

## Comments on the Availability of IT Tools Implementing the Deliberative Model of Public Consultations

Jacek Zadrożny

### Preparation of Public Consultations

#### 1. Citizen's registration form:

- each element of the form (edit control, check box, option button etc.) should have a semantically assigned label (LABEL);
- in the case of more developed forms it is possible, or sometimes it is even advisable, to divide them into logical parts using markers FIELDSET and LEGEND for descriptive purposes;
- when using graphs one should always remember their functional alternative description (ALT attribute), and the graphs themselves should be set in the layer of content and not the layout;
- all elements must be available from the keyboard level;
- in the case of a dynamically changing content as a result of choosing a certain element or changing its value, it is necessary to ensure an appropriate level of interaction with the user software, especially the assisting software;
- We strongly recommend the use of standard HTML controls, and the more complicated solutions may be used only in exceptional circumstances, after testing.
- The CAPTCHA security code, which requires a user to type a code from an image or voice recording, mustn't be used for user passwords.

#### 2. As far as the choice of meeting rooms is concerned, the form for announcing consultations should contain information about access to such rooms, illustrated by standardised icons:

- access for persons in wheelchairs,
- a lift or other device for transport between storeys,
- an induction loop for persons with hearing aids,

ticking the above boxes must be obligatory for an official. Absence of such an indication should be signalled by a strike-through icon, which will have the purpose of motivating the search for an appropriate room.

#### 3. An application for participation in consultations should contain a list of necessary facilities to choose from:

- sign language interpreter,
- access to premises,
- induction loop,
- Braille transcriptions of materials,
- large-print materials.

The system should check for conflicts of expectations with the selected meeting room and the facilities planned. Any errors should be reported to the organiser.

#### 4. Briefing materials:

The instructions concerning their preparation should contain a checklist for testing their availability.

Text:

- check if the file contains text with a possibility to paste excerpts into another place (this refers mostly to PDF files);
- check if tables are appropriately prepared and the content is divided into smaller parts by means of headings;
- check if the graphic elements have correct alternative descriptions;
- check if interpretation into sign language has been added.

Video:

- check if there is captioning for the deaf;
- check if there is interpretation into sign language,
- check if there is audio description or text transcription;
- check if the recorded speech is clearly audible in the context of other sounds.

The video may consist only of a picture without sound (animation). It is worth the while to add such kind of material and then the checklist will have the following shape:

- check if there is audio description or text transcription.

Audio recording:

- check if there is text transcription of the material;
- check if there is interpretation into sign language;
- check if the speech is clearly audible in the context of other sounds.

Photograph, map, plan, diagram, infographics:

- check if the added alternative text is correct.

Here it will be indispensable to add an extended manual on the manner of creating an alternative text.

#### 5. Discussion meetings:

When planning them it is necessary to take into account, inter alia, that if a deaf person participates in a discussion a sign language interpreter is required as an additional person. His task is to listen to utterances, translate them into sign language and convey the message of a deaf person. Refer to the description of conducting consultations to obtain more information about adjusting IT tools to the needs of the disabled people participating in debates and polls.

### **Conduct of Public Consultations:**

#### 1. Briefing materials:

- a printed-out leaflet is inaccessible for the blind, it may be partially inaccessible for the visually impaired, dyslectic, intellectually challenged and deaf; some problems are solved by an electronic form, prepared in accordance with the principles of availability; the content should be adapted, i.e. translated into sign language and a text easy to read;
- the photograph material must be supplemented with correct alternative texts;
- It is difficult to make a map available to the blind and visually impaired. This may be solved by carefully prepared alternative texts describing the most important elements of the map and tactile graphics.
- The video material performed live must be equipped with at least audio description and captions for the deaf. It would be suitable if it was also provided with a interpretation into sign language.

- Highlighting information in colour is an acceptable solution on the condition that other form of marking will be also ensured. For example symbols, letters and other elements.
2. The presence of a sign language interpreter is indispensable for deaf persons when interviewing experts. It is appropriate if interviews are conducted in a room provided with an induction loop.
- It is necessary to add a full text transcription to the sound file.
  - The video should be equipped with at least captions and audio description, and additionally it should be supplemented with interpretations into sign language.
3. Debates:
- If a deaf person participates in a discussion the audio and video material should be provided, as appropriate, with: transcription or captions and audio description, as well as sign language interpretations.
  - The task of the sign language interpreter is to listen to utterances, translate them into sign language and and convey the message of a deaf person. This also entails the necessity to add a functionality consisting of displaying the interpreter window. The interpreter may be an external service (wideotlumacz.pl, TokTuTok, etc.), so it is worth the while to consider a method for embedding easily such elements into the system.
  - All steering elements, i.e. buttons for connecting to the room, switching on and off the microphone, signalling the willingness to take the floor, regulating the volume of the microphone and loudspeakers should be available from the keyboard level and they should carry correct labels.
  - The ARIA technology should be used to signal the willingness to take the floor so that users of screen readers do not miss that information.
  - If the content of the board changes during the debate, it will be necessary to use relevant solutions from ARIA technology (aria-live). Thus the users of assisting technologies will not miss any information.
  - In the case of a clock measuring utterance length one may use the solution applied by the Polish Parliament where a sound signal goes off several seconds before the end of the time granted. If such a solution is introduced it will be necessary to provide an alternative signal for the deaf.
  - Speech-to-text tools (which transcribe a voice recording into text) do already exist for the Polish language, but they are not commercial solutions. The tool may include an API which would make it possible to attach easily such a device (e.g. Dragon).
  - Participation in a chat is quite difficult for the disabled. The blind frequently encounter unavailable solutions and the response is quite slow, so the utterances may be delayed. A similar problem occurs in the case of the deaf, whose command of the Polish language is poor, and the intellectually challenged. Conversation view may solve some, but not all, problems. It seems that for the deaf a sign language interpreter may be indispensable again, and hence - just as in other situations - it is necessary to provide an API for embedding interpretation in the application interface. The chat itself must fulfil the requirements of WCAG 2.0 availability, including in particular access from the keyboard level.

#### 4. Graphs:

It may be difficult or even impossible for a person who is blind or intellectually challenged to fill in a graph on his/her own. At this moment, without knowing a complete concept of a graph, it is difficult to propose concrete solutions. Automation of the graph-creating process offers an opportunity to

also design its text version.

A graph is a component of graphics which is particularly difficult to transcribe. If the system supports creation of such a graph, it should be also equipped with automated transcription methods.

#### 5. Questionnaire:

There must be a possibility to access both types of questionnaires: a paper-based questionnaire and an electronic questionnaire. The paper-based questionnaire will be impossible to fill in for a blind or visually impaired person, whereas a person who does not use information and communications technology will not complete the electronic questionnaire.

In the case of electronic questionnaires:

- every component has its semantic-bundle label;
- large forms are divided into smaller parts with facilitated navigation;
- obligatory grouping of single-choice elements (radio).

In the case of paper-based questionnaires (if there is an editor):

- font of at least 14 pt, or even 16 pt;
- sans-serif font, font-weight of at least medium value (do not use thin font), avoid italics.

For both types:

- clear instructions what should be done (fill in, check the box, delete, etc.);
- instructions compliant with the principles of a text easy to read (examples may be added).