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HAND SIGNS IN THE LERANING OF TRADITIOINAL ANGKLUNG INSTRUMENTS IN SMA NEGERI 1 BABALAN PANGKALAN BRANDAN

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Abstract - This research is the Use of Hand Signs in Learning Angklung traditional musical instruments in SMA Negeri 1 Babalan. The purpose of this study was to determine the learning process of Angklung traditional musical instruments in SMA Negeri 1 Babalan, to determine the use of hand signs in learning angklung traditional music, to determine the difficulties faced by students from using Hand Signs in learning traditional angklung music at SMA Negeri 1 Babalan, to know the student's learning ability in understanding the use of hand signs in the learning of traditional angklung music in SMA Negeri 1 Babalan. The theory used in this research is the theory of Hand Signs, learning, angklung traditional music, difficulties and learning abilities. The method used in this research is a descriptive method with a qualitative approach which includes several aspects: Observation of observation, interviews, documentation and study of literature. This research was carried out in SMA Negeri 1 Babalan, North Sumatra, located at Jalan Melati number 2 Kec. Babalan City of Pangkalan Brandan postal code 20857 North Sumatra. When this research was conducted from April 2019 to June 2019.

Keywords: Hand signs, Learning, Angklung.

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PRELIMINARY

In the world of education, music is one way to stimulate the mind to support learning. In addition to stimulating the mind, music can also improve concentration and memory, improve cognitive aspects, build emotional intelligence, and others. Music can balance the right and left brain, that means music balances the intellectual aspects as well as the emotional aspects. Students who have received music education from an early age, when they grow up, they will become human beings who have logical, intelligent, creative thinking, are able to make decisions and have empathy.

Many public schools include music subjects as compulsory material and are enriched with extracurricular activities, where the music subject matter taught includes modern music and traditional music. One of the music learned in schools is traditional music. Babalan 1 High School is one of the schools that teaches music art, from the 90s already applying modern music and traditional music.

Indonesian traditional music has the characteristics and uniqueness of each music, both in terms of characteristics, instruments and functions. Indonesian traditional music in northern Sumatra, the music is different from southern and western Sumatra (Minangkabau), so are the Riau Islands and its surroundings, Jakarta (Betawi), West Java (Sundanese), Bali, Kalimantan, also different from music from the eastern region. like Maluku, Minahasa, and Papua.

One of Indonesia's traditional music is angklung from Sundanese people on the western part of Java Island. Angklung is a multicultural tool that has traditionally developed in the Sundadi community of western Java. This instrument is made from bamboo, is sounded by shaking it quickly (the sound is caused by the impact of the tubular bamboo pipe body) to produce a vibrating sound. Angklung will sound melodious and magnificent if it is played together in a compact group. Someone only holds the frame in one hand (usually the left hand) so that the angklung hangs freely, while the other hand (usually the right hand) shakes it to sound. Meanwhile, to play an angklung unit with complete tunes, many players will be led by a conductor.

PURPOSE

- 1. To find out angklung learning at SMA Negeri 1 Babalan Pandan Berandan.
- 2. To find out the use of Hand Signs in learning angklung traditional music at SMA N 1 Babalan Pandan Berandan.
- 3. To find out the difficulties faced by students from the use of Hands Signs in learning angklung traditional music at SMA Negeri 1 Babalan Pangkalan Berandan.
- 4. To determine students' learning abilities in understanding the use of Hand Sings in the learning of traditional angklung music at SMA Negeri 1 Babalan Pangkalan Berandan.

Theoretical foundation

The theory used in this research is the theory of Hand Signs, learning, angklung traditional music, difficulties and learning abilities.

Research Location And Time

This research was carried out in SMA Negeri 1 Babalan, North Sumatra, located at Jalan Melati number 2 Kec. Babalan City of Pangkalan Brandan postal code 20857 North Sumatra. When this research was conducted from April 2019 to June 2019.

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Population and Research Samples

The population in this study were all students of class XMIPA 2 and teachers consisting of 36 students and 1 teacher and 1 school principal.

While the sample in this study were high school students XMIPA2 class of 16 students and 1 teacher.

Data Collection Technique

In this research all the data needed is collected through observation, interviews, documentation, and literature study. The collected data is then processed and analyzed to obtain the results set forth in the form of a thesis.

Data Analysis Technique

This study uses qualitative data analysis techniques collected through observation, interviews, documentation, and literature study. After the data is collected from the results of data collection, the data is analyzed carefully and carefully, to get an accurate and reliable result. Furthermore, the results can be systematically arranged with qualitative techniques and can be seen in the form of scientific reports or theses.

CONTENT

A. General Description and Geographical Location of SMA Negeri 1 Babalan Pangkalan Brandan

SMA Negeri 1 Babalan Is one of the government public schools located at Jalan Melati number 2 in Brandan Timur sub-district Babalan Sub-district Langkat Regency North Sumatra province, has a National School Education Number (NPSN) 10201316, and has received the title of Accreditation A. Has as many teachers 50 teachers, 3 majors, 251 male students, 458 female students, 24 classrooms, 3 laboratories, 1 library. And has an active status in cultural arts subjects which are strongly supported by schools in enhancing the soul of art and cultural love for the nation

To support all activities, the school has the following facilities: 1 principal room, 1 administrative room, 1 Wakasek room, 1 BP / BK room, 1 teacher room, 1 teacher meeting room, 1 UKS room, 1 student council room, 1 guesthouse art teacher / studio, 4 studio rooms (Scouts, Theater, Smapala, PMR), 24 classrooms, 1 Lab. Physics, 1 Lab. Biology, 1 Lab. Chemistry, Lab. Language, 2 Computer Laboratories, 1 Multimedia Laboratory, 1 2-story traffic building, 1 basketball / tennis court, 1 voley ball / ceremony field, 3 student WC / KM places and several WC / KM rooms which are integrated with the teacher's room, the KS room and TU room.

No	Nama	Jabatan
1	Drs. sudiatman, s.pd	Ka. Sekolah
2	Nining wahyuni, s.pd	wkl. Kepala sekolah
3	Nurhaida siregar, s.pd	wkl. Kepala sekolah
4	Dra. faridawati, m.pd	Guru
5	Ratna suliawati,	Guru
6	Saluat siahaan, s.pd	Guru
7	Dra. sri edyarti	Guru
8	Drs. p. siahaan	Guru
9	Adam, s.pd	Guru
10	Dra. inawati karo-karo	Guru
11	Drs. k.p nainggolan	Guru
12	James simorangkir, s.pd	Guru
13	Aspen manik, s.pd	Guru

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14	Boneta br ginting	Guru
15	Sri syafrina, s.pd	Guru
16	Drs. p. silaban	Guru
17	Drs. fajrun najah tanjung	Guru
18	Dra. juni astati	Guru
19	Peringetten	Guru
20	Nurbaya	Guru
21	J. tinambunan	Guru
22	Togap. s.pd	Guru
23	Evi syafinah, s.si	Guru
24	Umar syahputra, s.pd	Guru
25	Elmiati, s.pd	Guru
26	Desy mandasari, s.pd	Guru
27	Putri riza lavia lbs, s.pd	Guru
28	Yugotrisiam, se	Guru
29	M. darwis, s.pd	Guru
30	Melda tampubolon, s.pd	Guru

(Names Of Employees And Teacher Of SMA Negeri 1 Babalan Pangkalan Berandan)



(Group photo of all school teachers and administrators)

B. Learning Angklung In Babalan 1 High School

Music art learning activities are one of the subjects that are very popular with students of SMA Negeri 1 Babalan, music art subjects in MIPA 2 class X at SMA Negeri 1 babalan are held every Monday. Music art subjects in class X each class carried out at different times according to the schedule that has been arranged. At every 2 x 45 minute music art meeting and usually the teacher sees the lesson plan guide (RPP) before starting the class. Traditional angklung musical instrument learning is applied to class X consisting of 7 classrooms, and this research was conducted in class X MIPA 2, amounting to 36 people.

Angklung Learning Process in class, including:

1. Preliminary Activities

a) The Teacher Opens The Lesson

The learning of Angklung traditional musical instrument starts with opening the lesson by giving thanks by praying first. After praying the teacher greets and gives greetings, says good morning, asks how the students are today, and asks about the presence of the students on that day. then the teacher tries to relax the atmosphere before the teaching and learning activities begin. all the preliminary processes were carried out smoothly and the students' responses were also very enthusiastic in the subject of music art. SMA Negeri 1 Babalan had 2 sets of angklung, each set had a 1 octave tone interval, pitched C.

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(Figure the atmosphere when the teacher opens the class with greetings and greetings)

2. Teachers Carry Out Core Learning Activities.

a) The Teacher Explains The History Of Angklung

The teacher starts learning the traditional angklung instrument by describing a brief history of the traditional angklung instrument from before until now in the country of Indonesia, because the angklung instrument itself is a local culture that has become a world heritage, therefore angklung is very popular with many people and is complex to learn .



(Figure the atmosphere when the teacher explained the brief history of Angklung)

B) The Teacher Practices The Right Way To Hold Angklung

Furthermore, students are directed to understand and understand how to hold the correct angklung, first the angklung is distributed evenly to all students, and it should be noted that the number of angklung owned by SMA Negeri 1 babalan is inadequate so angklung is very limited to be held by all students in 1 class. after the angklung is distributed the teacher directs how to hold the correct angklung.



(Figure The atmosphere when the teacher explains how to hold the angklung)

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c) The Teacher Practices How to shake Angkung Correctly

The position of angklkung when held is that the long tube is on the right and the left hand holds the angklung supporting pole divided by the middle, then the short tube is on the left and the right hand holds the angklung's lower pole, the angklung supporting tube, the right hand is under the cause of movement Angklung shaking is done in that section, so that the sound of the angklung that is shaken or shaken sounds more perfect with a fast, powerful shake movement. Furthermore, students are directed to practice shaking angklung together by holding their respective angklung and guidance from the teacher. Then simultaneously shake the angklung together.



(The atmosphere when students practice shaking Angklung)

d) The Teacher Demonstrates The Symbol Of The Hand

After explaining how history, how to hold and how to shake angklung correctly, the teacher then demonstrates how to read the tones in angklung quickly using Hand Signs, where this method is easier to understand and can be played interactively between teachers and students. When the teacher explains how the shapes of the hand symbols are and shows them more fully.

e) Students Playing Angklung Practice

In this process students practice and are required to be able to understand and interpret each note using Hand Signs (hand symbols) quickly through songs led by the teacher, slowly with a slow lento tempo then gradually becomes a tempo (the actual tempo).

3. The Teacher Conducts The Learning Assessment

After the teacher explains the theory and students practice each material provided by the teacher, the teacher conducts angklung exercises and evaluates each student how the students' ability to practice and understand Hand Signs that have been explained and demonstrated by the teacher through the practice of compulsory national songs and songs areas that have been prepared, from this assessment activity the teacher can slowly see students who have difficulty in learning angklung using Hand Signs (symbol of hand movements

4. Teacher Closes Learning

After the material and all forms of explanation have been conveyed, at the end of the class the teacher closes by saying thank you to all students for being able to focus and accept the lesson very well. Then the teacher gives the conclusion of the lesson that has been done today and recalls the subject matter that has been delivered and practiced.



(Teacher explaination the hand signs solmisation)

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C. The Use of the Kodaly Hand Signs Method in Learning Angklung Traditional Music in SMA Negeri 1 Babalan.

At this stage, it is a continuation process of learning the traditional angklung instrument because students will start playing angklung music in accordance with the type of notes held by each student. by the teacher. The tone symbols that the teacher will demonstrate are as follows:

No	Nada	Simbol Tangan
1	Do	Do
2	Re	Re
3	Mi	Mi
4	Fa	Fa
5	Sol	Sol
6	La	La
7	Si	Ti
8	DoOktaf	Do

(ZoltanKodaly's Hand Signs symbol for reading Solmization)

Results of an interview with music teacher at SMA Negeri 1 Babalan. Angklung game using Kodaly's hand signs turns out to require full concentration, so students are required to focus more on the signal from the teacher. Angklung games can also eliminate stress for students who experience social problems, internal family problems and even school problems. So that the eyes of music art students are popular with many students because teaching and learning activities in the classroom are very relaxed and attract students' attention. The following are the Hand Signs Symbols that were demonstrated by the teacher in the traditional angklung music game:

1. Hand signals for the "Do" tone symbol

The teacher explains how the do tone hand symbol in the angklung game uses the kodaly method, which is in the form of a fist that points downwards and is parallel to the chest. Like holding something.

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(Teacher give "Do" Hand Signs)

2. Hand signals for the "Re" tone symbol

The teacher explains how the Re tone hand symbol in the angklung game uses the kodaly method, where the palms are open vertically upright looking up toward the front parallel to the chest like rejecting a door. That's the symbol of the Re Kodaly tone with the symbol of the hand.



(Teacher give "Re" Hand Signs)

3. Hand signals for the "Mi" tone symbol

The teacher explains how the symbol of the Mi tone hand in the angklung game uses the kodaly method, where the open palm is pointing down parallel to the chest. That's the symbol of the Mi kodaly tone with the hand symbol.



(Teacher give "Mi" Hand Signs)

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4. Hand Signs for the Symbol of Tone "Fa"

The teacher explains how the Fa tone hand symbol in the angklung game uses the kodaly method, which is the hand is in a fist but the index finger and thumb form a tick pointing down. That is the symbol of Fa kodaly's tone with the hand symbol.



(Teacher give "Fa" Hand Signs)

5. Hand signals for the "Sol" tone symbol

The teacher explains how the Sol hands symbol is in the game angklung uses the kodaly method, which is open palms to the left side parallel to the chest. That's the symbol of Sol kodaly's tone with the hand symbol.



(Teacher give "Sol" Hand Signs)

6. Hand signals for the "La" tone symbol

The teacher explains how the symbolic hands of the La tone are in the game Angklung uses the kodaly method, where the open palm is pointing forward to form a basin, parallel to the head. That is the symbol of the tone La kodaly with the symbol of the hand.



(Teacher give "La" Hand Signs)

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7. Hand signals for the "Si" tone symbol

The teacher explains how the Si tone hand symbol in the game angklung uses the kodaly method, where the palm of the fist is facing toward the face but the index finger and thumb are open pointing towards the ceiling. That symbolizes the tone of the kodaly with the symbol of the hand.



(Teacher give "Si" Hand Signs)

8. Hand signals for the "Do Octave" Tone Symbol

The teacher explains how the symbolic Do octave tone hand in the Angklung game uses the Kodaly method, where the hands are clenched again but are parallel to the head and are higher than the lower do notes that are parallel to the chest. That symbolizes the tone of the octave kodaly octave with the symbol of the hand.



(Teacher give "Do Octave" Hand Signs)

In this study the teacher also explained the symbol of the achord harmonization level using the symbol of the hand, this symbol is used when the angklung becomes a musical accompaniment of a song that is played according to the requested achord level. Angklung harmonization is played together namely 3 notes that form an achord, then students shake or shake the angklung together so as to produce harmonization.

a) Drill Method

Then after the teacher explains the material and explains the kodaly hand signs technique the teacher performs the drill method through hand movements into a song so that students are trained to focus on reading kodaly's hand signs in accordance with the song melody desired, the value of the notation will be visible and visible from how long the tone symbol is held before changing to the tone or the symbol of the next hand, as well as fully with the tempo, the value of notes and harmonization in the song, which is in the control conductor / conductor who leads the song using hand signs this.

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(Teacher Explanation the harmonization oh hand signs For Angklung tradisional Music)

D. Difficulties Faced by Students in Using the Kodaly Hand Signs Method.

After conducting an interview with the Babalan 1 High School Teacher in charge of music art, namely Mrs. Melda Tampubolon S.Pd on Monday, May 6, 2019 at 13.05 WIB in the Babalan 1 teachers' office room, I asked a few questions in the interview about Difficulties faced by students of class X MIPA2 in angklung learning using (hand signs) symbols of kodaly's hand movements, including the difficulties faced by teachers and students are:

a) Internal Factors:

- 1. Students are not focused and it is still difficult to interpret the symbol of the tone and the symbol of harmonization given by the conductor so that they make mistakes in sounding the melody / angklung melody that is not a symbol of their tone (intelligence / cognitive). The right solution is the teacher repeats the symbol of the hand symbol from the beginning until all understand the notes given from the gesture.
- 2. Students late in attack enter the angklung tone they hold related to the tempo and the value of the notes that are demonstrated by the teacher, which should have shaken the angklung but late shook the angklung (affective / taste). The solutions provided should be more teachers practicing the rhythm patterns and beat values in music theory so that students are more sensitive to attacks starting or ending a song.
- 3. In the harmonization game some students do not understand at the level of the given achord because they still do not understand which part they must enter at the level of the achord according to the tone held by each (intelligence / cognitive). The solution that should be given by the teacher is to memorize the level of harmonization / chord progression in music theory to students more often so that they memorize and understand clearly about the harmonization.
- 4. Students who sit in the back do not clearly see the signs of the teacher's hand (hand signs) so they do not focus on shaking the angklung and the playing tone is no longer in accordance with the tempo and rhythm in progress (psychomotor). Angklung learning should be done in a standing position so that everything can be seen from their respective positions.

b) External Factors:

- 1. Some students lack energy in sounding (shaking) angklung so that the sound produced is not full and not tunable (psychic). The solution given by the teacher should encourage students to make more effort in shaking angklung to be more powerful and to practice how to shake angklung with a longer duration.
- 2. Lack of equipment / media owned by the school so that not all students can hold angklung, there are some damaged angklung (facilities / infrastructure). The right solution

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is for schools to complete the facilities in learning music without distinguishing between obscure and other lessons, so that students feel more comfortable in learning.

3. Learning activities in the classroom are slightly disrupted because classrooms are on the side of the road (school environment). The right solution is, the school should pay attention to the condition of the class that is on the side of the road and build a fence between the road and the class noise of the road does not interfere with the learning process so that the classroom is more comfortable to be used in teaching and learning.

E. Learning Ability Students Understand The Kodaly Hand Signs Method In Learning Angklung Traditional Music.

NO	Nama siswa	Rata- rata kemampuan (50-90)
1	ADE AYU PUSPITA	80
2	ALRIFKY ALIF FADLA	81,25
3	ANGGI	80
4	ARKAN MUTSLINA HASIBUAN	81,25
5	AZHAR MARWAN	82,50
6	BRYAN LUMBAN TOBING	78,75
7	CINTAMI OKTAFIADI	72,50
8	DELA SUCI SUTISNA	76,25
9	DELVIA PERATA ZAI	75
10	DINDA ASTI FEBRIANTY	73,75
11	DINDA AYUNI	75
12	FILBERT DURAN 80	
13	IBNU FAQRI 85	
14	IKA PURNAMA SARI	73,75
15	IKHWANUL ADENIN	87,50
16	JUNIOR S.M. PANJAITAN	87,50
17	ZEFRIZAL DOLOK SARIBU	90
18	OCKY DANIEL NAIBAHO	90

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In a study conducted over a period of 2 months in SMA Negeri 1 Babalan in MIPA 2 class X in Pangkalan Berandan city in learning Angklung traditional music using Kodaly Hands Signs, many things were obtained regarding the ability of students to learn traditional angklung musical instruments One of them is the ability of students to understand and play Angklung using hand signs. The following table names the students of SMA Negeri 1 Babalan class X MIPA 2 who took music music subjects as well as the results of research on students' abilities in learning traditional angklung music using hand signs:

Description of Angklung ability Assessment Results

1. Very Good = 80-90 (11 person) 2. Good = 70-79 (7 person) 3. Good Enough = 60-69 (0 person) 4. Not Good = 50-59 (0 person)

From the student Angklung Ability Indicator table above, it can be concluded that group 2 understands very well the hand signs than group 1 which first used angklung and follows the angklung game description from both groups:

- 1. students are able to observe and interpret the kodaly's hand signs appropriately.
- 2. Students are able to remember and play the tone symbol given by the teacher through hand movements.
- 3. Students are able to play melodilagu using hand movements led by the teacher.
- 4. Students are able to play songs using Kodaly Hand signs with the right tempo and attack.
- 5. Students are able to play songs with good harmony and cohesiveness.
- 6. Students are able to read the level of harmonization using hand signs well.
- 7. Students are able to express angklung shocks well.



(Figure Interview with Music subject teacher)

CONCLUSIONS AND RECOMMENDATIONS

From the results of research and discussion on learning, the conclusions will be briefly explained in the study conclusions and discussions as well as suggestions from this study. The conclusion is an outline that needs to know clearly what and how the results have been obtained during the study. While suggestions are ideas and ideas from the author after seeing learning with all problems.

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A. Conclusion

Descriptions made from Chapters I to Chapter IV will be drawn from research results. The conclusion is to answer the main problems of research on Hand Sings in learning Angklung traditional music in SMA Negeri 1 Babalan, therefore researchers make several conclusions, namely as follows:

- 1. Angklung Learning Process is the teacher explaining the history of Angklung music, the teacher practices how to hold angklung correctly, the teacher practices how to sound the angklung correctly.
- 2. Using Kodaly Hand Signs in the Angklung game, among others, the teacher demonstrates the Kodaly Hand signs symbol in the angklung game for Do, Re, Mi, Fa, Sol, La, Si, and Do octave tones. Students practice the angklung game using the Exercise method, The teacher gives song material using Kodaly Hand Signs Symbols.
- Difficulties encountered in the angklung learning process are students and teachers still find it difficult to interpret the symbol of the hand sign tone and the symbol of the level of harmonization in the angklung game.
- 4. From the angklung assessment indicator table, it was proven that 9 people played very well, and 7 people played well, 0 people were good enough, and 0 people were not good enough.

B. Suggestions

The suggestions from researchers include:

- 1. Seeing the existing media and means for learning traditional music in SMA Negeri 1 Babalan, it is hoped that schools will be able to facilitate teaching and learning of music through adequate musical instruments and should complement traditional musical instruments that do not yet exist or repair damaged musical instruments.
- 2. In music activities at Babalan 1 High School, there is a lack of appreciation from the school as seen from the limited number of teachers who teach music and cultural arts subjects, which is minimal, so far there is only 1 music art teacher to teach all classes in SMA 1 Babalan.
- 3. The lack of facilities and infrastructure even time in musical experience outside of school activities such as the absence of extracurricular activities scheduled, schools should be able to accommodate students' creative talents and ideas through extracurricular Music ensemble activities at the school.
- 4. It is better for the angklung learning process to be carried out in a stand position not in a sitting position in their respective chairs, if done in a standing position the learning is easier to do and more in line with the learning of angklung musical instruments.

REFERENCES

Ali, Matthew. 2006. The art of high school music class X. Jakarta. Erlangga Arikunto, suharsimi.2016. Fundamentals of Educational Evaluation. Jakarta. EarthScript.

Bonoe, Pono. 2013. Music Class Method. Jakarta. PT Index.

Deswita, Yuni 2015. Angklung training for elderly mothers at Soka Foundationm gokkai medan. Field. Medan State University. Thesis.

Djaali 2008. Educational Psychology. Jakarta. Earth Literacy. Djohan.2017. Music Psychology. Yogyakarta. Best Publisher Publisher Hasibuan, Ernita. 2013. Utilization of angklung to accompany the evening song holy at Christmas celebrations in the Protestant Christian church of the high cliff angkola. Field. Medan State University. Thesis.

PRODI PENDIDIKAN MUSIK FBS UNIMED

p-issn: 2301-5349 e-issn: 2579-8200

Irham, Mohamad and Wiyani, Novan Ardy. 2017. Psychology Yogyakarta. Ar-Ruzz Media.

Jihad, Asep and Haris, Abdul. 2013. Evaluation of Learning. Yogyakarta. Multio. Pressindo.

Jamalus. 1981. Music 4.Jakarta. Department of Education and Culture. Kusmargono. 2000. Let's Learn Angklung. Yogyakarta. Liturgical Music Center.

Karl, Edmund. 2016. Techniques on cue. Yogyakarta. Liturgical Music Center.

Noor, Juliansyah. 2011. Research Methodology. Jakarta. Prenadamedia Group.

Pono, Hadi and Josep J. Sullivan. 1995. Indonesian-English expression. 1995. PT Gramedia Pustaka Utama.

Rizky, Diah. 2012. Angklung Learning Using learning methods while playing. Semarang. Semarang State University. Journals.

Sagala, syaiful. 2009. Concepts and Meanings of Learning. 2009. Jakarta. Alfabeta.

Situmeang, Rizki. 2013. The existence of angklung instruments in the parulian foundation 2 field. Field. Medan State University. Thesis.

Sugiyono 2018. Quantitative, qualitative and R&D research methods. Bandung. Alfabeta.

Sukardi, alek and Sulistyowati, sri.1992. The practice and how to play angklung. Jakarta. PT Gramedia Widiasarana Indonesia.

Supriadi, Didin. 2006. The learning model of angklung Sundanese music creation at sanggar saung angklung udjo ngalagena, padasuka bandung west java. Jakarta. FBS Jakarta State University. Journals.

Wulandari, Rina. 2012. Early Childhood Instrumental Aesthetics. Yogyakarta. Wave publisher.

https://www.google.com/search?q=simbol+hands+kodaly&safe / 23 March 2019

https://ilmuseni.com/seni-pert//seni- music/jenis-jenis-alat-musik-angklung / 23 March 2019