

Chapter 2

The Contemporary Theory: A Review

2.1. Views of metaphor: Classical vs. contemporary

In classical theories, there are three main views of metaphor: the comparison view, the substitution view, and the interaction view. The comparison view can be traced back to Aristotle, who regarded metaphors as implicit comparisons between a metaphorical expression and a literal paraphrase based on underlying analogy or similarity. The substitution view, of which the comparison view is a special case according to Black (1962, 1993 [1979]), holds that a metaphor is where a metaphorical expression is used in place of some equivalent literal expression.⁴ The interaction theory, proposed by Black (1962, 1993 [1979]), states that metaphorical meaning is a result of an interaction between a metaphorical expression, termed “focus,” and its “surrounding literal frame” (1993 [1979]: 27). All these views share a common feature: they view metaphor as a linguistic phenomenon, and assume a fundamental distinction between literal and figurative (or metaphorical in its broad sense) senses.⁵

As Lakoff (1994) points out, a major difference between the contemporary theory of metaphor and the classical ones is based on the old literal-figurative distinction. Traditionally, the word ‘literal’ is defined in terms of “an idealized and oversimplified model of language and thought” to include all of the following four senses (Lakoff 1986b: 292):

Literal 1, or conventional literality: ordinary conventional language—contrasting with poetic language, exaggeration, approximation, embellishment, excessive politeness, indirectness, and so on.

Literal 2, or subject matter literality: language ordinarily used to talk about some domain of subject matter.

Literal 3, or nonmetaphorical literality: directly meaningful language—no language that is understood, even partly, in terms of something else.

Literal 4, or truth-conditional literality: language capable of ‘fitting the world’ (i.e. of referring to objectively existing objects or of being objectively true or false).

Going with the four-sense definition of ‘literal’ is the following set of assumptions that has been proved to be false (Lakoff 1994: 43–44):

1. All everyday conventional language is literal, and none is metaphorical.
2. All subject matter can be comprehended literally, without metaphor.
3. Only literal language can be contingently true or false.
4. All definitions given in the lexicon of a language are literal, not metaphorical.
5. The concepts used in the grammar of a language are all literal; none is metaphorical.

The traditional definition of the word ‘literal’ is wrong, according to Lakoff (1994), because a huge system of conventional, conceptual metaphors has been discovered structuring our everyday conceptual system and pervading our everyday language. “The discovery of this enormous metaphor system has destroyed the traditional literal-figurative distinction, because the term literal, as used in defining the traditional distinction, carries with it all those false assumptions” (p. 44). Assuming the literal-figurative distinction, the traditional theory held that metaphor was mutually exclusive with the realm of ordinary everyday language. Over the centuries, the classical theory of metaphor was taken so much for granted that it came to be taken as ‘definitional’: “The word ‘metaphor’ was defined as a novel or poetic linguistic expression where one or more words for a concept are used outside of its normal conventional meaning to express a similar concept” (p. 42).⁶

The contemporary theory of metaphor, as Lakoff (1993a: 244) argues, “is revolutionary in many respects.” Lakoff and Johnson (1980: 3) summarize the contrast between the traditional and contemporary views of metaphor as follows:

Metaphor is for most people a device of the poetic imagination and the rhetorical flourish—a matter of extraordinary rather than ordinary language. Moreover, metaphor is typically viewed as characteristic of language alone, a matter of

words rather than thought or action. For this reason, most people think they can get along perfectly well without metaphor. We have found, on the contrary, that metaphor is pervasive in everyday life, not just in language but in thought and action. Our ordinary conceptual system, in terms of which we both think and act, is fundamentally metaphorical in nature.

In this way, Lakoff and Johnson have redefined the term metaphor. Since they argue that human thought processes are largely metaphorical, and that the human conceptual system is metaphorically structured and defined, metaphor in their sense is no longer a way of expression, but also a way of conceptualization. The term metaphor has come to mean "a cross-domain mapping in the conceptual system" (Lakoff 1994: 43). Defined as such, metaphor is in effect ubiquitous in everyday language and thought.

In the contemporary theory of metaphor, as Lakoff (1986b: 293) has suggested, the term literal is restricted to the meaning of Literal 3, "the sense of being directly meaningful, without the intervention of any mechanism of indirect understanding such as metaphor or metonymy." With such a definition, it can be said that, although many abstract concepts are metaphorical in character, a significant part of our conceptual system consists of nonmetaphorical concepts. For example, sentences such as 'The balloon went up' and 'The cat is on the mat' are not metaphorical. "But as soon as one gets away from concrete physical experience and starts talking about abstractions or emotions, metaphorical understanding is the norm" (Lakoff 1994: 44).⁷

2.2. Cognitive linguistics and cognitive semantics

In the discipline of linguistics, the contemporary theory of metaphor is closely associated with cognitive linguistics, which comprises cognitive grammar (e.g. Langacker 1987, 1988a, 1991) and cognitive semantics (e.g. Johnson 1987, Lakoff 1987a, 1988, Sweetser 1990, Turner 1991). As a new school, cognitive linguistics departs from the mainstream generative linguistics in commitments and background assumptions (Lakoff 1989a, 1990, 1991). Generative linguists make a distinction between competence and performance, keeping their focus of study on competence, that is, on the internal representation of rules that generate grammatical sentences in the ideal speaker-hearer. Generativists see metaphor as deviant and parasitic upon normal language, believing that it cannot be studied in any reasonable or systematic way. Parmegiani (1988: 2) has

noted that to generative linguists metaphor is but “a kind of semi-grammatical phenomenon” violating semantic rules. It should therefore be brushed aside into the domain of rhetoric, stylistics, or pragmatics. In short, in generative linguistics, metaphor, viewed as a semantically-deviant phenomenon, is either excluded from its study or relegated to the fringes of attention. But, since metaphor pervades human language and thought, any science of language or of the mind which excludes any consideration of, or pays little attention to, metaphor will turn out to be far too narrow or of little lasting value (Danesi 1988b, Mac Cormac 1985).

Cognitive linguistics, in contrast, “sees language as making use of conceptual structure and general cognitive mechanisms” (Pütz 1992b: lii). The cognitive paradigm holds a set of common views on language and cognition including the following (Gibbs 1996a, Radden 1992, Rudzka-Ostyn 1993). (It believes that natural language is a product of the human mind, based on the same organizing principles that operate in other cognitive domains. As one domain of human cognition, language is intimately linked with other cognitive domains and as such mirrors the interplay of psychological, cultural, social, ecological, and other factors. Language structure depends on (and itself influences) conceptualization, the latter being conditioned by our experience of ourselves, the external world, and our relation to that world. In other words, language is not just a system consisting of arbitrary signs, and its structures are related to and motivated by human conceptual knowledge, bodily experience, and the communicative functions of discourse. Linguistic units are subject to categorization which commonly gives rise to prototype-based networks and critically involves metaphor and metonymy. Meanings of linguistic units are based on embodied experience with and within the real world, and can be characterized with respect to relevant knowledge structures such as those called folk models, cultural models, or cognitive models.

As Fesmire (1994b: 150) has summarized, having departed from the mainstream generative linguistics, cognitive linguistics “grapples with how human beings actually make sense of their world,” and “dwells in the stream of human experience rather than in a supposedly pure realm of form,” thus “cultivating a theory of the ecology of human understanding.” In short, “cognitive linguistics is explicitly committed to articulating the embodied, encultured, and imaginative dimensions of meaning.” Metaphor, therefore, stays in the focus of attention within the cognitive paradigm.

As Johnson (1989a, 1989b, 1993b) has defined it, cognitive semantics is part of cognitive linguistics, which focuses on the cognitive mechanisms and

models that underlie and make possible our language activities. It hypothesizes that our 'higher' cognitive functions that are supposed to make meaning and reasoning possible are indeed continuous with and inseparable from our sensorimotor activities (Johnson 1989a). It claims that knowledge is embodied: our very conceptual system is grounded in and structured by various recurring patterns of our perceptual interactions, bodily orientations, and manipulations of objects (Johnson 1993b). A central task of cognitive semantics, then, is to examine the empirical evidence for embodied knowledge of this kind. To fulfill this task, cognitive semantics has worked out methods of analysis that make it possible to investigate the experiential grounding of our conceptual system and its irreducibly imaginative character. As Johnson (1989a: 112) claims, "What is new in cognitive semantics is the way in which it has been able to be more concrete and specific about the way in which structures of our perceptual interactions work their way up into our understanding of more abstract conceptual domains."

The contemporary theory of metaphor should be viewed as product of this endeavor of cognitive linguistics in general and of cognitive semantics in particular.

2.3. Conceptual and linguistic metaphors and metaphor systems

What makes the contemporary theory of metaphor unique is the important distinction that has been drawn between **conceptual metaphors** or **metaphorical concepts** on one hand, and **linguistic metaphors** or **metaphorical expressions** on the other hand (Lakoff and Johnson 1980). The former refers to those abstract notions such as ARGUMENT IS WAR and LOVE IS A JOURNEY while the latter is actual linguistic phrases that realize or instantiate those notions in one way or another. Metaphor, according to this theory, is fundamentally conceptual rather than linguistic in nature. Metaphorical language, consisting of specific linguistic expressions, is but a surface manifestation or realization of conceptual metaphor. Conceptual metaphors are systematic mappings across conceptual domains: one domain of experience, the source domain, is mapped onto another domain of experience, the target domain. "In short, the locus of metaphor is not in language at all, but in the way we conceptualize one mental domain in terms of another" (Lakoff 1994: 43).

A major discovery of Lakoff and Johnson is that people use metaphorical expressions in a systematic way because metaphorical concepts are systematic.

For instance, under the metaphorical concept LOVE IS A JOURNEY, which is discussed in detail in Lakoff (1986a, 1994), and Johnson (1993b), there are these metaphorical expressions which are highly conventionalized in daily English:

- (1) LOVE IS A JOURNEY.
- a. Look how far we've come.
 - b. It's been a long, bumpy road.
 - c. We can't turn back now.
 - d. We're at a crossroads.
 - e. We may have to go our separate ways.
 - f. We're spinning our wheels.
 - g. The relationship isn't going anywhere.
 - h. Our relationship is off the track
 - i. The marriage is on the rocks.

As is shown, conventional metaphorical expressions are governed by conceptual metaphor in a systematic way. Lakoff argues that conceptual metaphor reflects "a general principle" that is "part of the conceptual system underlying English" (1994: 45–46). This principle for understanding the domain of love in terms of the domain of journeys can be stated as "a metaphorical scenario" (p. 46):

The lovers are travelers on a journey together, with their common life goals seen as destinations to be reached. The relationship is their vehicle, and it allows them to pursue those common goals together. The relationship is seen as fulfilling its purpose as long as it allows them to make progress toward their common goals. The journey is not easy. There are impediments, and there are places (crossroads) where a decision has to be made about which direction to go in and whether to keep traveling together.

The metaphor here is thus a conceptual mapping from a source domain (journey) to a target domain (love), with both **ontological correspondences** and **epistemic correspondences** entailed by the mapping. The ontological correspondences are those in which the entities in the source domain are mapped onto the entities in the target domain, while the epistemic correspondences are those in which knowledge of the source domain is mapped onto knowledge of the target domain to form inference patterns. With the LOVE AS JOURNEY meta-

phor, for instance, the ontological correspondences between the two domains are as follows (from Johnson 1993b: 417):

- (2)
 - a. The lovers correspond to travelers.
 - b. The love relationship corresponds to the vehicle.
 - c. The lovers' common goals correspond to their common destinations on the journey.
 - d. Difficulties in the relationship correspond to impediments to travel.

The LOVE AS JOURNEY metaphor is thus a systematic mapping based on ontological correspondences. It gives rise to a set of epistemic correspondences in which knowledge of the source domain (journeys) is mapped onto knowledge of the target domain (love). "Consequently, the way we conceptualize, reason about, and talk about our love relationship will be determined by these, and other, epistemic correspondences" (Johnson 1993b: 417).

In sum, each metaphorical mapping at the conceptual level is a fixed set of ontological correspondences between entities in the source domain and those in the target domain. Once the fixed correspondences are activated, mappings can project source domain inference patterns onto target inference patterns, resulting in epistemic correspondences (Lakoff 1993). In such a way, conceptual metaphors in our conceptual system form intricate systems. Lakoff (1994: 41–42) believes that the study of systems of conventional conceptual metaphor is "the most elaborate and conceptually radical branch of contemporary conceptual system research." Lakoff and Johnson's (1980) methodology has demonstrated that such studies can be accomplished by close examinations of linguistic metaphors instantiating the underlying conceptual metaphors in our conceptual systems. That is, one can gain an understanding of the nature of human concepts by systematically studying linguistic expressions. With a new definition of metaphor given, Lakoff and Johnson have also provided a new methodology that makes it possible to study metaphor in a systematic way. Although it is still under debate as to whether and to what extent this new research methodology can actually reveal underlying conceptual systems (see, e.g., Gibbs 1996a, 1996b, Gibbs and Colston 1995, Murphy 1996, 1997, Ortony 1988), there is no doubt that it has been the most productive and influential approach to date.

In the above it is shown that metaphorical expressions are systematically tied to a conceptual metaphor, with each of the former as a particular linguistic instantiation or manifestation of the latter. That is, each conceptual metaphor

heads and governs a system of linguistic metaphors. The system of metaphor is highly structured by its ontological and epistemic correspondences operating across conceptual domains. The systematicity of metaphor, however, exists in a larger scope than described above. Not only are metaphorical expressions systematically governed by a conceptual metaphor, but conceptual metaphors may also be systematically related to each other to form a hierarchical structure. “Metaphorical mappings do not occur isolated from one another. They are sometimes organized in hierarchical structures, in which ‘lower’ mappings in the hierarchy inherit the structures of the ‘higher’ mappings” (Lakoff 1994: 62). Lakoff calls this phenomenon ‘metaphor inheritance hierarchies.’ Given below is an example of such a hierarchy including the LOVE IS A JOURNEY metaphor (adopted from Lakoff 1994: 62):

- Level 1: The Event Structure Metaphor
- Level 2: LIFE IS A JOURNEY
- Level 3: LOVE IS A JOURNEY; A CAREER IS A JOURNEY

Here the two versions of metaphor at Level 3—LOVE IS A JOURNEY and A CAREER IS A JOURNEY—inherit the structure of the higher mapping at Level 2—LIFE IS A JOURNEY—which is a more general metaphor containing the two metaphors at Level 3 as its more specific manifestations. The LIFE IS A JOURNEY metaphor may contain the following ontological correspondences or metaphorical mappings (from Winter 1995: 235):

The LIFE IS A JOURNEY Metaphor

JOURNEY (Source)		LIFE (Target)
traveler	→	person
point of departure	→	birth
initial conditions	→	personal endowments
baggage	→	personal problems
obstacles	→	external difficulties
distance	→	duration
distance covered	→	accomplishments
destination	→	life purpose
termination	→	death

As Winter (1995: 235) points out:

The 'LIFE IS A JOURNEY' metaphor enables many different metaphorical expressions and patterns of inference. Thus, we try to give our children an education so they will get 'a good start' in life. If they act out, we hope that they are 'just going through a stage' and that they will 'get over it.' As adults, we hope they won't be 'burdened' (or 'saddled') with financial worries or ill health and, if they face such difficulties, that they will be able to 'overcome' them. We hope they will have a 'long lifespan' and that they will 'go far in life.' We know that, as mortals, they will 'go to their final resting place.'

Lakoff (1994) has cited the following English examples under the LIFE IS A JOURNEY metaphor:

- (3) LIFE IS A JOURNEY
- a. He got a head start in life.
 - b. He's without direction in his life.
 - c. I'm where I want to be in life.
 - d. I'm at a crossroads in my life.
 - e. He'll go places in life.
 - f. He's never let anyone get in his way.
 - g. He's gone through a lot in life.

The conceptual metaphor LIFE IS A JOURNEY can thus summarize and account for many English idiomatic expressions such as cited above.

Since love is an important aspect of life, the LOVE IS A JOURNEY metaphor, therefore, inherits the structure of the LIFE IS A JOURNEY metaphor. As Lakoff (1994) points out, what is special about the LOVE IS A JOURNEY metaphor is that there are two lovers, who are travelers, and that the love relationship is a vehicle, while the rest of the mapping is a consequence of the LIFE IS A JOURNEY metaphor. In a similar vein, a career is another important aspect of life. So the CAREER IS A JOURNEY metaphor inherits the structure of the LIFE IS A JOURNEY metaphor just as the LOVE metaphor does. What is special about the CAREER metaphor, however, is that a successful career is always a journey UPWARD, since STATUS IS UP.

As shown above, the LIFE IS A JOURNEY metaphor is but a Level-2 metaphor, on top of which at Level 1 is the Event Structure Metaphor. According to Lakoff (1994), the Event Structure Metaphor has events as its target domain and space as its source domain. Its general mapping in terms of ontological correspondences goes as follows (Lakoff 1994: 62):

- (4)
 - a. States are locations (bounded regions in space).
 - b. Changes are movements (into or out of bounded regions).
 - c. Causes are forces.
 - d. Actions are self-propelled movements.
 - e. Purposes are destinations.
 - f. Means are paths to destinations.
 - g. Difficulties are impediments to motion.
 - h. Expected progress is a travel schedule; a schedule is a virtual traveler, who reaches prearranged destinations at prearranged times.
 - i. External events are large, moving objects.
 - j. Long-term, purposeful activities are journeys.

It should be apparent that the LIFE IS A JOURNEY metaphor makes use of all the structure of the Event Structure Metaphor, since events in a life are subcases of events in general. Lakoff (1994: 62–63) describes the coherence of inference in the Event Structure Metaphor and the inheritance involved in the LIFE IS A JOURNEY metaphor as follows:

In our culture, life is assumed to be purposeful, that is, we are expected to have goals in life. In the event structure metaphor, purposes are destinations and purposeful action is self-propelled motion toward a destination. A purposeful life is a long-term, purposeful activity, and hence a journey. Goals in life are destinations on the journey. The actions one takes in life are self-propelled movements, and the totality of one's actions form a path one moves along. Choosing a means to achieve a goal is choosing a path to a destination. Difficulties in life are impediments to motion. External events are large moving objects that can impede motion toward one's life goals. One's expected progress through life is charted in terms of a life schedule which is conceptualized as a virtual traveler that one is expected to keep up with.

Considering the above three-level metaphor system and metaphorical expressions that realize it linguistically, the ubiquity and systematicity of metaphor in human language and thought should be obvious. Little wonder that the contemporary theory of metaphor claims that metaphor is one of the essential elements constituting and structuring human cognition.⁸

Lakoff (1994: 64) suggested that the hierarchical organization is a very prominent feature of metaphor system, and that “the metaphors higher up in the hierarchy tend to be more widespread than those mappings at lower levels.”

He proposed the Event Structure Metaphor as his “candidate for a metaphorical universal” (p. 88). In Chapter 5 below, I will make a detailed study of the Event Structure Metaphor in Chinese. My study supports Lakoff’s proposal from the perspective of Chinese.

Now, the fundamental distinction between the traditional and contemporary theories of metaphor is obvious. The traditional approach studies metaphor as individual linguistic expressions or rhetorical devices: what artistic or aesthetic effects they have produced in a particular piece of discourse, which is primarily literary or poetic in nature. Just as Lakoff (1987d: vii–viii) points out, “traditional theories of metaphor assume that metaphors occur one by one, that each distinct metaphorical expression is individually created.” In the contemporary paradigm, on the other hand, metaphor is studied as systems of human conceptualization, operating deep in human thought and cognition and, at the same time, surfacing in everyday language in a systematic manner.⁹ On this view, metaphor in poetry or in literature at large is but a special case of metaphor in general, based on the same mechanisms (Gibbs 1994, Lakoff and Turner 1989, Lakoff 1990, 1993a, 1994, Sweetser 1992, Turner 1987, 1991). Section 2.6 will return to this claim.

2.4. Experiential basis of metaphor: The notion of embodiment

As Johnson (1987) and Lakoff (1987a) have argued, in the past the dominant philosophical tradition in the West was objectivism. In his review of Lakoff (1987a), Langacker (1988b: 384) describes the predominant status of objectivism in the Western scholarly community as being “so pervasive as to be almost invisible, and so fundamental as to be virtually immune to challenge.” According to the objectivist doctrine (Hampton 1989, Johnson 1987, 1989a, Lakoff 1987a, etc.), the world consists of mind-independent objects which have determinate properties and stand in definite relations to each other. The nature of these objects is independent of the ways in which people experience and understand them. The world, therefore, can be described objectively, independent of any particular culture or observer’s viewpoint. That is, there exists a God’s-eye view of reality. Meaning, according to this view, is an abstract relation between symbolic representations and objective reality. The symbols are arbitrary and meaningless in themselves, but supposedly given meaning by virtue of their capacity to correspond to things, properties, and relations existing objectively in the world out there. Meaning, defined as the relation between

words and those things in the world to which they refer, is thus fundamentally literal, holding a one-to-one or mirror-image relationship with the external world. It follows that there can be no irreducibly figurative or metaphorical concepts, because metaphorical projections cut across basic experiential domains, and such cross-categorical projections are held to have no counterparts in the real world, which supposedly has discrete and definite categorical boundaries. The task for semantics, according to objectivism, is to describe the way in which words and utterances correspond to the real world. Human understanding, on the other hand, is distinguished from meaning, which is held to be objective and in no way dependent on any person's or community's understanding of it. Ideal understanding proceeds by building an internal representation that correctly mirrors external reality. Reason is just the mechanical manipulation of abstract symbols which are meaningful only via conventional correspondences to things in the world. Correct reason merely mirrors the logic of the external world.

The objectivist paradigm so described, as Lakoff points out (1987a: 157–158), is “an idealization,” brought from “our intellectual background into the foreground.” Langacker (1988b: 388) further points out:

the power of the objectivist world view does not depend on anybody accepting it in its entirety. Rather, it works its influence through the pervasiveness and tacit acceptance of numerous attitudes, working assumptions, and methodological principles for which it can be recognized as the ultimate source. Even if, in its pure form, the objectivist philosophy is universally rejected, it is nonetheless the reference point with respect to which the actual world views of many scholars can be measured—it stands as the archetype that gives these views their coherence, shapes their research agenda in terms of both subject matter and approaches, and determines whether an idea is adopted as a default-case assumption or considered inherently suspect.

While criticizing objectivism, Lakoff (1987a) outlined an alternative called experientialism or experiential realism. According to him, experientialism and objectivism are two versions of ‘basic realism,’ which is featured by a commitment to the existence of a real world and stable knowledge of it, and by a rejection of the view that the conception of truth is merely based on internal or subjective coherence, yielding the view that ‘anything goes.’ However, experientialism differs from objectivism in the definition of meaning. “Where objectivism defines meaning independently of the nature and experience of thinking

beings, experiential realism characterizes meaning in terms of *embodiment*, that is, in terms of our collective biological capacities and our physical and social experiences as beings functioning in our environment" (Lakoff 1987a: 266–267). Here the key concept is **embodiment**, a notion that has been most forcefully articulated by Johnson (1987, 1989a, 1989b, 1991, 1992, 1993b). Meaning is based on experience, especially bodily experience. As Johnson (1989a) argues, the fact that every human being has a body bears directly on the nature of meaning. To be human is to be embodied: "What we can experience, what it can mean to us, how we understand that experience, and how we reason about it are all integrally tied up with our bodily being" (p. 109). That is, our bodily experience in and with the world sets out the contours of what is meaningful to us and determines the ways of our understanding.

In a fundamental sense, human cognition is embodied. Our world, as it means to us and as we understand it, is not something objectively given. Instead, it is something 'construed' by our embodied cognition. For this reason, "It is 'construals of the world' that are properly regarded as the object of linguistic semantics" (J. Taylor 1995: 4).¹⁰

The experientialist view of reason as being embodied in its context is summarized in Lakoff (1987a). Again, it is argued, human reason is made possible by the body. Instead of being an instantiation of transcendental reason, it grows out of the nature of the organism. The contributing factors include the organism's genetic inheritance, the nature of the environment it lives in, the way it functions in that environment, the nature of its social functioning, and so forth.

In short, experientialism assigns a central role to bodily experience in meaning, understanding, and reasoning. It holds that human knowledge arises out of the interaction between the experiencing organism and the experienced environment. The locus of that interaction is the human body; the human body is the result of such interaction. That is, "we have always existed only in and in relation to our evolving environment. We are what we are at this instant, and our world is what it is at this instant, only because of our embodied interactions" (Johnson 1991: 8). Therefore, it is necessary to put the body back into the mind (Johnson 1987).

In line with experientialism in philosophy, the contemporary theory of metaphor maintains that human conceptual systems are to a large extent metaphorical in the sense that they contain mappings of inference patterns from typically more concrete domains to typically more abstract domains. It insists that such metaphorical mappings are not arbitrary, but constrained by our em-

bodied nature. That is, metaphor is motivated by, and grounded in, our bodily experience—how our bodies function in and interact with the world (e.g. Johnson 1987, 1989a, 1989b, 1991, 1992, 1993b, Fesmire 1994b, Lakoff 1987a, 1990, 1993a, 1993b, 1994). The basic idea is that “conceptual structure has everything to do with one’s body and with how one interacts as part of one’s physical environment” (Lakoff 1994: 42).

The evidence supporting the claim that metaphor is constrained by human bodily experience in the real world has been discovered in various target domains. But it stands out most prominently in the domain of emotions. Numerous studies have shown that human emotions are conceptualized metaphorically in terms of bodily processes or activities (e.g. Emanatian 1995, Fesmire 1994a, King 1989, Kövecses 1986, 1988, 1990a, 1990b, 1991, 1995a, 1995c, Lakoff and Kövecses 1987, Matsuki 1995, Shyu 1989, Yu 1995).

It seems that cognitive linguists have put more emphasis on the interactive aspect of the grounding of meaning because they were criticized in the past for having neglected the cultural and social aspects of human understanding and reduced it to the biological or physiological only. Therefore, according to Johnson (1992: 347), this interaction is “at once biological, social, cultural, economic, moral, and political. ... Thus, the way things can be meaningfully understood by us depends, in large measure, on the kinds of bodies we have and the ways we interact with our physical and social surroundings.” Apparently, efforts have been made to make certain terminology more explicit to include the sense of interaction between the body and the environment. For instance, Fesmire (1994b) clarifies the term ‘embodied’ as having the rich sense of an encultured, interactive body rather than just a physiological one.

To explicitly stress the importance of the interaction between the body and the cultural and social environment in the grounding of metaphorical mappings, cognitive linguistics is bound to expand its scope of investigation of human cognition across linguistic and cultural boundaries.

2.5. Image schemas and the Invariance Principle

When metaphorical mappings are said to be not arbitrary, it means that they are, in large measure, constrained by the so-called image schemas (or image schemata). Johnson (1987), according to Lakoff (1987a: 271), “makes an overwhelming case for the embodiment of certain kinesthetic image schemas.” As Johnson (1987: xiv) defines it, “An image schema is a recurring, dynamic

pattern of our perceptual interactions and motor programs that gives coherence and structure to our experience." Image schematic structures, which are central in the organization of meaning and in the formation of inferences based on that meaning, have two characteristics: they are nonpropositional and imaginative in character. That is, they are preconceptual schematic structures that emerge from our bodily experience and that are constantly operating in our perceptual interaction, bodily movement through space, and physical manipulation of objects. Generated as "typical structures of recurring aspects of human bodily experience," image schemas "play a crucial role in what we take as meaningful and in how we reason" (p. xxxvii); they "make it possible for us to experience, understand, and reason about our world" (p. 19).

As pointed out by Johnson (1987), image schemas are recurrent patterns that "emerge from our constant and usually unnoticed encounters with physical containment" (p. 22), and therefore, they are relatively few in number, predominantly visual, though not tied to any single perceptual modality. However, image schemas are not concrete rich images: they "have a generality that raises them a level above the specificity of particular rich images" (p. 24). As Johnson summarizes, image schemas, existing at a level of abstraction, and operating at a level of mental organization between propositional structures and concrete images, "serve repeatedly as identifying patterns in an indefinitely large number of experiences, perceptions, and image formation for objects or events that are similarly structured in the relevant ways" (p. 28).

From the viewpoint of psychology, Gibbs and Colston (1995) argue that a large body of research in psycholinguistics, cognitive psychology, and developmental psychology, though not conducted in terms of cognitive linguistic ideas on image schemas, actually "can be interpreted as supporting the claim that image schemas are indeed psychologically real and function in many aspects of how people process linguistic and nonlinguistic information" (p. 347).

Structurally, image schemas are "extremely skeletal" (Turner 1990: 250), possessing a limited number of parts or components which stand in fixed relations to one another. They include, for instance, CONTAINMENT, PATH, LINKS, BALANCE, SCALARITY, OBJECTS, FORCES, and so on. Some image schemas also represent various spatial orientations and relations: UP-DOWN, FRONT-BACK, PART-WHOLE, CENTER-PERIPHERY, and so forth. Some others are dynamic in nature, denoting a rising motion, a dip, or an expansion, for instance (Turner 1990).¹¹ All of these, as recurring patterns of ordering or organizing our experience, are embodied, meaningful at a nonpropositional level. "But the flexibility of these sensorimotor structures makes it possible for them to be drawn up into

the structuring of more abstract concepts, propositions, and patterns of inference" (Johnson 1992: 349). A good example is the PATH or SOURCE-PATH-GOAL schema, which consists of three elements: a source point A, a terminal point B, and a vector tracing a path between them. The three basic elements stand in a definite relation, specified as a force vector moving from A to B. This schema, as Johnson (1987) points out, is recurrently manifested in seemingly different events, such as walking from one place to another, giving someone a present, and the melting of ice into water. All these events, varying from spatial movements to change of state of a substance, are structured by the same image schema with the same basic parts and relations. As seen in these examples, an image schema, which is "more general, abstract, and malleable" (p. 28) than a concrete rich image, can characterize "many similar, but different, situations that manifest a recurring underlying structure" (p. 30). In this sense, image schemas "operate as organizing structures of our experience and understanding at the level of bodily perception and movement" (p. 20). Johnson (1987: 29–30) suggests that there are two important respects in which image schemas are dynamic: (a) they organize our experience in ways that we can comprehend; and (b) they are flexible in that they can take on any number of specific instantiations in varying contexts.

The pervasiveness of image schemas in our experience is well reflected in our language. A well-known passage in Johnson (1987: 30–31) describing the first few minutes of an ordinary day is a good example of how the CONTAINER schema is reflected in our language talking about daily experience. The CONTAINER schema consists of a boundary distinguishing an interior from an exterior in terms of in-out orientations. It structures not only our spatial experiences but also, by metaphorical extension, our abstract experiences. And the latter kind of structuring is especially interesting. The following sentences are derived from Johnson's (1987: 30–31) original passage:

- (5)
- a. You wake **out** of a deep sleep.
 - b. You gradually emerge **out** of your stupor.
 - c. You walk **in** a daze.
 - d. You brush your teeth **in** a hurry.
 - e. You might enter **into** a conversation.

They are instances of metaphorical projections of the CONTAINER schema in our understanding of abstract states. Abstract states are interpreted as spatially bounded entities or locations. The power of image schemas lies in the fact that

we can metaphorically extend them from the physical to the nonphysical so as to structure and order our experience in abstract domains. In the following are some more examples from Johnson (1987: 34):

- (6) a. Tell me your story again, but leave out the minor details. (STORY EVENT AS CONTAINER)
- b. I give up, I'm getting out of the race. (RACE EVENT AS CONTAINER)
- c. Whenever I'm in trouble, she always bails me out. (STATE AS CONTAINER)

These examples further illustrate how a single image schema, as a recurring organizing structure, can help us understand and structure different kinds of experiences and reason about them.

In Lakoff (1987a), the image-schematic structure is treated as one of the two preconceptual structures in our bodily experience that give rise to conceptual structure, the other one being basic-level structure.¹² According to Lakoff (1987a: 278), image schemas should have the following qualifications: they are (a) pervasive in experience, (b) well-understood because it is pervasive, (c) well-structured, (d) simply structured, and (e) emergent and well-demarcated. The image-schematic structures are directly meaningful, whereas abstract conceptual structures are indirectly meaningful, arising from image-schematic structures by metaphorical projection from physical domain to abstract domain. That is, abstract conceptual structures "are understood because of their systematic relationship to directly meaningful structures" (p. 268). In other words, meaningfulness is embodied. In short, as Lakoff points out, "Image schemas provide particularly important evidence for the claim that abstract reason is a matter of two things: (a) reason based on bodily experience, and (b) metaphorical projections from concrete to abstract domains" (p. 275). They structure our experience preconceptually, and are mapped by metaphors into abstract domains, with their basic logic preserved. In such a sense, metaphorical mappings are not all arbitrary from any source domain to a target domain, but are very often motivated by, and based on, structures inhering in everyday bodily experience.

To illustrate his point, Lakoff cites the example of the PURPOSES ARE DESTINATIONS metaphor. The metaphor is motivated by "a structural correlation in everyday experience" (p. 277): we go to a place, namely our destination, to fulfill a purpose. Therefore, "there is an isomorphism between the structural correlation and the metaphorical mapping" (p. 278), as follows:

Source Domain		Target Domain
movement to a destination	→	achievement of a purpose
Location A or starting point	→	the initial state
Location B or end point	→	the desired state/purpose
motion along a path	→	action sequence

Here the metaphor is based on the SOURCE-PATH-GOAL schema, one of the most common schemas that emerges from our constant bodily functioning. The mapping seems natural because the connection between the source and target domains is motivated by experience. Thus, as Lakoff (1987a: 278) summarizes, image schemas that structure our bodily experience preconceptually have a basic logic, which is mapped onto abstract domains by metaphor motivated by preconceptual structural correlations in experience. Therefore, abstract reason has a bodily basis in our everyday physical functioning.

What Lakoff (1987a) claims is that those image schemas which structure our experience of space also structure our concepts in abstract domains. For instance, as he maintains, categories are understood in terms of CONTAINER schemas, hierarchical structure in terms of PART-WHOLE and UP-DOWN schemas, relational structure in terms of LINK schemas, radial structure in categories in terms of CENTER-PERIPHERY schemas, foreground-background structure in terms of FRONT-BACK schemas, and so forth. Lakoff calls his claim 'The Spatialization of Form hypothesis' (p. 283):

Strictly speaking, the Spatialization of Form hypothesis requires a metaphorical mapping from physical space into a 'conceptual space.' Under this mapping, spatial structure is mapped into conceptual structure. More specifically, image schemas (which structure space) are mapped into the corresponding abstract configurations (which structure concepts). The Spatialization of Form hypothesis thus maintains that conceptual structure is understood in terms of image schemas plus a metaphorical mapping.

He then concludes that image schemas play two roles: "They are concepts that have directly-understood structures of their own, and they are used metaphorically to structure other complex concepts" (p. 283).

The recognition of the pervasive function of image schemas as the basis for metaphorical mappings led to the formulation of the Invariance Hypothesis, which was later revised and renamed as the Invariance Principle (Lakoff and Turner 1989, Lakoff 1990, 1993a, 1994, Turner 1990, 1992, 1993).¹³ Proposed

as the general constraint on metaphorical mappings, it states: "Metaphorical mappings preserve the cognitive topology (that is, the image-schema structure) of the source domain, in a way consistent with the inherent structure of the target domain" (Lakoff 1993a: 215).

An important corollary of the Invariance Principle, according to Lakoff (1993a, 1994), is that image-schematic structure inherent in the target domain cannot be violated, and that inherent target domain structure limits the possibilities for mappings automatically. The phenomenon is called the target domain overrides. In the metaphor *ACTIONS ARE TRANSFERS*, for instance, actions are conceptualized as objects transferred from an agent to a patient. But with the target domain overrides, the agent can 'give' the patient 'a kick' without the latter's having it afterward. Turner (1990: 252) also points out that as a general constraint on metaphor, the Invariance Principle is not inviolable, but the violation is to be taken as "a carrier of significance," which is found in novel metaphors only.

According to Lakoff (1990, 1993a, 1994), the Invariance Principle raises the possibility that a great many, if not all, abstract inferences are actually metaphorical versions of spatial inferences inherent in the structures of image schemas. That is, metaphors based on image schemas give rise to abstract reasoning, and abstract reasoning is based on spatial reasoning via metaphorical projections of image schemas. Lakoff (1990, 1993a, 1993b, 1994) has demonstrated in English that what have been called propositional structures or abstract concepts such as time, states, changes, causes, purposes, and categories are really understood via metaphor in terms of spatial concepts structured by image schemas. As he suggests, "These are concepts that enter normally into the grammars of languages, and if they are indeed metaphorical in nature, then metaphor becomes central to grammar" (1993a: 212). Consequently, the Invariance Principle has put the nature of abstract reason into new perspective: "what have been seen in the past as propositional inferences are really image-based inferences" (Lakoff 1993a: 229). If the Invariance Principle is correct, Lakoff (1993a: 229) claims, it has a remarkable consequence: "Abstract reasoning is a special case of image-based reasoning." "Image-based reasoning is fundamental and abstract reasoning is image-based reasoning under metaphorical projections to abstract domains" (p. 229). If Lakoff is right, then much of our semantic system is metaphorical, as well as much of our conceptual system.

According to Lakoff (1990), cognitive linguistics takes as primary the cognitive commitment to seek general principles governing human language con-

sistent with what is generally known about human cognition. Part of such a commitment is to characterize what abstract concepts are, how they can be understood, and how abstract reason could have been acquired by human beings. The Invariance Principle provides an answer to these questions, since it claims that many abstract concepts arise from metaphorical mappings of spatial concepts and that abstract reason arises via metaphorical mapping of image schemas which preserves the inferential structure of those spatial concepts. As Lakoff (1990) points out, abstract reasoning is that aspect of human beings that has traditionally been taken as separating man from the lower animals, but that activity of human brain has evolved from certain mechanisms for the perception of spatial relations that appear to be present in lower animals.

At the present stage, however, the Invariance Principle is still, as Lakoff (1990: 72) put it quite a few years ago, "an empirical hypothesis," and "its status is anything but clear," "since a precise formulation would require knowledge of the full inventory of image-schemas." Moreover, it is still not clear as to how strong this principle is: whether or not all abstract inferential structure is image-schematic; and whether or not image-schematic structure is only one of a number of aspects of generic-level structure (Lakoff 1990). The answer to these questions calls for thorough investigation within and across linguistic and cultural boundaries.

2.6. Conventional and novel metaphors

In their *More than Cool Reason*, Lakoff and Turner's (1989) central claim is that metaphor in poetry is not an essentially different phenomenon from metaphor in ordinary language; poetic metaphor basically uses the same cognitive mechanisms as everyday metaphor; and what makes poetic metaphor look different, however, is its extension, elaboration, and combination of those mechanisms in ways that go beyond the ordinary. They argue, therefore, that creative literary metaphor generally depends on conventional metaphor in generation and interpretation. According to them, there are three basic mechanisms for interpreting linguistic expressions as novel metaphors: extensions of conventional metaphors, generic-level metaphors, and image metaphors. Poetic metaphor uses all of them superimposed on one another.

A good example of novel extension of a conventional metaphor, as cited by Lakoff (1993a), is a line of a song lyric:

(7) We're driving in the fast lane on the freeway of love.

Although what is regarded as novel is not absolute and is relative synchronically as well as diachronically, the metaphorical expression in this line, with its modern flavor, is novel in the sense that it is not conventionalized in the everyday language of English. However, it is only an extension, namely a novel instantiation, of the conventional conceptual metaphor LOVE IS A JOURNEY. The understanding of the former is a consequence of the preexisting metaphorical correspondences of the latter. As Lakoff argues, a conventional metaphor, as a fixed pattern of ontological correspondences across conceptual domains, defines an open-ended class of potential correspondences across inference patterns. "When activated, a mapping may apply to a novel source domain knowledge structure and characterize a corresponding target domain knowledge structure" (p. 210). At the lexical level, lexical items conventional in the source domain may or may not be conventional in the target domain, depending on whether or not the ontological correspondences between two domains are activated. That is,

each source domain lexical item may or may not make use of the static mapping pattern. If it does, it has an extended lexicalized sense in the target domain, where that sense is characterized by the mapping. If not, the source domain lexical item will not have a conventional sense in the target domain, but may still be actively mapped in the case of novel metaphor. (p. 211)

Those lexical items that have gained a conventional sense in the target domain are referred to as polysemies, that is, words with related senses. The lexical items 'freeway' and 'fast lane' in (7) above are not conventionally used in the domain of love, but they comprise a novel extension of the conventional metaphor LOVE IS A JOURNEY.

As Lakoff (1993a) has cited, examples of novel extension of conventional metaphor are also found in the following lines of poems:

- (8) a. In the middle of life's road
I found myself in a dark wood.
(Dante: *Divine Comedy*)
- b. Two roads diverged in a wood, and I—
I took the one less traveled by,
And that has made all the difference.

(Robert Frost: *Stopping by Woods on a Snowy Evening*)

Here, (8a) is an instance of novel extension and combination of two conventional metaphors: LIFE IS A JOURNEY and KNOWING IS SEEING. (8b) extends and elaborates the first of these two. In Sweetser's words (1992: 707), "literary metaphors are creative uses of precisely those metaphors that shape our everyday language and thought," and this is because "literary language is not 'another language' from everyday language"; in effect they "coexist as aspects of the varied language use of a single community" (p. 706). As Sweetser has suggested, being a powerful artistic structure in literature, metaphor is not merely a literary tool, but also generally basic to cognitive and linguistic structures. Therefore, "we can't understand literary metaphor outside of its context in language structure" (p. 708).¹⁴

Another type of metaphors that are common in poetry is called image metaphors (Lakoff 1987c, 1990, 1993a, Lakoff and Turner 1989, Gibbs 1994a, Turner 1991), those that function to map one mental image onto another (e.g. 'My wife ... whose waist is an hourglass'). Image metaphors are 'one-shot' metaphors, mapping only one image (e.g. an hourglass) onto another image (e.g. a woman's waist) by virtue of their common shape. For this reason, it is very unlike a conventional conceptual metaphor (e.g. LIFE IS A JOURNEY) that maps rich inference patterns across conceptual domains. In other words, an image metaphor maps the knowledge of one image onto another image whereas a conceptual metaphor maps the knowledge of a conceptual domain onto another conceptual domain. While the former is realized in a particular linguistic expression, the latter is manifested in a system of linguistic expressions. What is worthy of note, however, is that image-mapping metaphors work in just the same way as other metaphors, by mapping the structure of one domain onto the structure of another. What is special about them is that their domains are conventional mental images. But conventional mental images are also structured by image schemas, which are preserved by image metaphors. That is to say, both conceptual metaphors and image metaphors are unified under the general Invariance Principle, which states that metaphors preserve the image-schematic structure of the source domain in a way that is consistent with the inherent image-schematic structure of the target domain.

According to Lakoff and Turner (1989), novel metaphors, often found in literature, also include generic-level metaphors, as in contrast to specific-level metaphors (see also Gibbs 1994a, Turner 1991). For instance, EVENTS ARE ACTIONS is a generic-level metaphor, while DEATH IS DEPARTURE is a particular

instantiation of the former at a more specific level. The former only entails the understanding of events in terms of actions performed by agents, but leaves unspecified its details, which are to be furnished by specific-level metaphors. Lakoff and Turner (1989) have found, for instance, that the so-called personification in literature is summarized by the generic-level metaphor *EVENTS ARE ACTIONS*. According to Lakoff (1993a), generic-level metaphors preserve generic-level schemas, which may be image-schematic structures. If that is the case, then the Invariance Principle is operating here too, constraining the generic-level metaphors.

Lakoff (1993a) argues that our everyday metaphor system is constantly active, and is used maximally in interpreting novel metaphorical uses of language. This is because literary language shares much with ordinary language, and artistic usage with everyday usage. As Sweetser (1992: 722) concludes, "There are thus strong arguments in favor of approaching artistic metaphor together with everyday metaphor, even via everyday metaphor."

More generally, "everyday language and literary language are not separate domains," and "discoveries about one bear on the other" (Lakoff 1987d: vii).

2.7. Summary of findings of the contemporary theory

The summary of research findings provided here is based on Lakoff (1993a, 1994). Having resulted from the studies conducted under the contemporary theory of metaphor in the past decade and a half, it addresses three aspects of metaphor: its nature, its structure, and its properties. In terms of its nature, metaphor is fundamentally conceptual, not linguistic. Metaphorical language is merely a surface manifestation of conceptual metaphor. Much of our conceptual system is metaphorical, although a significant part of it is nonmetaphorical. Metaphorical understanding is built up on nonmetaphorical understanding. As a basic cognitive structure, metaphor allows us to understand a relatively abstract or inherently unstructured subject matter in terms of a more concrete, or at least a more highly structured subject matter. In fact, many subject matters, from the most mundane to the most abstruse scientific theories, can only be comprehended via metaphor. In short, metaphor is the main mechanism through which we comprehend abstract concepts and perform abstract reasoning.

Structurally, metaphors are mappings across conceptual domains. Such mappings are asymmetric in that they are one-directional, involving projections

from a source domain to a target domain. They are partial in that only part of the structure of the source domain is projected to the target domain. Each metaphorical mapping is a fixed set of ontological correspondences between entities in the source domain and entities in the target domain. When those fixed ontological correspondences are activated, mappings can project source domain inference patterns onto target domain inference patterns. Metaphorical mappings are not arbitrary, but grounded in the body and in everyday experience and knowledge. A conceptual system contains thousands of conventional metaphorical mappings, which form a highly structured metaphorical subsystem of the conceptual system. Metaphorical mappings, with both conceptual and image mappings, all obey the Invariance Principle: The image-schematic structure of the source domain is projected onto the target domain in a way that is consistent with inherent target domain structure.

In its current sense of the contemporary theory, metaphor has the following important properties, among others. First, the system of conventional conceptual metaphor is mostly unconscious, automatic, and is used constantly, with no noticeable effort, just like our linguistic system and the rest of our conceptual system. This metaphor system plays a major role in both grammar and lexicon of a language. It is central to our understanding of experience and to the way we act on that understanding. Second, novel or poetic metaphor is, for the most part, an extension of our everyday conventional system of metaphorical thought, constrained by the same principle as the conventional metaphor. Third, metaphorical mappings vary in universality; some seem to be universal, others are widespread, and some seem to be culture-specific.

2.8. Criticisms of the contemporary theory

Ever since its birth about a decade and a half ago, the contemporary theory of metaphor has grown increasingly influential in the interdisciplinary field of metaphor studies. It has also received some criticisms (e.g. Holland 1982, Mac Cormac 1985, Wierzbicka 1986, Ortony 1988, Jackendoff and Aaron 1991, Quinn 1991, Alverson 1991, Indurkha 1992, Kennedy and Vervaeke 1993, Cacciari and Glucksberg 1994, Murphy 1996, 1997) from different theoretical and disciplinary perspectives along its way of development. In this section I examine a few criticisms.

It seems that some criticisms have stemmed from different theoretical views regarding what counts as a metaphor. The focus of study of the contem-

porary theory is on (1) conceptual metaphors in human conceptual system and (2) conventional metaphors in everyday language, which were largely ignored by more traditional theories of metaphor. In the contemporary theory, it is believed that metaphor is primarily conceptual in nature and that conventional metaphors at the linguistic level yield important clues to human thought and cognition. The rejection of these two beliefs will surely lead to the denial of the central claim of the contemporary theory that human conceptual system is fundamentally metaphorically structured.

This central claim has been challenged, for instance, by Wierzbicka (1986). Citing the conceptual metaphor *LOVE IS A JOURNEY*, Wierzbicka argued that the journey metaphors are not applicable to the entire range of the use of the term 'love.' Instead, their use is limited to the kind of love between, say, erotic partners while not applicable to the love between a mother and a child. "This means that 'journey' is not in any way included in the semantic invariant of the concept 'love'" (p. 291). Wierzbicka (1986: 292) proposed the following "REAL" definition of love which is free of metaphor:

- (9) X loves (person) Y. =
 when X thinks of Y, X feels good feelings towards Y
 X feels that he wants to be with Y
 X feels that he wants to cause good things to happen to Y

As this definition suggests, people can have a clear concept of love without having experienced journeys. This is because, Wierzbicka argued, mental experiences are given to us more directly than physical ones, and our inner world is more familiar and more accessible to us than the external world. Therefore, we know and understand love without the mediation of the journey metaphors, which are used only "for talking about love" (p. 297).

It should be admitted that Wierzbicka was right when she said that the *LOVE IS A JOURNEY* metaphor is not applicable to the entire range of the use of the term love, and that she provided a nonmetaphorical definition of love in (9) above. However, it should also be noted that this nonmetaphorical definition of love is only one definition, and that it does not represent all there is of human cognition or conceptualization of love. In his reply to Kennedy and Vervaeke (1993), who denied the claimed constitutive role of metaphor in human cognition, Johnson (1993b: 418) emphasized that "the structure of a concept is not an all-or-nothing matter," and that "it is not the case that conceptual structure either preexists in a finished and fixed realm of its own, or else that it is all

radically constructed." Instead, as with the concept 'love,' most basic concepts are defined by multiple conceptual metaphors that are sometimes mutually inconsistent (though not incoherent). As acknowledged by the Invariance Principle, there are preexisting conceptual structure in both the source and target domains, but conceptual metaphor will be at least partially constitutive of our cognition of the target domain, by virtue of additional structure carried over from the 'logic' of the source domain. Johnson further pointed out that "cognitive semantics never claims that image-schematic structures and metaphors are all there is to cognition," and rather, it only claims that "this is a crucial, insufficiently explored, and undervalued dimension of meaning" (p. 421).

So, it is obvious that the LOVE IS A JOURNEY metaphor cannot replace the nonmetaphorical definition of love in (9) provided by Wierzbicka; it nevertheless enriches human understanding of, and reasoning about, the concept of love, in a particular aspect. It carries part of the structure of the source domain (journey) over into the target domain (love), which has its own preexisting structure. It is worth reminding that the contemporary theory of metaphor is superior in one aspect: it has reached a higher level of generality by having discovered the hierarchical structure of metaphor, as discussed previously in 2.3. In this structure, the conceptual metaphor LOVE IS A JOURNEY, which governs a system of metaphorical expressions, is merely a subsystem of higher metaphorical system LIFE IS A JOURNEY, which, in turn, is but a subsystem of the even higher system, the Event Structure Metaphor. This discovery has attached even greater importance to metaphor in human cognition.

The fact that a nonmetaphorical definition of love such as in (9) is inadequate for human conceptualization of love and that metaphorical projection of partial structure from a source domain is essential is also evidenced by Wierzbicka's (1986: 300–306) discussion of such prepositional phrases as 'in love,' 'in pain,' and 'in despair.' Wierzbicka contested Lakoff and Johnson's (1980) claim that nonphysical is typically conceptualized, metaphorically, in terms of the physical, as demonstrated in (10) (from Lakoff and Johnson 1980: 59):

- (10) a. Harry is in the kitchen.
 b. Harry is in the Elks.
 c. Harry is in love.

According to Lakoff and Johnson (1980: 59–60), there is a difference among these three sentences with respect to conceptual structuring. In (10a) the concept IN "emerges directly from spatial experience in a clearly delineated fash-

ion"; it is not a metaphorical concept. But (10b, c) are instances of concepts that are metaphorically structured (i.e. A SOCIAL GROUP IS CONTAINER and A EMOTIONAL STATE IS A CONTAINER). "The word 'in' and the concept IN are the same in all three examples; we do not have three different concepts of IN or three homophonous words 'in'."

Wierzbicka, however, disagreed that the word 'in' is used in the three sentences in the same sense; particularly, she disagreed that the expression 'in love' is metaphorical. She argued, "Plain common sense indicates that expressions such as *in love*, *in pain* or *in despair* don't refer to place. They refer to certain psychological states" (p. 302). But, there exists ample evidence that abstract states are conceptualized in terms of bounded locations in space, as in the Event Structure Metaphor (e.g. Lakoff 1990, 1993a, 1993b, 1994, Taub 1996). Now let us look at Wierzbicka's own interpretation of the emotional 'in' as opposed to the locational 'in' (p. 305):

I would speculate that something like the following (subconscious) reasoning may operate here. First, the form 'in N_{emotion} ' is more marked, more unusual than the ordinary $\text{Adj}_{\text{emotion}}$ or $\text{Verb}_{\text{emotion}}$. This in itself may suggest a marked form of the emotion. Second, the idea of place ('in') evokes the image of something surrounding the person from all sides. Normally, an emotion (designated by an adjective or a verb) is viewed as something that takes place within a person. If the linguistic form seems to suggest a reversal of the image (a person surrounded by something instead of something 'enclosed' within a person) the impression can easily arise that the feeling is intense, that it is stronger and more overwhelming than would normally be expected, and also that the normal relationship between a person and his emotions is reversed, so that the emotions, instead of being subject in some measure to the person's control, assume power over him. Finally, the image of a person being 'in' something (rather than out) may invite the idea of restrictions on this person's movements (and, possibly, on his field of vision): when we are outside we can go whenever we like; but when we are inside a house, our freedom of movements is circumscribed by the four walls.

As can be seen, the passage is packed with spatial metaphors. And that is typical metaphorical conceptualization of emotions. What Wierzbicka was doing is mapping the structure of space onto the structure of emotions, and that is metaphorical mapping in the sense of Lakoff and Johnson (1980). This metaphorical mapping, as illustrated by Wierzbicka's interpretation in the above passage,

is cognitively constitutive of the understanding of emotions in a partial way. Wierzbicka denies the metaphorical nature of the phrase 'in love' because she maintains a different definition of metaphor from Lakoff and Johnson's. Lakoff and Johnson believe that metaphor is primarily conceptual in nature whereas linguistic expressions are byproducts of the conceptual level. On the other hand, Wierzbicka treats metaphor as "a linguistic device ... which by definition can't convey meaning in a fully explicit manner" (p. 294). To her, metaphor only provides ways of "talking about" things. It is therefore primarily linguistic rather than conceptual in nature.

In their review of Lakoff and Turner (1989), Jackendoff and Aaron (1991) insisted that the term metaphor is used too broadly in the book. To them, what is called conventional metaphors should not be taken as metaphorical. Rather, they believed that "the traditional insight about the literal incongruity of metaphors is worth preserving" (p. 326). Thus, they drew a distinction between "LT-metaphors" (i.e. what Lakoff and Turner count as metaphors) and "I-metaphors" (i.e. "the more standardly acknowledged as metaphorical" based on the criterion of "literal incongruity") (p. 326), arguing that only I-metaphors are real metaphors. For instance, DEATH IS DEPARTURE is an LT-metaphor, but its status as an I-metaphor is relativized across cultures. In many cultures where death is viewed literally as the soul (or person) passing on to its next existence, DEATH IS DEPARTURE is not an I-metaphor, but a literal belief.

Jackendoff and Aaron also argued that some LT-metaphors should not count as metaphors in the first place. They believed that Lakoff and Turner's conceptual metaphors such as STATES ARE LOCATIONS, PURPOSES ARE DESTINATIONS, TIME MOVES are not metaphors, but instances of "Thematic Relations Hypothesis" (see also Jackendoff 1983: Ch 10), which claims that

the conceptual structures expressed by natural language are organized in terms of a set of abstract parameters that are most clearly revealed in language about space, but that apply to many other semantic fields as well. It is not that space is taken as a METAPHOR that supplements or enriches the conceptualization of these fields; rather, this common organization is the ONLY way we have of conceptualizing them. In other words, this basic skeletal organization of conceptual structure ... receives many parallel realizations, among them the conceptualization of space. (p. 328)

According to Jackendoff and Aaron, the statements such as STATES ARE LOCATIONS, PURPOSES ARE DESTINATIONS, TIME MOVES (i.e. LT-metaphors) are

not based on "mapping of incongruous domains" but on "thematic parallelism" (pp. 329–330), so they are not I-metaphors. In short, they could not agree with the "excessively broad notion of metaphor" of Lakoff and Turner (1989), who, "having drained from the term 'metaphor' much of its traditional content," "have created a theoretical construct so broad and unstructured that the term 'metaphor' may no longer be appropriate" (p. 331).

Regarding the equation DEATH IS DEPARTURE, Jackendoff and Aaron were certainly right when they pointed out that there exists some cross-cultural relativity as to whether it is a metaphor. In cultures where DEATH IS DEPARTURE is taken as literal belief, namely the belief that spatial movement is involved in death, this equation certainly is not a metaphor. The key to the definition of metaphor in the contemporary theory is the notion of 'semantic autonomy' (Lakoff and Turner 1989). If a concept is understood in its own terms and hence semantically autonomous, it is not metaphorical. If, on the other hand, a concept is understood in terms of another concept or concepts, it is not semantically autonomous and therefore is a metaphor. Jackendoff and Aaron of course would not accept this definition for being "excessively broad." They preferred, instead, "the standard sense" of metaphor which, as can be seen from the above quotation, cannot be "the ONLY way we have of conceptualizing" things, but in one way or another "supplements or enriches the conceptualization." This is also apparent in Jackendoff's (1983: 209) response to the view that the theory of thematic relations reveals widespread systems of metaphor in our language and thought: "But I think this debases both the theory of thematic relations and the concept of metaphor, for, unlike metaphor, thematic relations are not used for artistic or picturesque effect." However, as Ortony (1975) and Fainsilber and Ortony (1987) have shown, metaphors serve at least three communicative functions, of which one is 'inexpressibility' (namely, metaphors may allow one to express that which would be difficult or impossible to express if one were restricted to literal uses of language), the other two being 'compactness' and 'vividness.' Jackendoff and Aaron's view that metaphors merely provide alternate ways of talking about something nicely is similar to that of Wierzbicka's. Holding this view they would believe that many conventional metaphors are not really metaphorical since they constitute the ONLY way of conceptualization.

To Jackendoff and Aaron (1991), the ONLY way of conceptualization should be accounted for by the Thematic Relations Hypothesis, according to which the organization of conceptual structure consists of many "parallel realizations" or "thematic parallelisms," while conceptualization of space is only

one of them. On this view, time, for instance, is not metaphorically conceptualized in terms of space, but simply holds a thematic parallel with space.

Gibbs (1994a: 167–169) contains a critique of the Thematic Relations Hypothesis, which is based on Lakoff's unpublished reply to Jackendoff and Aaron (1991). It is argued that the so-called thematic parallels actually do not exist between the spatial and temporal domains and that the seeming parallelisms are indeed consequence of metaphorical mapping from the former to the latter domain. Specifically, in the spatial domain an observer has an inherent front and back. For instance, when I stand with my back against a wall, looking at the mountain in front of me, I can say something to the effect that 'The mountain is ahead of me and the wall is behind me,' regardless of which culture I am from or what language I speak. And that is reality. In the temporal domain, I can also say that 'The future is ahead of me and the past is behind me,' and what I say indeed reflects the way I think of the future and the past. But in reality, the future does not really exist in front of me, nor does the past behind me. What I say in this case is only the consequence of a metaphorical way of thinking or conceptualization that maps the spatial domain onto the temporal domain. Furthermore, the way of conceptualizing the future and the past is relative across cultures (see, e.g., Alverson 1994). Hence, a person from a different culture standing next to me side by side may say that 'The future is behind me and the past is ahead of me,' even though we both are facing the same direction. Moreover, there are different ways of conceptualizing time even within a single culture or language. In English, for example, 'Christmas is coming up on us' and 'We're coming up on Christmas' reflect two special cases of how time is metaphorically conceptualized. Times are understood as moving entities in the first case and as fixed locations in the second. These two special cases are inconsistent to each other, and cannot be accounted for by the notion of thematic parallels since parallels do not really exist between the spatial and temporal domains. Chapter 4 below will lend further support to this argument. Here and now, I want to further emphasize that the notion of 'thematic parallels or parallelisms' cannot solve the problem of asymmetry and directionality observed between conceptual domains. That is, metaphorical mapping is usually one-directional, from one domain to another, but not the other way around. As Chapter 5 below will demonstrate, for instance, abstract states are usually understood in terms of locations (i.e. STATES ARE LOCATIONS), but not vice versa (i.e. LOCATIONS ARE STATES). The asymmetry and directionality observed here and elsewhere call into question the existence of thematic parallels or parallelisms between the spatial domain on the one hand

and abstract domains on the other.¹⁵

Mac Cormac's (1985) criticism of Lakoff and Johnson (1980) also stemmed from a different view of metaphor. He believed that conventional metaphors (or 'dead metaphors' in his terms) should be regarded as literal rather than metaphorical. This view is apparent in his distinction between literal and metaphorical language:

Literal language seeks to use established categories (including those derived from dead metaphors) to describe the natural world in common terms that can be universally comprehended. Metaphorical language seeks to create new suggestive ways of perceiving and understanding the world and involves a conceptual process different from that of literal description. (p. 78)

He argued that most of the examples of metaphor presented by Lakoff and Johnson are 'dead metaphors' which have already faded into literal language. If they are also taken as metaphorical, it amounts to saying that all language is metaphorical, whereas he believed that a literal-metaphorical distinction is essential in explaining how new meanings are derived via metaphor with literal meanings as given and how language changes in such a process.

Regarding this criticism Indurkha (1992: 296) pointed out that the main objective of Lakoff and Johnson's study is to show that metaphor is a powerful tool in shaping the cognitive world that we experience. For this objective, conventional metaphors "are quite important, since they bring evidence that even what we take to be the conventional and ordinary description of the world is actually brought about by a metaphor." But "Mac Cormac's criticism of Lakoff and Johnson utterly fails to appreciate this important point." Indurkha's critique is very much to the point. While Mac Cormac's view that only novel metaphors are real metaphors served his purpose to show how novel metaphors derive their meanings, he failed to realize that there exist at least four different senses of 'literal' (see Lakoff 1986b for a critique).

In addition to the above criticism, Mac Cormac also opposed Lakoff and Johnson's account of how abstract concepts are structured metaphorically in terms of spatial concepts which are directly emergent from our bodily experience. He argued that even the delineation of the spatial is cultural, emerging "in linguistic forms that are already culturally mediated and transmitted" (p. 67). For illustration, he cited Lakoff and Johnson's (1980: 161) own example of front-back orientation relative cross-culturally:

Given a medium-sized rock in our visual field and a ball between us and the rock, say a foot from it, we would perceive the ball as being *in front of* the rock. The Hausas make a different projection than we do and would understand the ball as being *in back of* the rock. Thus, a front-back orientation is not an inherent property of objects like rocks but rather an orientation that we project onto them, and the way we do this varies from culture to culture.

Mac Cormac (1985: 68) then asked: "If some spatial concepts vary from culture to culture, how can we have any certainty that spatial concepts emerge directly? It seems more like a mediated, indirect emergence, which Lakoff and Johnson would call metaphorical" (see also Indurkha 1992 for a similar criticism).

The answer to Mac Cormac's question is that, when the experientialist view of cognition claims that spatial concepts emerge directly, it means that these concepts are derived directly from the physical world, as opposed to abstract concepts which are often mediated by metaphor. It is important to note that cognitive linguistics never claims that spatial concepts are universally interpreted and that some of them are indeed interpreted differently across cultures. Just as shown by the above example from Lakoff and Johnson (1980), a rock that lacks an inherent front and back is assigned one by culture-specific interpretation. Researches within the cognitive paradigm have shown that "although the physical configuration and neurophysiological apparatus of human beings give us all a common starting point for the way we experience the world, our perceptions of it are differentiated by individual cultures" (Allan 1995: 13). While the spatial domain is surely the source domain for metaphors mapping into more abstract domains, it is also the domain currently under investigation for possible cross-linguistic and cross-cultural universals and differences (see, e.g., Allan 1995, Ameka 1995, Brown and Levinson 1993, Heine 1995, Levinson 1991, 1992a, 1992b, Pederson 1995, Regier 1995, Sinha et al. 1994, Sinha and Thorseng 1995, Svorou 1994, Wilkins and Hill 1995).

Allan's 1995 study is a case in point. It is shown in this study that the word 'back' in English is defined as "that part of a body opposite the interactive-side" (p. 11). It is originally defined "on an anthropomorphic model of the prototypical human being in upright stance confronting the world by looking forward and walking forward," and is metaphorically "extended to the corresponding proper parts of vertebrate and invertebrate animals and to inanimate objects such as houses, cupboards, and computers" (p. 11). With cupboards or computers, the front is always the door or screen side, which is the interactive

side, while the back is the opposite side. With houses, the back is usually opposite the side with the main entrance. But in some cultures, it can be the house roof, conceptualized on a "zoomorphic" model in which the back is "roughly horizontal and facing skyward like an animal's back" (p. 19). Relevant to Lakoff and Johnson's example of the rock is the following conceptualization: "If a static concrete inanimate object is assigned no intrinsic front, the part or region of the object facing the human viewer is contingently named *the front*, and the part or region on the opposite side or end of the contingent front is named *the back*" (p. 22). This is because "The characteristics of the canonical encounter between humans are transferred to the encounter between a human being and a nonhuman object, with the result that the viewer faces the front of the object, and it confronts him/her" (p. 22). This is the case in most languages, but one alternative, selected in Hausa (Chadi), Kiswahili (Bantu), and Maasai (Eastern Nilotic), is to imagine the object "facing the same direction as (i.e. aligned with) the human viewer," namely, "the human viewer faces the backs of things" (p. 22). "It is a matter of cultural convention whether the viewer is facing the front of the object or its back" (p. 22). Allan's conclusion is that "the uses and meanings of English *back* are motivated by our cognitive modelling of the world and that they evidence a powerful anthropocentric image of 'the body in the mind' of humankind" (p. 11). A similar study of spatial terms 'in front of' and 'behind' is in Kalisz (1990), which also shows "an experiential grounding of terms expressing space orientation" (p. 167).

Finally, I consider the criticism raised by Naomi Quinn, a cognitive anthropologist, in her 'The cultural basis of metaphor' (1991). She criticized Lakoff and Johnson for the tendency "to neglect altogether the organizing role of culture in human thought, or to grant culture, at best, a residual or epiphenomenal place in their accounts" (p. 57). She was opposed to their assigning a constitutive role to metaphor in human understanding. Instead, she argued that metaphors are used only to fit preexisting cultural models, which are "presupposed, taken-for-granted models of the world that are widely shared (although not necessarily to the exclusion of other, alternative models) by the members of a society and that play an enormous role in their understanding of that world and their behavior in it" (Quinn and Holland 1987: 4). In her own words, "metaphors, far from constituting understanding, are ordinarily selected to fit a preexisting and culturally shared model," and that they "do not typically give rise to new, previously unrecognized entailments, although they may well help the reasoner to follow out entailments of the preexisting cultural model and thereby arrive at complex inferences" (p. 60). Citing her own study of the cul-

tural model of American marriage (see also Quinn 1987), she insisted that it is the cultural model that commands the selection of metaphors:

particular metaphors are selected by speakers, and are favored by these speakers, just because they provide satisfying mappings onto already existing cultural understandings—that is, because elements and relations between elements in the source domain make a good match with elements and relations among them in the cultural model. (p. 65)

Thus, “conventional metaphors” have become “conventional” only because “they are satisfying instantiations of a ‘conventional’ or culturally shared model, capturing multiple elements of that model” (p. 79). In conclusion, Quinn claimed that “metaphor plays a comparatively minor role in constituting our understanding of our world, and that a relatively major role in constituting this understanding is played by cultural models of that world” (p. 91).

So, while Quinn’s conclusion did not completely deny the constitutive role of metaphors in human understanding, which is at least in part in accordance with cognitive semanticists’ claim that metaphors partly constitute our understanding of the world, she laid special emphasis on the major role of cultural models in constituting this understanding, claiming that cultural models actually constrain the selection of metaphors. She was certainly right to some extent.

The contemporary theory claims that metaphors are rooted in our bodily experience. Here, ‘bodily experience’ should be interpreted in a broad sense, referring to our bodily function and interaction with the outside world, and our knowledge so derived. However, the bodily experience can only tell what are possible metaphors. Whether these potential metaphors are actually selected in a given culture is largely dependent upon the cultural models shared by individuals living in this culture. The use of sports metaphors, which are typically rooted in our bodily activities, should serve as an illustration. In American English, sports have always been a favorite source domain for metaphors in everyday and political discourse (see, e.g., Hardaway 1976, Howe 1988, Ching 1993, Shore 1996).¹⁶ The reason is apparent, as Hardaway (1976: 78) saw it:

Nobody would argue the place of sports in American life; they are big business. And they are big business because they fit philosophically with the widely accepted American dream of open competition in a free market economy. Americans believe in competition, foster it, and encourage it. They live by its rules. No

wonder the language of athletic competition has found its way as metaphor into every aspect of American life.

In Chinese, sports metaphors have enjoyed increasing popularity in the past 15 years or so when reform has remarkably raised the nation's level of competition in both economy and sports. That is, the increasing popularity of sports in an improving economic environment has brought about increasing popularity of sports metaphors. However, there exist some variations between the American and Chinese cultures as to which athletic events are more likely to be source domains for sports metaphors. According to Howe (1988), for instance, the most popular sports metaphors in American political discourse are from American football, baseball, and boxing. On the other hand, my own observation in Chinese has singled out volleyball, soccer, and pingpong as common source domains for sports metaphors in Chinese political and everyday discourse. It is hard to imagine, for instance, that American football metaphors should enjoy popularity in Chinese while most Chinese people do not know what a 'touchdown' is.

While I am in complete agreement with Quinn's conclusion that cultural models play a major role in constituting our understanding of the world and constrain the selection of metaphors, I would like to raise a question that challenges her belief that metaphors only play a minor role in constituting our understanding of the world and are ordinarily selected to fit or satisfy the preexisting cultural models. My question is: Could the cultural model, or culturally shared understanding, itself be metaphorical or free of metaphor? When it is said that "An underlying metaphor for life in the United States is LIFE IS PLAYING A GAME" (Ching 1993: 43), is this metaphor the culturally shared understanding in the American culture that controls the GAME and PLAY metaphors which are pervasive in American English? Is this metaphor entrenched in the middle of the cultural model shared by American people in their understanding of American life? A positive answer seems to make more sense. If, in short, a cultural model or culturally shared understanding could be metaphorical in nature, then the role played by metaphor in human understanding would consequently be major as well. Chapter 3 of this book will provide further support to this claim. Readers are also referred to Gibbs (1994a) and Kövecses (1995c, 1997) for critiques of Quinn's view.¹⁷

Finally, I would like to digress and discuss a little on the relationship between anthropology and linguistics, of which both are involved in the study of human language. However, as Quinn and Holland (1987) have discussed, these

two disciplines have different focuses of study and their approaches may proceed in opposite directions. For linguists, "cultural models promise the key to linguistic usage," whereas for anthropologists, "linguistic usage provides the best available data for reconstruction of cultural models" (p. 24). In the past, as Keesing (1992: 593), an anthropologist, has pointed out, "Linguistics and anthropology have had a curious, dialectical relationship, sometimes coming together in productive conjunctures, sometimes drifting apart." He suggested that "after a long period of estrangement, anthropology and linguistics are overdue for a reconciliation which could be productive for both disciplines" (p. 593). The period of reconciliation and dialogue has come after the emergence of cognitive anthropology and cognitive linguistics which are now sharing an area of common ground and working "toward each other's positions from opposite directions" (MacLaury 1995: x). Yet, the gap that divides them still exists. Palmer (1996), another anthropologist, has recently pointed out that cognitive linguistic studies often seem to lack an essential cultural dimension, whereas few of cognitive anthropological studies have incorporated recent developments in cognitive linguistics.¹⁸

Both cognitive anthropologists and cognitive linguists are trying to account for human understanding and human cognition. Assumably, however, there are at least two kinds of human understanding. One is culturally shared understanding based on cultural models of the world received across individual minds within a particular culture. The other is universally shared understanding based on common human experience of the world. But these two kinds of understanding are merely "two sides of the same coin, each side illuminating the other" (Keesing 1992: 601). If cognitive anthropologists and cognitive linguists have their emphasis on one side over the other, their contributions to their common endeavor to account for human cognition are complementary, rather than confrontational, to each other. It is simply what MacLaury (1995: x) calls "a natural division of labor" within the same task. For instance, it seems reasonable to argue for a distinction between the 'enculturated' meaning and the 'embodied' meaning based on the distinction between culture and biology. Nevertheless, the distinction between culture and biology is not so clear as it seems to be. As Turner (1994: 99) argues,

If meaning is structured and guided by the mapping of the body in the brain, then it is not possible to separate human culture from human bodies. Culture is patterns of activity in brains; brains are structured in accord with their bodies; therefore culture, which is activity in brains, is structured in accord with the bodies in

which it resides. Conversely, brains are in various ways developed under cultural experience, such as experience of language. A certain amount of our actual neurobiology is inseparable from culture.

That is, culture and biology are mutually dependent and coexistent. For this reason, a complete study of human meaning must include both 'enculturated' and 'embodied' meaning, so as to reveal the whole picture of human cognition in terms of how it is relative across different cultures and universal among all human beings. Cognitive linguistics and cognitive anthropology should join their hands closely in their search into human cognition. The coalition between these and other cousin disciplines is crucial for the success of the current "Cognitive Revolution" (Bruner 1996, Shore 1996).¹⁹

2.9. Questions faced by the contemporary theory

In his review of *Metaphors We Live By* (Lakoff & Johnson 1980), Lawler (1983: 205) had this to say about the significance of the book to the field of metaphor research:

From the viewpoint of a metaphor researcher, this book is clearly a milestone, but it does not point in any particular direction for further research—rather, it points in many directions. One obvious suggestion is that other languages than English should be treated along the lines which Lakoff and Johnson lay down.

Keesing (1985: 201) also argued that Lakoff and Johnson and many others' discovery in English of the systematic paradigmatic nature of conventional metaphors and their experiential bases called for more systematic exploration "to map the metaphorical schemata of non-Western peoples." He stressed that "the mapping and analysis of metaphorical schemata in non-Western languages must be given a high research priority" (p. 214). More recently, Mühlhäusler (1995) expressed the urgent need to intensively study 'metaphors others live by.' He believed that intensive study of non-Western metaphorical systems would even help solve problems such as social, technological, environmental, and philosophical, in Western cultures by "generating alternative ways of looking at things" (p. 282).²⁰ In spite of all these calls, intensive studies of metaphor systems in non-Western languages, and even in Western languages other than English, have not been carried out satisfactorily, to say the least.

As I see it, the contemporary theory of metaphor still faces two major questions that require cross-linguistic and cross-cultural research. The first is whether abstract human reasoning is at least partially a metaphorical version of imagistic reasoning. Lakoff (1990: 39) sees this as "a major question for future research in cognitive linguistics." There exists some evidence suggesting that such abstract concepts as time, states, changes, causes, purposes, quantity scales, categories, as well as emotions, are characterized metaphorically. But to what extent? The existing evidence is mainly from English. But is it true in other languages as well? And to what extent is it true in other languages?

The second question is that of universality versus relativity. According to Lakoff (1993a: 245), "Metaphorical mappings vary in universality; some seem to be universal, others are widespread, and some seem to be culture specific." But it is still unknown as to what and how conceptual metaphors are universal, widespread, or culture-specific.

Since, as argued, human understanding, meaning, and reasoning are grounded in our embodied experience, and since basic bodily experience should be common among all human beings, it can be hypothesized that there exist cognitive universals, as well as linguistic universals. On the other hand, since bodily experience always interacts with specific physical, social, and cultural environments, it is also expected that there should be cognitive variations across cultures and languages. However, to what extent and in what manner cognitive universals and variations exist across cultures and languages is still a largely unexplored area.

Regarding the lack of cross-linguistic and cross-cultural studies, Johnson (1992: 354)²¹ has made the following incisive statement:

Given the nature of our bodies and brains, and given the kinds of physical and cultural interactions we engage in because of the kinds of interests and purposes we have, there may well be universal image schemas, metaphorical concepts, or cognitive structures. Whether there are such universals is an *empirical* issue. The cross-cultural studies that could identify such empirical universals have simply not been carried out extensively enough at the present time. So, we cannot make any strong assertion along these lines. Neither, however, can we deny their existence. We will only know the answer when we do the necessary cross-cultural research.

Whether certain conceptual metaphors, image schemas, or cognitive prototypes are universal, as I believe, awaits further study.

Johnson's statement summarizes the situation of cognitive semantics: cognitive semantics has reached a point where it has to be supported by cross-cultural research.

My studies presented in the next three chapters attempt to make a contribution to this end.