The present paper is based on a presentation given at the 28th Annual Meeting of MELCOM International, the European-based Middle East Library Committee, held 19–21 June 2006 in Istanbul, Turkey. It aims at describing the OACIS Project (Online Access to Consolidate Information on Serials). The paper will cover the following topics: The need for and beginnings of the project; Yale University Library’s (YUL) involvement with the project; the role of other university libraries that participated; and, finally, the exchange of knowledge and expertise connected with the project. It presents a short review of the methods and the retrieval software utilized by researchers and concludes by discussing the main objective of the project, namely, the mutual benefits of the exchange of expertise among librarians and interns from the Arab world on the one hand and the administrators and librarians of the OACIS Project on the other hand.

The Origin of the Project and its Beginnings

In today’s fast-paced world of information creation and dissemination, replete with various formats of communication, electronic databases, digital libraries and archives, librarians and systems experts play a vital role in developing and sustaining viable information. These initiatives will be more successful where there is closer cooperation among libraries in different parts of the world. Projects such as OACIS lead to enhanced collaboration and support the information needs of scholars and researchers of Islamic civilization from around the world. In particular, this project facilitates the transfer of information and knowledge contained in serials pertaining to Middle Eastern and Islamic Studies published in the Middle East, North Africa, North America, and Western Europe, in the various Western

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European languages as well as in Arabic. OACIS provides for scholars and researchers the essential information that identifies the location and provenance of specific articles and journal issues held by each library participating in the OACIS Project. Longer-term the project, we hope, will contribute to mutual respect and greater understanding between scholars from Middle Eastern and Western societies.

Project OACIS (Online Access to Consolidated Information on Serials)

To build on the early 90s work of staff at the University of Washington Library (the so-called Khoury-Bates union list), Simon Samoeil, Yale’s Curator of the Near East Collection suggested that the Library requests funding from the U.S. Department of Education under its TIC-FIA program. to develop a more comprehensive resource available via the Web. The application was successful and OACIS was launched in Fall 2002. Over the next 3 years, over 24 additional university libraries in the United States, Europe, and the Middle East became involved with the project. The project’s goals were to support a better understanding of the Middle East economically, politically, linguistically, and culturally.

The OACIS project, which includes serials in print, microform, and electronic formats, can now be searched and its information retrieved free of charge. The OACIS database identifies not only serial titles, but also the specific libraries where serials related to the Middle East and their holdings are housed. Needless to say, the numbers of these serials are continuously increasing. Beginning in the summer of 2006, the OACIS database included serials published in 45 different languages, the five major languages being Arabic, English, Persian, Turkish, and French. These serials are published in 83 countries, the most frequent ones being Egypt, Turkey, Iran, Pakistan, Morocco, Iraq, Saudi Arabia, Syria, and Tunisia. As of August 2007, the number of serial records listed in OACIS was 65,080. Approximately 50% of these are unique titles, i.e. they are to be found in only a single library. There are 83,185 holdings records in OACIS. Although OACIS is not a cataloging tool per se, it can be utilized as a cataloging facilitator by searching for a specific title in the database. The OACIS system will then retrieve the desired item(s) and give the researcher a variety of options. For example, clicking on the option titled “Library View” will display to the user a MARC record for the searched title. This view can provide high quality catalog records for Middle Eastern and other libraries that
otherwise do not have cataloging staff, in turn expanding cooperation and participation among libraries.

For a relevant example of the “Library View” option, using the title search, please examine this link:

http://oacis.library.yale.edu/oacis/scripts/m_result.php?
searchMod=bl&type=en&z=0&w=0&x=Title&y=dirasat
%20arabiyah&kid=up99331

Two other important aspects of the project were: to facilitate Interlibrary Loan/Document Delivery services for Middle Eastern serials; and to digitize and help preserve selected journals from and about the Middle East. Unfortunately, neither objective has so far been fully realized. But the OACIS team was able to experiment in digitizing certain selected titles. We also chose the Tishreen University in Latakia, Syria, to participate in a library pilot project for the beginnings of a viable Interlibrary Loan/Document Delivery system. These two initiatives will evolve as part of the Yale University Library’s new AMEEL Project (Arabic and Middle Eastern Electronic Library, also funded by the U.S. Department of Education’s TICFIA program). For the relevant link regarding AMEEL, click on: http://www.library.yale.edu/ameel/

The libraries participating in OACIS have committed themselves to supplying updated Middle Eastern periodical records every three months to Elizabeth Beaudin, the Technical Administrator at YUL. OACIS will be continually updated and permanently maintained by the Yale’s Integrated Library Technology Services Department.

Yale University and the OACIS Project

The OACIS project is a cooperative endeavor between YUL’s Near East Collection; the Electronic Collections Department; Ann Okerson, Associate University Librarian for Collection Development; and the Middle East Council of the MacMillan Center for International and Area Studies Center at Yale University. OACIS members have expended four years of concentrated effort to achieve their goal of empowering researchers to retrieve important and relevant information related to the Middle East, a region which is becoming ever more important. For more information regarding the TICFIA program, see: http://www.ed.gov/programs/iegsticfia/index.html

The YUL has contributed a 30% cost-share to the TICFIA project. In addition, libraries participating in OACIS have supported the project by contributing the holdings of their serials databases. The
database is located at the Yale University Library, with mirror sites at the Bibliotheca Alexandrina (Egypt) and the Library at Halle University (Germany). The purpose of the mirror sites is to facilitate the availability of OACIS resources to users in the Middle East and Europe. The link to the mirror sites can be accessed at: http://www.library.yale.edu/oacis/oacisMirrors.html

Advisory Board

The role of the Advisory Board, composed of the institutions listed below, is to give important suggestions regarding the overall parameters of the project. From the beginning, the Advisory Board has played an important part in contributing ideas concerning the goals, design, and display of the project. The Board, during its annual meetings at the YUL, has helped to debate and discuss various aspects relating to the project. Following is a list of the member institutions:

Alexandria Library, Alexandria, Egypt
Cornell University, New York, United States
Ohio State University, United States
Universität-und Landesbibliothek Sachsen-Anhalt, Halle, Germany
University of Pennsylvania, United States
University of Michigan, United States
University of Texas, United States
University of Washington, United States
Yale University, Connecticut, United States

Participating Universities

As noted above, the OACIS project includes European, American, and Middle Eastern libraries. In addition, librarians from the Middle East have contributed their time and expertise to the design and the efficacy of the project. The number of participating institutions in OACIS has more than doubled since the start of the project. The geographical area represented by the OACIS community has also expanded. Two thirds of the participating universities and libraries are from the United States (17 out of 24): Cornell University, New York University, Ohio State University, Princeton University, University of Illinois at Urbana-Champaign, University of Pennsylvania, University of Michigan, University of Texas, University of Washington, Stanford University, Harvard University, University of Arizona in Tucson, the New York Public Library, the University of Utah, Yale University, Yale
Law Library, and University of California, Los Angeles. Six Middle Eastern universities participate in the project: the American University of Beirut, Lebanon; the University of Balamand, Lebanon; the Bibliotheca Alexandrina, Egypt; Tishreen University, Latakia, Syria; the University of Jordan, Amman; and the American University in Cairo. Two institutions are based in Europe: the Universitäts-und Landesbibliothek, Sachsen-Anhalt, Halle, Germany; and the School of Oriental and African Studies at the University of London, UK. Several other institutions plan to contribute the records of their serials to OACIS. We are trying to add both the al-Asad National Library in Damascus, Syria, and the Egyptian National Library and Archives in Cairo, Egypt to the OACIS project.

Exchange of Knowledge and Expertise

Perhaps the most important aim of the OACIS project is to facilitate and expand the exchange of ideas and skills. To further this ambition, five interns from different libraries in the Middle East were invited to the Yale University Library, where they spent a total of nine months working on different aspects of the project. The interns were selected by the OACIS team at the YUL on a competitive basis from a pool of qualified candidates from Arab countries in the Middle East. During their stay at Yale, the interns worked closely with several library personnel: Simon Samoeil, Curator of the Near East Collection and Project Manager of OACIS; Elizabeth Beaudin, Technical Administrator of OACIS; and Kimberly Parker, OACIS project Co-Principal Investigator; as well as various staff members of the Near East and Electronic Collection teams.

The first intern selected was Mr. Atif al-Jundi, Head of the Serials Department at the University of Jordan Library. The second intern was Mr. Adeeb Khoury, Head of the Acquisition Department at the Tishreen University Library in Latakia, Syria. Each intern spent three months at the Yale Library. Their principal task was to coordinate the databases of the holdings at their respective university libraries and to work towards the integration of these databases within the OACIS bibliographical database. In addition, Mr. Khoury created call numbers for the serial records of Tishreen University Library, according to the Modified Dewey Decimal Classification scheme. It is worth noting that the Tishreen University Library had not used, prior to this initiative, any classification numbers for their periodical records. Mr. Khoury worked also with Mr. Nachi Kenffer, a student at Yale University’s Near
Eastern Languages and Civilizations Department, to translate from English into Arabic the relevant Library of Congress Subject Headings for the Middle East, in addition to the geographical place names. These Arabic subject headings and geographical place names were entered according to the same procedure that renders them searchable and retrievable in the OACIS database. This process will facilitate research by using the Arabic language for information retrieval.

In addition, three other interns later joined the OACIS Project, two of whom were computer programming engineers from the Bibliotheca Alexandrina in Egypt; the third intern was an information technology librarian from Balamand University Library in al-Kurah, Lebanon. Each of the three interns worked for one month on the OACIS project during the summer of 2005. Mr. Muhammad al-Halosy and Mr. Shenuda Guirguis concentrated their efforts on two aspects: strengthening the underlying programming for the OACIS project and implementing efficiencies for its long-term maintenance. First of all, Mr. al-Halosy worked on improving the preliminary models for entering data. These will enable participating institutions that do not have automated library systems to contribute their bibliographical and holdings information records to OACIS.

2) Both interns made it possible for the OACIS project technical administrator to integrate the data of periodicals records coming from the Jordan and Tishreen universities. Hence, these records will be more easily integrated into the OACIS server, and be simultaneously transformed into MARC formatted records. In addition, both Mr. al-Halosy and Mr. Guirguis dealt with issues concerning the digital display of OACIS holdings, under the supervision of the technical administrator of the project. The preliminary model for this kind of display had been developed during an earlier visit of Dr. Beaudin to the Bibliotheca Alexandrina. Another task of Mr. Guirguis was to develop models for data entry in order to maintain an efficient workflow in regard to the organization of metadata related to the digital contents of OACIS.

Dr. Beaudin and Mr. al-Halosy traveled to the Metro Digitization Expo, organized by the Metropolitan New York Library Council. Mr. al-Halosy attended meetings of the Expo and participated in discussions about the creation of digital collections. On the other hand, Mr. Guirguis, in his capacity as a member of the OACIS team, was involved in the auditing process conducted by the U.S. Department of Education at the Yale University Campus.
The fifth and last intern was Ms. Randa al-Chidiac, Information Technology Librarian at the Balamand University Library. Ms. al-Chidiac worked on expanding the scope of the project and on developing information retrieval process from its database. As a first step, she surveyed and identified, by searching the Internet, important electronic journals currently available online either free of charge or by subscription. These periodicals might at a later time be added to the OACIS database. Her second task was to conduct a survey of significant libraries in the Arab world containing major collections of journals related to Arabic and Islamic studies, and to work with these libraries to establish an Interlibrary Loan Program between them and the OACIS libraries. This task involved formulating survey questions regarding the possibility of libraries in the Middle East participating in an interlibrary program with the OACIS project. In addition, Ms. al-Chidiac worked on integrating the serials and holdings database of her home institution, al-Balamand University, into the Project.

The interns visited several Yale library departments in order to learn more about their organization and workflow. In addition, several interns toured other important universities on the East Coast of the United States. Two of the interns were able to travel to the Harvard University Library and the University of Pennsylvania Library. They were given an extensive tour and historical explanation regarding the Middle Eastern collections of both libraries, and were able to visit with the University of Pennsylvania Middle East Bibliographer. The interns were shown how both institutions conduct their cataloging and acquisitions workflows. These visits provided mutual benefit to both parties, as each side shared their own knowledge, experiences and expertise.

Both Mr. Atif al-Jundi and Mr. Adeeb Khoury visited the Yale University Center for Languages Studies and recorded prose and poetry readings in Classical Arabic for the use of the Center’s students. In addition, Mr. Atif al-Jundi recorded several readings in the colloquial Jordanian Arabic, and Mr. Adeeb Khoury recorded readings in the colloquial Syrian Arabic. These recordings will benefit both teachers and students of Arabic at Yale University. Mr. Adeeb Khoury also participated in activities of the greater New Haven community. He gave an extensive lecture at the New Haven Free Public Library about his native country, Syria. The lecture was well attended, and the American audience asked Mr. Khoury many stimulating questions.

The internship program of OACIS has been a great success, with benefits flowing in both directions. The staff of the host institution,
the YUL, has gained valuable knowledge and information concerning library practices of the Middle Eastern region. The interns have learned more about American culture and life, as well as Yale library procedures. The interns on several occasions were able to attend various Yale College functions, where they observed particular facets of the lives of American undergraduate students.

The OACIS Philosophy and Infrastructure

From the start of the project, the team members at YUL investigated the idea of developing an infrastructure that does not require licenses and thus would allow OACIS to share data with other members freely and with minimal technical difficulties. This is important not only because of the potential costs of proprietary software licenses but also because of the fact that technical stability is fostered by open source standards that encourage the free redistribution of software and the sharing of source codes. According to Dr. Beaudin, “an Open Source license indicates that the software in question is available for free and can be modified and upgraded freely.” Furthermore, she notes that modifications can be redistributed freely as well, thus creating an evolving and self-correcting product. None of the software used in the OACIS and the evolving AMEEL online systems requires or depends on proprietary software components, thus avoiding complicated licenses whose stipulations can change over time. The Open Source system for the OACIS and evolving AMEEL online systems consists of the following components:

- Server operating system: Linux 2.6.9-34.0.1.EL via Red Hat 9.0 Enterprise
- Web server: Apache 2.0.46
- Database: MySQL 5.0.19
- Application languages: PHP 4.3.9, JavaScript 2.0, HTML

Searching and Languages in OACIS

The OACIS database can be searched in five languages: Arabic, German, English, Spanish, and French and three search options. The first is a Basic Search, either by title, place of publication, or subject (keyword). The second option is the Advanced Search, by place of publication and subject (keyword). The third option is to limit the search in the Advanced Search to a particular library that can
be found in the list of participating libraries displayed in a drop-down menu. This option is useful because the researcher can easily determine the particular journal holdings of specific libraries within the parameters of subject or place of publication. This option is especially useful to the librarian who wishes to compare the holdings of different member libraries for selection and acquisition of new and back issues of journals needed for a given collection. The following screen shots provide an overview of the searching capabilities and process in OACIS, including the Basic and Advanced options, as well as the “limited by library” option. For the complete PowerPoint presentation at the MELCOM conference in Istanbul, which includes a fuller account of searching, please visit the following website:
http://www.library.yale.edu/neareast/simon%20Istanbul.ppt

Basic Search screen shots
(http://www.library.yale.edu/neareast/oacis/basicsearch.html)
Advanced Search screen shots
(http://www.library.yale.edu/neareast/oacis/advancedsearch.html)
Advanced Search screen shots with Limited Library selected
(http://www.library.yale.edu/neareast/oacis/limitsearch.html)
In conclusion, the Project has proven the mutual benefits of the exchange of expertise between librarians and interns from the Arab world on one hand and the administrators and librarians of the OACIS project on the other. Originally, the project was supposed to end on the 30th of September 2005, but we were granted a one-year extension. According to the provisions of the original grant, Yale was authorized to do all project updates and to keep the site online and available to patrons for the next three years. Scholars and students at Yale and abroad quickly realized the importance of the project. One relevant example is the assessment made by Associate Professor Ellen Lust-Okar of the Political Science Department and Chair of the Middle East Council at Yale University. Professor Lust-Okar noted the usefulness and importance of the project for both her and her students in Middle Eastern Studies. Another example is provided by Harvard University Library’s recent decision to participate in the project and add its records to the OACIS database. At the same time, the YUL intends to update the project records and keep the site available to patrons free of charge in perpetuity, if possible. On their part, all member libraries have agreed to continue providing their updated records to the Project every three months.