WHAT CAN BE GLEANED OF THE PHONETICS OF THE CHINESE ANCIENTLY TAKEN OVER IN VIÊT-NAM?

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In this paper I am considering the traditional pronunciation of Chinese in Việt-Nam, and what inferences may possibly be made about the starting point from which—in or about 939 A.D.—it is customarily assumed that the Vietnamese went their own way in these matters without much further outside guidance, after the conclusion of a millenium of Chinese occupation. My enterprise in tracing back from Sino-Vietnamese, as it is now generally called, is admittedly problematic. So far as I can see, it is inherently impossible to be sure of distinguishing the state of a donor language from distortions introduced in the process of trying to imitate unfamiliar sounds.

Individual items in the Vietnamese data may be peculiar indeed, and only widely prevalent patterns can be relied upon. This means that there may be facts about the donor language which are in reality reflected in the borrowed forms, if we only knew enough to spot them, but which will not come to light very easily. I undertake this, I hope not entirely circular exploration, depending to the greatest extent possible on internal reconstruction from the Vietnamese evidence, with only very limited hints from comparative Chinese—to some extent making a virtue of necessity, since only with the Vietnamese material can I operate with any degree of assurance.

What, then, seem to have been the characteristics of the model on which the Vietnamese based their pronunciation?

In the first place, it had three tones, according to the three groups of examples given in Table 1. The eventual assignment of these to the six modern tones is a later development in Vietnamese, conditioned by the nature of the initial consonants, as will be brought out later in the paper. These tones might have been level, rising, and falling respectively—who knows, as tones can be very fickle, even over short time spans.

The donor dialect also had syllable-final stops /p/ /t/ /k/, without any original tonal distinctions among words ending in these sounds, but a later Vietnamese split (Examples are given in Table 2). The other possible final consonants were /m/ /n/ /ŋ/. There is copious Vietnamese evidence for the distinction between final /m/ and /n/, which does not show up in Mandarin. The spellings with final *ch* alongside *c* and *nh* alongside *ng* are due to recent developments in Vietnamese.

TABLE 1

TONES

Vietnamese spelling	Mandarin pronunciation (*pin yin* spelling)	radical. remaining strokes in character	gloss
tam	*san*	1.2	'3'
lai	*lái*	9.6	'odd'
bình	*píng*	51.2	'even'
cửu	*jiǔ*	5.1	'9'
ngũ	*wǔ*	7.2	'5'
tứ	*sì*	31.2	'4'
nhị	*èr*	7	'2'
Thanh	*qing*	85.8	'Ch'ing'
Minh	*míng*	72.4	'Ming'
Tùy	*súi*	170.9	'Sui'
thổ	*tǔ*	32	'earth'
Lỗ	*lǔ*	195.4	'Shantung'
Hán	*hàn*	85.4	'Han'
vạn	*wàn*	140.9	'10,000'

TABLE 2

SYLLABLE-FINAL CONSONANTS

Vietnamese spelling	Mandarin pronunciation (*pin yin* spelling)	radical. remaining strokes in character	gloss
cấp	*gěi*	120.6	'confer'
cốt	*gǔ*	188	'bone'
cốc	*gǔ*	150	'valley'
bách	*bǎi*	106.1	'100'
thập	*shí*	24	'10'
nguyệt	*yuè*	74	'moon'
lục	*liù*	12.2	'6'
mạch	*mài*	199	'wheat'
công	*gong*	48	'workman'
kinh	*jing*	8.6	'capital city'
sàng	*chuáng*	90.4	'bed'
Thanh	*qing*	85.8	'Ch'ing'
-n vs. -m			
an	*an*	40.3	'peace'
Ân	*yin*	79.6	'Yin'
tân	*xin*	69.9	'new'
nhân	*rén*	9	'man'
am	*an*	53.8	'temple'
âm	*yin*	170.8	'yin' [& yang]
tâm	*xin*	61	'heart'
nhâm	*rén*	33.1	'9th stem'

The Chinese model had initial nasals /m/ /n/ /ŋ/ and one other. As syllable-initial oral resonants it had /w/ /l/ /y/. Examples are given in Table 3. The existence of a palatal nasal in the donor dialect seems the most reasonable explanation of the Sino-Vietnamese palatal nasal in words like *nhi*, and is my first partly original suggestion. It fits into a system, and it is typologically common. Whatever strange sound may have lain behind later Chinese developments in these words, there seems to be no reason for assuming anything out of the ordinary for the dialect that engendered the Vietnamese pronunciation. All these resonants, the MING group as I've called them, regularly appear in borrowed Chinese words with only three of the Vietnamese tones, which provides one of the main lines of evidence for believing that the dialect imitated had just three tones.

TABLE 3

*MING Correspondences (*resonants)*

Vietnamese spelling	Mandarin pronunciation (*pin yin* spelling)	radical. remaining strokes in character	gloss	
Minh	*míng*	72.4	'Ming'	*m
mẫn	*mǐn*	205	'toad'	
mạnh	*mèng*	39.5	'eldest'	
mao	*máo*	32	'hair'	
mão	*mǎo*	26.3	'4th branch'	
mạo	*mào*	13.7	'forge'	
vương	*wáng*	96.0	'king'	
vãng	*wǎng*	60.5	'pass'	*w
vượng	*wàng*	72.4	'prosper'	
nam	*nán*	24.7	'south'	*n
năng	*néng*	72.17	'formerly'	
niệm	*niàn* (,)	61.4	'read aloud'	
dung	*yong*	53.8	'common'	
dũng	*yǒng*	19.7	'brave'	*y
dụng	*yòng*	101	'use'	
lô	*lú*	181.16	'skull'	
Lỗ	*lǔ*	195.4	'Shantung'	*l
lộ	*lù*	157.6	'road'	
ngư	*yú*	195	'fish'	
ngữ	*yǔ*	149	'language'	*ŋ
ngự	*yù*	60.9	'horsemanship'	
nhi	*ér*	126	'and yet'	
nhĩ	*ěr*	128	'ear'	
nhị	*èr*	7	'2'	*ɲ

The next group, exemplified in Table 4, are the HAN sounds, which point to original fricatives. These normally occur in borrowed Chinese words with five of the Vietnamese tones. Except for *h*, these all require comparative evidence to separate them from the reflexes of other sounds. If there were not at least five original tones, there

TABLE 4

*HAN Correspondences (*fricatives)*

Vietnamese spelling	Mandarin pronunciation (*pin yin* spelling)	radical. remaining strokes in character	gloss	
Hán	*hàn*	85.4	'Han'	
hạn	*hàn*	72.3	'drought'	
hanh	*heng*	8.5	'pervade'	
hàn	*hán*	40.9	'cold'	
hản	*hǎn*	27	'slope'	
hãn	*hǎn*	122.2	'rare'	
phú	*fù*	40.9	'wealthy'	*f
phụ	*fù*	88	'father'	*v
phu	*fu*	37.1	'husband'	*f
phù	*fú*	118.5	'amulet'	*v
phủ	*fǔ*	9.8	'bend down'	*f
phũ [?]	*fǔ*	69.4	'axe'	
thí	*shì*	149.6	'try'	
thị	*shì*	83	'clan'	
thi	*shi*	70.5	'bestow'	
thì	*shí*	72.6	'moment'	
thỉ	*shǐ*	152	'pig'	
hóa	*huà*	21.2	'change'	*h
họa	*huà*	102.7	'draw'	*ɦ
hoa	*hua*	140.4	'flower'	*h
hòa	*hé*	30.5	'harmony'	*ɦ
hỏa	*huǒ*	86	'fire'	*h
tứ	*sì*	31.2	'4'	*s
tự	*sì*	30.10	'heir'	*z
tuy	*sui*	120.7	'peaceful'	*s
Tùy	*suí*	170.9	'Sui'	*z
tử	*sǐ*	78.2	'die'	*s
số	*shù*	66.11	'number'	
sâm	*shan*	59	'feather'	
sở	*suǒ*	63.4	'office'	

had to be more than one Chinese source of *h*, and of each of these other sounds when corresponding to Mandarin as in Table 4. The 'low-register' tones are postulated as being the results of originally voiced fricatives. The words in *s* here correspond to Mandarin in a way that indicates a fricative without a voiced counterpart.

A distribution in only the tones that indicate voiceless sounds is characteristic also of the CH'ING group of initials, exemplified in Table 5. Here *kham*, etc., quite plausibly point to an aspirated /kh/. If disentangled comparatively from fricatives, *th* and *ph* seem to be fairly likely developments of other voiceless aspirates in the donor dialect. The letter *x*, a fairly unusual Vietnamese initial, represents an unknown quantity in Vietnamese historical phonology. At present the prevalent pronunciation is [s]; at the next earlier stage it was probably [sy]. One 1894 source describes it as an *ich-laut* — though we know not for what dialect. There is a single etymology, given

TABLE 5

*CH'ING Correspondences (*kh etc., voiceless aspirated stops and affricates)*

Vietnamese spelling	Mandarin pronunciation (*pin yin* spelling)	radical. remaining strokes in character	gloss	
kham	*kan*	32.9	'endure'	
khảm	*kăn*	32.4	'pit'	
khán	*kàn*	109.4	'examine'	
thư	*ci*	172.6	'female' [bird]	
thử	*cĭ*	77.2	'this'	
thứ	*cì*	76.2	'rank'	
tha	*ta*	9.3	'he'	
thổ	*tŭ*	32	'earth'	*th
thỏ	*tù*	10.6	'hare'	
xi	*chi*	30.10	'laugh at'	
xỉ	*chĭ*	211	'front tooth'	*ch[?]
xí	*chì*	86.12	'burn'	
khanh	*qing*	26.10	'minister'	
khoảnh	*qĭng*	181.2	'16 acres'	*kh
khánh	*qìng*	61.11	'celebrate'	
Thanh	*qing*	85.8	'Ch'ing'	
thỉnh	*qĭng*	77.2	'this'	*ts′
thú	*qù*	156.8	'delight'	
phanh	*peng*	86.7	'boil'	
phả	*pŏ*	30.2	'cannot'	*ph
phá	*pò*	112.5	'destroy'	
sung	*chong*	10.4	'satisfy'	
sủng	*chŏng*	40.17	'love'	
súng	*chòng*	167.6	'gun'	
sùng	*chóng*	46.8	'venerate'	

by Maspero in 1912, connecting the Vietnamese word for 'down' *xuống* with words in closely related *Mường* languages, as at the end of the examples. This suggests that the Vietnamese sound might have been just what would be convenient for taking over a Chinese aspirated palatal stop. The examples with *s* show a mess that is too complicated to put into the picture without extensive comparative work.

Vietnamese unaspirated stops in Chinese words commonly occur on five of the six tones, as in the case for the sounds taken earlier to be derived from fricatives. The ones that occur on the 'higher-register' tones and match the distribution of vowel-initial words like *y*, *ỷ*, *ý*, are here labled the CHOU group and taken to be reflexes of unaspirated stops or affricates (see Table 6). Assigning a point of articulation is fairly obvious except for *tr*. This reflex requires our positing another position, but there is not much evidence as to what. Trying to follow the Vietnamese sound upstream would make an ancestral [kl] as likely as anything at the time of borrowing. When some of these same sounds occur on the two 'lower-register' tones, indicating originally voiced sounds, I have labled them TH'ANG (Vietnamese *Đường* (see Table 7).Their

TABLE 6

*CHOU Correspondences (*plain stops)*

Vietnamese spelling	Mandarin pronunciation (*pin yin* spelling)	radical. remaining strokes in character	gloss	
ban	*ban*	96.6	'rank'	
bản	*băn*	75.4	'plank'	*p
bán	*bàn*	24.3	'half'	
đao	*dao*	18	'knife'	
đảo	*dăo*	46.7	'island'	*t
đáo	*dào*	18.6	'reach'	
tai	*zai*	75.6	'to plant'	
tải	*zăi*	159.6	'year'	*ts
tái	*zài*	13.4	'again'	
trung	*zhong*	2.3	'middle'	
trủng	*zhŏng*	32.10	'burial'	
trúng	*zhòng*	2.3	'attain'	
kê	*jī*	172.10	'chicken'	
kỷ	*jĭ*	49	'6th stem'	*k
ký	*jì*	40.8	'entrust'	
câu	*gou*	164.5	'entice'	
cẩu	*gŏu*	94.5	'dog'	*k
cấu	*gòu*	32.6	'filth'	
Chu	*zhou*	30.5	'Chou'	
chủ	*zhŭ*	3.4	'master'	*c
chú	*zhòu*	30.5	'incantation'	
y	*yi*	164.11	'medicine'	
ủ	*yĭ*	9.8	'rely on'	*?
ý	*yì*	61.9	'idea'	

TABLE 7

T'ANG Correspondences

Vietnamese spelling	Mandarin pronunciation (*pin yin* spelling)	radical. remaining strokes in character	gloss	
bàn	*pán*	108.10	'plate'	*pfi
bạn	*bàn*	9.5	'comrade'	
đào	*táo*	170.8	'mold'	*tfi
đạo	*dào*	162.9	'Way'	
tài	*cái*	154.3	'wealth'	*tsfi
tại	*zài*	32.3	'be at'	
trùng	*chóng*	142	'insect'	
trọng	*zhòng*	9.4	'second in a set'	
kì	*qí*	37.5	'strange'	*kfi
kị	*jì*	72.12	'give'	

subsequent entire coalescence with the plain stops in Vietnamese, with the distinction continued solely by the differing tones, seems most simply explained — as a second partially novel treatment — if the starting point was a voiceless stop followed by a voiced [fi], that is by a murmured release. The influence of this sound would have merely moved to later in the syllable to produce the modern situation. Something like this is still suggested, for that matter, by the way the *huyền* tone is commonly pronounced.

Vowels are far more complicated in their development (see Table 8). Here, the most interesting point to make — my third point — is that, in a given environment time after time, what is found as a predominant pattern is a set of just five possibilities,

TABLE 8

VOWELS

Vietnamese spelling	Mandarin pronunciation (*pin yin* spelling)	radical. remaining strokes in character	gloss	
cung	*gong*	57	'bow' [& arrow]	
công	*gong*	48	'workman'	
cương	*gang*	18.8	'inflexible'	
canh	*geng*	53.5	'7th stem'	
kinh	*jing*	8.6	'capital city'	
phủ	*fŭ*	9.8	'bend down'	
phổ	*pŭ*	85.7	'bank of a river'	
phả	*pŏ*	30.2	'cannot'	
hoa	*hua*	140.4	'flower'	
Lê	*lí*	75.8	'pear; Lê'	
ly	*lí*	172.11	'distant'	
lục	*lù*	113.8	'prosperity'	*u
lộc	*lù*	170.8	'dry land'	*o
lạc	*là*	140.9	'leave out'	*a
lặc	*lè*	19.9	'engrave'	*e
lịch	*lì*	77.12	'calendar'	*i
túy	*zùi*	164.8	'drunk'	*wi
tối	*zùi*	73.8	'extremely'	*oĭ
tái	*zài*	13.11	'again'	*aĭ
cảo	*găo*	120.10	'pure white silk'	*aŭ
cẩu	*gŏu*	94.5	'dog'	*eŭ
cửu	*jiŭ*	5.1	'9'	*iŭ
tứ	*sì*	31.2	'4'	*i
sư	*shi*	94.10	'lion'	*i
thư	*ci*	172.6	'female' [bird]	*i
lư	*lú*	86.16	'stove'	*u
lữ	*lŭ*	30.4	'pan-pipe'	*yu
cư	*ju*	44.5	'inhabit'	*yu
dõng	*yŏng*	19.7	'brave'	
vĩnh	*yŏng*	85.1	'eternal'	

For *x*: Vietnamese *xuông, Uý-lô Mường čoŋ', Mỹ-đức Mường t'uôŋ'*.

for which it is reasonable to reconstruct five donor vowels /a/ /e/ /i/ /o/ /u/. On purely Vietnamese evidence there is a residue; we would need another vowel as a source for Vietnamese *ư*. A modicum of comparative evidence, however, suggests that where this vowel is not a development of /i/ or /u/ in particular consonantal environments, it represents the development of /yu/ in final position. This limitation to a five-vowel system, if it should hold up under further examination, would be somewhat remarkable; this dialect would be so much more typologically normal than Mandarin, or Vietnamese, or the general picture of Ancient Chinese, of which the donor dialect must have been one particular rather late variant.

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DISCUSSION

TRUTENAU (Legon, Ghana)
Could you please tell us something more about the possible origin of the sound symbolized as *x*.

GAGE
I know of no reputable etymology tracing examples of *x* to either Mon-Khmer or Tai sources. There ought to be some examples, at least for Tai comparisons, since an aspirated palatal is fairly common in Tai languages, and I would expect there would have been one in Vietnamese at the time it was under heavy Tai influence.

[Professor Haudricourt pointed out that there is an additional Chinese source in some examples where an original Chinese [k^ha] gives Vietnamese *xa* in a way parallel to that in which [ka] gives *gia*.]