

INTRODUCTION

Macro and micro-social variation in Asia-Pacific sign languages

Nick Palfreyman

University of Central Lancashire

The volume of research on sign language (SL) variation has grown considerably in recent years but, as in other areas of SL research, there have been comparatively fewer reports from the Asia-Pacific region (Moriarty Harrelson et al., 2016). The region is already known for the extreme diversity of its (spoken) language ecologies (Cunningham, Ingram, & Sumbuk, 2006; Goebel, 2016; Volker, 2015), and it should come as no surprise that this diversity extends to the signed languages of the region.

Taken together, the articles in this special issue draw attention to that diversity: perhaps contrary to popular belief, SL practices across the Asia-Pacific region can, and do differ in remarkable ways that strengthen our understanding of language variation. To that end, I begin by highlighting the distinctive sociolinguistic settings and practices covered by this special issue. This is followed by a discussion of macro- and micro-social variation, why this theme is so relevant for SL variation studies, and how it is taken up by the papers that follow.

1. Sociolinguistic diversity in the sign languages of the Asia-Pacific region

SL research has been dominated overwhelmingly by what Mudd et al. (this issue) describe as ‘deaf community sign languages’ – also referred to as ‘national’ (Branson & Miller, 1997), ‘urban’ (Dolman, 1986) and ‘macro-community’ sign languages (Schembri, Fenlon, Cormier, & Johnston, 2018). More recently, a valuable contribution to the field has been made by studies of a different kind of SL (de Vos & Zeshan, 2012; de Vos & Pfau, 2015), described variously as ‘indigenous’ (Woodward, 2003), ‘rural’ (de Vos, 2011), ‘emerging’ (Meir, Sandler, Padden, & Aronoff, 2010), ‘shared’ (Nyst, 2012) and ‘micro-community’ sign languages (Schembri et al., 2018).

The emergence of these terms created instant dichotomies (urban-rural, macro-micro, and so on) that were swiftly followed by calls for further differentiation (de Vos & Zeshan, 2012, p.6; Nyst, 2012, p.268), but attempts to introduce such differentiation are criticised for implying a 'development cline' running from types of home sign to village/rural/shared sign languages to national/urban sign languages (Hou & Kusters, 2019). 'Home sign' is used to describe communication that emerges in the contexts of deaf people who do not have access to a SL (Kegl, Senghas, & Coppola, 1999); in rural areas, these practices include gesturing or signing, which is considered to be a natural means for communication with deaf people, and may entail an extensive set of conventional gestures (Nyst, Sylla, & Magassouba, 2012, p.268).

One of the most vocal critics of dichotomous approaches and the development cline is Nyst (2012), who writes of a 'grey area' between home sign languages and the sign languages of larger deaf communities. She calls for the documentation of communicative practices in that grey area in a way that is free from pre-conceived ideas such as 'full-fledged sign languages'. Only then, Nyst argues, 'can we begin to understand which factors are relevant in the shaping of sign language structure' (2012, p.568).

The first article of this special issue, by **Lauren W. Reed**, responds to this call sensitively and effectively. For Reed, it is not helpful to name or delineate the sign varieties that she encounters in Port Moresby, and in documenting these varieties she introduces emic terms used by community members: **SIGN LANGUAGE** and **CULTURE**. These two 'ways of signing' co-exist in Port Moresby, and the particular mix that a signer uses in a given interaction seems to depend in particular on the experience of one's interlocutor.

What is particularly unusual in Reed's account of the switches between **SIGN LANGUAGE** and **CULTURE** is the fact that community members have a sign to represent the metalinguistic practice of switching from one 'way of signing' to another, which Reed glosses **SWITCH-CAPS**. The steady stream of arrivals from rural areas, where **CULTURE** develops, makes it likely that this co-existence will continue for the near future – though Reed notes that a dictionary of **SIGN LANGUAGE** is currently in production, and wonders what effect this will have on community practices.

Katie Mudd, Hannah Lutzenberger, Connie de Vos, Paula Fikkert, Onno Crasborn and Bart de Boer focus their attention on **Kata Kolok**, a variety that emerged in a very different sociolinguistic context to the 'ways of signing' of Port Moresby. **Kata Kolok** literally means 'deaf talk' and emerged five generations ago in a village in the north of Bali, Indonesia, where there is a high incidence of hereditary deafness (de Vos, 2012). As a result, **Kata Kolok** is shared between deaf and hearing community members, facilitating integration between deaf and hearing villagers. Mudd et al. set out to test assertions made by Meir, Israel, Sandler,

Padden and Aronoff (2012) – that shared sign languages exhibit more variation in the expression of everyday concepts.

Both Reed's *CULTURE* and *Kata Kolok* feature practices shared between deaf and hearing people, which undoubtedly has consequences for how these practices are structured: one of the challenges facing SL sociolinguists is to determine the nature of these consequences. Does the participation of hearing people act as a conservative force that stymies language change, or promote linguistic innovation, or both? One of Mudd et al.'s preliminary findings is that deaf and hearing signers may have different lexical preferences. In response to the same stimuli, deaf participants produce what appear to be more specific descriptions than hearing participants. In light of the potential of communicative setting to influence structural processes such as lexicalisation (de Vos, 2011), this raises tantalising possibilities: could it be, for example, that the need to interact with hearing interlocutors less fluent in *Kata Kolok* promotes some ways of signing (which Mudd et al., term 'productive synonyms') over others ('perceptual synonyms')? And what roles are played by other factors, such as the smaller number of regular interlocutors?

Unlike *Kata Kolok*, which is used fluently by a few hundred deaf and hearing people, *BISINDO* (Indonesian Sign Language) is used by tens if not hundreds of thousands of deaf people across Indonesia's urban centres (Palfreyman, 2019). The editor, **Nick Palfreyman**, examines spontaneous, conversational data from signers in the cities of Solo and Makassar, and finds four variables that are used to create social meaning. These variables index identities along regional and ethnic lines, as well as hearing status.

Ever since Labov (1966) wrote about the linguistic variable as a structural unit, the variable has been at the heart of language variation and change, and Palfreyman asks where one might look in a SL in order to find socially meaningful variables. For *BISINDO*, two of these variables are found in constructed action (CA), where signers 'quote' a non-linguistic action of a referent as they sign (Hodge, Ferrara, & Anible, 2019), in a manner similar to enacted dialogue for spoken languages. Effective use of CA often requires a signer to pick up on nuances in the way that people sign, and this means that stretches of CA are a particularly good place to look for sociolinguistic variables.

One of the other variables in Palfreyman's article occurs in the mouthing practices of Javanese *BISINDO* users. Mouthings are lip movements that imitate the patterns visible on the lips of hearing speakers (Boyes Braem & Sutton-Spence, 2001), though it should be noted that not all signers use mouthings, and that not all signs are accompanied by mouthings. In the multilingual settings of the Asia-Pacific region, we might ask which languages are used by ambient speakers, and how (if at all) the use of sign language mouthings is influenced by sociolinguistic practices in ambient speech communities.

Palfreyman (2016, this issue) shows that some BISINDO signers are using mouthing variation to index Javanese identity, and McKee (2019) reports that a similar mouthing practice is used in New Zealand Sign Language by Māori signers. Meanwhile, research on BSL suggests that the mouthing of dialect words might also contribute to the creation of ‘regional accents’ in sign languages (Schembri & Fenlon, 2019). On the basis of these recent studies, mouthings seem highly suited to the expression of social meaning in sign languages.

Having opened, at the micro-level, with idiolectal variation in Papua New Guinea, the issue closes at the macro-level, with cross-linguistic variation in East Asia. **Keiko Sagara** and **Nick Palfreyman** present a study of Japanese Sign Language (JSL) and Taiwan Sign Language (TSL), which were in contact during the Japanese colonial period, from 1915, when the first deaf school was founded in Taiwan, until 1945. The quantitative study of variation across data sets – comparative sociolinguistics (Poplack & Tagliamonte, 2001) – is still a rare endeavour for sign languages, although several studies of British Sign Language, Australian Sign Language and New Zealand Sign Language have enabled comparative studies of those languages, such as Schembri et al. (2010).

Sagara and Palfreyman begin by looking at the variable expression of the numerals 10, 100 and 1000 in JSL, which are found to pattern according to region – Kanto signers prefer variants featuring numeral incorporation (‘NI variants’), while Kansai signers favour variants that show the number of zeros in their form (‘Z variants’). A parallel investigation finds that the same variable patterns regionally in TSL: Taipei signers prefer NI variants and Tainan signers prefer Z variants, although there are striking differences, too. In JSL, for example, the trend described above is bucked by variants for ‘1000’ (Kanto signers prefer Z variants for ‘1000’), while in TSL, Taipei signers prefer Z variants for ‘100’. Sagara and Palfreyman contend that this is likely to be linked to frequency of use: it is surely no coincidence that the smallest bank notes in their respective currencies are ¥1,000 and NT\$100. Although the qualitative analysis is framed at the macro-social level, they also consider the way that these variables operate at the micro-level, which is discussed further in the next section.

2. Sign language variation at the macro and micro-level

As well as reflecting the sociolinguistic diversity of the region, the articles in this issue are united in considering SL variation at different sociological levels, building on the ‘waves’ of analytic practice identified by Eckert (2008). According to her schema, ‘first wave’ studies adopt essentialist approaches that deploy macro-sociological groupings (class, gender, age, and so on), while ‘second wave’ studies use ethnographic methods to investigate local groupings, but variation continues

to be regarded as marking social categories (Eckert, 2012). Social constructionist approaches that focus on situated social interaction constitute the 'third wave' of analytic practice.

Compared with theoretical and methodological advances by spoken language researchers, the study of SL variation 'is still in the relatively early stages' (Lucas & Bayley, 2016, p.340); while Labov's work began in the 1960s, the first large-scale SL study to be inspired by the classical Variationist tradition was Lucas, Bayley and Valli (2001). There is now a burgeoning body of 'first wave' work, applying macro-social categories such as region, age, gender and register (including de Beuzeville, Johnston, & Schembri, 2009; Fenlon, Cormier, & Schembri, 2014; Fenlon, Schembri, Rentelis, & Cormier, 2013; Lucas, Bayley, & Valli, 2001; McKee, Schembri, McKee, & Johnston, 2011; Palfreyman, 2019; Schembri & Johnston, 2007; and Stamp et al., 2014).

For the most part, however, the analytic practices of the second and third waves are still to be applied to sign languages; major studies of SL sociolinguistics 'have not yet examined any particular region's deaf community to the same depth that is common in ethnographic studies of spoken language variation and change' (Schembri & Johnston, 2013, p.519). Given the strong focus on the macro-social level to date, this issue brings the micro-level variation to the table as well, in the belief that a gentle shift in focus will act as a mild corrective to the field. This also offers the chance to consider how patterns in SL variation at macro and micro-social levels relate to each other.

For example, a grammatical variable in BISINDO (Palfreyman, this issue) can be observed at both macro and micro level. Ambar, a deaf woman from Solo, uses grammatical variation in a stretch of Constructed Action to colour the performances of the two roles that she enacts. In one of these roles, Ambar constructs dialogue from her older, hearing sister (who does not sign) and uses a variant that originates from co-speech gesture. In the other role, Ambar represents herself, and uses a suppletive variant that has grammaticalized within BISINDO (Palfreyman, 2019): this suppletive variant is arguably more 'deaf' than the co-speech gesture, which is associated with hearing people. Mixed effects modelling suggests that the realisation of this variable in 162 constructed action contexts is influenced by whether it is uttered by a hearing person or a deaf person (Palfreyman, 2019, p.240). If this practice can be observed at the micro-level, is it driven from the macro-level, or is it constructed *in situ* at the micro-level each time? This question can only be answered once studies on other, similar variables become available.

In seeking to apply quantitative methods to a micro-community SL, Mudd et al. (this issue) face an interesting methodological quandary: the macro-social categories typically used for such studies, such as region and age, do not seem to be relevant for the Kata Kolok community: geographically, Kata Kolok is used on a much smaller scale than languages such as American SL and Australian SL,

while all signers ‘live relatively close together and frequently interact, regardless of their age’. Therefore Mudd et al. must find ways to reflect language use at the micro-social level in their quantitative study: region is scaled down to the level of clan membership, and there are other differences too, such as the inclusion of hearing Kata Kolok users.

Sagara and Palfreyman apply quantitative methods using macro-social categories, but also consider the possibility that the variable under study might be linked with creating social identity. For example, Heinrich (2018, p. 176) describes hearing individuals in Japan who engage in what he terms ‘dialect cosplay’ – dialect is no longer necessarily a way to index one’s regional background; one can use a *nise hogen*, or ‘fake younger dialect’, to index a regional identity that is not one’s own. A few signers in the Japanese city of Kagoshima have adopted the Z variant from the Kansai region alongside their own local variant – given the association of Z variants with the Kansai, could this be an example of deaf *nise hogen*?

Macro/micro distinctions have often been used in linguistics (Fishman, 1972; Schegloff, 1987), and Layder (1994) regards ‘macro-micro’ as one of the key tensions on which social theorising has centred. Of course, inflexible compartmentalisation along macro and micro lines does not reflect the complex relationships between social and linguistic structures (Coulmas, 1997, p.3), and Heller (2001, p.212) is right to point out that empirical work fails to identify the different types of data that the macro-micro distinction implies.

Equally, however, a focus on macro/micro distinctions can move us towards a more satisfying explanation for what we see in the data. Sharma (2017) argues that the excessive focus on groups in variationist theorising has left some processes less easy to explain. If we allow for an intra-individual dimension to contrasts in indexicality (at the micro-level), a number of regular and common patterns become more explicable. The need to focus on intra-group variation is even more evident in highly multi-ethnic speech communities such as Kohima (Nagaland). Satyanath (2018, p. 110) suggests that group and individuals provide two complementary perspectives, even though at times these perspectives appear to be in conflict; while ongoing changes can be uncovered by looking at groups, the mechanisms of change cannot be fully understood without looking at individual behaviour.

Just as third wave approaches increase the set of analytic practices available to spoken language sociolinguists (Sharma, 2011, p.2), so is a similar expansion for SL research a necessary innovation, if we are to understand SL variation better. There have been encouraging moves in this direction. In their study of Black ASL, McCaskill, Hill, Bayley and Lucas (2011) find three phonological variables that are conditioned by ethnicity, and importantly, this work builds on community-based observations and anecdotes. As early as the 1980s, references are made to ‘a Black way of signing used by Black deaf people in their own cultural milieu’ (Hairston & Smith, 1983, p.55), implying that variables tracked at the macro-level may be used

as a resource to fashion ethnic identity. Another promising sign is Blau (2017), whose study on Deaf gay men in the San Francisco Bay Area finds that the frequent use of distal joints in the articulation of signs is a socially-conditioned variable, and can index gay identity. His suggestion that distalisation is 'a component of a particular linguistic style' (Blau, 2017, p.36) is a significant moment for the study of SL variation.

Crucially, in order to do work on variables, methodological innovation is necessary. Lucas and Bayley (2016) imply that ethnographic studies of smaller groups of signers are a natural follow-up to the large-scale variationist studies that have been undertaken to date. Gumperz (1982) concludes that socially situated data are necessary if we are to understand language patterns more clearly, and Palfreyman (this issue) notes that this may require sociolinguists to review the place of spontaneous data collected in well-equipped laboratories with the aim of compiling language corpora. In other words, we must think again about our data collection practices – to paraphrase Heller (2001, p.213), what interactions do we now need to focus on, and why, and how?

At this point, it is useful to acknowledge developments that have been taking place in the field of deaf anthropology. Sociolinguistics has long incorporated diverse methods and drawn from neighbouring fields (Coupland, 2016), and much of the recent work of linguistic anthropologists already pioneers the use of linguistic ethnography (Hou & Kusters, 2019). Indeed, by focusing on natural communicative practices in diverse sociolinguistic contexts, 'linguistic ethnography and linguistic anthropology expanded understandings of the actual diversity of deaf communicative practices in everyday sociolinguistic and sociocultural contexts' (Friedner & Kusters, 2020, p.38), and forthcoming studies on how language ideologies shape and are shaped by language practices (Kusters, Green, Moriarty Harrelson, & Snoddon, 2020) seem sure to provide further assistance to sign language sociolinguists.

In particular, engagement with translanguaging theory (García & Wei, 2014) has encouraged fresh investigation of communicative practices and a willingness to consider multimodal language use and linguistic repertoires (De Meulder, Kusters, Moriarty, & Murray, 2019). Although the language of variables and variation is not used, the scrutiny of repertoire is a sound approach to finding and understanding variation because it places high value on the agency and resourcefulness of the signer. Reed (this issue, p.45) observes how translanguaging licenses 'a bottom-up approach, looking first at users' idiolects, and then identifying the patterns that link those idiolects'. She notes that focusing on the individual will help to determine why certain signs go on to become more widespread due to signers who have influence in social networks. Her analytical practice leads to a more robust understanding of the linguistic variation in her situated data, as the signers of Port Moresby switch easily between one 'way of signing' and another.

3. Closing comments

The papers in this issue have their origins in the Symposium on Sociolinguistic Variation in Signed and Spoken Languages of the Asia-Pacific Region, held at the University of Central Lancashire (UCLan) in July 2019. This Symposium built on work that began with the sign language sessions at the third NWAV Asia-Pacific conference in Wellington, May 2014, and aimed to promote dialogue between academics working on variation in signed and spoken languages. One of the central conclusions that emerged from discussion during the Symposium was the importance of sharing research findings cross-modally and explaining the ways in which we work. With that in mind, the papers in this special issue seek to share recent research on SL variation in the Asia-Pacific region with a wider audience. Each paper also provides a link to a sign language version of the English abstract in addition to offering a non-English version in one of the local spoken languages.

Since its inception, the *Asia-Pacific Language Variation* journal has been committed to representing signed languages alongside spoken ones (Siu, 2016; Sze et al., 2015; Wei, Sze, & Wong, 2018), making it a fitting host for these papers. I would like to thank those who have contributed to this special issue in different ways. The articles that follow have benefited from a splendid team of peer reviewers, to whom all of the authors extend deep gratitude. I would like to acknowledge the backing I have received from UCLan, a fellowship from the Leverhulme Trust (ECF-216-795), and financial support from some attendees, making it possible to host the Symposium. My thanks to Miriam Meyerhoff and James Stanford for supporting the idea of a special issue, and Kelhouvinuo Suokhrie for assistance with copyediting. This special issue would not have transpired without the kindness, determination and encouragement of the general editor, Shobha Satyanath, to whom I am very grateful. The issue is dedicated to my mother, Margaret, and my partner's father, Gian Paolo, who died during its preparation and are much missed.

References

- Blau, Shane (2017). Indexing gay identities in American Sign Language. *Sign Language Studies*, 18(1), 5–40. <https://doi.org/10.1353/sls.2017.0019>
- Boyes Braem, Penny, & Sutton-Spence, Rachel (Eds.) (2001). *The hands are the head of the mouth: The mouth as articulator in sign languages*. Hamburg: Signum Press.
- Branson, Jan, & Miller, Don (1997). National sign languages and language policies. In Ruth Wodak & David Corson (Eds.), (1997). *Encyclopedia of language and education: Language policy and political issues in education*, volume 1, (pp. 89–98). Dordrecht: Kluwer Academic Publishers. https://doi.org/10.1007/978-94-011-4538-1_9

- Coulmas, Florian (1997). Introduction. In Florian Coulmas (Ed.), *The handbook of sociolinguistics* (pp. 1–11). Oxford: Blackwell.
- Coupland, Nikolas (2016). Introduction. In Nikolas Coupland (Ed.), *Sociolinguistics: Theoretical debates* (pp. 1–34). Cambridge: Cambridge University Press.
<https://doi.org/10.1017/CBO9781107449787.002>
- Cunningham, Denis, Ingram, D. E., & Sumbuk, Kenneth (Eds.) (2006). *Language diversity in the Pacific: Endangerment and survival*. Bristol: Multilingual Matters.
<https://doi.org/10.21832/9781853598685>
- de Beuzeville, Louise, Johnston, Trevor, & Schembri, Adam (2009). The use of space with indicating verbs in Auslan: A corpus-based investigation. *Sign Language and Linguistics*, 12(1), 53–82. <https://doi.org/10.1075/sll.12.1.03deb>
- De Meulder, Maartje, Kusters, Annelies, Moriarty, Erin, & Murray, Joseph J. (2019). Describe, don't prescribe. The practice and politics of translanguaging in the context of deaf signers. *Journal of Multilingual and Multicultural Development*, 40(10), 892–906.
<https://doi.org/10.1080/01434632.2019.1592181>
- de Vos, Connie (2011). Kata Kolok colour terms and the emergence of lexical signs in rural signing communities. *Senses and Society*, 6(1), 68–76.
<https://doi.org/10.2752/174589311X12893982233795>
- de Vos, Connie (2012). Sign-spatiality in Kata Kolok: How a village sign language of Bali inscribes its signing space. Doctoral dissertation, Max Planck Institute of Psycholinguistics, Nijmegen.
- de Vos, Connie, & Pfau, Roland (2015). Sign language typology: The contribution of rural sign languages. *Annual Review of Linguistics*, 1, 265–288.
<https://doi.org/10.1146/annurev-linguist-030514-124958>
- de Vos, Connie, & Zeshan, Ulrike (2012). Demographic, sociocultural and linguistic variation across rural signing communities. In Ulrike Zeshan & Connie de Vos (Eds.), *Sign languages in village communities: Anthropological and linguistic insights* (pp. 2–23). Lancaster: Ishara Press and Berlin: de Gruyter. <https://doi.org/10.1515/9781614511496.2>
- Dolman, David (1986). Sign languages in Jamaica. *Sign Language Studies*, 52, 235–242.
<https://doi.org/10.1353/sls.1986.0027>
- Eckert, Penelope (2008). Variation and the indexical field. *Journal of Sociolinguistics*, 12(4), 453–476. <https://doi.org/10.1111/j.1467-9841.2008.00374.x>
- Eckert, Penelope (2012). Three waves of variation study: The emergence of meaning in the study of sociolinguistic variation. *Annual Review of Anthropology*, 41, 87–100.
<https://doi.org/10.1146/annurev-anthro-092611-145828>
- Fenlon, Jordan, Schembri, Adam, Rentelis, Ramas, & Cormier, Kearsy (2013). Variation in handshape and orientation in British Sign Language: The case of the '1' hand configuration. *Language and Communication*, 33(1), 69–91.
<https://doi.org/10.1016/j.langcom.2012.09.001>
- Fenlon, Jordan, Cormier, Kearsy, & Schembri, Adam (2014). *Directional verbs as fusion of linguistic and gestural elements in British Sign Language: A corpus-based study*. Paper presented at the Fifth UK Cognitive Linguistics Conference, Lancaster University, UK, 29–31 July, 2014.
- Fishman, Joshua A. (1972). Domains and the relationship between micro- and macrosociolinguistics. In John J. Gumperz & Dell Hymes (Eds.), *Directions in sociolinguistics: The ethnography of communication* (pp. 437–453). New York, NY: Holt, Rinehart and Winston.

- Friedner, Michele, & Kusters, Annelies (2020). Deaf anthropology. *Annual Review of Anthropology*, 49, 31–47. <https://doi.org/10.1146/annurev-anthro-010220-034545>
- García, Ofelia, & Wei, Li (2014). *Translanguaging: Language, bilingualism and education*. Basingstoke: Palgrave Macmillan. <https://doi.org/10.1057/9781137385765>
- Goebel, Zane (2016). Superdiversity from within: The case of ethnicity in Indonesia. In Karel Arnaut, Martha Sif Karrebæk, Massimiliano Spotti, & Jan Blommaert (Eds.), *Engaging superdiversity: Recombining spaces, times and language practices* (pp. 251–276). Bristol: Multilingual Matters. <https://doi.org/10.21832/9781783096800-013>
- Gumperz, John J. (1982). *Discourse strategies*. Cambridge: Cambridge University Press. <https://doi.org/10.1017/CBO9780511611834>
- Hairston, Ernest, & Smith, Linwood (1983). *Black and deaf in America: Are we that different?* Silver Spring, MD: TJ Publishers.
- Heinrich, Patrick (2018). Dialect cosplay: Language use by the younger generation. In Patrick Heinrich & Christian Galan (Eds.), *Being young in super-aging Japan: Formative events and cultural reactions* (pp. 166–182). London: Routledge. <https://doi.org/10.4324/9781351025065-11>
- Heller, Monica (2001). Undoing the micro/micro dichotomy: Ideology and categorisation in a linguistic minority school. In Christopher N. Candlin, Nikolas Coupland, & Srikant Sarangi (Eds.), *Sociolinguistics and social theory* (pp. 212–234). Abingdon: Routledge.
- Hodge, Gabrielle, Ferrara, Lindsay N., & Anible, Benjamin D. (2019). The semiotic diversity of doing reference in a deaf signed language. *Journal of Pragmatics*, 143, 33–53. <https://doi.org/10.1016/j.pragma.2019.01.025>
- Hou, Lynn Y-S., & Kusters, Annelies (2019). Sign languages. In Karin Tusting (Ed.), *The Routledge handbook of linguistic ethnography* (pp. 340–355). Abingdon: Routledge. <https://doi.org/10.4324/97813515675824-25>
- Kegl, Judy, Senghas, Ann, & Coppola, Marie (1999). Creation through contact: Sign language emergence and sign language change in Nicaragua. In Michel de Graff (Ed.), *Language creation and language change: Creolization, diachrony, and development* (pp. 179–238). Cambridge, MA: MIT Press.
- Kusters, Annelies, Green, E. Mara, Moriarty Harrelson, Erin, & Snoddon, Kristin (Eds.) (2020). *Sign language ideologies in practice*. Lancashire: Ishara Press and Berlin, de Gruyter.
- Labov, William (1966). The linguistic variable as a structural unit. *Washington Linguistics Review*, 3, 4–22.
- Layder, Derek (1994). *Understanding social theory*. London: Sage.
- Lucas, Ceil, Bayley, Robert, & Valli, Clayton (2001). *Sociolinguistic variation in American Sign Language*. Washington, DC: Gallaudet University Press. <https://doi.org/10.1017/CBO9780511612824>
- Lucas, Ceil, & Bayley, Robert (2016). Quantitative sociolinguistics and sign languages: Implications for sociolinguistic theory. In Nikolas Coupland (Ed.), *Sociolinguistics: Theoretical debates* (pp. 349–366). Cambridge: Cambridge University Press. <https://doi.org/10.1017/CBO9781107449787.017>
- McCaskill, Carolyn, Hill, Joseph C., Bayley, Robert, & Lucas, Ceil (2011). *The hidden treasure of Black ASL: Its history and structure*. Washington, DC: Gallaudet University Press.

- McKee, Rachel (2019). *Motivation and innovation in indexing Māori identity in New Zealand Sign Language*. Presentation at the Symposium on Sociolinguistic Variation in Signed and Spoken Languages of the Asia-Pacific Region, University of Central Lancashire, 12–13 July, 2019.
- McKee, Rachel, Schembri, Adam, McKee, David, & Johnston, Trevor (2011). Variable “subject” presence in Australian Sign Language and New Zealand Sign Language. *Language Variation and Change*, 23(3), 375–398. <https://doi.org/10.1017/S0954394511000123>
- Meir, Irit, Sandler, Wendy, Padden, Carol A., & Aronoff, Mark (2010). Emerging sign languages. In Marc Marschark, Patricia E. Spencer, & Peter E. Nathan (Eds.), *Oxford handbook of deaf studies, language, and education*, volume 2, (pp. 267–280). Oxford: Oxford University Press.
- Meir, Irit, Israel, Assaf, Sandler, Wendy, Padden, Carol A., & Aronoff, Mark (2012). The influence of community on language structure: Evidence from two young sign languages. *Linguistic Variation*, 12(2), 247–291. <https://doi.org/10.1075/lv.12.2.04mei>
- Moriarty Harrelson, Erin, Cooper, Audrey C., dela Torre, Theresa Christine B., Domingo, Raphael, Palfreyman, Nick, & Tien, Nguyen Tran Thuy (2016). Asia, Southeast: Deaf community. In Genie Gertz & Patrick Boudreault (Eds.), *The SAGE deaf studies encyclopedia*. Sage Publications. <https://doi.org/10.4135/9781483346489>
- Nyst, Victoria (2012). Shared sign languages. In Roland Pfau, Markus Steinbach, & Bencie Woll (Eds.), *Sign language: An international handbook* (pp. 552–573). Berlin: de Gruyter. <https://doi.org/10.1515/9783110261325.552>
- Nyst, Victoria, Sylla, Kara, & Magassouba, Moustapha (2012). Deaf signers in Douentza, a rural area in Mali. In Ulrike Zeshan & Connie de Vos (Eds.), *Sign languages in village communities: Anthropological and linguistic insights* (pp. 251–276). Lancaster: Ishara Press and Berlin: de Gruyter. <https://doi.org/10.1515/9781614511496.251>
- Palfreyman, Nick (2016). *Sign language sociolinguistics and the ‘Third Wave’: The social significance of Javanese mouthings in an Indonesian city*. Presentation at the Theoretical Issues in Sign Language Research (TISLR 12), Melbourne, 4–7 January, 2016.
- Palfreyman, Nick (2019). *Variation in Indonesian Sign Language: A typological and sociolinguistic analysis*. Lancaster: Ishara Press and Berlin: de Gruyter. <https://doi.org/10.1515/9781501504822>
- Poplack, Shana, & Tagliamonte, Sali A. (2001). *African American English in the diaspora: Tense and aspect*. Malden: Blackwell.
- Satyanath, Shobha (2018). Kohima: Language variation and change in a small but diverse city in India. In Dick Smakman & Patrick Heinrich (Eds.), *Urban sociolinguistics: The city as a linguistic process and experience* (pp. 95–112). Abingdon: Routledge.
- Schegloff, Emanuel A. (1987). Between micro and macro: Contexts and other connections. In Jeffrey C. Alexander, Bernhard Giesen, Richard Munch, & Neil J. Smelser (Eds.), *The macro-micro link* (pp. 207–234). Berkeley, CA: University of California Press.
- Schembri, Adam, & Johnston, Trevor (2007). Sociolinguistic variation in the use of fingerspelling in Australian Sign Language: A pilot study. *Sign Language Studies*, 7(3), 319–347. <https://doi.org/10.1353/sls.2007.0019>
- Schembri, Adam, & Johnston, Trevor (2013). Sociolinguistic variation and change in sign languages. In Robert Bayley, Richard Cameron, & Ceil Lucas (Eds.), *The Oxford handbook of sociolinguistics* (pp. 503–524). Oxford: Oxford University Press.

- Schembri, Adam, Fenlon, Jordan, Cormier, Kearsy, & Johnston, Trevor (2018). Sociolinguistic typology and sign languages. *Frontiers in Psychology: Language Sciences*, 9(200). <https://doi.org/10.3389/fpsyg.2018.00200>
- Schembri, Adam, Cormier, Kearsy, Johnston, Trevor, McKee, David, McKee, Rachel, & Woll, Bencie (2010). Sociolinguistic variation in British, Australian and New Zealand Sign Languages. In Diane Brentari (Ed.), *Sign languages* (pp. 476–498). Cambridge: Cambridge University Press. <https://doi.org/10.1017/CBO9780511712203.022>
- Schembri, Adam, & Fenlon, Jordan (2019). *Making identity visible: In search of regional accents in sign languages*. Poster presentation, Twelfth UK Language Variation and Change conference, London, 3–5 September, 2019.
- Sharma, Devyani (2011). Style repertoire and social change in British Asian English. *Journal of Sociolinguistics*, 15(4), 464–492. <https://doi.org/10.1111/j.1467-9841.2011.00503.x>
- Sharma, Devyani (2017). *Unexpected indexicalities: Exploring micro and macro contexts of social meaning*. Presentation at the UK Language Variation and Change conference, 11, 29–31 August, 2017.
- Siu, Wai Yan Rebecca (2016). Location variation in Hong Kong Sign Language (HKSL). *Asia-Pacific Language Variation*, 2(1), 4–47. <https://doi.org/10.1075/aplv.2.1.01siu>
- Stamp, Rose, Schembri, Adam, Fenlon, Jordan, Rentelis, Ramas, Woll, Bencie, Cormier, Kearsy (2014). Lexical variation and change in British Sign Language. *PLOS ONE* 9(4), e94053. <https://doi.org/10.1371/journal.pone.0094053>
- Sze, Felix, Isma, Silva, Suwiryo, Adhika Irlang, Wijaya, Laura Lesmana, Bharato, Adhi Kusumo, & Satryawan, Iwan (2015). Differentiating ‘dialect’ and ‘language’ in sign languages: A case study of two signing varieties in Indonesia. *Asia-Pacific Language Variation*, 1(2), 190–219. <https://doi.org/10.1075/aplv.1.2.04sze>
- Volker, Craig A. (2015). The diversity of Asia-Pacific language ecologies. In Craig A. Volker & Fred E. Anderson (Eds.), *Education in languages of lesser power: Asia-Pacific perspectives* (pp. 1–12). Amsterdam: John Benjamins.
- Wei, Monica X., Felix Sze, & Wong, Aaron Y.L. (2018). Gender variation in signs of sexual behaviour in Hong Kong Sign Language, *Asia Pacific Language Variation*, 4(1), 1–35. <https://doi.org/10.1075/aplv.17002.wei>
- Woodward, James (2003). Sign languages and deaf identities in Thailand and Viet Nam. In Leila Monaghan, Constanze Schmaling, Karen Nakamura, & Graham H. Turner (Eds.), *Many ways to be deaf: International variation in deaf communities* (pp. 283–301). Washington, D.C.: Gallaudet University Press.