stroud regards these three concepts as "slightly different but complementary rationale[s] for using local languages in education" (ibid., 21).

6.1 Advantages of the Use of Mother Tongues[8] for Educational Success

Until the 1980s, mother-tongue adult literacy programs in multilingual countries on a large scale were rare (see Malone/Arnove 1998, 29), and it was often limited to rural areas, as Wolff (2003, 195) describes the situation in Niger. This was mainly due to the fact that literacy meant being literate in the official, international language (see ibid., 195). However, the situation is changing, probably also due to the fact that many advantages of mother tongue education are more often discussed in recent literature. Additionally, research studies supporting this point of view have been carried out in this sector.[9]

The first and most convincing advantage of mother tongue instruction[10] is the proven fact that it is easier to become literate in the mother tongue than in a second or foreign language. For example, it is important that reading is acquired through a language which is known very well. This is due to the fact that the letters and words are sounded out and this information is matched to the known language patterns. It is a process of continuing trial and error to make sense of the incoming data. If this is happening in an unknown language, there is no background information to which the incoming data can be compared and finally matched so that the

[8] In this part the term "mother tongue" can also refer to the strong language of a person because for the educational success of literacy programs it is important that the language used here is the one which is mastered best by a person.

[9] However, the need for more, especially longitudinal, studies has been uttered very often in the literature.

[10] Mother tongue instruction should cover both the teaching of and the teaching through this language (see UNESCO 2003, 14)

word can be recognized. The reader will not be able to know if he/she pronounces the letters and the words in the correct way because he/she does not recognize or even comprehend the word (see Abadzi 2003). Küper (2003, 93) says, regarding education programs for indigenous people in Latin America which use the local language as medium of instruction, that "they have proved to be more successful than the conventional system where Spanish is the language of instruction". The mother tongue is the language one knows best. The words and the structures of this language are familiar and one knows exactly how the words have to sound. This makes it easier to remember letters and their sounds. Starting literacy in a less familiar language means that the student has to learn the meaning of a succession of sounds, parts of and whole new words, sentences, their meaning, their pronunciation and all this in addition to the undeveloped skills of reading and writing.[11] This makes the whole program far more difficult, and it is a heavy burden on the student's memory. In Salhi's opinion (2002, 326) "the consequence of learning through an alien language has been a strenuous burdening of the memory, a sacrifice of the faculty of independent thinking, and a blunting of the intellect". In addition, the participants of education programs conducted in a different language than their mother tongue might have severe problems understanding the teacher (depending of course on how well the language of instruction is known). Naturally, the interaction in the class between the teacher and the participants suffers due to these communication problems. This is especially grave because adult education programs are usually designed to help the people to cope with their daily lives and to introduce to them important facts and skills which can help them improve their lives (e.g. hygiene and nutrition advice). Also, discussions are often an essential teaching and learning method. If the participants of those programs do not understand the language of the teacher, how can they participate in these classes and learn anything? Not taking into account the language of the people for whom the program is designed means that it is designed to fail.

[11] Here, it is referred to alphabetic scriptures only.

Another advantage of mother tongue instruction is that the literacy skills which have been acquired in the mother tongue can be transferred to the second language, especially when the two languages have the same script. This is an important point since good adult education programs also include follow-up classes for literacy in the official language(s). Research has found that being literate in one's mother tongue facilitates the alphabetization in additional languages (see Omolewa 2001). Although research has been mainly concentrated on the acquisition of literacy skills of children, where the outcomes are rather encouraging for mother tongue education (see e.g. Wolff 2003, Obanya 2003), Omolewa (2001) mentions studies which came to comparable results in adult education programs as well. However, one has to consider that the students will make slower progress in the second language in the beginning. This is understandable because they are excluded from understanding and learning the second language without comprehensive input. This is due to the fact that "reading is not merely decoding written communication, that understanding a language comes before reading, and that reading the first language should come before reading other languages" (Hovens 2002, 250). Ouane (2003, 69) mentions a longitudinal study on the acquisition of literacy, which brought an empirical dimension to the cross-language transfer of skills[12]:

> "…they proved that this transfer did not concern similar forms alone but also the level of decoding of the alphabets in the second language on the basis of experiences in the first language. […] They discovered in this way that the relationship between literacy in the first language and the second language intensified with time."

Omolewa (2001) quotes a similar research finding in Nigeria:

> "…at the end of teaching English to two groups for 12 months, it was discovered that the performance of the experimental group (literate in Yoruba [a major language in Nigeria]) was better than that of the control group (illiterate). The experiment showed that literacy in the vernacular had a positive transfer effect on literacy in a second language."

This is especially important because the goal of the majority of the participants is literacy in the official language (see Sentumbwe 2003). Although

[12] This study was carried out in a rural area in Morocco, observing the transition from Arabic to French.

the competences in the first and the second language are mutually beneficial and enhance one another, certain preconditions have to be considered in order to optimize the combination: the use of the second language should begin orally, and if the second language is not understood well, its introduction should not occur too early (see Küper 2003, 92). Omolewa (2001) gives an example of the use of indigenous languages in Nigeria, which was welcomed enthusiastically by the communities. According to him, more people enrolled and remained in this program. Salhi (2002, 339) regards the use of vernaculars as a step to "a more equal access to educational opportunities". He also points out that "literacy could be most effectively achieved in the vernacular" (ibid.). This example demonstrates that the use of the local language can have a positive effect on the motivation of the participants.

In addition, mother tongue literacy not only has positive effects on the educational outcome of the adults, but also on the educational success of their children. Children of literate parents, especially literate mothers, are more likely to enrol in school and to remain longer than their peers with illiterate mothers (see Oxenham 2005). There is also evidence that in literate families, school matters and the children's education are more frequently discussed. Furthermore, literate parents are able to help their children with their homework, which can have positive effects on their learning outcome. Since the language of instruction in the first years of primary school in many countries is the children's mother tongue, it is a great advantage for them if their parents are literate in this language as well. The EFA Global Monitoring Report 2005 also refers to the importance of adult literacy skills for the progress towards UPE (Universal Primary Education, one of the Millennium Development Goals). The following figure demonstrates the correlation between the mother's (or caregiver's) self-reported literacy status and the risk of children not attending school.[13]

[13] Even though this figure demonstrates a correlation between the mother's or caregiver's literacy status and the risk of the children not attending school, one has to note that the 'ability to read a sentence' is a rather primitive and general proxy variable for language proficiency. It is even more unreliable since it is a self-reported and not objectively assessed literacy status.

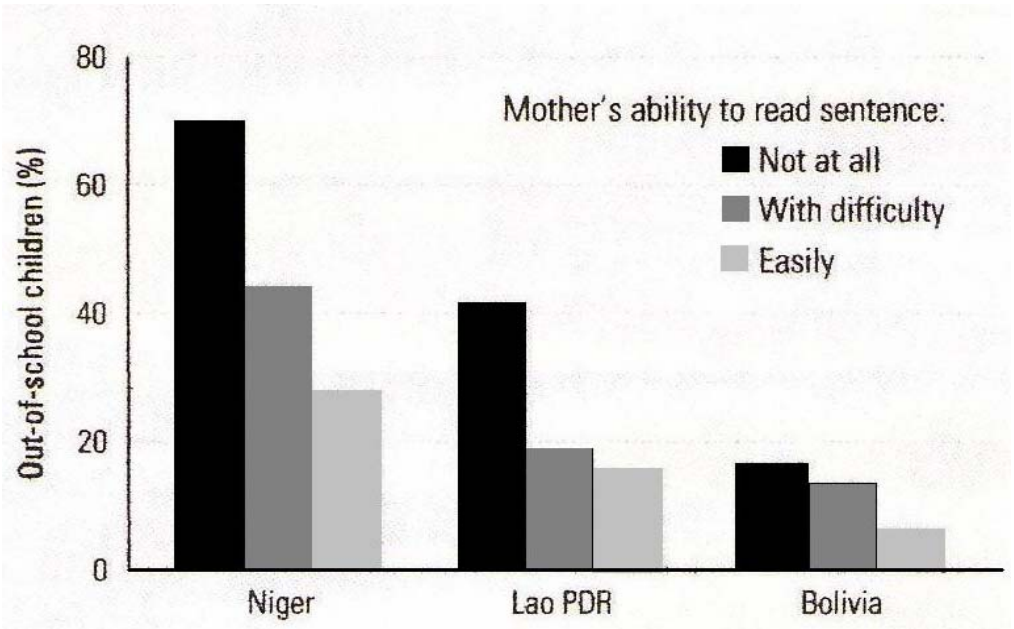


Figure 2: Mothers' literacy and schooling status in the Niger, the Lao PDR and Bolivia, 2000
Source: adopted from EFA Global Monitoring Report 2005, UNESCO. Calculations based on the UNICEF MICS database.

In the report about adult literacy programs in Uganda (see Carr-Hill 2001, 10), the importance of adult literacy for the achievement of UPE is stressed as well:

> "UPE demands that parents take a more active role in the management of schools and in monitoring their children's attendance and progress. To fulfil these roles, parents need to be able to read and write, if only to understand their children's homework and school reports."

The study this report is based on found that participants in adult literacy programs "appreciated the value of education and were spending more time to help their children with their work" (ibid., 90). In addition, they observed that graduates of these programs "were nearly twice as likely to discuss schoolwork and check homework as were nonliterates" (ibid.).

6.2 Positive Influence on the Political Climate

As already indicated in the previous chapters, language politics and language planning have a strong influence on the atmosphere within a coun-

try. Since language is not merely an oral and written way of communication, but rather a vehicle for tradition and culture which also has symbolic value for the people natively speaking it, they are very interested in how their language (and thus their culture and themselves) is treated. In many cases where the local languages are neglected and are of lower, non-official status, the speakers of these languages feel rejected and treated unequally. They feel unprotected against the predominance of the majority culture. Djité (2000, 37) finds an apt description for this situation:

> "For language, in this context, is not just a commodity, but a means of belonging, of managing one's social-cultural environment and an element of intergenerational understanding. It has a day-to-day reality and use for those who speak it and serves as a major mechanism to express and construct group solidarity. When these functions are negated by the lack of policy, it is often feared that the local languages will be threatened with extinction in the long term."

The belief in establishing national unity through imposing only one single official language (in the countries on which the focus of this thesis lies, it is the foreign language of the former colonial ruler) is a fallacy, as already indicated in chapter 5.1. Ouane (2003, 80) makes this very clear: "The solutions currently being applied are intended to lead to integration through international languages but they are actually leading to disintegration in the case of local communities, whose languages are affected by exclusion." It is simply not democratic to elevate one (or a few) language(s) above all others. This artificially created hierarchy always suppresses the majority of the languages and thus often the majority of the people as well. They will always be disadvantaged simply by being speakers of these local languages. They need to invest more effort to get good jobs (learning at least two languages), they are excluded from a great part of the public life (there are hardly any newspapers, books or radio stations using these minority languages) and they have grave problems in getting important information (e.g. about public services or election candidates), to name only some of the disadvantages they have to face every day. Djité (2000, 30f) describes the situation in Côte d'Ivoire, where the stress in language planning has returned to Standard French as follows:

> "The decision to put the emphasis back on Standard French […] can only be seen as a strategy to protect the privileges of these

> government authorities and other elites, and to limit the effective active participation in the public domain to select few, namely the elite."

The elite are using the language handicap of the masses for their own advantage by exercising power through control of the language (see Myers-Scotton 1993, quoted in Djité 2000, 31). Hovens (2002, 252) summarizes the situation in Niger in a similar way:

> "The existing political resistance to the use of national languages in education or in state administration may have to do with the elite's fear of losing privileges. When everybody can read and write there is more access to state activities and to the power of the elite. The lower the literacy rate the less democratic a country is likely to be."

Therefore, as Stroud (2003, 17) puts it correctly, "using local languages also enhances democracy". He claims "the rationale being that, as language is a gateway to other economic, cultural and social resources, control over linguistic resources is indirectly also control over economic and social advantages in general". In addition, the destruction of the foreign languages' role as the only official languages can help to remove the barrier between the communication of the leaders and the masses (see Salhi 2002, 326). By using the local languages in educational settings, the important process of democratization can begin early in the classroom. It ensures the democratization of teaching, without which a positive atmosphere between the teacher and the participants of the education program can hardly be achieved. The participants have to be encouraged right from the beginning to utter their own opinions and to take part in decision-making processes. The achievement of this more active and participatory attitude should be an aim of every education program. Therefore, a main method in many programs is group discussion. With the help of the teacher, the participants can be made aware of their situation and of their rights, and be shown methods to improve their lives. They can acquire and practice the imperative skills for becoming an active member of the community first in a classroom setting, for example by participating in the discussions. By doing so, they will become more confident to utter their opinion, to make suggestions and to come to new conclusions, later on not

only in the classroom, but also in public venues such as community meetings.

This is the first step to a new kind of *nation-building*. The term *nation-building* was often used by the governments and the elite to impose their undemocratic language policy on the people in a top-down manner. This new notion of *nation-building* is working the other way around, namely bottom-up. By strengthening and empowering the formerly oppressed majority of the people by helping them to become literate and confident to express their dissatisfaction (e.g. about the government), they form a nation from the grass root level upwards. ARED[14] encouraged the participants of literacy classes to write letters in which they explain what kind of impact the classes had on them. Amongst the responses[15] were several hints that point in the direction of a more active participation in the community and more self-confidence:

- "Studying gave me the courage to stand in the middle of people and speak the truth."
- "What has changed in my life is that now I dare sit with the elders, something that I didn't dare to do before."

Additionally, the positive effect on a bottom-up nation-building is evident in some of the responses:

- "Before, every group (lineage, social group, family) acted in its own interest, tending to exclude others. But now, they are beginning to act in concertation [sic] around community needs. This is easily observable in the changes in behavior in village meeting."

Ouane (2003, 66) explains that the "coexistence of several mother tongues is able not only to promote widely-spoken languages, which brings individuals closer to each other, but also to make it possible for different cultures to understand each other better". This can also be a very effective way of fighting corruption, which is a severe problem in many former colonies. When people are literate, especially when they are literate in the official language, they will be able to find out about their rights,

[14] ARED was founded in 1990 with the goal to publish books in the Pulaar language. They also provided village-based trainings for groups that use these books (Fagerberg-Diallo 2002, 177).
[15] All responses quoted in Fagerberg-Diallo 2002, 180.

and they will recognize more easily when their rights are violated. The significance of the promotion of local languages in all areas of public and social life, in political and economic development and in fair chances for the whole population are expressed in the following quotation of Djité (2000, 40):

> "If it is true that knowledge is power (both economic and political), than the transmission of this knowledge cannot be the preserve of a foreign language alone, no matter how perfect that language may be. The cultural values and spiritual aspirations of the people have to be taken into account. In other words, the continued exclusive use of the language of the former coloniser in such domains as education, law, or administration, condemns the overwhelming majority of the people to second-class citizenship and disqualifies them from taking an active part in serious national issues."

6.3 Positive Economic Results

The use of local languages in education programs resulting in literacy of a larger part of the population also has a positive influence on a country's economic situation. Stroud (2003, 25f) cites two studies about the influence of bi- or multilingualism on a country's economic growth. The first was conducted by Fishman (1991b, quoted in Stroud 2003), who found out that "heterogeneity bore no predictive value for the level of per capita GNP" (ibid., 25f). The findings of the second study by Fishman and Solano (1989, quoted by Stroud 2003, 25) "even suggest[s] that the existence of […] bilingualism enables many polities to attain a higher per capita GNP than they otherwise might". Support for the acceptance of multilingualism also comes from Michael Clyne (1997, quoted in Stroud 2003, 26), who

> "has pointed out how even in recent years *globalisation* is reinforcing this trend [of accepting multilingualism], as multilingualism is fast becoming an economic necessity rather than a liability, implying a shift from a social motivated language maintenance to a focus on an economically motivated language learning, and a rhetorical emphasis on productive diversity."

Ouane (2003, 72) sees a common mistake in the fact that

> "people who […] put obstacles in the way of the development of mother tongues, forget one essential aspect of the human condition, namely that people are the seat of linguistic functions and that the development of language is an aid to human development."

He also mentions other advantages of the use of the mother tongue, namely “happiness, culture, social or personal adjustment, or growth in responsibility” (ibid., 71), which are often considered to be rather trivial by radical economists, but which he believes “lie at the root of a number of acknowledged economic problems” (ibid.). The problem with these aspects is, of course, that they are more difficult to gauge than “profit that can be expressed in money terms” (ibid.), but they should be taken into account, nevertheless. He aptly notes the problem that economic growth and productivity can not merely be measured with statistical figures. The productivity of an economy is usually, especially in the less industrialized developing countries, the result of the work of the people. People with a better education who are willing to take calculable risks and responsibility for their lives are more productive. In the education programs in rural areas, for example, people learn about more effective ways of planting and irrigating, thus increasing their agricultural outcome. Literate people, who are familiar with bank transactions, are more likely to raise credit in order to start a small business. The education programs often encourage the participants to find new and more effective ways for earning money, and they demonstrate alternatives available to improve their daily lives. Some programs are implemented in cooperation with other organizations (e.g. the Food and Agriculture Organization in some Asian countries) in order to link learning to people’s livelihoods as a tool to acquire and use knowledge on health, income-generation and small-scale credit (see O’Malley 2003).

Adult education programs are often overlooked when it comes to public expenditures. Many countries invest the most part of the money in secondary and higher education, followed by primary education. The budget for adult education programs is usually very tight. However, studies show that it is less expensive to make an adult literate through an education program than it is to achieve literacy with children. One reason for these findings is that adults acquire literacy faster than children. Fagerberg-Diallo (2002, 182) cites an evaluation of Wiegelmann and Naumann (1999, 23) who found that the performance of the participants in adult literacy programs after 150 hours of instruction in national languages were “comparable to

the level of knowledge in French for students after three years of study". In the report about adult education programs in Uganda (see Carr-Hill 2001, 56), it is stated that adults can learn reading and writing skills faster and more effectively than children of the age of 10-15 under the given circumstances.[16] This report also includes figures about the costs of the programs in comparison to the costs of four years of primary school. In adult education programs the costs per certified graduate amount to US$4-20 (depending on the program), whereas the costs to bring a pupil through four years of primary school amount to US$60 (ibid., 96). However, it is not mentioned if the educational levels were comparable and in which language the primary school lessons were conducted. A comparison of the cost of making adults literate in the mother tongue versus the cost of making children literate in French is given by Ouane (2003, 71). It shows the positive cost-effectiveness of the adult program (500 hours), where the costs for one adult amount to US$50 in comparison to US$150 for a child made literate in French.

This is, of course, more of a warning sign for the ineffectiveness of the formal schooling in French than a sign of the effectiveness of adult education programs since the outcomes of these programs are often far behind the expectations. The claim is not to reduce the expenditures for the primary schools, but to rethink the way in which the schools work and how the lessons are conducted. Nevertheless, it indicates that adult education programs are a comparably cheap supplement in the education sector and that they should, therefore, occupy a secure place in the educational budget.

6.4 Empowerment of Women

In addition to the political and the economic sphere, the implementation of adult education programs in local languages can also have positive results for the social situation in a country. The most striking improvement, which can often be observed, is the empowerment of women. Many education

[16] This opinion contrasts with that of Abadzi (2003, 2004), who claims that adults have far more difficulties to become and remain literate than children. Her point of view will be discussed comprehensively in chapter 7.10.2.

programs are designed particularly for women. In Senegal, for example, the TOSTAN Basic Education Programme has been developed. One of its goals is the reduction of illiteracy, but it was also created to "help the population to achieve health and self-development through the use of adapted educational materials" (Wagner 2000, 20). Even in non-specialised programs, the number of female participants is often far higher than the number of male ones (see Oxenham 2005). In Uganda, for example, a much higher number of female participants in the education programs is reported. Some 78.9% of the programs' graduates were women (see Carr-Hill 2001, 18 and 97).

Women usually gain the most from education programs in their mother tongue because they often have little access to the official language, especially in rural areas. This is due to the fact that the dissemination of the official language often does not reach the remote rural areas, and that these areas' inhabitants seldom visit bigger cities, women even less frequently than men. Additionally, women, when they were young, have usually had fewer chances to go to school than men, and thus have been robbed of the opportunity to acquire at least the rudimentary ability to read and write in French.[17] By the use of the familiar language, they are better encouraged to join the programs, often even against the resistance of their husbands. It is reported that at the beginning of literacy programs, many of the women were beaten when they came home late from class. Since then, the attitudes have changed and the status of women has been raised in many places by their ability to read and write (see O'Malley 2003).

Female literacy is extremely vital for health and social development in the communities. Wagner (2000, 15) states that "given the key roles that women play in fertility planning, infant care/nutrition and health education, it is not surprising that female illiteracy is seen as a major obstacle to health and social development". Sen (2002, chapter 8) points out a study

[17] The enrolment rates of girls, especially in earlier years, are significantly lower than those of boys. Enrolment rates of girls in percentage points (of all pupils enrolled) in selected African countries in 1970: Benin 30.9%, Burkina Faso 36.4%, Côte d'Ivoire 36.4, Kenya 41.4%, Niger 35.5%, Nigeria 37% (see UIS).

conducted in almost 300 Indian districts which proves this assumption with statistical data. Schooling of women was found to be a significant factor in the reduction of child mortality (under five years old). In addition, the birth rates decrease as a result of the reduction of child mortality as well as a result of the more self-determined attitude of the literate women. Sen (ibid., 242) mentions other reasons as well: "Bildung erweitert unter anderem den Vorstellungshorizont und unterstützt – auf einer praktischen Ebene – die Verbreitung von Wissen über Familienplanung“. Another positive influence of female literacy has been shown to be a greater chance of survival for girls.

The women can also strengthen their position in the community through literacy. They are often more self-confident after the education program, mostly due to the fact that their newly acquired literacy skills help them to become more independent. Oxenham (2005) mentions a review of Moulton (1997) which provides supporting data for this assumption. Stroud (2003, 28) explains how the situation of women has been improved through literacy. He gives the example of women whose husbands are working in far away places. Their only way of communication is by mail. Before their literacy, the women had to rely on so called “literacy brokers”, who were often males, to read and write their private letters from and to their husbands. Often, they even had to pay these people to read and write the letters. Of course, this eliminates their privacy given that other people know the contents of the letters. By being literate, however, the women could liberate themselves from the “public surveillance and control” (ibid., 28).

Nevertheless, programs designed especially for women can also contribute to the cementation of traditional women roles, which are often connected with less community participation and a lower social status. Many programs focus on traditional domestic female roles, like nursing and nutrition, and they neglect and ignore their productive and community roles. In the few programs where there is a conscious attempt to change existing roles, they are usually designed as very didactic approaches with outsid-

ers lecturing women about their oppression. These programs have the good intention to empower the women and to improve their situation, but they seem to choose the wrong ways in order to achieve their aims (see ODA). Another danger lies in the fact that literacy and education programs seem to be regarded more and more as a “women’s thing” which directly or indirectly excludes men. It is important to stress the point that literacy is as vital and helpful for men as it is for women. Thus, whenever programs are establish which focus on the women’s needs and interests, special programs for men should be implemented as well (see ibid.).

6.5 Saving Dying Minority Languages

The countries which are examined for the purpose of this thesis are all linguistically diverse. As mentioned before, some languages are spoken by a majority of the population, for example as lingua francae, whereas others are spoken natively by only a few thousand people. These minority languages seldom have more functions than those concerning the private or community level. They have communicative functions within the family and community, and they are used for traditional rituals, songs and oral stories. On a wider level (regional or national) they are unknown and thus, they do not fulfil any functions since the language of inter-ethnic communication is the lingua franca and the language of education, administration and judicature is the international official language. In addition to the few possibilities of effectively using these languages, many of them do not exist in any written script. They only exist within the oral tradition. They never experienced the support and promotion like the official language(s) did. The former colonial rulers as well as the post-colonial governments did not regard most of these languages as being worth the effort of graphicization. Thus, having only little function in the private context and having no, or at least no standardized, written form, the minority languages never had the chance to develop and to “grow”. Therefore, the prospects of widening the use and the functions of the languages, as they exist at the moment, are not very promising. This is mostly due to the fact that they can not be used in more modern, industrialized and technology-related contexts because they simply lack the modern terms. Ouane (2003, 73) says to this issue:

"By forbidding the use of indigenous languages, this elite has prevented their development in the world of work". It is a vicious circle: the languages are not officially recognized, they had and have only a few functions in public life and therefore they were and are restrained from development and thus, modernization. This development, however, is often seen as a crucial prerequisite for an expansion of their sphere of usage. Ouane (2003, 69) argues that "it is […] more a question of access to use than of innate limitations of certain languages. No language is developed in its essence. Its development and ability to express technical matters come about through usage". These minority languages are in great danger of being extinguished within the next decades if their situation is not improved. Of the estimated 6000-7000 spoken languages today, "some experts suggest that perhaps 90 per cent […] will become extinct in the next century" (Perez de Cuéllar et al 1996, quoted in Küper 2003, 89).

However, there is a way of promoting the languages and thereby reducing the risk of their extinction: the introduction of the indigenous languages in formal and non-formal education programs. Ouane (2003, 51) cites Skutnabb-Kangas' claim according to which the most successful way of either supporting or destroying a languages is education. The decision to carry out education programs in the minority languages signifies the need for graphicization of these languages, alongside modernization and standardization. This is the first step to keep the languages alive and to broaden the opportunities for their use. Adegbija (2003, 179) regards graphicization as "the life-blood and trigger for further development, especially when the graphicized language is used in basic-level literacy". In addition, written material will be produced in the form of teaching and reading material and also by the newly literates themselves. They should be encouraged through the education program to preserve their traditions and culture with the help of a script, e.g. by writing down their songs and tales. In this way, they preserve their history, their traditions and, of course, their language, for written languages are less likely to become extinct.

Ouane (2003, 80): “To guarantee the cultural and linguistic permanence of indigenous peoples, efforts must be made to give them the opportunity to learn these languages within the framework of both formal and non-formal systems of education”. This quotation shows another dimension of this issue. The loss of a language always signifies the loss of a culture or at least of parts of it. A language includes much more than simply words, names and information. It is the reflection of a culture; it shows concepts of the world and of its people. There are words, which transmit a certain meaning, connotations and symbols that are unique and that can not be expressed in the same way in another language. Tadadjeu (2004, 7) supports this point of view with the following claim: “Since language is the best way to transmit culture from one generation to the other, the teaching of African languages supports the need for an authentic cultural identity”. Especially in today’s world of globalization, mass media and the Internet, it is particularly important to be aware of the uniqueness of the different cultures and languages. It should be the aim of education programs to emphasize the value and the importance of maintaining and strengthening the participants’ cultural roots. Madden (1990, 18; quoted in Fagerberg-Diallo 2002) agrees, and he also regards this point as a motivation for the people to join the education program he talks about in Senegal: “…we must try to revitalize our culture, and literacy in Pulaar language is one instrument for reaching that goal”. Nevertheless, it is important to mention that the awareness of the value of one’s own culture is not tantamount with the degradation of other languages, cultures and peoples. The value and the significance should be seen in the diversity itself, not in one particular part of it.

Despite the dangers the minority languages are exposed to and the help that can be offered from outside the community to support the languages, responsibility for the sustainability of a language is to a certain part also to be found on the side of the speakers themselves. They have to keep or establish a positive attitude towards their own language and its value. The development and the growth of the language are in their power as well. Adegbija (2003, 176) adds: ”That is, whether a small language lives or

dies is often directly and particularly dependent on the emotional, financial, psychological and intellectual commitment of the speakers." He always sees the possibility for the speakers to "salvage their linguistic and cultural destiny, and redeem their downtrodden and neglected status" (ibid., 180). However, these last remarks make clear that it is far more difficult to see the value in keeping one's language alive when the general attitude of other linguistic groups in the community is negative towards this language and when it has no functions in public life. Additionally, members of these minority language groups usually lack the financial resources and the education necessary to support their own language, e.g. producing books or establishing literacy classes. With financial and educational help from outsiders (e.g. government, non-governmental organizations), however, their attempts at revitalizing their language can be supported.

6.6 The Interdependence of the Advantages of the Use of Mother Tongues

The purpose of this first part of the thesis was to point out the most important reasons for implementing adult education programs in the mother tongue. It also demonstrated how complicated and complex the situation in the African countries is, especially considering the multilingual reality. All the arguments for mother tongue instruction and the advantages resulting from them can not be seen as isolated. They are all linked with each other in one way or another and an alteration in some place also has effects on the situation in other areas of the people's lives. Female literacy, for example, can have a positive influence on the health and education of children and it can improve the women's situation in the community, making them more independent and helping to achieve the aim of gender parity. This again is a prerequisite for a stable and democratic political situation, which can also help to improve the economic situation of the women, their families and the country as a whole. Thus, the advantages of literate adults can be seen on the individual, on the family and the community level, as well as up to the level of the whole society.

7. How can Mother Tongue Adult Education Programs be Implemented Successfully?

The following part of this thesis tries to answer this question by focusing on the important points of consideration when planning, introducing, maintaining and evaluating adult education programs.[18] It also reveals the areas where problems might be expected and how they can be prevented. One common problem concerning adult education programs is that the mistakes which are made in the formal school system are also made in these programs. One of the mistakes is that the educational content and teaching methods are of Western origin. The situation in the concerned countries is often not taken into account in an appropriate way. Insufficient attention is paid to the differences in the environment between Western and African countries and their influence on the cognitive development of the people living there (detailed discussion of this issue follows in chapter 8). These mistakes occur in formal schooling as well as in adult education programs. Fagerberg-Diallo (2002, 169) describes the situation in Senegal as follows:

> "The premise of most programs today […] remains the rather simple idea of 'translating school' (or part of it) from a European language into an African one. Since the experience has not always given the desired results, perhaps it is time for us to question the importance, applicability, timing, content, and cultural relevance of these programs. The objectives of most literacy programs have focused on how to find a more efficient (and hopefully very inexpensive!) way to transmit skills and information that have been identified by outsiders as valuable for participation in 'the modern world'."

She continues (ibid.):

> "Instead of asking how we can use African languages to transmit a predetermined body of knowledge, perhaps we should be asking how we can learn from African language education to discover what ought to be taught, how, to whom, at what place, and for what purpose?"

[18] For the purpose of this thesis only small-scale programs or projects for implementing education programs are considered. This is due to the fact that the focus lies on mother tongues in linguistically diverse countries, which often equates with minority languages. Therefore, programs implemented in the described environments are usually designed for smaller groups of participants. In addition, these minority languages often exist only in an oral tradition which demands different planning than programs for language groups with a long written tradition. Small-scale projects are aimed at a specific audience and they serve a specific purpose, usually being planned in close cooperation with the learners (see Malone/Arnove 1998, 28f).

These are exactly the relevant questions that are often not asked by the program planners. The necessary features in successfully implemented and sustained education programs for adults are identified by Malone (2004, 8):

- The program is helping the participants to achieve their own goals and to meet their needs, and it helps them to solve their problems which they have identified themselves. This is why the participants value the program and regard it as their "own".
- The lessons are taught in the participants' mother tongue.
- The lessons are planned on the basis of the participants' previous knowledge. This increases the confidence of the learners in their own abilities.
- A variety of interesting and challenging reading material in the participants' mother tongues as well as in the majority language for further study is available.
- The program experiences support from agencies and organizations outside the community as well as from the language community itself.
- The participants have the possibility to continue learning because the program is linked with on-going education opportunities inside and outside the community.

These issues will be discussed in the upcoming chapters, and alternative ways to the more traditional teacher-centred way or the functional way of implementing literacy and education programs will be presented.

7.1 The Use of Minority Languages in Adult Education

The choice for a local, often minority, language for adult education programs can bring along difficulties concerning the language itself. Minority languages often exist only in an oral tradition, and they have not yet been reduced to a written form. If this is the prevalent situation, the planning team has to tackle the imperative challenge of graphicization. A script has to be chosen and means of an unequivocal representation of the sounds in a language through letters have to be found and negotiated by involved

community members. Usually, one tries to find a common orthographic and alphabetic system for various languages within a country in order to avoid an immense complexity of the language situation in a country (see Fyle 2003, 114). A team of outsiders with the necessary theoretical background and of insiders who are native speakers of the respective language ought to be in charge of the process of graphicization. In addition to this process, a standardization of the language is important, too. Minority languages often exist in many different dialects, which can be so divergent from one another that it is sometimes almost impossible to recognize if it is a dialect of a language or a completely dissimilar language. To ensure that the standardized form is actually used in practice, members of all the concerned dialect groups have to be involved in the development. By this constant negotiation, the notion of the imposition of a form of the language from outside can be prevented. It is important that the standardized language is widely accepted and used, otherwise it has failed to achieve its aim.

The next step of modernization of the language happens in different ways. Words for concepts and things of a more modern world (e.g. technology, media) have to be developed or adopted from the official language. However, modernization is a process that happens more or less automatically through the use of the language. People who write, for example, about scientific discoveries will come up with new words for these in the national language or use borrowed words. If the public regards them as adequate, they will be used more frequently, and finally, they will be fully adopted into the language. Komarek (1997, quoted in Küper 2003, 90) describes the situation between language, modernization, culture and knowledge production. To guarantee the wider diffusion of new concepts and research findings, a more popular language level is used. Here, the important role language plays in the introduction of new knowledge and cultural change at a social level becomes very clear. Therefore, the situation in the linguistically diverse countries, where only the widely unknown official language is used in higher formal schooling and in science, is more complicated. The scientific concepts are not developed or even explained in African

languages. As a result, these concepts are only superficially and poorly learned in a foreign language and only by a small minority of the population; they are not becoming a part of the everyday life of the people (see ibid.). Employing the local languages, which the people master, facilitates the transfer of technology and know-how to those who need them most (see Stroud 2003, 17). Of course, even if scientific findings are translated into one's native language, it does not mean that one is able to fully understand them or that they would have any decisive impact on one's life. However, without using the local languages on more than just the community level, they are not allowed and supported to develop and to modernize. Another important aspect is the inter-translatability of the minority language "with the most advanced modern languages of art, science and technology such as English, French, German, Russian and Japanese" (Abdulaziz 2003, 110). This makes information flow from outside the country possible and facilitates the understanding of new discoveries and development throughout the society.

Nevertheless, the development of a minority language described herein is the ideal way. The processes of graphicization, standardization and modernization are important ones, but they need time to be negotiated and to develop. It may take a very long time for the last stage of development, the inter-translatability, to be achieved. The main problem is that the necessary dictionaries are often missing even for widely spoken national languages. Without them, however, it is almost impossible to establish a successful communication between the different languages.

7.2 The Participatory Approach

This approach in adult education emphasizes the necessity of representation of each group of stakeholders, especially in development-oriented programs, in decision-making processes (see Malone/Arnove 1998). Including all the different groups in the process of planning and implementing the program is an important step to ensure the program's relevance to the people and to support a mutual responsibility and ownership for it, which are imperatives for sustainability (see ibid., 20f). In addition, it is

necessary that the implementation team consists of people from within the community (native speakers of the program's language, including e.g. writers, facilitators) and people from outside the community (e.g. advisors and trainers). Members from each of the population groups should be represented in the implementation team (see Malone 2004, 22). In these people-centred programs, the beneficiaries are not seen as the *target of* development, but rather as *partners in* development (see Malone/Arnove 1998). The long-term benefits of this approach have been identified in a study of 16 projects, where participants of the program "were regularly consulted and involved in decision-making at all stages of the project cycle" (Malone/Arnove 1998, 21). The participatory approach is also identified by Senegal's Ministry of Education as one of the six "strategies" to achieve its goal of diminishing the illiteracy rate of the age group between 9 and 55 (see Fagerberg-Diallo 2002, 171f).[19] The participatory approach renders a constant assurance about the realization of the participants' expectations. With the help of interviews and discussions, in short, by the involvement of the learners in all processes, satisfaction in the program and success at achieving goals can be evaluated on a regular basis.

However, this approach has disadvantages as well. The process of decision-making, no matter whether it concerns the content, the practical realization or other aspects of the program, is prolonged by the fact that more people with different opinions are involved. This can lead to a reduced efficiency and to frustrations on the side of the program's initiators. Nevertheless, it is claimed that the additional effort to take every opinion and every stakeholder into account pay off in the long run (see Malone/Arnove 1998, 21).

[19] The other five "strategies" are "to work in partnerships with other actors, […] to encourage social mobilization around literacy, to decentralize control and decision-making, to provide coordination, follow-up and evaluation, and to carry out all activities based on the principle *faire-faire*" (Fagerberg-Diallo 2002, 172). *Faire-faire* is a concept that is meant to "enable others" by decentralization. "On the other hand, it also passes responsibilities for providing education from the government to various actors […] that are not fully equipped to carry out such a massive role" (ibid., 169).

7.3 Mobilizing the Community

In the run-up to the implementation of adult education programs, it is vital to take sufficient time for a thorough planning. However, before the planning can begin, a preliminary evaluation of the current situation in the country and also about its people is imperative. Without this evaluation, the program will be doomed to fail from the first moment onwards. There is a variety of questions the program planners have to ask themselves (and, of course, find answers to) before they can start planning the program. This is important because they have to learn about the people's needs and wishes, so that the program and its contents are relevant and meaningful to them. This is part of the mobilization of the community by which the people are encouraged and supported to take action. The chances of achieving these aims can be increased if the participatory approach is realized during the mobilization. The purpose of mobilization is to enable program leaders to:

- Identify the aspects community members want to alter by collecting and analyzing information about the current situation in the community.
- Learn what a program should include to suit to their particular situation.
- Collect and analyze information they will need to plan and implement the program.
- Identify existing resources within and outside the community and make efficient use of them.
- Encourage support and cooperation from within the community as well as from outside agencies. (see Malone 2004, 22f)

The gathering of the information can happen during community walks, informal discussions, interviews, role-play, skits and puppet-shows, participatory diagrams and graphics and with the help of already existing programs.[20] The mobilization also includes the dissemination of information about the upcoming program in the community. This can be done with the help of posters, the media (where available) as well as by using traditional

[20] For additional information see Malone 2004, 23f.

ways of disseminating information, e.g. by travelling musicians (see Malone 2004, 25f). By integrating the community and its needs and wishes, interest in the program will be more easily raised.

7.4 How Important is "Functionality"?

In the literature, it is usually claimed that the most important point in adult education programs is functionality. Adults have to feel a real need for and see a benefit from joining the program and spending their precious time (and often also, directly or indirectly, their money) on the classes. Literacy is not seen as an end in itself. Ramdas' experiences (quoted in Malone/Arnove 1998, 19f) with mass literacy programs in India support this point of view:

> "Literacy by itself had no meaning or relevance for those with whom we worked. […] So, we stopped worrying about literacy as an end in itself, or as being central to our work. We began to work together with the people in trying to understand their immediate and daily concerns and difficulties."

"For adults, reading and writing are meaningful only as they relate to daily activities" (Tadadjeu 2004, 5). Therefore, the functional literacy was introduced in the 1960s. The aim is "to help the new literates master new skills related to their work, living conditions, and participation in the development of the community and the nation" (Tadadjeu 2004, 5). Literacy is regarded as a tool; helping learners to better understand the political and social forces that impact their lives, and it is therefore an integral part of development (see Malone/Arnove 1998, 19). Even though the effectiveness of functional literacy programs was far behind the expectations in the 1976 UNESCO/UNDP evaluation, the idea of these programs has still remained and their main assumptions have been validated (see EFA 2005, 58). The EFA report (2005) also points out (with reference to Oxenham 2002) that a program "aimed at helping people acquire the skills they need to sustain a livelihood stand a stronger chance of success than those led by literacy as such" (ibid., 59). Evaluations of the attendance rates of courses in Kenya point in the same direction: courses which offered livelihood training (e.g. how to earn a living and get access to credit) in combination with literacy classes were found to have 80 percent attendance rates whereas literacy-

only classes had only 20 percent (see Abadzi 2003, 66f). The problem is, however, that the notion of what it is important for the new literates to know according to the program's planners is not always tantamount with what the programs' participants themselves want to learn and know. Sall (2002, 92) comments about this problem in women literacy programs in Senegal: "A quoi sert-il d'apprendre à lire et écrire si on sait que l'on n'aura ni la possibilité ni les moyens de mettre en pratique notre savoir-faire?". Oxenham (2005) cites an evaluation (Oxenham et al., 2002) of several education programs in different countries which were divided into two groups: "literacy-led" and "livelihood-led". Three conclusions were drawn from this evaluation:

- "Livelihood-led" programs seemed to be more successful than "literacy-led" ones. The reason for this is seen in the assumption that the concurrent training in livelihood skills demonstrates that literacy and numeracy are indispensable to their full effectiveness.
- "Livelihood-led" program seem to be better in designing effective combinations of livelihood and literacy.
- "Livelihood-led" program participants join the group for particular purposes and they find that they need literacy and numeracy to achieve these purposes. Therefore, they tend to be more successful in developing all skills.[21]

On the contrary to these claims stand the results of evaluations and interviews about the participants' motivation to join the program and about their hopes of possible benefits. In the evaluation of adult literacy programs in Uganda, the most important advantage of the program to the participants was the possibility to learn reading, writing and numeracy. The suggestion made here is that in countries where literacy and schooling are more widespread, "they acquire a value in themselves, separate from their potential uses" (Carr-Hill 2001, 111). This report of Carr-Hill (2001) also raises the question of the importance of functional information in the con-

[21] The programs allocated to the group "livelihood-led" were all created according to Rogers framework called "literacy second". It "entails identifying the leading common interest of groups of people, arranging training in those interests and then identifying how literacy and numeracy can best further the training and the interests" (Oxenham 2005).

text of literacy programs for the participants, and it comes to the conclusion that its importance was and still is overestimated. Its evaluations demonstrate that "many, perhaps most, participants in adult basic education programs simply wish to feel able to read and write" (ibid., 113). Functional knowledge questions were also posed to non-literates and literates. The result: "On many points of information, the differences between participants and nonparticipants were not large" (ibid., 113). This last remark raises the question of whether the contents of the program were chosen incorrectly.[22] The fact that the illiterates knew the correct answer to many of the questions (eight of the thirteen questions were answered correctly by more than half of the non-literates, four by 70% or more), even though they had not taken part in the programs suggests that the programs' contents did not really take the adults' previous knowledge into account. This is claimed to be "a cardinal sin for an adult educator" (ibid., 62). However, the knowledge of the just literates in comparison to the non-literates increases from 4% up to 33%.[23] This can be regarded as a partial success.

The question about the language of instruction plays an important role in the consideration of the programs' aims. In Adegbija's opinion (2003, 172) the language which can lead to functional literacy should be used in the programs. This can be either "the community language, or the mother tongue, whichever is more effective for functional literacy purposes in a defined area of a country and not necessarily over a wide zone" (Fyle 2003, 114). This might also mean, however, that this prerequisite can not be fulfilled by the mother tongue, for example in the cases of minority languages which have only few functions. Being literate in these languages does not necessarily help to improve the situation of the people because the languages are not officially recognized, and they are not used for administration and judicature. In addition, they might be useless for achieving the aim of getting a better job. According to Adegbija (1994, quoted in Omolewa 2001), this is due to the following situation: "Generally while all

[22] On 8 of 13 functional knowledge questions more than half the nonliterate sample was able to give the correct answer (see Carr-Hill 2001, 62).
[23] There is one exception. The question "How can you fight pests?" is answered correctly by 71% of non-literates, but only of 60% just literates and 64% 2-year-literates.

languages are apparently equal, it does seem that in terms of national and official functionality, at least, some are more equal than others". Although this is the present situation in many African countries, it should not be put forward as an acceptable justification for the non-introduction of the mother tongues in adult education programs. The prevalent situation was created by people and thus it can also be changed again.[24] However, the languages of wider communication should always be seen as a necessary second step in literacy and education programs because they offer, especially under the existing circumstances, the most advantages for the participants.

The question about the necessity of functionality can best be solved with the help of the preliminary research, asking for the learners' goals and expectations. If the intended learners wish to experience a more functional program, which includes livelihood skills as well, the program should, of course, take these wishes into account.

7.5 Recruiting Teachers[25]

Before the teacher training can begin, the planning team has to consider which qualifications the future teachers of their program should have in order to implement successful classes. Particularly for minority education programs, it is important that the teachers are native speakers of the language assigned for the program. This implies that the teacher should possibly be a member of the community, respected and accepted by the intended learners. A good relationship between the teacher and the learner is a vital prerequisite for a successful program. This is why a good way of starting the recruiting is to ask within the community, if there are people who fit the description of the desired future teachers. Recruits who are already literate in their mother tongue are extremely valuable for the pro-

[24] The issue of the allocation of more functions for local languages as a necessary supplement to the introduction of the languages in the educational sector will be discussed in chapter 9.

[25] In the literature, there are different terms used for the persons who are supporting and encouraging the participants. Depending on the programs, they are facilitators, instructors, literacy workers, teachers and many more. The facilitator in learner-centred programs for development, for example, is (or at least, should be) less an instructor and more a guide on the way to literacy and development. However, the term *teacher* will be used here to describe this person in a neutral way. What qualities this person should have to ensure successful classes will be discussed later.

gram. However, they will be the exception, especially in education programs for minority languages. For transitional programs, the teacher has to be fluent and literate in the second language, as well. Some programs use a certain minimum schooling degree as required qualification for becoming a teacher in the program, whereas other programs rely on rather newly literate people with no formal schooling. The reason for this is that the teachers who obtained formal schooling themselves easily relapse into the style of teaching they have experienced at school. This usually means the unwanted teacher-centred approach with rote learning and without much active participation on the side of the learner. The newly literates who attained their literacy in education programs are often more likely to apply the teaching methods they have learned during their teacher training since they do not know any other methods. Fagerberg-Diallo (2002, 188) addresses this problem:

> "Although they [meaning the future teachers] all blossom under the participatory and respectful approach used in their trainings, most fall back on the model of teaching with which they grew up. […] In voluntary community classes, we often find that it is better to count on a teacher who has never been to school. Even though his or her academic level may not be the highest, they don't have to unlearn as many inappropriate teaching techniques."

Another important aspect about teacher recruiting is the future teacher's attitude towards teaching and towards the learners. "They should appreciate the social, cultural and linguistic backgrounds of the different groups of learners and be committed to helping individuals and communities achieve their educational goals." (Malone/Arnove 1998, 41) Only if the teachers act according to this description does the education program have the chance to succeed, especially when it is designed as a learner-centred, participatory approach, which aims at development.

7.6 Teacher Training

After recruiting, the teacher training can begin. Depending on the program and the financial budget, the training of the teachers varies dramatically. In general, it can be said that the more the intended teaching method deviates from the one the trainees experienced themselves in school or in education programs, the more intense the training has to be. This is plau-

sible since the future teachers will relapse more easily into a familiar teaching style when they are not consolidated enough in the new teaching method. For the participatory approach with its learner-centred, often discussion-based nature, the trainees need a comprehensive training to develop and maintain the necessary teaching skills. It is vital that the training itself is implemented in the way the trainees are expected to implement their own classes later on. Thereby, they experience a more or less ideal example of how these new methods are applied. In addition, the training should include opportunities to "observe experienced teachers who demonstrate the desired attitudes and behaviour in their classes" (Malone/Arnove 1998, 43). After finishing the training, the new teachers should be offered the possibility to take part in workshops, follow-up seminars and discussion groups, where teaching experiences can be shared with others in order to constantly improve their teaching results and to get help and advice when needed.

This, however, is the (more) ideal way of recruiting and training teachers. In reality, there is often neither the time, nor the money and the personnel to realize every aspect of this model. The teachers are often retired individuals, university students or other formerly unemployed workers, who work on a voluntary basis for little or no money and who receive only minimal training. Fagerberg-Diallo (2002, 187f) describes the problems of a grassroots movement to implement literacy classes in Pulaar, the mother tongue of the people in this Senegalese region. The literacy teachers had often never owned a book, especially not in Pulaar. Large numbers of them were newly literate and many of them were still reading without fully understanding the meaning and without intonation. "Usually out of the group of twenty potential literacy teachers, only three or four of them will be able to read 'fluently' at the beginning of the teacher training. Roughly ten more will be able to acquire this skill during the two-week training" (ibid., 187f). Here, another problem becomes evident, namely the very short training period of only two weeks (sometimes it is even less), which is not sufficient to prepare the teachers for their duties and assignments in

class. If the teachers themselves can not read fluently, how can the learners possibly achieve fluency and proficiency without a proper model?[26]

7.7 Who are the Beneficiaries of the Education Program?

When designing an education program for adults, the answer to this question has to be given right at the beginning of the planning process. There is, of course, the need for differently designed programs, depending on the intended participants. A program specially aimed at women's needs demands a different design than a program for adolescents who dropped out of school (e.g. the women program might demand more female instructors, while a program for school drop-outs might be more interesting for the participants if it includes some kind of vocational training as well). To raise their interest for and to ensure their retention in the program, it is crucial to find out about their needs, motivations and the programs' potential benefits they are hoping for.

In this respect the planners also have to take into consideration the literacy proficiency level of the intended participants. The literacy classes have to be planned according to their previous knowledge. Malone/Arnove (1998) describe four types of literacy classes, depending on the participants' proficiency level in reading, writing and numeracy. There are *basic literacy classes* for people who have little or no schooling at all. The *fluency classes* are aimed at participants who demonstrate the language and the numeracy skills on a basic level, and who want to expand and consolidate these abilities. *Transitional literacy classes* are designed for people who have achieved a good level of proficiency in their mother tongue and who want to transfer these skills to a second language. In most cases, this is the lingua franca or the foreign official language. This language might be known on an oral basis, but it might also be completely unfamiliar to the learner. The fourth type is the *post-literacy classes*. They are important if the learners want to continue their education in the formal or vocational

[26] Fagerberg-Diallo (2002, 188) argues that it is not necessary for the learners to be fluent in reading since there is not nearly enough reading material for them. However, Abadzi (2003) regards fluency and accuracy as the major conditions for a successful and sustainable literacy (see chapter 7.10.2). Because of the lack of sufficient research, a thorough evaluation of the correctness of these two controversial opinions is not possible at this point.

system or through other educational opportunities in their community (e.g. reading clubs). This is essential for the retention of the literacy skills.

In the case of minority language groups with no writing system, there will of course only be basic literacy classes when the program is launched. However, research has shown that participants with some kind of formal schooling, even if it has been in the official language, gain most from the education programs because they learn faster and with greater ease (see Carr-Hill 2001). The report about adult education programs in Uganda (Carr-Hill 2001) shows that the majority of the participants had some previous schooling. They seemed to be more attracted by the programs, partly because they seemed to value education and literacy more than illiterates with no schooling experience. In this report, the question was raised whether the programs might be missing the target. They did not seem to reach the part of the population which they initially wanted to, namely the unschooled illiterates. A reason for this might be that these people were discouraged and intimidated by the presence of the participants with some kind of literacy experience. Developments like this have to be recognized by the implementation team and the teachers, and they have to be discussed with the learners. In these cases, it might be helpful to split classes, so that participants with a more homogenous level of literacy can learn together. Later on, with the rising level of proficiency on the side of the learners, classes building upon the learners' previous knowledge have to be installed to ensure the sustainability of the program by serving the participants' needs. These are alterations to the program which, of course, lead to higher expenditures and which can cause infrastructural problems, e.g. lack of classrooms, lack of teaching material. Nevertheless, these developments have to be considered while planning the program and they have to be expected. A thorough evaluation of the situation, the intended learners and their abilities and expectations as well as their integration in the planning process can prevent too many changes and alterations once the program has been launched.

7.8 The Aim of the Program

Given the fact that the time for adult education programs is very limited, thorough consideration should be given of the aims to be achieved. Under these circumstances, Fagerberg-Diallo (2002, 183) believes that "this style of education should be designed to provide the key to subsequent learning, so that newly empowered individuals can go on learning in real life situations after the classes have ended". Therefore, when evaluating achievement of goals, one should not overestimate the importance of accuracy, but the achievement of a skill level sufficient to make the participants independent learners after the classes should be the objective (see ibid.).

This is, of course, a desirable aim for education programs. However, reality shows that this is not a common development. In the report about Uganda (see Carr-Hill 2001, 60f), functional knowledge and the attitudes of the newly literates were compared with those who finished the programs two years earlier. The results show that there is no significant positive development during the two years following the program. On the contrary, the functional knowledge seems to be reduced, though not significantly. Of the thirteen functional questions, nine were answered correctly by fewer 2-year-literates[27] than by just literates, whereas only four questions were answered correctly by more 2-year-literates than by just literates. The questions about attitudes show a slightly better outcome. Of the eighteen questions, eleven were answered in the desired (more modern) way by a higher percentage of 2-year-literates. However, the difference was in the vast majority of the cases insignificant. In addition, the lack of reading material, especially in the local languages, and the few functions allocated to many of these languages often hinder a positive development and the increase of knowledge and skills in the aftermath of education programs.

In addition, the aim of what can be achieved during the program should be set realistically. Here, preliminary research and evaluation of the future learners' previous knowledge can again be of great help. According to

[27] "2-year-literates" means the persons who graduated from an education program two years earlier.

Fagerberg-Diallo (2002, 190), the goals should be set in a manner that at least a majority of the class can attain them. Enough time should be allowed to support the slower learners and alternative ways should be found for those who can not follow the “normal” program. She raises the question of whether we really want programs where only the best 25% of the students succeed whereas all the others are considered to be failures. This can surely not be a satisfying outcome for an education program, though this would still be a better achievement than many adult education programs implemented in the past.

7.9 Teaching Material

The availability of learning and teaching material as well as instruction books for teachers is often a problem in adult education programs. This is due to the limited financial resources, and often qualified personnel are difficult to find as well. Therefore, the majority of literacy classes and education programs are taught in an oral tradition without sufficient or adequate material (see Fagerberg-Diallo 2002, 189). Even where there are books available, there are usually far too few copies and their quality is often unacceptable. Because of the inexistence of teaching material, primary school materials are used for adult education programs. This is an unacceptable solution since the topics and the layout which is used for children’s books are absolutely inadequate for adults. The adults do not feel treated seriously, and they lose interest in the program, particularly because the children’s teaching material does not deal with topics which are of interest to the adults, and the adults’ previous knowledge is not taken into account. The situation is especially bad for math classes. The books usually contain exercises to be filled in without any explanations or examples of how to do the basic operations (ibid., 188f). Fal (2003, 222) describes the situation often prevalent in Senegal as follows:

> “Some of the arithmetic textbooks, for example, contain lessons teaching adults to count in their own language, and some language textbooks help them to memorize the grammatical rules of a language they speak perfectly well. The adults are thus being treated like children and the training is made unnecessarily long; the ‘childishness’ of the syllabus is, indeed, one of the reasons why adults drop out.”

Without sufficient material, the chances of conducting a successful program are very slim. The students do not have the possibilities to practice the newly learned skills or reread new information at home. Furthermore, students who missed classes for some reason do not have the chance to catch up by reading the missed chapters or topics in the course book. Another problem is the sustainability of the acquired skills and the retention of the new information after finishing the class. With course books or exercise books for every participant, they would have the chance to “preserve” what they have learned.

The development of teaching material for education programs should be based on the participants’ educational goals. Adequate material helps the learners to achieve these goals and it takes their present situation into account. With appropriate material that appeals to the participants, they are more likely to remain in class due to greater motivation. Some materials, especially in functional literacy classes, focus on topics which are identified to be of high interest to the participants (e.g. health, child care, agriculture). They can also include banking deposit and withdrawal slips or business order forms, anything that can help the learners cope with daily activities and situations (see Malone/Arnove 1998). Material of this kind can improve the living situation of the participants and their families in a rather direct manner. If the participants know how to fill out a form for food coupons, for example, they benefit immediately from their newly acquired skills. In literacy programs that stress the achievement of reading and writing skills in general without the functional aspect, adequate reading material also contains information about the improvement of livelihood. However, the benefits of this kind of program are more indirect. Literacy is more of a universal tool that can be used in all kinds of ways to improve daily life. Once literate, the participants can use their literacy for reading newspapers and books to get the information they want, they are more informed about what is going on in their country and they are more likely to participate.

The situation for teaching material in minority language education programs is usually extremely difficult. Books and other teaching and learning materials are needed only in small runs due to the special language situation. In addition, these language groups are often marginalized and live in remote areas without any possibility for producing teaching materials. Yet, there are ways of producing low-cost material in the minority languages. Which of the following methods are used to produce the material depends on the available printing technologies and other relevant material as well as on the intended teaching method (e.g. REFLECT programs intentionally reject pre-printed textbooks. As part of their program, they produce reading and learning material in their classes with the learners themselves).

One possibility is that the participants create their reading material themselves, with the help of the teacher. In beginner classes, they can dictate stories, songs or other relevant and interesting information to the teacher who writes it on the board and reads it with the class. Additionally, the participants can copy these short written texts in their exercise books. The teacher can also write texts and copy them for the class. The class can design posters about different topics, e.g. important nutrition facts or local songs, which can be hung up in the classroom. Graded reading material can be developed by using the traditional literature of the minority community (songs, stories, wise sayings and more), which often exists only in an oral form. This has many advantages. These old traditions have better chances of survival when they are written down, and they represent relevant and familiar topics for the participants, which usually results in higher motivation on the side of the learners. In addition to reading material, the participants can produce all sorts of material by themselves or with the help of the teacher or other experts. Examples are picture books with descriptions of local places, symbol and alphabet books, numeracy books, games, signs for schools and other public buildings, and many more (see Malone 2004).

To save the money and the effort required to develop completely new material, another possibility is to adapt already existing materials from other adult education programs for minority groups by translating them into the necessary minority language. This can be a good alternative if there is adequate material available which follows the same principals and aims as the program in question. However, the problem with this method is that in general, translated material is more difficult to read and the translation might be faulty due to the lack of experience in translating on the side of the implementation team (see Malone 2004, 85f).

Another interesting idea of producing reading material, especially in countries where there is a great variety of minority languages, is the so called shell books. This method is a combination of computer technology with simple community-based methods of reproducing materials with a silk-screen press. The books are illustrated with pictures of social, cultural, spiritual or other familiar themes closely related to the intended learners' background in cooperation with local artists and design-specialists. They are produced at a central setting (usually a bigger town with electricity and the available technology) and after that, they are distributed to the different communities. At this point, they do not yet contain any text. Appropriate texts are written by people in each community in their mother tongue, and they are typed or printed on the reserved pages. The main advantages are:

- Local communities are enabled to produce good quality material;
- The local/minority languages are taken into account since the same shell book can serve several languages;
- Though the initial production of the "text-free" shell book as well as the setting up of the computer facilities may be expensive, in the long run, this method permits the inexpensive production of small runs of quality material. (see Ahai 2004, 11)

Computer technologies and copying machines are of great importance for the production of teaching material because they make it possible to print good quality material in small runs and at a relatively fair price. A new printing software called AFRALPHA, created by UNESCO, corresponds to

the fifty characters of the African Reference Alphabet. With the help of this program, the printing of small runs of rural newspapers and of materials for basic education and literacy work is facilitated (see Ouane 2003, 71).

7.10 Teaching Methods and Teaching Approaches

The teaching method is another factor of compelling importance for the success and sustainability of adult education programs. Here again, there is not one specific teaching method which guarantees success in every setting and with every group of participants. The major implication here is that a good method is one which is accepted by and appeals to the participants. Generally speaking, teaching methods which promote the active participation of the learners and which regard the teacher more as a helper and facilitator on the learners' way to their educational aims than as the imposer of knowledge are favoured in the literature (see e.g. Malone 2004; Malone/Arnove 1998). What seems to be of great importance is the way in which learning and teaching in the local communities is taken into account in choosing the teaching method. In some communities, learning usually happens by observing and imitating the skill to be learned. Other groups might prefer to discuss new ideas, whereas a different community is used to learning new concepts on its own. These different learning styles should be used, especially in the beginning of the program. This helps the participants to feel more comfortable and accepted in the program. Later on, new learning styles and methods can be introduced, and a class discussion will reveal if these methods are appealing (see Malone 2004). Yet, this is again a description of a very favourable education situation. In general, as stated before, the teachers receive only a minimum of training and seldom have the support of refresher courses. For successful classes according to the method described above, the teachers need a profound training of the different learning styles and methods, and they need to be made sensitive to the participants' experiences in learning and teaching. This can not be accomplished by a few days of training, especially not if the teachers have never experienced the new methods themselves.

7.10.1 REFLECT: Adult Education Influenced by Paulo Freire's Theory

REFLECT is the abbreviation for Regenerated Freirean Literacy through Empowering Community Techniques. It was developed by the NGO Action Aid in the year 1993. Since then, it has grown into a worldwide initiative with over 350 projects in more than 60 countries. This approach is based on Paulo Freire's theories, of which the central premise is that no education is neutral because it is either used for domination or for liberation. It interweaves literacy with empowerment through increased community-level action and participation in community organisation (see NRDC).

7.10.1.1 Paulo Freire's Pedagogical Theory

Freire argues that in a context of prevalent illiteracy, where people are unable to assert themselves, where thinking is difficult and speaking is forbidden, there can not be such thing as neutral education. "Illiteracy is one of the concrete expressions of an unjust social reality. It is political…" (Freire 1985, quoted in ODA). However, he believes that literacy alone is of no use in achieving the social change and the uplifting of the illiterate people. He understands alphabetization as a creative act encompassing the critical understanding of the reality. He wants the learner to think about and reflect upon their own situation (see Freire 1980, 28f).

The aim of Freire's approach is the so called "'conscientization': the process of learning to perceive social, political and economic contradictions and taking action against the oppressive elements of reality" (ODA). To attain this aim, he claims that learners need to "gain distance from" their everyday lives in order to see their situation from a new perspective. This is achieved by *codification*, which is pictures and photographs containing existing problems or contradictions in the learners' lives. The learners reflect upon these pictures and describe and analyse them until they recognize their own lives and their own problems in them. With their help they are able to see reality more clearly by taking one step away from it (see ODA). Analysing a codification is called *decodification* and involves *dialogue*. Freire regards dialogue as fundamental in his approach to literacy

and social change. The dialogue he wants to be accomplished in the classes is more than a mere discussion. It is “a discussion where people reach below everyday life, open up, and come face to face with new understanding and awareness” (ibid.). In his understanding of education programs for adults and of the dialogue, which is an important part of the programs, it becomes clear that there is not a one-way communication from the teacher to the student as exists in the majority of educational situations. It is always a learning environment in which participants learn from each other and where different opinions are welcome:

> “Wir dürfen nie bloß über die gegenwärtige Situation reden, wir dürfen nie den Menschen Programme überstülpen, […] Es ist nicht unsere Aufgabe, zum Volk über unsere Sicht der Welt zu sprechen, erst recht nicht, zu versuchen, ihm diese Sicht aufzunötigen. Vielmehr besteht sie darin, mit dem Volk in einen Dialog über seine und unsere Auffassungen einzutreten.“ (Freire 1973, 105)

Because of the importance of the dialog and the communication between the participants and the participants and the facilitator, the courses can only be held in a language that is easily understood and spoken by everyone. Therefore, it has to be implemented in the mother tongue or a strong language of the participants.

During the decodification, the participants in the group express their view of the world and of their problems. During these dialogues the *generative topics* are discovered (see Freire 1973, 118). An important step on the way to literacy is the introduction of *generative word,* which originates out of the generative topics. After the dialogue, a carefully selected word with strong relevance to the learners and their situation is introduced.

> “The word itself is the focus of further dialogue. Once a generative word has been introduced, Freire advocated breaking the generative word into component syllables and syllabic families; but always asking questions of the learner, not doing it for them […]. Having done this the educator should ask the learner something like: ‘do you think we can create something with these pieces?’ For Freire (1985), ‘this is the decisive moment for learning’ as the learners ‘discover the words of their language by putting them together in a variety of combinations’.”
> (ODA)

An example: After the critical analysis of the existential situation (the decodification) in which a picture of a slum was presented and discussed in a group, the facilitator shows a picture with the word “FAVELA”. Immediately after that, a picture with the syllables of this word is shown: FA-VE-LA. In the next step the phonetic group follows: FA-FE-FI-FO-FU, followed by VA-VE-VI-VO-VU and the last phonetic group LA-LE-LI-LO-LU. On the next picture, the discovery card, all three groups are shown together. Now, the group starts creating words using different combinations of the demonstrated syllables (see Freire 1974, 100f).

This whole process leads to *conscientization*, enabling the learners to really understand and know the world. After achieving *conscientization*, they are believed to be in the position to take *action*, which can lead to political change. The crucial point with *action* is that it has an objective. *Action* without an objective would result in ignorance of its own process and of its aim (see ODA).

> “If learning to read and write is to constitute an act of knowing the learners must assume from the beginning the role of creative subjects. It is not a matter of memorising and repeating given syllables, words and phrases but rather, Reflecting [sic] critically on the process of reading and writing itself and on the profound significance of language.” (Freire 1985, quoted in ODA)

An essential part of this approach is the non-existence of primers or textbooks. To be particularly flexible and adaptive to the learners’ needs and interests, the learning material is developed by the learners themselves. This is the desired approach in theory. The reality, though, often displays a different praxis. There is a variety of course material, all of which is claimed to be designed in accordance with Freire’s ideas of *conscientization*, *codification* and *generative words*. The pictures used in them are usually not taken out of the learners’ relevant environment, the *dialogues* are mere discussions about pictures and the *generative words* are chosen rather arbitrarily (see ibid.). Freire’s literacy approach which was designed to be revolutionary and anti-establishmentarian has become a kind of main stream approach out of which most education programs quote their princi-

pals, but often enough they do not translate them into action in a truly Freirean way.

7.10.1.2 REFLECT

The REFLECT programs include Freire's ideas and methods. However, they also try to overcome shortcomings in this approach which lie primarily in Freire's failure to formulate an effective literacy methodology. Another point that REFLECT does not agree with is Freire's opinion about the underlying cognitive barriers (for which he blames the external forces of oppression) and his seeming distrust in the learners' existing knowledge and beliefs (see ODA). With these aspects in mind, REFLECT integrated the Participatory Rural Appraisal (PRA) in their program. This approach starts from the recognition that poor communities have a wealth of technical and social indigenous knowledge. Its practitioners do not believe in a simple pre-packaged technological solution to development which can be imposed by external professionals. They have invented techniques to enable non-literates to articulate their knowledge since they are of the belief that building on this knowledge and the reality of the poor must be the starting point of any effective development program (see ibid.). Their primary maxim is expressed in Fuglesang's quotation (1982, quoted in ODA): "Western educationalists have been blind to the oldest and truest pedagogical rule: start with what the students know, not with what you know." In spite of all the enthusiastic intentions, the evaluation of the pilot projects, published in 1995, noted that the participants showed only few signs of benefits in respect to health, productivity or community organisation. It also indicated that literacy was not in itself empowering (see ibid). However, the programs undergo constant changes in order to adapt to new environments, different people and research findings. Therefore, one can not conclude that the programs as a whole failed, but only that they were not yet fully developed to their best outcome.

In accordance with these theories, REFLECT has created new concepts for literacy. The *Ideological Approach* has been introduced in the last few years. Literacy is seen as "a social process in which particular socially

constructed technologies are used within particular institutional frameworks for specific social purposes. […] [It] cannot be so clearly seen as 'an externally introduced force for change'" (ODA). The methodology for this approach has the following rationales (see ibid.):

- Emphasis on writing rather than on the passive reading of fixed texts;
- Emphasis on creative and active involvement of participants;
- Building on existing knowledge of the participants, respect for their oral traditions and other "literacies";
- Focus on learner generated material;
- Insurance that the process is responsive and relevant in the local context

Other methodologies that are used by REFLECT practitioners are visualization techniques (graphics developed by the practitioners of PRA such as maps, calendars, trees and other diagrams) and lately also theatre, role play, songs, sayings and proverbs, which are often uniquely adapted to the cultural context on which the programs are developed. New techniques are constantly being innovated (see ibid.).[28]

With these rationales and methodologies, this approach seems very interesting for the application in multilingual and multicultural settings. With the generation of teaching and learning material within the classes and the focus on relevance, it can be regarded as an appropriate approach for small-scale education programs in minority languages. An independent evaluation of pilot REFLECT programs in Bangladesh, El Salvador and Uganda found that 60-70 percent of the participants became literate within two years. The World Bank evaluations of traditional programs, on the other hand, state that they only help about 12 percent of the adult learners to become literate (see UNESCO 2003).

However, shortcomings of this approach should also be considered. First of all, the success rates in reading are, according to Abadzi (2003, 64),

[28] For additional information about the REFLECT programs, teaching and learning materials on literacy and numeracy and projects and activities, see www.reflect-action.org.

very low. She is of the opinion that the participants' limited exposure to written material is the main reason for this problem. In addition, more recent evaluations of REFLECT programs in different countries come to mixed results. In Indian programs, for example, only about 25 percent of the participants were becoming literate. This might be due to the fact that the participants decide what to work on and not even a quarter of them chose reading (ibid., 69). Another weak point of the REFLECT programs is the method of evaluation. At the end of a course, a self-rating by the learners about their competence and process is used to evaluate the programs' success. The relationship between self-rating and reading scores in studies conducted in Burkina Faso, however, are non-existent (see ibid., 88). This raises the question about the validity and the value of this evaluation method.

Neither in Freire's adult literacy and education program nor in the adjusted REFLECT program is the existence of post-literacy programs in the language of wider communication mentioned. This, however, should always be an integrated part and an aim of the programs. Many participants stress the importance of these languages for their lives and therefore also the motivation to learn and become literate in them.

7.10.1.3 Evaluation of REFLECT and FAL in Uganda

Carr-Hill's report (2001) compares REFLECT programs implemented by the NGO Action Aid with governmental FAL (Functional Adult Literacy) programs in Uganda. FAL programs differ from the REFLECT programs by, among other aspects, the fact that their teachers are unpaid volunteers with only a minimum of training (five days training plus two days refreshing in comparison to two to three weeks of intensive basic training plus regular refreshing courses and supervision for the REFLECT facilitators). In addition, they are mainly using a more teacher-centred, traditional approach with literacy primers in comparison to the totally learner-centred approach, in which the teaching material is produced by the participants themselves, of the REFLECT program. Furthermore, the NGO's expenditures for the REFLECT program were higher than those of the government for their

FAL programs, mostly due to the fact that FAL teachers are unpaid volunteers. The unit cost per certified graduate mount to US$4-5 in the FAL program in comparison to US$12-15 in the REFLECT program. Interestingly, the outcome of the evaluation of the programs show that the REFLECT programs are considerably better with participants with prior education whereas the FAL programs are as successful as the REFLECT ones with completely non-literates. Since the illiterates are the intended target group of both programs, these outcomes are surprising, considering the much more favourable situation in the REFLECT programs.

A possible reason for this development might be the fact that adults with some kind of previous schooling have more self-confidence in the educational surrounding because they have experienced it before. Therefore, it might be easier for them to take an active part in the REFLECT program, which concentrates more on discussion and active participation. In addition, the cognitive development of those with schooling is presumably more advanced than those of complete illiterates. This might also be a reason why they gain more from the REFLECT program, which seems to be more challenging and more demanding. This might also be the reason why the REFLECT program seems to fail with a great number of complete illiterates. Without any experience in an educational setting, they might be overtaxed with the tasks this program gives them. Their needs seem to be served better with the more traditional method of the FAL program. Here, they are in a more passive role of observing and imitating the teacher. This might be closer to the style of teaching and learning they are used to in their community. As mentioned before, it is important to start the program in a style of teaching that is familiar to the participants, and new methods should be introduced later on. Thereby, the participants feel more comfortable at the beginning and are more willing to accept new ways of teaching and learning.

7.10.2 New Ways to Improve Adult Literacy Outcomes

Despite all the efforts that have been taken to establish and sustain literacy programs for adults, the outcomes are often not satisfying. The reten-

tion of the skills seems to be a major problem for achieving universal literacy. Helen Abadzi (2003, 1ff) claims that this is mainly due to the fact that the special features of an adult brain, especially the memory, are not taken into account while planning the lessons. She regards time as being of essence in reading. The main problem is, according to her, that neo-literates have not automated their reading in a way that would allow them to read a word in about 1-1.5 seconds with about 95% accuracy. This, however, is the prerequisite of understanding what is read. She mentions a study conducted in Burkina Faso which indicates that most newly literates need 2.2 seconds to read a word and their accuracy rate is only about 80-87%. This means that they have forgotten by the end of a sentence what they read at the beginning. She also claims that unless the participants become automatic readers at the end of the program, they may forget how to read more easily and relapse into illiteracy.

Therefore, adult literate programs should focus, according to Abadzi (2003), on increasing speed and accuracy, and tests in adult education programs should be timed. Faster reading can be practiced with the help of chanting, where through taking turns between the teacher or peer, a rhythm is established that forces the learners to read faster and larger amounts than they would normally do. Another method is the reading of a pack of cards containing small units of text over several days with increasing speed. This exercise also helps to build up recognition speed which is important especially for beginning learners. Words which are used often should be overlearned by the participants. The aim is that the recognition of these words becomes automatic, so that sentences can be decoded within the limits of the working memory (ibid., 30f). To achieve these goals in adult education programs, it is absolutely necessary that literacy skills are acquired in a language which is known well by the participants (see Abadzi 2003, 24). Therefore, the programs should be implemented in the participants' strong language. In order to use the little time available for adult literacy classes more effectively, Abadzi (ibid., 7) suggests reading in

small groups in contrast to the common method where one person reads and the others repeat.[29]

Furthermore, it is important to train the adults' working memory with special exercises because it may be too short for effective reading (e.g. repeating increasingly longer series of digits). Another method which helps improve the visuo-spacial skills of the illiterates (which are particularly poor among women) is the use of illustrative materials which are also used in the Participatory Rural Appraisals (e.g. maps, diagrams) (see ibid., 4). Writing, which is often given lower priority in comparison to reading, can be a way of facilitating perceptual learning. According to Abadzi (ibid., 6), this is due to the significant motor and visuo-spacial abilities which are reinforced through copying written material during basic reading instruction. In addition, writing can also prevent forgetfulness and it might in some ways protect against skill loss. This is why it should be applied and focused on more than is done in current programs (ibid., 43). These are all aspects which are explicitly stressed in the REFLECT program. Abadzi (2003, 4) also mentions Freire's *generative words* which she regards as a good method to achieve the important phonological awareness which is usually missing in illiterates. Phonological awareness is the understanding that spoken language is made up of discrete sounds and the ability to break down words into these sounds. Without this ability it becomes very difficult to decipher the code. Exercises which foster phonological awareness are, for example, deleting the initial or the final consonant or vowel, counting numbers of syllables or rhyming (see ibid, 32).

In a different paper, Abadzi (2004) gives three hypotheses about the age-related neurological barriers which might be responsible for the difficulties that adults have in comparison to children to become literate and to retain these skills. Her first suggestion is that the brain might be more developmentally prepared for reading acquisition at an earlier age. She tries to

[29] In order to implement this teaching method, the teachers of the programs must be instructed in grouping techniques, and they must learn how to monitor learner group errors (see Abadzi 2003, 7). Here again, these more advanced teaching methods need intensive training. Otherwise, the teachers are not confident enough to apply them in class.

establish a connection between the childhood facility for language acquisition that helps children acquire grammatical patterns auditorily and the influence of this device for the visual acquisition of word patterns. She argues that this facility helps children to become literate rather easily and sustainedly, making it vital to offer reading instruction in accordance to the critical periods, the optimal times when certain skills can be learned. She is not saying, however, that adults are not able to become literate at all, but that the efforts they have to make are considerably higher than those of children. Her second assumption is that the changing mechanisms of information storage may affect consolidation of the letter patterns. She comes to this conclusion because of the observation that "children seem more efficient than adults in gauging rules and procedures from sparse information" (ibid., 6) and because of the fact that the hippocampus, a part of the limbic system of the brain which plays a crucial role in memory storage, changes with advanced age. She mentions the possibility that the hippocampus, which is involved in short-term memory consolidation, might also facilitate the processing of information into the semantic memory, the memory related to rules and procedures. Hence, the capacity to store letter patterns with relatively little practice and the consolidation of these patterns might diminish with advancing age. The third possibility for the problematic literacy acquisition for adults might be the diminishing attentional resources that affect reading comprehension. Abadzi (2004, 6) claims that "the amount of attentional resources available diminishes with age, making people less able to carry out many tasks at the same time". The fact that every person has only a limited amount of attentional resources to assign to simultaneous activities can become problematic for reading when the attention capacity shrinks. This can affect literacy acquisition in several ways:

> "Readers may be unable to process all the cues of a script simultaneously, and thereby incur the high error rate that I have observed. Insufficient attention may result in less efficient processing and storage of new word patterns. […] If decoding of written material is slow and tedious, few attentional resources are left for processing the meaning of the material." (Abadzi 2004, 6)

In addition, follow-up reading material in order to practice the new skills is often not available, neither in quantity nor in quality. This makes it almost impossible for the adults to continue to train their skills which is the most important aspect of fluency and accuracy. Because of these problems, it is more difficult and exhausting for adults to become and remain literate. The slow and concentration-demanding reading of newly literates needs much strength of the learners. If their reading is not improving noticeably after some time, they might just give up because the effort they have to invest is not worth the little gain they get from the reading skill. Based on her observations and the experimental classes she established in Burkina Faso, Abadzi (2003, 74) presents four implementations for instruction in adult education classes:

- Phonological awareness exercises for about 20 minutes daily.
- Learning to count through local money and transactions, discussing how to avoid being cheated.
- To lengthen the working memory, applying digit span exercises; understanding pictures in textbooks and posters and using data in syllogisms.
- Simple visual tests to determine which participant needs to sit closer to the blackboard because of visual deficiencies.

She claims that “instruction that moves from phonological awareness training, to rapid processing of syllables, words, and sentences, and then to activities designed to foster reading comprehension skill would be particularly beneficial to adults” (ibid., 90).

However, extended research and experiments to prove Abadzi’s assumptions on the acquisition of literacy skills at an adult age is still lacking. In order to make valid assumptions and recommendations for adult literacy programs much more research about the cognitive differences between children and adults and about the way the brain functions when literacy is acquired has to be conducted as well.

7.11 Post-Literacy Programs and Follow-Up Material

To ensure the sustainability of the literacy skills, post-literacy programs after the basic education programs are an essential component. The most important point in these programs is that they offer additional reading material in the local languages as well as in the national and official languages. Through this, the participants have the possibility to practice their literacy skills in the language they have chosen in the education program. The post-literacy programs do not have to be organized with a strict schedule. They should rather offer the material and the flexibility for the people to continue their studies on their own or to establish regular meetings or workshops about topics and issues they are interested in and which are important to their lives. The program should encourage and motivate the participants to find new ways to use and practice their new skills. It can be a way to find new ideas for using literacy and it can offer the opportunity to realize these ideas. An example might be a workshop with the aim to collect traditional songs or stories and to write them down or create booklets with them. Local artists can add pictures and drawings to the songs and stories. Another possibility can be the establishment of a local community library. As many different kinds of literature as possible should be offered: leisure time reading material as well as information brochures about agriculture, health, nutrition and other areas of the reader's daily life. Thereby, the needs of many people can be served and the library will be used more frequently. Reading material produced in the education program can be offered as well. The lack of this kind of program and the follow-up reading material in local languages is among the main reasons why the aim of sustainability of literacy is not achieved.

Despite the obvious importance of the follow-up programs, they seem to be often forgotten. The main problem here is again the lack of reading material in the local languages. There are only a few organisations which tackle the challenge of producing literature in indigenous languages. An exceptional example for this kind of organization in Senegal is ARED (Associates in Research and Education for Development). They have been working successfully for over sixteen years to publish literature in Pulaar

and thereby sustain popular literacy as a non-profit business. They are selling between 30,000 and 50,000 volumes of literature every year, also in other Senegalese languages. They offer a rich palette of publications, covering the following basic topic areas: literacy and numeracy manuals; novels, stories and other creative literature; information on development and civil society; treaties on indigenous knowledge and traditional or religious practices; and instructional texts for management capacity building (see Easton/Fagerberg-Diallo 2001). They demonstrated that it is possible to produce literature in indigenous languages and that the demand for this kind of literature is high. The more books published in local languages, the easier it is for the people to get access to the written form of their language, and therefore they are more likely to practice and retain their newly acquired literacy skills.

Other important post-literacy programs in addition to the basic literacy in the mother tongue or strong language are classes in a country's language of wider communication, usually the official language. Literacy in this language should always be the aim after acquiring literacy skills in the strong language. It is greatly facilitated by literacy in first language because these skills enhance each other, and skills acquired in the first language have been proven to be transitional to the second language (see chapter 6.1). The use of the second language should begin orally, especially if the language is not mastered very well by the participants. It should not be introduced too early (see Küper 2003, 92) because the literacy skills have to be consolidated in the strong language first. The program has to be implemented differently according to the participants' level of mastery of the language of wider communication. If it is spoken on a highly professional level, and if literacy in the strong language is mastered as well, the acquisition of literacy in the language of wider communication can be achieved in about 30 hours (see Fal 2003, 225). If the language is not spoken and understood at all, however, the program will have more the character of a language course than of a literacy program. According to Malone (2004, 74f), the learners should continue to learn new life skills in their mother tongue, but they also should build oral fluency in the official language and

begin to read and write in this language. The second language is used increasingly, according to the participants' comprehension, but the mother tongue is always used to explain concepts which are not clear. It is important to use already existing skills in the mother tongue as a bridge for the new language. If the two languages have the same script, it will be easier to become literate in the new language as well. Even if the scripts are different, literacy in the mother tongue will still facilitate literacy in other languages. A good way of introducing the new language is a comparison with the already mastered language. Letters and their sounds can be compared and similarities or differences can be pointed out. Furthermore, many of the activities used for literacy acquisition in the mother language can be used again. However, it is important that reading and writing in the strong language is still practiced alongside the new language to prevent the loss of the skills.

After the education and literacy classes in the official language, possible follow-up classes can include vocational or technology skill training and other preparations for possible jobs. These are a vital supplement in an education program that allows participants to achieve better jobs. Younger adults might be helped to enter the formal education system, for example in distance education programs (see Malone 2004, 76).

7.12 Evaluation of the Program

The constant evaluation of the education program is another vital aspect in order to achieve the aims of a successful and sustainable program. The program's planners have the duty to check repetitiously if the participants are making progress and if they are still content and satisfied with the program, the teachers and their own progress. Only if they receive noticeable gain from participating in the program will they stay motivated and not drop out. These gains, however, might occur in different shapes and forms. Program planners and educators tend to measure the success of an education program merely in marks or achieved percentage points in formal tests. The participants themselves, on the other hand, often have different

criteria of evaluation. Fagerberg-Diallo (2002, 179) explains the situation as follows:

> "Students most often express their motivations and the benefits of attending literacy classes in terms of *impact on their lives*, not in terms of *acquired academic skills.* […] [Comments of participants] indicate that people look at becoming literate as a process of personal and social transformation and change, not just as the acquisition of academic skills."

Therefore, it is crucial that in addition to the program's evaluation from outsiders, the participants themselves evaluate the program and their personal progress. This evaluation can take place through discussions, interviews or questionnaires. This anecdotal evidence reflects more vividly the impact of the program on the participants' lives. This also helps the planners to notice insufficiencies of the program, for example irrelevance of the topics discussed in the lessons or dissatisfaction with the teaching method. With such constant evaluations, necessary changes to the program can be implemented more immediately, thus shaping the program in accordance to the individual learner group. Nevertheless, the progress of the actual literacy skills has to be observed as well. After all, the achievement of literacy remains the aim of the program. Periodic formal tests are a necessary way to determine the progress as well as the difficulties on the way to literacy. In an open discussion with the participants, problems for possible educational insufficiencies can be identified and solutions can be found. The teachers and the program planners should always take the participants' comments about the program and their ideas for adjustment or proposals for change seriously.

In addition to evaluations during the program, evaluations at the end of the program as well as after a couple of years should not be forgotten. Only with continuing evaluation is it possible to assess the sustainability of the literacy skills. Here, anecdotal evidence received through interviews and discussions are also an important resource of information. With the help of a combination of formal tests as well as anecdotal evidence, the program planners can evaluate if the former participants lost their literacy skills, if they retained them or, in the ideal case, if they even improved them

through self-study or follow-up programs. What is even more important are the possible reasons for a certain development. Anecdotal evidence can help draw a clearer picture of the prevalent situation. This kind of evaluation will also offer the chance to find out if the education program and the acquired literacy skills had an impact on the former participants' lives, and how exactly this impact becomes noticeable for the participants. They can learn if the program served the participants' needs in the long run as well or what additional measures have to be considered in order to retain and improve the educational success and the people's satisfaction with the program.

8. The Cognitive Development of Illiterate People

It has been discussed comprehensively that the local contexts, the participants' wishes and needs as well as their expectations, and their previous knowledge and strong languages have to be taken into account when planning and implementing adult education and literacy programs. However, to actually reach the participants, cognitive and psychological research findings have to be considered as well. Aleksandr Lurija's research findings from studies he conducted with illiterates in the former Soviet Union in the 1930s already indicated clearly that there are considerable cognitive limitations of unschooled people. However, these discoveries were not taken thoroughly into consideration for many decades.

8.1 The Influence of the Environment on Cognitive Development

It has been shown in different studies and experiments, using methods according to Piaget and his developmental stage theory,[30] that the first two stages (*sensorimotor stage* and *preoperational stage)* determine the psychological development in every cultural context, whereas for the achievement of the following two stages (*concrete-operational stage* and *formal-operational stage*) certain stimulations to the person's environment have to be given (see Oesterdiekhoff 1992, 49). However, it is not possible to determine per se that every illiterate person is to be found on only these

[30] When "stages" and "phases" are discussed in the following, they always refer to Piaget's theory of cognitive development. For detailed information see for example Ginsburg/Opper (1998): *Piagets Theorie der geistigen Entwicklung* Stuttgart: Klett-Cotta.

first two stages, whereas all literates are on the third and fourth stage. In today's world, the secluded regions in which many of the studies were conducted decades ago are almost non-existent. Some form of media, for example, has advanced in almost all parts of the world. Life has changed, even in remote areas, and often tasks which require concrete-operational skills belong to the everyday life of many people by now. Hence, it can be assumed that today's illiterate adults are usually at least on the medium competency level of the concrete-operational stage. Even where a majority of the population is illiterate, they know about the existence and the function of written language. They are also able to use it in certain situations by asking literate people for help. Just as there are illiterates on levels of the two higher stages, there are literate people who have not achieved these higher levels of concrete and formal-concrete operations. To a certain extent, this development happens in a natural way, by growing up and by gathering experiences in everyday life. However, in general, for the achievement of the higher competence level of the concrete-operational stage and even more for the competence level of the formal operations, supportive learning opportunities have to be presented (see Naumann 2004, 47). Whereas Piaget's findings from the experiments with Geneva children[31] were confirmed by research conducted in the USA, Europe and other Western and modernized regions, obvious differences can be found in the studies conducted in Africa, Asia, South America and Oceania. Oesterdiekhoff (1992, 50) summarizes:

> "In traditionalen Regionen in Entwicklungsländern werden die konkreten Operationen bereichsspezifisch nur von einem mehr oder weniger großen Prozentsatz, meist 30-50% der Erwachsenen bzw. gar nicht entwickelt. Sofern ihre Ausbildung stattfindet, verzögert sie sich in der Regel um drei oder fünf Jahre im Verhältnis zur westlichen Altersentwicklung. Isolierte, rein agrarische Populationen scheinen das operative Stadium überhaupt nicht zu erwerben. So sind Aborigines ohne Westkontakt dominant präoperational."

It can be concluded that the achievement of the higher competence level of the concrete-operational stage and the formal-operational stage is a development which occurs only in certain environments, namely in more

[31] For detailed information about these experiments see for example Jean Piaget: Der Zeitfaktor in der kindlichen Entwicklung [1962]. In: Piaget, Jean: *Probleme der Entwicklungspsychologie. Kleine Schriften.* 1976. 7-30.

modern ones with compulsory schooling.[32] This is claimed to be the case because of the complexity of modern societies and environments. In traditional societies, the method “learning by doing” to acquire all the knowledge which is needed to survive is sufficient and adequate. Children learn by observation and imitation of adults in their community. All their activities are conducted in close relationship to their immediate and concrete environment, and they involve almost exclusively practical operations. “So ist das konkrete, präformale Denken eine Folge der Kontextgebundenheit sozialen Handels. Die Individuen abstrahieren und generalisieren nicht ihre Tätigkeiten, sondern sind in sie stark eingebunden“ (Oesterdiekhoff 1992, 64). This concept of “learning by doing”, however, is not applicable in modern societies. They are far too complex to be presented in a concrete way or understood by mere observation. Children have to learn techniques and concepts which offer them the possibility to acquire knowledge about the world. Most of this knowledge originates from contexts unfamiliar to the student; it can not be derived from their immediate environment. “So scheint die Abstraktheit des Denkens mit der Abstraktheit der modernen Gesellschaft verknüpft zu sein” (ibid., 64). Especially when considering the world of politics, administration and law, it becomes obvious that a high ability of abstraction is needed in order to understand and participate in these systems. Abadzi (2003, 18) states that normal unschooled people perform as they have throughout history and that they do not have any deficiencies. Yet schooled people have acquired cognitive “effectiveness” which gives them certain advantages in particular situations and contexts.

8.2 Differences in the Cognitive Development between Schooled and Unschooled People

There are certain ways in which the brains of adult illiterates are wired differently than those of literate adults (see Abadzi 2003, 18f). First, even though they have normally developed language skills, illiterates usually do not understand the way in which phonemes make up a word. Here, exercises developed to strengthen the phonological awareness can be very

[32] However, even in the ideal environment of modern schooling these stages are not achieved by everyone. Schooling is a necessary precondition for their achievement, but it is not a guarantee.

helpful. They need to attain the understanding that spoken language is made up of discrete sounds. Second, observations of illiterates have given evidence that it is difficult for them to follow and understand radio broadcasts, even if they are in their own language or dialect. After only six to nine months of literacy instruction, comprehension can be improved remarkably. This demonstrates how the cognitive effects of schooling foster the understanding of decontextualized abstract speech. This is important to take into consideration for the teachers of adult education programs for illiterates. The teacher's speech and the explanations should not be too abstract because the participants might miss important information. Also visual-spatial discrimination, that is the ability to identify three-dimensional figures, is often not well developed among illiterates. As a result, they might have problems to recognize and name objects pictured in books or posters. Another crucial difference between schooled and unschooled people is the capacity of the memory. The memory ability of illiterates is lower than that of people with some form of schooling. Particularly, the working memory is shorter, so they might have less time to process a sentence than educated people. This causes problems when it comes to reproducing a short story, remembering words or recalling common objects, to give only a few examples. The last two skills of memory and visual-spatial ability influence the general thinking of a person. They are important for perceptions of risk, use of reference points or the consideration of the context on making judgements as well as the communication and sharing of information relevant to decision-making. As a consequence, illiterates may obtain most information from authority figures because the likelihood of using new data in decision-making is limited by their tendency to rely on consensus and environmental validation (see Abadzi 2003).

8.3 Syllogisms – A Way of Analysing Cognitive Development?

Alexandre R. Lurija conducted a series of experiments using syllogisms[33] in remote rural areas of Uzbekistan in the 1930s. The theoretical and logi-

[33] "Syllogism" comes from the Greek word "sollugismos", meaning "deduction". It is an inference in which the conclusion follows of necessity from two premises. Example: All humans are mortal and all Greeks are human, therefore all Greeks are mortal. In the experiments conducted by Lurija and others, the two premises were given followed by a question about the conclusion. Example: Valuable metals do not rust. Gold is a valuable metal. Does it rust or not? (see Lurija 1986, 126).

cal way of drawing conclusions from the presented premises of the syllogisms by neglecting one's personal experiences and previous practical knowledge is regarded as a proof of the achievement of the stage of formal and operational thinking. Empirical deductions resulting from one's previous knowledge and of one's opinion of the concrete reality are to be seen on a lower stage of cognitive development (see Oesterdiekhoff 1992, 59). Lurija (1986) observed, among others, two groups of people: peasants without any formal schooling and young workers of a kolkhoz with one or two years of formal schooling. He found out that the group with some kind of schooling had no problems to understand the logical structure of the syllogisms and to answer the question with the correct logical conclusion resulting out of the given premises (see ibid. 126). The test subjects without formal schooling, on the other hand, did not identify the logical structure of the syllogisms; they did not recognize the system behind them. They saw the three sentences isolated from each other, and it was impossible for them to draw conclusions from the premises. In most cases, they refused to give any answer at all, stating the reason that they do not know anything about what was given as a theoretical hypothesis. Whenever they gave answers, they were drawn out of their personal and practical experiences. However, a difference could be observed in regard to the type of syllogism. Lurija applied two types: Syllogism concerning the practical experiences of the test persons and syllogism whose contents were chosen out of unknown areas. The test persons were able to acquire the skill of logical conclusion after a short time when the syllogism came out of their area of practical experience, whereas they were not able to draw a verbal-logical conclusion from unknown contents (see ibid., 135). Lurija concluded that the possibilities for verbal-logical thinking are strongly restricted in the illiterate test persons. His main reason for this conclusion was that the premises had no universally valid character for the illiterate test persons, but they were only regarded as single pieces of information without the character of universal rules. They did not recognize the system and the logic of the syllogism. Therefore, the test persons tried to find answers to the question out of their personal experience, even when they clearly understood the premises. Without recognition of the sys-

tem it is impossible to develop logical thought according to the premises (see ibid. 137f).

This experiment demonstrated that even a few years of schooling have an influence on the cognitive development and the way of thinking of the students. This kind of experiment has been conducted in different parts of the world with surprisingly similar outcomes. Even the answers to the questions and the reasons for rejecting the drawing of a conclusion out of the presented premises are almost identical whether posed in South America, in Asia or in Africa. These similarities between the different cultures lead to the assumption that the problems with syllogisms do not arise out of cultural specific aspects (see Scribner 1984, 314). The most significant factor for differences in the answers between the test persons was always the schooling. It was even more significant than the “rural/urban environment” factor (see Oesterdiekhoff 1992, 61f). After two or three years of schooling, the improvements are already astonishing (see Scribner 1984, 316).

8.4 Different Interpretations of Lurija’s Research Findings

Scribner (1984, 317) poses the question of whether Lurija’s findings should lead to the conclusion that traditional people are not able to apply their logical skills on verbal material. She rejects this conclusion, on the grounds of Lurija‘s findings. He demonstrated that illiterate people without schooling are able to draw new conclusions in certain situations. However, this only happens when the contents of the syllogism have a connection to the practical knowledge of the test person but nothing to do with familiar facts (see Scribner, 318). This is where Scribner differentiates between an “empirical” and “theoretical” explanation for the answers to the syllogisms. She defines “empirical” explanations as those which are given according to the test persons’ previous knowledge or their experiences, whereas “theoretical” explanations are drawn from the contents of the premises on a hypothetical basis. She argues that the “empirical” explanations are caused by the so called “empirical bias” which leads the test persons away from a formal and abstract way of answering the question. According to Scribner, this “empirical bias” has the function of an “organizer”, influenc-

ing and leading the whole manner of how the person deals with the information (see ibid., 320). The more isolated the people live and the less schooling they have, the stronger is this “empirical bias” which makes it impossible for them to understand the theoretical nature of the syllogism. Scribner tries to see the interviews with the test persons from a different perspective. When the test persons answered the questions according to their experiences and the conclusions they drew from them were correct, even if they neglected the premises, Scribner saw this as evidence of theoretical and logical thinking (see ibid., 321f). She also observed that there are syllogisms which evoke far more “empirical answers” than others (see ibid., 324). After sorting out the syllogisms which seemed to be organized by the “empirical bias”, she discovered that the relationship between theoretical reasoning and correct answers were stable. She comes to the following conclusion:

> “Aus dem Vergleich ergibt sich eindeutig, daß [sic] dort, wo sie ein Problem formal-“theoretisch” angehen, analphabetische Männer und Frauen ohne Schulbildung genau dieselbe Logik zeigen wie Erwachsene und Kinder unter dem Einfluß [sic] von Schulen westlichen Typs.“

However, Oesterdiekhoff (1992, 58f) does not agree with this conclusion. For him, Scribner also states, though unintentionally, the incomprehensibility of the syllogisms in illiterate communities. Her confusing differentiations between the different kinds of theoretical thinking are only another proof of this incomprehensibility and not a proof of the universal logic and equity of human thought which Scribner, according to Oesterdiekhoff, wants to give with her implementation. The conclusion he draws from the research findings is clear:

> “Alle [von den Autoren Luria, Wygotski, Cole und Scribner erörterte Phänomene] erklären ausdrücklich das Unverständnis für syllogistisches und rein hypothetisches Schließen in traditionalen Gesellschaften. […] Kinder wie Analphabeten weigern sich, „gesetzte“ Prämissen anzunehmen, auf rein gedanklicher Ebene logisch folgerichtig zu argumentieren, sie kennen beide nicht die Bedeutung von Quantifikatoren, zerstören den Syllogismus durch seine Umformung in Einzelsätze und Urteilen auf der Basis persönlichen Wissens.“

Another reason for the illiterate test persons' problem with the syllogism is seen by Scribner (1984, 331) by the fact that they are not used to its structure. They do not possess pre-existing schemes in which they can integrate the new information given in the syllogism. These schemes organize the incoming material, and only with their help does the new material "make sense". Scribner calls these schemes "genres". They vary between different cultures, and they have a strong influence on the performance of the people in these kinds of experiments because they might vary also according to the context and situation. The genres develop dissimilarly in different social and language contexts. Thus, the structure of a syllogism for people with formal schooling is identified as a theoretical and logical problem, whereas it might signify the search for a solution on a personal and practical level in other cultures without schooling. Once acquired and understood, the structure of the syllogism is consistent and does not change with varying incoming information. This, however, was not the fact with the illiterate test persons. With some syllogisms, they were able to draw correct conclusions, and with others they were not. This indicates that they are, under certain circumstances, capable of logical thinking; however, they could not generalize the scheme of the logical problem on an abstract level (see Scribner 1984, 333).

The experiments with syllogisms might be one possible way to gain some insight into a person's way of thinking and to make a first suggestion about the cognitive development. Nevertheless, it seems too easy to assess someone's cognitive development according to a single test method. The syllogism can be only one out of many more tests on the way to as precise an assessment as possible.

8.5 The Effects of Schooling and Literacy on Cognitive Development

For the development of formal-logical thinking, several years of modern schooling are, in general, a prerequisite. Without schooling, this stage can usually not be achieved. The significance of schooling for abstract and formal thinking as well as for the functionalization of the thinking process is a generally accepted fact (see Oesterdiekhoff 1992, 63). In the natural and

familiar environment people often do not have the need to think in abstract ways. Everything they have to deal with, all the problems and obstacles, are usually found in their immediate personal and practical surroundings. School, however, opens up a new world of unsolved problems. The solutions can mostly not be found on a concrete or practical level, but rather abstract thinking is needed here. The process of learning how to read and write in particular demands a new level of abstraction. Oesterdiekhoff (ibid., 63f) says on this issue:

> "Insbesondere die Schrift und das Schreiben zwingen dem Intellekt die Bewußtwerdung [sic] und Verallgemeinerung des Gesagten auf. Sie verändern damit das vorher vielleicht in einer Situation Gemeinte und durch ihren Kontext Begrenzte, indem sie eine Bedeutung über spezifische Gesprächspartner und Situation hinaus abstrahieren. Bloße Oralität hingegen scheint die Denkfähigkeit in konkrete Bahnen einzugrenzen."

In order to adopt the specific structure of written language, a certain level of cognitive decentration has to be achieved. Only then it is possible to abstract from the concrete object to be written about. It has to become clear that the letters represent different sounds (phonemes) and are arranged according to the spoken word; therefore, the written word is another, more abstract way of representation of the concrete object. An example is as follows: The word "elephant" does not start with "the trunk", but with the letter "e" representing the first sound in the spoken word.[34] Therefore, the productive use of writing requires the cognitive awareness of function and meaning of the elements of the written language. In addition, the cues and references existing in face-to-face communication are not present anymore in written communication. In order to be understood unequivocally, the writer has to be precise in his/her selection of words. Furthermore, he/she has to put him-/herself mentally in the position of the intended recipient of the writing and consider his/her previous knowledge about the topic to ensure that all relevant information for a successful communication is included. This requires the ability of decentration on the

[34] The notion of a written word as a symbolic way of representing the concrete object is a discovery that some children first make when they come to school. Adults, however, can nowadays be expected to already know about the function of the written word, even if they live in remote areas.

side of the writer, an ability which seems to be not common among illiterates.

An experiment to evaluate the ability of a test person to take over the perspective of someone else can be the following: Two people sit together at a table, a pile of ten wooden sticks of different size and shape in front of each of them, but with a sight barrier between them. The test person is shown one of the sticks (according to an order on a list), and he/she has to describe it to the second person in such a way that this second person can class the sticks according to the verbal description. Cole (1984, 293f) explains the outcome of this experiment which he conducted with Kpelle peasants in Liberia. The vast majority of the tested peasants failed this task because they were incapable of giving a precise description of the characteristic features of each wooden stick. Instead of describing them with words like “the longest stick” or “the thin and bent wood”, they used imprecise descriptions like “one of the sticks” or “a big stick” (see ibid., 294). These results are usually interpreted as the failure of the test person to take over the perspective of the listener and therefore as a proof for the lack of development higher than the stage of egocentrism (the second stage in Piaget’s theory of cognitive development). However, Cole rejects this interpretation. He holds the opinion that the test persons’ failures in this experiment result from the lack of abstract words in the Kpelle language rather than of the lack of cognitive development and incapability of successful and adequate communication. From his discussions and interviews with the Kpelle he is convinced that they are on a higher stage of cognitive development than 6-year-old American children (which are usually classified as being on stage two) and that they are perfectly capable of communicating adequately (see ibid., 295).

However, the mere mastery of writing does not in itself lead to the logical thinking required to solve the syllogisms or, expressed more generally, “produce in itself an immediate change in the intellectual operations of individuals” (Goody 1987, 221). Goody (ibid., 221) calls the idea of “syllogistic reasoning” as an immediate consequence of “mastery of writing” “pat-

ently absurd". He argues that syllogisms are an invention of a particular time and a particular place, that they do not demand mastery in writing and that they can be taught to be solved in a comparable way as can, for example, operations on the arithmetic table. A study presented by Goody (ibid., 223f) partly proves this argument. This study grouped members of the Vai according to their language of literacy. Those being literate in English solved the syllogisms effortlessly, whereas literacy in Vai had no such effect on the solving of the syllogisms.[35] Nevertheless, he agrees that the syllogisms, regarded as a certain kind of puzzle, a theorem with logic which involves a graphic layout, "is consequent upon or implied in writing" (ibid., 221).

8.6 Numeracy and Cognitive Development

Another point that has to be considered when planning numeracy lessons, which are also an important part of adult education programs, is the way in which the participants use numbers and when and how they use math in their daily activities. This can help to identify where problems might arise and how they can be overcome, for example by beginning with the mathematical situations which are familiar to the participants. An example is given by Cole (1984, 293). He observed the Kpelle in Liberia to better understand their way of calculating. He found out that they are extremely good in measuring rice and that they have a highly developed vocabulary for these procedures. On the other hand, they have problems measuring length and distances. Cole (ibid., 295) also discovered that their vocabulary for this area is very limited. These findings show how important language and vocabulary is in numeracy as well as in other areas of schooling and education.

According to Oesterdiekhoff (1992, 107), members of traditional groups without any formal schooling are, in general, on the preoperational stage, which means that they do not have an operational notion of numbers. In addition, he believes that the mere mechanical subtraction, multiplication or addition of numbers does not change this state (ibid). He shows that

[35] However, positive effects of literacy in Vai where observed by other tasks, such as number sort, rebus reading and rebus writing (see Goody 1987, 223f).

preoperational numbers are not free from a sensual and real character. The sensual character becomes obvious while observing people counting. Amounts of objects bigger than two can often not be counted without touching the single items. Some of the indigenous languages do not contain words for numbers bigger than two or three. They are simply called “many” (for example in languages of the Australian aborigines) (see ibid, 107f). This, however, does not mean that they do not have a notion of how to count. When they have learnt English, their ability to count and calculate is comparable with that of an English native speaker (see Crystal 1998, 15). In other communities the body parts are used to count bigger amounts of objects by classing every single object to be counted to different parts of one’s own body. Oesterdiekhoff (1992, 108) quotes Levy-Bruhl’s observation of counting Murray Island inhabitants:

> “Man beginnt bei dem kleinen Finger der linken Hand, dann geht es zu den Fingern, zum Handgelenk, zum Ellbogen, zur Achsel, zur Schulter, zur Höhlung über dem Schlüsselbein, zum Brustkorb, endlich geht es zu der umgekehrten Ordnung über den rechten Arm zurück, um beim kleinen Finger der rechten Hand aufzuhören.“

With the help of this system and their bodies, they were able to count up to 31. Furthermore, the notion of the number itself does not always exist. In some communities, numbers are only seen in connection with the concrete things they count. This becomes evident in the words for the different numbers in some languages. On the Fiji Islands, for example, the word for ten boats is “bola” whereas the word for ten coconuts is “koro”. The numbers are a part of the item itself, and they are not verbally differentiated from it. There are also numbers which are only used for circular, long or flat objects. The numbers are not yet divided from the qualitative difference of the things. Therefore, there are no objective and abstract numbers, and there is no calculating without sensual support (see ibid. 109). These different notions of numbers, the sensual aspect of calculating and the close relationship between numbers and objects, can also be explained with Piaget’s theory of the stages of cognitive development. Believed to be on the preoperational stage, some illiterate indigenous people are not able to realize the abstract character of numbers and the logic behind mathematical operations. Counting is only successful when it starts with one and

when the order of the counting body parts is kept. This proves, according to Oesterdiekhoff (ibid., 108), that the sensual counting is preoperational because the order is incompatible with the reversibility of logical addition.

However, these examples are the more extreme ones. The observations of Levy-Bruhl were taken a very long time ago and in a very remote region. Also Oesterdiekhoff's point of view is questionable. As mentioned before, even in remote areas, life has changed in the last decades, and lower concrete operations belong to the life of the vast majority of the people. Sometimes even higher levels on the concrete-operational or even the formal-operational stage are achieved by illiterates. In addition, numbers and calculations are present in almost everyone's life today. There is an innate ability to add and subtract, which has been identified already in few-month-old babies, and therefore illiterates have a numeracy system in their minds when they start the literacy program (see Abadzi 2003, 63). This has to be identified in order to better understand possible difficulties and, where it is correct, it can be used to facilitate the acquisition of numeracy. Nevertheless, the prevalent notion of numbers, the words for the numbers, their system and the way of counting and calculating, which can all be different from the Western ones, have to be identified and evaluated. All this information is very valuable for planning adequate and successful education programs. The observations make it obvious how crucial learning material is when teaching math to indigenous people. It has to become clear that there are more ways of calculating and more notions of numbers then the Western ones.

8.7 Perceptions of the Research Findings about Cognitive Development for Adult Education

The experiments and research findings and the partly controversial opinions about them presented here are only a selection of many more about this complex topic. A more comprehensive handling of this topic would transgress the extent of this thesis. The purpose of this part was to demonstrate that there are differences in the cognitive development of schooled and unschooled people and that schooling and literacy have in-

fluences on the development of certain skills. Nonetheless, the applicability of the tests and experiments, which have been developed in Western contexts, for the completely different situation in developing countries with a dissimilar living situation and preconditions of the people living there, and their ability to assess the cognitive development of these people, is questionable. The results, and even more so the conclusions drawn from these results, should be considered with great care. However, taking this information about the differences in the cognitive development between adults with some kind of formal schooling and those with no previous formal education experience into account, it becomes obvious how important it is to adapt the style and the methods of teaching as well as the contents of the lessons to the respective participants of the program. A mere translation of Western education programs, even when they try to take the local context into account, is absolutely impossible. A first and rather simple step might be the establishment of different classes for those with and without formal education experience in order to serve the participants' respective needs and adapt to their prerequisites in a more adequate way. It also becomes clear that these prerequisites, especially those of illiterates from rural areas, differ greatly from those of adults raised and living in Western countries. The planners of the programs and the lessons have to free themselves from their view of the world and from almost everything they regard as "universal" and "given" (e.g. the notion of abstract numbers, the ability to draw conclusions or the ability to recognize objects in pictures). A close cooperation between planners from outside and members of the respective community as well as preliminary evaluation are again essential in order to create a successful program which considers the participants, their previous knowledge and their way of thinking.

9. Vital Changes in the Linguo-Pragmatic Context

Even if an education program fulfils all the recommendations and the requirements explained above, this will not be sufficient to achieve the long-term goal of sustainable literacy and positive social changes for the individual participants, for their families, their communities and for the whole society. Another crucial change that has to take place in order to achieve this goal is the allocation of more functions to the local languages. Apart from their use in the educational sector, they need to be introduced to other areas of communication as well. As Wolff (2003, 201) aptly expresses: ”The use of national languages for adult literacy in rural settings, in culture and crafts, and in the media, does nothing to overcome the marginalization of the masses, or to threaten the domination of our language by the foreign language”.

A first step in the right direction ought to be the promotion of the local languages, or at least of widely spoken national languages, to an official level. However, the mere labelling of certain languages as “official” is not sufficient. The crucial point here is the actual use of the languages in national life (see Fyle 2003, 118). They need to be vividly used in administration, politics, judicature and other civil institutions. Yet, until today the language used in these kinds of spheres is in almost all African cases the official language, which is usually the international one. A study conducted by UNESCO (1985, quoted in Fal 2003, 224) on community languages states that of the forty-five African states covered, only eight chose an African language as their official language (in most cases together with an international language). The other thirty-seven countries continue using the former colonial language thereby marginalizing the eighty per cent of the African population who do not speak the official European language.

Of course, it is impossible to use all the languages of a country as official languages in all spheres of public communication and administration, but using only the widely unknown European language is also an unacceptable solution (see Ouane 2003, 50). A possible solution can be the use of different languages depending on their use in the relevant segment of so-

ciety. As explained before, in multilingual countries, the vast majority of the people speak more than one language. Therefore, it would be possible to use the local language for public communication and administration concerning the local level. When socially higher levels of communication are concerned[36], the local languages are not an effective means of communication anymore. Here, it would be more adequate to use a language that is spoken by the majority of the people as a second language, which is usually the lingua franca. When it comes to communication on the national level, for example national politics, the European language still seems to be in a monopoly position. The main reason for this situation is that the international language is seen as a gateway for successful international communication, which is regarded as being very important for the economy amongst other factors. At the same time, however, it demonstrates the elitist attitude to shut off the vast majority of the population from participation in and influencing of national affaires. Often, a systematic generation of a negative language attitude towards the minority or local languages is established by the government. Adegbija (2003, 176) portrays these policies as follows:

> “Negative language attitude goals are often achieved through policies that deny small-group languages any functions, attract all significant functions to the majority language, and create a looming sense in the small-group language speakers of the indispensability of major languages, on the one hand, and the dispensability of the small-group languages, on the other.”

He also mentions the lack of financial support for self-initiated developmental efforts as a way to demonstrate the negative governmental attitude towards these minority languages (ibid., 176).

A solution seems to be the adoption of a middle course; an equilibrium between the most important languages in the respective country and its local and minority languages has to be found, in which “important” refers to both functional importance and importance because of the size of the language group. The conflict between uniformity and diversity and especially between both equity and efficiency has to be taken into account (see

[36] "Higher" means here that more people with different mother tongues are concerned, for example on a regional level.

Ouane 2003, 58). For Davies (1986, 8, quoted in Ouane 2003, 53), the "ideal language policy ought to have a dimension and scope that are both national and local. Efficiency is not necessarily achieved by uniformity, rather by sympathetic understanding of complex demands and dynamic uncertainty". The use of the local languages has to be promoted as long as it is an efficient way of communication. This includes their use in local administrational institutions, local politics as well as for example in local newspapers and radio programs. At the other end of communication within a country, the national level, the lingua franca(e) should be used in addition to the international language. This would facilitate the political discourse and open the way for active participation and a more democratic society. The people who are still excluded because of their inability to speak one of major languages have to be given a language aid (translator, speaker of their mother tongue) when needed, for example in court.

In order to realize these proposals, people working in civil services have to become literate in the local or national languages, depending on where they work. What seems to be an unrealistic demand at first sight is actually a relatively easy step to take, especially in comparison to its necessity on the way to social change. According to Fal (2003, 225), "it takes no more than 30 hours to learn to read and write a language that the learner already speaks", considering that the civil servants are already literate in the official language. This literacy can be acquired through participation in literacy programs as well as through self-study if adequate material is available. An example of this policy can be found in Somalia, where government civil servants are put through examinations as to their command, both oral and written, of two national languages, one of which is their mother tongue (see Wolff 2003, 210). A possibly problematic precondition for literacy in local languages is the graphicization of these languages in a standardized form. In addition, special terms used in bureaucracy and politics might not exist in indigenous languages because they had been excluded from these areas of communication for decades. Therefore, a modernization of the languages has to be advanced. Only through use is a language able to develop and to create and adopt new words in order to

keep up with the developments within a society. Despite the importance of the promotion of national languages, the notion of the international language as a gateway to participation in worldwide politics and economy is also correct and important. Therefore, literacy in these languages has to be constantly supported in addition to literacy in the mother tongues.

In addition to the practical advantages of the promotion of local and national languages for their speakers, it can also signify a boost in prestige not only for the language itself, but also for the members of the respective language group. The vicious circle of neglect and rejection of the local languages and their speakers can be turned into a virtuous circle. Ouane (2003, 57) describes it this way:

> "The relation of causality between function and status, and between function, status and the use of a language is a tautological one. A language having several functions inevitably gains in prestige and, with its prestige growing, it beats a path towards new functions. […] Prestige is in fact acquired through use and prestige facilitates access to new functions, thus broadening the field of use of a given language."

Only when a language has real functions in a society, when it is used in the media and by country officials, is its value acknowledged by a majority of the population. Allocating new functions to a language also signifies the creation of social demand for literacy in this language. As explained in chapter 5.3, the lack of social demand for a language often discourages its speakers from becoming literate in this language. Fyle (2003, 117) describes the situation as follows:

> "…it is no use educating someone in the mother tongue or community language […] when all national communication, all public business and administration, and even all access to meaningful jobs depends upon a knowledge of only one language, the official international English, French or other."

Without real functions of the local languages in daily life as well as in national communication, literacy in these languages has only few advantages and the sustainability of newly acquired literacy skills will stand no chance of survival. Adegbija (2003, 178f) supports this point of view:

> "It is only when the language is seen to function in mundane, real-life contexts and becomes part and parcel of day-to-day life, with

> the use for reading and writing relevant to the total pragmatic contexts of the new literates, that the acquired literacy skills can become ingrained, deep-rooted and assimilated into life's bona fide experience."

Especially when literacy in the international language is not promoted, the speakers of these local languages are "trapped" in their own, often socially lower, sphere of communication. They are locked out of social participation on a regional or national level, and they have no means of becoming an active member in the society and of making themselves and their situation understood. They are denied the right of a public voice. This is exactly what happened in South Africa. In the 1950s, the use of mother tongues as media of instruction for subjects in primary school and secondary schools was encouraged, "as a means of consolidating the linguistic and cultural apartheid" (Abdulaziz 2003, 107). Later in the 1950s, teaching of Afrikaans as a medium of instruction was imposed on the native peoples even though it was spoken natively by only a very small number of people. On the other hand, the native peoples were denied the right and the opportunity to learn English or other international languages, thereby denying them the right to a public voice. It was assumed by the elite that they would not need to be educated in international languages since they would supposedly never work in the higher prestige jobs that request these skills. "Later, the Black consciousness movement […] insisted on reversing this policy in favour of English" (ibid., 107).

This last example of South Africa makes it again very clear that African language politics are always power politics. The small elite who is successful in the mastery of the official, colonial language, tries to retain their monopoly of power, which makes it possible for them to hinder initiatives favouring mother tongue education, or even stop them, as soon as they seem politically opportune. The African linguistic policy, and therefore also the mother tongue education, is almost always determined by political interests of this governing power elite. This policy is overshadowed by the retention by the elite of the colonial languages as official languages. This is its way of ensuring exclusive access to information and of preventing self-determination and thus sharing of power by others. The governments

often show no willingness to foster the national languages beyond the strict minimum demanded by domestic politics, which is the use of these languages as the official media or instructional languages (see Küper 2003, 95). Furthermore, many governments fear the reaction of the former colonial ruler, which usually is an important financial supporter, to their intentions of improving the status of local languages by allocating more functions to them, for example through the use in higher levels of communications, which were formerly reserved for the international language only.[37] This is an additional pressure faced by the introduction of national languages in more important areas of communication. Therefore, demands for the allocation of more important functions to the national and local languages are usually refused by the governments. All these obstacles are in the way of a fair language policy. The different interests and the power struggles make it very difficult for outsiders to improve the situation of the local languages, especially when it comes to the allocation of more functions. These are changes that can be encouraged by outsiders, but the actual steps have to be taken by the respective country's people and government.

[37] See for example the situation in Niger, described by Wolff (2003, 202).

10. The Benefits of a Supportive Attitude towards Mother Tongue Education for a Country's Literacy Rate

Quite obvious differences in the literacy rates can be observed among the African countries. The countries which were ruled by the British during the colonial time have in general a fairly higher literacy rate than the countries which were under French or Portuguese control. A reason for these differences can be found in their way of handling the language situation. The language policy applied by the British colonial authorities was more in favour of using the local languages, for example in primary and adult education, rather than strictly insisting on the official language throughout all areas of public communication like the French and the Portuguese did. The British encouraged the development and use of African languages and lingua francae. The missionaries in Kenya, for example, wanted to develop the vernacular languages for the purpose of elementary education and catechism. In the 1930s, mother tongues were used in lower primary education (see Abdulaziz 2003, 106). According to Fal (2003, 224), doubts might be expressed about the real motives of this policy, but nevertheless it did prepare the ground for the development of the African languages. The French assimilation policy, on the other hand, "had an adverse effect" (see ibid., 224). At independence, the African languages in the areas governed by the French were the least developed; most of these languages had not even acquired an orthographical system (see Abdulaziz 2003, 105). The situation in the former British colonies was much more desirable: all major languages were fairly developed and widely used in the education system and in administration. Additionally, a rich tradition of academic research on African languages by British scholars in their universities can be found (see ibid., 105f). The French were very concerned that pidginized forms of French might emerge in the colonies. Therefore, they were very strict about promoting Standard French as the only language used in education (from the nursery to the university level), administration and culture (see Abdulaziz 2003, 105). The British, on the other hand, recognized the existence and development of English-based pidgins and creoles (see ibid., 105).

The following table demonstrates, through a selection of former British and French colonies, the obvious differences in the literacy rates between these two groups.[38]

Country	**Adult literacy rate** (% ages 15 and above) **1990a**	**Adult literacy rate** (% ages 15 and above) **2003a**
Former French colony:		
Benin	26.4	33.6
Burkina Faso	..	12.8c
Côte d'Ivoire	38.5	48.1
Mali	18.8	19.0c
Niger	11.4	14.4
Senegal	28.4	39.3
Former British colony:		
Botswana	68.1	78.9b
Ghana	58.5	54.1
Kenya	70.8	73.6
Malawi	51.8	64.1c
Nigeria	48.7	66.8b
Uganda	56.1	68.9b
Zimbabwe	80.7	90.0b

Table 1: Adult literacy rates in former French and British colonies, 1990 and 2003[39]

[38] Numbers reflecting literacy rates have to be handled with care, and comparisons across countries and over time should be made with caution due to differences in methodology and timeliness of underlying data. In some countries, the data is collected by asking questions like "Are you literate or not?" or "Can you read and write with understanding?" while for other countries more comprehensive questions are asked or an assessment test is administered (see www.uis.unesco.org/ev.php?ID=4930_201&ID2=DO_TOPIC). The assessment tests applied can vary from merely decoding a word written on a card to reading texts, followed by questions about the contents as well as writing exercises. The questions about the level of literacy are sometimes only posed to the head of a family who answered for all the family members. This data and the specific numbers resulting from it can not be regarded as very reliable. In addition, Abadzi (2003, 28) argues that the cognitive limitation has not been taken into account in the various definitions of literacy, e.g. UNESCO's definition of literacy as the ability "to read and write with understanding a short simple statement of his/her everyday life". Another shortcoming of literacy definitions is the neglect of the changed environments and the much more complex tasks that literacy in the 21st century has to fulfil in comparison to ten or twenty years ago. To cope with these complex environments, a higher level of literacy performance is needed now. Abadzi (ibid.) claims that "if functional literacy is defined as having sufficient skills to process information, the number of people worldwide who lack basic skills may be as high as 2 billion". Clearly, the definitions of literacy as well as the evaluation methodologies need rethinking and standardizing in order to be representative and comparable. However, the data reflects certain developments within a country and gives an idea about the general spread of literacy.

These differences can be seen as a sign for the positive long-term consequences of mother tongue education and the supportive attitude towards the development of the national and local languages for the adult literacy rates of these countries. Higher adult literacy rates reflect the presence of a functioning education system, which manages to provide the children and adults with sustainable literacy. Because the national languages are, generally speaking, not only used in education, but for all kinds of public communication in the former British colonies, literacy in the mother tongue or at least in the lingua francae is of greater use and therefore the literacy skills seem to be better retained.

[39] Notes:
a Data for 1990 refer to estimates produced by UNESCO Division of Statistics based on data prior to 1990; data for 2003 refer to national literacy estimates from censuses of surveys conducted between 2000 and 2004, unless otherwise noted.
b Estimates produced by UNESCO Institute for Statistics in July 2002.
c Data refer to a year between 1995 and 1999.
Source: UNESCO Institute for Statistics

11. Conclusion

Adult education and literacy programs have been neglected in the last decades. The stress in the fight against illiteracy has always been on primary school education and the goal of universal primary completion. This is, of course, a correct step to take; however, in the last decade it became obvious that this is not enough. The quality of primary school education as well as the enrolment rates are still far behind the expectations. Consequently, adult literacy programs have to come back into focus.

As comprehensively demonstrated in the implementation of this thesis, the acquisition of basic literacy and numeracy skills in the strong language, which equals in almost all cases the mother tongue, is the ideal way of initial alphabetization. The strong language is the one which is known best by a person and therefore the process of becoming literate is facilitated enormously. In addition, the literacy skills acquired in the strong language support the acquisition of literacy in additional languages. The transferability of the literacy skills is a widely acknowledged fact. Since literacy in other languages, usually the official language, in addition to the mother tongue is an important aim of good literacy programs, this transferability is a great help.

Many aspects have to be considered when planning and implementing adult education programs in order to meet the expectations and the needs of the participants. There is not one single program that suits all participants and situations in the different countries; there is not even a one and only way of implementing programs in one respective country. In basically every community, the program has to be planned in accordance to the prevalent situation, the intended participants and the available resources. The most important aspect is the participants, of course. Their languages, previous knowledge, expectations, needs and aims have to be identified and taken into account. Only when the participants recognize the benefits of the program and when they are meeting their personal aims will they remain in the program.

Research about the acquisition of literacy and the significance of the mother tongue in this process has been concentrating more on children than on adults. Especially when the differences between children and adults in this acquisition process are concerned, there are more questions than answers. Attempts are being made to find new ways to improve adult literacy and education programs by considering the special prerequisites with which the adults enter the programs, for example exercises for an automated and accurate reading skill (see Abadzi 2003, 2004). The lack of profound and comprehensive studies about the success of mother tongue education programs for adults and especially longitudinal studies about the retention of the newly acquired literacy skills makes it impossible to determine which method is better than the others. Much more research, especially concerning the cognitive differences between children and adults, has to be conducted in order to establish more effective ways and methodologies for adult education programs.

Some new methods have been presented in this paper. The REFLECT programs, which are based on Paulo Freire's theories about adult education, stress the empowerment of the participants. The success of these programs, even though very popular, is not unequivocally stated. It is difficult to assess why innovative programs seem to fail quite often, even though they take the latest research findings into consideration and are planned in close cooperation with the communities. The evaluation of education programs is very difficult, especially when different programs in different countries are compared. The situations the programs are set in tend to be very dissimilar, and therefore many different factors and aspects have to be taken into account. It is almost impossible to create and conduct comparable tests.

What can be concluded, however, is that the success rates of adult literacy programs are, in general, behind expectations. In addition, a great number of participants relapse back into illiteracy, often because their skills are not consolidated and because they are not able to actively use these new skills. Often, reading materials in the local languages are miss-

ing, and the languages are not present in the public life of a country. This is due to the fact that in almost all spheres of public communication, for example in politics, civil services, administration and sometimes even in the media, only the official languages are actively used. The minority languages have only minor or no function beyond the private level. Therefore, literacy in these languages is regarded as a waste of time and money by many people. As long as the local and national languages are not allocated more function, a demand for literacy in these languages will not be recognized by a major part of society.

It has been shown that the advantages of literacy in the strong language can not only be found on the educational level, but also on the political, the social and even the economic level. Even though many of these advantages have been recognized decades ago, mother tongue education has only slowly been implemented. The small elite which is in the power position in almost all the African countries has always found arguments against the use of the local languages. The main reason behind these arguments is usually their fear of losing their privileged situation of being members of a small group which has mastered the official language. In the discussion of these counter arguments and their real reasons, it became obvious that language politics are always power politics. This has to be taken into account when the claim for alphabetization in local languages is uttered. Even though the advantages are overwhelming, the powerful elite often seem to be deaf towards them. Therefore, literacy programs should always offer post-literacy classes in which the participants can learn and become literate in the official language as well. These languages can help them to get better jobs and award them a public voice.

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Schlusserklärung

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