MULTIMEDIA MODEL FOR STUDY OF MUSICAL INSTRUMENTS
IN THE FIRST CLASS

M. Dimitrov*

Faculty of Education, Trakia University, Stara Zagora

ABSTRACT
A multimedia model for learning the musical instruments in the first class. The focus of the model is directed towards the pupils. The topics presented on this screen are of the model.

Key words: models, multimedia, musical instruments, screen

Nowadays the use of computers in the educational process is a necessity. It offers significant opportunities for refreshing and illustration of teaching process, tests and experiments. The computers provoke increase of interest in students, initiates an ease and attractiveness in the presentation of teaching material. The new technical solutions could successfully remove the shortcomings in the traditional teaching and increase its quality. Music lessons should not be turned into a permanent repetition of learned tunes or deliberately memorizing of definitions. The main task of the teacher is to diversify the traditional learning process presenting the information in an attractive and funny way. Modern musical education involves emotional impact and activating the interest of young students methods and means, to have a beneficial, natural, serious –funny, innovative and interactive music education. The interest of students to the multimedia interactive educational models is significantly greater than that of traditional training. In music lessons the entertainment and education are factors to ensure success. For the educational purposes, multimedia products have more and more comprehensive application and will occupy an increasing part in the learning process. To the traditional textbooks on music there are more diverse and heterogeneous appendices, posters, MCs, demo CDs, boards with illustrations and pictures; The textbooks are colorful and grab students with multiple color pictures. The multimedia offers more resources. It can combine in one the abovementioned textbook’s components and appendices. Its main advantage is that it is a "complete set" of all necessary didactic means presented in a modern, attractive and impressive for students manner. The teacher focuses students’ attention on a specific educational module. For various reasons sometimes it is necessary the teacher to prepare in advance the teaching material. For its preparation the teacher is required to posses various knowledges and practical skills, imagination, time and resources. Often the competencies described above do not guarantee the development of quality didactic product. The preliminary preparation of a music lesson includes considerable number of activities:

• Planning activities in the lesson
• Learning “getting into voice” exercises
• Listening and analyzing the musical composition
• Audition and learn the songs
• Preliminary preparation of the demonstration material, didactic tools, CDs, MCs and due playback devices
• Playback of musical scores from the textbooks
• Introduction with the metrum patterns
• Elaboration of plan-conspectus

Here are the steps for successful implementation of the lesson. Primary school teacher plans, prepares and implements an effective music class. The key question is:

*Correspondence to: Milen Dimitrov, Trakia University, Faculty of Education, Stara Zagora, e-mail: milendimitrov6@gmail.com; tel: 0887639160
How this lesson to be presented to the students’ attention as an interesting and attractive one, so the children can recognize it as "a great lesson of music in my school". The presented model is an attempt in this direction. This method of work facilitates teacher’s efforts and focuses students’ interest and attention. The little student is immersed in a universe of sounds. Music hearing (in a broad sense) is the perception and understanding of the four basic qualities of tones / height, durability, strength, timbre / and playing different musical elements of artistic expression. Timbre musical hearing is the musical ability that implements acceptance and comparison and definition of equal height, strength and durability musical tones, played by different musical instruments or singing voices. Know the timbre of musical instruments significantly increases the activity of hearing, creates a basis for more stable musical memory, a rich pool of musical experience gained. Enrichment of sound ideas and creating new ones provokes the creative imagination and initiative of the students. The interest and desire for learning new knowledge in the field of music is closely associated with increased motivation for learning. Learning and knowledge of musical instruments is a necessity for students of primary school age. It expands the horizons of the child, enriches its hearing ideas, increases the activity of hearing and creates a basis for a stronger musical memory and musical culture. It is a long lasting and complicated process to learn the timbre of the musical instruments in the context of the orchestra sound. This can be achieved step by step and requires persistence, patience and professionalism. Failure to solve this problem leads to failures in the overall development of students' musical growth. The knowledge of musical instruments is not something completely new for students - some experiences of this nature the children receive in a natural way through their daily contacts with music. During music classes this knowledge is purposefully classified and expanded with a view to build sound skills in identification of specific timbres. National holidays and customs are a natural herald of vitality, magnificence and diversity of timbres. As a technical mean, multimedia requires good computer skills, very good knowledge of the educational model and modern equipment. On the other hand, it facilitates the teacher, makes his work easier, eliminates his "wandering" among the many demonstrative and sounding equipment, ensures attractiveness and presents the information in a different systematic way. The process is reduced to a single-click on the preferred button. In the presented model are incorporated the demonstration, information, game and evaluation activities. In practical terms, the emphasis is on the musical instruments and their groups. As an application of technologies in music education, the focus of the model is directed towards the realization of a new modern students-oriented approach. First grade pupils participate in all phases of the model: the acceptance of the visual and sound information through enrichment hearing associations, represented by models of sounding musical instruments to their specific timbre coloration; playing musical components; reach to the enclosed self-assessment tests. Experienced teacher has the opportunity to significantly extend presented new information about musical instruments in the early objectives of the lesson and to provide additional information intended for children with keen interest in music. The model provides opportunities for expansion with new modules and screens for better use of interactive features on the problem with the study of musical instruments, holidays and traditions, the song repertoire. The main idea is to present in a new way the main sources reproducing musical tones - musical instruments. The electronic aids do not deny or contest the traditional textbook work, demonstration materials and methodical organization of music lessons. On the contrary. It is an auxiliary mean, an teacher’s assistant for lighter work in preparation of the lessons on this topic. The product includes animation, music and games, musical examples, information about the types of musical instruments, grouping them in the way of sound-production, orchestral performances, traditional music festivals and customs issues, questions and tests for self evaluation. For pedagogues facilitation as text documents there are SER and curriculums for preparatory and first grade classes included. In each element of the model are included sound, photographs, video and text. The images are selected so as to form a clear and unambiguous idea of form, size and manner of sound-presented by the instruments.
Available screens:
"Main Menu" Screen
In the main menu there are buttons for each section of the model. Topics presented on this screen are:
Buttons:
1. Musical instruments
3. Holidays, traditions and customs.
4. Curriculum
5. Musical games for children
6. Diagnostic test - Entry Level
7. Intermediate test
8. Baseline test
9. Sample song repertoire for the first class
10. Video

Figure 1. "Main Menu" Screen
Pressing the button a submenu appears with the contents of that section. Each screen is synchronized with appropriate music.
"Groups of musical instruments" Screen
Musical instruments are grouped according to drawing out. First are introduced the musical instruments the children are familiar with from the kindergarten and preparatory classes.
Buttons:
1. Children musical instruments
2. Traditional musical instruments
3. Wind musical instruments
4. Stringed musical instruments
5. Keyboard musical instruments
6. Percussion musical instruments
7. Additional information on musical instrument

Figure 2. "Groups of musical instruments" Screen
“Children's musical instruments” Screen
For each of the instruments there is information about its structure, a way of playing, photo and illustrative material, sound. If you click on the button: "Orchestral performance” sound from children's musical instruments from vocal-instrumental piece from the repertoire for the first class.
Buttons:
1. Triangel / triangle /
2. Drum
3. Tambourine
4. Xylophone
5. Klavisi
6. Maracas
7. Orchestral performance
8. Additional information of the instruments

Figure 3. "Children's musical instruments" Screen

"Traditional Musical Instruments Screen"
Buttons:
1. Bagpipe
2. Wooden pipe
3. Rebec
4. Wooden flute
5. Tambura
6. Drum
7. Orchestral performance
8. Additional information of the instruments

Figure 4. "Traditional Musical Instruments Screen"

"Wind instruments" Screen
Buttons:
1. Flute
2. Clarinet
3. Trumpet
4. Saxophone
5. Trombone
6. Horn
7. Orchestral performance
8. Additional information of the instruments
Figure 5. "Wind instruments" Screen

"Stringed instruments " Screen
Buttons:
1. Violin
2. Cello
3. Contrabass
4. Harp
5. Guitar
6. Balalaika
7. Additional information of the instruments

Figure 6. "Stringed instruments " Screen

Piece orchestra sounds when loading screen.

"Keyboard musical instruments "Screen
1. Buttons:
2. Concert grand piano
3. Piano
4. Organ
5. Accordion
6. Orchestral performance
7. Additional information of the instruments

Figure 7. "Keyboard musical instruments "Screen
“Percussion musical instruments” Screen

Buttons:
1. Gong
2. Vibraphone
3. Tarambuka
4. Drums
5. Orchestral performance
6. Additional information of the instrument

Figure 8. “Percussion musical instruments” Screen

All screens have a hyperlink to the "Main Menu" and "Groups of musical instruments” menu. Applied for training purposes with their flexible structure will contribute to the proper depth acceptance and understanding of the studied musical instruments, their specific timbres, structure and soundmaking ways.

“Musical examples” Screen

Buttons:
1. Fiddle and drum
2. Pipe and drum
3. Accordion
4. Rebec
5. Bagpipe
6. Drum
7. Bagpipes and drums
8. Contrabass
9. Violin
10. Contrabass

Figure 9. “Musical examples Screen”

Presents samples of musical compositions for listening to and accumulation of aural experience. Musical demonstrations are tailored to the curriculum and serve as an effective catalyst in emotional learning process.

"Holidays and Traditions" Screen

Buttons:
1. Information on all holidays / requires Internet connection /
2. Holidays / text file /
3. Koleduvane- Christmas ritual
4. New Year’s congratulations
5. Mummer’s games
6. Lazar
7. Easter
8. St. George’s Day
9. Dimitri’s Day
10. St. Nicholas
"Programs" Screen
Presents examples of Educational programs for music:
1. Prep
2. First Class - in textbook publishing Prosveta
3. First Class - a textbook publisher Bulvest
4. Nuclei, goals and objectives for teaching music
5. State Education Standards

"Musical games for children" Screen
Buttons:
1. Singing Horses
2. Orchestra
3. Indian Music
4. Color the musical instrument
5. Notes and tones
6. Virtual Piano / requires Internet connection /
7. Music House
8. Instruments in the orchestra
9. Who, how it sounds in the orchestra

"Holidays and Traditions" Screen

Figure No. 10. "Holidays and Traditions" Screen

Figure 11 "Programs" Screen

Figure 12. "Programs" Screen
“Sample music repertoire " Screen
For the convenience of teachers in this module are compiled several of the recommended songs for preparatory and first grade.

1. Brala moma Lazare- a traditional folk song
2. Easter Song
3. Tit to marriage
4. Sing me a wonderful slaveyu
5. Soldiers
6. Dooley, Dooley bagpipe
7. Fido and the first snow
8. Koledarska
9. Rebels write
10. Lalentse swing
11. Struggling Boryanke
12. Captain
13. Winter Song
14. Copper pipe
15. Rabbits
16. Winter dance
17. Horte
18. Our flag is three colors
19. Snowman
20. Wonder turnip
21. Mom

Figure 13. “Sample music repertoire " Screen

Screen “Video "

Figure 14. Screen “Video "
Videos appropriate to reflect the reality in educational situations where it is not possible direct participation and observation. Video can be used not only for demonstration purposes. The user of multimedia educational model can regulate and manage the individual components on their own will.

Screens "Tests"

The user of electronic learning package can regulate and manage the individual components on their own will. The practical work with the model allows for synchronous operation with the paper textbook. Considering the age of parvolatsite, multimedia package protects against fatigue, it is predominantly visual information over text and speech. Test tasks included in the model do check them much easier and accessible to the students themselves. Song materials allows to the teacher free choice, according to the objectives and tasks. Music videos with performances of professional musicians and peers of the students will enrich children’s ideas for the learning material.

All the above methods give the teacher unlimited freedom in the performance of the individual components of the handbook, a choice for choosing the content of the package and the choice for the speed of learning according to the cognitive capabilities of students and the differences in their intellectual training.