Classic Expression: the effect of storytelling in a classical concert for children

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Thesis

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Abstract

The traditional way of classical concerts – i.e. a concert of 1,5 hour, no moving or making sounds, no interaction – is not the way to attract children to classical music. There are different inviting ways to interest children in a classical performance, for example with interaction, participation or storytelling. In this research we investigate if storytelling has an effect on children's enthusiasm for classical music and their likeability of playing an instrument themselves. Furthermore, we assess if this effect is moderated by engagement and/or emotional intensity during the concert. We do this by comparing a story-condition with a technical information-condition, in which the presenter talks about the instruments or the performance location. It is executed in the Classic Express, a concert truck in which laureates of the Prinses Christina Concours, a Dutch competition for young musicians, perform and present classical music for primary school classes. Children answer questions before, directly after and one week after the concert about how much they like the music, if they want to experience it again and if they are interested in playing a musical instrument themselves. During the concert, they fill in emotion meters at different musical points and video's are made to code engagement. The results can support musicians wanting to give engaging performances to children, improve the quality of concerts for this target audience and raise likeability of classical music in young generations.

Key words: audience, children, classical music, concert, storytelling (3-5)

Content

Introduction

In the field of classical music most concerts encompass a traditional way of performing: a musician or group of musicians present their music in a concert hall, for which the wealthy, educated audience regularly pay a substantial amount, with a number of norms to adhere to – not even a cough is allowed – and frequently no commentary is given about the music. Many people feel uncomfortable in this situation or do not even know the step to the concert hall. One of the populations usually not seen in combination with classical music are children (Savernije, 2011; van Aartsen et al., 2018). These traditional concerts are not attractive for children, as they are not acquainted with classical music, they do not know where to listen to or to recognize patterns, and they are not used to sitting still or keep their concentration that long. Playing classical concerts for children accordingly requires a different approach.

Getting in touch with classical music early in life is important, as children are the next generation filling musicians' concert halls. People familiarized with this music from a young age are more likely to be interested in classical music and visiting concerts later in life (Dobrota & Reić Ercegovac, 2016). Preschool children appear to not have an intuitive preference for a certain musical style, popular or classical music (Greer et al., 1974; Peery & Peery, 1986). In fact, preference appears to be determined by exposure, repetition and familiarity, among other things (Dobrota & Reić Ercegovac, 2016; Peery & Peery, 1986). Next to that, sustaining attention and developing understanding while listening to music is a skill that has to be trained (Sims, 2005). The earlier children get in touch with classical music and the more attractive these performances are, the more exposure of this musical style and practice in attention will take place and the bigger the preference will grow. So it is important for musicians to focus on implementing engaging performances for children.

To add, it is not only for the sake of the musical field that children should be interested in classical music, but also for the listeners themselves. This genre has beneficial outcomes on health (Saing et al., 2016), helps fulfilling social, emotional and developmental needs (Arnett et al., 1995; Rubin, 1994), is powerful in recalling emotional memories (Sloboda & Juslin, 2001), and can possibly

increase intelligence and creativity (Djohan, 2006; Merritt, 2003). Rhythm, harmony and melody implicate medical effects (Djohan, 2006; Halim, 2003) and can cause relaxation, reduce anxiety (Fernel, 2002; Haun et al., 2001; Mok & Wong, 2003; Triller et al., 2006) and lower heart rate and blood pressure (Grossman et al., 2001; Hatem et al., 2006; Schein et al., 2001). Certain music even can enhance pain tolerance (Hekmat & Hertel, 1993). Furthermore, music could give a means to express yourself in a way words and language lack (Smith & Sparkes, 2011), which can help children manage emotions and experiences.

Several initiatives started in The Netherlands with concerts specially for children. For example, Concertgebouw organizes family concerts, Muziekgebouw programs babyconcerts and Soundlabs for youth or theatrical performances, and Muziekgebouw Eindhoven also sets up concerts for children from age two. Another prominent initiative is The Classic Express. This is a mobile concert truck organized by the Prinses Christina Concours which visits primary schools to introduce children to classical music. Laureates of this competition play there and one of them also presents the concert, which means that this person tells something about the music, about the truck and concert hall, about the musicians and instruments, and interacts with the children. This is an attractive set-up, as the concert comes to the children, instead of them visiting an overwhelming concert hall. The presenter and interaction make the music accessible and children are able to genuinely experience the music because of the explanation they receive and because of the light and video effects supporting the music. Active ways of music listening, like in the Classic Express, augments musical perception (Fung & Gromko, 2001) and in turn, stimulates learning (Fortuna & Nijs, 2019). The Classic Express appears to be successful, as already more than 130.000 children enjoyed their concerts (Classic Express, 2021).

Until now I discussed initiatives concerned with classical music for children, but there are various ways to do this. I mentioned the Classic Express, where one of the musicians talks the audience through the music, but workshops like the Soundlabs of Muziekgebouw are a different approach in which children can make music themselves. An inspiring approach for me is telling a story in between the music. I came in contact with this method during my time as a musician in

Orchestra Morgenstond. This orchestra consists of conservatory students and bring classical music to the neighborhood Morgenstond in The Hague. The local residents are largely not familiar with classical music and this orchestra makes their music compelling for them by using storytelling. One of the yearly projects is school performances at primary schools. Based on a picture book they act out a story with classical music in between (Sie Dhian Ho, 2016; Sie Dhian Ho & Royal Conservatoire The Hague, 2017). We know that music can support emotions in for example movies (Juslin & Laukka, 2003). In this research we use a narrative to increase emotional intensity, interest and engagement. Both music and a narrative affect mood, so combining these may have a double effect (Pilcher et al., 2014). Also, people frequently refer to semantic meaning in music, known as 'musical semotiotics' (Yee, 2018). It has been found that music indeed transmits meaning, as responses to music are identical to responses evoked by sentences (Janata, 2004). Storytelling could support children to find meaning in the music. This method synthesizes music and words (Tsvetkovskaya, 2020) and is a 'meeting point' between children's world and classical music (Mojsilovic, 2018). Addressing music to children by means of a story can help understanding their music perception (Elkoshi, 2014). It guides children through the sensations that can be felt and the characters that can be followed in the music without explicitly telling them. They know how to listen to the music without people teaching it them. Storytelling targets "evocation, intimate involvement and engagement" (Phoenix & Smith, 2011, p. 5). This seems effective, as I personally noticed that children are drawn into the music and seem to experience it intensely.

If we zoom in on the effects of successfully bringing classical music to children we see several phenomena happening. Firstly, it is remarkable that when children attend a concert specially designed for them, like the storytelling, they seem to have more attention than when it's a traditional concert. It has been researched that a mean to keep children's attention is by active participation and active listening (Sims, 1986). A captivating story would draw more attention than informational text.

Secondly, we reasoned that storytelling makes the experience of the emotions in music easier. Music can evoke memories and subsequently affect feelings (Smith & Sparkes, 2011).

Additionally, music is found to objectify emotional expression (Seashore, 1967) and to induce strong, quick emotions (Kenealy, 1988; Robazza et al., 1994; Rosenfield, 1985). We presume that storytelling influences induced emotion. It is important to clarify the distinction between induced and perceived emotion. Induced emotion is the generated affection – "This music makes me sad" – while perceived emotion is the connotation of an emotion, which is more a perceptual-cognitive ability of understanding (Gabrielsson, 2002). Many researches focused already on the labeling of emotions in music – i.e. happiness, sadness, anger, fear – and the congruency in responses, but in this study we will examine the intensity of emotions, regardless the specific emotion felt. It is important to research emotion in relation to music, as this conjunction is valuable for several fields, such as music education; music therapy; music, health and well-being; music in movies; music and marketing; and music and memory (P. N. Juslin & Sloboda, 2010; Pilcher et al., 2014).

Lastly, it is intriguing to know if storytelling as a way of presenting classical music to children has an effect on their likeability of classical music or eagerness to play an instrument themselves and whether enhanced attention and stronger emotional experience are related to this effect. It harmonizes with the Kantian view that "music is something that acts as a beautiful aesthetic experience that causes some pleasantness in us" (Mojsilovic, 2018, p. 75). We want to research this pleasant experience as a consequence of classical music and investigate if narrating between the music intensifies this pleasantness. Moreover, according to 'the preferences for prototypes model', people have a preference for things which are easy to classify (Martindale & Moore, 1988). Telling a story could help in classifying and make the audience like the music more.

This research takes place at primary schools. It has been found that there is a close relation between music education and liking (Dobrota & Reić Ercegovac, 2016), so the chosen context gives future promise in attracting children to classical music by playing at schools. It is meaningful to identify whether storytelling influences children's likeability of classical music. If so, this could be spread as a successful presentation technique for children concerts. The traditional way of performing does not attract young audiences and these are the future generation visiting concert. Captivating concerts should make classical music familiar to them and this responsibility lays in the

hands of musicians. They would benefit from the knowledge this research provides and many performances can be upgraded by using storytelling. Both the player as the receiver can greatly benefit from the findings of this study. Moreover, if we are aware which processes strengthens children's likeability of classical music in the short and in the long run, musicians can apply this when performing for young audiences. For example, they can work with the attention of children by designing the right duration of a performance, choosing pieces with an ideal length, adding enough variation, and noticing the signs of disengaged listening. Another possibility to work with the insights of this research is to induce emotions in children in various ways in order to raise likeability of classical music. An obvious example is by telling a story, like we are researching, but other means are by use of art or drawing, questions and conversations with children or theatre. Concluding, understanding the effect of storytelling and the underlying processes of engagement and emotional intensity can help musicians to trigger likeability of their younger audiences.

Because of the necessity from the musical field to gain more expertise in performing for and attracting young listeners, this research is concerned with the question whether storytelling has an effect on children's likeability of classical music, their desire to experience such concert again, and their eagerness to play an instrument themselves. Additionally, I will test if the likeability of classical music and wanting to experience the concert again are related to eagerness to play an instrument, and if the three interest measures are related to their engagement and/or emotional intensity. Based on the assumptions mentioned earlier, I hypothesize that narrating a story in a classical concert makes that children like classical music more and are more eager to make music themselves in comparison to telling technical information about the music and instruments. I also expect likeability and wanting to experience it again are related to eagerness to play an instrument, and that the interest measures are related to engagement and emotional intensity. The results of this thesis are preliminary, as only few of the experiments were carried out because of Covid-19. More experiments will take place next months.

This subject also has personal meaning and significance to me. Before I entered the conservatoire I had never thought of another way of presenting my music than playing in front of an

audience the ‘traditional’ way. During the First Year Festival week at the beginning of my Bachelor, my teacher invited me to a workshop of Orchestra Morgenstond, which was the first moment I came in touch with storytelling. From then on, I increasingly asked myself while playing: “How would I play this if I would be in front of an Orchestra Morgenstond audience and with storytelling?” I also came up with stories in my head while playing, which helped me in discovering the different characters of a piece. The benefit of storytelling for me is that when acting out such a story in front of an audience, I get carried away by the energy of the audience and the story, which brings me closer to the music.

However, this is only a personal and subjective experience. No claims about effectiveness of storytelling can be made upon this. I know these occurrences never can be completely proven, but as of my scientific psychological background, I would like to take the challenge of making these experiences as clear and apparent as possible. Experimental research about storytelling in music does not exist yet, so that is why I decided to overcome this gap. With this study, I wanted to know whether the phenomena I experienced as a musician would be consistent and quantifiable and also whether storytelling would have a positive effect on the audience. If so, solid and meaningful advice could be given to all musicians who are concerned with making attractive performances for children. Summing up, this research is inspired on my individual impulses and will influence my future of playing for children, but also the future of widespread musical initiatives.

Methods

Participants

We recruited 87 children between six and nine years old. These were from class three to six in the Dutch system from primary schools Meester Baars in Rotterdam and Hannie Schaft in Zandvoort. There were no exclusion criteria, except absence of consent from the parents and unusable data. We scheduled experiments at four schools, but fulfilled the research at two of them. The others got cancelled because of Covid-19.

Experimental design

This research is a quasi-experimental design with pre-test and two post-tests. There was an experimental group and active control group, which were not randomly allocated. We divided parallel classes to the two different conditions, i.e. class 4A and 4B received different content. Overall, we balanced the distribution of conditions over the grades throughout the participating schools. The experimental groups attended a concert with storytelling between the music and the active control groups the same concert with technical information in between.

Materials

Narratives

The presenter narrated different content to two different conditions. One was a life-like and relatable story we wrote ourselves and the other was technical information about for example the instrument, acoustic, the pieces or the musician in a non-story manner. Both were equally long and both contained the same musical pieces. The texts are depicted in Appendix A.

Music

Different musical pieces were played by guitar, violin and piano: Banjo and Fiddle by Kroll, Preludium of Hollberg's Suite by Grieg, Asturiana by Da Falla, Dabse of Saudade by Dyens, movement 3 of Fantasistücke by Schubert, and Salut d'Amour by Elgar. The pieces contained different tempi, keys, instrumentation, characteristics and qualities, as these parameters respectively influence arousal (Husain et al., 2002), emotion (Kamenetsky et al., 1997), and liking (A. LeBlanc, 1981; A. LeBlanc & Cote, 1983; S. LeBlanc & McCrary, 1983) and we want to present the participants a broad spectrum of musical flavors. Moreover, various types of music can help connecting with different components of the self (Smith & Sparkes, 2006).

Booklet

We collected the measurement materials in a booklet (Appendix B), printed on A5 format in color. The children filled in every page at different time points. The first page was for the name. The second page contained two questions about the likeability of classical music and was completed in the classroom right before the concert. Page three to six encompassed four times the emotion meter questions and were answered during the concert in the Classic Express. Page seven had again

questions about likeability of classical music, which the children filled in right after the concert in the classroom. Page eight again contained these questions and were completed one week after the concert. The last page thanked the children for participating.

Stickers

The booklet contained an A5-size sticker in different colors: green, orange and yellow. Fully excluded children received a booklet with a green sticker, partially included children – only included for the booklet data – received a booklet with an orange sticker, and fully included children – included for the booklet data as well as the video data – received a booklet with a yellow sticker. These stickers were sticked on their belly when they entered the Classic Express. The yellow stickers had a participant number on it, so the behavior could be coded by participant number. Numbers from 1000 to 1999 belonged to participating children and numbers from 2000 to partially participating children. Children were informed that they were going to be filmed.

Standardized classroom instruction

To make sure that every participant received the same instruction, we made a standardized instruction to tell in the classroom (Appendix C). It clarified the thumbs answer scale and invited the children to respond to the likeability questions. Additionally, it contained an explanation of and practice opportunity with the emotional intensity scale. An important message of the instruction was that all answers are right and that the questions should be individually answered.

Background questionnaire

Parents got requested to fill in a questionnaire about background variables. These contained demographic questions, questions about musical experience and education of the child and the family and questions about parental attitude towards music and playing a musical instrument. This questionnaire can be seen in Appendix D.

Measures

Likeability of classical music

We assessed likeability of classical music by asking the following questions:

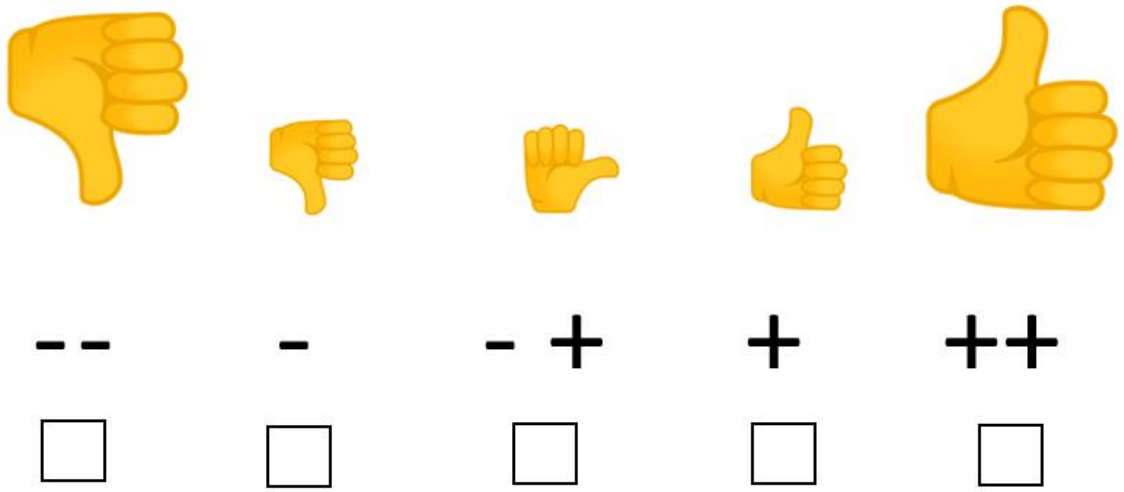
1. Vind je deze muziek leuk? (Do you like this music?)

2. Wil je dit nog een keer? (Do you want this again?)
3. Wil je zelf zo muziek maken spelen? (Do you want to make music like this yourself?)

Children responded on a 5-point scale (Figure 1), with a big thumb down being the worst, a small thumb down being slightly negative, a thumb in the middle being neutral, a small thumb up being slightly positive, and a big thumb up being the best. These thumbs were accompanied by plusses and minuses.

Figure 1

Answer Scale Musical Likeability



The participants answered these questions multiple times. Some questions are omitted or framed differently at certain moments, as can be seen in Appendix B .

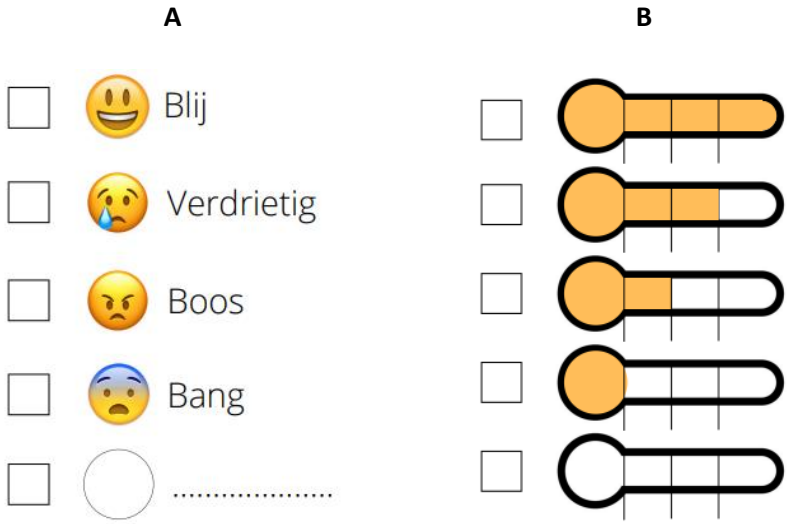
Emotional intensity

To evaluate emotional intensity and assess induced emotion at defined moments, the child selected which emoticon, accompanied by the corresponding label, best fitted the feeling. We chose to use emoticons because it is intuitive and understandable for all ages. Options were happy, sad, angry, scared or other (Figure 2A). This is based on research by Goycoolea et al. (2013) and Juslin & Laukka (2003) who found that musical pieces can provoke basic feelings of happiness, anger,

sadness, fear, and love or tenderness and can be recognized in music by children. They can name emotions in musical fragments without having knowledge of it (Robazza et al., 1994). After choosing the emotion, the child indicated on a 5-point thermometer how intense this feeling was from a little to a lot (Figure 2B). It did not matter which emotion the child felt, as musical works can evoke a wide range of moods and emotions in every listener and external factors have an influence on these (Elkoshi, 2014). Only the intensity was relevant for the research. We still chose to ask children to choose the emotion they felt, in order to make defining the intensity easier for them.

Figure 2

Answer Scale Emotional Intensity



Engagement

Seven musical fragments of the concert were selected to rate engagement of the participants. The parts are carefully chosen and balanced in character, instruments, length, and moment in the musical piece (e.g. beginning, middle, end). Also the emotional intensity meter points are taken into account so that these measurements will not interfere. These are the numbered fragments:

1. Banjo and Fiddle, Kroll: from the middle till the recapitulation. It has a length of 1:20 minutes, involves piano and violin, and the character is dreamy.
2. Holberg Suite, Prelude, Grieg. It has a length of 2 minutes, involves piano, and the character is diverse.

3. Asturiana, Da Falla: from after the emoticon meter moment. It has a length of 1 minute, involves violin and guitar, and the character is sad.
4. Saudade, 2nd movement, Dyens: after the emoticon meter. It has a length of 1:30 minutes, involves guitar, and the character is contemplative.
5. Fantasistücke, Schumann: till the emoticon meter. It has a length of 2 minutes, involves violin and piano, and the character is wild and musically complicated.
6. Salut d'Amour, Elgar. It has a length of 3 minutes, involves violin and piano, and the character is dreamy.
7. Banjo and Fiddle, Kroll: from recapitulation till the end. It has a length of 1 minute, involves violin and piano, and the character is happy.

To measure engagement we adapted the Leuvense Betrokkenheidsschaal (Laevers, 1993, 2003) to make it applicable for a concert setting. This scale targets engagement of children during playing and contains 5 degrees of engagement, with 0 being the least and 5 being the most engaged. We interviewed experienced presenters of the Classic Express about how we could translate this scale to concerts in the Classic Express. First, in an open interview, they described what they regarded as attentive and non-attentive listening signals and second they evaluated the descriptions of the Leuvense Betrokkenheidsschaal from a musical point of view. Subsequently, one of our researchers processed these reports and developed an adapted version: the Classic Expression Concert Engagement (CECE) scale (Appendix E).

To code the children we positioned two camera's with different angles in the Classic Express so that every child was visible on one of the video's. The coding team consisted of three students from Leiden University. They received coding training in three sessions, taught by a Leiden University pedagogy researcher, after which all coders were examined. They independently coded twenty fragments. All accomplished reliable scores with excellent internal consistency (three coders; α = .938) (van Heijst, 2021) and good intra-class correlations (ICC = .834) (Koo & Li, 2016).

Setting

The concerts took place in the Classic Express in order to research within an ecological valid context, contrasting to lab studies. It is a mobile truck of the Prinses Christina Concours with an electronically replicated acoustic. On location, the truck expands into a small concert hall (Figure 3). Three laureates of the Prinses Christina Concours played the concerts: a guitarist, violinist and pianist. One of them also presented the concerts and carried out the story and non-story condition. She is an experienced Classic Express presenter.

Per concert one school class attended the concert, the amount of children varying between twenty and thirty and the amount of accompaniments varying between one and three. We divided the seating's of the audience in two: one area within the field of the camera's and the rest of the spot outside this reach. Two camera's were placed at different angles. Children with yellow stickers (fully included) were placed in the video recorded area. The other children, with a green or orange sticker, were seated outside the reach of the camera's.

Figure 3

The Classic Express

The repertoire they played was Banjo and Fiddle by Kroll, Praeludium from Holberg's Zei by Grieg, Asturiana by Da Falla, Danse from Saudade by Dyens, the third movement from Fantasiestücke by Schubert, and Salut d'Amour by Elgar.

Procedure

The procedure began in the classroom right before the concert where we handed out the booklets and followed the standardized instruction (Appendix C). The questions in the booklets were read out loud. Children who got no consent from their parents to participate in the research still received a booklet to prevent feelings of exclusion. However, after the research, these booklets were destroyed. On the front page they wrote down their name and on the second page their participant number. After the experiment, we removed the front page and processed the data anonymously by participant number. After handing out the booklets we let them hear a soundbite of classical music similar to the pieces played in the concert (second movement of piano trio no. 1 by Schubert), so the children knew we were talking about this kind of music without needing to understand the definition of classical music, in order to keep the measurement valid. Subsequently, they filled in the second page with questions about their likeability of classical music (Appendix B). The questions were read out loud. Thereafter, we explained the use of the booklet and practiced how to fill in the emotional intensity meters (Appendix B). At the end of the instructions we collected all booklets again, to make sure they were stored safely and not lost.

After the classroom introduction the teacher accompanied the children to the Classic Express. At the entrance we gave instructions about the regular procedure of the Classic Express, we appointed children where to sit, based on the color of their stickers, and we handed out their booklets with pens. We checked if all children with yellow stickers were well visible on at least one of the camera's.

The research consisted of an experimental condition and active control condition. Groups of both conditions attended a classical concert with a presenter talking between the pieces. In the experimental condition, the presenter told the story and in the active control condition, the technical information (Appendix A). Both concerts had the same length and lasted approximately 30 minutes.

Emotional intensity was measured at five moments where the music involved a clear mental state (Appendix G). The children filled in the meter during the music. A researcher sat near the stage

and stood up on these moments, showing the number of the question to be answered on a paper. When every child had seen the sign the researcher sat down again.

It is a feature of the Classic Express concerts that children are allowed to ask questions. We structured this into specific moments (Appendix A), so that it did not compromise the measurement of engagement.

After the concert the teacher accompanied the children back to the classroom. There, a researcher continued the standardized instruction and the children filled in page seven of the booklet (Appendix B) with the questions about musical likeability and eagerness to play in instrument. They always answered these questions in the classroom to keep the environment valid. Afterwards, the researcher collected the booklets again.

The responses right after the concert can be distorted because of the enthusiasm and energy the children have, so we asked the same questions again one week later. Additionally, we wanted to have a more long-term measurement of children's likeability of classical music. The same researcher visited the class, handed out the booklets, and proceeded with the last section of the standardized instruction (Appendix C). To remind the children of the concert, we showed a picture of the Classic Express truck. They filled in page eight of the booklet with the questions about musical likeability and eagerness to play in instrument. The researcher assembled the booklets. In the lab we wrote down the participant numbers in the booklets and destroyed all the title pages and the booklets of children without consent.

Pilot

In April 2021 we executed a pilot of the experimental condition with two concerts in the Pi program, which is a musical trajectory for toddlers of the Royal Conservatoire The Hague. The procedure was the same as in the experiments in the Classic Express, except for the sessions in the classroom. The videos gathered in these two concerts were used to train and examine the coders.

Some changes in the methods have been made based on the pilot. For example, at the Pi concert, we asked children if they liked classical music, but they were not familiar with the definition

of classical music, so we reframed this question so that the participants don't need knowledge about this definition.

Ethics

Data will be removed after completion of the research. Sensitive information and videos are stored safely. Booklets of children without consent were destroyed after the concerts.

Ethical approval for the study including the pilot was obtained (Appendix F) by the Ethical Committee of Leiden University. Consent from the parents was asked via Qualtrics. They could choose for full participation of their child, including the video material as well as the booklets, partial consent, in which we only used the data from the booklets, or no consent, in which we did not make video recordings and we destroyed the booklet after the experiments. As there was low response on the Qualtrics, the Ethical Committee allowed us to ask for retrospective partial consent. After the concert, parents received a letter on paper in which they could consent with the use of the booklet data or with no use of any data.

Data analysis

The variables we use have different levels. The independent variable is condition – active control condition and story condition – and this is a binary variable. The dependent variables are likeability of classical music, wanting to experience it again, and eagerness to play an instrument. These are on ordinal level.

These are the hypotheses being tested:

1. H_0: likeability control condition = likeability story condition

   H_a: likeability control condition < likeability story condition
2. H_0: wanting again control condition = wanting again story condition

   H_a: wanting again control condition < wanting again story condition
3. H_0: eagerness playing instrument control condition = eagerness playing instrument story condition

H_a: eagerness playing instrument control condition < eagerness playing instrument story condition

Every hypothesis will be tested for the post-concert data as well as the one-week follow-up data. The test we will use to compare the above-mentioned variables between the condition is an Independent-Samples Mann Whitney U Test. This is a nonparametric test. We will also use this test to examine if there is a significant difference between the condition on pre-test. If so, we should compute difference scores between pre and post-test and execute analyses on these outcomes.

The data of likeability, wanting it again and eagerness to play an instrument will be coded from 1 to 5, 1 being the big thumb down (really not interested), 2 being the small thumb down (slightly not interested), 3 being the thumb in the middle (neutral), 4 being the small thumb up (slightly interested), 5 being the big thumb up (really interested).

Additionally, we will test if there are associations between the interest variables, engagement and emotional intensity. This will be done with Kendall's Tau, which is a nonparametric test and measures associations between variables of at least ordinal level. In this test the three interest variables (likeability, wanting it again, and eagerness to play an instrument) will be added, together with the mean of engagement measures and the mean of emotional intensity.

Results

Descriptives

In the tables below descriptive information of the sample about primary school (Table 1), class according to the Dutch system (Table 2), and division over the story and control condition (Table 3).

Table 1

School Division (N = 101)

School	Frequency	Percentage
Meester Baars	51	50,5
Hannie Schaft	50	49,5

Table 2

Class Division according to the Dutch System (N = 101)

Class	Frequency	Percentage
3	25	24,8
4	24	24,8
5	17	16,8
6	29	28,7
Unknown	6	5,9

Table 3

Division over Conditions (N = 101)

Condition	Class	Frequency	Percentage	
Story		Total	46	45,5
	3	7	15,2	
	4	24	52,2	
	5	8	17,4	
	6	6	13,0	
	Unknown	1	2,2	
Control		Total	55	54,5
	3	18	32,7	

4	0	0,0
5	9	16,4
6	23	41,8
Unknown	5	9,1

From all participants, 38 parents filled in the questionnaire about background information. Three of them (7,9%) play an instrument or sing in a choir, four of them (10,5%) have music lessons (not considering music lessons at school), nine of them (23,7%) have someone in the household playing an instrument, ten of them (26,3%) sometimes listen to classical music, three of them (7,9%) sometimes go to a performance with classical music, thirteen of them (34,2%) get in touch with music at school, and four of them (10,5%) have other experiences with music, not necessarily classical. 35 of the parents (92,1%) would be excited if the child wanted to play a musical instrument and thirty of them (78,9%) indicate that playing an instrument would be possible, with regard to financial resources and willingness of the parents. Of these children, 37 (97,4%) speak mainly Dutch at home, the other one Spanish. Of the seventy parents involved in the questionnaire, five (7,1%) completed primary school as highest education, two (2,9%) VMBO, 26 (37,1%) VWO, eighteen (25,7%) MBO, and nineteen (27,1%) HBO of the Dutch school system. 36 of the 38 children (94,7%) were born in The Netherlands, 58 of the 75 parents (77,3%) were also born in The Netherlands and the others in Suriname (two; 2,6%), Germany (one; 1,3%), Morocco (two; 2,6%), England (one; 1,3%) or somewhere else (twelve; 16%).

Some data were removed because of uselessness, for example invisibility of children in the video coding or disturbance from children in filling in the booklets. Booklets in which two smileys in the emoticon meters were chosen for one question, an open smiley has been recorded.

Assumptions

For the Mann-Whitney U test, one assumption should be met, which is that the dependent variable should be at ordinal or continuous level (Statistisch Handboek Studiedata, 2021). The

dependent variables we use – likeability, wanting it again, and eagerness to play an instrument – have an ordinal level, so this assumption is met. Tests of Normality show that the variables liking classical music and wanting to make music are not normally distributed at pre-test as well as post-test and one-week follow up ($p < .001$). However, for the Mann-Whitney U test, normality is not required.

For the Kendall's Tau test, two assumptions should be met (Leard Statistics, 2022). First of them is that the variables tested should be at ordinal or continuous level. The variables we use for this test – the interest measures, engagement ratings, and felt emotional intensities during pieces – are all on ordinal level. Secondly, it is preferable that the used data have a monotonic relationship. This is, that if one variable increases or decreases, the other variable also increases or decreases (DiscoverPhDs, 2020). This does not have to be in the same direction, in equal rates or in linear manner. This assumption is not a strict one. It is not doable to make scatterplots for every combination of variables and perform correlation tests to check this assumption, so we are not sure this optional assumption is met.

Interest

In this preliminary sample ninety children, of 101 included children, filled in the booklets. The other eleven are missing data. The mean of the pre-test liking classical music is 3.40 and pre-test eagerness to make music 3.77. The mean of post-test liking classical music is 4.44, post-test wanting it again 4.45, and post-test eagerness to make music 3.82. The mean of one-week follow-up liking classical music is 4.34, one-week follow-up wanting it again 4.33, and one-week follow-up eagerness to make music 3.62.

On pre-test, there was no significant difference between the conditions on liking classical music ($p = .931$) and on eagerness to make music ($p = .778$). On post-test, there was no significant difference between the conditions on liking classical music ($p = .442$) and eagerness to make music ($p = .602$). However, there was a significant difference between the conditions on wanting to experience it again ($p = .036$) with children in the story condition having a higher score on this (M =

4.607) than children in the control condition (M = 4.327). At one-week follow-up, there was no significant difference between the conditions on liking classical music (p = .727), wanting to experience it again, and eagerness to make music (p = .194).

Correlations

There are no significant correlations between engagement and the post-concert measures of likeability of the music (τ_b = .044; p = .653) and wanting to experience the concert again (τ_b = .016; p = .872). There is a signification association between engagement and post-concert eagerness to play an instrument (τ_b = .216; p = .022). This is a medium effect (SPSS Tutorials, 2020). There are no significant correlations between emotional intensity and the post-concert measures of likeability of the music (τ_b = .016; p = .868), wanting to experience the concert again (τ_b = .002; p = .981), and eagerness to play an instrument (τ_b = .050; p = .586).

At one week follow-up, there are no significant associations between engagement and likeability of the music (τ_b = .100; p = .306) and wanting to experience the concert again (τ_b = -.031; p = .751). There is a significant relation between engagement and one week follow-up eagerness to play an instrument (τ_b = .229; p = .015). This is a weak to medium relation. There are no significant associations between emotional intensity and one week follow-up measurements of likeability of the music (τ_b = .079; p = .410), wanting to experience the concert again (τ_b = -.004; p =.966), and eagerness to play an instrument (τ_b = .057; p = .541).

Discussion

In this research we investigated if storytelling in a classical concert had an effect on children's interest in classical music, measured by their likeability of classical music, their wish to experience it again, and their eagerness to make music themselves. Next to that, we studied if there was an association between the interest of children in classical music, engagement during the concert, and their felt emotional intensity during the concert. The conclusions are based on preliminary data, as more experiments are to be carried out. I will start with outlining the results and limitations per

research question. Secondly, I will point out general limitations of the study. I will end with improvements for coming experiments of this research, insights for the musical field and advise for future investigations.

We did not find a significant difference between the conditions on interest measures before the concert. This means that the groups are comparable on their starting point. Right after the concert, we found no difference between the conditions on their likeability of the music and the eagerness to make music themselves. However, children in the story condition responded with higher scores on wanting to experience it again than the children in the technical information condition. On this measure, storytelling did have an effect on the interest. After one week, there we no differences between the conditions on all measures of likeability, wanting to experience it again, and eagerness to play an instrument. However, we saw little differences between the groups at post- and follow-up measurement, not big enough to be significant, but this could be because of the small sample.

One of the possible reasons that we did not find a solid difference on the interest measures between the conditions on likeability of classical music and playing an instrument is that the event of visiting the concert truck and listening to live music already makes a big impact and causes raised likeability and eagerness to play in instrument, independently of what the presenter told. This happening possibly has a bigger influence on interest scores than presentation technique, but this research is not designed to make statements about this. Another limitation is that results can be polarized within a class, as children can base their musical preference and behavior on authority figures (Radocy, 1976) like teachers (Dorow, 1977; Steele, 1967) or other adults (Greer et al., 1973), according to the social learning theory. These variables, but also time of the day, drive to discuss responses with peers or pre-given information about the concert, could influence the results. We tried to keep our own behavior during the experiment as constant as possible, but we observed great differences in all mentioned covariates so this could account for diverge outcomes. With our experiences of these preliminary experiments we develop an even stricter format as to gather more reliable results. For future research, it would be interesting to investigate if there are age or

socioeconomic status differences in likeability, as previous studies have found that there is a general decline in liking of classical music with age (Dobrota & Reić Ercegovac, 2016) and that socioeconomic status is related to preference for classical music (North & Hargreaves, 2007a, 2007b, 2007c).

Next to looking at the interest questions in detail, we investigated if there was a relation between the interest measures and the felt emotional intensity during the concert, and between the interest measures and engagement in the performance. Firstly, there were no associations found between engagement and two of the interest measures, namely likeability of the music and wanting to experience the concert again, immediately after the concert as well as one week later. However, there was a significant relation between engagement and eagerness to play an instrument directly after the concert as well as one week later.

During the concerts, we observed different reactions to the control condition than expected. We predicted that the story condition would boost engagement more than the control condition, but we did not see that. We based this assumption on the premise that active listening and participation heightens attention (Sims, 1986). We argued that a story would yield more active listening than a technical text, but this does not have to be true. Children can be interested in the information about instruments and music as much as in a story. This insight should be considered in next researches and performances. A way to pursue with active involvement could be to explore letting the participants choose the music (Pilcher et al., 2014).

A drawback in conclusions about engagement is that there could be big individual differences in attention during listening, because sustaining concentration is a skill that has to be learned and developed (Sims, 2005), so children with more exposure to music and with more practice in this probably have higher engagement scores. Some but not all parents filled in the questionnaire surveying background information, so for these children the relation between attentive listening and previous musical exposure can be checked and accounted for, although previous research showed a negligible influence of formal training and musical stimuli to responses (Elkoshi, 2014). However, those analyses are beyond the scope of this thesis and can be read in the paper of one of the other researchers in the Classic Expression research group. Additionally, another limitation in the

measurements of this variable is that the cameras were visible so children knew they were filmed. This can diminish naturalistic behavior. However, we observed that children pointed at the cameras at arrival, but focused on the stage during the performance and forgot about the video's.

Secondly, in testing the relation between the interest measures and felt emotional intensity during the concert, we found no associations between likeability of the music, wanting to experience the concert again, and eagerness to play an instrument directly after the concert as well as at one week follow-up.

Also in measuring emotional responses there are limitations. Several factors are present which could influence this parameter but we can not control, namely learning, mood, and personal emotions (Sopchak, 1995). These elements could lead to different emotional experiences and more variety in results, although there are mixed results about the effect of untrained and trained musical listeners on emotional responses to music (Tan & Kelly, 2004; Waterman, 1996). Furthermore, it could be that the older age groups understood these assignments better and filled them in more truthfully, as the capability to specify emotions in music advances with age (Robazza et al., 1994). Something not influencing the identification of emotions is musical expertise. It is researched that familiarity with musical structures has no impact on this (Robazza et al., 1994).

It is important to note that these preliminary data may lack reliability. The sample size is small and division over condition in relation to classes unequal. Next to that, children, in comparison to adult participants, make mistakes more often, have a higher chance of forgetting or misunderstanding the instructions, are more influenceable by their peers, don't answer all questions or may be less serious about the responses they give. For example, some children filled in the same answer at all questions and we saw that a few children looked at their neighbors' booklet when filling it in, although the instruction stresses multiple times that these are individual responses and that no answers are wrong. Additionally, this research is carried out in a naturalistic setting so a lot of contingencies happen in the concerts. Data may be biased because of these factors. For example, a whole group had to pie halfway the concert or a teacher disturbed a performance by taking pictures all the time. However, the naturalistic context is also a strength of the study. The ecological validity is

high, behavior and responses of children can be coded in their familiar environment and thus will be the closest to their normal behavior, and results can be convincingly generalized to various concert settings. Also factors which would appear as unwanted influences on our results is competence of the musical ear and cultural background. Conversely, Gregory (1990) found that participants perceived musical lines with equal ability, so there are no considerable differences in what children would perceive in music. With regard to cultural background, Unyk et al. (1992) concluded that songs of different cultures were recognized by their participants, and that all ages could subtract basic emotions in unfamiliar music (Thompson, 2010). All in all, these factors would not have influenced our results.

Limitations in the statistical analyses are also important to take into account when interpreting the data. Regarding the hypotheses we tested in a confirmative manner – concerning the interest variables – , independence of results is not guaranteed. In this setting with carrying out the experiments in classes, data could be biased within a school class, for example because of attention during the instructions, discussion of answers with classmates, attitude of the teacher, pre-given information about the concert, etc. We still executed the analyses so this limitation should be kept in mind in the interpretation.

Concluding, important progress has been made in research to presentation techniques in classical concerts for children. We encourage future research group to use our experiences and developed materials, although we recommend using different compositions to increase generalizability to classical music. From these preliminary experiments we learned several things to improve in next trials. However, we will not change things largely, as the results still should be comparable and gathered in the same way. First of all, we noticed during the concerts was that the presenter was so experienced that she easily improvised in her narrative, instead of adhering to the prescribed text. She will take care of that and make sure that the prescribed text is followed. Another remark with regard to the texts was that in the technical information condition, a violin case was shown, but not in the story condition. This can distort the validity of the research, as this object is something new and will raise curiosity. We will remove this element and only talk about the violin

case without showing it. Second, we observed that teacher supervised the children in very different ways. Some frequently demanded silence, while others did not control children or even disturbed the concert themselves by taking pictures. In next experiments we will request teachers to not be in the Classic Express or remain passive. Instead, an attendant of the research group will correct extreme behavior. The operational definition of extreme behaviors and how to react on it will be explicitly specified. The presenter should not be involved in this. Third, we encountered that classes were prepared for the concert in different degrees. This can effect their expectations and behavior. We will write an instruction for the teachers on what to tell the children about the concert so that all participants will be informed similarly. Fourth, while coding the behavior from the video's, some participant numbers were not visible because children did not put their booklets back on the ground after the emotion meter measurements. In next experiments, the attendant will make sure all booklets will be put away after children finished their responses.

It is clear that more data are necessary to improve above-mentioned limitations. Other theses will be written of our research group after carrying out more experiments. However, we also suggest to execute other studies related to this subject but with different foci. The set-up, materials, procedures and experiences of this investigation are a valuable source for next projects. An example of possible future research could be about factors besides presentation technique influencing musical preference. Among those are exposure and repetition, as mentioned in the introduction, but also a beneficial classroom situation with positive social reinforcement and favorable modeling (Peery & Peery, 1986). The concept investigated here is useful for exposure and repetition, but is not in detail designed to ameliorate social reinforcement and positive modeling. This could be augmented in future music projects for children. Additionally, next to looking into musical preference, musical taste could be delved into. There is a difference between these concepts. Musical preference refers to the momentary liking of certain music, while musical taste is more long-lasting (Hargreaves et al., 2006). Maybe presentation techniques have distinct effects on these concepts. Furthermore, the contribution of being a trained or untrained musical listener could be explored more in depth in next studies. It is also interesting for research to get more into active

listening and the effect it has on engagement, for example with movements corresponding to the music (Sims, 1986) or with visual support of the music like video's. A third suggestion is related to the beneficial effects of music on health (Djohan, 2006; Fernel, 2002; Grossman et al., 2001; Halim, 2003; Hatem et al., 2006; Haun et al., 2001; Mok & Wong, 2003; Saing et al., 2016; Schein et al., 2001; Triller et al., 2006) and possibly intelligence and creativity (Djohan, 2006; Merritt, 2003). As mentioned in the introduction, classical music can cause relaxation reduce anxiety, lower heart rate and blood pressure and lead to regular breathing. To add, it would be interesting to investigate how long this effect remains and how often the musical encounter should take place to profit fully.

Furthermore, it is also interesting to explore if using a narrative influence attentiveness, emotional intensity and musical likeability of adults instead of children, and also what other presentation techniques would influence these factors. As mentioned in the introduction, a narrative could support unfamiliar audiences to find semantic meaning in music (Janata, 2004). Of course playing a concert for an older age group requires a different approach, but it is interesting to see what elements correspond for different ages in their impact on the dependent variables used in this study. Ways of researching this has been shown in the current paper and are encouraged to be used.

To end with a personal note, it always has been a dream to merge my passion for music and scientific research. It was a fantastic opportunity that I could do this during my Master. It was a pleasant challenge to try to measure musical variables as accurately as possible. Frequently, people talk about personal experiences they had or effects they perceived in the audience. However, this is subjective and no definite claims can be made based on these observations. In this research, we tried to quantify effects of musical presentation in order to be able to make underpinned statements about the influence of storytelling on attention span, emotional intensity and likeability of music and musical instruments in children. Based on this, we can advise musicians about making a performance for children and the quality of children's concerts will rise because musicians know how to best approach this. We highly encourage musicians and researchers to learn from this study in order to improve investigations, concerts and projects for classical concerts for children.

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Appendices

Appendix A

Presenter texts: story and control

Every text has two versions: one for the storytelling experiment and one for the control group. After the different texts the same music follows. Note: the texts are in Dutch

1. Story:

Zo meteen gaan we muziek spelen voor jullie, maar het is niet alleen muziek, het is ook een verhaal**.** Het gaat over een broer en zus, Paul en Roos. Paul is 6 en Roos is 9. Ze zijn nogal druk en spelen vaak tikkertje, dan rennen ze en proberen elkaar te pakken te krijgen en als er iemand is getikt gaan ze elkaar vaak plagen en stoeien.…

1. Control:

Zo meteen gaan we muziek voor jullie spelen op instrumenten. Er is een piano en een viool en een gitaar. Je kunt alleen muziek maken maar samen met anderen spelen kan ook. Bijvoorbeeld de viool met de piano. Dat klinkt zo.

Music after 1:

Opening Kroll, 16de loopje…….(zonder inleiding piano/ pizzicati….)

2. Story:

Paul en Roos zijn ook dol op klimmen. En als ze ergens op geklommen zijn, springen ze liefst met een reuzesprong naar beneden.

2. Control:

Martine heeft niet alleen een viool maar ook een strijkstok. Er zitten haren op een strijkstok en daarmee beweegt ze over de snaren.

Music after 2:

Kroll: alleen de eerste frase die naar boven gaat op de e snaar tot en met de sprong naar beneden G-snaar.

3. Story:

Roos en Paul kunnen zo hard rennen omdat ze heel veel voetballen.

Ze doen dat naast de boerderij waar ze wonen. Die boerderij staat vlakbij een heuvel. Aan de andere kant van die heuvel is een dorp waar al hun vriendjes wonen. Dit verhaal gaat over een zaterdag.

Paul en Roos zitten aan het ontbijt als hun moeder wordt gebeld door iemand van de voetbalclub uit het dorp. Paul en Roos kunnen de man goed horen: “Dag mevrouw, we hebben hier een probleem, onze voetbal wedstrijd kan niet doorgaan! Het is een heel raar verhaal, je raadt nooit wat er gebeurd is, maar misschien kunnen Paul en Roos ons helpen!. Presentator: wat denken jullie dat er gebeurd is? INTERACTIE

3. Control:

We zitten nu in de Classic Express. Dat is eigenlijk een gewone vrachtwagen. Hij is ..meter lang en weegt… kilo. Voordat hij werd opgebouwd kon je er van alles in vervoeren. Grote dozen met chocola of meubels. Om ervoor te zorgen dat jullie kunnen zitten zijn er kussens en je ziet dat het mooi is gemaakt. Je ziet dat hij hier helemaal is uitgebouwd. Buiten kan je zien dat er een speciale poot onder dit gedeelte staat. Je ziet hier een piano. Daar speel ik op. Martine speelt viool. En Michael heeft een gitaar. Michael en ik kunnen zitten terwijl we muziek maken en Martine en Michael nemen hun instrument altijd mee. Denken jullie dat ik de piano ook kan meenemen? INTERACTIE

No music after 3

4. Story:

Er is een voetballen dief geweest in het dorp. Alle voetballen zijn verdwenen. Paul en Roos willen natuurlijk helpen. Hoe denken jullie dat ze dat doen? INTERACTIE

4. Control:

Nee, een piano is veel te zwaar om mee te nemen. Dus deze piano blijft hier altijd staan in de Classic Express. Hoeveel weegt hij denken jullie? ITERACTIE

No music after 4.

5. Story:

Ja, door een voetbal te brengen. Maar daarvoor moeten ze wel over de heuvel lopen, want ze kunnen niet gebracht worden, papa en mama moeten die dag boodschappen brengen naar oma.

5. Control:

Hij weegt … kilo. Dat is evenveel als…. pakken melk of ….koeien. Terwijl een viool heel licht is. Die weegt maar …. Dat komt ook omdat hij hol is. En dit is de strijkstok. Die weegt maar …..

No music after 5.

6. Story:

En nu gaat het verhaal beginnen. Roos stond al klaar bij de deur en riep: “Kom Paul, we moeten opschieten, anders zijn we niet op tijd de heuvel over en moeten ze de wedstrijd spelen zonder voetbal.“ Mamma was bezig de boodschappen voor oma te pakken… (Stem van moeder) “super lief dat jullie die voetbal gaan brengen…..als jullie maar goed bij elkaar blijven”. En beloof je dat je goed op Paultje let, Roos?” “Jahaaaaa” zei Roos, en met de voetbal onder haar arm riep ze: tik me dan” tegen Paul en rende weg “Ik krijg je wel” zei Paul.

6. Control:

Het concert in de Classic Express gaat nu zo beginnen. We zijn hier in de enige rijdende concertzaal van de wereld. Deze vrachtwagen kan net als andere vrachtwagens meer dan 100 km per uur rijden. Maar van binnen klinkt hij net alsof je in een concertzaal zit. Dat komt omdat er een galm in is gemaakt. Misschien ben je wel eens in een kerk of een grote hal geweest. Dan merk je dat het geluid langer doorklinkt. We beginnen zometeen met een stuk dat is gecomponeerd door meneer Kroll.

Music after 6: Kroll opening tot middendeel

7. Story:

Ze waren bij de rand van het bos gekomen. Hier ging het pad omhoog tussen hoge bomen.. “Wat is het hier mooi!” zei Roos terwijl ze langzamer begon te lopen. “En het ruikt lekker!” zei Paul. De zon

was warm en ze waren moe van het rennen. Ze hoorden vogeltjes en het geritsel (ander woord) van dieren door de struiken. Er waren hoge bomen, ze keken naar boven naar alle bladeren, bloemen en zagen en hoorden allerlei dieren…. Hoor je ze ook?

7. Control:

Als de Classic Express aankomt bij een school moet de vrachtwagen chauffeur eerst heel goed parkeren. Dat moet op een plek waar niemand er last van heeft. Soms best lastig want het is zo'n grote truck! Soms kan het op het schoolplein of op een grote parkeerplaats. Dan gaat de chauffeur de binnenkant klaarmaken en wordt het dus net als een concertzaal. Er is genoeg plaats voor de muzikanten om te spelen en een hele groep met kinderen.

Music after 7:

Kroll middendeel tot reprise

8. Story:

"Kijk Roos, een paarse vlinder!" Paul wees. "Er zijn er nog meer, wow moet je die rode zien!" riep Roos. Ze hoorden nu ook het geluid van water: klaterend water…Zou dat een waterval zijn? Die wilden ze wel eens zien. Maar daar moesten ze een heel eind voor lopen. Ze zagen steeds meer kleine beekjes die sneller stroomden. *Muziek optie "loopje uit Holberg*". En soms een dier dat opeens weg vluchtte. *Muziek optie: sprong uit Holberg suite"*. En steeds harder hoorden ze de waterval. Ze bleven lopen en zagen het water van alle kanten komen.

8. Control:

Omdat de muzikanten ook dorst hebben is er en klein keukentje om koffie en thee te maken.. De kinderen die soms optreden krijgen ook wat te drinken natuurlijk. Daar kunnen we een beetje uitrusten. Want piano spelen is best vermoeiend. *Muziek optie "loopje uit Holberg"*. Als we klaar zijn met het concert doen we de lampen uit en sluiten de Classic Express af. *Muziek optie: "sprong uit Holberg"*. Dan wordt de Classic Express weer ingevouwen en gaat hij naar een volgende school ergens in Nederland.

Music after 8:

Grieg: Holberg suite, piano solo

9. Story:

Ja, daar was de waterval! Het water spetterde en Roos en Paul werden nat! Er lagen steentjes langs de kant. Paul gooide ze in het water, dat vond hij super leuk! Maar Roos zei “kom Paul, we moeten verder”. Maar Paul had net zoveel plezier en zei: “toe nou, nog even.” Maar Roos was streng: ”Meekomen jij” zei ze en trok Paul mee aan z’n shirt. “Hé, laat los”. Zei hij boos. Altijd speelde ze de baas omdat ze ouder was! Het pad ging steil omhoog. “Hoe lang zou het nog zijn?” vroeg Paul zich af, en tikte Roos op haar schouder om het te vragen. Ze draaide zich om. “Hé, hou ‘ns op!” “Wat nou, ik vraag alleen hoe lang het nog is” Boos liepen ze door totdat ze bij een splitsing kwamen. Je kon links- of rechtsaf. Roos twijfelde. “We moeten geloof ik links, omhoog, de heuvel over.” Paul snauwde “nietes, we moeten rechts.” Dat pad ging naar beneden. “Hoe kom je daar bij? We moeten omhoog. Je ben zeker moe.” “Ik ben helemaal niet moe!”, riep Paul. “Je bent zelf moe. Kijk, je bent zo rood als een tomaat!” “Wat?!” Roos keek Paul kwaad aan, draaide zich om en begon te lopen. Maar Paul bleef staan. Roos liep door en draaide zich niet om. Na een tijdje kon Paul haar niet meer zien. Hij twijfelde, maar nam toen boos de andere weg, omlaag. Zo liepen ze nu apart op een eigen pad. Het begon te regenen. Roos herkende de weg niet meer en maakte zich zorgen over Paul.“Wat erg, dacht ze, “ ik zou op hem passen.” Paul’s pad ging maar even naar beneden en daarna ook steil omhoog. Hij twijfelde. “Zou dit de goede weg zijn?” Na een uur waren ze allebei moe en stonden even stil. Ze voelden zich alleen, misten elkaar en hadden spijt van de ruzie. Ze keken om zich heen maar er was niemand. Het was mistig en je hoorde niets meer.

9. Control:

(Martine laat vioolkist zien) Een viool wordt vervoerd in een vioolkist. Martine gaat die nu laten zien. Je ziet dat het heel zacht is van binnen. Daardoor beschadigt de viool niet. Je kunt de viool vastmaken met een koordje. Op deze plekken kun je de strijkstok bewaren.

Je klikt hem dan zo vast dat hij niet kan bewegn in de kist. Je ziet dat er plek is voor meer strijkstokken. De meeste violisten hebben ook een zachte doek bij zich om de viool schoon te maken

nadat ze gespeeld hebben. Je hebt vioolkisten in allerlei kleuren. Rood, blauw, zwart, maar ook knalgeel. Omdat de muzikanten vaak muziek nodig hebben is daar ook ruimte voor. Kijk in dit vak kun je muziekboeken stoppen. Zo kreukelt het niet en heb je het altijd bij je. Omdat een vioolkist best zwaar is kun je hem op je rug dragen. Dat draagt het net als een rugzak lekker makkelijk.
De buitenkant is gemaakt van stof dat goed tegen de regen kan. Dus je viool kan niet nat worden. Martine gaat vaak op de fiets met haar viool, en dat kan dus helemaal veilig!

Music after 9:

Asturiana De Falla, violin /guitarre

10. Story:

Het was gestopt met regenen. Roos dacht: "Ik moet verder, en zoek zodra ik beneden ben naar de andere weg die Paul heeft genomen. Die komt natuurlijk een stukje verderop ook het bos uit. Zodra ik Paul zie ren ik naar hem toe en zeg dat het me spijt dat ik alleen ben doorgelopen. Ook Paul was verder gegaan. Als Roos me weer ziet zal ik zeggen dat ik het niet zo bedoelde. Als ik zeg dat ik haar rugzak zal dragen tot we weer thuis zijn komt het wel goed. Het pad van Roos werd breder en begon te dalen. Dat was fijn zeg! Paul was op zijn pad nu ook aan het dalen. Laat ik huppelen, dacht Roos; dan vergeet ik dat ik moe ben. Laat ik over de plassen springen, dacht Paul; Dat doen Roos en ik altijd samen.

10. Control:

Hier zie je bladmuziek. Dit is tekentjes die we kunnen lezen en dan weten we wat we moeten spelen op de piano of de viool of de gitaar. (Michael laat zijn muziek zien) Er zijn allemaal bolletjes te zien. Dat noemen we de muzieknoten. De 5 streepjes noemen we een notenbalk. Een bolletje dat hoger staat is op de notenbalk is een hogere toon dan een bolletje dat lager staat. Alle stukken die we spelen zijn bedacht door iemand die de muziek in zijn hoofd had en toen wat hij in zijn hoofd had heeft opgeschreven. Zo iemand noemen we een componist!

Music after 10:

R. Dyens - Saudade 3, 2e deel, gitaar solo

11. Story:

Hoe breder het pad werd, hoe minder bomen er waren. Paul kwam het bos uit bij een veldje. Daar lag het dorp. En je kon zelfs het voetbalveld al zien. Daar, helemaal links, zag hij iemand huppelen. “Roooos!!!”Roos keek op en zag Paul zwaaien en rennen. “Pauul!!!” Ze renden zo hard ze konden naar elkaar toe. En omhelsden elkaar *(gebaar)* en keken superblij.

11. Control:

Om te kunnen muziek maken op een piano, een gitaar of een viool moet je wel wat oefenen. Dat doe je meestal alleen. Maar om samen te spelen moet je ook met elkaar oefenen. Dan ga je een paar keer opnieuw spelen en ervoor te zorgen dat het goed samen klinkt.

Music after 11:

Schumann Fantasiestücke derde deel, tot middendeel. Viool en piano

12. Story:

Ze vertelden elkaar ook hoe naar het was geweest om alleen te zijn. Roos was bezorgd geweest en Paul had Roos zo gemist. Maar, daarna waren weer blij dat ze bij elkaar waren en omhelsen elkaar weer.

12. Control:

Om goed samen te spelen met je goed naar elkaar luisteren en afspraken maken.

Soms moet je even op elkaar wachten of juist wat sneller spelen om bij elkaar et blijven.

Music after 12:

Middendeel Fantasie Stücke Schumann

13. Story:

Ze waren nu bijna bij de voetbalclub. Wat keek iedereen verbaasd toen ze de bal het veld opgooiden! Ze werden toegejuicht en beloond met een ijsje. Al likkend aan haar ijsje keek Roos haar broertje aan. “We moeten wel weer gaan lopen, het is een eind en ik wil niet door het donker.” Paul keek

teleurgesteld, hij wilde graag de wedstrijd zien maar absoluut niet in het donker door het bos. “Oké”, zei hij, terwijl hij zijn rugzak pakte. De weg terug was weer steil, maar het was niet meer zo warm. “Ik ben benieuwd wat we eten vanavond”, zei Roos. Paul keek haar aan, mam kookt vats iets lekker voor ons “het maakt mij niet uit. Ik eet alles en ik duik daarna in mijn bed. “Ja, ik ook”, Roos zuchtte met een glimlach op haar gezegd. En zo liepen ze moe maar gelukkig verder en dachten allebei aan wat ze beleefd hadden. Blij dat het was goed gekomen, en ook nog even aan dat nare moment dat ze alleen waren. En ze droomden over thuis.

13. Control:

De Classic Express rijdt door heel Nederland. Dus hij is ook helemaal in Groningen geweest en in Zeeland en Amsterdam. Per jaar legt hij ….km af. In totaal heeft hij al 3000 kilometer gereden. Wel blijft hij eigenlijk altijd in Nederland. Een paar weken geleden was hij in Limburg. Dat is wel 200 km van hier. De chauffeur doet er 3 uur over om hierheen te rijden. In de grote steden is het wel eens lastig want je moet dan door allerlei smalle straatjes. Tot nu is het wel altijd gelujkt om de scholen te bereiken. Soms moeten de kinderen een eindje lopen met hun juf pf meester, maar nooit meer dan een kwartier.

Music after 13:

Elgar, salut d’amour. Viool/ piano

14. Story:

In de verte klonk het klaterende geluid van de waterval. Even verderop ging het pad weer naar beneden. “Het kan nu niet ver meer zijn!” zei Roos. En ja hoor, na een paar minuten zagen ze hun huis in de verte liggen. Een klein stipje bewoog bij de voordeur. “Ik zie mama!” riep Paul. “Ja, ik ook!” van opwinding vergat Roos hoe moe ze was. “Kom, snel!!” Samen renden ze het pad af, al springend van de een naar de andere kei. Paul maakte de gekste sprongetjes. Roos moest keihard lachen en al giechelend stormden ze hun huis binnen.

14. Control:

Straks zullen de muzikanten hun instrumenten even schoonmaken voor ze weer ingepakt worden. Dat doen ze zonder water en zeep.. Je kan een gitaar of viool niet met zeep boenen, dan gaat het hout kapot. Omdat je hem niet in de wasmachine kunt stoppen moet je natuurlijk oppassen dat je er geen limonade overheen krijgt.

Music after 14:

Kroll, vanaf reprise tot einde. Viool, gitaar, piano

Appendix B

Booklet with measurement materials musical likeability, eagerness to play in instrument, and emotional intensity

Concert boekje

Naam: _____

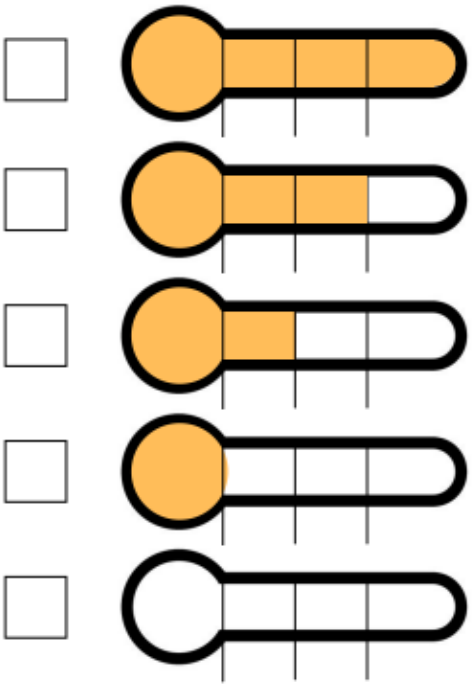
Dit zijn oefenvragen.

A

1) Wat voel je bij deze muziek?

- ☐ Blij
- ☐ Verdrietig
- ☐ Boos
- ☐ Bang
- ☐ .....

2) Hoe erg voel je dit?

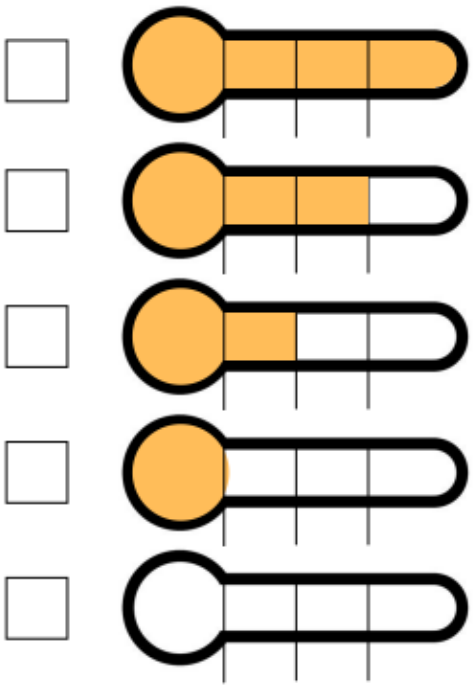


B

1) Wat voel je bij deze muziek?

- ☐ Blij
- ☐ Verdrietig
- ☐ Boos
- ☐ Bang
- ☐ .....

2) Hoe erg voel je dit?



Deze vragen zijn voor het concert

Vragen voor het concert

In de klas

1) Vind je deze muziek leuk?

- -	-	+ -	+	++
☐	☐	☐	☐	☐

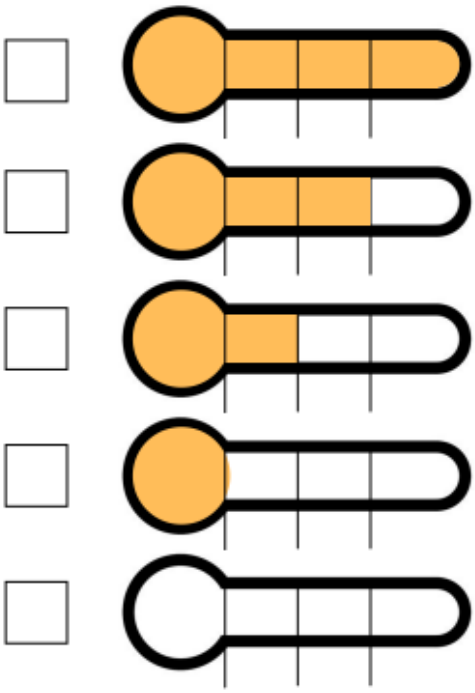
2) Wil je zelf ook zo muziek maken?

- -	-	+ -	+	++
☐	☐	☐	☐	☐

1) Wat voel je bij deze muziek?

- ☐ Blij
- ☐ Verdrietig
- ☐ Boos
- ☐ Bang
- ☐ .....

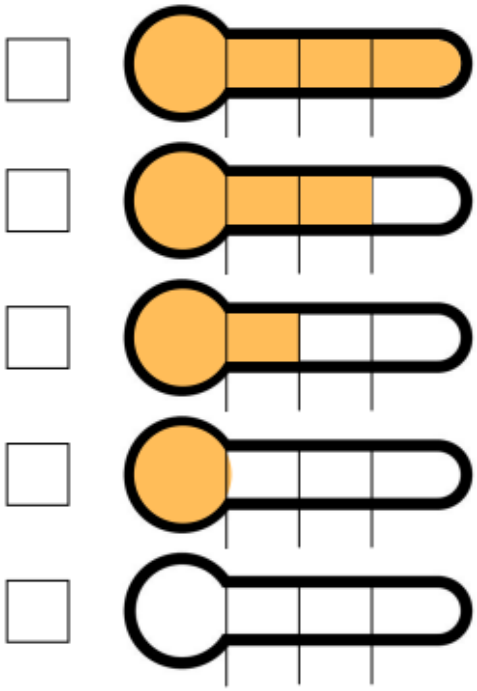
2) Hoe erg voel je dit?



1) Wat voel je bij deze muziek?

- ☐ Blij
- ☐ Verdrietig
- ☐ Boos
- ☐ Bang
- ☐ .....

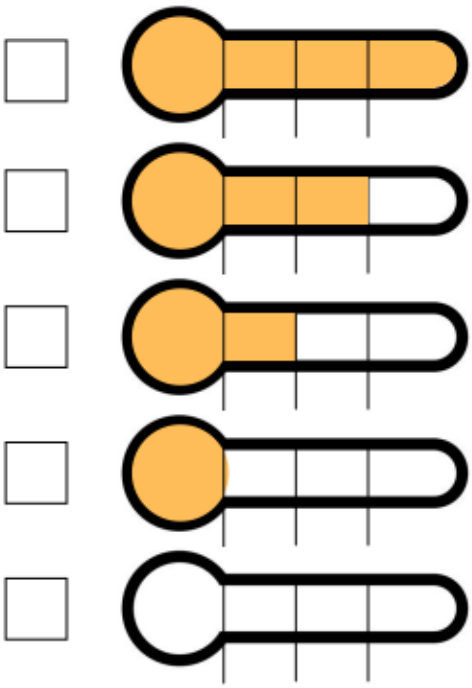
2) Hoe erg voel je dit?



1) Wat voel je bij deze muziek?

- ☐ Blij
- ☐ Verdrietig
- ☐ Boos
- ☐ Bang
- ☐ .....

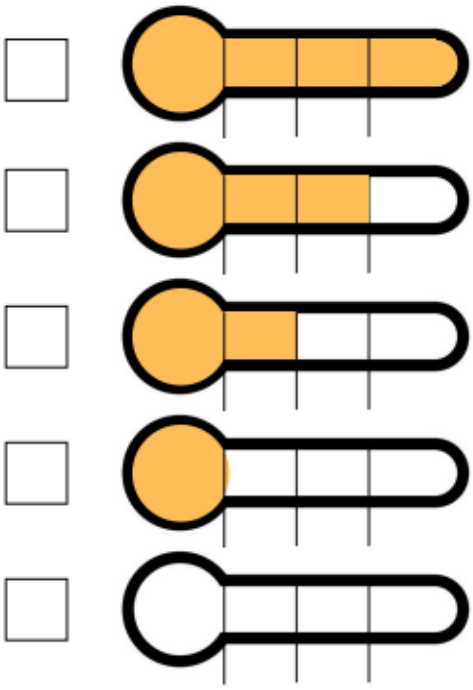
2) Hoe erg voel je dit?



1) Wat voel je bij deze muziek?

- ☐ Blij
- ☐ Verdrietig
- ☐ Boos
- ☐ Bang
- ☐ .....

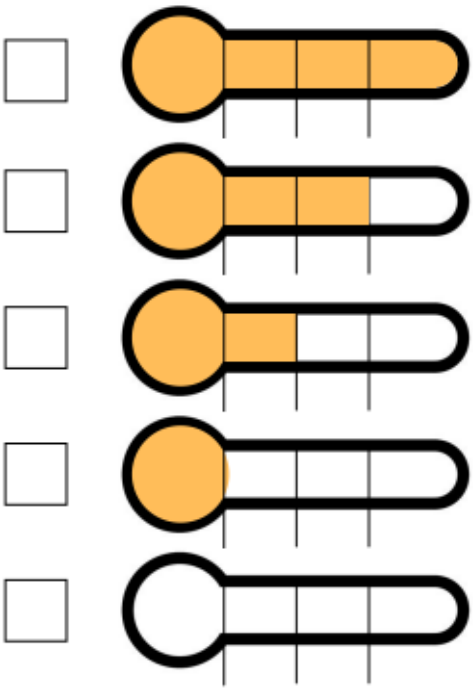
2) Hoe erg voel je dit?



1) Wat voel je bij deze muziek?

- ☐ Blij
- ☐ Verdrietig
- ☐ Boos
- ☐ Bang
- ☐ .....

2) Hoe erg voel je dit?



Vragen vlak na het concert

In de klas

1) Vond je de muziek van het concert leuk?

- -	-	+ -	+	++
☐	☐	☐	☐	☐

2) Wil je dit nog een keer?

- -	-	+ -	+	++
☐	☐	☐	☐	☐

3) Wil je zelf ook zo muziek maken?

- -	-	+ -	+	++
☐	☐	☐	☐	☐

Vragen na het concert

In de klas een week na het concert

1) Je bent vorige week naar een concert geweest. Vond je de muziek leuk?

- - | - | + - | + | ++

☐ ☐ ☐ ☐ ☐

2) Wil je dit nog een keer?

- - | - | + - | + | ++

☐ ☐ ☐ ☐ ☐

3) Wil je zelf ook zo muziek maken?

- - | - | + - | + | ++

☐ ☐ ☐ ☐ ☐

Appendix C

Standardized instructions

These instructions are written to the researchers who will perform the experiment. The research will start with a tryout in the classroom *before* the children do the real experiment in the classic express.

Note: the instructions are in Dutch

Preparations: hang poster of booklet in classroom set up soundbite on phone + music box: https://open.spotify.com/track/2Me2XD4uYASTPgjMsxqDKS?si=vAWT1TM-S3iisSlv6ZVCZA&utm_source=copy-link (stop op 0.23 of op 0.44) .

Before the concert in the classroom

We gaan vandaag een onderzoek doen in de Classic Express. Dat is een rijdende concertzaal van het Prinses Christina Concours. Tijdens het concert zal de presentator ook dingen vertellen, met stukken muziek die erbij horen. Jullie maken tussendoor opdrachten en er staan camera's in de concertzaal. Jullie krijgen bij de concertzaal een gekleurde sticker en we zeggen jullie waar jullie mogen zitten. Wij hebben jullie ouders verteld over het onderzoek en jullie mogen altijd stoppen of weggaan.

Voordat we daaraan beginnen delen we eerst de opdrachtenboekjes uit. Iedereen krijgt een eigen boekje. Die moet je heel goed bewaren en niet kwijtraken of verwisselen met het boekje van iemand anders. Jullie nemen straks zelf je eigen boekje naar de concertzaal en ook weer terug. Jullie krijgen ook een pen van ons.

Hand out pens and stencils

We laten jullie eerst een stukje muziek horen en stellen we daarna 2 vragen. (YouTube afspelen, 1 minuut). Nu gaan we 2 vragen aan jullie stellen. Je maakt de vragen zelf en alle antwoorden zijn goed. Die staan op de tweede bladzijde van het boekje dat jullie hebben gekregen. De eerste vraag is: "Vind je deze muziek leuk?" Je kan dit antwoorden door een kringetje te zetten om een duim. De grote duim omlaag betekent dat je deze muziek heel erg niet leuk vindt. De kleine duim omlaag

betekent dat je deze muziek een beetje niet leuk vindt. De platte duim betekent dat het je niet uitmaakt. De kleine duim omhoog betekent dat je deze muziek een beetje leuk vindt. De grote duim omhoog betekent dat je deze muziek heel erg leuk vindt. Alle antwoorden zijn goed. Je mag de duim omcirkelen die laat zien hoe leuk of niet leuk jij deze muziek vindt.

Dan gaan we naar vraag 2: “Wil je zelf ook zo muziek maken?” Weer mag je een rondje zetten om de duim die laat zien of jij zelf wel of niet een instrument wilt spelen. De grote duim omlaag betekent dat je echt niet een instrument wilt spelen. De kleine duim omlaag betekent dat je liever niet een instrument wilt spelen. De platte duim betekent dat het je niet uitmaakt. De kleine duim omhoog betekent dat je misschien wel een instrument wilt spelen. De grote duim omhoog betekent dat je heel graag een instrument wilt spelen. Alle antwoorden zijn goed. Je mag de duim omcirkelen die laat zien hoe graag jij zelf een instrument wilt spelen.

Dank jullie wel! Nu gaan we naar het tweede onderdeel.

Tijdens het concert wordt er muziek gemaakt en wij zijn heel erg benieuwd hoe jullie die muziek voelen. Daarom hebben we vragen gemaakt en die gaan we zo alvast een keertje oefenen, zodat je tijdens het concert weet wat je moet doen. Maar tijdens het concert zijn er geen tafels. Je legt dan je boekje bij je voeten en pakt hem op als de presentator dat zegt. Dat oefenen we nu ook alvast, dus jullie mogen je stoel van je tafel af schuiven en je boekje bij je voeten leggen.

Tijdens het concert, gaan jullie luisteren naar muziek. Soms gaan we midden in een stuk aan jullie vragen om 1 bladzijde van het boekje in te vullen. Ik zal heel duidelijk aangeven wanneer jullie een vraag moeten beantwoorden en welk nummer. Dat laat ik zien met het aantal vingers die ik op steek, kijk zo: *(vingers opsteken).* Pak je boekje maar.

Sla maar bladzijde A open van het boekje. Zo zien de opdrachten eruit. Hij staat ook hier op deze poster. Eerst willen we aan jullie vragen of je iets voelt. Je kunt een kruisje zetten in “ja” of “nee” (*wijs aan*). Als je helemaal niks voelt door de muziek en nee hebt ingevuld, ben je nu klaar. Als je wel iets voelt, ga je door naar de volgende vraag (*wijs aan*). Daar moet je een kruisje zetten in het vakje voor het gevoel die het beste past bij hoe jij je voelt. Als je het niet zo goed weet, of als je denkt dat ze allemaal niet passen, kun je ook de lege cirkel onderaan aankruisen (*wijs aan*). Nadat je een gevoel

hebt gekozen, kruis je bij de thermometer in hoe erg je dat voelt. Als je een gevoel maar een beetje voelt, kies je bijvoorbeeld de thermometer die tot 1 streepje is ingevuld. Als je het heel erg sterk voelt, kies je de thermometer die heel veel is ingekleurd. Je kan ook de thermometers die tot het tweede of derde streepje zijn ingekleurd kiezen.

Je kan deze opdracht niet "fout" doen, want er is niet 1 goed antwoord. We willen gewoon graag weten wat jij vindt, en als dat iets anders is dan iemand anders, is dat dus helemaal niet erg. Je mag tijdens het invullen van de vragenlijsten niet overleggen met je klasgenoten, of hun antwoord overschrijven.

In totaal gaan we in het concert jullie 5 keer zeggen om de vragen te beantwoorden. Ik laat dat dan zien door op te staan en mijn vingers in de lucht te houden (*voordoen*). Het kan zijn dat je sommige smileys dus nooit gebruikt, of misschien dat je een smiley vaker dan 1x kiest. Dat mag allemaal!

Hebben jullie nog vragen of zullen we het een keer oefenen?

> Na het oefenen is er weer een kans om vragen te stellen of om hulp te vragen.

<u>After the concert in the classroom</u>

Jullie hebben net het concert gehoord en in de vrachtwagen ook al wat vragen beantwoord. Nu mogen jullie je boekje openen op de zevende bladzijde (Laat op beamer zien en controleer of het klopt bij de kinderen). Er staat bovenop de pagina: "Vragen na het concert: in de klas". Ook deze vragen maak je zelf en alle antwoorden zijn goed.

De eerste vraag is: "Vond je de muziek van het concert leuk?" Je kan dit antwoorden door een kringetje te zetten om een duim, net zoals we deden voor het concert. De grote duim omlaag betekent dat het helemaal niet leuk vond. De kleine duim omlaag betekent dat je het een beetje niet leuk vond. De platte duim betekent dat het je niet uitmaakt. De kleine duim omhoog betekent dat je het een beetje leuk vond. De grote duim omhoog betekent dat je het heel erg leuk vond. Alle antwoorden zijn goed. Je mag de duim omcirkelen die laat zien hoe leuk of niet leuk jij de muziek vond.

De tweede vraag is: “Wil je dit nog een keer?” Weer mag je een cirkel zetten om een duim die laat zien hoe graag je dit nog een keer wilt. De grote duim omlaag betekent dat je het zeker niet nog een keer wilt. De kleine duim omlaag betekent dat je het een beetje niet nog een keer wilt. De platte duim betekent dat het je niet uitmaakt. De kleine duim omhoog betekent dat je het misschien wel nog een keer wilt. De grote duim omhoog betekent dat je het zeker wel nog een keer wilt. Alle antwoorden zijn goed. Je mag de duim omcirkelen die laat zien hoe graag of niet graag je dit nog een keer zou willen.

De derde vraag is: “Wil je zelf ook zo muziek maken?” Weer mag je een rondje zetten om de duim die laat zien of jij zelf wel of niet een instrument wilt spelen. De grote duim omlaag betekent dat je zeker geen instrument wilt spelen. De kleine duim omlaag betekent dat je een beetje niet een instrument wilt spelen. De platte duim betekent dat het je niet uitmaakt. De kleine duim omhoog betekent dat je misschien wel een instrument wilt spelen. De grote duim omhoog betekent dat je heel graag een instrument wilt spelen. Alle antwoorden zijn goed. Je mag de duim omcirkelen die laat zien hoe graag jij zelf een instrument wilt spelen.

<u>One week later in the classroom</u>

Vorige week hebben jullie naar een concert geluisterd in deze vrachtwagen (plaatje laten zien van Classic Express). Kunnen jullie je dat nog herinneren? Wij hebben voor jullie nog een paar vragen daarover. Je mag je boekje openen op de 1 na laatste bladzijde. Er staat bovenaan: vragen na het concert: In de klas een week na het concert. (Laat op beamer zien en controleer bij kinderen of het klopt.) Jullie maken deze vragen voor jezelf. Alle antwoorden zijn goed.

De eerste vraag is: “Je bent vorige week naar een concert geweest. Vond je de muziek leuk?” Je kan dit antwoorden door een kringetje te zetten om een duim. De grote duim omlaag betekent dat je het zeker niet leuk vond. De kleine duim omlaag betekent dat je het een beetje niet leuk vond. De platte duim betekent dat het je niet uitmaakt. De kleine duim omhoog betekent dat je het een beetje leuk vond. De grote duim omhoog betekent dat je het heel erg leuk vindt. Alle antwoorden zijn goed. Je mag de duim omcirkelen die laat zien hoe leuk of niet leuk jij de klassieke muziek vond.

De tweede vraag is: “Wil je dit nog een keer?” Weer mag je een cirkel zetten om een duim die laat zien hoe graag je dit nog een keer wilt. De grote duim omlaag betekent dat je het zeker niet nog een keer wilt. De kleine duim omlaag betekent dat je het liever niet nog een keer wilt. De platte duim betekent dat het je niet uitmaakt. De kleine duim omhoog betekent dat je het een beetje wel nog een keer wilt. De grote duim omhoog betekent dat je het heel graag nog een keer wilt. Alle antwoorden zijn goed. Je mag de duim omcirkelen die laat zien hoe graag of niet graag je dit nog een keer zou willen.

De derde vraag is: “Wil je zelf ook zo muziek maken?” Weer mag je een rondje zetten om de duim die laat zien of jij zelf wel of niet een instrument wilt spelen. De grote duim omlaag betekent dat je zeker geen instrument wilt spelen. De kleine duim omlaag betekent dat je liever niet een instrument wilt spelen. De platte duim betekent dat het je niet uitmaakt. De kleine duim omhoog betekent dat je misschien wel een instrument wilt spelen. De grote duim omhoog betekent dat je heel graag een instrument wilt spelen. Alle antwoorden zijn goed. Je mag de duim omcirkelen die laat zien hoe graag jij zelf een instrument wilt spelen.

Dank jullie wel! Jullie mogen je boekje dichtdoen en bij ons inleveren.

<u>General guidelines</u>

- Er mogen geen woorden over waarde gebruikt worden (zoals leuk, saai, stom).
- Er mag niks over de Classic Express gezegd worden.
- Er mag niet buiten de vragen om met de kinderen gepraat worden.

Appendix D

Background questionnaire for the parents

1. Op welke school zit uw kind? _____ 2. In welke groep? _____

3. Wat is de naam van uw kind? _____

4. Wat is de leeftijd van uw kind? _____

5. Wat is het geslacht van uw kind? ◯ Jongen ◯ Meisje ◯ Wil ik liever niet zeggen

6. We willen graag weten of uw kind ervaring heeft met klassieke muziek. Geef alstublieft in de onderstaande lijst aan waar uw kind ervaring mee heeft (meerdere antwoorden zijn mogelijk, niks invullen is ook een optie)

◯ Het kind speelt een instrument of zingt in een koor

◯ Het kind volgt muzieklessen buiten school (de schoolse muzieklessen niet meegerekend)

◯ Iemand in het huishouden speelt een instrument.

Namelijk: ouder – verzorger – broer – zus – anders:

◯ Het kind luistert wel eens naar klassieke muziek

◯ Het kind gaat wel eens naar een klassiek concert

◯ Het kind gaat wel eens naar een voorstelling met klassieke muziek

◯ Er wordt op de school van het kind aandacht gegeven aan klassieke muziek

◯ Anders: …

7. Zou u enthousiast zijn als uw kind een muziekinstrument zou willen spelen?

◯ Ja ◯ Nee ◯ Geen mening

8. Als uw kind nu een muziekinstrument zou willen leren spelen, zou dat kunnen? (daarbij kunt u denken aan financiële middelen, bereidheid van opvoeders, etc.)

◯ Ja ◯ Nee ◯ Weet ik niet

9. Welke taal wordt er thuis het meest gesproken? _____

10. Welk onderwijsniveau heeft u afgerond? Bij meerdere opvoeders: zet een 1 bij het onderwijsniveau van de ene opvoeder en een 2 bij het onderwijsniveau van een tweede opvoeder.

◯ Basisonderwijs
◯ VMBO
◯ HAVO
◯ VWO
◯ MBO
◯ HBO
◯ WO/Universiteit

11. Waar zijn de gezinsleden geboren? Zet een 1 bij het geboorteland van een opvoeder, een 2 bij het geboorteland van een eventuele tweede opvoeder en een K bij het geboorteland van uw kind

◯ Nederland
◯ Nederlandse Antillen
◯ België
◯ Duitsland
◯ Engeland
◯ Eritrea
◯ Indonesië
◯ Irak
◯ Marokko
◯ Molukken
◯ Suriname
◯ Syrië
◯ Turkije
◯ Verenigde Staten
◯ Anders: …

12. Wat is de thuissituatie? (vul een getal in op de lijn)

… biologische ouder(s)
… stiefouder(s)
… pleegouder(s)
… broer(s)

… zus(sen)

Anders: …..

13. Opmerkingen over uw antwoorden of over de vragenlijst: _____

Appendix E

Classic Expression Concert Engagement (CECE) scale

Signals of engagement

The assessment of engagement can be guided by a number of characteristic child behavior. These signals are not necessarily all shown at the same time to identify engagement. A child that is engaged can show the following characteristics: Concentration, energy, complexity, creativity, mimic features, posture, persistence, exactness, verbalization, satisfaction.

1. Concentration

Concentration is one of the signals of engagement that can be seen most clearly. Someone who is doing something in an engaged way is focusing his or her attention on the musician. Distraction will not occur easily. There is a high persistence level. Only intense incentives from the environment can possibly distract him or her. An important focus of the observer are the eye movements of the child: does the focus stay on the musicians or is he/she letting go?

	High engagement	Low engagement
Concentration	• Gazing at the stage or musicians • The child can't be distracted easily (for example, not distracted by nearby chatting but distracted only when someone tap him/her)	• Gazing everywhere or not at the stage or musicians.

2. Energy

The child is putting a considerable force and effort in its activity. In other activities a physical component might be striking, for example after a musical climax. Speaking loudly, (calling) after the music. It should however not be about an "energy release". Energy on the mental may appear from the eagerness in which questions are answered, or more abstract, from the (mental) effort that can be seen on the faces. This may be accompanied by red color and perspiration.

	High engagement	Low engagement
Energy	• Reactions in relation to the music (movement, talking to themselves or towards the stage) • Very eager to answer questions • Loud answers and reactions	• Absence of reactions to music when the music is prone to have any (but remember: not all children will recognize this). • Burn out after the concert (when clapping at the final piece). • Loud children, not really following instructions or music.

3. Complexity and creativity

In an engaged activity children are at their best. There is a good balance between what the activity is asking from them and their competences. They use their cognitive and other possibilities to the limit. Complexity is often also including creativity: the child is doing something personal with the questions or music (is adding own elements).

	High engagement	Low engagement
Creativity and Complexity	• Complex or extensive answers to the questions • Asking questions • Making remarks about the music • Making the story their own or expressing feelings related to the music (personal touch)	

4. Facial mimicry and posture

The non-verbal signals of engagement are a great help in the assessment. So we can distinguish between eyes that are dreamy, staring in space, uninterested going for one thing to something else, and a strenuous gaze. The entire posture can be a sign of particular concentration or express boredom.

	High engagement	Low engagement
Mimic and Posture	• Stillness • Sit upright and leaning a little bit forward • Eyes really still • He/she seems to be happy and active • Dreamy listening • Reacting physically to the music	• Focusing on their peers • Looking down • Pretending to be asleep • Looking around, chatting, whispering, shuffle • Passive • Not reacting physically to the music when it is prone to (for example, a change of instrumental technique or rhythm) • Movements not related to the music

5. Persistence

When concentrated all attention and energy are focused. Persistence is about the duration of this concentration. Children who are engaged do not let go of the activity easily and are willing to do an effort. They will not be distracted by their surroundings. The engaged activity is lasting mostly quite a while.

	High engagement	Low engagement
Persistence	- Keeping his/her focus on the musicians for a great part of a piece or a whole piece	

6. Precision

Children who are engaged in their activity show a special care in what they do. They take details in consideration, are dedicated. Non-engaged children are likely to be uncareful, rough etc: they do not mind so much. In the more verbal activities less clear matters like softly spoken words and unfinished phrases stay unnoticed.

	High engagement	Low engagement
Exactness	• Notices details in the music • Listens very well to the questions and answers them.	

7. Response time

The children are alert and respond quickly to the inviting stimuli/incentives. They immediately react and show their motivation to act. They respond promptly to new incentives that occur in the music. Also the impatient "having to wait for their turn to answer the questions" can be regarded as a signal.

	High engagement	Low engagement
Response time	• Fast reactions to changes in the music (this might depends on the piece of music) and questions	

8. Verbalization

Children show by their spontaneous comments that they are engaged ('that was fun!" or "let's have another go!"). Also by describing enthusiastically what they heard/ thought when answering questions, they show a more implicit proof that they were engaged. They say something/ elaborate/ describe what they have experienced.

	High engagement	Low engagement
Verbalization	• Expressing thoughts and feelings about the music when answering questions • Spontaneous talking (to themselves or the musicians) • Spontaneous comments and questions (“fantastic”, “Again?”)	• Speaking with other children (about something else)

9. Satisfaction

Engaged activities are often associated with “enjoying”. The activity that is enjoyed can be varied, but it should be related to experiencing/ letting in the music. Most of the time, joy is implicit but you can observe the child is obviously fascinated. One of the most crucial “inner” characteristics is motivation. The engaged child is interested and captured by the music. Time is flying.

	High engagement	Low engagement
Satisfaction	• Any sign of satisfaction as long as you see gaze at the stage • Usually specially clear at the end	

Scale engagement

Score 5: continued intense engagement

We score a 5 for activities that involve the greatest possible engagement. The child is clearly absorbed in the music. The gaze is almost uninterruptedly focused on the stage. Environmental stimuli do not or hardly reach him/her. Interrupting the child during this activity (by a teacher or another child) is experienced as unpleasant. For score 5, especially the signals "concentration", "persistence", and "energy" must be present to a large extent.

Score 4: Activity with intense moments

We score 4 for activities that correspond to what is described under scale value 3, but in which engagement signals are also present. The child is mainly focused on the music. Because a number of engagement signals are still missing, a scale value of 4 is given. A variant consists of a continued and concentration-related activity (level 5), but there are no signals the child is really engaged in the music (e.g., moving head, reacting to climax).

Score 3: More or less continued activity without engagement signals

During the observation episode, the child is engaged in the music almost continuously. However, real engagement signals are lacking. Rather, they seem to be staring, indifferent, without a great deal of energy. The music doesn't really affect them. Typically, the activity is discontinued if an (attractive) stimulus comes into view. Variant: the child sometimes looks at the stage, and shows some music related movements (head, eyes), but the child also looks around.

Score 2: Frequently interrupted activity

A child scores a 1 when he or she is not interested in the music during almost the entire observation period. For score 2, we can observe moments of interest in the music. However, these periods are often and for a long time interrupted by looking away or dreaming, or focussing on other stimuli (e.g., peers). The child's gaze moves around without staying fixated on the stage.

Score 1: Not interested in the music

This score refers to the moments when the child is not engaged/ interested in the music. There are two variants: In the first one, the child is 'inactive', not alert, staring into space, sitting absently. Often the eyes are only half open or the gaze is empty and fixed at a certain point, without one can

speak of concentration, sometimes even (almost) asleep. Everything around the child escapes him/ her. The other variant is a child that is active, but not interested in the music, but something else. For example: messing around with peers, writing things down.

Appendix F

Ethical Approval Leiden Committee

Universiteit Leiden
Social and Behavioural Sciences

Psychology Research Ethics Committee
Social and Behavioural Sciences
Leiden University

Dr. R.S. Schaefer
Social and Behavioural Sciences
Psychology
Health, Medical and Neuropsychology
Leiden University
Wassenaarseweg 52
2333 AK Leiden

Reference number	2021-09-27-R.S. Schaefer-V2-3443	*Date*	27-09-2021
Subject	Approval	*Telephone*	071 5276661
		Contact	ethiekpsychologie@fsw.leidenuniv.nl

Dear Dr. R.S. Schaefer,

This is to declare that the Leiden University Psychology Research Ethics Committee, Leiden, The Netherlands, reviewed the research proposal with number 2021-09-27-R.S. Schaefer-V2-3443 and entitled: *Classic Expression: Classical music for Children*. The Committee approved the proposal on 27-09-2021.

You now have permission to start this study as approved. Please be aware that if you decide to make any changes to the design, procedures, number of participants, instruments to be used, or changes that affect the privacy impact of this study, you need to notify the Psychology Research Ethics Committee by email (if it is a minor change) or by amendment (if it is a substantial change). In case of any such minor or substantial change, you will need to wait for approval of the proposed change before you can conduct the changed study.

In case of a multi-centre trial, approval is hereby granted for the part that is being carried out at Leiden University, but can only start at the other centre(s) after having obtained a Declaration of Feasibility within the specific centre(s).

With kind regards,
The Psychology Research Ethics Committee

Appendix G

The emotion meter moments indicated in the scores

Banjo and Fiddle, Kroll

Asturiana, Da Falla

Saudade, movement 2, Dyens

Fantasiestücke, movement 3, Schubert

Salut d'Amour, Elgar