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Other Comparative Matters, Consistencies, and Patterns

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7 Other Comparative Matters, Consistencies, and Patterns

7.1 Vowel Correspondences

Proto-Semitic and Egyptian vowels were originally only three *a, *i, *u. Arabic still has only those three, but from those three, Hebrew developed seven or more, and most Aramaic dialects have something between three and seven. The Proto-Uto-Aztecan vowels and their reflexes in the various UA languages are presented on page 46 and are discussed on pages 58-64. While there are periodic inconsistencies within the UA vowel correspondences among themselves, the correspondences of the Semitic vowels to PUA vowels enjoy a comparable consistency; most abide by consistent patterns but include instances of not yet explained variance. I say "not yet explained" because as linguists know, sometimes subsets of exceptions are later explained by a newly discovered principle or environmental cause. Untangling the history or prehistory of stress patterns and changing stress patterns from the two Semitic infusions to the contemporary UA languages may be the most significant contribution toward clarifying UA vowels, though it may also be the most difficult, and perhaps not entirely possible. Nevertheless, the PUA vowels (*a, *e/ï, *i, *o, *u) often align with the same Hebrew vowels (*a, *e, *i, *o, *u) and most of the groups of exceptions are consistent or explainable patterns. In essence, the following patterns are apparent:

Semitic mid-vowels (e, ə, o) often rise to UA high vowels i, ï, u, as in Hebrew prtcpl oo-e > UA u-i:
(754) Hebrew poone 'turn, look' > UA *puni 'look, turn'
(532) Arabic baaṣir 'eye'; unattested Hebrew/Phoenician cognate *booṣer 'eye' > UA *pusi 'eye'
(1318) Hebrew ygr / yaagor- 'be afraid', unattested participle *yooger > Ca yuki 'get scared, be afraid'
Other forms similarly show raised vowels:
(564) Hebrew śapoot 'lips', sᵊpooteeʸ 'lips of' > UA *puti 'lip'
(52) Hebrew mukke 'smitten' > UA mukki 'die, sick, smitten'
(607) Hebrew dobɛr 'pasture, vegetation' > UA *tupi 'grass, vegetation'
(1384) Aramaic -be 'with it, in it, by means of it' > Hp -pi 'instrumental' and other UA languages
(796) Hebrew to'kal > *tukkaC > tïkkaC 'eat';
(832) Semitic sarṭoon 'scratcher, crab' > UA *saCtun 'claw, crab'
(57) Arabic singaab = expected Hebrew *siggoob 'squirrel' > UA *sikkuC 'squirrel'
(583) Hebrew ʼepod 'ephod, shoulder cape or mantle' > UA *wipura 'belt'
(755) Hebrew kutónet 'shirt-like tunic' > UA *kutuni 'shirt'
(710) toolaaʕ 'worm, scarlet stuff' > UA *tulo 'embers, coals, dark, black' (2ⁿᵈ V rounded by pharyngeal)
(30) Hebrew ṣippoor 'bird, small bird' > UA *cipuri 'bird'

Likewise, impfv stems Hebrew -CCoC / Arabic -CCuCu > UA -CuC with loss of 1ˢᵗ C of the cluster.
(718) Hebrew npl, impfv stem -ppol (< *-npul) 'fall, be born' > UA *puli 'to fall, give birth'
(1094) Hebrew ktš, impfv -ktoš (< *ktusu) 'pound, grind' > UA *tusu 'grind' with loss of 1ˢᵗ C in a cluster
(1064) Semitic lxš, impfv *-lxoš (< *-lxusu) 'whisper, mutter' > UA *kusu 'make its sound (of animal)

Semitic low-central vowel A usually remains (*a*) in stressed syllables:
(571-p) Semitic ya'ya'/yaa'ayaa' 'beautiful' > Ls yawáywa, Sr yï'aayï'a'n 'beautiful'
(616-p) Aramaic dakar > UA *taka 'man'
(559-p) Aramaic bakaa / baka' 'cry' > UA *paka' 'cry, v'
(892-p) Semitic ṣanawbar 'type of pine tree' > Sh sanawap-pin 'pine tree'
(534-p) Hebrew batt 'daughter' > UA *pattï 'daughter'
(567-p) Hebrew ya'amiin-o 'he believes him/it' > UA *yawamin-(o) 'believe (him/it)'
(1055) Syriac ʼaamaqqət-aa 'lizard-the, n.f.' > UA *makkaCta(Nka)-ci 'horned toad'
(1079) Aramaic naanaa 'mother' > UA *nana 'mother'
(1190) Aramaic ʼaykaa 'where' > UA *haka / *hakka 'where?'
(639-p) Semitic *-psax 'be lame, limp' > CU sakï- 'limp'; WMU süǵ́ú-y 'limp, be lame' (assimilated)
(991-kw) Hebrew ni-qraʼ 'he/it is called/named' > *nihya 'call, name' (Numic)
(954-kw) Semitic/Arabic baqiya 'stay, be left behind' > Hp kwayŋya- 'behind'

Final low vowel -*aa* of the suffixed article of Aramaic nouns usually remains (*a*), appearing to have preserved the stress that it has in some Aramaic dialects:
(1276) Aramaic talg-aa 'snow-the' > UA/CNum *takka 'snow'
(617) Aramaic diqn-aa 'beard / chin-the' > UA *tï'na 'mouth'
(618) Aramaic di'b-aa 'wolf-the' > UA *tï'pa 'wolf'
(1130) Aramaic pagr-aa 'carcass-the' > UA pïïkya 'hide, fur, carcass'
(1403) Syriac šigr-aa 'drain, ditch, gutter-the' > Hp sikya 'small valley, ravine, canyon with sloped sides'
(604) Aramaic rə'emaan-aa 'antelope-the' > UA *tïmïna 'antelope'
(967) Aramaic qušṭ-aa 'bow-the' > UA *kuCta-pi 'bow'
(1042) Semitic mar'(aa) 'prince, princess' > Ktn/Sr mayha; Hp maana 'daughter', SUA *mara 'child'
(1409) Aramaic kuuky-aa 'spider-the' > UA *kuukya 'spider'
Also at 2, 3, 4, 5, 16, 49, 50, and throughout, are many more *a* < **a*.

However, sometimes Semitic *a* rises to UA *ï*:
(581) Hebrew 'arṣ-aa 'earth-ward, down' > UA *wïcï 'fall'
(99) Hebrew rakb-uu 'they mounted, climbed' > UA *tï'pu 'climb up'
(1459) Hebrew yhb, haabaa > haavaa 'come on, let's, go to (cohortative) > SP ïvï 'go ahead! (hortatory adv)'
(1007) Semitic *xdl (> Hebrew ħaadal) 'cease, cease doing'; OSArabic xdl; Akkadian xadaalu 'cease'
Arabic xadila 'stiffen, become rigid' > Hp hïrïï-ti 'come to a stop, harden'; Hp hïïrïla 'be hesitating, pausing, stopping'. Note Hopi's two very different meanings (stop, harden) both in Semitic (cease, stiffen/rigid).
See also 7, 24, etc.
Semitic **a* > UA *ï* especially in a less stressed first syllable when the second vowel is stressed.
(1130) Aramaic pagr-aa 'body/carcass-the' > UA *pïkya 'animal hide, carcass'
(1077) Semitic *manzaal > UA *mïcaC 'moon':
(1284) Aramaic dəwaay-aa 'grief-the' > UA *tïwoya 'sick(ness)'
UA **a* > ï when assimilating toward final -i (11, 54, Sr in 571, etc.)
Many UA verbs *CïCaC suggest Aramaic pfv CəCáC 2nd syllable stress (vs Hebrew/Phoenician CaaCaC):
(681) Semitic ʕlw / ʕly / ʕalaa 'ascend, go up, grow' > UA *wïla/i 'grow'
(861-p) Hebrew qaaša^y^; Aramaic qəša' 'be hard, severe, harsh (of taste)' > UA *kïsa 'sour, harm(ed), bad'
(683-p) Syriac ʕmṭ 'become dark, cloud over, be obscure, concealed' > UA *(w)umaC / *(w)ïmaC 'rain'
(782-p) Arabic ṯ̣y / ṭaħaa 'to hurl, shoot' > Wr cewa 'to throw or hit with a missile'
(600-p) r'y / raa'aa 'see' > UA *tïwa 'find, see'
In contrast to Aramaic-like Sem-p, **Hebrew/Phoenician Sem-kw CaaCaC preserves 1st vowel as -a-:**
(935-kw) Hebrew glm / gaalam 'wrap up, fold' > UA *ŋálam 'tie, entangle(d)'
(946-kw) Hebrew qlʕ / *qalaʕ 'to sling, throw out (people from land)' > UA *ŋalaw 'throw out'

Semitic high front vowel I usually remains i, unless assimilated to other nearby segments:
(757) Hebrew šipħaa 'maid, maid-servant' > UA *siwa 'female, sister, daughter'
(769) Semitic taqipa, pl: taqipuu 'to overpower, be strong' > UA *takipa / *takipu 'push'
(810) Hebrew hikkiir 'recognize, know, know how to' > Tr iki- 'know, be aware of'
(853) Aramaic ħippušit-aa 'beetle-the, n.f.' > UA *wippusi 'stink beetle'
(1088) Aramaic ħild-aa (< *xild-aa') 'mole, burrower' > UA *kita 'groundhog': Mn kidá'; NP kidï
(1246) NWSemitic *has-sim'al 'the left' > UA aašiŋan 'left'
(1293) Hebrew hiśkiil, hiśkal- 'to understand, make wise' > CN iskalia 'be discreet, prudent'
(1403) Syriac šigr-aa 'drain, ditch, gutter-the' > Hp sikya 'small valley, ravine, canyon with sloped sides'.

Many i > ï when assimilating toward a following -a or other non-high V: *i-a > ï-a
(889-p) Aramaic rikb-aa 'upper millstone-the' > UA *tïppa 'mortar (and/or) pestle'
(617-p) Aramaic diqn-aa 'beard / chin-the' > UA *tï'na 'mouth';
(618-p) Aramaic di'b-aa 'wolf-the' > UA *tï'pa 'wolf';
(1003) Semitic kirš / kariš 'stomach, paunch, belly' > UA *kïca 'belly, waist'
(944-kw) Hebrew tiqqen 'to make straight, straighten s.th.' > Ktn tïŋen 'to straighten arrows'

Hebrew mid back round vowel O often remains o (but sometimes rises to u, see 7.1):

(531-p) Hebrew bw' 'come', infinitive boo' 'coming, way' > UA *poo' 'road, way'

(569-p) Semitic 'e(N)gooz 'nut tree' > UA *wo(N)koC 'pine'

(724) Semitic parʕoš 'flea (jumper)' from prʕš 'jump' > UA *par'osi / *paro'osi 'jackrabbit'

(630-p) Hebrew *xole 'be sick, hurting' > UA koli, Tak *qoli 'be sick, hurt, vi'

(705) Semitic l'y / la'aa^y, Hebrew prtcpl: loo'e^y 'grow weary / tired' > UA *lo'i / *loCi 'tired'

Many o are assimilations or lowerings of *u-a > o-a

(868) Aramaic ṭwr- / ṭuur-aa 'rock, hill, mountain-the' > UA *toya 'mountain'

(931-kw) Hebrew gulla(t) 'basin, bowl'; Arabic ğulla(t) 'ball, bowl' > UA *ŋola 'hoop, ring, wheel'

Semitic high back round vowel U often remains u:

(853) Aramaic ħippušit-aa 'beetle-the, n.f.' > UA *wippusi 'stink beetle'

(52) Hebrew mukke > UA mukki 'die, sick, smitten'

(871) Hebrew *tu'pal 'become dark' > UA *cuppa 'fire go out, become dark'

(872) Hebrew *yu'pal 'become dark, be gone down (sun)' > UA *yuppa 'fire go out, (get) dark, black'

(967) Aramaic qušṭ-aa 'bow-the' > UA *kuCta-pi 'bow'

(1283) Aramaic ruumš-aa' 'evening-the' > Sr rumaaruma'n 'be dark'; Sr ruma'-cï'q 'be very dark'

(1138) Hebrew šor (< *šurr) 'navel, navel cord'; Arabic surr 'navel cord' > Sr ṣuur 'navel'

(606) Arabic dubr/dubur 'back(side), buttocks' > UA *tupur 'hip, buttocks'

(1409) Aramaic kuuky-aa 'spider-the' > UA *kuukya 'spider'

Uto-Aztecan initial *hu is often from pharyngeal ħ introduced in 78-85, and other examples such as:

(672) Arabic ħabaqa 'pass air, break wind' > Hopi hovaqtï 'smell bad, stink' (Hopi o < UA *u)

(675) Semitic ħnp 'have turned in feet, be pigeon-toed' (used in lizard/turtle words) > UA *hunap- 'badger'

Also final or medial ħ > o/u, becoming round vowels when adjacent to pharyngeals, are numerous:

(1408) Syriac dinħ-aa 'sunrise, light, ascendant or predominant star' > UA *-cinuN- in *ta(C)tinuN-pi 'star'

(773) Semitic tħn 'grind, pound' > UA *to'na(C) 'hit, pierce, stab', UA *co'na / *co'ni 'pound, hit'

(84) Hebrew impfv: yi-ṣmaħ 'sprout' > UA *icmo 'sprout': CN icmo-liini 'sprout, grow'.

(1308) Semitic nħl, -nħal 'have/ take possession', naħ^{a}lat 'property' > nol- of TO nolawt 'buy'

(188) Egyptian nħbt 'neck, back of neck' > UA *nohopi / *nopi 'hand, arm'

(1421) Arabic saħr- / suħr-, masaaħir 'lungs' > SP soo-vi 'lungs'; Tb mosooha-t 'lungs'

UA ï/e does not exist in Proto-Semitic or Arabic; Hebrew e is of various sources: *-ay- or *i (> e).

(943-kw) Syriac qanqen (< *qanqin) 'to chant, sing' > UA *ŋaŋi 'to cry'

(528-p) Semitic bayit / bayt / beet 'house' > Tr bete 'house'

(1316) Hebrew yayin / yayn / yeen 'wine' > Wr yena 'strong (of liquor)'

(1292) Hebrew śyb 'be grey-headed, old'; Arabic šyb 'become old, white-haired'; Hebrew śeebaa 'grey hair, advanced age' > Wr ahseba 'reach or be so many years old'; SP siu- 'light grey'

(1324) Hebrew henaa 'hither, toward here' > Wr ena 'come'; Tr enai / ena 'here'

(1325) Hebrew hinné 'behold!'; Arabic 'inna 'particle of emphasis' > UA *ne 'look! adverb of emphasis'

Likewise, the masculine plural construct -eey is originally from -iiy, and UA shows -i also:

(823-p) Hebrew ba-yyamee^y (< *ba-yyamii) 'in the year of' > *payami > UA *pami 'year':

(852) Hebrew pl: *paniim, pl construct panee^y- 'face, surface of' > CN pani 'on top, on surface'

An unstressed 1st vowel often assimilates to a longer or stressed 2nd vowel:

(569-p) Semitic 'e(N)gooz 'nut tree' > UA *wo(N)koC 'pine'

(535-p) Aramaic bəquuraa / bəquurə-t-aa) 'livestock' > UA *pukku(C) 'domestic animal'

(864-p) Arabic/Hebrew quuppa(t) 'basket'; Hebrew pl *quuppoot > UA *koppot 'basket'

(934) Hebrew glm 'wrap up, fold together', verbal noun: gəloom 'wrapping, garment' > UA *koloom 'cover'

For other examples, see also 966, 1041, 1415.

Vowels often assimilate toward or anticipate the point of articulation of the following consonant:
(527-p) Semitic baraq 'lightning' > UA *pïrok / My berok- 'lightning'; the 1ˢᵗ a > ï/e, raised and fronted
toward alveolar -r-; the 2ⁿᵈ a > o, anticipating back uvular -q
(726) Hebrew paraq 'drag away, tear away' > Numic *piyok 'pull, drag'
(19, 20-kw) Semitic brr / barr(a) 'land, choose' > UA *kwiya 'earth, choose/take';
(64-kw) Semitic krr 'circle, dance' > UA *kiya 'have a round dance';
(65-kw) Semitic mrr 'go' > UA *miya 'go';
(5-kw) Hebrew bááśaar 'flesh, penis' > UA *kwasi 'tail, penis, flesh'.
Or assimilate to either adjacent consonant:
(1284) dwy 'be sick, miserable'; Aramaic dəwaay-aa 'grief-the' > UA *tïwoya 'sick(ness)'

As in 527 and 726 above, Semitic-p uvular q seems to have a strong rounding influence causing V > u:
(738-p) Hebrew qayiṣ / qeyṣ 'summer' > UA *kuwïs 'summer'
(961-p) Hebrew dɛqɛl 'date-tree, palm'; Arabic daqal 'kind of palm tree' > UA *taku 'palm tree'
(963-p) Hebrew qaaṣiir 'branch(es)' > UA *kusi 'wood'

In Masoretic Hebrew phonology, "guttural" consonants (ʕ, ħ, ', r) share behaviors unique to themselves—
cannot be doubled/geminated, must take helping vowels in original clusters—and often lower adjacent
vowels in certain environments. In Hopi, two of those original "guttural" consonants being in the same word
seem to trigger Hopi ö, originally Hopi's lowest round vowel, corresponding to PUA *o:
(695) Hebrew lqħ / laaqaħ 'take, grasp, take as wife' > Hopi lööqö(-k-) '(for bride) to marry' (q and ħ)
(663) Hebrew ħɛrpaa 'shame, mutilation, reproach, deficiency' > Hp ööpï 'sickly one, invalid,
        one with disabling sickness' (ħ and r) (Also note Hopi -p- < *-Cp-, i.e., from a cluster, or *-rp- here.)
(686) Hebrew ʕɛrwaa 'nakedness, genital area' > Hp löwa 'vulva, vagina' (ʕ and r)
(280) Egyptian ħVm'at 'salt' > PUA *homwa 'salt' > Hopi öŋa 'salt' (ħ and ')

Anticipating Semitic-kw -l (but not Semitic-p -l) causes a vowel to rise and maybe front: V > i or ï
(797-kw) Hebrew 'kl , imfv: yo'kal 'eat, enjoy love' > UA *yï'ïki / *yïkï 'swallow, taste, finish'
(798-kw) Hebrew 'aakal '(he) ate (pfv) > UA *'aki 'open mouth, eat'
(1321-kw) Hebrew ħargol 'locust'; Arabic *ħargal / *ħurgul 'locust' > Tr urugi-pari 'grasshopper'

The rather universal **centralization of vowels** or schwa-like behavior in unaccented syllables that occurs in
many languages worldwide happens in UA too, though both ï and i serve that purpose in UA.
(550-p) Biblical Aramaic bəśár 'flesh' > UA *pisa 'penis'
See other examples in the 4ᵗʰ and 5ᵗʰ groups under 7.2

Short initial unstressed vowels often disappear:
(1416) Arabic iđaa / iđan 'then, therefore, if, when, whenever' > Tb tan / tanni 'if'.
(591) Hebrew 'adaamaa / 'ᵃdaamaa 'earth' > UA *tïma 'earth'
(592) Hebrew 'abneṭ, pl: 'abneṭ-iim 'sash, girdle' > UA *natti 'belt'
(1055) Syriac 'aamaqqət-aa 'lizard-the, n.f.' > UA *makkaCta(Nka)-ci 'horned toad'
(729) Aramaic 'eebaar-aa / 'eebr-aa 'limb, arm, wing' > UA *pïra 'arm, right arm'

Or the whole first syllable may be lost when unstressed:
(593) Akkadian qardammu 'enemy, opponent' > UA *tïmmu 'opponent'
(564) Hebrew saapaa(t) 'lip', pl: sapoot 'lips', sᵊpooteeʸ 'lips of' > UA *puti 'lip'
(948-kw) Hebrew ʕiqqaar 'root'; Syriac ʕeqaar 'root, remedy' > UA *ŋa- in UA *ŋa-kaw 'root'
(1054) Aramaic raqbubit-aa 'decayed-matter, moth-eaten, moth-the' > UA *(V)kupïpika 'butterfly'
(597-kw) Arabic 'arnab 'hare, rabbit', Hebrew f. pl: *'ᵃrnaboot > UA *taput 'cottontail rabbit'
(1325) Hebrew hinné 'behold!'; Arabic 'inna 'particle of emphasis' > UA *ne 'look! adverb of emphasis'

7.2 Medial Consonant Cluster Results in Uto-Aztecan

Medial consonant clusters in UA have been obscure enough that UA specialists have scarcely dealt with them until relatively recently. Alexis Manaster Ramer (1993b, 1997, etc) broke new ground in discovering a few clusters that underlay what were formerly thought single medial consonants. The fact that the medial consonant correspondences were not nearly as consistent as the initial correspondences was a strong hint that more former clusters probably did underlie that medial variety than previously suspected (addressed p. 47); nevertheless, other than Manaster-Ramer's pioneering start, little has been accomplished in clarifying unobvious clusters, perhaps because most could hardly be extracted from the UA data alone. All that were apparent were so many arrays of inconsistent combinations of medial reflections among so many cognate sets. This Near-East consideration for a portion of UA's origins, if valid, seems to shed light on many previously puzzling aspects of UA—consonant clusters being one such area where such a key should clarify much. Yet further analyses are also needed to answer some unanswered questions.

Some clusters remain basically as are:
*-ky- > -ky-: kuuky-aa 'spider-the' > UA *kuukya / *kukkaC 'spider' (1409-p)
*-'y- > -'y-: Eg x'yt 'slaughter, carnage' > UA *ko'ya 'fight, kill pl objects' (178-9)
*-'w- > *-'w-: Eg ṯ'w 'take up, collect, bring together' (Coptic jiwe) > UA *tï'wi / *tu'wi 'gather seeds, harvest' (159)
*-'w- > *-w-: Eg t'w 'man, male' > UA *tawa / *tawi 'man, male' (205)
*-yl- > -yly-: gyl 'do circles, dance, rejoice' > Cp ŋáylʸa 'spin, twirl' (929-kw)
*-ly- > -ly-: gly / -galley 'uncover (nakedness), sleep with (woman)' > Sr ŋalyaaŋalyah-kin 'make loose' (1521-kw)
*-'b- > *-'p-: n'bl / nebel 'skin-bottle (of wine)' > no'pal- 'prickly pear cactus fruit' (fermented to alcohol) (720-p)
*-'p- > *-'p-: naap-aa, written na'p-aa 'louse egg-the' > UA *no'pa / noppa 'egg' (1076-p)

Geminated consonant clusters often remain geminated or doubled in some UA languages, but lenition of *-CC- > -C- happens often in this tie as well as among some UA reflexes themselves:
mukkɛ 'smitten' (*mu-nkay > mukkɛ) > UA *mukki 'die, be sick' (52)
'aamaqqət-aa 'lizard-the' > UA *makkaCta(Nka)-ci 'horned toad' (1055)
dkk / dakka 'make flat, level, smooth, stamp, crush' > UA *takka 'flat' (1103)
zgg / zagga, impfv *-zuggu 'throw, squeeze, force, cram' > UA *cukka/i 'crowded, mixed' (622)
šakka 'pierce, prick, stab'; Arabic šikkat 'weapons'; Hebrew sek 'thorn' > UA *sikki 'spear, pierce, stick' (1291)
Eg ngg 'goose' > UA *nakï 'goose' (395)
Eg t'-ggt 'the-kidney' > UA *takkiC 'kidney' (357)
Eg qbb 'cool, calm, quiet' > UA *koppa 'quiet, calm' (134)

Bilabial stops b and p: in etyma from Semitic-kw, any cluster with -b- becomes -kw-:
*-bb- > -kw-: ṣbb / ṣabba (< *ḍabba) 'take hold, keep under lock' > UA *cakwa / *cakwi 'catch, grasp, lock' (8-kw)
*-bb- > -kw-: ṣbb / ṣabb (< *ḍabb) 'lizard (< take hold)' > UA *cakwa 'lizard' (9-kw)
*-bb- > -kw-: šabber 'break, break in pieces' > UA *sakway 'break, ruin' (10-kw)
*-bb- > -kw-: dabber (< *-dabbir) 'speak' > UA *tïkwi 'say' (11-kw)
*-bb- > -kw-: zbb 'be in a frenzy, an ecstatic' > UA *sakwo / sikwo 'witch, bewitch' (18-kw)
*-bb- > -kw-: rbb / *rabba 'shoot (an arrow)' > UA *tïkwa 'hit by striking or throwing, shoot (arrow)' (95-kw)
*-br- > -kw-: br' / -bra'- 'eat' > UA *kwa'a 'swallow, eat' (46-kw)
*-br- > -kw-: brii('/y) 'provide food, feed' > UA *kwi 'food, feed, give food' (47-kw)
*-qb- > -kw-: (ya)-qbiḍ(V) 'take, grab' > UA **kwïsa/i 'take, carry' (44-kw)
*-qb- > -kw-: qbl 'be/face front, go foreward', -qbiil 'confront' > Hopi *kwila 'take a step, step forward' (45-kw)
*-qb- > -kw-: qbr 'bury', impfv: *-qbor > UA *kuy / kuC 'bury' (1017-kw)
*-gb- > -kw-: gbr / -gbar 'be strong, prevail' > UA *kwaC- 'win' (49-kw)
*-nb- > -kw-: gnb / ganba 'side, beside, near' > UA ŋakwa 'side, by, near' (21-kw)
*-bb- > -kw-: ṭibbuur 'navel' > UA *siku 'navel' (777-kw)
*-lb- > -kw-: lbš / -lbaš-uu 'put on (garment), clothe (oneself)' (-lb- > -bb- > -kw-) > UA *kwasu 'dress, shirt' (50-kw)
*-sb- > -kw-: sbl 'carry'; sabbaal 'burden carriers'; *hisbiil > Hp iikwil-ta 'put on the back to carry' (40-kw)
*-šb- > -kw-: yšb / yooošbim 'sit, pl' > UA *yukkwi 'sit, pl' (1158-kw)
*-šb- > -kw-: ʕušb- 'grass, herbage, plants, pasture' > *(h)ukwi 'grass' (918-kw)
*-ṣb- > -kw-: ṣᵊpardeaʕ 'frog' > UA *kwa'ro 'frog'; *haC- 'the-' made cluster *ha-ṣṣpardVʕ > kwa'ro 'frog' (1378-kw)
*-bb- / -nb- > -ŋw-: šibbólet 'ear of grain'; Arabic sunbul 'ear, spike (of grain) > *suŋu 'corn' (828-kw)

Also *-pp- > -kw-

*-np- > -kw-: npš 'to breathe'; *hippiiš 'breathe' > UA *hikwis 'breathe, spirit, heart' (839-kw)

?*-pp- > -kw-: ṭpl 'to smear or plaster over' > Hopi cakwani 'plaster'; Hopi cakwan-ta 'plastering, smearing on' (783)

Semitic-kw more often retains the 1ˢᵗ consonants of other clusters, besides -bC- > -kw-:

*-mr- > -mi-/-my-: ṣɛmɛr 'wool' > UA *comi / *comya 'hair' (742-kw) (vs. Sem-p tumraa > tu'ya 'palm tree')

*-ṣm- > -cm- : ṣmħ / yi-ṣmaħ 'sprout' > UA *icmo 'sprout, grow' (84-kw) (vs. Sem-p *ya-ṣmax > UA *yama)

*-nd- > -n-: buundəq-aa 'ball, globule, sphere-the' > UA *kwinu 'round, spherical' (1375-kw) (vs. Sem-p *potto)

*-śk- > -sk-: hiśkiil, hiśkal- 'understand, make wise, insightful' > CN iskalia 'be discreet, prudent' (1293)

*-ml- > -m'- > -'m-: śimlaa / śimla-t 'wrapper, mantle, cloak' > *sam'aC 'to spread, v, a cover, rug, blanket, n' (764)

*-xr- > -ħr- > -w-: Hebrew ħrd, impfv: tɛ-ħ(ɛ)rad 'tremble, worry' > UA *tiwa 'shy, embarrassed' (1512-kw)

*-gd- > -ŋ-: gadiir 'walled place', *ya-gdiir 'cause wall to go up' > UA *yaŋi 'fence, enclosure, roofless walls' (916-kw)

In etyma from Semitic-p, we see *-bb- / -pp- / -Cb- / -Cp- > UA -pp- / -(')p-:

*-bb- > -pp-: ṭabbuur / ṭibbuur 'navel' > Tb šappušt 'belly'; NP sibudu 'navel'; Cr sipu; Hp sivon- (778-p)

*-kb- > -pp-: kaukb-aa(') 'star-the' > UA *kuppaa': Sr kupaa' 'to shine (as of the stars)' (1274-p)

*-pp- > -pp-: tpr / tapper < *tappir 'sew together' > UA *tappiCta 'tie' (1264-p)

*-pp- > -pp-: tpr / tuppar 'sown' > tuppa 'tie(d)' (1265-p)

*-tp- > -pp-: pakken / etpakkan 'speak much, chatter, gossip' > NUA/Num *appaka / *aNpaka- 'talk' (1151-p)

*-tp- > -pp-: Eg ħtp hotpe 'be gracious, peaceable, set (sun)' > NUA *huppi 'peaceable, behave, sink, go down' (182-4)

*-tp- > -'p-: Eg stpt 'choice things of food' > SUA sa'pa 'meat'; *sa'pï 'fat' (256)

*-'b- > -p-: di'b-aa 'wolf-the' > UA *tïpa / *to'apa 'wolf' (618-p)

In etyma from Semitic-p and Egyptian, bilabials b, p, f are usually lost when 1ˢᵗ consonant in a cluster:

*-bʕ- > -w-: ṣibʕ- 'finger' > UA *sïwa /WMU *sipwa /Tep*capiwa 'finger' (747-p)

*-pʕ- > -w-: Eg ħpʕ 'chew' > UA *hiwa 'taste' (299)

*-p'- > -w-: Eg sp' 'centipede' > UA *ma-siwa 'centipede' (*sipwa > siwa, bilabial > ø as 1ˢᵗ C in cluster) (297)

*-b'- > -w-: Eg ib' 'dance, run' > *yab'a/i > UA *yawa / *yawi 'dance' (296) (bilabial > ø as 1ˢᵗ C in cluster)

*-b'- > -w-: Eg db' 'leaf', pl: db-w 'leaves' > UA *sawa 'leaf' (467) (bilabial > ø as 1ˢᵗ C in cluster)

*-bx- > -k-: Eg ʕbxn 'frog' (> *wapkan) > UA *wakaN-ta > *waqatta 'frog' (bilabial > ø as 1ˢᵗ C in cluster) (298)

*-px- > -x-: npħ 'blow, breathe'; *napxat 'puff, breath, gust' (*napxa > nïka) > UA *nïka 'be windy, blow' (1218-p)

*-pš- > -s-, in one language -ps-: Eg xpš 'foreleg, thigh' (Coptic šopš) > UA *qapsi 'thigh'; others kasi (294)

*-pd- > -t-, in one language -pt-: Eg xpd 'buttock' > UA *kupta 'buttocks'; others kuta (295)

*-ft- > -t-: Eg xfty(w) 'enemies' > UA *qaytu 'enemy, opponent' (486)

*-bṭ- > -c-: *-bṭaħ > -cawa (542-p)

*-br- > -r-: gabr-aa, pl: gabr-iim/iin 'great man' > UA *kïri 'man, old man, elder' (1180)

*-bṣ- > -s-: rbṣ 'lie down (often of animals)'; rebɛṣ / rabaṣ 'resting place' > UA *tosa / *ta'so / *tapa'sol 'nest' (1242-p)

*-pħ- > -w-/Tak -ŋ-: šipħaa 'maid' > *siwa 'female, girl, sister, daughter' (757)

*-p'- > -w-/Tak -ŋ-: rp' / raapaa' 'to heal'; *roop'-aa 'healer-the' > UA/Tak/Tb *toŋa 'cure, to doctor s.o.' (1237)

Apparent exceptions, but not really:

*-bt- > -pt-: Eg sbty; Coptic sobt 'wall, fence' > Yq sápti 'fence of branches' likely a later cluster < *sapati (133)

*-pħ- > -pu-: Eg tpħt 'cavern, hole (of snake)' > UA *tapu 'hole' probably had consonants separated *tapuħ… (207)

Sibilants (though usually > s initially and intervocalically) as 1ˢᵗ consonant in a cluster, were absorbed to disappear or show some residual evidence of a former 1ˢᵗ consonant, occasionally doubling the 2ⁿᵈ consonant:

*-šk- > -hk-: moškat 'bracelet, fetter, belt > Tb mohkat 'belt' (1045)

*-št- > -Ct-: 'išaa / 'išt- 'woman, wife of' > Hp wïïti / wïhti 'woman, wife' (574-p)

*-št- > -Ct-: qušṭ-aa 'bow-the' > UA *kuCta-pi 'bow' (967-p)

*-śṭ- > -Ct-: qśṭ 'measure'; qəśiiṭaa 'weight, money'; qesṭ-aa 'measure-the' > UA *koCta/i 'bark, shell, money' (1248)

*-śṭ- > -Ct- > -Cc-: qśṭ 'measure'; qəśiiṭaa 'weight, money'; Aramaic qesṭ-aa > UA *pa-koCci 'shrimp' (1249)

*-śṭ- > -Ct-: zwsṭ- 'belt' > UA *ṣutka 'belt' (if -ka another morpheme) (1048)

*-sk- > -kk-: psħ / *pissex, pl: pisx-iim 'limping' > UA *pisika / *pikka 'bad, rotten, infected, limping' (640-p)

*-sq- > -k-: Eg isq 'linger, wait for', s lost in cluster, *isqV > *ïka > UA *ïka / *ïkï 'remain, be in a place, let lie' (525)

*-ṣm- > -m-: ʕɛṣɛm 'bone', pl ʕəṣaam-iim 'bones' (< *ʕaṣm); Arabic ʕaẓm- 'bone' > Azt *omi / *ohomï 'bone' (1477)

*-ṣh- > -ṣħ- > -hu-: yiṣhar 'oil' > UA *yuhu 'grease' (1120)

*-šk- > h-: -škab 'lie down' > UA *hapi 'lie down' (983)

*-šk- > k-: šakuur 'drunk' or šikkoor 'drunk' > UA *kuru 'mescal, agave' (59)

*-sb- > -kw-: sbl 'carry'; sabbaal 'burden carriers'; *hisbiil > Hp iikwil-ta 'put on the back to carry' (40-kw)

*-šb- > -kw-: yšb / yoošbim 'sit, pl' > UA *yukkwi 'sit, pl' (1158-kw)

*-ṣl- > -l-: ṣlʕ / impfv: -ṣlVʕ 'limp, be lame' > UA *lo'i 'lame, limp' (1108)
*-ṣm- > -m-: ṣmħ / yi-ṣmaħ (< *ya-ḍmax) 'sprout, grow' > UA *yama 'sprout, grow, up' (813-p)
*-sšt- > -t-: Eg psšt 'mat (made of the psš plant)' > UA *ha-pït 'blanket' (402)
*-sn- > -n-: Eg msnħ 'rotate, turn backwards,turn, turn away' (*masnVħ) > UA *manu 'turn, change' (524)

Sometimes sibilants are lost even as 2nd consonants in the cluster
*-uħši- > -uhi-: bwħšyn(') 'green herbs' > UA *puhiC 'green' (870-p)
*-mš- > -m-: ruumš-aa' 'evening-the' > Sr *ruma'- 'become dark' (1283-p)
*-qš- > -k-: qšb / -qšeebuu 'perk up (ears), listen, pl' > UA *kïpu 'hear' (1068)
*-qš- > -k-: qšb / -qšeebuu 'perk up (ears)', *na-qšab 'what is perked up' > UA *naqa / *nakap / *nakas 'ear' (1070-71)

Some sibilants are kept, though 1st consonant or from loss of V becoming a later cluster
*-sg- > -sk-: sgy 'be many, great'; *hosgay 'be made great' > Hopi hoskaya 'large, huge, enormous' (1414)
*-śk- > -sk-: hiśkiil, hiśkal- 'understand, make wise, insightful' > CN iskalia 'be discreet, prudent' (1293)
*-šk- > -sk-: muskir 'alcoholic beverage'; unattested *ma-škar / *mi-škar > CN meškal-li 'alcoholic drink' (60)
*-šr- > -s-: šrq 'to whistle, hiss'; wayyišroq-uu 'they whistled, hissed' > UA *wisuko 'whistle' (1215)

Sibilants, though usually s initially and intervocalically, often and naturally become c when 2nd C of a cluster:
*-dš- > -c-: *xdš 'scratch', xadš 'scratching'; Arabic xadš 'a scratch, scratch mark' > UA/Tep *kïca 'scratch' (1490-p)
*-dd- > -c-: Eg xdw / xddw 'fish(es), coll. pl' > UA *kïcu 'fish' (365-6)
*-nz- > -c-, but Ca/Cp -n-: manzaal 'star, moon' > UA *mïcaC / *mïncaC (1077-p)
*-nš- > -c-, but -nc- in 2: Eg wnš / wnšiw 'jackal'; Coptic: woonš 'wolf'; wnšt 'f.' > Num *wancio / wocia 'fox' (129)
*-ns- > -s-/-hs-: Eg kns 'pubic region' > Wr kohsí 'anus, vagina' (358)
*-rs- > -c-/-nc- in one language: qarsol 'ankle' > UA *kwi(n)co 'ankle' (858-p)
*-rs- > -c-: qursəl-aa 'ankle bone-the'; Akkadian kursinnu 'region of the ankle-bone' > UA *koci 'ankle(bone)' (859-p)
*-rṣ- > -c-: 'arṣ-aa 'earth-ward, to the earth' > UA *wïcï, NUA *-y-, Num *-'- (581-p)
*-rṣ- > -'c-: qrṣ 'bite' > UA *kï'ca 'bite' (1447)
*-rz- > NUA -'-: 'arz-aa 'cedar-the' > NUA *wa'aC 'juniper/cedar', UA *-c- > NUA -'- also at 581 and 532 (582-p)
*-rs- > -s-: gursiptu 'butterfly' > UA *asiNpu(tonki) 'butterfly' (1057).
1057 and 358 above may be exceptions showing *-CS- > -s- instead of *-CS- > -c- (S = sibilant) as usual in the other 9, but keep in mind that c and s discrepancies occur in UA itself, as the two can differ only slightly.

Other 1st consonants of clusters are also lost or are absorbed to double the second consonant
*-kb- > -p-: kbd 'be heavy, honor, sweep', hiqtiil: hi-kbad > UA *(hi)paca 'sweep' (1354-p)
*-kt- > -t-: ktš / *-ktušu 'pound, bray' > tusu 'grind' (1094)
*-kb- > -pp-: kaukb-aa(') 'star-the' > UA *kuppaa': Sr kupaa' 'to shine (as of the stars)' (1274-p)
*-kt- > -Ct-: bkt 'to weave' > UA *kwiCta 'braid, wind around' (1445-kw)
*-ks- > -s-, Eu -ks-: Eg tks 'pierce' > UA/Eu *tïkso 'pierce, poke', but Op/Tr tesso (124)
*-nd- > -tt-: buundəq-aa 'ball, globule, sphere-the' > SP potto 'round, spherical' (1374-p)
*-tq- > -k-: motq-o 'its/his sweetness'; motq-aa 'her/its …' > UA *mumuko/ka 'bee' (1231)
*-tq- > -k-/-kk-: 'etqaraš 'to shade, put in the shade' > UA *hïkka / *hïkya 'shade' (1220)
*-tq- > -k-: tqp, impfv: -tqap 'prevail, overpower', təqoop 'might, strength' > UA *kopi 'win/lose in a game' (1081)
*-ṭm- > -m-: ʕaṭmaa 'thigh, n.f.' > UA *uma 'thigh, upper leg' (1282-p)
*-df- > -v-: Eg ddft 'snake, internal bodily worm' (Coptic jatfe) > Sr sïväṭ-ṭ 'body louse' (311)
*-tp- > -pp-: pakken / etpakkan 'speak much, chatter, gossip' > UA *aNpaka- / *-appaka 'talk, speak' (1151-p)
*-kb- > -kp-: rkb 'mount, climb up on' > CN tlakpa-k 'above, on top' (887-p)
*-kb- > -pp-: rkb 'mount, climb up on' > UA *cippih 'prairie dog' (rVkbi > tikpi > tippi > cippi) (888-p)
*-kb- > -pp-: rkb 'mount, climb up on', rikb-aa 'upper millstone-the' > UA *tïppa 'mortar (and/or) pestle' (889-p)

Sometimes the 1st consonant of a cluster reduces to a glottal stop rather than entirely disappearing:
*-mr- > -'y-: Aramaic tuumr-aa 'palm-the, date-palm-the' > UA *tu'ya 'palm tree, sp' (743-p)
*-qn- > -'n-: diqn-aa 'beard-the, chin-the' > UA *tï'na > *tï'ni 'mouth' (617-p)
*-qn- > -'n-: zaqn-o 'chin-his' > NUA *ca'no 'chin, jaw'; SUA *ca'lo 'chin, jaw' (628-kw)
*-xt- > -'t-: taxt-e 'under-him/it' or taxta 'under' > Wr te'ré 'down on the ground' (1389-p)
*-kt- > -'t-: makteš 'mortar, grinding stone' (< ktš 'grind') > UA *ma'ta/*maCta /*mattas 'grinding stone, mortar' (614)
*-kb- > -'p-/-pp-: rkb / rakb-uu 'they mounted, climbed' > UA *tï'pu 'climb up' (< rakb-uu) (99-p)
*-kb- > -'p-/-pp-: rkb / rakb-uu-hi 'they climbed it' (Syriac) > UA *ciCpuhi 'climb' (< rakb-uu-hi) (99-p)
*-rd- > -'r-: ṣᵊpardeaʕ 'frog' > UA *kwa'ro 'frog'; *haC 'the' clustered *ha-ṣṣpardVʕ > kwa'ro 'frog' (1378-kw)

Also -h- > -'- as 1ˢᵗ consonant of a cluster
*-ḥr- > -'r-: Eg pḥr 'turn, turn about, revolve,' > UA *pi'ri-na > *piyi(na) 'spin/twist thread, make rope' (289)
*-ḥp- > -'p-: nḥp 'copulate' > UA *na'pa 'join/be together, copulate' (192) see also 506
*-ḥt- > -'t- > -Ct-: Eg mḥt 'insect' > UA *matta / *maCti 'tick' (437)
*-ḥw- > -'w-: tehwe 'you are' > UA te'wa 'you'; yehwa 'he is' > UA ye'wa 'he' (110-p)
Glottal stops themselves are often absorbed to double the 2ⁿᵈ consonant:
*-'k- > -kk-:'aakal, *to'kal 'she/it eats' > UA *tïkkaC 'eat' (796-p)
*-'q- > -kk-: Eg p'q 'thin blade, leaf, sheet (of metal)' > UA pikkaC 'knife' (433)
*-'q- > -kk-: Eg fˀk 'be bald, shorn' > UA *piCka / *pikka / *piNka 'smooth, bald' (276)
*-'d- > -tt- / -Cc-: Eg ḥ'dt 'basket' > UA *huCta / *huCca 'basket' (404)
*-ḥt- > -'t- > -Ct-: Eg mḥt 'insect' > UA *matta / *maCti 'tick' (437)
*-'p- > -pp-: Eg k'p 'close (eyes), cover, hide self, droop (eyebrows)' > UA *kuppa / *kuCpa 'close (eyes)' (398)
*-'p- > -pp-: Eg g'p 'cut' > UA *kappi 'break, cut' (434)
*-'p- > -pp-: Eg g'p 'cut' > UA *koppi 'break' (435)
*-'b- > *-Cp-: Eg i'bty 'east, left' (Coptic yebt 'east') (*ya'baty? > *yo'boty) > UA *oCpoti 'left' (300)
In the unique cluster of *-C'- > -'w-, the 1ˢᵗ consonant > glottal stop, while the 2ⁿᵈ consonant, a glottal stop > w:
*-x'- > -'w-: Eg wx' 'seek, desire' > UA *wi'wa / *wa'wa 'seek, want' (288)
*-x'- > -'w-: Eg px' 'purge, clean' > UA *pi'wa 'clean' (286)
*-d'- > -w-: in bad'a 'beginning, start' > pïwa 'first, begin' (545-p)

Sometimes the imperfective pronoun prefix is retained with the impfv stem (*ya-qmuṣ 'be stingy' > UA *yamuC 'stingy'); however, at least as often, the impfv stem alone continued into UA without the prefixes. In such cases, the first two consonants of the stem form a cluster (-qm-), but the continuance of the stem without prefix puts that cluster in initial position, which loses its medial behavior tendencies, and naturally almost always loses the 1ˢᵗ consonant and simply begins with the 2ⁿᵈ consonant for Semitic-p items, for which there is no gemination or sign of the 1ˢᵗ consonant.
*-kb- > -p-: kbd 'be heavy, honor, sweep', impfv: -kbod > UA *poci 'sweep' (1353-p)
*-kb- > -p-: kbd 'be heavy, honor, sweep', hiqtiil: hi-kbad > UA *(hi)paca 'sweep' (1354-p)
*-kp- > -p-: kpr, impfv: *-kpor 'cover' > Tr pora 'cover' (1396-p)
*-ṣb- > -p-: ṣbʕ 'to dye'; impfv: *-ṣboʕ; Arabic impfv: ya-ḍbuġu 'to dye' > UA *pu 'dye' (1438-p)
*-ṣl- > -l-: ṣlʕ / impfv: -ṣlVʕ 'limp, be lame' > UA *lo'i 'lame, limp' (1108)
*-lx- > -k-: lxš / *-lxus-uu 'whisper, mutter sounds' > UA *kusu 'make sound (characteristic of species)' (1064-p)
*-kt- > -t-: ktš / *-ktušu 'pound, bray' > tusu 'grind' (1094)
*-qn- > -n-: qn' / impfv -qna' 'be jealous' > UA *nawa 'jealous' (1031-p)
*-lm- > -m-: -lmad 'learn' > UA *mata / mati 'know' (701)
*-rʕ- > *-w-: rʕy /impfv: *ya-rʕay 'to graze, tend (animals)' > Hopi layi 'herd, drive (animals)' (UA*w > Hp l) (1358)
In contrast, Semitic-kw items even in stem-initial clusters often show their 1ˢᵗ consonant prominence in the cluster.
*-mʕ- > -ŋ-: -mʕak 'squeeze, crush, rub' > UA *ŋaka/i 'grind, scrape, rub against' (940-kw)
*-nʕ- > -ŋ-: -nʕar 'shake, grunt, roar' > *ŋïy 'shake, be dizzy' (941-kw)
*-br- > -kw-: br' / -bra'- 'eat' > UA *kwa'a 'swallow, eat' (46-kw)
*-gd- > -ŋ-: gadiir 'walled place', *ya-gdiir 'cause wall to go up' > UA *yaŋi 'fence, enclosure, roofless walls' (916-kw)

-R- as 2ⁿᵈ consonant clustered with -t- or such simply strengthens the -t-
*-zr- > -c-: zrʕ / -zriiʕ 'bear a child' > CN ciiwa 'beget, gender' (624)
*tr- > t-: zˤrooʕ 'arm, forearm, power'; Arabic điraaʕ 'arm, forearm' > UA *toC 'with the hand' (1234-p)
*-tr- > -t-: hit-rapp'aa 'have oneself healed' > UA *hitowa 'medicine' (1236-kw)
*-đr- > -Cc-/-'ci-: Arabic bađara 'sow'; Arabic bađr- 'seed(s)' > *paCci / *pa'ci 'seed' (554-p)

In the next two, the sequence of laryngeal + y + t behaves similarly to each other, adjusting to a CVCV pattern:
*-ḥyt- > -uti-: Eg mḥyt 'fish (collective), literally: swimmers' > UA *muti 'fish' (234)
*-'yt- > -uti-: Eg m'yt 'sheath, vagina' > UA *muci or *muti 'vagina' (235)

Nasals in clusters with low-back consonants become NUA velar nasal ŋ: *-m'- > -ŋ-, or *-Nʕ- > -ŋ-
*-m'- > -ŋ-: Old Canaanite hassim'al 'the-left' > UA/ Tb 'aašiyan / aašiŋan 'left side' (1246)
*-m'- > -ŋ-: Eg ḥm' / ḥm't 'salt' (Coptic hmu) > UA *omwa > *oŋwa > *oŋa 'salt' (280)
*-m'- > -ŋ-: Eg sm' 'lung' > UA *somwo / *soŋo 'lung' (281)
*-m'- > -ŋ-: Eg qm' 'create, beget' > UA *kumCa / *kumwa / *kuŋa 'husband' (284)
*-mʕ- > -ŋ-: -mʕak 'squeeze, crush, rub' > UA *ŋaka/i 'grind, scrape, rub against' (940-kw)
*-nʕ- > -ŋ-: -nʕar 'shake, grunt, roar' > *ŋïy 'shake, be dizzy' (941-kw)
*-lm- > -'m- > -ŋ-: 'alima 'to experience grief', 'almaanaa 'widow' > UA *o'mana / *oŋana 'sad, suffering' (1144)

Contrast the next two pairs, one from Semitic-p and one from Semitic-kw:
*-mr- > -'y-: Aramaic tuumr-aa 'palm-the, date-palm-the' > UA *tu'ya 'palm tree, sp' (743-p)
*-mr- > -my-/-mi-: ṣɛmɛr 'wool' > UA *comi / *comya 'hair' (742-kw) (vs. Sem-p tumraa > tu'ya 'palm tree')
*-qm- > -m-: qmṣ / impfv: *ya-qmuṣu 'take, be miserly, stingy' > UA *yamuC 'angry, stingy' (1035-p)
*-qm- > -ŋ-: šiqma(t) 'sycamore tree' > UA *sïŋŋa(C) 'cottonwood or aspen' (1012-kw)
In homorganic clusters, the nasals are lost in most languages, but do appear in one or two languages:
*-nz- > *-c-, but Ca/Cp -n-: manzaal 'star, moon' > UA *mïcaC / *mïncaC (1077-p)
*-nš- > *-c-, but -nc- in 2: Eg wnš / wnšiw 'jackal'; Coptic: woonš 'wolf'; wnšt 'f.' > Num *wancio / wocia 'fox' (129)
*-ns- > *-s-/-hs-: Eg kns 'pubic region' > Wr kohsí 'anus, vagina' (358)
*-tn- > -c-: maatn-aim 'loins, dual'; Arabic matnat-aani 'loins, dual' > Ls mááča-t 'back' (1356)

In four instances of the cluster *-qn- below, three of the four (617, 628, 1031) approximate the expected *-'n-; and in the fourth, Semitic-kw *-qn- > -ŋ- (1032) is also expected. The 1032 Semitic-kw *-qn- > -ŋ- and the 628 Semitic-kw *-qn- > *-'n- may seem contradictory, but the cluster in 1032 of the impfv verb form has been a permanent cluster in Semitic for thousands of years while the cluster from which 628 derives was only occasional, only when possessed: *đaqan 'chin', but đaqn-o 'chin-his'. In other words, the two clusters were likely set centuries apart.
*-qn- > -'n-: diqn-aa 'beard-the, chin-the' > UA *tï'na > *tï'ni 'mouth' (617-p)
*-qn- > -'n-: zaqn-o 'chin-his' > NUA *ca'no 'chin, jaw'; SUA *ca'lo 'chin, jaw' (628-kw)
*-qn- > -n-: qn' / impfv -qna' 'be jealous' > UA *nawa 'jealous' (1031-p)
*-qn- > -ŋ-: qn' / impfv -qna' 'be jealous' > UA *ŋa'i 'get even, be jealous' (1032-kw)

In the below, we see Semitic-kw continuing its 1st consonant dominance of the cluster in 1375 (*-nd- > -n-), but in the Semitic-p and Egyptian contributions, the 1st consonant nasal is absorbed to double the following stop:
*-nd- > -n-: buundəq-aa 'ball, globule, sphere-the' > UA *kwinu 'round, spherical' (1375-kw) (vs. Sem-p *potto)
*-nd- > -tt-: buundəq-aa 'ball, globule, sphere-the' > SP potto 'round, spherical' (1374-p)
*-nt- > -tt-/-nc-: pant-aa' 'upper leather of a shoe, instep of the foot-the' > UA *paNca / *patta > *pacca 'shoe' (1281-p)
*-nt- > -tt-: Eg ʕnt 'nail, claw' (Coptic ine) > UA *watti 'claw, fingernail' (262)
*-nt- > -tt-: Eg bnty 'breasts' > UA *piCti / *pitti 'breast' (139)
*-nt- > -tt-: Eg mnt 'thigh'; mnty 'thighs, dual' > UA *macci / *maCti 'thigh, upper leg' (301)
*-nt- > -tt-: Eg ḥnt'sw 'lizard' (Coptic anθus) > UA *-hoto- 'lizard' (185)
*-nq- > -kk-: Eg inqt 'net' > UA *ikkaC / *iCkaC 'carrying net' (384)
*-nx- > -ŋ-: Eg ʕnx 'to live, v, (living) person, n' > Num *onka / *oŋa 'baby' (427)
*-nx- > -'ŋ- or SUA -'n-: Eg ʕnxt 'grain' > Tr/Wr *(w)o'na 'corn cob, olote' (443)
*-nx- > -'k- or -Ck-: Eg wnxyt 'clothing' > UA *waCkay(la) 'clothing, shirt' (223)
*-nh̲- > -ŋ-: Eg gnh̲t 'a star' > Num/SP kaŋa 'morning star' (156)
*-nħ̲- > -'-/-n-: dnħ 'rise, shine (sun, moon, star)'; dinħ-aa 'sunrise, star' > Num tinuN/ti'uN in *ta-tinuN- 'star' (1408)
*-gn- > -ŋ-: šagni 'remove from its place, transform, change clothing' > Hopi siiŋi 'peel, shed skin (of a snake)' (1419)
*-mm- > -'m-: tmm / tumma 'be finished, come to an end' > UA *tuma / *tu'ma 'finish' (820)

In the four items below, the languages show -mm-, but Kaufman reconstructs *-nm-, which exactly matches Egyptian, though I do not know how he figured out *-nm- for them:
*-nm- > -mm-/-nm-: Eg xnm 'inhale, smell, enjoy, eat (food)' > UA *kuCma/i / *kunmi (Kaufman) 'chew, nibble' (302)
*-nm- > -mm-/-nm-: Eg xnm 'inhale, smell, enjoy, eat (food)' > UA *kaNmu / *kanmï (Kaufman) 'jackrabbit' (463)
*-nm- > -mm-/-nm-: Eg xnm 'inhale, smell, enjoy, eat (food)' > UA *kamma / *kanma 'taste, have a taste like' (303)
*-nm- > -mm-/-nm-: Eg xnm 'inhale, smell, enjoy, eat (food)' > UA *kaCma 'cheeks, mouth' (304)

Nasals had often already assimilated in the ancient languages: Proto-Semitic *-nC- > Hebrew -CC-
ngʕ / *ti-ngaʕ 'she/it touches' > Hebrew tiggaʕ > Hp toŋo(k-) 'come into contact with, touch, reach' (*-g- > -ŋ-) (1196)
ngd / *hangiid > Hebrew (y/t/')aggiid 'tell, announce, inform' > TO 'aagid 'tell s.o. s.th.'; Hp ki-ta 'say' (1310-p)
Arabic singaab 'squirrel' corresponds to Hebrew *siggoob 'squirrel' > UA *sikkuC 'squirrel' (57)
mukkɛ 'smitten' (*mu-nkay > Hebrew mukkɛ) > UA *mukki 'die, be sick' (52)
hukkɛ 'was smitten' (< *hu-nkay) > Tb hookii 'deceased grandfather / grandson after death' (53)
hikkiir 'recognize, know' (< *hi-nkiir > Hebrew hikkiir) > Tr iki 'know, be aware of' (810)
npl / *ta-npiil > *teppil: 'cause to fall' > UA *tïppin 'trip, hunt, track' (822)
npš 'to breathe'; nɛpɛš 'breath, life, soul'; unattested: *hippiiš 'breathe' > UA *hikwis 'breathe, spirit, heart' (839-kw)
nṭʕ 'to plant', *yi-nṭaʕ > Hebrew yi-ṭṭaʕ 'he plants' > UA *'ïca 'to plant' (774-kw)

Pharyngeals become a round vowel with glottal stop as 1ˢᵗ consonant in a cluster with a nasal (or other):

*-ħn- > -o'n- or pharyngeal + nasal > u'N / o'N

*-ħn- > -o'n-: bħn, *-baħħen 'observe, examine, pull out organs to examine' > UA *po'na 'pull out, uproot' (1513-p)

*-ħn- > -o'n-: ħny / maħᵃne < *maħne 'camp, people of the camp' > UA *mo'na / *mo'ona 'son-in-law, in-law' (1407)

*-ħn- > -o'n-: ṭħn 'grind, pound, crush, destroy' > UA *to'na(C) 'hit, pierce (773)

*-ħm- > -um-: yħm 'be in heat, be warm' > UA *yuma > *yoma 'copulate' (855)

*-ħm- > -u'm-: yħm 'be in heat, be warm' > UA *yu'mi 'warm' (856)

*-ʕm- > -u'm-: ṭʕm 'taste, eat'; plural participle ṭoʕmiim > UA *cu'mi 'suck, sip (771)

*-ħti- > -u'ci-: Eg swħty / sħty 'fish, sp.' > Wr so'cí 'fish' (456)

*-ʕll- > -o'n-: ʕᵃṭallep 'bat'; ha-ʕᵃṭallep 'the-bat'; Aramaic ʕᵃṭallep-aa 'bat-the' > UA *ho'napi 'bat' (784)

*-ħl- > -ol-: nħl 'take/have as possession'; naħᵃlat 'inherited property' > TO nolawt 'buy, buy from' (1308)

The Phoenician *ha- and lack of rounding for the pharyngeal both suggest Semitic-kw for the next item:

*-ʕṭ- > -'t-: ʕaṭiišaa 'sneeze, n.f.', ha-ʕṭiišaa 'the-sneeze' > UA *ha'tisa 'sneeze' (1162-kw)

The following two may be due to a three-consonant cluster *-ħNw- > -ŋ-:

*-ħm- > -uŋ-: Eg nħm 'take, carry off' (Coptic nuuhm), if pl nħmw > Tak *nuŋu 'carry'; SUA *nuk 'carry, take' (369)

*-ħn- > -oŋ-: Eg ṭħn(w) 'sparkle, shine, gleam'; ṭħnħn 'be bright' > UA *toŋa 'hot, heat (of) sun/day, shine' (462)

Liquids, usually l, sometimes remain in the cluster:

*-lm- > -lm-: blm 'muzzle, wrap, restrain'; baalm-aa 'halter' > UA *kwalma 'put arm around, carry under arm' (16-kw)

*-lw- > -l- or -w-: śəlaaw / salway; Samaritan šalwi; Hebrew pl: śalwiim 'quail' > UA *solwi / *sowi 'quail' (1082)

Liquids as 1ˢᵗ C in a cluster may double the 2ⁿᵈ C, become glottal stop (-LC- > -CC-/-'C-), or nasalize in NUA

*-lm- > -'m-: 'alima 'to experience grief', 'almaanaa 'widow' > UA *o'mana / *oŋana 'sad, suffering' (1144)

*-lm- > -m-: -lmad 'learn' > UA *mata / mati 'know' (701)

*-rn- > -nn-/-'n-: 'arnébet; Akkadian 'arnabu; Arabic 'arnab 'hare, rabbit' > UA *wa'na/wanna 'rabbit net' (596-p)

*-rp- > -pp-: ħrp / ħɛrpaa 'shame, mutilation, deficiency' > Hp ööpï 'sickly, wounded, invalid, one with disability' (663)

*-rk- > -kk-: bar kəbaan-(aa) 'belt', kbn 'gird' > UA *pakkaC 'belt' (1446-p)

*-rk- > -kk-: karkara / qarqara 'coo (pigeon), grumble, gurgle' > UA *kakkara 'quail' (960)

*-rk- > -k-: birkaa 'blessing, praise' (often sung) > UA *kwika 'sing, song' (35-kw)

*-rg- > -kk-: ħirgaa' 'dust' > UA *huCkuN 'dust' (665)

*-rd- > -tt-: 'ard-aa 'mushroom-the' > UA/Num *hitto'oC / *witto'oC 'mushroom' (1110-kw?)

*-rd- > -tt-: qarduun-aa 'louse-the, nit-the' > UA *aCtïN > *attïN 'louse' (971-kw)

*-rd- > -'r-: ṣᵃpardeaʕ 'frog' > UA *kwa'ro 'frog'; *haC 'the' clustered *ha-ṣṣpardVʕ > kwa'ro 'frog' (1378-kw)

*-rd- > -r-: ṣᵃpardeaʕ 'frog' > UA *siboro 'tadpole' (1377-p)

*-rṭ- > -Ct-/-tt-: sarṭaan / *sarṭoon 'scratcher, crab' > *saCtun > siCtun / *suCtun 'claw, nail, crab' (832-p)

*-ld- > -t-: *xuld / *xild-aa' 'mole, cave dweller-the' > UA *kita 'groundhog' (1088-p)

*-lṭ- > -tt-i > -c-i: bilṭii 'worm sp' > UA *kwici 'worm' (23-kw)

*-l- > -l-: *ħool 'sand'; Aramaic ħaal-aa; Aramaic pl: haalaat-aa 'sand, sandy area' > UA *(h)ola (Tep) (1141)

*-lt- > -tt-: *ħool-taa > *otta (Num) 'sand' (1141)

*-lt- > -tt-: plṭ 'escape', pl participle: poolṭiim > UA *puCti 'escape' (793)

*-lg- > -k-: Hebrew šɛlɛg 'snow' (< *θalg) > UA *sïk: CN sek-tli 'snow, ice' (760)

*-lg- > -kk-: Aramaic talg-aa 'snow-the' > NUA/Num *takka 'snow' (1276-p)

*-lp- > -pp-: qlp 'to peel, shell, scrape off, strip off'' > Hp hàapo(-k-) 'get loosened, chipped' (1010-kw?)

*-lk- > -(N)k-/-ŋ-: hlk, impfv: sg: yelek / yelku / *yelka 'go' > UA *yïka or *yïŋa / *yïNka 'enter, move, travel' (1085)

*-lk- > -ŋ-: mlk 'to lead in council'; mɛlɛk / malk- / moolek 'king' > Hopi moŋwi 'chief' (1300)

*-rq- > SUA -'k-: prq 'separate from, depart, go away' > UA *pa'ku 'out' (1243-p)

*-rg- > SUA -'k-/-y(k)-: drg 'rise, step, tread' > UA/Tep/Wr *tïy(k) / *tï'kï 'climb, step, make thump noise' (1326-p)

*-rq- > SUA -'k-/-k-: Eg srqt / s'qt 'the-scorpion' > UA/TrC *saka 'scorpion' (363-Eg)

The cluster *-r'- is nicely arrayed as expected in 1042-kw, which see:

*-r'- > Tak -yh-, Hp -n-, SUA -r-: mar'a 'princess' > SUA *mara / Tak *mayha 'daughter' (1042-kw)

*-r'- > Num -'-: *mar'a 'princess' > Num *ma'a 'woman' (1043)

-R- with a pharyngeal or other back consonant often yields -ŋ- in NUA:

*-rʕ- > -ŋ-: ṣirʕaa 'hornets' > UA *saŋa 'yellowjacket, stinging one' (737-p)

*-rʕ- > -ŋ-: ṣrʕ / ḍrʕ 'weak, lean, emaciated', v.n. ḍarʕ, ḍuruuʕ > UA *corowa / *corwa > coŋo 'be hungry' (1066-p)

*-ʕr- > -ŋ-: ʕry / ʕr' / ʕaraa, impfv: ta-ʕra 'to contain, hold' > UA *taŋa 'bag, sack, put in container' (1418-p)

*-rħ- > -w-/-ŋw-: Eg qrħt 'serpent, ally, partner' > UA *koNwa > *kowa; Tak/Azt*koŋwa 'snake, twin' (332)

*-rg- > Num -Nk-/-ŋ-/-kk-:'argaamaan 'red-purple'; Akkadian argamannu 'purple' > UA/Num *aNkaC 'red' (587-kw)

*-rq- > UA/Tak -ŋ-: qarqaḍaan 'squirrel' > UA *koŋi 'squirrel' (957-p)

*-kl- or *-rk- > -ŋ-: rkl / rakla, impfv: ta-rkulu 'kick' > UA *taŋa 'kick' / *cïŋï 'kick' (vs. 1134 below) (1507)

These may not have been clusters originally, but separated consonants that later clustered:

*-rʕ-/-roʕ- > -ʔw-: ʕaroʕer / ʕarʕaar 'juniper tree' > *waʔwari > waorí / awarí 'juniper' (689-kw)

*-rʕ-/-raʕ- > -ʔw-: pɛraʕ / *parʕ-aa 'hair' > UA *pïʔwa 'hair, hide, fur' (1132-p)

*-rʕ-/-rᵃʕ- > *-ʔw-: rʕy /impfv: *ya-rᵃʕay 'to graze, tend(animals)' > Hopi layi 'herd, drive(animals)'(UA*w/Hp l) (1358)

*-rʕ- > -rʔo-/-roʔo-/-ʔro-: prʕš 'jump' / parʕoš 'flea (jumper)' > *parʔosi / *paroʔosi 'jackrabbit' (724)

*-rw- > -ʔw-/-ʔVw-: Eg wr 'big, much, many'; wrw 'the greatest' > UA *wïrwïru > *wïʔwïru > wïʔïwïru 'big' (221)

Clusters separated: Cluster separation happened in both Masoretic Hebrew and in UA. In Biblical Hebrew, as voweled by the Masoretes centuries after the consonants were written, the so called guttural consonants (ʕ, ħ, ʔ, r) in original Semitic clusters would separate the cluster with a vowel. For example, other Semitic languages show a cluster *-rʕ- in * ʕarʕar 'juniper tree' while Masoretic Hebrew has both ʕaroʕer / ʕarʕaar, the first of which separated the cluster between two gutturals: ʕarʕar > ʕaroʕer. Note that a round vowel does this ancient separation of the two gutturals, and the anticipated consonant is a pharyngeal. For Semitic-kw we would expect something like UA *wayowey; and UA *wayori, if -ri is an old noun suffix, fits. Other examples of Masoretic separated clusters include *yaʔmiin > yaʔamiin > UA *yawamin 'believe'. UA also separates some clusters, though why some separate while others do not, is not always clear. Nevertheless, worth noting is that the UA separated clusters also involve laryngeals or r, as happens in Masoretic phonology also.

*-rʕ- > -ʔw-: ʕaroʕer / ʕarʕaar 'juniper tree' > *waʔwari / *wayori > waorí / awarí 'juniper' (689-kw)

*-rʕ- > -rʔo-/-roʔo-/-ʔro-: prʕš 'jump' / parʕoš 'flea (jumper) > UA *parʔosi / *paroʔosi 'jackrabbit' (724)

*-rg- > -rug-: ħargol 'type of locust'; Arabic *ħargal / *ħurgul 'locust' > Tr urugi-pari 'type of grasshopper' (1321-kw)

*-ʔt- > -ʔot-: qaʔt-aa 'pelican' > UA *koto / *koʔota 'crane' (1000-p)

*-ʔt- > -ʔat-: raaʔtaa / raataa 'lung(s), n.f.' > Cr taʔatime 'lungs' (1428)

*-qb- > -kup-: raqbubit 'moth' > UA *(V)kupïpika 'butterfly' (1054)

*-tp- > -ʔp-: Eg stpt 'choice things of food' > SUA saʔpa / saʔapa 'meat' (256)

*-lb- > -ʔp-: ħelɛb 'fat' < *ħilb > UA *wip / *wiCp / *wiʔp (>*wiʔi) 'fat' (652-p)

Liquid > -ʔ- then anticipated (*-CL- > -Cʔ- > -ʔC-) or anticipation and glottalization may be simultaneous:

*-ml- > (-mʔ- >) -ʔm-: śimlaa / śimla-t 'wrapper, mantle, cloak' > *samʔaC 'to spread, v, a cover, rug, blanket, n' (764)

*-kl- > (-kʔ- >) -ʔk-: tiklaa 'purple-blue, violet' > UA *tïʔkaC 'red pigment' (1134)

*-đr- > (-cʔ- >) -ʔc-: bađara 'sow'; bađr- 'seed(s)' > *paCci / *paʔci 'seed' (554-p)

*-ħr- > (-wʔ- >) -ʔw-: baħr- 'sea, large river, water (vs. land)' > UA *paC (pharyngeal -C) / *paʔwi 'water' (1165-p)

*-šl- > (-lš- >) -ʔs- > -ʔas-: tašleeg 'it is snowing' (hiqtil impfv) > UA *taʔasïC 'freeze' (1336)

*-nr- > (-nʔ- >) -ʔn-: Eg ʕnr(t) 'flint' > UA *wiʔnaC 'flint, arrowhead' (426)

*-mr- > (-mʔ- >) -ʔm-: ṭmr 'bury, cook underground with coals' > UA *tïʔma 'baked underground with coals' (865)

*-ṭr- > (-ṭʔ- >) -ʔt-: pɛṭɛr 'firstborn' < *paṭr- > UA *paʔti / *paCtiʔi 'older sibling' (837)

Other types of 2ⁿᵈ consonants > ʔ and then anticipated

*-nq- > -ʔn-: ynq 'to suck', impfv: yiinaq; yaanq-aa 'nursing child-the' > UA *yïʔna 'smoke by sucking' (1160)

*-nx- > -ʔŋ- or SUA -ʔn-: Eg ʕnxt 'grain' > Tr/Wr *(w)oʔna 'corn cob, olote' (443)

Liquid as 2ⁿᵈ consonant is usually lost or lessened to -y- or -ʔ-:

*-ql- > -k-: ħaql-aa 'field-the, open country-the' > UA *oka 'sand, earth, rock' (1275)

*-qr- > -k-: qrʕ 'rip/tear to pieces', impfv: -qraʕ > UA *kowV 'to tear' (965)

*-ql- > -k-: šql take, take (self away), depart' > UA *saka(la) 'go, leave' (1086)??

*-ṣr- > -lʔ- (Tb): ħṣr (< *xđr) 'be green, verdure, vegetation' > Tb hulʔhulat 'be green' (1412-kw)

*-šl- > -lʔ- > -ʔas-: tašleeg 'it is snowing' (hiqtil impfv) > UA *taʔasïC 'freeze' (1336)

*-ħr- > -r-: ħrb 'lay waste, destroy'; ye-ħrab 'massacre' or *yuħrab > SP yurava 'be overcome' (exception?) (674)

Velar/Uvular + -r- > -ky-:

*-gr- > -ky-: pagr-aa 'corpse, body' > UA *pïkyaa 'skin, animal hide, flesh' (1130-p)

*-gr- > -ky-: šigr-aa 'drain, ditch, gutter-the' > Hp sikya 'small valley, ravine, canyon with sloped sides' (1403-p)

*-qr- > -ky-: šqr 'be fair complexion, blond, blondness, redness, fire color' > Hopi sikya- 'yellow' (1405)

*-ħr- > -ʔr-: Eg pħr 'turn, turn about, revolve,' > UA *piʔri-na > *piyi(na) 'spin/twist thread, make rope' (289)

Liquid *-ll- > -n- in Numic:

*-ll- > -nʔn-: bll moisten, mix' > UA *kwallV 'soft(en), stir', Num -nn-, SP -nʔn- (22-kw)

*-nl-/-ll- > -n-: lebb, hal/han-lebb 'the-heart' > Hp ïnaŋwa 'heart, life' (1312-kw)

*-ħabbil (< *ħbl) 'bind, tie together' > SP wïkkwinta 'to wrap around, coil' (658-kw)

And nasal clusters show glottal stop between the two in SP: *-NN- > SP *-NʔN-

*-ll- > -nʔn-: bll 'moisten, mix' > UA *kwallV 'soft(en), stir', Num -nn-, SP -nʔn- (22-kw)

*-mm-/-mml- > -mʔm-: wayyigammel 'tie, load, adorn' > SP wïkamʔmi 'put blanket over' (938)

Clusters sometimes reduce the whole complexity to simply glottal stop -'-. Such even show a difference between closely related languages of the same branch. For example, no UA specialist would doubt the relatedness of the Tr and Wr terms in 1058 (below), or the terms of the closely related Numic languages in 1408, yet the discrepancies -y- vs. -'- and -n- vs. -'- are major differences without explanation to date.

*-rn- > -y-/-'-: šarnaqat 'cocoon', pl *sarnaqoot > Wr *ca'ïku / Tr *cayïku < *caCCïku 'cocoon' (1058-kw)
*-nħ- > -'-/-n-: dnħ 'rise, shine (sun, moon, star)'; dinħ-aa 'sunrise, star' > Num tinuN/ti'uN in *ta-tinuN- 'star' (1408)
*-rq- > NUA -'-: 'arqə-taa / ʕarqə-taa 'fluke worm, parasite worm' > UA/Num *wo'a 'worm' (1224)
*-rz- > NUA -'-: 'arz-aa 'cedar-the' > NUA *wa'aC 'juniper / cedar tree' (582-p)
*-rṣ- > -c-: 'arṣ-aa 'earth-ward, to the earth' > UA *wïcï, NUA *-y-, Num *-'- (581-p)

A remaining handful of unique clusters:
*-ʕr- > -ŋ-: ʕry / ʕr' / ʕaraa, impfv: ta-ʕra 'to contain, hold' > UA *taŋa 'bag, sack, put in container' (1418-p)
*-ʕrat > -wi 'girl' perhaps not originally a cluster (91-kw)
*-rw- > -v-/-'p-: rwy 'drink', hirwaa / hirvaa, hirvee- 'to water (s.o./s.th.)' > UA *hiCpï / *hi'pa / *hiypi 'drink' (1061)
*-kħ- > -(x)kw-: Eg rkħ 'fan into flames, burn, vi, be on fire' > UA *taxkwa 'ceremonial official, fire tender' (451)
*-lʕ- > -oh-/-'o-: saalʕaam 'locust' > UA *coho / *co'o 'grasshopper' (816-kw)
*-lʕ- > -w-/-ŋ-: ṣelaʕ / ṣalʕ- 'rib'; Arabic đlʕ 'incline/lean, limp', Arabic đilʕ- / đilaʕ- 'rib' > UA *cawa 'rib';
   UA/Hp/Ca caŋa 'side, limp, rib'; Azt silaŋ 'rib'; this set is complex, as a variety of Semitic originals, with and without
   clusters, make it difficult to sort the variety of UA forms (744)
*-'x- > -'w-: 'ħz (< *'xđ), impfv: yooħez (< *ya'ħiz) 'take, grasp' > UA *yawi / ya'wi / yaŋwi 'take, carry' (835-kw?)
Egyptian m'm' 'dom-palm tree' > UA *maCwa 'palm tree'; after initial ma…, the rest (-'m'-) scrunched to various
   cluster results of no consistency among UA reflexes, though Ch …mau'um… may refect it best. (227)
*-gd- > -ŋ-: gadiir 'walled place', *ya-gdiir 'cause wall to go up' > UA *yaŋi 'fence, enclosure, roofless walls' (916-kw)
   In Sem-kw can expect *-gd- > -ŋ- as in 916, and in Sem-p, we might expect *-gd- > -'t- or such, so to see
   *-gd- > -k- in 1492 may make it invalid, unless the cluster separated (-gd- > -gVd) or some other explanation:
*-gd- > -k-: gdl 'wax / grow big'; mugdal 'big' > UA *mukaC-: Ls muká-t 'big, large' (1492-kw)
*-ryt- > -Ct-: guuryə-taa / guur-taa 'cub (female), young of animal (usually lion or dog) > UA *koCti 'dog' (1025)
These last two would feel better if they had company, more examples of the same cluster
*-rt- > -s-: ħagor-taa 'girdle, loincloth' > UA *wikosa 'belt' (1046-kw)
*-rtħ- > -s-/-r-: Eg wrt ħq'w 'buzzard, great (of) magic' > *wirhukuN > *wis/rukuN 'buzzard, turkey vulture' (381)

7.3 Grammatical and Morphological Parallels

The grammatical and morphological parallels between the Near East languages and UA have been noted periodically throughout the book as they occur, but are gathered here for unified consideration.

Five Stative and Passive Affixes: Most pervasive, in all branches of UA, is the Egyptian old perfective / stative -i (final vowel -i on verbs), which final -i is also a perfective in Tep and a stative in all other branches:
(116) Egyptian old perfective/stative   verb-i   verb-i 'intransitive / passive / stative verb'
Three other Egyptian passives or statives are also found in UA, suffixes in both Egyptian and UA:
(117) Egyptian passive   verb-w/-iw   verb-wa/ verb-iwa
(118) Egyptian passive   verb-tw   verb-tu / verb-tuwa
(119) Egyptian stative suffix   verb-ti   verb-ti (WTr, Numic, others)
The Northwest Semitic passive / reflexive / reciprocal prefix is also found in UA:
(2) Northwest Semitic reflexive/reciprocal/passive prefix *na- > UA reciprocal/ reflexive prefix *na-

Five plural morphemes: Four Semitic plural suffixes match four UA plural suffixes, and one Egyptian prefix, which is also a plural prefix in Egyptian.
(1) Northwest Semitic masculine plural suffix *-iima > UA pl suffix *-ima
(904) Hebrew feminine plural suffix -oot / -ootee^y; the primary suffix -oot, is often augmented to -ootee(y) > UA *-tï 'plural suffix' in three branches of SUA plus Hopi in NUA. Besides being a regular plural suffix in those branches, many other instances of -ootee^y fossilized into UA terms from the Hebrew feminine plural of which we give an example in 564 below:
(564) Hebrew saapaa(t) 'lip', pl: sapoot 'lips', sᵊpootee^y 'lips of' > UA *puti 'lip' in Tbr tini-purí-t 'lip'
(1417) Aramaic -aayaa '-the' is the Aramaic definite plural suffix > Hopi -ya, one of Hopi's non-singular plural suffixes, yet it most often follows -a, as in -a-ya 'pl' to parallel Aramaic -aayaa

For three suffixes—*-iima > UA *-(i)ma, *-ootee^y > UA -*tï, *-aayaa > UA *-ya—the consistency is that the first vowel is usually lost in UA, while the consonant and final vowel more often remain in UA. The reason the first vowel is often lost is because most UA forms end with a vowel, which creates a dipthong or vowel cluster, which clusters in UA are usually simplified by the first vowel eliminating the second.

One Egyptian plural found in UA is a prefix, again both in Egyptian and in Tarahumara.
(121) Egyptian i- or ip- 'plural prefix on old demonstrative pronouns' (Gardiner 1969, 85; Allen 2000, 53) as in Egyptian pn, pw, tn, tw 'this'; ipn, ipw, iptn, iptw 'plural, these.'
Tr i- or ip- 'plural prefix': Tr čabóči 'spider'; Tr ičápoči 'spiders';
Tr siríame 'local/tribal leader, governor'; pl: isérigame 'leaders' (Brambila 1953, 14, 15)
Tr bineri 'alone, only, sg'; Tr a'wineri 'alone, only, pl' (< *appineri, Stubbs 1995, 413)

In addition, Hebrew's dual suffix is also a dual suffix in UA:
(905) Hebrew -ayim / -aym 'dual suffix' > Northern Ute and WMU -ïm/-yïm/-əyəm 'dual suffix'

Egyptian pw: Most UA pronouns are from Semitic or Egyptian (see 101-114, and the last item 1528); however, the one most impressive morphologically and syntactically is Egyptian -pw 'he/it' in phrases of 'noun/adjective-pw 'he is noun/adjective':
(122) Egyptian pw, originally a demonstrative pronoun 'this/it' later 'he/they' and came to be used for emphasis or topicalization, always in 2nd position in specific structures: A-pw B 'it is A who is B / A is B' or A-pw verb 'it is A who verbs'; Egyptian pw > UA *po/pu 'he, she, it, 3rd sg': Ls -pu-; Wc pï-; and My -po.
Ls yixél**vu**-l 'intelligent, alert' fits perfectly Egyptian iqr-pw 'he (pw) is one excellent, intelligent, capable';
Ls 'itéŋvu 'hot spring' ('itéŋ- 'hot'), so 'itéŋ-vu 'hot-it is' or 'it (is) hot';
(1146) Aramaic tek / tikk-aa 'twisted cord, chain-the' so *tikka-pu 'cord-it is' > UA *tikaa-pu 'rope':
Mn tïġápo 'rope'; NP tïgapu 'rope'; and several other examples at 122.

Late Egyptian article prefixes are treated at 4.4 and are as follows:

	masculine	feminine
Indefinite singular: 'a/an'	wa-	wa-
Definite singular: 'the'	pa-	ta-
Plural 'the' for either gender	na-	na-

Several UA terms (373-380, 174, 339, 520, and others) have fossilized together the Egyptian article prefix with the Egyptian term. We do not repeat all of them here, but note the following sample:
(174) Egyptian sxt 'country, pasture, willow, n.fem' > UA *sakat / *sakaC 'willow'; UA *sakat 'willow' is widespread in 6 of 8 branches, but Hopi has the fossilized feminine prefix for this Egyptian feminine noun in Hopi tïïsaqa 'grass'.
(339) Egyptian t'-ḫimat 'the-wife' (Coptic hime) > UA *tïhima 'spouse': These match the definite article form: Egyptian t'-ḫimat 'the-wife'.
(373) Three synonymous variants for Tr 'bumblebee'—Tr napári, ŕapára, wapára—have undergone a vowel change from Egyptian bit 'bee' which is a feminine noun and so has the three prefixes: na-, ta-, wa-.

Hebrew and Arabic have prefixed definite articles; however, Aramaic has suffixed articles in 'noun-the' morphology: masculine noun-aa(') and feminine noun-t-aa('). The final glottal stop is in parentheses because it is written, generally only to signify a long vowel; however, it appears that UA forms may be from a dialect that was pronouncing the glottal stops, perhaps ancient mistakes in reading. In some Aramaic dialects, these forms with definite article have become the citation forms of nouns, the 'the' becoming obscure, as it is in UA also. First, note the masculine nouns to which -aa(') 'the' is suffixed:
(743) Aramaic tuumr-aa 'palm-the' > UA *tu'ya 'type of palm tree' fits Aramaic, but not Hebrew taamaar.
(604) Aramaic rə'emaan-aa / reemaan-aa 'antelope-the' > UA *tïmïna 'antelope'
(618) Aramaic di'b-aa 'wolf-the' > UA *tï'pa 'wolf' (vs. Hebrew haz-zə'eb 'the-wolf')
(617) Aramaic diqn-aa 'beard-the, chin-the'> UA *tï'na > *tï'ni 'mouth' (vs. Hebrew zaaqaan 'beard, chin')
(1130) Aramaic pagr-aa 'corpse-the' > Hp pïïkya 'skin, fur' (vs. Hebrew hap-pɛgɛr 'the-corpse')
(1403) Syriac šigr-aa 'drain, ditch, gutter-the' > Hp sikya 'small valley, ravine, canyon with sloped sides'.

(1405) Arabic šqr 'be of fair complexion, blond, fair-haired, color of fire'
> Hopi sikya- 'yellow'; Hopi sikyà-ŋ-pï 'yellow(ish) thing'; Hopi sikya-qa'ö 'yellow-corn'.
(1046) Hebrew ħgr 'gird (self)'; Hebrew ħᵃgoraa 'girdle, loincloth, n.f.'; Aramaic *ħagor-taa
> UA *wikosa 'belt'. The -r- devoices next to voiceless t, then the whole cluster goes to -s-.
(889) Hebrew rkb 'to mount, climb up'; Aramaic rikb-aa 'upper millstone-the'; Syriac rakb-aa 'upper
millstone-the' > UA *tïppa 'mortar, pestle' (i.e., upper millstone): Wr te'pá 'above'; TO čïpa 'hole in
bedrock for mashing mesquite bean'; ST topaa 'mortar'; Ls tóópa-l 'mortar for grinding' (Ls o < *ï)
(634) 'loins, hip': Akkadian xanṣaatu; Syriac ħaṣṣaa; Arabic xaṣr- 'hip, haunch, waist'; Samaritan ħarṣ-aa;
Aramaic ħarṣ- 'hip'; Mandaic halṣa, haṣa > UA *kaca- 'hip'
(1409) Aramaic kuuky-aa' 'spiderweb' > UA *kuukyaC: Hopi kookyaŋw 'spider'; Ls kúyxiŋi-š 'black
widow spider'; Sr kuka-ṭ 'spider'; Ktn kuka-č 'spider'; even Cp kúka-t 'blackwidow spider' shows a final
consonant where that glottal stop would be; otherwise, the absolutive suffix would be -l, not -t.

Sometimes the final glottal stop (whether originally pronounced or not) of Aramaic's definite article suffix—
masculine -aa' or feminine -taa', is apparent in UA, as in spider above (1409) and in many others (as below):
(81) Aramaic *ħaberet > UA *hupi- > Cr hïi (because *u > Cr ï, and *-p- disappears in Cora, so
Aramaic *ħaberet-aa' 'woman' > Cr hüita'a 'woman' (Casad 1984, 161) is a very good match;
(1055) Syriac 'aamaqqət-aa' 'lizard-the, n.f.' > NP makaca'a 'horned toad' (with echo vowel after -a')

Also notice how well Western Numic (Mn and NP) words for 'deer' reflect both the feminine -ta 'deer' and
the masculine -a 'buck deer' as a distinction in Mn and NP:
(638) Semitic *raxel 'ewe' > Mn tïhïta 'deer'; Mn tïhïya 'old buck'; Mn(L) tïhïhta 'deer'; NP tïhïdda 'deer';
NP(B) tïhï'ya 'deer'. So Mn has both and the genders match. The NP dialects show one of each as a general
word, but no gender distinction, yet NP(B) tïhida when possessing s.th.'
(794) Aramaic 'iibr-aa' 'penis-the' > UA *wï'aC 'penis'

Longer Aramaic words of 3 and 4 syllables often lose the first syllable in UA, yet all else in UA very well
matches that Aramaic form. Of course, a Hebrew cognate may have existed, yet many UA forms match
Aramaic forms not found in Hebrew, or would not match Hebrew correspondences as in 1056:
(1054) Aramaic raqbubit-aa 'moth-the' > UA *(V)kupïpika 'butterfly'
(1055) Syriac 'aamaqqət-aa 'lizard-the, n.f.' > UA *makkaCta(Nka)-ci 'horned toad'
(1056) Syriac ħady-aa 'breast-the, n.f.', pl: ħᵊdaawaat- > UA *tawi 'chest'; UA aligns with the Aramaic
plural with loss of the first unstressed syllable of the plural.
(23) Syriac bilṭii-taa 'boring worm-the' > UA *kwici 'worm, feces-snake'
(19) Arabic barr- 'land'; Aramaic *barr-aa 'field-the' > UA *kwiya / *kwira 'earth'
(603) Aramaic rymh (= riimaa) 'large stone'; with '-the' suffixed would be
Aramaic riimə-taa 'large stone-the, n.f.'; Syriac ryaam-taa 'large stone-the, n.f.' > UA *tïmï-ta

Another feature suggests that Semitic-kw is Phoenician-like, while Semitic-p is more Aramaic-like. There is
evidence that some nouns from Semitic-kw used to include the Northwest Semitic definite article prefix
*haC- > UA *iC- (vs. Semitic-p Aramaic suffixes masculine: -aa / feminine: -t-aa); not all Semiticists agree
whether this prefix *hal-/*han- ends with -l- or -n-, but either way, that final -C assimilates to double the
initial consonant of the noun in Phoenician/Hebrew and does the same in Arabic for some sounds. Some
nouns from Semitic-kw appear to include the article prefix:
(1522-kw) Hebrew *ham-madwe 'the-menstrual blood' > hiNtwa > UA *iNtwa 'blood' in Hp ïŋwa, Tb ïkwa-l
(1312-kw) Hebrew *hal/han-lebb 'the heart' > Hp ïnaŋwa 'heart, life'
Other forms lost a short initial syllable, which would be quite natural if subject to the prefix *haC-, causing the first
short syllable to collapse, then when taken off, the resulting form would lack it:
(1378-kw) ṣᵊpardeaʕ 'frog' > UA *kwa'ro 'frog'; *haC- 'the' encouraged cluster *ha-ṣṣpardVʕ > kwa'ro 'frog'
(597) Arabic 'arnab 'hare, rabbit', Hebrew f. pl: *'ᵃrnaboot, ha'rnabot > ha-tapot > UA *taput 'cottontail rabbit'

Noun morphology with possessive suffix

Verbs or Nouns followed by the 3rd person singular suffix Hebrew -w / -o periodically appear in UA:
(628) Hebrew zaqn-o 'chin-his' > SUA *ca'lo 'chin, jaw'
(567) Hebrew ya-'amiin-o 'he-believes-him/it' > UA yawamino 'believe him/it'
(906) Hebrew -w 'his/its' > UA *-wa / *-wV 'possessed suffix' usually as -w in most UA languages

Semitic Verb Morphology in Uto-Aztecan

(1494) explains the morphological and syntactic similarities of the Hebrew vav-consecutive, a perfective or past-tense construction, and the formation of the Nahuatl past tense. The order of morphemes is also the same in both Hebrew and Nahuatl, and both drop the final vowel of the verb stem:
Hebrew wa-pronoun prefix-jussive verb stem (dropping final vowel), as in wa-yi-šb 'and-he-take captive'
Nahuatl oo-pronoun prefix-verb stem (dropping final vowel), as in *oo-ni-nemi 'past-I-lived' > oo-ni-nen
In Cora the more clear and original wa- is prefixed.

It is natural to expect that 3rd person singular forms would be the most likely to survive, and indeed Semitic 3rd person sg forms are what we find most in UA, while 1st and 2nd person forms are almost non-existent.

(3) Northwest Semitic sg perfective ***yašiba** 'sit, reside' > UA ***yasipa** 'sit, reside'
       pl perfective ***yašibuu** 'sit, reside, pl' > UA-Tep ***yasipu** 'sit, reside'; the two Semitic forms (sg and pl) are not specified as sg and pl in UA, but both exist in UA, having lost number significance.
(4) Hebrew bšl / **baašel** 'boiled' > ***kwasïC** 'cook(ed), ripe(n)'; while most of UA reflects the baašel adjective, AYq has both the perfect verb *bašala > AYq bwasa'a (*-l- > -'-) and the adj AYq bwase/bwasi

The final vowel of the Proto-Semitic singular perfective kataba / yašiba was lost in Hebrew (kaatab) and in Aramaic (kətab), but is preserved in Arabic kataba and sometimes appears in UA:
(3) Northwest Semitic sg perfective *yašiba 'sit, reside' > UA *yasipa 'sit, reside'
(87) Arabic ʕgz / ʕagaza 'to age, grow old (of women)' > Tr wegaca- 'grow old (of women)'
(94) Hebrew ršʕ 'act wickedly, be guilty' > UA *tasawa 'be/do bad'
(580) Semitic qr' / qara'a 'call, cry out' > UA *koyowa 'yell, shout'

Of course, not all UA forms are so fully formed; many are shortened.
(576) Hebrew 'aataa^y / 'atii- 'come'; Arabic 'ty / 'ataa^y 'come'; Syriac 'ita / 'εta > UA *wica > wic 'come'

Final vowel -uu of the Semitic **plural -uu** sometimes appears in UA and is sometimes specified as plural in the Tep branch:
(50) Hebrew -lbašu 'put on (garment), clothe (oneself)' (-lb- > -bb- > -kw-) > UA *kwasu 'dress, shirt'
(3) Most UA forms reflect sg pfv yašiba, but pl pfv *yašibuu 'sit, reside, pl' > UA/Tep *yasipu 'sit, reside'
(99) Hebrew rakb-uu 'they mounted, climbed' > UA *tï'pu 'climb up'
Syriac rakb-uu-hi 'they climbed it' > UA *ciCpuhi 'climb'; Mn cibuhi 'climb with arms and legs'
(528) Semitic bayt-uu 'they lie down, pl' > PYp veetu 'lie, be situated, inan pl'; both even agree in plural.
(1034) Hebrew nqm, Arabic naqama 'avenge o.s., be angry', pl naqamu > Wr nehkamú- 'be angry'
(1068) Hebrew hi-qšiib 'listen, prick up ears', impfv: (ya)-qšeeb, pl: -qšebuu / -qšiibuu > UA *kïpu 'hear'
(1258) Hebrew plural: ʕaluu 'they stood up'; while the two forms of Tbr were / welo 'estar, estar en pie' align with singular and plural, the Tepiman forms align with a reduplicated plural UA *wïwïlu-ka 'stand, pl'
(221) Egyptian sg wr 'big' and pl wrw/wrwrw > UA *wïrwïru 'big'
Note how often Tepiman verbs (often pl in Tep also) reflect Semitic plural forms: 3, 221, 528, 1258.

The Hebrew conjugation called hiqtiil in the form of hi-CCiiC is also found in UA:
(810) Hebrew hikkiir 'recognize, know, know how to' (hiqtiil of nkr) > Tr iki- 'know, be aware of.'
(838) Hebrew npš 'breathe'; nεpεš 'breath, life, soul'; unattested *hippiiš > UA *hikwis 'breathe, spirit/ heart'

Imperfective (impfv) 3rd person prefixed verb forms, both masculine (ya-/yi-) and feminine (ta-/ti-), are also throughout UA: impfv prefix ya-/ta- from Semitic-p vs. yi-/ti- from Semitic-kw.
Semitic-kw yi-/ti- (e.g., 20, 1313, 84, 797):
(20) Hebrew/Phoenician *ti-barr 'select, choose' > Ls čikwáyi- 'to choose, select' is from Semitic-kw
(1313) Semitic yi-knVʕ 'be humble' > CN iknoa 'to be humane, compassionate, humble'
(814) Hebrew ṣmħ / ṣaamaħ 'sprout, grow' (< Semitic *ḍamaxa), impfv: *yi-ṣmaħ (< *ya-ḍmax):
CN camawa 'to grow, become big' is of Semitic-kw as is the impfv below in 84:
(84) Hebrew ṣmħ, impfv: yi-ṣmaħ (< *ya-ṣmaħ) 'sprout' > UA *icmo of CN icmo-liini 'sprout, grow';
However, (813) has the same impfv form from Semitic-p showing both *ya- and loss of 1st C in a cluster:
(813) Hebrew ṣmħ, impfv: *yi-ṣmaħ (< *ya-ḍmax) > UA *yama 'sprout, grow'; UA *yama 'up, over, above'.
      We see the Semitic-kw perfective in CN camawa, because ṣ > UA c and pharyngeal ħ > w, and we see Sem-kw imperfective in UA *icmo 'sprout, grow' because the first consonant of the cluster is prominent, yi- prefix, and ħ > o; in contrast, Sem-p UA *yama 'sprout, grow, up' loses the first consonant of the cluster, shows Sem-p ya- prefix, and did not round the final vowel, because keeping final x, though lost, is not pharyngeal and so would not round the final vowel.
Semitic-p prefixes ya-/ta- (e.g., 1035, 567, 560, 561, 796):
(1035-p) Hebrew qmṣ 'take a handful, be miserly, stingy', impfv *ya-qmuṣ > UA *yamuC 'angry, stingy'
(567-p) Hebrew ya'amiin 'he believes, 3rd m sg impfv' > UA *yawamin- 'believe'
Hebrew ya'amiin-o 'he believes him/it' > UA *yawamin-o 'believe him/it'
(560-p) Semitic *ya-bka^y 'he/it weeps, cries, m.sg.' > UA *yaCkaC > *yakka / *yaka 'cry'
(561-p) Semitic *ta-bka^y 'she/it weeps, cries, f.sg.' > NP taka (< *takka) 'cry, vi'.
(796-p) Hebrew *to'kal 'she/it eats, f.sg.impftv' > UA *tïkkaC 'eat' of Sem-p as V-l > aC retains vowel *a*
(797-kw) Hebrew impfv: *yo'kal 'he/it eats, m.sg.impfv'> UA *yï'ïki 'swallow, taste' of Sem-kw as V-l > i-.

Like the ya-/yi- difference in Sem-p vs. Sem-kw prefixes, respectively, UA *nihya also shows two features that align it with Semitic-kw, having ni- (instead of na-) and no rounding or sign of the glottal stop:
(991-kw) Phoenician/Hebrew ni-qra' 'he/it is called/named' > UA *nihya 'call, name'

      Another feature of Semitic morphology apparent in UA are the pfv vowelings. Most Semitic verbs have the pfv voweling CaCaCa. However, some verbs, perhaps less than 10%, have a voweling of CaCiCa, where the midde vowel is i instead of a. Though originally CaCiCa, some of these later changed to CaCaCa. Yet UA consistently shows the original voweling: CaCiCa.
(769) Hebrew tqp 'to overpower, v'; Aramaic təqep 'be strong'; the 2nd vowel of Aramaic means it is from Proto-Semitic *taqipa (sg), *taqipu (pl), exactly as the UA forms:
UA *takipa / *takipu 'push': KH/M06-ta9: Wr tahkipúna 'empujar muchas veces [push many times';
(3) Semitic yašiba (sg), yašibuu (pl) > UA *yasipa, *yasipu
(1521) Semitic *kapina 'be hungry'; Aramaic(S) kappiin 'hungry'; Syriac kəpen / kəpin 'be hungry':
Gb kovii- 'be hungry'.
(649) Hebrew ħaaṭaa' 'miss (a mark), do wrong' shows the later change, but Arabic xaṭi'a 'be mistaken, to err' shows the original voweling, as appears in the Sem-kw form in UA *wa(C)tiC 'lose, lost, misled'

UA shows both the huqtal participle and the huqtal perfective of the verb nky below:
(52) Hebrew mukkɛ 'smitten' (hoqṭal participle) > UA *mukki 'die, be sick, smitten'
(53) Hebrew hukkɛ 'was smitten' (3rd sg huqtal pftv) > Tb hookii 'deceased grandfather, grandson'

Semitic conjugation patterns are very specific. Only one full Semitic sg paradigm exists in UA, and that is in the Nahuatl singular pronouns deriving from the Aramaic verb hawaa 'to be':

(110)	Hebrew/Semitic sg		Hebrew/Semitic pl		maghrib Arabic	Classical Nahuatl
1st	'e-/'a-	'I (verb)'	ni-/na-	'we (verb)'	n- 'I verb'	ne'wa / nehwa 'I'
2nd	ti-/ta-	'you sg (verb)'	ti-/ta-	'you pl (verb)'	t- 'you verb'	te'wa / tehwa 'you, sg'
3rd	yi-/ya-	'he (verbs)'	yi-/ya-	'they (verb)'	y- he verbs'	ye'wa / yehwa 'he'

The Classical Nahuatl (CN) singular pronoun series—nehwa (I), tehwa (you), yehwa (he)—parallels the imperfective of the Aramaic 'be' verb—'ehwe, tehwe, yehwe. Though the Nahuatl 1st person (nehwa 'I')

differs from Semitic 'e-, the n- of the CN form is analogically like the fundamental n- of most Semitic 'I/me' forms. In fact, the maghrib Arabic dialect did the same thing, that is, analogized the impfv verb prefixes to be n-, t-, y- (Goldenberg 2001, 86), like the Classical Nahuatl singular series did also—nehwa, tehwa, yehwa.

Keep in mind that full paradigms hardly exist in the ancient Hebrew corpus either. Yet several verbs are found in UA exhibiting two or three or four shapes or conjugated forms of a Semitic verb's paradigm. Consider some of the groups of items exhibiting various parts of a Semitic conjugation:

(1420) Semitic **nwr** 'to make/become light' with infinitve and imperfective: -**nuur**(u), and perfective **naar**; UA has both in Eu and Tr: **UA *nur / *nar** 'aclarar el día [to dawn, become light]': Eu nurú 'aclarar el día'; Tbr nare 'aclarar el día'.

(679) UA ose (< Hebrew pfv: ʕśy or prtcpl ʕoose) and (680) UA yo'ose (< Hebrew impfv: y-ʕsy / ya-ʕ^{a}sey)

	Hebrew root ktš 'grind'	UA
(1094)	impfv -ktoš (< *ktusu) 'pound, grind'	*tusu 'grind' with loss of 1st C in a cluster
(615)	*kitteš (< *kittaš) 'grind'	Yq kitte / kittasu 'grind'
(614)	makteš 'mortar, grinding stone'	*ma'ta 'mortar, grinding stone'

(559) Hebrew bky/ baka 'cry, weep' (perfv); yV-bkV (imperfv); Syriac bakaa / baka' > UA *paka' 'cry, v'
(24) Hebrew bky/ bakaa^y 'cry, weep' > UA *kwïkï/*o'kï 'cry' (Sem-kw) vs. 559 *paka' of Sem-p
Because bilabials as first element in a cluster disappear (-bk- > -k-), the imperfective 3rd person masculine singular stem Hebrew *yVbkV 'weep' with imperf prefix originally *ya- (later yi-) also matches UA *yakka
(560) Semitic *ya-bka^y 'he/it weeps, cries, m.sg.' > UA *yaCkaC > *yakka / *yaka 'cry'
(561) Semitic *ta-bka^y 'she/it weeps, cries, f.sg.' > NP taka (< *takka) 'cry, vi'.

NP has both m and f 3rd sg of *ya-bka > yakka and *ta-bka > UA *takka 'cry' and consistently geminates/doubles the middle consonant in both as well. So UA has both the m.sg *ya-bkay > UA *yakka and the f.sg. *ta-bkay > UA *takka, and also the perfective stem in UA *paka' of Sem-p and also Sem-kw's *kwïkï/*o'kï.

Hebrew 'kl shows various conjugated forms in UA: Hebrew **'aka**l '(he) ate (perfect), **'to'kal** 'she/it eats'; *yo'kal 'he/it eats'; 'akol / 'əkol (infinitive):
(798) Semitic 'akal 'eat/ate' > **UA *'aki** 'open mouth, eat, take/put into one's mouth' of Sem-kw
(796) Hebrew **'to'kal** 'she/it eats, f.sg.impftv' > UA **'tïkkaC** 'eat' of Sem-p as V-l > aC retains vowel *a*
(797) Hebrew impfv: **'yo'kal** 'he/it eats, m.sg.impfv'> UA **'yï'ïki** 'swallow, taste' of Sem-kw as V-l > i-.
(1177) Arabic 'kl / 'akala 'eat, eat away, corrode'; Hebrew 'kl / 'aakal 'eat, savour, have sense of taste, enjoy love'; from Hebrew infinitive 'əkol, and a semantic shift from 'eat, enjoy' to 'desire' > UA **'ukol** 'want'

Note both the Hebrew pfv **laaqaħ** and the impfv **yi-qqaħ** in UA:
(695) Hebrew **lqħ / laaqaħ** 'take (in hand), take as wife'; Arabic lqħ / laqaħa 'to impregnate';
Hopi **lööqö(k-)** '(for a bride) to go to the groom's house to begin the wedding ceremony';
Hopi(Seaman) löhqö / lööqö 'she married'; Hopi(Seaman) löhqöqna/ lööqökna 'they gave her in marriage, he married her'.
(696) pre-Hebrew *ya-lqaħ > Masoretic Hebrew *yi-qqaħ; final pharyngeal rounded UA vowels:
Hebrew *yi-qqaħ > UA *yokoC 'to copulate', Azt yekoaa 'taste, copulate'.
(1465) Hebrew lqħ, imperative forms: qaħ and **qəħaa** > Hp ŋï'a 'grab, catch'; WMU güǘ / küǘ- 'grasp, catch, get, take, vt'; Kw ku'u 'catch, get, receive'.

(1031) Hebrew qn' 'be jealous', impfv: -qna' > UA *nawa 'be jealous' of Sem-p, as ' > w, and no ŋ, with loss of first C of the cluster -qn-.
(1032) Hebrew qn' 'be jealous', impfv: -qna' > Ls ŋe'i 'get even'; My na'ibúke 'is jealous'. My na'i- aligns well with Ls ŋe'i, because Sem-kw shows q > ŋ, 1st C prominence, NUA ŋ > SUA n, no rounding for '.
(1033) Hebrew qn' 'jealous'; Hebrew qannaa' 'zealot, jealous one' > Kw kïnii-ga-dï 'one covetous'

Three different morphological shapes of the root Semitic kbd 'be heavy, honor, sweep' appear in UA:
Semitic/Hebrew kabbed 'to honor, sweep/clean, make respectable' (qattel 'intensive');
and impfv: *-kbudu / *-kbod; Hebrew hikbad / hikbiid 'to sweep':
(1353) Semitic *-kbudu / Hebrew *-kbod > UA *poci 'sweep'
(1354) Hebrew *hikbad- 'sweep' > *(hi)paca 'sweep'
(1355) Aramaic(J) -kabbed 'to clean, sweep' > UA *kaper 'be clean, good'

(1126) Hebrew yṣb or yṣg (hiqtiil means 'to set, place') or yṣ\ / Arabic waḍa\a 'lay, put down, set, place'
UA *yaca 'set, put' and (1127) UA *moci 'set, put' reflect the qal perfect and hiqtiil participle, respectively

Hebrew \lw / \ly, pfv: \alaa 'ascend, go up, grow'; and Hebrew impfv: ta\alɛ 'it/she grows, goes up':
(681) UA **wïla**/i 'grow': Ca wél 'to grow, rise up high'; Cp wéle 'to grow'; Ls wola/i 'grow (of plants or
anim subj)'; and part of Hp wïŋwa 'grow, grow up' (-lw- > -ŋw-)
(682) UA **tïwïl** 'grow': Cp tewe 'to grow of plants'; TO čïwïl-him 'to grow'. Tb wilaa'lat 'climb, climb on'
(1258) Hebrew plural: \aluu 'they stood up'; while the two forms of Tbr were / welo 'estar, estar en pie'
align with singular and plural, the Tepiman forms align with a reduplicated plural UA *wïwïlu-ka 'stand, pl'

Aramaic gəmal / Hebrew gaamal 'complete, ripen, wean' (cognate to Arabic *ğamula 'be beautiful') is found
in the the perfective (936, 937, 939) and in the imperfective (1175) and in a waw-consecutive conjugation
(938). In the imperfective (1175), its first consonant can be expected to be lost because the pattern or
conjugation sets it as first consonant in a cluster:
(1175) Hebrew gml, impfv **-gmol** 'to complete, ripen, wean' > **mo(i)** 'ripen'
(936) Note 3 meanings in both Semitic and UA: Semitic: 'complete' and 'beautiful' and 'be proper, befit' >
UA 'quit/stop (when complete)' and 'look good' and 'be proper, fit, wrap (in garment/blanket)'.
Tr gamea '1 to be able, 2 to look good to, like, 3 to fit, be enough' (intervocalic liquids r/l often lost in Tr);
Tb(V) kam'-(ut) ~ 'aŋgam' 'it fits'; Tb(H) kam'mut, pfv aŋkam' 'to fit, be proper' (l > ' in Tb cluster);
Ca qami (before C), qamñ (before V) 'to leave, quit, stop'.
(937) Wr kemá; Tr gemá; Tr komabi / gemabi 'wrap oneself in a blanket'; Tr gimí-mea 'wrap oneself (as with
a blanket)'; CN keemi 'put on, wear (clothes)'; CN keemi-tl 'garment'; Pl kimilua 'wrap, cover, vt'; CN kimil-
li 'bundle of clothes, blankets'; CN kimiloaa 'wrap in a blanket, vt';
(938) Hebrew wayyigammel > Numic wïkam'mi 'put on, cover/wrap in blanket'; for same SNum languages
with m 2nd & liquid 3rd C, see ṭmr > tïm'ma 'bury'. 939 is Sem-kw perfective.

Semitic *psx has both the impfv (*-psax) and an adjectival form (*pissex) which appear in UA:
(639) Hebrew psħ (< *psx) 'be lame, limp'; Arabic fsx, ya-fsaxu 'dislocate, disjoint'; from the imperfective
stem *-psax, and bilabials (b, p) disappear as first consonant in a cluster, so *sakV is what we would expect
in UA and is what we see in CU, and WMU assimilated/raised the vowel from a > ï/ü:
CU sakï- 'to limp, v'; WMU süġű-y / sügű-y 'to limp, be lame, vi'.
(640) Hebrew psħ (< *psx) 'be lame, limp'; Hebrew pisseᵃħ 'limping', pl: pisħiim (> piskiim) 'limping'
(verbal adj) > UA *piski / *pisiki 'bad, rotten'

Sets 540-543 show four different morphological shapes of the root bṭħ 'trust, believe':
540 Hebrew bṭħ 'trust, v'; Hebrew biṭħa(t) 'trusting'; Hebrew *baṭiiħ 'trusted'
        > UA *pittiwa 'believe, be true/real, trustable'
541 Hebrew baaṭuuħ 'trusting, confident' > UA *paso 'true, consider true, believe, truly, indeed!'
542 Hebrew bṭħ 'trust, v', from the impfv stem -bṭaħ we expect UA *cawa 'believe' and loss of -b
543 Hebrew baaṭuuħ 'trustful, confident' UA *puttuwa (> *puttucuwa) 'know'

Nouns often become verbs, or many Semitic nouns appear in UA as denominalized verbs:
(63) Syriac sirq-aa 'comb-the, n' > UA *cika 'to comb, sweep' (denominalized verb)
(35) Aramaic birkaa 'blessing' > UA *kwika 'sing' (denominalized verb)
(86) Hebrew ṣə\aaqaa 'yelling, screaming, call for help, n' > UA *coaka 'cry, v' (denominalized verb)
(1162) Hebrew \aṭiišaa 'sneeze, noun fem.' > *ha't(w)isa (> *ha'(N)kwisa) 'to sneeze, vi'
(138) Instead of the Egyptian verb bši 'to vomit', the noun bšw 'vomiter' is made a verb with the
        verbalizing suffix -ta in UA *piso-ta 'to vomit'; likewise,

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(170) Instead of the Egyptian verb txi 'to drink, be drunk', the noun txw 'drunkard' is made a verb 'be drunk'
(1274) Syriac kaukb-aa' 'star-the' > Sr kupaa ('< *kuppaa') 'to shine (of stars)'
(178) Egyptian x'i 'disease'; Egyptian x'yt 'slaughter, corpse-heap' > UA *ko'ya 'fight, kill, die'
(581) Hebrew 'arṣ-aa 'earth-ward, to the earth' > UA *wïcï > Num *wï'i 'fall'
(614) Hebrew makteš 'mortar, grinding stone' > UA *ma'ta 'mortar, grinding stone' but Ca *mattaš 'crush, squash'
(942) Hebrew qiinaa 'funeral song, dirge' > Ls ŋináŋna 'feel sorry for, be broken hearted' (kwSem q > ŋ)
More examples could be assembled here.

Two-word sequences typical of Semitic or Egyptian are sometimes found in UA. For one word, with its three, four, five, six, or more sounds of the word, to align with that number of the corresponding sounds of the related language's word is one thing, but for two words—and in the same order—to align both sounds and syntax and for a longer length is more notable, and even less probable by chance. Examples follow:
Egyptian su 'he/it' (is) p'ʕt 'quail' > su-p'ʕt 'quail' > UA *supa'awi 'quail' (475-6)
Egyptian iqr-pw 'skillful, excellent, capable, intelligent' (is) 'he/she' > Ls *yikelvu 'intelligent' (122, 219)
Aramaic *tikk-aa 'cord-the'; with pw, *tikk-aa-pw 'cord-the-it is' > UA *tïkapu 'rope, thread' (122, 1146)
Egyptian's prefixed definite articles—p' 'the, masculine'; t' 'the, feminine'; n' 'the, plural)—appear in UA as well, and are also in prefixed position in UA, and they match the gender of the noun that they are prefixed to, though they are not recognized as definite articles in UA; examples are found at 174, 185, 339, 357, 373-380
yry / yoore (m) / toore (f) 'instruct, teach' (hiqtiil 3 sg impfv), toore le/la 'teach to him/her'
                                                    > Tb tooyla 'teach (him/her)' (1344)
Semitic daqar panaa-w 'till/dig its surface' > UA *tekipanawa 'work' (827)
pny / bə-paney 'on the surface of' > UA bepán 'on, on top of, over' (1398-p)
bə-taxat 'at-under' > UA *pïtaha 'under' (1390-p)

Also in UA, we see forms aligning with Hebrew vav-consecutive forms, a perfective or past-tense construction—wa-pronoun prefix-jussive verb stem—in 938, 1215, 1518.

At 609 and in section 7.7, Syntax are discussed and the grammatical particle Hebrew ha- 'interrogative particle' and UA *ha- 'interrogative particle'.

7.4 Basic Vocabulary (animal terms, body parts, basic nouns of nature) from the Near-East tie are

numerous, as well as most pronouns (not listed here, but see 101-114). Animals are listed first, roughly from largest to smallest (insects), then birds, then reptiles and fish. The Near Eastern tie provides two terms for antelope, two terms for mountain lion, two for dogs, two for foxes, two for coyotes, two for squirrels, four for lungs, four for hair, etc. **Body parts** are listed generally from top (hair) to bottom (feet), then **man** and **woman**. The **basic nouns of nature** start in the sky (sun, moon, 4 terms for star) and come down to earth. All of these are necessarily abbreviated from the numbered set, which can be checked for details:

(604) Aramaic rə'emaan-aa / reemaan-aa 'antelope-the' > UA *tïmïna 'antelope'
(29) Hebrew ṣəvii 'gazelle'; Arabic ẓaby-; Aramaic ṭaby-aa 'deer, gazelle' > Hp cöövi-wï 'antelope'
(147) Egyptian m'i 'lion' > UA *mawiya 'mountain lion' (*' > w of Sem-p)
(566) Hebrew 'ari 'lion' > UA *wari 'mountain lion'
(803) Hebrew kəfiir (< *kapiir) 'young lion' > PYp kaper 'wildcat'; Wc kapuvi 'bobcat'
(618) Aramaic di'b-aa 'wolf-the' > UA *tï'pa 'wolf'
(406) Egyptian b' 'buck, ram, soul' > UA *pa'aC / *pa'at 'bighorn sheep'; UA *pa'a 'all living creatures'
(734) Hebrew mə-ṣuudat 'net, prey, game' > UA *masot (< *masuta) 'deer'
(638) Semitic *raxel 'ewe' > UA *tïhïC 'deer': Mn tïhïya 'old buck'; Mn tïhïhta 'deer', and genders match
(1025) Aramaic guuryə-taa / guur-taa 'cub (female), young of animal (lion or dog) > UA*koCti 'dog'
(711) Hebrew kɛlɛb, kalb- 'dog'; Arabic kalb- 'dog'; pl: kilaab = *kiloob
        > Tb(V) 'iklooba-l 'fox'; Tb(M) yekalooba-l 'grey fox'
(447) Egyptian wtw 'pup (fox, dog)' > UA *woci 'dog'
(129) Egyptian wnš 'jackal'; wnšt 'jackal, f'; pl: wnšiw 'Wolfs-hund' > UA *wancio / wancia 'fox'
(391) Egyptian ishb 'jackal, fox' > UA *isa'a(N)pa 'coyote'
(580) Hebrew/Arabic/Aramaic qr' / qara' 'call, cry out' > UA *koyowa 'yell, shout'; *koyoC 'coyote, fox'
(756) Hebrew śn' 'hate'; *śannaa' 'enemy, hating one' > Ch(L) šïnawavi 'Mythic Coyote, the pre-human,
    immortal personage'; UA *sïna'a-/*sïnawa 'coyote, trickster/cosmic hater/enemy of mankind (Sem-p)

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(675) Arabic ħnp 'be pigeon-toed, walk with toes inward' (like Arabic ħanpaa' 'tortoise') > UA *hunap 'badger'

(613) Hebrew *dobboot 'bears, f pl', unattested *dᵊbbootee^y 'bears, construct pl' > UA *poci / *posi 'bear'

(724) Hebrew parʕoš 'flea' (jumper, Hebrew prʕš 'jump') > UA *paro'osi 'jackrabbit'

(596) Hebrew 'arnébet 'hare'; Arabic 'arnab 'hare, rabbit' > UA *wa'na 'rabbit net'

(1088) Arabic xuld 'mole'; Syriac ħld 'to burrow, drive a mine underground'; Aramaic ħild-aa 'cave-dweller-the'
                     Proto-Semitic *x > UA k, so *xuld-aa / *xild-aa > UA *kita 'groundhog'

(1089) Hebrew qippod 'hedgehog'; Arabic *qunpuđ; Aramaic quuppaad 'hedgehog, mole' > UA *kïNpa 'prairie dog'

(57) Arabic singaab 'squirrel'; Hebrew *siggoob 'squirrel' > UA *sikkuC 'squirrel'

(957) Arabic qarqađaan 'squirrel' > *koŋi 'squirrel'

(579) Arabic *pa'r- > fa'r- 'mouse' > UA *pu'wiN (< *pa'wiN) 'mouse'

(68) Hebrew gebiim 'swarm of locusts'(only in pl) > SP qïïvi 'grasshopper'

(69) Hebrew gobay 'locust' > Eu okoboi 'grasshopper'; Kw haakapayni-ži 'grasshopper'

(1321) Hebrew ħargol 'type of locust'; Arabic *ħargal / *ħurgul 'locust' > Tr urugi-pari 'grasshopper, sp.'

(28) Arabic ṣurṣur 'cricket' > UA *corcor 'cricket'

(88) Hebrew ʕaluqa(t) 'leech'; Arabic ʕalaqat; Syriac ʕilaq- 'leech, anything clammy or sticky' > UA *walaka 'snail'

(363) Egyptian srqt / s'qt / slqt 'scorpion (a constellation)' > UA *saka 'scorpion'

(479) Egyptian ḏ'rt 'scorpion' > UA *suyi 'scorpion, sting'

(832) Syriac srṭ 'scratch'; Arabic šrṭ 'tear, scratch'; Aramaic ṣarṭaan 'scratcher, crab, crayfish' would be
         Hebrew ṣarṭoon > CU sïčú-či 'crab' and CU sïčú-ppï 'fingernail'; UA *siCtuN / *suCtuN 'claw, nail'

(1409) Aramaic kəkay / kwkyh 'spider' > UA *kukkaC 'spider'

(1409) Aramaic kuuky-aa' 'spiderweb' > Hopi kookyaŋw 'spider'; Ls kúyxiŋi-š 'black widow spider'

(141) Egyptian bit 'bee' > UA *pita / *piti > *pica/pici

(737) Hebrew ṣirʕaa 'hornets' > UA *saŋa 'yellowjacket, stinging one'

(784) Hebrew ʕᵃṭallep 'bat'; Aramaic(J) ʕᵃṭallep-aa 'bat-the' > UA *ho'napi 'bat' (explained at 784)

(854) Hebrew saas 'clothes moth' (< *sws); Arabic suus 'mothworm' > Tep *soso-kimar 'butterfly'

(1054) Aramaic raqbubit-aa 'moth-eaten, moth-the' > UA *…kupïpika / *(C)Vkupïpika 'butterfly'

(17) Semitic đabboot 'flies' > UA *sikwoti 'flies' (Sem-kw)

(620) Semitic đabboot 'flies' > UA *tapputi 'fleas' (Sem-p)

(390) Egyptian ḏwt 'mosquito, gnat, sandfly' > UA *suti 'mosquito, gnat'

(310) Egyptian s' 'maggot' > UA *sa'a / *si'a 'louse'

(971) Syriac qarduun-aa 'louse-the, nit-the' > UA *'aCtïN > *'atï(N) 'louse'

(1058) Arabic šarnaqat 'cocoon', pl šarnaqaat would be Hebrew *sarnaqoot
           > UA *ca'ïku / *caCCïku 'cocoon attached to plant'

(853) Aramaic ħippušit-aa 'beetle-the' (Arabic *xunpusaa'/xunpus 'beetle') > UA *wippusa 'stink beetle'

(261) Egyptian sd 'tail' > Hp sïrï 'tail'

Birds:
(381) Egyptian wr(t) ħq'w 'buzzard, lit: great (of) magic' > UA *wirhukuN 'buzzard, turkey vulture'

(15) Semitic baaz 'falcon' > UA *kwasa 'eagle' (Sem-kw)

(142) Egyptian bik 'falcon' > *pik 'hawk, sp'

(475) Egyptian p'ʕt 'quail'; Egyptian sw 'he, she, it, pronoun': sw-p'ʕt > UA *supa'awi 'quail'

(1082) Hebrew śəlaaw, pl: salwiim 'quail'; Syriac salway 'quail'; Samaritan šalwi > UA *solwi 'quail'

(960) Arabic qarqara 'gurgle, coo (pigeon)' > UA *kakkara 'quail'

(725) Hebrew toor 'turtle-dove' > UA *tori 'domestic bird'

(824) Hebrew hayyownaa / hayyoonat 'dove' > UA *hayowi 'dove'

(878) Hebrew ʕayṭ / ʕeeṭ 'bird of prey'; Aramaic ʕayiṭ-aa' 'bird of prey-the' > UA *wiCtiki 'bird'

(1117) Aramaic(CAL) kwkby; Syriac kuukkəbbe 'owl' > UA *kuku 'ground owl, burrowing owl'

(1361) Modern Syriac/Aramaic papuke 'owl' > UA *poko 'burrowing owl'

(1167) Aramaic pəraħ 'to fly, flower'; Hebrew pɛraħ 'blossom' > UA *pïyaw 'feather, to fly'

Snakes / Reptiles and Fish:
(115) Egyptian sbk 'crocodile', Greek Sobek > UA *supak / *sipak 'crocodile'.

(332) Egyptian qrħt 'serpent spirit' / qrħ 'friend/partner' > UA *koNwa 'snake, twin'

(201) Egyptian dnnwtt 'snake species > UA *sinawi 'snake'

(1055) Syriac 'aamaqqət-aa 'lizard-the, n.f.' > UA *makkaCta(Nka)-ci 'horned toad'

(9) Arabic đabb-V 'lizard' > UA *cakwa 'lizard' (Sem-kw)

(365) Egyptian xḏw / xḏḏw 'fish, coll. pl' > UA *kicu/*kucu 'fish'

(168) Egyptian rm 'fish' (Coptic rame, often in the pl rmw) > Tr ŕamú 'small fish'

(204) Egyptian tbt 'fish' > UA *(pa-)topa 'fish'

(234) Egyptian mħyt 'fish (collective), lit. swimmers' > UA *muti 'fish'

(455) Egyptian swr 'fish, sp.' > CN šowil-in 'catfish'

(456) Egyptian sħty 'fish, sp.' > Wr so'cí 'fish'

(185) Egyptian ħnt'sw 'lizard' > UA *-hoto- 'lizard':

(1239) Aramaic yall-aa' / yarl-aa' 'lizard' > UA *yul 'lizard, sp.'; Ls yulú 'lizard, sp'

(298) Egyptian ʕbxn 'frog' > *wapkan > UA *wakaN-ta > *wakatta 'frog'

(1378) Hebrew *ṣᵊpardeᵃʕ 'frog' > UA *kwa'ro 'frog'

Body Parts, Man, Woman

(89) Hebrew śeeʕaar 'hair'; Arabic šaʕr / šaʕar 'hair'; Arabic šaʕira 'be hairy' > UA *suwi 'body hair'

(1132) Hebrew pɛraʕ 'hair, locks'; Arabic farʕ- < *parʕ- 'long hair' and Arabic farw-u < *parw-u (nom) /
        parw-a (acc) 'fur, skin, pelt'; Syriac perʕ-aa 'bud, shoot, blossom-the' > UA *pǐ'wa 'hair'

(1133) Syriac baʕw-aa 'camel hair-the'; i.e., animal fur/ hide > UA *po'wa / *poCwa 'hair, fur, hide, skin'

(742) Hebrew ṣɛmɛr 'wool' > UA *comi / *comya 'hair'

(1098) Hebrew qubbaa; Aramaic qubbə-taa 'vault, dome, tent'; Syriac qbb 'to stand on end, bristle (of hair),
        to over-arch, form a dome' > UA *kuppa 'hair of head, head'

(1099) Hebrew góbah 'height (of a man), height of other things'; Arabic ğabha(t) 'forehead'
        > UA *kopa is 'forehead' (in Tep, TrC), 'face' (in Num), 'head' (in Cahitan)

(93) Hebrew rooš 'head' (< *ra'š); Arabic ra's- 'head' > UA SNum *toCci 'head'

(1078) Arabic muxx- 'brain'; Akkadian muxxu 'skull': Hebrew moħ 'marrow' > UA *mo'o 'head'

(511) Egyptian ħ' 'back of the head, back side' > UA *ho'o 'back'

(851) Hebrew panaa-(w) 'face-(his)' > UA *pana 'cheek'

(245) Egyptian xnt 'face, n; in front of, prep' > Tbr kota 'face'

(532) Arabic baaṣirat 'eye', Hebrew *booṣer 'eye' > UA *pusi 'eye'

(1279) Aramaic yəgar (< *yagar) 'hill, heap of stones' > UA *yakaC / *yakaR (AMR) 'nose, point, ridge'

(1070) *na-qšab 'what is perked up, the ear' > NUA *na(N)kapa / Aztecan *nakas

(617) Semitic ðiqn- 'chin' > UA *tǐ'na 'mouth'

(508) Egyptian rmn 'row of rowers' > UA *raman 'tooth/teeth'; Wr(MM) táme 'jaw, jawbone'; see 508

(698) Arabic *lahgat 'tongue', unattested NW Semitic plural *lahgoot > UA *laŋi / *laŋu 'tongue'

(563) Hebrew saapaa(t) 'lip, edge, shore' > UA *sapala (< *sapata) 'lip'

(137) Egyptian(F) bbyt 'region of throat' > UA *papi 'larynx, throat, voice':

(962) Aramaic qooʕ-aa 'throat, gullet, windpipe-the'; qooʕai-k 'neck-your' > UA *kuwi 'throat'

(1014) Syriac qəðaal-aa 'neck, nape of neck'; Arabic qaðaal 'occiput' > UA *kuta / *kura 'neck'

(999) Hebrew gaaroon 'throat, neck' (Sem-kw) > UA *iyoN 'back of neck, nape of neck'

(56) Hebrew šɛkɛm 'shoulder' > UA *sǐka 'arm' / *sǐkuN 'shoulder

(51) Hebrew *kaatep 'shoulder' > UA *kotapa / *kotapo 'shoulder'

(188) Egyptian nħbt 'neck, back of the neck' > UA *nohopi > nopi 'arm, hand, arm'

(925) Semitic 'agap 'wing, feather, arm, shoulder' > UA *aŋapu 'wing' (Sem-kw)

(926) Semitic 'agap 'wing, feather, arm, shoulder' >UA *wakapu > *wakaC/*wiki 'wing, feather' (Sem-p)

(1234) Hebrew zəroʕ 'arm, forearm, power'; Arabic ðiraaʕ 'arm, forearm' > UA *toC 'with the hand'

(523) Egyptian mni' 'hand-arm' > UA *man 'hand'

(746) Hebrew 'ɛṣbəʕ-oot 'fingers'; Syriac ṣibʕ-taa 'finger' > Hp civot 'five'; *-c(i)po in TO hǐtaspo 'five';
        and -spo in Nv utaspo 'cinco' point to *cipo / *cipu (Tep s < *c); Aztecan *cikwa (Sem-kw)

(262) Egyptian ʕnt 'nail, claw' > UA *wati 'claw, finger'

(1056) Syriac ħady-aa 'breast-the, n.f.', pl: ħᵊdaawaat- > UA *tawi 'chest'

(744) Hebrew ṣeelaaʕ / ṣalʕ- 'rib'; Arabic ḍilʕ- / ḍilaʕ- 'rib' > UA *cawa 'rib': Ca čáwa-'al 'rib',
        Hp cǐŋï 'rib'; CN šillan-tli 'side'; Cahitan *sána'a 'rib'

(7) Semitic *bahamat 'back' > UA *kwahami 'back' (Sem-kw)

(910) Hebrew gab 'back, elevation'; Syriac gəbiib-aa 'hunchbacked' > Ls ŋavá-ŋva-š 'stooped, as old man'

(281) Egyptian sm'w / zm'w 'lungs' > UA *somwo > *soŋo 'lungs'

(282) Egyptian wf' 'lungs' (Coptic wof) > Tbr wopaᴺ-s 'lungs'

(1421) Arabic saħr- / suħr-, pl: suħuur 'lungs'; Arabic masaaħir 'lungs' > SP soo-vi 'lungs'; Tb mošooha-t 'lungs'

(1428) Syriac raa'taa / raataa 'lung(s)' > Cora ta'atime 'lungs'

(337) Egyptian r'-ib 'stomach' > *to'i 'bone, belly'; *topa 'belly, stomach'

(218) Egyptian swn 'to suffer, know' > UA *suna 'to suffer, heart' / SUA *sura 'heart, seed'

(139) Egyptian bnty 'breast(s, pair of)' > UA *pici 'breast'

(140) Egyptian šnbt 'breast' > UA *sanaC- 'breast' in Tb piišana-t 'breast'

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(777) Hebrew ṭabbuur / ṭibbuur 'navel'; Aramaic(J) ṭiibbuur 'navel' > UA *sikuN / * sikʷur 'navel'

(1138) Hebrew šor 'navel, navel cord'; Arabic surr 'navel cord' > Sr ṣuur 'navel'

(171) Egyptian sxn / zxn 'kidney fat, kidney tallow, pancreas' > UA *sikun / *sikur / *sikuC 'kidney'

(1105) Akkadian kaliitu 'kidney'; Hebrew kilyaa 'kidney'; Syriac kooliit-aa 'kidney' > UA *kali 'kidney'

(1003) Arabic kirš / kariš 'stomach, paunch, belly' > UA *kïca 'belly, waist'

(295) Egyptian xpd 'buttock', xpdw 'buttocks '> UA *kupta 'buttocks' and UA *kupitu 'buttocks'

(606) Arabic dubr/dubur 'back(side), buttocks' > UA *tupur 'hip, buttocks'

(1383) Arabic qaʕda(t) 'sitting, backside, buttocks' > Hp kïri 'buttocks'

(634) 'loins, hip' are Arabic xaṣr-; Samaritan ħarṣ-aa; Mandaic halṣa > UA *kaca 'hip'

(1282) Aramaic ʕaṭmaa 'thigh, n.f.', pl: ʕaṭmee > UA *uma 'thigh, upper leg'

(294) Egyptian xpš 'upper arm, thigh': UA *kapsi 'thigh'

(301) Egyptian mnty 'thighs, dual' > UA *macci / *maCti 'thigh, upper leg'

(132) Egyptian sbq 'calf of leg' > UA *sipika 'lower leg':

(685) Hebrew ʕaaqeb 'heel, footprint' > Hp -laqvï in Hp kïk-laqvï 'tracks all over' (kïk 'foot')

(1197) Hebrew ʕaaqeeb 'heel, hoof, footprint' > UA(SUA/Tb) *woki / *woku'i 'track, footprint'

(858) Hebrew qarsol 'ankle' > UA *-kwinco- 'ankle' (Sem-p)

(859) Syriac qursəl-aa 'ankle bone'; Akk kursinnu; 'Hebrew qarsol 'ankle' > UA *koci 'ankle' (Sem-kw)

(973) Hebrew gɛlɛd 'skin', gildaa-w 'skin-his'; Arabic *gild 'skin' > UA Tepiman *'ïlida 'skin'

(5) Hebrew bááśaar 'flesh, penis' > UA *kwasi 'tail, penis, flesh' (Sem-kw)

(550) Aramaic bəsár 'flesh' > UA *pisa 'penis' (Sem-p)

(794) Aramaic 'ebr-aa / 'iibraa' 'pinion, member male member' > UA *wï'aC 'penis'

(616) Semitic *đakar 'male, man' > UA *taka 'man, male, person, self, body'

(169) Egyptian rmṭ 'man, person, mankind' > UA *rïmatí / *rï'matí 'young man'

(205) Egyptian t'y (t'w) 'man, male' > UA *tawa / *tawi > *tïwi 'man, male'

(572) Hebrew 'iiš 'man, person' (with negatives 'no one') > UA *wïsi 'person' (Sem-p)

(76) Hebrew 'aadaam 'man' > UA *otami / *wVtam 'man, person'

(81) Hebrew ħabéret 'marriage companion (feminine), wife' > UA *hupi 'woman, wife'

(339) Egyptian ħmt / ħimt 'woman, wife'; Coptic hime; Egyptian t'-ħimat 'the-wife' > UA *tïhima 'spouse'
        pl: ħmwt; > UA *hamut 'woman'

(87) Arabic ʕagaza 'grow old (of women)' > Tr wegaca- 'grow old (women)' / UA *okaci '(old) woman'

(574) Hebrew 'išaa / 'ešɛt / 'išt- 'woman, wife of' > Hp **wïïti / wïhti** 'woman, wife' (Sem-p)

(1130) Aramaic pagr-aa 'corpse-the' > Hp pïïkya 'skin, fur'

(411) Egyptian ħʕ / ħʕw 'body' > UA *hoŋa 'body'

(1476) Hebrew ʕɛṣɛm 'bone' (pl: ʕəṣaam-iim > ocomim > cumi) > UA *cuhmi 'bone' (explained@1476)

Nouns of Nature

(163) Egyptian rʕw 'sun' > UA *tawa 'sun, day';

(1077) Semitic *manzal 'star, moon', Hebrew maazzaal 'star' > UA *mïcaC / *macaC 'moon';

(154) Egyptian sb' 'star' > UA *si'pu > *su' 'star';

(1274) Aramaic kookb-aa 'star-the' > UA *kuppaa 'shine (like stars)': Sr kupaa 'to shine (like stars)'

(1408) Syriac *dinħ-aa* 'sunrise, light, the ascendant or predominant star' > *-tinuN- of Numic *tatinuN-pi* 'star'

(156) Egyptian *gnħt* 'a (particular) star' > SP kaŋa- 'morning star'

(1165) Semitic baħr 'sea/water' > UA *pa (with pharyngealized vowel) / *pa'wï 'water';

(229) Egyptian mw 'water'; Egyptian mwy 'watery' > Hp mowa-ti 'be wet, moist'; Ls páá-muwi-š 'wet'

(491) Egyptian pẖrw 'water' > UA *parawa 'juice, soup, stew'

(98) Hebrew rqʕ 'beat (out)'; Hebrew raaqiiªʕ 'extended surface, sky' > UA *tukuN-pa 'sky, metal'

(264) Egyptian šmrt 'bow', pl: šmrwt 'bows' > UA *ko-samalo 'rainbow'

(683) Syriac ʕmṭ 'become dark, cloud over, be obscure' > UA *(w)umaC / *(w)ïmaC 'rain'

(709) Arabic ṭll / ṭalala 'spray, sprinkle, rain a fine rain, drizzle, bedew'; Hebrew ṭal 'night-mist, dew';
        > Hopi cölö-(k-) 'to drip (a drop)'; Hopi cölölö-ta 'be dripping, be sprinkling (rain)'

(1038) from Hebrew (hiqtil) yooreh 'to water, send rain', pfv: hoora, inf: hooroot > UA *horo 'rain, fall'

(760) Hebrew šɛlɛg 'snow'; Arabic θalǧ- 'snow' > UA *sïk 'snow'

(603) Aramaic rymh / riimaa 'large stone'; rimə-taa 'large stone-the, n.f.'; Syriac ryaam-taa 'large stone-the'
         > UA *tïmï-ta > *tïN-(pV) 'rock'

(591) Hebrew 'adaamaa / 'ªdaamaa 'earth' > UA *tïma 'earth'

(150) Egyptian t' 'earth, land, ground, country' > UA *tïwa 'sand, dust'

(19) Arabic barr- 'land (vs. sea)'; Hebrew baar 'field'; Aramaic bar-aa 'forest, prairie-the'
        > UA *kwiya / *kwira 'earth' (Sem-kw)

(75) Hebrew tebel 'firm (dry) land'; Assyrian taabal 'land' > UA *tïpaC / *tïpal 'earth'

(208) Egyptian(H) ʧn 'shine, gleam'; Egyptian ʧnw 'Libya' (desert) > TO tohono 'desert, the south'

(162) Egyptian šʕy 'sand' > SUA*siwal / NUA siwaN 'sand'

(1141) Hebrew ħool 'sand'; Aramaic ħaal-aa > UA *(h)ola (Tep) / *otta (Num)'sand'

(280) Egyptian ħm'(t) 'salt' > UA *omwa / *oŋa 'salt'

(322) Egyptian q'yt 'high-lying land, hill' > UA *kawi 'mountain, rock':

(868) Aramaic ṭwr- / ṭuur-aa 'rock, hill, mountain-the' > UA *toya 'mountain'

(274) Egyptian dhnt 'mountain top', pl: dhnwt > UA *ton(n)o 'hill'

(1241) Arabic ğabal 'mountain(s)' > UA *kaipa / *kaapa 'mountain'

(527) Semitic baraq 'lightning' > UA *pïroq 'lightning' (Sem-p)

(885) Arabic naar 'fire' but written na'r / na'ar (< Sem/Arabic nwr) > UACV-878 *na'y- / na'ay 'fire'

(401) Egyptian ħnt/ħnw 'watercourse, swampy lowland' > UA *hunuC 'canyon, gorge, ditch'

(1403) Syriac šigr-aa 'drain, ditch, gutter-the' > Hp sikya 'valley, ravine, canyon'

(646) Hebrew náħal (< *naxal) 'river valley, wadi, stream'; Akkadian naxallu 'wadi, gorge':
> Ktn naka-č 'gully, ravine, cliff' (Sem-p)

(647) Hebrew náħal (< *naxal) 'river valley, wadi, stream' > SP noiC / noi-ppi 'canyon, wash' (Sem-kw)

Trees:
(743) Aramaic tuumr-aa 'palm-the / date-palm-the' > UA *tu'ya 'type of palm tree':

(569) Hebrew 'egooz 'nut tree'; Aramaic 'emguuz-aa 'nut-the' > UA *wokoN / *wo(N)koC 'pine'

(74) Hebrew təbuu'aa(t) 'produce, yield from the land, harvest' > UA *tïpï'at 'pinion nut'

(92) Hebrew yáʕar 'wood, forest' > UA *yuyiC 'evergreen sp'

(892) Arabic ṣanawbar 'pine sp.' > UA *salaC / *sanawap 'pitch, gum'; Sh sanawap-pin 'pine tree'

(1116) Hebrew zépɛt (< *zipt-) / zaapet 'pitch' > UA *copï 'pitch, torch'

(582) Aramaic 'arz-aa' 'cedar-the' > UA *wa'aC / *wa'aN 'juniper or cedar tree'

(689) Hebrew ʕaroʕer 'juniper tree'; Arabic ʕarʕar 'juniper'; Samaritan ʕarʕar
> UA/Tr gayorí / kaorí / kawarí / aorí / aborí / waorí / awarí 'juniper'

(599) Hebrew 'ayil / 'eel- 'mighty tree'; 'yl 'tree and sometimes oak' > UA *iyal 'poison oak' (Sem-kw)

(1337) Hebrew 'ayil 'mighty tree'; Arabic 'ayyil / 'iyyal > UA *wi'a(N)/*wiya(N) 'acorn, oak' (Sem-p)

(1012) Hebrew šiqma(t) 'sycamore tree'; Syriac šeqma(t) > UA *sïŋŋa(C) 'cottonwood and/or aspen tree'

(174) Egyptian sxt 'field, country, pasture, willow, n.f.' > UA *sakat / *sakaC 'willow'

(961) Hebrew dɛqɛl 'date-palm'; Arabic daqal 'palm tree' > UA *taku 'palm tree'

(227) Egyptian m'm' 'dom-palm (tree)' > UA *mahawa / *ma(C)wa 'palm tree':

(489) Egyptian xt 'wood, stick, tree' > UA *kut 'tree, wood, firewood'

(666) Arabic ħaṭab 'firewood' > UA *hucakwa / *husaba 'pitch' > *'usaba-i 'pitch'

Other plants:
(266) Egyptian šnw 'hair, grass' > UA *soni / *soŋo 'grass, straw, blanket'

(644) Arabic xuḍar 'vegetation, greenery, meadow'; Semitic xḍr > ħḍr > UA *husa 'grass'

(73) Akkadian dašuu > diišu 'grass, spring'; Hebrew dɛšɛ' 'grass, vegetation' > Hp tïïsï 'weeds'

(720) Hebrew **nebɛl** 'skin-bottle, skin', Syriac nbl **/ n'bl** > Nahuatl no'pal 'cactus fruit made alcohol'

(400) Egyptian sʕr 'thorn bush(es), thorny undergrowth, thicket]' > UA *sawaro 'saguaro cactus'

(198) Egyptian d'rt 'bitter gourd' > UA *sawara 'gourd':

(987) Arabic qarʕ- 'gourd, pumpkin' > UA *kuyawi 'gourd'

(267) Egyptian twr 'reed' > UA *toli > *to'i 'reed, cattail': CN tool-in 'reeds'

(1216) Hebrew qaanɛ 'reed, stalk' > UA *kana 'willow'

(1135) Hebrew qaanɛ 'reed, stalk'; Aramaic qanyaa 'reed, stalk' > UA *pa-kaN 'reed, phragmites'

(1136) Hebrew 'ébɛh 'reed, papyrus'; Arabic 'abaa' > UA *wapi 'foxtail'

7.5 Unusual Semantic Combinations in Egyptian/Semitic Preserved in Uto-Aztecan

(98) Hebrew rqʕ 'stamp, beat (metal) out, spread out'; Hebrew raaqii^aʕ 'extended surface, expanse, sky'
> UA *tukuN- in * tukuN-pa 'sky' and 'metal' in the Takic languages.

(283) Eg qm' 'create' and 'mourn' > UA 'make, create' and 'mourn'

(332) Egyptian qrħt 'serpent', without fem -t is Egyptian qrħ 'friend, partner' > UA/CN koŋwa 'snake, twin'

(406) Egyptian b' 'ram, soul' > UA *pa'a 'mountain sheep, all living beings'

(411, 412) Egyptian ħʕ 'body' and 'joy' > UA *hoŋ 'cheerful, contented' and 'body'

(289, 292) Egyptian pħr 'turn' and (290) 'medicine' > UA 'turn' and 'medicine'

(1220) Semitic etqaraš 'be cold' and 'what is fixed' > Hopi hïkya 'cool off, vi, be set in a fixed position, vi'

(994) Ls qáya/i- 'blow down (a tree)', that is, 'uproot' and Ls qáya/i- 'heal' are listed as separate verbs in the Luiseño dictionary, though phonologically identical, yet the corresponding Syriac verb ʕqr also means both 'uproot' and 'heal'.

(1485) Semitic *rxm (> rħm) 'be wide' and 'have compassion' > UA *taha 'pity, have compassion' in most; but the two meanings of CU tǔaa 'open space, gap, area' and CU tǔaani 'pitiful, pitiable' in light of Semitic rħm 'compassion' and 'wide' are noteworthy in this Sem-p item.

(1007) Semitic *xdl (> Hebrew ħaadal) 'cease, cease doing'; OSArabic xdl; Akkadian xadaalu 'cease'; Arabic xadila 'stiffen, become rigid' > Hp hïrïï-ti 'come to a stop, harden'; Hopi Hp hïïrïla 'be hesitating, pausing, stopping'. Note Hopi's two rather different meanings (stop, harden) are both in Semitic (cease, stiffen/rigid).

(1009) MHebrew qmṭ 'heap together, bind'; Aramaic qmṭ 'draw together, pack, bind';

Syriac qmṭ 'lay fast hold of, take, contract, shrink, shrivel, wrinkle':

Hp homi(k-)[1] 'in competition with others, grasp, grab, or catch s.th. thrown'.

Hp homi(k-)[2] 'shrink, draw together, gather up, shrivel up'.

Again notice two identical but separate forms in the Hopi dictionary due to different meanings, yet Semitic also has both meanings, like Semitic ʕqr 'uproot, heal' in Ls at 994.

(329) Egyptian qd / qdd 'wander around, sleep, surround' > SP qarï 'sit, dwell' and SP qarï 'protect' (or 'surround')

(13) Semitic snw 'be beautiful, shine, bright colors' > Hopi soniwa 'be beautiful, bright (of colors)'

(1399) bxr (> bħr) 'test, choose, be/make choice'; Amorite bexeru 'elite soldier' > UA *bïhïrï 'expensive, opponent'

(538) Hebrew bad 'part, member, alone' and in phrases 'except, apart from, beside(s)'

> Tr biré and NT parï both mean 'one/some' and both also act as a negative particle

(19, 20) Semitic brr / barr(a) 'land, choose' > UA *kwiya 'earth, choose, consider one's own'; other sets are 1024.

7.6 Uto-Aztecan Often Preserves Egyptian Phonology Better Than Coptic Did

Coptic	<	Egyptian	>	Uto-Aztecan	
še	<	šm	>	*sima	(131)
Sobek	<	sbk	>	*supak	(115)
sobt	<	sbty	>	*sapti	(133)
mui	<	m'i	>	*mawiya	(147)
siu	<	sb'	>	*sipu'i / *si'pu / *su'	(154)
ji	<	iṯ'	>	*itu'i	(157)
sooše	<	sxt	>	*saka	(175)
		ħbi	>	*hupiya	(180)
		ħnqt	>	*hunaqa	(181)
hotpe/hotep	<	ħtp	>	*huppi	(182)
tebi	<	ḏb'	>	*si'pu (< *sipu'i)	(199)
too'be	<	ḏbt	>	*supa	(200)
neme	<	nbi	>	*napi	(243)
soote	<	sṯ'	>	*sutu'i	(258)
šopš	<	xpš	>	*kapsi	(294)

Egyptian, like its Afro-Asiatic parent language, originally had three basic vowels—a, i, u. Most languages, with time, would naturally develop more than three, like Classical Hebrew did its seven or so, but notice in the list above how often the UA reconstructions show only the same three basic vowels of Aftro-Asiactic—a, i, u—as opposed to Coptic's variety.

Other patterns are consistent in the Egyptian-UA connection itself. For example, initial i/y is consistently lost in stems of more than three consonants. Such a loss of initial consonants does happen in Egyptian itself: Egyptian itnw or Egyptian tnw 'be difficult'; Egyptian igr/igrt or gr/grt 'furthermore, moreover', and the UA forms usually lack that initial i, but reflect the rest quite consistently:

Egyptian irṯt 'milk' > UA *rïti/*rïçi 'milk' (306)

Egyptian i'bty 'left' > UA *opoti 'left' (300)

Egyptian irtyw 'blue' > UA *tïyawi/*tayawi 'blue/green' (307)

Egyptian išdd 'sweat' > UA *-sul/-sud 'sweat' (308)

Egyptian itrw 'river' > UA *t(r)wV/*tiwï 'river' (309)

Also note the consistent pattern of Egyptian Ctt > UA *Coti (C = any consonant):

Egyptian Ctt   >   UA *Coti (< *Cotti; otherwise, we might expect Cori or such)
Egyptian ftt 'jump'   >   UA *poti 'jump' (463)
Egyptian i̠t̠t̠ 'fly'   >   UA *yoti 'fly' (215)

C**onsistencies in semantic patterns** also occur. What might be dubbed the UA semantic shift down the UA arm—from 'neck/shoulder' to 'arm' to 'hand'—happened in UA with Hebrew škm and with Egyptian nħbt, but also happened in Egyptian, though less dramatically, with Egyptian rmn 'shoulder' > 'arm' and Egyptian qʕħ 'shoulder, upper arm' > *qħ > Cpt keh 'arm.'

7.7 Syntax, Word Order, and Verbal Nouns

        Word order was introduced on pages 15-17. Some people may want to claim it significant that UA and perhaps most Native American languages show basic SOV order while some Semitic languages more often show VSO order. However, the facts are that (1) most languages can vary their order due to emphasis (topicalization) or other things, regardless their most frequent or basic order; (2) Hebrew can also have SOV order though more often it has VSO order; (3) much of the book of Daniel in Aramaic has SOV order; (5) and while most UA languages have SOV order, some show VSO order as well as SVO, and (6) for languages to change their basic order when in the midst of languages with a different order happens often and can do so quickly. So basic word order is not a very stable measure or feature of language relatedness. Nevertheless, it is good to look at such syntactic matters to see how certain changes may have occurred.

        Though some Semitic languages, like Hebrew and Arabic, often exhibit VSO order, such is not always the case. Hebrew can also exhibit SOV order:
Judges 17:6   'īš ha-yyašar bə-ʕeenaa-w ya-ʕase 'Each man does what is right in his own eyes.'
          Man the-right in-eyes-his he-does (subject-object-verb)

While most UA languages show basic SOV order, some exhibit VSO order like Hebrew and Arabic.
Cr Verb-Subject-Object (Casad 1984, 168)
TO čikpan o hegai uwi 'That woman is/was working.'
     work is/was that woman
TO huhu'id o g ban g čuwi 'The coyote is/was chasing the rabbit.'
     chase   coyote rabbit

        The change from Semitic prepositions to UA postpositions is similar to the change within Semitic itself, a change from prepositions to postpositions in Semitic (Goldenberg 107-8). In UA, the change appears to entail preposition-noun > noun preposition-it, which looks like noun-postposition. For example, the UA postpositions often correspond to Semitic preposition + pronoun: taxt-e 'under-it/him'; qereb bo 'midst-in it'. A good example is (562) UA bobica 'wait for' from Hebrew -bbiiṭ b-o 'look at in/for-him/it' with its constituents reversed, the very kind of order expected in such a change as -bbiiṭ b-o 'look at-him' > bo bica 'at-him look' or 'prep-object-verb' syntax. Much more detailed study remains to be done in this area.

7.8 The Widespread Uto-Aztecan Words

        Of some 2500 cognate sets in UA, only 45 appear in 25 or more of the 30 UA languages or in seven or eight of the eight branches. Yet 26 of those 45 most widespread UA words are in this work—about 60%.

4   Hebrew baašal 'cook, ripen' > UA *kwasïC 'cook, ripen'
5   Hebrew baaśaar 'flesh, penis' > UA *kwasi 'tail, penis, flesh'
56   Hebrew šɛkɛm 'shoulder' > Num sïkum / UA *sïka 'shoulder, arm'
78   Hebrew ħeṣ 'arrow' > UA *huc 'arrow'
570   Hebrew 'axar 'follow, another, after' > UA *wakay 'two, after'
1077   Semitic *manzal 'star, moon', Hebrew maazzaal 'star' > UA *məcaC / *macaC 'moon'
531   Hebrew boo' 'coming, way' > UA *pow 'road, path'
532   Arabic baaṣirat 'eye', Hebrew *booṣer 'eye' > UA *pusi 'eye'
565   Hebrew makar 'sell' > UA *makaC 'give, sell, feed'
616   Arabic/Hebrew *đakar 'male, man' > UA *taka 'man, male, person, self, body'

617   Semitic/Hebrew điqn- 'chin' > UA *tï'na 'mouth'
614   Hebrew makteš 'mortar' > UA *ma'ta 'mortar'
701   Hebrew *-lmad 'learn' > UA *mati 'know'
52   Hebrew mukke 'smitten' > UA *mukki 'sick, dead'
1165   Semitic baђr 'sea/water' > UA *pa / *pa'wï 'water'
139   Egyptian bnty 'breast(s, pair of)' > UA *pici 'breast'
154   Egyptian sb' 'star' > UA *si'pu / *su' 'star'
158   Egyptian it̠i 'rob, take' > UA *ïci 'steal'
523   Egyptian mni' 'hand-arm' > UA *man 'hand'
163   Egyptian rʕw 'sun' > UA *tawa 'sun, day'
179   Egyptian x'yt 'slaughter, carnage' > UA *ko'ya 'kill pl obj's, die pl subj's'
280   Egyptian ђm't 'salt' > UA *omwa / *oŋa 'salt'
284   Egyptian qm' 'create, beget' > UA *kumwa / *kuŋa 'husband'
332   Egyptian qrђt 'serpent spirit' > UA *kowa / *koŋo / *koro 'snake'
1   Northwest Semitic *-ima > UA -im, -m, -mï 'plural suffix'
101   Aramaic/Syriac ('a)naa' 'I' > UA *nï' 'I'
105   Semitic *-kVm > UA 'ïm 'you'

7.9 The Semitic Liquids and Velars / Uvulars in Uto-Aztecan

One of the most common sequences among Semitic roots is initial q-, k-, or g- and second consonant liquid -r- or -l-. So addressing them together is convenient and again provides data for further analyses.

The liquids as initial consonants have been largely treated in the body of the book: initial r- at sets 93-100, 600-604, 887-889, and initial l- at 695-708. The liquids' behaviors in consonant clusters are treated at 7.2 on consonant clusters. Here we list the initial l- forms, but mainly address the intervocalic liquids. Intervocalic -l- is more straightforward, more often remaining each language's liquid. However, intervocalic -r- > -r- or -y- or other. Uto-Aztecan's nasal-liquid spectrum is introduced at 1.45-46 (pp. 52-56).

Among NUA languages, Numic has -r-, and Tb and Tak languages have -l-, all presumed to be from intervocalic PUA *-t-, many of which are, but not all. Hopi has both -r- and -l-, but many Hopi l align with PUA *w, but not all, and some -r- seem to be from intervocalic stops. A few NUA -n- correspond to SUA liquids. Many SUA languages have only one liquid: e.g., CN has l, but not r, and Eu has r, but not l. However, many SUA languages have both -l- and -r- or show separate reflexes for the two: My, Yq, Wr, Tr, Tbr. Significant is that in those languages that have both liquids, Semitic-p's -r- usually reflects as -r- and -l- as -l-. For example, in (724), Semitic parʕoš 'flea (jumper)' from the verb prʕš 'jump' > UA *par'osi / *paro'osi 'jackrabbit', most languages (Op, Eu, Yq, My, PYp) show -r-, one (Tr) has -l- and Wr has variants with each. Notice in the several items listed below that most reflexes show -r- < *-r-, and -l- < *-l-, though liquid reversals also happen and are common in other language families as well. Even in Numic (below) we see Semitic -r- > Num -r-, though it has been reconstructed as intervocalic *-t- becoming -r-.

The following two My terms are evidence of a distinction between Semitic-p's -r- and -l-:
(527-p) My bérok-te 'to lightning' (< Semitic brq 'lightning' verb and noun)
(549-p) My béloh-ko 'to shine' (< Semitic blg 'shine')
The two Semitic-p forms in My are in identical environments with -r- in 527 and -l- in 549, and the -r- and -l- of UA align with Semitic -r- and -l-, and the definitions match perfectly as well.

Initial *l- > l-:
l- 'to/for'; Aramaic le 'to/for him' > UA *li 'to, for' (1187)
lo 'to him/it, has' > UA lo (1026)
l'y / loo'e 'grow weary/tired' > UA *loi 'be tired' (705)
lahgat 'tongue', pl: *lahgoot > UA *laŋi / *laŋu 'tongue' (698-kw)
lwz / lawz 'almonds' > UA *lawas 'pine nut cache' (702)
lwy / laawaa 'turn, bend, twist' > UA *líwa/i 'be tightly twisted' (706)
lmd / loomed 'learn' > UA *lomi 'know' (699)
lummad 'learned, trained, taught' > UA *luma 'good, beautiful, fit, nice' (700)
lmm 'gather, collect, befall, overcome' > UA *lïmïmï 'burn, fall in (a structure)' (703)
laqlaq 'stork' > Ca la'la' 'goose' (704)

lqħ / laaqaħ 'take (in hand), grasp, take as wife' > UA *loko- 'marry' (695)
lqħ / *ya-lqaħ > *yi-qqaħ 'take, take as wife' > *yïkoC / *yokoC 'copulate' (696)
lqħ, -qqaħ; imperative forms: qaħ and qəħaa > UA *ŋïha / *ŋïhi 'grasp, catch' (1465)
l'm 'to bandage, wrap, dress' > UA *taluma 'blanket, garment' (1129)
*-ll- > -n-
lebb, hal/han-lebb 'the heart' > Hp ïnaŋwa 'heart, life' (1312-kw)
Initial *l- lost, perhaps due to later stress making lə- so short of a syllable that it is lost as when 1st C of cluster:
lappiid-aa 'torch-the, light pot-the' > pita 'fire' (883-p)
lħy / ləħiy 'chin, jawbone'; Arabic laħy- 'jawbone' > Hopi öyi 'chin'; Ls 'óóyi-l 'jaw, chin' (1431)

Velars and Uvulars
Let us examine the transfer of Semitic initial velars and uvulars into UA, whose 2nd consonant is often a liquid. Semitic-p generally preserves initial q-, k-, and g- as PUA *k-, though Takic more finely distinguishes *qa and *ka as qa and ka (see at 6.6). Semitic-kw, in contrast, seems to have lost initial q-, k-, g-, except in Takic, where Semitic-kw initial q- and g- both correspond to Takic initial ŋ- (see at 5.13), but seem to have been mostly lost in the other branches.

Semitic-kw initial g-/ q-/ k- > ø
(981-kw) gaz 'bird of prey', gaz-aa 'falcoln-the' > UA/Tak/Tb *'asa-wïr 'eagle'
(973-kw) gɛlɛd 'skin' > Tep *'ïlida 'skin'
(984-kw) gullaa / gullat- 'basin, bowl, ball' > SUA *ola 'ball'
(1137-kw) gómɛ 'papyrus' > UA/Eu/Wr *oma 'reed'
(999-kw) gaaroon 'throat, neck' > UA/SNum *iyoN 'back of neck, nape of neck'
(1057-kw) gursiptu 'butterfly' > UA *asiNpu(tonki) 'butterfly'
(974-kw) kakkar 'valley' > UA *aki 'arroyo, canyon, valley'
(980-kw) klm 'address s.o.' > Ls 'ulómi 'call s.o. names'
(993-kw) qəwuṣoot 'locks (of hair)' > UA *woC 'hair'
(982-kw) qll / qaliil 'be small, insignificant, light' > Tep/Cah/Tbr *ali 'little'; Tak añii
(1217-kw) qalal 'be small, contemptible'; *qillal / -qallel 'declare accursed, consider bad' > Tak/Wr *'alal 'bad,wrong'
(972-kw) qippoz 'arrowsnake' > Tr aposini 'venomous serpent'
(990-kw) qr' / qara'a 'call, cry out' > UA *aya 'call'
(991-kw) ni-qra' 'he/it is called/named' > UA *nihya 'call, name'
(975-kw) qéreb 'inward part, midst' > UA *'ïrapa 'inside'
(976-kw) qarob 'near' > Tr ayobe 'soon, near in time'
(977-kw) qariib 'near' > Tep/PYp *alip 'soon'
(593-kw) qardammu 'enemy, opponent' (Akkadian) > UA *tïmmu 'opponent'
(971-kw) qarduun-aa 'louse-the, nit-the' > UA *aCtïN 'louse'
(998-kw) qeren / qarn- 'horn, corner, tip' > SP yïnnï 'crown of the head'
(997-kw) kəraaʕ 'lower leg' > *kVyu'u > UA *yï'u 'leg'
(988-kw) qarʕ- 'gourd, pumpkin' > UA *ayaw 'squash'
(989-kw) qarʕ- 'gourd, pumpkin' > UA *ayaC / *ayoC 'turtle'
(1272) qšr 'to peel, shell, derind, debark, skin, husk', f. impfv ta-qšir > UA *asi'a 'bark, peel, shell, n'
(969-kw) qešet, qašt- 'bow, weapon' > UA *aCta 'atlatl, bow'
Some q > Hp h
(1010-kw?) qlp 'to peel, shell, scrape off, strip off'' > Hp hàapo(-k-) 'get loosened, chipped'
(1009) qmṭ 'draw together, lay hold of, take, contract, shrink, shrivel' > Hp homi- 'grab, shrink, draw together, shrivel'
(1008-kw) qrb 'approach, be near', qariib 'near', Syriac qərib 'come near, draw nigh' > Hp hayiŋw- 'draw near'
Several etyma seem worth contemplating as feasibly from qr':
(992) Semitic qr' / *qara 'call, name, cry out, shout, announce' > Hopi eyoyo-ta 'ring, peel (bell)'; Ls 'uyá'a 'feel bad, sad' (i.e., cry); Ls 'úúyi 'howl'; Ls hááyi 'scream'; Ktn yu' 'cry, buzz, sing' of impfv pl yV-qrə'u 'they call/cry'?; SP qwarava-ya'i 'cry from pain' vs. SP oroŋwi 'roar, growl'; WMU oróǵoa'nI'ni 'groan'; CU 'oróǧwa'ni 'suffer'

In contrast, Semitic-p kept initial q-, g-, and k- (see also 6.6); some examples follow:
(717-p) qlp 'peel off, shell, rub away' > UA *kïlipi 'shell, shuck, degrain, v'
(1409-p) kuuky-aa(') 'spider-the' > UA *kuukyaŋw 'spider'
(575-p) kama' 'truffle' > UA *kamo'-ta 'sweet potato'
(755-p) kutónet 'shirt-like tunic' > UA *kutuni 'shirt'
(803-p) kapiir 'young lion' > PYp kaper 'bobcat'

(1015-p) kabara 'be older, big, grow, increase' > Num kabara 'tall, long' though reconstructed *kapata

(1117-p) kuukkəbay 'owl' > UA *kuku(pu) 'burrowing owl'

(1274-p) kookb-aa' 'star-the' > UA *kuppaa 'to shine (as of the stars)'

(738-p) qayiṣ / qeyṣ 'summer' > *kuwïs 'summer'

(861-p) qəša' 'be hard, severe, harsh (of taste)' > UA *kïsa 'sour, harm(ed), bad'

(864-p) *quuppoot 'baskets' > UA *koppot 'basket'

(959-p) qml 'be lean/thin, wilt, wither' > UA *komal 'thin'

(967-p) qušṭ-aa' 'bow-the' > UA *kuCta-pi 'bow'

And many more. A puzzle is when we see q- > ø in Takic (e.g. 982, 1217), which may mean a loan from Tepiman or another nearby branch of UA, because normally Sem-p q- > q- and Sem-kw q- > ŋ- in Tak.

Intervocalic -l-:

Turning now from initial velars/uvulars to our main focus: intervocalic liquids. Intervocalic Semitic -l- seems to be surprisingly consistent as -l- in UA (or -r-, especially in languages lacking -l-), in etyma from both Semitic-kw and Semitic-p: Semitic-kw -l- > UA -l-, and Semitic-p -l- > -l-; and to -l-, -r-, or -d- in the Tepiman branch; sometimes doubled -ll- > -n-; and some items are not yet clear. Details can be sought at each set, but below is a rough listing of data with intervocalic -l-:

branch inventory	Hopi l/r/y	Tb l/y	Tak l/r/y	Num r/y	Tep l/r/d/đ	Eu r/y	Tr/Wr r/l/y	Cah r/'/l/y	Tbr r/l	CrC r/'/l/y	Azt l/y
(31) şll	l		l	n							l
(6-kw) blʕ		l	l				r				
(710) tlʕ			l		d		l		l		l
(712) hll	l	l	l					l			
(930-kw) gll			l								
(931/984-kw) gll	l				l						l
(935-kw) galam			l								
(934) gəloom				r				l			
(973-kw) gld					l/but Nv r						
(980-kw) klm			l								
(982-kw) qll			l/ñ		l			l			
(1217-kw) qalal			l				l				
(630-p) xly			l		l/r/d		(r?)	?			
(709) ţll	l										
(713) ţlʕ		l									
(714-p) pl'			l								
(715) dll	l										l
(716) dlq	l										
(717-p) qlp					l						
(645-kw)ħbl/*xbl	l										
(681) ʕlw	cluster	l	l								
(677) ʕgl					l/d						
(917-kw) gʕl			l								
(1521-kw) gly			l								
(947-kw) qlb			l								
(765-p) xlq			y			r				r	
(1105) kali	l			n							

Intervocalic *-r-: Intervocalic *-r- changed somewhat differently in Semitic-kw vs. Semitic-p. The most common or general rule is that Semitic-p *-r- > UA -r-, Tep -d-, but Semitic-kw *-r- > UA -y-, Tep -đ-. (Likewise, Proto-Mayan *r > y in branches of Mayan; and in Egyptian also, -r- > -y/i-.) Many UA liquids in clusters were nasalized in Numic. Some overlap and exceptions also dot the data.

Semitic-kw intervocalic *-r- > UA *-y- in most branches, > Tep d/đ (see details at numbers listed):

(19/20-kw) Semitic brr / barr(a) 'land, choose' > UA *kwiya 'earth, choose/take'; but the Yq pl and Tbr kwira show -r-

(64-kw) Semitic krr 'circle, dance' > UA *kiya 'have a round dance'

(65-kw) Semitic mrr 'go' > UA *miya 'go'

(976-kw) Semitic qrb 'approach, draw near'; Hebrew qaaroob 'near' > Tr ayobe/ayowe/ayowi 'soon'

(1367-kw) Syriac mrq 'rub off, scour, polish, cleanse, vt' > Sr mïyï'-kin '1 wipe out, 2 cause to shimmer'

(914-kw) Semitic grr 'ruminate (chew cud), saw' > UA/Tak/Hp ŋayaya 'do circular/back-and-forth motion'
(920-kw) Hebrew grš 'drive out' > UA ŋoya 'chase'
(932-kw) Aramaic gwr / gwr-aa 'traveling away from home' > ŋoya 'leave, go away, go/come home'
(643-kw) 'aḥare^y / 'aaħoor 'back, behind' > UA *(a)hoyi 'back, follow, return'
(66) 'mr / 'aamar, impfv: yoomar / yoomer 'say' > UA *umay / *may 'say'
(933-kw) gwr / *yə-gayyar 'to commit adultery' > Hopi yoŋyày-ti 'be adulterous, have an affair (with)'
(950-kw) gəraamaa-w 'bones-his' > UA/Hp *ŋya(m) 'clan, relative'
(999-kw) gaaroon 'throat, neck' > UA/SNum *iyoN 'back of neck, nape of neck'
(1483-kw) dwr 'to go round, turn, revolve, move in a circle' > UA/Hp/Yq *ruya 'roll, turn, twist'
(868) ṭwr- / ṭuur-aa 'rock, hill, mountain-the' > UA *toya 'mountain'
(605-p) ṣwr / ṣuur-aa 'rock-the' or Samaritan Aramaic ṣor-aa > Tep hoda < UA *soya 'rock'
(623-kw) zrʕ / zaaraʕ 'sow (seed)'; Arabic zaraʕa 'sow, plant' > CN cayawa 'sew, scatter seed'
(625-kw) zéraʕ 'seed, offspring, descendants'; Arabic zarʕ- 'seed' > Hopi cayo 'child'
(1156) ħrk / ħaruka 'set in motion, move, stir, be agitated' > UA *huyuka 'move'
(670) ħɛrɛṣ 'earthenware, vessel, potsherd' > Ca wayisma-l 'plate, dish'
(1037-kw) yoorɛ 'to water, send rain' (< *yawri) > UA/Tak *yawya / *yuya / *yawi 'rain, snow'
(728) yr' / yiiraa' '(he/it) fears'; yir'a(t) 'fear, n' > UA *iya-paka 'fear, v'
(1344) yry / yoore (m) / toore (f) 'instruct, teach' (hiqtiil 3 sg impfv), toore le/la > Tb tooyla 'teach (him/her)'
(997-kw) kəraaʕ 'lower leg' > UA *yï'u < *kVyu'u 'leg'
(941-kw) -nʕar 'shake, grunt, roar' > *ŋïy 'shake, be dizzy'
(62) śrq / srq 'to comb' > UA *siyuk / *ciyuk 'to comb'
(727) swrr 'turn, revolve, dance' > UA *suyuyu 'spin, whirl'
(1167-kw) pəraħ (< *prx) 'to fly, depart, flutter, a blossom' > UA *pïyaw 'feather, to fly'
(726-kw) prq / paraq 'drag away, tear away' > UA *piyok 'pull, drag'
(1164) ṣħr 'dry up, become yellow' > UA *sa'wa / *sawari / *sawiya 'yellow'
(67-kw) ṣaaráʕat 'skin disease, leprosy' > CN siyo-tl 'rash, scab, leprosy'
(991-kw) ni-qra 'he/it is called/named' > UA/Num *nihya 'call, name'
(1478) Hebrew ṣar 'enemy' > UA *say- 'enemy, opponent'; NP sai 'enemy'; Wr sahí ' opponent';
        Tr saye/sayi-ra 'enemy', pl: na-sayira; Tr na-sayé 'confront each other'; My sáyyo 'enemy'.
(990-kw) qr' / qara'a 'call, cry out' > UA/NUA *aya 'call'
(580-p) qr' / qara'a 'call, cry out' > UA/Azt/TrC *koyowa 'yell, shout'
(1357) qr' / qara'a 'call, cry out'; many Semitic bird words from this root > UA/Num/Hp *kuyuC / kuyuŋV 'turkey'
In contrast to Sem-p (987-p) qarʕ- 'gourd, pumpkin' > UA *kuyawi 'gourd' Tr/Wr/Tb all -y-, Semitic-kw has
(988-kw) qarʕ- 'gourd, pumpkin' > UA *ayaw 'squash'
(989-kw) qarʕ- 'gourd, pumpkin' > NUA/Azt/Tbr/Wc *ayaC / *ayoC 'turtle'
(976-kw) qarob 'near' > Tr ayobe 'soon, near in time'
(977-kw) qariib 'near' > UA *alip 'soon'
(1008-kw) qrb 'approach, be near', qariib 'near', Syriac qərib 'come near, draw nigh' > Hp hayiŋw- 'draw near'
(1489-kw) qrb 'approach, be near' > Ls ŋááya 'be close, be near'
(975-kw) qéreb 'inward part, midst' > UA/Tep *'ïrapa 'inside'
(964) qɛrɛn / qarn- 'horn' > CN koyooniaa 'perforate'
(998-kw) qeren / qarn- 'horn, corner, tip' > SP yïnnï 'crown of the head'
(730) śrp 'to burn completely'; Hebrew śərepa(t) 'fire' > UA/Tep/Wr *saypa / *saya 'to burn'

Semitic-kw final -Vr > -i, or -ar > -ay
(5-kw) Hebrew baaśaar 'flesh, penis' > UA *kwasiC / *kwasiy 'tail, penis, meat' (all 8 branches)
(885-kw) Semitic naar 'fire' written na'r / na'ar 'fire' > UA *na'ay / na'aya 'fire' -y- in Tr/Wr/My, -d- in Tep
(651-kw) ħoṭɛr 'rod' > UA *(h)uci 'tree, stick'
(1372-kw?) dbr 'turn one's back'; dubr / dubur 'rump, back(side), buttocks' > Ktn tïhpi-c 'loin, back';
in contrast is Sem-p (606-p) dubr / dubur 'rump, back(side), buttocks' > UA/Tep *tupur 'hip, buttocks'
(607) dobɛr 'pasture, vegetation' > UA *tupi 'grass, vegetation'
(610) daabaar 'speech, word > thing, matter'; Hebrew haddaabaar 'the thing, the word' > UA *(hi)-tapi(ri) 'thing'
(611) dbr 'speak'; daabaar 'speech, word, discourse, saying, report, tidings' > UA *tapay(a) / tapiya 'speak'
(81) ħabéret 'marriage companion (feminine), wife' > UA *hupi 'woman, wife'
(974-kw) kakkar 'valley' > UA *aki 'arroyo, canyon, valley'
(92-kw) yáʕar 'wood, forest, roadless terrain' > UA *yuwiN 'ponderosa pine'
(89) śeeʕaar 'hair'; Arabic šaʕr / šaʕar 'hair, pelt' > UA *suwi 'body hair'
(1245) śeeʕaar 'hair'; Arabic šaʕr / šaʕar 'hair, pelt' > UA *suwi 'jackrabbit'
(985) ksr / kasara 'break' > UA/Tr/Wr *kasi 'break'

(742-kw) ṣɛmɛr 'wool' > UA *comi / *comya 'hair'

(79) ḥmr 'to pitch, cover, smear' (with s.th.); ḥammar 'to color or dye red' > UA *humay 'smear, spread, rub, paint'

(1181) šmr 'keep, watch over, have charge of, restrain (within bounds)' > UA *summay /sumiya 'think about'

(10-kw) šabber 'break, break in pieces' > UA *sakway 'break, ruin'

Semitic-p intervocalic *-r- > -r-

(28-p) ṣurṣur / ṣurṣuur / ṣarṣuur 'cricket' > UA *corcor 'cricket'

(527-p) baraq 'lightning' > UA *pïrok 'lightning' / My berok- 'lightning', Tbr virikí-t

(566-p) 'ariy / 'arii 'lion' > UA *wari 'mountain lion'

(875-p) boqer 'morning', bəqar-iim 'mornings' > UA *pi'ari 'tomorrow'

(1496-p) brd 'be cold, to hail', barad/baaraad 'hail, n' > UA/Tr * bara- 'be cool, time of rains'

(660-p) ḥaram / ḥurmat- / ḥariim 'woman, wife' > Wr oerume / oorume 'woman'

(1401-p) brħ 'flee, slip away, pass through, glide past' > My bóroh-te 'tiene diarrea'

(1180-p) gabr-aa, pl: gabr-iim/iin 'great man' > UA *kïri 'man, old man, elder'

(1499) zry (< *đry)'to scatter, sow'; Aramaic dry /dəraa 'to winnow, scatter', verbal n: dəree / dərii > Tr/Wr *tari 'seed'

(723) ṭariya 'to be juicy, moist, fresh' > UA/Wr *-cori 'wet/moist'

(1038-p) yoorɛ 'to water, send rain', pfv: hoora, inf: hooroot 'watering' > UA/TrC *hora / *horo 'rain'

(1396-p) kpr, impfv: *-kpor 'cover' > Tr pora 'cover'

(803) kəfiir (< *kapiir) 'young lion' > UA / PYp kaper 'bobcat'

(1420-p) nwr, impfv: nuur(u), pfv: naar 'make/become light' > UA/Eu *nur / *nar 'become daylight'

(1202-p) ʕwr > ʕaara / ya-ʕwaru 'be/make blind, go away with (s.o./s.th.)'; IV aʕaara 'lend, loan' > UA/Tep *wara 'sell'

(745-p) zhr 'be bright, clear'; Arabic ẓhr 'appear, arise' > UA *cihari / *ci'ra/i, Num sï'aN 'sunrise, east, morning'

(1222) ṣpr 'to whistle, hiss, chirp' > UA/Tep *ciporika 'whirlwind'

(1250) šrg / šrq 'slip, slide'; or šrʕ / zlq 'slip, slide, glide' > NUA/Tr *siro 'slide, slip', CN -l-

(1266) tpr / -tpor 'sow together' > UA/Tep/TrC *pura/i 'tie'

(1016-p) qbr 'bury' > UA *kopor 'dig', *kopa '(make) a hole'

(725) toor 'turtle-dove' > SUA *tori 'domestic bird', CN -l-

Even Numic and the rest of NUA show intervocalic -r- (< *-r-) in Sem-p items (though formerly understood as lenited intervocalic *-t- by previous Uto-Aztecanists):

(674) ħrb 'lay waste, destroy'; impfv ye-ħrab 'massacre', or hoqtal impfv: *yuħrab > SP yurava 'be overcome'

(1322) ħrr / ħaaraa 'be hot, burn', Ethiopic/Arabic ħarra 'be hot' > UA/TrC *uru / Num *ïrï 'hot'

(1399-p) bxr (> bħr) 'test, choose, be/make choice'; Amorite bexeru 'elite soldier' > UA *bïhïrï 'expensive, opponent'

(1015-p) kabara 'be older, great, big, grow, increase' > UA/Num *kaparaC 'long, tall'

(1484-p) dwr 'to go round, turn, revolve, move in a circle' > UA/Hp/SNum *turu 'whirl, roll, twist'

(667) ħwr / ħuur 'look, behold, gaze' > UA/Tak *hura 'come up, look in/over'

(655-p) *xrr / xarra 'to snore' > Ls xaráá-ya 'to snore'

(1297-p) prk 'crush' > SP puruqqwi 'to break to pieces'

(1066-p) ṣrʕ (< *đrʕ) 'be weak, lean, emaciated', verbal nouns đarʕ, đuruuʕ > UA *corowa / *corwa > coŋo 'be hungry'

(737-p) ṣirʕaa 'hornets' > UA *saŋa 'yellowjacket, stinging one'

(1299-p) ṣrħ 'groan, cry out' (< *ṣrx) > UA *ïsoroN- 'snore'; UA *sork

(1138-p) šor 'navel, navel cord'; Arabic surr 'navel cord' > Sr ṣuur 'navel'

(1511-p) šrd 'to quake, be terrified' > Ktn šariri 'trembling'

(1201-p) təmuuraa 'exchange, substitution'; ha-ttəmuuraa 'what is exchanged, exchanging' > Num *tïmïrï 'buy, trade'

(729-kw) 'eebaar-aa / 'eebr-aa 'limb, arm, wing, pinion, male member' > UA *pïra 'arm, right arm'

(1440-kw) 'rħ 'be on the road, wander'; Hebrew 'oraħ 'way, path' (Akkadian urxu) > Ch 'uruʷa- 'travel, go, walk'

Semitic-p final -ar > -a, as final -r does not raise the preceding vowel like Semitic-kw final -l does:

(565-p) mkr / maakar 'sell' (3rd masc sg pfv) > UA *maka / *makaC 'give'

(1331-p) 'kr / 'akara 'till (the ground)'; 'ikkaar 'agricultural worker' > UA *wika 'digging stick'

(550-p) Aramaic bəšár 'flesh' > UA *pisa 'penis'

(616-p) dakar 'male, man' (Aramaic) > UA *takaC / *takaN 'man, person, body'

(631-p) *xamar 'wine'; Arabic ximiir 'drunkard' > UA *kamaC 'drunk'

(789-p) ṭhr / ṭaahar 'be clean (dietarily, of animals/food)' > UA *cahar 'fork(ed)'

(1072-p) yáʕar 'wood, forest, roadless terrain' > UA *yuwa 'open country, outside'

(90-p) naʕar 'boy' > UA *nowa 'son'

(1022-p) maaħaar 'next day, tomorrow' (< *ma'xar) > UA mawa, moosta, muu'a, mowahusu 'tomorrow'

(1421-p) saħr- / suħr-, pl: suħuur 'lungs'; also masaaħir 'lungs' > Tb mošooha-t / mosooha-t 'lungs'

Puzzles include the Hp and SP forms in 921 below: in Sem-kw, we would expect Hp ŋayo and SP (q)ayu, and in Sem-p, we might expect qaro / qoro for both, but each shows a characteristic of Sem-kw and another of Sem-p.
(921-kw) grm 'gnaw, break/crush (bones)', inf: garom
                     > Hp ŋaro- 'crunch down on'; SP qayu 'grind up (like a dog crushing bones)

Semitic-p forms showing some -r- > -y- in NUA is puzzling
(1373-p) Arabic đrr 'strew, spray' > Ktn tïyïyï'y 'drizzle (weather)' (Sem-p, Semitic đ > t);
(1365-p) 'gr / 'agar 'to hire, harvest' > Tb waahay 'work'   (-r- > - y'-)
(570-p) 'axar 'behind, after'; *'axer 'other/another' > UA *wakay/waxay 'two, after'
(1486-p) 'rk 'be long (time or space/length)' > UA wïïyak 'long'
(994-p) ʕqr 'uproot, weed, heal' > UA/Tak *qaya/i 'uproot, weed, clean, wash, heal'
(1515) ʕrq 'flee, escape, shun, avoid' > UA/Tak/Hp *wayaq 'go out (fast)'

Final -r/-l > CN -l, though lost in other UA languages:
(60-p) Arabic muskir 'alcoholic beverage'; unattested *ma-škar / *mi-škar > CN meškal-li 'mezcal, alcoholic drink'
(866-p) ṭmr 'hide, bury, cook underground with coals' > UA *tïmal- (tamal-li) 'what is baked underground'
(720-p) n'bl / nebel 'skin-bottle, skin (of wine)' > no'pal- 'prickly pear cactus fruit' (often fermented to alcohol)
(873-p) 'pl / yu'pal 'get dark, (sun, planet) go down' > UA *yu'wal 'night, get dark'

7.10 Other Consistencies and Phonological Phenomena

Besides sound correspondences and a substantial number of lexical similarities according to those correspondences, related languages tend to share other patterns, systems, and even systems of systems. The facts that every marker for passive/stative in Egyptian is found in UA, and that five of the UA ways of doing passive/stative align with either Hebrew or Egyptian are rather remarkable.

Egyptian and Semitic also frequently add explanatory power to other matters that have stumped Uto-Aztecanists for decades. For example, underlying Egyptian forms offer a much better explanation than other proposals for the medial m, ŋw, ŋ, n segments in 'salt' (280), 'lung' (281), and 'husband' (283), as outcomes of the underlying cluster -m'- (-m + glottal stop-). In fact, Uto-Aztecanists have quite ignored the forms with *m*, only discussing the NUA ŋ and SUA n correspondence.

Manaster-Ramer's meticulous uncovering of some medial clusters, such as the p in UA *kapsi 'thigh' (Manaster-Ramer and Blight 1993b), which item for decades was reconstructed as *kasi (VVH 1962, Miller 1967), was followed by finding Egyptian xpš 'thigh' to match *kapsi perfectly, with the 1st and 3rd consonants supported by several other sets showing the same correspondences, as well as a dozen other sets exhibiting the same behavior of p > ø as first consonant in the medial cluster (4.3).

Similar to English debt, pronounced det, the bilabial stops as first element of a cluster were lost in pronunciation (**-bC-/-pC- > -C-**) as noted in 294, 295, 296, 297, 298, 299, 300, 486, 757, 794 at p. 124, *kapsi among them. In fact, the loss of bilabial stops as first element in a cluster was so consistent that it took 80 years to discover and reconstruct *kapsi, while a possible tie with Hebrew and Egyptian reveals a similar and consistent pattern in a dozen other cases. Whether due to clustering or not, Coptic lost many medial bilabial stops as well: Egyptian sbg 'Mercury, the planet/bright star' > swg' > Coptic sowke; Egyptian ṯbwt 'sandal' > later Egyptian twt/twy; Egyptian sb' 'star' > Coptic siu.

Another consistency is that as 3rd consonant, Egyptian final -i quite consistently yields UA *-iya:
147 Egyptian m'i 'lion'; Coptic mui > UA *mawiya 'mountain lion'
180 Egyptian ḥbi 'be festive, make festival' > UA *hupiya 'to sing, song'
165 Egyptian rwi 'to dance' > UA *tawiya / *tuwiya 'to dance'
387 Egyptian ḥwi 'fliessen, fluten [flow, flood]' > UA *huwiC 'canyon, water way' (slightly shortened)
In addition, the final *-i/y stands as a consonant in producing gemination of the next consonant in NUA.

Another consistency is Tara-Cahitan's and especially Wr's anticipation of a glottal stop to precede the consonant it formerly followed: 154 sb' > si'pu 'star'; 199 db' > si'pu 'clothing'; 157 it' > i'tu 'take'; 724 Hebrew parʕoš 'flea (jumper)' > *pa'rosi 'jackrabbit'.

Also quite consistent within the Semitic-UA tie is some pre-classical Hebrew phonology. The vowelings match very early Northwest Semitic voweling patterns, as noted in (1), (2), and (3). Consistent with that earliness are two consonant distinctions that are earlier pronunciations than those reflected by the 23 letters of the Biblical Hebrew text: the Proto-Semitic pharyngeal ḥ and *x merged to ḥêt, ʕ and *ġ > ʕ, and Proto-Semitic *đ and *z merged to Hebrew z. However, there is evidence in UA that the Semitic-p language

distinguished those pairs. There are many instances of UA *hu/o/u reflecting a pharyngeal ħ; and several other sets reflect Proto-Semitic *x > *k when Hebrew ħeṭ is from Proto-Semitic *x.

In contrast to explanatory power answering many questions, other questions remain, so here are also listed groups of data for further contemplation and analyses.

Other consistencies and patterns:

Weak third consonants, like y, w, and ’, in Semitic verbs are more often lost or not apparent in the Semitic conjugations. However, in UA they often appear though not expected in Semitic:
sly / salaa / saliya ‘think no more on (s.th.), forget, comfort, delight, take pleasure in’; Hebrew šalaa ‘rest’
> Hp salayti ‘be gratified, fulfilled, pleased by/from’ (1501)
bahiya ‘empty, vie, compete’ > Hp kwahi / kwàyya ‘suffer loss’; kwaha- ‘deprive of, take at expense of’ (38-kw)
baqiya ‘stay, be left behind’ > Hp kwaynya- ‘behind’ (954-kw)
snw ‘gleam, shine, be beautiful’ > Hp soniwa / sonwa-y ‘be beautiful, pleasing, bright’ (13)
bky / Syriac pfv bakaa / baka’ > UA *paka’ ‘cry, v’ (559-p)
dwy / dawaya / daawɛ / daawaa ‘be miserable, faint, sick’ > UA *tïwoya / *tï’oy / *tï’mo ‘sick(ness)’ (1284)
dʕw / daʕaa ‘to call, name’ > UA *tï(N)wa ‘name’ (1059)
ħṭ’ (< *xaṭi’a) / ħaaṭaa ‘miss (a mark), do wrong’ > UA *wa(C)tiN / *waCtiC ‘lose, lost, misled’ (649-kw)
ħṭ’ (< *xaṭi’a) / ħaaṭaa ‘miss (a mark), do wrong’ > Ktn ’ačaw ‘miss (the mark)’ (650-p)
Aramaic sw’ / swy / səwaa ‘to long, desire’ > UA *suwaC ‘to want’; UA *sïwaC ‘to want’ (1207)
ʕlw / ʕly / ʕaalaa ‘ascend, go up, grow’ > UA *wïla/i ‘grow’; Hp wïnwa (681)
pl’ ‘to be extraordinary, wonderful’ > UA *palaw ‘pretty’ (714-p)
pġy / f.pfv: paġyaa ‘inquire, seek’ > UA *paya ‘call, summon’ (1067-p)
pty / pətaa / pəta’ / pətiy ‘be enlarged, wide, broad’ > UA *pïttiya / *pït(t)ï’a ‘(be) heavy’ (812)
pətaa’aa / pətaawaa ‘wide, enlarged’ > UA *patawa 'wide' (1168)
ṣb’ / ṣəbee ‘wish, prefer, be pleased with, delight in’ > UA *supiC ‘like, want’ (901-p)
qn’ / impfv -qna’ ‘be jealous’ > UA *nawa ‘jealous’ (1031-p)
qn’ / impfv -qna’ ‘be jealous’ > UA *ŋa’i ‘get even, be jealous’ (1032-kw)

Semitic-p 3ʳᵈ consonant y verbs in Hebrew and Aramaic end their impfv with -e, but UA is consistent in showing impfv -a, not -e
hwy / yehwe ‘he is’ (Aramaic) > UA *yïhwa ‘that, he, she’ (112)
bky / impfv masc: *ya-bkaʸ ‘he/it weeps, cries’ > UA *yaCkaC / *yakka 'to cry, sg’ (560-p)
bky / impfv fem: *ta-bkaʸ ‘she/it weeps, cries’ > UA *takka (> NP taka) ‘to cry’ (561-p)
*-ʕr- > -ŋ-: ʕry / ʕr’ / ʕaraa, impfv: ta-ʕra ‘to contain, hold’ > UA *taŋa ‘bag, sack, put in container’ (1418-p)
ʕśy / yaʕaśɛ ‘make, make (write) books, create’ > UA *yo’osa ‘write, paper’ (680)
Aramaic tehwe ‘you are, sg’ > UA *tï / *tïhwa ‘you, sg’ (111)
tly ‘hang’; *yutla ‘be hung’ > UA *yula ‘hang’ (1247)

Some of the below include problematic / inconsistent data to think about and for future study.

-h- is well preserved in Semitic-kw:
ghh ‘be cured, healed, freed, bend’ > Sr ŋöhääh ‘go around a bend’; Hp ŋaaha ‘untie’, Hp ŋahï ‘remedy’ (909-kw)
khh / kehah ‘be inexpressive, dim, dull, colorless, disheartened’ > Ktn ’a-kïhahïk ‘sad’ (903-p or kw?)
bahiya ‘empty, vie, compete’ > Hp kwahi / kwàyya ‘suffer loss’; kwaha- ‘deprive of, take at expense of’ (38-kw)
bhl ‘cease, become quiet, tranquil, calm, gentle’ > *kwaha ‘1. tamed, 2. peaceful, tranquil, gentle’ (39-kw)
bahamat ‘back, hill, high place’ > UA *kwahama ‘back’ (7-kw)

Examples of -w- > -v-: While lenition (weakening) is the more common kind of consonant change, fortition (strengthening) also occurs in language change. We have already noted other instances of strengthening in Semitic x > UA k (also Semitic x > Semitic k), and r > t, initially at least. We see that w > v occurs also. I’ve heard some Arabic speakers say v for Arabic w, and in Modern Hebrew, the original w is pronounced v. Hebrew rwy / raawaa (> raavaa in some dialects) ‘drink one’s fill’, impfv pl: yirvəyuun. In Talmudic Aramaic, an actual b (> v) is an alternate form due to strengthening of w > b: Aramaic(J) raabe, f: raabaa ‘moist, saturated with liquid’. Also Hebrew ʕerwaa / ʕervaa has as its cognate Samaritan irba. Likewise, in UA, Semitic w > UA v occurs often enough, and intervocalic -v- is then re-interpreted as from PUA *-p-, though other times we see PUA *w > v in only a few languages, such that -w- occurs in most UA languages, and it can be seen that w > v within UA itself.

Note examples of intervocalic *-w- > -v-, often causing UA forms to seem from UA *-p- instead of *-w-:
(147) UA *mawiya 'mountain lion': *mawiya > mavid in some Tep languages and in Eu. [Egyptian m'i 'lion']
(1287) UA *na-wakay 'four': most languages show -w- in reflexes of *na-wakay, but *-w- > -v- in Eu návoi.
(1037) UA *yuwiN > *yuviN 'ponderosa pine' (in Num) and > *yuy 'conifer sp' (in Tak), and w > v happens often enough in Num: Kw yïvi-bï 'ponderosa or yellow pine'; Ch yuvimpï 'pine sp'; CU yïvï-pï 'pine tree'.
(569) UA *woko(N) 'pine' > Eu vokót/gokót. [Hebrew 'egooz 'nut tree']
(286) UA *pi'wi 'clean, vt' > Eu pigwide/pivide. [Egyptian px 'purge, clean']
UACV-1730 *wokin 'drag': Tb wïïgiin~'ïïwïïgin 'drag it'; Hp lölökinta 'drag, pull behind'; *w > v in Sr vööhkin 'pull, drag'; even if Tb's first vowel does not agree, 4 of the 5 segments agree in Tb and Hp with identical semantics: *wVkin.
UACV-1873 *awa 'tell': TO aag(a); TO aagiđ; UP 'aagï; LP 'aagi; NT áága; ST 'a'aga; Eu áwa; My hiáwa 'decir'; Tbr amwá / omwá; Tb aawiinat~aawiin 'tell to'; Hp aa'awna, aawin-/awin- 'tell, inform, relate, announce'; but Sr aav 'tell a true story' seems to show *-w- > -v- in Sr again.
(575) UA *kamo'-ta 'sweet potato': Cr kámwah; CN kamo'-tli; ST kamav 'camote' with ' > w > v. [kam'- 'truffle(s)']
(347) UA *wiru 'play a reed flute': Ca wíiru; Ls wíiru; Sr wiirui'n 'play a reed flute'; Sr wiirui'ni-t 'reed flute'; WMU viyu'/eviiyu'ni 'flute' is very similar to Sr except w > v. [Egyptian wr 'reed flute']
(165) UA *tawiya / *tuwiya > *tuya 'dance'; redupl *tu(w/v)tui: AYq tatawiilo 'turn around, vi'; Sr tuhtu' 'dance, vi'; Ktn tuhtu' 'dance, vi'; Ktn tuhtuhyït 'dancer, n'; Ls tóótuwi-š 'guardian spirit, person who performs a certain dance, the tatahuila'; Gb tóvtu'ax 'tatahuila, kind of dance'; Gb tóvto'ar 'the tatahuila dancer'; Ktn tïvi-t 'certain type of dancer'; CN i'tootiaa 'dance, v'; CN mi'to'-tli 'dance, n'; Pl ihtutia 'dance, vt/refl'; *tuya > PYp tuuda 'dance, vi'; TO čuuđ. [Egyptian rwi 'dance, v']
(799) UA *yaway > Tbr yavá-n 'river' at 'canyon' [Hebrew yə'or 'river']
UACV-845 UA *sawi 'fear' > Eu sevíce 'tener miedo, v' at 'fear' *sawi
UACV-1413 UA *yaway(a)wa / *yawayo 'lung': CN mimiyawayo-tl 'lungs'; Ca yávayva 'lung, liver'
(322) Egyptian q'yt 'high land, hill' > UA *kawi 'mountain': Eu kavít / kawí(t) / hawi 'hill'
(163) Egyptian rʕw 'sun, day' > UA *tawa > Eu tavi 'sun'; Numic tava
(566) Semitic 'ari 'lion' > UA *wari > Tbr wawi / wowi / vavo 'mountain lion'; Cr waábe'e 'coyote'; Eu bo'i / wo'i
(1512) *tiwa > Eu tivé 'tener vergüenza'
(756) Hebrew *śannaa' 'enemy, hater' > UA *sina'a / *sinawa > Num sïnáwa-vi 'coyote' as the trickster often representing the cosmic 'hater' or 'enemy' of mankind; Eu zináva 'get angry'
(719) Hebrew towlid 'bear a child, fem impfv > Ls tóvli 'to bear a child, lay an egg'
(1061) Semitic rwy 'drink' hirwiy > UA hivi (< *hipi?) 'drink'
(1464) Hebrew śə'or 'sour (leavened) dough'; Aramaic sii'uur / sy'wr > UA civu (< *cipu?) 'bitter'
(738) Hebrew qayiṣ > UA *kuwïs 'summer': Eu kuvés-rawa 'summer'; Tr kuwésa 'be summer'
(758) Hebrew š'l 'ask' > UA *sï'wï and Ls şóovini 'ask for'
(689) Semitic ʕarʕar 'juniper' > UA *wa'wari > wa'wori > abori 'juniper'
(381) Egyptian wr ẖq'w 'buzzard' > UA *wirhukuN 'buzzard': Wc wirïkï; Cr viskï 'buzzard'
(1046) Aramaic ḥagort-aa 'girdle' > UA *wikosa 'belt': Eu wikosa/vikosa
?*nayawa > SP nayava/naya'pa 'seem, look like'

Liquids *l/*r > s in a cluster with or when adjacent to a voiceless consonant
(381) Egyptian wr(t) ẖq' 'turkey buzzard' > UA *wiruku in most UA languages, but r > s in Hp wisoko, Tb, and Cr
(1279) *yagar 'point' > UA *yaka 'nose, summit' Hopi yakas- (combining form)
(91) Aramaic *naʕar-taa 'girl' > UA *nawis-t 'girl'
(1301) Semitic mlk 'to lead' > Tb mïškït 'to lead, vi'; Tb(H) mïškip 'in front'
(778) Hebrew ṭabbuur 'navel' > Tb šappuš-t 'belly'
(290) Egyptian t'-pẖrt 'medicine' > Tb tiipoohiš-t 'medicine, herb medicine'
UACV-918 Hp momospala 'honey' and PYp mumur 'bee'; Hp also devoices r > s as in buzzard, necklace, etc.
(1422) Syriac kmr / *kamar 'be sad' > Tb hammaššat 'be sad'
(1022) Hebrew maaẖaar 'next day, tomorrow' < *ma'xar (what is after) (Brockelmann); Hebrew moẖoraat 'tomorrow'; Aramaic məẖar, maẖr-aa 'next day-the' > CN moostla 'tomorrow'. In CN, -r- > -s- in a cluster with a voiceless C.
(1046) Aramaic ḥagort-aa 'girdle' > UA *wikosa 'belt': Eu wikosa/vikosa; Cah wikosa. -rt- > -s- as also the -rẖ- > -s- in 'turkey vulture' as in both cases clustering with a voiceless consonant causes devoicing of r > s, like Nahuatl y > s.

Sibilants, especially ṣ > ' in Numic
(581) Hebrew 'arṣ-aa 'earth-ward, to the earth' > UA *wïcï > Num *wï'i 'fall'
(748) Hebrew šibbeṣ, šibbaṣ- 'to weave patterns' > SP sikwa'a 'to braid'
(33, 32-kw) Hebrew biṣṣar 'make inaccessible' > UA/Num *kwi'ay / *kwi'aC 'surround, fence'

(1020) Syriac blṣ 'to bud, blossom' > Ca če-kwála'an 'open (eyes or mouth)'
(532) Hebrew *booṣer(et) > UA *pusi 'eye' > Numic *pu'i

Samech s > c (the c vs. s results of the four Semitic sibilants (s-like sounds) await more research)
(1255) Hebrew sgd, impfv: -sgod 'bow down, kneel', infinitive səgod > UA *coko 'knee, kneel'
(1307) Hebrew nes 'flag, standard, ensign' > UA *naci 'standard outside kiva'
(895) Hebrew *hi'asep 'be gathered, die, be put in family cemetery' > UA *hi'acapa 'bury, grave' > Tep hi(')asapa
(1462) Hebrew śapat 'lip, speech, edge, shore (of sea), bank (of river)' > UA *capa- 'ridge, edge'

Egyptian w > Tepiman w: normally PUA *w > Tep g, but instances of *w > Tep w do occur and may be loans, but collecting such samples to look at (more than these exist) may tell us something:
Egyptian (226) wnm 'eat'; (147) m'i 'lion'.

Initial ' > h in Sem-kw?, which is merely initial devoicing of the first vowel when glottal stop is negligible:
(1220) Syriac 'etqaraš 'to shade' > *hïkya 'shade'
(1192) Syriac 'aynaa 'who, what, m'; Syriac 'aydaa 'who? what? f' (< *'ayn-taa)
Tb haayn 'what'; acc: haaynta; the other UA forms show *hinta / *hitta 'what, acc', that is, a cluster, clear in Tb and a cluster is clear in Ls: Ls híí-ča, acc. hí-š, 'what?' (*hita > hila, thus *hinta > hita / hica); Sr hiit, acc. hiiti; Eu hat/hit, gen. híte, acc: hitá 'what'; Sr hiit; Ktn hit; Yq híta; My híta; CN tle 'what'; Wr ihtá

Afro-Asiatic and PUA *h > Tep h; the usual correspondence is PUA *h > Tep ' yet Tep sometimes retains h within UA itself (the first two) and also in the Near-East to UA tie (the last four):
UACV-560c *ihoho (> Tep *i'oho...) 'to cough': B.Tep314 *'i'ohogïi 'cough'; TO i'ihog; LP ihoga/ihosana; PYp i'osin
UACV-789 *hay... 'edge, shore, end': Cp háyve 'end, edge, shore'; Cp háye 'finish, tire of'; Ca háyva 'edge, end';
Ls háylu / háyla 'edge, end'; like Cp háye 'finish, tire of' is PYp had 'finish, vt' (UA *y > Tep d)
(184) Egyptian ḫtp 'set (of sun)' > Tep huru 'set (of sun)' and Eu hurun, but Eu h not from *s like Tep
(208) Egyptian tḥnw 'glisten, Libya' (the glistening desert) > TO tohono 'desert'
(895) Hebrew *hi'asep 'be gathered, die, be put in family cemetery' > UA *hi'acapa 'bury, grave' > Tep hi(')asapa
(463) Egyptian ḥʕ / ḥʕw 'body'; Egyptian ḥʕwt / ḥʕʕwt 'joy, rejoicing'; Egyptian ḥʕi 'rejoice' > *hoŋa 'body':
TO hon 'body'; PYp hona 'body'; Ls héŋča 'happy'. The cluster of -ʕw- > -ŋ-.
(824) TO hoohi 'mourning dove' (< *howi < UA *hayowi 'dove') with consonant harmony (*howi > hoohi),

In UA, w > kw (many more to be gathered)
*suwi > Mn sukwi 'pubic hair'
*wacuwini > Mn wahcïhkwihtu 'four'

Hebrew Semitic-p non-initial -t- > -c- or –s-
(1195) Arabic qimma(t) 'top, summit, peak' > UACV-2368 **kumisa** 'top, tuft, crest'
(613) Hebrew dVbbooteey 'bears' > Tep *posi, CrC *huce, with loss of first syllable of short unstressed V
(594) Hebrew 'axootee^y 'sisters' > UA *kooci / *koosi
(633) Semitic xaataan / xooten 'in-law, father-in-law' > UACV-1791 *kusana 'sibling-in-law':
      Ktn -kuhana 'sister-in-law' (< *kusana); Gb kúsna' 'brother-in-law'.
(1462) Hebrew śaapaa(t) 'lip, speech, edge, shore, bank' > UA *capa- 'ridge, edge': Eu zápsi (capsi) 'loma [hill]'
(1046) Hebrew/Aramaic ḥagort-aa 'girdle' > UACV-177 *wikosa 'belt'; the -rt- > -s- as also the -rḥ- > -s- in 'turkey
      vulture' such that in both cases clustering with a voiceless consonant causes devoicing of r > s.
(1386) Syriac qatqet 'laugh'; Aramaic qty / qatqet 'to laugh' > UA *kasi 'smile': Ca kaskási 'smile'
(381) Egyptian wr(t) ḫq' 'turkey buzzard' > UA *wiruku in most UA languages, but r > s in Hp wisoko, Tb, and Cr
(1400) Syriac baatar 'after, following' (< b-'atar, which equates to Hebrew b-'ašer); Hebrew ba'ašer 'because';
      Arabic 'aθar 'track'; Arabic 'iθra 'immediately after'; these three language forms are cognate in Semitic, and
      the UA form is phonologically like Hebrew, but semantically like the more original meaning in Arabic and
      Syriac, i.e., 'in the track of' or 'after, behind': AYq veasi 'behind, beside, on the other side of'.

Masoretic e = UA a: (614) makteš 'mortar' > UA *maCta / *mattas 'mortar';
(851) paane 'front, face' > UA *pana 'cheek'; (592) 'abneṭ, pl: 'abneṭ-iim 'sash, girdle' > UA *natti 'belt'; 1198;
(1307) Hebrew nes 'flag, standard, ensign' > UA *naci 'standard outside kiva'
Occasional *x > h, not usual *x > k/x: Eu kawí(t) / hawi 'hill' and 655, 1007, 1008, 1009, 1010, 1011.
Semitic-kw medial *-mm- > -(m)'m- in Numic (820, 830, 936, 938) and *-nn- > -(n)'n- (22, 715, 945)

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7.11 Measuring up to Methods for Establishing Language Relationships

In *Language Classification: History and Method*, Campbell and Poser (2008) enumerate several requirements for establishing language relationships: morphological resemblances, established sound correspondences among some basic vocabulary, sorting loans from cognates by sound correspondences, and hopes for morpheme lengths of enough segments to eliminate chance resemblances.

Morphology
Throughout, Campbell and Poser (2008, but especially in Chapter Five, 74-86) put a premium on morphology, the examples being from Indo-European, which is packed with specific morphology, especially the older or better preserved languages, with fully conjugated verbs and elaborate noun declensions of case, gender, and number. Morphology is indeed important, which makes securing relationships more difficult for language families lacking rich morphologies, such as those with non-conjugating verbs and undeclined nouns void of case, gender, etc. Polynesian languages are good examples of morphological scarcity. Even morphologically rich languages often lose that richness. In English, for example, verbal conjugation is greatly reduced, case marking remains only in pronouns, grammatical gender is lost, and its plural is generalized, with only a few archaic plurals remaining (oxen, children, brethren). This does not mean, however, that language connections cannot be firmly established for languages without rich morphology.

There is yet another matter regarding morphology. Consider the fact that Yiddish is classified as a Germanic language because it is mostly German; however, in Yiddish the Semitic infusion inserts Semitic roots into the Germanic grammatical machinery. So Yiddish is excused from retaining Semitic conjugations and morphology, even though it began with Hebrew-Aramaic speaking Jewish peoples entering central and northern Europe to gradually take on substantial amounts of German vocabulary and morphology; even its pronouns and basic vocabulary, like body parts, are mostly from German.

Tendency Toward Fossilized Morphology
Uto-Aztecan, like Yiddish, is also a language mix or an infusion into unrelated languages. However, unlike Yiddish, UA retained the Semitic pronouns and much basic vocabulary, much more than Yiddish did. Furthermore, UA, in spite of its mischsprache status, has retained a surprising quantity of the Near-East morphology (see 7.3), often in a fossilized state: UA has four Semitic plural suffixes, one Egyptian plural prefix, four Egyptian stative/passive suffixes, and one Hebrew passive/reciprocal prefix. Semitic-p contributes many Aramaic nouns whose citation forms include the suffixed definite article (see 7.3 and 8), which articles are also included in the citation forms of some Aramaic dialects, and for 'deer' (638) are found the feminine suffix for female deer and the masculine suffix for bucks. UA also has a great number of fossilized Semitic verb forms of the following types: 3rd person perfective verb forms, both singular and plural; Semitic 3rd person imperfective/prefixed forms mostly with the 3rd masc prefix ya-/yi-, some with the fem prefix ta-/ti-, and a few with both the masc and fem forms (560-561), and others of the impfv stem without a prefix. For some verbs, both the perfective and imperfective exist, like camawa (< *ṣamaħa) (814) and icmo (< *yi-ṣmaħ) (84) and laaqaħ > looqo (695) and *yilqaħ > Hebrew yi-qqaħ > UA yoko (696). Some imperatives appear (1459, 1465), but no regular 1st and 2nd person forms, only 3rd person forms or impfv stems without any person prefixes, which package of forms is quite as expected. No complete paradigms exist, except perhaps the 1st, 2nd, 3rd sg impfv series of the Aramaic verb 'to be' in the Nahuatl sg pronoun series nehwa, tehwa, yehwa (111-112).

If a language with Semitic percentages comparable to Yiddish were found in the Americas, would its connection with Semitic be accepted? The traceable history of Yiddish and its same-continent geography allow its Semitic infusion to be accepted without question. Yet UA has a higher percentage of Semitic vocabulary than Yiddish has, and more grammatical parallels, but the intervening oceans may discourage assent. But should it be so? If so, then the matter is not being decided by hard language evidence, but by paradigmatic bias.

Sound Change
The sound correspondences that Semitic-p and Egyptian have in common with UA underlie a sizable vocabulary, including much of it basic vocabulary. The set of sound correspondences of Semitic-kw with UA differ from those of the Egyptian-and-Semitic-p set, which identifies Semitic-kw as a classic loan source of another sizable amount of data/etyma, a loan source more like Phoenician in contrast to Semitic-p with its Aramaic tendencies. In addition, Semitic-p shows some pre-exilic sound distinctions (5.7, 5.8, 5.9) while the Phoenician-like Semitic-kw does not, consistent with the Phoenician alphabet lacking those distinctions.

Morpheme Length
Also among matters mentioned is morpheme length (Campbell & Poser 7.10, pp. 200, 171). As explained on page 13 of this work, the probabilities for chance correlations of morphemes of CV length is high, maybe 1/30 or 1/50, or for CVC length 1/500 or much less (1/100) if sounds that are "close" are accepted. That is, 1000 CVC items in two languages could have 2 to 30 similarities by coincidence. Items of CVCV length have smaller chance probabilities, and thus a sufficient number of them make a decent case, but they are still subject to probabilities such that a limited number of CVCV or 4-segment items can be suspect. However, as we begin finding items 5, 6, and 7 segments long, as well as hundreds of 4-segment matches, how do we logically dismiss it?

Items 7 or 8 segments long:
(853) Aramaic ḫippušit 'beetle' > UA *wippusi 'stink beetle' (both with geminated -pp-)
(567-p) Hebrew ya'amiin-o 'he believes him/it' > UA *yawamin-(o) 'believe (him/it)'
(381) Egyptian wr(t) ḥq'w 'buzzard, lit: great (of) magic' > UA *wirhukuN 'buzzard, turkey vulture'

Items 6 segments long:
(1246) hassim'al 'the left' > UA aašiŋan 'left'
(87) Arabic ʕgz / ʕagaza 'to age, grow old (of women)' > Tr wegaca- 'grow old (of women)'
(604) Aramaic rə'emaan-aa / reemaan-aa 'antelope-the' > UA *tïmïna 'antelope'
(1045) moškat 'bracelet, fetter, belt > Tb mohkat 'belt'
(57) Arabic singaab 'squirrel' = Hebrew *siggoob 'squirrel' > UA *sikkuC 'squirrel' (-gg- > -kk-)
(88) ʕalaqat 'leech' > UA *walaka 'snail'
(892) ṣanawbar 'stone pine' (type of pine) > UA *sanawap 'pine tree'
(832-p) *sarṭoon 'scratcher, crab' > *saCtun > siCtun / *suCtun 'claw, nail, crab'
(28-p) ṣurṣur 'cricket' > UA *corcor 'cricket'
(864-p) quppat, pl *quuppoot 'large basket(s) > UA *koppot 'basket' (both with -pp-)
(603) rymh (= riimaa) / riimə-taa 'large stone-the' > UA *tïmï-ta 'rock'
(99-p) Syriac rakb-uu-hi 'they climbed it' > UA *tippuhi > cippuhi 'climb' (-kb- > -pp-)
(1274-p) kookb-aa(') 'star-the' > UA *kuppaa' 'to shine (as of the stars)' (-kb- > -pp-)
(796-p) to'kal 'she/it eats' > UA *tïkkaC 'eat'
(1446-p) bar kəbaan-(aa) 'belt', kbn 'gird' > UA *pakkaC 'belt'
(778-p) ṭabbuur / ṭibbuur 'navel' > Tb šappušt 'belly'; NP sibudu 'navel'; Cr sipu; Hp sivon-
(658-kw) *-ḫabbil (< *ḫbl) 'bind, tie together' > SP wïkkwinta 'to wrap around, coil'
(614) makteš 'mortar' > UA *maCta 'mortar' and Ca *mattaš 'crush, squash, vt' (with *-tt- and -š)

Items 5 segments long:
(1409) Aramaic kuuky-aa 'spider-the' > UA *kuukya 'spider'
(926-p) 'agap 'wing, pinion, arm, shoulder' > UA *wakapu 'wing, feather'
(925-kw) 'agap 'wing, pinion, arm, shoulder' > UA *aŋapu 'wing, arm'
(617-p) diqn-aa 'beard-the, chin-the' > UA *tï'na 'mouth'
(675) ḫnp 'be pigeon-toed, bow-legged w/ toes pointing in, turtle, lizard' > UA *hunap 'badger, bear'
(52) mukkɛ 'smitten' (*mu-nkay > mukkɛ) > UA *mukki 'die, be sick'
(677) ʕagol 'round' > UA *wakol 'round'
(683) ʕmṭ 'cloud over, become dark' > UA *(w)umaC / *(w)ïmaC 'rain, be cloudy / overcast'
(1130-p) pagr-aa 'corpse, body' > UA *pïkyaa 'skin, animal hide, flesh'
(182) Egyptian hotpe 'peace(able)' > UA *huppi 'peace(able)'

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Near-East Answers to Heretofore Unresolved Uto-Aztecan Issues
The body of this work or the 1528 sets are laid out primarily to demonstrate the consonant correspondences. A greater attention to consonants in Semitic and Egyptian is natural, since the consonants carry the meaning; vowels carry grammatical meaning, such as tense/aspect, adjective and noun forms, etc. Yet the vowel correspondences are also treated at 7.1 and are quite consistent. In every language family, subsets of apparent exceptions are sometimes later explained, by specific phonological environments or rule ordering or other influences. Nevertheless, whether explained yet or not, apparent exceptions plague most language families. As Salmons (2012, 111) says in *A History of German*, "we expect, as we saw earlier, for sound change to be regular, but we find messiness in real historic data." Likewise, in this tie between UA and the Near-Eastern infusions, the sound correspondences are consistent most of the time, perhaps more often than they are within UA itself. In fact, the Near-East tie explains many of the correspondence inconsistencies within UA itself that Uto-Aztecanists could not explain previously (6.1, 6.2, 6.3, 6.5, 6.6, 6.7). Nevertheless, some apparent exceptions still sprinkle the data short of perfect neatness as Salmons notes, and within UA itself are many unexplained inconsistencies in sound correspondences. For example, no Uto-Aztecanist would deny the relatedness of the Ls and Sr forms in 571 below, yet nowhere have Uto-Aztecanists specified a correspondence of w:' in UA at all, let alone between Ls and Sr. The Near-East tie with UA shows *' > w sometimes (but remains glottal stop sometimes), so this and many sets are of stunning interest in light of Semitic, though not all sound changes are all understood yet, within UA itself, regardless this proposed tie.
(571) Semitic ya'ya' / yaa'ayaa' 'beautiful' > Ls yawáywa 'be pretty'; Sr yï'aayï'a'n 'be pretty, beautiful'
  Likewise, no Uto-Aztecanist would object to the cognates in 1058 of the closely related sister languages of Wr and Tr, yet no sound correspondence of y:' has been proposed to exist between Wr and Tr.
(1058) Arabic šarnaqat 'cocoon', the pl šarnaqaat would correspond to Hebrew *sarnaqoot / sarnaqootee[y]: UA *ca'ïku / *caCCïku 'cocoon': Wr ca'égori 'rattles of cocoon'; Tr čayéguri 'cocoon attached to a tree'. Tr and Wr do not have a ':y correspondence, though -y- from a cluster of an alveolar pair -rn- is natural enough.
  Similarly, in the closely related Central Numic languages in 1408 below, two of them show -n-, two show -'-, and one shows neither, yet no one has suggested a correspondence of -n-:-'- in CNum or anywhere.
(1408) UA *ta(C)tinuN-pi 'star': Mn tazinópï 'star'; TSh taciumpi 'star'; Sh(C) taci'ïm-pin/ttaC 'star'; Sh(M) tacï'ïm-pin 'star'; Cm tacinuupi 'star'.
  In 381 below, a cognate for 'buzzard' exists in most UA languages and in 7 of 8 branches. An intervocalic liquid -l/r- appears in most UA languages, but Hp, Tb, and Cr show -s-. Yet no correspondence of -l/r- with -s- has been proposed for those 3 languages, though in this case the suggested Egyptian source with a cluster of -rtḥ- may explain the devoicing of r > s preceding two voiceless consonants.
(381) Egyptian wrt ḥq'w 'buzzard, literally: great (of) magic'; the attested Egyptian form is the feminine wrt ḥq'w, but the syncopated cluster -rtḥ- became the liquid -r/l- in most UA languages, but -s- in Hp, Tb, and Cr: UACV-343 *wirhukuN 'buzzard, turkey vulture': Hp wisoko; Tb wišokombiš-t 'song of the turkey buzzard'; Sr wirok-t; Ktn wirukuh-t; Yq wiiru; My wiiru; Tr wirú; Tbr wilú; Wc wirïkï; Cr viskï.
  Another periodic inconsistency in UA itself is variation in which some UA languages show doubled or geminated consonants while others do not. In 832 below, Sh and the SNum languages show reflexes of a doubled consonant (like its Semitic source), but most languages have lost that gemination (a few are listed):
(832) sarṭoon 'scratcher, crab' > UA *saCtuN 'claw, nail, scratch, crab' (Hebrew o > UA u): Sh ta-sittun 'toenail'; Kw ta-šito'o-bï 'toenail'; Ch tasíco'o 'toenail', masico'o 'fingernail'; SP šïču, ma-ššï(n)čo'-N; CU sïčú-či 'crab'; CU sïčú-ppï 'fingernail'; but the Takic languages lost that gemination, showing only a single intervocalic -t- > -l-: Ca sálu-l 'claw, nail'; Ca saluki 'scratch'; Cp ṣul'a; Gb čúr 'hoof, nail'.
  In 'deer' we see medial *-h- in all languages except SP showing *-k-:
(638) Semitic *raxel 'ewe': Mn tïhïya 'old buck'; Mn(L) tïhïhta 'deer'; NP tïhïdda; TSh tïhïya(n); Sh tïhïyan; Cm tïhïya 'horse'; Kw tïhïya; Ch tïhíya; SP tïġia (< *tïkia) 'deer'. All show -h-, but SP -ġ- < PUA *-k-.
  In UACV-995, we see *-p- > *-kw-, like Semitic-kw b > UA *kw: *yïpanaC 'autumn': Mn yïbano 'be autumn'; NP yïbano; TSh yïpani; Sh yïpani; Kw yïvana; SP yïvannaC / yïvwannaC; CU yuvwa- / yïgwa-.
  In spite of exceptions in UA itself, 95% of the Semitic-UA sets accord with the proposed correspondences, and the exceptions are included to contemplate potential explanations; furthermore, the Semitic-to-UA percentage is at least as high as the percentage of UA correspondences within UA itself.