

Emotions:

Expressions for emotions - and inner feelings - in Kilivila, the language of the Trobriand Islanders: A descriptive and methodological critical essay¹

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1.) Introduction²:

In 2006 the "Language and Cognition Group" at the MPI for Psycholinguistics decided to start a research project on emotion categories in language and thought. Ever since Charles Bell (1806), Charles Darwin (1872) and Guillaume Duchenne (1876) this domain has been researched from various angles. On Darwin's view, universal emotions and hard-wired facial expressions which reflect them should yield clear universal categories – with predicted agreement across languages in terms for emotions and their expressions. Hjortsjö's (1969) work laid the foundation for further elaboration of this claim by Ekman (1973, see also Ekman and Friesen 1975). Ekman and his co-workers have played an important role in keeping the Darwinian perspective alive, and in persuading the cognitive science community that the

¹ I explicitly use the term "methodological critical" as a literal translation of the German technical term "methodenkritisch" - as it was used by representatives of the "Frankfurt school"; see e.g. Adorno et al. (1969). This is the first version of Senft (2017); the published version is substantially shorter and without an appendix.

² This paper is based on many discussions I had with my colleagues within the "Categories across Language and Cognition" project of the "Language and Cognition" group at the MPI for Psycholinguistics. I would like to thank them for the excellent cooperation in our project. I could not have written this paper without the help of my consultants in Tauwema. I express my great gratitude to the people of the Trobriand Islands, especially to the inhabitants of Tauwema for their hospitality, friendship, and patient cooperation. Last but not least I would also like to thank the National and Provincial Governments in Papua New Guinea, the Institute for PNG Studies, especially Don Niles, and the National Research Institute, especially James Robins, for their assistance with, and permission for, my research projects.

subject is more orderly and tractable than it at first appears: there are, they claim, a small set of universal basic emotions with universal expressions reflecting adaptive “affect programs” like mating, defence, flight.

Thus, research on emotion and on their facial expression has a relatively long tradition - but it also has always been a highly controversial topic (see e.g. Ekman 1994 and Russell 1994; also Izard and Saxton 1988). Criticism of Ekman’s claim that there is a set of basic emotions with universal facial expressions which are labeled with the same emotion terms³ came not only from psychologists like Russell, but also from anthropologists. From this tradition of close attention to cultural detail has come severe criticism of Ekman’s understanding of basic emotions as universal human traits. Anthropologists noted interesting culture-specific concepts embedded in local “ethnopsychologies”. Rosaldo (1983), for example, showed that with the Ilongot, an ethnical group living in the Philippines, the concept “*liget*” which can be glossed as “anger” is closely tied to the intense emotions of headhunting (for other such examples see the contributions in Levy:1983; see also Kuipers 1998).

The nature of natural language labeling of emotions has been relatively poorly explored, at least in a systematic way, despite the fact that many psychological investigations of emotions presuppose labels in one way or another. Our particular interest in emotion terms lies in their status as potential *ineffables*: linguistic expressions in which access to their referents cannot be directly shared. I can point to a color and say “blue”, and thus you can learn the extension of “blue”, but there seems no way to point to “anger” (as opposed to its typical behavioral manifestations) in the same way. Even if there is a clear set of basic internal states (à la Ekman), it is not clear how the terms can be mapped onto them in an identical way by different learners of a language.

In 2006 we did pilot studies in various field-sites to get an overview over the lexical means speakers of our field languages use to refer to emotions and their expressions and to explore what kind of methods would fit best in all our field-sites to elicit the relevant data. Leading questions for our research on emotions are:

³ Ekman (1973: 220) claims: “Regardless of the language, of whether the culture is ... industrialized or preliterate, facial expressions are labeled with the same emotion terms”.

- Is their evidence from language for a small set of universal basic emotions?
- How "effable" are they or can we observe ineffability - the difficulty or impossibility of putting experiences into words - within the domain of emotions?
- Do consultants agree with one another how they name emotions?
- Are facial expressions or situations better cues for labeling?
- How well can people map situations to facial expressions?

However, before we could tackle these highly complex questions, we first had to get an overview over the verbal expressions that speakers use to refer to emotions.

This paper reports on the results of my research in 2006 and 2008 on the verbal expressions - the lexical means - Kilivila, the language of the Trobriand Islanders, offers its speakers to refer to and to describe emotions and inner feelings. Data were elicited with 18 "Ekman's faces" in which the faces of three persons illustrate the allegedly universal basic emotions (anger, disgust, fear, happiness, sadness, surprise) and film stimuli staging and demonstrating standard emotions based on English. This latter stimulus set is called "Mind Reading Emotions Library (MREL)". It was developed by Baron-Cohen and his co-workers in 2004 - actually designed for autism research. It is much larger than the "Ekman faces" stimulus, it has graded granularity (which follows age-norms, see below), and it is moving, not still (see: Mind Reading Emotions Library User Guide: 2004). We also collected data with scenarios to elicit emotion words in cultural scripts (see Levinson et al. 2007). However, in this paper I will neither present this tool nor report on results gained with it.⁴ After the presentation of the data elicited with the "Ekman faces" and the MREL film clips I will discuss them on the basis of our guiding research questions. In addition to the data elicited with these tools the paper also presents lexical means the Trobriand Islanders use to refer to emotions and inner feelings which are documented in my overall corpus of the Kilivila language.

⁴ Thus, I will not provide an answer here to the question "How well can people map situations to facial expressions?" which I raised above. Moreover, I cannot provide an answer to the first question "Is their evidence from language for a small set of universal basic emotions?" here, either, because this paper is just descriptive.

2.) Data collection

As briefly mentioned above, the "Mind Reading Emotions Library (MREL)" serves as one of our tools for data gathering. For Baron-Cohen "[e]motions are states of mind that arise as a result of specific experience and drive us to take action. Although emotions exist in the mind and so are essentially unobservable, they are frequently revealed through facial expressions, voice, posture and gesture..." (Mind Reading Emotions Library User Guide 2004: 6).

The "MREL" consists of 412 enacted forms of emotions which are grouped into 24 major groups. Each of the 412 emotions are represented by 6 actors. This results in 2472 movies!

The Cambridge Team put every emotion into a family or into a group of emotions; every group is named according to the emotion concept that best represents it. All in all the researchers defined the following 24 groups (see Table 1):

Table 1: Emotions Groups (Mind Reading Emotions Library User Guide 2004: 16)

Afraid	Angry	Bored	Bothered
Disbelieving	Disgusted	Excited	Fond
Happy	Hurt	Interested	Kind
Liked	Romantic	Sad	Sneaky
Sorry	Sure	Surprised	Thinking
Touched	Unfriendly	Unsure	Wanting

Because emotion vocabulary grows with age, the MREL further subcategorizes the films into 6 different levels with level one being the simplest and level 6 the most sophisticated. These levels cover the age span of consultants from preschoolers through to adults (see Mind Reading Emotions Library User Guide 2004: 7 & 13).

The MREL set of emotions is definitionally hooked to English: during the development of the tool a word was given (say "angry") and then Baron-Cohen and his co-workers tested whether a set of judges could systematically differentiate a corresponding set of films from say "furious" and "irritated". Overlap in features was

accepted, as long as systematic differentiation using English labels could be achieved. The stimulus reflects the huge English vocabulary on emotions (see e.g., Dutch 1972).

For our pilot studies we decided on the following procedure: We used the "20 Big Emotions of Level 1" only. These emotions stage "afraid situations, angry situations, bored situations, disgusted situations, excited situations, fond situations, happy situations, hurt situations, interested situations, kind situations, liked situations, sad situations, sneaky situations, sorry situations, sure situations, surprised situations, thinking situations, unfriendly situations, unsure situations" and "wanting situations". We focused on the "Situation Enactments", that is little scenes in which the emotions are enacted within a brief context and on 2 follow up film clips which depict just the enacting of the respective emotion without such a context. We played the clips without sound and tried to get straight descriptions. We presented each stimulus and asked the following questions in our respective field languages:

- 1.) What does he/she feel?
- 2.) How does the face look?
- 3.) What kind of person is he/she?
- 4.) What might she (protagonist in the film) say?

The Kilivila equivalents for these questions are:

- 1.) *Avaka kudoki (mtona/minana) ala lumkola?*
What do you think (about) his/her feeling/emotion?
What do you think s/he is feeling?
- 2.) *Kugisi migila – avaka kudoki migila amakala?*
Look at her/his face - what do you think her/his face is like?
Look at her/his face - what do you think it expresses (looks like)?
- 3.) *Avaka kudoki - minana vivila/mtona tau bwena kena gaga kena avaka?*
What do you think - (is) this woman/this man good or bad or what?
- 4.) *Avaka kudoki minana/mtona bilivala?*

What do you think this woman/this man will say?

I did this explorative pilot study in June 2006 with two male informants, Mokeilobu (65 years old) and Toyogima (30 years old).

The "Ekman's faces" consist of three series of six photographs each. The first series (P1 - P6) consists of six practice cards displaying a male face expressing (see Ekman & Friesen 1975: 189) expressing "disgust", "happiness" (Ekman & Friesen 1975: 189, top-right), "surprise" (Ekman & Friesen 1975: 197 top-left), "anger" (Ekman & Friesen 1975: 199 top-right), "sadness" (Ekman & Friesen 1975: 195 top-left), and fear (Ekman & Friesen 1975: 181 top-right).

The second series (F1 - F6) consists of 6 experimental cards of a female face expressing "happiness", "anger", "fear" (Ekman & Friesen 1975: 179 top-right), "sadness" (Ekman & Friesen 1975: 193 top-right), "disgust" (Ekman & Friesen 1975: 183 top-left), and "surprise".

And the third series (M1 - M6) consists of 6 experimental cards of a male face expressing "surprise" (Ekman & Friesen 1975: 177 bottom-left), "sadness", "happiness", "fear", "disgust", and "anger" (Ekman & Friesen 1975: 185 bottom-right).

Ekman and his coworkers claim that these cards illustrate the six allegedly universal basic emotions.

We presented each stimulus to the consultants and asked them the following questions in our respective field languages (see Levinson et al 2007: 48):

- 1.) How does the face look?
- 2.) How does she/he feel?
- 3.) Is there a word for that feeling?

The Kilivila equivalents for these questions are:

- | | | | |
|-----|----------------|------------------|----------------------|
| 1.) | <i>Ku-gisi</i> | <i>migi-la</i> – | <i>avaka ku-doki</i> |
| | 2.-look | face-her/his | what 2.-think |

*migi-la amakala?*⁵

face-her/his like

Look at her/his face - what do you think her/his face is (looks) like?

2.) *Avaka ku-doki m-to-na / mi-na-na*
 what 2.-think Dem-CP.male-Dem Dem-CP.female-Dem

ala lumkola?

her/his feeling

What do you think (about) his/her feeling/emotion?

3.) *E-sisu kwe-tala biga pela*
 3.-be CP.thing-one language for

ma-na-kwa lumkola?

Dem-Dem-CP.thing feeling

Is there a word for this feeling?

I collected data with the "Ekman faces" in 2008 with 5 male and 5 female consultants ranging in age from 16 to 66 years (see Table 2).

⁵ Abbreviations used are: 1. - first person; 2. - second person; 3.- third person; CP - classificatory particle, classifier; Dem - demonstrative; Fut - future; PPIV - possessive pronoun (marking inalienable possession)

Table 2: Consultants naming emotions from facial expressions ("Ekman faces")

Consultant No:	Name	Age	Gender	Clan	Language	Other languages	School education
1	Pulia	38	m	Lukwasisiga	Kilivila	English	High School
2	Taidyeli	65	m	Malasi	Kilivila	-/-	-/-
3	Libunagava	26	f	Malasi	Kilivila	-/-	-/-
4	Okeyota	16	f	Lukwasisiga	Kilivila	-/-	-/-
5	Tupesagawa	17	f	Lukulabuta	Kilivila	-/-	-/-
6	Moagava	45	m	Lukwasisiga	Kilivila	-/-	-/-
7	Lydia	20	f	Lukulabuta	Kilivila	-/-	-/-
8	Carolin	20	f	Malasi	Kilivila	-/-	-/-
9	Mobili'uya	66	m	Lukwasisiga	Kilivila	-/-	-/-
10	Yabilosi	25	m	Lukwasisiga	Kilivila	-/-	-/-

3. Results

In this section I will first present the results of my data elicitation using the "Mind Reading Emotions Library (MREL)" and then the results of the data elicitation in which I used the "Ekman faces" as stimuli.. However, before doing this I want to point out once more that Kilivila has a word that can be glossed as "feeling, emotion" - namely "*lumkola*" - as the attentive reader of the previous section will have realized already.

3.1 Results of the data elicitation with the "MREL"

To illustrate the raw data I elicited I will just present Mokeilobu's answers to the 4 questions I asked him after he saw the enactment of the afraid situation; then I summarize the results (for each emotion group, that is 24 reactions by two consultants to 4 questions each asked after presenting 3 clips) in a more appropriate

way. Here are the questions I asked Mokeilobu showing him one of the clips for "being afraid":

1.) What does she feel?

Ala kokola

Her fear

2.) How does the face look?

Bi-valam

3. Fut-cry

She is going to cry.

3.) What kind of person is he/she?

Vivila bwena

girl good

A good girl

4.) What might she say?

E a-kokola

yes 1.-afraid

Yes I am afraid.

In what follows I summarize the data collected with the "MREL" for each emotion group in separate tables. For each emotion group I also check the Kilivila dictionary (Senft: 1986) for respective expressions as well as Roget's Thesaurus for synonyms and related words for the English emotion group label.

For the "afraid situation" and the acting out of being "afraid" clips the reactions of the two consultants are summarized in Table 3⁶:

Table 3: Kilivila responses to "afraid" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
noun	<i>kokola</i>	fear
verb	<i>-kokola-</i>	to be afraid, to fear
phrase	<i>nanola imwau</i>	(her mind is heavy), she feels sad
verb	<i>-vinu- / -vinuvinu-</i>	to be close to crying
noun	<i>valam</i>	crying
verb	<i>-valam-</i>	to cry

Other means that Kilivila offers its speakers to refer to this emotional state are the verbs "*-pogi-*" - "to fear, to be afraid of" which can also mean "to be jealous, to poison" and "*-seluve-PPIV-*" - "to surprise someone, to make someone afraid of something".

Note that in Roget's Thesaurus (Dutch 1968, entry 854) we find the entry "unhappy" under the main entry "Fear".

For the "angry situation" and the acting out of being "angry" clips the reactions of the two consultants are summarized in Table 4:

⁶ An asterisk (*) marks that I have no explanation why the consultants produced the respective expression. Literal translations are given in brackets. Responses are listed according to their frequency. Most frequent, not so frequent and marginal responses are separated from each other by an empty row in the tables.

Table 4: Kilivila responses to "angry" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
noun	<i>leya</i>	anger
noun	<i>kaleya</i>	anger
verb	<i>-kaleya-</i>	to be / to get angry
noun	<i>gubuluva</i>	anger, being annoyed
verb	<i>-gubuluva-</i>	to be angry, to be annoyed, to quarrel
adjective	<i>-gubuluva</i>	angry
adjective	<i>-gasi</i>	fierce, wild
verb	<i>-kasigegina-</i>	to grimace, to grin, to smile in a detached way
verb	<i>*-titabelu-</i>	to gossip
verb	<i>-mitipayuyu-</i>	to look angry / sad
verb	<i>-kabelu-</i>	to make a wry /angry/ cross face
phrase	<i>ekabinam ala gabula</i>	s/he bites her lips - as a sign of anger

Other means that Kilivila offers its speakers to refer to this emotional state are the verbs "-*gasisi-*", "to be angry, violent", "-*gubuluva-*" - "to feel angry", "-*guleya-*" - "to feel angry", "-*kaleya-*" - "to get angry" and "-*yosibului-*" - "to make angry".

Note that in Roget's Thesaurus (Dutch 1968, entry 891) we find the entries "sullen, fury, angry look, wild, bitter", and "in a temper" under the main entry "Resentment, Anger".

For the "bored situation" and the acting out of being "bored" clips the reactions of the two consultants are summarized in Table 5:

Table 5: Kilivila responses to "bored" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
phrase	<i>ala lumkola emwa</i>	(her/his feeling goes off) s/he is feeling onerous
verb	<i>-peki-</i>	to dislike, to abhor
noun	<i>gibugibu</i>	sadness, dullness, sullenness
adjective	<i>-gibugibu</i>	dull, sad, sullen, indifferent, passive
phrase	<i>egibugibu migila</i>	it is dull her/his face
phrase	<i>nanola imwau</i>	(her/his mind is heavy), her/his mind is gloomy/sad
phrase	<i>migila imwau</i>	(her/his face is heavy), her/his face is dull/sullen
verb	<i>-kaikai-</i>	to be/feel miserable
phrase	<i>ikaikai vovola</i>	It feels miserable her/his body
verb	<i>-masisi-</i>	to sleep, to feel sleepy
phrase	<i>nunupula mataala</i>	sleepy eyes
verb	<i>-sivila-</i>	to turn away from someone/something
phrase	<i>gala magila bigisi</i>	s/he does not want to see someone/something
phrase	<i>*nanamsa egaga</i>	thinking is bad
noun	<i>balau</i>	laziness

Other means that Kilivila offers its speakers to refer to this emotional state are the verb "*-gwegwesi-*" - "to be bored, to feel homesick", which can also be used as an adjective and a noun. It is most often used in the phrase "*igwegwesi vovola*" - "it is/feels bored/homesick her/his body", the verb "*-kamagwesi-*" - "to get bored, to be fed up with sth.", and the adjective "*-nunumata*" - "bored".

Note that in Roget's Thesaurus (Dutch 1968, entry 838) we find the entries "indifference, dislike, tiresome, send one to sleep", and "make one yawn " under the main entry "Tedium".

For the "disgusted situation" and the acting out of being "disgusted" clips the reactions of the two consultants are summarized in Table 6:

Table 6: Kilivila responses to "disgusted" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
phrase	<i>lumkola gaga</i>	her/his feeling is bad, feeling bad
phrase	<i>lumkola mwau</i>	her/his feeling is bad and heavy, feeling bad and sad
phrase	<i>nanola gaga</i>	her/his mind is bad
verb	<i>-lagoba-</i>	to vomit
verb	<i>-minena-</i>	to feel disgusted, to feel like vomiting
phrase	<i>iminena nanola</i>	her/his mind is affected with nausea
verb	<i>*-kasigegina-</i>	to be detached, to grimace, to grin
phrase	<i>gidageda olumolela</i>	pain inside
verb	<i>-mitipayuyu-</i>	to look angry and sad
phrase	<i>matala epipisi</i>	her/his eyes twinkle
noun	<i>valam</i>	crying
noun	<i>kokola</i>	fear
noun	<i>kukoro-PPIV</i>	aversion, dislike
verb	<i>-peki-</i>	to dislike, to abhor, to be disgusted

phrase	<i>gala magila</i>	s/he does not want it
phrase	<i>bogwa desi</i>	(already enough), it is enough

Another means that Kilivila offers its speakers to refer to this emotional state is the noun "*minena*" - "disgust, aversion".

Note that in Roget's Thesaurus (Dutch 1968, entry 829) we find the entries "dislike, nausea, vomit, resent, frighten, pain", and "look blue" under the main entry "Discontent".

For the "excited situation" and the acting out of being "excited" clips the reactions of the two consultants are summarized in Table 7:

Table 7: Kilivila responses to "excited" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
noun	<i>mwasawa</i>	fun, love, surprise
verb	<i>-bomwasawa-</i>	to have fun, to love something
phrase	<i>mamwasawa nanola</i>	happiness/fun is on her/his mind
phrase	<i>lumkola bwena</i>	her/his feeling is good
adjective	<i>-gigila</i>	laughing
verb	<i>-kasigegina-</i>	smile, grin in a detached way
adjective	<i>-karimwana</i>	proud

Another means that Kilivila offers its speakers to refer to this emotional state is the phrase "*itutu vovola*" - "(it hammers her/his body) s/he feels excited".

Note that in Roget's Thesaurus (Dutch 1968, entry 821) we find the entries "joy, fun" and "loveliness" under the main entry "Excitation".

For the "fond situation" and the acting out of being "fond" clips the reactions of the two consultants are summarized in Table 8:

Table 8: Kilivila responses to "fond" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
phrase	<i>lumkola bwena</i>	her/his feeling is good
phrase	<i>lumkola migile'u</i>	her/his feeling is bright
phrase	<i>lumkola gigila</i>	her/his feeling is like laughing
phrase	<i>nanola migile'u</i>	her/his mind is bright
adjective/adverb	<i>bwenigaga</i>	very good, best
adjective/adverb	<i>uliyebweli</i>	lovely
noun	<i>mamwasila</i>	happiness
adjective	<i>-gigila</i>	laughing
noun	<i>kimwala</i>	smile
adjective	<i>-kalimwana, -kilimwana</i>	proud, happy

Another means that Kilivila offers its speakers to refer to this emotional state is the verb "-yobweli-" - "to be fond, liked, romantic, caring, flirtatious" and the noun "yobweli" - "fondness".

Note that in Roget's Thesaurus (Dutch 1968, entry 887) we find the entry "fondness" under the main entry "Love".

For the "happy situation" and the acting out of being "happy" clips the reactions of the two consultants are summarized in Table 9:

Table 9: Kilivila responses to "happy" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
noun	<i>mwasawa</i>	fun, love, surprise
phrase	<i>mwasawa ekaliseva</i>	s/he is overjoyed with fun
noun	<i>mamwasila</i>	having fun, be in a good

		mood
verb	<i>-wasau-</i>	to be happy
verb	<i>-bomwasawa-</i>	to be happy
noun	<i>*gibugibu</i>	sadness
phrase	<i>*ekapinum ala gabula</i>	s/he angrily bites her/his chin
adjective	<i>*-yovai</i>	being eager to fight
adjective, adverb	<i>*mwau</i>	difficult, sad

Other means that Kilivila offers its speakers to refer to this emotional state are the noun "*kalimwana*" - "happiness, pride", the verb "*-kalimwana-*" - "to be happy, to be proud", and the phrase "*itutu vovola*" - (it hammers her/his body) s/he feels excited".

Note that in Roget's Thesaurus (Dutch 1968, entries 615, 824, 826) we find the entries "fine, attractiveness, loveliness" and "lovable" under the main entries "Good, Joy" and "Pleasureableness".

For the "hurt (bullied) situation" and the acting out of being "hurt" clips the reactions of the two consultants are summarized in Table 10:

Table 10: Kilivila responses to "hurt" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
phrase	<i>lumkola mwau</i>	feeling sad
phrase	<i>migila ebelu</i>	her/his face is deformed
phrase	<i>migila emwau</i>	her/his face is full of grief
phrase	<i>migila evinuvinu</i>	her/his face is sad / close to crying
verb	<i>-mitubilibili-</i>	to look away
noun	<i>Kokola</i>	fear

phrase	<i>ala ninamwau</i>	her/his being hurt
verb	*- <i>kalimwana</i> -	to be happy and proud
phrase	* <i>lumkola sigimnaka</i>	feeling of showing off

Other means that Kilivila offers its speakers to refer to this emotional state are the verbs "-geda-" - "to bite, to sting, to hurt", "-sim-" - "to sting, to hurt", and "-teganini-" - "to ache, to hurt".

Note that in Roget's Thesaurus (Dutch 1968, entry 827) we find the entry "grievous" under the main entry "Painfulness".

For the "interested (asking) situation" and the acting out of being "interested" clips the reactions of the two consultants are summarized in Table 11:

Table 11: Kilivila responses to "interested" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
adjective	- <i>kabitam</i>	clever, knowing
adjective	<i>bwena</i>	good
phrase	<i>lumkola bwena</i>	feeling good
phrase	<i>lumkola migile'u</i>	feeling bright
phrase	<i>migila migile'u</i>	her/his face is bright
adjective	- <i>migile'u</i>	bright
adjective	- <i>mwamwasila</i>	happy
phrase	<i>magila binukwali</i>	s/he wants to know / is interested
noun	* <i>leya</i>	anger
adjective	* <i>gagaveaka</i>	very bad
phrase	* <i>lumkola gaga</i>	feeling bad
noun	* <i>gubuluva</i>	anger

For the "kind (friendly) situation" and the acting out of being "kind" clips the reactions of the two consultants are summarized in Table 12:

Table 12: Kilivila responses to "kind" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
adjective, adverb	<i>bwena</i>	good, fine, kind, friendly
phrase	<i>lumkola bwena</i>	feeling good
phrase	<i>lumkola gigila</i>	feel like laughing
noun	<i>gigila</i>	laughing
phrase	<i>migila mamwasila</i>	her/his face is full of fun
phrase	<i>migila nakalimwana</i>	her face full of happiness
noun	<i>mwasawa</i>	fun, love, surprise
adjective	<i>-manabweta</i>	beautiful, attractive

Other means that Kilivila offers its speakers to refer to this emotional state are the adjective "-*yobweli*" - "lovely, flirtatious" and the verb "-*yobweli*-" - "to love, to be lovely, to be liked".

Note that in Roget's Thesaurus (Dutch 1968, entry 8)7) we find the entries "good" and "love" under the main entry "Benevolence".

For the "liked situation" and the acting out of being "liked" clips the reactions of the two consultants are summarized in Table 13:

Table 13: Kilivila responses to "liked" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
adjective, adverb	<i>bwena</i>	good, fine, kind, friendly
phrase	<i>lumkola bwena</i>	feeling good
phrase	<i>lumkola mamwasila</i>	feeling fun
phrase	<i>migila bwena</i>	her/his face is good
noun	<i>gigila</i>	laughter

verb	<i>-gigila-</i>	to laugh
verb	<i>-yobweli-</i>	to be liked, to love
adjective	<i>-kalimwena</i>	proud and happy

For the "sad (lonely) situation" and the acting out of being "sad" clips the reactions of the two consultants are summarized in Table 14:

Table 14: Kilivila responses to "sad" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
phrase	<i>nanola emwau</i>	her/his mind is (heavy) sad
phrase	<i>gigisa mwau</i>	her/his face is (heavy) sad
phrase	<i>lumkola mwau</i>	feeling (heavy) sad
phrase	<i>lumkola gaga</i>	feeling bad
phrase	<i>kaikai vovola</i>	(miserable her/his body) s/he feels miserable
phrase	<i>evinuvinu bivalam</i>	s/he is close to crying
phrase	<i>migila valam</i>	her/his face - crying
adjective	<i>-valam</i>	crying
phrase	<i>egibugibu migila</i>	it is sad / dull / sullen her/his face
noun	<i>leya</i>	anger
phrase	<i>migila gubuluva</i>	her/his face is full of anger
verb	<i>-gumalava-</i>	to be lonely
verb	<i>-simaleta-</i>	to feel lonely
phrase	<i>katela ikivigi</i>	her/his heart is broken

Another means that Kilivila offers its speakers to refer to this emotional state is the noun "*tutamwau*" - "sadness, grief".

Note that in Roget's Thesaurus (Dutch 1968, entries 825 & 834) we find the entries "sad, weeping, low spirits, heaviness, ready to cry" and "miserable" under the main entries "Suffering" and "Dejection, Seriousness".

For the "sneaky situation" and the acting out of being "sneaky" clips the reactions of the two consultants are summarized in Table 15:

Table 15: Kilivila responses to "sneaky" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
adjective	<i>-tiriki</i>	tricky
nominalized adjective	<i>tovela, navela</i>	(male) thief, (female) thief
phrase	<i>bubunela gaga</i>	bad manners
phrase	<i>tau gaga</i>	bad man
phrase	<i>gigisa gaga</i>	bad looks
verb	<i>-gigila-</i>	to laugh
adjective	<i>-gilikimwala</i>	smiling
phrase	<i>lumkola -mitupipisi</i>	feeling like blinking eyes
phrase	<i>*lumkola mwau gubuluva</i>	feeling very angry
noun	<i>*gubuluva</i>	anger

For the "sorry situation" and the acting out of being "sorry" clips the reactions of the two consultants are summarized in Table 16:

Table 16: Kilivila responses to "sorry" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
adjective, adverb	<i>gaga</i>	bad
phrase	<i>lumkola gaga</i>	feeling bad
phrase	<i>bubunela gaga</i>	bad manners
phrase	<i>migila gaga</i>	bad face
phrase	<i>migila valam</i>	face like crying

phrase	<i>lumkola mwau</i>	feeling sad (heavy)
phrase	<i>migila gibugibu</i>	sad and dull face
phrase	<i>ekabelu evinuvinu migila</i>	her/his face is wry, close to crying
phrase	<i>migila gubuluva</i>	angry face
phrase	<i>migila kokola</i>	face full of fear
Noun	<i>kokola</i>	fear
nominalized adjective	<i>-velau</i>	thief

Another means that Kilivila offers its speakers to refer to this emotional state is the noun "*kapisila*" - "feeling sorry".

Note that in Roget's Thesaurus (Dutch 1968, entry 825) we find the entries "sorrow, grief, sadness, misery, unhappiness, heavy-laden, weeping, tearful" and "sad" under the main entry "Suffering".

For the "sure situation" and the acting out of being "sure" clips the reactions of the two consultants are summarized in Table 17:

Table 17: Kilivila responses to "sure" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
adjective, adverb	<i>bwena</i>	good
adjective	<i>-kabitam</i>	clever
adjective	<i>-pe'ula</i>	strong
phrase	<i>bogwa lanukwali</i>	I already knew
phrase	<i>lumkola gigila</i>	feeling like laughing
phrase	<i>lumkola bwena</i>	feeling good
phrase	<i>migila gigila</i>	laughing face
phrase	<i>migila mwamwasila</i>	face full of fun
phrase	<i>tau gaga</i>	bad man
verb	<i>-gubulua-</i>	to be angry

phrase	<i>migila kasigegina</i>	detached face
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Another means that Kilivila offers its speakers to refer to this emotional state is the verb "-*mokwita*-" - "to be sure, to be right".

For the "surprised situation" and the acting out of being "surprised" clips the reactions of the two consultants are summarized in Table 18:

Table 18: Kilivila responses to "surprised" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
phrase	<i>lumkola bwena</i>	feeling good
phrase	<i>lumkola kabitam</i>	feeling clever
adjective	<i>-kalimwana</i>	happy
verb	<i>-gigila-</i>	to laugh
adjective	<i>-gigila</i>	laughing
adjective	<i>-yana</i>	showing off
adjective	<i>-seaveaka</i>	showing off

Other means that Kilivila offers its speakers to refer to this emotional state is the phrase "*itutu nanola*" - "(it hammers her/his mind) "s/he is surprised", the noun "*yakaula*" - "surprise", the verb "*-kayou-*" - "to startle, to surprise", and the verb "*-seluve-PPIV-*" to surprise someone, to make someone afraid of something".

For the "thinking situation" and the acting out of being "thinking" clips the reactions of the two consultants are summarized in Table 19:

Table 19: Kilivila responses to "thinking" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
verb	<i>-nanamsa-</i>	to think
phrase	<i>migila makala nanamsa</i>	her/his face looks like

		thinking
adjective	<i>-nanamsa</i>	thinking
adjective	<i>-kabitam</i>	clever
adjective, adverb	<i>bwena</i>	good
adjective, adverb	<i>mwau</i>	heavy, sad
adjective, adverb	<i>gaga</i>	bad
phrase	<i>migila kaikai</i>	face looks miserable
phrase	<i>vovola kaikai</i>	body feels miserable
phrase	<i>elau vovola</i>	body feels lazy
phrase	<i>migila gasisi</i>	fierce / violent face
noun	<i>leya</i>	anger

Other means that Kilivila offers its speakers to refer to this emotional state are the verbs "*-doki-*" - "to think, to guess", "*-ka'isi-*" - "to suppose, to think, to suggest", "*-viseki-*" - "to guess, to think, to give an example", "*-pikwaku-*" - "to think of, to worry about", "*-yelu-*" - "to remember, to think of", and "*-kabitamu-*" - "to think something over".

For the "unfriendly (bullying) situation" and the acting out of being "unfriendly" clips the reactions of the two consultants are summarized in Table 20:

Table 20: Kilivila responses to "unfriendly" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
phrase	<i>sena gaga avaka evagi</i>	it is very bad what s/he is doing
phrase	<i>gala magila</i>	s/he does not want this
phrase	<i>tau / vivila gaga</i>	a bad /unfriendly man / woman
phrase	<i>gala bwena</i>	not good
adjective	<i>-gasisi</i>	fierce, violent
phrase	<i>migila egubuluva</i>	angry face

adjective	<i>-gubuluva</i>	angry, annoyed
phrase	<i>bubunela gaga</i>	bad manners
noun	<i>leya</i>	anger
adjective	<i>-yovai</i>	fighting
phrase	<i>sena kokorola</i>	much aversion

Note that in Roget's Thesaurus (Dutch 1968, entries 881 & 885) we find the entries "quarreling, bad manners, rude" and "grim" under the main entries "Enmity" and "Discourtesy".

For the "unsure situation" and the acting out of being "unsure" clips the reactions of the two consultants are summarized in Table 21:

Table 21: Kilivila responses to "unsure" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
phrase	<i>lumkola gaga</i>	feeling bad
adjective, adverb	<i>gaga</i>	bad
phrase	<i>gaga nanola</i>	bad mind
adjective, adverb	<i>bwena</i>	good
phrase	<i>lumkola gala bwena</i>	not feeling good
phrase	<i>lumkola bwena mamwasila</i>	feeling good and having fun
phrase	<i>bubunela bwena</i>	good manners
phrase	<i>bubunela gaga</i>	bad manners
verb	<i>-kapakala-</i>	to be reserved, withdrawn
adjective	<i>-kutabova</i>	quiet
phrase	<i>lumkola kalimwana</i>	feeling happy and proud
adjective	<i>-gubuluva</i>	angry

Another means that Kilivila offers its speakers to refer to this emotional state is the noun "wo'uya" - "unsureness".

For the "wanting situation" and the acting out of "wanting" clips the reactions of the two consultants are summarized in Table 22:

Table 22: Kilivila responses to "wanting" clips

PART OF SPEECH	KILIVILA EXPRESSION	ENGLISH GLOSS
adjective, adverb	<i>bwena</i>	good
adjective, adverb	<i>gaga</i>	bad
phrase	<i>bunela bwena</i>	god manners
adjective	<i>-gasisi</i>	fierce, violent
phrase	<i>lumkola mwau</i>	feeling sad
phrase	<i>nanola imwau</i>	s/he is sad
phrase	<i>migila gibugibu</i>	sad and dull face
adjective	<i>-gubuluva</i>	angry
verb	<i>-gilikimwala-</i>	to smile
adjective	<i>-kolimwana</i>	proud
adjective	<i>-seakava</i>	showing off

Another means that Kilivila offers its speakers to refer to this emotional state is the noun "*magi-PPIV*" - "wish, want".

We can summarize these results as follows:

- The Trobriand Islanders characterizations of the clips for the 5 emotion groups "Afraid, Angry, Sad⁷, Unfriendly" and "Thinking" overall agree with the "MREL" stimulus descriptions.
- The Trobriand Islanders characterizations of the clips for the 8 emotion groups "Disgusted" (feeling bad, like vomiting)⁸, "Kind" (feeling good, fine), "Fond" (good, bright, laughing), "Sorry" (sad, bad, crying), "Hurt" (sad, fear)⁹,

⁷ Note, however, that this acted out emotion was also interpreted as an expression of "anger".

⁸ Note, however, that this acted out emotion was also interpreted as an expression of "sadness, fear" as well as "anger".

⁹ Note, however, that this acted out emotion was also interpreted as an expression of "happiness".

"Happy" (fun, happy)¹⁰, "Bored" (gloomy, sleepy, dull miserable)¹¹, and "Excited" (good feeling, fun) come close to the "MREL" stimulus descriptions.

- The Trobriand Islanders characterizations of the clips for the 2 emotion groups "Sneaky" (theif, tricky) and "Liked" (fine, fun) are more or less in the realm of the "MREL" stimulus descriptions.
- The Trobriand Islanders characterizations of the clips for the 5 emotion groups "Sure" (clever, strong, laughing, writing) "Surprised" (clever, laughing, showing off), "Unsure" (feel happy, feel bad), "Wanting" (fierce, sad, proud), and "Interested" (bright, clever, anger) hardly agree or do not agree at all with the "MREL" stimulus descriptions.
- Persons acting in the clips for the emotion groups "Liked, Kind, Fond, Surprised" (6 tokens each), "Sure, Excited" (5 tokens each) and "Happy" and "Interested" (4 tokens each) were characterized as being "good".
- Persons acting in the clips for the emotion groups "Disgusted, Bored, Unfriendly" (6 tokens each), "Angry, Hurt, Sorry, Sad" (5 tokens each) and "Sneaky"¹² and "Unsure" (4 tokens each) were characterized as being "bad".
- Persons acted in the clips for the emotion groups "Afraid, Thinking" and "Wanting" were either characterized as being "good" or as being "bad".

Thus, the MREL elicitation tool reveals that the Trobriand Islanders refer to 15 out of 20 basic emotional states in more or less the same way as speakers of English do. These emotional states include analogues to English 'Afraid', 'Angry', 'Sad', 'Unfriendly', 'Thinking', 'Disgusted', 'Kind', 'Fond', 'Sorry', 'Hurt', 'Happy', 'Bored', 'Excited', 'Sneaky', and 'Liked'. It was unclear whether the Kilivila characterizations of the remaining 5 basic emotional states corresponded in any way to the English descriptions. These emotional states encompass the following: 'Sure', 'Surprised', 'Unsure', 'Wanting', and 'Interested'.

¹⁰ Note, however, that this acted out emotion was also interpreted as an expression of "sadness" as well as "anger".

¹¹ Note, however, that this acted out emotion was also interpreted as an expression of "disgust" as well as "sadness".

3.2 Results of the data elicitation with the "Ekman faces"

In this subsection I present the results of the data elicitation session during which I presented photos of the "Ekman faces" to my consultants asking them to name the emotions expressed on the faces. I list the 6 basic emotions presented in the 3 series of photographs (i.e., I also present the data I collected with the practice photos P 1-6), the consultants verbal reactions (some consultants produced two responses) and refer to the individual consultants with their number (see Table 2 above).

Table 23 presents the consultants' reactions to the photos depicting the emotion "Anger":

Table 23: Emotion: ANGER

Photo	Consultant(s)	Part of speech	Kilivila term	English gloss
P4	2,3,4,6,7,9,10	verb, adjective	<i>gubuluva</i>	(to be) furious
	6	adjective	<i>gaga</i>	bad
	1	verb	<i>etakenova</i>	he does not know
	5	phrase	<i>ala gigisa mwau</i>	his face is sad
	8	phrase	<i>ekebiga "a"</i>	he says "ah" (surprise)
	2	phrase	<i>gala magila</i>	he does not like it
	8	phrase	<i>egisi vavagi kwemanabweta</i>	he sees a beautiful thing
	F2	6,8,9	adjective	<i>gaga</i>
4,9		verb	<i>ekapwagega</i>	she opens her mouth
1		verb, adjective	<i>gubuluva</i>	(to be) furious
7		verb	<i>ekasigegina</i>	she shows her teeth angrily
2		verb	<i>eyakaula</i>	she is surprised
3		phrase	<i>ekebiga "wai"</i>	she says "wai" (disgust)
5		phrase	<i>sena ala leya</i>	her big anger
10		noun	<i>mayuyu</i>	pain
2		phrase	<i>etutu nanola</i>	she is impressed
3		phrase	<i>gala bwena</i>	not good
M6	8	phrase	<i>ekebiga "a"</i>	s/he says "ah" (surprise)
	3,7	verb	<i>emitupayuyu</i>	he closes his eyelid
	1	noun; adjective	<i>togasisi</i>	fierce man

¹² Note, however, that this acted out emotion was also interpreted as an expression of "happiness" as well as "anger"

	2	verb	<i>imitakavati</i>	he inspects sth.
	4	noun	<i>gigila</i>	laughter
	5	noun	<i>gibugibu</i>	sadness
	6	phrase	<i>nanola mwau</i>	his mind is sad, he is disappointed
	8	phrase	<i>ekebiga "a"</i>	he says "ah" (surprise)
	9	adjective	<i>bwena</i>	good
	10	phrase	<i>ala kokola</i>	his fear

This table shows that the consultants produced a broad variety of responses. Seven consultants (2,3,4,6,7,9,10) described the facial expression presented in P4 as expressing "Anger", three consultants (1,7,5) did that with photo F2, too, and just one consultant (1) did it with photo M6.

However, we also find descriptions of these photos that reveal that the consultants perceived the faces as expressing among other things "Sadness" (5,6), "Surprise" (8 (three times),2), "Dislike/Disgust" (2,3), "Fear" (10) and "Happiness" (4).

Table 24 presents the consultants' reactions to the photos depicting the emotion "Disgust".

Table 24: Emotion: DISGUST

Photo	Consultant(s)	Part of speech	Kilivila term	English gloss
P1	1,3,4,5,7,9	verb, adjective	<i>gubuluva</i>	(to be) furious
	2	verb	<i>etakenova</i>	he does not know
	6	adjective	<i>gaga</i>	bad
	8	verb	<i>isekila</i>	he does not know
	10	verb	<i>ekabelu</i>	he twists his mouth
F5	6,10	noun	<i>mayuyu</i>	pain
	7,9	noun	<i>kasigegina</i>	angrily showing teeth
	1	phrase	<i>esukwani bogina</i>	she smells a stench
	2	phrase	<i>gala magila bigisi</i>	she does not want to see
	3	adjective	<i>gaga</i>	bad
	3	phrase	<i>gasisi magila biweya</i>	fiercely / violently she will want to fight
	4	noun	<i>gigila</i>	laughing
	5	adjective	<i>mwau</i>	sad
	7	phrase	<i>la leya</i>	her (hot) anger
	8	noun	<i>kasiwelu</i>	uneasiness, fear

M5	1,4,9	verb, adjective	<i>gubuluva</i>	(to be) furious
	2	verb	<i>etakenova</i>	he does not know
	3	adjective	<i>gaga</i>	bad
	5	adjective	<i>mwau</i>	sad
	6	phrase	<i>bivutukokola gugwadi</i>	he will frighten children
	7	phrase	<i>Ikaikai vovola</i>	it worries her/him, it makes her/him lazy
	8	phrase	<i>ekebiga "eseki"</i>	he says "we'll see"
	10	adjective	<i>bwena</i>	good

We see that with the exception of one consultant (1 with photo F5) nobody describes the faces on the photos as expressing "Disgust". The descriptions show that the Trobriand Islanders perceived these faces also as expressing - among other things - emotions like "Anger" (1,3 (twice),4,5,7 (twice),6, 9 (twice), "Happiness" (4), and "Sadness" (5 (twice)).

Table 25 presents the consultants' reactions to the photos depicting the emotion "Fear".

Table 25: Emotion: FEAR

Photo	Consultant(s)	Part of speech	Kilivila term	English gloss
P6	2,4,8	Phrase	<i>eyou lopola</i>	it leaps the stomach = it makes his heart leap
	1	verb	<i>emitikavati</i>	he inspects
	3	phrase	<i>ekilali matala</i>	he opens his eyes
	5	verb	<i>isibalutuva</i>	he is frightened
	6	phrase	<i>gaga migila</i>	his face is bad
	7	phrase	<i>ala kokola</i>	his fear
	9	phrase	<i>matala imitupunapuna</i>	his eyes - he opens them angrily
	10	verb	<i>ekapakala</i>	he does not turn a muscle
F3	1,2,10	phrase	<i>ala kokola</i>	her fear
	5,8	phrase	<i>ikipwinipwini matala</i>	she stares angrily
	3	phrase	<i>egibugibu ala gigisa</i>	it is sad her sight
	4	phrase	<i>eyou lopola</i>	it makes her heart leap
	5	phrase	<i>ala leya</i>	her anger
	6	phrase	<i>gaga wala</i>	just bad

	7	phrase	<i>kaikai vovola</i>	tired is her body
	9	verb	<i>imitupunapuna</i>	she opens (her eyes) angrily
M4	1,6	noun,verb	<i>kokola</i>	(to) fear
	7,10	phrase	<i>ala kokola</i>	his fear
	2	phrase	<i>gala magila</i>	he does not want sth.
	3	phrase	<i>nanola mwau</i>	his mind is sad
	4	phrase	<i>eyou lopola</i>	it makes his heart leap
	5	verb, adjective	<i>gubuluva</i>	(to be) furious
	8	sentence	<i>kwetala vavagi egisi e magila tuvela bigisi</i>	he saw one thing and wants to see it again
	9	adjective	<i>bwena</i>	good

Five consultants (2,4,5,7,8) described the facial expression presented in P6 as expressing "Fear", four consultants (1,2,4,10) did that with photo F3 too, and five consultants (1,4,6,7,10) did it with photo M4. The Trobriand Islanders' hearts leap both for joy and for fear - this phrase is used by consultant 2, 4 (twice) and 8 to refer to the facial expression depicted on the photos.

However, the Trobriand Islanders perceived these faces also as expressing - among other things - emotions like "Anger" (5 (three times),8,9) and "Sadness" (3 (twice)).

Table 26 presents the consultants' reactions to the photos depicting the emotion "Happiness".

Table 26: Emotion: HAPPINESS

Photo	Consultant(s)	Part of speech	Kilivila term	English gloss
F1	1,3,4,5,6,7,8,9,10	verb, noun	<i>gigila</i>	to laugh, laughter
	3,4,5,7	noun	<i>to(mwa)mwasila</i>	man in a good mood
	2,8	verb, noun	<i>mwasawa</i>	Fun, love, surprise
	1	adjective	<i>kalimwana</i>	happy
	6	adjective	<i>bwena</i>	good
P2	1,2,3,5,6,7,8,9,10	verb, noun	<i>gigila</i>	to laugh, laughter
	1,4,8	noun	<i>na(mwa)mwasila</i>	woman in a good mood
	2	verb, noun	<i>mwasawa</i>	fun, love, surprise
M3	1,4,5,7,9	verb, noun	<i>gigila</i>	to laugh, laughter

	1,2,7,8,10	verb, noun	<i>mwasawa</i>	fun, love, surprise
	3,5	noun	<i>to(mwa)mwasila</i>	man in a good mood
	6	adjective	<i>bwena</i>	good

This table shows that all the consultants clearly perceive the faces on all the photos as expressing (something like) "Happiness" and that they also verbally refer quite consistently to this emotion, characterizing it with expressions that refer to laughing and laughter, fun, happiness and being in a good mood.

Table 27 presents the consultants' reactions to the photos depicting the emotion "Sadness".

Table 27: Emotion: SADNESS

Photo	Consultant(s)	Part of speech	Kilivila term	English gloss
P5	1,2,7,10	phrase	<i>nanola mwau</i>	his mind is sad
	5,8	noun	<i>gibugibu</i>	sadness
	6	verb	<i>bivalam</i>	he will cry
	3	verb	<i>emitupayuyu</i>	the eyelid goes down
	4	verb, adjective	<i>gubuluva</i>	(to be) furious
	9	adjective	<i>bwena</i>	good
F4	1,3,7,8	phrase	<i>nanola mwau</i>	her mind is sad
	4,5	noun	<i>gibugibu</i>	sadness
	2	phrase	<i>gibugibu nanola</i>	sadness on her mind
	9	verb, adjective	<i>gubuluva</i>	(to be) furious
	6,10	noun	<i>valam</i>	crying
M2	1,5	phrase	<i>nanola mwau</i>	his mind is sad
	3,7	noun	<i>gibugibu</i>	sadness
	6,10	noun, verb	<i>valam, bivalam</i>	crying, to cry
	6	noun	<i>mayuyu</i>	pain
	2	phrase	<i>ikaikai nanola</i>	it worries his mind
	8	phrase	<i>ebubusi mitilaqila</i>	they flow his tears
	9	phrase	<i>esisu edubaduba</i>	he sits motionless
	3,4	verb, adjective	<i>gubuluva</i>	(to be) furious
	5,6	adjective	<i>gaga</i>	bad

Seven consultants (1,2,5,6,7,8,10) described the facial expression presented in P5 as expressing "Sadness", nine consultants (1,2,3,4,5,6,7,8,10) did that with photo F4, and seven consultants (1,3,5,6,7,8,10) did it with photo M2. They also refer verbally

relatively consistently to this emotion, using Kilivila expressions for "sadness, being sad", and for "crying". However, three consultants (3,4,9) perceive these faces also as expressing "Anger".

Table 28 presents the consultants' reactions to the photos depicting the emotion "Surprise".

Table 28: Emotion: SURPRISE

Photo	Consultant(s)	Part of speech	Kilivila term	English gloss
P3	1,2,5,8	phrase	<i>eyou lopola</i>	it makes his heart leap
	3,4,6,7,9,10	phrase	<i>imitupwinapwina matala</i>	his eyes stare angrily
	2	verb	<i>isibalutuva</i>	she is surprised
	6	adjective	<i>gaga</i>	bad
F6	6,9,10	adjective	<i>bwena</i>	good
	1,4	phrase	<i>eyou lopola</i>	it makes her heart leap
	2	phrase	<i>magila bisakesi</i>	her wish she will give
	3	noun	<i>mwamwasila</i>	good mood
	5	adjective	<i>mwau</i>	sad
	5	verb, adjective	<i>gubuluva</i>	(to be) furious
	7	noun	<i>kokola</i>	fear
	8	sentence	<i>esisu vavagi kwemanabweta ekebiga "a"</i>	there is a beautiful thing (and) she says "ah"
M1	5,9	verb, adjective	<i>gubuluva</i>	(to be) furious
	1	phrase	<i>gaga leya</i>	bad hot anger
	2	adjective	<i>bwena</i>	good
	2	phrase	<i>senamagila</i>	he really wants sth.
	3	noun	<i>tobidadem</i>	ugly man
	4	phrase	<i>eyou lopola</i>	it makes his heart leap
	6	phrase	<i>kaikai vovola</i>	tired is his body
	7	phrase	<i>emitupwinapwina evitukokola</i>	he stares angrily and frightens (somebody)
	8	verb	<i>evalam</i>	he cries
	10	phrase	<i>nina mwau</i>	his mind is sad

Four consultants (1,2,5,8) described the facial expression presented in P3 as expressing "Surprise", 3 consultants (1,4,8) did that with photo F6, too, and 1 consultant (4) did it with photo M1 (if we interpret the phrase "it makes her/his heart leap" as a 'surprise' reaction). The majority of the consultants, however, perceives these faces also as expressing among other things "Anger, Sadness", and "Fear".

We can summarize these results as follows:

- The only emotion expressed in all the respective "Ekman faces" stimuli which was perceived by all consultants in the predicted way was "Happiness".
- Seven consultants perceived stimuli for the emotion "Sadness" in the predicted way for stimulus P5, nine for stimulus F4 and seven for stimulus M2. Consultants also interpreted the stimuli among other things as expressions of "Anger".
- Five consultants perceived stimuli for the emotion "Fear" in the predicted way for stimulus P6, four for stimulus F3, and five for stimulus M4. Consultants also interpreted the stimuli among other things as expressions of "Anger" and "Sadness".
- Seven consultants perceived stimuli for the emotion "Anger" in the predicted way for the stimulus P4, three for the stimulus F2 and one for the stimulus M6. Consultants also interpreted the stimuli among other things as expressions of "Sadness, Surprise, Disgust (Dislike)", and "Happiness".
- Four consultants perceived stimuli for the emotion "Surprise" in the predicted way for stimulus P3, three for stimulus F6, and one for stimulus M1. Consultants also interpreted the stimuli among other things as expressions of "Anger, Sadness", and "Fear".
- One consultant perceived the stimulus F5 for the emotion "Disgust" in the predicted way. Otherwise, the consultants interpreted these stimuli among other things as expressions of "Anger, Happiness", and "Sadness".
- The consultants randomly characterized the faces depicted on the "Ekman faces" stimuli cards either as "good" or "bad".

4. Discussion and a criticism of methods in researching the facial expression of emotions

After the presentation of the data gathered with the "Ekman faces" photos and the "Mind Reading Emotions Library (MREL)" as elicitation tool I now want to provide first answers to the questions asked in the introduction.

4.1 How "effable" are emotions (that are claimed to be basic) or can we Observe ineffability - the difficulty or impossibility of putting experiences into words - within the domain of emotions?

According to my own competence in Kilivila I expected that the consultants would use the adjective "*gubuluva*" (furious), the verb "*-gubuluva-*" (to be furious) and the nouns "*gibuluva*" or "*leya*" (both: hot anger) to refer to "Anger", the verb "*-peki-*" (to abhor, to dislike) and the noun "*minena*" (bad taste, disgust, aversion) to refer to "Disgust", the verb "*-kokola-*" (to fear) and the noun "*kokola*" (fear) to refer to "Fear", the nouns "*kalimwana*" and "*mwasawa*" (both: happiness, fun; also: surprise) and the verb "*-mwasawa-*" (to be happy) to refer to "Happiness", the nouns "*tutamwau*" and "*gibugibu*" (both: sadness) and the phrase "*nanola (i)mwau*" (her/his mind (is) sad) to refer to "Sadness", and the noun "*yakaula*" and the phrase "*itutu nanola*" (her his mind is impressed / surprised) to refer to "Surprise".

However, the data presented above document that Kilivila has many more different verbal means to refer to the expression of emotions (see also Senft 1998). Thus, with respect to the language of the Trobriand Islanders, emotions are a domain where we cannot observe ineffability - on the contrary, Kilivila has a rich inventory of terms (nouns, verbs, adjectives and idiomatic phrases and expressions) to precisely refer to, and to differentiate, emotions and inner feelings. In the Appendix I present more expressions for emotions which I elicited in 2006 and during my field research on the Trobriands ever since 1982.

4.2 Do consultants agree with one another how they name emotions?

The fact that Kilivila provides its speakers with a broad inventory of verbal means to refer to emotions has consequences for the consistency of the consultants'

responses and thus for the codability of emotions. In their responses to the "Ekman faces" stimuli all consultants agreed in naming the facial expression of "Happiness" in the predicted way, and the majority of the consultants agreed in naming the facial expression of "Sadness" in the predicted way. However, there is hardly any consistency in my consultants naming the other facial expressions for the four emotions "Fear, Anger, Surprise", and "Disgust" displayed in the "Ekman Faces" stimuli. The rank order of the other "basic" emotions that were perceived by my consultants in the predicted way is:

Happiness	>	Sadness	>	Fear	>	Anger	>	Surprise	>	Disgust
(10/10/10)		(7/9/7)		(5/4/5)		(7/3/1)		(4/3/1)		(0/1/0)

The numbers below the names for the emotions indicate the number of consultants that perceived the three "Ekman faces" stimuli in the predicted way.

However, I have to point out once more that some consultants interpreted

- stimuli for Sadness as stimuli for Anger,
- stimuli for Fear as stimuli for Anger and Sadness,
- stimuli for Anger as stimuli for Sadness, Surprise, Disgust, and even Happiness,
- stimuli for Surprise as stimuli for Anger, Sadness and Fear, and
- stimuli for Disgust as stimuli for Anger, Happiness, and Sadness.

However, the results of the pilot study which I conducted with just two consultants using the "Mind Reading Emotions Library (MREL)" stimuli revealed that the consultants there referred to 15 out of 20 basic emotional states in more or less the same way as speakers of English do. These emotional states include analogues to English 'Afraid', 'Angry', 'Sad', 'Unfriendly', 'Thinking', 'Disgusted', 'Kind', 'Fond', 'Sorry', 'Hurt', 'Happy', 'Bored', 'Excited', 'Sneaky', and 'Liked'. This observation - anecdotal as it may be - has consequences for answering the last question I pose in this paper.

4.3 Are facial expressions or situations better cues for labeling?

In my description of the MREL in section 2 of this paper I quoted Baron-Cohen's and his co-workers' definition of Emotions as "states of mind that arise as a result of specific experience and drive us to take action. Although emotions exist in the mind and so are essentially unobservable, they are frequently revealed through facial expressions, voice, posture and gesture..." (Mind Reading Emotions Library User Guide 2004: 6). This quote illustrates that emotions are not just displayed with facial expressions; on the contrary, the expression of emotions and inner feelings is done in "complex behaviour patterns" (Eibl-Eibesfeldt 1989: 492) which control and regulate not only facial expressions, but also posture and position of the body, muscular tonus, gesture, speech utterances, voice, pitch, personal distance between interactors (proxemics; see Hall 1966), eye-contact or its avoidance, skin temperature, pulse rate, etc. Some of the expressive motor patterns that constitute these behaviour patterns are "fixed action patterns" that are innate - as proven in research on the expressive behavior of deaf-and-blind-born children (Eibl-Eibesfeldt 1973; also 1989: 466, 492), many other of these behaviour patterns are ritualized in culture specific ways (Eibl-Eibesfeldt 1989; 546f.). Even if we accept Ekman's claim that there is a set of basic emotions, these basic emotions are expressed not just in the face, but in much more complex interactional behaviour patterns - which may have even evolved into (ritualized) interaction strategies (see Eibl-Eibesfeldt 1989: 520f.; 546f.). Therefore, photographs of static facial expressions seem to be a rather inadequate means to elicit terms for the emotions claimed to be expressed by these "frozen" facial expressions. I think the results of that part of my study on expressions for the emotions in Kilivila that used the "Ekman Faces" stimuli has clearly shown the inadequacy of this elicitation tool. These results also refute Ekman's strong claim quoted in the introduction to this paper, namely that "[r]egardless of the language, of whether the culture is ... industrialized or preliterate, facial expressions are labeled with the same emotion terms" (Ekman 1973: 220). This is clearly not the case - neither across languages - as the comparison of Kilivila and English shows, nor within a language - as the Kilivila data presented above show.

However, If we look at the results of the exploratory pilot study, it seems that tools like the "Mind Reading Emotions Library" with film clips and especially with film clips where emotions are enacted within a brief context, thus being contextualized in

an instance of a specific social interaction are a more adequate tool to do research on the language of emotions.

But I have to concede here that the emotion clips of the MREL are "staged" by professional actors - so they are not "the real thing" so to speak, but a kind of "fictive" emotion (if this analogy to the literary sciences may be permitted). The best way to falsify - or verify - universal claims à la Ekman would be to gather film documents of how members of various cultures express emotions in everyday interactions. However, then we have to answer the question how the persons expressing these emotions and their interactors would classify and label what they were doing and whether or not other members of this (sub-)culture would validate their classification and their choice of an emotion term. Moreover, we have to find out what people really do when they (claim that they) refer to emotions. Do they specify an emotion or rather the cause(s) of a felt (?) or sensed (?) inner state or do they refer to a learned cultural concept that is said to be adequate in a given, described situation?

Thus, we are faced with severe methodological problems, if not dilemmata, which we have to overcome in some way or another if we really want to do more adequate research on the expression of, and the reference to, emotion in various languages and cultures than the research that has been done so far.

Appendix:

This appendix first presents additional expressions for the emotions and inner feelings in Kilivila, which I have been eliciting during my field-research on the Trobriand Islands ever since 1982. Then I will list those phrases that are used to express emotions and inner feelings on the Trobriands with data which I already published in Senft (1998). The following first part orders the Kilivila expressions alphabetically (note: CP is the abbreviation for “Classificatory Particle”, “classifier”):

<i>CP-bugumata</i>	passive
<i>-dubomem-</i>	to be enthusiastic
<i>-dubumi-</i>	to be believing
<i>kaiwada</i>	jealousy, envy
<i>-kamamalu-</i>	to be impatient, to be stubborn
<i>CP-kamamalu</i>	impatient, stubborn
<i>CP-kamokwita</i>	serious, honest
<i>CP-karevaga</i>	responsible
<i>-kasemwali-</i>	to tease
<i>-kateta-</i>	to be sure
<i>CP-kateta</i>	sure
<i>-katubayasa-</i>	to prepare, to be prepared
<i>-katumigile'u-</i>	to be determined
<i>CP-katupoi</i>	questioning
<i>CP-kokorogu</i>	hated
<i>CP-koliuwoyala</i>	undecided
<i>-komta'ela-</i>	to be competitive
<i>-komwayaba-</i>	to be flirtatious
<i>kopatu</i>	guilt
<i>CP-kopatu</i>	guilty
<i>-kopatu-</i>	to be guilty
<i>CP-koyayola</i>	bossy
<i>CP-lalasi</i>	to be generous
<i>-lesigi-</i>	to be/feel provoked
<i>-lotupa-</i>	to be pushy

<i>CP-luavala</i>	argumentative
<i>CP-luluvai</i>	remembering, sentimental
<i>-makiusa-</i>	to be nervous
<i>CP-mekita</i>	mean
<i>-mesisi-</i>	to be panicked, to be terrified
<i>migile'u</i>	attractive
<i>-mitikipoi-/mitikipoki-</i>	flirt, wink
<i>-mitubilibili-</i>	to flirt, to twinkle
<i>mmwasila</i>	shyness
<i>-mnitakavati-</i>	to be watchful
<i>CP-nagoa</i>	silly
<i>CP-namakava</i>	passive
<i>-nanali-</i>	to be bad, to worry, to be jealous
<i>CP-nanamsa</i>	decided, thoughtful
<i>-nigada-</i>	to request, to ask (form sth.), to be greedy
<i>CP-nigada</i>	greedy
<i>-ninayua-</i>	to behave cowardly, to feel like a coward
<i>CP-pilasi</i>	helpful
<i>-pipisi-</i>	to flirt, to twinkle, to blink
<i>-pogi-</i>	to fear, to be jealous, to poison
<i>-polu-</i>	to boil, to worry, to be jealous
<i>pugipogi</i>	envy, jealousy
<i>CP-salau</i>	busy, restless
<i>-silagi-</i>	to be desperate
<i>-simakava-</i>	to be / feel tense
<i>-subobuta-</i>	to be lucky
<i>-sivadulu-</i>	to be attracted
<i>-somata-</i>	to be tired
<i>-sopa-</i>	to lie, to joke, to be humorous
<i>-tayubani-</i>	to persuade
<i>-tuvalova-</i>	to be sang-froid
<i>-uliweli</i>	unjust, jealous
<i>uliweli</i>	marital jealousy
<i>-vesabu-</i>	to seduce, to feel seduced

<i>CP-vesabu</i>	seductive
<i>-vitusi-</i>	to be watchful, to be concentrated
<i>-wali-</i>	to be jealous
<i>CP-wali</i>	jealous
<i>CP-yokaikai</i>	passive
<i>CP-yovai</i>	aggressive

Tome'uda, one of my consultants in Losuia, rightly pointed out to me

Tommota si lumkola e-sisu-si nano-si, vovo-si, lopo-si.
 people their feeling 3.-be-PI mind-their body.their belly-their
 The peoples' feelings are (located) in their mind, in their body, (and) in their belly.

The following phrases illustrate this general observation:

<i>ala lumkola balau</i>	his/her feeling (is) laziness; s/he is lazy
<i>balau vovogu</i>	laziness (of) my body, I am lazy
<i>nanola gala ekau</i>	her/his mind (does) not take (it); s/he is unimpressed
<i>tegala kasai</i>	her/his ear is hard, s/he is inattentive, s/he is feigning deafness, being angry
<i>nanola gala ibwadi</i>	her/his mind (does) not fit (with this), s/he is shocked
<i>katela ikivigi</i>	her/his lung it breaks; s/he feels heartbroken

In Senft (1998) I listed the following phrases (for further details consult this paper and Senft 1986: 311; 335f.; 415f.):

<i>ibisibasi vokuva vovogu</i>	I am racked with pain
<i>ikai'iki vovogu</i>	I am working hard and get tired
<i>imama vovogu</i>	I feel weak
<i>imwana vovogu</i>	I am happy
<i>itau vovogu</i>	I am relieved
<i>itoki vovogu</i>	I feel overburdened
<i>itutu vovogu</i>	I am excited

<i>itutuvakau vovogu</i>	I am experienced
<i>vovogu yuviyavi</i>	I am feverish
<i>dabagu gidageda</i>	I have a headache
<i>mtona dabasi tommota</i>	this is a wise person
<i>ibulumse'u dabala</i>	s/he lost his head, s/he is confused
<i>pe'ula dabala</i>	a confident person
<i>kasai dabala</i>	a stupid person
<i>dabala yuviyavi</i>	s/he is feverish
<i>matala ibiriuya</i>	s/he is unconscious, s/he is fainting, his/her eyes are distorted.
<i>iudu vadola</i>	s/he cannot keep his/her mouth shut, s/he is a hypocrite
<i>ininaki lopogu</i>	I keep it quiet/to myself
<i>ikapisi lopola</i>	s/he is sorry, s/he mourns, s/he feels pity with someone
<i>gala nanogu pela bagula,</i>	I do not want to work in the garden,
<i>nanogu mwasawa</i>	I would like to have fun.
<i>ida'ila nanom</i>	it changes your mind; it remembers your mind
<i>ikaikai nanosi</i>	it irritates them
<i>bikalisau nanom</i>	it will charm you; you will steal sth.
<i>ikanta'ila nanodasi</i>	it convinces us, it persuades us
<i>ikamituli nanogu</i>	I admit (reveal, report)
<i>ikatotila nanom</i>	you are determined (to do something)
<i>ikavisi nanosi</i>	they are fascinated
<i>ikitu nanola</i>	s/he withdraws within her/himself, s/he is afraid
<i>iluvai nanogu</i>	I remember
<i>bimanum nanomi</i>	you won't be angry (your minds will be soft)
<i>gala bimau nanom</i>	don't worry
<i>imimi nanogu</i>	I dream; I make magic
<i>ipani nanosi</i>	it confuses them (it mixes them up)
<i>ipolu nanom</i>	it makes you jealous

<i>isavali nanom</i>	you think it over
<i>isim nanogu</i>	I am conscious of (something)
<i>isinapu nanogu</i>	I tell fibs, I swindle
<i>isipolu nanogu</i>	I dream, I imagine
<i>isivili nanodasi</i>	it changes our minds, it converts us, it turns us away (from someone)
<i>isugwa nanogu</i>	I am overindulgent, it is very sweet and tasty
<i>itaboda nanom</i>	you are blockheaded, you are stultified
<i>itagwala nanogu</i>	I agree
<i>itaki nanola</i>	s/he is obsessed
<i>itamwau nanogu</i>	I forgot it, it slipped my memory
<i>itavilisi nanosi</i>	they reconsider it
<i>iteya nanom</i>	it confuses you; it "cuts" your mind
<i>ateya nanola</i>	I change her/his mind, I turn her/his mind, I charm her/him
<i>itutuvakau nanosi</i>	they are very much impressed
<i>ivagi nanogu</i>	it influences me
<i>ivakavili nanom</i>	it turns your mind against something/someone
<i>iweya nanola</i>	s/he remembers (something)
<i>iyelu nanogu</i>	I long for it, I am inspired with it
<i>iyogagi nanola</i>	it upsets her/him, (it spoils her/him)
<i>iyokwaisi nanodasi</i>	we rack our brains (over something)
<i>bala nanogu</i>	I will have an idea
<i>mtona gala nona</i>	he is senseless, he is stupid

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