

An attempt at a family tree of Japanese dialect accentuation : As viewed from "class mergers" and "geographical distribution"

著者(英)	Munemasa TOKUGAWA
翻訳者(英)	Wayne Lawrence
校正者(英)	Timothy J. Vance
journal or publication title	Pioneering Linguistic Works in Japan
page range	1-19
year	2019-10
URL	http://doi.org/10.15084/00002240

**An Attempt at a Family Tree of Japanese Dialect
Accentuation
— As viewed from “class mergers” and “geographical
distribution” —**

TOKUGAWA Munemasa

It is unexpectedly difficult to prove whether an elderly person A and a young man B are parent and child or not. It is possible that the blood type may provide decisive evidence, but that is not always the case. It is necessary to check family registers, but this is not absolute proof. Even combining the results of both of these lines of inquiry, it is often the case that it is still insufficient. Of course, we cannot reach a conclusion merely by comparing appearances.

Whether such an analogy is appropriate or not, reconstructing the family tree of the accentuation systems of Japanese dialects, like tracing blood lines, is often not a simple matter. The results from multiple valid methods must be examined, and only then can the most trustworthy family tree be obtained.

When it comes to reconstructing an accentual family tree, the principle of “merger of accentual classes” can be considered to be comparable to using blood types when tracing blood lines, and “geographical distribution” is somewhat similar to the evidence of family registers. Of course, it would be overoptimistic to think that using only “class mergers” and “geographical distribution” would produce a complete reconstruction of the family tree. Even if a family tree can be reconstructed using only these two methods, there is no guarantee that it would be trustworthy.

However, it is unthinkable that the results of these two lines of inquiry to be explained below are not valid for contributing to a complete family tree of the accent systems of Japanese dialects. This essay is no doubt premature, but I would like to receive frank and forthright feedback from readers.

The data

Table 1 from Takeshi Shibata’s “The accent system of Japanese” in *Kokugogaku* 21 (1955).

The table in the entry “Dialects” by Haruhiko Kinda’ichi in *Sekai Daihyakka Jiten* [Heibonsha World Encyclopedia] vol.26 (1958).

Data provided in personal communications from Haruhiko Kinda’ichi and Yukihiro Yamaguchi.

The premises

This essay is written based on the following five premises.

- (1) The accentuation of only bimoraic nouns will be considered.
- (2) The accent systems of bimoraic words in all modern Japanese dialects derive from an accent system which distinguished five accentual classes. The principle of “accentual class merger”.
 - a. The five accentual classes (represented as 1/2/3/4/5 with four dividing lines) have been merging over time, and once classes have merged, they do not split and return to their original classes.
 - b. The accent system with five class distinctions will be called the “primary accent system”. An accent system where two of the original classes have merged (e.g. 1/23/4/5 with three dividing lines) will be called a “secondary accent system”. Further mergers resulting in a one-by-one reduction of dividing lines result in what will be called tertiary, quaternary

and quinary accent systems. For example, the Tokyo accent system is as follows:¹

*kaze*₁ LH-H 'wind', *tori*₁ LH-H 'bird', *hata*₂ LH-L 'flag', *hasi*₂ LH-L 'bridge', *yama*₃ LH-L 'mountain', *inu*₃ LH-L 'dog', *sora*₄ HL-L 'sky', *hasi*₄ HL-L 'chopsticks', *ame*₅ HL-L 'rain', *haru*₅ HL-L 'spring'.

In this essay this accentuation system is viewed as having classes 1, 2=3, 4=5, represented as 1/23/45, and this is classified as a tertiary accent system. The accentual system of Toyama city, according to the *Heibonsha World Encyclopedia*, is as follows:

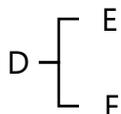
*kaze*₁ LH-H 'wind', *tori*₁ LH-H 'bird', *hata*₂ LH-L 'flag', *hasi*₂ HL-L 'bridge', *yama*₃ LH-L 'mountain', *inu*₃ HL-L 'dog', *sora*₄ LH-H 'sky', *hasi*₄ LH-H 'chopsticks', *ame*₅ LH-L 'rain', *haru*₅ HL-L 'spring'.

In this essay this system is viewed as having classes 1=4, 2=3=5, which is represented as 14/235 and is classified as a quaternary accent system. In this dialect, the class 2,3 and 5 words each distinguish between two pitch contours, but as they are of the same type (the degree of openness of the vowel in the second mora determines the pitch contour of each word in these classes), they can be grouped together from the viewpoint of "class merger".

The primary accent system changed into a secondary accent system through a class merger at some point in history. Further mergers produce tertiary and quaternary accent systems, and then finally the quinary accent system is reached. I will assume that mergers do not produce changes like a secondary accent system changing directly into a quaternary system.

Reconstruction of lineages from "geographical distribution".

- a. If several dialects have the same accent system A (viewed from the standpoint of mergers of accentual classes) and are located in a geographically neighbouring area to each other, it will be considered that these dialects descended from the same "parent" (i.e. accent system of a preceding period).
- b. If two different accent systems, B and C, are located geographically adjacent to each other, and through the principle of "accentual class merger" it can be considered that C derives from B, the family tree B — C is reconstructed.
- c. If two different accent systems, E and F, are located geographically adjacent to each other, and through the principle of "accentual class merger" it can be considered that both derive from a parent D, the following family tree is reconstructed.



In this essay, agreements of, similarities between, and differences in the actual pitch contours (rise or fall in pitch, etc.) are excluded from consideration.

Tables

From the viewpoint of "merger of accentual systems", there can be only one primary accent system. There are ten possible secondary accent systems, and these will be labelled with roman numerals. There are 25 possible tertiary accent systems, and these will be assigned upper case letters of the alphabet. There are 15 possible

quaternary accent systems, and these will be assigned lower case letters of the alphabet. There is only one possible quinary accent system.

The logically possible accent systems, from the viewpoint of “accent-class mergers”, are the following 52 types.

Table 1: Types of accent system

- Primary accent system (1 type)
1/2/3/4/5
- Secondary accent systems (10 types)

12/3/4/5 (i)	13/2/4/5 (ii)	14/2/3/5 (iii)	
15/2/3/4 (iv)	1/23/4/5 (v)	1/24/3/5 (vi)	
1/25/3/4 (vii)	1/2/34/5 (viii)	1/2/35/4 (ix)	
1/2/3/45 (x)			
- Tertiary accent systems (25 types)

1/2/345 (A)	1/3/245 (B)	1/235/4 (C)	1/234/5 (D)
145/2/3 (E)	135/2/4 (F)	134/2/5 (G)	125/3/4 (H)
124/3/5 (I)	123/4/5 (J)	12/34/5 (K)	13/24/5 (L)
14/23/5 (M)	12/35/4 (N)	13/25/4 (O)	15/23/4 (P)
12/3/45 (Q)	14/3/25 (R)	15/3/24 (S)	13/2/45 (T)
14/2/35 (U)	15/2/34 (V)	1/23/45 (W)	1/24/35 (X)
1/25/34 (Y)			
- Quaternary accent systems (15 types)

1/2345 (a)	2/1345 (b)	1245/3 (c)	1235/4 (d)
1234/5 (e)	12/345 (f)	13/245 (g)	14/235 (h)
15/234 (j)	145/23 (k)	135/24 (l)	134/25 (m)
125/34 (n)	124/35 (o)	123/45 (p)	
- Quinary accent system (1 type)
12345

It is not the case that there are $10 \times 25 \times 15 = 3750$ different paths from the primary accent system to the quinary accent system. For example, from the secondary accent system *v* it is impossible to change to the tertiary accent system *Q*. This is because whereas in *v* classes 2 and 3 have merged, *Q* distinguishes these two classes (note premise 3a above).

The primary accent system can give rise to any of the secondary accent systems, but each secondary accent system can only give rise to 6 types of tertiary accent system. Furthermore, each tertiary accent system can only give rise to 3 quaternary accent system types. In other words, the number of logically possible paths leading from the primary accent system to the quinary accent system is $10 \times 6 \times 3$ or a total of 180 pathways.

Table 2: Possible changes

- Pathways from the primary accent system to secondary accent systems
Primary accent system → i, ii, iii, iv, v, vi, vii, viii, ix, x
- Pathways from secondary accent systems to tertiary accent systems

i	→ H, I, J, K, N, Q	ii	→ F, G, J, L, O, T
iii	→ E, G, I, M, R, U	iv	→ E, F, H, P, S, V
v	→ C, D, J, M, P, W	vi	→ B, D, I, L, S, X
vii	→ B, C, H, O, R, Y	viii	→ A, D, G, K, V, Y

ix → A, C, F, N, U, X x → A, B, E, Q, T, W

- Pathways from tertiary accent systems to quaternary accent systems

A → a, b, f	B → a, c, g	C → a, d, h	D → a, e, j
E → b, c, k	F → b, d, l	G → b, e, m	H → c, d, n
I → c, e, o	J → d, e, p	K → e, f, n	L → e, g, l
M → e, h, k	N → d, f, o	O → d, g, m	P → d, j, k
Q → c, f, p	R → c, h, m	S → c, j, l	T → b, g, p
U → b, h, o	V → b, j, n	W → a, k, p	X → a, l, o
Y → a, e, n			

- Pathways from quaternary accent systems to quinary accent system
a, b, c, d, e, f, g, h, j, k, l, m, n, o, p → quinary accent system

By referring to Table 2, it is possible to trace the possible pathways from each accent system (excluding the primary accent system) back through history. For example, the tertiary accent system *W* (the accent system of Tokyo and elsewhere) can be assumed to derive from either *v* or *x*, and no other accent system, in a prior period of history.

However, because it takes some time to use Table 2, this information has been reorganised into the more easily accessible format below.

Table 3: Determining the parent

- Parent of secondary accent systems

i, ii, iii, iv, v, vi, vii, viii, ix, x ← primary accent system

- Parent of tertiary accent systems

A ← viii, ix, x	B ← vi, vii, x	C ← v, vii, ix	D ← v, vi, viii
E ← iii, iv, x	F ← ii, iv, ix	G ← ii, iii, viii	H ← i, iv, vii
I ← i, ii, vi	J ← i, ii, v	K ← i, viii	L ← ii, vi
M ← iii, v	N ← i, ix	O ← ii, vii	P ← iv, v
Q ← i, x	R ← iii, vii	S ← iv, vi	T ← ii, x
U ← iii, ix	V ← iv, viii	W ← v, x	X ← vi, ix
Y ← vii, viii			

- Parent of quaternary accent systems

a ← A, B, C, D, W, X, Y	b ← A, E, F, G, T, U, V		
c ← B, E, H, I, Q, R, S	d ← C, F, H, J, N, O, P		
e ← D, G, I, J, K, L, M	f ← A, K, N, Q	g ← B, L, O, T	
h ← C, M, R, U	j ← D, P, S, V	k ← E, M, P, W	l ← F, L, S, X
m ← G, O, R, Y	n ← H, K, V, Y	o ← I, N, U, X	p ← J, Q, T, W

- Parent of quinary accent systems

quinary accent system ← a, b, c, d, e, f, g, h, j, k, l, m, n, o, p

Above it was stated that there are 180 logically possible pathways for the primary accent system to have changed into the quinary accent system. However, it is inconceivable that all of these pathways in fact existed, and it is probable that only a fraction of these were actually used. The accent systems found thus far in the Japanese dialects are the following 17 types.

Primary accent system — 0²

Secondary accent systems — 2

Tertiary accent systems — 8

Quaternary accent systems — 6

Quinary accent systems — 1

It is not easy to work out family trees from only Tables 2 and 3, so these are supplemented here by two logically possible family trees. Only the pathways from the secondary accent systems to the quaternary accent systems will be given. The examples chosen are of the logically possible descendants of *v* and *x*, which are, as noted above, the two candidates for the parent of the Tokyo accent system *W*.

Table 4: Actual examples of logically possible family trees

(a) *v*
1/23/4/5

C			D			J			M			P			W		
1/235/4			1/234/5			123/4/5			14/23/5			15/23/4			1/23/45		
a	d	h	a	e	j	d	e	p	e	h	k	d	j	k	a	k	p
1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
/	2	4	/	2	5	2	2	2	2	4	4	2	5	4	/	4	2
2	3	/	2	3	/	3	3	3	3	/	5	3	/	5	2	5	3
3	5	2	3	4	2	5	4	/	4	2	/	5	2	/	3	/	/
4	/	3	4	/	3	/	/	4	/	3	2	/	3	2	4	2	4
5	4	5	5	5	4	4	5	5	5	5	3	4	4	3	5	3	5

(b) *x*
1/2/3/4/5

A			B			E			Q			T			W		
1/2/345			1/3/245			145/2/3			12/3/45			13/2/45			1/23/45		
a	b	f	a	c	g	b	c	k	c	f	p	b	g	p	a	k	p
1	2	1	1	1	1	2	1	1	1	1	1	2	1	1	1	1	1
/	/	2	/	2	3	/	2	4	2	2	2	/	3	2	/	4	2
2	1	/	2	4	/	1	4	5	4	/	3	1	/	3	2	5	3
3	3	3	3	5	2	3	5	/	5	3	/	3	2	/	3	/	/
4	4	4	4	/	4	4	/	2	/	4	4	4	4	4	4	2	4
5	5	5	5	3	5	5	3	3	3	5	5	5	5	5	5	3	5

Analysis

In order to reconstruct the family tree, we shall progress our analysis by firstly focussing on several smaller regions.

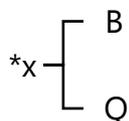
We will first look at the border region between the former feudal domains of Dewa and Koshi (refer Map 1). There are two *B*'s and three *Q*'s in close geographical proximity. The locations (from north to south) for *B* are Ōtori in Ōizumi village, Yamagata prefecture and Oku-Miomote in Miomote village, Niigata pref., and for *Q* they are Tsuruoka city in Yamagata pref., Nunobe in Miomote village, Niigata pref., and Oguni-machi in Yamagata pref. (Place names have been omitted from the following maps.)

B and *Q* are both tertiary accent systems. Can we consider this distribution in terms of premise 4-c? Let us use Table 3 to investigate the secondary accent systems which may be the parent of *B*, and those which may be the parent of *Q*. Table 3 gives:

B ← vi, vii, x

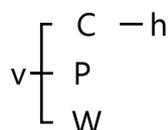
Q ← i, x

We can see that *x* is common to both. We can thus reconstruct the lineage of the accent systems of the Dewa and Koshi border region as follows, with accent systems which no longer exist marked with *.

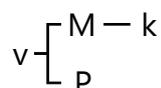


Now let us turn our attention to the Noto peninsula and vicinity (see Map 2). In this region we see one secondary accent system, three tertiary accent systems, and one quaternary accent system. Applying premise 4-b, we may consider the tertiary and quaternary accent systems to have derived from the secondary accent system *v*. For secondary accent system *v*, it is convenient to refer to Table 4a.

For Noto peninsula and vicinity, the following lineage will be reconstructed.



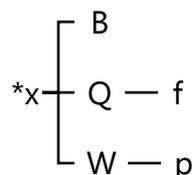
Let us next cross over to Sado island (see Map 3). Using the same methodology as for the Noto region to reconstruct a lineage, we obtain the following:



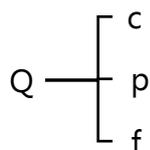
It is possible to consider that *k* derived from *P*, but because *M* is geographically closer, that option is selected.

Now how about the Kumano region (see Map 4)? We have a distribution where *v* is surrounded by *W* and *a*. The lineage reconstructed from Table 4a is *v* — *W* — *a*. We are not considering the actual phonetic contours, so the lineage is easily obtainable.

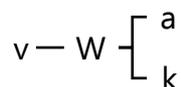
Next I would like to consider the wider geographical area of the whole of eastern Japan (see Map 5). *Q* exhibits a wide-ranging distribution, and it surrounds *W*. The *B* in the Dewa-Koshi border region has been analysed above. The quaternary accent systems on the map are *f* and *p*. The common parent of *B*, *Q* and *W* is, according to Table 3, *x*. Referring to Table 4b, we can reconstruct the lineage for this region as follows.



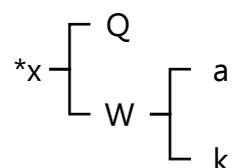
Next we will jump over to western Japan (see Map 6). Here there are a variety of accent systems intermingled. There is one secondary accent system, three tertiary, and five quaternary accent systems. Let us first look at Kyushu. Is it possible to view *Q* as the parent of the quaternary accent systems of *c*, *f* and *p*? Looking at Table 2 or Table 4b, we can see that that will work. The lineage is as follows.



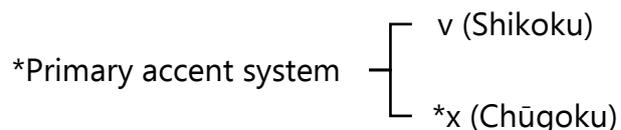
Next is Shikoku. Applying premises 4-b and 4-c, the lineage will be:



The Chūgoku region will probably be:

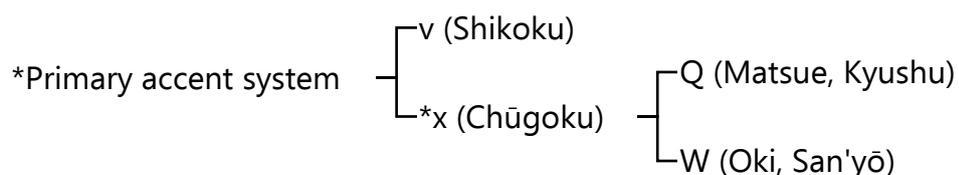


Now we need to combine these three lineages. The Shikoku and Chūgoku lineages both start with secondary accent systems, so these can easily be combined as:



The problem is the Kyushu accent system. What secondary accent system would be the parent of the Kyushu accent system? Possible parents for *Q* are, according to Table 3, *i* and *x*. It is not immediately clear which of these is the parent. Let us recall that we have proposed that the Chūgoku accent systems reconstruct back to *x*. It is true that the Kammon Straits lie between Nagato in the Chūgoku region and the Buzen and Chikuzen regions in Kyushu, so the two regions are not contiguous. However, Shimonoseki (western Yamaguchi pref. in Chūgoku) and Moji (north-eastern Kyushu) are but a stone's throw from each other. For this reason, it is reasonable to consider that, at some point in the past, because the region as far west as Yamaguchi pref. was *x*, the Kyushu accent system was also *x* (and not *i*) at some point. At least as far as language is concerned, it is a little strange to say that a region is necessarily split by the existence of a strait.

In this way, the family tree for western Japanese accent systems can be drawn together as follows:

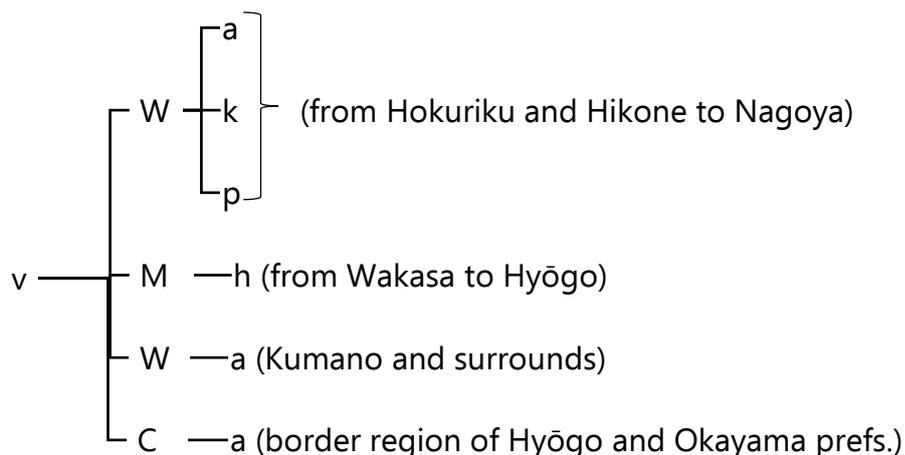


On the subject of the San'yō region, if the Kammon Strait does not sever the continuity of a region, we should also be able to say that the Seto Inland Sea does

not sever the continuity of a region. If so, it is possible that the *W* of the San'yō region is the result of a change from the *v* of Shikoku. However, I believe that it is reasonable to consider that dialects with the common parent accent system *x* formed a continuum from Oki through to Kyushu. If San'yō's *W* is viewed as a descendant of Shikoku's *v*, then the *x* continuum would be split. Rather than saying that the San'in *x* and Kyushu *x* (or possibly *i*?) had independently developed from the primary accent system, it is more realistic to say that, at some point in the past, there was just one accent system *x* which covered a wide geographical area.

Regarding the southwestern corner of Shikoku, it is possible that the *x* region once straddled the Bungo channel and extended as far as southwestern Shikoku (in other words, that modern southwest Shikoku's *W*, *a* and *k* derive from *x*). This more likely than San'yō's *W* being a descendant of *v*. Here the *v* region is not split. However, I will not adopt this view, although some doubt remains. Southwestern Shikoku's *a* and *k* are of course distinct from *W*, but rather than saying that this *W* is related to San'yō's *W* (which is a descendant of *x*), it is more reasonable from the viewpoint of "geographical distribution" to view its parent as Shikoku's *v*.

The accentual situation in central Japan is complex (see Map 7). In this region two types of secondary accent system, six tertiary accent systems and four quaternary accent systems are used. However, if we exclude the Chūgoku and Shikoku regions from consideration for the moment, it is not difficult to reconstruct *v*, which is now found centring on Kyoto and Osaka, as the parent. Incorporating the *C* of Okayama pref. into the family tree gives the following:



The Hokuriku accent system forms, in this way, a continuum with the Noto region accent system discussed above.

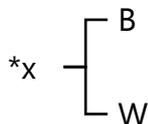
In the northeastern corner of Shikoku we have the secondary accent system *ii* — this is completely different from the *v* accent system seen elsewhere. *ii* and its descendants are related as below.



The *J* system here could also be considered to have derived from *v*, but from the viewpoint of "geographical distribution", I consider it to be a development from *ii*.

The *v* in southeast Shikoku is a continuation of the *v* across the Kii channel in Wakayama pref., and furthermore we can see that it connects with the accent system of the western half of Shikoku as analysed above.

How should the *B* and *W* of Tottori and Okayama prefectures be treated? Both of these accent systems have to be considered to be the result of changes from *x* according to Table 3. From this it becomes evident that the accent systems of both of these prefectures form a continuum with the accent system of the Chūgoku area discussed above.



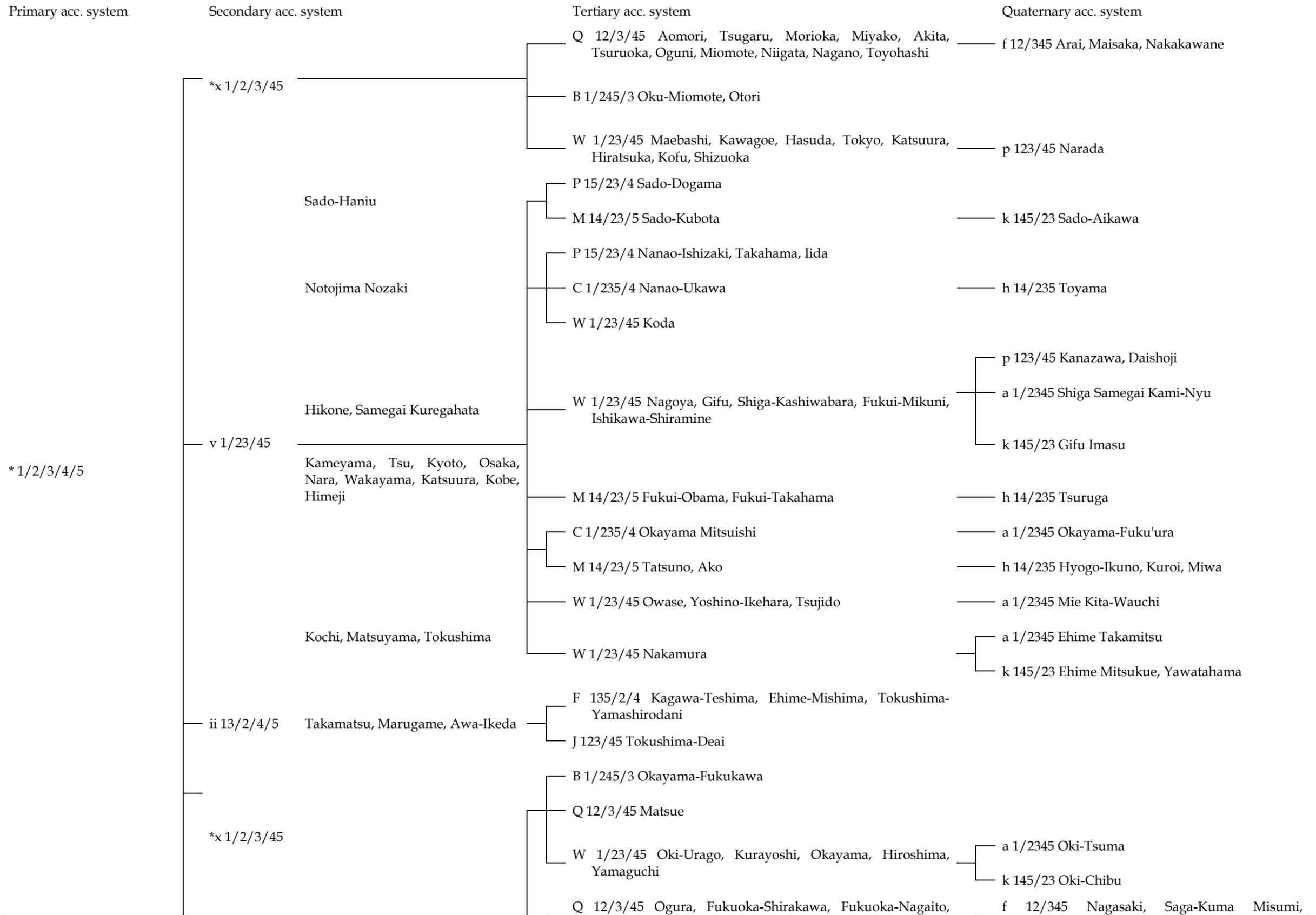
W can probably also be viewed as having developed from *v*. However, this cannot be accepted from the viewpoint of “geographical distribution”. (If *B* were not present there, it would have been difficult to decide between the two options.)

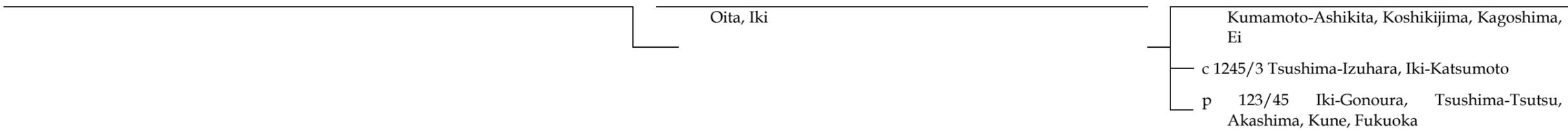
With regard to this region of Japan, the most problematic area is actually the *W* (and *a* and *k* which are its descendants) from the eastern border of Shiga pref. south to Nagoya. Are these descendants of *v*? Thinking back to our analysis of the accent systems of eastern Japan, we saw that the area along the Japan Alps as far as the west side of Lake Hamanako was a **x* region. From “geographical distribution”, is it possible that the *W* system of Gifu and Nagoya descends from **x*? This seems to be a real possibility. (If it is the case, then the Hokuriku region’s *W* and *p* might also be removed from the *v* lineage.) It is difficult to decide. *W* is sandwiched between the *v* region and the **x* region, so it could have developed from either. However I will assign these accent systems to the *v* lineage. From “geographical distribution” it is relatively certain that the *W* at the eastern border of Shiga pref. descends from *v*. Because the Gifu/Nagoya *W* is a continuation of the eastern Shiga *W*, it can similarly be considered to derive from *v*. Premise 4-b does not decide between the two options, so 4-a has been co-opted.

Conclusion — The lineage of the accent systems of Japanese dialects

In Section 4 we travelled around Japan reconstructing the lineage for each region. In this section we will draw these together into a family tree which is the lineage of the accent systems of Japanese dialects. Connecting the eastern Japanese accent systems with its subgroup of the Dewa-Koshi border region accent systems, the central Japan accent systems with the accent systems of the Noto peninsula and vicinity, and the various lineages of the western Japanese accent systems provides a model of the procedures followed. Explanations of the procedural detail behind this synthesis are omitted.

From this family tree it becomes clear that the accent systems of Japanese dialects should be grouped genealogically into four main lineages. These can be called the eastern Japan accent group, the central Japan accent group, the northeastern Shikoku accent group, and the western Japan accent group.



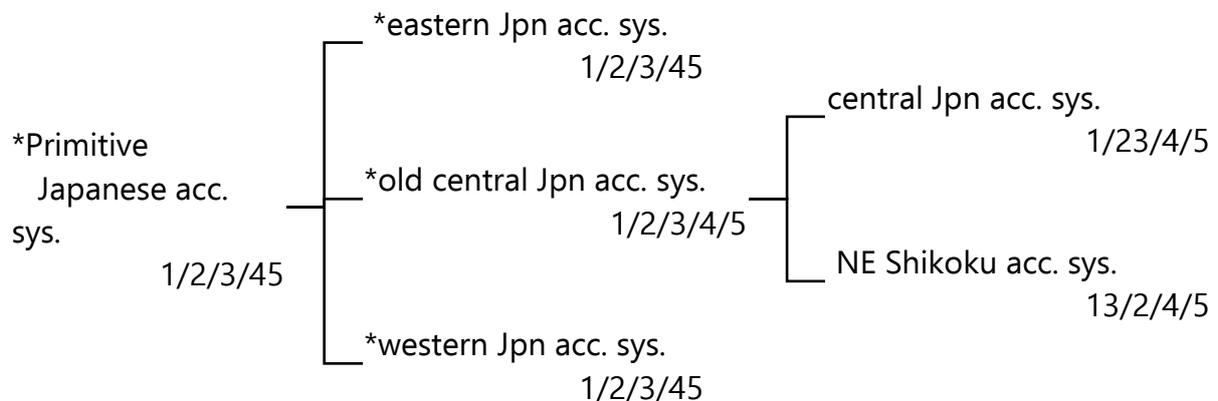


Supplementary notes

Premise 1 — I will not specifically define the terms bimoraic, noun, and accent. For these and other undefined terms, please refer to *Kokugogaku Jiten* ([Dictionary of Japanese linguistics] Tōkyōdō, 1955). For the reconstruction of the family tree of the accent systems of Japanese dialects, it is not enough to use only bimoraic nouns. Eventually mono- and tri-moraic nouns and other parts of speech will need to be considered.

Premise 2 — I stated that five accentual classes is the oldest system which can be inferred based on currently available materials, but this may be premature. We can, however, say that none of these five classes were formed anew at some point in history. Firstly, we cannot find any modern data which is relevant to the origin of any of the class distinctions. Secondly, these distinctions are found throughout Japan. For example, the distinction between classes 1 and 2 is found from Ōtori, Yamagata pref. and Oku-Miomote in Niigata pref. in the east to Obi and Yamaguchi in the west. The distinction between classes 2 and 4 is found from Aomori in the north to Okinawa in the south. These “geographical distributions” indicate that each class distinction is of great age. The same applies in the cases of the other eight distinctions (class 1 distinguished from class 3, class 1 from class 4, etc.).

However, the status of the distinction between classes 4 and 5 is subject to some doubt. The distinction exists (or there is evidence of it having once existed) only in one continuous area in central Japan, which hints at a recent development. If the distinction between these two classes was conditioned (for example, if the degree of aperture of the vowel in the second mora conditioned the split) at a certain point in the past, the earliest stage of our family tree will have to be amended to the following.



Alternatively, it is possible that either the western Japanese accent system or the eastern Japanese accent system descended from the old central Japanese accent system.

Premise 3a — In the previous supplementary note it was stated that “none of these five classes were formed anew at some point in history”. Two or more classes which have completely merged cannot split again into the original cases. If they appear to have split into the original classes, we should assume that in the preceding stage the merger was not complete.

An accent class (or a class which is the result of mergers) can split, and actual examples of this exist. That the original accent class distinctions always head in the direction of merging does not mean that new classes cannot be created. However, it is thought that the class distinctions (except for class 5) were not the traces of the oldest accent distinctions, those of so-called Primitive-Japanese, for the following reasons. Firstly, there are facts currently known that appear to be related to a class split. Secondly, we can identify specific regions where the same kind of split has

taken place. For example, in the accent system of the Toyama city dialect, given in section 2, classes 2, 3 and 5 merged, but then later split to form a new distinction based on the degree of aperture of the vowel in the second mora.

I would like to point out that in this essay I am assuming that all accent system changes have occurred due to language-internal causes, and there were no changes due to external influences. If we consider changes due to external influence, then it is in fact possible for a once lost distinction between accent classes to be restored. Not recognising changes due to external influences is going counter to reality, but I believe that it is not without meaning to seek to explain phenomena assuming that there has been no external influence. Rather than interpreting a phenomenon as a whole, I believe it is more scientific to first break the phenomenon down into component parts, analyse them, and then synthesise them into a whole. How changes due to external influences arise, and what position they occupy in contrast to language-internal changes, are topics for future research.

Premise 3b — It could be imagined that the primary accent system could change to a tertiary or quaternary accent system in one step. For example, let us say that the primary accent system was: class 1 LL-H; class 2 LH-H; class 3 LL-H and LH-H; class 4 LL-H and LH-L; and class 5 LH-H and LH-L. If LH-H were to change to LH-L, the primary accent system would become the tertiary accent system of class 1 LL-H, classes 2 and 5 LH-L, classes 3 and 4 LL-H and LH-L. If the LH-H of the primary accent system were to change to LL-H, we would have to say that the primary accent system would have changed into a quaternary accent system. However, in this essay it will be assumed that this kind of change does not occur.

Premise 4 — Due to a lack of data, there are cases where, using only these premises, uncertainty arises. Please refer to the analysis in Section 4 for the region from the eastern border of Shiga pref. south to the Nagoya region, and southwest Shikoku. If more data becomes available, it may well be that these uncertainties will be resolved. However, on the other hand, it can be envisaged that, as the available data increases, other uncertainties may arise in other regions.

Premise 5 — If the results of this essay are valid, taking into consideration the actual pitch contours of the accent classes in each dialect would increase the persuasiveness of this essay. This is an exercise for the future.

Analysis: Dewa-Koshi border region — The horizontal lines in Map 1 mark a region with a so-called “1-class accent system”. From the viewpoint of mergers of accent classes, this is the quinary accent system. In this essay I have not included the quinary accent system. The reason for this is that the quinary accent system is the final stage of accent-class mergers, and no matter which path is taken, in the end all paths lead to it. Looked at the other way, all quaternary accent systems can be the parent of the 1-class accent system. With any accent system being able to be the parent (i.e. direct ancestor), there is no way to draw up a family tree. This is because there are many instances where the premise of “geographical distribution” fails to be relevant.

I should add that not all quinary accent systems are necessarily 1-class accent systems. There may be dialects where there are accentual classes unrelated to the original accent classes. (For example, an accent system where nouns from each of the original classes can be pronounced as LH-H and LH-L.)

Analysis: Sado — According to Haruhiko Kinda’ichi (personal communication), the localities in Map 3 marked as *v* and *M* all have the 145/23 accent system. He also points out that the *P* accent system is also found in Ogi town, Takachi and Sotokaifu. If this is the case, we will have $P - k$.

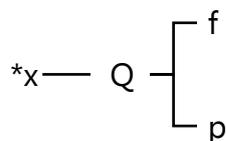
What will be the secondary system that produced *P*? It was because we had both *P* and *M* that we could reconstruct *v*, but with *M* no longer present, we have a problem. If we view Sado as being geographically adjacent to Etchū and Noto, we

could reconstruct *v — P — k, but there remains some uncertainty.

Analysis: Eastern Japan — From this essay it is expected that the theory that the Tokyo accent system derived from the Kyoto/Osaka-type accent system will be amended. In Map 5, the line of *Q*'s from Niigata city through Nagano city to Toyohashi city and environs is somewhat ill-defined. It is possible that south of Nagano city *W*'s may be found which would join up with the Kantō area and the *W*'s of Gifu and Nagoya. In fact in my fieldwork it seems that the Shinano Ōmachi city accent system may be *W*, casting further doubt on the standard theory of the relationship between the Tokyo accent system and the Kyoto/Osaka-type accent system. However, if it is accepted that the accent system of the Kyoto/Osaka region which was the direct ancestor of the Tokyo accent system was not *v* but was instead the primary accent system, then that would be a different matter.

Be that as it may, I am unable to accept the standard view of accentologists which classifies *Q* and *W* together as the Tokyo-type accent system (and the same goes for the *Q* in the San'in region and Kyushu). Finally, the inclusion of three localities in Shizuoka pref. with the *f* accent system is thanks to a personal communication from Yukihiro Yamaguchi.

Analysis: Western Japan — According to Haruhiko Kinda'ichi (p.c.), the *p* on Iki island (Gōnoura) in Map 6 should be *Q*. If this is accepted, *p* will disappear from Iki. The Ryukyuan dialects have accent systems of types *Q*, *f*, *p* and 1-class accent systems, according to Yukio Uemura's "Overview of the accentuation of 1- and 2-mora nouns in Ryukyuan dialects" (*Kokuritsu Kokugo Kenkyūjo Ronshū* 1, 1959). If the Ryukyuan dialects have a connection to the Kyushu dialects, these would have descended from *x*, as follows.



Analysis: Central Japan — According to the *Sekai Daihyakka Jiten* [Heibonsha World Encyclopedia], the Kanazawa city accent system is: class 1 LH-L and HL-L; class 2 LH-L; class 3 LH-L and HL-L; classes 4 and 5 LH-H. This seems like it should be classified as *T*. However, H. Kinda'ichi informs me that the Kanazawa city dialect system is not 13/2/45, but instead probably 123/45, where for the merged 123 class the words have split according to the quality of the second mora. If the second mora vowel is narrow and the consonant is voiced, it is HL, and otherwise it is LH. Segmentally identical words are not distinguished accentually. I adopt this here.

In Map 7, Obama and Takahama in Wakasa are both given as *M* (Obama is taken from *Kokugogaku* 21 p.46, 1955), but H. Kinda'ichi shared the following with me, so I am somewhat relieved. Kinda'ichi agrees with separating the Nagoya, Gifu and Kashiwabara dialects' accent system from the accent system of Tokyo and the like and grouping them with the Kinki (Kyoto/Osaka-type) dialects, considering their similarity to dialects such as Kōda, Totsukawa and Nakamura.

On the eastern Japanese accent system and the ancient Eastern Japanese dialects — I have named the dialect systems east of the line joining Niigata city, Nagano city and Toyohashi city the eastern Japanese accent (lineage), distinguishing them from the accent lineage west of the line. With regard to this, Professor Misao Tōjō expressed the opinion that there might be a connection with the Eastern Japanese dialect dating back to the 8th century *Man'yōshū* anthology. This is an intriguing possibility. To this I respond as follows: (1) It is possible there is a connection between the fact that the modern eastern Japanese accent systems and the central

accent systems are of different lineages and the establishment of the ancient Eastern Japanese dialects; (2) However, at present it is impossible to prove whether, in the 8th century, eastern Japanese accent systems and central Japanese accent systems had already gone their separate ways; (3) But on the other hand, even if the two had not yet split, if there was a difference in their phonetic tonal contours, this difference could have led to the formation of an awareness of the ancient Eastern/Central Japanese dialect divide. However, this issue is outside of the scope of this essay.

In the process of writing this paper, I received valuable data and opinions from Haruhiko Kinda'ichi, Takeshi Shibata, Tatsuo Miyajima and Yukihiro Yamaguchi. I take this opportunity to express my appreciation to them.

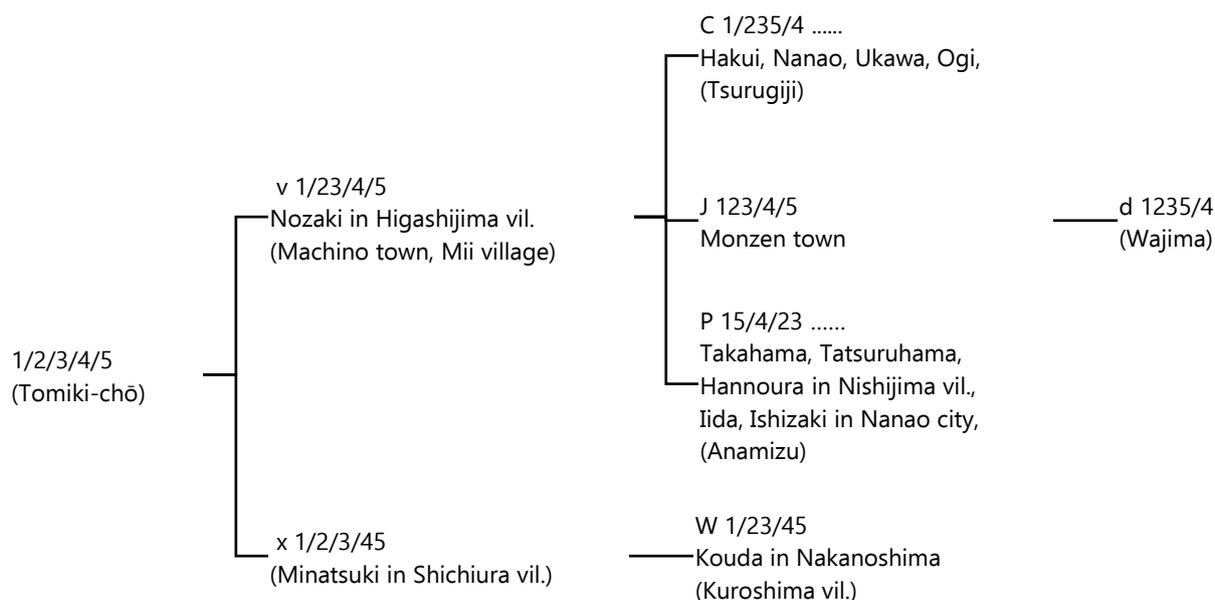
(30 Jan., 1962)

After submitting this paper, there were several parts I wanted to correct and elaborate upon. I am grateful to the editorial department and the printer for giving me the opportunity to do this here.

(1) *Hinoemata in Fukushima pref.* — According to Ichirō Ōshima's "The accentuation and boundary of the southwestern part of Fukushima pref." (*Kokugo Kenkyū* 1, Kokugakuin University, 1952), in the Hinoemata region there is found the 123/45 (or *p*) accent system. This can be added to the family tree. It can be assumed to be a descendant of the Kanto area's *W*.

(2) *Noto* — I add data from League of Nine Academic Societies (1955) *Noto* and complete the family tree below. The parts linked with dotted lines are relationships which, from the "geographical distribution", I do not want to adopt, but they should be considered. The accent systems of the localities given in parentheses are so-called obscure accent systems.³

The primary accent system of Togi town⁴ and the *d* system of Wajima are rare (only known from these two localities). The *x* system of Minatsuki in Shichiura village is geographically odd, but this is an obscure accent system dialect so should possibly be excluded from the family tree.



Western border region of Gifu pref. — According to Takeshi Shibata's "The accentuation of upstream Ibigawa river" (*Nihongo no akusento*, Nihon Hōgen Gakkai (ed.), 1942), in this region five accent systems are intermingled.

v is found in Higashi-Tsugumi, Nishi-Tsugumi and Hirose.

B is found in Ozu.

W is found in Ōgaki city, Akasaka-chō, Kanō, Miyaji, Kuni, Kojima, Ibi-chō, Wakamatsu, Wakamiya, Otohara, Soto-Tsugumi and Nissaka.

a is found in Higashi-Yokohama, Nishi-Yokohama, Hirui in Aohaka village, and Yamichi.

b is found in Tarui and Kawaue.

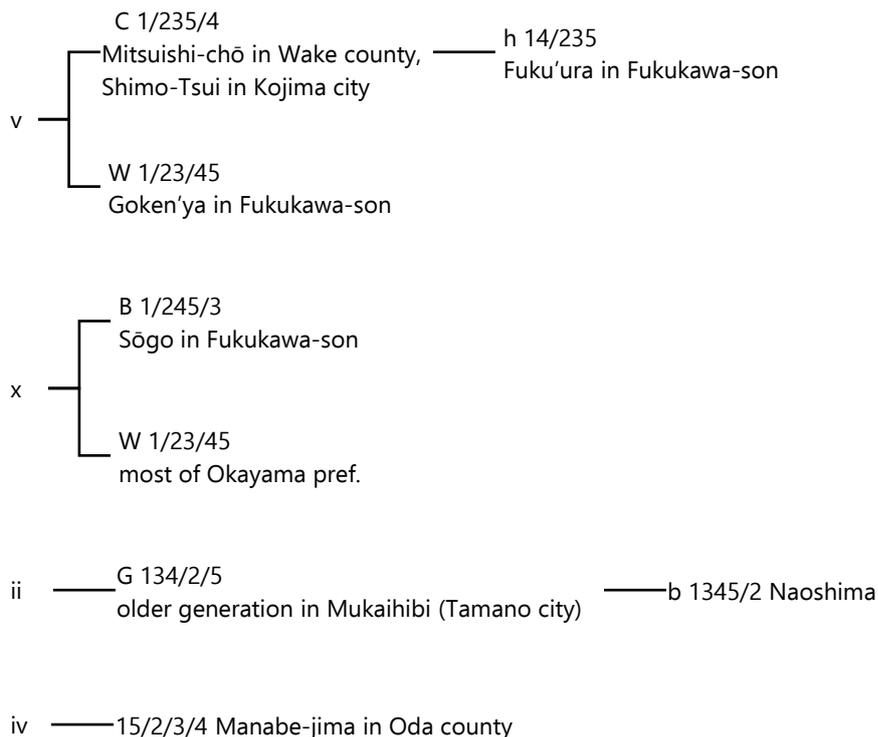
When it comes to reconstructing the family tree, the *B* accent system of Ozu deserves attention. In the main text of this essay, east of this region as far as the eastern border of the Mikawa region was presented as being in the central Japanese accentuation region. The Ozu data require us to revise this analysis. *B* cannot have come from *v*, so we need to exclude this locality and what lies east of it from the central Japanese accent region.

This being the case, what lineage should *B* be placed in? I am of the opinion that it should be connected to the Nagoya and Gifu *W* and placed as a descendant of *x*. Where then is the boundary between the central Japanese accent region and the eastern Japanese accent region? In the main text I drew the line west of Toyohashi, but now I would place the line between Ozu and Higashi-Tsugumi in the north and between Akasaka-chō and Tarui in the south, thus moving the line quite a distance to the west. The Higashi-Tsugumi accent system is *v*, and the Tarui system is *h*, so they cannot be descendants of *x*, and thus west of this area cannot be considered to be of the eastern Japanese accent lineage. And in the opposite direction, east of this line contains *B* which cannot be of central Japanese lineage, so there is nothing stopping it being classified in the eastern Japanese lineage.

The central-Japanese/eastern-Japanese boundary may be further revised in the future, but for the present we can recognise the boundary as being located as described above. (I am unfortunately unable to provide a revised map, so I ask readers to refer back to the main text or a map for details.) I note that between Akasaka-chō and Tarui is an *a* accent system area, but it is unclear which lineage this belongs to, so I defer a decision on this region.

Looked at on a national scale, including the large part of Gifu pref. in the eastern Japanese accent lineage gives rise to the possibility that the Echizen/Kaga accent system should also be included in the eastern Japanese accent lineage. However I believe this possibility is negated by at least the following considerations: (1) If the Echizen/Kaga area systems were eastern Japanese, this would mean that the central Japanese accent region would be non-contiguous with a break between Noto on the one hand and the Kinki region and elsewhere on the other; (2) In this case, taking into account the existence of mountain ranges, geographical continuity should probably not be given so much importance. I will continue to view the Echizen/Kaga dialects as being of central Japanese accent lineage.

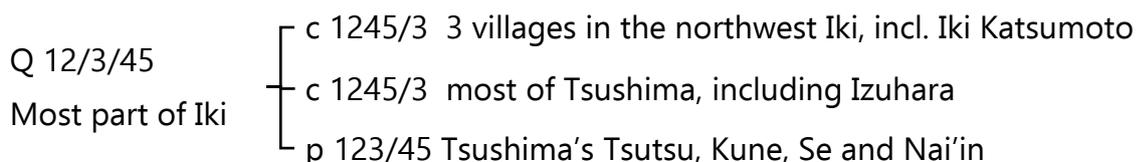
From the southern shore of Okayama pref. to northeastern Shikoku — Using Kichijirō Mushiaki's "The accentuation of Okayama pref." (*Okayama-ken no Kenkyū* 1, 1954), I supplement and correct the family tree for this region as follows.



I would like to draw attention to the following points. (1) The accentuation of Shimo-Tsui is fluid, so there is some doubt as to whether it should be classified as *C*. Also, although it is historically an important port, there is some doubt from geographical perspective. (2) The *h* of Fuku'ura can alternatively be considered to be a descendant of the *M* in Hyogo pref. (3) The *W* of Goken'ya may alternatively be a descendant of *x*.

Manabe-jima's *iv*, Mukaihibi's *G* and Naoshima's *b* are all rare accent systems which are attested only in these localities. Manabe-jima's *iv* cannot be tied into either the northeastern Shikoku lineage or the western Japanese lineage, so it is probably necessary to create a new Manabe-jima accent lineage. It is only one location, but it can be considered to be the fifth lineage in the family tree of Japanese accent systems. Regarding the Naoshima accent system, according to H. Kinda'ichi (personal communication), Setsuko Sogō has investigated the dialect and she records it as *O* 13/4/25. It is unclear which system is to be accepted (*O* is also rare), but, either way, there is no doubt it is a descendant of *ii*.

Iki and Tsushima — The table in *Kokugogaku* 21 (1955) which I used for the main text appears to be based on a table submitted by H. Kinda'ichi to *Jimbun* 1 (1951). I will correct and complete the data here based on the League of Nine Academic Societies' 1954 report *Tsushima*.



The publication of new data — As seen above, the publication of new data has resulted in a large number of revisions, and no doubt further corrections and additions will be made in the future. When I look back on the brilliant history of Japanese accent research, it seems to me that using just the first

two tables in this paper is somewhat insufficient. I should probably have put more work into it.

However, to be honest, rather than refining the family tree in the light of newly published data, I am now more interested in (1) the theoretical question of how the procedures used in reconstructing this kind of family tree interact with the traditional research methodology which explains similarities and differences in form; (2) the linguistic-geographical analysis in order to elucidate the complicated distribution seen in the regions where different lineages come into contact (the western border of Gifu pref., and the eastern border of Okayama pref. down to the northeastern part of Shikoku); (3) application of the same methodology to the accent systems of forms other than bimoraic nouns, and comparing it with the results of this paper. I hope that Japanese language research will also make strong progress in these areas.

Items 1, 2, 4 and 5 of the addendum to this paper were written based on input from Haruhiko Kinda'ichi. I express my gratitude for his guidance.

(20 May, 1962)

Translator's notes

¹ In what follows, L represents a low-toned mora, and H represents a high-toned mora. The tone after the hyphen is that of a following mono-moraic particle. The subscript number associated with the noun is the historical accentual class of that noun.

² Shūko Seno'o published a paper in 1966 demonstrating that the dialect of Ibuki-jima in the Inland Sea was a primary accent system, and this has been confirmed by later researchers.

³ An obscure accent system is an accent system where there are accent classes, but the distinction between classes is unclear. Typically the same word may be pronounced with the pitch contours of multiple classes. It is the stage immediately before losing the class distinctions altogether and becoming a quinary accent system.

⁴ It is now known that the Togi town accent system is not a primary accent system. Its accent system is reported to be very similar to that of Hakui, making it C.

ORIGINAL PAPER

TOKUGAWA, Munemasa, 1962, "Nihongo sho-hōgen akusento-no keifu" shiron: "rui-no tōgō"-to "chiri-teki bumpu"-kara miru, *Gakushūin Daigaku Kokugo Kokubungaku Kaishi* 6, pp. 1-19.

Translated by Wayne Lawrence (The University of Auckland)

Proofed by Timothy J. Vance (Komatsu University)

Original ver.	English ver.		Original ver.	English ver.	
I	i	1 2/3/4/5	a	a	1/2 3 4 5
II	ii	1 3/2/4/5	b	b	1 3 4 5/2
III	iii	1 4/2/3/5	c	c	1 2 4 5/3
IV	iv	1 5/2/3/4	d	d	1 2 3 5/4
V	v	1/2 3/4/5	e	e	1 2 3 4/5
VI	vi	1/2 4/3/5	f	f	1 2/3 4 5
VII	vii	1/2 5/3/4	g	g	1 3/2 4 5
VIII	viii	1/2/3 4/5	h	h	1 4/2 3 5
IX	ix	1/2/3 5/4	i	j	1 5/2 3 4
X	x	1/2/3/4 5	j	k	1 4 5/2 3
			k	l	1 3 5/2 4
イ	A	1/2/3 4 5	l	m	1 3 4/2 5
ロ	B	1/2 4 5/3	m	n	1 2 5/3 4
ハ	C	1/2 3 5/4	n	o	1 2 4/3 5
ニ	D	1/2 3 4/5	o	p	1 2 3/4 5
ホ	E	1 4 5/2/3			
へ	F	1 3 5/2/4			
ト	G	1 3 4/2/5			
チ	H	1 2 5/3/4			
リ	I	1 2 4/3/5			
ヌ	J	1 2 3/4/5			
ル	K	1 2/3 4/5			
ヲ	L	1 3/2 4/5			
ワ	M	1 4/2 3/5			
カ	N	1 2/3 5/4			
ヨ	O	1 3/2 5/4			
タ	P	1 5/2 3/4			
レ	Q	1 2/3/4 5			
ソ	R	1 4/3/2 5			
ツ	S	1 5/3/2 4			
ネ	T	1 3/2/4 5			
ナ	U	1 4/2/3 5			
ラ	V	1 5/2/3 4			
ム	W	1/2 3/4 5			
ウ	X	1/2 4/3 5			
キ	Y	1/2 5/3 4			