On modes, metafunctions, and communicative acts: A Systemic-functional Multimodal Analysis of Light Rail Transit (LRT) Line 1's publication materials

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Abstract

One of the observable ways the Light Rail Manila Corporation (LRMC) uses to ensure order and safety inside the LRT premises is through its publication materials at the entrances and platforms of each station, and inside the train wagons. In the Philippines, no previous studies have been published that analyzed multimodality employed in railway publication materials. Thus, this study, through a Systemic-functional Multimodal Discourse Analysis, explored LRMC's use of semiotic resources, such as metafunctions and modes of language, in its publication materials. Thirty (30) publication materials, which were gathered through purposive sampling, were analyzed quantitatively and qualitatively. By utilizing Halliday's (1978) three metafunctions and incorporating Kress and van Leeuwen's (2001) three strata of meaning-making, both language and visuals were analyzed to discover the meaning-making process in the publication materials and to determine how meanings were conveyed through specific semiotic modes. Further, van Leeuwen's (2005a, 2005b) communicative acts were employed to examine the coherence between and among the metafunctions and semiotic modes to convey the communicative goals of the publication materials. The present study found that the main language choice of LRMC is the material process in imperative mood that is cohesively integrated through elliptical form as a way to communicate safety instructions to train passengers. Moreover, the imposition of rules and promotion of travel safety of LRMC was expressed through a narrative representation, which consists of specific modes such as image, gaze, social distance, and layout as the materials functionally instruct the discourse of safety.

Keywords: Communicative acts, LRT Line 1, metafunctions, modes, publication materials

1.   Introduction

Public transportation services may come in different forms that include buses, cabs, trains or ferries. In the Philippines, one of the public modes of transportation is the Light Rail Transit (LRT). Because a huge number of the Philippine population take public transportation, the safety of passengers is the utmost priority of any transportation agency (Department

campaigns in Zambia by the Road Transport and Safety Agency (RTSA) in transmitting safety information to the public using the metafunctions of Halliday (1994) and the multimodal approach of Kress and van Leeuwen (1996).

In the Philippines, Reyes (2014) studied the verbal aspect, specifically the dominance of the English Language, of sign posters in two major train stations. The present study, however, investigated not only the language used through metafunctions but also the visual system such as image, gaze, social distance, layout, and how these visual elements were coherently organized to contribute to the meaning-making process of publication materials.

This research is done to prove the importance of meaning-making process, particularly in the representation and interpretation of meaning as a crucial aspect in maintaining order and safety inside LRT-1 premises, by determining the publication materials' use of language and their semiotic resources to impose rules and promote travel safety.

Therefore, understanding the cohesive utilization of both language and visuals in publication materials, which promote travel safety and order within LRT-1 premises, is important because it will affect passengers' interpretation of the said materials. Once the meaning-making process of language becomes ambiguous, misinterpretations may arise and cause injuries, disputes, or worst, fatalities. Consequently, the LRMC must be creative, mindful, and meticulous in constructing its publication materials.

1.1   Research Questions

Previous studies on Multimodal Discourse Analysis focused on advertisements as the most common subject (Rodriguez, 2016). However, this study aims to show that a multimodal perspective can be applied to the representation and interpretation of meaning by analyzing LRT Line 1's publication materials in terms of modes, metafunctions, and communicative acts. Specifically, this study aimed to answer the following questions:

1. What are the ideational (transitivity process), interpersonal (mood), and textual (cohesion) metafunctions of language in the publication materials of LRT Line 1?
2. How are the ideational, interpersonal, and textual metafunctions represented by different modes (i.e., image, gaze, social distance, and layout) used in the publication materials of LRT Line 1?
3. How do the verbal (metafunctions) and nonverbal features (modes) realize the functions of the publication materials of LRT Line 1?

1.2   Theoretical Framework

The present study was anchored on three theoretical frameworks: Halliday's (1978) metafunctions, Kress and van Leeuwen's (2001) three strata of meaning-making, and van Leeuwen's (2005a, 2005b) communicative acts. These theories were utilized not only to show how the functions of publication materials were realized but also to emphasize the importance of representation and interpretation in ensuring travel safety and maintaining order inside the LRT Line 1 premises by analyzing the semiotic resources in the publication materials such as the metafunctions of language present using SFL, and the modes and

communicative acts using MDA.

The verbal linguistic features employed in the publication materials were analyzed based on Halliday's (1978) metafunctions in terms of transitivity processes, mood elements, and cohesive devices.

With respect to the ideational metafunction of language, the researchers only focused on its experiential function or transitivity, which consists of the different process types, i.e., material, behavioral, mental, verbal, relational, and existential (see Appendix A), to identify the main language choice of the LRMC in constructing the knowledge of reality presented in the publication materials.

With regard to the interpersonal metafunction of language, the researchers focused on mood elements, specifically the speech functions, i.e., declarative, interrogative, and imperative (see Appendix A), to determine the ways through which the publication materials relate or enter into a social relationship with passengers as viewers of the materials.

In the aspect of the textual metafunction of language, the researchers examined the cohesiveness of texts, i.e., referencing, substitution and ellipsis, and conjunctions (see Appendix A), to determine how the transitivity process and mood were cohesively formed in delivering safety precautions and regulatory messages that contribute to the effectiveness of the communicative function of the publication materials.

On the other hand, the nonverbal linguistic features were analyzed based on Kress and van Leeuwen's (2001) three domains of the meaning-making process:

1. Discourse: In the construction of the knowledge of reality, the social elements of *who is involved* using personal and possessive pronouns*, what takes place,* and *where and when the communication happens* were examined to establish the discourse presented in the publication materials.

2. Design: It refers to the combination of all modes utilized in the publication materials. The semiotic modes such as the image, social distance, gaze, and layout were examined by employing Kress and van Leeuwen's (2006) multimodal perspective on Halliday's (1978) metafunctions.

    In analyzing the 30 publication materials in terms of using images as a semiotic mode, the actions of the represented participants were examined through vectors as a way to identify the kind of narrative process involved in the materials. Vectors include eye-lines, dialogue balloons, bodies, limbs, or gestures indicating a particular line direction linking participants with each other in the narrative process. In this manner, there are four main narrative processes identified among the publication materials: transactional, reactional, verbal, and circumstantial (Babaii, Atai, & Kafshgarsouteh, 2016; Kress & van Leeuwen, 1996, 2006) (see Appendix A).

    In terms of social distance as a semiotic mode, the publication materials were analyzed in terms of social distance, size of frame, and field of vision (Hall, 1966; Kress & van Leeuwen, 2006; Torres, 2015) (see Appendix A).

    With regard to gaze as a semiotic mode, van Leeuwen coined the term "image act" to refer to the way an image (human-like or animal-like) gaze in a visual representation (Kress & van Leeuwen, 2006, p. 116). There are two kinds of

an image act: the visual demand and the visual offer. When an image looks directly at the viewer, it is called the visual demand; the visual offer means otherwise.

On the other hand, the layout of the publication materials was examined in terms of framing and information values (Kress & van Leeuwen, 1996, 2006). It is through framing where participants in a communication process make sense of the external environment (Kress & van Leeuwen, 2001). Mwelwa (2015) further explains that framing serves as a means to connect and disconnect elements through the presence of a dividing line or concrete frame lines (Babaii, Atai, & Kafshgarsouteh, 2016; Mwelwa, 2015; Kress & van Leeuwen, 2006). In addition, the arrangement of elements in a frame dictates their information values. There are two kinds of frames: the horizontal and the vertical frames (Kress & van Leeuwen, 2006). In a horizontal framing, the informational elements are arranged from left to right. According to Kress and van Leeuwen (2006), the left side consists of a Given information in which it is assumed that the information is known already by the viewer; while the right side is where the key information is placed, known as New, and this is where the viewer must pay particular attention to. On the other hand, in a vertical framing, the informational elements are arranged from top to bottom, considering them as 'ideal and promising,' and 'factual and real,' respectively (Kress & van Leeuwen, 2006).

3. Production: This is where a semiotic event is materialized through the use of a specific medium. In the present study, the publication materials were identified according to type and location.

After analyzing the metafunctions and modes of the publication materials, the researchers examined how these verbal (metafunctions: ideational, interpersonal, and textual) and nonverbal linguistic elements (modes: image, gaze, social, distance, and layout) realize the function of the publication materials through the multimodal communicative acts posited by van Leeuwen (2005a, 2005b). Hence, the language and visuals were put together to identify a single communicative function for the 30 publication materials. The multimodal communicative acts include beckoning, warning, encouraging, instructing, informing, and advising (Oyebode & Unuabonah, 2013).

2.   Method

2.1   Research Design

The researchers utilized both quantitative and qualitative methods. The researchers accounted for the frequency of the verbal linguistic elements present in the publication materials. Moreover, the modes, metafunctions, and communicative acts were identified and interpreted using the relational content-analysis method guided by the theoretical frameworks of the present study.

2.2   The Sample

The researchers utilized purposive-sampling technique in gathering the 30 publication materials published by the LRT management. The sample was collected from December 2017 to March 2018. These 30 publication materials were selected because they were the most common in the 20 stations of LRT Line 1.

    The publication materials were selected based on these criteria: (1) they should be published by the LRT management; (2) they should have illustrations or graphics; and (3) they are common or present in most or all stations of LRT Line 1. Although the publication materials in the LRT Line 1 are considered public documents, the researchers informed the LRMC through a letter that these materials would be used for research purpose only.

2.3   Research Procedure

In the data-gathering phase, the researchers took photos of the 30 publication materials located at the entrances and platforms of each station, and inside the train wagons. Only the common publication materials with illustrations or graphics were considered. The common publication materials were chosen because they promote retention in the memory regarding safety awareness to passengers of LRT Line 1.

    In the initial phase of the analysis, the researchers did a frequency count of the categories for the transitivity processes, mood elements, cohesive devices, and the usage of personal and possessive pronouns.

    Then, the instances found were interpreted using the categories for analysis of transitivity processes, mood elements, and cohesive devices grounded on the theoretical framework of Halliday's (1978) metafunctions. Subsequently, drawing from Kress and van Leeuwen's (2001) three strata or domains of meaning-making, the Discourse domain was analyzed in terms of *who is involved* (i.e., the usage of personal and possessive pronouns), *what takes places*, and *where and when the communication happens*. The semiotic modes of image, gaze, social distance, and layout were examined under the Design domain using the multimodal perspective of Kress and van Leeuwen (2006) and Halliday's (1978) metafunctions, namely representational, interactive, and compositional functions.

    Finally, the analyses of both metafunctions and semiotic modes were examined to see how these elements cohere to form one single communicative act based on van Leeuwen's (2005a, 2005b) communicative acts.

2.4   Intercoding

To validate the researchers' analyses, the intercoding process was done. Two intercoders with an English degree and who are knowledgeable in multimodality and/or discourse analysis analyzed 80% of the data.

    The intercoders were oriented regarding the frameworks for data analysis. A personal meeting was set with the two intercoders to compare and discuss the interpreted publication materials. In cases where there were difference(s) in the results and interpretation of data, a thorough discussion was held together with the intercoders to reanalyze the data in question and to arrive at a concensus regarding the results and interpretation of data.

3.   Results and Discussion

Through Halliday's (1973, 1978) Systemic Functional Linguistics, the 30 publication materials of LRT Line 1 were examined in terms of ideational, interpersonal, and textual metafunctions by analyzing the transitivity process of language ideationally, the mood of language interpersonally, and the cohesive devices of language textually. Furthermore, to have a full view on how the meaning-making process of language was employed, Kress and van Leeuwen's (2001) three strata of meaning-making were used to analyze how these metafunctions of language were articulated in terms of Discourse, Design, and Production. The elements of *who is involved*, *what takes place*, and *when and where the communication happens* in the strata of Discourse were analyzed to ascertain the formation of different discourses in the publication materials. Moreover, the Design stratum was articulated through different semiotic modes based on Kress and van Leeuwen's (2006) multimodality approach to ideational, interpersonal, and textual metafunctions of language. In terms of Production, the location and the type of material of the data were identified. On the other hand, the relationship between the metafunctions and the three strata of meaning-making was determined through van Leeuwen's (2005a, 2005b) communicative acts.

3.1   Ideational Metafunction (Transitivity)

The use of the different process types in transitivity such as the material, verbal, relational, mental, existential, and behavioral was examined. These processes represent reality encoded with a specific ideology (Fowler, 1987, as cited in Haratyan, 2011) regarding the perception of the world, which is socially and culturally constructed through different participants and circumstances (Halliday, 1985). There are four process types found, as Table 1 presents, which show how the language experience was constructed in the publication materials.

Table 1
Frequency of transitivity

Process	Frequency	Percentage
Material	73	63.48
Relational	25	21.74
Verbal	12	10.43
Mental	5	4.35

3.1.1   Material Process

The material process had the highest occurrence (73 times) in the publication materials. This reveals that 63% of the language employed in the materials use action words (Halliday & Matthiessen, 2004). Also, the structure of the language was in imperative form, where words in the Material process appear at the beginning of every clause in the materials, making the communication process direct to the point. In this manner, the Actor, which is the doer of the action, and the Goal as the one affected by the action (Halliday, 1985) cannot be

found at the beginning of a sentence. Moreover, the imperative structure of the Material process in the clause allows the publication materials to elicit a response involving physical movements that are tangible and concrete (Halliday & Matthiessen, 2004). Govindaraju (2014) found in her study that the dominant use of a material process at the beginning of sentences gives emphasis on physical actions by giving direct instructions to readers. The following publication materials exemplify the material process both as an action (transitive verb) and an event (intransitive verb):

3.1.1.1   Material Process as an Action

A material process as an action has a transitive verb known as the *doing* verb (Halliday & Matthiessen, 2004) and an object of the verb. It primarily involves benefaction, which either has a Goal and/or a Recipient (Haratyan, 2011) as one of the participants.
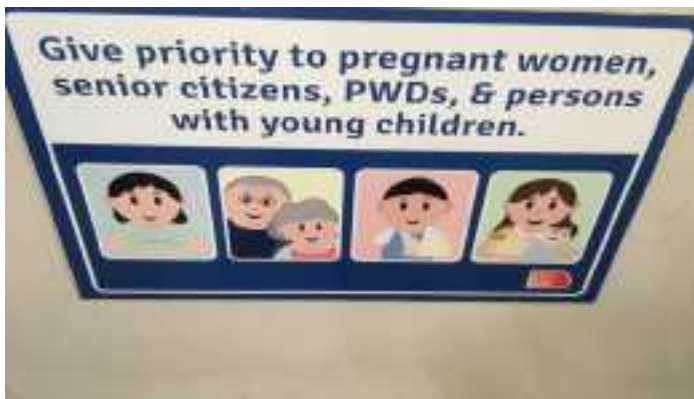
Image 1. *Publication material #21*

Publication Material #21 in Image 1 contains the action word *give,* which serves as the Material process participant. This publication material employed the Goal and Recipient as the other participants in the process. The Recipient is a participant in the Material process performing as the benefactor of goods or services (Bustam, 2011; Halliday, 1985; Haratyan, 2011). The word *priority* is the Goal where the action word *give* is directed to, and the Recipient participants who benefit from the service of being given a priority are the *pregnant women, senior citizens, PWDs, and persons with young children.* Hence, the material expects the viewer to respond by giving a seat as a concrete way of prioritizing the Recipient participants.

3.1.1.2   Material Process as an Event

A material process as an event has an intransitive verb that construes a process of *happening* (Halliday & Matthiessen, 2004), which does not have an object of the verb; but it may either have an Actor or a Circumstance (Haratyan, 2011) as one of the participants.

In Image 2, there is a Circumstance participant in the process. Aside from the

represented participant's gesture of going down the stairs as to where the action *Ingat* (English translation: take care) is directed, the Circumstance of Location gives the reader a spatial context expressed in the prepositional phrase *sa pagbaba* (English translation: in going down). This material conveys that when a passenger uses the stairs, utmost care must be done in going down.

It can be assumed that the material process is the main choice of the LRMC, and it is significant in communicating actions and/or events in the publication materials.

Image 2. *Publication material #18*

3.2   Interpersonal Metafunction (Mood)

The speech functions of the publication materials through the clausal mood such as the declarative, imperative, and interrogative mood were examined through the mood elements of Subject and Finite verb (Haratyan, 2011). The declarative mood was analyzed in the order of Subject+Finite; the interrogative mood, Finite+Subject or Subject+Finite; the imperative mood is the only one that does not have any mood element (Leong, 2015). The declarative and the imperative moods (see Table 2) were found, which show how the language in the publication materials enters into a social relationship with the viewers or passengers.

Table 2
Frequency of mood

Mood	Frequency	Percentage
Declarative	20	23.53
Imperative	65	76.47

3.2.1   Imperative Mood

The imperative mood was used 65 times indicating the highest occurrence in the materials, which suggests that 76% of the materials' way of expressing a communicative goal, i.e., to impose safety and to main order inside the LRT premises, is through the imperative form. Aside from not having a clausal mood element, an imperative mood primarily focuses on demanding, instructing, or requesting information in the form of a command ("Learn English grammar," n.d.). In addition, a command is an authoritative order given through direct speech ("Command," n.d.) within an imperative mood, which has an invisible subject formed in the second-person pronoun (You) as the one being spoken to ("Imperative mood," 2016). In this case, the (invisible) subject automatically is the viewer, thus the one being addressed by the command. In other words, the one being addressed by the command is the passenger viewing the material. The following example illustrates the use of the imperative mood:

Image 3. *Publication material #19*

In Image 3, *Do not lean on the train doors* is in imperative mood because there is no subject explicitly doing the action that would be agreed by a finite verb; thus, this material does not contain any mood element. Rather, the presence of the imperative clause implies to direct the instructions toward the passengers about leaning against the train door.

3.3   Textual Metafunction (Cohesion)

Cohesive devices act as semantic ties to form the relationship of words within a text (Haratyan, 2011). The usage of cohesive devices was examined to know how meaning was formed into a cohesive whole in delivering safety messages to LRT passengers. Ellipsis, reference, and conjunction as textual metafunctions of language were found in the materials.

Table 3
Frequency of cohesive devices

Cohesive Device	Frequency	Percentage
Ellipsis	68	87.18
Reference	4	5.13
Conjunction	6	7.69

3.3.1   Ellipsis

Elliptical messages are used to avoid repetition (Bloor & Bloor, 1995, as cited in Haratyan, 2011); they omit certain words or information because the text is already understood through presuppositions or references outside of the text (Abed, 2012).

Ellipsis as a cohesive device garnered the highest frequency; 86% of the publication materials were written with an elliptical form. The following image shows the use of ellipsis:

Image 4. *Publication material #13*

A noticeable feature found in publication material #13 is the presence of multiple elliptical sentences. The elliptical sentences found are *Wag mo nang habulin ang gamit kapag nahulog* (English translation: Don't try to retrieve fallen objects); *Delikado* (English translation: Dangerous); *Kapag may na-fall, pakisabi sa guard* (English translation: When something falls, tell the guard); *No crossing on tracks*; and *Bawal tumawid sa riles* (English translation: No crossing on tracks). In this material, the missing phrases were determined to see the complete form of the elliptical sentences. In the first elliptical sentence, the missing phrase is [Huwag] *mo nang habulin ang gamit kapag nahulog* [sa riles ng tren] (English translation: [Do not] try to retrieve fallen objects [on the railroad tracks]). It can be deduced that a prepositional phrase was omitted. The second elliptical sentence describes the first elliptical sentence as dangerous. The missing phrase in the said elliptical sentence is [Ang pagkuha sa nahulog na gamit sa riles ng tren ay] *Delikado* (English translation: [The act of retrieving fallen objects on the railroad tracks is] dangerous).   In here, the subject in the sentence was omitted. Next, the missing phrase in the third elliptical sentence is *Kapag may na-fall* [na gamit sa riles ng tren], *pakisabi sa guard* (English translation: [When an

object falls on the railroad tracks], tell the guard). In here, the noun, which specifies the condition and the location of the verb *falls*, was omitted. The other two elliptical phrases can be found in both the English and the Filipino translations within the image of this publication material. When these two elliptical phrases are transformed into their complete form, then they will become *No crossing on* [the rail] *tracks* [for you might get hit by the train], and *Bawal tumawid sa riles* [ng tren sapagkat ikaw ay may posibilidad na masasagaan ng tren]. Both elliptical phrases omitted the reason why the passengers should not cross the railroad tracks. The three elliptical sentences in their complete form all convey the possible danger of retrieving fallen items on the railroad tracks.

3.4   Discourse (First Domain)

Kress and van Leeuwen (2001) formulated the four domains in the meaning-making process of language, namely discourse, design, production, and distribution. In this paper, only the first three domains were studied. The researchers did not include the fourth domain, i.e., distribution, because it focuses on the production of media forms for the purpose of re-use. This domain is beyond the scope of the present study because such an aspect falls within the concern of producers as to how they reproduce the materials for the public.
Kress and van Leeuwen (2001) explain that discourse consists of the knowledge of reality realized by semiotic modes. This paper examined the publication materials in terms of the elements *who is involved, what takes place,* and *where and when the communication happens.*

3.4.1   Who is Involved

The element *who is involved* was analyzed based on the use of personal and possessive pronouns in the materials; the use of pronouns determines the active participants involved in the discourse. There are six instances (see Table 4) that show how the pronouns were used in the materials; four instances are identified as personal pronouns, while two are possessive.

Table 4
Frequency of personal and possessive pronouns

Pronoun	Frequency	Percentage
Personal Pronouns		
you	5	20
ka (you)	2	8
it	2	8
Possessive Pronouns		
your	12	48
natin (our)	2	8
mo (your)	2	8

The possessive pronoun *your* occurred 12 times (48%) in the materials. The use of possessive pronouns as one of the main participants in the discourse indicates ownership ("Possessive pronouns: Rules and examples," 2017). Also, it was found that the pronoun *your* co-occurs with the Filipino pronoun natin (*our)* in one of the materials as shown in the following image:

Image 5. *Publication material #10*

In Image 5, the pronoun *your* refers to the implied viewer who is the passenger. However, it is not only the passenger who is involved in the discourse because of the presence of another possessive pronoun in Filipino, which is *natin* (our). The pronoun *our* may refer to the management of LRT Line 1. The command in the material process becomes affective toward the passengers, which convey a sense of belongingness between the LRMC and the train passengers by using both possessive pronouns. Likewise, the combination of your + *natin* (us) indicates the social affinity between the LRMC and the passengers. Hakkanson (2012) found a similar result in which using possessive pronouns such as mine, my, our/s, your/s, his, hers, and the like indicates how two participants in the communicative process are connected with each other. This observed phenomenon shows that establishing the social affinity between the LRMC and the passengers means that both are equally responsible for maintaining LRT Line 1 clean as indicated in the material.

Although the possessive pronoun *your* garnered the highest frequency as shown in Table 4, still a majority of the publication materials used the subject in the sentence as a means to represent who is involved in the discourse, instead of a personal or a possessive pronoun. For instance, it was observed that 11 of these materials involved *Kap* as the subject and active participant in the discourse. The following image shows how *Kap* is the only subject of discourse referred in the material:

Image 6. *Publication material #8*

The word *Kap* seems to play a vital role in the communication process. Apart from being the subject from whom the verbiage '*cover your mouth*' came from, the word *Kap* implicitly manifests an idea of authority because all the verbiage from the 11 materials containing a verbal process are in the command form. Ideationally, *Kap* is represented by the man in uniform in the left frame of the sample publication material.

Furthermore, it can be seen that the man in uniform is the only represented participant drawn as a human-like figure; thus, it can be said that the word *Kap* refers to the man in uniform. For this reason, through the represented participant's uniform, it gives an idea that *Kap* is a figure of authority. Significantly, it can also be noticed that on the hat of the represented participant, an iconographic logo of LRMC can be seen. By this, *Kap* can be viewed as an authority figure of the LRMC. Therefore, the conveyance of power in the discourse makes the command binding and lawful for the passengers of LRT Line 1 to follow.

In addition, the other subject explicitly mentioned as a participant in the discourse is *LRT-1*. This occurrence was found in publication material #30 (see Image 7). In this case, the institution itself is involved in the communication process.

Image 7. *Publication material #30*

3.4.2   What Takes Place

Kress and van Leeuwen (2001) argue that the work and action of semiosis in the communication process is significant, for it establishes the social context in analyzing discourse and ideologies within representational resources. The researchers found four instances that summarize *what takes place* in the publication materials: (1) Giving safety instructions directly to the passengers within LRT premises such as at the entrances and platforms of each train station, and inside the train wagons; (2) Maintaining order within LRT premises by providing instructions related to good manners and right conduct as a way of making the passengers conscious of their own actions; (3) Promoting and announcing specific information by the LRMC to the public; and (4) Providing general information and reminders to passengers. To show *what takes place* in the publication materials, the following are some examples (see Images 8 and 9):

Image 8. *Publication material #16*

Image 9. *Publication material #15*

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In publication material #16, the first sentence explicitly emphasizes *safety as a priority*. The instruction following the explicit statement about having safety as a priority means that *what takes place* is giving safety instruction directly to the passengers inside the train wagon because this poster is located on both sides of the train doors. On the other hand, publication material #15 gives safety instructions differently because *what takes place* here is giving the instructions through a short procedure in case of emergency. Additionally, it is observed that in publication material #16, the safety instruction is to make the passengers respond by moving away from the door edge, while publication material #15 gives the safety instruction to make the passengers respond by moving toward the emergency button located above the train doors.

Image 10. *Publication material #5*

Image 11. *Publication material #8*

Interestingly, both publication materials #5 and #8 (see Images 10 and 11) exemplify the second instance of maintaining order within LRT premises by giving instructions related to good manners and right conduct as a way of making the passengers conscious of their own actions. However, the difference between the two publication materials is that the former

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represents the culture of respect of Filipinos by instructing the passengers to use the polite words *po, opo*, *please,* and *salamat*, while the latter conveys one's consciousness regarding the spread of diseases, hence focusing on health.

Image 12. *Publication material #26*

Image 13. *Publication material #30*

What takes place in Images 12 and 13 is an instance of announcing of information to the public by LRMC. Publication material #26 focuses on promoting LRT Line 1 by announcing that it gives a free ride at certain hours, while publication material #30 announces information regarding the operating hours during the Holy Week 2018.

Finally, Image 14 shows the fourth instance of giving general information to the passengers. This material informs the passengers about the schedule, i.e., service hours, of LRT Line 1.

Image 14. *Publication material #29*

3.4.3   Where and When the Communication Takes Place

Another part of constructing reality in discourse is considering *where and when the communication happens*. Fourteen (14) publication materials specify the place of the discourse as exemplified in Image 15.

Image 15. *Publication material #7*

The words *escalator, hagdan (stairs),* and *tren (train wagon)* are the places explicitly mentioned as contextual bases for the passengers to do the action.

Additionally, there are instances where a publication material did not explicitly mention the place of the discourse. However, such information can be understood based on the location where the material was placed, which is within the vicinity of LRT Line 1 as shown in the following materials:

Image 16. *Publication material #18*

Image 17. *Publication material #22*

Both publication materials #18 and #22 were placed along the staircase at the entrances of LRT Line 1. Passengers can immediately understand that the materials are intended for safety while using the staircase. Furthermore, the materials are aided with an illustration of a boy going up and down the staircase to fully communicate the place of the discourse.

Likewise, there are instances where the time of the discourse was not stated, and it would depend on the current situation of passengers viewing the material at the moment. As an example, a material is shown in Image 18.

Image 18. *Publication material #20*

In this example, there is no explicit statement as to when the communication happens, but it is implied that passengers should keep their hands away from the door edge always. For example, if the train is full at the moment, the passengers should avoid placing their hands on the door edge as a means to hold onto to keep their balance while the train is moving. With this, the passengers should look for other means to hold onto such as the safety hand rails or hand bars.

3.5   Design (Second Domain)

Design was analyzed through the different semiotic modes (i.e., gaze, social distance, and layout) in the materials based on Halliday's (1985) metafunctions, but viewed from a multimodal perspective, which involved the representational, interactive, and compositional metafunctions to make communication fully functional as a system (Kress & van Leeuwen, 2006). The unity of the said elements transforms the socially constructed knowledge of reality into a social (inter-) action (Kress & van Leeuwen, 2001).

3.5.1   Ideational Metafunction (Representational Process)

Twenty-seven (27) of the 30 publication materials used a narrative representation process, while three materials used a conceptual representation process.

3.5.1.1   Narrative Representation

In visual grammar, a representational process is narrative in form, which depicts unfolding actions and events (Mwelwa, 2015), and where participants are connected by a vector to represent that they are doing something to or for each other (Kress & van Leeuwen, 1996, 2006). Moreover, the participants involved in a narrative representation are categorized into two: interactive and represented (Kress & van Leeuwen, 1996, 2006). The former are the real-life participants involved in the discourse; they either produce or view the text. On the other hand, the latter are abstract participants represented either in writing or images about which or whom the image/text is concerned (Kress & van Leeuwen, 2006).

3.5.1.1.1   Image as Semiotic Mode

Image 19. *Publication material #1*

Publication material #1 in Image 19 does two processes at once, i.e., the Verbal Process and the Transactional Reaction Process. By examining the left frame, it can be observed that the words 'Manatili sa platform pagtunog ng buzzer' (English translation: Stay on the platform when the buzzer sounds) act as Utterance because it is a verbal participant enclosed in the dialogue balloon, while *Kap* as an authority figure of the LRMC acts as the Sayer of the verbal process from whom the dialogue balloon emanates. Based on transitivity analysis, the Utterance consists of a material process or action words written as a command in the imperative mood. Therefore, the Utterance indicated in the material needs to be performed by passengers because it comes from a Sayer with authority.

Interestingly, the right frame supplements an action or doing with what is said or verbalized in the left frame. By examining the right frame, it can be observed that a Transactional Reaction Process takes place in the narrative. In this case, the boy at the center acts as a passenger and the Senser of the narrative process. Although his gaze cannot be seen directly, it can still be understood based on the lines in the middle of the train connecting the boy's gaze toward the warning buzzer, which acts as the Phenomenon as illustrated in Image 20.

Image 20. *Publication material #1: Vector illustration*

In addition, there is a secondary participant involved in the narrative process of this material who are the passengers in shadow form in the right frame. The shadows in the right frame are forms of an accompaniment. Aside from not having any vector relation with the other participants, the secondary participant functions to accompany the scene or circumstance in the right frame as co-passengers of the boy at the center, which reflects the reality within LRT Line 1 premises outside the material.

3.5.2   Interpersonal Metafunction (Interactive)

The social interaction between the producer and the viewer of an image takes place in the interactive function where three factors interact with each other, namely gaze, angle, and distance (Babaii, Atai, & Kafshgarsouteh, 2016; Kress & van Leeuwen, 1996, 2006).

3.5.2.1   Gaze as Semiotic Mode

Using Publication Material #1 as the same example, it could be noticed that the material offers both a visual demand and an offer. The left frame consists of a represented participant who looks directly at the viewer in a horizontal frontal angle in the eye level with a smiling gesture toward the viewer. This means that the represented participant is clearly demanding the passenger to perform the command enclosed in the dialogue balloon once the warning buzzer sounds. Although the represented participant gives an authoritative demand, still the demand was not given in a forceful manner; instead, it was given in a friendly way through a smiling gesture. Additionally, the frontal angle where the represented participant is placed indicates that there is a sense of involvement taking place (Babaii, Atai, & Kafshgarsouteh, 2016; Kress & van Leeuwen, 2006; Mwelwa, 2015), which invites the viewer to establish a social affinity with the represented participant. By examining the left frame's vertical angle, the represented participant is in the eye level indicating equality (Babaii, Atai, & Kafshgarsouteh, 2016; Kress & van Leeuwen, 2006; Mwelwa, 2015) although the demand came from an authority.

On the other hand, the right frame consists of a represented participant who does not look directly at the viewer. In this case, the image act involved is a visual offer. The represented participant only acts as an object to be looked or examined at. Moreover, the represented participant is positioned in a horizontal angle from the back; thus, the social relationship being established is detachment (Babaii, Atai, & Kafshgarsouteh, 2016; Kress & van Leeuwen, 2006; Mwelwa, 2015). In this case, it is already within the viewers' discretion if they will follow what is done by the participants in the right frame. For this reason, the safety messages and illustrations in this material will only be effective or meaningful to those passengers who will obediently follow because safety signs are merely tools in raising safety awareness to the public ("How to use safety posters effectively," 2018), while discipline comes from within.

3.5.2.2   Social Distance as Semiotic Mode

Using Publication Material #1 as the same example, *Kap* and *the boy,* as the main and active participants in the narrative process, share the same interpersonal representation. Both of their fields of vision consist of their heads and shoulders captured in a close shot. This suggests that there is a close personal distance (Babaii, Atai, & Kafshgarsouteh, 2016; Kress & van Leeuwen, 2006) being established between the represented participants and the viewer. By examining a part of the Utterance *Sabi ni **Kap***, the represented participant, being addressed in an informal manner by abbreviating the original word *Kapitan*, suggests that a close personal distance is evident between the LRMC and its passengers. Furthermore, as mentioned from the previous discussion on image and gaze as semiotic modes, *Kap* is seen as a figure of authority giving a command in a friendly manner because of his smiling gesture toward viewers in frontal angle and his eye-level gaze with the viewers. On the other hand, as noted earlier in the discussion on image as semiotic mode, the other represented participants, such as the boy and the shadow passengers, also depict a close personal distance because they both act as passengers together with their co-passengers on the train station platform. Hence, the right frame relates to the viewers as a mirror reflecting the action to be done in relation to the command uttered by *Kap* in the left frame. For these reasons, it can be deduced that a close personal distance was evidently presented in this material.

3.5.3   Textual Metafunction (Compositional)

Textual metafunction brings together the ideational and the interpersonal as one to form a meaningful discursive whole (Babaii, Atai, & Kafshgarsouteh, 2016; Kress & van Leeuwen, 2006). Thus, the layout of the 30 publication materials was examined in terms of framing and information values (Kress & van Leeuwen, 1996, 2006).

3.5.3.1   Framing and Information Values

It is through framing where participants in a communication process make sense of the external environment (Kress & van Leeuwen, 2001). Mwelwa (2015) further explains that framing serves as a means to connect and disconnect elements through the presence of a

dividing line or concrete frame lines (Babaii, Atai, & Kafshgarsouteh, 2016; Kress & van Leeuwen, 2006; Mwelwa, 2015). In addition, the arrangement of elements in a frame dictates their information values (see Appendix A). There are two kinds of frames: horizontal and vertical (Kress & van Leeuwen, 2006). In a horizontal framing, the informational elements are arranged from left to right. According to Kress and van Leeuwen (2006), the left side consists of a Given information in which it is assumed that the information is known already by the viewer, while the right side is where the key information is placed, known as New; this is the side where the viewer must pay particular attention to. On the other hand, in a vertical framing, the informational elements are arranged from top to bottom, considering them as 'ideal and promising,' and 'factual and real,' respectively (Kress & van Leeuwen, 2006).

Using Publication Material #1 as an example, it can be observed that the framing used is horizontal. The material is divided into distinct left and right frames by the black lines around it. What makes it distinct is that the left frame represents verbalization, while the right one represents action. Also, all the information written on the left frame are the *given* information, which mean that the command, logos, and social network service (SNS) IDs are assumed to be familiar information to a viewer or passenger. In contrast to the right frame, the depicted represented participant is the *new* information, which would demand the passenger's attention. By looking solely at the right frame, it can be assumed that the viewer can have varied interpretations of the picture; that is why, the *given* information supplements the idea about the *new i*nformation depicted in the right frame.

3.6   Production (Third Domain)

Production was examined by identifying the type of material used in the production, and the location where the material is placed.

In terms of the type of material, three are chiefly utilized in LRT Line 1: platform stickers, posters, and tarpaulins. A platform sticker is a publication material that is painted on the floors of the platform (LRT); a poster is placed on the walls and doors around the LRT premises and inside the train wagons, while a tarpaulin is information paraphernalia, which stands near the entrances of each station. Upon examining the material types, 23 out of 30 are posters; four, platform stickers; and three, tarpaulins.

With respect to location, 14 of the 23 posters are placed inside the train wagons (see Publication Materials 2-11, 15-16, and 19-20 in Appendix B); eight, at the entrances of each station (see Publication Materials 17-18, 22-23, 26, 27, 29, and 30 in Appendix B), while only one is placed on the train station platform (see Publication Material 21 in Appendix B). The four platform stickers (see Publication Materials 1 and 12-14 in Appendix B), on the other hand, are seen on each train station platform, while three tarpaulins (see Publication Materials 24, 25, and 28 in Appendix B) are located near the entrances of each station.

Significantly, most, if not all, publication materials are visible within the LRT Line 1 premises; the information found in these materials remain accessible to passengers.

In essence, the discourse or communicative goals of the LRMC in promoting rules and maintaining travel safety in LRT Line 1 will not be possible if communicative goals are not conveyed through a medium such as publication materials. Moreover, different semiotic modes under the domain of design will be meaningless if not for participants involved in the communication process.

3.7   Communicative Acts

Image 21. *Publication material #1*

Metafunctions:
Ideational: Material and Verbal
Interpersonal: Imperative Mood

Visuals:
Discourse:
(Kap and the boy, giving safety instruction)
Design:
(Demand and Offer)
Production: Platform Sticker

Stylistically coheres into:
Instructing

The platform sticker in Image 21 functions as *Instructing* written in a narrative representation, which involves *Kap* as a representation of an authority in the LRMC and the *boy* as a representation for train passengers. Both participants are involved in the discourse of giving safety instructions. *Kap* directs the command by using a material process or action words such as *manatili* (English translation: stay) and *pagtunog* (English translation: sounds), and through a verbal process using the word "Sabi" (English translation: said) to mark that the utterance *buzzer means stop* came from *Kap* himself as the Sayer participant through the phrase *ni Kap* (English translation: by Kap). Likewise, both processes are written in the imperative mood. In addition, it is evident that *Kap* looks directly at the viewer as a way of demanding the latter to respond to it; this illustrates the boy as the passenger doing the action, which serves as an offer and an example for the demand.

Through the communicative acts, the researcher found how the verbal (metafunctions) and the nonverbal linguistic features (modes) are integrated to realize the communicative functions found in the publication materials.

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4.   Conclusion

Using Halliday's (1978) metafunctions, it was found that the LRMC's publication materials utilized language coherently to give a clear picture of safety messages among its passengers. The main verbal linguistic choice of the LRMC was the material process consisted of action verbs in the imperative mood to relate with the train passengers through instructions or commands. Both these instructions and commands were found to be structurally written elliptically, so the precautionary messages would be direct to the point and comprehensible. Although some words or phrases were omitted in the publication materials, the safety messages remain clear because they were contextualized in the reality of experiences of the passengers.

On the other hand, the verbal linguistic choices of the LRMC were found to be expressed in a narrative representation via the use of different semiotic modes such as image, gaze, social distance, and layout, which were examined through a multimodal perspective. Finally, the main communicative function of the publication materials was determined by analyzing both the language and visuals. It was found that the primary function of the materials was to give safety instructions or to instruct.

Significantly, both the language and visuals employed did not function independently; they are integrated in such a way that the language speaks for the visuals and vice-versa, cohering into one communicative act, that is, maintaining order and safety inside the LRT Line 1 premises.

Through this study, the significance of the meaning-making process of language in a given context was established. It is because a cohesive utilization of both language and visuals, specifically in the publication materials which promote travel safety and order within the LRT Line 1 premises, is important because it affects the passengers' welfare. If the meaning-making process of language is ambiguous, misinterpretations may arise and cause injuries, disputes, or worst, fatalities. Therefore, it is implied that the LRMC must be creative, mindful, and meticulous in creating its publication materials.

For researchers who wish to further explore the topic at hand, other semiotic modes such as color, typography, and the like may be analyzed. The said modes will be of great importance to fully cover the meaning-making process of language used in the publication materials. In addition, other researchers may interview the passengers of LRT Line 1 to determine their perceptions on the comprehensibility of these materials. In this way, interested researchers likewise may ascertain the passengers' attitude toward these publication materials in LRT Line 1.

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Appendix A
Frameworks for data analysis

Table A1
Ideational metafunction: Process types (adopted from Leong, 2015)

Process	Participants
Material	Actor, Goal, Scope, Attribute, Client, Recipient
Mental	Sensor, Phenomenon
Verbal	Sayer, Receiver, Verbiage
Existential	Existent
Relational	Carrier/Attribute, Token/Value
Behavioural	Behaver, Behaviour

Table A2
Interpersonal metafunction: Mood types (adopted from Leong, 2015)

Order	Participants
Subject + Finite	Declarative
Finite + Subject or Subject + Finite	Interrogative
Lacks mood element	Imperative

Table A3
Textual metafunction: Cohesive devices (adopted from Leong, 2015)

Textual Metafunction (Cohesion)	Example
Ellipsis (Elliptical)	So…what happened?
Conjunction	Ana and Mary are beautiful.
Substitution	My pen was lost. I will buy a new one.
Reference	Anaphoric: Ana is beautiful. She is my classmate. Cataphoric: When she arrived, Ana found that the classroom is empty. Exophoric: I really want to try that.

Table A4
Image as semiotic mode: Narrative processes and the vector relations between participants (adopted from Kress and van Leeuwen, 1996, pp.74-75)

Process	Participants	Vector Relation
a. Unidirectional Transactional Action	a. actor (active participant where the vector comes from) Goal (the passive participant where the vector is directed)	a. Diagonal element or an arrow (to connect the action coming from the actor towards the goal)
b. Bidirectional Transactional Action	b. Interactors (participants acting as one)	b. Diagonal element or a double-headed arrow (to connect the action between interactors acting as actor and goal)
c. Non-transactional Action	c. Actor-Viewer (the action points towards an invisible participant known as the *viewer*)	c. Diagonal element or an arrow emanating from the actor but does not point to any represented participant
Reactional		
a. Transactional Reaction	a. Reacter (the active participant where the eyeline comes from) Phenomenon (the passive participant in which it is the one being looked at)	a. eyeline (connects the reacter and phenomenon)
b. Non-transactional Reaction	b. Reacter-Viewer (the eyeline points towards an invisible participant known as the *viewer*)	b. eyeline (does not connect to any other represented participant)
c. Verbal	a. Sayer (the participant where the dialogue balloon emanates) b. Utterance (the participant enclosed in the dialogue balloon)	Thought Bubbles/Dialogue Balloons

Table A4 continued...

Process	Participants	Vector Relation
d. Circumstance	Secondary participants	a. Circumstance of Means: tool which is used to relay an action b. Locative circumstance: relates the participants into a specific setting c. Circumstance of Accompaniment: no vector relation connects with other participants

Table A5
Social distance, field of vision, and size of frame (adopted from Torres, 2015)

Hall's Social Distance (1966)	Kress and van Leeuwen's Field of Vision (2006)	Kress and van Leeuwen's Size of Frame (2006)
Intimate distance	Face or head only	Very close shot
Close personal distance	Head and shoulders	Close shot
Far personal distance	Waist up	Medium close shot
Close social distance	Whole figure	Medium long shot
Far social distance	Whole figure with space around it	Long shot
Public distance	Torso of at least 4-5 people	Very long shot

Table A6
Design: Framing and information values (adopted from Kress and van Leeuwen, 2006)

Types of Framing	Information Value
Horizontal Framing	Left: Given information Right: New information
Vertical Framing	Top: Ideal message Bottom: Real message

Appendix B
LRT Line 1 publication materials

Publication Material #1

Publication Material #2

Publication Material #3

Publication Material #4

Publication Material #5

Publication Material #6

Publication Material #7

Publication Material #8

Publication Material #9

Publication Material #10

Publication Material #11

Publication Material #12

Publication Material #13

Publication Material #14

Publication Material #15

Publication Material #16

Publication Material #17

Publication Material #18

Publication Material #19

Publication Material #20

Publication Material #21

Publication Material #22 and #23

Publication Material #24

Publication Material #25

Publication Material #26

Publication Material #27

Publication Material #28

Publication Material #29

Publication Material #30