

## Ajami in West Africa

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### Abstract

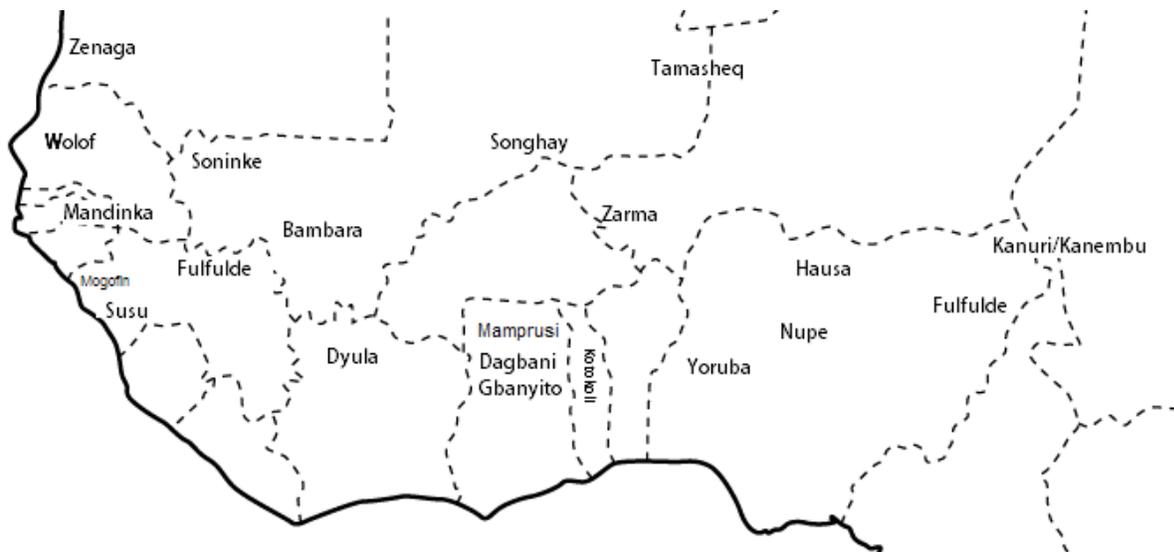
West Africans throughout the region have creatively adapted the Arabic script to write non-Arabic languages, a form of literacy known as Ajami which remains widespread today despite little or no government support. The variety of methods used to extend the Arabic script to fit other phonological systems are of particular interest: methods that appear unmotivated from a purely linguistic perspective can readily be explained as rational adaptations to the parallel educational system in which Ajami is typically learned, an issue often not taken into account in orthography planning.

### Introduction

<1>

*Ajamiyy* is an Arabic word meaning “non-Arabic”. In a West African context, “Ajami” is used in particular to refer to the writing of non-Arabic languages in Arabic characters. This practice is attested in practically all Muslim areas of West Africa, including at least Senegal, Gambia, Guinea-Bissau, Guinea, Mauritania, Mali, Niger, Ghana, Nigeria, and Cameroon. It continues to the present despite being propagated almost exclusively through traditional religious instruction, usually without government funding or recognition; in this sense, it might be called a non-governmental literacy, as opposed to literacy whose norms are passed on through a government-organised school system. The West African languages for which its use is attested are geographically, genealogically, and typologically diverse, as illustrated below.

**Figure 1: Map of languages for which Ajami use is attested (cf. especially O’Fahey and Hunwick 1994, Vydrine 1998, Norris 1982)**



<2>

The earliest reported West African efforts to transcribe their own languages in Arabic characters date to the 13th century inscriptions documented in Moraes Farias 2008. For the early Muslim states of the Niger bend, Arabic inscriptions became an important political statement, affirming their status as Muslims and their connection to the wider Islamic world. But some elements – names and titles in particular – could be expressed only in the writers' mother tongue. Thus in inscriptions like the following (*ibid.*), a Songhay word (italicised) is placed within an Arabic frame:

hādā al-qabr al-wazīr Muhammad Ariyaw *zammu*      هذا القبر الوزير محمد اريو ظم  
Kawkaw bin Būbakar      كوكو بن بوبكر

“This is the tomb of Muhammad Ariyaw *praise-named* Kawkaw son of Boubacar.”  
(Bentyia 234)

Fāṭimah *Kayna* bint...      فاطمة كين بنت

“*Little* Fatima daughter of...”  
(Bentyia 234)

<3>

It may be supposed that this tradition of writing down individual Songhay (and other West African) words encouraged the emergence of conventional solutions to the problems of fitting a non-Arabic phonology into the Arabic script, making the task of writing and reading whole Ajami texts more manageable. Unfortunately, there is little reported evidence on how this crucial transition occurred, and only indirect evidence on to what extent it occurred independently in different areas. The earliest dated West African Ajami texts, in Tuareg and Kanembu, date to the 16th and 17th centuries (Gutelius 2000, Bondarev 2006 respectively), but there is no compelling reason to believe that they were the first of their kind. However, a study of the conventional solutions used offers clues to the creation process.

## Orthography

### Basis

<4>

North African influence is conspicuous in West African Islam; in general, West Africa follows the Maliki school of Sunni Islam, mainly centred in the Maghreb. Accordingly, all traditional West African Ajami orthographies are primarily based on the Maghrebi variant of Arabic, which until the twentieth century was used throughout north Africa excluding Egypt. This differs from the Eastern variant which has become standard in several ways:

- *fā'* ف is written with a dot below (ف)
- *qāf* ق is written with a dot above (ق)
- *nūn* ن is often written without the dot word-finally (ن)
- *shaddah* ø (the gemination marker) is often written as a v-sign <sup>v</sup>

<5>

Only in a few of the most recent texts are non-Maghrebi features observable – for example, in the late 20th century Mogofin texts shown by Vydrine (1998), where *fā'* and *qāf* are written ف and ق. The ISESCO efforts to create a common African Ajami orthography (eg Chtatou 1992) are based on the Eastern variant; but this proposal ignores almost all features of existing West African Ajami orthographies.

<6>

There are several reading traditions (*qirā'āt*) of the *Qur'ān*, each using slightly different signs to mark phonetic details. The one traditionally taught throughout the Maghreb and West Africa is Warsh, rather than the most widespread one, Hafṣ. Among other special marks, this orthography makes use of a dot placed underneath the letter to mark the sound [e:], which in this tradition is pronounced in place of some instances of what Modern Standard Arabic would realise as /a:/. This feature has been widely adopted in West African Ajami orthographies, including Kanembu (Bondarev 2006), Hausa, Fulani (Gaden 1913: 70), Susu (Vydrine 1996), and Wolof (Touré 1964, n.d.) – but not, for example, Mandinka.

<7>

The Arabic script marks long vowels through full letters, while optionally marking short vowels through diacritic marks, termed *tashkīl* or “vocalisation”, placed above or below the letters. In Modern Standard Arabic, vocalisation is rarely used except in pedagogical texts or to prevent ambiguity in specific words. However, Qur'ān texts have normally been fully vocalised since a very early period, because of the religious importance attached to their correct pronunciation. West African Ajami typically follows the latter model, with every letter fully vocalised.

## Adaptations

<8>

The sound system of Arabic, like that of English or French, is rather different from the sound systems of most West African languages. As a result, a person literate only in Arabic attempting to write a West African language face significant challenges. The Arabic alphabet, like the Latin one:

- includes sounds not found in the target languages: for example, Fulani does not have *ḥ, q, d, s* ح ق ذ ص
- does not include sounds found in the target languages: for example, Fulani has *o, mb, b, c, p*
- does not distinguish features which are phonemic in some target languages, such as tone or nasalisation

West African authors have creatively applied at least five strategies, of varying degrees of effectiveness and conventionalisation, to solve these problems.

## Homography

<9>

In Arabic loanwords into West African languages, consonants not found in the language are usually replaced with similar ones that are found. This can easily lead to a situation where several Arabic letters each correspond to the same sound. In some cases, authors use any of these possibilities to represent the same sound within native words. Thus in *The Poem of Repentance* (Eguchi 1976 – Fulani, Cameroon), /s/ in Fulani words may be written with the Arabic letter <s>

(eg *sappo* سَفُّ), or (less commonly) with <θ> ث, whose nearest Fulani equivalent is s (eg *saftataa* تَفْتَاتَا). This strategy is unambiguous from the reader's perspective – the reader always knows which sound is intended – but creates potential ambiguity for the writer, who needs to decide at each occurrence of the sound which of several possible letters for it to select. This may be resolved by picking one letter as primary and using others only in Arabic loanwords. Thus in *L'Islam No. 1* (Touré n. d. – Wolof) /s/ is always written as س except in Arabic loans; but the latter include even ones well-integrated into the language, such as صَب *suba* “morning”.

## Polyvalence

<10>

One way to cope with sounds not found in Arabic is to give existing Arabic characters additional, non-Arabic readings. For example, in *The Poem of Repentance*, the following correspondences apply systematically:

- *o* and *u* are written as <u> و
- *p* and *f* are written as <f> ف
- Prenasalised stops (*mb, nd, nj, ηg*), implosive stops (*b d y*), voiced stops (*b, d, j, g*), and back nasals (*ny, η*) are all written as the corresponding voiced stops <b, d, j, ġ> ب د ج غ
- Exception: *d* is sometimes written as <t> ط

This strategy creates ambiguity for the reader, who at each occurrence of such a character is forced to consider which of several possible readings is appropriate. However, from the writer's perspective it is unambiguous; for any given sound, the writer knows exactly which letter will represent it.

## Redeployment

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An Arabic letter with a sound or function not relevant to the language may be redeployed to express a similar sound that does occur. For example:

- In a language without the voiced velar/uvular fricative ġ غ, this letter may be used to represent the voiced velar stop *g*, not found in classical Arabic (as sometimes in Hausa (Newman 2000), Fulani (Eguchi 1976), and Kanembu (Bondarev 2006))
- In a language without the pharyngealised voiceless coronal stop *t* ط, this letter may be used to represent the coronal implosive *d* (as sometimes in Hausa and Fulani – cf. Newman 2000, Eguchi 1976)
- In a language without the voiceless dental fricative θ ث, this letter may be used to represent the voiceless palatal stop *c* (as sometimes in Hausa). For example, in Robinson 1897 (via Newman 2000) *da marece* is written دَمَرَيْشِي.

In some cases, a whole class of letters may be redeployed for a new function. Thus:

- In Arabic, *tanwīn*, a final *-n* marking the indefinite form of nouns and dropped pre-pausally, is written not with the letter *nūn* ن but rather by doubling the final vowel sign: *ˀ-un ˀin ˀan*. In Arabic, this convention is motivated only grammatically; but in Mandinka, it has been adopted as a means of marking nasalised vowels, and as such has a distinct reading and can occur even word-internally (Vydrine 1998.)
- In Arabic, the pharyngealised (“emphatic”) consonants typically lower following high vowels phonetically (so that after them /i/, /u/ > [e], [o]). Mandinka has no pharyngealised consonants; but, unlike Arabic, it does have phonemic mid vowels. It thus adopted the Arabic emphatics *s t d* ص ط ض for writing the phonemes *s t l* when followed by *e* or *o*, allowing these vowels to be indirectly distinguished through the choice of consonant symbols (Vydrine 1998.)

The potential of this method is limited by the usually large overlap between Arabic and target language sounds. However, where available and conventionalised, this method is equally unambiguous for the writer and for the reader, except potentially for Arabic loans. Often, this method fits existing oral conventions for adapting Arabic loanwords to target language pronunciation – for example, the representation of *k* as ق in Hausa corresponds to the normal borrowing of Arabic *q* as *k* (Skinner 1971); however, where exceptions to these conventions are found (for example due to borrowing via another language), the writer is likely to stick to the familiar Arabic spelling even at the expense of creating orthographic irregularity, just as often occurs in English.

## New characters

<12>

Many existing Arabic characters, often similar to each other in pronunciation, are distinguished only by the number and position of dots. Thus ت is /t/ while ث is /θ/; س is /s/ while ش is /ʃ/; etc. This naturally suggests an easy way to create new letters: change the number and position of dots on existing ones of similar pronunciation. Such cases are attested in several areas:

- In Tamasheq, the letter shape found in *j* ج is combined with three dots underneath to yield the voiced palatal stop *g*, written as چ, a letter not used in classical Arabic. (Sudlow 2006.)
- In the Mandinka Pakao and Bijini manuscripts, the letter shape found in *b* ب is combined with two vertically aligned dots underneath to yield the corresponding voiceless stop *p*, written as پ, a letter not used in Arabic (Vydrine 1998.)
- In the Mandinka Pakao manuscript, the letter shape found in *y* ي is combined with three dots underneath to yield the corresponding nasal *ny*, written as ڤ, a letter not used in Arabic (Schaffer 1975, Vydrine 1998); see Figure 2 below.
- In the Mandinka Ajami recorded by Hamlyn (1935), the letter shape of *w* و is combined with three dots above to yield the voiced labiovelar stop *gb*, written as ڤ, a letter not used in Arabic.

More rarely, new vowel markers may be created on a similar principle by adding dots to existing ones. There is one clear-cut case of this in West Africa; in Guinea, including most Fulani (Sow 1971) as well as Mogofin (Vydrine 1996), o is written by taking the Arabic vowel marker for short u ' and substituting a dot in place of the circle. Despite its wide usage, this letter does not currently appear to be found in Unicode.

## Diacritics

<13>

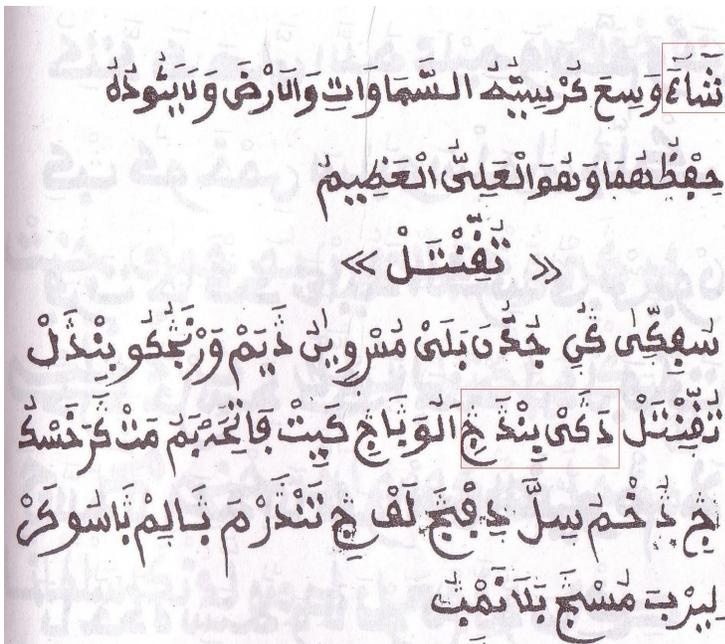
All of the methods listed above are more or less widespread in Arabic-based orthographies throughout the Islamic world. However, one method appears not to be reported outside West Africa: the use of what might be termed an “Ajami diacritic” not to form a new character with a core reading in its own right but simply to indicate that an existing character should be read as a non-Arabic equivalent.

## In Senegal

<14>

In Senegalese sources (Wolof and Pulaar), a diacritic consisting of three small dots is commonly used. This is not to be confused with the strategy of creating new characters by changing dots: the dots used for this diacritic are consistently written far smaller than those used to distinguish letters, and they are added to a character complete with dots, rather than replacing the character's existing dots. This is illustrated for Wolof by the following selection from Touré (n.d.):

Figure 2: L’Islam No. 1, p. 46



<15>

Illustrative areas have been outlined in red. In the higher one, an Arabic *shīn* ش may be seen, written with three full-size character-distinguishing dots. In the lower one, the Wolof words *da ngay binda ci* (دنگي بندج) feature three instances of the Ajami diacritic; observe that its dots are consistently far smaller than those distinguishing letters, and that it appears on top of *j* ج without affecting its existing dots.

<16>

The other key difference is in polyvalence. In Touré's orthography, Arabic letters without the diacritic are monovalent, as in Arabic itself. Letters with the diacritic added, by contrast, often get several readings:

- ب <b> + 3 small dots = ب = *p, mb*; eg بيم = *bopp-am* “his head”; بز = *mbir* “problem”
- ج <j> + 3 small dots = ج = *c, ñ, nj*; eg ج = *ci* “on”; بج = *bañ* “refuse”
- د <d> + 3 small dots = د = *nd*; eg ديچور = *ndeyjoor* “right”
- ك <k> + 3 small dots = ك = *g, η, ng*; eg كئو = *gannaaw* “back”; كوخ = *nga wax* “you say”

Particularly illustrative is the case of *j*. The three readings *c*, *ñ*, and *nj* are each one phonetic step away from *j* – they can respectively be derived from it by devoicing, nasalisation, and prenasalisation; but there is no natural phonetic class that includes all three of these while excluding *j* itself. The only natural definition of this character's reading is “any Wolof sound not found in Arabic whose closest Arabic equivalent is *j*.” This confirms that the best functional definition of the three small dots diacritic is as yielding “any Wolof sound not found in Arabic whose closest Arabic equivalent is the letter underneath.”

<17>

This diacritic is not restricted to Wolof Ajami. For Pulaar Ajami – that is, Ajami as used in Fuuta Tooro in northern Senegal – Gaden (1913: 69) says “Toutes les fois qu'un caractère est mis pour une consonne autre que celle qu'il représente normalement, il est de règle qu'il soit surmonté d'un signe d'avertissement qui se compose habituellement de trois points diacritiques” (“Every time a character is taken for a character other than what it normally represents, it is as a rule crowned with a warning sign usually made up of three diacritic points.”) An important sample is the page reproduced in *La Vie d'El-Hadj Omar*, a poem by Mohammadou Aliou Tyam (~1885) published in Gaden 1935. This work reveals a similar system, whereby:

- ج <j> + 3 dots = ج = *c, ny*; eg جيمبند = *cemmbindi* “vigorous”; كج = *kanye* “also”
- ف <f> + 3 dots = ف = *p*; eg تفبته = *tampata* “they will not tire”
- ق <q> + 3 dots = ق = *g* or *ng*; eg قل = *gilli* “love”

This makes the element of conventionalisation in the Ajami diacritic's use obvious; here /p/ is based on Arabic <f> rather than <b>, and /g/ on <q> rather than <k>. Moreover, a separate convention observed in this text – that a prenasalised consonant is represented as the corresponding voiced one – changes the distribution of the readings. Nevertheless, the common principle is clear: allowing for the prenasalisation rule, adding the diacritics again yields “any Pulaar sound not found in Arabic whose closest Arabic equivalent is the letter underneath.” Once again, the diacritic is consistently smaller than letter-distinguishing dots, as illustrated by the dots boxed in red below: the large one is on the *shīn* ش in the Arabic word والشريعة, while the small one near it is on the *p* in the Fulfulde word *tampata* discussed above.

Figure 3: page from Gaden (1935)



## In Guinea

<18>

A similar system is attested for Fulfulde in the Futa Djalon region of Guinea, using a single small dot placed beyond the vowel mark (above a *fathah* 'a' or *dammah* 'u', below a *kasrah* 'i'; with a *dammah*, this typically yields the vowel *o*, as discussed above.) This mark is attested in some of the manuscripts in Sow 1966 and 1971; its purpose is not explicitly discussed, but can be deduced from the Latin transcription. Thus, in my examination of lines 1-211 of “Le filon de bonheur éternel”, by Tierno M. S. Mombéyâ, as reproduced in Sow 1971, the following readings are observed for letters with this mark above a vowel *a* or *i*:

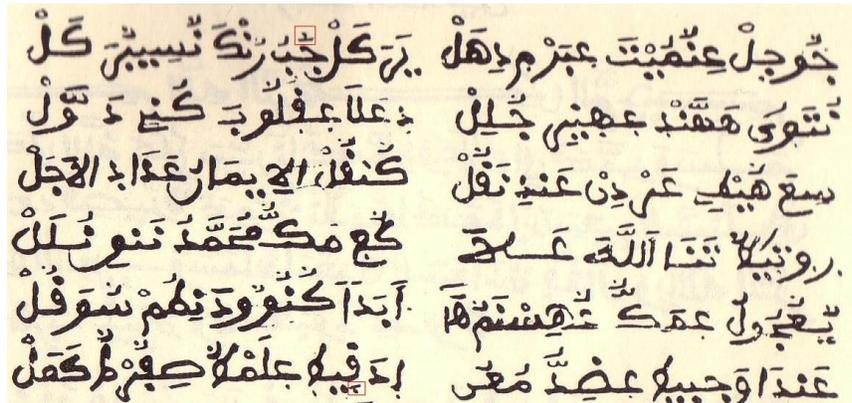
- ج <j>: ny (14, 33, 43, 82, 108, 123, 163, 167, 179, 211), y (27, 108, 115), j (39, ?171)
- ق <q>: g (19, 76, 81, 82, 92, 94, 156)
- ب <b>: b (72, 165, 185)

Once again, it appears that this is best explained as indicating a non-Arabic reading similar to the Arabic character below it; the occasional cases of *j* being read as *j* may be explained by the fact that Fulfulde *j* is palatal, whereas Arabic *j* – depending on the reading tradition – is more commonly an affricate.

<19>

The system is exemplified in the following figure (reproduced from p. 2), in which examples are found on lines 14 (*nyabu* جَبْ) and 19 (*e dagiide* اَدَقِيْط).

Figure 4: p. 2, ll. 14-19 (Sow 1971)



<20>

However, in contrast to the Senegalese system, this dot appears to be entirely optional; for example, the same word, *kuugal*, is spelled كُوُقَل (with a dot marking the g) in line 92 vs. كوقل (with no dot) in line 8.

## Conclusions

<21>

Most of the devices by which the Arabic script has been made to fit the purpose of writing non-Arabic languages in West Africa are widely attested. The Ajami diacritic, however, is noteworthy for being negatively defined, yielding multiple readings not directly connected to one another. Why would such a device be used, instead of simply creating specific conventions for specific non-Arabic phonemes?

<22>

The answer lies in the nature of the educational system through which Ajami is normally dispersed. Arabic literacy has spread primarily through Qur'anic education, widely provided to children outside of state structures. The main goal of such an education is to be able to read texts in Arabic; conventions not related to Arabic, like how to write *nj* or *d*, are secondary. A striking illustration of this attitude is provided by the Wolof booklet *L'Islam No. 1* (Touré n.d.); the explanatory texts of the book are written in Wolof in Ajami orthography, using the conventions described above, and the book also includes a 17-page explanation of the Arabic alphabet intended for Senegalese people literate in French, yet this explanation covers exclusively the conventions of Arabic and does not explain the conventions used in this very book for representing Wolof sounds at all! If conventions for writing non-Arabic sounds are considered as mere sidelines to the primary goal of learning to write Arabic, then the simpler a convention is relative to Arabic, the more likely it is to be successfully acquired. The “non-Arab sound” diacritic is a single element, thus maximally easily learned, and in principle doubles the script's expressive capacity without requiring any further conventions. A language planner setting a goal of native language literacy would most likely design a system where each sound was separately represented; but this method represents a pragmatic compromise, recognising the religiously defined primacy of the goal of being able to read the Qur'an and yet making the desirable side effect of native language mass literacy more easily attainable even with few or no printed works. It serves as an important reminder that the nature of an orthography depends not just on the structure of the language, but on the educational infrastructure supporting it and on its perceived purpose.

## References

- Addis, R.T. 1963  
*A Study on the Writing of Mandinka in Arabic Script*
- Arensdorff, L. 1913  
*Manuel Pratique de la Langue Peulh*. Paris: Paul Geuthner
- Bobboyi, Hamid 2008  
“Ajami literature and the study of the Sokoto Caliphate.” in Jeppie et al. 2008
- Bondarev, Dmitry 2006  
“The language of the glosses in the Bornu quranic manuscripts”. *Bulletin of SOAS* 69: 1
- Chtatou, Mohamed 1992  
*Using Arabic Script in Writing the Languages of the Peoples of Muslim Africa*. Rabat: Institute of African Studies
- Eguchi, Paul K. 1976  
*Poem of Repentance*. Tokyo: ILCAA
- Gaden, Henri 1913  
*Le poular : dialecte peul du Fouta sénégalais. Tome I*. Paris: Ernest Leroux
- Gaden, Henri 1935  
*La vie d'El Hadj Omar: qacida en poular (Mohammadou Aliou Tyam)*. Travaux et mémoires de l'Institut d'Ethnologie XXI. Paris: Institut d'Ethnologie
- Giesing, Cornelia & Valentin Vydrine 2007  
Ta:rikh mandinka de Bijini (Guinée-Bissau): La mémoire des Mandinka et des Sòoninke du Kaabu. Leiden: Brill
- Gutelius, D. 2000  
NEWLY DISCOVERED 10TH/16TH C. AJAMI MANUSCRIPT IN NIGER AND KEL TAMAGHEQ HISTORY. *Saharan Studies Association Newsletter*, VIII(1-2). Available at: <http://ssa.asu.edu/v8n1-2.pdf> [Accessed November 9, 2008]
- Hamlyn, William T. 1935  
*A Short Study of the Western Mandinka Language*. London: Government of Gambia
- Hiskett, Mervyn 1975  
*A History of Hausa Islamic Verse*. London: SOAS
- Jeppie, Shamil & Souleymane Bachir Diagne, eds. 2008.  
*The Meanings of Timbuktu*. Cape Town: HSRC Press
- Luepke, Friederike 2004  
Language planning in West Africa - who writes the script? *Language Description and Documentation Vol. 2*. London: SOAS
- Moraes Farias, P. F. de 2001  
*Arabic Medieval Inscriptions from the Republic of Mali: Epigraphy, Chronicles and Songhay-Tuareg History*. Oxford: Oxford University Press
- Moulaye Hassane 2008  
“Ajami in Africa: the use of Arabic script in the transcription of African languages.” in Jeppie et al. 2008

- Newman, Paul 2000  
*The Hausa Language: an Encyclopedic Reference Grammar*. New Haven: Yale University Press
- Norris, H. T. 1982  
*The Berbers in Arabic Literature*. Harlow: Longman
- Philips, J.E. & Hirosaki Daigaku 2000  
*Spurious Arabic: Hausa and Colonial Nigeria*. University of Wisconsin-Madison: African Studies Program
- Pilaszewicz, S. 1992  
*The Zabarma Conquest of North-West Ghana and Upper Volta: A Hausa Narrative "Histories of Samory and Babatu and Others" by Mallam Abu*. Warsaw: Polish Scientific Publishers
- O'Fahey, R. S. and J. O. Hunwick 1994  
*Arabic Literature of Africa*. Leiden: Brill
- Ogunbiyi, Isaac Adejoju 2003  
 "The Search for a Yoruba Orthography since the 1840s: Obstacles to the Creation of an Arabic Script." *Sudanic Africa* 14
- Salvaing, Bernard & John Hunwick 2003  
 "Writers of Guinea", in O'Fahey and Hunwick 1994
- Sanni, Amidu 2001  
 "The Indigenization of an Intellectual Tradition: A New Trend in Contemporary Islam in Yorubaland (Nigeria)". *Studies in Contemporary Islam* 3
- Schaffer, Matt 1975  
 "Pakao Book': An Introduction to Pakao Expansion and Social Structure by Virtue of an Indigenous Manuscript". *African Languages / Langues Africaines* 1
- Skinner, Neil 1971  
 "/ts/ and /k'/ in Hausa". *Anthropological Linguistics* Vol. 13, No. 6
- Sow, Alfâ Ibrâhîm (ed.) 1966  
*La Femme, la Vache, la Foi*. Paris: Armand Colin
- Sow, Alfâ Ibrâhîm (ed.) 1971  
*Le Filon du bonheur éternel, par Tierno Mouhammadou-Samba Mombéyâ*. Paris: Armand Colin
- Sudlow, David 2001  
*The Tamasheq of North-East Burkina Faso*. Köln: Rüdiger Köppe
- Touré, Ahmadou Dam 1961  
*Zād-ul-Muslim raqm I*. Dakar: Ly & Frères
- Touré, Ahmadou Dam n.d.  
*L'Islam No. 1*. Dakar: ECARICOM
- Umaru, 2000  
*Hausa Prose Writings in Ajami by Alhaji Umaru from A. Mischlich / H. Sölken's Collection*. Berlin: Reimer
- Vydrine, Valentin 1998  
 "Sur l'écriture mandingue et mandé en caractères arabes (mandinka, bambara, soussou, mogofin)". *Mandenkan* 33