# Thematic Walk and Competition in Budapest

Ambrus Gönczi<sup>1</sup>, Zsolt László Márkus<sup>2</sup>, Gábor Kaposi<sup>2</sup>, Tibor Szkaliczki<sup>2</sup>, Miklós Veres<sup>2</sup>

<sup>1</sup> Ferencváros Local History Collection, Budapest, H-1092, Budapest, Hungary, Ráday u. 18.

<sup>2</sup>Institute for Computer Science and Control, Hungarian Academy of Sciences

(MTA SZTAKI), H-1111 Budapest, Hungary, Kende u. 13-17.

gonczister@gmail.com,

{markus.zsolt, kaposi.gabor, szkaliczki.tibor,

miklos.veres}@sztaki.mta.hu

**Abstract.** The paper presents a guided smartphone walk (Attila József Literary Walk) and its latest supplements, based in district 9 of Budapest. The thematic guided walk developed 2 years ago covers the scenes of the childhood of the poet Attila József. Several interactive games related to the life of the poet were developed and integrated into the application. This April, the developers of the walk prepared and arranged a special orientation field competition based on the mobile games for students studying in the district.

**Keywords:** Mobile Applications, Tourist Guide Application, Interactive Games, Literature Education

#### 1 Introduction

Attila József is probably the most outstanding character of Hungarian 20th century poetry. His oeuvre has a basic and ever present influence on our contemporary literary world. Attila József was born in district 9 of Budapest, called Ferencváros, in April 1905. He spent the first 14 years of his life in the district, lived in 19 different locations during this period, his presence is still prevalent in several buildings and places today.

In 2015, on the initiative of the local government of Ferencváros the eLearning Department of MTA SZTAKI and the Ferencváros Local History Collection prepared and arranged a special smartphone walk by which the most significant places of the young Attila József can be visited (Gönczi & Márkus, 2015).

The walk is based on the biographical novel written by the poet's sister, Jolán József and is supplemented with Attila József poems, background information on each location.

The guided walk can be freely downloaded within GUIDE@HAND Budapest mobile application. It was presented to the public on the following occasions:

- Official Opening of Attila József Memorial Place (11 April 2015)
- Night of Museums (20 June 2015)

Digital Presentation and Preservation of Cultural and Scientific Heritage. Conference Proceedings. Vol. 7, Sofia, Bulgaria: Institute of Mathematics and Informatics – BAS, 2017. ISSN: 1314-4006, eISSN: 2535-0366

This paper introduces the literary walk, its extension with mobile games and a competition organised in the framework of the games for secondary school students on the festive day of Hungarian poetry.

### 2 Partners

### 2.1 Ferencváros Local History Collection

The Ferencváros Local History Collection was established by the municipality of Ferencváros, district 9 of Budapest, in 1998. Its main goal is the research of the history of the district, such as the collecting of all the written documents, objects or art pieces connected to Ferencváros and its citizens in any way. The results of this work can be seen and followed by all museum goers in various exhibitions, publications, conferences and special local history programs. The Ferencváros Local History Collection works in close co-operation with the Ferencváros Local History Society, which is a civil organization established by local pedagogues with the main aim to get the school children of the district involved in all kinds of activities related to the rich past of the district. History competitions, summer camps and field trips have been organized for the pupils and students living in Ferencváros every year since 2002.

# 2.2 Institute for Computer Science and Control, Hungarian Academy of Sciences (MTA SZTAKI)

MTA SZTAKI is a research institute, governed by the Hungarian Academy of Sciences. MTA SZTAKI is the acronym of the Hungarian name of the institute, while its full English name is "Institute for Computer Science and Control, Hungarian Academy of Sciences". The Institute was founded in 1964. Its staff consists of more than 300 full-time employees, more than 200 with university diploma and more than 70 with scientific degrees. 20-30 Ph.D. students and 20-30 graduate students participate in the work of the Institute. The fundamental task of the Institute is to perform basic and application-oriented research in an interdisciplinary setting in the fields of computer science, engineering, information technology, intelligent systems, process control, wide-area networking and multimedia.

The eLearning Department of MTA SZTAKI started mobile-based software development in 2005. As a result of this activity, a new mobile application family was created with the brand name of GUIDE@HAND (http://guideathand.com/en/index). It consists of more than 60 multilingual offline applications running on smart phones and tablets for providing tools and interactive services for mobile exploration of places, events, organisations, cultural objects, etc. (Márkus & Wagner, 2011).

The aim of the applications is to enable the visitors to change their perception of new or familiar locations, objects and motives and explore the past and present of an area in an entertaining and exploring way. The GUIDE@HAND family covers many destinations in Hungary and abroad. The applications are available on iOS (iPhone, iPad) and Android platforms. In addition to its original objective as an audio tourist guide, the

GUIDE@HAND applications have been adapted to several application domains as follows: museums, events, municipalities, zoos, musicians, universities, conference series, sport teams, books, etc.

The guided walks are designed in a way that it is enough to put only the gadget into the pocket as a sound travel guide. The travellers are guided from sights to sights during the discovery and all necessary information and stories are played automatically at the proper place and time.

Tourists can always find their current position on the map with the help of GUIDE@HAND and, if they like, they can follow and review the audible information with the help of pictures and texts. They can proceed at their own pace during the guided walk and they can have a break and then continue the sightseeing any time.

The sights can be explored individually as well with help of the "Explore" function. As the travellers approach the sights, the most important information connected to those specialties is automatically played and then interesting stories related to the sights can also be listened to.

# 3 "József Attila Ferencvárosban" Walk

The thematic guided walk called "Attila József in Ferencváros", covers the scenes of the poet's childhood in district 9 of Budapest (Ferencváros). The project, initiated by the municipality of Ferencváros, was completed in the summer of 2015. The sources of the interactive guided walk were gathered and prepared by the experts of the Ferencváros Local History Collection and the Petőfi Literary Museum for the application developers of the eLearning Department of MTA SZTAKI. The guided walk is available within GUIDE@HAND Budapest application (Fig. 1).

In the course of the guided walk several tools help in evoking the childhood of the poet: excerpts from the biographical novel written by Jolán József, the poet's older sister, background information connected to the respective locations and archival multimedia elements.

For easier traceability the developers did not use chronology as the basis of the structure of the walk but chose locality for the same reason. As a result, the scenes of Attila József's life are presented as the places of interest follow each other along the walk.



Fig. 1. a) List of the walks in GUIDE@HAND Budapest; b) Description of the walk "József Attila in Ferencyáros"; c) Route of the walk.

In Ferencváros the researchers could establish 19 venues where the connection to the poet is verified - of these there are 11 places which are presented during the walk. Orientation is being helped by a downloadable interactive, digital Budapest map, in which the route of the walk can be followed, furthermore, the respective stops of the walk also appear. During the walk by clicking on the book icon the audio material can also be read, thus details of interest or information can be searched back whenever the user chooses to do so. The duration of the literary walk is approximately 90 minutes, but it can be stopped and continued any time. The venues already visited are recorded by the program, so the walk can easily be continued.

Some examples of the presentation of the multimedia packages are as follows (Fig. 2):

- 1. Quotes from Jolán József
- 2. Details of poems
- 3. Photo collection of the life of Attila József



Fig. 2. a) Quotations from Jolán József. b) Part of a poem. c) Image gallery.

# 4 Development of the Interactive Items of the Competition

MTA SZTAKI developed several interactive game types. The games can be accessed in the literary walk to deepen the users' knowledge related to the life of the poet. The interactive game types are as follows (Fig. 3):

- 1. Sliding puzzle The pictures about the life of József Attila are cut into small square tiles. The starting screen of the puzzle contains the tiles arranged in random order with one tile missing. The objective of the puzzle is to move the tiles to their right position thereby restoring the original picture. Tiles can be moved by using the empty space. The puzzle exists in two sizes with different difficulty levels. The easier version has 3×3 tiles, whereas the more difficult version has 4×4 tiles.
- 2. Memory game Cards containing pictures are located along a grid. Initially, the cards are laid face down and two cards are flipped face up over each turn. The objective of the game is to turn over pairs of matching pictures.
- 3. Matching Given the names of some terms, locations and persons. The aim is to match pairs of the predefined items.
- 4. Ordering Events are given in random order. The objective of the game is to put them in chronological order.
- 5. Crossword The word puzzle contains definitions related to the life of the poet.



Fig. 3. a) List of games. b) Sliding puzzle. c) Memory game. d) Matching. e) Ordering. f) Crossword

# 5 Competition on the Festive Day of Hungarian Poetry

## 5.1 Introducing the Festive Day of Hungarian Poetry

In 1964 the Parliament of Hungary decided that April 11, the birthday of Attila József, should become the official festive day of Hungarian poetry. Since then every year his life and oeuvre is celebrated all around Hungary. The first act of appreciating his poetry was the opening of the Attila József Memorial Room in the very building he had been born in 1905. Ever since 1964 the municipality of Ferencváros gives special and careful attention to the up-keeping of this venue. During the past decades, the permanent exhibition of the Memorial Room was renewed several times. In 2015 both the building and the exposition were completely modernized, the next year the place was awarded the Hungarian Exhibition of the Year Prize. The Attila József Literary Memorial Place, as it is called now, is visited by hundreds of enthusiasts every day, coming from Hungary as well as abroad.

#### 5.2 Introducing the Competition

In the 11th April 2017, the developers of the Attila József Literary Walk prepared and arranged a special orientation field competition for students studying in the district. The script of the competition was created during the preparation of the competition.

Based on the material of the literary walk, the competitors (groups of 5 students) had to check in to 5 different locations with the help of their smartphones, where tasks of various difficulty had been waiting for them to solve. The local government called secondary school students for a competition and 24 groups participated in the competition from Ferencváros. Each group received an achievement list where the scores of their solutions were registered at the locations. There were crossword puzzles, pairing games, games of chronological order and more among the tasks, all connected to the information the students could gather while going through the literary walk in advance. This meant that they had to complete the whole walk days before the competition took place. The students could rely not only on their own knowledge on Attila József's life and their ability to orientate when walking the walk but were given help by experts of MTA SZTAKI, who were waiting for them at each meeting point (Fig. 4).







Fig. 4. The route of the walk and pictures taken during the competition.

# 6 Comparison with Other Literary Walks

There are only few smart phone applications, which contain literature based interactive walks. For example, the walk Literary Kensington (Literary Kensington, English Heritage, 2017) helps to discover the literary history of Kensington district in London where world-famous writers lived such as Agatha Christie, James Joyce, T. S. Eliot, etc. The application Culture Walks Reykjavik (Culture Walks Reykjavík, City of Literature UNESCO, 2016) was developed by Reykjavík UNESCO City of Literature. It provides literature walks around Reykjavík. The application JoyceWays (JoyceWays on the App Store, 2012) was created in 2012 and belongs to the first applications containing literature walks. It is based on the James Joyce's Dublin of 1904, and it guides the users through one of the most important novels of the 20th century, Ulysses. MTA SZTAKI developed their first literary walk in GUIDE@HAND Budapest application also five years ago. The walk is based on the novel "Rooftops at dawn" written by the Hungarian author Géza Ottlik (Rooftops at Down, 2012).

Table 1 provides a comparison of the literature walks. Literary excerpts, audio and multimedia packages (photo galleries) make the walk "József Attila Ferencvárosban" attractive. We can found that the interactive games based on the walk are unique, which made it possible to organise the competition about the life of the poet.

Table 1. Comparison of selected literary walks

	Literary Kensing- ton	Culture Walks Rey- kjavik	JoyceWays	Rooftops at dawn	Attila József in Ferencvár os
Мар	Google Maps	Google Maps, Ap- ple Map	Open- StreetMap	Open- StreetMap , historical map from 1938, Google Maps, Ap- ple Map	Open- StreetMap ,Google Maps, Ap- ple Map
GPS	+	+	+	+	+
Audio	-	+	+	+	+
Navigation	+	-	+	+	+
Literary excerpts	-	+	+	+	+
Additional multime- dia pack- ages	-	-	+	+	+
Platforms	iPhone, Android	iPhone, Android	iPhone	iPhone, Android	iPhone, Android
Offline	basic in- formation only	+	+	+	+
Free/paid	free	free	paid	free	free
Interactive games based on the walk	-	-	-	-	+

# 7 Conclusions and Future Work

The "Attila József in Ferencváros" literary walk helps visitors to gain information about the life of the poet on the scenes of his childhood. Interactive games were added to the walk to deepen the students' knowledge. A competition was successfully organised for secondary school students with the help of the literary walk. Before the competition, students could complete the walk and visit the locations playing relevant role in the life of the poet.

Our plan is to create the Web version of the walk, which can provide all the information available in the mobile application to users who are unable to personally participate in the walk on the real scene. We would like to apply our methodology for organising competitions with the help of mobile applications to other topics as well. For example, another thematic walk in district 9 of Budapest which is about the revolution in 1956 would be a promising historical topic for a competition organised for students.

### References

- *Culture Walks Reykjavík, City of Literature UNESCO.* (2016). Retrieved July 04, 2017, from https://bokmenntaborgin.is/en/explore/culturwalks-reykjavík
- Gönczi, A., & Márkus, Z. (2015, August 23). *József Attilával a Ferencvárosban*. Retrieved from Magyar Múzeumok Online: http://www.magyarmuzeumok.hu/targy/2692\_jozsef\_attilaval\_a\_ferencvaros ban
- JoyceWays on the App Store. (2012). Retrieved July 04, 2017, from https://itunes.apple.com/us/app/joyceways/id534524278
- Literary Kensington, English Heritage. (2017). Retrieved July 04, 2017, from http://www.english-heritage.org.uk/visit/blue-plaques/themes/literary-kensington
- Márkus, Z., & Wagner, B. (2011). GUIDE@HAND: Digital GPS Based Audio Guide that Brings the Past to Life. *International Conference on Digital Presentation and Preservation of Cultural and Scientific Heritage*, (pp. 15-25). Veliko Tarnovo.
- Rooftops at Down. (2012). Retrieved July 04, 2017, from http://create.mome.hu/rooftops at dawn

Received: June 21, 2017 Reviewed: July 03, 2017 Final Accepted: July 08, 2017