DIFFERENCES OF THOUGHT FROM A CROSS-CULTURAL PERSPECTIVE

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first publication

1 Dahl, S.: Communication and Culture Transformation. European Univ., Barcelona, http://www.steph-web.com/capstone/ © 2001 Maria Egidio.

2 Maletzke, G.: Interkulturelle Kommunikation. Opladen: Westdt. Verl. 1996, p. 16.

3 McQuail, D.: Mass Communication Theory. London: Sage 1994, p. 100.

4 Victor, D.A.: International Business Communication. New York: Harper Collins 1992, p. 6.

5 Fisher, G.: Mindsets: The Role of Culture and Perception in International Relations. Yarmouth: Intercultural Pr .1988.

6 Dahl 2001, p. 9.

7 Ibid.

1. Defining Culture

In order to clarify the meaning of the word ›culture‹, we have to go back to history and philosophy to seek different interpretations of the word. In the early stages of the philosophical debate about what ›culture‹ is, the term often refers to the opposite of ›nature‹, something constructed willingly by men, whereas ›nature‹ was given in itself. The word »culture« comes from the Latin *colere*, which can be translated as »to cultivate, to build on or to foster«. Leibnitz, Voltaire, Hegel, von Humbold, Kant, Freud, Adorno, Marcuse and others have reflected on the meaning of the word in different versions of its use.[1]

Later on, the word »culture« emerged more in the sense of »products that are worthy«: somewhat reduced to Dürer, Goethe and Beethoven. The term was used to describe elite and high-culture concepts, particularly in continental Europe in the 18th century. This definition of culture is still vivid; Rickert, in *Kulturwissenschaft und Naturwissenschaft* (*The Science of Culture and the Science of Nature*), defines culture following the elitist approach: »

> Gesamtheit der realen Objekte, an denen allgemein anerkannte Werte oder durch sie konstruierte Sinngebilde haften und die mit Rücksicht auf die Werte gepflegt werden.
> [The totality of real objects, to which the general values, or sense constructions of those, are related, and which are cared for with regards to the values.][2]

Also during the mid-nineteenth century, there emerged the concept of mass culture and popular culture, fueling the critical theory of the Frankfurt School and the Birmingham School. In the words of Stuart Hall of the Birmingham School, ›culture‹ is »both the means and values which arise among distinctive social groups and classes, on the basis of their given historical conditions and relationship, through which they ›handle‹ and respond to the conditions of existence«.[3]

According to Geert Hofstede, culture is »the collective programming of the mind«.[4] This view of culture focuses on culture as a set of values and attributes of a given group, and the relation of the individual to the culture, and the individual's acquisition of those values and attributes. Fisher defines culture as:

> [...] shared behavior, which is important because it systematizes the way people do things, thus avoiding confusion and allowing co-operation so that groups of people can accomplish what no single individual could do alone. And it is behavior imposed by sanctions, rewards and punishments for those who are part of the group.[5]

In the context of this paper, culture will be understood »as a collectively held set of attributes, which is dynamic and changing over time«.[6] Culture will be defined as the totality of the following attributes of a given group (or subgroup): shared values, beliefs and basic assumptions, as well as any behavior arising from those. The term ›group‹ not only refers to a nation, but to supranational and international groups, which are clearly distinguishable as well.

Finally, as Dahl states,[7] it is important to consider the individual's role in a culture. On the one hand, the individual determines its culture, on the other, it is determined by its culture. As the individual contributes to the culture around him, he will be part of the cultural change.

8 Kluckhohn, F.R./Strodtbeck, F.L.: Variations in Value Orientations. Evanston/IL: Row & Peterson 1961.

2. Anthropological Approach: The Value Orientations Method

In order to increase understanding within and between cultural groups in the United States and abroad, anthropologists of the *Harvard Values Project*[8] developed a model labeled as the *Value Orientations Method*. This method serves as a tool that allows groups to examine, compare and contrast the underlying ›orientations‹, or world views, which shape how they perceive one another and the issue at hand. The model is based on three primary assumptions:

1.   »There is a limited number of common human problems for which all people at all times must find some solution«, including the character of innate human nature, the relation

9 Kluckhohn Center for the Study of Values: The Values Orientations Method. Bellingham/WA., http://members.aol.com_ht_a/frkvalues/method.htm (2001).

10 E.g., Carter, R.T.: Cultural Value Differences between African Americans and White Americans. In: Journal of College Student Development 1990, p. 31, pp. 71-79.

11 E.g., Russo, K.W.: A Sharing of Subjectivities: The Values Project Northwest. In: Russo, K.W. (Ed.): Finding the Middle Ground: Insight and Applications of the Value Orientations Method. Yarmouth/ME: Intercultural Pr. 2000, pp. 165-177.

of man to nature, the temporal focus of human life, modality of humankind's relationship to other people and the modality of human activity. The answers to these five concerns are called »value orientations« and can be interpreted as »core values«.

2. »While there is variability in solutions of all the problems, it is neither limitless nor random but is definitely variable within a range of possible solutions.«

3. »All alternatives of all solutions are present in all societies at all times but are differentially preferred.«9

By means of individual oral interviews, the value orientations of each group could be identified. There follows a series of workshops, where the groups come together to discuss the similarities and differences in their orientations. During this process, the participants develop effective communication skills, trust, and cooperative action plans which integrate new cross-cultural understanding into their working relationships.

All of the five concerns were put in question form to the participants of the personal interviews. According to the responses, the patterns of preference which guide the life of a population were drawn out. These orientations, while culturally held as what is »most true and right«, are often unvoiced, and may not even be consciously articulated.

Concerns/Orientations		Possible Responses	
Human Nature: What is the basic nature of people?	**Evil.** Most people cannot be trusted. People are basically bad and need to be controlled.	**Mixed.** There are both evil people and good people in the world, and you have to check people out to find out which they are. People can be changed with the right guidance.	**Good.** Most people are basically pretty good at heart; they are born good.
Man-Nature Relationship: What is the appropriate relationship to nature?	**Subordination to Nature.** People really cannot change nature. Life is largely determined by external forces, such as fate and genetics. What happens was meant to happen.	**Harmony with Nature.** Man should, in every way, live in harmony with nature.	**Dominant over Nature.** It is the great human challenge to conquer and control nature. Everything from air conditioning to the »green revolution« has resulted from having met this challenge.
Time Sense: How should we best think about time?	**Past.** People should learn from history, draw the values they live by from history, and strive to continue past traditions into the future.	**Present.** The present moment is everything. Let's make the most of it. Don't worry about tomorrow: enjoy today.	**Future.** Planning and goal setting make it possible for people to accomplish miracles, to change and grow. A little sacrifice today will bring a better tomorrow.

Table 1. Description of Five Common Human Concerns and Three Possible Responses (based on Kohls 1981).

Most studies of the dominant Euro-American culture in the United States find that it is future-oriented, focused on doing, emphasizes individualism, aspires to be dominant over nature, and believes that human nature is mixed, some people are good and some are bad.10 By contrast, most studies show that native cultures are past-oriented, focused on being, emphasize collateral (group) relations, aspire to be in harmony with nature, and believe that people are fundamentally good.11

12 Gallagher, T.J.: The Value Orientations Method: A Tool to Help Understand Cultural Differences. In: Journal of Extension 39/6 (December 2000), http://www.joe.org/index.html © Copyright by Extension Journal, Inc. ISSN 1077-5315.

13 Slobin, D.: From »Thought and Language« to »Thinking and Speaking«. In: Gumperz, John J./Levinson, Stephen C. (Eds.): Rethinking Linguistic Relativity. Cambridge: Cambridge UP 1996, pp. 70-96.

14 Ibid., p. 70.

15 Gumperz/Levinson 1996, p. 25.

16 Clark, A.: Being There: Putting Brain, Body, and World Together Again. Cambridge/MA: The MIT Pr. 1997, p. 195.

17 Sapir, E.: Language. New York, Harcour: Brace and World 1921; Slobin 1996, pp. 70-96.

Furthermore, each culture will express all three possible responses at some time. It is common for Euro-Americans to have a »doing« orientation during the workweek but to have a »being« orientation on weekends and while on vacation. The VOM theory recognizes that there is diversity within a culture – both among subgroups and individuals – and that degree of acculturation matters.[12]

3. Linguistic Approach: Does Language Shape Thought?

Languages differ dramatically from one another in terms of how they describe the world. Each language differs from the next in innumerable ways: from obvious differences in pronunciation and vocabulary to more subtle differences in grammar. It is interesting to analyze whether having different ways of describing the world leads speakers of different languages also to have different ways of thinking about the world.

Experiments suggest that the relevant issue is not so much thought (a static notion) as thinking, i.e. the specific task one is performing (a more dynamic notion). In particular, when you are expressing thoughts in a particular language, you necessarily have to respect the important categories of that language, but if you wish you can include whatever extra information you want to.[13]

3.1. The Whorfian Theory

The roots of the current Whorfian hypothesis go back to the German educator Wilhelm von Humboldt's study of linguistic relativity and determinism early in the last century.[14] According to Humboldt, languages differ from one another; thought and language are inseparable; and, therefore, each speech community embodies a distinct world-view.

Benjamin Whorf extended this doctrine of linguistic determinism to describe the roles of language and thought in human development. Bringing the idea to a new and heavy mix of empiricist epistemology, Whorf placed emphasis on the unconscious influence of language on habitual thought. The Whorfian hypothesis can therefore be summarized as follows:

> 1. Different language utilizes different semantic representation systems, which are informationally non-equivalent (at least in the sense that they employ different lexical concepts);
> 2. semantic representations determine aspects of conceptual representations; therefore
> 3. users of different languages utilize different conceptual representations.[15]

3.1.1. Whorfian Hypothesis on a Personal Level

Observing and recording the ongoing speech of a group of children between the ages of 5 and 10, cultural linguists Bivens and Berk made an experiment. They discovered that the incidence of private speech increased when the child was alone and trying to perform some difficult task. In subsequent studies, the researchers learned that those children who made the greatest numbers of self-directed comments were the ones who mastered the tasks best. Hence, Bivens and Berk concluded that self-directed speech is a crucial cognitive tool that allows us to highlight the most puzzling features of our environments.[16] The Whorfian hypothesis can therefore be argued to exist on a personal level.

3.2. Cross-Cultural Wordplay

Let us take the following statement: »The elephant ate the peanuts.« We must include tense in English for showing that the event happened in the past. In Indonesian and Mandarin, indicating when the event occurred would be optional and would not have to be included in the verb. In Russian, the verb would need to include tense and in the past tense also the indication whether the peanut-eater was male or female, as well as whether the peanut-eater ate all of the peanuts or just some of them. In Turkish, one would specify (in a suffix to the verb) whether the eating of the peanuts was witnessed or if it was hearsay. It appears that speakers of different languages have to attend to and encode strikingly different aspects of the world in order to use their language properly.[17]

18 Slobin 1996, p. 71.

19 Ibid.

20 Ibid., p. 71.

Cultural linguist Franz Boas catalogued a great diversity of obligatory grammatical categories across languages in the introduction to his *Handbook of American Indian Languages*.[18] For example, Boas discussed the English sentence »The man is sick«, and noted that in Siouan one would have to indicate, grammatically, whether the man is moving or at rest.[19] In Kwakiutl one would have to indicate whether the man in question is visible or non-visible to the speaker. In Eskimo, one would simply say, »man sick«, with no obligatory indication of definiteness, tense, visibility, or location. Boas' concept can be extended to other languages such as Spanish where one must indicate whether the man is temporarily or chronically sick. In many other European languages one cannot indicate definiteness other than gender.[20]

3.3. The Metaphor TIME as SPACE across Languages

21 Levinson, S.: Frames of Reference and Molyneux's Question: Crosslinguistic Evidence. In: Bloom, P./Peterson M. (Eds.): Language and Space. Cambridge/MA: MIT Pr. 1996, pp. 109-169.

One can note dramatic cross-linguistic differences in the way languages describe spatial locations. Whereas most languages (e.g. English, Dutch) rely heavily on spatial terms to describe the relative locations of objects (e.g. left/right, front/back), Tzeltal (a Mayan language) relies primarily on absolute reference (a system similar to the English north/south direction system). Spatial locations that are north are said to be downhill, and those that are south are said to be uphill.[21]

Languages also differ from one another in their descriptions of time. While all languages use spatial terms to talk about time (e.g. »looking forward to seeing you«, »falling behind schedule«), different languages use different spatial terms. We will look at the following dimensions of space and their metaphorical mappings in time: orientation of the time-line, shape of the time-line, position of times relative to the observer, and time as motion.

3.3.1. Dimensionality of the Time-Line

22 Radden, G.: The Metaphor Time as Space across Languages. Baumgarten, Zeitschrift für Interkulturellen Fremdsprachunterricht (2003), pp. 227-229.

In metaphorising time as space we have to take into consideration that while time is usually illustrated as a one-dimensional line, the time-line, space has three dimensions with 3 axes: a longitudinal, a vertical and a horizontal axis.

The preference for the longitudinal axis may be due to our spatial experience of motion, which is almost invariably directed to the front. The front-back orientation of time appears in expressions, such as »the weeks ahead of us« or »the worst is behind us«. In Western cultures, the front-back orientation predominates in temporal scenes. We do not see a vertical or lateral movement underlying temporal expressions such as »this coming week« or »the days gone by«, or »the following week«, i.e., we do not visualize a month approaching from above or from the left side.

In Chinese, the vertical axis commonly applies conceptualizing time. Earlier times are viewed as »up« and later times as »down«. Thus *shànyuè* (up.month) means last month and *xiàyuè* (down.month) means next month.

Western cultures may conceptualize earlier times as »up« and later times as »down«. The older generations of the family tree are at the top and described as »ascendants«, while the younger generations are at the bottom and described as »descendants«.[22]

3.3.2. Shape of the Time-Line

23 Ibid., p. 229.

If we are looking for spatial shapes of the time-line, we will soon find out that there are only two geometrical *gestalts* in use: a straight line and a full or partial circle. A circle as a two-dimensional form is ideally suited to represent recurrent, cyclic time. The notion of cyclic time is often associated with exotic languages, but it is far from uncommon in Western languages. This is well reflected in the proverbial expression »History always repeats itself«. The only time unit which is readily understood as circular in English is the year while days require specific wordings: »Guided tours are offered year-round«, »Unser Geschäft ist geöffnet rund um die Uhr« (»Our shop is open round the clock«), or »he slept round the day«. The circular understanding of a 24-hour day is iconically motivated by the round shape of the clock, although the pointer normally goes round the clock twice in 24 hours.

As we can observe, »a full circle suggests the repetition of the same time or event, a sector suggests taking new direction away from a line or circle. This is the case with expressions like »turn of the century« or »to turn twenty«.[23]

24 Yu, N.: The Contemporary Theory of Metaphor: A Perspective from Chinese. Amsterdam: Benjamins 1998, p. 95.

25 Miracle, A.W. Jr./Dios Yapita Moya, J. de: Time and Space in Aymara. In: Hardman, M.J. (Ed.): The Aymara Language and its Social and Cultural Context. Gainesville/FL: UP of Florida 1981, pp. 33-56.

26 Klein, H.E.M.: The Future Precedes the Past: Time in Toba. In: Word 38 (1987), pp. 173-185.

3.3.3. Position of Times Relative to the Observer

As in the world of space, the ego occupies a prominent role as the temporal reference point. The predominant view of time as a time-line allows a distinction between three times: present, past and future. The idea of »present time« may also be elaborated by descriptions of the ways humans experience things in their immediate vicinity, as in the Chinese expressions for »present time«: »on hand.existing«, »just at.front«, »eye.front«, »eye.below«, »eye.underneath«, »eye.face.front« and »foot.under«.[24]

The pattern predominantly found across languages is that of the horizontal time axis and, especially in Western languages, of the future as being in front of an imaginary observer. The following descriptions of static situations illustrate our standard arrangement with the future in front of us and the past behind us »I can't see the future«, »troubles lie ahead«, or «I am looking forward to seeing you«. As for the past: »That's all behind us now« or »that was way back in 1900«.

The future may also be seen as lying behind and the past as lying in front of the observer. The logic of this arrangement is that we can »see« or know the past but not the future. Miracle and Moya[25] and Klein[26] found this model in the Indian languages Aymara and Toba which are spoken in Peru and Bolivia, respectively. In Aymara, the past is rendered as »nayra timpu« (eye time, i.e., the time before my eyes) and tomorrow as »q'ipi uru« (back day, i.e., the day at my back). Similarly, past events in Malagasy are described as »in front of the eye« and future events as »behind«.

3.3.4. Time as Motion

People usually use expressions of motion like time passes, goes by, flows for explaining the notion of time. The perception of motion requires a background which allows us to notice the spatial changes resulting from the motion of the object. If the background is fixed, it may also be in motion itself provided that it moves at a different speed as in »We are trying to catch up with time« or moves to another direction, as in »we are racing against time to finish our homework«.

We can observe two models of time as a motion that are summarized in Table 2. The spatial-temporal orientation characterizing the moving-time model is the opposite of that of the moving ego model. In the moving-time model, time »comes« from the future and »goes« into the past. Such examples as »coming week«, »past week« or »following week« are good illustrations. In the moving-ego model, the observer »goes« into the future and has »come« from the past. This model is well reflected in expressions such as »We are approaching golden times« and »We have left the worst behind us«.

The new year is coming.	Moving time: come = future
The old year has gone by.	Moving time: go = past
I am going to do it.	Moving ego: go = future
Je viens de le faire. (I come from it do, = I have just done it.)	Moving ego: come = past

Table 2 (adapted from Radden 2003, p. 236.)

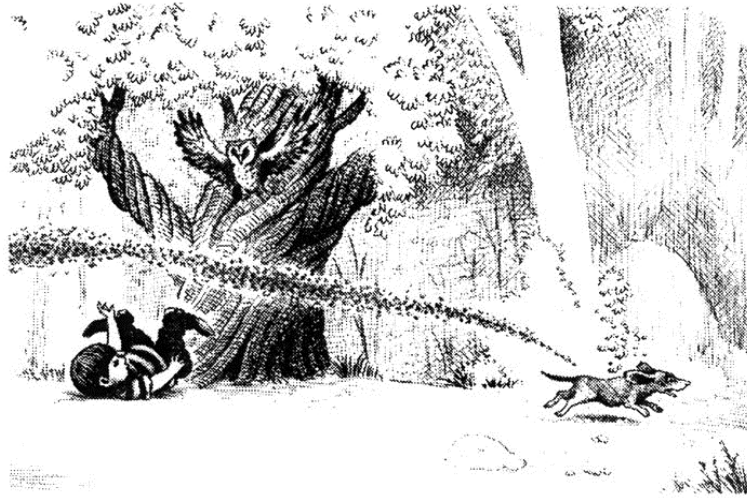### 3.4. A Picture Worth a Thousand Words

Figure 1. Source: Language, Culture and Thought (2002). Lecture notes to Linguistics 001: Introduction to Linguistics, University of Pennsylvania based on Pinker, S.: The Language Instinct: How the Mind Creates Language. US and Canada. HarperCollins 1995, pp. 44-73.

This picture was taken from a storybook that was used by Slobin and his colleagues to assess the Whorfian hypothesis in a cross-cultural perspective. The picture represents a pair of events that you can understand immediately, probably without talking to yourself at all.[27] Something happens to the boy in the tree, and something happens to his dog. An owl and some bees are involved; the location is most likely in a forested area.

If we examine the grammatical categories interpreted by different nations, we will arrive at very interesting conclusions. The English speaker interprets the activity of the dog as durative, or extended in time, in comparison to the activity of the boy.[28] In a typical English sentence, dedicated to English learners, we might say: »The boy fell off the tree, and the dog was running away from the bees.« English marks a progressive aspect of the verb, seeming to correspond to an obvious temporal component of the ›complete concept‹ or ›mental image‹.[29]

A Spanish-speaker will recognize the durativity of running as well, because Spanish also has a progressive aspect, as well as an imperfect aspect. Nonetheless, this speaker might also note that the falling of the boy is punctual or completed, since Spanish differentiates between perfective and imperfective aspect.

There is a group of languages that have no grammatical marking of perfective/imperfective or of progressive, such as German or Hebrew. These two languages lack distinctive marking of either pole of aspectual contrast.[30] Hebrew has no grammaticized aspect at all; verbs are simply inflected for past, present, or future tense. German has a simple past and present. Neither language has grammatical marking of either progressive or imperfective. For the original sentences and their English translation see Table 3:[31]

Language	Picture Description	English Translation
English	The boy *fell* off… and the dog *was being chased* by the bees. He's [the dog *is]* running* through there, and he [the boy] *fell* off.	
Spanish	Se cayó el niño y le perseguían al perro las avispas. Se cayó… El perro está corriendo.	The boy *fell* and the wasps *were chasing* the dog. The boy *fell*… The dog *was running*.
German	Der ist vom Baum runtergefallen und der Hund läuft schnell weg. Er rannte schneller und immer schneller. Der Hund rennt rennt rennt.	He *fell* off from the tree and the dog *runs* away quicky. He *ran* faster and faster. The dog *runs runs runs*.
Hebrew	Hu nafal ve hakelev barax. Hayeled nafal… ve hakelev boreax.	He *fell* and the dog *ran* away. The boy *fell*… and the dog *runs* away.

32 Slobin 1996, p. 88.

33 Skotko, B.: Relationship between Language and Thought from a Cross-Cultural Perspective Exploring the Mind. Durham: Duke Univ. 1997.

34 Slobin 1996, p. 91.

As Slobin states, »the events of this picture book are experienced differently by speakers of different languages in the process of making a verbalized story out of them.«[32] For example, there is nothing in the pictures themselves that leads English speakers to verbally express whether an incident is in progress or Spanish speakers to note whether it has been completed. In addition, there is nothing in the figure to encourage German speakers to formulate elaborate descriptions of trajectories or to make Hebrew speakers indifferent to conceiving of events as durative or bounded in time. In acquiring each of these languages, children are guided by the set of grammaticized distinctions within their language to attend to such features of events while speaking.[33] As Slobin concludes, »Each [language] is a subjective orientation to the world of human experience, and this orientation affects the ways in which we think while we are speaking.«[34]

3.5. Germanic Prepositions

According to the Sapir-Whorf hypothesis, different cultures also have different linguistic properties. But quite similar cultures can also have significantly different linguistic properties, in which case it is rather implausible that the thought processes of the speakers are so different. Let us take into consideration some spatial prepositions from three West Germanic languages: English, German and Dutch are linguistically and culturally closely related. These prepositions should express some of the relationships seen in these drawings in Table 4.
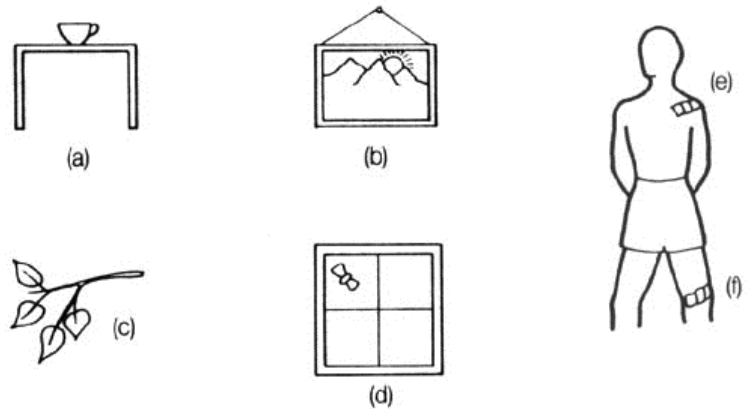

Figure 2. Source: Language, Culture and Thought (2002), pp. 44-73.

Language	Preposition	Examples
English	on	cup on a table; spider on a ceiling; band-aid on shoulder
German	auf = horizontal surface an = vertical surface, or no clear orientation	picture, poster on a wall; band-aid on leg raindrops on a window; fly on a window leaves on a twig
Dutch	aan = attached by a fixed point; prevented from manifesting tendency toward separation	clothes on a line; coat hook on a wall; picture on a wall (hanging from a nail); apple on a twig; icicles on a roof; handle on a pan; dog on a leash; pull-toy on a string; balloon on a string
	op = supported from underneath (i.e. horizontally), or broadly on flattish surface, or living creature; seen as essentially stable	cup on a table; bandage on a leg or shoulder; poster on a wall (glued tight); sticker on a refrigerator; paint on a door; raindrops on a window; fly on a window; spider on a ceiling; snail on a wall

Table 4. Source: Pinker 1995.

From Table 4 we can see that German uses two prepositions depending on the orientation of the surface to which something is attached (or in contact) that would be rendered by the English »on«. In Dutch, the related prepositions are chosen depending on the method of attachment.

Although the cultural and scientific traditions of Germany, the Netherlands and Britain are closely related and very similar, English uses only one preposition, »on« for all of these relations. If these fundamental spatial distinctions do not indicate differences in thought, it is doubtful that any more »exotic« distinctions indicate anything significant about thought processes. Speakers of German or Dutch have to attend to these issues of orientation or attachment when choosing a preposition, but speakers of all languages understand the underlying concepts.

3.6. Categorizing the World

The idea that the vocabulary of a language traps its speakers into thinking only in those terms is easily refutable. For example, in English animal terms, there is a different range of details available for various animals. Follolwing the basic scheme (cf. Table 5) and the categorization of humans, let us consider first an animal of cultural importance, the horse!

species			
immature		mature	
male	female	male	female

person, human, man			
child		adult	
boy	girl	man	woman

horse			
foal		horse	
colt	filly	stallion	mare

Table 5

The word horse is thus polysemous: it can mean »adult horse« or just »horse« regardless of age. This is the general pattern for English animal terms.

Other animals have just one term for the immature animal, regardless of sex. Does that mean that speakers of English think sheep have no sexual differences until maturity? No, it just means the language does not bother to express a notion that is nevertheless understood. For most animals, such as the *elephant*, only one basic term exists. Adoption of terms from other species is necessary to create distinctions when necessary, such as cows. Again, this shows awareness of the concepts even in the absence of special vocabulary. Unfortunately, the most general category is not actually very well handled in English for cows.

sheep		
lamb	sheep	
	ram	ewe

elephant		
elephant calf	elephant	
	bull elephant	elephant cow

cattle, cow*		
calf	cattle, cow*	
	bull	cow

Table 6

There are two possibilities for the general term:

1. *cow*: ranchers generally use this term only for the female, but it's typically the general term for the layperson.
2. *cattle*: this is a non-count noun, so it is not possible to say »a cattle«; instead one has to count head of cattle, which means that the general term ends up being the quite non-specific head.

So for this animal we lack the simple equivalent of horse, but we can still understand the difference between cows (or cattle) in general and specifically female animals of the species.[35]

3.7. Semantic Distinction

It is not a very hard task to find examples for semantic distinction concerning any pair of languages. For example, given any pair of languages, it is always possible to find a semantic distinction that is made in one but not in the other. For example, Russian distinguishes two kinds of blue, darker and lighter, using two different words and has no common term for them. English has to use a longer phrase to make a similar distinction. But it is done by modifying the general term (cf. Table 7).

English	Russian
blue	sínij
	golubój
English	**Russian**
dark blue	sínij
light blue	golubój

Table 7

Russian	English
ruká	hand
	arm

Russian	English
v ruké	in one's hand
zá ruku	by the hand
brat' ná ruki	lift up in one's arms
idtí pód ruku	walk arm in arm
rukáv	sleeve
rukavítsa	mitten

Table 8 (Pinker 1995)

Conversely, Russian uses the same word for hand and arm. Table 8 shows the characteristics of *ruká* in various expressions.

3.8. Color Perception

In order to demonstrate that Whorf's theory can be applied to a cross-cultural study, several psycholinguists have focused on lexical items, especially ones for colors. In one of the most famous of these studies, Brown and Lenneberg tried to show that certain colors were more »codable« than others in English.[36] Subjects assigned them shorter names and tended to agree more on the application of those names to color samples. The more codable colors were recognized and remembered more readily than the other colors.[37]

Extensions of the early color work by anthropologist Berlin and his collaborators generated the first broad multilanguage comparative framework actually applied to the relativity question.[38] Zuni, a language of the American Southwest, for example, exhibits two terms that we might translate as »yellow«.[39] Closer analysis reveals that one term is verbal and refers to things that become yellow by ripening or aging, whereas the other is adjectival and refers to things that have had yellow substances applied to them. The customary approach in Zuni would select one term as »basic« and ignore the aspect of its meaning (i.e., the manner of becoming colored) for which there is no English equivalent.[40] Hanunóo, a language of the Philippines, has four terms that seem to refer to what we would call white, black, green, and red, but which under further analysis turn out to mean roughly lightness, darkness, wetness, and dryness.[41]

Languages differ in the way they split up the range of possible colors by means of color terms. Research on this issue often draws on sets of color chips.[42]

43 Kay, P./Kempton, W.: What is the Sapir-Whorf-Hypothesis? In: American Anthropologist 86 (1984), pp. 65-79.

A useful experiment about the possible effect of color vocabulary on perception was done with speakers of English and Tarahumara, a native language of northern Mexico.[43] While English has the two words green and blue among its eleven basic color terms, Tarahumara, like many languages, has a single term that covers this range of color, *siyóname*. (Sometimes such words are translated as »grue,« from *green+blue*. Here it is labeled »green.«). It would be interesting to know whether speakers of the two languages in some way perceive the difference between these colors differently.

Although this work has been highly criticized for its assessment of relativity, the study has shown that cultures interpret colors differently as a result of their languages. While some cultures may associate color names with tactile touch, others link the color names to internal development (aging, ripening, etc.) Hence, the cross-cultural pinwheel of color linguistics has demonstrated that the grammatical structure of language can influence our thoughts and interpretations.
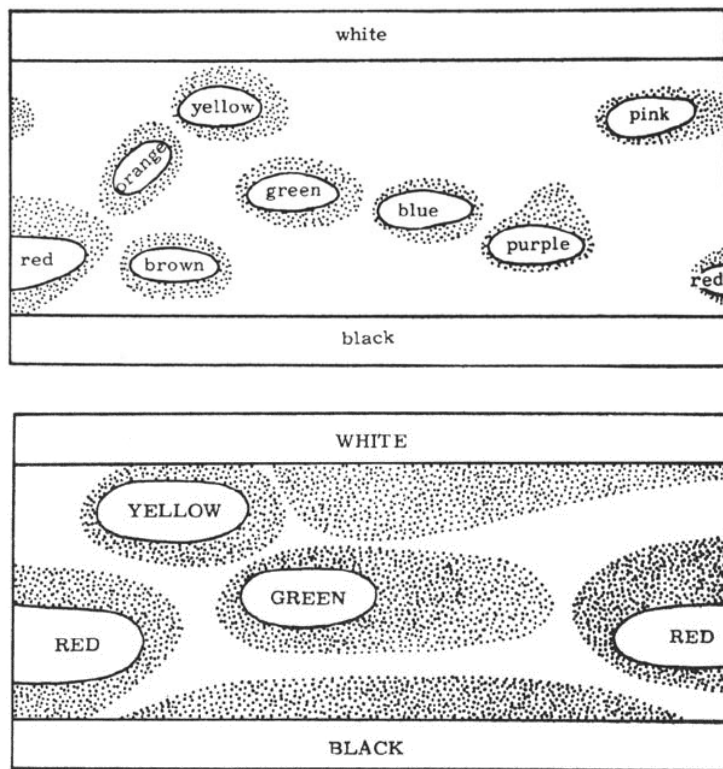

Figure 4. Source: Pinker 1995.

44 Hampden-Turner, C./Trompenaars, F.: The Seven Cultures of Capitalism: Value Systems for Creating Wealth in the United States, Britain, Japan, Germany, France, Sweden, and the Netherlands. London: Piatkus 1994.

4. The Appearance of Cultural Differences in Business Life
4.1.1. Trompenaars' and Hampden-Turner's Cultural Factors

Trompenaars and Hampden-Turner classified cultures along a mix of behavioral and value patterns.[44] Their research focuses on the cultural dimensions of business executives. They identified seven pairs of value dimensions: universalism versus particularism; communitarianism versus individualism; neutral versus emotional; defuse versus specific cultures; achievement versus ascription; human-time relationship and human-nature relationship.

Here we will discuss *The Seven Cultures of Capitalism*,[45] which are based on the original pairs of value orientations mentioned above.

Universalism vs. Particularism
Universalism is about finding broad and general rules. When no rules fit, it finds the best rule. Particularism is about finding exceptions. When no rules fit, it judges the case on its own merits, rather than trying to force-fit it into an existing rule.

45 Ibid.

46 Ibid.

Analyzing vs. Integrating
Analyzing decomposes to find the detail. It assumes that God is in the details and that decomposition is the way to success. It sees people who look at the big picture as being out of touch with reality. Integrating brings things together to build the big picture. It assumes that if you have your head in the weeds you will miss the true understanding.

Communitarianism vs. Indivualism
Communitarianism is about the rights of the group or society. It seeks to put the family, group, company and country before the individual. It sees individualism as selfish and short-sighted. Individualism is about the rights of the individual. It seeks to let each person grow or fail on their own, and sees group-focus as denying the individual their inalienable rights.

Inner-directed vs. Outer-directed
Inner-directed is about thinking and personal judgment, »in our heads«. It assumes that thinking is the most powerful tool and that considered ideas and intuitive approaches are the best way. Outer-directed is seeking data in the outer world. It assumes that we live in the »real world« and that is where we should look for our information and decisions.

Time as Sequence vs. Time as Synchronization
Time as sequence sees events as separate items in time, sequence one after another. It finds order in a seried array of actions that happen one after the other. Time as synchronization sees events in parallel, synchronized together. It finds order in the coordination of multiple efforts.

Achieved Status vs. Ascribed Status
Achieved status is about gaining status through performance. It assumes individuals and organizations earn and lose their status every day, and that other approaches are recipes for failure. Ascribed status is about gaining status through other means, such as seniority. It assumes status is acquired by right rather than daily performance, which may be as much luck as judgment. It finds order and security in knowing where status is and stays.

Equality vs. Hierarchy
Equality is about all people having equal status. It assumes we all have equal rights, irrespective of birth or other gifts. Hierarchy is about people being superior to others. It assumes that order happens when few are in charge and others obey through the scalar chain of command.[46]

4.2. Hofstede's Cultural Dimensions

47 Hofstede, G.H.: Cultures and Organizations. New York: McGraw-Hill 1991.

48 Hofstede, G.H.: Masculinity and Femininity: The Taboo Dimension of National Cultures. Thousand Oaks/CA: Sage 1998, p. 28.

The Dutch organizational anthropologist Hofstede derived his culture dimensions from examining work-related values in IBM employees during the 1970's. In his original work he divides culture into four dimensions at culture-level: power distance, individualism/collectivism, masculinity/femininity and uncertainty avoidance.[47]

First of all, we have to consider how Hofstede interprets these dimensions. Then we will look at the detailed description of the dimensions. For power distance, he gives the following definition:

> The extent to which the less powerful members of institutions and organizations within a country expect and accept that power is distributed unequally.[48]

The first group of countries, such as Australia, Canada, the USA, Great Britain, New Zealand, Israel, Sweden, Switzerland and West Germany, are cultures with low power distance. These cultures are characterized by more interdependence, mutual support and shared undertakings. Religion stresses equality, and power sharing ideologies dominate. Decision-making in the workplace is decentralized; employees seek involvement and have a desire for a participative management style. Consultation and resourceful, democratic managers are valued while limits on privilege and status symbols are emphasized. There is less dependence on a superior, more interdependence. Subordinates will readily approach and contradict their bosses.

49 Hofstede 1991.

50 Hofstede 1994, p. 51.

51 Hofstede 1991.

52 Hofstede 1994, p. 82f.

53 Hofstede 1991.

54 Hofstede 1994, p. 113.

Countries like Indonesia, Malaysia, Philippines, Mexico, most Arab countries and India are cultures with high power distance. In these cultures, it is typical that inequalities are expected and desired, parents and children relate in terms of unilateral obedience and respect, teachers »transfer personal wisdom« and religions stress stratification and hierarchy. In the workplace, subordinates expect to be directed through a hierarchy. The ideal boss is a benevolent autocrat and privileges and status symbols are expected and popular. Subordinates often prefer an autocratic style and employees are reluctant to express disagreement and may fear the boss' autocratic/paternalistic decision-making style.[49] Individualism/collectivism is described as:

> Individualism pertains to societies in which the ties between individuals are loose: everyone is expected to look after himself or herself and his or her immediate family. Collectivism as its opposite pertains to societies in which people from birth onwards are integrated into strong, cohesive in-groups, which throughout people's lifetime continue to protect them in exchange for unquestioning loyalty.[50]

The best examples for countries that rate high on individualism are Australia, Great Britain, Canada, France, Netherlands, New Zealand, Italy, Belgium, Denmark, Sweden, and the United States. In these cultures, the interests of the individual prevail over those of the group and people value self-determination – people think in terms of »I«. Related to this, privacy is considered important. Ties between individuals are very loose; everyone is expected to look after him-/herself. Typically, there is more regard for assertiveness, confrontation, truth, and conflict. In the workplace, interaction is often based on honest and direct feedback about specific behaviors. Employer-employee relationships are based on mutual advantage, hiring is based on skills.

In highly collectivist cultures like Indonesia, Taiwan, South Korea, Panama, Venezuela, Pakistan and Peru, the focus is on group affiliations such as the extended family, clan, organization, or culture. People are integrated into strong, cohesive groups that protect them and demand loyalty throughout one's lifetime. Behavior is determined by the collective will of a group or organization. The »we« group is the source of identity, protection and loyalty instead of saying and thinking in terms of »I«. In the workplace, special leave and other breaks for family ceremonies are common. Hiring persons from one's family reduces business risk. Workers may prefer anonymity and group/team work. Employee-employer relationships are defined in moral terms and interpersonal relationships prevail over tasks. Often in these cultures, large families and confined spaces require regard for others, and conflict to the harmony is thus minimized.[51] Concerning masculinity/femininity, Hofstede states that

> masculinity pertains to societies in which social gender roles are clearly distinct (i.e., men are supposed to be assertive, tough, and focused on material success, whereas women are supposed to be more modest, tender, and concerned with the quality of life); femininity pertains to societies in which social gender roles overlap (i.e., both men and women are supposed to be modest, tender, and concerned with the quality of life).[52]

In masculine or assertive cultures like Japan, Austria, Venezuela, Italy, Switzerland, Mexico, Ireland, Jamaica, Great Britain, and Germany, gender/sex roles are clearly distinct – men are supposed to be assertive, ambitious and tough; women tender, caring and concerned about relationships. The dominant values are material success and progress, money and things. Males fight back when attacked, while females should be submissive. This is best shown in the workplace, where managers are decisive and assertive and the stress is on competition and performance. It is important to mention here that dominant religions stress the male prerogative.

In feminine or modesty cultures like Norway, Netherlands, Denmark, Costa Rica, Yugoslavia, Finland, Chile, Portugal, Thailand, and Guatemala, gender/sex roles are often merged or overlap; both men and women can be gentle and people and relationships are important. In these countries, everyone should be modest. Here, in the workplace, managers use intuition and strive for consensus, there is an emphasis on the quality of work life, and conflict is resolved by compromise and negotiation. Good working relationships, cooperation and employment security are important and a priority is placed on preservation of the environment.[53]

Uncertainty avoidance is defined by Hofstede as »the extent to which the members of a culture feel threatened by uncertain or unknown situations.«[54]

55 Hofstede 1991.

Cultures with low uncertainty avoidance like Canada, Sweden, Hong Kong and Great Britain and the United States accept uncertainty. In these cultures, people are relatively comfortable with ambiguity and rules and laws tend to be fewer and more general. Rules are seen as flexible, and open-ended learning styles are preferred.

Cultures with high uncertainty avoidance like Portugal, Greece, Belgium, Japan, Yugoslavia, Peru, France and Spain are trying to avoid ambiguity by means of sacrosanct rules expected to be strictly followed and controlled by authorities. The corporate strategies of firms in these countries are extremely cautious, that is, offering lower rewards but have higher probability of success. The dominant values are precision and punctuality, so managers at the workplace are expected to have precise, »correct« answers to questions. Instructions should be precise and detailed.[55]

Country	INDIVIDUALISM/ COLLECTIVISM	POWER DISTANCE (low/high)	UNCERTAINTY AVOIDANCE (low/high)	MASCULINITY/ FEMININITY
Australia	90	36	51	61
Canada	80	39	48	52
Indonesia	14	78	48	46
Portugal	27	63	104	31
Norway	69	31	50	8
Jamaica	39	45	13	68
Greece	35	60	112	57
Japan	46	54	92	95
Sweden	71	31	29	5
United States	91	40	46	62
Venezuela	12	81	76	73

Table 9. Based on Geert Hofstede's research on cultural differences in *Promoting a European Dimension of Intercultural Learning – Developing School Materials*, EFIL Seminars, Vienna 17-20 April and Lisbon, 26-29 June, 1997.

Table 9 shows some comparisons of countries on the four dimensions, highlighting the extremes in terms of differences. The highest score possible on the above scales is 125. The scores are meaningless on their own or in absolute terms; they only tell us something in terms of one culture in comparison with, or relative to, another.

4.3. Hall's Dimensions

Edward. T. Hall, an American scholar of the theme focused on the world of communication. In his theory, communication can be divided into three parts: words, material things and behavior. After the examination of these parts, he found out that »most regions of human behavior which are unexplored exist outside the range of people's consciousness.«[56] The complexity of these phenomena was labeled by Hall as »The Silent Language«, which became the title of his book.[57] In this book and in *The Hidden Dimension* (1969), Hall identified two classic dimensions of culture. Firstly, he identified high-context and low-context cultures, where the high and low context concept is primarily concerned with the way in which information is transmitted, that is to say communicated. His second concept, monochronic vs. polychronic orientation deals with the consideration of time in business life.

4.3.1. High-low Context Language

56 Heidrich, B.: The Change of Organizational Culture in the Transition Period in Hungary. Miskolc: [unpubl. Diss.] 1999, p. 42.

57 Hall, E.T.: The Silent Language. Garden City/NY: Doubleday 1959.

58 Hall, E.T./Hall, M.R.: Understanding Cultural Differences. Yarmouth/ME: Intercultural Pr. 1990, p.6.

59 Hall, E.T.: Beyond Culture. Garden City/NY: Anchor/Doubleday 1976, p. 101.

Contexting in communication has first been described by E.T. Hall. He defined context as »the information that surrounds an event; it is inextricably bound up with the meaning of that event«.[58] It assumes that during a communication not only the utterances are »transferred«, but that every communication also has a »deeper meaning« (or implicitly stored information) which cannot necessarily be derived from the utterances alone. High-low context language refers to the amount and specificity of information in a given situation. Verbally, this is related to words, their definitions and nuance; nonverbally it is related to voice (inflection, pitch, and pace), gestures, and facial expression.

According to Hall, all »information transaction« can be characterized as high-, low- or middle-context. »High context transactions feature pre-programmed information that is in the receiver and in the setting, with only minimal information in the transmitted message. Low context transactions are the reverse. Most of the information must be in the transmitted message in order to make up for what is missing in the context.«[59]

60 Heidrich 1999.

61 Hall/Hall 1990, p. 15.

62 Dahl, S.: An Overview of Intercultural Research. Middlesex University Business School Society for Intercultural Training and Reserach UK 1/10 (2/2003). London 2003.

Low context communication is observable in the United States, Germany and Scandinavia. These cultures transmit information in explicit code to make up for a lack of shared meanings. Meanings are determined by *what* is said, rather than *how* it is said. Like talking with a computer, if information is not explicit and detailed, meaning is distorted. This mode is used in cultures where backgrounds, meanings and experiences are diverse; they also occur in cultures where individualism is promoted over collectivism. In a low-context culture, people primarily rely on spoken words and written communication for gathering information and clues to behavior. These cultures stress clarity, and favor a straight and to-the-point communication style. The strong tendency is to avoid any ambiguity and uncertainty. Linear, logical and rational ways of communication are strongly preferred. Emotions and feelings are downplayed, where objectivity is stressed.

High context cultures live in Japan and in most Arab, Southern and Eastern European countries. High-context communication relies heavily on nonverbal, contextual and shared cultural meanings. Meanings are determined from *how* things are said, rather than from *what* is said. High context is faster, more economical, and more satisfying than low context communication. On the other hand, in a high-context culture, nonverbal signals, family status, age differences, social setting and other such factors carry a lot more meaning. The context in which the communication takes place may alter the actual meaning of the message. However, if time is not devoted to shared and common programming, communication is incomplete. This mode is used in cultures where backgrounds are common and shared, and where »we« is emphasized over »I«. High context communication implies that a lot of »unspoken« meaning is transferred during communication – the information may be implicitly contained in the utterances.

For example: In some cultures it is regarded to be impolite to deny a wish to someone. Hence instead of saying »no«, other phrases are being used to describe an inconvenience etc. implying that the answer is no. In this case, the »no« is implied in the answer – but not spoken. This single cultural difference between low-context cultures such as the US and high-context cultures such as Asian cultures, if not well understood, can cause many unnecessary cross-cultural communication problems.

Disposable information is another example for illustrating the difference between the two cultures. Low-context people always need detailed information before they begin to work or commit themselves to any project. High-context people usually know a bit of everything that is going on around them. They can easy be annoyed by a low-context person who tells them everything in detail. Meanwhile, low-context people usually find the quantity of information given to them by a high-context person incomplete.[60] As Hall & Hall state »too much information leads people to feel they are being talked down to; too little information can mystify them or make them feel left out.«[61]

This concept is one of the easiest concepts to witness in intercultural encounters and is one of the most frequently used concepts when analyzing, for example, face-to-face communication with far-ranging implications reaching from interpersonal to mass communication. The concept deals primarily with language, which is located in the outer layer of the ›culture onion‹, and is one of the most rudimentary concepts for any type of intercultural communication, or analysis thereof. As is easily observable, many business negotiators from the West find it difficult to deal with Chinese business negotiators. Often they have been found to encounter severe problems understanding their counterparts, and interpreting correctly what their counterparts want to convey. Although clearly it is not only the high/low context concept that makes communication difficult, the high/low context concept may well play an important role in the difficulties encountered when a person from a high context country, such as China, communicates with a person from a low context country, such as Germany.[62]

4.3.2. Monochronic and Polychronic Cultures

Hall's second concept, polychronic versus monochronic time orientation, deals with the ways in which cultures structure their time. Similar to the high/low context concept, this concept is easy to understand, but it lacks empirical data.

As Hall states »monochronic time means paying attention to and doing only one thing at one time. Polychronic time means being involved with many things at once. Like oil and water, the two systems do not mix.«[63]

63 Hall, E.T/Hall, M.R.: Understanding Cultural Differences: Germans, French, and Americans. Yarmouth/MA: Intercultural Pr. 1990, p. 13.

64 Järvenpää, E.: Cross-Cultural Management Lecture Notes No. TU-53.309. Helsinki Univ. of Technology, Dept. of Industrial Engineering and Management 2002.

65 Hall/Hall, 1990, p. 14.

66 Järvenpää 2002.

Monochronic time can be related to terms as »clock time«, »appointment time«, »segmented time« and »task-orientated time«.[64] Time is experienced and used in a linear way. It is always a future-focused approach with a tangible outcome orientation. The United States and Western cultures like Germany, Switzerland and Scandinavia are good examples of monochronic time-orientation.

On the other hand, polychronic time is characterized by »the simultaneous occurrence of many things and by a great involvement with people.«[65] Polychronic time is perceived like a single point that is much less tangible than the road of monochronic time. The following terms are closely related to polychronic time: »situational time«, »flextime« and »simultaneous activities«. This concept has a relationship-oriented perspective with a past/present-focused approach and a historical orientation.[66] Arab, African, Latin American, Asian, Mediterranean cultures are dominated by the polycronic orientation of time. Table 10 summarizes the characteristics of people dominated by the two cultures.

Monochronic People	Polychronic People
Do one thing at a time	Do many things at once
Concentrate on the job	Are highly distractible and subject to interruptions
Take time commitments (deadlines, schedules) seriously	Consider time commitments an objective to be achieved, if possible
Are low-context and need information	Are high-context and already have information
Are committed to the job	Are committed to people and human relationships
Adhere religiously to plans	Change plans often and easily
Are concerned about not disturbing others; follow rules of privacy and consideration	Are more concerned with those who are closely related (family, friends, close business associates) than with privacy
Show great respect for private property; rarely borrow or lend	Borrow and lend things often and easily
Emphasize promptness	Base promptness on the relationship
Are accustomed to short-term relationships	Have a strong tendency to build lifetime relationships

Table 10. Characteristics of Monocronic and Polycronic People, adapted from Hall & Hall 1990, p. 15.

5. Conclusions

In the context of this paper, the definition of culture was interpreted as the totality of the following attributes of a given group: shared values, beliefs and basic assumptions, as well as any behavior arising from those. Culture was understood as a collectively held set of attributes, which was dynamic and changing over time. On the one side, the individual determined its culture; on the other it was determined by its culture.

From the anthropological point of view Kluckhohn's *Value Orientations Method* seemed to be a powerful tool to increase understanding within and between cultural groups.

Next to the anthropological approach, the appearance of cultural differences in business life was focused through Trompenaars' and Hofstede's cultural dimensions and in Hall's classic models. Hall's high/low context concept gave us an excellent opportunity to witness intercultural encounters. Although it is not only the high/low context concept that makes com-

munication difficult, it may well play an important role in the difficulties encountered when a person from a high context country, such as China, communicates with a person from a low context country, such as Germany.

As far as the relationship between language and thought is concerned, the paper analyzed whether different ways of describing the world leads speakers of different languages also to have different ways of thinking about the world. Although language is a powerful tool in shaping thought and one's native language plays a role in shaping habitual thought (how we tend to think about time) it does not completely determine thought in the strong Whorfian sense, since one can always learn a new way of talking, and with it, a new way of thinking.

It is interesting to analyze what happens if the inverse version of the Worfian theory is assumed: whether our language and communication is influenced by our thoughts. Thoughts are embedded in the culture that appears through communication and is expressed by means of language (pronunciation, vocabulary and subtle differences in grammar). Language can be regarded as a mirror of our thoughts. The question is whether our thought is determined by language or language is determined by thought.

In order to support the second assertion, E.T. Hall and G. Hofstede provided excellent proof in business. In Hofstede's individualism/collectivism dimension, on finds that in Penan and in Borneo, there is one word for »he«, »she« and »it« and six words for »we«, as these countries have collectivist cultures. Consequently, people do not think in terms of »I«.

Even better evidence is given in Hall's high-low context theory. Both written and spoken languages appear in the form of communication. The style, tone and speed of speaking determine the atmosphere of a workplace and provide guidance to understand the company's culture and how to behave appropriately to the expectations. In low context cultures, you do not need to be a Sherlock Holmes in order to make out the essence of what is said: all the information is directly contained in the utterances, and there is little or no implied meaning apart from the words that are being said. All you need is to know the language, speak and listen. Discourse stresses clarity, and favors a straight and to-the-point communication style. The strong tendency is to avoid any ambiguity and uncertainty, while linear, logical and rational ways of communication are strongly preferred. This style of low context communication is nicely reflected in the interpersonal relation of monochronic cultures.

Contrary to low context communication, in high-context cultures, language alone does not carry all the meaning of a discourse. High context communication relies heavily on nonverbal, contextual and shared cultural meanings, on how things are said, rather than what is said. Language is playing an important role in shaping our sentences. If time is not devoted to shared and common programming, communication can be found by low context speakers as incomplete. Using the word »we« instead of »I« can be observed in the interpersonal relation of polychronic cultures.

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