Concessive conditionals beyond Europe: A typological survey[1]

Tom Bossuyt (Ghent University)

Abstract

The present study is concerned with complex sentences known as concessive conditionals from a functional-typological perspective. It examines the coding strategies used in the protasis of the three subtypes of concessive conditionals – viz. scalar, alternative, and universal concessive conditionals – in a global sample of 17 languages, thus complementing a previous study of their formal properties in European languages (Haspelmath & König 1998). The results include some coding strategies which are unattested in European languages and suggest that Haspelmath & König's division between languages which mark the three subtypes uniformly and languages which mark them differentially is too simplistic, there being at least four overall marking patterns rather than two. Although these results are only preliminary in nature, they do look promising for future research, which should be based on a larger and more strictly stratified sample.

Keywords: concessive conditionals, subordination, complex sentences, linguistic typology

1. Introduction

The present study is concerned with complex sentences known as concessive conditionals from a functional-typological perspective, focusing in particular on their subordinate clauses. The aim is to give a preliminary overview of how concessive conditionals are encoded in a small but global sample of languages. Three subtypes of concessive conditionals are usually distinguished in the functional-typological literature (e.g. Haspelmath & König 1998; König 1986; Leuschner 2006), exemplified from English in (1)–(3):

English
(1) scalar concessive conditional (henceforth: SCC)
[***Even if*** *it rains*]*, we'll go outside.*
(2) alternative concessive conditional (ACC)
[***Whether*** *it rains* ***or*** *not*]*, we'll go outside.*
(3) universal concessive conditional (UCC)
[***Whatever*** (/***No matter what***) *the weather is like*]*, we'll go outside.*

The functional-typological tradition apart, concessive conditionals have also been widely studied in formal semantics, especially ACCs as in (2) and UCCs as in (3), which semanticists usually refer to as "unconditionals" (cf. Zaefferer 1987, 1991; Rawlins 2008, 2013; Ciardelli 2016, among others). More recently, concessive conditionals have also been studied in cognitive semantics (Duffley & Larrivée 2020) and construction grammar (d'Avis 2016; Oppliger 2018, Leuschner in press). While some of these studies are rich in detail, their claims

[1] I am grateful to the people who helped to improve this study: my supervisor Torsten Leuschner, Ellison Luk, who corresponded with me about concessive conditionals in Australian languages, and Denis Creissels, who provided me with some interesting data on Mandinka. Last but not least, I would like to thank the two anonymous reviewers who helped me improve the present paper in numerous ways.

and findings are almost entirely based on European languages, mostly English, considerably limiting their applicability for typological research (cf. Haspelmath 2010). This is why the present study largely adopts Haspelmath & König's (1998) definition of concessive conditionality, which was after all designed with cross-linguistic comparison in mind.

As the name suggests, concessive conditionals share certain functional-conceptual properties with both conditionals and concessives. Like prototypical conditionals, they link a protasis to an apodosis, but whereas the protasis of prototypical conditionals normally expresses one antecedent value ('if *p*, then *q*'), the protasis of concessive conditionals expresses a partially ordered set of antecedent values: 'if {p_1, p_2, p_3, …}, then *q*' (Haspelmath & König 1998: 565f.; Leuschner 2006: 19–23).[2] This set usually exhausts all contextually relevant possibilities, causing the consequent *q* in the apodosis to be entailed. Concessive conditionals are thus defined as *conditional constructions which express a contextually exhaustive set of antecedent values in the protasis*.

Each subtype employs a different quantificational strategy to express this basic meaning: SCCs overtly express a contextually extreme value from the set whilst implicating that the conditional relationship also holds for less extreme cases (e.g. someone who goes outside in the rain would also go outside in more favorable circumstances); ACCs use a disjunction to explicate two or more contrasting values (e.g. raining and not raining); and in UCCs the set is suggested by free-choice quantification over instantiations of a variable, which is usually realized as a word denoting an information gap (Bhat 2004), i.e. a question word or a form based on one.[3]

Like concessives proper ('although *p*, *q*'), concessive conditionals typically (but not always) entail their consequent *q* against a background of incompatibility. In other words: not only does the consequent hold under any condition contained in the antecedent set, this set usually includes at least one unfavorable condition p_n for which one would expect that 'normally (if p_n, then not *q*)' (cf. König 1986: 231–234; Leuschner 2006: 23–28), e.g. 'normally (if it rains, we won't go outside)' in (1)–(3). The difference is that concessives entail *p* as well as *q*, whereas concessive conditionals do not entail their protasis: *although it is raining* entails that it is, in

[2] This paraphrase applies to concessive conditionals based on conditional relationships at the content level, but *mutatis mutandis* also at the at the epistemic and illocutionary levels (in terms of Sweetser 1990). Examples cited henceforth represent mostly content-level, occasionally epistemic-level linkage. See Haspelmath & König (1998: 568–570) and Leuschner (2006: 28–30) for discussion of concessive-conditional linkage at the three levels.

[3] The present study adopts Haspelmath's (2010: 672) definition of "question word", viz. "a word that can be used as a question pronoun (or adverb), that is, to represent the questioned content in a content question". Note that "the definition does not assume that question words are restricted to the use as question pronouns, and this use does not even have to be their primary use" (ibid., with reference to Haspelmath 1997 and Bhat 2000).

fact, raining, whereas this is normally not the case with *even if it rains*. In cases where the unfavorable condition p_n is contextually given, the protasis may be interpreted as factive; the implicature of multiple antecedent values then disappears and the concessive conditional becomes equivalent to a concessive. Note, however, that such scalar readings are usually more prevalent in SCCs than in ACCs and UCCs. As Duffley & Larrivée (2020) point out, scalarity is not an intrinsic part of the semantics of UCCs and instead occurs only in certain circumstances – at least in English. Even so, scalar interpretations in concessive conditionals must be frequent or cognitively salient to some extent, since concessive-conditional connectives are one of the most important and recurrent sources of concessive connectives cross-linguistically (König 1988). While such concessive connectives can be derived both from SCCs and UCCs, UCC-derived concessives usually seem to involve 'how'-words originally interpreted in terms of a degree scale (König 1985: 274).[4]

Despite their shared nature as conditionals on the functional-conceptual overlap with concessivity, the formal marking of SCCs, ACCs, and UCCs is quite heterogeneous in many European languages, including English. Whereas English SCCs are based on conditionals (cf. *if*) with additional quantification (cf. *even*), English ACCs resemble embedded alternative interrogatives (cf. *whether*) and English UCCs resemble constituent interrogatives and free relatives (cf. the question word). These similarities are motivated by the fact that interrogatives and free relatives contain an information gap just like concessive conditionals.

In other languages, by contrast, the marking of the three subtypes is more uniform and more consistently conditional. In Turkish, for example, all three subtypes of concessive conditionals may be marked uniformly as conditionals (containing the conditional marker *-sA*[5]) with an additive focus particle (*dA* 'also/even') that evokes the multiplicity of antecedents in the protasis.[6]

Turkish (Menz 2016: 98)

(4) SCC

[*Ara-**sa**-k*	***da***]	*bul-ama-yacağ-ız.*
[search-COND-1PL	ADD]	find-NEG-FUT-1PL

[4] Examples of connectives that allow both SCC and concessive readings are Dutch *al*, Lithuanian *tegul*, and Malthese *għadli* (Haspelmath & König 1998: 585). Examples of concessive connectives that are historically derived from UCCs ('no matter how' > 'although') are Latin *quamvis* (Leuschner 2008) and Middle High German *swie* (De Groodt 2002); in such cases, a 'how'-based connective which used to express a free choice between possible antecedent values on a scale of degrees (e.g. *quam-vis* [how-you:want] 'no matter how, although') became conventionally associated with a single, factual value under which *q* would not normally be expected to hold.

[5] The capitalization of *A* in *-sA dA* indicates that these Turkish morphemes are subject to vowel harmony: /a/ occurs with back vowels (*-sa da*), /e/ with front vowels (*-se de*).

[6] Note, however, that languages may have multiple coding strategies for one or more subtypes of concessive conditionals. Turkish is a case in point and has an alternative coding strategy for each subtype (cf. below, §3.2.4, §3.3.6., and examples (46)–(51) in §4.2.).

'Even if we look (for her), we will not find (her).'

(5) ACC
[*Ara-**sa**-k* ***da*** *ara-ma-**sa**-k* ***da***]
[search-COND-1PL ADD search-NEG-COND-1PL ADD]
bul-ama-yacağ-ız
find-NEG-FUT-1PL
'Whether we look (for her) or not, we will not find (her).'

(6) UCC
[***Ne*** ***kadar*** *ara-**sa**-k* ***da***] *bul-ama-yacağ-ız.*
[how much search-COND-1PL ADD] find-NEG-FUT-1PL
However much we look (for her), we will not find (her).'

Henceforth, concessive conditionals in languages like English will be called "differentially marked" and those in languages like Turkish will be called "uniformly marked".[7]

Cross-linguistic structural variation in concessive conditionals, as in (1)–(3) and (4)–(6), was previously investigated by Haspelmath & König (1998) with regard to 42 European languages. Concessive conditionals in non-European languages, by contrast, remain severely under-investigated, there being only a handful of language-specific studies (e.g. AnderBois 2014 on Yucatec Maya; Fujii 1994 on Japanese; Kim 2015 on Korean). The present study preliminarily fills this research gap by providing an overview of coding strategies used to mark concessive conditionals in a small, but global sample of 17 languages, covering all linguistic macroareas (in the sense of Dryer 1992).

Methodological issues relating to the language sample are discussed in Section 2. Section 3 presents the different coding strategies found in the sample for each subtype (SCCs §3.1., ACCs §3.2., UCCs §3.3.). Generalizing remarks and a comparison with the findings of Haspelmath & König (1998) are provided in Section 4. Finally, Section 5 contains a summary of the findings of present study and directions for future research.

2. Language sample

When investigating concessive conditionals cross-linguistically, the researcher is faced with a practical challenge: information on them is not readily available in most descriptive reference grammars and the number of language-specific studies is very limited (cf. above). Even grammars with a specific subchapter dedicated to concessive conditionals rarely provide examples of all three subtypes (e.g. Forker 2020 on Sanzhi Dargwa; Kibrik 1996 on Godoberi;

[7] Logically speaking, up to five ways of differential and/or uniform marking across all three concessive-conditional subtypes are possible. These will be discussed in §4.2. Languages marking the subtypes of concessive conditionals uniformly will then be referred to as "type-1 languages" and languages marking the subtypes of concessive conditionals as differentially "type-5 languages". Note that since languages may have multiple coding strategies for certain subtypes of concessive conditionals (e.g. Turkish, cf. footnote 6 and further below in §4.2.), a language can belong to multiple types at the same time.

Liljegren 2016 on Palula; Sandman 2016 on Wutun, most of which only discuss SCCs). The present pilot study is therefore based on a small convenience sample consisting of languages for which information was readily available to the researcher rather than on a larger variety sample, which remains as a challenge for future research.[8] Nevertheless, care has been taken to include languages from each of the six linguistic macroareas in the sense of Dryer (1992), viz. Africa, Australia & Oceania, Eurasia, North America, South America, and Southeast Asia & Oceania, making it a truly global sample, despite its obvious shortcomings. Care has also been taken not to excessively overrepresent any macroarea or language family, which is why the sample is considerably smaller (n = 17) than it could have been: many more Eurasian, Southeast Asian, and African languages could have been included in the sample (e.g. Spanish, Russian, Khmer, and Amharic, to name but a few), but this would only have skewed the sample even more (cf. further below).

The sample consists of the following languages per macroarea (genealogical affiliation according to Glottolog, cf. Hammarström et al. 2020):

Africa (*N* = 3)
Kanuri (Saharan)
Mandinka (Mande)
Sheko (Dizoid)
Australia & New Guinea (*N* = 2)
Bagandji (Pama-Nyungan)
Mauwake (Nuclear Trans New Guinea)
Eurasia (*N* = 4)
German (Indo-European)
Japanese (Japonic)
Tamil (Dravidian)
Turkish (Altaic)
North America (*N* = 3)
Veracruz Huasteca Nahuatl (Uto-Aztecan)
West Greenlandic (Eskimo-Aleut)
Yucatec Maya (Mayan)
South America (*N* = 2)
Huallaga Quechua (Quechuan)
Kwaza (Kwaza)
Southeast Asia & Oceania (*N* = 3)
Mandarin Chinese (Sino-Tibetan)
Rapanui (Austronesian)
Vietnamese (Austroasiatic)

[8] As Song (2018: 88) points out, convenience samples like the present one may be used legitimately in pilot studies in order to explore whether a certain phenomenon in worth further, more systematic investigation, which is precisely what the present study aims to do.

Note that the languages in the sample do not need to be representative of their respective language families (i.e. a "typical example" of a language of that family). The fact that they all belong to different families merely ensures maximal independence of data points within the limits of what is practically achievable and eliminates genealogical affiliation as a confounding variable. In order to minimize areal effects, languages that are spoken in non-adjacent areas within their respective macroarea were chosen, with the exception of Veracruz Huasteca Nahuatl and Yucatec Maya, which are spoken relatively close to each other in Mexico.

Note also that Eurasian languages (and, to a lesser extent, African and Southeast Asian languages) are overrepresented in the present sample, whereas Australian & New Guinean, Oceanian, and South American languages are underrepresented. Coverage of concessive-conditional subtypes is incomplete for Rapanui, Bagandji, Mauwake, and Kwaza (and for any other language spoken in their respective macroareas). For Rapanui, information on UCCs is missing; for Mauwake and Kwaza, no data on ACCs was found. No data on more than one subtype could be found for any Australian language – eventually, Bagandji, for which an example of a UCC is given in Hercus (1982), was selected for the sample. Moreover, the sample contains too few language isolates, viz. only Kwaza. Because of this general lack of representativeness, few quantitative claims will be made in the present study and no statistical tests will be performed. Instead, this study aims (i) to give an exploratory overview of the coding strategies used in concessive conditionals in the languages of the sample, (ii) to explain the functional motivation behind them, and (iii) to compare the results with those from Haspelmath & König (1998), whose systematic results were based on a larger, but exclusively European sample, with only anecdotal reference to non-European languages.

3. Coding strategies

This section provides a typological classification by subtype (SCCs in §3.1., ACCs in §3.2., and UCCs in §3.3.) of the coding strategies found in the languages in the sample. Per subtype, all coding strategies are briefly described and exemplified.

3.1. Scalar concessive conditionals

Four coding strategies for SCCs were found in the languages of the sample: SCCs that are structurally identical to conditionals (§3.1.1.), SCCs that consist of a conditional clause plus a focus particle (§3.1.2.), SCCs that have their own specialized marker meaning 'even if' (§3.1.3.), and SCCs that have a marker without a clearly identifiable conditional component which may also occur in concessives (§3.1.4.).

3.1.1. Identical to conditional

Mauwake is an example of a language which uses the same coding strategy to express 'if'-conditionals and 'even if'-SCCs, cf. (7)–(8).[9] In other words, the scalar 'even if'-reading can only be derived from the context of the utterance, not from morphological cues. In Mauwake, antecedents in both conditionals and SCCs are marked by the clitic *=na*, which also occurs as a topic marker (cf. Haiman 1978 on the cross-linguistically recurrent overlap between conditional and topic markers).

Mauwake (Berghäl 2015: 379–380)

(7) conditional
[*Wia* *uruf-i-nan=**na***] *wia* *maak-e.*
[3PL.ACC see-NPST-FUT.2SG=TOP] 3PL.ACC tell-IMP.2SG
'If you (happen to) see them, tell them.'

(8) SCC
[*Naap* *yia* *ma-ikun=**na***] (*nain* *pun*) *ni*
[thus 1PL.ACC say-FUT.3PL=TOP] that too 2PL
kekan-ep *sira* *eliwa* *ook-eka.*
be.strong-SEQ custom good follow-IMP.2PL
'Even if they talk about us like that, be strong and follow the good custom.'

This coding strategy is not found in Haspelmath & König's (1998) sample. English *if*-clauses can have SCC readings in certain contexts with the right intonation; an example from the Pixar-film *Up!* (2009) is *I am going to Paradise Falls if it KILLS me!*. Such cases are rare and contextually restricted, however. Mauwake is an interesting case because formal identity with regular conditional antecedents seems to be the only coding strategy for SCCs in this language. The apparent cross-linguistic rarity of this strategy is likely to be functionally motivated, as the latter requires the addressee to rely on world knowledge in order to infer whether the concessive presupposition 'normally (if p_n, then not q)' is licensed or not. Presumably, this is why Mauwake allows quantificational *nain pun* (lit. 'that too') to be added in the apodosis, as in (8), in order to strengthen the SCC reading in case it cannot easily be inferred from the context (Berghäl 2015: 380).

3.1.2. Conditional clause plus focus particle

SCCs consisting of a conditional clause plus a focus particle are very common in Haspelmath & König's (1998) sample of European languages. The focus particles in such SCCs signal that the protasis is a contextually extreme case, licensing the 'normally (if p_n, then not q)' reading.

[9] Berghäl (2015: 380) calls the sentence in example (8) a "concessive". In the absence of further contextual cues, however, it seems reasonable to analyze this example as an SCC, given that the speaker advises the addressee to act in a certain manner in the case of a hypothetical future event (cf. future tense marker *-ikun* [FUT.3PL] in the main verb of the protasis), which is semantically more compatible with SCCs than with concessives.

It is usually either a scalar-additive particle like English *even* and French *même* or an additive 'also'-particle which allows for a scalar-additive 'even'-reading in certain contexts like German *auch* and Italian *anche*.

SCCs consisting of a conditional clause plus a focus particle basically take either of two shapes. In some languages, including English (1), such SCC connectives consist of a conditional marker in clause-initial position preceded by the focus particle; in other languages, such as Turkish (4), SCCs consist of a clause-final conditional marker, which follows or attaches to the verb, followed by the focus particle. In the present sample, German *auch wenn* 'even if', Mandinka *hání níŋ* 'even if', and Yucatec Maya *kex wáa* 'even if' belong to the former type:

Yucatec Maya (AnderBois 2014: 2)

(9) [***Kex*** ***wáa*** *k'áax-ak* *ja'-e'*] *ma'atan* *in* *ch'u'ulul.*
[even if fall-SBJV water-TOP] not 1.NOM get.wet
'Even if it were raining, I wouldn't get wet.'

Huallaga Quechua, Japanese, Tamil, Turkish, and West Greenlandic belong to the latter type. SCCs in these languages consist of a clause-final general or conditional converb followed by an additive focus particle.

Huallaga Quechua (Weber 1989: 303)

(10) [*Qam-ta* *apari-**pti**-:-**pis***] *mana-mi* *chaya-shun-chu.*
[you-OBJ carry-CVB-1.POSS-ADD] not-DIR arrive-1PL.FUT-NEG
'Even if I carry you, we will not arrive.'

Slightly different word-order patterns are found in Rapanui and Sheko. Rapanui has a clause-initial conditional marker, followed by the focus particle *atu*[10] in SCCs:

Rapanui (Kieviet 2017: 569)

(11) [***Ka*** *rahi* ***atu*** *tā'aku* *poki*],
[COND many away POSS.1SG child]
e *hāpa'o* *nō* *e* *au* *'ā.*
IPFV care.for just AG 1SG IDENT
'Even if I have many children, I will care for them myself.'

Sheko uses clause-final conditional converbs to express conditionality, but the focus particle *k'arà* (or one of its many forms), which is used in SCCs, is usually attached to nouns rather than to verbs:

Sheko (Hellenthal 2010: 364)

(12) [*ʃẽʔī-**k'erà*** *ás-kà* *ha=ʃìʃ-**ǹtà***] *ārt-ʃ'ñār=á-k'y-á-m-ə*
[stone-ADD 3SG.M-IN 2sg=ADD-COND] tear-NEG=3SG.M-remain-put-IRR-STI

[10] The occurrence of *atu* (lit. 'away') in this context is probably derived from its function as a marker of extent or emphasis (Kieviet 2017: 356–357). The original deictic meaning 'away from the deictic center' is metaphorically extended to 'beyond what is common or expected', hence its occurrence as a scalar focus particle in SCCs.

‘Even if you add a stone in it, it will not break.’

3.1.3. Specialized marker meaning ‘even if’

The use of a special marker for SCCs is “extremely rare in European languages” (Haspelmath & König 1998: 584) and, in fact, unattested among the 42 languages in Haspelmath & König’s sample. It is, however, found in two languages of the present sample. Both Mandarin Chinese *jíshǐ* (or *jiùshi*) and Veracruz Huasteca Nahuatl *yonke* are clearly distinct from both ‘if’-conditional markers in their respective languages (Mandarin Chinese *rúguǒ* and Veracruz Huasteca Nahuatl *tlan* ‘if’) and from purely concessive markers (Mandarin Chinese *swēi rán* and Veracruz Huasteca Nahuatl *panniman* or *maske* ‘even though’; cf. Bisang 1998 and Olguín Martínez 2016, respectively). From a purely synchronic perspective, these markers thus specialize for SCCs only.

Veracruz Huasteca Nahuatl (Olguín Martínez 2016: 101)

(13) [***Yonke*** *ti-tlachpana-s* *cal-ihtic*],
[even.if 2SG-clean-FUT house-inside]
amo *ti-ia-s* *ilhui-tl.*
NEG 2SG-go-FUT party-ABS
‘Even if you clean the house, you won’t go to the party.’

3.1.4. Connective without conditional component, also used in concessives

In some languages, SCCs are marked by a connective that has no clearly distinguishable conditional component (much like Mandarin Chinese *jíshǐ* and Veracruz Huasteca Nahuatl *yonke*), but allows both SCC and concessive readings. Vietnamese, Kwaza, and Kanuri belong to this type. In Vietnamese, the connective is clause-initial, in Kwaza and Kanuri it is clause-final.

Vietnamese (Bystrov & Stankevich 2012: 330)

(14) [***Dẫu*** *ngày mai có xách bị đi ăn*]
[even.if day tomorrow have carry bag go eat]
thì hôm nay vẫn phải có đầy tớ
then day this all.the.same must have servant
‘Even if tomorrow I have to beg for a living, I must have a servant today.’

Kwaza (van der Voort 2004: 631)

(15) [*atsu’ka* *he’dy-a-**hỹ**=**wara***] *ja-‘he-ỹ-rydy-ki*
[sugar mix-1PL-NMLZ=even.if] eat-NEG-ATT-IRR-DECL
‘Even if we had put in sugar, he would not have eaten it.’

Note that not only the connectives, but also the verb forms in Vietnamese, Kwaza, and Kanuri SCCs and concessives are identical, whereas in European languages of this type (e.g. with Finnish *vaikka* and Spanish *aunque*, Haspelmath & König 1998: 585), there is often a difference

in verb mood between the two: SCCs tend to be in the subjunctive, whereas concessives tend to be in the indicative (ibid.).

3.2. Alternative concessive conditionals

Six coding strategies for ACCs were found: ACCs may be based on conditionals or SCCs (§3.2.1.); they may be based on (embedded alternative) interrogatives like English *whether … or …* (§3.2.2.); they may be marked by subjunctive or optative mood (§3.2.3.); by a certain verb form meaning '(you) want' (§3.2.4.); by an explicit expression of irrelevance (§3.2.5.); and, finally, they may contain a specialized connective which occurs only in ACCs (3.2.6.).

3.2.1. Based on conditionals

Among conditional-based ACCs, two types can be distinguished: those that consist of two (or more) juxtaposed or coordinated conditional antecedents, and those based on SCCs rather than prototypical conditionals. Rapanui (*ka … ka …* 'if … if …') and Veracruz Huasteca Nahuatl (*tlan … tlan …* 'if … if …') belong to the former type.

Rapanui (Kieviet 2017: 332)

(16) *O te ta'ato'a mahana te*
of ART all day ART
aŋa nei e aŋa era
work PROX IPFV do DIST
[***ka*** *rohirohi,* ***ka*** *ta'e rohirohi*].
[COND tired.RED COND CONNEG tired.RED]
'The work was done every day, whether (you were) tired or not.'

Kanuri belongs to the latter type, i.e. it is an example of a language in which ACCs are formed by juxtaposing SCCs.

Kanuri (Hutchison 1981: 288)

(17) [*Lènə́-m-ìn* ***yàyé*** *lènâ-m-bâ* ***yàyé***],
[go-2SG-IPFV even.if go-2SG-NEG even.if]
lámbí-nyí bâ.
care-NEG.COMPL NEG
'Whether you go or whether you don't go, I don't care.'

This strategy is also found in many languages in which SCCs contain a clause-final conditional marker followed by an additive focus particle (cf. (10) in §3.1.2.), e.g. Huallaga Quechua, Sheko, Tamil, Turkish, West Greenlandic, and Japanese.

Japanese (Fujii 1994: 196)

(18) [*Benkyoo si-**te** **mo** si-na-**kute** **mo***],
[study do-COND ADD do-NEG-COND ADD]
doose dame daroo.
anyway bad MOD

‘Whether I study or not, it will be bad anyway.’ [i.e. ‘I won’t pass’]

3.2.2. Based on (embedded) conditionals

ACCs based on (embedded) interrogatives are common in European languages, e.g. in English (cf. above), Russian, Irish, Icelandic, Dutch, and Latvian (Haspelmath & König 1998: 596–597). By contrast, only one language in the present sample belongs to this type. It happens to be the only Standard Average European language in the sample, viz. German. In this language, the first disjunct is introduced by the complementizer *ob* ‘whether’, which is also used in embedded alternative interrogatives.

German

(19) [***Ob*** *es* *morgen* *regnet* ***oder*** *nicht*],
[whether it tomorrow rains or not]
wir *gehen* *spazieren.*
we go walk
‘Whether it rains tomorrow or not, we’ll go for a walk.’

Whereas formal semanticists such as Zaefferer (1991) have suggested that ACCs are encoded by interrogative morphology in most languages, the present study suggests that ACCs based on conditionals as in §3.2.1. may actually be more common. Even so, more research will be needed to verify this.

3.2.3. Marked by subjunctive or optative

In some languages, ACCs lack connectives altogether and instead consist of juxtaposed or coordinated antecedents in the subjunctive or optative mood. This coding strategy is relatively common in European languages, e.g. in Armenian, Spanish, Irish, Finnish, and Belorussian (Haspelmath & König 1998: 598–599). Outside Europe, Yucatec Maya also belongs to this type.

Yucatec Maya (AnderBois 2014: 15)

(20) [*K’aax-**ak*** *ja’* ***wa*** *p’il-**ik*** *k’iin-**e’***]
[come-SBJV water or shine-SBJV sun-TOP]
layli’ *ki’imak* *in* *wóol.*
still happy 1.NOM soul
‘Whether it rains or the sun shines, I will be happy.’

3.2.4. Marked by ‘(you) want’

ACCs may be introduced by an expression that means ‘(you) want’ in certain languages. Some European languages of this type include Hungarian, Ossetic, and Georgian (Haspelmath & König 1998: 599–600). This strategy is found in only one language in the present sample, viz. Turkish:

Turkish (Menz 2016: 92, fn. 7)

(21) [***İster*** *hoş-umuz-a* *git-sin* ***ister*** *git-me-sin*]
[want liking-1PL.POSS-DAT go-IMP want go-NEG-IMP]
marka-lar […] *birçok* *işlev* *üstlenir.*
brand-PL many function fulfill
'Whether we like it or not, brands fulfill a lot of functions.'

3.2.5. Marked by an expression of irrelevance

In certain languages, ACCs are introduced by an explicit expression of irrelevance, meaning something like 'no matter' or 'all the same'. This strategy occurs e.g. in Romani and Norwegian, but is relatively uncommon in European languages overall (Haspelmath & König 1998: 601). In the present study's sample, it is found in German *egal* ('no matter'), Yucatec Mayan *mix ba'al ti'* (lit. 'not even a thing'), and in Mandarin Chinese, which introduces ACCs by one of the following expressions of irrelevance: *bùnguǎn*, *bùlùn*, or *wúlùn* (all 'no matter'). The latter are mostly interchangeable, with the latter being a bit more literary (Bisang 1998: 786). *Bùnguǎn* consists of the negator *bù* 'not' the verb *guǎn* 'be concerned with, bother about, mind'; *bùlùn* consist of the negator followed by *lùn* 'discuss, talk'; *wúlùn* consists of Classical Chinese *wú* 'there is not' and *lùn* (ibid.).

Mandarin Chinese (Bisang 1998: 786)

(22) [***Bùnguǎn*** *wǒ-men* *dé* *dào*
[no.matter 1-PL get arrive
háishi *dé* *bu* *dào* *rènhé* *zīzhù*],
or get NEG arrive any financial.support]
wǒ-men *dōu* *yào* *jìnxíng* *wǒ-men* *de* *jìhuà.*
1-PL all will carry.on 1-PL ATTR support
'Whether we get any financial support or not, we will go ahead with our project.'

3.2.6. Special connective

Finally, ACCs may be introduced by a connective that is used exclusively in this clause type. This coding strategy seems to be uncommon in the languages of the world: it is unattested in Haspelmath & König (1998) and found in only one language in the present sample, viz. Mandinka. In Mandinka ACCs, *wǒo* is obligatorily repeated after each disjunct.

(23) Mandinka (Creissels & Sambou 2013 : 492)
[*Í* *làfí-tà* ***wǒo***, *í* *máŋ* *làfí* ***wǒo***],
2SG want-COMPL FCI 2SG COMPL.NEG want FCI
í *ñân-tá* *táa-lá* *jěe.*
2SG must-COMPL go-INF there
'Whether you want or not, you must go there.'

Wǒo is homonymous with a distal demonstrative meaning 'that (one)', but this homonymy is likely to be accidental (Denis Creissels, p.c.). Instead, *wǒo* is more likely to be derived from

the free-choice determiner *wóo* or *wô*, from which it is differentiated by tone, as in *N wô N* 'any N' (where *N* stands for 'noun'). Free-choice *wóo* or *wô* is also found in Mandinka UCCs (cf. §3.3.7.), thus showing considerable formal and functional similarities to the ACC connective. However, they differ not only in tone, but also in positional distribution: UCC *wóo*/*wô* occurs between two identical nouns (cf. below), whereas ACC *wŏo* is clause-final as in (23).

3.3. Universal concessive conditionals

UCCs are the most structurally diverse subtype of concessive conditionals in the present sample, as indeed in Haspelmath & König (1998). Even so, nearly all UCCs contain a question word (Haspelmath & König 1998: 604). Seven coding strategies for UCCs are found in the present sample. In most languages, UCCs contain some sort of "irrelevance particle", i.e. a quantificational particle which "signal[s] a free choice in the selection of values for a variable in the protasis" (König 1986: 231). This particle may occur in one of several positions: it may occur on or after the verb (§3.3.1.); it may follow the question word (§3.3.2.); or it may precede it (§3.3.3.). In some languages, however, UCCs lack irrelevance particles altogether. They may instead be marked by reduplication (either of the question word or of the verb; §3.3.4.); by subjunctive, conditional, or optative mood (§3.3.5.); or by an explicit expression of irrelevance (§3.3.6.). Lastly, some UCCs in certain languages do not involve a question word at all (§3.3.7.).

3.3.1. Particle on or following the verb

Irrelevance particles may occur in different positions, the first one being as a clitic or affix on the verb or as a separate word following the verb. In Europe, this coding strategy occurs in verb-final languages, e.g. Caucasian languages such as Lezgian and Kalmyk (Haspelmath & König 1998: 607–608). Similarly, this coding strategy is found in verb-final languages like Huallaga Quechua, Japanese, Turkish, and Tamil in the present sample. In Tamil, the focus particle *-um* follows the clause-final conditional converb:

Tamil (Lehmann 1993: 283)

(24) [*evvaḷavu* *neeram* *aa-**n̲·aal-um***]
[how.much time become-COND-ADD]
naan̲ *iṅkee* *kaattiru-pp-een̲*
I here wait-FUT-1SG
'No matter how long it takes, I will wait here.'

Languages in which the irrelevance particle occurs on the verb as a prefix rather than as a suffix, such as Lithuanian *WH … be-V* (Haspelmath & König 1998: 608), are not found in the present sample.

3.3.2. Particle following the question word

In the majority of languages in Haspelmath & König (1998), the irrelevance particle follows the question word, be it as a free morpheme, a clitic, or a suffix. German, English, French, and Spanish all adopt this strategy. Non-European languages that encode their UCCs in this way include Sheko and West Greenlandic.

Sheko (Hellenthal 2010: 415)

(25) [***yírà-k'arà*** *há=fòòt-**ǹtà***] *ɳ=óóʈʃ'-á-m-ə*
[what-ADD 3SG.M=happen-COND] 1SG=ask-PUT-IRR-STI
'Whatever happens, I'll ask.'

3.3.3. Particle preceding the question word

Irrelevance particles may precede the question word in UCCs rather than following it. European languages of this type are Romanian and Latvian (Haspelmath & König 1998: 614); languages with this strategy in the present sample include Vietnamese, Yucatec Maya, and Veracruz Huasteca Nahuatl.

Veracruz Huasteca Nahuatl ([Olguín Martínez 2016: 98])

(26) [***Zan katlia*** *ti-kuah-s*], *ti-mayana-s.*
[only which 2SG.SBJ-eat-FUT] 2SG.SBJ-be.hungry-FUT
'Whatever you eat, you will be hungry.'

3.3.4. Reduplication

In certain languages, UCCs do not have any irrelevance particles, but are instead marked by reduplication of either the question word or the verb in the protasis. Reduplication of the question word is found in Latin (e.g. *quid-quid* [who-who] 'whoever'), while reduplication of the verb is found in Southern Italian varieties like Sicilian (e.g. *unni vaju vaju* [where I:go I:go] 'wherever I go') (Haspelmath & König 1998: 615). Reduplication is not very productive in European languages in general (Rubino 2013), however, and it therefore does not come as a surprise that this strategy is rather uncommon in Haspelmath & König (1998). In the present sample, reduplication of the question word is found in Bagandji UCCs:

Bagandji (Hercus 1982: 171)

(27) *gila* *yuri-wa-yiga-ayi,*
NEG hear-ASP-3PL.SBJ-1SG.OBJ
[***miŋa-miŋa*** *yawara* *ŋaḏu* *gulba-ra-na-ama*]
[what-RED word 1SG.ERG speak-TOP-PTC-2SG.OBJ]

‘They don’t understand me, whatever word (in Bagandji) I may be saying to you.’

This coding strategy appears to be relatively common in Australian languages: the exact same strategy is also found in Arabana (Hercus 1994: 129) and Wirangu (Hercus 1999: 91).

Reduplication of the verb is found in certain Japanese UCCs:

Japanese (Fujii 1994: 200)

(28) [*denwa o* ***kake-te*** ***mo*** ***kaketemo***]
[telephone ACC call-COND ADD RED]
tuuz-imas-en.
connect-POL-NEG
‘I never reach him no matter how often I call him.’

Note that the construction in (28) does not involve a question word (cf. §3.3.7.).

3.3.5. Marked by subjunctive, conditional, or optative mood

Like ACCs, certain UCCs may be marked by a special verb mood, e.g. the subjunctive, conditional, or optative. A European example of such a language is Spanish, e.g. *vaya adonde vaya* [go.SBJV.3SG to.where go.SBJV.3SG] ‘wherever (s)he goes’ (Haspelmath & König 1998: 616). A very similar strategy is found in Turkish:

Turkish (Haspelmath & König 1998: 617)

(29) [***Nereye*** *gid-er-se-m* *gid-**eyim***]
[where go-AOR-COND-1SG go-SBJV.1SG]
bin-i *bırak-ma-yacağ-ın.*
I-ACC leave-NEG-FUT-2SG
‘Wherever I go, you will never leave me.’

Note that Turkish UCCs may alternatively be marked by an additive particle following a conditional converb (cf. §3.3.1.). Although the same coding strategy is used in Turkish SCCs and ACCs (cf. (4)–(6)), it was apparently overlooked by Haspelmath & König (1998).

Kwaza UCCs contain only one verb (as opposed to the two verbs in the above Spanish and Turkish examples), which is marked by the conditional mood. This coding strategy is formally reminiscent of the one described in §3.3.1., but lacks an irrelevance particle.

Kwaza (van der Voort 2004: 241)

(30) [***di’lɛ*** *‘mã-hata-**kywy***] *ta’dy-xa-le* *tso’roi=o’nɛ-he-ky*
[who call-3>2-COND] yes-2-PRECOND run=come-NEG-NEG.IMP
‘Whoever calls you, don’t say “yes” and come running, no!’

3.3.6. Marked by an expression of irrelevance

Again like ACCs, UCCs may be introduced by an explicit expression of irrelevance in some languages, e.g. Irish *is cuma* ‘is irrelevant’ or Finnish *ihan sama* ‘all the same’ (Haspelmath &

König 1998: 618). Mandarin Chinese introduces UCCs the same way it does ACCs, viz. by means of an expression of irrelevance like *bùnguǎn*, *bùlùn*, or *wúlùn*.

Mandarin Chinese (Bisang 1998: 787)

(31) [***Bùlùn*** *wǒ-men* *qǔ-dé*
[no.matter 1-PL obtain-get
zěnyàng *de* *zīzhù*],
what.kind ATTR financial.support]
wǒ-men *dōu* *yào* *jìnxíng*
1-PL all will carry.on
wǒ-men *de* *jìhuà.*
1-PL ATTR support
'However much financial support we get, we will go ahead with our project.

Yucatec Maya UCCs, too, may be introduced by an expression of irrelevance, viz. *mix ba'al ti'* (lit. 'not even a thing about …') (AnderBois 2014: 3), and German UCCs may be introduced by a surprisingly wide variety of expressions of irrelevance, the most common one being *egal* 'no matter' (Vander Haegen 2019). This coding strategy is thus found in both UCCs and ACCs in all three languages.

3.3.7. No question word

Although the occurrence of question words appears to be near-universal feature of these UCCs, Haspelmath & König (1998) already point out some rare exceptions in European languages, which all involve gradable adjectives instead of a question word, e.g. German *so* + ADJ or Romance *per/por/pour* + ADJ + *que/che* (ibid.: 619).

In the present sample, WH-less UCCs are found in German (i.e. *so* + ADJ), Japanese (which uses verb reduplication, cf. (28) above), Vietnamese, and Mandinka. Whereas WH-less UCCs are peripheral in the former two languages, they seem to be the main coding strategy in the latter two. In Vietnamese, focus particles like *dù* may precede a noun or adjective rather than a question word if the noun or adjective is followed by the complex particle *đi nữa*:

Vietnamese (Bystrov & Stankevich 2012: 339)

(32) [***Dù*** ***lý do*** *gì* ***đi nữa***]
[even cause some EMPH]
nếu *các* *triệu chưńg* *xuất hiện*
if PL symptom appear
bạn *nên* *đưa* *con* *đi* *khám*
you must carry child go examine
'No matter what the cause is, if such symptoms appear, you must take the child to the doctor.

In Mandinka, the indefiniteness or free-choice determiner *wô* is placed in between two identical nouns. This *N wô N* strategy is used to express 'any N', where N stands for any noun. If this

noun is sufficiently generic in meaning, e.g. *dáa* 'place' or *fɛ́ŋ* 'thing', the meaning of the whole comes close to respectively 'wherever' and 'whatever', etc.

Mandinka (Creissels & Sambou 2013: 477)

(33) [*Í* *lafi-ta* *táa-lá* ***dáa*** ***wô*** ***dáa***],
[2SG want-COMPL go-INF place FCI place]
a *si* *í* *sambá* *jee.*
3SG POT 2SG take there
'Wherever you want to go, he'll take you there.'

4. Analysis and discussion

After presenting the coding strategies in Section 3., this section proposes generalizations over the results and compares the findings of the present study to those of Haspelmath & König (1998). Section 4.1. discusses how the attested coding strategies are functionally motivated and whether they share a common denominator. It also discusses which coding strategies are found where: do they occur in both the present study and Haspelmath & König's or do they seem to be restricted to specific linguistic areas? Section 4.2. discusses the patterns of differential and uniform marking across the three subtypes of concessive conditionals as a typological parameter, distinguishing five possible types, four of which are in fact represented among the languages in the present study and/or Haspelmath & König (1998).

4.1. Some generalizing remarks

Even given only a small sample, the encoding of concessive conditionality in the languages of the world varies considerably. Concessive conditionals take up an interesting intermediate position in functional-conceptual and syntactic space, overlapping with conditionals and concessives and, in the case of ACCs and UCCs in certain languages, interrogatives and free relatives. From a synchronic perspective, these formal overlaps are motivated by either of two basic semantic characteristics of concessive conditionals: conditionality and the multiplicity of antecedent values. From a diachronic perspective, the respective markers are recruited into concessive conditionals by way of conceptually similar clause types, i.e. conditionals on the one hand and gap-denoting interrogatives and free relatives on the other hand (Leuschner 2006); some concessive conditionals in turn develop into concessives (König 1985, 1988). Other recurring formal features of concessive-conditional protases are (scalar-)additive focus particles, free-choice items, reduplication, expressions of 'wanting' or irrelevance, and subjunctive/optative mood. All are functionally motivated as either speaker- or hearer-oriented strategies of quantification (cf. Haspelmath & König 1998: 600, 611) insofar as they evoke a set of less informative alternatives to the antecedent value, signal that the addressee may pick

an antecedent value at will, express indifference as to the choice of antecedent value with regard to the truth of the consequent, and/or mark the non-entailment of the protasis.

Whereas most of the coding strategies described in the present study are also found in Haspelmath & König's (1998) European sample, some are documented here for the first time: (i) SCCs that are formally identical to conditionals as the only option to express SCCs in a language (§3.1.1.), (ii) SCCs with a specialized connective (§3.1.3., as already hinted in Haspelmath & König 1998: 584), (iii) ACCs with a specialized connective (§3.2.6.), and (iv) WH-less UCCs as in Vietnamese and Mandinka (§3.3.7.). Unsurprisingly, all the languages that use these so-far undocumented coding strategies are spoken outside the Eurasian linguistic macroarea, viz. Mauwake and Kwaza in South America, Mandinka in Africa, and Vietnamese and Mandarin Chinese in Southeast Asia.

Only one coding strategy was found in Haspelmath & König's (1998) sample, but not in the present study, viz. UCCs marked by negation on the verb. UCCs are characterized by a negated main verb in certain Eastern European languages (Haspelmath & König 1998: 615–616), including Russian, Latvian, Udmurt, and Georgian, or languages which have been influenced by Eastern European languages, such as Yiddish and Hebrew. Haspelmath & König suggest that this pattern may have been borrowed from Russian or other Slavic languages. Since this coding strategy is not found in the present sample, it may indeed be areally restricted.

4.2. Uniform and differential marking in concessive conditionals

So far, only languages which mark *all* subtypes either differentially or uniformly have been compared, e.g. English and Turkish in (1)–(6). These are also the only marking patterns discussed systematically by Haspelmath & König (1998). Logically, however, up to five types of uniform/differential marking across all subtypes are possible: languages may mark all three subtypes uniformly ("type 1" in Table 1); they may mark SCCs and ACCs uniformly, but UCCs differently ("type 2"); they may mark SCCs and UCCs uniformly, but ACCs differently ("type 3"); they may mark ACCs and UCCs, but SCCs differently ("type 4"), and, finally, they may mark all subtypes differently ("type 5").

Table 1: Possible language types according to differential vs. uniform marking in concessive-conditional subtypes. = 'uniform marking', ≠ 'differential marking'.

	SCC	ACC	UCC
type 1	=	=	=
type 2	=	=	≠
type 3	=	≠	=
type 4	≠	=	=
type 5	≠	≠	≠

What is more, languages may have multiple coding strategies for one or more subtypes, further complicating the picture. European languages with multiple coding strategies for UCCs include English *WH-ever* vs. *no matter WH* and Spanish *WH-quiera* vs. *V:SBJV WH V:SBJV* (e.g. *vaya adonde vaya*, cf. §3.3.5. above). Any given language may thus have multiple sets of concessive conditionals that belong to different types.

Type-1 languages in the present sample, i.e. languages with uniform marking across all three subtypes, include Huallaga Quechua, Japanese, Tamil, and Turkish. Concessive conditionals are formed in a remarkably similar way in all these languages, i.e. by adding an additive focus particle to a conditional clause (cf. §3.1.2. for SCCs, §3.2.1. for ACCs, and §3.3.2. for UCCs). The conditional clause is marked by a general or conditional converb which occurs in clause-final position – in fact, all the above languages have SOV as their dominant word order. This language type is exemplified here by Tamil:

Tamil (Lehmann 1993: 282–284)

(34) SCC
[*maẓai* *pey-**t·aal-um***] *naaṅkaḷ* *veḷiyee* *viḷaiyaatu-**v**-oom*
[rain fall-COND-ADD] we outside play-FUT-1PL
'Even if it rains, we will play outside.'

(35) ACC
[*Kumaar* *iṅkee* *va-**nt·aal-um*** *naaṉ* *aṅkee* *poo-**ṉ·aal-um***]
[K. here come-COND-ADD I there go-COND-ADD
appaa·v-ukku·p *piṭi·kk-aa-tu*
father-DAT like-NEG-3SG.N
'Whether Kumar comes here or I go there, father won't like it.'

(36) UCC
[*yaar* *iṅkee* *va-**nt·aal-um***] *inta* *iṭa-tt-ai*
[who here come-COND-ADD] this place-OBL-ACC
avar-ukku·p *piṭi·kk-aa-tu*
he-DAT like-NEG-3SG.N
'No matter who comes here, he won't like this place.'

Concessive conditionals in Sheko also belong to type 1. The building blocks of Sheko concessive conditionals correspond to those in the languages mentioned above: the additive focus particle *k'arà* (or one of its variants) is added to a conditional clause (with a verb ending in *-ǹtà*). However, the word order in Sheko is considerably more flexible than in other type-1 languages, with the focus particle often attaching to nouns or question words rather than to the verb.

Sheko (Hellenthal 2010: 364, 366, 415)

(37) SCC
[*ʃẽʔī-**k'erà*** *ás-kà* *ha=ʃìǐf-**ǹtà***] *ārt-ʃ'nāār=á-k'y-á-m-ə*
[stone-ADD 3SG.M-IN 2SG=ADD-COND] tear-NEG=3SG.M-REMAIN-PUT-IRR-STI
'Even if you add a stone in it, it will not break.'

(38) ACC
[*há-fòòt-**ǹtà*** *fōōt-ārā* *há=kì-**ǹtà*** ***k'arà***]
[3SG.M-happen-COND happen-NEG 3SG.M=exist-COND ADD]
ɳ=kōō-m-ə
1SG=take-IRR-STI
'Whether it happens or not, I will accept it.'

(39) UCC
[***yírà-k'arà*** *há=fòòt-**ǹtà***] *ɳ=óótʃ"-á-m-ə*
[what-ADD 3SG.M=happen-COND] 1SG=ask-PUT-IRR-STI
'No matter what happens, I'll ask it.'

West Greenlandic is the only language in the present sample which belongs to type 2, i.e. to the type which uses a uniform coding strategy for SCCs and ACCs, but a different one for UCCs. Both SCCs and ACCs are formed by successively attaching to the verb stem a form of the concessive/adversative suffix *galuar* (glossed as 'but'), a conditional suffix, and the clitic *luunniit* 'also/even'.

West Greenlandic (Fortescue 1984: 68, 123)

(40) SCC
urni-ssa-nngil-akkit [*akili-**ralua-rumma**=**luunniit***] (*naamik*)
come-FUT-NEG-1SG>2SG.IND [pay-but-2SG>1SG.COND=ADD] (no)
'I won't come to you, even if you pay me.'

(41) ACC
*ullu-u-**galuar-pat*** *unnua-a-**galuar-pal**=**luunniit***
day-be-but-3SG.COND night-be-but-3SG.COND=ADD
'whether it is day or night'

In UCCs, by contrast, *luunniit* is attached to the question word rather than to the verb, much like in Sheko. The crucial distinction, however, is that West Greenlandic UCCs are in a different mood than their SCC and ACC counterparts: whereas the latter both take the conditional mood (cf. directly above), UCCs take the so-called "Contemporative Mood" (Fortescue 1984). West Greenlandic therefore belongs to type 2, not type 1.

West Greenlandic UCC (Fortescue 1984: 67)

(42) [*su-mil=**luunniit*** *puuqattaq* *manna* *immir-niqa-**raluar-luni***]
[what-INS=ADD bag this fill-PASS-but-4SG.CONTP]
qarturar-niq *ajur-puq*
burst-NMLZ cannot-3SG.IND
'Whatever you fill this bag with, it won't burst.'

Type-3 languages are not represented in the present sample. More research is needed to determine whether this is a coincidence or whether this language type is cross-linguistically rare or perhaps even nonexistent, i.e. whether it constitutes a typological gap and if so, why.

Type-4 languages, by contrast, are attested: in Mandarin Chinese, for example, SCCs are marked by a special connective, while both ACCs and UCCs are introduced by the explicit expression of irrelevance *bùnguǎn*, *bùlùn*, or *wúlùn*.[11]

Mandarin Chinese (Bisang 1998: 785–787)

(43) SCC
[***Jíshǐ*** *wǒ-men dé bu dào rènhé zīzhù*],
[even.if 1-PL get NEG arrive any financial.support]
wǒ-men ***yě/dōu*** *yào jìnxíng wǒ-men de jìhuà.*
1-PL also/all will carry.on 1-pl ATTR support
'Even if we do not get any financial support, we will go ahead with our project.'

(44) ACC
[***Bùnguǎn*** *wǒ-men dé dào háishi dé bu dào rènhé*
[no.matter 1-PL get arrive or get NEG arrive any
zīzhù], *wǒ-men* ***dōu*** *yào jìnxíng wǒ-men de jìhuà.*
financial.support] 1-PL all will carry.on 1-PL ATTR support
'Whether we get any financial support or not, we will go ahead with our project.'

(45) UCC
[***Bùlùn*** *wǒ-men qǔ-dé* ***zěnyàng*** *de zīzhù*],
[no.matter 1-PL obtain-get what.kind ATTR financial.support]
wǒ-men ***dōu*** *yào jìnxíng wǒ-men de jìhuà.*
1-PL all will carry.on 1-PL ATTR support
'However much financial support we get, we will go ahead with our project.

Type-5 languages, i.e. languages with a different coding strategy for each of the three subtypes, include German, Mandinka, Veracruz Huasteca Nahuatl (VHN), and Yucatec Maya. A schematic overview of their coding strategies for each subtype is given in Table 2.:

Table 2: Coding strategies of type-5 languages for each concessive-conditional subtype

language	SCC	ACC	UCC
German	*auch wenn*	*ob … oder …*	WH *immer/auch* *egal* WH *so* A *auch*
Mandinka	*hání níŋ*	*… wǒo … wǒo*	N *wô* N
VHN	*yonke*	*tlan … tlan …*	*zan* WH
Yucatec Maya	*kex wáa*	V-*nak wa* V-*nak*	*je'en* WH (*káa*)

Type-1 and type-2 languages encode concessive conditionals in remarkably similar ways despite not being genealogically affiliated with each other. Languages such as Huallaga Quechua, Japanese, Sheko, Tamil, Turkish, and West Greenlandic use basically the same building blocks to form all three concessive-conditional subtypes – viz. a clause-final general or conditional converb followed by an additive focus particle –, some differences in word order

[11] Note, however, that Mandarin Chinese apodoses are marked uniformly, always containing the correlative element *yě* 'also' or *dōu* 'all'.

and verb mood notwithstanding. In type 4 and 5, on the other hand, concessive-conditional subtypes are formally more diverse, both across and within languages.

The question arises which factors determine how concessive conditionals are encoded, i.e. which of the above marking patterns they belong to, in any given language. According to Haspelmath & König (1998), this is determined by the subordination strategy predominantly used in any given language: in their sample, uniformly-marked concessive conditionals occur in languages that are primarily "nonfinite-subordinating", whereas differentially-marked concessive conditionals correlate with predominantly "finite" subordination. Since the parameter of finite or nonfinite subordination in turn correlates heavily with the parameter of dominant word order in European languages (ibid.: 625), the ultimate explanatory factor may be word order (ibid.: 635–636, fn. 10): nonfinite-subordinating languages like Lezgian or Turkish are OV, whereas finite-subordinating languages such as English and Spanish tend to be VO. As Haspelmath & König (1998: 627) suggest, these parameters may correlate with others, for example the position of question words in subordinate clauses, as WH-fronting seems to be more common in VO languages and WH *in situ* in OV languages (at least in Europe, ibid.). This parameter may in turn directly influence whether *all* subtypes of concessive conditionals are marked uniformly or not: type-1 languages encode all concessive-conditional subtypes overtly as conditionals, whereas in many type-4 and type-5 languages, often only SCCs and sometimes ACCs contain conditional marking. The reason why UCCs are not marked in type-4 and type-5 languages may well be that such languages tend to be finite-subordinating and would tend to mark conditionality by means of a clause-initial conditional marker, conflicting with WH-fronting (ibid.).

Future research based on more sophisticated statistics (e.g. conditional inference trees, Levshina 2015: 291–300) will be needed to untangle these parameters and determine which factors (e.g. subordination strategy and/or word order) are the best predictors of coding strategies in concessive conditionals. In this endeavor, a global sample of languages will obviously be superior to Haspelmath & König's (1998) European sample. As far as the present sample is concerned, all type-1 and type-2 languages are indeed nonfinite-subordinating OV languages, as predicted by Haspelmath & König. Among type-4 and type-5 languages, however, the correlations suggested by Haspelmath & König seem less strong, given that this group contains both VO languages (e.g. Yucatec Maya and Veracruz Huasteca Nahuatl) and OV languages (e.g. Mandinka). Instead of the bidirectional universal proposed by Haspelmath & König (1998) 'finite subordination ↔ differential marking' (or its contrapositive: 'nonfinite

subordination ↔ uniform marking'), these preliminary findings suggest an implicational universal, viz. 'VO → type 4 or 5', which needs to be further explored.

Statistics in future research will likely be complicated by the fact that one language may belong to more than one type at the same time, as pointed out in §4.2. above. A possible solution could be to include multiple data points per language. Turkish is a case in point: Turkish concessive conditionals may be marked uniformly by *-sA dA*, as shown above in (4)–(6), but Turkish also has another coding strategy for each subtype: SCCs may be marked by the scalar-additive focus particle *bile* (rather than *dA*), which does not occur in ACCs or UCCs; disjuncts in ACCs may be introduced by *ister* 'want' (cf. above, §3.2.4.); and UCCs may be marked by the optative mood (cf. above, §3.3.6.).

Turkish

(46) SCC (Menz 2016: 98)
[*Ara-**sa**-k* ***da***] *bul-ama-yacağ-ız.*
[search-COND-1PL ADD] find-NEG-FUT-1PL
'Even if we look for (her), we will not find (her).'

(47) ACC (ibid.)
[*Ara-**sa**-k* ***da*** *ara-ma-**sa**-k* ***da***] *bulamayacağız.*
[search-COND-1PL ADD search-NEG-COND-1PL ADD]
'Whether we look for (her) or not, we will not find (her).'

(48) UCC (ibid.)
[*Ne kadar ara-**sa**-k* ***da***] *bulamayacağız.*
[how much search-COND-1PL ADD]
'However much we look for (her), we will not find (her).'

(49) SCC (Nasilov et al. 2012: 401)
[*Yemin et-**se*** ***bile***] *inan-ma-m.*
[vow make-COND.3SG ADD] trust-NEG-1SG
'Even if he vows, I will not trust (him).'

(50) ACC (Menz 2016: 92, fn. 7)
[***İster*** *hoş-umuz-a* *git-sin* ***ister*** *git-me-sin*]
[want liking-1PL.POSS-DAT go-IMP want go-NEG-IMP]
marka-lar […] *birçok işlev üstlenir.*
brand-PL many function fulfill
'Whether we like it or not, brands fulfill a lot of functions.'

(51) UCC (Haspelmath & König 1998: 617)
[***Nereye*** *gid-er-**se**-m* *gid-**eyim***] *bin-i bırak-ma-yacağ-ın.*
[where go-AOR-COND-1SG go-SBJV.1SG] I-ACC leave-NEG-FUT-2SG
'Wherever I go, you will never leave me.'

5. Conclusion and outlook

The present study has provided a preliminary survey of how concessive conditionals are encoded in a small, but global sample of languages.

Concessive conditionals are defined as conditionals that express a partially ordered set of antecedent values in their protasis: 'if {p_1, p_2, p_3, …}, then q'. Three subtypes of concessive conditionals are distinguished according to the quantificational strategy used to express the multiplicity of antecedent values: SCCs, ACCs, and UCCs. Cross-linguistically, they show both functional-conceptual and formal overlap with conditionals, concessives, and, in the case of ACCs and UCCs in some languages, with interrogatives and free relatives.

After presenting and discussing the language sample in Section 2., the attested coding strategies were presented in Section 3. Four coding strategies were found for SCCs, six for ACCs, and seven for UCCs. While most strategies are also present in Haspelmath & König's (1998) European sample, the present study has revealed some coding strategies that seem to occur exclusively in non-European languages. A future study based on a larger and more strictly stratified sample may therefore find even more strategies for languages to encode (certain subtypes of) concessive conditionality.

Importantly, this study has shown that Haspelmath & König's (1998) division between uniformly- and differentially-marked concessive conditionals is too simplistic: of the five logically possible patterns for uniform or differential marking across all three subtypes, four are attested in the present sample. More research is needed in order to determine whether the missing type, so-called "type-3 languages", exists or constitutes a typological gap. Generally speaking, there seems to be a very uniform group of type-1 languages (and one type-2 language) which all use very similar coding strategies based on conditional forms across all subtypes, and a more diverse group of type-4 and type-5 languages which show considerably more formal diversity, both cross-linguistically and across subtypes within the same language. And of course any given language can have more than one set of concessive conditionals representing different coding types, further complicating the picture.

Further research is needed to investigate the factors determining which concessive-conditional subtypes are encoded uniformly or differentially. Haspelmath & König (1998) suggest that the dominant subordination strategy of a given language plays a role, but this parameter seems to correlate strongly with other grammatical factors such as dominant word order. Furthermore, non-grammatical factors like genealogy and area should be taken into account, requiring advanced statistical methods such as conditional inference trees.

All findings of the present study are preliminary, being based on language sample that is neither representative nor sufficiently stratified. However, the main results do seem promising and should be verified on a larger, more representative sample. A sample of about 50 languages, for example, should perform significantly better (assuming it follows stricter sampling rules),

whilst still being realistically manageable. In order to find data from 50 languages following stricter sampling rules, however, other methods of data collection will be required than in the present study, given that there are simply not enough descriptive grammars which provide adequate information on concessive conditionals. Furthermore, a sample based solely on grammars like the present one may be skewed in favor of type-1 languages, because researchers may be more likely to include examples of all three coding strategies if they are coded identically. A possible solution could be to use a questionnaire, similar to the one used in Haspelmath & König's (1998) original study. Ideally, a study based on a representative 50-language sample would not only find more previously undescribed coding strategies in concessive conditionals, but also provide better grounds for explanations: with the use of statistical methods, it could be determined which factors correlate with the above-mentioned four to five language types and why.

Abbreviations

The glosses in the present study follow the Leipzig Glossing Rules as much as possible. The glosses used in this paper and their meaning are listed immediately below.

1/2/3	first/second/third person
12	first person plural inclusive (in Huallaga Quechua)
4	"fourth person", i.e. third person reflexive (in West Greenlandic)
>	direction of transitivity
ABS	absolutive
ACC	accusative
ADD	additive marker
AG	agentive
AOR	aorist
ASP	aspectual marker
ASSUR	assurative
ATTR	attributive
CNTG	contiguous
COMP	complementizer
COMPL	completive
COND	conditional
CONTP	contemporative
COP	copula
CVB	(general) converb
DAT	dative
DECL	declarative
DET	determiner
DIR	direct (information)
DIST	distal
EMPH	emphatic

ERG	ergative
FCI	free-choice item
FOC	focus
FUT	future
IDENT	identity
IMP	imperative
IN	inessive
IND	indicative
INF	infinitive
INS	instrumental
IPFV	imperfective
IRR	irrealis
M	masculine
MOD	modal verb
N	neuter
NEG	negation
NMLZ	nominalizer
NOM	nominative
NPST	nonpast
OBJ	object
OBLIG	obligation (near future)
PASS	passive
PL	plural
POL	politeness
POSS	possessive
POT	potentialis
PRECOND	preconditional
PREP	preposition
PTC	participle
PURP	purposive
RED	reduplication
REFL	reflexive
REL	relative marker
SBJ	subject
SBJV	subjunctive
SEQ	sequential action
SG	singular
STI	stance marker
TOP	topic

References

AnderBois, S. (2014): Unconditionals in Yucatec Maya. *Proceedings of Form and Analysis in Mayan Linguistics* 2, 1–20.

Berghäl, L. (2015): *A grammar of Mauwake*. Berlin: Language Science Press.

Bhat, D.N.S. (2000): The indefinite-interrogative puzzle. *Linguistic Typology* 5, 365–400.

Bhat, D.N.S. (2004): *Pronouns*. Oxford: Oxford University Press.

Bisang, W. (1998): Adverbiality: The view from the Far East. In van der Auwera (ed.), 641–812.

Bystrov, I. S. & N. V. Stankevich (2012): Concessive constructions in Vietnamese. In Xrakovksij (ed.), 330–343.
Ciardelli, I. (2016): Lifting conditionals to inquisitive semantics. *Proceedings of SALT* 26, 732–752.
Creissels, D. & P. Sambou (2013): *Le mandinka: Phonologie, grammaire, textes*. Paris: Karthala.
d'Avis, F. J. (2016): Satztyp als Konstruktion: Diskussion am Beispiel 'konzessive Konditionalgefüge'. In R. Finkbeiner & J. Meibauer (eds.): *Satztypen und Konstruktionen*. Berlin: de Gruyter, 267–295.
De Groodt, S. (2002): Reanalysis and the five problems of language change: A case study on the rise of concessive subordinating conjunctions with *ob-* in Early Modern German. *Sprachtypologie und Universalienforschung* 55.3, 277–288.
Dryer, M. S. (1992): The Greenbergian word order correlations. *Language* 68.1, 81–138.
Dryer, M. S. & M. Haspelmath (eds., 2013): *The World Atlas of Language Structures Online*. Leipzig: Max Planck Institute for Evolutionary Anthropology. (Available online at https://wals.info, accessed on 10/04/2021.)
Duffley, P. & P. Larrivée (2020): Whatever floats your boat: A corpus-based investigation of definiteness, quantification, modality, presuppositional content, scalarity and epistemic stance with *wh-ever* words. *International Review of Pragmatics* 12, 206–245.
Forker, D. (2020): *A grammar of Sanzhi Dargwa*. Berlin: Language Science Press.
Fortescue, M. (1984): *West Greenlandic*. London: Croom.
Fujii, S. Y. (1994): A family of constructions: Japanese *temo* and other concessive conditionals. *Berkeley Linguistics Society* 20, 194–207.
Haiman, J. (1978): Conditionals are topics. *Language* 54.3, 564–589.
Hammarström, H., R. Forkel, M. Haspelmath & S. Bank (2020): *Glottolog 4.3*. Jena: Max Planck Institute for the Science of Human History. https://doi.org/10.5281/zenodo.4061162 (Available online at https://glottolog.org, accessed on 10/04/2021.)
Haspelmath, M. (1997): *Indefinite pronouns*. Oxford: Oxford University Press.
Haspelmath, M. (2010): Comparative concepts and descriptive categories in crosslinguistic studies. *Language* 86.3, 663–687.
Haspelmath, M. & E. König (1998): Concessive conditionals in the languages of Europe. In van der Auwera (ed.), 563–640.
Hellenthal, A. C. (2010): *A grammar of Sheko*. Doctoral dissertation, University of Leiden.
Hercus, L. A. (1982): *The Bāgandji language*. Canberra: Australian National University.
Hercus, L. A. (1994): *A grammar of the Arabana-Wangkangurru language, Lake Eyre Basin, South Australia*. Canberra: Australian National University.
Hercus, L. A. (1999): *A grammar of the Wirangu language of the West Coast of South Australia*. Canberra: Australian National University.
Hutchison, J. P. (1981): *The Kanuri language: A reference grammar*. Madison: University of Wisconsin.
Kibrik, A. (ed., 1996): *Godoberi*. Munich: Lincom Europa.
Kieviet, P. (2017): *A grammar of Rapa Nui*. Berlin: Language Science Press.
Kim, M. (2015): From choice to counter-expectation: Semantic-pragmatic connections of the Korean disjunctive, concessive, and scalar focus particle *-na*. *Journal of Pragmatics* 80, 1–21.
König, E. (1985): Where do concessives come from? On the development of concessive conditionals. In J. Fisiak (ed.): *Historical semantics: Historical word-formation*. Berlin: de Gruyter, 263–282.

König, E. (1986): Conditionals, concessive conditionals and concessives: Areas of contrast, overlap and neutralization. In E. Traugott, A. ter Meulen, J. Snitzer Reilly & Ch. A. Ferguson (eds.): *On conditionals*. Cambridge: Cambridge University Press, 229–246.
König, E. (1988): Concessive connectives and concessive sentences: Cross-linguistic regularities and pragmatic principles. In J. A. Hawkins (ed.): *Explaining language universals*. Oxford: Blackwell, 145–166.
Lehmann, Th. (1993): *A grammar of modern Tamil*. Pondicherry: PILC.
Leuschner, T. (2006): *Hypotaxis as building-site: The emergence and grammaticalization of concessive conditionals in English, German and Dutch*. Munich: Lincom Europa.
Leuschner, T. (2008): From speech-situation evocation to hypotaxis: The case of Latin *quamvis* 'although'. In E. Seoane & M. J. López-Couso (eds.): *Theoretical and empirical issues in grammaticalization*. Amsterdam: Benjamins, 231–252.
Leuschner, T. (in press): Concessive conditionals as a family of constructions. *Belgian Journal of Linguistics* 34, 234–246.
Levshina, N. (2015): *How to do linguistics with R: Data exploration and statistical analysis*. Amsterdam: Benjamins.
Liljegren, H. (2016): *A grammar of Palula*. Berlin: Language Science Press.
Menz, A. (2016): Concessive conditionals in Turkish. *Turkic Languages* 20.1, 90–103.
Nasilov, D. M., F. I. Xoršid & I. A. Nevskaya (2012): Concessive constructions in Turkish. In Xrakovskij (ed.), 387–412.
Olguín Martínez, J. F. (2016): *Adverbial clauses in Veracruz Huasteca Nahuatl from a functional-typological approach*. M.A. thesis, University of Sonora.
Oppliger, R. (2018): *Whatever the specific circumstances, …*: A Construction Grammar approach of wh-ever clauses in English. In E. Seoane, C. Acuña-Fariña & I. Palacinos-Martínez (eds.): *Subordination in English: Synchronic and diachronic perspectives*. Berlin: de Gruyter, 263–284.
Rawlins, K. (2008): Unifying if-conditionals and unconditionals. *Proceedings of SALT* 18, 583–600.
Rawlins, K. (2013): (Un)conditionals. *Nat Lang Semantics* 40, 111–178.
Rubino, C. (2013): Reduplication. In M. S. Dryer & M. Haspelmath (eds.), http://wals.info/chapter/27.
Sandman, E. (2016): *A grammar of Wutun*. Doctoral dissertation, University of Helsinki.
Song, J. J. (2018): *Linguistic typology*. Oxford: Oxford University Press.
Sweetser, E. (1990): *From etymology to pragmatics: Metaphorical and cultural aspects of semantic structure.* Cambridge: Cambridge University Press.
van der Auwera, J. (ed., 1998): *Adverbial constructions in the languages of Europe*. Berlin: de Gruyter.
van der Voort, H. (2004): *A grammar of Kwaza*. Berlin: de Gruyter.
Vander Haegen, F. (2019): Die Emergenz irrelevanzkonditionaler Subjunktoren des Typs *egal was*: Variation und Grammatikalisierung anhand des Deutschen Referenzkorpus. *Germanistische Mitteilungen* 45.1–2, 113–138.
Weber, D. J. (1989): *A grammar of Huallaga (Huánuco) Quechua*. Berkeley: University of California Press.
Xrakovskij, V. S. (ed., 2021): *Typology of concessive constructions*. Munich: Lincom Europa.
Zaefferer, D. (1987): Satztypen, Satzarten, Satzmodi: Was Konditionale (auch) mit Interrogativen zu tun haben. In J. Meibauer (ed.): *Satzmodus zwischen Grammatik und Pragmatik: Referate anläßlich der 8. Jahrestagung der Deutschen Gesellschaft für Sprachwissenschaft, Heidelberg 1986*. Tübingen: Niemeyer, 259–285.
Zaefferer, D. (1991): Conditionals and unconditionals: Cross-linguistic and logical aspects. In D. Zaefferer (ed.): Semantic universals and universal semantics. Berlin: Foris, 210–236.

Tom Bossuyt
Tom.Bossuyt@UGent.be

Tom Bossuyt
UGent LW06 Duitse Taalkunde
Blandijnberg 2
9000 Gent
Belgium