### DOCUMENT RESUME

ED 221 221

IR 010 '396

AUTHOR

White, Phillip M.

TITLE

Online Retrieval Systems Users Survey from Texas.

PUB DATE NOTE

[81] 16p. '

EDRS PRICE **DESCRIPTORS** 

MF01/PC01 Plus Postage.

\*College Libraries; Databases; \*Information

Retrieval; Library Planning; Library Surveys; \*Online Systems; Private Colleges; \*Reference Services; Two

Year Colleges; \*Use Studies

IDENTIFIERS

Bibliographic Retrieval Services; DIALOG; ORBIT;

### ABSTRACT

Based on a survey of 160 Texas college and university libraries, this study reports on their access to and usage of 3 online information retrieval systems: Bibliographic Retrieval Services (BRS), Lockheed's DIALOG Information Services, and System Development Corporation's ORBIT Information Retrieval System. The study finds that 2# percent of all respondents have access to BRS, DIALOG, or ORBIT, or a combination of the three. Figures are given for percentages of appropriate respondents with online searching facilities among libraries at public schools (30 percent), private schools (13.7 percent), two-year colleges (11 percent), 4-year colleges (3 percent), universities with graduate programs (57 percent), and graduate or professional schools including theological seminaries (29 percent). Results show that of 32 respondents reporting access to the BRS, DIALOG, or ORBIT systems, 31 access DIALOG, 20 access BRS, and 16 access ORBIT. In addition, 23 of the schools report access to more than 1 system. Finally, the study indicates that DIALOG is searched primarily because searchers are more familiar with its system; BRS is searched primarily because it is the least expensive system to use; and ORBIT is searched primarily because it offers unique databases. (Author/ESR)

Reproductions supplied by EDRS are the best that can be made from the original document. \*\*\*\*\*\*\*\*\*\*\*\*

\*\*\*\*\*\*\*\*\*\*\*\*\*\*

#### U.S. DEPARTMENT OF EDUCATION NATIONAL INSTITUTE OF EDUCATION EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

- This document has been reproduced as received from the person or organization originating it.
- Minor changes have been made to improve reproduction quality
- Points of view or opinions stated in this document do not necessarily represent official NIE position or policy

ONLINE RETRIEVAL SYSTEMS

USERS SURVEY FROM TEXAS

bу

Phillip M. White

"PERMISSION TO REPRODUCE THIS MATERIAL HAS BEEN GRANTED BY

Phillip M. White

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."



Online Retrieval Systems -- Users Survey from Texas

## INTRODUCTION

Questionnaires were mailed on September 1, 1981, to the libraries at 160 Texas colleges and universities to poll their use of the following three commercial bibliographic database retrieval systems: BRS (Bibliographic Retrieval Services, Inc.), DIALOG (DIALOG Information Services, Inc., of the Lockheed Corporation), and ORBIT Information Retrieval System (of System /Development Corporation). Although there are other important online systems available to libraries, such as those offered by NLM, New York Times, ISI, I.P. Sharp, Dow-Jones, Pergamon, and Mead Data Central, this author feels that BRS, DIALOG, and ORBIT are still the most attractive systems to libraries because of the variety of subject areas covered by the many databases on each of these systems.

The National Library of Medicine (NLM) provides direct access to its databases. NLM's primary database, MEDLINE, has also been available through BRS since 1976 and is now available through DIALOG.

ORBIT may soon make MEDLINE available, too. However, this author recognizes that most medical libraries use NLM extensively. The variety of subject-area databases available through BRS, DIALOG, and ORBIT, however, place these systems in a class of their own. At this time, BRS offers about 40 databases, DIALOG offers about 120, and ORBIT offers about 80 databases. This is

a time of rapid growth and healthy competition between these systems. And, many colleges and universities that do not have online information retrieval services in their libraries are now seriously considering starting such a service, and are forced to make decisions regarding which system(s) to use to best serve the needs of their clientele. Studies such as this survey will hopefully provide useful information to those decision-makers who are considering online services in their libraries.

The 160 schools polled are those listed in the <u>Yearbook of Higher Education 1980-81</u> for Texas. These are public and private universities and colleges, including 2-year community and junior colleges, 4-year colleges, 4-year and graduate colleges and universities, and graduate and professional schools. The schools vary from large universities to community colleges to medical schools, technical institutes, and theological seminaries. Table I illustrates the general types of schools polled.

Yearbook of Higher Education 1980-81. (Chicago: Marquis Who's Who, Inc., 1980) pp. 517-548.

Table I .

Types of Schools Polled

Academic * type	Publie	Private	Totals
2-year	. 60	4	64
4-year	. 6	30	36
4-year and graduate	28*	14	.42
Graduate/ Professional	7	, 11·	18

public: 101

private: 59

160 TOTAL

(\* Two of the schools in this category are upper-division and graduate only)

Of the 160 schools polled, 134 (or 83.3%) responded. Table II illustrates the responding schools.

Table II

Types of Schools Responding

Academic				,	•
type	Public	Ĵ	<u>Private</u>		<u>Totals</u>
2-year	52	-,	4	•	56
4-year	. 4.	. •	22		26
4-year and graduate	. 21	ر	14		35
Graduate/ Professional	7		10	•	17
	· · · · · · · · · · · · · · · · · · ·	<b>.</b>		•	لم

public: 84

private: 50

134 TOTAL

# PURPOŠE

Many college and university libraries are considering offering online search services to their clientele. Administrators at these institutions may benefit from knowing which systems are proferred by the online librarians in schools already utilizing. such online systems. This survey attempts to determine where we stand now in Texas colleges and universities with regard to use of the three primary bibliographic retrieval systems available in the U.S. Many factors are involved in choosing an online database system to use. Does the online system offer the databases that are likely to be in demand for the academic departments served? Is the online system economical to search? Are there special features or characteristics about the system · that make it especially suitable to meet the needs of the library's patrons? Factors such as the number of years online of a particular database, numbers of hours each day that the system is up, and the ability to use certain codes when searching a particular database may all be taken into account when deciding which system to use. Since neither BRS, DIALOG, nor ORBIT require subscription fees, many libraries prefer to establish access to more than one system. YWhen two or three systems. . are available to use, which system is used the most, and why? Answers to these questions may benefit those administrators and librarians who are beginning online searching.

# METHODOLOGY

.This survey is concerned with three questions: (1) What



types and how many schools offer online searching in Texas?

(2) Of BRS, DIALOG, and ORBIT, which is used the most? (3) What is the primary reason online searchers use each of these systems?

Each online searcher in each college and university library was requested to fill out a questionnaire. There are three parts to the questionnaire. First, the searcher was asked to indicate the online systems to which his library has access.

Next, for each of the three systems to which he has access, the searcher was asked to indicate the single, most important reason he uses that system. Example A gives the wording on , the questionnaire.

### EXAMPLE A

I search (BR only on	S or DIALOG c	or ORBIT) primari	ly because	(choose
a.	Economical -	It is the least to use.	expensive	• . system
•	•	<pre>lusivity - It is to which I have the database(s)</pre>	access tha	t offers search.
	System featu	res - It offers r or techniques th facilitate the s	nat improve	feature or
đ.	Familiarity v	with the system training or expenses system.	I have had erience with	d more
e.	Other reason	(specify) -	•	, , <b>, -</b> ;

The third part of the questionnaire attempts to determine the approximate quantity of searching done on each system, in

Comments on your answer:



an'effort to 'weigh! the importance of the answers of each respondent. Example B provides the wording on the questionnaire.

## EXAMPLE B

In this survey, a SEARCH is defined as: each time a database is searched for an individual. On an average, how many searches do you do per month on each system?

I do \_\_\_\_\_ searches per month on (BRS) or (DIALOG) or (ORBIT).

## RESULTS

A. What types of schools offer online searching on BRS, DIALOG, or ORBIT?

The availability of online services in a college library may be a determining factor of the quality of service provided for the institution's students, faculty, and staff. A distinction was made in the survey between publicly supported and privately supported colleges and universities to determine whether public schools or private schools of higher education provided online services more often.

59 private colleges and universities were polled, and 51 responded. Of these, only 7 (or 13.7%) offer online searching.

101 public colleges and universities were polled, and 83 responded. Of the 83, 25 (or 30%) offer online searching.

The significant difference in the percentages of public and private schools offering online searching is further exemplified by the fact that most of the 2-year colleges responding are public schools.



Therefore, students and faculty at public institutions of higher education in Texas are more likely to have the benefits of online services in their libraries than are those in private colleges and universities in Texas.

2-year colleges are expected to offer online services less often than 4-year and graduate colleges since their research needs, and library collections, are usually less extensive. Only 6 (or 11%) of the 2-year colleges that responded offer online services. These are all public colleges. One uses BRS exclusively, 3 use DIALOG exclusively, and 2 use both BRS and DIALOG.

Of the 26 4-year schools, without graduate programs, only 1 (or 3%) offers an online search service in the library.

However, of the 35 responding universities that do have graduate schools, there are 20 (or 57%) that offer online services in their libraries. This represents a tremendous difference between the availability of online services at 4-year colleges and at universities that also have graduate schools. The research needs of graduate students and faculty may explain this discrepancy.

5 (or 29%) of the 17 graduate or professional schools responding offer online services. Many of the schools in this category are theological seminaries, and research via BRS, DIALOG, and ORBIT may not be of great utility to them. Consequently, the percentage of graduate and professional schools having online services is less than the percentage for full universities, which have a variety of graduate programs.

Altogether, there were 134 responding schools in the survey.

Only 32 (or 24%) of these schools reported access to BRS, DIALOG, or ORBIT. Table III exhibits the types of schools offering access



to one or more of the three systems.

Table III

Texas Colleges and Universities Accessing

BRS, DIALOG, or ORBIT

Type of School	Number Schools	<pre>% Schools Responding in this category</pre>
2-year	6	11%
4-year	° 1	3%
4-year and graduate	20	578°
Graduate/ ,Professional	5	. ) '

Total: 32 Schools

Total: 24% of Total Schools

Therefore, only about 1/4 of all colleges and universities in Texas now offer online services through BRS, DIALOG, or ORBIT.

B. Of BRS, DIALOG, and ORBIT, which is used the most in Texas colleges and universities?

32 colleges and universities reported access to BRS, DIALOG, or ORBIT in their libraries. DIALOG is used by 31 of these schools; BRS is used by 20 of these schools; and, ORBIT is used by 16 of these schools. However, only 8 schools reported using DIALOG exclusively, and only 1 school uses BRS exclusively. No schools reported using ORBIT exclusively.

There are many reasons for a library to have access to more than one online system. Each system offers some databases that are not offered by any of the other systems. Also, should one system be down,



1(9)

another system may be used as a back-up. Additionaly, costs for searching and printing vary considerably between systems.

Of the 32 schools reporting access to BRS, DIALOG, or ORBIT, 23 (or 72%) indicated use of more than one of the systems. Table IV illustrates the numbers of schools utilizing more than one system.

Table IV

# Numbers of Schools Accessing More Than One System.

Systems Used	No. Schools Reporting	% Using Multiple Systems
BRS, DIALOG, and ORBIT	12	52%
BRS and DIALOG	7	30%
DIALOG and ORBIT	4	ب. 18%
BRS and ORBIT	0.	, 0
BRS and DIALOG DIALOG and ORBIT	7	30%

16 (or 70%) of the schools accessing more than one system are universities with graduate programs.

# C. What is the primary reason each system is searched?

The first part of the questionnaine indicated whether or not the respondents libraries have access to BRS, DIALOG, or ORBIT. If the respondent revealed that his library accessed none or only one of these systems, he was requested to stop at that point, and return the questionnaire to the surveyor. Those libraries accessing only one system were not asked to respond to the rest of the questionnaire, although their input may have contributed to the value of the survey. It is difficult to assess the methods and reasons a library chooses to use one system over the others, but the decision to do so may be

entirely in the hands of administrators in many institutions, and not decided by experienced online searchers. If only one system is available to use in a library, then obveously there is no individual choice by the online searchers of which system they might use. Consequently, the reasons one system is searched rather than other systems was asked only to those online searchers who have a choice between 2 or 3 systems to use.

For each library reporting access to at least 2 of the systems, every online searcher in that library was asked to indicate the primary reason he or she searched BRS, DIALOG, or ORBIT (see Example A). In order to determine the relative importance of the responses, each online searcher was then asked the number of searches performed each month on the systems they use (see Example B).

There were 38 respondents from the 12 schools having access to BRS, DIALOG, and ORBIT. There were 13 respondents from the 7 schools having access to BRS and DIALOG, but not ORBIT. And, there were 10 respondents from the 4 schools having access to DIALOG and ORBIT, but not BRS.

# Comparing BRS and DIALOG

48 useable questionnaires were received from online librarians having access to both BRS and DÍALOG. 28 of the librarians (or 58%) reported searching DIALOG the most, and 20 (or 42%) reported searching BRS the most. DIALOG is searched primarily because of 'Familiarity with the System.'. BRS is searched primarily because of 'Economical' reasons.

## Eomparing DIALOG and ORBIT

10 respondents reported access to both DIALOG and ORBIT, but not BRS. All search DIALOG more than ORBIT. Again, the primary reason given for searching DIALOG is 'Familiarity with the System.'

It must be noted, however that several of the respondents in this survey commented that it was difficult to choose the one primary reason they searched on a particular system. Some typical examples of comments on each system are as follows:

### BRS

- ---"I prefer it to DIALOG because of system features as well as its being more economical."
- ---"Students can better afford searches on BRS."
- ---"I find the system easier to use."
- --- "Printouts are much more economical than on DIALOG."
- ---"Standardization of field labels and commands across databases are features I particularly find helpful."

### DIALOG

- ---"It was the first system on which I was trained."
- --- "More hours online..."
- ---"Entire MEDLINE, Agricola, Biosis, and Chemical Abstracts files are searchable online."
  - "Some features such as EXPAND make DIALOG easier to search Psych or ERIC when you have a complex topic."
  - ---"the most sophisticated and flexible system."
  - --- "Great documentation, good support from company, really responsive to our needs."

### ORBIT

- ---"They have Sport Database and a few others only on SDC. This is the most expensive system so I never use it for databases offered on DIALOG or BRS."
- ---"I was never trained on this system."
- ---"Hate ORBIT software, love their printouts, documentation is a joke."

The primary reasons for searching each system are summarized below.

- (1) Of those respondents who search DIALOG more than BRS or ORBIT, their primary reasons given are:
  - a. Familiarity with the System---- 59% of the respondents
  - b. System Features ----- 22% of the respondents
  - c. Database Exclusivity ----- 16% of the respondents
  - d. Economical ----- 3% of the respondents
- (2) Of those respondents who search BRS more than DIALOG or ORBIT, their primary reasons given are:
  - a. Economical ----- 60% of the respondents
  - b. Systems Features ----- 30% of the respondents
  - c. Familiarity with the System --- 10% of the respondents
  - d. Database Exclusivity ----- 0 of the respondents
- (3) ORBIT is not searched more than BRS or DIALOG in Texas colleges and universities. Of the 48 online searchers reporting access to ORBIT, only 21 report ever utilizing it within a month's time (usually one search per month). When it is used, the primary reasons given are 'Database Exclusivity' (19 searchers, 91%), and 'System Features' (2 searchers, 9%).

## Conclusions

This survey attempts to answer 3 questions: What types of colleges and universities offer online searching on BRS, DIALOG, or ORBIT in their libraries? Which systems are used the most?

And, Why are those systems used?

Clearly, public universities with graduate schools are the most likely institutions of higher education to offer online retrieval services in their libraries. 57% of the responding universities with graduate schools utilize BRS, DIALOG, and/or ORBIT. The fact that 11% of the responding 2-year colleges offer online services is significant, since many full universities do not offer online services.

DIALOG is used more than BRS or ORBIT. The primary reason given for this is 'Familiarity with the System.' One reason for this may be because DIALOG is the oldest and largest commercial vendor of databases, and therefore more librarians have had the opportunity to be trained on the system and accumulate experience using the system.

BRS is used less frequently than DIALOG, and more often than ORBIT in Texas colleges and universities. The primary reason cited for its use is 'Economical.' For some, the economy of using BRS outweighs the possible benefits of using DIALOG or ORBIT.

ORBIT offers several unique databases which may be used more extensively in libraries serving businesses and technological firms than in libraries in colleges and universities. However, its value should not be underestimated as a major force in the online industry.





16 colleges and universities in Texas reported having access to .

ORBIT, even though it was not utilized by searchers at all of those institutions.

It is hoped that this analysis of the use of BRS, DIALOG, and ORBIT in Texas colleges and universities will benefit those considering access to one or more of these systems.