InterPARES Trust Project Report



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Rationale

This ministry's site was chosen as a case study for the following reasons: It is in English, includes data that is updated from time to time, saves earlier versions in the site itself, receives inquiries and comments from the public, and attempts to develop consular services online. The Department of Digital Diplomacy is responsible for the site.

This project is of interest to InterPARES Trust because the website is part of a government server's farm providing storage in a government cloud. In contrast to a private cloud whose provided services may be hidden from most of the customer, the services provided to customers of a government cloud are expected to be open, suited to meet the needs of the government unit, under supervision in relation to procedures and technology, and legally protected. Through examination of these elements, the proposed research will enable study of the ties and inter-relationships between the site, its composition, contents, and manner of operation with the cloud's operator, as well as with other bodies such as the bureaus that created the records displayed, judicial bodies, the Egovernment complex providing internet services, and the Israel State Archives, all of which influence retention and disposition policy.

The objective of the research project is to examine the process of archival retention and disposition according to its two basic meanings – disposition, or transfer to another repository or suitable archival institution – and to create a set of procedures and guidelines by which the organization will be able to choose which documents will be permanently preserved by transfer to another repository or archival institution, and which will be disposed of.

Since it is the objective of InterPARES Trust to create a theoretical and methodological framework of policies, procedures, regulations, and standards relating to electronic records available on the internet in order to ensure public trust in the trustworthiness of these records, this case study and its findings can contribute to an understanding of the process of retention and disposition as an aspect of research in the domain of control of trustworthy records.

Description of the research project

Research questions

- 1. Is there a procedure for setting the schedules during which records will be retained on the website?
- 2. Is there a procedure for disposition of records, whether by disposal or transfer to another repository?
- 3. What are the relationships between the organization and the provider of internet services (E-government) concerning retention and disposition of records?

- 4. What is the role of other bodies (Ministry bureaus, the Israel State Archives) in the context of retention and disposition of records?
- 5. To what extent are there existing procedures concerning electronic and traditional records that relate to the contents and functions of the records displayed?
- 6. Should records that exist only on the website be handled in a special procedure?
- 7. What is the most suitable method of assessment to decide on periods of retention and disposal for material on the website?

Objective

To create a suitable system of methodologies and procedures for retention and disposition of records on the website in question, whether by means of macro appraisal, or the existing procedures in accordance with the regulations and guidelines included in the Israel Archives Law, or any other method.

The research project will include:

- A. Examination and analysis of the types of records, policies, work procedures, and processes of retention and disposition on and relating to the Ministry's website:
 - Types of data and records on the website, i.e., whether dynamic or static, and their content
 - Policy relating to inclusion of records on the website (parameters for their retention)
 - Retention, disposition, or permanent preservation as compared to records having the same content and function in conventional systems or electronic ones not on the internet
 - Retention, disposition, or permanent preservation of records found only on the internet
- B. Comparison with the process of appraisal and retention adopted by InterPARES 2 (www.interpares.org)
- C. Comparison with procedures and standards in Israel and abroad
 - Israeli government standards for creation of government websites
 - Other standards employed abroad
 - Examination of Israeli laws relating to archives, freedom of information, and computers that might influence decisions on these matters.

D. Research procedures

- Inspection of the website
- Interviews with Ministry employees who maintain the website, both those responsible for content or technology
- Interviews with Ministry employees responsible for adding material to the website
- Reading and assessment of procedures, standards, and professional literature from Israel and abroad

Literature Review – Appraisal and Preservation of Websites

The issue of appraisal of archival material and its preservation or disposal has concerned the archival community throughout the world since the end of the 19th century. Two main schools of thought can be noted that flourished and continue to flourish today in Europe and North America: the first was based on a structural analysis of the records system, according to the administrative structure of the creating entity, on which the principle of provenance is based; and the second, which developed from the beginning of the last two decades of the 20th century, the functional method, which is based on the operational context in which the records were created, and not on the records themselves. As of the '90's of the same century, these schools added elements related to electronic records such as the diplomatics discipline.

Websites are an innovative tool, with characteristics and functions that were previously unknown. From the aspect of their function, they are a tool for mass communication. Among other things, they can serve as a platform for the representation of their organization or individual in the broadest meaning of the word. Since their appearance at the beginning of the '90's, they have occupied information scientists in finding ways to preserve them both from a software aspect, as well as the hardware aspect. As for the hardware aspect, a website is composed of electronic records, a field which has already been researched. The results of this research can constitute an infrastructure when relating to the records of websites, studying their characteristics and the ways of dealing with them.

On a website three main types of records can be identified, as to their completeness and authenticity: the records created for the purposes of the website itself, which are considered original to it, and therefore all the rules of contemporary diplomatics apply to them; records copied from other frameworks, but which retain all their original characteristics; and records that retain their contents, but not their form.

In the case of the Ministry of Foreign Affairs website in English, the last type constitutes the majority of the material. A question arises, in principle, regarding the provenance and context of these records. Since the administration of the Foreign Ministry records contains regulations for retention periods that cover all the Ministry's fields of activity, in relation to records that were transferred in their original state – in the fullest sense of the word – does the original context in the creating entity influence, or obligate, the setting of the retention period on the website? In the third case, does the change of form influence the answer to the previous question? To what extent should original records created solely for the website itself be influenced by other contexts – meaning content sources – beyond the context of the website itself?

Because one of the special characteristics of each website is the replacement or addition of new material in accordance with criteria set by the nature of the site's sections and divisions, harvesting programs exist which make it possible to harvest websites in their entirety, or certain parts of them, and at predetermined times, according to the type of material and the frequency of the changes presented.

Another element not yet taken into consideration in the appraisal of websites is the number of users viewing its various parts. Can the results of a study of this type serve as criteria for the appraisal and determination of retention periods or permanent preservation of particular material? Below follows a study of the extent to which the existing literature answers these questions.

The method of reviewing the literature for different issues addresses the need to proceed from the basic research through publications that describe practical attempts to provide guidelines as to how to deal with various types of websites on a practical level. Due to the development that has occurred in the field in recent years, we have tried to keep to a chronological arrangement of the publications according to their appearance, because the tendency of the research has been naturally to progress from the general to the particular. There are three types of publications: 1) reports of research projects and their results, such as "InterPARES"; 2) books and articles that discuss dealing with this media from various aspects; 3) guidelines provided by institutes that preserve websites, such as archives and national libraries.

Literature from the research project, International Research on Permanent Authentic Records in Electronic Systems, Phase 2 (InterPARES 2, 2002–2007)¹ belongs to the first type, in which the electronic records must meet with the requirements of the contemporary diplomatics discipline, in order to be considered worthy of permanent presentation. That means that it is possible to ensure their completeness in content and in form, as well as their authenticity, including the accompanying metadata, at all the stages from their creation and up to their deposit and preservation in the archives.² To this primary condition can be added the criteria of the structural and/or functional analysis of the context in which the records were created, and thus an appraisal of electronic records can be made.

The research has defined a strategy for appraising material that was created in a digital environment. This strategy defined three stages: appraisal management, monitoring and control, and conducting the appraisal. Appraisal management includes four stages: processing and analysis of information on the records and their context; an assessment of their ability to serve the needs of their creator and society; an assessment of the possibility of their being suitable for permanent preservation, and determining an appraisal. The process of monitoring and control examines whether the data changed during the period of time up to the moment of transfer to the permanent deposit.

During the processing and analysis of the information on the records, information is created on the continuing value of the records and the level of their authenticity. The InterPARES research project has determined that it is not the records that are preserved (digital components) but the ability to copy them. That is, to locate the digital components that relate to identity and completeness, through knowledge of the present and future capabilities of the preservation. This process includes three stages:

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¹ IntePARES 2 (2002-2007), Appraisal Task Force Report, http://www.interpares.org/book/interpares book e part2.pdf

² According to Duranti, electronic records whose authenticity is in question can also be appraised; however, this should be noted in the material to be preserved.

determining the record's elements that contain information and the components required to preserve them in accordance with the demands of authenticity; identifying where the elements of the record are in the digital components of the electronic record; and comparing the demands of preservation with the preservation capabilities of the preserver (including a cost estimate).

Therefore, the appraisal should be conducted as early as possible. The reasons for this are two-fold - the need for the context of the creation of the group of records, and the technological context. The context of the group of records is important for determining the authenticity of the records. This information may disappear as a result of the transfer from the system that created it to another system. The technological context is very important, since it makes it possible to identify the group of records required for permanent preservation, and the digital components that contain the parts of the record required for its authenticity.

As a result of the three stages of appraisal, two types of information are produced: the first is the appraisal decision itself and the second is information on the electronic records that were select for preservation, and which are attached to them as part of the transfer to the preserving entity.

The section on the subject of permanent appraisal, in the booklet that deals with practical guidelines for organizations dealing with electronic records, was based on the above article.³ In addition to the emphasis on the early appraisal of electronic records and the reasons for it, this section notes the possibility of joint ownership of the records, and gives an example from a website in which the access and use of its resources are outside the scope of the creating entity. In general, an agreement between the two bodies for long-term preservation of the significant digital components was not discussed. As noted above, one of the most important stages in appraising records for permanent preservation, both of the traditional type as well as in electronic form, is the appraisal and determination of authenticity of these records, including a study of an ongoing chain of preservation, from the beginning of the creation of the records and their ongoing records management. For this authenticity assessment, authentication which confirms the previous one is required. In addition, the records can be adversely affected by the collapse of systems that were not properly maintained. As with traditional records, electronic records too need to have their appraisals updated at regular intervals, in accordance with changes that occur in the system. In each case, all the means for transferring and receiving the chosen records in the place of their final preservation must be made secure. In principle, everything stated till now regarding appraisals by InerPARES 2, and in the practical guidelines based on it, is also valid with regard to appraisals of websites.

http://www.interpares.org/ip2/display file.cfm?doc=ip2(pub)creator guidelines booklet.pdf

³ InterPARES (2002-2007), Preserver Guidelines - Preserving Digital Records: Guidelines for Organizations,

An example of the second type of literature is the article by Brown⁴, who presents in Chapter 3 of his book, the special characteristics of the Internet that may influence the selection of internet sources. Among other things, he lists internal connections within the site and information within the site can arrive from external sources; these characteristics result in the boundaries of sites not always being clear. In addition, it is easy to create copy and link content in a variety of displays, and even erase content. Furthermore, a website is not an isolated object, but is located within a wider system of links in the internet system, with the connection between the sources not always being visible.

These characteristics raise a number of issues. The first touches on the selection policy, and the definition of clear boundaries of the object proposed for selection. The second relates to basic archival issues of the nature and authenticity of the selected material — whether it can easily be changed; and the fact that the web is characterized by change of the lifetime of an internet page. An additional issue is that a large part of internet content is created in a dynamic fashion from databases, and is defined in accordance with the technologies of various users. Therefore, there is no defined look of an internet page that can be identified and captured. Due to all these reasons, selection decisions on when and at what frequency they are to be collected may have a significant influence on the nature of the collection that is created.

Brown claims that the nature of a large part of the informative contents of the web is defined by using traditional categories. Despite the fact that terms such as 'publication', 'record' and 'artifact' may serve in a number of cases, more and more of these type of definitions are vague or sometimes lack meaning. The result is that it is necessary to decide on new definitions for material on the internet

The author presents a model of an organizational selection program from which selection policy should evolve. The policy includes the following steps: definition of the connection of external selection policies (of other sites) with the site, and organizational policy. A situation may arise in which a link will lead to a page outside the boundaries of the site on a different site, which another organization is preserving. Therefore, it may perhaps be necessary to think of the general and local policy of the organization. In addition, and in accordance with the program, it is necessary to define selection criteria and a selection method: by subjects, by creators, or by the special types of sources and domains.

Subsequently, a list of collections is created, which includes defining the boundaries of each source, and defining times and frequencies of selection for each source. Defining the times may be done by the lifecycle of the site, or of the harvested part. The lifecycle may be defined for an internet source with an unlimited time, or for a site for a specific event. In addition, the frequency of content changes, risk management of the life duration of a technology, the relevance and uniqueness of the source – such as the birth of the British crown prince – also contribute to determining the list of collections.

⁴ Brown A. (2006), Archiving websites: a practical guide for information management professionals. Facet Publishing. pp. 24-41

Luciana Duranti, in her article from 2011,5 does not rule out the use of traditional structural methods in the appraisal of electronic records, but emphasizes the need for a diplomatic analysis in order to ensure the authenticity of these records, if they are intended for preservation for long periods of time, or permanently. These records must be under constant supervision, and if changes occur the deposit decision should be reexamined. In another case, if a stored record appears in several documentary displays, there is a need to decide for which of them retention periods will be set. It is possible to differentiate between static digital identities and interactive digital identities. The first cannot be changed as to content or form, and if the rest of the authenticity conditions have been fulfilled, they are considered records. Examples of this are electronic mail, reports, and audio recordings. The second type may or may not be records, depending on whether they are dynamic or not. Those that are not dynamic are those for which the rules determining the content and structure do not change, and the content is taken from an unchanging data storage source. Examples of this are interactive sites and on-line catalogues. Dynamic identities are those for which the rules determining the content and structure do change. They will become records if they are transferred to a system that will give them the same characteristics as static or non-dynamic records. Traditionally, appraisal literature does not emphasize authenticity; but the nature of electronic records requires the diplomatic analysis as part of the appraisal process. The metadata is a key datum in this process. It's the record's identity and completeness, including an electronic signature, confirm the above. An appraisal decision of these records includes two parts: defining what should be transferred to the archives, including a list of the records' digital components; and the decision how and when the transfer should be conducted, including identifying the formats and methods used for the transfer to the archives.

The only article that deals with the behavior of users in archival systems and in information sources on the use of them as a possible criterion in appraising archival material is that of H.L. Rhee, (2012)⁶. The article relates to research that was conducted on the practice of records management and archives at state level/ the states in the USA. It presents a variety of approaches that can be used in relating to users, from consultations with experts in various fields, to the number of visits to a website or its parts, to the data collected by users of reference services, a study of research projects and users, and/or inclusion of experts such as historians and representatives of groups with specific cultural or scientific interests. The author conducted research on the subject of users among records managers and archivists in the government sector, because they are those who most require appraisals of archival material. Their three main sources are registration and reference services, talks with users, and data taken from the service through the website. The intention in this case is not an appraisal of the website itself through its users, as is the goal of the current research; but rather, users who reach specific archival material through the archives site. The conclusion is that archivists need to develop information sources from users in order to use them as an appraisal tool, and to develop genres that can contribute information from them. For example, to add and develop modules in

⁵ Duranti F. L. (2011), Structural and Formal Analysis: the contribution of diplomatics to archival appraisal in the digital environment, in Hill, Jennie (ed.), The Future of Archives Record Keeping, pp. 65-88

⁶ Rhee, H.L. (2012), Genres and genre repertoires of user and use information sources in U.S. state archival and records management appraisal practice. Arch Sci 12:461–483

information systems that contribute information on users collected from all sources: reference services, appraisal, process and access, and to develop and implement them on a practical basis.

An article published by T. Risse, W. Peters & P. Senellart in 2013⁷ analyses a model that was developed by ARCOMEM, which makes it possible to implement crawling designed not only for harvesting dates, but also to add semantic metadata (identities, subjects, ideas and events); this makes it possible to analyze the content of material taken by a crawler, and thus arrive at what is defined as intelligent crawl specification. This method, which makes it possible to retrieve controlled information, may also be useful for various types of research. The semantic metadata can be used as a criterion for the appraisal of additional material that will be added to the same site or parallel sites.

The article, which was published in 2013 by A.J. Le Follic, P. Stirling & B. Wendland, presents mainly the example of the National Library in France, which combines two functions – mandatory deposits by law, and selection by subjects. The first type can be conducted without asking for permission from the creators of the site, and conforms to the policy of a mixed model of both wide and selective crawls. The second type is focused on thematic and project crawls. The approach towards the preservation of websites should be adapted to the policy of the receiving entity. Therefore, in the case of the national library, its responsibility is divided between the fields of deposit by law and information technologies, with the content curator also having a role regarding the subject. All this is based on the existing infrastructure in the national library, with the cooperation of the department of the digital library, the librarians and its information technologies staff. This makes it possible to find solutions to problems of permanent deposits in the archives, while taking advantage of their experience in a similar field, such as librarianship.

Two examples of the third type are the guidelines of the TNA. The one from 2011⁹ explains the issue of preservation of websites in the archives, their importance, and the ways used to achieve it. The terms "snapshots", "crawler" and "harvesting" are explained, as well as the three existing methods to implement them: a. by the user, the most common; b. by the server that stores the content, which makes it possible to supervise the interaction between the users on the site and the server; c. taking copies directly from the server, which makes surfing possible, as well as control of material we are interested in preserving, while controlling what is open to the public. Furthermore, the guidelines suggest treating the records appearing on the site in the same manner as the rest of the organization's records, according to their creation and their use in the organization, and thereby determining their value. In addition, technical advice for implementation is included.

⁷ Risse Thomas, Wim Peters, and Pierre Senellart (2013), Social and Semantic Driven Web Harvesting in Web Science 2013 Workshop: Building Web Observatories, https://sites.google.com/site/bwebobs13/

⁸ Le Follic A., P. Stirling and, B. Wendland (2013). How to fit in? Integrating a web archiving program in your organization. In: d'IIPC Website. http://www.netpreserve.org/resources/how-fit-integrating-web-archiving-program-your-organization

⁹ TNA (2011), Web Archiving Guidance (2011). http://nationalarchives.gov.uk/documents/information-management/web-archiving-guidance.pdf

The goal of the second guide published by the same source in 2014¹⁰ is to organize, along general lines, the deposits of the websites of the various ministries of the British government in TNA, as is the case with the traditional and electronic records of the above ministries, which are designated for permanent preservation. The very appearance of official records on these websites, and the need for transparency of government activity, enhances the need for preservation. The TNA developed harvest periods adapted to each one of these sites and the nature of the material found on them. In addition, it contains instructions for determining special harvest times for content on unique events or processes, such as the economic crisis of 2008 and the London Olympics of 2012. There is a correlation between the retention periods of the documents in ongoing record management, and the appearance of those same documents on the website. In the case of a particular document that was supposed to appear in the harvest not being found, the creating entity must point this out. In other words, on principle, the existing approach in the TNA about appraisal, also applies to the websites, despite their special nature and the services they provide.

An additional guide for preservation of internet sources¹¹ presents a general approach for universities; how to manage internet sources intended for preservation, means of appraisal and selection of material for preservation, and how to capture the records.

As in the InterPARES 2 research¹² the appraisal process includes learning about the environment that created the records and their use. This includes the structure of the organization and its goals, preservation policy and motives, the demands of the law for records preservation from the organization, the potential for repeat use, etc. The authors of the guide argue that the first stage includes learning about and understanding of the internet sources, including the ease with which it is possible to change their content and location on the web. An important issue in the preservation process is the subject of records management in content management systems, which contains, among other things, tracking the various versions, and metadata management. The guide also presents three approaches to selection: a non-selective approach, a selective approach, and an approach influenced by events. The non-selective approach is one in which all the internet sources are taken. The second approach is selective according to criteria as, for example, in all the sources belonging to a specific department, a specific type of internet source (e.g. all the blogs); or sources that share a common or similar, subject. The third is an approach influenced by events, which may include the beginning or end of a year, the appointment or termination of a position held by a senior staff member, completion of a project, etc.

According to the definition of a document provided by the appraisal process, three types of documents are identified: a record that provides evidence of an activity that was

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¹⁰ TNA (2014), Operational Selection Policy OPS 27, UK Central Government Web Estate, http://www.nationalarchives.gov.uk/documents/information-management/osp27.pdf

A Guide to Web Preservation, Practical advice for web and records managers based on best practices from the JISC-funded PoWR project (2010), Edited by Susan Farrell using content written by Kevin Ashley, Richard Davis, Marieke Guy, Brian Kelly, Ed Pinsent and Susan Farrell. http://jiscpowr.jiscinvolve.org/wp/files/2010/06/Guide-2010-final.pdf

¹² See above page 7.

carried out, for business and legal purposes; a publication – an internet page open to the public, a copy of a digital source; and finally, an artifact.

An additional issue presented in the guide is the general approach to preservation by differentiating between the preservation of the experience of a visit to a site, including its behavior; and preservation of content alone, which includes words, graphs, images and sound. The selection of one of these ways of preservation has implications that are expressed in the organization's servers, and its maintenance and preservation policy. And finally, there are three points at which it is possible to capture internet sources from the server to the client: from the creating system or server, by a browser or by a crawler.

In conclusion of all the above, it may be said that the literature has dealt with the full scope of issues related to appraisal of electronic records as a whole, and the ways to ensure the process of their preservation or destruction, and their transfer to their final destination. ¹³ These are supplemented by the integration of the subject of diplomatics, as an element for determining an appraisal. 14 All this is also valid for the records of websites. One can see continuity in the line that developed following the InterPARES 2 appraisal, which is implemented especially on the internet sites of universities. 15 With regard to records that were created as internet records or appear on websites: on the one hand, there are those that put the emphasis on the context of the website, both from the web aspect and from the aspect of the creating entity; 16 but on the other hand, there appear methods that are adapted to the specific requirements of websites, such as the question of harvesting and its periods; the addition of semantic metadata; ¹⁷ and the selection of sites for preservation by subjects. 18 In certain guides there is no special reference to other characteristics of websites, other than the field of harvesting. In other, the fields they are treated like the rest of the electronic records belonging to the same creating entity. 19 The subject of users 20 is proposed as a criterion for the general appraisal, despite the fact that it does not relate at all to the appraisal of the websites themselves; however, this may be a point for comparison in research projects.

As for the questions that were asked in the introduction to the literature review, there is no answer in the above material to the issues related to the context of records on the internet and their types, and their influence on appraisals. Only in relation to original records created on the site itself do two publications (the British and the French) hint at the possibility of appraisals in accordance with subjects determined in advance.

It may be said that the literature provides a basis for research, and there is a possibility of using a part of it directly in our own research, with part of it remaining as a base on

¹³ See Notes Nos. 3 and 4.

¹⁴ See Note No. 6.

¹⁵ See Note No. 12.

¹⁶ See Note No. 5.

¹⁷ See Note No. 8.

¹⁸ See Notes Nos. 9 and 12.

¹⁹ See Notes Nos. 10 and 11.

²⁰ See Note No. 7.

which to build further. The literature mainly shows what is lacking, which provides us with a direction for our own advancement and development.

Archival Appraisal Processes in the Ministry of Foreign Affairs of Israel

The Ministry of Foreign Affairs (MFA), as an integral part of the governmental system of the State of Israel, conducts its records management in accordance with the Archives Law 5715–1955. The State Archivist, through the Israel State Archives (ISA) and its administration, is responsible for enforcing the Law in all government ministries, state institutions, and local government. As such, archival appraisal, which is part of the Ministry of Foreign Affairs' records management, is executed in accordance with the system set forth by the ISA.

This system was created in the 1950s, influenced by the theory of Theodore Schellenberg and examples from the United States. The appraisal process begins in the creating entity itself that reviews all the records created by each administrative unit separately. The proposed retention schedule is based on the system's administrative and legal needs and on the place of the specific record within this context. The entities involved in this stage are the record creators themselves as well as the individual responsible for the Ministry's records and the Ministry's legal counsel. The proposal is then transferred to the ISA, which for more than forty years has maintained a standing committee for archival appraisal. Following the committee's approval, the retention schedule lists are transferred to the Ministry of Justice and added to the existing regulations and guidelines pertaining to archival appraisal in government institutions and local government.²¹

A special department within the Ministry of Foreign Affairs, the Records Management and Databases Center, is responsible for records management. It has a long tradition of proper records management ensuring that all records of all the Ministry's units, including those in Israeli missions worldwide, undergo archival appraisal, including determination of retention schedules. This pertains to both traditional and electronic records, so they do not differ in terms of appraisal criteria. Beginning in 2000, the Ministry integrated the retention schedules of electronic records. To date, no material from the Ministry's electronic systems has been disposed of. Retention schedules will serve the Ministry of Foreign Affairs for two purposes in the future: the first, to classify material in the electronic systems according to level of importance; and the second, to transfer material intended for permanent retention to the ISA. Regarding preservation of record authenticity, we will need to re-examine this issue within the framework of the above mentioned processes.

The Ministry of Foreign Affairs' websites, including the website serving as this case study, have yet to be addressed within the framework of the archival appraisal process.

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²¹The regulations are in accordance with accepted legal procedure, including a process that requires the Prime Minister's approval and signature. The guidelines are a work document, prepared by the State Archivist with the approval of the Supreme Archives Council, that also include retention or permanent preservation schedules.

The Ministry of Foreign Affairs Website

The Ministry of Foreign Affairs site was established in 1993, and was the first among the sites of government ministries of Israel. Today the Foreign Ministry has five websites, each in a different language: Hebrew, English, Arabic, Russian and Persian. Each of them has its own characteristics, according to the population which it targets. The English site is naturally a public relations site. It was updated technologically in 2013 to the work environment of a SharePoint program. It behooves us to point out that each of Israel's 103 legations around the world has its own website, to which it copies material from its head office site, and adds material in accordance with its needs. Based on a compulsory government directive, all government ministry websites must visit government servers' farms; therefore the Foreign Ministry website can be found in a government cloud. This site has its own servers, separate from the sites of other ministries.

Before we could reply to the research questions that relate to appraising the archival material of the website, we needed to examine in-depth the existing situation, both from the shape and contents of the site as it appears to users, as well as the elements from the back end of the site; both from the contents aspect of what is preserve and what is not, and from the technical aspect of how the site itself operates and in relation to the government cloud on which it is based.

The first stage was to conduct interviews with the staff of the Ministry of Foreign Affairs (MFA) who are involved with the website process. Interviewees were:

- MFA, Head of Digital Diplomatic Department
- MFA, English Site Web Master
- MFA, MASHAV Web Master
- MFA, Head of Internet & Media projects Team, Computer Department
- MFA, Consular Affairs Division, Head of Training and Computerization
- MFA, The Information and Visual Media Department.
- E-government (Cloud, Servers Farm)
- MFA, Records Management Center and Databases²²

Sources and organization of the contents in the website

As for the contents, there are two sources for the information distributed on the site. One is internal, from the minister's bureau, the deputy-minister's bureau, the spokesman's announcements, and various departments that wish to disseminate information. In addition, material arriving from the legations may also be included on the site. The material from outside the ministry may arrive from the Government Press Office, as well as from an external company that writes for the ministry, mainly on the Israeli experience and Israeli innovation. Science and research institutes also send the site innovations that appear appropriate for publication. The site also contains films that are produced by the Production Department. The contents editor in almost all the cases is the web master of

²² See appendix

the site, who also defines which topics will be included, and which films will be combined with the text. In actual fact, there is almost no control by the senior level of the ministry of the material posted on the site, except for rare cases in which it is asked by the ministry staff to remove or revise it. There are only two units that manage their subsites independently. The first is the Consular Division, which exercises systematic supervision of its information which appears on the site; the director of the Consular Division is responsible for that. The second is MASHAV, as can be seen below.

The site manager organizes the information she has into categories, which resemble dividers on the site. Every file in which these documents are concentrated is found in the content management tool. The categories constitute the context of the documents. In addition, a situation may arise in which content pages are marked in more than one category; therefore, the same document may appear in more than one category. The rate of change on the site is likely to be more than several times a day during an unusual event, up to once every few days. As a result the site in English is organized into 11 subsites (see fig 1): Home site page, Press room, About us, News, Consular Services, Foreign policy, About Israel, Contact us, International organizations, MASHAV, and Video.

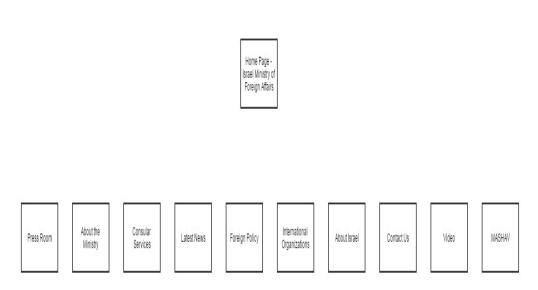


Figure 1 The Ministry of Foreign Affairs Website

In order to illustrate the work procedures in editing the contents of the site, we will concentrate on a number of important sub-sites: Press room, MASHAV, Consular Services, Contact us, and Video.

Press room

This sub-site preserves announcements from the beginning of the site (1993), including announcements of other ministries that did not yet have a site of their own. During the years these have gone down in number, as the other ministries opened sites of their own.

Today, other than foreign ministry items, the site includes the Prime Minister's Office and a few items from the IDF, mainly whatever is connected to international relations and the legations. It also has summaries of news from the Israeli press, which are edited by the Government Press Office. In addition to the site, this department disseminates information by email to a distribution list of approximately 5,000 email addresses. There is also distribution of a newsletter that is conducted in accordance with a demand by interested users, according to the topics requested by them.

MASHAV

(Hebrew acronym for Israel's Agency for International Development Cooperation)

This is a government company that specializes in aid to developing countries; not only technical assistance but also humanitarian aid. It operates under the aegis of the Foreign Ministry. As part of the OECD it is required to have a website; therefore, MASHAV operates the sub-site itself and has a special manager to do that. The site contains information on the activities Israel conducts in Africa, Asia, and Latin America. This activity constitutes an important part of the work of the Israeli delegations in these countries. For example, it is expressed in agriculture — in instruction on irrigation methods. Visually, this information is transmitted in articles, publications and photographs with appropriate text added. Those interested in courses and journalists are the majority who use this sub-site.

Consular Service

In light of the legal and administrative aspects of the services provided by the Consular Division, only the department itself may have control of the texts presented on the site. Therefore, there is a computerized list of regulations that details the consular procedures (including forms) of the State of Israel, including instructions to citizens and applicants who are not citizens of the country. Due to their importance and implications in the fields mentioned above, the regulations are updated at the level of singles words. The fact that it is computerized makes it possible to save the different versions. A full and updated version is found in each legation. Only the parts of the regulations that relate to service to the general public appear on the site. There is no possibility of filling out the forms electronically, but only to download and print them, fill them in manually, and then appear at the legation or the ministry to carry out any procedure.

Contact us

This includes interaction with the public, but without a uniform policy. In this part of the site, according to the query, the site manager generally directs the enquiries or comments that arrive to an aide to the minister, the public relations department, the Consular Division or to the political departments. There is no tracking conducted on the site of the replies of the various departments. After an unspecified period of time the questions and answers from the mail box are deleted, because there are very great quantities of material.

Video

This sub-site presents clips that have been taken from an external YouTube site that retains the ministry's material. Presentation of the clips is done by a link to that site, not by downloading clips from it. There is no supervision conducted by the ministry on the maintenance of these clips. In point of fact, it is possible to make changes to the clips

which will affect the look of the clip on the site, and influence safeguarding their authenticity.

International organizations – This part of the site includes material posted on the site by the site manager, or that are received from the Department of International Relations.

International organizations

This part of the site includes material posted on the site by the site manager, or that are received from the Department of International Relations.

The Content Management System

Technically, the site is powered by a SharePoint system, of which only the Content Management module is operated, not the Documents and Records module. The Content Management module lacks uniformity in the style of writing of the documents on the site. In addition, there is no uniform method for using metadata, which is the most basic: titles, the date of the document or the event, long or short descriptions, the email address of the document. Of course there are additional fields that are not in use at all, and there is also no module to lock the document; therefore it can change during its lifetime. There are two copies of Share Point, each stored on a separate server; An editing state within the Ministry that enables various authorized personnel to edit documents in the system. The other state is the viewing state (read only at the website itself). Regarding the editing state, there is some control over the transactions carried out in the software. Therefore it is possible to know who last made changes to an item of data and when the change was made.

For purposes of finding and retrieving information there is a vocabulary with 400 items in English, from which items are translated into other languages; but there is no possibility of conducting a multi-language search. There is no supervision of the translation and the method of writing terminology; therefore, the various site managers may add technical terms freely. In other words, there is no enforcement of the use of key words. These, in fact, are not managed but rather constructed ad hoc. The terms are saved as part of the metadata of the document.

As for preserving material, back-up procedures are conducted on the site once a month, in order to ensure its operation and to save its contents. The server farm reports to the ministry on every change in the fields of hardware and software even before conducting the back-up activities. The ministry relies on reports from the server farm that the material underwent changes without any harm. According to the ministry staff, the site is very accessible to external users and very active to internal users; and therefore, if changes occur in the documents, they would notice them immediately. Another problem point is the possibility of accessing the data server in the server farm not through Share Point. It therefore follows, that there is no real supervision of the authenticity of the documents.

A comparison between appraisal of the Ministry records and the records (documents) of the website

The ministry has a good plan for managing records, both traditional documents and electronic ones (unified meta-data, file plan policy), as well as a program for appraising

records, which includes periods of preserving material. However, it has not been adapted for the website, and not been applied to it.

The site does not have an appraisal program, so that the total content of the documents is saved during the updating of the site, with almost no elimination of irrelevant or outdated material but document qualifiers (for ex. structure, context) weren't preserved. In addition, the appearance of the old site has not been retained and, as a result, the connection between the documents has not been preserved. The addition of new documents to the site is not reflected by deleting old pages but rather, by pushing them to the bottom of the page on which they appear, or by saving them in the categories to which they are assigned.

By conducting an in-depth examination of the system for appraising archival material that exists in the management of the ministry records, and comparing it to comparable material on the site – if it exists, and despite the differences in their functions; it can be discerned if there is a common denominator of criteria for determining retention periods. As for documents that are unique to the site, the discussion should center on the specific issue.²³

In accordance with the nature of the website, website harvesting periods will have to be determined, which will be tailored to each sub-site or divisions according to its specific characteristics, as well as the location of retaining those parts intended to be saved on a permanent basis. Perhaps in the government cloud itself, with all the security measures involved? Or perhaps by transfer to a facility at the Israel State Archives? Perhaps on a website in which the material is mostly for public relations purposes (except for Consular Service), the same level of authenticity is not required as in records transferred to the archives from the document management of operational units? These are just some of the questions that arise when planning the work required in future.

Attempts to find a basis for appraisal in existing retention schedules

There were two options to appraise the website:

- From the beginning of the new website in 2013 (The website has undergone a major structural change)
- Or since the website was established in 1993

The meeting with the Head of the Record Management at the Ministry was particularly important, because we touched on the main objective of the study, the evaluation of the archived material of the website. This Department plans to roll out, within two years, the record management procedures of the Ministry, adjusted to the character and needs of the website, including evaluation Amongst the questions cropping up for examination is the location of storage of the records designated for permanence, whether on an internal system or on an external system. The Head of the Department agrees with our opinion that, by means of changes and additions, new documents are created at the Website that did not previously exist, from the aspects of components, content and layout. He is eagerly looking forward to making use of our findings and proposals.

After examining the various sections we decided, at this stage, to deal with an appraisal of the new website, beginning with 2013, with a view to the future, rather than to conduct a retrospective appraisal. This decision was taken due to the different characteristics of the website that was created in 1993 and the difficulties that might arise in an attempt to analyze the two systems concurrently.

From everything described thus far, it appears that the records in the English website should be appraised according to the accepted method. We attempt to adapt the existing model to the website but, it became apparent that such adaptation is not possible. The characteristics of the website records are fundamentally different from those of the classic records. So this method should be adapted to the special characteristics of a website. In terms of the appraisal method, we decided to continue using the currently accepted system (see above) rather than trying another, perhaps more advanced, one such as macro-appraisal. We did this in order to avoid investment in a new infrastructure that would divert the effort from the main objective. Furthermore, it will be easier to examine the case study as it functions within the existing environment. In line with this decision, and since the website represents a large portion of the Ministry's activities, we attempted to adapt the current records appraisal model and its accepted retention schedules to the website records.

Just as appraisal of archival material in the operational records was conducted according to the Ministry's administrative units, thus the various sections of the website will be taken into consideration. Among the special characteristics, it is important to mention the relationships between the various website sections and the movement of records between sections. Furthermore the contents are taken from the regular records, but the format, wording and original content are changed. The changes also include the addition of photographs, video clips and links. Special sections such as Consular Services and MASHAV that are not only informative but also operational provide empty forms to be used by the public for various purposes. These forms are of value in terms of their format as they point to governance practices, yet lack content that can help in determining their retention schedule classification. These issues were addressed by conducting in-depth analysis of the various sections, similar to the analysis already conducted on the MASHAV and Foreign Policy sections. Several issues remain open: how should these records be treated - should their value be measured on their own merit or should archival appraisal address the context within which the record appears? Should the website be appraised as a single unit, including all the records it contains, or perhaps website sections should be clustered into groups that will be appraised based on common characteristics, or maybe each section should be appraised separately? Finally, perhaps a sampling method should be considered?

In addition, in light of the research findings, the ministry of foreign Affairs will have to conduct its website records according to records management procedures, in order to create and appraise authentic records.

Two additional topics may affect website appraisal: first, harvesting and its application to the website or to portions of the site, and secondly, the users - an issue which to the best

of our knowledge has not been taken into consideration in any website appraisal framework. Can the ways in which the website is used - by user segmentation, by website sections and the way they are divided internally - be a factor sufficiently significant to serve as an appraisal and retention schedule criterion? Is it possible that a large number of visits to a website section or to a certain website page points to their importance in the eyes of the users.

Appraisal of archival materials – websites

Archivists faced a new challenge with the emergence of websites in the 1990s: how to cope with electronic records that were organized in their entirety in a manner they had not done previously. The purpose of an organizational website is to make information accessible to the general public about the organization or institute, its objectives, activities, the content of its material, and any other information which it deems necessary, worthwhile, or suitable to be made public. The material posted on the site can be divided into two main groups: records intended to distribute information as a goal within itself; and records that constitute an alternative to administrative services, such as posting forms that are part of a service to the public and receiving them back on-line, in order to implement the public's rights. Due to the nature of the service and its operation, a website is defined as social media. The records constituting the site have different diplomatic forms: some conform to traditional and electronic records, which are the result of a service, and others are more similar to publications – these are part of what was defined above as information. Everything depends on the nature of the site and its purposes. In light of the above, one of the special characteristics of a website is the constant updating of the records appearing on it, with the goal of providing current information in all the fields with which the site is concerned. Updates may be made as often as several times a day during critical periods, and up to every few weeks or more when dealing with permanent administrative material. Because one of the objectives of the site is the distribution of current information, the number of users is one of the characteristic criteria that determine at any one time the measure of the site's success, as opposed to other records which are not made available to the public until they become archival material. This situation raises questions as to the nature of the appraisal and retention of records whose source is the Internet: is it possible to use the same rules of a particular appraisal method, which are applied to traditional and electronic records that deal with the same subjects in the administration of the same organization that operates the website, or is there a need to find appraisal methods that meet the specific needs of a website? Can the number of the users of the site's various sections serve as a criteria for determining the importance of a site, or one of its parts, and influence the determination of a retention schedule for specific materials?

With regard to the process of choosing records for retention on websites or on some of their pages, the system for doing so is harvesting. This refers to a type of software that makes it possible to locate the site or its sections; "to harvest" is to create copies in the computer on a specific date and at intervals of time that have been determined by those responsible for this process. This makes it possible to adapt harvested material to the structure of the site, its content, the time, and a specific situation. For example, on the

Ministry of Foreign Affairs site, during times of war material will be harvested at very short periods of time, compared with harvesting information during periods of calm. Retention by harvest parameters is accepted practice, and is mentioned in the literature. The issue of the number of users and its influence on appraisal has not yet been dealt with in the literature. Only a systematic study over a specific period of time of the number of users compared with the material presented on various parts of the site can provide an answer about this criterion (see below).

For the purpose of demonstration, in this case study of the Ministry of Foreign Affairs site, two of its sections were considered. Two different types were deliberately chosen, each having its own unique characteristics which serve different purposes.

One was MASHAV that can be defined as a subsite, since it is operated by an administrative unit having a certain amount of autonomy when compared to other administrative units of the Ministry of Foreign Affairs. It is mainly operational, and serves as a means of fulfilling the functions of the unit responsible for it, such as presenting courses and everything related to them, MASHAV's activities on four continents, and more. The purpose of this subsite is partly informative and partly fulfillment of administrative functions, such as enabling registration for courses. The function of "Foreign Policy," as its name indicates is to present the past and current policy and activities of the Ministry through information from the past and current news. The format of the material is similar to traditional publications in the written and electronic media.

MASHAV

MASHAV was founded in 1957 with the main purpose of circulating Israel's technological expertise among the developing countries. Today MASHAV is a unit at the Ministry of Foreign Affairs headquarters which works through the Ihud company to service Israeli organizations that deal with international training and consultation for developing countries, providing them with humanitarian as well as technical aid. It implements its training programs with the help of three training centers in Israel. Its fields of activity are those in which Israel has a comparative lead and expertise that have accumulated throughout the years. The subsite includes the structure and activities of the administrative unit. The documents are generally divided into two types: governance and management information, and research and innovative information. The division in which new documents are requested at the greatest frequency is the Newsletter, ranging from one to three documents a month. The site is managed independently by one of the MASHAV staff.

As can be seen in Fig. 2, the subsite is divided into seven divisions, some of which are divided into subdivisions:

 "About MASHAV" presents the organization, MASHAV's history, organizational structure, and policy, which explain the MASHAV organizational unit and its work procedures vis-à-vis private bodies and international organizations.

- "How We Work" outlines MASHAV's activities, the use of its training programs in Israel and abroad and its consultation activities in various countries. MASHAV also conducts international cooperative ventures.
- "What We Do" presents MASHAV's fields of activity, including a link to the organizations that implement these activities.
- "Where We Work" presents the regions and countries throughout the world in which MASHAV activities are conducted. The types of documents are mainly newsworthy information on MASHAV's activities.
- "Publications" contains a collection of publications on MASHAV activities that appear in various formats, both textual and visual.
- "MASHAV Professional Courses" presents the various courses available in a variety of languages for 2014 (and those that were given in 2013), with links to descriptions of the courses. The page in this division includes registration forms for participating in the courses.
- "Latest News" includes news on MASHAV activities. Since there is no definitive
 date, it is difficult to know whether the date that appears is that of the event or of
 the document.

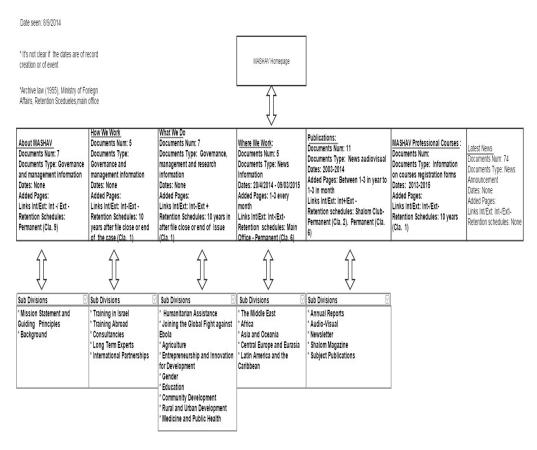


Figure 2 - MASHAV subsite and its seven divisions

With regard to divisions, we collected data that would help us with the appraisal according to the categories common to all records: the name of the division, number of documents, document type, date of creation or event, additional documents, internal or external links, and retention schedules. In addition to the name of the divisions, the following data are also presented: the number of document pages, e.g., the division "About MASHAV" with 7 pages; the document type, e.g., Governance and Management Information in the division "How We Work"; dates – in some of the divisions there are no dates, because the site manager did not list them, e.g., in the division "What We Do," which we then listed as "None," as was also done in "How We Work." In other divisions where dates appear, it is not always clear whether that is the date of the event or of the creation of the document. The next datum is added pages, which is the number of pages added to the division at specific periods of time. An example of that is "Where We Work" to which 1–3 pages are added every month. In addition, we examined whether there are links within the division to other places on the site, or off it. This datum is important to know in order to plan the harvesting process of the division and its various parts, or of the entire site. We marked the links with a + when they appeared, and a when they didn't, as in the "Publications" division. Finally, we noted whether there are retention periods in the Archives Law for material found in the division. We also noted the retention period and the clause in the Archives Law, as in the division "MASHAV Professional Courses," where the retention period is 10 years after file closure or end of issue.

Foreign policy

The "Foreign Policy" division contains documents describing the foreign relations of the State of Israel. It changes and adds information according to the pace of events; in that, it is similar to traditional and electronic media. Various documents may appear on the site several times – in the divisions of the main page of the "Foreign Policy" division and in other divisions on the site, such as "International Organizations." The fact that the same documents appear in different places on the Ministry's site makes it difficult to determine time periods of updating. Obviously, when diplomatic activities are intensified, such as during Operation Protective Edge, material is updated more frequently, 2–3 times as often, depending on the judgment of the site manager. The main page of the division then accumulates the latest major newsworthy items on Israel's foreign policy. In cases of such campaigns retention is permanent, especially if one takes into account the fact that the person responsible for the site has already applied a selection process as to which items to post (there are no clear rules on the issue, only personal judgment). Fig. 3 shows the Foreign Policy section and its twelve divisions.

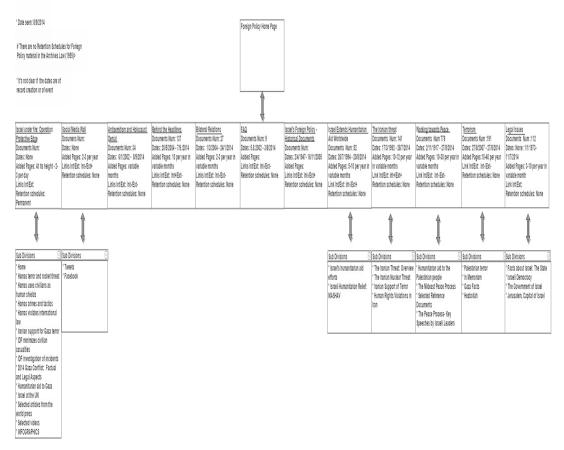


Figure 3 Foreign Policy and its Subdivisions

"Israel under Fire: Operation Protective Edge" is unusual, since it was created during Operation Protective Edge. During that campaign, documents were added to the division and its subdivisions more frequently than during regular times. This division is now featured on the Ministry's home page, at the request of the Ministry administration. The experimental division "Social Media Wall" contains links to Ministry announcements on the Facebook and Twitter social networks, as well as on You Tube. The link is operated by using codes supplied by these networks, which automatically

The link is operated by using codes supplied by these networks, which automatically present the latest posts. This demonstrates the desire to integrate the social media into the website.

"Anti-Semitism and Holocaust Denial" contains reports of anti-Semitic incidents around the world, and the Ministry of Foreign Affair's activities connected with this issue.

"Behind the Headlines" contains items that combine background reviews that present the events with the political stance of Israel on them. Some of these items also appear in other divisions or additional sections of the site.

"Bilateral Relations" presents selected documents that relate to the relations between Israel and other countries.

"FAQ" contains nine documents that provide in-depth explanations of various occurrences in the history of Israel during the last decade.

"Israel's Foreign Policy – Historical Documents" contains documents (some translated into English) and publications, arranged by years, touching on Israel's foreign policy. Some of these publications were produced by bodies outside the Ministry, such as the Prime Minister's Office. These are not scanned documents, but rather are transcriptions of the printed text.

"Israel Extends Humanitarian Aid Worldwide" contains items that describe the international efforts of Israel in the field of human rights. Items related to the conflict between Israel and Iran can be found in the division "The Iranian Threat."

"Working towards Peace" presents items related to the Arab-Israeli peace process, while "Terrorism," as its name indicates, contains documents relating to acts of terrorism committed against Israel.

With regard to the divisions, we collected data according to the categories common to all: the name, number of documents, date of creation or event, additional documents, internal or external links, and retention schedules. The category "Document Type," which appears in the MASHAV data, was eliminated in this section because it was difficult to characterize the type of documents it presents. In addition to the name of the division, the following data appear: the number of document pages, such as "Behind the Headlines" which contains 137 pages; dates – as in MASHAV, in some of the divisions there are no dates because the site manager did not list them, and we noted them as "None." In other divisions, in which dates appear, it is not always clear whether it is the date of the event or of the creation of the document. The next category is "Added Pages" - the number of pages added to the division during various periods of time. For example, to "Bilateral Relations" 2–3 pages were added per year, in different months. In addition, we examined whether there were links in the division to other places on the Ministry site or outside it. This item is important in order to know how to plan the harvesting process of the division and its various subdivisions or of the entire site. We marked + where links were found, and – where they were not, as was done in the "FAQ" division. Finally, we left in the category of retention periods, despite the fact that we did not find in the Archives Law periods for the material appearing in the section, and marked it "None." Only in "Israel under Fire: Operation Protective Edge" did we note the retention period, since this was a unique event.

Attempts to Determine Retention Periods for the Two Sections Examined

Because the Ministry of Foreign Affairs has updated retention periods for the entire administrative structure of the office, an attempt was made to adapt the retention periods of the records for the two sections studied to the retention periods of corresponding administrative units in the structure of the Ministry. With regard to MASHAV, the parallels exist because that section represents a defined administrative unit. Therefore, clauses 1, 2, 5, 6 and 9 of the Archives Law guidelines, as applied to MASHAV, compare with the divisions of the MASHAV section (see Fig. 2). The question remains whether this obligates MASHAV to apply its own retention period to its site.

As for the "Foreign Policy" section, because of its publicist nature it has no parallel in the retention periods that were determined for the Ministry framework; therefore, it seems that only harvesting periods in accordance with the pace of events and/or the number of users can serve as criteria in this case. Since an advance selection of the material presented in this section division is made by the person responsible for the site, and despite the fact that the criteria for his/her choices are unclear, the possibility of setting rules for selection has been discounted at this stage of the appraisal. Therefore, it appears that there is no point in recommending setting retention periods for the "Foreign Policy" section.

From the above two examples, it may perhaps be possible to determine rules with regard to other sections on the site. Each one of them will require a process of study and analysis, both from the aspect of its internal organization and that of its content and the diplomatic form of the records.

Comparison of User Data

The purpose of the experimental analysis is to try to integrate users' behavior on the website into the process of its appraisal. The goal of the data presented here is to present trends and estimates in the field, rather than results. The reasons for that are that the material on the website is mostly different than that of the internal organizational systems and, in contrast to those systems, the material on the site is accessible to the public at all times. Therefore, an external element may be required to assist in the site's appraisal, in addition to – or instead of – the criteria usually used in a standard appraisal, such as administrative use or legal, sociological, and research value.

The program we used was "Piwik," an open source system which can be downloaded from the Internet. It was installed on the Ministry of Foreign Affairs' website, in the government servers' farm, instead of the "Share Point" system, which is used on the site and provides similar options.

Organization of the Data

The Piwik program data were collected from two sections, MASHAV and Foreign Policy, on which we conducted an in-depth study. In addition, a third section – About Israel – was chosen randomly to serve as a control group. The data on the three sections were recorded for the months of February and October 2014, as well as summary data for all of 2014. Comparative reports were produced for the three sections, which present the same data: the number of page views and average time on page during each of the periods studied, with page views representing the number of times a page was visited (see Figs. 4, 6). The average time on page represents the average amount of time visitors spent on a page (see Figs. 5, 7).

February 2014

Number of Page Views in the Sections

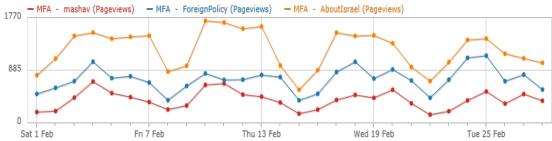


Figure 4 Number of views for MASHAV, Foreign Policy, About Israel, February 2014

- 1. It can be seen that there are page views throughout the entire month in all the sections.
- 2. About Israel is the section most viewed, and the least viewed is that of MASHAV.

Time Spent on a Page

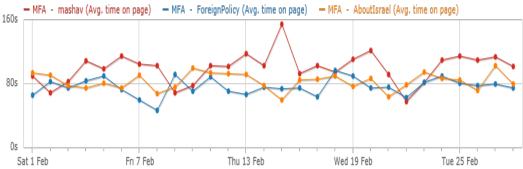


Figure 5 Average amount of time spent on MASHAV, Foreign Policy, About Israel, February 2014

- 1. The average amounts of time spent in the three sections range around 80 seconds.
- 2. Most of the longest periods of time are found in MASHAV, with the peak of time spent on a page occurring on February 15, in that section, at a little less than 160 seconds.

October 2014

Number of Page Views in the Sections

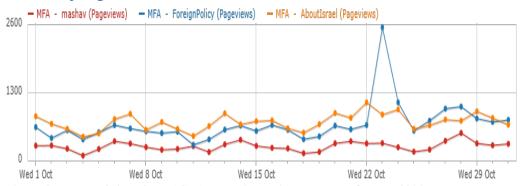
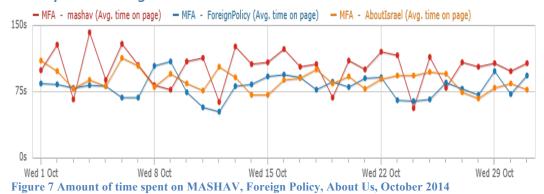


Figure 6 Number of views for MASHAV, Foreign Policy, About Us, October 2014

- 1. All the sections were viewed during the month.
- 2. The number of page views in general, the most page views occurred in "About Israel" and following that, "Foreign Policy." The fewest page views were in MASHAV. A special peak can be seen on 23 October in "Foreign Policy." This may be related to a special incident which took place the previous day in Jerusalem: an Arab terror attack in which *a baby was killed* when it was deliberately run down by a car.

Time Spent on a Page



- 1. The average time spent in the sections, in most cases, is more than 75 seconds.
- 2. The longest average periods of time spent were in MASHAV, with the peak being a little less than 150 seconds.

Comparison of the February and October Data

In a comparison of the page views data for February and October, there are page views in all three sections that were studied. Most page views were in About Israel, while Foreign Policy was second. MASHAV had the least page views of the three (see Fig. 8). On the other hand, the average periods of time spent in the MASHAV section were the longest. In February the average periods of time spent in the MASHAV section were one minute and forty-one seconds, and in October they were one minute and forty-four seconds. The MASHAV section also has the longest average periods of time spent on a page, with a peak of slightly less than one hundred and sixty seconds in February and slightly less than one hundred and fifty seconds in October (see Fig. 9). Apparently, it is the operational nature of the section that causes the lengthy periods of time of page views.

Summary of 2014

Number of Page Views in the Sections

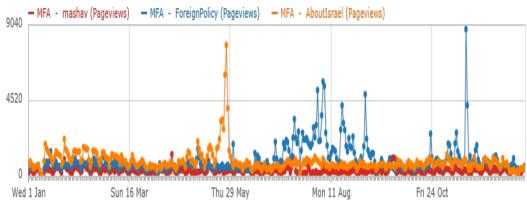


Figure 8 Number of views for MASHAV, Foreign Policy, About Us, Summer 2014

- 1. It is evident that throughout the first half of the year there were more page views in "About Israel" while in the second half there were more page views in "Foreign Policy."
- 2. We can see that there are some peak points of page views both in "Foreign Policy" and in "About Israel", with MASHAV having low page views data throughout the year.

Time Spent on a Page

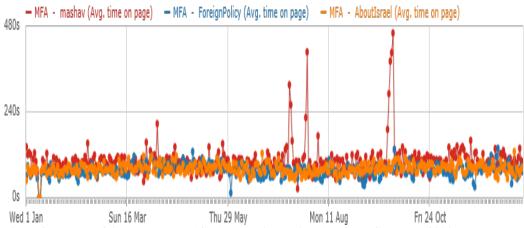


Figure 9 Amount of time spent on MASHAV, Foreign Policy, About Us, Summary 2014

- 1. The average periods of time spent on a page in 2014 were one minute and forty-five seconds in MASHAV, one minute and thirteen seconds in Foreign Policy, and one minute and twenty seconds in About Israel.
- 2. The periods of time spent in MASHAV were lengthier during three periods of the year than the others. MASHAV is also characterized by four leaps in the data.

Conclusion and Trends

1. This type of system makes it possible to observe divisions and subdivisions throughout various periods of time. These data can serve as criteria that influence the appraisal and the determination of retention periods.

- 2. It can be seen that for the years and months studied the sections most viewed are About Israel and Foreign Policy. The section with the fewest page views is MASHAV. However, in MASHAV users spent the most time on pages, in accordance with the nature of the site and its operational nature.
- 3. According to the experience of the director of the website, the minimal significant amount of time spent on a page is at least 60 seconds. This datum requires additional study.
- 4. An additional element influencing the data presented here, which was not taken into account because it is presently beyond the scope of the research conducted, is the quality of the website from the aspect of its accessibility and links.

Summary and Conclusions

The tests we conducted included a review of the literature on the subject, mainly instructions for retention of websites such as those of the British National Archives, and the Archives Law of Israel and its regulations regarding records of the Ministry of Foreign Affairs. We also conducted an analysis of the structure and content of the Ministry of Foreign Affairs website in English, focusing in-depth on the sections MASHAV and Foreign Policy in order to demonstrate two different types of records and information included in each of them, on the assumption that they can constitute a basis for appraisal of additional sections. We also made a comparison of three sections of the website: MASHAV, Foreign Policy, and About Israel, with regard to user behavior, according to number of visits and the amount of time spent there. From all the above, several conclusions can be reached, as follows:

- We did not find in the regulations for the retention of government websites any special appraisal instructions, only general instructions on procedures according to the Archives Law.
- The Archives Law of the State of Israel does not mention the subject. Therefore, we can conclude that there are no practical instructions on this topic.
- The solution, in light of the above facts, is retention of the entire website and its contents in their entirety as is; or operating a harvest program programmed to act on fixed dates, as per the instructions of the British National Archives, or adapted to the contents of each section. It does not seem feasible to operate a harvest program at lower levels, whether from the aspect of content or due to technical difficulty.
- Due to the special characteristics of each section, the analysis of the two sections above indicates a method of analysis, but it must be adjusted to each section according to its needs.

In the case of MASHAV, due to its close adherence to the MASHAV administrative unit and its operational nature, it can apply the retention periods that were determined for the administrative unit by the Archives Law (see the MASHAV table, Fig. 2).

In the case of the Foreign Policy section, due to its informative – almost journalistic – nature, it may well be that there is an intrinsic value to statistical data – quantity of users, and the time they spend in the section – as parameters for appraisal, beyond the contents

themselves. With regard to this section, there is no possibility of relying on a previous appraisal, because one does not exist.

Several topics still await study and discussion:

- The subject of transferring the entire website, or parts of it, for permanent storage in the Israel State Archives, similarly to the records intended to be stored permanently in the Ministry of Foreign Affairs, has not yet been dealt with.
- If it is decided to conduct an appraisal according to sections, and to determine retention periods for each of them according to the administrative structure of the Ministry of Foreign Affairs, as prescribed by the Archives Law, the technological aspect of its implementation will need to be studied.
- There is a need to define the meta-data required to preserve the authenticity of the stored records and to prevent changes in them.
- A study of the entry points of the users and their geographical origins may constitute parameters of significance in the evaluation.
- Use of statistical methods on sample records for purposes of choosing material for preservation.

Appendix

This appendix presents four questionnaires that constituted a part of the in-depth learning stage of the Israel Ministry of Foreign Affairs website. Four questionnaires that were directed to the managers and staff connected with of the Ministry website were chosen. Ms. Sarah Lederhendler is the webmaster of the site in English; Ms. Avnit Rivkin is the webmaster of the MASHAV sub-site, which functions almost completely independently; Ms. Rina Djerassi is the Manager of Training and Computerization in the Consular Affairs Division, which includes material of an administrative nature; Mr. Alon Gilad was Head of the Internet & Media Projects Team, Computer Department, at the Ministry, and Ms. Nirit Bar-Or has replaced him.

Questions to Sarah Lederhendler, Department of Digital Diplomacy – senior webmaster:

- 1. What are the structure and activities of the website?
- 2. How is the website organized?
- 3. In your opinion, what is the role of the website; what activities of the Ministry does it address?
- 4. Is there a directive or instruction from the Ministry management regarding the website its status, regulations?
- 5. Where does the material for the site come from?
- 6. Is there any control of the materials on the site?
- 7. To what extent is accuracy important in your work, and who checks your work?
- 8. What is the connection to the website in Hebrew?
- 9. System of content management:
 - 9.1 What software is installed?
 - 9.2 Were any specific adaptations made to the software?
 - 9.3 Where is it located?
 - 9.4 Where is the server of this system located?
 - 9.5 What is the connection to the website itself?
 - 9.6 What are the contents managed by the system?
 - 9.7 How are they related/ linked to the different parts of the site?
 - 9.8 What metadata do the documents have?
 - 9.9 What types of files are created?
 - 9.10 Are there standard names for the files? Do they change?
 - 9.11 How and where are they organized? Why did you organize them in that particular form?
 - 9.12 Is the folders directory linked to the content management system for?
 - 9.13 Are the files created in the same system?
- 10. Is there management of key words?
- 11. Do the documents have copies in additional places? (We saw, in practice, that she creates new documents.)
- 12. What are the operating and application systems linked to the content management system?
- 13. What are the tools linked to the computer that help in the creation of the files?
- 14. Who has access to the files?
 - 14.1 At what stage of the work, and what is the nature of the work?

- 15. What are the various stages of the work, and how are they defined?
 - 15.1 Is there any control over the work? Over all of it, Or only over some parts?
- 16. How does anyone know that the document has not changed over time?
- 17. What happens to the work products, and the work by-products? Where are they saved, and for how long?
- 18. How do is tracking users' requests conducted?
- 19. How many distribution systems to users or clients are there today such as 'Press Room', 'Newsletter'?
 - 19.1 What is the difference between RSS and the Newsletter system?
- 20. Are there any statistics regarding the website?
- 21. When content is received from external sources, which has ownership of it?

Questions to Avnit Rivkin, webmaster of the MASHAV sub-site:

- 1. What does the MASAV do, in general?
- 2. Are there such divisions in other foreign ministries?
- 3. Is there control over the material on the website?
- 4. To what extent is accuracy important in your work, and who checks your work?
- 5. What is the structure of the website?
- 6. Where does material on the website come from?
- 7. What is the connection to the website in Hebrew?
- 8. System of content management:
 - 8.1 What software is installed?
 - 8.2 Were any specific adaptations made to the software?
 - 8.3 Where is it located?
 - 8.4 Where is the server of this system located?
 - 8.5 What is the connection to the website itself?
 - 8.6 What are the contents managed by the system?
 - 8.7 How are they related/ linked to the different parts of the site?
 - 8.8 What metadata do the documents have?
 - 8.9 What types of files are created?
 - 8.10 Are there standard names for the files? Do they change?
 - 8.11 How and where are they organized? Why did you organize them in that particular form?
 - 8.12 Is the folders directory linked to the content management system for?
- 9. Are the files created in the same system? Do the documents have copies in additional places?
 - 9.1. How are the contents of the website, and the files created, managed?
- 10. What are the operating systems and software that are being used?
- 11. What are the tools linked to the computer that help in the creation of the files?
- 12. Who has access to the files?
 - 12.1. If so, at what stages of the work, and what is the nature of the work?
- 13. Is there any control over the work?
- 14. How does anyone know that the document has not changed over time?
- 15. What happens to the work products, and the work by-products?
- 16. Are there any statistics regarding the website?

Questions to Rina Djerassi, Consular Affairs Division, Manager of Training and Computerization:

- 1. What is the role of the division?
- 2. Who decides what will be appear on the website?
- 3. Is what appears on the website identical to the internal systems?
- 4. What is the connection with the legations?
- 5. How do they deal with requests from the public?

Questions to Alon Gilad and Nirit Bar-Or (Head of the Internet & Media Projects Team, Computer Department):

- 1. Please present a general picture of the website, from the technological aspect software and hardware.
- 2. Is there general metadata for the site; for a sub-site; for a page on the site?
- 3. How is the website folders directory managed?
- 4. How is a cumulative page managed?
- 5. Where are YouTube clips saved, and how?
- 6. Is it possible to see an optional list of key words?
- 7. Do they conduct tests on materials that are updated (technologically)?
- 8. Are there any statistics on pages preferred by the public?
- 9. Did you harvest the site in the past?
- 10. Is it possible to harvest the site?
- 11. If so, is it possible to reduce the level of website's security on material intended for harvesting?