

Solega ethno-ornithology

Introduction

The Solega (Dravidian; Sholaga in Ethnologue) have traditionally lived in forests that now form part of the Biligirirangaswamy Temple Wildlife Sanctuary (B. R. Hills). These forests are known for their high diversity of plant and animal life, and many of the local species are firmly embedded in Solega religious, cultural and domestic life. The Solega are traditionally a hunter-gatherer people, although they have also practiced swidden agriculture for several generations. The conversion of their traditional lands into a wildlife sanctuary, combined with recent ecological disturbances, has had a severe, negative impact on their way of life, and on the transmission of cultural knowledge: the Solega now live in permanent settlements, and much of the traditional ecological knowledge that all community members once took for granted is slowly being forgotten.

The B. R. Hills forests are said to be home to approximately 250 species of birds, and a significant number of bird species have been given names in the Solega language. In this paper, we first describe the patterns of Solega bird nomenclature, giving particular attention to which species are named, and which are not. We believe that the latter is a particularly important question, one that is frequently ignored in studies on ethnobiological nomenclature. Next, we describe how the naming of birds in Solega is at times a dynamic, consensus-based process, where many of the phenomena described by Sillitoe (2002) can be observed. Finally, we give an account of the very important role that birds play in Solega life, myth and ritual. Author SA has over five years experience observing, recording and identifying BRT birds in the company of Solega-speaking field assistants, while author AS has spent close to 12 months cumulatively at BRT over three field seasons, documenting the Solega language.

Methodology

A basic list of bird names in Solega was first compiled with the help of Solega-speaking field assistants from the ATREE field station, where both authors were based. These were Solega men whose ages ranged from around 30 to 45, and included individuals

who had worked with author SA in field situations while collecting data for her research on bird behaviour and ecology. All field assistants lived in *poḍus* or villages in the vicinity of the field station and the Biligirangaswamy Temple, which is frequented by largely Kannada-speaking tourists and devotees from the lowlands on a regular basis. As some of the bird names collected at this stage were bare monomials, while some were binomials (of the form *x-hakki*, where *hakki* means ‘bird’), the Solega field assistants were also asked to judge the acceptability of adding or removing the *hakki* morpheme, both when the name was used in isolation, or when it was embedded in a sentence, such as *a: marada me:le ondu x/x-hakki ku:tide* ‘there is a x/x-bird sitting on that tree’. On the basis of these initial responses, the bird names were divided into three categories, namely ‘obligate binomials’, where the *-hakki* cannot be omitted, ‘optional binomials’, where the use of *-hakki* is optional, and ‘obligate monomials’, where the addition of *-hakki* to the name is not allowed.

For the second stage of data collection, SA compiled a Powerpoint presentation consisting of the photos and calls of around 100 species of birds known to be present in the B. R. Hills. Five widely spaced Solega *poḍus* were visited, and the presentation was shown to the inhabitants of those villages in a group – this ensured that the data arising from such elicitation sessions would represent a consensus opinion of the Solega living in a particular locality. Participants were shown the picture of a bird on a laptop screen, accompanied by the sound of the bird’s call, and asked to provide an appropriate Solega name, if any. They were then asked to also relate any songs, stories or other items of folklore pertaining to that bird. As can be expected, there was considerable disagreement in the naming of some bird species, but in the vast majority of cases, a consensus was reached through discussion, and a single name was provided for a particular stimulus.

The names elicited in this way were assessed according to two criteria, namely reliability and consistency. The bird list compiled with the help of the field station Solega over several years of fieldwork was a useful benchmark against which to compare the responses from the other villages, but we had to be open to the possibility that there might be variation in the names of certain birds from community to community. A lexical label for a particular species was therefore considered to be ‘reliable’ if it (a) matched the name for that species in our initial list, or (b) was novel,

but was also accompanied by accurate information regarding the bird's behaviour, ecology or appearance. A name was considered 'consistent' if participants from three or more villages provided the same name (within reasonable limits of dialectal variation). It was possible for names to be both consistent and reliable (e.g. the responses from a majority of villages also matched our initial list), reliable, but not consistent (e.g. a novel label might be recorded in a single village, accompanied by a convincing amount of supporting information regarding the bird's biology), and consistent, but not reliable (e.g. a single, in our opinion, erroneous¹, name might be provided for a particular stimulus by participants from a number of villages). Naturally, names could also be neither reliable nor consistent (e.g. participants might indulge in speculation when presented with an unfamiliar stimulus).

Solega bird nomenclature

Acceptability judgements

Based on the initial acceptability judgements of the field assistants, it was found that only a handful of birds are named with obligate binomial lexemes, in that *-(h)akki* is an inalienable part of the name (Table 1). An intermediate number of birds are named by 'optional binomials', where the *-(h)akki* can be used or dropped, at the speaker's volition. The majority of bird names are obligate monomials, where the addition of *-(h)akki* is not allowed. A cursory scan of Table 1 might appear to confirm some 'universals' of ethnoclassification proposed by Berlin (1992). These include (1) the dominance of monomials among what Berlin calls generic taxa, (2) a tendency for 'perceptually salient' organisms and monotypic genera to be preferentially named, and (3) a systematic overlap between 'folk' and 'scientific' taxa, especially at the level of the folk genus.

¹ We might deem a particular response to be erroneous if the stimulus picture used in the task were misleading, *i.e.* if it drew attention to aspects of the bird's appearance that might not normally be visible in the wild. Such a case of mistaken identity would usually also be accompanied by incorrect biological information from otherwise knowledgeable speakers.

	Solega	English	Scientific
Obligate binomials (4)	<i>araḷakki</i>	emerald dove	<i>Chalcophaps indica</i> #
	<i>maṇṇa:kki</i> *	crested treeswift	<i>Hemiprocne coronata</i> #
		house swift	<i>Apus affinis</i> #
		Asian palm swift	<i>Cypsiurus balasiensis</i>
		barn swallow	<i>Hirundo rustica</i>
	<i>ma:diyakki</i> *	scarlet minivet	<i>Pericrocotus flammeus</i>
	<i>gumisiyakki</i> *	common swallow	<i>Passer domesticus</i> #
Optional binomials (16)	<i>ba:sa:tale(nakki)</i>	brahmīny starling	<i>Sturnus pagodarum</i>
	<i>piggā(nakki)</i>	forest wagtail	<i>Motacilla indica</i>
	<i>ṭhīya(nakki)</i>	red-wattled lapwing	<i>Vanellus indicus</i>
	<i>kuṭru/kuṭrakki</i>	white-cheeked barbet	<i>Megalaima viridis</i>
		brown-headed barbet	<i>M. zeylanica</i>
		crimson-fronted barbet	<i>M. rubricapilla</i>
	<i>kambarakuṭru</i> *	coppersmith barbet	<i>M. haemacephala</i>
	<i>ke:sā/ke:sanakki</i> ^	Indian cuckoo	<i>Cuculus micropterus</i> #
	<i>si:pi(yakki)</i> *	Indian silverbill	<i>Lonchura malabarica</i>
		black-headed munia	<i>L. malacca</i>
		scaly-breasted munia	<i>L. punctulata</i>
		common rosefinch	<i>Carpodacus erythrinus</i> #
	<i>sore(yakki)</i>	spotted dove	<i>Streptopelia chinensis</i>
		Eurasian collared dove	<i>S. decacto</i>
	<i>araḍe(y-akki)</i>	rufous treepie	<i>Dendrocitta vagabunda</i>
	<i>uṇṇigirika(n-akki)</i>	common myna	<i>Acridotheres tristis</i>
		jungle myna	<i>A. fuscus</i>
		bank myna	<i>A. ginginianus</i>
	<i>oggeḡuḡukā(n-akki)</i>	Indian roller	<i>Coracias benghalensis</i> #
	<i>karāḷi(y-akki)</i>	black drongo	<i>Dicrurus macrocercus</i>
	bronzed drongo	<i>D. seneus</i>	
	white-bellied drongo	<i>D. caerulescens</i>	
	<i>doḡḡakarāḷi</i>	greater racket-tailed drongo	<i>D. paradiseus</i>

	<i>pa:riva:la(d-akki)</i>	blue rock pigeon	<i>Columba livia</i>
	<i>gi:ṇa(n-akki)</i>	blue-winged parakeet	<i>Psittacula columboides</i>
	<i>saṇṇa gi:ṇa</i>	vernal hanging parrot	<i>Loriculus vernalis#</i>
	<i>morā(n-akki)</i>	rose-ringed parakeet	<i>Psittacula krameri</i>
	<i>se:na(n-akki)</i>	hill myna	<i>Gracula religiosa#</i>
Obligate monomials (35)	<i>ko:ḷi</i>	domestic fowl	<i>Gallus gallus</i>
	<i>ka:ḍako:ḷi</i>	gray junglefowl	<i>G. sonneratii</i>
	<i>kaṇṇaṭ</i>	gray nightjar	<i>Caprimulgus indicus</i>
		large-tailed nightjar	<i>C. macrurus</i>
		Indian nightjar	<i>C. asiaticus</i>
	<i>ka:kanakoṭe</i>	Indian scimitar babbler	<i>Pomatorhinus horsfieldii#</i>
	<i>ka:ge</i>	crow	<i>Corvus macrorhynchos</i>
	<i>ni:ruka:ge</i>	Indian cormorant	<i>Phalacrocolax fuscicollis</i>
	<i>ka:nakattale</i>	black eagle	<i>Ictinaetus malayensis#</i>
	<i>ka:nagoravā</i>	Malabar whistling thrush	<i>Myiophonus horsfieldii#</i>
	<i>kuggiluṭ</i>	mountain imperial pigeon	<i>Ducula badia</i>
		green imperial pigeon	<i>D. aenea</i>
		Nilgiri wood pigeon	<i>Columba elphinstonii</i>
	<i>bu:jore</i>	laughing dove	<i>Streptopelia senegalensis</i>
	<i>kembuttā</i>	greater coucal	<i>Centropus chinensis#</i>
	<i>keshṭe</i>	red spurfowl	<i>Galloperdix spadicea</i>
	<i>kokkore</i>	migratory waterbirds	--
	<i>ko:gile</i>	Asian koel	<i>Eudynamys scolopacea#</i>
	<i>koṭā (haddu?)</i>	crested serpent eagle	<i>Spilornis cheela#</i>
		oriental honey-buzzard	<i>Pernis ptilorhyncus#</i>
		changeable hawk eagle	<i>Spizaetus cirrhatus#</i>
	<i>garuḍa</i>	brahminy kite	<i>Haliastur indus#</i>
	<i>giḍugā</i>	common kestrel	<i>Falco tinnunculus</i>
		black-shouldered kite	<i>Elanus caeruleus#</i>
	<i>gi:ṇa</i>	blossom-headed parakeet	<i>Psittacula cyanocephala</i>

	<i>gu:be</i> [^]	oriental scops owl	<i>Otus sunia</i>
		collared scops owl	<i>O. bakkamoena</i>
	<i>gumma</i>	brown hawk owl	<i>Ninox scutulata</i> #
		brown fish owl	<i>Ketupa zeylonensis</i> #
		spot-bellied eagle owl	<i>Bubo nipalensis</i> #
	<i>goregosha:kā</i>	white-throated kingfisher	<i>Halcyon smyrnensis</i>
	<i>navilu</i>	Indian peafowl	<i>Pavo cristatus</i> #
	<i>natta:re</i> [^]	jungle owlet	<i>Glaucidium radiatum</i> #
	<i>siṭṭe</i> *	small passerines	--
	<i>eləsiṭṭe</i> *	tailorbird	<i>Orthotomus sutorius</i> #
	<i>karisiṭṭe</i> *	Indian robin	<i>Saxicoloides fulicata</i> #
	<i>koḍangisiṭṭe</i> *	white-browed fantail	<i>Rhipidura aureola</i>
	<i>tu:gusiṭṭe</i> *	purple sunbird	<i>Nectarinia asiatica</i>
		purple-rumped sunbird	<i>N. zeylonica</i>
		crimson-backed sunbird	<i>N. minima</i>
		Loten's sunbird	<i>N. lotenia</i>
	<i>bīlisiṭṭe</i> *	oriental magpie robin	<i>Copsychus saularis</i>
	<i>pa:pira</i> [^]	common hawk-cuckoo	<i>Hierococcyx varius</i>
	<i>maratottā</i> *	velvet-fronted nuthatch	<i>Sitta frontalis</i>
		chestnut-bellied nuthatch	<i>S. castanea</i>
	<i>mara:kuṭuka</i>	rufous woodpecker	<i>Celeus brachyurus</i> #
		streak-throated woodpecker	<i>Picus xanthopygaeus</i>
		yellow-crowned woodpecker	<i>Dendrocops mahrattensis</i>
	<i>sivanakki</i>	greater flameback	<i>Chrysocolaptes lucidus</i> #
	<i>maragosappa:na</i>	black-rumped flameback	<i>Dinopium benghalense</i>
	<i>sha:luḡā</i>	shikra???	<i>Accipiter badius</i> ???
	<i>sattugaba:la</i> *	Asian paradise flycatcher	<i>Terpsiphone paradisi</i> #
	<i>saṇeyā</i> *	green bee-eater	<i>Merops orientalis</i>
		chestnut-headed bee-eater	<i>M. leschenaultii</i>

		bluebearded bee-eater	<i>Nyctyornis athertoni</i> #
	<i>si:danakari</i>	jungle babbler	<i>Turdoides striatus</i>
	<i>doḍḍa si:danakari</i>	rufous babbler	<i>T. subrufus</i>
	<i>hullu si:danakari</i>	yellow-billed babbler	<i>T. affinis</i>
		tawny-bellied babbler	<i>Dumetia hyperythra</i> #
	<i>haddu</i>	raptors	--
	<i>hebbaddu</i>		
	<i>bīliyaddu</i>	crested serpent eagle	<i>Spilornis cheela</i> #
	<i>koṭrole</i>	red-vented bulbul	<i>Pycnonotus cafer</i>
	<i>kottipidiyā</i>	red-whiskered bulbul	<i>P. jocosus</i>
	<i>vijju</i>	shikra	<i>Accipiter badius</i>
		besra	<i>A. virgatus</i>
	<i>maḷegoḍḍā[^]</i>	orange-headed thrush	<i>Zoothera citrina</i>

Table 1. Named birds in Solega, along with their official English and scientific names. The left-aligned names in column 2 are ‘generic’ names after Berlin (1992); the right-aligned names are ‘subgeneric’ or ‘specific’. Superscripts roughly indicate those birds which are not visually striking - * small; ^ cryptic; # after the scientific name indicates a locally monotypic genus. The scientific identifications are from Grimmett and Inskipp (2005).

The first of these generalisations is the most readily supported by our data. Overall, a majority of bird names (35 out of 55, or 64%) are obligate monomials. However, the use of the 16 (29%) ‘optional’ species names in their full, binomial forms is by no means marginal – the linguistic context plays a crucial role here. When asked “What bird is that?” a Solega person might give the following reply:

- (1) *adu e:va hakki?*
that which bird
‘What bird is that?’
- (2) *adu ondu sore*
that one dove
“That’s a dove.”

However, if the same speaker intended to draw a listener’s attention to the presence of a particular bird, s/he might spontaneously say the following:

- (3) *no:ḍ-u alli ondu sore-yakki ku:tide*
look-IMP there one dove-bird sit-PERF

“Look, there’s a dove sitting there.”

When asked, Solega speakers will undoubtedly say that it is acceptable to omit *-(y)akki* from sentence (3), but the majority of their spontaneous utterances contain the superordinate taxon. This has important implications for the way in which data are collected in ethnobiological studies. Traditional question and answer sessions where a researcher repeatedly asks a consultant to name dead or living specimens, either *in situ* or in a sorting task, would, in languages like Solega, clearly bias speakers’ responses towards one type of label, namely the bare monomial². The fact that a context has been unambiguously established (along the lines of ‘We are now going to talk about birds’) has a very real effect on subsequent utterances, and so it is worth considering whether the data obtained from such elicitation sessions is indeed ‘naturalistic’. To use an English analogy, a car enthusiast might well refer to his/her prized possession as an ‘E-type’, but only in the limited contexts of addressing a fellow enthusiast, or continuing a discussion on Jaguars. Assuming, then, that the optional monomials in Solega are more routinely used as binomials in spontaneous utterances (see the following section for further discussion), the total proportion of binomials at the ‘generic’ level comes to 36% - still a minority, but a significant one. One prediction of Berlin that does hold unequivocally is that Solega bird names have very few subordinate or ‘specific’ taxa that are labelled by secondary lexemes.

Picture elicitation task

We recognise that the elicitation of bird names from static, two-dimensional images, albeit accompanied by recordings of the birds’ calls, is a poor substitute for sighting the bird in its natural habitat in the company of a Solega speaker (see Diamond and Bishop, 1999 for further commentary). For that reason, the following discussion is based on only responses that were assessed as either ‘reliable and consistent’ or at least ‘reliable’ (see Methodology section for definitions). The results of the picture elicitation task carried out in five villages provide further support for our claim that in Solega at least, the preponderance of monomials in speakers’ responses is likely to be an artefact of the data-gathering process. The effect of context on the naming and

² It is interesting to note that Solega tree names behave more like obligate binomials, where the morpheme ‘tree’ is dropped only in the context of a person reciting a list of trees; in the case of grasses and vines, the morphemes for ‘grass’ and ‘vine’ are totally obligatory.

classificatory responses of Nuauulu speakers has already been discussed in detail by Ellen (1975) for two culturally significant organisms – the cassowary and the cuscus. Criticizing theory-driven ethnobiological studies for their “single-mindedness”, their “failure to include a sufficiently critical assessment of the context and variation of the data elicited” and the “spurious uniformity” of their data, Ellen stresses that:

...classifications are not ossified rubrics of cerebral apparatus, genetically programmed, although the principles that order them may be; they are culturally-determined ordering devices interacting constantly with experience, infinitely variable both over time and between individuals. (p. 202)

In our study, a basic quantitative analysis of the pooled responses from all five villages shows that the majority of first responses (*i.e.* the first name provided by a participant on viewing the picture of a bird and hearing its call) were bare monomials (69% of a total of 237 tokens). This is unsurprising, given the artificial nature of the task, and the constraints this might impose on the participants’ responses. However, an interesting phenomenon evident in this data set is the reversal of a participant’s first response into its opposing form, *e.g.* a name is first provided in its monomial form, and repeated soon afterwards – by the same speaker, or by another - in a binomial form, which incorporates *-hakki*.

Speaker 1: *adu arade* <PAUSE> *aradeyakki*

It might seem at first that such ‘reversals’ are merely indicative of free variation between the two forms of the optional binomials presented in Table 1. After all, such reversals only occurred in a minority of situations (around 27%). However, a closer look at the frequencies of the two types of possible reversal reveals a distinct pattern: reversals from bare monomial to binomial, as in the example given above, occurred 66% of the time (42 tokens), while reversals in the opposite direction occurred in only 34% of instances (22 tokens). The fact that speakers are more likely to replace bare monomials with binomials, than *vice versa*, suggests that the former is perceived as being incomplete in some way. Our observation, that binomials are followed up with monomials far less frequently, indicates that the two forms are not in free variation.

These findings relate a cautionary tale: it is unwise to assume that the utterances recorded in controlled elicitation task are totally ‘naturalistic’, simply because the questions were asked in the target language, and the majority of speakers responded in

a particular way. In Solega at least, the naming of birds seems to be quite context dependant, and optional binomials often appear in their longer form in connected speech. In the following extract, the Solega consultant had been speaking for the last 10 minutes or so about the various birds found in his forest, and decided, quite spontaneously, to start talking about *kuruli-hakki* ‘common quail’. After a brief comment about how rare this species has become, he goes on to relate a folk tale that explains why the elephant has no scrotum (and why, incidentally, it has two large bumps on its head). Here, the transition from the previous narrative to the new species is marked by a bare monomial, *kuruli*, but in all subsequent tokens, the name of the bird appears as a binomial (shown in bold). The speech presented in the following passage is arguably far more naturalistic than that obtained from the picture elicitation task, and strongly supports our view that when the morpheme *-hakki* is optional, the bare monomial is actually the marked form, and the longer, binomial form the more natural choice.

*Kuruli ... kuruli hatt-hattu ip-ippattu iddō. A: **kuruli-hakki** endale saṅṅa hakki. Tanna hesarave ‘kuruli! kuruli! kuruli!’ enduru koṭṭade. “O: **kuruli-hakki** ha:ḍdade.” A: **kuruli-hakki** e:na ma:ḍi kittu, a:nette oitittu ... a:ne ho:ga timeinalli e:n a:gottu prrr-enna a:ri kittu! A:nega a:rukku endottu. A:ne hi:ḍutte keḷage ittu ... ade:na:gottu, prrr-enna a:radakka ue adara hi:ḍutte me:le ku:turtu. A: **kuruli-hakki** hi:ḍa e:rusuṭṭattu. A: hi:ḍu keḷage ille me:le ade, katti nalli. A: **kuruli-hakki** o:ḍsuṭṭattu. Gaṭa no:ḍidale ba:ri gaṭa, **kuruli-hakki** ira:du ipaṭie. A: tara ma:ḍittu, **kuruli-hakki**.*

Quails ... there used to be quails in groups of 10 or 20. The quail is a small bird. It speaks its own name, ‘*kuruli! kuruli! kuruli!*’ “Oh, I can hear quails chirping,” (one would say.) What did the quail once do? An elephant was walking along ... and at that moment, a quail flew up, ‘PRRR!’ The elephant got a fright. The elephant’s balls used to be down there ... but then, when the bird flew up, ‘PRRR!’ the elephant’s balls jumped up. The quail had raised its balls up. The balls aren’t down there, they’re sitting on top. The quail lifted them up. If you think about it, an elephant’s really big, the quail’s only little. But that’s what it did, the quail.

An unexpected result that emerged from the picture elicitation task was the variation, from village to village, in the membership of the categories ‘obligatory binomial’,

‘optional binomial’ and ‘obligatory monomial’. Although speakers from these villages were not systematically asked to state their preference for one form over the other, several of their responses were found to be different from the acceptability judgements we had earlier recorded with the Solega field assistants from nearby settlements. In particular, we were surprised to find that many of the ‘obligatory monomials’ from our initial name list were in fact optional binomials, at least for speakers from some villages. Table 2 gives a list of obligatory monomials from Table 1, which, during the course of the picture elicitation task, were used in conjunction with the morpheme – *hakki*.

Optional binomials	
Alternative Solega name	Common name
<i>keshte hakki</i>	red spurfowl
<i>marakuṭuka hakki</i>	woodpeckers
<i>gi:ṇanakki</i>	blossom-headed parakeet
<i>goravana hakki</i>	Malabar whistling thrush
<i>sitṭe hakki</i>	small passerines
<i>ko:gilakki</i>	Asian koel
<i>koṭrole hakki</i>	red-vented bulbul
<i>kuggilu hakki</i>	pigeons
<i>pa:piranakki</i>	common hawk-cuckoo
<i>si:dagari hakki</i>	jungle babbler
<i>gumusi hakki</i>	sparrow
Obligate binomials	
Solega name	Common name
<i>arsinakki</i>	yellow-browed bulbul?
<i>ka:rihakki</i>	woodpeckers
<i>ku:sakki, nana ku:so hakki</i>	puff-throated babbler
<i>ka:raīyanakki</i>	woodpeckers

<i>mara eḷe hakki</i>	nuthatches
<i>sa:vakki</i>	greater flameback woodpecker

Table 2. Selected bird names from the picture elicitation task. ‘Optional binomials’ are those bird names from Table 1 which were initially considered to be obligate monomials. The only exception is ‘sparrow’, which was initially thought to be an obligate binomial. ‘Obligate binomials’ are some newly-recorded bird names that were absent from the initial list.

Some new obligate binomials were also recorded during the picture elicitation task (Table 2). Scrutiny of the morphemes that make up such names shows that binomial names are obligatory when the first morpheme encodes an attribute of the bird being named – this can include physical appearance (e.g. *arsinakki* ‘yellow bird’), behaviour (*mara eḷe hakki* ‘tree climb bird’), cultural significance (*sa:vakki* ‘death bird’), an associated object, substance or plant (*maṇṇakki* ‘mud bird’) or a god’s name (*ka:raīyanakki* ‘karaīya’s bird). Taking the new data in Table 2 into account, the revised counts and percentages for the different types of names are as follows:

Obligate binomials: 10 (17%)

Optional binomials: 26 (43%)

Obligate monomials: 24 (40%)

Binomials (totalling 60%) now outnumber the obligate monomials, and it is very likely that at least some of the latter category could also be used in binomial form. However, this remains to be confirmed, as many of the bird names from our initial list (Table 1) were not recorded in the picture elicitation task.

Solega name	Possible identification
<i>da:sapaṭada hakki*</i>	scimitar babbler?
<i>goregotā</i>	kingfisher? bee-eater?
<i>goresubbā</i>	white-throated kingfisher
<i>gu:ge</i>	
<i>gubulegaṇṇa</i>	owl? oriental white-eye?
<i>gudugaḍe</i>	spurfowl?
<i>guggalakki*</i>	laughing dove
<i>ka:nakki*</i>	
<i>ka:nuguddā*</i>	
<i>ke:sehakki</i>	
<i>kuigalakki</i>	

<i>kurubigo:ḍi</i>	rufous treepie
<i>kurūḷaddu</i>	‘quail raptor’
<i>kusurihakki</i>	
<i>ma:dilammi hakki</i>	paradise flycatcher?
<i>meṇḍegaṇa hakki</i>	‘large-eyed bird’
<i>moḍevaḷakki</i>	
<i>moṭṭesillā</i>	
<i>raṇa haddu</i>	
<i>ratna giṇi</i>	vernal hanging parrot
<i>soīna gi:ṇa</i>	vernal hanging parrot
<i>solegitti hakki</i>	paradise flycatcher?
<i>taragaḍakā</i>	orange-headed thrush

Table 3. Solega bird names for which we were unable to provide reliable identifications. * after the Solega name indicates a probable nonce coining. ? indicates a high level of doubt.

The picture elicitation task also revealed the ease with which new names could be coined for yet unnamed birds, or birds with which a speaker might be unfamiliar. Some of these are given in Table 3. In one village, a speaker took great delight in composing novel names for some birds that he was unable to identify – such attempts were greeted with much amusement from the other Solega speakers participating in the task, and indicated to us that the names being provided were indeed nonce creations. Names like *piṭre hakki* and *pigganakki* were offered for a couple of small birds – in Solega, *piṭre* refers to something that is small and useless, while *piggā* means a young child who runs around restlessly, and does not listen to the admonishments of his/her elders. Similarly *guggalakki* (*guggalu* means ‘solitary’ or ‘loner’) could indicate a bird that is shy of humans, and is usually encountered by itself in the forest. Such names may well be the product of a single speaker’s imagination, but could very easily become established in the lexicon of that speaker’s village dialect, if s/he were to use it repeatedly and consistently for a particular referent (*i.e.* a particular species or group of species). Therefore, while it is tempting to dismiss such names as *arsinakki* ‘yellow bird’, *ka:nakki* ‘evergreen forest bird’ *kuī kuī hakki* ‘bird that calls *kuī kuī*’ and *koṭṭi hakki* ‘crest bird’ as nonce coinings, as they were only recorded in one village, it is important to remember that such names are, in essence, not dissimilar to names such as *araḷakki* ‘castor bird’, *kuṭrakki* ‘bird that calls *kuṭru*’ and *ka:rihakki* ‘calling bird’ and *maṇṇakki* ‘mud bird’, which were obtained from several villages. Quite often, several speakers

from a single village would agree that a name like *arsinakki* ‘yellow bird’ was the correct name for a particular species of yellow bird; to us, this indicated that *arsinakki* was the accepted name for that bird for the speakers of that village, even though our consultants from the field station might argue that such a name did not exist in their lexicon.

A related issue is that of variation, of which there was a significant amount in the naming of some species of bird. The level of variation ranged from minor differences in pronunciation to completely novel names, as shown in Table 4. Some of the variation, not shown in Table 3, but occurring frequently in our conversations with Solega consultants, could be attributed to pragmatic factors, such as the inability to satisfactorily identify a bird in the wild, due to its distance from the speaker, or its being obscured by foliage, for instance. In such instances, a common response would be that the bird was a kind of *sitte* ‘small passerine’. Many small birds, that are not known to have formal Solega names were also identified in this manner. This is identical to the situation described by Descola (1994; cited in Sillitoe, 2002) for the Achuar Jivaro of the Peruvian Amazon, who use the word *chinki* ‘sparrow’ under similar circumstances. According to Sillitoe, this could be a strategy to “facilitate agreement over the naming of animals, seen fleetingly, for example, when precise identification is difficult”.

	Keredimba	Nellikadiru	Ma:riguḍi	Moṇakai	A:repa:lya
red spurfowl	<i>(ka:ḍa)kesaṭe</i>	<i>keshṭe</i>		<i>keshṭe</i>	
greater flameback woodp.	<i>sa:vu hakki</i> ‘death bird’	<i>ka:ri hakki</i> ‘calling bird’	<i>ka:ri hakki</i> ‘calling bird’	<i>ka:ri hakki</i> ‘calling bird’	<i>sa:vakki</i> ‘death bird’
coppersmith barbet	<i>kammara kuṭru</i> ‘smith <i>kuṭru</i> ’	<i>kammara kuṭru</i> ‘smith <i>kuṭru</i> ’	<i>batta kuṭru</i> ‘paddy <i>kuṭru</i> ’		
Indian cuckoo	<i>ke:sakki</i>	<i>ke:sanakki</i>	<i>ke:sā</i>	<i>ke:sanakki</i>	<i>ke:sakki</i>
greater coucal	<i>kembuti/kembuguti</i>	<i>kembuta</i>	<i>kembuta</i>	<i>kembuta</i>	
brown fish owl	<i>gumma</i>	<i>gumma</i>	<i>gumma</i>	<i>gumma</i>	<i>gubulegaṇṇa</i>
spotted dove	<i>totore</i>	<i>sore</i>	<i>male sore</i> ‘mountain <i>sore</i> ’	<i>sorehakki</i>	<i>sorehakki</i>
laughing dove	<i>bu:jore</i>	<i>sore</i>	<i>na:ḍa sore</i>	<i>guggalakki</i>	<i>bu:jore</i>

				‘solitary bird’	
red wattled lapwing	<i>(kuṇḍu)biḷuka</i>	<i>ṭhīyā</i>	<i>ti:ṭrigā</i>	<i>ti:ṭigā</i>	<i>ṭīya:nakki</i>
scarlet minivet	<i>ma:di hakki</i>	<i>ma:di hakki</i>	<i>ma:di hakki</i>	<i>ma:dilakki</i>	
nuthatches	<i>mara eḷe hakki</i> ‘tree-climbing bird’	<i>maratotta</i> ‘tree jumper’	<i>maratotta</i> ‘tree jumper’	<i>maratotta</i> ‘tree jumper’	<i>maratonta</i> ‘tree jumper’
red-vented bulbul	<i>koṭrole</i>	<i>koṭrole</i>	<i>heṇṇu koṭṭi</i> ‘female koṭṭi’	<i>heṇṇu koṭṭi</i> ‘female koṭṭi’	
red-whiskered bulbul	<i>koṭṭipiḍiyā</i>	<i>koṭṭipiḍiyā</i>	<i>gaṇḍu koṭṭi</i> ‘male koṭṭi’	<i>gaṇḍu koṭṭi</i> ‘male koṭṭi’	
jungle babbler	<i>si:danagari</i>	<i>doḍḍa si:dagari</i> ‘big <i>si:danakari</i> ’	<i>si:dari</i>	<i>si:dari</i>	<i>si:danagari</i>
puff-throated babbler		<i>nanna ku:so</i> ‘my child’	<i>ku:sakki</i> ‘child bird’	<i>nanna ku:so</i> <i>hakki</i> ‘my child bird’	
wagtails	<i>piggā</i>	<i>ni:rpiggā</i> ‘water <i>piggā</i> ’	<i>pigganakki</i>	<i>ni:rpikka</i> ‘water <i>pikka</i> ’	<i>pigganakki</i>
sunbirds	<i>tu:gusiṭṭe</i> ‘hanging bird’		<i>hu: karaḷi</i> ‘flower drongo’	<i>kokkakki</i> ‘beak bird’	

Table 4. Variation in bird names across villages – data from the picture elicitation task. Only those species with consistent identifications from three or more villages are shown here. The exceptions are the laughing dove, for which two names were obtained from two villages each, and the sunbirds, whose name matches the one we had in our initial list.

Much of the variation shown in Table 4 is small enough to be restricted to the domain of phonological dialectal variation, but for some species, such as the coppersmith barbet, the bulbuls and the sunbirds, the names indicate a significantly different conception of the same bird by two or more communities that otherwise share a common language. The label *kammara kuṭru* (smith barbet), which seems curiously similar to the common English name of this bird, was recorded from two villages, and makes reference to the call of this bird, which sounds like a smith’s hammer at work. In one village, however, the name *batta kuṭru* (paddy *kuṭru*) was recorded, and here the participants explained that the name alluded to the resemblance between the bird’s call and the sound produced by the action of dehusking rice. In the case of the bulbuls, the names *koṭrole* ‘red-vented bulbul’ and *koṭṭipiḍiyā* ‘red-whiskered bulbul’ were recorded

from two villages (the same names were provided by the Solega men working at the field station), but speakers from two other villages grouped these birds together, saying that one was a male (*gaṇḍu koṭṭi*, red-whiskered bulbul), and that the other was a female (*heṇṇu koṭṭi*, red-vented bulbul). A further case of lexical variation is that of *tu:gusiṭṭe* ‘hanging bird’, which was the label provided for the four sunbird species found at our field site, both by the Solega men working at the field station, as well as by picture task participants from one village. The name refers to the hanging nests that are constructed swinging from small branches. In another village, however, the label *hu: karaḷi* ‘flower drongo’ was provided, which we assessed as valid, because the participants agreed on this name unanimously, and were also able to provide details of the physical characteristics (small size, bright colours), behaviour (sucking nectar from flowers) and distribution (high-altitude forests) of these birds. In a third village, name *kokkakki* was recorded, a clear reference to the birds’ long, curved beaks. It seems that while the former group of Solega speakers seemed content to place these birds in the superordinate category *siṭṭe* ‘small passerines’, the second grouped them together with *karaḷi* ‘drongos’, possibly owing to their rapid, darting flight and the metallic sheen of their feathers. The final group, in contrast, provided a name that did not affiliate these birds with either small passerines or with drongos.

A final example of variation that is worth discussing at this point is the case of the puff-throated babbler, a culturally-important bird whose call is said to be *nanna ku:so* ‘my child!’ There is a universally-known folk tale in Solega that explains why this bird came to lament a lost child (see below), and every single speaker who heard the recording of this bird’s call during the picture task was able to recognise it as the bird that lost its child. Surprisingly, a great number of people who know the story, and who can correctly identify the bird call, are unable to provide a name for it – while some say that they simply do not know a name for it, others reply, with obvious hesitation, that they call it the *nanna ku:so hakki* (‘my child’ bird), and a only small minority provides the far more compact label *ku:sakki* ‘child bird’.

Effect of culture

Interesting patterns emerge when we examine the species which participants in the picture elicitation task identified with high or low levels of consistency (see Methodology section for a working definition of ‘consistency’. For the purpose of the current analysis, species which elicited the same (or similar) labels from 3 or more villages were deemed ‘consistent’, while those with fewer than 3 similar responses were classed as ‘inconsistent’ (Table 5).

	Total count	Species with associated folklore	%
Consistent species (3+ villages)	53	22	42
Inconsistent species (<3 villages)	47	1	2
Consistent folk names (3+ villages)	35	18	51
Inconsistent folk names (<3 villages)	25	1	4

Table 5. Bird species identified with high and low consistency by participants in the picture elicitation task, along with the number of species with which some folklore is associated.

Table 5 shows that 53 out of 100 biological species were consistently identified by the residents of 3 or more villages. In all, 35 Solega names were elicited for these 53 bird species. As the participants were asked to volunteer any items of folklore associated with each bird name, we were able to assess the relative cultural importance of species that are readily identified, in contrast to species that are difficult to identify. A total of 20 species from the ‘consistent’ group had some form of folklore or other cultural significance associated with them – this included stories that explained a bird’s call, avoidance practices, the significance attributed to a bird’s call, invocation of the bird’s name in ritual, association of a bird with a deity, and so on. Knowledge of the ecology and behaviour of a bird species, or of negative interactions with a bird (*e.g.* as a pest species) were not included under the heading of ‘folklore’. Using these criteria, only one species – the brahminy kite – from the ‘inconsistent’ group was found to possess any associated folklore. In summary, 41% of the ‘consistent’ birds are mentioned in Solega folklore, compared to only 2% of ‘inconsistent’ birds. The disparity is even greater when the Solega names are used as a base count rather than the scientific

names – 18 out of 35 ‘consistent’ Solega names (51%) find a place in Solega folklore, compared to only 1 of 25 ‘inconsistent’ names (4%)³. We conclude that birds are more likely to be recognised and identified consistently across Solega communities if they have some cultural significance.

The role of perceptual salience

It is almost a tautology to state that human perception and/or cognitive capacities will have a significant influence on a language community’s folk classification system – indeed, it is hard to imagine any form of human behaviour that is not similarly influenced. However, it would be unwise to conclude that humans merely react to the input from their sense organs to automatically produce mental (and by extension, lexically encoded) representations of the natural world. Despite decades of comparative linguistic research on various domains of semantics, the number of true cross-linguistic semantic universals that have withstood rigorous empirical testing remain few in number (Wierzbicka, 2005). It is therefore to be expected that different languages will also ‘carve up’ the natural world in different ways, giving rise to a range of folk classifications. As previously suggested by other authors (e.g. Bulmer, 1967; Hays, 1982; Hunn, 1982), cultural or utilitarian factors should also play an important role in determining which organisms are to be named, and how distinctive those names should be.

In keeping with the hypothesis of perceptual salience, most of the large, visually striking birds in the B. R. Hills do have Solega names. This is only part of the explanation, as a more detailed investigation into which birds are named, and which are not, reveals a far more complicated pattern. For instance, it is not unusual for ethno-ornithologists to report that their target languages have distinct labels for birds that can be described as ‘rare and similar-appearing sibling species’, ‘small and dull-coloured’ and ‘obscure’ (Diamond and Bishop, 1999). First, however, it is pertinent to clearly establish what is meant by ‘perceptually salient’, as it is all too easy to explain away inconvenient facts which do not fit theoretical models by means of vague phrases such as ‘salient’ and ‘not salient’. It is probably not possible to devise a single,

³ The total of 60 Solega bird names is obtained by adding the ‘generic’ names from Tables 1 and 2.

objective, cross-linguistic and cross-taxon criterion of ‘salience’, but we could, at the very least, settle on a minimum salience threshold for a taxon in a single language. Two birds that are given distinct names but share many visual characteristics are *kottipidiyā* (the red-whiskered bulbul, *Pycnonotus jocosus*) and *kottorole* (the red-vented bulbul, *Pycnonotus cafer*). Apart from having a *kotti* ‘crest’ on their head, both birds are roughly the same size, and the same colour overall. The principal differences are that the former has two small red ‘whiskers’ and a whiter face, while the latter has a darker head, and a patch of red under its tail. Clearly, these differences are sufficient to warrant the naming of these birds by two different labels. The owls are another set of birds that are contrasted by few features – *gumma* is the name given to three large owl species, while two smaller species of scops owl are called *gu:be*. A difference in size, then, can be a perceptually salient feature of Solega bird taxonomy. At the generic/specific interface, three species of birds, *si:danagari* the jungle babbler, *doḍḍa si:danagari* the rufous babbler and *hullu si:danagari* the yellow-billed babbler, are recognised as distinct folk species that nevertheless, belong together. All 3 species of birds move in noisy flocks, and the only distinguishing visual features seem to be differences in their size and overall colour – described as drab grey, dark olive and grey, respectively (REF). The magnitude of the difference, while not remarkable, is clearly sufficient for these birds to be given related, but different names.

Given that visual cues as minor as the ones discussed above can be associated with differently named birds, it is surprising that three species of woodpecker are named *marakuṭuka* when the differences between these species are at least as prominent as those between the bulbuls. In a similar vein, three species of mynah, which appear at least as different as the babblers, are all called *uṇṇigirika:nakki*, while four species of drongo, distinguishable even from a distance by differences in body size, colouration and the shape of their ornamental tail feathers, are all called *karaliyakki*. The only drongo that has a unique, ‘specific’ name is the greater racket-tailed drongo, which is labelled *doḍḍakarali* ‘big *karali*’. Much cultural significance is attached to this bird, however (see below), and perceptual reasons alone (its larger size and racket tail) cannot account for its special nomenclatural status.

Some other phenomena arising from the picture elicitation task cannot be explained by the perceptual salience hypothesis alone. Three species of orioles – bright yellow birds

the size of mynas with prominent calls – live in the B. R. Hills, but no one was able to provide a name for any of them. In contrast, the significantly smaller *ma:di hakki* ‘scarlet minivet’, which is similarly coloured, was correctly named in 4 out of 5 villages. Most participants were even able to point out that only the female was bright yellow, while the male had scarlet plumage. Another bird that no Solega speaker was able to name is the yellow-footed green pigeon (*Treron phoenicoptera*). The absence of the name of this bird from the Solega lexicon is curious, as practically all other members of the family Columbidae are easily recognised and named – these include *kuggilu*, *sore hakki*, *bu:jore*, *pa:riva:la* and *aralakki* (Table 1; also see the section below on ‘Relation to scientific taxonomy’). Even more inexplicable, however, was our observation that not a single participant tried to insist that this obviously pigeon-like bird was really just an example of one of the other five columbid taxa. Some reported that they had seen the bird before, but that it simply did not have a name. Most English speakers, when faced with a similar predicament, would probably not shy away from stating that *T. phoenicoptera* was ‘a kind of pigeon’, in much the same way that they would unhesitatingly classify a hitherto unseen breed of dog as ‘a kind of dog’. No Solega speaker, however, spontaneously categorised *T. phoenicoptera* as ‘a kind of *kuggilu*’ or ‘a kind of *sore hakki*’.

When speakers are explicitly asked to mention the morphological features used as diagnostics for identifying different birds, they may not always agree on the salient feature(s) to be used. In the case of the parrots/parakeets, speakers are often divided on the issue of which morphological criteria should be used to distinguish *mo:rã* from *gi:na*. Ultimately, however, there seems to be a consensus that the blue-winged parakeet is *mo:rã*, while the rose-ringed parakeet and the blossom-headed parakeet are both *gi:na*.

Mo:rãdu kempu kokku, mai ondu tarada ni:li baṇṇa, kattinalli kari da:ra. Gi:na endale mai asiru pu:ra, arsina kokku. <Jaḍegowḍa, Bangalipo:ḍu >

Mo:rã has a red beak, and the body is sort of blue, with a black line on the neck. *Gi:na* has a completely green body, and a yellow beak.

Gi:nana pari:kshe ma:ḍagiddale na:vu, hakki hi:ge ku:tira:ga, illi ondu boṭṭu ade. Balasari ondu boṭṭu, rekke me:le, puna eḍasari ondu boṭṭu irtade. Mo:rãna hakkili adu baradille. <Da:segowḍa, Bu:ta:nipo:ḍu >

To distinguish *gi:ṇa*, when the bird is sitting like this, there is a spot here. There is a spot on the right, on the wing, and another one on the left. The *mo:rã* does not have these.

Kempu taledu gi:ṇa. <Madegowḍa, Nellikadiru po:ḍu>

The one with a red head is *gi:ṇa*.

The reason for this disagreement cannot be a lack of perceptual salience, as all 3 species are commonly seen and heard throughout the year in the B. R. Hills. Moreover, both *gi:ṇa* and *mo:rã* are significant crop pests, and can completely lay waste to a *ra:gi* field that is left unwatched. Instead, as Sillitoe (2002) suggests, the answer may lie in the possibility that we had asked our consultants an inappropriate question in the first place.

When asked how they identify particular animals, informants vary in their responses. They are not accustomed to specifying what cues they look for as naming criteria... They see any creature as a distinctive whole, considering simultaneously a range of observable cues, not seeking a few characteristic ones. (p. 1169)

As stated earlier, most of the large and easily spotted birds in BRT do have Solega names, but as Table 1 shows, a significant number (15 out of 55 at the ‘generic’ level) are either small⁴ or cryptic species. Similarly, a significant number of birds found in this locality, that are either medium to large sized, visually striking or common, or that possess distinctive calls, lack any Solega name whatsoever (Table 6). The presence of many of the visual cues that were arguably ‘perceptually salient’, in differentiating various named species cannot therefore guarantee that species possessing those features will be named. Very large and morphologically distinctive migratory waterbirds that appear in BRT during certain parts of the year (WHICH?) are all lumped together in the category *kokkore*, and the Solega make no attempt to try and distinguish between, say storks and herons ????. It could be argued that such species, being transient, do not leave as great an impression on the Solega psyche as birds that are present all year round. Such an argument can, however, be easily countered by the observation that

⁴ We decided to characterise any bird up to the size of a sparrow as ‘small’. Birds around the size of a myna are called ‘medium’, while larger birds are called ‘large’.

many cryptic birds such as *ke:sanakki* ‘Indian cuckoo’ and other cuckoos are primarily recognised by their calls. *Ke:sanakki* is particularly significant in this respect, because its calls are usually only heard in April-May, and herald a change of season; for the rest of the year, this species is rarely seen or heard.

English name	Scientific name	Perceptually salient features	Possible perceptual reasons for lack of name
blue-bearded bee-eater*	<i>Nyctyornis athertonii</i> #	large, widespread, distinctive call	
banded bay cuckoo*	<i>Cacomantis sonneratii</i>		
grey-bellied cuckoo*	<i>Cacomantis passerinus</i>		
blue-faced malkoha*	<i>Phaenicophaeus viridirostris</i>	large	silent
ashy wood swallow	<i>Artamus fuscus</i> #	common and often seen perched in small groups on dead trees	does not make nests out of mud, like other swifts and swallows
yellow-footed green pigeon	<i>Treron phoenicoptera</i>	common, seen in flocks	
fairy bluebird	<i>Irena puella</i> #	medium-sized, distinctive call	
gold-fronted chloropsis	<i>Chloropsis aurifrons</i>	common, loud caller	camouflaged by its green plumage
bay-backed shrike	<i>Lanius vittatus</i>	medium-sized, prominent markings	found only in scrub forests
orioles Eurasian golden oriole slender-billed oriole black-hooded oriole	<i>Oriolus oriolus</i> <i>Oriolus tenuirostris</i> <i>Oriolus xanthornus</i>	large and bright yellow, prominent calls	uncommon
black-headed cuckoo-shrike	<i>Coracina melanoptera</i>	medium-sized	found only in scrub forests
bar-winged flycatcher shrike	<i>Hemipus picatus</i> #	distinctive markings	
black-naped monarch	<i>Hypothymis azurea</i> #	bright blue, very common	small
Tickell’s blue flycatcher	<i>Cyornis tickelliae</i>	distinctive colouration, common	small

grey-headed canary flycatcher	<i>Culicicapa ceylonensis</i> #	bright yellow, common	small
Nilgiri flycatcher	<i>Eumyias albicaudatus</i>	blue	restricted to high-altitude forests
common iora	<i>Aegithina tiphia</i> #	bright colours, prominent calls	small
Indian blue robin	<i>Luscinia brunnea</i> #	distinctive colouration, loud, distinctive call	winter migrant, rarely seen
yellow-browed bulbul	<i>Iole indica</i> #	bright yellow belly, common in moist and evergreen forests, move in loud flocks	
white-browed bulbul	<i>Pycnonotus luteolus</i>	medium-sized	hard to spot
black bulbul	<i>Hypsipetes leucocephalus</i> #	common in evergreen forests, large size, red beak, crest on head, large noisy flocks	
grey-headed bulbul*	<i>Pycnonotus priocephalus</i>	medium sized, distinctive call, flocks in moist forest	
jungle prinia	<i>Prinia sylvatica</i>	common	small
grey-breasted prinia*	<i>Prinia hodgsonii</i>	common	small
oriental white-eye	<i>Zosterops palpebrosus</i>	common, distinctive markings, move in flocks	small
brown-cheeked fulvetta	<i>Alcippe poioicephala</i> #	common in moist and evergreen forests, distinctive call	small
larks Madras bush lark red-winged bush lark ashy-crowned sparrow lark rufous-tailed finch lark Malabar lark	<i>Mirafra affinis</i> <i>Mirafra erythroptera</i> <i>Eremopterix grisea</i> # <i>Ammomanes phoenicurus</i> # <i>Galerida malabarica</i> #	medium sized, and conspicuous in the breeding season; elaborate calls; mostly common	not brightly coloured; <i>M. affinis</i> and <i>G. malabarica</i> are uncommon
pipits olive-backed pipit tree pipit paddyfield pipit long-billed pipit	<i>Anthus hodgsoni</i> <i>A. trivialis</i> <i>A. rufulus</i> <i>A. similis</i>	medium sized, common	well camouflaged

white-rumped shama	<i>Copsychus malabaricus</i>	common, medium sized, distinctive colouration, loud, distinctive call	not easily seen
Eurasian blackbird	<i>Turdus merula</i> *	medium sized, common in evergreen and moist forest, glossy black plumage	

Table 6. Common, visually striking or otherwise perceptually salient bird species occurring in BRT, that do not have Solega names. Birds not included in the picture elicitation task are marked with an asterisk; # after the scientific name indicates a locally monotypic genus. The scientific identifications are from Grimmett and Inskipp (2005).

A strong claim made by Berlin (1992) relates to the special status of monotypic genera. In this regard, Berlin says that monotypic species stand out in the biological landscape due to their relative evolutionary isolation, and are consequently more likely to be given a distinct name in an ethnoclassification scheme for being perceptually more salient.

Focusing solely on monotypic genera as the most likely candidates for linguistic recognition, the following hypothesis is suggested:

1. If a scientific genus, x, is monotypic, it is highly likely to be given a distinct folk generic name.
2. The generic name will be restricted in its range of application to the single monotypic genus, x. (Berlin, 1992)

Our Solega bird data do not support these predictions. We were fortunate to have access to a published, comprehensive and up-to-date list of birds inhabiting the B. R. Hills, which supplied us with reliable information on scientific species names (Aravind et al., 2001). From this list, we were able to determine which species of birds belonged to locally monotypic genera. Examining the named bird species shown in Table 1, we found that around half (46%) of the *genera* which had Solega bird names were monotypic (Fig. 1). It is significant that a similar analysis of the unnamed species from Table 5 reveals the same pattern: once again, around half of the *genera* from this list are monotypic. The implications of this analysis are clear – monotypic bird genera of the B. R. Hills have a 50% chance of being named in Solega (or not named). In other words, being monotypic has no effect on the likelihood that a particular genus will be named.

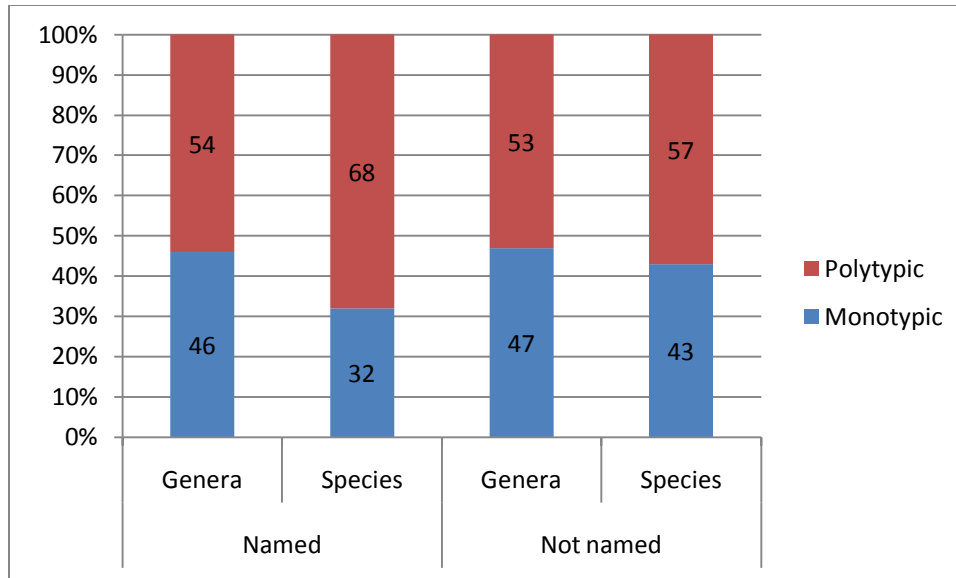


Figure 1. Distribution (in %) of monotypic and polytypic genera among the named and unnamed birds of Tables 1 and 5 respectively. The columns labelled ‘genera’ indicate counts of genera from the two groups; the columns labelled ‘species’ show counts based on total species number. For instance, *Sitta frontalis* and *Sitta castanea* from Table 1 would be counted as 1 genus (for the first column, ‘Named – Genera’), but as 2 species (for the second column, ‘Named – Species’) under the category ‘polytypic’.

Berlin’s prediction on the primacy of monotypic genera is further weakened if we count the total numbers of *species* that are named or not named by the Solega. Among the species shown in Table 1, only a third (32%) belong to monotypic genera, while the majority belong to polytypic genera (Fig. 1). Among the unnamed species of Table 5, 43% belong to monotypic genera.

Berlin’s second prediction on the denotational range of generic labels, as applied to monotypic taxa, is also challenged by our data. There are many instances in Table 1 where a Solega ‘generic’ label for a monotypic genus can also be used to refer to other species, which may or may not belong to other monotypic genera. Examples include *maṇṇakki*, which has among its referents two monotypic genera, and two species from polytypic genera; *gumma*, which is the shared name for three monotypic owl genera, and *saṇeyã*, the shared name for one monotypic bee-eater genus and two species from another genus.

Relation to scientific taxonomy

It is often stated that folk and scientific classification systems show a remarkable degree of convergence; in recent years, such a view has come to be taken for granted, and authors now rarely make the effort to point out where these convergences might lie. Looking at Table 1, it could be argued that Solega bird classification closely matches Linnaean classification, on the basis that 45 out of 67 (67%) Solega bird names (counting both ‘generic’ and ‘subgeneric’ names) match a single scientific species. This, however, would be a trivial conclusion, as it merely indicates that something⁵ that has a name in one system also has a name in another system. A more reliable test would be to compare larger groupings of ‘generic’ taxa to see if these also match with the same level of congruence. Using this criterion, it appears that there are some similarities to be found between the Solega and Latin classification schemes presented in Table 1. Prominent examples include the drongos (*karaliyakki*, genus *Dicrurus*), the barbets (*kuṭrakki*, genus *Megalaima*), the mynas (*uṇṇigirikanakki*, genus *Acridotheres*) and the nightjars (*kapuṭa*, genus *Caprimulgus*), all of which show congruence between the ‘folk generic’ category and the scientific genus. However, such a correspondence needs to be interpreted with care, as a scientific taxonomy, rather than being an objective ‘etic grid’ of facts, is more a set of working hypotheses that is continually updated and revised depending on prevailing evolutionary theories and the availability of new data (Stevens, 1994). Making reference to the taxonomy of Indian birds, Ghorpade (2011) has warned that it would be a grave mistake to use “*current species names ... promiscuously and uncritically ... as correct, precise*” (p. 982). Most current field guides use outdated taxonomies, with the result that the Indian “*avifauna could number anything between 1500 and 1700 or more confirmed species (including those*

⁵ Considerations of space prevent us from entering into a discussion on whether or not Linnaean species constitute ‘real’ units of nature, although Blumer (1970) provides an interesting account of why folk taxa are just as real as biological species. It is important to remember, however, that ethnoclassifications reported in the literature are not the result of omniscient researcher/consultant partnerships casting their gaze on entire species and ecosystems at a time; rather, the subjects of scrutiny tend to be individual organisms (birds, in this case), either living, dead, or photographed. It would be an extremely difficult task to empirically and reliably determine the referential limits of all the folk taxa in an ethnoclassification, just as it is often a very challenging task to find out where one biological species begins, and another ends.

in Burma and Afghanistan, which belong to the Indian subregion), and not just 1200–1300, as is presently understood and recorded in recent commercially oriented ‘DIY’ guidebooks” (p. 982). Although Ghorpade’s paper deals specifically with the phenomenon of polytypic species (i.e. true species that have been demoted to the level of subspecies or race), his comments also apply to the “poorly analysed” bird genera of India, many of which were excessively lumped together in the first half of the 20th century, thereby reducing the total number from 600 to around 400.

A good example of this tendency to lump taxa together can be found in the taxonomy of the sunbirds, most of which have traditionally been placed in the large genus *Nectarinia*. Using this label, it would be easy to conclude that there is a good match between the Solega label *tu:gusiṭṭe* and the scientific genus, of which there are four species present in BRT (Table 1). The genus *Nectarinia* has now been revised, and many of its members have been assigned to other, new genera. Consequently, the four species recognised by the Solega as *tu:gusiṭṭe* now correspond to the two separate genera, namely *Cinnyris* and *Leptocoma*, with a greatly reduced correspondence between scientific and folk categories (Oiseaux.net, 2005). Such revisions have occurred for the avifauna of many parts of the world (e.g. Peterson and Navarro-Siguenza, 2006 for Mexican birds), but the birds of Asia in general have received little recent taxonomic attention. It is not possible for the average ethnobiologist or linguistic fieldworker to predict which scientific taxa might undergo revision in the future, and it is therefore highly probable that many observed correspondences between folk and scientific taxa will turn out to be lacking in substance.

Finally, it is worth pointing out that many named Solega categories in fact show a poor correspondence with scientific genera, as they are currently understood. These include *maṇṇakki* (four genera of swifts and swallows), *gi:ṇa* (two genera of parrot/parakeet), *koṭā* (three raptor genera), *marakuṭuka*, *sivanakki*, *maragosappa:na* (five woodpecker genera), *giḍugā* (two raptor genera), *gumma* (three owl genera) and *siṭṭe* (at least five genera of small passerines). Moreover, eight species of dove/pigeon in four genera are labelled *araḷakki*, *soreyakki*, *bu:jore*, *pa:riva:ḷa* and *kuggilu*, with little correspondence between folk generics and scientific genera, while the common yellow-footed green pigeon is not named (Table 7).

<i>araḷakki</i>	<i>Chalcophaps indica</i>
<i>sore hakki</i>	<i>Streptopelia chinensis, S. decacto</i>
<i>bu:jore</i>	<i>S. senegalensis</i>
<i>pa:riva:ḷa</i>	<i>Columbia livia</i>
<i>kuggilu</i>	<i>Ducula badia, D. aenea, Co. elphinstonii</i>
<i>X</i>	<i>Treron phoenicoptera</i>

Table 7. Pigeons/doves found in BRT, and their Solega labels, if any.

Birds in Solega life, myth and ritual

In the final section of this paper, we describe the very important status that birds enjoy in the secular and religious life of Solega speakers. Birds, in general, play two important roles in Solega folklore: the first is that of a herald of important natural phenomena, both benign and noxious, while the second is that of a moral arbiter that sounds the alarm when important social or cultural taboos are broken. One might speculate that the reason birds are said to possess such gifts is the position they occupy in the physical environment – perched on trees and other high places, they observe not only the world of humans, but also the activities of other animals. As birds communicate their messages to humans through their various calls, it is not surprising that good number of their vocalisations⁶ have been lexicalised as ideophones in Solega (Table 8).

<i>aṭṭ-aṭṭu kere suṭṭ-suṭṭu kere</i>	red spurfowl
<i>chu chucca</i>	oriental scops owl
<i>jirr-jirr-jirri</i>	quail

⁶ There are two verbs in Solega to describe the calling of birds: in their nominalised forms, these are *moreyadu*, which can also be used to describe the vocalisations of other animals, such as elephant and tigers, and *siḍiyadu*, which is specific to birds.

<i>ka:kanakote</i>	Indian scimitar babbler
<i>karra kurra tikada meṇa ki:lu</i>	large-billed crow
<i>kē kē gaku gaku</i>	junglefowl
<i>ke:ta sattu makka keṭtu</i>	Indian cuckoo
<i>ke:tike ku:sa:ta</i>	Eurasian collared dove
<i>kisi kisi</i>	blue-winged parakeet
<i>kiṭri:/piṭri:/siṭri:</i>	flameback woodpeckers
<i>kottipidiyā</i>	red-whiskered bulbul
<i>kuī kuī</i>	rufous woodpecker
<i>kuruli kuruli</i>	quail
<i>kuṭru kuṭru</i>	barbets
<i>ma:vā kena/pa:pira</i>	common hawk cuckoo
<i>pikku pikku</i>	wagtails
<i>sankara sara tappu</i>	rooster
<i>sirpuru sirpuru</i>	jungle babbler
<i>soī soī/si:l</i>	parrots, whistling thrush

Table 8. Bird calls that have been lexicalised in Solega.

The five woodpeckers found in the B. R. Hills may all be labelled *marakuṭuka* in Solega, but two species are given special names that reflect their cultural significance. One bird, possibly a kind of flameback woodpecker, is also referred to as *ka:ri hakki* ‘calling bird’, as it is said to be able to predict or induce the onset of rain through its call. Another species of flameback woodpecker is called *sa:vakki* ‘death bird’, as its calls are said to signal the death of a person⁷. Some Solega will also say that the *ka:ri hakki* is able to warn humans of the presence of danger in the form of wild animals. For this reason, it is also sometimes referred to as *sivana hakki* ‘Shiva’s bird’. Although there was a surprising amount of confusion regarding the precise identities of these birds, two points that all participants did agree on was that there there was one woodpecker that called the rain and one that heralded death, and that these birds had very different calls. The rufous woodpecker, which looks very different from the flamebacks, was also

⁷ It is possible that both Solega names refer to a single flameback species, which is able to produce two different calls???

sometimes given the label *ka:ri hakki*. This is not the only bird to which this power is attributed, as barbets are also said to protect humans from harm (see below).

E:vondu kaḍeli biḍu biddo:dare “kuĩ kuĩ” entadu. Adara sama:sa:ra to:rtera:du. Maḷe a:gottu, a:ga kirri-enna karetaḍe, no:ḍi, a:va:ga maḷe de:sti (ka:ri hakki)

When it gets overcast somewhere, it says “*kui kui*”. It relays the news. When it rains, then it calls “*kirri*”⁸, see? Then it rains a lot.

Hakki piṭri:-ennade. O! de:lo? Hakki siḍḍadella? E:ka? I: da:ri ho:ku a:ga hakki siḍḍattu. O:, alli ho:ga ba:radu, de:nondu ade alli. Alli ho:da:giddale a:neve yo, e:nondu karaḍiye yo, e:nondu ja:ti kaṇḍe uḍṭade a:ga. Matte i: da:ri ho:ga be:ku endu yo:cane ma:ḍida:ga e:na ma:ḍade, “kirri-kirri-kirri” endade. O:, i: da:rili e:nu ille. (ka:ri hakki)

The bird says “*piṭri:*”. Oh! What’s that? The bird’s calling? Why? You want to go along a path and the bird calls (and so you think), “Oh! I shouldn’t go there, there’s something there.” If you keep going you encounter some wild animal, whether it be an elephant or a bear. And when you want to go along a path and the bird says, “*kirri-kirri-kirri*”, (you say to yourself) “Oh, there’s nothing here.”

E:va kaḍeli maraṇa a:godare, sa:vu a:dare, adu suddi koḍṭade. ade emadamana ko:ḷi ennadu (sa:vakki)

When there’s a death somewhere, it gives a signal. That’s why it’s called the bird of the god of death.

Large owls, *gumma*, are also birds of ill omen, possibly due to their human-like faces, which are usually seen at night. Solega people may avoid looking at even a picture of a *gumma*, and the threat of this bird is often used to frighten young children into obedience: “*gumma bandade, summane malagu*” (The *gumma*’s coming; go to sleep!). The Solega, particularly those who live on the Tamil Nadu side of the border, say that the call of a *gumma* signifies the presence of *e:ḷu kula* ‘Seven Clan’ Solega⁹ (also called *uraḷi*

⁸ The call of the rufous woodpecker is best characterised as “*kuĩ kuĩ*”, and that of the greater flameback as “*kiṭri:*”.

⁹ The Solega living in the B. R. Hills are called the *aidu kula* ‘Five Clan’ Solega, and speak a language that is closely related to the official state language, Kannada. They regard themselves as loosely affiliated with, but distinct from, the *e:ḷu kula* ‘Seven Clan’ Solega, who mostly live in Tamil Nadu, and whose language has much in common with Tamil. These people are thought to be skilled in black magic and traditional medicine, and it is said that they can render themselves invisible.

solegavaru or *kurubaru*) in the forest. The Five-Clan Solega are afraid of these people, and believe that their men would kidnap young girls for marriage, and steal the grain from their fields. So if one hears a *gumma* calling while watching over one's crops at night, one dares not shoo away any animal that fed on that crop that night, as it could be one of the *kurubaru* in animal form. A *gumma* calling a single time signifies the presence of the *kurubaru*, but if it calls twice, it is just a regular *gumma* that means no harm. Negative attitudes directed towards owls have also been reported from other parts of the world – an owl is regarded as the watchman of a witch or sorcerer by the Mbuti of the Congo basin (Ichikawa, 1998), while the Tembo, who also live nearby, claim that “sorcerers use it [the spotted eagle-owl] as a telephone” (Kizungu et al., 1998). The Sahaptin of the Pacific Northwest consider owls to be “a dangerous being, an Indian doctor and an omen of death” (Hunn, 1991), and Forth (2004: 69) similarly reports that the Nage of Indonesia speak of owls as the form assumed by the maleficent spirit of a witch. Interestingly, the Nage also attribute special significance to the number of times the call of an owl is heard, as an uneven number of calls is meant to indicate the presence of a witch nearby. In many parts of India, however, equating someone with an owl simply means that s/he is stupid.

A large and common bird, the greater coucal, or *kembutã*, can also bring about ill luck, due to its association with the death of an ogre. The ill luck can, fortunately, be countered by means of a simple ritual.

Savaṇana kola:ga sva:mi iddã. No:ḍidã, balagaḍinda oṅtottutte atta:gi, hinde savaṇanige e:ṭade. Balagaḍinda oṅto:da:ga na:vu aga:darue, ondu kone murdu - muḷḷugone ue sarie, ondu kalla:dalue sarie - adava etti attaka tiṭṭu uḍa:du. Nammadu da:ṅta:gille. Adakka e:na ennabe:ku endale, “Ni: ho:da da:ri kallu muḷḷu a:guḍa be:ku, na:nu ho:da da:ri sa:lu sampage vana huṭṭi santo:sava:gi beḷiya be:ku,” enduru buḍa be:ku. A: tara ma:ḍadiddale e:na:daru tondari ade. Adu ondu karmada hakki.

When (the ogre) *savaṇa* died, the Lord was there. He saw a coucal passing by his right-hand side, when *savaṇa* lay dying. So when we see a coucal on our right, we break a branch – it can be a thorn or even a stone – and place it there (on the ground). Then it doesn't cross our path. What that means is, “May your path be full of rocks and thorns, and may a forest of *sampage* saplings grow blissfully along mine.” If you don't do that, there will be trouble ahead. It is a fateful bird.

Barbets are important in Solega folklore, not only as protectors of humans against wild beasts, but also as sources of practical information. In the first of the following two extracts, the barbet (in particular, the brown-headed barbet) is described as an accurate timekeeper, with its late afternoon and evening songs telling humans that it is time to stop work and return home from their fields. Three separate bouts of singing are said to emanate from the barbet's throat at this time of day, and although the first two bouts are given unique names, the speaker was unable to explain their significance. In the second extract, the speaker explains that the barbet's song, much like that of the flameback woodpecker, can help humans avoid running into dangerous wild animals.

Sande a:da:ga a:ga idu mo:da ka:vaḷa allava? A:ga kuṭru ha:ḍdade. "O:! I:ga aṇiyāna kuṭru ha:ḍdade! I:ga time a:gottu kaṇo!" A:ga puna innondu suma:r ottu iḷdu, a:gondū kuṭru ha:ḍdade. Idu ma:vana kuṭru. Kuṭrina saddakave time a:gottu endu thiḷdumaku na:vu ... a:seka eraḍane kuṭriḡa puna mu:rne kuṭriḡa sound bandale a:ga kattale a:gottu. Mu:re sound koṭṭade adu ... a mu:rne sound biddottu enda:ga, aḍiḡe teya:r ma:ḍa:ku. (kuṭrakki)

It gets dark in the evening, right? That's when the barbet sings. "Oh! That's the son-in-law barbet singing now! It's time!" Then, when the sun sets completely, another barbet will sing. This is the father-in-law barbet. We tell the time just from listening to the barbet's song ... when the second barbet sings, and then the third barbet sings, it gets dark. It only sings three times ... when you hear that third sound, you should start cooking.

Adu suddi koṭṭre a:vottina dina yelli iddarue huli kirubā aḍḍa baḷsi odde (kuṭrakki)
When the barbet calls, no matter where you are that day, tigers and leopards will avoid you.

Mystical powers are attributed to other birds such as the fish and hawk owls *gu:be* and (possibly) the large cuckooshrike, referred to as *kaṇiḡa:rā*.

Ondu ka:la ettadu ondu ka:lu hi:ḡe. kuṇiyadu, batta kuṭṭadante adu, de:va ḡaṇatige. (gu:be)

It has one leg raised up, and one leg (down) like this. It dances, it grinds rice flour, as an offering to the gods.

*I:ga na:vu beleka tekobe:ka:giddale, a:ga saistra no:ḍista:re. avā saistraga:rā.
(kaṇiga:rā)*

When we want to take our produce (to the market), it tells us how we will do.
It's the fortune-teller.

The emerald dove is another bird with divine connections. The Solega name for this bird, *araḷakki* or 'castor bird', is a reference to its habit of feeding on the seeds of the castor plant, which grows wild, but is also cultivated by the Solega. The following myth explains that the bird collects castor seeds not for its own sustenance, but for a higher purpose. Participants from one village commented that this bird can fly at great speeds, but also warned against trying to imitate the bird's call.

*Avā araḷakki endale araḷaiyā. Avā sva:mīne, avana pu:je ma:ḍta:re. Avā
araḷaiyyānatte avā srushTi ma:ḍidā. I: araḷa a:du a:du a:du se:rsi koḍadu. Eṇṇe
illa:doitu avana maṇḍeka. Araḷina eṇṇe be:ka:gittu, adakkatte araḷakki kaḷisinā. I:
hakkiya kaḷisi puna i:kaḍe a:kaḍe buttu, puna avā tandade akki ella, araḷella adu
tandu me:sadalli alli etti surdattu keḷage avanagaḍe.*

The castor bird is associated with Grandfather Castor. He's a god, and we worship him. It was Grandfather Castor who created it. It painstakingly collects castor seeds, and gives them to him. He didn't have oil to put in his hair. He wanted castor oil, and that's why he sent the castor bird. He sent the bird here and there, and the bird brought him all the castor seeds in its crop, and poured them out in front of him.

Aṇakisadaka ue a:ga:dille. Kivīli u:ḷe surdu uṭṭade endu. (araḷakki)

You can't repeat what it says. It is said that it makes earwax start to flow out of your ears.

Another timekeeping bird is *ke:sanakki* 'Indian cuckoo'. Unlike the barbet, however, whose call signals a diurnal rhythm, the cuckoo's song waxes and wanes with an annual period. This bird is heard only in the months of April and May, and the presence of its song heralds the first rains of the year, or *munga:ru*. The content of the four-syllable song, on the other hand, which is rendered in Solega as "*ke:ta satto, makka keṭṭo*" has a more sinister meaning.

Ke:ta satto, makka keṭṭo. Tande satta me:le avana makka bi:de pa:lu anta.
(*ke:sanakki*)

Ke:ta died, his children cried¹⁰. After the father died, the children were left destitute.

The call of the puff-throated babbler (called *ku:sakki* by some Solega participants) is also a death lament. It is said that a mother and her baby, both exceedingly thirsty, stopped to rest, and that the mother, in her haste, proceeded to drink some water without first seeing to her infant. Her act of selfishness caused the infant to die. Stricken with grief at her failure to care for her own baby, the mother turned into a bird, and to this day, calls out *nanna ku:so nanna ku:so* ‘My child! My child!’

Obba awwe maga tabburu ho:da. Ni:rutte da:va hattira time-inalli ni:r etturo:gi e:ri mele nilsu uṭṭu, avatte ho:gi rappenna kuḍiya:ge biddu uṭṭa. Maguvina usura oṭṭottu. Ni:ra tākuḍdu uṭṭu itta:ka no:ḍida, ku:sina usura oṭṭottu. Adakka etti first-e: kuḍsutṭiddale seriya:gittu, ade:nue tondari a:galle. Ta:nu kuḍdu uṭṭa, idakka usuru oṭṭottu. A:ga porr-enna a:ri ho:gi, alli ku:turu,, “Nanna ku:so:! Nanna ku:so:!” ennadu ha:ḍa:du.

A mother was walking along, holding her child in her arms. In that time of great thirst she rested on a hillock, and there she eagerly drank the water that she had brought along with her. (At that moment) the child died. By the time she had finished quenching her thirst, and turned to look at her child, it was already dead. If she had given her child some water to drink first, everything would have been fine. But she drank first, and that’s why the child died. Then she flew up, and sitting there (on a branch), started to sing, “My child! My child!”

Two other birds serve as witnesses to human frailty in Solega folklore – these are the common hawk-cuckoo *pa:pira* and the large-billed crow *ka:ge*.

Ma:na mariya:di ma:tu idu. Ma:vānue soseue ibbarue elli ho:ga time-inalli, a:ga sose ondu kallu me:le ku:tu keḷeka negadu uṭṭa. “Husha:ravva!” enda:ki hindeka turugi no:ḍida:ga avaḷa ma:na kaṇḍu uṭṭattu. A:seka ma:vāniga, “O ho!” iḍiya:gave avka:sha a:goitu. Soseya gabbakenna iḍiya:da:ka:ue, ondu hakki, alliyē: ku:tidu, “Ma:vā ke:na! Ma:vā ke:na! Ma:vā ke:na!” endale “pa:pira: pa:pira: pa:pira:”

¹⁰ Lit. things were bad for his children.

endadu. Sa:kshi koḍadadu, a: hakki. Puna hoṭṭogiga ibbaru soseue ma:vanue meneka bandu, sose ma:ṅana mene hoṭṭoda, matte ma:vā ma:vāna meneka hoṭṭonā. A: hakki hullina su:ru me:le ku:taru, “Ma:vā ke:na! Ma:vā ke:na! Ma:vā ke:na!” ha:ḍdade, endale ma:vā soseka oṅtogu uṭṭā. (pa:pira)

This is a tale of morals and propriety. A man and his daughter-in-law were travelling; after resting on a rock, the girl proceeded to jump down. “Careful!” said the man, and as he turned towards her, caught a glimpse of her breast. Sensing his opportunity, the man thought to himself, “A ha!” As he quickly grabbed her, a bird, sitting above, cried out, “*Ma:vā ke:na! Ma:vā ke:na!*” or “*pa:pira pa:pira pa:pira*”. It witnessed the act, that bird. Later the man and his daughter returned home, and the girl went to her husband’s house, while the man returned to his own. The bird landed on the grass roof of the house, and sang, “*Ma:vā ke:na! Ma:vā ke:na!*”, meaning that the man had had relations with his daughter-in-law.

The crow story starts with a woman who is asked by her husband to cook a meal for some guests. Left on her own, the woman greedily ate most of the beans and *ra:gi* balls while cooking, with the result that there was very little left for the guests. Later that night, she suffered from severe indigestion, and was unable to sleep. She was afflicted with a debilitating amount of flatulence, which she tried to remedy by blocking her anus with a plug made from the wax of *nesari je:nu*, the stingless bee. Unfortunately, enteric gas built up inside her belly, and the next morning, she was found dead by her husband. As people prepared to bury her, a crow, who had been watching the proceedings, called out, “*karra kurra tikada meṅa ki:ḷu*” “*Karra kurra!* Remove the wax from (her) bottom!”. An old woman came along, removed the plug with a stick, and cast all the escaping gas onto a nearby *si:ge* bush. She then dropped dead, but the woman who had eaten the beans sat bolt upright, and was well again. Incidentally, the leaves of the *si:ge* bush took on a foul odour, and for that reason is now called *ūsū si:ge* ‘flatulence *si:ge*’.

A number of prominent Solega folksongs, which are sung at festivals and celebrations, make reference to birds. The simplest of these songs honours the mud-nest-building swifts and swallows, or *maṅṅakki*, that are common in the B. R. Hills. For reasons unknown, the birds are referred to as *maṅṅakki ma:vā* ‘father-in-law mud-bird’ in the

song, which is open-ended, and can be repeated any number of times by naming different tree species in the second line:

*Maṇṇa tege tege maṇṇakki ma:vã,
Araḷu kaḍḍella maṇṇakki gu:ḍu.*

Collect mud, o father-in-law swift,
Swift nests among the castor branches.

A far more important and lengthy song cycle called *ha:ḍuke* is sung at the shrine of a god on his festival day from dusk till the following dawn. The sequence of themes covered in the *ha:ḍuke* is such that the final few stanzas, which consist of invocations of certain birds, coincide with the first calls of those birds in the forest as the sun rises. A recent addition into Solega folklore may be the *garuḍã* ‘brahminy kite’. This bird plays a key role in an important Hindu (*i.e.* belonging to non-Solega, plains people) festival that takes place in the B. R. Hills. The ceremonial chariot that is drawn in procession during this festival may only leave the temple after this bird is seen circling overhead. Given that Solega people participate in this festival, but do not claim it as their own, it is significant that the only village that correctly named this bird as *garuḍã* in the picture elicitation task was the one situated in the lowlands, at the edges of traditional Solega territory.

Some birds are afforded a privileged position by the Solega on the basis of observed behavioural and ecological traits. The greater racket-tailed drongo, *doḍḍa karaḷi*, which is able to mimic the calls of other birds with great accuracy, is thought use this ability to attract birds of other species into mixed-species flocks (Goodale and Kotagama, 2006). The significance of such unusual gatherings of birds, and of the possible role of the drongo in maintaining them, is not lost on the Solega; the drongo is also called *ko:luka:rã* (lit. ‘rod bearer’) the title given to a traditional Solega elder charged with maintaining peace and order, and meting out punishment to wrongdoers. An identical belief exists among the Mbuti of the Congo basin, and for much the same reasons, but for a different bird species that also leads mixed-species groups. According to Ichikawa:

A species of greenbuls called *mbilie* (*Criniger calurus*) is said to be the chief of the birds, because, according to the Mbuti, other birds will gather around him, when it calls “mbilie!” (1998: 112)

An unrelated point of cultural significance is that the ashes obtained from burning the feathers of the *doḍḍa karaḷi* are smeared on the forehead of Solega men who are about to set out on a honey collecting expedition. This may be related to the drongo's habit of flying after migrating bee swarms, and picking off stragglers.

Ko:luka:rā anta. Pakshigaḷige ella idu va:ra ettavā (doḍḍa karaḷi)

We call it the sheriff. It's like a counsellor to all the birds.

Another bird, the Malabar whistling thrush, or *ka:nagoravā*, sings at dawn, and is said to be responsible for leading cows and buffalos out to pasture. It's slow, halting call has a strikingly human-like quality, and has earned it the nickname 'whistling schoolboy' among ornithologists. The Solega, however, say that it resembles the speech of a stutterer.

Goravā endale todavā enta ... Golla, gollarakki adu. Dana, emme, adella idu buḍtade no:di. Beḷagu aidu gaṇṭeka soī: enta, si:l-enta buḍta:de. Ba:gīlu tegedu ... doḍḍi. (ka:nagoravā)

We call the whistling thrush a stutterer... It's the cowherd, a cowherding bird. Cows, buffalos, it leads them all, see? It calls out "soī:" at five in the morning, it leads them out with a "si:l!". It opens the door ... of the cowshed.

Finally, the highly variable calls of the hill myna *se:nanakki* have led the Solega to conclude that English speakers must have learnt their language from this bird. The myna's song was characterised by one speaker as "hī: huī kī: sī: poī sī: poī", a rendition full of falling pitches and alien-sounding diphthongs.

English-inavariga ma:tu barade, adu tante ma:ta kalisiradu. Korama ja:ti hakki adu. (se:nanakki)

When the English couldn't speak, it was that bird that taught them language. That bird is a show-off.

Solega people have traditionally eaten both the eggs and the flesh of many species of birds, although such practices have declined sharply ever since the setting up of a wildlife sanctuary on their lands. Some birds that are never eaten, however, and these include the crow, the pheasant coucal and woodpeckers. This taboo is very likely a direct consequence of the powers, both noxious and benign, that the latter two groups are supposed to possess. In the case of the crow and the coucal, the taboo may also be

due to their unusual calls, their scavenging habits (at least for the former) and the unpleasant smell and/or taste of their flesh. Much like the coucal, the crow is regarded as an ill-omened bird, as it is the vehicle of *shani*, the personification of Saturn. As a result, children are warned to not even throw stones at crows. One final culinary taboo among the Solega concerns the head and legs of chickens – these should not be eaten by men, as this will cause their bodies to tremble when they attempt to climb trees.

Concluding remarks

The results presented in the first half of this paper demonstrate that bird naming in Solega is not a straightforward affair, and that it would be naïve to assume that there is a lexicon of universally accepted, ‘correct’ bird names in the language, simply waiting to be elicited. The initial name list presented in Table 1, which was compiled by author SA over five years of fieldwork with Solega-speaking field assistants, was approved by numerous Solega from villages situated around the field station. The picture elicitation task, carried out in villages located far from the field station, showed that there were other ways of naming many of the birds on our list; the variation we encountered ranged from transparent dialectal differences in pronunciation to completely unrelated lexemes (Table 4). Moreover, while we were confident about our field assistants’ judgements on the acceptability of omitting *-hakki* ‘bird’ from the generic names shown in Table 1, Solega speakers from other villages clearly had different ideas about when this morpheme should be used (Table 2). This situation is reminiscent of the ethnobiological knowledge of the Wola people of Papua New Guinea, as described by Sillitoe (2002). Faced with a significant level of disagreement among his consultants regarding the identification and classification of bird species, Sillitoe argues that it is futile to attempt to compile a single ethnotaxonomy for a community like the Wola, which is characterised by intellectual egalitarianism and acephalous politics. In other words, individual Wola are able to decide for themselves what constitutes an appropriate taxonomy, as there is no ‘higher authority’ to contradict them, and prescribe a ‘standard’ taxonomy. The Wola display “considerable tolerance of dissonance” (p. 1167), and, as a result, their animal classification scheme:

is inherently dynamic and subject to negotiation; there can be no closure or final bounded version, no authoritative comprehensive arrangement. (p. 1169)

Many Solega examples discussed above support this view. When discussing the common and culturally-important woodpeckers, Solega speakers seemed quite at ease with changing their minds about which labels to apply to which woodpecker species, and which birds to group together under a single category. The Solega labels *marakuṭuka*, *sa:vakki* and *ka:rihakki* were known to most participants, but there seemed to be only a loose correspondence between the names and the birds. Ultimately, the more important pieces of information were the stories and omens associated with each bird name.

A further example is that of the paradise flycatcher (*Terpsiphone paradisi*), which, in our initial name list (Table 1) was called *sattugaba:la* ‘ladle tail’. To our surprise – as this is a visually highly distinctive bird - this name was not recorded once in any of the five villages visited during the picture elicitation task. Three plausible names were recorded from three villages, while participants from the remaining two villages said that they had definitely seen the bird (and were able to describe its appearance, including its sexual dimorphism, and habits), but did not have a name for it. This example also demonstrates how perceptual distinctiveness is not the sole force that shapes folk taxonomies. The same can be said of the brightly-coloured orioles, which are unnamed in spite of being significantly larger than the *ma:dihakki* (scarlet minivet). The picture elicitation task showed that a bird was far more likely to be identified and named consistently if it had some sort of folklore associated with it (Table 5). Additionally, several prominent or common species of bird present in the B. R. Hills remain unnamed in Solega (Table 6), while visually unremarkable birds such as the puff-throated babbler and the quail are prominent in the Solega psyche.

Some other strong predictions made in Berlin (1992) are not supported by our data. We found that belonging to a locally monotypic genus in no way increases the chances of a bird being named in Solega. With regard to nomenclature, we demonstrate that while bare monomials dominate the responses in artificial situations such as the picture elicitation task, birds are more likely to be referred to with their full, binomial names in spontaneous speech. Finally, the apparent correspondence between scientific classification and Solega ethnotaxonomy appears to be superficial when larger ‘generic’ groupings of birds from both systems are compared. While some Solega groupings

neatly match their Linnaean counterparts, as they are currently recognised, some show little to no correspondence.

The flycatcher example discussed above contrasts sharply with the case of the puff-throated babbler, which, in spite of its important place in Solega culture, is a 'bird with no name' for many Solega. The bird's call is recognised by every single Solega we spoke with, and the story associated with this bird is also universally known. Yet, many consultants were unperturbed by the fact that they did not know its name; a few provided what appeared to be a nonce coining, along the lines of *ku:sakki* 'child bird'. Cases such as this illustrate that neither 'perception' nor 'culture' can, in isolation, explain the architecture of such a complex social and linguistic construct as a folk classification, and that it would be a mistake to view raw language data through the lens of polarising theoretical orientations.

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