## A Descriptive Analysis on Grammatical-Morphology Patterns of the Deaf College Students' Indonesian Written Language

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#### Abstract

Along with the encouragement of Inclusive Education in Universitas Brawijaya-Indonesia, the students with disability, including the Deaf, are having an opportunity to join higher education in the mainstream educational context. It is challenging for Deaf students, especially those graduated from Special Needs Schools since their previous education has not prepared them to access higher education. Previous researches have well documented that most of the Deaf population are struggling with producing written language. Thus, this article purpose is to seek the grammaticalmorphology patterns in Indonesian written language performed by Deaf college students in Universitas Brawijaya. This study involves 10 Deaf college students consist of two groups (1) 5 students graduated from Public Senior High School (P SHS) and perform oral communication, (2) students graduated from Special Needs Senior High School and perform SIBI (Indonesian Language Signed System) instead of BISINDO (Natural Indonesia Sign Language) (Sn SHS). The findings describe that all of the students are struggling with Indonesian grammatical-morphology though P SHS Deaf students show better performance on using the preposition, possessive pronoun, conjunction and use both inflectional and derivational morphemes than Sn SHS Deaf students. The discussion of this study related to the Deaf students' language preferences, the influence of sign language use, morphological awareness and Deaf first language. This article will be beneficial for teachers and other researchers to develop strategies to improve Deaf students' literacy and as a reference to give literacy intervention for deaf children.

Keywords: Deaf college students, Grammatical-morphology, Indonesian written language

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## Introduction

Along with the encouragement of Inclusive Education in Universitas Brawijaya, the students with disability, including the Deaf, are having opportunity to share higher education as students without disabilities. It is an insightful opportunity but also challenging matters since most of students with disability are not well prepared for higher education, especially Deaf students who are struggling with literacy issues.

PSLD (The center of disability services and studies), as the institution that provide services to support the study of students with disability in their college study such as providing students-assistants, interpreter, assistive technologies, and Indonesian language course specialized for deaf students.

This course is needed since Deaf students are struggling in producing written text. According to some research conducted in English-speaking countries on deaf abilities in written language revealed that deaf students tend to construct sentences simpler than other hearing peers. Their sentences are also syntactically simpler and they produce lowly vocabulary and lexical inflexibility. Deaf students are also facing difficulty with relative, subordinate, and pronominal clauses. In the grammatical morphology area, they are striking most with morphemes omission, substitutions, and addition (Fabbretti, D. et.al 2015).

Unfortunately, such kind of research is rarely done in Indonesia. Researches on the investigations of deaf students' language incompetency in Indonesia mostly have concentrated on improving deaf students' speaking and language competency from oralism perspective. Such as research done by Hernawati (2007) concludes that deaf students speaking and language competency can be improved through various ways, such as special services supported by facilities, early language intervention to the deaf children, and maximize the remaining hearing of deaf children using hearing aid. Another research done by Lintangsari (2013) has only focused on identifying the needs of deaf students in written language learning in technical matters such as learning media which is adjusted to deaf students need, adopting second language teaching method as a method to teach deaf students, using simultaneous communication while teaching deaf students, and the need of gradual assessment process to observe the development of the learning process. Recalling the fact that the study of deaf students' written language in Indonesia are rarely done, this research offers the new issues on linguistics study.

Deaf students encounter new challenge when they arrive in higher education, mainly in terms of communication and accessing information either in the classroom or in other places. As the speech-dominated society, Indonesia people rarely apprehend sign language, thus oral and written communication is the best alternatives for deaf to communicate with their hearing counterparts. On the other hand, Deaf college students perform written language in a unique pattern which is mostly hard to understand and considered meaningless. This condition will indirectly have an effect on their academic futures. Therefore, this research focuses on deaf college students' Indonesian written language in the grammatical-morphological level.

# Method

This research involve 10 Deaf college students divides into two groups with the different background characteristics; (1) the Deaf students graduated from public Senior High school and perform oral language (P SHS) and (2) the Deaf students graduated from Special Needs Senior High School and perform Sign Language (Sn SHS). They were asked to write a recount text related to their first experience in University.

This research utilizes the descriptive taxonomy covers omission, addition and substitution on grammatical-morphology level (Fabbreti, 1998). Grammatical-morphology level is related with the use of lexical and functional words, the use inflectional and derivational morpheme, word selection and the use of punctuation.

This research examines the numerous selected Indonesian written languages performed by Deaf students in Universitas Brawijaya divided into two groups according to their senior high educational background and their language preference. The first group is called the P SHS group refers to deaf students graduated from public high school and perform oral communication; the second group is called the Sn SHS group refers to deaf students graduated from special needs senior high school and perform sign language.

It is a document analysis using qualitative approach since it aims to explore and understand the meaning individuals or group ascribe to a social or human analysis that builds the data from particular into general themes. Qualitative research involves some characteristics such as typically data collection which is done in participants' setting, inductive data analysis, and the interpretation of the researcher on the data (Creswell, 2007).

# **Review of Literature**

# Deaf Students' Written Language Characteristics

Learning is considerably supported by our senses, if one of it is limited; our access to information is also limited. Deafness chiefly limits the audio sensory that potentially affect the speech ability, which lead to communication disorder that automatically will affect the learning process. Deaf individuals require a unique form of communication. Visual communication modes such as sign language, finger spelling, lip reading and written communication will be the most preference. In Indonesia, this form of communication will automatically limit their process of language learning since the sign language is not familiar to our society. Beside academic matters, written language is the most efficient communication among deaf and hearing individuals. Therefore, written language competence is essential for deaf individuals to be inclusively included to the society.

A recent study engaging Gallaudet University students reveals that the estimation number of deaf students with satisfactory skills ranged between 5 percent and 75 percent. Evidently, writing is the complex skill to be mastered by deaf students (Marschark, 1997).

Researches reveal that deaf students' writing competence is detained for some years than hearing students. Some characteristics found in deaf students are they tend to use fewer cohesive markers than hearing students (De Villiers1991 in Albertini & Schley, 2003). They also use vocabulary restrictedly than the hearing students. In the spelling area and punctuation, they perform sentence simpler than the hearing students (Albertini & Schley, 2003). Another research conducted in English-speaking countries on deaf abilities in written language found that deaf students produce shorter sentences and simpler syntactical structure than the hearing students. They also display the poorer vocabulary and lexical rigidity. They stumble on relative, subordinate and pronominal clauses. Their most difficulty subjects are in the area of grammatical morphology, covering omissions, substitutions, and addition of the variety of morpheme beside lexical, morphologic, syntactic and pragmatic (Fabbretti, D et.al, 2015). Sentence-level grammatical and semantic anomalies are found in deaf adult and adolescents' writing (Marschark, 1997).

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# Finding

## Grammatical-Morphology patterns of P SHS deaf students

The writing of P SHS students mostly written in a good morphological patterns with appropriate derivational and inflectional morphemes that function correctly in the sentences though there are found few non-standard grammatical morphologies related to the usage of non-standardized preposition, inflection, derivation, omission and substitution but not in significant number.

As illustrated in table 1, there are some omission, addition and substitution of grammatical-morphology. Sentence in 1(a) undergo omission of preposition *untuk* 'for' as the preposition. Sentence 1(a) is also syntactically non-standard, phrase *membuat buka* 'make open' though semantically understood but it is syntactically non-standard. The standard form to represents the phrase is *membuka* 'opening'. Another omission is also found in non-verbal sentence that involve noun clause as in sentence 1(f) *istilah kata disabilitas dan difabel sama* '(literally translated) the term of disability and difabel is similar'. In standardized structure of nonverbal sentence, the subject and predicate should be separated by copula *adalah* that is equal to auxiliary verb in English and that sentence is missed it out.

Related to the inflection, there is omission of inflective prefix me- that derive word into verb form in the sentence 1(b) *perkenalkan diri* 'introduce myself' and 1 (c) *beri contoh* 'give example'. The words *perkenalkan* and *beri* are imperative, though this

sentence is semantically understood but it is considered non-standard without the presence of prefix *me*-, as in *memperkenalkan diri* 'introducing myself' and *memberi contoh* 'giving example'. Omission of inflective morpheme is also found in sentence 1(d) .*jadi tegur tidak boleh ngobrol* 'so we are warned to stop chatting'. The word *tegur* 'warn' is imperative, it needs prefix *di*- to make it passive as in *ditegur* 'is warned'. Beside inflection verb, there is inflection noun found as in the sentence 1 (e) *menempuh pendidik* di Universitas Brawijaya 'taking education in Universitas Brawijaya'. The word *pendidik* is equal to noun word 'educator' in English, while the sentence context requires other noun that is *pendidikan* 'education'.

Table 1. Omission, addition and substitution of grammatical-morphological elements of P SHS Students

Taxonomy	Grammatical-Morphology	
1. Omission	a) Pemimpin UB telah berusaha <u>untuk membuat buka</u>	
	jalur Ø (untuk) difabel	
	'The leader of UB has tried to make open line $\emptyset$ (for)	
	difabled'.	
	b) Saya <u>perkenalkan</u> diri	
	'I introduce myself'	
	c) <u>Beri</u> contoh.	
	'give example'	
	d) Dosen sempat salah paham bahwa pendamping saya	
	juga Maba padahal bukan, jadi <u>tegur t</u> idak boleh <u>ngobrol</u>	
	The lecturer has misunderstood consider my volunteer as the	
	new students instead she is not, so we are warned to stop	
	chatting'	
	e)dan menempuh <u>pendidik d</u> i Universitas Brawijaya	
	'and taking education in Universitas Brawijaya'	
	f) Istilah kata disabilitas dan difabel $\emptyset$ (adalah) sama.	
	' the term of disability and difabel $\emptyset$ (is) same'	
	g) Apakah ospek yang kami jalan nanti sama dengan	
	mahasiswa reguler	
	'Is orientation for us later similar to other (non-disabled)	
	students'	
2. Addition	a) $UB \underline{yang}(\emptyset \text{ masuk ke dalam deretan kampus bergengsi})$	
	'UB <u>that(<math>\emptyset</math></u> is included to a rank of prestigious university'	
	b) Kami disarankan untuk bertanya ke orang <u>yang <math>(\mathcal{Q})</math></u> lain	
	'We are suggested to ask people <u>who</u> other (other people)'	
	c) <u>Banyak para</u> calon mahasiswa	
	'many college student applicants'	
3. Substitution	a) $UB \underline{vang}(\emptyset)$ masuk <u>ke</u> (di) dalam deretan kampus	
	bergengsi	
	'UB <u>that(<math>\emptyset</math></u> is included into a rank of prestigious university'	
Omissions are indicated by Ø, non-standardized forms are underlined, and		
standardized form is in parenthesis.		

The omission of suffix –an in the sentence vitally make the sentence semantically ambiguous though it is syntactically acceptable. The last is the omission of suffix –i in verb derivation as shown by sentence 1(g) *Apakah ospek yang kami jalan nanti sama dengan mahasiswa reguler* 'Is the college orientation for us will be similar to other (non-disabled) students'. The underlined word *jalan* 'street' is a noun, to derive verb we need to attach suffix –i in the word into *jalani* 'join'.

Addition is identified with the presence of yang 'that' in the sentences 2(a) and 2(b). The word *yang* 'that' is a relative pronoun used to precede relative clause to emphasize noun phrase, yang 'that' in the sentences is unrequired. The underlined words *banyak* 'many' and *para* (preposition indicates plurality) are considered redundant since both of words indicates plurality. In standard form, it is better to use one of it. Substitution is also found as in sentence 3(a) as the usage of non-standardized preposition *ke* 'to' instead of *di* 'in' in the prepositional phrase *ke dalam* 'into'.

Another unique characteristic found in morphological level is the usage of suffix – nya. In Indonesian, suffix –nya function to indicate the third person possessive pronoun such as in the sentence *namanya* A.M 'his name is A.M'. It also *function* as ligature before possessive noun such as in *rasanya* 'the feeling' in the sentence *saat saya mengikuti PK2MU rasanya saya telah memasuki dunia baru* 'when I join PK2MU, I feel like entering the new world'. It also can be attached to the head noun which is equal to 'the' in English such as in the sentence *alasannya karna terkesan lebih sopan* 'the reason is, it sounds politer'.

In term of lexical selection, most of deaf students select the lexical semantically correct though most of them use non-standard diction, such as the word *sama kamu* instead of *dengan kamu* 'with you', or the word *ngobrol* 'chatting' instead of *berbicara* 'talking'.

# Grammatical-Morphology patterns of P SHS deaf students

Sn SHS deaf students perform some violation in morphological level according to non-standardized grammatical-morphology covers the usage of non-standardized preposition, conjunction, pronoun and verb inflection, non-standardized lexical covers the lexical selection. Besides those items, omission (the absence of obligatory linguistics item), addition (the presence of inappropriate linguistic item) and substitution (the substitution of the correct item with the incorrect one) are also found.

Table 2. Omission, addition and substitution of grammatical-morphological elements
performed by SN SHS deaf students

Taxonomy	Grammatical-Morphology
1. Omission	a. <u>brosur</u> Ø (nya) ke <u>orangtua Ø (</u> saya) 'give
	brochure to (his) parents'
	b. saya mencari Ø (materi di) internet
	'I look (materials in) internet'
	c.Ø (se) LanjutkanØ (nya) ada pengumuman
	c.Ø (se) LanjutkanØ (nya) ada pengumuman 'Then, there is an information'
	d. Kenapa tawa?

	'why do you laugh?'	
2. Addition	a.dosen datang di kelas <u>nya</u>	
	'the lecturer comes to his class'	
	b. <i>ada perasaan malu</i>	
	'there is a feeling shy'	
	c.masuk kuliah memang <u>harus butuh k</u> esabaran	
	'studying at university must need patience'	
3. Substitution	a. dari gruru SMALB oro-oro dowo terus saya dikasih	
	brosur ke orangtua	
	'from teacher of SMALB in oro-oro dowo then I am	
	given brochure to parents'	
	b. berkenalan teman baru <u>tersebut D</u> , R, and H	
	'be acquainted with new friend mentioned D,R and	
	H'	
	c. Saya <u>pendaftaran kirim e</u> mail ke PSLD	
	'I admission send email to PSLD'	
	d. Pertama dulu saya <u>dapati</u> brosur UB	
	'At first, I got UB brochure'	
Omissions are i	Omissions are indicated by $\emptyset$ , non-standardized forms are underlined, and	
standardized form is in parenthesis.		

Some omission identified in the sentences produced by Sn SHS deaf students are the omission of  $\neg$ suffix *–nya* that indicates definiteness, the omission of dependent in noun phrase, the omission of preposition, the omission of affix that derive adverb and verb and the omission of object.

In term of addition, Sn SHS deaf students tend to write sentences redundancy by using noun phrase instead of verb as their predicate that lead to the presence of unrequired word. Another addition recognized is the presence of suffix -nya that do not indicate anything in the sentence.

Substitutions of active form with passive form are found but not in significant number. Other substitution is the substitution of apposition *yaitu* 'that (be)' with inflection verb *tersebut* 'mentioned' and the usage of noun as a verb. The substitution of inflectional verb is also found. Beside those characteristics, Sn SHS deaf students also produce orthographic miss-spelling in trivial number. The detail explanation is elaborated in table 2.

Omissions are mostly found in Sn SHS deaf students' writing such as explicated in table 2 number 1. In number 1(a) the omission are found in the word *nya* in *brosurnya* 'the brochure' that indicate definiteness and the dependent of noun phrase *orangtua* saya 'my parents'. The word *brosur* in the second clause (the one in bracket) is a definite noun that indicate the first *brosur* in the first clause, so it should be completed by the suffix *-nya* to show definiteness of the noun which is equal to 'the' in English. The next word is *orangtua*, this word is incomplete since it doesn't have dependent to explain whose parents are they. This word should be completed by the pronoun saya 'my' into *orang tua saya* 'my parents'. 1(b) shows that the sentences missed out the object and preposition *di* 'in' placed between the predicate *mencari* 'search' and complement internet'. Related the omission in the use of the derivational

adverb, 1(c) shows that the sentence missed out the circumfix *se-....-nya* that derive the adjective *lanjut* into adverb *selanjutnya*. Beside the omission on derivational adverb, there is also omission on derivational verb as in noun *tawa* in 1 (d) that missed out derivational verb *ter-*. Other omission in1(d) is the absence of object as in *kenapa (kamut) tertawa?* 'Why do (you) laugh?'.

The unrequired -nya in the 2(a) is considered as addition since -nya in the sentence do not use appropriately. Another addition is sentence in 2(b) *ada perasaan malu* 'there is a shy feeling' which is more properly changed into *merasa malu* 'feeling shy'. The last addition as shown in 1(c) is the addition on *harus butuh kesabaran* 'need patience' that can be changed into *membutuhkan kesabaran* 'need patience'.

Related to substitution, some cases found are substitution of active verb with passive verb *dikasih* 'is given' instead of active verb *memberi* 'give' in 3(a). *dikasih* that indicate passive form while the sentence context indicates active form. The word *dikasih* should be in active form that is *mengasih*, but this word is lexically inappropriate. The proper lexical item that represents the sentence meaning is the word *memberi* 'give'. The next case is the substitution of apposition *yaitu* 'that is' with the passive word *tersebut* 'mentioned' in 3(b). Another case is the substitution of derivational verb *mendaftar* 'enroll' instead of derivational noun *pendaftaran* 'registration' and the inflectional verb *kirim* 'send' instead of inflectional verb *mengirim* 'sending' as shown in 3(c). Another inflectional verb substitution also appears in 3(d) in the word *dapati* instead of *mendapat* 'got' because suffix –i performs grammatical meaning to indicate; (1) repeated action (2) place of the [base],; (3) 'feel something to' (4) give [base]; (5) make [base] as and (6) do an act to the [base] that do not fit with the sentence context.

Other omission and addition related to the usages of suffix -nya are also found. It is used both correctly and incorrectly such as in the sentence *ketua kelasnya disuruhnya kita menunjukkan nama* '(literally translated) the chief of the class is asked us to mentione his name'. The suffix -nya is used correctly in noun phrase *ketua kelasnya* 'the chief of the class' since it shows definiteness, but it is used incorrectly in the sentence *disuruhnya* '(be) asked', though it is semantically understood but it is nonstandardized and linguistically incorrect because suffix -nya is only attached to noun head. The sentence also shows the misusage of prefix -di in word *disuruhnya* that should be changed into *menyuruh*. The lexical *menunjukan nama* 'showing name' is also appropriate, it should use the more proper word that *ia menyebutkan nama* 'he mention his name'.

Beside the grammatical-morphology violation, there are also some orthographic misspelling such as in the words *susananya* for *suasananya* 'the atmosphere', *selasai* for *selesei* 'finished', and *mengenti* for *mengerti* 'understand'.

# Conclusion

Findings of this thesis replicate previous studies regarding the grammaticalmorphology patterns of deaf college students in its relation with educational background but it does not reveal the influence of sign language preference to the written language performance though it shows a significant relation according to the findings.

This research's finding replicates the previous finding by Fabbreti, et.all (1998) that the deaf Italians are also striking difficulties on grammatical-morphology area and word-order violation. Deaf college students in both of group tend to do errors in the morphological and syntactic level but the error performance is lesser in P SHS deaf students' writing than Sn SHS deaf students' writing. Both of groups are having experiences on omission, addition and substitution of inflectional and derivational morphemes though it is not significant in P SHS deaf students' writing but pretty massive in Sn SHS deaf students' writing.

Educational background may be very influential for deaf students since it evolves students' characteristics. These research findings replicate the previous research done by Stinsin, M.S & Kluwin, T.N (2003) that conducted a research on educational consequences of deaf in alternative school placements categorized into; (1) Separate schools, (2) resources rooms and separate classes (3) general education classes and (4) co-enrollment classes. This thesis only discusses the two of the four alternative school placements since this thesis only focuses on two educational placements that is Public Senior High school and Special needs Senior High School that well represented by separate and general education classes. In relation to the achievement, there are two finding revealed that deaf students in general education class perform better English skills than those in other classes (Kluwin & Stinson, 1993; Reich et al, 1997 in Stinson & Kluwin, 2003). This research finding also reveals that P SHS deaf students who graduated from Public Senior High School perform better performance than those who graduated in Special needs Senior High School. This significant findings needs to take into account without undervalue the quality of Special needs Senior High School since there are many factors that influence deaf college students written language performance.

Concisely, both of students perform some violation patterns of grammaticalmorphology though PSH/O students show better performance than SN SHS students. The results reveal that deaf students graduated from public school and perform oral language have better skill to produce Bahasa Indonesia written language than those who graduated from special needs senior high school and perform sign language. The differences of education model and language modality definitely influence deaf students' writing skill.

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