

of the word family have frequently been added with this ultimate objective in mind.

I. $a \sim e/e \sim a$

A. Guttural S(tem) I(nitial)s

1. *skam(-po)* "dry" \sim *skem(-po)* "id."
 IIIA: *skam/skom*
2. *mk'an* (in cpds.) "who knows a thing thoroughly" \sim *mk'yen (-pa)* to know" (resp.)
3. *gañ(-ba)* "full" \sim *hgeñs(-pa)* "to fill", *hk'eñs(-pa)* "to be full"
 IIIA: *gañ/skoñ*
 VIA: *hgeñs/hk'eñs/skoñ*
4. *gre(-ba)* "throat", *sgreg(-pa)* "to belch" \sim *hgrag(s)(-pa)* "to utter a sound"
 IIIA: *hgrag(s)/sgrog*
5. *dga(-ba)* "to rejoice" \sim *dgyes(-pa)* "id."
 IVA: *dga/mgu*
6. *hges(-pa)* "to split, cleave, divide" \sim *hgas(-pa)* "to be cleft or split"
7. *rga(-ba)* "to be old" \sim *hgre(-ba)* "to grow old"
 IIIA: *rgan/rgon*
 IVA: *rga/rgud*

B. Palatal S.I.s

1. *ljags* "tongue" (resp.) [*ldag-pa*] "to lick" \sim *lce* "id."
2. *nyal(-ba)* "to lie down, to sleep" [*rnal* "rest"] \sim *mnyel(-ba)* "to get tired" (resp.), *bsnyel(-ba)* "to forget" (resp.)
 IIIB: *nyal/snyol*
 VIB: *snyol/bsnyel*

C. Dental S.I.s

1. *rten(-pa)* "to hold, lean on" \sim *brtan(-pa)* "firm, steadfast"
2. *ltam(s)(-pa)* "to be full" \sim *ltem(-po)* "full"
 see also ex. 3
3. *t'am(-pa)* "complete", *t'ams* (in *t'ams-cad*) "whole, all" \sim *t'em(-pa)* "to be full", *t'eb* "full"
 see also ex. 2
4. *drañ(-po)* (< **nrañ*) "straight" \sim *hdren(-pa)* (< **hdreñ* < **hnreñ?*) "to draw, drag, pull"
 IIA: *drañ/riñ*, see also note 2
5. *hdabs* (< **hldabs*¹) "side" \sim *ldebs* "id."

¹ I hope to deal with the loss of the *l* on another occasion. *hdabs* is obviously a derivative of *hdab* "wing (=the 'folds' [of a bird]), petal, leaf", which on its part belongs with *ltab-pa* "to fold" and with *lo-ma* (Western Tibetan *lob-ma*) "leaf".

VOWEL ALTERNATION IN TIBETAN

by WALTER SIMON

The present survey of vowel alternations in Tibetan is tentative. It has taken all possible alternations into account (ten, not counting the "inversions"). One of them (see Section VII) is represented by one example only. Vowel alternations which can be observed in the "parts of the verb" have been excluded, as they have already been studied by other scholars. Vowel alternations occurring in compounds such as *gya-gyu*, *ya-yo*, *kyañ-kyoñ*, *snyag-snyig*, *tog-tag*, *ldam-ldum*, etc. have likewise been omitted as they deserve special treatment.

Jäschke has already directed our attention to certain vowel alternations, the most frequent of them being $a \sim o$. In about half of the cases suggested by me in Section III, he has pointed to relevant cognate words by cross-referencing them in his dictionary. Occasional references have been made by him to four further alternations $a \sim e$ (Section I), $a \sim u$ (Section IV), $e \sim o$ (Section VI) and o/u (Section X).

It will be observed that in a number of cases words ending in a plosive (-g, -d, -b) or a nasal (-n, -ñ), have been compared with words ending in a vowel. Though it is likely that originally these latter words also ended in a (homorganic) consonant, I have refrained from attempting any reconstruction as this would have involved discussion of the whole word family concerned. But as a similar list of words set out in the *Addenda* to Jäschke's Grammar by A. H. Francke (assisted by W. Simon, Berlin 1929, pp. 120-1), (where words ending in a vowel alternate with words ending in dental plosives or nasals) did not include cases with simultaneous vowel alternation, special reference may be made here to alternations like *glā/glud* (Section IVA), *rko*, *rkod/rked* (Section VIA), or *rna/rno*, *rnon* (Section IIIC).

One final point to be raised in these preliminary remarks is the ambivalence of the alternations indicated in the Section-Headings by following up each alternation by its repetition in inverse order. The assignment of any word or set of words to the left-hand position does not necessarily mean that the word on the left is to be regarded as the etymon and the word on the right as its derivative. The problem of the primary or secondary nature of the vowel—if developments of such nature are likely to have taken place—will have to be studied in the light of both semantic considerations and the constitution of the specific word family. Cross-references to other members

6. *sna* "nose, end, hem" ~ *sne(-mo)* "extremity, end, hem"
7. *gzar* "peg, hook, wooden nail", *hdzar(-ba)* "to hang up, to hang over" ~ *gzar, zer* "nail", *mdzer(-pa)*, *hdzer(-pa)* "knot, excrescence, wart"
8. *sel(-ba)* "to remove, to cleanse, to clear" ~ *gsal(-ba)* "to be clear, bright", *bśal(-ba)* "to wash"

D. Labial S.I.s

1. *p'al(-pa)* "usual, common" ~ *hp'el(-ba)* *spel(-ba)* "[to become or to make common =] to increase, to multiply"
2. *bam(-pa)* "rotten, decayed, putrid" ~ *bem(-po)* "dead matter"
3. *hbab(-pa)* "to descend" ~ *hbabs(-pa)* "to cast down"
IVc: *hbab/hbub*
4. *hbrañ(-ba)* "to follow" ~ *hbren(-ba)* "id."
IIb: *hbrañ/hbriñ*
5. *sbed(-pa)* "to hide" ~ *sba(-ba)* "privy parts"
6. *rmað(-pa)* "to wonder" ~ *rmed(-pa)*, *smed(-pa)* "to ask"
7. *smar(-ba)*, *smra(-ba)* "to speak, talk" ~ *smre(-ba)* "to wail, lament"

E. H, Y, R, L, H as S.I.s

1. *lhams* (in *lhams-kyis*) "at once, all" ~ *lhem* "instantly, all"
2. *lhas(-ma)* "wicker-work" ~ *lhes(-ma)* "id."

II. a~i/i~a

A. Dental S.I.s

1. *t'ag* "rope" ~ *t'ig* "carpenter's cord, line"
2. *t'al(-mo)* "palm of the hand" ~ *mt'il* (in *lag-mt'il*) "id."^{1a}
3. *drañ(-po)* (< *nrañ*²) "straight" ~ *riñ* (< **nriñ*²) "long"
VIII: *sroñ~sriñ*

^{1a} See also below IIIc, ex. 6.

² The ancient Tibetan *hđriñ*, occurring in the phrase *glo-ba hđriñ* "disloyal", has rightly been proposed as "definitely related to the so-called adjective *ring*, 'long, distant' " by Professor Li Fang-Kuei (see his paper in *Studia Serica Bernhard Karlgren dedicata*, Copenhagen, 1959, p. 58). The assumption of an original initial cluster *nr-* in the case of both *riñ* and *drañ-po*, the latter a derivative of *hdren-pa* "to draw, to draw tight", whose "Perfect" is in fact *drañ*, may be supported by the parallel development of the cluster *nr-*: We witness *nr-* in *reñ* [< **nreñ*] "stiff" and *hgren(-ba)* "to stand" [< **hāren*], the *nr-* in *reñ* to be confirmed by its Chinese counterpart *ning* 凝 of identical meaning, going back to *ngieng* (Karlgren, *Grammata Serica Recensa*, No. 956a), see "Tibetan Lexicography and etymological research" in *Transactions of the Philological Society*, 1964 (1965), 105. See also below VIa: *hgren/hgroñ* and VIe: *reñ/ro* Cf. also note 41. Re the phrase *glo-ba riñs* see also F. W. Thomas, *Tibetan literary texts*, III (1955), pp. 27 and 34 of the 'Addenda' and the entries *glo-ba riñs* (p. 121) and *riñs* (p. 182) of the 'Tibetan Vocabulary'. The collocation *glo-ba riñ(s)-ba* occurs also in later texts: See *hDzañs-blun* (ed. I. J. Schmidt, 1843, p. 36¹ (misunderstood in his translation, p. 44⁷), and *Vinayakśudrakavastu*, Ch. 34, Ti. T. XLIV, 1550⁸ (Schiefner-Ralston, *Tibetan Tales*, 1926, p. 183²⁵⁻²⁸).

4. *hdam* "mud, mire, swamp" ~ *hjim(-pa)* "mud, clay, loam"
5. *ldañ(-ba)* "to rise, get up" ~ *ldiñ(-ba)* "(to be on top =) to be swimming, floating, to be suspended (in the air), soaring"
6. *ts'a(-ba)* "to be hot, heat" ~ *hts'ig(-pa)* "to burn"
7. *rdza* "clay" ~ *rdzi(-ba)* "to press, knead"³

IXa: *rdzi/rdzu*Xc: *rdzub/rdzob*

B. Labial S.I.s

1. *p'yag-dar* "sweeping"⁴ ~ *p'yi-bdar* (or: *p'yi-brdar*), *byi-dor* "cleaning"
2. *hbrañ(-ba)* "to follow" ~ *hbriñ(-ba)* "middle, middling, moderate"⁵
ID: *hbrañ/hbren*
3. *rmi* (in *rmi-lam*) "dream" ~ *rmañ* (in *rmañ-lam*) "id."
VIIIb: *rmi/rmoñ*
IXc: *rmi/rmus, rmugs*

C H, Y, R, L, H as S.I.s

1. *ra(-ba)* "enclosure, fence wall"⁶ ~ *rib(-ma)*⁷ "id."

III. a~o/o~a

A. Guttural S.I.s

1. *klañ(-pa)* "to mend, to patch" ~ *kloñ(-pa)* "id."
see ex. 12 and also IVa: *gla/glud*
2. *rkañ(-pa)* "foot" ~ *rkyoñ(-ba)* "to stretch, extend"⁸

3. With *rdzu-ba* "to give a deceptive appearance" and *rdzun* "falsehood, lie, fiction" being further cognates, this word family recalls Latin *fungo* "to knead, mould, shape and to devise, contrive, invent, feign", *figulus* "potter", *fictilis* "make of clay", Cp. *Asia Major*, n.s. I, pp. 5-6 and n. 1.

⁴ *p'yag-ma* "broom, duster, mop" (according to Jäschke listed in native dictionaries as well as being used in Central Tibet).

⁵ Cp. Latin *secundus* from *sequi* "to follow".

⁶ The idea of fence or wall as a "limiting line" is reflected in *rab* "eldest of three sons", in *rab-tu* "(to the limit =) very", and in *rabs* "lineage". With the 'causative' *s-* prefix we witness *srab* "bridle" and *sri-ba* "to retain (as urine, etc.)". The verb *srabs-pa* "to be exhausted", a synonym of *zad-pa* and *btugs-pa*, occurs in the following passage, referring to *loñs-spyod* "property, wealth", which also confirms the translation of *gtugs-pa* (*btugs-pa*) as a synonym of *zad-pa*, queried by Jäschke in his *Dictionary* (p. 207b): (Ti. T. XLIII, 220b⁶ = N. hDul/Nya 363B⁹) *dehi loñs-spyod-dag srabs-pa dañ/yoñsu zad-pa dañ/yoñsu btugs-pa gyur-to*. *Srabs-pa* "(to use to the limit =) to exhaust" has apparently not been listed in our dictionaries. *ri* "mountain" may perhaps also belong here ("mountain wall").

⁷ *rib-ma*, noted only as 'colloquial' in Jäschke, occurs in fact in texts of classical Tibetan (see, e.g., Nobel, *Udrāyana*, pt. 2, 1955, p. 73).

⁸ Jäschke (*Dictionary*) notes the variants *rkyañ(-ba)* and *rgyañ(-ba)*. *rgyañ-ma* "distance" and *rgyañs* "far" also belong here.

3. *rko(-ba)* "to dig" ~ *rka* "furrow"
VIA: *rko/rked*
4. *skabs* "time, opportunity" ~ *skobs* "id."
5. *skam(-po)* "dry" ~ *skom* "thirst"
IA: *skam/skem*
6. *hk'ad(-pa)* "to sit firm, stick fast" ~ *hk'od(-pa)* "to sit, dwell, to be placed, established"⁹
7. *gañ(-ba)* "full" ~ *skoñ(-ba)* "to fulfil"
IA: *gañ/hgeñs, hk'eñs*;
VIA: *hgeñs, hk'eñs/skoñ*
8. *gar* "dance"¹⁰ ~ *gor(-mo)* "round, circular"
9. *grag(-pa)* "noise, rumour, talk", *hgrag(s)(-pa)* "to utter a sound" ~ *hgrog(-pa)* "to cry, shout", *sgrog(-pa)* "to call, call out"
IA: *gre/hgrag(s)*
10. *gral* "row (as in 'front-row', etc.), class, series" ~ *rol* "furrow; side (in cpds.)"
11. (*h*)*grags(-pa)*¹¹ "to bind" ~ *hgrog(-pa)* "to bind, tie, to be associated"
12. *b(s)grad(-pa)* "to open wide"; (with *rkañ(-pa)* "leg") "to part the legs wide, to straddle" ~ *hgrol(-ba)*, *bgrod(-pa)* "to walk"¹²
13. *glan/glon* = *klañ/klon* (ex. 1)
14. *rgan(-po)* "old man" ~ *rgon(-mo?)* "old woman"¹³
IA: *rga/hgre*
IVA: *rga/rgud*
15. *rgal(-ba)* "to cross" ~ *sgrol(-ba)* "to ferry across"¹⁴

B. Palatal S.I.s

1. *cag* "termination of the plural of personal pronoun" ~ *cog* "id." (in *ho-cog*, plural of *ho* "this"¹⁵)
2. *hc'a(-ba)* "to make, propose, instruct" ~ *hc'os(-pa)* "id."

⁹ In the last two meanings *hk'od(-pa)* is used 'like a passive to *hgod(-pa)*' (Jäschke, *Dict.*).

¹⁰ About other members of this word family cp. *Asia Major*, n. s. I, 1949, pp. 9-10.

¹¹ Cp. also *grog(-po)* "friend", *sgrog(s)* "fetters".

¹² *bgrod* "gait", *hgros* "going, walking", *hgron(-po)* "traveller, guest, foreigner" also belong here.

¹³ I. J. Schmidt's entry *rgan rgon gnyis* "both the old man and the old woman" has been queried by Jäschke (*Dictionary*, p. 103), but upheld by Das (*Dictionary*, p. 301). Sumatiratna gives the translation of "old men and old women" (*ebüget emeget*) to the compound *rgan rgon*.

¹⁴ The 'Present' *sgral* also occurs (see *Asia Major*, n.s., I, p. 13, n. 1). *sgrol(-ba)* "to rescue, deliver, save", though appearing in one and the same entry in Jäschke's dictionary, belongs with *hgrol(-ba)* (Pf. *grol*) "to become free" and *hgrol(-ba)* (Pf. *bkrol*) "to liberate, untie".

¹⁵ Cp. *BSOAS* X (1942), p. 970 and n. 5. See also here below XD: *ho/hu*.

3. *hc'ag(-pa)*¹⁶ "to break (vb. n.)" ~ *gcog(-pa)* "to break (trs.)"
4. *nyal(-ba)* "to lie down" ~ *snyol(-ba)* "to lay down"
IB: *nyal/mnyel, bsnyel*
VIB: *snyol/bsnyel*
5. *mnyam(-pa)* "equal" ~ *snyom(s)(-pa)* "to level, equalize"
6. *zoñ*¹⁷ "lower, nether" ~ *gžañ* "anus"
7. *šva* (in *k'a-šva*¹⁸) "harelip" ~ *šo* (in *k'a-šo*) "id."
8. *šam* (in *šam-du*) "below" ~ *hjoms(-pa)* "(to lay low =) to conquer, subdue"
9. *šoñ(-ba)*¹⁹ "to go to stool" ~ *bsañ(-ba)* "alvine discharge"
10. (*g*)*šad(-pa)* "to comb" ~ *gsod(-pa)* "id."

C. Dental S.I.s

1. *t'ad* "direction straight forward" ~ *gtod(-pa)* (also *gtad(-pa)*) "to direct, turn"
2. *t'ar(-ba)* "to become free, get through" ~ *gtor(-ba)* "to strew, scatter"²⁰
VIC: *ster/gtor*
3. *t'a(-ma)* "last, lowest", *mt'a* "end, margin, brim" ~ *mt'o(-ba)* "height", *mt'on(-po)* "high"
4. *dañ* "with" ~ *sdoñ(-ba)* "to unite, join"
5. *bdag(-po)* "proprietor, master" ~ *bdog(-pa)* "to be possessed of"
6. *hdogs(-pa)* "to bind, fasten, tie, attach" ~ *t'ag(-pa)* "rope", *t'ags* "texture", *ht'ag(-pa)* "to weave"^{20a}
7. *ldañ(-ba)*, *lañ(-ba)* "to rise" ~ *slon(-ba)* (also *slañ(-ba)*) [*< *sdoñ, *sdlañ*] "to cause to rise"
8. *nan*²¹ "act of pressing, pressure" ~ (*g*)*non(-pa)* "to press, oppress"
9. *snam(-pa)*²² "to smell", *mnam(-pa)* "to smell of" ~ *snom(-pa)* "to smell (perceive by the nose)"
XD: *snom/snum*
10. *rna(-ba)* "ear"²³ ~ *rno(-ba)*, *rnon(-po)* "sharp"
11. *rnag* "matter, pus" ~ (*r*)*nyog(-pa)* "soiled, muddy"

¹⁶ *c'a* "part, portion, share" and *c'ag(-po)* "broken vessel, potsherd" also belong here.

¹⁷ Cp. also ex. 9.

¹⁸ Cp. "Tibetan 'Fifteen' and 'Eighteen'" in *Études Tibétaines dédiées à la mémoire de Marcelle Lalou*, Paris, 1971, p. 477.

¹⁹ Cp. also ex. 6.

²⁰ *gtor(-ma)* "strewing oblation", *ht'or(-ba)* "to be scattered", *stor(-ba)* "to be lost, go astray" also belong here.

^{20a} See also above IIA, ex. 1.

²¹ Cp. also *sne(-pa)* "to hurt, harm, injure" and *gnod(-pa)* "id.". *na(-ba)* "to be ill" and *nad* "disease" also belong here.

²² Obviously derivation of *sna* "nose" (cp. IC: *sna/sne*). Cp. also *snabs* "mucus, snivel, snot".

²³ For other members of the word family see 'Ear, sharp and hearing' in 'W. B. Henning Memorial Volume', London, 1970, pp. 406-8.

12. *ts'ab*²⁴ "(stop-gap=) representative, substitute", *hst'ab(-pa)* "to repay" ~ *gsob(-pa)* (< **gtsob*) "to fill out, repay"
13. *mts'an(-ma)* "sign, mark, token" ~ *mts'on* ("marker, pointer=) fore-finger²⁵, pointed instrument, weapon"
14. *hst'al(-ba)* "to want, wish, desire, ask" ~ *hst'ol(-ba)* "to seek, search, try to obtain", *gsol(-ba)* (*gtsol*) "to request"
15. *rdzab* (in *rdzab-rdzub*) "sham, emptiness, falsehood" ~ *rdzob(-po or -mo)* "vain, empty, spurious"
- IIA: *rdza/rdzi*
IXB: *rdzi/rdzu*
16. *bzad(-pa)* (< **bdzad*) ~ (rare alternative of) *bzod(-pa)* (< **bdzod*) "to suffer, bear, endure", *mdzod*²⁶ "store-house, magazine"
- VIC: *mdzod/bzed, mjed, hdzed*
17. *sa* "(earth), place, spot" ~ *so* "id." (in conjunction with certain words, see Jäschke, Dict., p. 578a)
18. *sron(-ba)*²⁷ "to straighten" ~ *srañ* "street; pair of scales", *bsrañ(-po)* "straight, upright"

D. Labial S.L.s

1. *p'an(-ba)*, (*h*)*p'añs(-pa)* "to spare, save, use economy" ~ *hp'oñs(-pa)* "to be poor"
2. *spañ* "to abandon" ~ *spañ* "id."
3. *p'yag* (< **p'lag*)²⁸ "hand" (resp.) ~ *p'yogs* "side"^{28a}
- IIIE: *lag/logs*
VIIIb: *p'yogs/p'yi*
4. *hbyañ(-ba)* "to clean, cleanse, purify" ~ *hbyoñ(-ba)* "to be cleaned", *hbyog(-pa)* "to clean out (by scraping or licking)"²⁹
5. *rma* "wound", *rma(-ba)* "to wound" ~ *rmo(-ba)*, *rmod(-pa)* "(to wound the earth³⁰=) to plough"
- VID: *rmo/rmed*

²⁴ For other members of the word family see "Tibetan *gseb* and cognate words" in *BSOAS*, XX, 1957, pp. 523-532. See also *Transactions of the Philological Society*, 1964 (1965), p. 105.

²⁵ Note Chinese *tsuen* 寸 "thumb" (Karlgren, *GSR* 431 a-b: *ts'wən*) as the obvious correspondence.

²⁶ The idea of "holding" suggests itself as semantic link between *mdzod* "store-house" (= "holder") and *bzad*, *bzod* "to endure" (= "to hold out") to which (see below under VIC) *bzed* "container", *hdzed* "to hold out or forth", and *mjed* "suffering" must be added.

²⁷ A derivative of *drañ-po* "straight". See Note 2 to IIA: *drañ/rñ*.

²⁸ Cp. *Transactions of the Philological Society*, 1964 (1965), p. 103.

^{28a} From the semantic point of view, cf. English "on every hand" for "on all sides".

²⁹ *TPS*, 1964 (1965), pp. 106-7.

³⁰ In support of this etymology the sentence *bii li shang tuu fa jy shiah* 彼犁傷土環之下 from the *For been shyng jyi jing* 佛本行集經 (*Taishō Tripitaka* III No. 190, p. 705c²⁵) may be adduced.

6. *smad* "lower part" ~ *smod(-pa)* "(to run down=) to blame"
7. *smān* "medicine, drug" ~ *smyon(-pa)* "(drugged=) insane, frantic, mad"

E. H, Y, R, L, H as S.I.s

1. *lag* "hand" ~ *logs* "side"
- IIID: *p'yag/p'yogs*
2. *rīan* "moisture, humidity" ~ *rīon(-pa)* "to moisten, make wet"
3. *rīabs*³¹ "(swell=) flood" ~ *rīom(-pa)*³² "(have a swelled head=) to be proud"

IV. a~u/u~a

A. Guttural S.I.s

1. *gru* (< **ñru*)³³ "angle/corner" ~ *grva* (< **ñrva*) "id."
- IVD: *ru/rva*
2. *grub(-pa)* "make ready, complete, perfect, state of perfection", *hgrub(-pa)* "to be made ready" ~ *grabs* "preparation, arrangements"
3. *glā*³⁴ "pay, wages, fee" ~ *glud* "ransom"
- IIIA: *kīan/kīon; glā/glon*
4. *dga(-ba)* "to rejoice" ~ *mgu(-ba)* "id."
- IA: *dga/dgyes*
5. *hgran(-pa)* "to vie with" ~ *sgrun(-pa)* "id."
6. *rgad(-pa)* "oid" ~ *rgud(-pa)* "to decline, sink (especially with old age)"
- IA: *rgā/bgre*
IIIA: *rgan/rgon*
7. *rñab(-pa)* "to desire, crave", *rñam(s)(-pa)* "to breathe, pant, desire ardently" ~ *rñub(-pa)* "to draw in (as air), breathe"

B. Palatal S.I.s

1. *bcu* "ten" ~ *bcva*³⁵ "id."

³¹ *brla* "(swollen part of the leg=) thigh" (cp. German *Dickbein*) and the verb *rlob-pa*, mainly occurring in the phrase *byin-gyis rlob-pa* "to bless" (*adhiṣṭhāti*) and the compound *byin-rīabs* "blessing" (*adhiṣṭhāna*) "to flood with blessings" also belong here.

³² A less abstract meaning of *rīom-pa*, equally reflecting the basic meaning of "to swell", viz. "(to have a swollen stomach=) stuffed, replete" occurs in a passage of section (*bam-po*) 82 of the Tibetan Kanjur (Ti.T. XLIII, 232d⁷ and 236a³, where the collocation *c'añ-gis ra-ro-ba-dag* (those drunken with wine) is paired with *śa-zas brīams-pa-dag* (those replete with meat).

³³ See *Asia Major*, n.s., I, p. 14, n. 2, according to which *gru/grva* and *ru/rva* must be considered as doublets differentiated in meaning at a later stage. See also *Études Tibétaines dédiées à la mémoire de Marcelle Lalou*, p. 473 and n. 15.

³⁴ For other members of this word family, cp. *Asia Major*, XVII, p. 217.

³⁵ See Tibetan "Fifteen" and "Eighteen" in *Études Tibétaines dédiées à la mémoire de Marcelle Lalou*, pp. 472-8.

2. *lcag* "rod, switch" ~ *lcug(-pa)* "flexible", *lcug(-ma)* "rod, switch"
3. *c'ab* "water (resp.)" ~ *c'u* "id."³⁶
4. *g'zu* "bow" ~ *g'za*, *hja* "rainbow"

C. Dental S.I.s

1. *t'abs* "opportunity, chance, possibility", *stabs* "mode, manner, way" ~ *t'ub(-pa)* "to get the better of, be able to cope with; a mighty one", *mt'u* "power, force, strength"
Xc: *t'ob*, *stob*/*t'ub*
2. *rdzab*³⁷ (in *rdzab-rdzub* "sham, emptiness, falsehood") ~ *rdzu(-ba)* "to give a deceptive representation", *rdzub* "deceit, imposture"
Xc: *rdzub*/*rdzob*

D. Labial S.I.s

1. *hp'ar(-ba)*³⁸ "to rebound, fly up, leap" ~ *hp'ur(-ba)* "to fly"
2. *hbab(-pa)* "to descend, fall down, flow" ~ *hbub(-pa)* "to be turned over, upside down", *spub(-pa)* "to turn upside down"
Id: *hbab*/*hbebs*
3. *lba(-ba)* "wen, goitre, excrescence" ~ *lbu(-ba)* "bubble, foam"

E. H, Y, R, L, H as S.I.s

1. *ru* "horn" ~ *rva* "id."
IVA: *gru*/*grva*, see also note 33
2. *las* (in *rags-las-pa* "to depend upon" ~ *lus* (in *rags-lus-pa* "id.")
3. *hral(-ba)* "to tear to pieces" ~ *hrul(-ba)* "ragged, tattered, rags"

V. e~i/i~e

A. Dental S.I.s

1. *stegs* "contrivance for putting things on" ~ *sti(-ba)* "to rest"
2. *de* "that" ~ *hdi* "this"
3. *dreg(s)* "dirt (removable by washing)" ~ *dri(-ma)* "dirt (removable by scraping)"

³⁶ *hc'u-ba* "to draw water", *bca-ba* "to drink" and *hc'ab-pa* "to wash" (resp.) are other members of this word family. For the last word, which is not listed in our dictionaries, note the following example from the Tibetan translation of the *Vinayavibhanga* (Narthang, hDul/Ja 256 A¹; Ti.T. XLIII, 90⁴): *bcom-ldan-hdas gdugs-ts'od gsob ciñ p'yag bcabs-te lhuñ-bzed b'zag-par rig-nas* (realising that the Bhagavan had eaten his dinner, washed his hands and put his bowl down.)

³⁷ Apparently *rdzab* "mud, mire" also belongs here.

³⁸ Concerning other members of this word family cp. Tibetan *par*, *dpar*, *spar*, and cognate words (*BSOAS*, XXI (1962), pp. 72-80).

4. *rtse*³⁹ "point, top, peak, summit", *rtseg* "(to top=) to lay one thing on or over another" ~ *rtsi(-ba)* "(to add one thing to another=) to count", *rtsig(-pa)* "(to put one piece of earth or one stone or brick on top of another=) to build"

VIb: *rje*/*(r)jo*

B. Labial S.I.s

1. *hbreg(-pa)* "to cut off, shave" ~ *hp'ri(-ba)* "to lessen, diminish, take away from", *hbri(-ba)* "(intrans.=) to lessen, decrease, diminish"
VID: *hbreg*/*hbrog*

VI. e~o/o~e

A. Guttural S.I.s

1. *rko(-ba)*, *rkod(-pa)* "to dig, dig out" ~ *rked(-pa)* "(dug out⁴⁰ part of the body=) waist"
2. *hgogs(-pa)* "to hinder, prohibit, stop" ~ *hgogs(-pa)* "to prevent, avert"
3. *hgeñs(-pa)* "to fill", *hk'eñs(-pa)* "to be full" ~ *skoñ(-ba)* "to fulfil"
IA: *gañ*/*hgeñs* *hk'eñs*
IIIA: *gañ*/*skoñ*
4. *hgreñ(-ba)* "to stand", *sgreñ(-ba)* "to raise, erect" ~ *hgroñ(-ba)* "(to be stiff=) to die; to be killed"⁴¹
VIE: *reñ*/*ro*
5. *hgrol(-ba)* "to loosen, unfasten; to explain" ~ *hgrel(-ba)* "to explain"
6. *ño* "face, countenance, air, look" ~ *ñes(-pa)* "certain,⁴² true, sure, firm"

B. Palatal S.I.s

1. *c'e(-ba)* "greatness, excellence", *mc'ed(-pa)* "to spread, gain ground" ~ *mc'od(-pa)* "to honour; offering"
2. *rje* "lord, master" ~ *jo(-bo)*, *rjo*⁴³ "id."
3. *snyeg(s)(-pa)* "to hasten, run after, pursue" ~ *snyog(-pa)*, *bsnyog(-pa)* "secondary form of *snyeg-pa*, especially when signifying "to wish earnestly, to crave for, or lust after"⁴⁴

³⁹ Other words belonging here are *rdze-ba* and *rtseñ-ba* "to tuck up", (with loss of *r* after *h*) *hts'eng-ba* "to increase" and *rdxi-bo* "the(counter [of sheep]=) shepherd".

⁴⁰ Cp. French *la taille* "waist" and *tailleur* "to cut, cut out".

⁴¹ See *TPS*, 1964 (1965), pp. 104-5.

⁴² As shown by the combination of *ño* "face" with *nyid* "self"—the latter in its function of denoting abstract nouns—in the compound *ño-bo nyid* "entity, essence, nature, substance", the semantic implications of *ño* obviously are different from English "face" in "on the face of it".

⁴³ About the spelling *rjo* see Li Fang-kuei, *A Sino-Tibetan glossary from Tun-Huang* (*T'oung Pao* XLIX, 1961, p. 258, item 2).

⁴⁴ See Jäschke, *Dictionary*, p. 200b.

4. *snjol(-ba)* "to lay down, to bed a person" ~ *bsnyel(-ba)* "to forget (resp.)"

IB: *nyal/mnyel, bsnyel*

III B: *nyal/snyol*

5. *gśog(-pa)* "to cleave, split" ~ *gśeg(-pa)* "id."
6. *gśor(-ba)* "rough, bristly, shaggy" ~ *gśer(-ba)* "id."

C. Dental S.I.s

1. *ster(-ba)* "to give" ~ *gtor(-ba)* "to strew, scatter"
III C: *t'ar/gtor*
2. *hdoñ(-ba)* "to go, proceed" ~ *hdeñ(-ba)* "id."
3. *hded(-pa)* "to walk behind, pursue, run after" ~ *hdod(-pa)* "to desire"
4. *rdeg(s)(-pa)* "to beat, strike, smite" ~ *rdog(-pa)* "step, footstep, kick"
5. *rtse(-ba)* "to play, sport, frolic", *rtsed(-mo)* "play, game" ~ *rtso(-pa)* "to contend, dispute, wrangle"
6. *ts'e* "time", *ts'es* "day of the month" ~ *hts'o(-ba)* "to live, life"⁴⁵
7. *hts'od(-pa)* "to cook, dress in boiling water" ~ *hts'ed(-pa)* "id."
8. *mdzod* "(holder =) store-house" ~ *hdzed(-pa)* "to hold out or forth";
mjed(-pa) "enduring"

III C: *bzad/bzod*, see also note 26.

9. *gsēb, sēb* "multitude, crowd"⁴⁶ ~ *gsob(-pa)* "to fill out"

III C: *ts'ab/gsob*, see also note 24.

10. *sem, sems* "soul", "mind", *sem(-pa)* "to think" ~ *som* in *som-nyi*⁴⁷ "(in two minds =) doubt"
11. *sro(-ba)* (< **snro*)⁴⁸ "to be warm" ~ *sred(-pa)* "to desire"
12. *srel(-ba)* "to bring up, rear, nurse, train" ~ *srol* "usage, custom,⁴⁹ habit"

D. Labial S.I.s

1. *dpog(-pa)* "to measure, proportion, fix" ~ *dpe* "pattern, model"⁵⁰

⁴⁵ The word family includes also *gso-ba* "to feed, nourish", *gson-pa* "to live" [< **gtson*, cp. Chinese *tswen* 存 (GSR 432a *dz'won*), and *so* (< **stso*) "life" of the compound *so-ñi* "life and death" which, as Professor R. E. Emmerick kindly communicated to me, occurs several times in the Tibetan version of the *Siddhasāra* he is going to publish.

⁴⁶ Re the semantic problem and the elimination of the meaning of "small interstices between things or persons thronged together" see *BSOAS* XX (1957), pp. 532-32. See also *TPS*, 1964 (1965), p. 105.

⁴⁷ Not in Jäschke's, but in Das's dictionary. See also F. Nobel, *Udrāyana*, Pt. 2 (1955), p. 80.

⁴⁸ The original initial cluster *nr-* may be assumed when comparing the obvious cognates *dro-ba* "to be warm", *dro* "hot time of the day" and *drod* "warmth" on the one hand, and Chinese *re* 熱 "hot" on the other, for which Professor Karlgren reconstructed archaic *ñjat* (GSR 339j). See also above note 2.

⁴⁹ From the semantic point of view, cp. German *pflügen* and *Gepflogenheit*.

⁵⁰ Cp. Latin *modus*, *modulus* "measure", the latter word being the etymon of *model*.

2. *hp'en(-pa)* (< **hp'eñ?*) Pf. *hp'añs*, Fut. *hp'añ*, Imp. *p'oñ*, *p'añs* "to throw, cast, fling, fire off, let fly" ~ *hp'oñ* "archery", *hp'og(-pa)* "to hit, strike, touch"
3. *byed(-pa)* "to make, fabricate" ~ *spyod(-pa)* "to do, act, accomplish, perform, commit"
4. *hbreg(-pa)* "to cut off" ~ *hbrog* "solitude, wilderness, uncultivated land"; *hp'rog(-pa)* "to rob, take away, deprive"
VB: *hbreg/hp'ri, hbri*
5. *rmo(-ba)*, *rmod(-pa)* "to plough" ~ *rmed(-pa)* "to plough and sow"
III D: *rma/rmo, rmed*

E. H, Y, R, L, H as S.I.s

1. *reñ(-ba)* "to be stiff, hard, rigid" ~ *ro* "(a stiff =) dead body"
VI A: *hgren/hgroñ*
see also note 2 to II A: *drañ/rin*

VII. e~u/u~e

A. Palatal S.I.s

1. *mjug, gžug* "posterior, backside, tail" ~ *mje* "penis"⁵¹

VIII. i~o/o~i

A. Palatal S.I.s

1. *rnyi* "snare, trap" ~ *rnyoñ* "id."⁵²
2. *zi(-ba)* "(to rest =) to become calm;" *gzi(-ma)* "(rest =) ground, foundation" ~ *hjog(-pa)* "(to rest [trs.] =) "to put, place;" *gžogs* "(resting place =) side (of the body)"^{52a}

B. Labial S.I.s

1. *p'yogs* "side, direction" ~ *p'yi* "outside, behind"; *dpyi* "(sides =) hips"
III D: *p'yag/p'yogs*
III E: *lag/logs*
2. *p'rin, hp'rin* "news, tidings, intelligence, message" ~ *sbron(-pa)* "to give information, notice, intelligence"

⁵¹ Latin *penis* had in fact the meaning of "tail" in preclassical language. Cp. also German *Schwanz* in both meanings.

⁵² See, however, *Mahāvūyutpatti* (Sakaki) 6671 (= *lepa*), Edgerton, *Buddhist Hybrid Sanscrit Dictionary*, s.v. *lepa* (p. 463), and J. Nobel, *Udrāyana*, Vol. 2, p. 6, entries *rñi* and *rñoñ*.

^{52a} *ziñ* "field, ground, soil, arable land" may also belong here.

3. *rmi(-ba)* "to dream" ~ *rmoñ(-ba)* "to be obscured; obscured, stultified"
 IIb: *rmi|rmañ*
 IXc: *rmi|rmus, rmugs*

IX. *i~u/u~i*

A. Palatal S.I.s

1. *gci(-ba), gcid(-pa)* "to make water", *gci, gcin* "urine" ~ *bcud* "moisture, juice, sap"
2. *nyiñ* in *nyiñ-lag* "member" (lit. "hand") of second order (as opposed to *yan-lag*) ~ *nyuñ* "little"
3. *zi(-ba)* "to become quiet, calm, to abate, subside" ~ *bžugs(-pa)* "to sit (resp.); to dwell, reside; to remain, stay, exist, live"
 VIIIa: *zi/hjog, gžogs*

B. Dental S.I.s

1. *t'ugs* "heart, mind, soul" (resp.) ~ *gti* in *gti-mug* "gloom, mental darkness, ignorance"⁵³
2. *rdzi(-ba)* "to press, knead" ~ *rdzu(-ba)* "to give a deceptive appearance"
 IIa: *rdza/rdzi* and note 3
 Xc: *rdzub/rdzob*
3. *gzi* "shine, brightness, clearness, splendour" ~ *gzugs* "(brightness perceived =) figure, form, shape"

C. Labial S.I.s

1. *hbig(s)(-pa), p'ig(-pa)* "to sting, pierce, bore, make a hole" ~ *hbug(s)(-pa), sbug(-pa), p'ug(-pa)* "id."⁵⁴
2. *rmi(-ba)* "to dream" ~ *rmugs(-pa)* "dense fog"; *rmus(-pa)* "foggy, gloomy"
 IIb: *rmi|rmañ*
 VIIIb: *rmi|rmoñ*

X. *o~u/u~o*

A. Guttural S.I.s

1. *dkrug(-pa)* "to stir, stir up", *hk'rug(-pa)* "to be disturbed" ~ *dkrog(-pa), skrog(-pa)* "to stir, churn"

⁵³ See Jäschke, *Dictionary*, s.v. *mug-pa* (2): 'vb with *yid-*, *yi-*, resp. *t'ugs-* "to despair".

⁵⁴ Further obvious cognates are: *bu-ga* (in cpds. *bug*), *bug-pa, bu-gu* "hole", *p'ug-pa* "cavern", *sbu-gu, sbug-po, sbugs* or *sbugs* "hollow, cavity". *dbugs* "(the piercer =) breath, respiration" apparently also belongs here.

B. Palatal S.I.s

1. *bcu* "ten" ~ *bco* (< *bcvo*) (in *bco-lña* "fifteen" and *bco-brgyad* "eighteen")
 IVb: *bcu/bcva*, see also note 26
2. *sul* "truck, rut, furrow of a plough" ~ *gsol* "(furrower =) plough"

C. Dental S.I.s

1. *t'um(-bu)* "spoon, ladle" ~ *t'om(-bu)* "id".
2. *t'ob(-pa)* "to find, get, obtain, get possession of", *stob(-pa)*⁵⁵ "to make [enable to] get food =) to feed" ~ *t'ub(-pa)* "to get the better of"
 IVc: *t'abs, stabs, t'ub, mt'u*
3. *snom(-pa)* "to smell" ~ *snum(-pa)* "id."
 IIIc: *snam, mnam/snom*
4. *rdzub* "deceit" ~ *rdzob(-po or -mo)* "vain, empty, spurious, void"
 IIa: *rdza/rdzi*
 IIIc: *rdzab/rdzob*
 IXb: *rdzi/rdzu*

D. Labial S.I.s

1. *hbo(-ba), sbo(-ba)* "to swell", *sbom(-pa or -po)* "thick" ~ *bum(-pa)* "bottle"

E. H, Y, R, L, H as S.I.s

1. *ho* "this"⁵⁶ ~ *hu* "id."

⁵⁵ *stobs(-pa)* "strength, vigour, force" also belongs here.

⁵⁶ Cp. *ho-cog* (IIb: *cag/cog*).