

PAIDEIA ADAPTATION: CAN WE TRANSFORM PEDAGOGICAL MATERIALS INTO ANTHROPOMORPHIC NARRATIVES?

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Abstract

Paideia philosophy urges education and anything derived or related to it to respond to the *zeitgeist* of an era. Thus, techniques to deliver any pedagogical materials should position the target users as the axis to disclose them more possibilities to comprehend the materials. One of the techniques is designing anthropomorphic narratives. Studies on this topic circumnavigate around educational domains. Perceiving this issue from the lens of literary adaptation is the gap left by the previous studies. We argue that narrating pedagogical materials anthropomorphically is better termed paideia adaptation. This study attempts to prove the existence of this adaptation type by utilizing qualitative method, indicating the narrative and language features of the adaptation. Implementing the theories of onto fiction by Couceiro-Bueno, ergodic literature by Aarseth, second degree of literature by Genette, anthropomorphism by Weemans and Prévost on a corpus of animated films and games, the findings indicate that paideia adaptation has four narrative features namely anthropomorphic narratives, pseudoreferentiality, metalepsis, and metafictionality. This adaptation also has distinctive language features namely thematization, proairetic decoding, and didacticization. The result discloses a new viewpoint in the study of adaptation.

INTRODUCTION

Pandemics has compelled students to lean over more on digital resources autonomously to learn their school materials or subjects. To facilitate this condition, in Indonesia, for instance, one of national television networks broadcasted what Couceiro-Bueno (2000) calls as ontofiction, where an alternative way of comprehending the world is the emphasis of the fiction, in *anime* - Japanese animation - format. When applied as a fundamental concept for delivering paideia, mental and physical training to educate and instill values, ontofiction might take alternative media formats like films and games to explain particular pedagogical material. Shimizu's *Hataraku Shibou* or *Cells at Work*, the ontofiction broadcasted by the television network, attempts to elucidate how red and white blood cells work inside the body of a human by anthropomorphizing all of the cells and anything related to their works e.g. virus and disease. Delivered in Japanese *manga* and *anime* format, younger



audiences are expected to comprehend how the cells work through an entertaining fashion. Biology scholars in Japan and China were reported to be impressed by the high degree of accuracy in adapting pedagogical materials of how cells work by the series (Valdez, 2018; Shen, 2018). These positive responses point out that the process of adaptation from materials which are metaknowledge in nature – generally understood by people or appearing on many resources – has undergone particular techniques to ensure the accuracy of the materials or subjects especially techniques in delivering anthropomorphic narratives.

Many academics have shown interest in this phenomenon, but studies on anthropomorphism and anthropomorphic narratives typically focus on their varied applications on a wide range of educational subjects or learning materials (Wood, 2019; Neto, et al., 2019), their impacts, effects and efficiency (McCabe & Nekarlis, 2019; McGellin, et al., 2021), and teleological reasoning (Roberts, et al., 2021; Tamir & Zohar, 1991). The gap left from those studies is to perceive anthropomorphic narratives from the perspectives of literary adaptation. We believe that the use of anthropomorphic narratives in adaptation discloses a new viewpoint in terms of the pseudoreferentiality, where vagueness of a reference occurs due to the attributes of the object which generate biased references (Sorensen, 1990). In Shimizu's *Hataraku Shibou*, teleologically readers or viewers understand that the series talk about red and white blood cells but they are left unknown over the source texts or references of the pedagogical materials or subjects that are used as the basis of the narratives. This is what it means by pseudo-referentiality. In short, we argue that the process of adapting particular pedagogical materials or subjects in the form of anthropomorphic narratives is included as an adaptation since the authors adapt the metaknowledge shared by people into a different form of presence and existence. This study aims at explaining this phenomenon which we call paideia adaptation and the techniques of delivering the adaptation.

Paideia adaptation is an adaptation of pedagogical materials in pseudoreferential fashion executed through textual, audiovisual, and operative adjustments to adjust the medial and audience context with anthropomorphism as the core mechanics. To indicate the presence of paideia adaptation and to formulate the techniques of delivering the adaptation, we employed the theories of ontofiction by Couceiro-Bueno (2000), ergodic literature by Aarseth (1997), second degree of literature by Genette (1997), and anthropomorphism by Weemans and Prévost (2014). Ontofiction theory was employed as a philosophical foundation to reveal the pedagogical materials or subjects that have been modified to some extent and length to offer an alternative means of understanding those subjects and materials. Ergodic

literature was put into use to address the recontextualization of the pedagogical materials or subjects into anthropomorphic narratives in terms of user's functions especially narratives that appear on games. Second degree of literature was used to indicate how anthropomorphic narratives are constructed as a product of the adaptation of the metaknowledge. Anthropomorphism theory was applied to indicate the types and levels of anthropomorphism applied in the adaptation.

The four theories were applied to investigate paideia adaptation in animated films and games. As seen from the studies by Lanier, Rader, and Fowler III (2013) and Koike and Loughman (2021), these two media disclose innovative possibilities in delivering, displaying, and disseminating anthropomorphic narratives for a wide range selection of issues, materials, and purposes. Differences in interaction and immersion level between animated films and games evoke a distinctive fashion of delivering pedagogical materials or subjects through anthropomorphic narratives. In his study on Disney's anthropomorphic animals, Whitley (2012) points out that the animal anthropomorphism Disney displays tends to stay faithful to the animal nature or characteristics. This tendency implies that in interaction level, animal anthropomorphization demands the film makers to negotiate what humane sides of the characters are delivered and what animal sides are pertained in order to avoid any misleading and misconception of the messages delivered by the animals to the viewers. With this fashion of interaction, the immersion fashion might be different from that of characters which are fully anthropomorphized. Though the immersion fashion might be different, that any films are constructed in a didactic one-way absorption indicates the same level of immersion. This condition is different in game context where different fashions of immersion will lead to different level of it. Anthropomorphic narratives played using keyboards, controllers, and virtual reality (VR) devices lead to different expectations of experience, which are constructed to immerse the players distinctively in the game worlds. These different fashions in accessing the game world are realized through what Aarseth (1997) calls as user's functions - different user's functions will lead to different immersion which then leads to different experiences.

LITERATURE REVIEW

Anthropomorphic Narratives in Adaptation and Pedagogical Contexts

Hutcheon (2006) proposes the concept of triangular medial modes of adaptation namely telling e.g. novel, showing e.g. film, and interacting e.g. game. These medial modes require the presence and the existence of source texts to call the process of mode changing or alteration an adaptation. Problems occur in the telling mode. As implied by Popovic (1976),

an adapted or target text is a metatext which implies its unlimited or oral and limited or textual references to the other texts. Since telling is unlimited in the sense of what to refer to, what Plato calls *methexis* – the involvement of audiences – is arbitrary and difficult to trace when the involvement occurs on a text which is being referred for an adaptation. In pedagogical material context e.g. tooth brushing before sleeping to prevent any bacteria from decaying the tooth, if this tooth brushing instruction is transformed into an anthropomorphic narrative, we can and cannot trace the reference of the instruction since the knowledge of tooth brushing before sleeping is shared common knowledge or metaknowledge. In metaknowledge, references find themselves the status of *pseudo* – pseudoreferentiality. In pseudoreferentiality, verifications which involve external factors are not required (Stierle in Schaefer, 1991) which further implies that, in the context of adapting pedagogical materials into anthropomorphic narratives, the source text which becomes the metatext or reference does exist, but we are left unsure on the references taken.

The absence of external verification toward the references used in an adaptation of metaknowledge indicates that metacommunication has a significant role in bridging metaknowledge with the process of adaptation. In the context of ontofictions, where alternative way of comprehending materials or subjects is presented (Couceiro-Bueno, 2000), the adaptation of metaknowledge into anthropomorphic narratives becomes challenging in the sense of ensuring that the metacommunication is transferable to the target users. The transferability might be perceivable whether the target users could comprehend the narratives delivered through anthropomorphic characters or not. In the example of tooth brushing, the adapters might anthropomorphize the bacteria into monstrous looking characters but whether the choice of the monster might infer or imply a different meaning is a concern the adapters have to take. If this anthropomorphic narrative of learning about tooth brushing is delivered in an interactive manner e.g. video games, what Aarseth (1997) calls as non-trivial traversal will take place – that the target users will immerse themselves in comprehending the importance of tooth brushing before sleeping or completing the game becomes a concern. This concern further invites consideration over immersion.

In anthropomorphic narrative context, as studied by Gardner and Herman (2011), the empathy which connects the anthropomorphic narratives with the readers requires a particular level of immersion to ensure that the connection comes into function. In the example of tooth brushing anthropomorphization, if the target users e.g. the children do what the narratives tell them, it implies that the connection functions and that might indicate that

the children immerse themselves in the narratives in such a degree or level that they do what being told. In the perspectives of Calleja (2011), this influence points out that the children have undergone immersion as transportation, in which the children have control upon the world they have shared – the action of tooth brushing. In adaptation context, it implies that this immersion as transportation occurs due to what Genette (1997) calls transmodalization, where presentation mode is altered to fit the target readers. In the context of tooth brushing, the presentation mode is metacommunicatively altered from metaknowledge into medial knowledge.

RESEARCH METHOD

Design, Data, and Data Sources

This is a qualitative study which emphasizes on the descriptive fashion of delivering the findings. The data of this study are in the forms of textual, audiovisual, and operative elements taken from eight animated films and games. Textual data refers to verbal expressions performed by the characters in the anthropomorphic narratives which point out the presence and existence of pedagogical materials. Audiovisual data refers to cosmetic elements which accompany the emergence of textual data that might take the forms of images, colors, and visual effects, background music, and sound effects. Operative data is used only in games. They refer to how the games are played and how the narratives of the games function also as the gameplay. These data were taken from the following titles:

Table 1

Data Sources

Animated Films	Games
Hataraku Saibou (Cells at Work)	Dragon Box Elements
Hetalia: World Stars	Armello
Ketsuekigata-kun (a Simple Thinking about Blood Type)	Harvest Moon series
Babybus	Plants vs Zombies series
Tayo the Little Bus	I am Bread
Dr. Stone	Purrfect Date
Gin No Saji (Silver Spoon)	Goat Simulator
How Heavy are the Dumbbells You Lift?	Untitled Goose Game
Thomas and Friends	
Super Wings	

The criteria employed in selecting those titles were the presence and existence of pedagogical materials or subjects. Phenomenological pedagogy by Kurenkova, Plekhanov, and Rogacheva (2000) was employed to categorize what was being called pedagogical materials or subjects and what was not. This pedagogy type was selected to align the mode of learning that we analyzed – learning through anthropomorphic narratives creatively delivered through films

and games. Ontofiction by Couceiro-Bueno (2000) was also applied to indicate whether the data sources fall into ontofiction or not, by analyzing if the media offer an alternative means of understanding particular subjects and materials.

Data Analysis

Spradley's data analysis techniques (2016) consisting of four phases were taken in the analysis process, namely domain, taxonomy, componential, and cultural theme. In domain analysis, anthropomorphism by Weemans and Prévost (2014) was applied to indicate how anthropomorphic narratives are delivered in regard to the pedagogical materials or subjects channeled by the film and games. Revealing the delivery fashion of the anthropomorphic narratives from each film and game title, second phase, taxonomy analysis, commenced. In this analysis, second degree of literature theory by Genette (1997) was employed to reveal the transmodalization and transtylization of the pedagogical materials or subjects. The findings acquired from this phase were componentially brought to indicate how textual, audiovisual, and operative elements of the film and game titles work in displaying the anthropomorphic narratives. Done with this phase, in the last phase - cultural theme analysis - significance was drawn in regard to the fashions and levels of immersion.

FINDINGS AND DISCUSSION

The section is divided into two sub sections with first talking about the findings on the narrative features of paideia and the second about the language features. Paideia adaptation is an adaptation of pedagogical materials in pseudoreferential fashion executed through textual, audiovisual, and operative adjustments to adjust the medial and audience context with anthropomorphism as the core mechanics. Four narrative features of paideia adaptation, which differentiates it from the other types of adaptation, are anthropomorphic narratives, pseudoreferentiality, metalepsis, and metafictionality. On the other hand, three language features are formulated to indicate the distinctiveness of paideia adaptation. They are thematization, proairetic decoding, and didacticization.

Narrative Features of Paideia Adaptation

Narrative features are features that signify and define how the mythopoesis of paideia adaptation is constructed. The first narrative feature is anthropomorphic narrative. This feature circumnavigates around the use of anthropomorphized characters to deliver pedagogical or educational materials. The second is pseudoreferentiality. This feature refers to absence of vivid references and to the presence of meta references from which paideia adaptation is constructed. The third is metalepsis. This feature highlights how a context is

changed through adjustments and modifications. The fourth is metafictionality. This feature deals with an implied reminding force that the adaptation is only a work of fiction with educational materials as the content.

Anthropomorphic Narratives

Paideia adaptation is signified through the use of various types of anthropomorphic characters. Anthropomorphism, as stated by Weemans and Prévost (2014), deals not only with the figuration of knowledge but also the production of knowledge – implying that abstract concepts like knowledge can be anthropomorphized to explain the intended knowledge. In regard to the anthropomorphization of pedagogical materials into an anthropomorphic narratiives with the focus on how the materials are anthropomorphized and how the anthropomorphized objects interact with non- anthropomorphized objects in a pedagogical engagement, we propose four types of anthropomorphization. They are proactive, interactive, exertive, and operative.

Table 2

Anthropomorphic Narrative Types

	Pedagogical Material Anthropomorphization		Pedagogical Material Engagement	
	Explicit	Implicit	Participative	Passive
Proactive	√	×	√	×
Interactive	√	×	×	√
Exertive	×	√	√	×
Operative	×	√	×	√

First is proactive anthropomorphic narrative. In this type, the anthropomorphic characters which tend to have a fully functioning set of human traits interact with the viewers in a pedagogical context. Nursery rhymes programs or channels like *Babybus*, which shows an anthropomorphized panda, tend to employ this type of anthropomorphization. In delivering pedagogical materials, *Babybus* blends the learning with sing-a-song and dance-a-song and thus, enticing the viewers, which are mostly children, to be proactively engaging the materials through cheerful physical activities.

Second is interactive anthropomorphic narrative. Different from proactive which offers a physical engagement, this type focuses on anthropomorphized pedagogical materials aimed at providing a clear picture or comprehension toward the materials. *Hataraku Saibou (Cells at Work)* which depicts anthropomorphized cells and *Hetalia: World Stars* which depicts anthropomorphized countries are the examples of this narrative type. The former delivers pedagogical materials about cells while the latter about geopolitical materials.

Third is exertive anthropomorphic narrative. Through this narrative, the viewers or players are given participative pedagogical materials through implicitly anthropomorphized pedagogical materials. *How Heavy are the Dumbbells You Lift?* which talks about how to build an ideal body in a gym and *Gin No Saji (Silver Spoon)* which talks about agriculture are the examples of this narrative. Both have implied anthropomorphic characters with human traits over bodies as seen in the former and animals in the latter.

Fourth is operative anthropomorphic narrative. This narrative has implicit anthropomorphized materials and demands passive engagement from the viewers or players - implying the vagueness of the pedagogical elements. *Goat Simulator* is an example of simulative games where the players play a goat in a free-to-roam fashion are the example. The players learn how to operate or control a goat but whether the goat is a form of anthropomorphization and what pedagogical materials are being delivered remains vague. The players are given visualization on how the goat would be like if controlled in various ways of 'herding'.

Pseudoreferentiality

Adaptations might not always have a clear reference. King Arthur and his legendary Knights of the Round Table, for example, have a vague reference when the personalities are adapted into various medial adaptations. The vagueness derives from the fact that King Arthur saga is based on folklore and thereby its adaptation, called *folklorismus* (Newall, 1987), has this unclear or vague reference as its distinctive feature. The unclear or vague presence of referentiality - pseudoreferentiality - is also the key feature of paideia adaptation.

In folklorismus, pseudoreferentiality tends to take a reference from an oral tradition while in paideia adaptation, the reference taken is from existing general knowledge. Ones tend to learn this type of knowledge through both formal means e.g. in the classroom and informal means e.g. experiences or stories. In the Korean animation *Tayo the Little Bus*, for instance, Tayo and his friends teach their viewers to learn the importance of safe driving, obeying the traffic rules, and respecting the others on the road. These pedagogical materials are general knowledge transformed into a narrative with talking buses and cars as the 'teachers' for the viewers.

Metalepsis

Fundamentally adaptations are contextually exercised. This context change is basically what defines metalepsis. In adaptation domain, metalepsis is delivered through what Genette (1997) calls transtylization where changes of style are eminent to adjust different audiences. In

paideia adaptation, the transtylization circumnavigates around anthropomorphism adjusted to target audiences. Thus, we can find different styles of anthropomorphism since the adapted general knowledge might not always fit for general audiences.

In a visual novel dating simulation *Purrfect Date*, for instance, the general knowledge on how to treat one's cat is delivered through an anthropomorphic story where the players could date a various cat with human traits. That this game is a dating simulation, it tends to target a specific age to make the players comprehend the implied messages of the game. Thus, the anthropomorphism tends to have a symbolic implied meaning which requires certain signification to comprehend how the game reflects the message of how ones should be treating their cats.

Metafictionality

Metafictionality deals with constant reminding that the works are fictional. These constant reminders, as implied by Macrae (2019), are exercised through scalarity, fourth wall breaking, and commentarability. First is scalarity. Scularity in the context of paideia adaptation deals with how the viewers or players might learn pedagogical materials delivered through implicit or explicit fashions. In *Dr. Stone*, for example, in order to explain the hazardous yet beneficial natures of sulphuric acid, the acid was anthropomorphized into a green auric winged angel-like creature with terrifying face. The wings might represent the beneficial nature of sulphuric acid e.g. metal cleaning and the terrifying face to indicate its hazardous nature. This operative anthropomorphic narrative evokes scalarity in a sense that it provides implied instruction on how to handle sulphuric acid.

Second is breaking the fourth wall. Fourth wall breaking deals with boundary crossing between fictional and real worlds. In *Dr. Stone*, for example, the main protagonist, the genius Senku, has its robotic counterpart called Mecha Senku, whose job is to explain the procedures of conducting various scientific experiments to the viewers. That Mecha Senku directly addresses the viewers verbally and nonverbally through camera angles situated as if he talked to the viewers signifies the breaking of the fourth wall.

Third is commentarability. The presence of reaction videos toward the fictional and the nonfictional aspects of paideia adaptation as commonly found from YouTube is an indication of constant reminder that the commented works are fictional. *Dr. Stone*, for example, has many reaction videos from scientists who commented on the scientific experiments as displayed on the anime series. Their commentaries might support the scientific-ness of the series and might disclose also an understanding between myth and facts

- further signifying that the work is still fictional.

Language Features of Paideia Adaptation

The distinctive language features that distinguish paideia adaptation from the other types of adaptation are what we call as paideia markers. These markers are distinctively different from the other textual, visual, and operative markers of audiovisual narratives. Paideia markers signify paideia adaptation using thematization, proairetic decoding, and didacticization of educational materials. The following example from *Super Wings* from season 3 episode 31 might help illustrate the differences of thematization, proairetic decoding, and didacticization of educational materials and how they work in tandem to mark the presence of paideia adaptation:

- Jett: Where am I winging it to today, Sky?
Sky: You're taking a packet to a boy named Nav who lives in the city of Abu Dhabi. Abu Dhabi is the second biggest city in the United Arab Emirates. It's an island city surrounded by the Persian Gulf. It's home to amazing buildings including the Sheikh Zayed Grand Mosque.
Jett: Cool! I can't wait to see it.
Sky: Have a good trip but don't rush! Safety first! To say 'safety' in Arabic which is the language they speak in Arabic, say 'salama'.
Jett: *Salama* is always on this plane's checklist, Sky. See ya!

Super Wings hails the story of anthropomorphized plane Jett and his friends who serve a package delivery to customers around the world. In each episode, younger viewers are introduced to thematic educational materials that comprise geography and intercultural communication. These thematic selections are intratextually wrapped in an all-of-sudden adventure involving Jett and the package receivers who are always a child. The selection of geography and intercultural communication highlights the use of thematization. Thematization, as suggested by Perfetti and Goldman (1974), functions to provide stable referential focus to the readers. In relation to paideia adaptation, thematization is supported by visualization of what is being referenced to strengthen the referential focus. In the example, the referential focus is Abu Dhabi. This verbal referential focus is visualized through the depictions of the city itself and the image of Sheikh Zayed Grand Mosque. To further strengthen the focus, proairetic decoding is applied.

Proairetic decoding, as suggested by Nikolajeva (2010), deals with presenting a text with nonbiased expressions. Through proairetic decoding, concrete nouns tend to be of preference be they with or without their visual counterparts. In relation to thematization, concrete nouns

with higher frequency of appearance are assumed to strengthen the thematization of the paideia adaptation. From the example of *Super Wings*, we learn that the words ‘Abu Dhabi’ and ‘city’ have the same frequency of three appearances if the title of the episode ‘Abu Dhabi Thunder’ is included. The same frequency of appearance the two words share strengthens the geographic themes the series are all about. That the words indicate the absence of bias, due to the visuals that support the words, point out that proairetic decoding is on the work. The following table might help illustrate how thematization and proairetic decoding are intertwined:

Table 3.

Thematization and Proairetic Decoding

Themes	Proairetic Decoding	
	Textualization	Visualization
Geography	Abu Dhabi	Map
	City	Images of the city
Intercultural Communication	<i>salama</i>	Images of the city
	safety	Gestures indicating ‘safety’ by Sky and Jett
		Gestures indicating ‘safety’ by Sky and Jett

As seen from Table 3, the thematization circumnavigates around ‘Abu Dhabi’, ‘city’, ‘salama’, and ‘safety’. These four words are referentially visualized through images and motions to strengthen the proairetic decoding by the younger viewers. At these four words, events in the episode revolve. The episode mainly talks about safety in the air. No matter how advanced a plane is, safety always comes first. Through this thematization and its realization through proairetic decoding, didacticization ensues.

In the context of reading, when it comes to ‘didactic’, as implied by Brown (1998), it might refer to reading an object that tends to be ‘morally neutral’ and an object with truth that tends to be hidden and authoritative. The position of being ‘morally neutral’ in the context of paideia adaptation comprises two elements namely neutral in anthropomorphization context and neutral in the sense of neutralizing narratives. As seen from the example of *Super Wings*, an anthropomorphized civilian plane, Jett, is selected as the main character signifies the neutrality of the character. The selection of civilian plane as the main character also strengthens the proairetic decoding in regard to the fact that Jett’s duty is to make children happy by sending them packages. This neutral nuance is further supported by the tendency of the story to have neutralizing narratives. These narratives are embodied through the depictions of events where those who show negative attitudes are neutralized and changed into characters with positive vibes by Jett, his companions, and the children whom Jett gives the package to.

Didacticization is also seen from the presence of teacher-student like relationship between Jett and Jimbo and Jett and Sky. Whenever Jett readies himself for a delivery duty, Jimbo or Sky provides him with instructions, explanations, and suggestions. The following table might help illustrate the statement:

Table 4

Didacticization

'Teacher' Characters	Instructions	Explanations	Suggestions
Sky	You're taking a packet to a boy named Nav who lives in the city of Abu Dhabi.	Abu Dhabi is the second biggest city in the United Arab Emirates. It's an island city surrounded by the Persian Gulf. It's home to amazing buildings including the Sheikh Zayed Grand Mosque.	Have a good trip but don't rush! Safety first! To say 'safety' in Arabic which is the language they speak in Arabic, say 'salama'.

As seen from Table 4, explanations consume the most part of and this is the case for every episode of Jett on the departure of scene. In the context of didacticization, what Sky says strengthens the teacher like fashion. Though the instructions, explanations, and suggestions are intended for Jett, they tend to target younger viewers also especially on the geography and intercultural communication themes. In some cases, didacticization is implemented through the use of soliloquy.

Hasegawa (2011) states that there are three defining characteristics of soliloquy namely situational, intentional, and form and content heuristic. The first deals with the presence of a single speaker speaking to him or herself, the second with whether what is said by a speaker is intended for himself, for others, or for both, and the third with the absence of elements that indicate the presence of addressees. In the context of paideia adaptation, these three characteristics are embodied through the visualization of a single character speaking to himself of which the information is intended for the viewers. The information shared tends to be that of the pedagogical materials that become the themes or topics of the adaptations. In relation to the example of *Super Wings* season 3 episode 31, that Sky is screenplayed in close-up shots also indicates that soliloquy is at play since the close-up shots give the impression that she is talking with the audiences positioned in a student like fashion.

The Problems of Being 'Paideia' in Paideia Adaptation

Philosophically the function of paideia, as suggested by Paxson (1985), is to promote and enhance the *arete* or excellence of mankind through education. Further he suggests that

one of the educations that could foster *arete* is art. Films and games are works of art to which educational materials could be embedded. The problems lie in what Hirschbein (2015) calls as denaturation, where educational materials might collide with the entertainment features from which the essence of learning might shift into only enjoyment.

To prevent this shift, practitioners of adaptation might apply Apuleius's method of paideia, as suggested by Riess (2008), through a careful mixture between language, style, and allusion in the construction of narratives. In *Thomas and Friends*, for example, in order to align the thematization, proairetic decoding, and didacticization, careful considerations are taken not only language, style, and allusion in their verbal forms but also the visual forms. Through the use of diorama, it is expected that the level of immersion is enhanced. Young viewers might immerse themselves into the film and feel as if they are a part of the scenes in the dioramic animation more than when they watch non-dioramic animation. This high level of immersion strengthens further the proairetic decoding of the film. Supported by allusive didacticization in the form of instructing, explaining, and suggesting by the train station master Sir Topham Hatt or better known as the Fat Controller, the level of immersion is expected to be further enhanced.

To deal with whether the immersion is truly enhanced, an assessment over the level of denaturation or an assessment over the level of distraction is required. In Natsume's *Harvest Moon*, for example, a game that adapts farming and breeding, players might get distracted from the knowledge about farming and husbandary skills since the game is packed with diverse range of non-farming and non-breeding activities, such as get married and have a family. In the game, players can court a female Non-Playable Character (NPC), marry her, and have a child. This might create distraction in a sense that marriage is not part of the educational materials. This distraction or what Walter Benjamin calls as *zestreuen* or *zestreeung* (in Shusterman, 2003) tends to be natural since attention of the viewers in popular entertainment tends to be dispersed compared to attention given to high forms of arts like painting. Though natural adapters are advised to construct a countermeasure on how to partition between educational materials and the entertainment means used to channel the materials.

CONCLUSION

Paideia adaptation is an adaptation of educational or pedagogical materials through the adoption of anthropomorphization narratives, pseudoreferentiality, metalepsis, and metafictionality. This adaptation has distinctive language features namely thematization, proairetic decoding, and didacticization. The combination of these narrative and language

features constructs a specific type of adaptation in which education meets entertainment. Due to this fusion, problems of denaturation and distraction might ensue.

Future adaptation scholars or practitioners could continue the study of paideia adaptation by constructing denaturation and distraction assessment. Elements taken in constructing the assessment might encompass narrative, language, and user. Narrative elements might consider film and game genre, educational material portion, and techniques of adaptation or localization. Language elements might put a concern over degree of complexities, concretization, simplification, and abstraction. User elements might address degree of interactivity, and level of immersion.

The results of this study can be used as a parameter or a guideline in adapting educational materials into anthropomorphic narratives. Game narrative designers could consider the game genres when applying the results of this study. Role-Playing Games (RPG), for instance, that tend to have a branching story, game narrative designers could consider whether the branching will lead to another process of absorbing educational materials or pure entertainment materials. On the other hand, film writers that want to design an anthropomorphic narrative could consider the presence of didacticization through a careful scenic consideration. The scenic considerations could consider the use of teaching-learning like fashion in direct talk to the viewers or an indirect one.

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