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MORE ON NASAL LOSS ON THE NORTHWEST COAST

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This paper is intended as a sequel to Thompson and Thompson (1972; further relevant references can be found there), which detailed the known occurrence and distribution of voiced stops derived from nasals in Northwest Coast languages. In that paper, the authors pointed out (among other things) that there are six languages in the Northwest where there are (essentially) no nasals, but what would have been nasals in the proto-languages have shifted to corresponding voiced stops. They also note that some of these same languages have also developed other voiced stops from other sources, creating a new manner series among the consonants. Questions that were not answered in an entirely satisfactory way, however, were why just these particular languages lost nasals, and how it happened that they are not even all contiguous. Old data newly re-examined suggest some answers to these questions, and allow a slightly different interpretation of the linguistic situation in the Northwest.

The languages in which the nasal to voiced stop shift has occurred pervasively are Twana and Lushootseed on Puget Sound (both Salishan languages) and Quileute (Chimakuan), Makah and Nitinat (Wakashan) at the northwest corner of the Olympic Peninsula and the opposite coast of Vancouver Island. Thompson and Thompson also note that Sapir "reports <u>b</u> <u>d</u> as optional positional variants of <u>m</u> <u>n</u>" (1972:448) in Comox, which was spoken well up Georgia Strait in yet a third area. Although the Northwest Coast is well-known for its areal features occurring across language boundaries, why would this particular shift have occurred independently in three non-contiguous parts of this region? The answer seems to be that it did not, and although the (probably earlier) development of other voiced stops may have helped enable the shift, their presence was probably not instrumental in its coming about. Nor does one have to rely on putative population shifts as an explanation. What seems to have been the case is that there was a continuum of languages

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from Comox in the north to Twana and Lushootseed in the south on Puget Sound, and extending out the Strait of Juan de Fuca and down the Pacific Coast at least to the Columbia River where nasals were sometimes pronounced without full closure of the velum. Boas describes pronunciation in Lower Chinook (as pointed out by Thompson and Thompson in a footnote; 1972:450) as involving "much confusion regarding surds and sonants, not only because the sonant has greater stress than our sonant, but also on account of the occurrence of a labial sound with semiclosure of the nose and weak lip-closure, which is therefore intermediate between \underline{b} , \underline{m} , and \underline{w} , with prevalent \underline{m} character. Between vowels the sound approaches a \underline{b} . The occurrence of \underline{d} is also doubtful" (Boas 1911:565).

As stated, Sapir indicated the occurrence of voiced stops for nasals in Comox. But, in fact, so did Boas in his earliest transcriptions from this area made in 1886. And Boas and others indicated them in several other languages of the area where subsequent records show no more trace of them. I first became aware of this in going over his Pentlatch materials (also collected in 1886), and being puzzled by his putting a subscript dot beneath m or n in a number of instances. But the word for 'lightning' provides the explanation. This Boas wrote first as la lbem, but subsequently with m for the b. What Boas was hearing, and trying to represent (at this stage he was still formulating a transcription system for Northwest languages), was a sound that he later described for Chinook (as quoted above). Upon realizing what this peculiar transcription represented, I looked at microfilms of other early records made by Boas of languages of this area and found an identical situation in Comox, Sechelt (where Boas' writing the occasional b or d had earlier been pointed out to me by R. C. Beaumont), and two dialects of Halkomelem (Nanaimo on Vancouver Island and Scowlitz well up the Fraser River). I noted only two instances in his Clallam material, but that is enough to indicate that the trait was there. But I did not spot any in his Squamish or his Northern Straits (Lkungen-Songish) materials, and J. V. Powell says there are none in his Chemakum materials. (This leaves only Nooksack in this part of the area, and there seem to be no early records of this language.) Thus there was a continuous distribution (with a gap only at

Northern Straits and Chemakum) of these sounds that were apparently intermediate between (or which varied freely between) nasals and voiced stops from Comox to the southern end of Puget Sound and out the Strait of Juan de Fuca to the Pacific Ocean. Furthermore, there is evidence that the situation was the same between Quileute and Lower Chinook in both Quinault and Lower Chehalis. Livingston Farrand in 1897 obtained some Quinault data, and his notes show a few instances of d where n would be expected, and one recording of a final m preceded by a small raised b; most of these \underline{n} 's are word-final (one is written dn), often in the morpheme -ton 'instrumental' (but no instances of these voiced stops occur in Quinault data obtained in 1916 by James Teit or in 1963 by James Gibson). Several instances of d for n (nearly all word-final) also occur in Myron Eells' notes on Lower Chehalis from 1882; Boas rechecked these, and where he gives his own transcription wrote a final t, except in one case where he has n. These sounds then settled out as voiced stops in six languages, but reverted to pure nasals in the rest. This settling-out process may have occurred a little earlier in Squamish, Northern Straits, and Chemakum, which could account for the lack of indication of the presence of the intermediate sounds there.

Hypothesizing intermediate sounds for the whole region can also help to explain another problem--the occurrence of place names around Puget Sound from Lushootseed and Twana with nasals in the English versions. If at the period of earliest white contact the sounds were still intermediate, they would have been heard sometimes as nasals, sometimes as voiced stops, or more like one or the other. Thus Snohomish, Skykomish, Snoqualmie, Swinomish, Suquamish, Muckleshoot, Tacoma, Steilacoom, Nisqually, and Twana all have nasals, but Dosewallips has a voiced stop, and Duwamish even has one of each. But this hypothesis does raise a new question. Hess (1982) shows that Lushootseed uses nasals for <u>b</u> or <u>d</u> when speaking endearingly to children or pets, in some diminutives, or to provide an archaic flavor to speech. If the two types of sounds were earlier not distinguished, how would this situation have arisen in a language that has rapidly declined in use over the past century? It seems fairly certain that this phenomenon did not have a wider distribution than that delineated above (unless it extended on south of Chinook). Spread north of Comox was blocked by the Northern Wakashan languages, which have a three-way contrast among stops already, one of which is voiced stops, in addition to nasals. There is no evidence that Interior Salishan languages to the east or Upper Chehalis and Cowlitz to the south ever had this characteristic. Thus it is nicely hemmed in, except for Nootka on up the west coast of Vancouver Island from Nitinat. Within this area, there were at least twelve languages that had a sound intermediate between nasals and voiced stops--a rather unusual sound that was lost as it settled out in one direction or the other, presumably under the influence of English, where the sounds are in contrast. Just why some languages settled on nasals and others on voiced stops is not clear; Thompson and Thompson (1972) provide extensive discussion of this point, and I will not speculate on it further here.

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A Grassmann's Law for Salish* Laurence C. Thompson and M. Terry Thompson University of Hawaii

0. Introductory. Among the 23 languages of the Salish family¹, four show dissimilation rules that are very similar in spirit to those which Grassmann¹ noted as alike in Greek and Sanskrit. Where the Indo-European cases concern deaspiration, the Salishan rules involve mainly deglottalization, but the principle is obviously the same. In all the languages there is a series of glottalized stops (and affricates) corresponding to plain (unglottalized) counterparts, and the glottalized elements are replaced by those unglottalized counterparts when there is a glottalized element later in the stem. One of the languages has recently developed a contrast between aspirated and unaspirated stops. In that language, in reduplicative prefixes, underlying aspirated stops are deaspirated before the stem aspirate, behavior precisely corresponding to Grassmann's Law.

Now again as in the Indo-European situation, the languages involved are found in two quite separate areas, and there seems every indication that the dissimilation rules, despite their similarities, have developed independently in the two areas. We should like to show here the details of these cases and suggest that the phenomenon reflects a universally available principle likely to be found operative in other language families as well.

The languages involved (see map) are three Interior Salish languages (Kalispel, Okanagan, and Shuswap) on the one hand, and on the other Tillamook, an outlier of the family whose closest relationship is to the Central Coast subgroup.³

1. Interior Salish Deglottalization. Just as in Greek and Sanskrit, the effects of the dissimilation are observable partly only in comparative terms, but to some extent morpheme structure rules demonstrate the principle, and the effects also show up as alternations in paradigmatic material. Since reduplication is widely used in all the languages, reduplicated derivatives furnish good synchronic evidence.

1.1. Shuswap, spoken over a large area of south-central British Columbia, shows the most systematic and thoroughgoing applications of the principle. Gibson (1973:16) states the morphophonemic alternations for an eastern dialect. Kuipers (1974a), based mainly on western dialects, covers also the morpheme structure conventions. It is convenient to quote from the latter (p. 23; abbreviations are K any obstruent, R any resonant, V any vowel):

If a root has the shape $K_1 V K_2$, $K_1 V R K_3$, $K_1 R V K_2$, and K_3 is glottalized, then K_1 is never glottalized. In any type of reduplication, the first occurrence of a reduplicated obstruent is never glottalized.

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