

ʿal-Khalīl ʿibn ʿahmad ʿal-Farāhīdī: The Sound System of Arabic

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A name that is respectfully recognized by Arab scholars as an exemplar of scholarship, citizenship and fidelity to one's faith is the name of ʿabdu ʿal-Raḥmān ʿal-khalīl ʿibn ʿahmad ʿal-Farāhīdī, who is simply known as Al-Khalīl.(100-175H/719-791 AD). He was born in ʿumān but lived and taught in Basrah. He traveled to Mecca every other year and came in contact with a variety of Arabic dialects.

By the accounts of the chroniclers, he was an ascetic and a creative genius who devised many ways of looking into the Arabic language and its structure. The metrics of Arabic owe their formalization and foundations to him. He contemplated the classical pre- and post-Islamic Arabic poetry and captured its varied rhythms by reducing them to fourteen basic meters with their proper identities and proper labels, referred to as the science of *ʿal-saruwḍ*^f.

Although the prosodic feat would have been enough to immortalize him, ʿal-Khalīl is also known for his other linguistic innovations, one of the most significant is the design of the Arabic lexicon. He proposed that the root system in Arabic was constrained to roots of the bi-radicals to the quinque-radicals, and the roots that went outside these limits were either made up or borrowed lexical items. In his method, the anagrammatic method or the permutations of the radicals predicted all the possible words that may be derived from such roots with the proper inflectional or derivational modifications. In this design, he utilized the anagrammatic method by considering all the possible permutations of all the Arabic roots and their possible occurrences in the language, such as the root KTB with all its six possible permutations: ktb, kbt, tkb, tbk, bkt, and btk. Some of the results of such permutations were used, others were ignored. A second innovation he introduced was to arrange the dictionary not in accordance with the alphabetical *ʿalif, bāʿ, tāʿ*, etc. sequence but phonetically; that is, starting with the throat letters, [ʿ], [ḥ], etc., and ending with the lip letters [b] and [m]. The lexicon is called *Kitāb ʿal-ṣayn* (ʿal-Farāhīdī, 1980) 'the book of *ʿal-ṣayn*' with *ṣayn* being the first throat letter by his estimation. This lexicon became the model and inspiration for subsequent lexicographers, who copied, incorporated, modified, summarized and found other ways of accounting for the lexical items of Arabic but never overlooked the work of ʿal-Khalīl.

ʿal-Khalīl was also a grammarian. He included much phonological, morphological, syntactic and dialectal material in his lexicon, although we have no systematic book on grammar attributed to him despite some claims of attributing *kitāb ʿal-ḍumal fiy ʿal-naḥw* (ʿal-Farāhīdī, 1985), to him. His grammatical theory and insights have found their way into the work of his most prominent student, Sībawayh (Sībawayh, 1881) beyond what is found in his lexicon. Sībawayh is probably the most revered name among the grammarians of Arabic. In his book, called simply *ʿal-kitāb*, he quotes many of the former and contemporary linguists. The man most frequently quoted in this book is ʿal-Khalīl. He is quoted over 600 times on various topics of grammar (Troupeau, 1976: pp. 228-230). This bespeaks not only of the close relationship between master and disciple, but of the weight that Sībawayh gave the ideas and grammatical analyses of his master. The present treatise is part of the introduction to *Kitāb ʿal-ṣayn* (ʿal-Farāhīdī, 1980: pp. 47-60).

Translation of the Treatise¹

1. Introduction² (P. 47)

In the Name of God the Kind, the Merciful³

By praising God, we begin. By Him, we shall be guided. On Him, we depend. He is our lot and generous Provider.

This is what ʿal-Khalīl Ibn Ahmad of Basrah, may the mercy of God be on him, composed about *ḥurūf* ‘letters’ [A, b, t, θ], of what the Arabs spoke. It was a comprehensive account of the speech of the Arabs and their expressions, none of which had escaped his notice. His aim was for the Arabs to know that in their poetry, tales and speeches nothing deviated from what he composed. He set his mind to work on it, but he could not begin the composition at the beginning of [A, b, t, θ] which is the *ʿalif* [A], because the *ʿalif* is a *ḥarf muʿstall* ‘a weak letter’. When the first letter eluded him, he was loathe to begin with the second, which is the *bāʿ* [b], except as a consequence of an argument and a far reaching vision. Consequently, he examined all the letters, organized and sampled them and found out that all speech exits from the *ḥalḡ* ‘throat’. So, he made the first one to begin with, the innermost one in the *ḥalḡ* ‘throat’.

His manner of his sampling the letters was by opening his mouth with the *ʿalif* then pronouncing the letter, like: [āb], [āt], [āḥ], [āʿ], [āy]. He found out that the *ṣayn* [ʿ] was the innermost letter in the throat. So he made it the first in the book, and what was closer to it was placed higher, then higher until he came to the last one which is the *miym* [m].

If you were asked about a word and you wanted to know *mawḍiʿi ṣahā* ‘its location’, you should look at the spelling of the word, whichever of its letters you find in the introductory book, then it is in that book. (P. 48)

١ . مقدمة المؤلف

بسم الله الرحمن الرحيم

بحمد الله نبتدىء ، ونستهدي ، وعليه نتوكل ،
وهو حسبنا ونعم الوكيل .

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¹An earlier version of this treatise appeared in *International Journal of the Islamic and Arabic Studies* Vol. VIII (Sara, 1991) and printed here with the permission of the editor.

²The subdivisions have been added to the text.

³ʿal-Farāhīdī (1980: pp. 47-60).

2. Measures. ʔal-Khalīl reversed [A, b, t, ʔ] and put them according to *maxragihā* ‘their exit’ from the *ḥalG* ‘throat’ in the following arrangement:

[ʔ, ḥ, h, x, γ- G, k- g, š, d¹- s¹, s, z- t¹, d, t- ð¹, ʔ, ð- r, l, n - f, b, m - w, A, y - *hamzah*].

ʔabuw muḥāð ʔabdu ʔallāh bnu ʔāʔid said that ʔal-layʔ bnu ʔal-muð¹affar bin naḥr bin sayyār told him about ʔal-Khalīl concerning all that is in this book.

ʔal-layʔ said ʔal-Khalīl said: speech of the Arabs is constructed of four classes: on the bi-radical, tri-radical, quadri-radical and quinque-radical. The bi-radical is of two letters like: *gad* ‘may’, *lam* ‘not’, *hal* ‘question marker’, *law* ‘if’, *bal* ‘rather’ and similar ones, like function words/particles and prohibitions.

The tri-radical *ʔaffāl* ‘actions’ are like your saying *d¹araba* ‘he struck’, *xaraga* ‘he exited’, *daxala* ‘he entered’ which are constructed of three letters.

Tri-radical *ʔasmāʔ* ‘names’ are like: *ʔumar* ‘Umar’, *ʔamal* ‘camel’, *ʔaḡar* ‘trees’ which are constructed of three letters.

Quadri-radical *ʔaffāl* ‘actions’ are like: *daḥraḡa* ‘he tumbled’, *ḥamlaga* ‘he ambled’, *ḡar¹sa* ‘he hit the target’ which are constructed of four letters.

Examples of *ʔasmāʔ* ‘names’ are like: *ʔabḡar* ‘wonderland’, *ʔaḡrab* ‘scorpion’, *ḡundub* ‘grasshopper’ and similar ones.

Quinque-radical *ʔaffāl* ‘actions’ are like: *ʔiḥankaka* ‘it became pitch dark’, *ʔiḡša ʔarra* ‘he shivered’, *ʔiḥanfara* ‘he continued’, *ʔiḥakarra* ‘It became fully grown’ which are constructed of five letters. (P. 49)

Examples of *ʔasmāʔ* ‘names’ are like: *ʔaḡargal* ‘quince’, *ḥamargal* ‘swift’, *ʔamardal* ‘good natured’, *kanahbal* ‘type of tree’, *ḡara ʔbal* ‘a broad insect’, *ʔaḡanḡal* ‘a great hill of intermingled sand’, *ḡaba ʔḡar* ‘huge’ and similar ones.

٢. مقاييس . وقلب الخليل [ا ، ب ، ت ، ث] فوضعها على قدر نخرجها من الحلق وهذا تأليفه :

[ع ، ح ، هـ ، خ ، غ ، ق ، ك ، ج ، ش ، ض ، ص ، س ، ز ، ط ، د ، ت ، ظ ، ث ، ذ ، ر ، ل ، ن ، ف ، ب ، م ، و ، ا ، ي ، ء].

قال أبو معاذ عبد الله بن عائذ: حدثني الليث بن المظفر بن نصر بن سيار عن الخليل بجميع ما في هذا الكتاب.

قال الليث قال الخليل: كلام العرب مبني على أربعة أصناف: على الثنائي، والثلاثي، والرباعي، والخماسي، فالثنائي على حرفين نحو: قد، لم، هل، لو، بل ونحوه من الأدوات والزجر.

والثلاثي من الأفعال نحو قولك: ضرب، خرج، دخل، مبني على ثلاثة أحرف.

ومن الأسماء نحو: عمر وجمال وشجر مبني على ثلاثة أحرف.

والرباعي من الأفعال نحو: دحرج، هملج، قرطس، مبني على أربعة أحرف.

ومن الأسماء نحو: عبقر وعقرب، وجندب، وشبهه.

والخماسي من الأفعال نحو: اسحنكك واقشعر واسحنفر واسبكر مبني على خمسة أحرف. (ص

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ومن الأسماء نحو: سفرجل، وهمرجل، وشمردل، وكنهبل، وقرعبل، وعقنقل، وقبعثر وشبهه.

The *ʔalif* that is in *ʔishankaka* ‘it became pitch dark’ *ʔiṣṣaṣarra* ‘he shivered’, *ʔishanfara* ‘he continued’ and *ʔisbakarra* ‘it became fully grown’ is not part of the original structure; rather these *ʔalifs* are prefixed to *ʔaffāl* ‘actions’ and their likes in speech so that the *ʔalif* becomes a support and a ladder for the tongue to the letter of the structure, because the tongue is not released with the quiescent letters and it needs the connecting *ʔalif*. As for *daḥraga* ‘he tumbled’ *hamlaga* ‘he ambled’, *ḡarīsa* ‘he hit the target’, there is no need for the *ʔalif* in them to serve as a ladder. God willing you will understand.

Know that the *rāʔ* [r] in *ʔiṣṣaṣarra* ‘he shivered’, *ʔisbakarra* ‘It became fully grown’ is two [r]s, one is assimilated to the other and the gemination is a sign of assimilation.

ʔal-Khalīl said that the Arabs have neither *ʔism* ‘a name’ nor *fiʔl* ‘an action’ structures with more than five letters. Wherever you find more than five letters in *ʔism* ‘a name’ or in *fiʔl* ‘an action’ know that they are added to the structure and are not of the origin of the word: e.g. *ḡaraṣablāna* ‘a broad insect’. The original structure is *ḡaraṣbal*, and the example of *ṣankabuwt* ‘spider’, the origin is *ṣankab*.

ʔal-Khalīl said that *ʔism* ‘a name’ consists of no less than three letters: a letter to begin with, a letter to fill the word with and a letter to pause on. These are three letters. e.g. *saʔd* ‘good fortune’, *ṣumar* ‘Umar’ and *ʔasmāʔ* ‘names’ like them. It was begun with a *ṣayn* [ʔ], the word was filled with a *miym* [m] and paused on a *rāʔ* [r]. As for the cases like *zayd* ‘Zaid’ and *kayd* ‘deception’, the *yāʔ* [y] is related but not to be counted/insignificant. (p. 50)

If you were to make *bi*-radical like *ḡad* ‘maybe’, *lam* ‘not’, *hal* ‘question marker’, *law* ‘if’, *bal* ‘rather’, a name, you would geminate them and say this is a written *laww* and this is a pretty script *ḡadd*. You added a *wāw* [w] to a *wāw* [w] and a *dāl* [d] to a *dāl* [d], thus you assimilated then geminated them. Gemination is a sign of assimilation in the third letter as in the saying of ʔabi Zubayd ʔal-tʔāʔiyi:

layta šī friy wa ʔayna minniy laytu

ʔinna laytan wa ʔinna lawwan ṣanāʔu

‘I wish I knew where layta is

Both laytan and lawwan are a pain.’

والألف التي في اسْحَنَكَكْ واقْشَعَرَّ واسْحَنَفَرَّ
واسْبَكَرَّ ليست من أصل البناء ، وإنما أدخلت
هذه الألفات في الأفعال وأمثالها من الكلام
لتكون الألف عماداً وسُلماً للسان إلى حَرْفِ
البناء ، لأنَّ اللسان لا ينطلق بالساكنين من
الحروف فيحتاج إلى ألف الوصل إلا أن دَخِرَجَ ،
وهَمَلَجَ ، وقَرَطَسَ لم يُجْتَجِ فيهنَّ إلى الألف
لتكون السُّلم ، فافهَمَ إن شاء الله .

اعلم أن الراء في اقْشَعَرَّ واسْبَكَرَّ هما راءان
أدغمت واحدة في الأخرى . والتشديد علامة
الإدغام .

قال الخليل : وليس للعرب بناء في الأسماء ولا
في الأفعال أكثر من خمسة أحرف ، فمهما
وجدت زيادة على خمسة أحرف في فعل أو اسم ،
فاعلم أنَّها زائدة على البناء . وليست من أصل
الكلمة ، مثل قرْعَبْلانَة ، إنما أصل بنائها :
قرْعَبَل ، ومثل عنكبوت ، إنما أصل بنائها
عَنْكَب .

وقال الخليل : الاسم لا يكون أقل من ثلاثة
أحرف . حرف يُبتدأ به . وحرف يُحشى به
الكلمة ، وحرف يُوقَفُ عليه ، فهذه ثلاثة
أحرف مثل سَعَد وعَمَر ونحوهما من الأسماء
بُدئَ بالعين وحُشيت الكلمة بالميم ووقِفَ على
الراء . فأما زَيْد وكَيْد فإلياء مُتعلِّقة لا يُعتدُّ بها .
(ص ٥٠)

فإن صَيَّرت الثنائيَّ مثل قَدْ وهَلْ ولوَّ اسماً
أدخلت عليه التشديد فقلت : هذه لوَّ مكتوبة ،
وهذه قَدْ حَسَنَةُ الكِتَبَةِ ، زِدْتَ واوّاً على واوٍ ،
ودالاً على دال ، ثم أدغمت وشدّدت . فالتشديد
علامة الإدغام والحرف الثالث كقول أبي زيد
الطائي :

لَيْتَ شِعْرِي وأَيْنَ مِنِّي لَيْتٌ

إنَّ لَيْتاً وإنَّ لَوّاً عَناءُ

He geminated *lawwan* when he made it *ʔism* ‘a name’.

LayṪ said: I said to ʔabiy Duḡayš:

hal laka fiy zubdin wa rutʔab

‘Do you want to have butter and fresh dates?’

And he answered:

ʔašaddu ʔal-halli wa ʔawḥāhu

‘Plenty of them and in abundance’

When he made *ʔism* ‘a name’, he geminated the *lām* [l].

He said *ʔasmāʔ* ‘names’ may occur in speech with two letters, but their integrity and their meanings are based on three letters, e.g. *yadin* ‘hand’, *damin* ‘blood’, *famin* ‘mouth’. The third *ḏahaba* ‘disappeared’ for the reason that they are quiescent and their nature is quiescence like the *yāʔ* [y] of *yaday* ‘my hand’ and the *yāʔ* [y] of *damay* ‘my blood’ at the end of the word. When *tanwiyn* ‘nutation [n]’ occurs quiescent, and is added to the quiescent letter, the *tanwiyn* ‘nutation [n]’ gets confirmed because it is *ʔiʔrāb* ‘inflection’, but the quiescent letter *ḏahaba* ‘disappeared’. If you want to know their true nature, then examine them in the *gamʔ* ‘plural’ and the *tasʔiyir* ‘diminutive’, as they say *ʔaydiyhim* ‘their hands’ in the plural and *yudayyah* ‘little hand’ in the diminutive. This also occurs in the *fiʔl* ‘action’ as people say: *damiyat yaduhu* ‘his hand bled’. If you were to make *fam* ‘mouth’ dual you would say: *famawān* ‘two mouths’. That which *ʔal-ḏāhibah* ‘had disappeared’ from *fam* ‘mouth’ was a *wāw* [w].

ʔal-Khalīl said that the origin of *fam* ‘mouth’ is *fawahun*, as you can see and the plural is *ʔafwāh* ‘mouths’ and the action is *fāha* ‘he mouthed/spoke’, *yafuwḥu* ‘he mouths/speaks’, *fawhan* ‘mouth/voice’, if he were to open his mouth *li-lkalām* ‘for speech’. (P. 51)

ʔabuw ḥamzah bnu Zarʔah said that his saying *yadun* ‘a hand’ has *tanwiyn* ‘nutation [n]’ and he also mentioned that *tanwiyn* ‘nutation’ is *ʔiʔrāb* ‘inflection’. Rather, I said, *tanwiyn* ‘nutation’ is the *dʔammah* ‘closure’ [u] and the *kasrah* ‘break [i]’ that accompanied *dāl* [d] in *yad* ‘hand’ in different forms, but *tanwiyn* ‘nutation [n]’ distinguishes between the *ʔism* ‘name’ and the *fiʔl* ‘action’. Don’t you see that you say *taʔsalu* ‘you act’ but you don’t find the occurrence of *tanwiyn* ‘nutation [n]’ at the end of the word. Don’t you see that you say *raʔaytu yadaka* ‘I saw your hand’ *hāḏihi yaduka* ‘this is your hand’ *ʔagibtu min yadika* ‘I wondered about your hand’. You inflect the *dāl* [d] and *taʔraḥu* ‘you drop’ the *tanwiyn* ‘nutation [n]’.

فَشَدَّدَ "لَوًّا" حِينَ جَعَلَهُ اسْمًا.

فقال الليث : قلت لأبي الدُقَيْشِ : هل لك في زُبْدٍ وَرُطَبٍ؟

فقال : أَشَدُّ الْهَلِّ وَأَوْحاه ،

فَشَدَّدَ اللَّامَ حِينَ جَعَلَهُ اسْمًا.

قال : وقد تجيء أسماءٌ لفظها على حرفين وتماؤها على ثلاثة أحرف مثل يَدٍ وَدَمٍ وَفَمٍ، وإنما ذَهَبَ الثالث لِعِلَّةٍ أنها جاءت سَوَاكِنَ وَخَلَقَتْهَا السُّكُونُ مثل ياء يَدَيَّ وَياء دَمَيَّ في آخر الكلمة، فلما جاء التنوين ساكنًا اجتمع ساكنان فثَبَّتَ التنوينُ لأنه إعرابٌ وذَهَبَ الحرفُ الساكنُ، فإذا أردتَ معرفتها فاطْلُبْها في الجمع والتَّصْغِيرِ كقولهم : أَيديهم في الجمع ، وَيُدَيَّةٌ في التَّصْغِيرِ . ويوجد أيضًا في الفعل كقولهم : دَمَيْتَ يَدَهُ ، فإذا ثَبَّتَ الفمُ قُلْتُ : فَمَوَانُ كانت تلك الذاهبة من الفم الواو.

قال الخليل : بل الفمُ أصلُهُ فَوَهٌ كما ترى والجمع أفواه ، والفعل فاه يَفُوهُ فَوُهًا ، إذا فَتَحَ فَمَهُ للكلام. (٥١)

قال أبو أحمد حمزة بن زرعة : قوله : يَدٌ دَخَلَهَا التنوينُ وَذَكَرَ أَنَّ التَّنْوِينَ إِعْرَابٌ (قلت بل) الإعراب الضمّة والكسرة التي تلزم الدال في "يد" في وجوه ، والتَّنْوِينَ (يُمَيِّزُ بَيْنَ) الاسم والفعل ، ألا ترى أنك تقول : "تَفَعَّلُ" فلا تجد التنوين يدخلها ، وألا ترى أنك تقول : رأيتُ يَدَكَ ، (وهذه يَدُكَ) ، وَعَجِبْتُ مِنْ يَدِكَ فَتُعْرَبُ الدال وتطرح التَّنْوِينَ.

If *tanwiyn* ‘nunation [n]’ were the *ʔi ʔrāb* ‘inflection’ it would not *yasgut* ‘drop’. As for his saying *famwān* ‘two mouths’, he substituted the *wāw* [w] in place of *ʔal-ḏāhibah* ‘the one that had disappeared’. *ʔal-ḏāhibah* ‘ones that had disappeared’ are the *hāʔ* [h] and the *wāw* [w] and they are next to *fāʔ* [f]. *Miym* [m] entered as a replacement for them. *Wāw* [w] in *famawayn* ‘two mouths’ entered by mistake, since the poet sees that the *miym* [m] is entered into the word, and sees *ʔal-sāʔitʔa* ‘what has dropped’ from *fam* ‘mouth’ is after the *miym* [m], so he introduces a *wāw* [w] in the place from where he thinks it has dropped from and he errs.

3. Exits. ʔal-Khalīl says know that *ḥuruwf ʔal-ḏalaḡ* ‘the letters of fluency’ and *šafawiyyah* ‘labial letters’ are six and are [r, l, n, f, b, m]. These letters are called *ḏalaḡan* ‘of fluency’ since *ʔal-ḏalāḡah* ‘fluency’ in speech is with *tʔaraf ʔal-lisān* ‘the edge of the tongue’ and *ʔal-šafatayn* ‘the two lips’, and they are the *madragatā* ‘two levels’ for these six letters. Three of them are *ʔal-ḏalāḡiyyah* ‘laminal/of fluency’ [r, l, n] emitted from the *ḏalaḡ ʔal-lisān* ‘laminum of the tongue’ at the *tʔaraf* ‘edge’ of the *ḡār ʔal-fam* ‘hollow of the mouth’; and three are *šafawiyyah* ‘labial’ [f, b, m]. *maxraguhā* ‘Their exit’ is between the *šafatayn* ‘two lips’, especially. The two lips are not involved in any *ḥuruwf ʔal-sʔihāh* ‘strong letters’ except these three, only. (P. 52). *ʔal-lisān* ‘the tongue’ is not set free except in *rāʔ* [r], *lām* [l] and *nuwn* [n]. As to the rest of the letters, they are raised over the *ḏʔahr ʔal-lisān* ‘surface of the tongue’, in the area inner to the *ʔanāyā* ‘incisors’, from the *maxrag* ‘exit’ of *tāʔ* [t] to the exit of *šiyṅ* [š], between the *ḡār ʔal-ʔaʔlā* ‘upper hollow/concavity’ and the *ḏʔahr ʔal-lisān* ‘surface of the tongue’. The tongue is not involved in them except to the degree of the movement of the two layers. They do not deviate from the *ḏʔahr ʔal-lisān* ‘surface of the tongue’ to the degree of the deviation of the *rāʔ* [r], *lām* [l] and *nuwn* [n]. As to the *maxrag* ‘exit’ of *ḡiym* [g], *ḡāf* [ḡ] and *kāf* [k], it is between the *ʔukdat ʔal-lisān* ‘root of the tongue’ and the *lahāt* ‘uvula’, at the extremity of the mouth. As for the exit of *ʔayn* [ʔ], *hāʔ* [h], *ḥāʔ* [ḥ], *xāʔ* [x] and *ḡayn* [ḡ], it is in the *ḥalḡ* ‘throat’. As to the exit of *hamzah* [ʔ], it is at the extremity of the *ḥalḡ* ‘throat’. It is a *mahtuwtaḥ* ‘tense’ and *madʔḡuwtʔah* ‘constricted’ sound. If it were relaxed, it would soften and become a *yāʔ* [y], a *wāw* [w] and an *ʔalif* [A] in a manner that is different from that of the *ḥuruwf ʔal-sʔihāh* ‘strong letters’.

ولو كان التنوينُ هو الإعرابُ لم يسقط. فأما قوله: "فَمَوَانٌ" فإنه جَعَلَ الواوَ بَدَلاً مِنَ الذاهبة. فإنَ الذاهبة هي هاء وواو، وهما إلى جنب الفاء ودخلت الميمُ عوضاً منهما. والواو في "فَمَوَيْنٌ" دَخَلَتْ بِالغَلَطِ، وذلك أَنَّ الشاعر يَرى ميمًا قد أُدخِلَتْ في الكلمة فَيَرى أَنَّ الساقطَ من "الفم" هو بعد الميمِ فَيُدخِلُ الواوَ مكانَ ما يَظنُّ أَنه سقطَ منه ويغلطُ.

٣. مخارج. قال الخليل: اعلم أن الحروف الذلقت والشفوية ستة وهي: [ر، ل، ن، ف، ب، م]، وإنما سميت هذه الحروف ذلقة لأنّ الذلاقة في المنطق إنّما هي بطرف أسلة اللسان والشفيتين وهما مدرجتا هذه الحروف الستة، منها ثلاثة ذليقة: [ر، ل، ن]، تخرج من ذلقت اللسان من (طرف غار الفم) وثلاثة شفوية: [ف، ب، م]، مخرجا من بين الشفتين خاصة، لا تعمل الشفتان في شيء من الحروف الصّحاح إلا في هذه الأحرف الثلاثة (ص ٥٢) فقط، ولا ينطلق اللسان إلا بالرّاء واللام والنون. وأمّا سائر الحروف فإنّها ارتفعت فوق ظهر اللسان من لدن باطن الثنايا من عند مخرج التاء إلى مخرج الشين بين الغار الأعلى وبين ظهر اللسان. ليس للسان فيهنّ عمل أكثر من تحريك الطبقتين بهنّ، ولم ينحرفنّ عن ظهر اللسان انحراف الرّاء واللام والنون. وأمّا مخرج الجيم والقاف والكاف فمن بين عكدة اللسان وبين اللّهاة في أقصى الفم. وأمّا مخرج العين والحاء والهاء) والحاء والغين فالحلق. وأمّا الهمزة فمخرجا من أقصى الحلق مهتوتة مضغوطة فإذا رُفّه عنها لانت فصارت الياء والواو والألف عن غير طريقة الحروف الصّحاح.

When the six letters are released and the *lisān* ‘tongue’ is eased into them, it is easy for it in *mantʿiḡ* ‘speech’, and they proliferate in word structures. There is no integral quinque-radical word that is without them or some of them.

ʔal-Khalīl said if you were to come across a quadri-radical or a quinque-radical word without *ʔal-ḍalāḡah ʔaw šafawiyyah* ‘laminal or labial letters’ and in that word there is not one or two of these letters, or more than that, know that, that word is *muḥdaṡah* ‘made up’ and a *mubtadaḡah* ‘neologism’ and is not part of the *kalām* ‘speech’ of the Arabs, because you will not find anyone who hears a single quadri-radical or quinque-radical word of the *kalām* ‘speech’ of the Arabs, except that he will have one, two or more of the *ʔal-ḍalāḡah ʔaw šafawiyyah* ‘laminal or labial’ letters in it.

ʔal-layṡ said: I said what would *ʔal-muwalladah ʔal-mubtadaḡah* ‘a created and coined’ word, unmixed with any of these letters, be like? He responded with examples like *ʔal-kašaṡṡah* and *ʔal-xadʿaṡṡah* and *ʔal-kašaṡṡah* and their likes. These creations are not allowed in the *kalām* ‘speech’ of the Arabs because they do not include any of *ʔal-ḍalāḡah ʔaw šafawiyyah* ‘the laminal or labial’ letters. So do not accept any of them (P. 53) even if they are similar in expression and composition. The glib ones probably introduced to the people what is not of the speech of the Arabs in order to confuse and to obfuscate.

As to the spread out quadri-radical structure, the overwhelming majority of it is not without *ḡuruwf ʔal-ḍulḡ* ‘the laminal letters’ or some of them except about ten exceptional cases. Examples of these words are: *ʔal-ḡasḡad* ‘gold’, *ʔal-ḡasṡuws* ‘scale of justice’ *ʔal-ḡudāḡhis* ‘strong march’, *ʔal-duṡṡuwḡah* ‘small woman’ *ʔal-ḡuduḡah* ‘quieted young camel’ *ʔal-zuḡzuḡah* ‘loud laughter’ and they are explained in their places.

ʔabuw ʔahmad hamzah bin Zarḡah said it is as the poet said:

wa du ṡṡuwḡatun fiyhā tarannaḡa dahṡam
ta ṡaṡṡaḡtuhā laylan wa taḡḡiy gulāḡi ḡu

‘A small woman on her back, the rider sways
I am enamored of her at night with bows under me’

فلما ذلقت الحروف الستة ، ومذل بهن اللسان
وسهلّت عليه في المنطق كثرت في أبنية الكلام ،
فليس شيء من بناء الخماسي التام يعرى منها أو
من بعضها .

قال الخليل : فإن وردت عليك كلمة رباعية أو
خماسية معرّاة من حروف الذلق أو الشفوية ولا
يكون في تلك الكلمة من هذه الحروف حرف
واحد أو اثنان أو فوق ذلك فاعلم أنّ تلك
الكلمة محدثة مبتدعة ، ليست من كلام العرب
لأنك لست واجداً من يسمع من كلام العرب
كلمة واحدة رباعية أو خماسية إلا وفيها من
حروف الذلق والشفوية واحد أو اثنان أو أكثر .

قال الليث : قلت : فكيف تكون الكلمة المولدة
المبتدعة غير مشوبة بشيء من هذه الحروف ؟
فقال : نحو الكشعشع والخصعع والكشعطع
وأشباههن ، فهذه مولدات لا تجوز في كلام
العرب ، لأنه ليس فيهن شيء من حروف الذلق
والشفوية فلا تقبلن منها (ص ٥٣) شيئاً ، وإن
أشبه لفظهم وتأليفهم ، فإن النحارير منهم ربّما
أدخلوا على الناس ما ليس من كلام العرب
إرادة اللبس والتعنت .

وأما البناء الرباعي المنبسط فإن الجمهور
الأعظم منه لا يعرى من الحروف الذلق أو من
بعضها ، إلا كلمات نحو من عشر كن شواذ .
ومن هذه الكلمات : العسجد والقسطوس
والقداحس والدعشوقة والهدعة والزهزقة
وهي مفسرة في أمكنتها .

قال أبو أحمد حمزة بن زرعة هي كما قال الشاعر :

ودعشوقة فيها ترنح دهم
تعشقتها ليلاً وتحتي جلاهق

There is no *dušwuḡah* nor *gulāhiḡu* in the *kalām* ‘speech’ of the Arabs, nor a word that begins with *nara*, and no language has *ḏ̣ʔāʔ* [ḏ̣ʔ] except Arabic, and no language has *ʔal-tanawwuru* is *tanawwur* in it. These words are without *ʔal-ḏulḡ* ‘the laminal’ letters. That is why they are rare hence they are few. If they were without *ʔayn* [ʔ] and *ḡāf* [ḡ], they would be no good at all. However, *ʔayn* [ʔ] and *ḡāf* [ḡ] do not enter a structure except to enhance it, because they are the freest of letters and with the greatest *gars* ‘ring’. If both or one of them occur together in a structure, the structure improves due to their clarity. If the structure is *ʔismān* ‘a name’, it has a *siyn* [s] or a *dāl* [d] with the necessity of a *ʔayn* [ʔ] or a *ḡāf* [ḡ], because a *dāl* [d] is softer than the stiffness of a *ṭʔāʔ* [ṭʔ] and its *rigidity*. (P. 54) It rises from the inaudibility of *ʔal-tāʔ* [ṭʔ]. It gets better. The circumstance of the exit of *siyn* [s] is between the exits of *ʔal-ṣʔād* [ṣʔ] and *ʔal-zāy* [z], in the same manner. Whatever occurs of the spread out quadri-radical *ʔism* ‘name’ without *ʔal-ḏalāḡah* *ʔaw šafawiyah* ‘the laminal or labial’ letters, it will not be without one of the two letters of *ʔal-ḏalāḡah* ‘fluency’ or both of them, or be without a *siyn* [s] or a *dāl* [d] or one of them. It is not detrimental if it violated the letters of *ʔal-ṣʔutm* ‘non-throat’ letters. If you come across something like that, observe what is of Arabs’ creation and what is not of their creation. For example *ḡaʔḡaga*, *naʔḡag* and *daʔḡag* do not belong to any variety of Arabic, even if they are attributed to a most trustworthy informant, can not be denied. We have not heard of them. We, however, constructed them so that the authentic Arabic structures can be distinguished from the alien ones.

وليس في كلام العرب دُعشوقة ولا جُلَاهِق، ولا كلمة صَدْرُهَا "نَر" وليس في شيء من الألسن ظاء غير العربية ولا من لِسَانٍ إِلَّا التَّنُورُ فيه تَنُور. وهذه الأحرف قد عَرِينَ من الحروف الذُّلِق، ولذلك نَزَرْنَ فَكَلَلْنَ. ولو لا ما كَزَمَهُنَّ من العين والقاف ما حَسُنَ على حال. ولكن العين والقاف لا تدخلان في بناء إِلَّا حَسَّتَاه، لِأَنَّهُمَا أَطْلَقَ الحروف وَأَضَخَمَاهَا جَرَسًا. فإذا اجتمعا أو أحدهما في بناء حَسُنَ البناء لِنِصَاعَتِهِمَا. فَإِن كَانَ البِنَاءُ اسْمًا كَزَمَتْهُ السَّيْنُ أو الدَّالُ مع لزوم العَيْنِ أو القاف. لِأَنَّ الدَّالَ لانت عن صلابة الطَّاء (ص ٥٤) وكزازتها وارتفعت عن خُفُوتِ التَّاء فَحَسُنَتْ. وصارت حال السَّيْنِ بين مَخْرَجِ الصَّادِ والزَّاي كذلك، فمهما جاء من بناء اسم رباعي مُنْبَسِطٌ مُعَرِّي من الحُرُوفِ الذُّلِقِ والشَّقْوِيَّةِ فَإِنَّهُ لَا يَعْرِى من أَحَدِ حَرَفِي الطَّلَاقَةِ أو كليهما. ومن السَّيْنِ والدال أو أحدهما، وَلَا يَصُرُّ ما خالف من سائر الحروف الصُّتَم. فإذا ورد عليك شيء من ذلك فأنظر ما هو من تأليف العرب وما ليس من تأليفهم نحو: قَعْجَجٌ وَنَعْجَجٌ وَدَعْجَجٌ لَا يُنْسَبُ إلى عَرَبِيَّةٍ ولو جاء عن ثِقَّةٍ لَمْ يُنْكَرْ وَلَمْ نَسْمَعْ بِهِ (ولكن أَلْفَنَاهُ لِيُعْرَفَ صَحِيحُ بِنَاءِ كَلَامِ العَرَبِ من الدخيل).

As for the spread out quadri-radical, denuded of *ʔal-ḏulḡ* ‘laminal’ letters, it is constructed speech, e.g. *dahdāḡ* ‘stirring the pot’ and *zahzāḡ* ‘laughing derisively’ and their likes. The occurrence of the *hāʔ* [h] and the *dāl* [d] which are similar to the obligatory *ʔayn* [ʔ] or *ḡāf* [ḡ] adds to their acceptance. They preferred *ʔal-hāʔ* [h] in this case for its lenity and delicacy. *ʔal-hāʔ* [h] is an unobstructed breath.

وأما ما كان من رُبَاعِيٍّ مُنْبَسِطٌ مُعَرِّي من الحروف الذُّلِقِ حكاية مؤلفة نحو: دَهْدَاقٌ وَزَهْزَاقٌ وَأَشْبَاهُهُ فَانِ الهَاءِ والدال المتشابهتين مع لزوم العين أو القاف مُسْتَحْسَن. إِنَّمَا اسْتَحْسَنُوا الهَاءَ فِي هَذَا الضَرْبِ لِئِنَّهَا وَهَشَّاشَتِهَا. وَإِنَّمَا هِيَ نَفْسٌ لَا اعْتِيَاصَ فِيهَا.

Even if the constructed *ʔikāyah* ‘imitation’ is not without *ʔal-ḏulḡ* ‘laminal’ letter, it will not be harmful whether *ʔal-hāʔ* [h] is included in it or not. For example, *ʔal-ʔaṭmaṭʔah* ‘clashing of waves’ and its likes.

وإن كانت الحكاية المؤلفة غير مُعَرَّةٍ من الحروف الذُّلِقِ فَلَنْ يَصُرَّ كَانَتْ فِيهَا الهَاءُ أو لا نحو: العَظْمَةُ وَأَشْبَاهُهَا.

ḥikāyah ‘imitation’ is no more than that the letter of *sʿadrihā* ‘its onset’ is in agreement with the *sʿadr* ‘onset’ of what is added to the rest of it. It is as though they added [dh] to [dG] and they combined the two together. Were it not that the letters that occur in both were similar, they would not be acceptable constructions, since quadri-radical constructions are either constructed or reduplicated.

As for the constructed ones, they are as I described them for you. They are rare and few. If *huḥḥuḥ* were part of *ḥikāyah* ‘imitation’, it would be permitted (P, 55) on the analogy of the structure of Arabic composition, even if *xāʔ* [x] is after the *ḥayn* [ʔ], because *ḥikāyah* ‘imitation’ is tolerant of constructed creations, what others do not tolerate in expressing the meaning of the construction. Since *huḥḥuḥ* is a special *ḥism* ‘name’, as some say, but it is unknown to most people of vision and knowledge. It is rejected and it is not accepted.

As for *ʔal-ḥikāyah ʔal-mudʿāḥafah* ‘reduplicative imitation’, it has the status of *sʿalsʿalah* ‘clang’ and *zalzalah* ‘shake/rumble’ and their likes. People are duped by the beauty of the motion as they are duped by the *ḡars* ‘ring’ of the sound. They reduplicate so *ʔal-ḥikāyah* ‘the imitation’ goes on according to the appearance of *ʔal-tasʿriyf* ‘the derivation’.

In *ʔal-mudʿāḥaf* ‘reduplicative’ style of imitations and others, the last two letters are similar to its first two letters and that structure is favored by the Arabs. Its use is permissible in creating words of all that occurs in *ʔal-sʿaḥiyh wa ʔal-muḥḥal* ‘the strong and the weak’, from the *ʔal-ḥulḡ wa ʔal-sʿutm* ‘the laminals, the free and non-throat’ letters. It is related to the *ḥi*-radical because it reduplicates it. Don’t you see that during speech the speakers utter *sʿalsʿalata ʔal-ligāmi* ‘clang of the bridle’ and says *sʿalsʿala ʔal-ligāmu* ‘the bridle clanged’. If he so wished, he could have said *sʿalla* ‘it clanged’ reducing by one and be satisfied with it or repeating it twice or three times like: *sʿal sʿal sʿal* or do whatever else appeals to him. (P. 56)

ولا تكون الحكاية مؤلفة حتى يكون حرف صدرها موافقا لحرف صدر ما ضم إليها في عجزها، فكأنهم ضموا "ده" الى "دق" فألفوهما ولولا ما جاء فيهما من تشابه الحرفين ما حسنت الحكاية فيهما لأن الحكايات الرباعيات لا تخلو من أن تكون مؤلفة أو مضاعفة.

فأما المؤلفَةُ فعلى ما وصفتُ لك وهو نزر قليل. ولو كان الهُجْعُ من الحكاية لجاز (ص ٥٥) في قياس بناء تأليف العرب، وإن كانت الخاء بعد العين، لأن الحكاية تحتل من بناء تأليف ما لا يحتمل غيرها بما يُريدون من بيان المحكي. ولكن لما كان الهُجْعُ، فيما ذكر بعضهم اسما خاصا، ولم يكن بالمعروف عند أكثرهم وعند أهل البصر والعلم منهم ردّ ولم يُقبل.

وأما الحكاية المضاعفة فإنها بمنزلة الصلصلة والزلزلة [وما أشبهها] يتوهمون في حُسن الحركة ما يتوهمون في جرس الصوت [يضاعفون لتستمر] الحكاية في وجه التصريف.

والمضاعف في [البيان] في [الحكايات و غيرها] ما كان حرفاً عجزه مثل حرفي صدره وذلك بناء يستحسنه [العرب] فيجوز فيه من تأليف الحروف جميع ما جاء من الصحيح والمعتل ومن الذلّقي [والطلق] والضم. وينسب الى الثنائي لأنه يضاعفه، ألا ترى في الحكاية أن الحاكي يحكي صلصلة اللجام فيقول صلصل اللجام. وإن شاء قال: صل، يحقق مرةً اكتفاء بها وإن شاء أعادها مرتين أو أكثر من ذلك فيقول: صل، صل، صل، يتكلف من ذلك ما بدا له. (ص ٥٦)

It is permissible in *ḥikāyat ʔal-mudʿāṣafah* ‘the reduplicative imitation’ what is not permissible in the creation of other words. Don’t you see that if the *dʿād* [dʿ] and the *kāf* [k] are joined, one begins with the *dʿād* [dʿ] and says *dʿk*. This is a composition that is not acceptable in the formation of *ʔasmāʔ* ‘names’ or *ʔafʿāl* ‘actions’, unless there is a separation between its two letters with one or more obligatory letters like *dʿank* ‘hardship’, *dʿaḥk* ‘laughter’ and similar ones. This is permissible in the reduplicative as in *dʿakdʿāka* ‘stillness of the flesh’ of women. The reduplicative permits the minimum and the maximum of separators between *ʔaṣgāz* ‘codas’ and *ʔal-sʿuduwr* ‘onsets’ of words and other than that.

The Arabs derive, in much of their speech, *ʔal-mudʿāṣafah* ‘the reduplicative’ structures from the structure of the tri-radical that is rendered heavy by the two reduplicated letters and from the *muṣtall* ‘weak’ tri-radical. Don’t you see that they say *sʿalla ʔal-ligāmu* ‘the bridle clanged’, *yasʿillu* ‘it clangs’, *sʿaliylan* ‘clanging’. If you were to speak like that, you would say *sʿalla* ‘it clanged’. By lengthening the *lām* [l] and rendering it heavy. You lightened it in *sʿalsʿalah* ‘clanging’, and all these are the sounds of the bridle. Heaviness is length and reduplication is a return that lightens. Since it consists of two letters, it is not considered *li-ltasʿriyf* ‘for derivation’ until it is reduplicated or rendered heavy, and in most cases it comes out in accordance with what I described for you. And many of them are different, as in your saying *sʿarra ʔal-gundubu sʿariyran* ‘the grasshopper creaked creakingly’. *Sʿarsʿara ʔal-ʔaxtʿabu sʿarsʿaratan* ‘the hawk screeched screechingly’. It is as though they confused the sound of the locust with length, and that of *ʔaxtʿab* ‘hawk’ with return to the expanded form. And examples of that are many and varied. (P. 57)

As to what is derived from the reduplicated of the tri-radical of the weak forms, it is as the saying of ʔal-ʔaggāg:

wa law ʔanaxnā gam ʔahum tanaxnaxuw
‘If we were to make the camels kneel, they
would kneel with an āx-āx sound’

and he said in another verse:

li-faḥlinā ʔin sarrahu ʔal-tanawwuxu
‘For our beast if it liked the kneeling’

ويجوز في حكاية المضاعفة ما لا يجوز في غيرها من تأليف الحروف ألا ترى أن الضاد والكاف إذا أُلِّفَا فَبُدِيَءَ بِالضَّادِ فَعِيلٌ : "ضك" كان تأليفاً لم يُحْسَن في أبنية الأسماء والأفعال إلا مفصلاً بين حرفيه بحرفٍ لازم أو أكثر من ذلك الضنك والضحك وأشباه ذلك. وهو جائز في المضاعفة نحو الضكضكاة من النساء. فالْمُضَاعَفُ جائز في كل غثٍّ وسمين من الفصول والأعجاز والصدور وغير ذلك.

والعربُ تَشْتَقُّ في كثير من كلامها أبنية المضاعف من بناء الثلاثي المثقل بحرفي التضعيف ومن الثلاثي المعتل، ألا ترى أنهم يقولون: صَلَّ اللِّجَامُ يَصِلُّ صَليلاً، فلو حَكَيْتَ ذلك قُلْتَ: صَلَّ تَمَدُّ اللامِ وتثقلها، وقد خَفَّفْتَهَا في الصلصلة وهما جميعاً صوت [اللِّجَامِ]. فالثقل مدٌّ والتضاعف ترجيعٌ يَخْفُ فلا [يتمكّن لأنه على حرفين فلا يتقدّر للتصريف حتى يُضَاعَفَ أو يُثَقَّلَ [فيجيءُ كثير منه مُتَّفِقاً] على ما وصفت لك، ويحيءُ منه كثير مختلفاً نحو قولك: صَرَ الجُنْدُبُ صَريراً وصرَّ الأخطبُ صَرَ صَرةً، فكأثم توهّموا في صوت الجُنْدُبِ مدّاً و[توهّموا] في صوت الأخطبِ ترجيعاً. ونحو ذلك كثيرٌ مختلفٌ. (ص ٥٧)

وأما ما يشتقون من المضاعف من بناء الثلاثي المعتل، فنحو قول العجاج:

ولو أنخنا جمعهم تنخنخوا

وقال في بيت آخر:

لَفَحَلْنَا إِنْ سَرَّهُ التَّوْخُ

If he so wished, he could have said in the first verse: *law ʔanaxnā gamʕahum tanawwaxuw*, but he derived *ʔal-tanawwux* from *tanawwaxnāhā* and *tanawwaxat*, and he derived *ʔal-tanaxnuxa* from *ʔanaxnāhā* because *ʔanāxa*, when it comes lightened, it is better to take out of it the weak letter and then reduplicate the remaining two letters as in *tanaxnaxnā tanaxnuxan*, and when it is rendered heavy, the *wāw* [w] is lengthened and confirmed in *tanawwux*. So, understand

4. Locales. ʔal-layθ said, ʔal-Khalīl said: in Arabic there are twenty nine letters. Twenty five of which are *sʕihāh* ‘strong’ and have *ʔahyāzan* ‘locales’ and *madārig* ‘levels’ and four of which are *guwf* ‘cavity’ letters, which are: the *wāw* [w], the *yāʔ* [y], *ʔal-ʔalif ʔal-layyinah* ‘the soft *ʔalif*’ and *ʔal-hamzah* [ʔ]. They are called *gawfan* ‘of cavity’ because they exit out of the *gawf* ‘cavity’ and they do not pertain to a *madrag* ‘level’ of the tongue, nor to any *madrag* ‘level’ in the *ħalġ* ‘throat’, nor to a *madrag* ‘level’ at the *lahāt* ‘uvula’. They are, rather, hurtled in the *hawāʔ* ‘air’ and they have no place to be referred to except the cavity. He used to say frequently: the soft *ʔalif*, the *wāw* [w] and the *yāʔ* [y] are *hawāʔiyyah* ‘airy’, that is, in the *hawāʔ* ‘air’.

ʔal-Khalīl said: the farthest of all letters is the *ʕayn* [ʕ], then the *ħāʔ* [ħ]. Were it not for the harshness of *ħāʔ* [ħ] it would be similar to *ʕayn* [ʕ], due to the proximity of its exit to that of *ʕayn* [ʕ]. Then the *hāʔ* [h]. Were it not for the h-ness of the *hāʔ* [h], one time he said *hahhah*, it would be similar to the *ħāʔ* [ħ], due to the proximity of the exit of the *hāʔ* [h] to the *ħāʔ* [ħ]. These are three letters in one locale, some are higher than (P.58) others. Then *ʔal-xāʔ* [x] and *ʔal-ɣayn* [ɣ] are in one locale. All of them are *ħalġiyyah* ‘of the throat’. Then *ʔal-ġāʔ* [ġ] and *ʔal-kāʔ* [k] are *lahawiyyatān* ‘two uvulars’. The *kāʔ* [k] is higher. Then *ʔal-ġiym* [g], *ʔal-šayn* [š] and *ʔal-dʕād* [dʕ] in one locale. Then *ʔal-sʕād* [sʕ], *ʔal-siyn* [s] and *ʔal-zāy* [z] in one locale. Then *ʔal-tʕāʔ* [tʕ], *ʔal-dāl* [d] and *ʔal-tāʔ* [t] in one locale. Then the *ʔal-ḏāʔ* [ḏ], *ʔal-ḏāl* [ḏ] and *ʔal-θāʔ* [θ] in one locale. Then *ʔal-rāʔ* [r], *ʔal-lām* [l] and *ʔal-nuwn* [n] in one locale. Then *ʔal-fāʔ* [f], *ʔal-bāʔ* [b] and *miym* [m] in one locale. Then *ʔal-ʔalif* [A], *ʔal-wāw* [w] and *ʔal-yāʔ* [y] in one locale and the *hamzah* [ʔ] in the air. It has no locale to be related to.

ولو شاء قال في البيت الأول (ولو أنخنا جمعهم تنوخوا) ولكنه اشتق (التنوخ) من تنوخوا فتنوخت، واشتق (التنوخ) من أنخنا، لأن أناخ [لما جاء] مخففا حسن إخراج الحرف [المعتل] منه، وتضاعف الحرفين الباقيين في (تنوخنا تنوخنا)، ولما ثقل قويت الواو فثبتت في التنوخ، فافهم.

٤. أحياء. قال الليث: قال الخليل: في العربية تسعة وعشرون حرفاً: منها خمسة وعشرون حرفاً صحاحاً لها أحياء ومدارج، وأربعة أحرف جوف وهي الواو والياء والألف اللينة والهمزة، وسميت جوفاً لأنها تخرج من الجوف فلا تقع في مدرجة من مدارج اللسان، ولا من مدارج الحلق، ولا من مدرج اللهاة، إنما هي هاوية في الهواء فلم يكن لها حيز تنسب إليه إلا الجوف، وكان يقول كثيراً: الألف اللينة والواو والياء هوائية أي أنها في الهواء.

قال الخليل: فأقصى الحروف كلها العين ثم الحاء ولولا بحة في الحاء لأشبهت العين لقرب نخرجها من العين، ثم الهاء ولولا هتة في الهاء، وقال مرة ههه، لأشبهت الحاء لقرب مخرج الهاء من الحاء، فهذه ثلاثة أحرف في حيز واحد بعضها أرفع من (ص ٥٨) بعض ثم الحاء والعين في حيز واحد كلهن حلقية، ثم القاف والكاف لهويتان، والكاف أرفع، ثم الجيم والشين والضاد في حيز واحد، ثم الصاد والسين والزاء في حيز واحد، ثم الطاء والدال والتاء في حيز واحد، ثم الطاء والدال والتاء في حيز واحد، ثم الراء واللام والنون في حيز واحد، ثم الفاء والباء والميم في حيز واحد، ثم الألف والواو والياء في حيز واحد، والهمزة في الهواء لم يكن لها حيز تنسب إليه.

ʔal-layθ said: ʔal-Khalīl said *ʔal-ʕayn* [ʕ], *ʔal-ḥāʔ* [h], (*ʔal-hāʔ* [h]), *ʔal-xāʔ* [x] and *ʔal-ʕayn* [ʕ] are *ḥalḡiyyah* ‘of the throat’ because their origin is from the *ḥalḡ* ‘throat’. *ʔal-ḡāf* [ḡ] and *ʔal-kāf* [k] are *lahawīyyatān* ‘two uvulars’ because their origin is *ʔal-lahāt* ‘the uvula’. *ʔal-giyḡ* [g], *ʔal-šiyḡ* [š] and *ʔal-dʕād* [dʕ] are *šagriyyah* ‘of velo-palatal’ because their origin is from the *šagr* ‘opening ‘to the mouth, that is the *mafrag* ‘outlet’ of the mouth. *ʔal-sʕād* [sʕ], *ʔal-siyḡ* [s] and *ʔal-zāy* [z] are *ʔasalīyyah* ‘of the apex’ because their origin is from *ʔasalati ʔal-lisān* ‘apex of the tongue’, which is the thinning edge of the tongue’. *ʔal-tʕāʔ* [tʕ], *ʔal-dāl* [d] and *ʔal-tāʔ* [t] are *niʕīyyah* ‘of the palate’ because their origin is from the *niʕīʕ* ‘the hard palate’ of the upper *ʕār* ‘hollow/cavity’. *ʔal-ḏʕāʔ* [ḏʕ], *ʔal-ḏāl* [ḏ] and *ʔal-θāʔ* [θ] are *liθθawīyyah* ‘of the ginges/interdentals’ because their origin is from the *liθθah* ‘ginges’. *ʔal-rāʔ* [r], *ʔal-lām* [l] and *ʔal-nuwn* [n] are *ḏalḡiyyah* ‘of the laminae’ because their origin is from *ḏulḡ* ‘laminum’ of the tongue and it is the limits of the edges of the tongue. *ʔal-fāʔ* [f], *ʔal-bāʔ* [b] and *ʔal-miyḡ* [m] are *šafawīyyah* ‘of the lips’, one time he said *šafahīyyah*, because their origin is from the *šafah* ‘lip’. *ʔal-yāʔ* [y], *ʔal-wāw* [w], *ʔal-ʔalif* [ʔ], and the *hamzah* [ʔ] are *hawāʕīyyah* ‘of the air’ in one locale since nothing is connected to them. So every *ḥarf* ‘letter’ has been associated with its relative status and from the position from which it begins.

5. Arrangement. ʔal-Khalīl used to call *miyḡ* [m] *mutʕabḡah* ‘covered’ because it covers the mouth when it is uttered. The forms of the letters out of which Arabic is formed, which are twenty nine, are as follows: [ʕ, h, ḡ, x, ʕ, ḡ, k, g, š, dʕ, sʕ, s, z, tʕ, d, t, ḏʕ, ḏ, θ, r, l, n, f, b, m]. These are *ʔal-ḥuruwf ʔal-sʕīḥāḥ* ‘the strong letters’. And [w, ʔ, y] makes twenty nine letter, and out of which are created the structures of the *kalām* ‘speech’ of the Arabs. (P. 59)

ʔal-layθ said: ʔal-Khalīl said know that a *bi*-radical word can display two facets like: 1. *ḡad*, 2. *daḡ*; 1. *šad*, 2. *daš*. A *tri*-radical can display six facets called *sexitacial* like: 1. *dʕarab*, 2. *dʕabar*, 3. *baradʕ*, 4. *badʕar*, 5. *radʕab*, 6. *rabadʕ*.

قال الليث : قال الخليل : فالعينُ والحاءُ (والهاء) والحاءُ والغينُ حَلْقِيَّةٌ ، لأنَّ مَبْدَأَها مِنَ الحَلْقِ ، والقافُ والكافُ هَوَيَّتَانِ لأنَّ مَبْدَأَهُمَا مِنَ اللِّهَاءِ ، والجيمُ والشينُ والضادُ شَجْرِيَّةٌ لأنَّ مَبْدَأَها مِنَ شَجَرِ الفَمِ ، أي مَفْرَجِ الفَمِ ، وَ الصَّادُ والسَّيْنُ وَالزَّاءُ أَسَلِيَّةٌ ، لأنَّ مَبْدَأَها مِنَ أَسَلَةِ اللِّسَانِ وَهِيَ مُسْتَدَقُّ طَرَفِ اللِّسَانِ . وَالطَّاءُ وَالتَّاءُ وَالدَّالُ نَطْعِيَّةٌ ، لأنَّ مَبْدَأَها مِنَ نَطْعِ الغارِ الأَعْلَى . وَالظَّاءُ وَالدَّالُ وَالتَّاءُ لِيُويَّةٌ [لأنَّ مَبْدَأَها مِنَ اللِّثَّةِ وَ الرِّاءُ وَاللَّامُ وَالنُّونُ ذَلْقِيَّةٌ] ، لأنَّ مَبْدَأَها مِنَ ذَلْقِ اللِّسَانِ وَهُوَ تَحْدِيدُ طَرَفِي ذَلْقِ اللِّسَانِ . وَ الفاءُ وَالباءُ وَالميمُ شَفْوِيَّةٌ ، وَ قال مَرَّةً شَفْهِيَّةٌ لأنَّ مَبْدَأَها مِنَ الشَّفَةِ . وَالياءُ وَالواوُ وَالْألفُ وَالهمزةُ هَوَائِيَّةٌ فِي حَيْزٍ وَاحِدٍ ، لِأَنَّها لا يَتَعَلَّقُ بِها شَيْءٌ ، فَنَسِبَ كُلَّ حَرْفٍ إِلَى مَدْرَجَتِهِ وَ مَوْضِعِهِ الَّذِي يَبْدَأُ مِنْهُ .

٥. ترتيب. وكان الخليل يُسَمِّي الميم مُطْبَقَةً لأنها تطبق الفم إذا نُطِقَ بِها ، فهذه صورة الحُرُوفِ التي أُلْفِتْ مِنْها العَرَبِيَّةُ عَلَى الوَلَاءِ ، وَهِيَ تِسْعَةٌ وَعِشْرُونَ حَرْفًا: [ع ح هـ خ غ ، ق ك ، ج ش ض ، ص س ز ، ط د ت ، ظ ذ ث ، ر ل ن ، ف ب م] ، فهذه الحروف الصّحاح ، وَ يا ، فهذه تِسْعَةٌ وَعِشْرُونَ حَرْفًا مِنْها أَبْنِيَّةُ كَلَامِ العَرَبِ . (ص ٥٩)

قال الليث : قال الخليل : اعلم أنَّ الكَلِمَةَ الثَّنَائِيَّةَ تَتَصَرَّفُ عَلَى وَجْهَيْنِ نَحْوِ : قَد ، دَق ، شَد ، دَش . وَ الكَلِمَةُ الثَّلَاثِيَّةُ تَتَصَرَّفُ عَلَى سِتَّةِ أَوْجُهٍ ، وَ تُسَمَّى مَسْدُوسَةٌ وَهِيَ نَحْوِ : ضَرَب ، ضَبْر ، بَرَض ، بَضْر ، رَضَب ، رِبْض .

ʔal-Khalīl said: we began this, our book, with *ʔal-ʕayn* [ʕ] which is the farthest of the letters and we will add to it what follows until we encompass fully the speech of the Arabs, both the *wād'iḥ* 'clear' and the *ʕariyb* 'strange/exotic'. We began the structures with the reduplicative because it is the easiest on the tongue and the shortest approach for the one with understanding.

وقال الخليل: بدأنا في مؤلّفنا هذا بالعين وهو أقصى الحروف، ونضمُّ إليه ما بعده حتى نستوعبَ كلامَ العرب الواضح والغريب و بدأنا الأبنية بالمضاعف، لأنّه أخفُّ على اللسان وأقربُ مأخذاً للمتفهم.

The chart below reflects ʔal-Khalīl's classification of the sounds of Arabic:

LETTER / <i>ḥarf</i> /	LOCALE / <i>ḥayyiz</i> /	EXIT / <i>maxrag</i> /
S	Throat / <i>ḥalḡ</i> /	ʔ, ḥ, ḫ, x, ɣ
	Uvula / <i>lahāh</i> /	ḡ, k
T	Soft-palate / <i>šagr</i> /	g, š, d'
R	Apex / <i>ʔasalah</i> /	ʂ, s, z
O	Alveolum / <i>niṭṭ</i> /	ṭ, d, t
N	Gingiva / <i>liṯṯah</i> /	ḏ, ṯ, ḏ
G	Laminae / <i>ḏalaḡ</i> /	r, l, n
	Lips / <i>ʔafah</i> /	f, b, m
strong / <i>ṣaḥīḥ</i> /		
Weak / <i>muṣtal</i> /	Cavity/air / <i>hawāʔ</i> /	w, A, y, ʔ

Bibliography

- ʔal-Farāhīdī, ʔal-Khalīl ʔibn ʔaḥmad. 1980-1986. *Kitāb ʔal-Ṣayn*. Mahdi ʔal-Makhzuwmi and Ibrahim al-Sāmirraʔi. Eds. Baghdad: Dār ar-Rashid.
- ʔal-Farāhīdī, ʔal-Khalīl ʔibn ʔaḥmad. 1985. *Kitāb ʔal-jumal fiy ʔal-naḥw*. Fakhr ʔal-Di-n Qabāwah. Ed. Bayruwt: Muʔassasat ʔl-Risālah.
- Sara, Solomon. I. 1991. "ʔal-Khalil: The First Arab Phonologist". In *International Journal of Islamic and Arabic Studies* Vol VIII: 1-57.
- Sībawayh. 1881/1970. Derenbourg, H. Ed. *Sībawaihi: Le Livre de Sībawaihi: Traite de Grammaire Arabe*. Hildeshein: Georg Olms Verlag.
- Troupeau, G. 1976. *Lexique-index du "Kita-b" de Si-bawayhi*. Paris: Klincksieck.