

# Landscape terms and toponyms in Jahai: a field report

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## 1. Introduction

This report explores issues of geographical cognition as reflected in landscape terms and place-names among the Jahai, a group of hunter-gatherers in the Malay Peninsula. It is based on fieldwork conducted in October–November 2002 with a group of Jahai settled in the village of Sungai Banun, in the Hulu Perak district of Perak state, Peninsular Malaysia. Data collection involved interviews and observations, especially during travels together with Jahai consultants through the Jahai territory by foot or by car, and was inspired by the ‘Toponym questionnaire’ and its supplements in the 2001 and 2002 field manuals of the Language & Cognition Group at the Max Planck Institute for Psycholinguistics (Bohnemeyer 2001; Levinson 2002). Data has also been extracted from field-notes from the author’s earlier fieldwork in the area, conducted intermittently between 1998 and 2000. The report, which should be considered preliminary, is a contribution to the subproject on places and place-names within the ‘Space Project’ at the same department.<sup>1</sup>

### *1.1. The Jahai*

The Jahai are a group of about 1,000 hunter-gatherers, traders and occasional swidden cultivators inhabiting the montane rainforests of northern Peninsular Malaysia and adjacent parts of southern Thailand. They form the largest

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ethnic group of a cluster of hunter-gatherer populations in the Malay Peninsula referred to generically as *Semang*. Their traditional subsistence system is based on hunting, fishing and the collecting of wild tubers and vegetables. Occasionally they make small swiddens where they grow mainly cassava and dry rice. They are also engaged in the collecting of commercial forest products, mainly rattans, gaharu (*Aquillaria* spp.) and honey. Traditionally, the Jahai live in mobile groups of 15-50 people, sheltering in windbreak huts and moving camp every one to two weeks. When engaged in swidden cultivation a group may settle down for a month or more in more permanent houses. Nowadays many Jahai lead a settled or semi-settled life in regroupment programs established by the Malaysian government (van der Sluys 1999:308-310; Burenhult 2002:1-3).

The language of the Jahai, referred to by the same name, is a member of the Northern Aslian subgroup of the Aslian languages, a branch of the Mon-Khmer language family. Characteristic features include a fairly rich system of vowel phonemes, a complex system of word formation involving intricate processes of derivational affixation and reduplication, and rich pronominal and demonstrative distinctions. The Jahai language is heavily influenced by Malay, the Austronesian majority language of the peninsula, as reflected for example in a large number of loanwords (Burenhult 2002).

### 1.2 The geographical setting

The Jahai territory covers an area of about 3,500 square kilometres and straddles the main Titiwangsa (or Central) divide in the northernmost part of Peninsular Malaysia, including the northeastern part of the state of Perak (Hulu Perak district) and the western part of the state of Kelantan (Jeli district). A small number of Jahai is said to inhabit adjoining parts of the Yala and Narathiwat provinces of southern Thailand. More specifically, the Jahai inhabit the uppermost part of the drainage areas of two major rivers: the Perak, which flows southwest to the Straits of Malacca, and the Pergau, which flows southeast towards the Kelantan, which meets the South China Sea near Kota Bharu. The main portion of the Jahai territory lies on the western, Perak side of the Titiwangsa divide.

The topography of the area is dominated by the mountains of the Titiwangsa range, and the relief ranges between about 100 and 1,800 metres. The landscape is generally characterised by a maze of narrow, steep-sided valleys, which widen out only at the eastern and western peripheries of the territory. The area is flanked to the east and west by two conspicuous

geological landmarks which are of great mythological significance to the Jahai: the two peaks of Kenderong (*Rlay* and *Rnayoh* in Jahai) near Grik in the west, and the precipitous limestone formation of Batu Melintang or Batu Reng (*Rem* in Jahai) by the Pergau river near Jeli in the east.

The area is drained by swift-flowing mountain streams, which are fed by countless rivulets that trickle down from their sources on the mountain sides. The streams are shallow and generally fordable, and their profile is characterised by numerous rapids and vertical or near-vertical knick-falls. Only at the eastern and western peripheries of the territory do rivers begin to slow down and become sizeable.

The vegetation is made up of mostly primary Dipterocarp rainforest characteristic of foothills and lower montane regions, which forms a dense cover over most of the mountainous territory. Rainfall averages 2,250 mm per year and occurs year-round.

In the late 1970s, the Temenggor hydroelectric project flooded some 150 square kilometres of forest along the upper Perak in the heart of the Jahai territory and created a limnic environment characterised by numerous inlets and islands. The lake has had a profound impact on Jahai communities in that it facilitates communication between distant parts of the area. Also, several groups of Jahai now supplement their livelihood with commercial fishing. Another recent development is the construction of the East-West Highway, a two-laned paved road connecting Grik with Jeli which cuts straight through the Jahai territory.

## 2. Landscape terms and categories of geographical entities

This section describes the more prominent landscape terms in Jahai and their mutual relationships. As will be shown, subcategorisation of landscape entities draws heavily on metaphorical extension from the domains of the human body and kinship.

### 2.1 Water

Take watercourses, for example (note the avoidance of the term 'river', which has no Jahai equivalent). The term for water or fluid, *tom*, may denote a whole drainage system or any subpart thereof, down to a single drop of water. Subcategorisation of a drainage system is achieved primarily by means of metaphorical extension of human body part terms. Thus, *mit tom* 'water-eye' refers to a point on a mountain side where surface run-off first assembles to form rivulets, or where spring water emerges from the ground.

Such features are sometimes also referred to as *moh tom* 'water-nose'. A larger system of such sources is called *kuy tom* 'water-head', and a peripheral source of such a system may be referred to as *?ntey tom* 'water-ear'. The main stream of a drainage system is referred to as *ley tom* 'water-body'; *klapah tom* 'water-shoulder' represents an upper tributary, and *bli? tom* 'water-thigh' (or *can tom* 'water-foot') denotes a lower tributary. The mouth of a drainage system is referred to as *kit tom* 'water-bottom'; its bottom is called *dada? tom* 'water-chest' and its surface is *krə? tom* 'water-back'. A drainage system thus appears to be conceptualised as a body lying face-down (see Figure 1). The Jahai sometimes speak of water as 'looking across' the watershed divide into the 'eyes' of an adjacent drainage system.

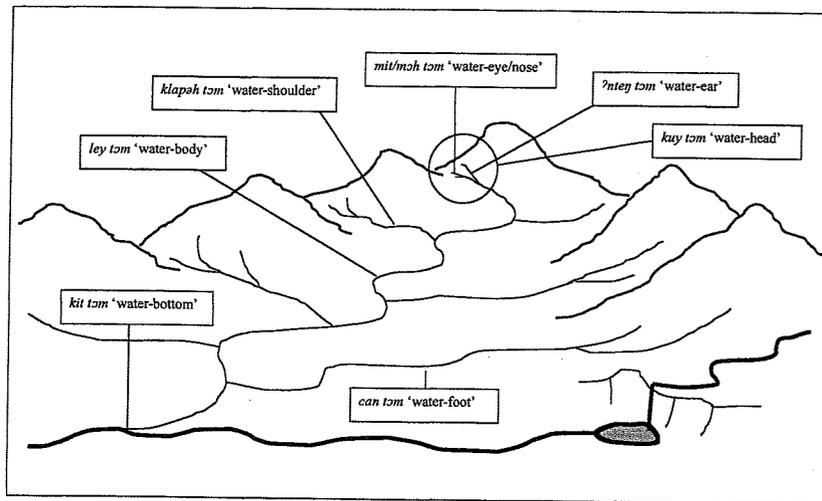


Figure 1. Examples of body part terms used metaphorically in Jahai to denote features of a drainage system.

The relationship between different features of a drainage system is frequently also expressed by means of metaphors drawn from the domain of human kinship. A little rivulet is referred to as a *tom wəŋ* 'child-water', which empties into its *tom bi?* 'mother-water', which in turn may flow into a watercourse of similar size referred to as the *tom ?ey* 'father-water'. Occasionally the terms *tom kneh* 'wife-water' and *tom ksiy* 'husband-water' are used.

In addition to such metaphorical terminology there is a handful of terms which specifically signify certain features along a watercourse. For example, a bend in a stream is referred to as *kunah* (possibly a loan of English 'corner' via Malay); a waterfall (vertical or near-vertical) is called *lata?* (from Malay *lata* 'waterfall') and the plunge pool below is called *lobo?* (from Malay *lobok* 'pool'); a rapid is referred to as *jrem* (from Malay *jeram* 'rapid'), and the confluence of two watercourses is called *was*. The term *cabay* (from Malay *cabang* 'branch') denotes any type of tributary, and *snret* refers to a dry stream-bed. It is interesting to note that much of this non-metaphorical terminology has been borrowed.

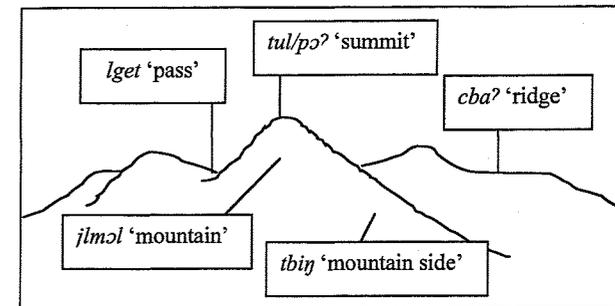


Figure 2. Examples of topographical terminology in Jahai.

## 2.2 Landforms

Jahai topographical terminology is illustrated in Figure 2. The most general term for landmass is *te?*, which can be translated as 'soil', 'ground', 'land' and 'place'. Raised landmass is referred to by a variety of terms, the most common and general probably being *jlməl* 'mountain'. The mountain ridges that run down from the top of a mountain are called *cba?*, and the sides of mountains and ridges (from the foot all the way up to the crest) are referred to as *thiy*. The highest point of a mountain is called either *tul* or *pə?*. So-called *lget* are the concave shapes in the form of gaps or passes where the *cba?* of two mountains meet. These are significant to the Jahai during travelling as they usually provide the easiest way of moving across a divide from one watershed to another. A *lget* is also the site of *mit tom* 'water-eyes' and forms the point where sources of two different drainage systems are at their closest. Stream-beds are referred to as *carək* (from Malay *caruk*

'runnel'), and flat areas, especially along watercourses, are called *tpis* or *lgim*. The term *batu?* (from Malay *batu* 'rock') refers to outcrops, rocks and cliffs, and *gahuj* denotes a cave or rock-shelter (from Malay *gaung* 'ravine').

Metaphors are not so much in evidence in topographical terminology as in that pertaining to drainage systems. Mountains are sometimes spoken of in terms of *kuy te?* 'land-heads' and are, in turn, themselves considered to have a *kuy* 'head' (the summit), a *krɔ?* 'back' (the ridges) and *klapəh* 'shoulders' (the sides), for example.

### 2.3 The forest

Forest is referred to generically as *hip*. This word also means 'outside'. Somewhat surprisingly – and unlike some other Semang groups, like the Batek (cf. Endicott and Bellwood 1991:160-162; Lye 2004) – the Jahai do not appear to make finer linguistic distinctions of different types of forest based on soil, altitude or regenerative conditions. However, the subcategorisation of the forest into different parts is again achieved by means of metaphorical extension of human body part terms. This mapping of body parts onto the forest cover is constitutionally less transparent than that applied to drainage systems, and it seems to at least partly overlap the limited metaphorical system applied to the topographical concept of *te?* 'land'. For example, *mit hip* 'forest-eye' refers rather abstractly to secluded and pristine inner portions of the forest (the Jahai frequently refer to themselves and their ancestors as *mnra? mit hip* 'forest-eye people'). The forest cover as a whole is sometimes spoken of as *ley hip* 'forest-body'; a forest-covered raised landmass like a mountain may be called *kuy hip* 'forest-head'; *klapəh hip* 'forest-shoulder' denotes a forest-clad incline; *mɔh hip* 'forest-nose' and *cawĩŋ mit hip* 'forest-eyebrow' refer to specific features of a forested mountain; a wall of forest may be referred to as *paw hip* 'forest-side'; the upper side of the forest canopy is *krɔ? hip* 'forest-back' and the forest floor is *dada? hip* 'forest-chest'.

Conceptualisation of the forest landscape is obviously closely intertwined with concepts and categorisations of its life forms (as also shown by Lye 2004 for the Batek), some of which, like single-species stands of vegetation (e.g. *bulo?* 'bamboo') or conspicuous individuals of trees (e.g. the *gil* 'tualang tree, *Koompassia excelsa*' and the *dok* 'ipoh tree, *Antiaris toxicaria*'), may be particularly relevant in a landscape context, as are the holes, dens, burrows and trails of numerous species of animals. However, such biologically related concepts will not be further explored here.

### 2.4 Man-made features

Jahai travelling normally involves walking along narrow trails referred to as *har* 'trail' or *har hip* 'forest trail'. Wider paths, like logging roads, are called *glɔŋ*. The wide, paved East-West Highway is referred to as *lbuh rayəh* (from Malay *lebuhraya* 'big road'). Networks of trails and roads are subject to metaphorical extensions similar to those of drainage systems. The end point of a trail or road, for example, is referred to as its *mit* 'eye' or *kuy* 'head', and its beginning (e.g. the point of its turn-off) is its *kit* 'bottom'. Side trails/roads are *cabay* 'branches' or *wɔŋ* 'children' of a main trail/road. Uniform stretches of trails and roads are frequently referred to by means of location nominalisations of verbs denoting the type of motion that is involved in travelling that particular section of the trail or road. Thus, an uphill section is called *nhjɔh* 'ascent' (from *jɔh* 'to ascend'), a downhill section is a *nsges* 'descent' (from *ges* 'to descend'), and a section running along a mountain-side is called *tingil* (from *tigil* 'to move along a mountain-side'). Similar subcategories of trails have been documented in Batek (Lye 2004). Such features may also have subparts expressed by means of body metaphors, e.g. *kuy nhjɔh* 'head of ascent', referring to its top. A trail or road may also be referred to more generally with the nominalisation *npcip* (from *cip* 'to go').

Traditional locations of habitation are temporary and referred to as *hayē?* 'hut', 'camp'. This term appears to be connected to the concept of *kleŋ* 'inside', 'interior', which forms the antithesis of *hip* 'forest', 'outside', 'exterior'. Larger, permanent buildings are called *dij*, and permanent Malay-style villages are referred to as *kampon* (from Malay *kampung* 'village'). Huts and houses are conceptualised as bodies and their subparts are referred to by means of body part metaphors according to the now familiar pattern. Swiddens and other clearings are called *slay*, an open field is sometimes called *padan* (from Malay *padang* 'field'), and military installations are designated by the term *pos* (from English *post* via Malay *pos*). The terms *dēm* 'dam' (from English via Malay) and *tase?* 'lake' (from Malay *tasek*) are used with reference to the Temenggor hydroelectric project.

### 2.5 The embodied landscape: a summary

High-level categorisation of landscape features in Jahai seems to centre on two reasonably well-defined concepts: those of *tɔm* 'water' and *hip* 'forest'. The internal organisation of each of these concepts is expressed by means of metaphorical extension from human domains, notably that of the human body. They may be pictured as two independent, super-imposed human

bodies lying face-down. A third concept, *te?* 'land', may form an even higher-level category that incorporates both *tɔm* and *hip*, but as a category it is less transparent in that it does not seem to exhibit the same conceptual coherence. In other words, it is more difficult to discern part-whole relationships for this concept. However, several lower-level categories, like mountains or different types of routes of human travelling, are indeed subject to conceptual mapping involving metaphorical extension of the body. Thus, a fairly simple metaphorical template is employed to map a variety of geographical entities at various levels of scale and provides a neat way of bringing order to a complex environment. (It should be noted that the body metaphor is not restricted to geographical features; it also applies to the universe as a whole as well as virtually every physical object in a very productive manner).

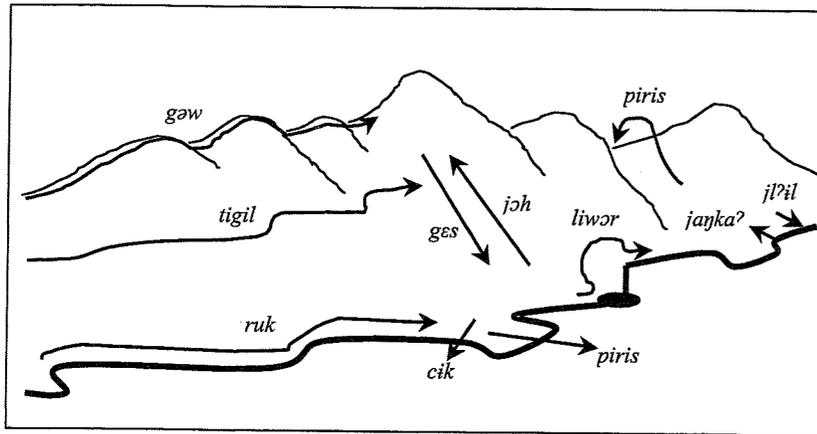


Figure 3. Some landscape-related motion verbs in Jahai

### 2.6 Motion verbs and landscape

Jahai categorisation of landscape is closely linked to its concepts of movement within that landscape (see Figure 3). Most motion verbs are path-encoding and denote the types of movement involved in negotiating particular landscape features, including water, landforms and forest as well as subcategories thereof. There are three verbs denoting movement lengthwise along water or landforms: *ruk* refers to travelling along a major watercourse

(upstream or downstream) by wading or walking on its side; *tigil* denotes travelling lengthwise on a *tbiŋ*, i.e. on the side of a ridge or mountain; and *gəw* refers to movement along the crest of a *cba?* 'ridge'. There is a specific term for movement around an obstacle along a watercourse (typically a knick-fall): *liwɔr*. Verbs denoting crosswise movement include *piris*, which refers to the crossing of a watercourse or a divide; *jɔh*, which signifies uphill movement on a *tbiŋ*; *ges*, which denotes downhill movement on a *tbiŋ*; *janka?*, which refers to movement up and away from water, and its opposite *jɬ'il*, movement down (in)to water. The verb *cik* denotes crosswise wading.

### 3. Toponyms

The Jahai territory is richly endowed with indigenous Jahai place-names. The referential grounds of such place-names do not typically coincide with the conceptual categories or subcategories of landscape features outlined in section 2. Thus, with a few possible exceptions, there appear to be no traditional place-names which refer exclusively to e.g. drainage systems, individual watercourses, waterfalls, mountains, summits, ridges, rocks, cliffs, forest parts, trails, swiddens or camp locations. Rather, a place-name designates an area which contains 'bundles' of different landscape features. There is no indigenous term denoting such areas, but the Jahai sometimes refer to them with a term borrowed from Malay, *kwasan* (Malay *kawasan* 'area'). They will be referred to henceforth as 'name-areas'. Given this lack of referential correspondence between landscape terms and toponyms, the two appear to form rather different and independent systems of reference to landscape, superimposed on and coordinated with each other for maximum applicability and disambiguation.

The feature content of a name-area varies with scale, but drainage seems to be a recurring theme. The watersheds of larger watercourses, including the surrounding landforms and forest cover, seem to represent higher-level name-areas. Their main watercourse may carry the same name. For example, the name *Cɔs* refers to both a watershed east of the Jahai settlement of Sungai Banun and its main water-channel. Such higher-level name-areas are subdivided into numerous lower-level name-areas representing sections along the main watercourse. Low-level name-areas thus form dense strings along the larger watercourses. They are typically associated with the watersheds of tiny rivulets trickling down from the mountain sides (the *tɔm wɔŋ* 'child-waters'), but frequently they also extend across the main watercourse to incorporate the opposite side of the valley. They may also extend beyond a

divide to incorporate the far side of a ridge or mountain. They typically only cover a very short stretch along the main watercourse (some 100-200 metres) but crosswise they may extend several hundred metres or more uphill. The boundaries of a low-level name-area are not clear-cut (probably because the natural divides between the drainage areas of such tiny rivulets are not particularly marked). Instead, the name-area appears to form a sphere of influence, with a conceptual centre in the form of the confluence of the rivulet and the main watercourse, and peripheries that fade imperceptibly into those of adjacent name-areas.

It is within lower-level name-areas that the lack of referential correspondence between landscape terms and place-names becomes most obvious. Since a place-name refers to an area, reference to landscape features within that area is expressed with possessive constructions. For example, east of the Sungai Banun settlement there is a name-area along a stretch of the *Cos* drainage referred to as *Rlom*. Landscape features of this area include e.g. a rivulet, *tom Rlom* 'Rlom's water', which forms a confluence with the main stream, *was Rlom* 'Rlom's confluence', just upstream from a waterfall, *lata? Rlom* 'Rlom's waterfall'. The rivulet originates at *lget Rlom* 'Rlom's pass' below *jlmol Rlom* 'Rlom's mountain', several hundred metres uphill. Below the waterfall, the northern bank of the main stream is the site of an abandoned hamlet, *hayē? Rlom* 'Rlom's camp', and the slope behind it is an old swidden, *slay Rlom* 'Rlom's swidden'. If the name-area represents shared knowledge in discourse, the possessor is usually represented anaphorically by the third person singular pronoun *?o?*: e.g. *lata? ?o?* 'its waterfall', *jlmol ?o?* 'its mountain', *slay ?o?* 'its swidden'.

There appear to exist occasional examples of individual members of a landscape category with a co-referential place-name. Two have so far been identified, both of which involve conspicuous rock formations (*batu?*) of great mythological significance: *Rem*, a large, precipitous limestone outcrop near Jeli in the easternmost part of the Jahai territory, and *Paca? La?* (or *Batu? Mak?* 'Egg Rocks'), a formation of large, egg-shaped rocks at the southern side of the East-West Highway on the Perak-Kelantan border. The two similarly significant peaks of *Rlay* and *Rnayoh* northwest of Grik (Gunung Kenderong in Malay), in Perak, may be other examples, now involving mountains, but this is less clear. Exposed surfaces of bedrock generally play an important role in Jahai mythology and are referred to as *batu? cnel* 'myth-rocks', but usually they are referred to with their respective

name-area according to the pattern outlined above, e.g. *batu? Bnhon? Bnhon?* 'Bnhon's rocks'.

Non-indigenous, Malay place-names have been introduced to denote inhabited locations of different kinds, notably with the establishment of resettlement villages, military installations and the like. Thus, permanent Jahai villages have been given Malay-style village names, frequently with malayicised indigenous terms. Such toponyms appear to be a rather recent phenomenon introduced by the Malaysian authorities. (Note that there are traditionally no names that refer exclusively to inhabited locations. The reason for this is probably to be sought in the mobile existence of the Jahai, in which locations are not inhabited for more than a few days or weeks at a time. Instead, camp sites are invariably referred to with the name of the name-area in which they are set up). Also, several watercourses have official Malay or malayicised names in addition to the Jahai drainage names, e.g. Banun (Jahai *Cos*), Raba (Jahai *Rabaw*), Chiong (Jahai *Cyih*), Rui (Jahai *Rwil*) and Long (Jahai *Lim*). There are also examples of Jahai drainage names which appear to be of Malay origin, e.g. *Mjnlom* (Malay *Mendelum*) and *Manəh* (Malay *Mangga*).

### 3.1 The origin of toponyms

The Jahai trace all place-names to mythical events. The names themselves (here exemplified with names of name-areas in various parts of the Jahai territory) may denote species of plants or animals (e.g. *Gil* 'tualang tree, *Koompassia excelsa*', *Pih* '[a type of bamboo]', *Prphip* '[a type of tree]', *Skor* '[a type of squirrel]', *Tytūy* '[a type of spider]', *Manək* 'chicken'), tools or other objects (e.g. *Blēy* 'cartridge case', *Piriy* 'bamboo container', *Kapo?* 'axe'), or to the events themselves, then represented by a nominalisation of a verb (e.g. *Nkhek*, from *hek* 'to get something stuck in one's throat'). The Jahai interpretations of a great number of names give the impression of being folk etymologies based on phonological similarities. It may be that the original meaning was a different one and has become obsolete and forgotten. The Jahai often explain the phonological differences as having resulted from some misunderstanding of a word. For example, the place-name *Cadak* is said to be connected to *carwak* '[a type of edible plant]', *Tampil* to *tabil* '[a type of tree]' and *Bariy* to *bar?ey* '[a type of tortoise]'.

The mythical events explaining the origin of place-names typically involve a person or group of people placing, losing, forgetting or throwing away a plant, animal or object at a location, usually at a point of water

confluence but occasionally at other landscape features as well, such as a waterfall or an outcrop. Such mythically associated features seem to form the conceptual centres of named areas. To take an example, an area along the *Mjɔlom* drainage referred to as *Pɲpiɲ* is said to have got its name from a *piɲ* lizard which was caught, killed and then placed near the local waterfall. The hunter went away to find more game, and when he returned the lizard had disappeared downstream.

### 3.2 *The structure of toponyms*

Structurally, Jahai place-names conform to the general patterns of the language. They draw on its ordinary phonemic inventory and adhere to its phonotactic constraints. However, monosyllabic forms, which are always of the structure CVC and which make up a large part of the Jahai vocabulary, are noticeably rare among place-names. Instead, disyllabic and so-called sesquisyllabic (one-and-a-half-syllabic) forms are overrepresented.

Most Jahai place-names are monomorphemic. Some bear the hallmarks of morphological complexity but are still usually synchronically unanalysable. This morphological complexity usually involves copies of one or both consonant of the final syllable, processes which are still productive in some areas of Jahai grammar (cf. Burenhult 2002:60-77). Place-names with such obsolete morphology include e.g. *Krɔtes* and *Prɲhip*. A couple of names may exhibit more productive copying: *Bɲbɔɲ*, which is said to be connected to *bɔɲ* '[a type of tree]', and the aforementioned *Pɲpiɲ*, related to *piɲ* '[a type of lizard]'. Some place-names are location nominalisations of verbs (typically derived by means of an affix involving the phoneme *n*), e.g. *Nkhek*, from *hek* 'to get something stuck in one's throat' (named so because, according to myth, a phalanx of a leaf-monkey got stuck in a person's throat there once), and *Cnrwɪs*, from *cwɪs* 'to make sound (with a *lmlɛm* leaf to attract leaf-monkeys)'.

True compounds are very rare as place-names. Only occasional examples have been identified, including *Paca? La?*, the meaning of which is unknown. Place-names frequently turn up together with terms denoting landscape features, but, as was noted, these are to be interpreted as possessive constructions (which are structurally similar to compounds) rather than proper compounds. Interestingly, names of lower-level name-areas frequently turn up in possessive constructions with the third person singular pronoun *ʔo?* in possessor position, much like what was described for landscape terms in section 3 in terms of their relationship to their name-area, e.g. *Rlɔm ʔo?* 'its

Relom'. It is possible that this reflects an idea of a part-whole relationship among place-names in that lower-level name-areas are subparts of higher-level name-areas. The matter is complicated by the fact that the possessor position is here never occupied by the higher-level place-name itself. This needs further investigation.

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