

## Chapter 3

### The Semantics of Emanation Event

The purpose of this chapter is to identify all semantic types of emanation events which are linguistically coded in Thai and discuss differences among them. This chapter consists of two main sections. Section 3.1 presents various semantic types of Thai emanation events and Section 3.2 compares specific semantic types.

First of all, I should clarify how an emanation expression is identified. I posit the following two criteria for the identification of an emanation expression. If an expression meets both of these criteria, I consider it an emanation expression.

(a) The expression in question must have a lexical element referring to motion (i.e. a motion verb and a locative preposition implying motion) so that it, in effect, represents an emanation event (i.e. something intangible moves away from a source entity relative to a reference entity).

(b) In spite of the presence of a word expressing motion, the scene described by the expression as a whole must be actually stationary, as illustrated in (18), or at the very least, the motion word must not indicate the actual change of location of the focal figure in the scene (the subject's referent) but must however indicate fictive motion of some intangible entity, as in (19).

(18) a. ตา ทอด ไป สู่ ท้องฟ้า  
 taa thwít pay sùn thwít fáa  
 eye stretch go get to sky

The eyes (gaze) stretched toward the sky.

b. ตัว ตึก หัน หน้า เข้า หา ทะเล  
 tua tuèk hǎn nâa khâw hǎa thalee  
 body building turn face enter seek sea

The building faces toward the sea.

(19) a. หล่อน ชี้ มือ ไป ยัง ดอกไม้  
 lǔwǎn chíi muu pay yanj dǔwák máy  
 PRONOUN point hand go toward flower

She pointed to the flower.

b.	เขา	นั่ง	หัน	หน้า	เข้า	หา	ตู้
	kháw	nâṅ	hǎn	nâa	khâw	hǎa	tûu
	PRONOUN	sit	turn	face	enter	seek	cabinet

S/he sat facing the cabinet.

### 3.1. Semantic Types of Thai Emanation Event

This section is divided into two subsections. Section 3.1.1 describes basic semantic types of Thai emanation events, namely thematic and agentive types. Section 3.1.3 discusses specific semantic types of Thai emanation events, namely perception, radiation, shadow, and orientation types. The perception type consists of visual, auditory, olfactory, and tactile subtypes. Before describing my categorization of Thai emanation events in the following sections, however, I first introduce the theoretical concepts that are relevant to the categorization: the "canonical event model," "action chains," "role archetypes," "scope of predication" and "imagery."

To explain the structure of Thai emanation events, I will employ the "canonical event model" formulated by Langacker (1991a: 210-211; 1991b: 285-286). It represents the normal observation of a canonical event profiled by a prototypical transitive clause. A canonical event emerges in the form of an "action chain" originating with a canonical agent (volitional energy source) and terminating with a canonical patient (energy sink).

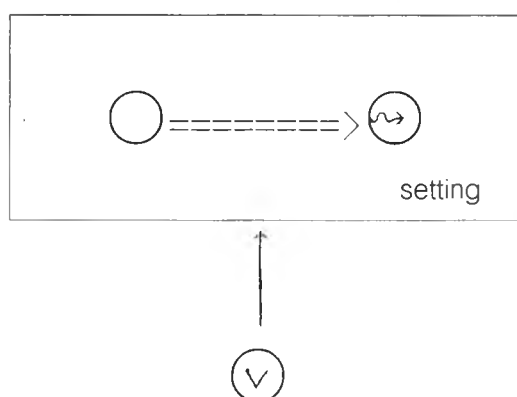


Figure 1: Canonical Event Model

(adapted from Figure 1 in Langacker (1991a: 211))

Figure 1 graphically represents the canonical event model, which comprises: (a) the participants (at least an agent and a patient) and their interaction (transmission of energy from an agent to a patient); (b) the setting within which the process unfolds; and, (c) the viewer of the process. The double arrow indicates the transmission of energy. Two main participants, namely an agent and a patient, are at the upstream and downstream ends of the energy flow, respectively. There may be an instrument manipulated by the agent to affect the patient (intermediary in transmitting energy). The squiggly arrow in the patient circle indicates the patient's resulting change of state. The rectangle stands for the setting in which the two participants interact. The circle V stands for a viewer who observes the event from a vantage point external to the setting.

The canonical event model is a synthesis of propositional and image-schematic models. Two basic prepositional models constitute the canonical event model, i.e., the billiard model and the stage model, which I have explained in Section 2.1.2. In accordance with the billiard model, the canonical event consists of discrete participants interacting energetically through physical contact. The stage model contributes the notion of a viewer observing the event from a vantage point external to its setting.

An event must entail one or more than one participant. Langacker (1991a: 210) argues that six semantic roles of participants in an event are sufficiently fundamental and cognitively salient enough to be considered archetypal, as listed below. He calls those semantic roles "role archetypes."

- (a) **Agent:** a person who volitionally initiates physical activity resulting, through physical contact, in the transmission of energy to an external entity
- (b) **Patient:** an inanimate entity that absorbs the energy transmitted by externally initiated physical contact and thereby undergoes an internal change of state
- (c) **Instrument:** a physical entity that is manipulated by an agent to affect a patient. It serves as an intermediary in the transmission of energy
- (d) **Experiencer:** a person who is engaged in mental (intellectual, perceptual, emotive) activity
- (e) **Mover:** an entity that undergoes a change of location with respect to its surroundings

- (f) Absolute: an non-energetic entity whose role in a process is viewed in isolation from the flow of energy

Among these, the agent and the patient are the maximally opposite role archetypes in the sense that the former is at the head of the profiled action chain (the energy source) while the latter is at the tail (the energy sink). Additionally, the semantic role of an entity that merely occupies a location or exhibits a static property is termed 'zero' (to be precise, 'zero-absolute').

Langacker (1991a: 210, 213; 1991b: 285) notes that there are deviations from these archetypes (e.g. nonhuman animate agent) and certain hybrid roles (e.g. agent-mover (subject of 'jump'), experiencer-patient (object of 'injure'), absolute-patient (subject of 'melt'), absolute-mover (subject of 'sail')), and that the entities construed as participants in an event are not necessarily concrete, "basic level" objects such as human, hammer and glass (e.g. 'Floyd's hammer-blow broke the glass'). The "basic level" is a level of special cognitive significance at which we tend to operate unless there is some reason to resort to either a more specific or a more schematic notion (cf. Rosch et al. 1976).

Figure 2 represents typical connections among the role archetypes.

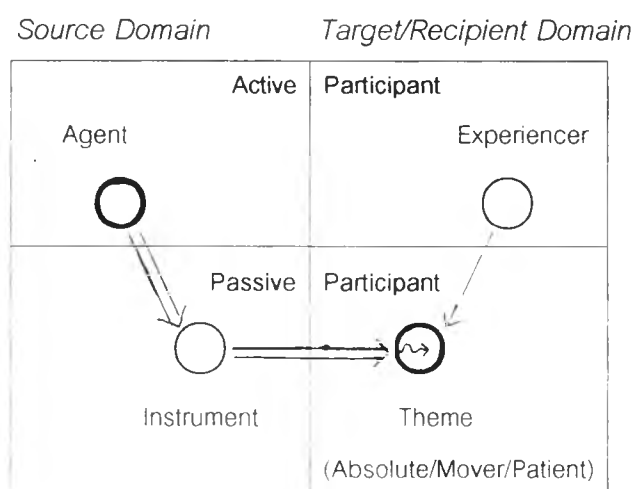


Figure 2: Relationships among Role Archetypes  
(adapted from Figure 7.5 in Langacker (1991b: 327))

The sequence 'Agent --> Instrument --> Theme (patient, mover)' constitutes a canonical action chain that results in some internal or external change of the theme. The sequence 'Experiencer --> Theme (absolute-zero)' corresponds to a perceptual or conceptual relationship in which the experiencer establishes mental contact with the theme. Agent and Theme are depicted with heavy lines to suggest their inherent cognitive salience (the polar opposites), which make them the unmarked choices to be coded as focal participants related to each other (subject and direct object). Note that the thematic participants (i.e. experiencer, patient, mover, absolute-zero) are within the target or recipient domain in terms of energy transmission. They, except absolute-zero as a limiting case, undergo a certain kind of resulting change (i.e. an experiencer undergoes internal mental change; a patient undergoes internal physical change; a mover undergoes external physical change). The generalized notion "theme" is neutral as to whether the change is internal or external, and whether it occurs in physical or mental space.

Role archetypes are arranged in two hierarchies with respect to cognitive salient parameters of two kinds: (a) energy flow hierarchy (source domain > target or recipient domain) which is defined by the flow of energy along an action chain: Agent > Instrument > Patient/ Mover/ Experiencer (Theme); (b) initiative hierarchy (active participant > passive participant) which reflects the capacity of a participant to function as an original source of energy and thereby initiate contact with other entities: Agent > Experiencer > Other.

In the conception of an event or an action, however, the action chain connecting the agent and the patient (through the instrument) can be profiled either entirely or partially, as respectively illustrated in (20a) and (20b-c).

- (20) a. Floyd broke the glass (with the hammer).  
 b. The hammer easily broke the glass.  
 c. The glass easily broke.

In (20a), 'broke' profiles the entire action chain. That is, the energy is transmitted from the agent (Floyd) to the patient (glass). On the other hand, 'broke' in (20b) and

(20c) profiles only a part of the action chain. In (20b), 'broke' profiles the part beginning with the instrument (hammer) and ending up with the patient (glass). In (20c), 'broke' profiles only the patient (glass)'s change of state. Thus, (20a) to (20c) differ in "the scope of predication," which is one important dimension of "imagery." Imagery is defined as our capacity to structure the content of a scene in a particular way for the purpose of linguistic expression (Langacker 1987: 39; 1991a: 5-12; 1991b: 5-12).

Langacker claims that the full conceptual or semantic value of a conceived situation is a function of not only its content but also how we structure this content. The same objective situation can be described by more than one expression, because we have the capacity to construe a situation and organize it by means of alternative images, e.g., emphasizing certain facets of it at the expense of others, viewing it from a certain perspective, construing it in terms of a certain metaphor, and so forth. He calls this human capacity imagery. (21) serves an example.

- (21) a.     McMurtry climbed the mountain.  
       b.     McMurtry climbed up the mountain.

(21a) is transitive (taking the direct object 'the mountain') and highlights the climber's taking over the mountain. By contrast, (21b) is intransitive (including the prepositional phrase 'up the mountain') and highlights the climber's traveling to the top of the mountain. The mountain is virtually affected by the climber in (21a) while it is taken as the reference entity for designating the climbing route in (21b).

Another example is our mental contact with something (e.g. to see, to want, to love, to fear, to understand), a fundamental conception grounded in our mental life. English speakers use transitive clauses to express mental contact (e.g. 'I see it') presumably because they take their attention to a particular object as analogous to some energy flow from them to that object, or they evoke a more specific metaphor such as SEEING IS TOUCHING. But speakers of other languages may conceptualize some abstract entity (equivalent to their attention) spontaneously moving along a spatial path and reaching a particular object, and so they use intransitive clauses to express this

conceptualization. Since the choice of images is a matter of linguistic convention, semantic structure is language-specific to a considerable degree.

### 3.1.1. Basic Semantic Types

The analysis of my data of Thai emanation expressions shows that a Thai emanation event ICM may include two or three role archetypes as its participants. According to the number of role archetypes that participate in the emanation event ICM, Thai emanation events can be categorized into two basic semantic types:

1. thematic type involving two role archetypes (i.e. mover and absolute)
2. agentive type involving three role archetypes (i.e. mover, absolute and agent)

Thus, the two types differ in the scope of predication. The thematic type includes, while the agentive type excludes, an agent. A mover moves of its own accord in a thematic emanation event, while it is moved by the instigation of an agent in an agentive emanation event. In other words, the agentive type involves, while thematic type does not involve, some force-dynamic interaction between a mover and an agent.

Below I describe the thematic and agentive types of Thai emanation events.

#### 3.1.1.1. Thematic Emanation Event

In a thematic emanation event, a mover emanates from one absolute and moves in relation to another absolute, as illustrated in (22). A mover by itself, without any external force, moves with respect to absolute(s).

- (22) a. สายตา            ไป        หยุด        ที่        เขา  
 sǎay taa        pay        yùt        thii        kháw  
 line of vision    go        stop        at        PRONOUN  
 (Her) line of vision went and stopped at him.
- b. เสียง    ต่างๆ            ดัง        มา        กระทบ    หู  
 sǎaŋ    tàaŋ tàaŋ        daŋ        maa        krathóphǔu  
 sound    various            loud        come        hit        ear  
 Various loud sounds came and struck the ears.

c. กลิ่น ไชย มา  
 kʰin chooy maa  
 odor blow gently come

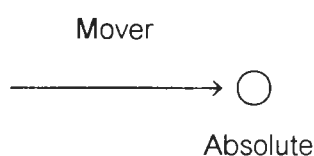
An odor came blowing gently.

d. แสง ไฟ กระจาย ลง สู่ สระ  
 sɛ̌ɛŋ fay kracaay loŋ sùu sàʔ  
 light lamp spread descend get to pool

The lamp's light spread down toward the pool.

e. เงา ไม้ ทอด ทาบ พื้น น้ำ  
 ŋaw máy thɔ̌t thâap phúuwn nám  
 shadow tree extend cover surfacewater

The tree's shadow extended and covered the surface of the water.



There are two semantic roles included in the thematic emanation event ICM:

1. A mover that undergoes a change of position relative to an absolute.
2. A absolute that serves as a reference point with respect to which a mover moves.

A mover spontaneously moves in relation to an absolute in a thematic emanation event. Thematic emanation events normally include an absolute as a reference point. An absolute may be located at the source, or the goal, or some intermediate point of an emanation path along which a mover proceeds.

### 3.1.1.2. Agentive Emanation Event

In an agentive emanation event, an agent moves a mover with respect to an absolute, as illustrated in (23).

(23) a. ทักษิณ ถอน สายตา จาก นาย เจิม  
 thápthim thɔ̌n sǎay taa càak naay cɛ̌m  
 Thapthim withdraw line of vision from Mr. Cerm

Thapthim pulled her line of vision away from Mr. Cerm.



(Thapthim stopped looking at Mr. Cerm.)

- b. เขา สะบัด เสียง ไล่ หล่อน  
 kháw sabàt sǎŋ sày lǎwŋ  
 PRONOUN whip sound put in PRONOUN

He roared at her.

- c. ดอกไม้ กำจาย กลิ่น หอม  
 dǔwk máy kamcaay kʰin hǔwm  
 flower spread odor fragrant

The flower spread a fragrant odor.

- d. ไฟ ส่อง แสง ตรง ลง มา  
 fay sǔwŋ sǎŋ tɔŋ loŋ maa  
 lamp shine light go straight descend come

The lamp shed light straight downward.

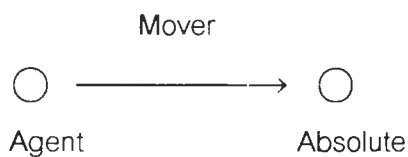
- e. ต้นไม้ ทอด เงา ลง บน พื้น  
 tǔn máy thǔwt ŋaw loŋ bon phǔtun  
 tree stretch shadow descend on surface

น้ำ

nám

water

The tree stretched its shadow on the surface of the water.



There are three semantic roles included in agentive emanation event ICM:

1. An agent that moves a mover.
2. A mover that is moved by an agent and undergoes a change of position relative to an absolute.
3. An absolute that serves as a reference point with respect to which a mover moves.

A mover is moved by an agent in an agentive emanation event. Some agentive emanation events, however, may not include any absolute, that is, the path of emanation may not be specified.

Note that a mover is the most central participant in an emanation event whether the event is of the thematic type or of the agentive type. This is the obligatory participant of emanation event ICM. That is, in all emanation events the presence of a mover is presupposed. Even though in some emanation expressions (e.g. เขามองไปยังดอกไม้ *kháw mǝŋ pay yaŋ dǝk máay* 'S/he looked toward the flower') a nominal mover may be unnamed, the direction of its motion must be represented by a motion verb or a preposition.

What fundamentally distinguishes the two types is their difference in degree of conceptual complexity. Conceptually, the thematic expression is less complex and the agentive type is more complex. In this regard, Langacker (1991a: 245; 1991b: 286-291) states that a thematic participant and the change it undergoes or the state it exhibits provide the minimum semantic content required for a processual predication, and thus constitute its irreducible conceptual core. This means that a thematic participant's change or state (i.e. thematic relationship) has conceptual autonomy, functioning as the bottom layer of the organization of a more complex event conception. This opinion is relevant to Talmy's (1976, 1988) argument that non-agentive expressions are more basic than expressions containing an agent since the inclusion of an agent in an expression involves an additional semantic complex.

### 3.1.2. Specific Semantic Types

In this section I discuss a variety of specific semantic types of Thai emanation events. Thai emanation events can be categorized into four types according to the kinds of imagined mover: perception, radiation, shadow and orientation types. The list below indicates the kinds of an intangible mover and tangible entities associated with events that together participate in an emanation event of each specific type.

1. Perception emanation events are categorized into four further subtypes:

1.1. Visual emanation events

Mover: a line of vision

Associated entities: a visual perceiver, a seen entity, and other reference entities

- 1.2. Auditory emanation events  
 Mover: a sound  
 Associated entities: an aural perceiver, a sound producer, and other reference entities
- 1.3. Olfactory emanation events  
 Mover: an odor  
 Associated entities: an olfactory perceiver, an odor producer, and other reference entities
- 1.4. Tactile emanation events  
 Mover: an air in motion  
 Associated entities: a tactile perceiver and other reference entities
2. Radiation emanation events  
 Mover: a light  
 Associated entities: an illuminated entity, a light radiator or reflector, and other reference entities
3. Shadow emanation events  
 Mover: a shadow  
 Associated entities: a shaded entity and a shadow producer
4. Orientation emanation events  
 Mover: the focus of an observer's attention  
 Associated entities: an orientated entity and a reference entity

These specific types of emanation events, except for the orientation type, may be either thematic or agentive. In other words, they may or may not include an agent that moves a mover. However, there are no tactile emanation expressions of the agentive type in my data. It is probably because Thai speakers usually take no notice of the producer of a stream of air (agent in tactile emanation event) and so agentive tactile emanations are scarcely expressed. There are no orientation emanation events of the agentive type (for the details, see the discussion in Section 3.1.3.4).

Below I describe each of the above specific semantic types of Thai emanation events. In each section, I first give a definition of that type of emanation event and show

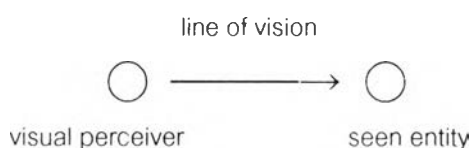
examples of linguistic realizations of it which are derived from my data. Then I identify the mover and list up possibly associated entities. The nature of the mover is also discussed.

### 3.1.2.1. Perception Emanation Event

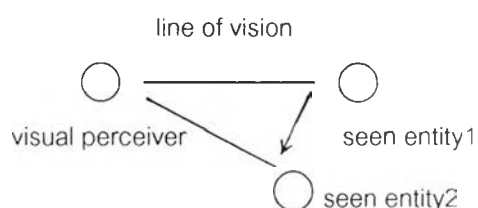
The first specific type of emanation events is perception emanation events, which consist of four subtypes: visual, auditory, olfactory, and tactile emanation events.

#### 3.1.2.1.1. Visual Emanation Event

A “visual emanation event” is defined as an imagined event in which an intangible straight line of vision emanates from a visual perceiver’s eyes and the head of the line moves relative to a seen entity. As the head of a line of vision changes its position, the length and orientation of the line as a whole also changes. Therefore, I take a moving line of vision as a whole, rather than as its head alone, as a mover in a visual emanation event. It should be noted that a line of vision is imagined to move both axially and laterally. That is, it first extends from a visual perceiver’s eyes to a seen entity (axial visual emanation), as in (24a), and then its head may further move over that seen entity or away from it toward another entity (lateral visual emanation), as in (24b) to (24d).



Axial visual emanation  
(extending ahead)



Lateral visual emanation  
(changing the direction)

- (24) a. เขา                      เอน    ตัว    พิง                      พนัก  
           kháw                    ʔeen   tua   phiŋ                    phanáʔ  
           PRONOUN            recline body   lean against   backrest



ตา	มอง	ไป	สู่	ฟาก	ฟ้า	สี	มืด
taa	mooŋ	pay	sùu	fāak	fāa	sii	muut
eye	look	go	get to	side	sky	color	dark

S/he reclined against the backrest and her/his eyes looked (stretched) toward the dark sky.

b. สายตา            ตวัด    ไป            ทาง    กำแพง            ฝั่ง  
 sǎay taa            tawàt    pay            thaaŋ    kamphæŋ            fīŋ  
 line of vision    whip    go            way    wall                    bank

ตรงกันข้าม  
 troŋ kan khām  
 opposite

(Her/His) line of vision moved to the wall on the opposite bank.

c. ผม                    กวาด    สายตา                    ดู            แต่ละ    คน    จน  
 phǒm                    kwàat    sǎay taa                    duu            tɛ̀e lá?    khon    con  
 PRONOUN            s'weep    line of vision                    see            every    person    until

ทั่ว  
 thūa  
 throughout

I directed my line of vision around to see every person throughout.  
 (I looked around to see every person.)

d. อุบล    ละ                    สายตา                    จาก    เขา  
 ?ubon    lá?                    sǎay taa                    càak    kháw  
 Ubon    abandon                    line of vision                    leave    PRONOUN

Ubon moved her line of vision from him. (Udon stopped looking at him.)

In a thematic visual emanation event, as (24a) and (24b), a line of vision emanates from a visual perceiver's eyes and proceeds along a linear path toward a seen entity and furthermore its head may shift in direction. In an agentive visual emanation event, as in (24c) and (24d), a visual perceiver extends the line of vision out of the eyes and controls the line moving in relation to a seen entity.

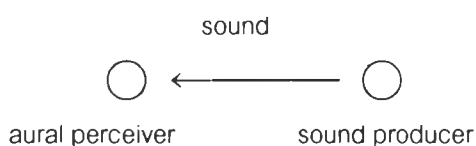
The mover in a visual emanation event is the line of vision. Other entities are also possibly involved in a visual emanation event: (1) the visual perceiver, (2) the eyes, (3)

the seen entity, and (4) other entities that function as reference entities with respect to which a line of vision moves (e.g. eyeglasses, a glass wall, a window, a lattice fence, and darkness, through which a line of vision passes; a desk, a fence, a pool, a river, a field, and someone's head or shoulder, over which it passes; and so on).

A line of vision is an imaginary mover. Thai speakers use the compound noun สายตา *sǎay taa* 'string + eye' for referring to a line of vision. My data include another compound noun for representing the concept of a line of vision, namely กระแสตา *krasǎe taa* 'current + eye.' But Thai speakers do not commonly utter this compound noun. It is likely that they conceptualize the configuration of a line of vision as solid (beam-like) rather than liquid/gaseous (current-like).

### 3.1.2.1.2. Auditory Emanation Event

An "auditory emanation event" is defined as an imagined event in which a sound emanates from a sound producer and moves in relation to an aural perceiver.



- (25) a. เพลง ฝรั่ง จาก แผ่นเสียง ล่องลอย มา  
*phleɛŋ faràŋ càak phèɛn sǎaŋ lɔŋ lɔɔy maa*  
 music Western leave record float come

จน ถึง สนาม  
*con thǔŋ sanǎam*  
 until reach field

Western music from a record floated to the field.

- b. คำ ที่ ไม่ สุภาพ หลุด  
*kham thǐi mây sùphâap lùt*  
 word RELATIVE PRONOUN NEGATIVE polite slip off  
 ออก ไป  
*ʔwɔk pay*

exit go

An impolite word slipped (out of one's mouth).

- c. ทุก คำ ผ่าน หู ไป เหมือน สายลม  
 thúk kham phàan hũu pay mư̄n sǎay lom  
 every word pass ear go like wind

Every word passed through her/his ears away like the wind.

(The person did not listen to the words.)

- d. เรา สอง คน ส่ง เสียง ทักทาย  
 raw sǎwng khon sòng sǎng thákthaay  
 PRONOUN two CLASSIFIER send sound greet  
 จาก ข้างๆ อ่างเลี้ยงปลา ไบ ใหญ่  
 càak khâng khâng ʔàang líang plaa bay yà  
 leave side fish farming pool CLASSIFIER big

We two sent greetings from the side of pool of the big fish farm.

- e. สามี ตวัด เสียง ใส่ ภรรยา  
 sǎamii tawàt sǎng sàt phanrayaa  
 husband whip sound put in wife

The husband roared at his wife.

In a thematic auditory emanation event, as in (25a) to (25c), a sound emits from a sound producer and moves in relation to an aural perceiver. In an agentive auditory emanation event, as in (25d) and (25e), a sound producer emits a sound and the sound moves in relation to an aural perceiver; or, a message sender produces a message and the message moves (from/through the mouth or the lips of the message sender) to (the ear or the auditory nerves of) a message receiver. Communication emanation events are a major subtype of auditory emanation events. A moving entity in a communication emanation event is a verbal message (i.e. a piece of spoken information) which is a particular kind of sound, that is, a meaningful sound.

The mover in an auditory emanation event is a sound (including a message). There are other entities possibly involved in auditory emanation events: (1) the sound producer (including message sender), (2) the mouth and lips, (3) the aural perceiver (including message receiver), (4) the ears and auditory nerves, and (5) other reference

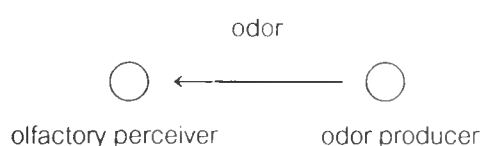
entities (e.g. an enclosed place (like a room) from which or to which a sound travels; a way (like an intercom) or an opening (like a door) through which it travels; a space (like a field) in which it disperses; a stream of wind along which it travels; and so on).

Though a sound is an intangible mover, we experience the presence of intangible sound waves by virtue of the organ of hearing (i.e. ears and auditory nerves). Unlike the mover in visual emanation events (i.e. a line of vision proceeding straight to a seen entity), the mover in auditory emanation events (i.e. a sound) may proceed along a linear path or diffuse in all directions. It depends on whether the destination of the auditory emanation in question is specific or not. For example, usually a bark of a dog in a house is conceived to advance toward some target, whereas a song of a bird in a forest is conceived to spread all around without any target. A verbal message (i.e. a meaningful sound) largely arrives at a message perceiver. However, it is possible that a message sender has little intention to convey a message to a message receiver, such as just muttering to herself or letting her tongue slip, so that the message does not reach any specific destination.

While a visual perceiver is an agent who controls the motion of a line of vision, an aural perceiver is not an agent who controls the motion of a sound. Since a line of vision emanates from a visual perceiver, a visual perceiver is always located at the definite starting point of a visual emanation. On the other hand, an aural perceiver is located at a mere prospective endpoint of an auditory emanation.

### 3.1.2.1.3. Olfactory Emanation Event

An “olfactory emanation event” is defined as an imagined event in which an odor emanates from an odor producer and moves relative to an olfactory perceiver.



- (26) a.   กลิ่น   แพ้                   กระจาย   ไป   รอบ   บ้าน  
          kĕlĭn   phèe                   kracaay   pay   rŏwɔp   bâan



odor spread out spread go around house

The odor spread out around the house.

- b. กลิ่น ลอย ตาม ลม มา กระทบ จมูก  
 kĭn lɔɔy taam lom maa krathóp camùuk  
 odor float follow wind come hit nose

An odor came along in the wind and struck the nose.

- c. เตา ย่าง เนื้อ ส่ง กลิ่น กำจาย  
 taw yâaŋ nŭa sòŋ kĭn kamcaay  
 oven roast meat send odor spread

The oven sent an odor about.

- d. ดอกไม้ ส่ง กลิ่น หอม เย็น กระจาย ไป  
 dŏwk máy sòŋ kĭn hŏm yen kracaay pay  
 flower send odor fragrant cool spread go

ทั่ว บริเวณ

thŭa bŏwriween

all over region

The flower sent a cool fragrance diffused all over the region.

In a thematic olfactory emanation event, as in (26a) and (26b), an odor emits from an odor producer and moves with respect to an olfactory perceiver. In an agentive olfactory emanation event, as in (26c) and (26d), an odor producer emits an odor and the odor moves with respect to an olfactory perceiver.

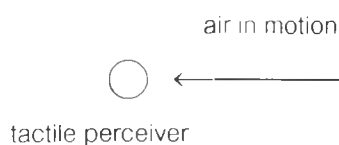
The mover in an olfactory emanation event is an odor. Other entities that are possibly involved in olfactory emanation events are: (1) the odor producer, (2) the olfactory perceiver, (3) the nose and olfactory nerves, and (4) other reference entities (e.g. a space like a room where an odor producer is located and an odor diffuses about; a breeze along which an odor flows). Compared with visual and auditory emanations, the kinds of reference entities for olfactory emanations are limited to quite a small number. Intermediate points (except the medium such as an air stream) and endpoints (other than olfactory perceivers) are hardly referred to in olfactory emanation expressions, probably because it is difficult for us to identify the accurate route of an olfactory emanation.

An odor is an intangible mover, but we become aware of its presence because of our olfactory perception by means of the organ of smell (i.e. nose and olfactory nerves). English has a number of nouns denoting abstract entities sensed by the organ of smell, such as aroma, fragrance, scent, stench, smell, and odor. Out of these nouns, 'smell' seems to be most frequently used in daily life, but sometimes it has a biased connotation, namely a horrid one. Therefore, in my study I employ the most neutral word 'odor' as the term for representing an entity raising the sense of smell. The Thai counterpart กลิ่น *klîn* 'odor, smell' also sometimes connotes a bad odor, but it can be modified by หอม *hôm* 'fragrant, scented, aromatic,'เหม็น *mên* 'give off a bad odor, smell,' ชุน *chûn* 'acrid,' and other words for odor quality.

The description of configurations of olfactory emanations is less various than that of visual and auditory emanations. This presumably reflects difference in the degree of conceptualized solidness between the former and the latter: we conceptualize emanations of odors as being less solid (more diffuse) than emanations of lines of vision or sounds. Such different degrees of conceptualized solidness of emanations bear on the different degrees of the intention of agents to direct the emanations to certain destinations. Generally, the agents of olfactory emanations have a lower degree of intention to emit movers than the agents of visual and auditory emanations. That is, an odor producer normally does not have any intention to send the product --- an odor --- to a particular target.

#### 3.1.2.1.4. Tactile Emanation Event

A "tactile emanation event" is defined as an imagined event in which a current of air occurs and moves with respect to a tactile perceiver. Usually a tactile emanation event does not encompass an agent (producer of air in motion), that is, it is thematic, as in (27). Agentive tactile emanation expressions are not included in my data. Thai speakers normally do not speak of a particular agent of a tactile emanation.



(27) a. ลม เย็น ผ่าน เข้า มา ใน รถ  
 lom yen phàan khâw maa nay rót  
 wind cool pass enter come in car

A cool wind came into the car.

b. ลม หนาว พุ่ง ปะทะ ใบหน้า และ ลำแขน  
 lom nǎaw phûŋ patháʔ bay nǎa léʔ lam khěen  
 wind cold dart crash face and arm

A cold wind blasted into the face and arms.

The mover in a tactile emanation event is air in motion. There are other entities possibly involved in a tactile emanation event: (1) the tactile perceiver and (2) other reference entities (e.g. a discrete space (like a car, a room) to which a stream of air proceeds; a surface (like the surface of the water) over which it passes; an opening (like a door, a window) through which it passes; and so forth).

Air in motion is an intangible mover. Although air in motion itself is intangible, its effects are sensible tactilly and/or visually and/or aurally: we become aware of the presence of air when we are exposed to it and sense its pressure, temperature and humidity, and/or when we see something moving as a result of being hit by it, and/or when we hear a noise from something moving as a result of being hit by it. But I take only tactilly sensed cool or hot air in motion as tactile emanation.

Since a current of air serves as the medium of transmission of a sound or an odor, some tactile emanation expressions conflate auditory or olfactory emanation with tactile emanation. (28) is an example of an olfactory-tactile emanation expression.

(28) ลม เย็น มา วูบหนึ่ง หวน เอา กลิ่น หอม  
 lom yen maa wûp nûŋ hŭan ʔaw klin hŭom  
 air in motion cool come suddenly return take smell fragrant  
 มาแตะประสาท รับ กลิ่น  
 maa tèʔ prasàat ráp klin  
 come touch nerve receive smell

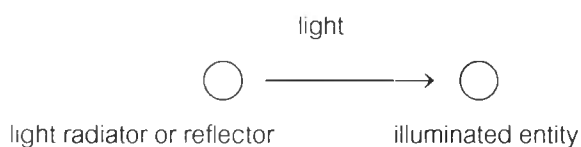
A cool current of air suddenly came bringing a sweet smell which struck the

olfactory nerves (stimulated the sensation of smell).

The English language categorizes air in motion into at least three classes according to its source: (a) one originating from natural forces (wind, breezes, blasts, gusts, drafts, whirlwinds, etc.); (b) one originating from artificial processes such as the working of an electric fan (current); (c) one originating from breathing (breath). But the Thai language has only one noun for the concept of air in motion, namely ลม *lom* 'air in motion,' which can be modified variously (e.g. ลมอ่อน *lom ʔwɔ̄n* 'breeze,' ลมมรสุม *lom mɔ̄ɔrasũm* 'monsoon,' ลมวง *lom ŋuɑŋ* 'tornado,' ลมหวน *lom hũan* 'whirlwind' ลมหายใจ *lom hǎay cay* 'breath,' etc.). However, the nouns ไอน้ำ *ʔay* 'vapor' and คลื่น *khlũum* 'wave' can also be used to represent air in motion (e.g. ไอน้ำ *ʔay phôn* 'vapor (=air in motion) + exhole; jet,' คลื่นความร้อน *khlũum khwaam rɔ̄n* 'wave (= air in motion) + heat; hot air'). In addition, though the flow of air is an indiscrete part of the atmosphere, sometimes it is described as being linear, either less solid current-like (กระแสลม *krasǎe lom* 'current of air') or more solid string-like (สายลม *sǎay lom* 'string of air').

### 3.1.2.2. Radiation Emanation Event

Radiation emanation events are the second specific type of Thai emanation events. A "radiation emanation event" is defined as an imagined event in which a light emerges from a light radiator, or reflects from a light reflector, and moves away from it to an illuminated entity.



- (29) a. แสง สลัวราง สาด ผ่าน กระจก ฝ้า เข้า มา  
 sǎeŋ salũa raɑŋ sàat phàan kracòk fǎa khǎw ma  
 light dim splash pass glass frosted enter come

A dim light came in through the frosted glass.

- b. ลม แสง เล็กๆ พุ่ง ลง จับ ที่ นาฬิกา  
 lam sǎeŋ lék lék phũŋ loŋ çàp thǐi naalikaa

beam light small dart descend hold at clock

A little beam of light hurled down and rested on the clock.

c. องค์พระ เปล่ง รัศมี ออก มา รอบ กาย  
 ใว่ phrá? plèŋ rátsàmmī ใว่k maa rǔwǎp kaay  
 Buddha image emit light exit come around body

The Buddha image emitted rays of light around its body.

d. ดวงตะวัน ทอ แสง สี ทอง ลง บน  
 duang tawan thǎw sǎy sīi thǎwŋ loŋ bon  
 sun weave light color gold descend on  
 พื้น น้ำ สี เนื้อ ไส้ จาง  
 phǔn nam sīi nuǎ sǎy caaŋ  
 surface water color substance transparent pale

The sun shed golden light on the surface of the clear water.

In a thematic radiation emanation event, as in (29a) and (29b), light moves away from a light radiator or reflector to an illuminated entity. In an agentive radiation emanation event, as in (29c) and (29d), a light radiator or reflector sheds light upon an illuminated entity.

The mover in a radiation emanation event is light. Radiation emanation events may involve other entities: (1) the light radiator or reflector, (2) the illuminated entity, and (3) other reference entities (e.g. a glass, a chink, a hole among leaves, a hole in the ozone layer, and so forth).

Light is an intangible, though visible, mover. We categorize comparative bright electromagnetic waves as light, and comparative dark ones as shadow or shade (see Section 3.1.2.3 below). Sometimes light or brightness is associated with warmth that is sensed by the tactile organ.

As I mentioned earlier, the concepts 'sound,' 'odor' and 'air in motion' are denoted by a single plain noun in Thai (i.e. เสียง sǎy 'sound,' กลิ่น kĭn 'odor' and ลม lom 'air in motion,' respectively), while they are denoted by a number of nouns with a variety of connotations in English (e.g. sounds, voice, noises, etc.; smells, aromas, fragrances, scents, stench, etc.; currents, wind, breezes, blasts, etc.). However, the concept 'light' is denoted by a number of Thai nouns (e.g. แสง sǎy 'light (brightness),' รัศมี

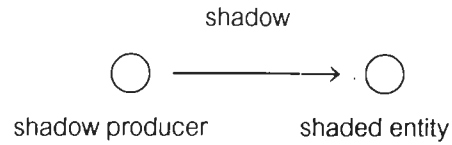
**rátsàmi** 'light spreading out like radii,' **ประกาย** **prakaay** 'spark (tiny glowing bit thrown off from a burning entity),' **แวว** **wæw** 'light on a membrane-like cover or surface of something (such as light in the eyes and light from a diamond),' **เงา** **ngaw** 'gleam,' **แดด** **dæet** 'sunlight'), though still fewer than English nouns for light (e.g. light, glow, shine, flash, shimmer, glimmer, gleam, twinkle, luster, spark, glitter, glint, glare, etc.). Thai speakers linguistically do not classify intangible entities without a particular shape (like sound, odor, and air in motion), but do classify intangible entities if they have a particular shape (like light) (cf. Placzek 1978: 82-83).

English speakers may use nouns for solid linear entities (beams, threads) or for more abstract linear entities (rays) for characterizing light as extending from a radiator (a beam/thread/ray of light; rays of light). Likewise, to express the conceptualized schematic shapes of light, Thai speakers use classifiers such as **ลำ** **lam** (hull) for long slender tapering objects (e.g. **ลำแสง** **lam sǎeng** 'classifier (hull) + light') and **ดวง** **duang** (circle) for round objects (e.g. **ดวงไฟ** **duang fay**, **ดวงดาว** **duang daaw**, **ดวงจันทร์** **duang can**, **ดวงประทีป** **duang prathîp** 'classifier (circle) + fire/star/moon/candle').

Actually, we cannot always tell whether a shining entity in question is a radiator or a reflector. To take a simple example: we, except for those who have a good knowledge of astronomy, do not know if a twinkling star in the sky radiates its own light or reflects light from the sun. Yet we take for granted naively that stars shine by themselves. The boundary between the categories of a light reflector and an illuminated entity is vague. They are by no means two discrete categories. A roof bathed in a sunlight, for example, can be taken either as a light reflector if the sunlight is strong, or as an illuminated entity if the sunlight is soft. We also know from everyday outdoor experiences that the more white-like color a roof has, the more light the roof reflects, in other words, the more reflector-like the roof is.

### 3.1.2.3. Shadow Emanation Event

Shadow emanation events are the third specific type of Thai emanation events. A "shadow emanation event" is defined as an imagined event in which a shadow emerges from a shadow producer and moves to a shaded entity.



- (30) a. เงา                  ของ    บ้าน    หลาย    หลัง                  ทอด    ยาว  
 ḡaw                  khwǎŋ    bâan    lǎay    lǎŋ                  thǔwt    yaaw  
 shadow                  of    house    many    CLASSIFIER    stretch long  
 ลง                  บน    กอ    กระจะ  
 loŋ                  bon    koo    sawà?  
 descend                  on    clump    Java weed

The shadows of many houses stretched down over a clump of Java weed.

- b. เงา                  ของ    ต้นไม้    ตก    ทอด    บน    พื้นดิน  
 ḡaw                  khwǎŋ    tǒnmáy tòk    thǔwt    bon    phǔntun din  
 shadow                  of    tree    fall    stretch on    the ground

The tree's shadow fell on the ground.

- c. ยอด    ปราสาท                  ทอด    เงา                  ลง                  มา  
 yǔwt    praasàat                  thǔwt    ḡaw                  loŋ                  maa  
 top    tower                  stretch shadow                  descend                  come  
 เป็น                  ทาง    ยาว  
 pen                  thaaŋ    yaaw  
 COPULA                  path    long

The tower's top shed its shadow as a long path.

- d. มะม่วง                  ขยับ    เงา                  ยาว    จาก    โคน    ต้น  
 mamúŋ                  khayàp ḡaw                  yaaw    càak    khoon tǒn  
 mango                  budge shadow                  long    leave    trunk    tree  
 ทอด    ยืด                  ไป    ตาม    พื้น  
 thǔwt    yúwt                  pay    taam    phǔntun  
 stretch lengthen                  go    follow    the ground

The mango tree extended its shadow long from its trunk along the ground.

In a thematic shadow emanation event, as in (30a) and (30b), a shadow emerges from a shadow producer and moves as out as or over a shaded entity. In an agentive shadow emanation event, as in (30c) and (30d), a shadow producer brings about a shadow and casts it onto an entity.

The mover in a shadow emanation event is a shadow. A shadow emanation event may involve other entities: (1) the shadow producer and (2) the entity shaded.

A shadow is an intangible mover. Usually Thai shadow emanation events do not include an absolute other than a shadow producer (source entity) and an entity that is shaded (goal entity). This is presumably because Thai speakers normally do not conceptualize a shadow emanation as going through some intermediate reference point.

English speakers metaphorically conceptualize shadows as concrete entities having weight (such as a heavy or light shadow). The darker a shadow is, the heavier it is conceived to be. But Thai speakers do not characterize shadows as being heavy or light (\*เงาหนัก *ɲaw nàk* 'shadow + heavy,' \*เงาเบา *ɲaw baw* 'shadow + light'). However, the use of the verb ตก *tòk* 'fall,' as in (30b), suggests that Thai speakers also conceptualize shadows as having weight.

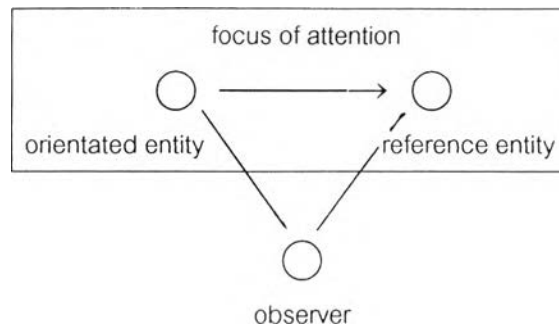
Areal (two-dimensional) darkness is named เงา *ɲaw* 'shadow, luster, image' (or เงามืด *ɲaw mǐi* 'shadow + dark') in Thai. But เงา *ɲaw* represents not only a shadow (areal darkness) but also a gleam or an image reflected on a mirror-like surface. In short, entities denoted by เงา *ɲaw* 'shadow, luster, image' are not necessarily dark.

#### 3.1.2.4. Orientation Emanation Event

Thai emanation events of the fourth and last specific type are orientation emanation events. An "orientation emanation event" is defined as an imagined event in which an orientated entity turns (or is turned by an orientation-setter) to a reference entity and the focus of an observer's attention shifts from the orientated entity to the reference entity. Thus, orientation emanations are a depiction of the orientation of entities in terms of a linear path connecting the entity with a certain remarkable reference entity, along which an observer's focus of attention shifts. However, neither observers nor their focus of attention are explicitly named in orientation emanation



expressions, but motion verbs and prepositions used in the expressions allude to the moving focus of attention of observers.



- (31) a.    กระท่อม      หัน    ไป    สู่    ทะเล  
 krathwôm    hăn    pay    sùu    thalee  
 cabin        turn    go    get to    sea

The cabin turned toward the sea. (The cabin looks toward the sea.)

- b.    ด้าน   หน้า    พระราชวัง                    หัน    เข้า    หา    ตัวเมือง  
 dâan   nâa    phrá/râatch: waj            hăn    khâw    hăa    tua muanj  
 side    face    palace                            turn    enter    seek    downtown

The front side of the palace turned toward the downtown.

(The front side of the palace faces toward the downtown.)

- c.    หล่อน            ชี้      มือ    ข้าม    รั้ว    ไป    ยัง    บ้าน  
 lŏwn            chíi    mɯu    khâam    rúa    pay    yanj    bâan  
 PRONOUN    point    hand    cross    fence    go    toward    house  
 ของ    เขา  
 khŏwŋ    khâw  
 of        PRONOUN

She pointed her hand to his house over the fence.

- d.    ทุก    แปลง   หัน    ด้านข้าง                    เข้า    ทะเล  
 thúk    pleɛŋ    hăn    dâan khâŋ                    khâw    thalee  
 every    plot    turn    side                            enter    sea

Every plot turned the side toward the sea.

(Every plot's side faces toward the sea.)

The mover in an orientation emanation event is the observer's focus of attention. Other entities possibly involved in orientation emanation events are: (1) the orientation-setter, (2) the orientated entity, and (3) the reference entity. An intermediate reference entity for an orientation emanation is rarely expressed. My data include only one orientation emanation expression in which an intermediate reference entity is mentioned, i.e., (31c) (the intermediate reference entity is <sup>v</sup>ṛúá 'fence').

Orientation emanation events entail no agent. Even though an orientation emanation event can be encoded by a transitive clause, as in (31c) and (31d), it is not an agentive type because its subject represents an orientation-setter that does not move a mover (observer's focus of attention) along the path starting from an orientated entity and terminating at a reference entity. An orientation-setter is just an indirect initiator of an orientation emanation event. The observer, who may cause and control the mover, is not an agent, either, but the external conceptualizer (see the discussion below). Therefore, (31a) to (31d) all express thematic orientation emanation events (after an orientated entity actually/fictively turns/points to a reference entity) where an unnamed observer's focus of attention moves from the first orientated entity to the second reference entity. Whether an orientation-setter is identical to an orientated entity, as in (31a) and (31b), or not, as in (31c) and (31d), is a trivial matter for an orientation emanation (i.e. shift of an observer's focus of attention).

The observer (involved in an orientation emanation event) is different from a visual perceiver (involved in a visual emanation event) in terms of the situated positions: an observer is situated outside, while a visual perceiver is situated inside the objective scene of the emanation event. Recall Langacker's event model, especially the stage model. Observers or conceptualizers are excluded from the objective scene or setting in which the emanation event unfolds, but they view the event from the outside and their focus of attention moves from the orientated entity to the reference entity. The focus of attention of an observer is subjectively involved, while the line of vision of a visual perceiver is objectively involved in an emanation event. In other words, an observer of an orientation emanation event is the external (or subjective) conceptualizer, whereas a visual perceiver of a visual emanation event is the internal (or objective) participant even though sometimes a visual perceiver is not profiled and is not overtly mentioned.

### 3.1.2.5. Summary of Specific Semantic Types

Properties of each specific semantic type of Thai emanation event are summarized in Chart 1 below. Chapter 1 shows what participants are involved in each specific type and which participant may possibly be assigned a certain semantic role (MOVER or *AGENT* or *ABSOLUTE*).

1.1. Visual	1.2. Auditory	1.3. Olfactory	1.4. Tactile
line of vision <u>MOVER</u>	light <u>MOVER</u>	shadow <u>MOVER</u>	Stream of air <u>MOVER</u>
visual perceiver <i>AGENT</i> or <i>ABSOLUTE</i>	sound producer <i>AGENT</i> or <i>ABSOLUTE</i>	odor producer <i>AGENT</i> or <i>ABSOLUTE</i>	
seen entity <i>ABSOLUTE</i>	aural perceiver <i>ABSOLUTE</i>	olfactory perceiver <i>ABSOLUTE</i>	Tactile perceiver <i>ABSOLUTE</i>
other reference entity <i>ABSOLUTE</i>	other reference entity <i>ABSOLUTE</i>	other reference entity <i>ABSOLUTE</i>	other reference entity <i>ABSOLUTE</i>

	2. Radiation	3. Shadow	4. Orientation
	light <u>MOVER</u>	shadow <u>MOVER</u>	focus of attention <u>MOVER</u>
	light radiator/reflector <i>AGENT</i> or <i>ABSOLUTE</i>	shadow producer <i>AGENT</i> or <i>ABSOLUTE</i>	(orientation-setter) (INDIRECT INITIATOR)
	illuminated entity <i>ABSOLUTE</i>	shaded entity <i>ABSOLUTE</i>	orientated entity <i>ABSOLUTE</i>
	other reference entity <i>ABSOLUTE</i>		other reference entity <i>ABSOLUTE</i>

Chart 1: Participants in Specific Types of Thai Emanation Event

From Chart 1 above, we see the following points. First, tactile and orientation emanation events (expressed in my data) do not include agents. That is, there are no agentive orientation emanation events, while it is possible to imagine an agentive tactile emanation event, as in (32), though this is very rarely the case.

- (32) เครื่องแอร์      ขนาด    ใหญ่      ส่ง      ลม                      เย็น    มา      กระทบ  
 khruàŋ ʔee    khaàa yà    sòŋ    lom                      yen    maa    krathóp  
 air-conditioner size    big    send    air in motion    cold    come    hit  
 ผิวหนัง  
 phǐw nǎŋ  
 skin

The big air-conditioner sent a cool flow of air which struck her/his skin.

Second, shadow emanation events (expressed in my data) do not include absolutes other than a shadow producer (source) and a shaded entity (goal). Thai speakers normally do not conceptualize any intermediate reference entity in a shadow emanation event.

### 3.1.3. Summary

To summarize, Thai emanation events are categorized into two basic types according to the number of the participants included:

1. Thematic types involving two participants (mover and absolute):

A mover moves related to an absolute

2. Agentive types involving three participants (mover, absolute and agent):

An agent moves a mover related to an absolute

Thai emanation events are also categorized into four specific types according to the kind of mover:

1. Perception emanation events, including
  - 1.1. Visual emanation events (fictive motion of a line of vision)
  - 1.2. Auditory emanation events (fictive motion of a sound)
  - 1.3. Olfactory emanation events (fictive motion of an odor)
  - 1.4. Tactile emanation events (fictive motion of a current of air)
2. Radiation emanation events (fictive motion of light)

3. Shadow emanation events (fictive motion of a shadow)
4. Orientation emanation events (fictive motion of the focus of an observer's attention)

The degree of agentivity of an agent in a visual emanation event (visual perceiver) is relatively high, because it controls motion of a mover (line of vision) all the time. In contrast, an agent in an emanation event of other types (such as sound producer, odor producer, light radiator, and shadow producer) does not execute full agentivity. That is, although the agent brings forth a mover and directs it to some direction, it does not have control over motion of the mover afterward.

### 3.2. Comparison of Emanation Subtypes

This section consists of three subsections. Section 3.2.1 examines differences among the specific types of Thai emanation event. Section 3.2.2 examines different degrees of conceptual solidity of the perception types. By 'conceptual solidity,' I mean phenomenological substantiality of emanation that is linguistically expressed. And Section 3.2.3 discusses the distinction between the active-determinative nature of a source entity in Thai emanation event and the agentive nature of a source entity in English emanation event.

#### 3.2.1. Differences among Emanation Subtypes

Generally, Thai emanation events are classified force-dynamically into two main types: thematic and agentive types. The choice of clause subject (non-agent subject vs. agent subject) effects the force-dynamic classification. Furthermore, they are also modified in the spatial and temporal dimensions by using various kinds of verbs and prepositions.

In the following subsections, I examine characteristics of each specific type of Thai emanation event in three dimensions, namely, in force-dynamic, spatial and temporal dimensions. I first explain the points examined in each dimension below.

In the dimension of force-dynamics, I examine two points: (1) the number of the role archetypes of participants (two or three), and (2) the relation between the mover and the absolute (the mover is stronger than the absolute and vice versa). The first point indicates whether or not an agent is included. If there are only two role archetypes, the agent is not included (mover and absolute); if there are three role archetypes, the agent is included (mover, absolute and agent). Inclusion of an agent leads to some energy transmission between the agent and the mover, that is, the agent moves the mover. The second point indicates whether or not the mover interacts force-dynamically with the absolute. It is possible that the mover is stronger or weaker than the absolute and so some force interaction between them may happen. If the mover is stronger than the

absolute, the mover thrusts its way through the absolute; if the mover is weaker than the absolute, the mover rebounds when meeting the absolute.

In the dimension of space, I examine three points: (1) orientation of path of emanation, (2) directionality, and (3) highlighted portion of path of emanation. The first point indicates what schematic configuration the path of emanation has (line or surface or space). A mover may move along a line (axially) or move on a surface (laterally) or move in space (moving about). The second point indicates in what direction the mover proceeds. The mover may move in an "intrinsic" or "absolute" or "relative" direction (cf. Levinson 1996). Intrinsic directions are directions that are determined by some intrinsic feature of the participant such as the front and the back (forward/backward); absolute directions are the fixed directions provided by gravity (upward/downward); and, relative directions are directions that are determined relative to the position of some viewpoint or absolute (inward/outward, hither/thither, opposite direction ;). The third point indicates what portion of the path of emanation is possibly highlighted. There are four schematic configuration types of a highlighted portion of the path of emanation: point (starting point, intermediate point, endpoint, stationary point), line (path followed), surface (upper surface, middle surface), and space (surrounding space, pervasive space, inner/outer space, upper space, middle space, side space, space above, way).

In the dimension of time, I examine three points: (1) aspect of emanation, (2) velocity of emanation, and (3) duration of emanation. The first point indicates whether emanation is perfective (involving some change) or imperfective (involving no change). The mover may start moving or stop moving. It also may keep moving or stay at rest. The second point indicates how the speed of emanation is specified. The mover may move fast or slow. The third point indicates whether or not emanation is specifically characterized as durative. Sometime auditory emanations are described as moving for a long time.

Specific values in each dimension are summarized below.

#### 1. Force-dynamic dimension:

##### 1.1. The number of the role archetypes of participants (emanation type):

two, i.e., mover and absolute (thematic type)

three, i.e., mover, absolute and agent (agentive type)

### 1.2. Relation between mover and absolute:

mover is stronger than absolute

absolute is stronger than mover

## 2. Spatial dimension:

### 2.1. Orientation of path of emanation:

moving axially (along a line)

moving laterally (on a surface)

diffusing or moving about (in space)

### 2.2. Directionality of emanation:

intrinsic direction: forward/backward

absolute direction: upward/downward

relative direction: inward/outward, hither/thither, opposite

### 2.3. Highlighted portion of path of emanation:

point: starting point, intermediate point, endpoint, stationary point

line: path followed

surface: upper surface, middle surface

space: surrounding space, pervasive space, inner/outer space, upper space, middle space, side space, space above, way

## 3. Temporal dimension:

### 3.1. Aspect of emanation:

perfective: to change into motion / to change to a state of rest

imperfective: to keep moving / to stay at rest

### 3.2. Velocity of emanation:

fast/slow

### 3.3. Duration of emanation:

a long period of time



Below I examine force-dynamic, spatial and temporal characteristics of each emanation subtype.

### 3.2.1.1. Perception Emanation

Perception emanation consists of four subtypes: visual, auditory, olfactory and tactile emanations.

#### 3.2.1.1.1. Visual Emanation

A straight line of vision emerges from a visual perceiver's eyes and moves relative to a seen entity or other reference entity. This is the basic scenario of a visual emanation event. But specific characteristics of visual emanations are various, as is shown below.

1. Force-dynamic:

1.1. Emanation type:

- |                    |   |
|--------------------|---|
| thematic emanation | the clausal subject is a mover (line of vision), as in (33a)    |
| agentive emanation | the clausal subject is an agent (visual perceiver), as in (33b) |

- (33) a. สายตา           กวาด   ไป           ทั่ว           ห้อง  
 sāaytaa           kwàat pay           thúa           hǐŋ  
 line of vision   sweep go           all over room  
 Her/His line of vision moved around the room.
- b. เขา                   กวาด   สายตา                   มอง   ทุก   คน  
 kháw               kwàat   sāay taa               mǝŋ   thúk   khon  
 PRONOUN       sweep line of vision   look   every   CLASSIFIER  
 S/he moved her line of vision to look at everybody.

1.2. Relation between mover and absolute:

- |                                 |                                     |
|---------------------------------|-------------------------------------|
| implication of a stronger mover | ฝ่า fáa '(a mover) goes against (an |
|---------------------------------|-------------------------------------|

absolute)'

## 2. Spatial:

## 2.1. Orientation of path of emanation:

axial	ตรง <i>troṅ</i> 'go straight,' ทอด <i>thwət</i> 'stretch,' ถอน <i>thwən</i> 'withdraw,' พุ่ง <i>phūṅ</i> 'throw, dart'
lateral	กวาด <i>kwàat</i> 'sweep,' กราด <i>kràat</i> 'rake,' ปราย <i>praay</i> 'cast about,' ตวัด <i>tawət</i> 'whip,' ลด <i>lót</i> 'lower,' เบน <i>been</i> 'veer,' เปลี่ยน <i>plian</i> 'change,' ละ <i>lá?</i> 'detach,' ได้ <i>lây</i> 'chase,' สอดส่าย <i>sòtsàay</i> 'insert and sway,' วงเวียน <i>wonwian</i> 'circle,' โคลมได้ <i>loomlây</i> 'rub,' ตาม <i>taam</i> 'follow'

## 2.2. Directionality of emanation:

forward/ backward	ทอด <i>thwət</i> 'stretch'/ ถอน <i>thwən</i> 'withdraw'
upward/ downward	ขึ้น <i>khūn</i> 'ascend'/ ลง <i>loṅ</i> 'descend'
inward/ outward	เข้า <i>khâw</i> 'enter,' สอด <i>sòt</i> 'insert'/ ออก <i>iwək</i> 'exit'
hither/ thither	มา <i>maa</i> 'come'/ ไป <i>pay</i> 'go'

## 2.3. Highlighted portion of path of emanation:

starting point	แต่ <i>tèe</i> 'from,' ตั้งแต่ <i>tāṅ tɛe</i> 'from,' จาก <i>càak</i> 'leave, depart'
intermediate point	ผ่าน <i>phàan</i> 'pass,' ข้าม <i>kâam</i> 'cross,' เลย <i>lɔy</i> 'pass, overstep,' ลอด <i>lòt</i> 'go through,' ทะลุ <i>thalu?</i> 'go through,' ฝ่า <i>fâa</i> 'go against'
endpoint	จรด <i>caròt</i> , จด <i>còt</i> 'touch,' ถึง <i>thūṅ</i> 'reach,' สู่ <i>sùn</i> 'get to,' หา <i>hâa</i> 'seek,' ตรง <i>troṅ</i> 'go straight,' ยิ่ง <i>yan</i> 'toward,' ที่ <i>thii</i> 'at (point),' ใน <i>nay</i> 'in (inner),' นอก <i>nwək</i> 'out (outer),' บน <i>bon</i> 'on (upper)'
stationary point	กับ <i>kàp</i> 'at (with),' ที่ <i>thii</i> 'at (point)'
path followed	ตาม <i>taam</i> 'follow,' ได้ <i>lây</i> 'chase'
upper surface	บน <i>bon</i> 'on (upper)'
middle surface	กลาง <i>klaaṅ</i> 'in the middle of (middle)'
surrounding space	รอบ <i>rɔwəp</i> 'around (surrounding)'



pervasive space	ทั่ว <i>thūa</i> 'all over (everywhere)'
inner/outer space	ใน <i>nay</i> 'in (inner)'/ นอก <i>nōk</i> 'out (outer)'
side space	ภายใน <i>phaay</i> 'in the space of (side),' ข้าง <i>khāaŋ</i> 'in the direction of (side)'
way	ทาง <i>thaaŋ</i> , เบื้อง <i>būaŋ</i> 'in the direction of (way)'

### 3. Temporal:

#### 3.1. Aspect of emanation:

to change into motion	ลด <i>lót</i> 'lower,' ละ <i>lá?</i> 'leave, detach,' เบน <i>been</i> 'veer,' เปลี่ยน <i>pĕian</i> 'change,' ปลาย <i>praay</i> 'cast about,' ตวัด <i>tawàt</i> 'whip,' ฟุ่ง <i>phūŋ</i> 'throw, dart,' ทอด <i>thōwt</i> 'stretch,' ส่ง <i>sòŋ</i> 'send,' ถอน <i>thōwn</i> 'withdraw,' สอด <i>sōwt</i> 'insert,' กวาด <i>kwàat</i> 'sweep,' กราด <i>kràat</i> 'rake,' เหลือบ <i>lūap</i> 'glance upward or sidewise,' ชำเลียง <i>chamluaŋ</i> 'glance upward or sidewise,' คั่น <i>khōwn</i> 'look askance'
to change to a state of rest	หยุด <i>yūt</i> 'stop,' จับ <i>càp</i> 'hold, catch,' พบ <i>phóp</i> 'meet, touch,' กระทบ <i>krathóp</i> 'collide against, hit,' ปะทะ <i>pathá?</i> 'crash'
to keep moving	วนเวียน <i>wonwian</i> 'circle,' โขมโลม <i>loomláy</i> 'rub,' ตาม <i>taam</i> 'follow,' ตามติด <i>taam tít</i> 'follow,'ไล่ <i>lây</i> 'chase,' เลื่อนลอย <i>lūan looy</i> 'drift,' ฝ่า <i>faa</i> 'go against,' อยู่ <i>yūu</i> 'stay,' แล <i>lee</i> 'turn and look'
to stay at rest	แขวน <i>khwǎen</i> 'hang,' ค้าง <i>kháaŋ</i> 'remain, stick to,' จับ <i>càp</i> 'hold, catch,' อยู่ <i>yūu</i> 'stay'

#### 3.2. Velocity of emanation:

fast	ฟุ่ง <i>phūŋ</i> 'throw, dart,' ตวัด <i>tawàt</i> 'whip,' เชียด <i>chĭat</i> 'pass near, graze'
slow	เลื่อนลอย <i>lūan looy</i> 'drift'

With respect to (1.2), normally we do not imagine a force interaction (other than touching) between a line of vision (mover) and a seen entity or a reference entity (absolute) in a visual emanation event, but there is a verb that implies a slight force interaction between the two, namely ฝ่า *fāa* 'go against,' as in (34).

(34)	สายตา	ของ	หล่อน	มอง	ฝ่า	ความมืด
	sǎay taa	khǎwng	lǎwn	mǎwng	fāa	khwaam mǔt
	line of vision	of	PRONOUN	look	go against	darkness
	ไป	ยัง	เงา	รางๆ		
	pay	yan	ngaw	raan raan		
	go	toward	shadow	dim		

Her line of vision looked and went against the darkness toward a dim shadow.

But ฝ่า *fāa* 'go against' never implies the transmission of energy between a line of vision and a seen entity. A certain energy transmission may be brought in to focus in terms of how a person's mental state may be affected, as in (35).

(35)	b.	เขา	ถาก	ด้วย	ตา
		kháw	thàak	dúay	taa
		PRONOUN	cut	by means of	eye

S/he cut (something) by means of the eye.

i.e. S/he glared fiercely at something.

	c.	เขา	กรีด	สายตา
		kháw	kriit	sǎay taa
		PRONOUN	slit	line of vision

S/he slit (something) with her/his line of vision.

i.e. S/he looked sharply along something.

However, the semantic domain of such expressions here shifts from a spatial domain into a mental one. In this study, I do not analyze expressions in non-spatial domains.

With respect to (2.1), it is impossible for a line of vision to move along an axially nonstraight path (e.g. to proceed along a zigzag or crooked path). The contour of a line of vision between a perceiver's eyes and a seen entity must not be complex but ideally straight and direct.

### 3.2.1.1.2. Auditory Emanation

The basic scenario of an auditory emanation event is where a sound emerges from a sound producer and moves relative to an aural perceiver. But there are two different configurations of auditory emanation which are as follows. (1) a sound emerges from a sound producer and proceeds along a linear path; (2) a sound emerges from a sound producer and diffuses in space. Each of the two types of auditory emanation can be further modified. A modification of an auditory emanation is made by adding specific values for the force-dynamic, spatial, and temporal components. Below, I first show all grammatical and lexical elements that represent those specific values, and then compare those of auditory emanations to those of visual emanations.

#### 1. Force-dynamic:

##### 1.1. Emanation type:

thematic type	the clausal subject is a mover (sound), as in (36a), or an absolute (aural perceiver), as in (36b)
agentive type	the clausal subject is an agent (sound producer), as in (36c)

- (36) a.   เสียง ตะโกน ออก มา จาก ห้องน้ำ  
           sǎŋ   takoon ʔwək   maa   càak   hǔŋ nám  
           sound shout exit   come leave bathroom  
           A shout came out of the bathroom.
- b.   ข้า ได้ยิน เสียง ตาม หลัง มา  
           khâa           dâyyn sǎŋ   taam   lǎŋ   maa  
           PRONOUN   hear   sound follow back come  
           I heard a sound coming after me.

c.	เขา	ตะโกน	ข้าม	ห้อง
	kháw	takoon	khâam	hông
	PRONOUN	shout	cross	room

S/he shouted (and the shout went) across the room.

## 1.2. Relation between mover and absolute:

implication of a stronger mover	ฝ่า <b>fiaa</b> '(a mover) goes against (an absolute)'
implication of a stronger absolute	สะท้อน <b>sathwôn</b> , กระทบ <b>krathwôn</b> '(a mover) bounces back on (an absolute)'

## 2. Spatial:

### 2.1. Orientation of path of emanation:

moving along a line	สะท้อน <b>sathwôn</b> , กระทบ <b>krathwôn</b> 'reflect, rebound,' กลับ <b>klàp</b> 'turn back,' ย้อน <b>ywôn</b> 'retrace,' ลอย <b>looy</b> 'float,' ล่อง <b>ลอย lóy looy</b> 'drift,' หลั่งไหล <b>làn lăy</b> , ไหล <b>lăy</b> 'flow'
moving in space	แผ่ <b>phèet</b> 'emit,' หวน <b>hŭan</b> 'return,' กระจาย <b>kracaay</b> 'spread'

### 2.2. Directionality of emanation:

upward	ขึ้น <b>khŭm</b> 'ascend'
downward	ลง <b>loŋ</b> 'descend,' ร่วง <b>rŭaŋ</b> 'drop off, fall'
inward	เข้า <b>khâw</b> 'enter,' แทรก <b>sĕek</b> 'insert'
outward	ออก <b>lŭok</b> 'exit,' เล็ดลอด <b>lét lŭot</b> 'sneak,' หลุด <b>lùt</b> 'slip off'
hither	มา <b>maa</b> 'come,' ใกล้ <b>klâm kraay</b> 'come near,' ใกล้ <b>klây</b> 'near'
thither	ไป <b>pay</b> 'go,' ห่าง <b>hàaŋ</b> 'remote'
opposite directions	สวน <b>sŭan</b> 'pass in opposite directions'

### 2.3. Highlighted portion of path of emanation:

starting point	แต่ <b>tĕe</b> 'from,' จาก <b>càak</b> 'leave'
intermediate point	ผ่าน <b>phàan</b> 'pass,' ข้าม <b>khâam</b> 'cross,' ลอด <b>lŭot</b> 'go through,' ทะลุ <b>thalŭ</b> 'go through,' ฝ่า <b>fiaa</b> 'go against,' ตัด

	tàt 'cut,' แทรก sêek 'insert, penetrate'
endpoint	ถึง thǔng 'reach,' ใ้ sày 'put in,' ต่อ tǔw 'joint,' กับ kàp 'with,' แก่ kèe 'for'
path followed	ตาม taam 'follow,' ไล่ lây, กวดไล่ kùat lây 'chase'
pervasive space	ทั่ว thǔa 'all over (everywhere)'
inner/outer space	ใน nay 'in (inner)'/ นอก nǔwk 'out (outer)'
side space	ข้าง khâaŋ 'in the direction of (side)'
way	ทาง thaaŋ 'in the direction of (way)'

### 3. Temporal:

#### 3.1. Aspect of emanation:

to change into motion	ส่ง sòŋ 'send,' ทิ้ง thǐng 'throw away,' ยิง yǐŋ 'shoot,' กระทบ krathêek 'bang,' สะบัด sabàt 'fling,' ตวัด tawàt 'throw, whip,' ยื่น yǔn 'protrude,' เล็ดลอด lét lǔw 'sneak,' แทรก sêek 'insert, penetrate,' กระจาย kracaay 'spread,' หยอด yǔw 'drop,' หลุด lùt 'slip off,' ร่วง rǔaŋ 'drop off, fall,' ลาก lâak 'tug,' ทอด thǔw 'stretch,' ผุด phèet, เปล่ง plèŋ 'emit,' ออก ǔwk 'exit, put forth (emit),' ลง loŋ 'descend, put down (emit)' and all auditory activity verbs
to change to a state of rest	กระทบ krathóp 'collide against, hit'
to keep moving	ลอย looy 'float,' ล่องลอย loŋ looy 'drift,' ตาม taam 'follow,' หลั่งไหล làŋlǎy, ไหล lǎy 'flow,' เดิน deen 'walk,' วิ่ง wǐŋ 'run,' ไล่ lây, กวดไล่ kùat lây 'chase,' อยู่ yǔu 'stay'

#### 3.2. Velocity of emanation:

fast	ตวัด tawàt 'throw, whip'
slow	ลอย looy 'float'

#### 3.3. Duration of emanation:

a long period of time	ลาก lâak 'tug,' ทอด thǔw 'stretch'
-----------------------	------------------------------------

The characteristics of auditory emanations and visual emanations are different from each other on the grounds that they take different values of the incorporated semantic components, except for (1.1) and (3.2).

(1.2) tells that if a sound confronts a stronger absolute, it can do nothing but bounce back from it (สะท้อน *sathóvɔn*, กระทบ *krathóvɔn* 'reflect'). After being launched by a sound producer, a sound should keep moving onward, never pausing, except after reaching a goal such as the ears (กระทบหู *krathóp hūu* 'hit the ears').

With respect to (2.1), visual emanations extend along a single axial or lateral direction, while auditory emanations may extend along a single axial direction (ล่องลอย *lōng lōy* 'drift') or in multiple directions (แผด *phèet* 'emit,' กระจาย *kracaay* 'spread'); they may bounce back after hitting a landmark (สะท้อน *sathóvɔn*, กระทบ *krathóvɔn* 'reflect'); and, they may turn back to the original place (กลับ *klàp* 'turn back,' หวน *hūan* 'return'). Unlike visual emanations, auditory emanations are not a solid line and therefore they cannot move laterally, such as by turning the head horizontally and vertically.

Several differences between auditory and visual emanations are found in (2.2). First, auditory emanations should move 'forward.' Once auditory emanations depart from sound producers, they continue advancing. Sound producers cannot make a sound retreat after releasing it. For visual emanations, on the other hand, it is possible to move backward, that is, a visual perceiver can withdraw a line of vision from an enclosed space (ถอน *thvōn* 'withdraw'). Second, besides directional verbs, there are only two motion verbs used for expressing the directionality of visual emanations, namely สอด *sōt* 'insert' for an inward path and ถอน *thvōn* 'withdraw' for an outward path. On the other hand, there are several motion verbs used for expressing the directionality of auditory emanations, such as ร่วง *rūaŋ* 'drop off, fall' for a downward path, แทรก *sēek* 'insert, penetrate' for an inward path, เล็ดลอด *lét lōt* 'sneak,' หลุด *lūt* 'slip off' for an outward path, and กล้ำกราย *klâmkraay* 'come near' for a near or approaching path. Third, auditory emanations approaching, or moving away from, aural perceivers are expressed by using not only verbs of motion (ไป *pay* 'go,' มา *maa* 'come,' กล้ำกราย *klâmkraay* 'come near') but also verbs of distance (ใกล้ *klây* 'near,' ห่าง *hàŋ* 'remote').



But verbs of distance are not used for the description of visual emanations. Fourth, there is a unique direction which auditory emanations can be imagined to take, namely, two strings of sound may pass in opposite directions (สวน **sàan** 'pass in opposite directions'). More specifically, one person may speak to another person and the latter person may simultaneously speak back to the former person. In contrast, two visual emanations are not imagined to pass in opposite directions, though they may be imagined to meet.

Visual and aural emanations differ in regard to (2.3) as well. First, in some communication emanation expressions, the verb ใส่ **sày** 'put in' and the noun phrase naming someone's face (หน้า **nâa** 'face'), viz., ใส่หน้า **sày nâa** 'put in the face' are placed in the final position of the clause. In such expressions, "face" metonymically represents its possessor, namely a message receiver who may be mentally affected by the message. A face is a very prominent body-part of an animate being where the eyes, the nose and the mouth are located. Therefore we take the face is the most salient, and therefore representative part of its possessor. We know that the most effective way of mentally affecting a person is to hit her/his face. As such, a message sender may throw a violent message against the face of a message receiver whom s/he wants to verbally attack.

Second, in visual emanation expressions a moving reference entity which the mover follows is encoded by ตาม **taam** 'follow' alone, but in auditory emanation expressions it may be encoded by not only ตาม **taam** 'follow' but alsoไล่ **lây** 'chase' which has a slight force-dynamic connotation. This fact suggests the somewhat forcefulness of the mover of auditory emanations (i.e. sound).

Third, goals of auditory emanations, unlike goals of visual emanations, are not encoded by such lexical items as ตรง **tron** 'at (go straight),' ที่ **thii** 'at (place, point),' ใน **nay** 'in (inner)' and นอก **nôok** 'out (outer)' that designate a specific endpoint. This reflects our conceptualization with respect to configurations of auditory emanations that they do not have a pointed head.

Fourth, since auditory emanations do not move laterally, prepositions indicating starting points and endpoints of lateral motions (i.e. those headed by ตั้งแต่ **tântèe** 'from' and จรด **caròt**, จร **còt** 'touch,' respectively) do not appear.

A significant difference between auditory and visual emanations in (3.1) is that auditory emanations, unlike visual emanations, always exhibit the progressive aspect. Namely, auditory emanations are never imagined to cease to rest. Our world knowledge tells us that a sound keeps changing its location.

(3.3) concerns only auditory emanations. Some auditory emanations involve duration and pitch. For example:

- (37) a. ลาก เสียง  
 lâak sǎŋ  
 tug sound  
 to prolong the voice
- b. ทอด เสียง  
 thǔwt sǎŋ  
 stretch sound  
 to prolong the voice
- c. ตวัด เสียง  
 tawàt sǎŋ  
 whip sound  
 to change into a high pitch

(37a) and (37b) represent prolonging the voice; (37c) represents changing into a high pitch. Note that the verb ทอด thǔwt 'stretch' expresses two related meanings: it expresses the temporal length of a sound (long duration of uttering) when used in auditory emanation expressions, whereas it expresses the spatial length of a line of vision (long distance between a visual perceiver and a seen entity) when used in visual emanation expressions.

### 3.2.1.1.3. Olfactory Emanation

The semantic elements that characterize olfactory emanations are categorized into the force-dynamic, spatial and temporal ones. Below, I list all

grammatical and lexical elements indicating their specific values, and then compare them with those of visual and auditory emanations.

## 1. Force-dynamic:

### 1.1. Emanation type:

thematic type	the clausal subject is a mover (odor), as in (38a) or an absolute (olfactory perceiver), as in (38b)
agentive type	the clausal subject is an agent (odor producer), as in (38c)

- (38) a. กลิ่น คาว คลุ้ง มา แต่ ไกล  
 kĭn khaaw khlúŋ maa tɛɛ klay  
 odor stinking spread come from far  
 A stinking odor came spreading from afar.
- b. ได้ กลิ่น สบู่ อ่อนๆ ระเหย ออก มา  
 dây kĭn sabùu ใ่วน ใ่วน rahǎy ใ่วก maa  
 get odor soap soft evaporate exit come  
 จาก ดวงหน้า นั้น  
 càak duan nâa nán  
 leave face that  
 (S/he, sensed a soft odor of soap evaporating from that face.)
- c. ดอกไม้ ส่ง กลิ่น หอม  
 dǎwk máy sòŋ kĭn mǎn  
 flower send odor fragrant  
 The flower sent out fragrance.

## 2. Spatial:

### 2.1. Orientation of path of emanation:

moving along a line	โชย chooy 'blow gently'
moving in space	แผ่ phɛɛ 'spread out,' ขจร khacoon, กำจาย kamcaay, กระจาย kracaay 'spread,' ซ่าน sâan 'diffuse,' ระเหย rahǎy

'evaporate,' คลุ้ง *khruŋ*, คละคลุ้ง *khlá?khlúŋ* 'spread, smell strong, reek,' ฟุ้ง *fúŋ* 'spread, fill the air, reek,' อวดอบ *ʔuanʔòp*, อบอวด *ʔòpʔuan* 'pervading'

## 2.2. Directionality of emanation:

upward	ขึ้น <i>khûn</i> 'ascend'
inward/ outward	เข้า <i>khâw</i> 'enter'/ ออก <i>ʔòk</i> 'exit'
hither/ thither	มา <i>maa</i> 'come'/ ไป <i>pay</i> 'go'

## 2.3. Highlighted portion of path of emanation:

starting point	แต่ <i>tèe</i> 'from,' จาก <i>càak</i> 'leave'
endpoint	ถึง <i>thúŋ</i> 'reach'
path followed	ตาม <i>taam</i> 'follow'
pervasive space	ทั่ว <i>thûa</i> 'all over (everywhere)'
inner space	ใน <i>nay</i> 'in (inner)'

## 3. Temporal:

### 3.1. Aspect of emanation:

to change into motion	ส่ง <i>sòŋ</i> 'send'
to change to a state of rest	กระทบ <i>krathóp</i> 'collide against, hit,' ปะทะ <i>patháʔ</i> 'crash'
to keep moving	โชย <i>chooy</i> 'blow gently,' ตาม <i>taam</i> 'follow,' ระเหย <i>rahǎy</i> 'evaporate,' ลอย <i>looy</i> 'float,' อยู่ <i>yùu</i> 'stay'

### 3.2. Velocity of emanation:

slow	โชย <i>chooy</i> 'blow gently,' ลอย <i>looy</i> 'float,' แผ่ <i>phèe</i> 'spread out'
------	---

It is obvious that the number of the semantic components incorporated in the meanings of olfactory emanation expressions is much smaller than those of visual and auditory emanation expressions. The specific values for olfactory emanations are also less various than those for visual and auditory emanations. Only (1.1) shows no differences from visual and auditory emanation expressions.

Any olfactory emanation expressions do not imply an asymmetrical relationship between the mover and the absolute, nor an affected one (e.g. a line of vision goes

against a reference entity; a sound bounces back on a reference entity). No force interaction is seen in olfactory emanation events.

As in (2.1), olfactory emanations axially proceed along a path or diffuse in space. And the lexical items listed in (2.1) all represent motion with no specific orientation. Configurations of olfactory emanations are thus fuzzy.

As in (2.2), olfactory emanations, like auditory emanations, always move 'forward.' They are never imagined to move backward or retreat. It is imagined that the mover of auditory and olfactory emanations (sound, odor) is free from control of the causer and therefore moves according to natural law. In addition to moving forward, olfactory emanations are described as moving into or out of something as well as moving nearer or away from something. But they are not commonly described as moving upward or downward. The reason may be that the configuration of olfactory emanations is largely multi-directional and does not form a vertical gradient. Note that **ขึ้น** *khūn* 'ascend' in sentences like (39) functions as an inchoative aspect marker:

(39)	มัน	ส่ง	กลิ่น	ขึ้น	มา
	man	sòŋ	kʰin	khūn	maa
	PRONOUN	send	odor	INCHOATIVE	come

It has begun to send an odor.

The sources, goals and mediums of olfactory emanations are profiled by a few lexical items, as in (2.3), and normally intermediate points are not profiled. This suggests fuzziness of the path of olfactory emanations. Generally we do not speak of particular intermediate points or endpoints of olfactory emanations, except for the nose.

There are a few topological characterizations for reference entities of olfactory emanations. These are represented by **ทั่ว** *thūa* 'all over' and **ใน** *nay* 'in,' as indicated in, e.g., **ทั่ว** *thūa* **บึง** *buŋ* 'all over the marsh' or **ใน** *nay* **ห้อง** *hōŋ* 'in the room.'

With respect to (3.1), olfactory emanations are similar to auditory emanations: (3.1) lacks the value of 'to keep at rest.' Odors and sounds are commonly imagined to keep moving until they lose the substantiality in the course of time or they terminate at

someone's nose or ears. That is, olfactory and auditory emanations are always progressive.

A few lexical items represent the slowness of olfactory emanations, as in (3.2). Unlike visual and auditory emanations, olfactory emanations are not described by **พุ่ง phûŋ** 'throw, dart' or **ตวัด tawàt** 'throw, whip' implying a high velocity. It is likely that odors are conceived to move slowly. Practically, we might argue that the nose is not capable of recognizing an odor at high speed. The nose may be considered dull in comparison with the ears.

### 3.2.1.1.4. Tactile Emanation

Tactile emanations are characterized by specific values of the force-dynamic, spatial and temporal components shown below.

#### 1. Force-dynamic:

##### 1.1. Emanation type:

thematic type                      the clausal subject is a mover (air in motion), as in (40)

(40)	ลม	เย็น	โกรก	เข้า	มา
	lom	yen	kròok	khâw	maa
	air in motion	cool	blow strongly	enter	come
	Cool air blew in.				

#### 2. Spatial:

##### 2.1. Orientation of path of emanation:

moving along a line      **โชย chooy** 'blow gently,' **ไหล lăy** 'flow,' **พุ่ง phûŋ** 'throw, dart,' **กฐ kruu**, **กฐเกรี้ยว kruu kriaw** 'throng, crowd,' **โกรก kròok** 'leach, blow strongly,' **กระโชก krachòok** 'come suddenly upon, blow strongly'

##### 2.2. Directionality of emanation:

inward/ outward                      **เข้า khâw** 'enter' / **ทะลัก thalák** 'leak out'

hither/ thither      มา *maa* 'come' / ไป *pay* 'go'

### 2.3. Highlighted portion of path of emanation:

starting point	จาก <i>càak</i> 'leave'
intermediate point	ลอด <i>lòot</i> 'go through,' ผ่าน <i>phàan</i> 'pass'
endpoint	ถึง <i>thǔng</i> 'reach'
path followed	ตาม <i>taam</i> 'follow'
surrounding space	รอบ <i>ròop</i> 'around (surrounding)'
inner space	ใน <i>nay</i> 'in (inner)'
upper space	บน <i>bon</i> 'on, over (upper)'
way	ทาง <i>thaang</i> 'in the direction of (way)'

### 3. Temporal:

#### 3.1. Aspect of emanation:

to change into motion	ฟุ้ง <i>phũng</i> 'throw, dart,' ทะลัก <i>thalák</i> 'leak out,' กระทอก <i>krachòok</i> 'come suddenly upon, blow strongly,' โกรก <i>kròok</i> 'leach, blow strongly,' ไชย <i>chooy</i> 'blow gently,' ไหล <i>lǎy</i> 'flow,' กว <i>kruu</i> , กว เกี้ยว <i>kruu kriaw</i> 'throng, crowd,' เป่า <i>pàw</i> 'blow,' พัด <i>phát</i> 'fan,' กระทบ <i>krathóp</i> 'fan, flap'
to change to a state of rest	ปกคลุม <i>pòk khlum</i> 'cover,' ปะทะ <i>pathá?</i> 'crash,' กระทบ <i>krathóp</i> 'collide against, hit,' ถูก <i>thùuk</i> 'touch'
to keep moving	โกรก <i>kròok</i> 'leach, blow strongly,' ไชย <i>chooy</i> 'blow gently,' ไหล <i>lǎy</i> 'flow,' กว <i>kruu</i> , กวเกี้ยว <i>kruu kriaw</i> 'throng, crowd,' ได้ <i>láy</i> 'smear,' รวยริน <i>ruay rin</i> 'pour slowly,' อยู่ <i>yùu</i> 'stay'

#### 3.2. Velocity of emanation:

fast	ฟุ้ง <i>phũng</i> 'throw, dart,' โกรก <i>kròok</i> 'leach, blow strongly,' กระทอก <i>krachòok</i> 'come suddenly upon, blow strongly'
slow	ไชย <i>chooy</i> 'blow gently,' รวยริน <i>ruay rin</i> 'pour slowly'

One of the most salient characteristics of tactile emanations is their spontaneity. As indicated in (1.1), tactile emanation events do not entail an agent. That is, tactile emanations are imagined to move about freely from any arbitrary control but just abiding by natural law.

The configuration of tactile emanations is very simple, as in (2.1). Tactile emanations proceed along a path. That is all.

Regarding (2.2), tactile emanations do not have a default value, while auditory and olfactory emanations have a default value, namely moving 'forward.' Since tactile emanations have no causers (agents), it is impossible to identify the 'forward' direction for tactile emanations. Furthermore, it is rare that tactile emanations are described as moving upward, downward or outward. In my data, for example, there are no tactile expressions including the directional verbs **ขึ้น** *khūn* 'ascend,' **ลง** *long* 'descend' and **ออก** *ʔok* 'exit.' This may be ascribed to the nature of air in motion itself as well as our common experiences about air in motion. First, we usually experience a current of air passing horizontally past us but not blowing up or down onto us. Second, we sense air in motion when we expose ourselves to it outdoors; otherwise, when we stay inside a building and it comes in, rather than going out, passing past us.

As shown in (2.3), the starting and terminating points and intermediate points or paths of tactile emanations can all be profiled, though the number of lexical items used for profiling them is relatively small. Note that they are not 'points' in a strict sense. Rather, they are 'spaces' or 'directions' in relation to which a current of air moves.

Using the lexical items indicated in (2.3), the region of a reference entity for a tactile emanation can be characterized as directed path, surrounding space, enclosed space, or space above.

From (3.1) and (3.2) we see that tactile emanations are conceived to continue moving and never stop and that they may be conceived to move at a slow speed or a fast speed.

### 3.2.1.2. Radiation Emanation





	'deviate,' สะท้อน <i>sathwón</i> 'reflect, rebound,' กลับ <i>klàp</i> 'turn back,' ฉาย <i>chǎay</i> 'project, emit'
moving on a surface	ไล้ <i>láy</i> 'rub,' ลูบไล้ <i>lúup láy</i> 'caress,' ทา <i>thaa</i> 'smear,' กราด <i>kràat</i> 'rake,' ทอ <i>thoo</i> 'weave'
moving in space	กระจาย <i>kracaay</i> 'spread,' แผ่ <i>phèe</i> 'spread out,' ซ่าน <i>sâan</i> 'diffuse,' กระเด็น <i>kraden</i> 'spurt,' สาด <i>sàat</i> 'splash,' ปราย <i>praay</i> 'cast about'

## 2.2. Directionality of emanation:

downward	ลง <i>loŋ</i> 'descend,' ตก <i>tòk</i> 'fall, drop'
inward/ outward	เข้า <i>khâw</i> 'enter'/ ออก <i>iwók</i> 'exit,' เล็ดลอด <i>lét lwót</i> 'sneak'
hither/ thither	มา <i>maa</i> 'come'/ ไป <i>pay</i> 'go'

## 2.3. Highlighted portion of path of emanation:

starting point	จาก <i>càak</i> 'leave'
intermediate point	ผ่าน <i>phàan</i> 'pass,' ลอด <i>lwót</i> 'go through' ทะลุ <i>thalú?</i> 'go through'
endpoint	ถึง <i>thǔŋ</i> 'reach,' ถึง <i>sùu</i> 'get to,' ตรง <i>tron</i> 'go straight,' ยัง <i>yan</i> 'toward,' ที่ <i>thii</i> 'at (point),' ใน <i>nay</i> 'in (inner),' บน <i>bon</i> 'on (upper),' กับ <i>kàp</i> 'with'
stationary point	ตรง <i>tron</i> 'at (go straight),' ที่ <i>thii</i> 'at (point)'
upper surface	บน <i>bon</i> 'on (upper)'
middle surface	กลาง <i>klaaŋ</i> 'in the middle of (middle),'
surrounding space	รอบ <i>rǔwóp</i> 'around (surrounding)'
pervasive space	ทั่ว <i>thúa</i> 'all over (everywhere)'
inner space	ใน <i>nay</i> 'in (inner)'
middle space	ระหว่าง <i>rawàaŋ</i> , หว่าง <i>wàaŋ</i> 'among'
above space	เหนือ <i>núa</i> 'above'
way	ทาง <i>thaaŋ</i> 'in the direction of (way)'

## 3. Temporal:

### 3.1. Aspect of emanation:

to change into motion	พุ่ง <i>phúŋ</i> 'throw, dart,' พวยพุ่ง <i>phuayphúŋ</i> 'stream'
-----------------------	---

	out,' แล่น lēn 'run,' ตก tók 'fall, drop,' ทอด thówt 'stretch,' ซ่าน sâan 'diffuse,' กระเด็น kraden 'spurt,' สาด sàat 'splash,' ปราย praay 'cast about,' กระจาย kracaay 'spread,' แผ่ phèe 'spread out,' ส่ง sòng 'send,' ผลิต phlíi 'bud,' ทอ thoo 'weave,' เปล่ง plèng 'emit,' ฉาย cháay 'project, emit'
to change to a state of rest	กระทบ krathóp 'collide against, hit,' โดน doon 'hit, collide,' ตั้ong tǒng 'meet, touch,' ถูk thùuk 'touch,' จับ càp 'hold, catch,' ติด tít 'stick,' ตก tók 'fall, drop,'
to keep moving	ไล้ láy 'rub,' ลูบไล้ lúup láy 'caress,' กวาด kràat 'rake,' ทา thaa 'smear,' อยู๋ yùu 'stay'
to stay at rest	อาบ ʔàap 'bathe,' ฉาบ chàap 'coat,' ทาบ thâap 'cover, lay flat against,' พาด phâat 'lean, put across,' หุ้มห่อ hũm hỏỏ 'wrap up, cover,' ทอด thówt 'stretch,' อยู๋ yùu 'stay'

### 3.2. Velocity of emanation:

fast	พุ่ง phũng 'throw, dart,' พวยพุ่ง phuayphũng 'stream out,' แล่น lēn 'run'
slow	แผ่ phèe 'spread out'

Above, we see the following characteristics of radiation emanations. First, as indicated in (2.1), a radiation emanation may extend along a linear path (move axially) and then it may shift the direction of its head on a surface (move laterally), or it may diffuse in all directions. When it moves axially, the axial linear path may be straight or bent at a point due to an obstacle or spontaneously (สะท้อน sathỏỏn 'reflect,' ใพล่ phlây 'deviate,' เบี่ยงเบน biang been 'deviate'). If the angle of reflection is around 180 degrees, we may say (42).

(42)	แสง	สะท้อน	กลับ
	sǎeng	sathỏỏn	klàp

light reflect return

The light reflected back.

When a radiation emanation diffuses in space, it never returns to where it started along a curved path. Therefore (43) is not acceptable, though (44), which expresses an auditory emanation along a curved path, is OK.

(43) \*แสง หวน กลับ มา  
 sǎeŋ hǔan klàp maa  
 light return turn back come

(intended meaning) The light returned back.

(44) เสียง หวน กลับ มา  
 sǎaŋ hǔan klàp maa  
 sound return turn back come

The sound returned (echoed) back.

Second, a light may be rendered as a substance with a considerable weight. There are a few pieces of evidence in support of this idea. In the first place, a radiation emanation can be conceived to fall onto something by the force of gravity, as illustrated in (45).

(45) แสงไฟ ตก ลง มา ตรง สัน จมูก  
 sǎeŋ fay tòk loŋ maa tron sǎn camùuk  
 light fall descend come at ridge nose

Light fell down on the ridge of her nose.

In the second place, some radiation emanations are understood as analogous to watercourses, as follows. For one thing, แสง sǎeŋ 'light' can be modified by the classifier ลำ lam (for long slender bodies, approximately cylindrical in form, such as hulls, trunks and stems, as well as watercourses or songs) and this classifier is presumably derived from the nominal concept 'hull' --- a mover along a watercourse (cf. Bradley 1873: 616;

Placzek 1992: 160). What is more, as shown in (2.1) and (3.1), radiation emanations can be represented by verbs for motion of liquid entities: พวยพุ่ง *phuayphung* 'stream out,' สาด *sàat* 'splash,' อาบ *jàap* 'bathe,' ฉาบ *chàap* 'coat,' ทา *thaa* 'smear' (and กระเด็น *kraden* 'spurt,' cf. Bradley 1873: 47).

Third, a radiation emanation is often described as resting on an illuminated entity, as if light has covered or stuck on an illuminated entity. As indicated in (3.1), there are a number of motion verbs used for expressing such radiation emanations at rest: จับ *càp* 'hold, catch,' ทอด *thót* 'stretch,' อาบ *jàap* 'bathe,' ฉาบ *chàap* 'coat,' ได้ *láy* 'rub,' ทา *thaa* 'smear,' ทาบ *thâap* 'cover, lay flat against,' พาด *phâat* 'lean, put across,' หุ้มห่อ *húm hỏ* 'wrap up, cover,' and ติด *tít* 'stick.' Out of these verbs, จับ *càp* 'hold, catch' encodes the resulting phase of both visual and radiation emanations; ทอด *thót* 'stretch' encodes not only the resulting phase of radiation and shadow emanations but also the initial and progressive phases of visual, auditory, radiation and shadow emanations.

The illuminated form may be a relatively wide surface (ทอด *thót* 'stretch,' อาบ *jàap* 'bathe,' ฉาบ *chàap* 'coat,' ได้ *láy* 'rub,' ทา *thaa* 'smear,' ทาบ *thâap* 'cover, lay flat against,' พาด *phâat* 'lean, put across,' หุ้มห่อ *húm hỏ* 'wrap up, cover') or a relatively narrow spot (จับ *càp* 'hold, catch,' ติด *tít* 'stick').

### 3.2.1.3. Shadow Emanation

Shadow emanations are deduced from visible areal shadows. That is, a shadow on a surface is imagined to have such a history that it has fallen onto that surface and changed into an areal figure, or it has stretched its shape over that surface. In this regard, shadow emanations can be regarded as a subtype of what Talmy (1996) calls 'advent paths' (e.g. The palm trees clustered together around the oasis; This rock formation occurs near volcanoes). Shadow emanations are characterized in the force-dynamic, spatial and temporal dimensions, as follows:

1. Force-dynamic:

1.1. Emanation type:



	'cover, lay flat against,' ပြင်ပပုံပုံ ပြင်ပပုံ ပြင်ပပုံ 'cover'
to stay at rest	တစ်ခုတည်း တစ်ခုတည်း 'stretch,' တစ်ခုတည်း တစ်ခုတည်း 'cover, lay flat against'

Force-dynamically, shadow emanations do not differ from radiation emanations, as shown in (1.1) and (1.2). However, the number of lexical items used for characterizing shadow emanations is much smaller than radiation emanations. This means that conceptualizations of shadow emanations are less various.

As in (2.1), the path of shadow emanations may extend axially (e.g. တက် တက် 'fall, drop') or laterally (e.g. နှိပ် ကျပ် 'budge').

As in (2.2), the directionality of shadow emanations is relatively limited. First, shadow emanations never retreat. Once they leave the shadow producers, they must advance to shaded entities. Second, shadow emanations are not modified by the directional verbs ချော် ကျော် 'enter' and စွဲက ချော် 'exit,' since normally they are not imagined to pass through an intermediate reference entity. Third, they are seldom modified by the directional verb ချော် ကျော် 'ascend,' either, since usually the direction of rays of light is down toward the surface below. The common spatial relationship between a shadow and its producer is that a shadow is under its producer. That is, a shadow emanation goes down.

#### 3.2.1.4. Orientation Emanation

Orientation emanations (motion of the observer's focus of attention) are highly abstract and subjective phenomenon. It is nonsense to ask whether an orientation emanation is thematic or agentive in terms of the physical force-dynamics, or whether it is perfective or imperfective in terms of aspect. Orientation emanations can be modified by the following spatial dimensions only.

2. Directionality of emanation:

downward	လှ လှ 'descend'
inward/ outward	ချော် ကျော် 'enter'/ စွဲက ချော် 'exit'

hither/ thither            มา *maa* 'come'/ ไป *pay* 'go'

### 3. Highlighted portion of path of emanation:

starting point	จาก <i>càak</i> 'leave'
intermediate point	ข้าม <i>khâam</i> 'cross'
endpoint	สู่ <i>sùu</i> 'get to,' หา <i>hǎa</i> 'seek,' ใส่ <i>sà</i> 'put in,' ยิ่ง <i>yan</i> 'toward ,' ที่ <i>thii</i> 'at (point)'
way	ทาง <i>thaaj</i> 'in the direction of (way)'

Orientation emanations have the following two salient characteristics. First, an orientation emanation always shifts laterally. The focus of attention (connected, by means of the line of sight, with the observer's vantage point outside the setting) proceeds along a linear path from an orientated entity to a reference entity, and the path is straight. The axial motion (i.e. extension from the observer's vantage point) has nothing to do with the designation of orientation in the setting. Second, there are no intrinsic directions of an orientation emanation (such as forward or backward), because its producer which functions the determinant for its intrinsic directions does not exist in the setting.

### 3.2.2. Conceptual Solidity of Perception Emanation

Talmy (1996: 248) states that "the manner in which the various (sensory) modalities behave with respect to the (palpability-related) parameters --- in possibly different ways --- remains at issue." Here I examine the degree of conceptual solidity of different perception emanations pertaining to the following sensory modalities: (1) the visual modality (the sense of sight), (2) the auditory modality (the sense of hearing), (3) the olfactory modality (the sense of smell), and (4) the tactile modality (the sense of touch).

I adopt the notion "conceptual solidity" as a cognitive-functioning parameter for evaluating the abstractness of perception emanations. This parameter is a simplified and reduced version of Talmy's palpability-related parameters that I mentioned in Section 2.1.1. It specializes in spelling out values at the semiabstract level, ranging from



the less abstract (solid) to the more abstract (less solid). The degree of conceptual solidity is inversely proportional to the degree of abstractness. Since emanation is semiabstract in nature, it need not cover the concrete level and the extreme abstract level. I assume that the degree of conceptual solidity of perception emanations of each type is determined by the following two points: (1) whether or not they are manipulated for some purpose; (2) how their goal entities are characterized.

### 1. Controllability

Whether each type of perception emanation can or cannot be described as being launched and controlled by a person for a certain purpose (i.e. whether it can be of agentive type) is recapitulated below.

- |                         |  |
|-------------------------|--|
| (1) visual emanation    | may include an agent<br>and may be launched and controlled by an agent |
| (2) auditory emanation  | may include an agent<br>and may be launched by an agent                |
| (3) olfactory emanation | may include an agent<br>and may be launched by an agent                |
| (4) tactile emanation   | usually does not include an agent<br>and is not launched by an agent   |

The controllability of an emanation is relevant to the solidity of an emanation. An emanation is seldom imagined to be controllable unless it is conceptualized to being solid. Therefore visual and auditory emanations are conceptually more solid (less abstract) than olfactory and tactile emanations.

### 2. Region of Goal

Possible imagined schematic regions of goals of perception emanations of each type are recapitulated below.

(1) visual emanation	point, upper surface, middle surface, surrounding space, pervasive space, side space, inner/outer space, way
(2) auditory emanation	pervasive space, side space, inner/outer space, way
(3) olfactory emanation	pervasive space, inner space
(4) tactile emanation	surrounding space, inner space, upper space, way

Among the schematic regions emanations are described as reaching, regions indicated by **thĩ** **thũa** 'everywhere' are less specific and regions indicated by **thĩ** **thũi** 'point' are most specific. Specificity of the goal of emanation correlates to solidness (abstractness) of emanation in such a way that an emanation diffusing 'everywhere' is less solid (more abstract) than an emanation ending up at a 'point.' Furthermore, the less various the endpoint of an emanation is, the less solid (more abstract) the emanation is. Hence, olfactory emanations are least solid (most abstract), tactile emanations are less solid (more abstract), auditory emanations are more solid (less abstract), and visual emanations are most solid (least abstract).

The results of examinations on the two points above are consistent. The degrees of conceptual solidity and abstractness of perception emanations of four types are summarized below.

high <----- the degree of conceptual solidity -----> low

(1) visual emanation > (2) auditory emanation >

(4) tactile emanation > (3) olfactory emanation

low <----- the degree of abstractness -----> high

(1) visual emanation < (2) auditory emanation <

(4) tactile emanation < (3) olfactory emanation

I have heard that aged carpenters whose senses of sight and hearing have been dulled may still tell the kinds of wood by means of the sense of smell. That is, the olfactory modality of the aged may be more sensitive than the visual and auditory

modalities. It can be said that the olfactory modality of human beings in general is relatively weak and so we cannot use it for locating exactly something that smells, but we keep it as long as we live.

### 3.2.3. Active-Determinative vs. Agentive Source Entities

Endorsing Talmy's "active-determinative principle," I assume that in an emanation event an entity filling the role of the source of emanation is conceived to be active or determinative. However, I hesitate to apply Talmy's "agent-distal object pattern" to all conceptualization patterns of emanation events. The "agentive" is not identical with the "active/determinative." Agentiveness requires volition and intention and is attributed to animate beings, while activeness and determinativeness do not. To be active means to be energetic, and to be determinative means to have the power to direct. Therefore activeness and determinativeness are attributable to inanimate beings such as natural forces as well as to animate beings. I do not agree that all conceptualizations of emanation events are based on the model of our experience of "agency" as discussed by Talmy. That is, an emanation event is best understood as analogous to an agentive event in which an agent who travels, or moves an intermediate object, to a distant object to affect it. Also, I do not believe that the cognitive domain for emanation events will always include an agent participant, and so agentive, rather than thematic, emanation events are basic. Thai emanation expressions suggest that agentless/causerless emanations are no more marked than agentive/causative emanations are. Normally the agent or causer of an emanation is not imagined if it is unknown or irrelevant to the predication of that emanation.

The source objects in emanation events include:

- (1.1) a person extending a line of vision in a visual emanation event (i.e. visual perceiver)
- (1.2) an object emitting a sound (including a person uttering a message) in an auditory emanation event (i.e. sound producer, message sender)
- (1.3) an object emitting an odor in an olfactory emanation event (i.e. odor producer)

- (2) an object emitting light in an illumination emanation event (i.e. radiator)
- (3) an object casting a shadow in a shadow emanation event (i.e. shadow producer)
- (4) an object facing some other distant object in an orientation emanation event (i.e. orientated entity)

The person who is the source in (1.1) extends a detective line of vision to an object to see the object. The person or object in (1.2) emits a stimulative sound that is aurally perceived by a person. The source object in (1.3) emits a stimulative odor that is perceived by a person with the sense of smell. The source object in (2) radiates a visible light. The source object in (3) produces a visible shadow by cutting off the flow of light. These sources are energetic enough to give birth to a moving entity that is intangible but still physically recognizable. A sound, an odor, light and a shadow are recognized directly, while the line of vision is recognized indirectly (inferred from the physical view). The source in (4), namely an orientated entity, produces nothing physically recognizable; it is not a causer (agent) but a reference entity (absolute) for the path of subjective motion of the conceptualizer's focus of attention. Nonetheless orientated entities are still active and determinative in the sense that they (are imagined to) turn to a reference entity and the focus of attention is directed by their (fictive) turning.

#### 3.2.4. Summary

The main points in Section 3.2 are as follows. First, visual, auditory and radiation emanation events are expressed with a relatively large number of different linguistic elements, while tactile and shadow emanation events are expressed with a relatively small number of different linguistic elements. Second, the degree of conceptual solidity of different perception emanations is graded. Visual emanations are most solid (least abstract) and olfactory emanations are least solid (most abstract). Third, source entities in Thai emanation events are imagined to be active and determinative, but not necessarily imagined to have volition or intention.