

WSUL and DALNET

Summary of Data to be Maintained on the
Automated Library System

Here is a chart with estimated data base sizes for our automated library system.

For purposes of estimating, the following were used:

1. Assume a 30% overlap in bibliographic and authority records for all libraries;
2. Assume these sizes of the various records:
 - a. Bibliographic records -- 3,000 - 4,000 characters each.
 - b. User records -- 500 - 1,000 characters each.
 - c. Vendor records -- 500 - 1,000 characters each.
 - d. Fund records -- 500 - 1,000 characters each.
 - e. Order records -- 500 - 1,000 characters each.
 - f. Authority records 3,000 - 4,000 characters each.

These estimates already included the necessary indexes to these files.

3. There is a need to allow ample space for some working files, e.g., temporary files, message files, files for downloading from OCLC.

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VSUL and DALNET

Summary Of Initial Data To Be Maintained On The System

	<u>Number Of Records</u>										
	<u>WSU</u>	<u>DPL</u>	<u>U of D</u>	<u>WCCC</u>	<u>Botsford</u>	<u>Children's</u>	<u>Harper</u>	<u>H. Ford</u>	<u>Sinal</u>	<u>M. B'mont</u>	<u>Totals</u>
OCLC Bibliographic Records	395,705	240,000	170,649	35,100	0	2,216	8,045	15,661	8,252	7,211	882,839
Other Machine-readable Bib. Records	2,228	0	0	0	4,435	0	0	0	0	0	6,663
Library Users	49,500	350,000	6,683	25,000	520	125	10,000	2,700	1,900	1,500	447,928
Vendors	3,200	3,000	79	40	125	75	165	10	8	100	6,802
Funds for One Fiscal Year	1,000	250	82	50	75	75	180	5	5	5	1,727
Order Records for One Year	40,500	50,000	4,590	10,000	1,500	520	1,430	1,500	1,300	2,200	113,540
Authority Records	<u>1,165,260</u>	<u>661,000</u>	<u>509,427</u>	<u>107,220</u>	<u>11,694</u>	<u>7,488</u>	<u>21,435</u>	<u>40,723</u>	<u>22,067</u>	<u>19,052</u>	<u>2,565,366</u>
Totals	1,657,393	1,304,250	691,510	177,410	18,349	10,499	41,255	60,599	33,532	30,068	4,024,865

Summary Of Anticipated Growth Rate Of Data Bases

Bib. Records To Be Added Per Year	125,625	107,000	36,649	11,100	3,035	383	1,312	5,205	710	1,391	292,410
Authority Records Added Per Year	278,875	235,400	80,627	11,220	2,244	919	3,148	12,492	1,704	3,338	629,967
Funds For Second Fiscal Year	<u>1,000</u>	<u>250</u>	<u>82</u>	<u>50</u>	<u>75</u>	<u>75</u>	<u>180</u>	<u>5</u>	<u>5</u>	<u>5</u>	<u>1,727</u>
Totals	405,500	342,650	117,358	22,370	5,354	1,377	4,640	17,702	2,419	4,734	924,104

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Summary Of Initial Data To Be Maintained On The System

Number of Estimated Characters*

	<u>WSU</u>	<u>DPL</u>	<u>U of D</u>	<u>WCCC</u>	<u>Botsford</u>	<u>Children's</u>	<u>Harper</u>	<u>H.Ford</u>	<u>Sinal</u>	<u>W.B'mont</u>	<u>Totals</u>	<u>Less 30% Overlap</u>
OCCLC Bibliographic Records	1,583Mb	960Mb	683Mb	140Mb	0	9Mb	32Mb	63Mb	33Mb	29Mb	3,532Mb	2,463.4Mb
Other Machine-readable Bib. Records	10Mb	0	0	0	18Mb	0	0	0	0	0	28Mb	
Library Users	50Mb	350Mb	7Mb	25Mb	0.5Mb	0.1Mb	10Mb	3Mb	2Mb	2Mb	449.6Mb	
Vendors	3Mb	3Mb	0.1Mb	0.1Mb	0.1Mb	0.1Mb	0.2Mb	0.1Mb	0.1Mb	0.1Mb	6.9Mb	
Funds for One Fiscal Year	1Mb	0.3Mb	0.1Mb	0.1Mb	0.1Mb	0.1Mb	0.2Mb	0.1Mb	0.1Mb	0.1Mb	2.2Mb	
Order Records for One Year	41Mb	50Mb	5Mb	10Mb	2Mb	0.5Mb	1Mb	2Mb	1Mb	2Mb	114.5Mb	
Authority Records	<u>4,661Mb</u>	<u>2,644Mb</u>	<u>2,038Mb</u>	<u>429Mb</u>	<u>47Mb</u>	<u>30Mb</u>	<u>86Mb</u>	<u>163Mb</u>	<u>88Mb</u>	<u>76Mb</u>	<u>10,262Mb</u>	<u>7,183.4Mb</u>
Totals	6,349Mb	4,007.3Mb	2,733.2Mb	604.2Mb	67.7Mb	39.8Mb	129.4Mb	231.2Mb	124.2Mb	109.2Mb	14,395.2Mb	

Summary Of Anticipated Growth Rate Of Data Bases

Bib. Records to be Added Per Year	503Mb	428Mb	147Mb	44Mb	12Mb	2Mb	5Mb	21Mb	3Mb	6Mb	1,171Mb	819.7Mb
Authority Records Added Per Year	1,116Mb	942Mb	323Mb	45Mb	9Mb	4Mb	13Mb	50Mb	7Mb	13Mb	2,522Mb	1,765.4Mb
Funds For Second Fiscal Year	<u>1Mb</u>	<u>0.3Mb</u>	<u>0.1Mb</u>	<u>0.1Mb</u>	<u>0.1Mb</u>	<u>0.1Mb</u>	<u>0.2Mb</u>	<u>0.1Mb</u>	<u>0.1Mb</u>	<u>0.1Mb</u>	<u>2.2Mb</u>	<u>3,695.2Mb</u>
Totals	1,620Mb	1,370.3Mb	470.1Mb	89.1Mb	21.1Mb	6.1Mb	18.2Mb	71.1Mb	10.1Mb	19.1Mb	3,695.2Mb	

* Using upper limit of characters per record.

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WSUL and DALNET

Estimated Annual Transaction Load

Here is a chart with estimated transaction load statistics. There are many transactions that were not estimated, including borrower registrations, inventory, and claiming. We also do not know how many messages each transaction will require, e.g., it will require at least two to check out a book -- one to validate the borrower and one to record the book. And, libraries that have automated report 5 to 10% increases in transactions above manual systems. Therefore, the totals have been multiplied by four to get a grand total estimate, which is still probably conservative.

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Estimated Annual Transaction Load

	<u>WSUL</u>	<u>DPL</u>	<u>U of D</u>	<u>WCCC</u>	<u>Botsford</u>	<u>Children's</u>	<u>Harper</u>	<u>H. Ford</u>	<u>Sinal</u>	<u>W. B. Mont</u>	<u>Totals</u>
<u>Circulation</u>											
Charges	279,986	1,442,500	31,594	128,000	27,808	5,019	76,323	13,000	22,316	41,291	2,067,837
Discharges	279,986	1,442,500	31,594	128,000	27,808	5,019	76,323	13,000	22,316	41,291	2,067,837
Books Searched	42,310	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	42,310
Holds Placed	2,102	4,000	1,283	1,500	52	240	0	100	50	500	9,827
Overdues Sent	25,573	120,000	4,872	6,000	2,400	3,396	8,220	6,240	6,960	1,500	185,161
Reserve Room	7,757	0	375	600	100	40	0	0	0	20	8,892
Items Shelved	956,416	4,266,763	240,034	340,500	N/A	N/A	83,000	120,000	N/A	66,300	6,073,013
Bookings Made	12,000	0	3,053	20,000	(In Charges)	0	7,400	360	0	500	43,313
ILL Lending	26,388	12,000	2,162	N/A	800	1,688	3,436	6,196	1,681	3,656	58,007
ILL Borrowing	2,451	2,000	2,806	N/A	2,600	3,994	2,432	5,308	3,667	3,940	29,198
Sub Total	1,634,969	7,289,763	317,773	624,600	61,568	19,396	257,134	164,204	56,990	158,998	10,585,395

Public Catalog

Bib. Records Added	125,625	107,000	36,649	11,100	3,035	383	1,312	5,205	710	1,391	292,410
Authority Records Added	278,875	235,400	80,627	11,220	2,244	919	3,148	12,492	1,704	3,338	629,967
Corrections to Bib. Records	3,669	N/A	2,000	500	N/A	N/A	N/A	N/A	N/A	N/A	6,169
Item/Copy Level Records	130,000	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	130,000
Searches	3,000,000	3,600,000	400,000	800,000	9,000	9,000	45,000	30,000	24,000	24,000	7,341,000
Sub Total	3,538,169	3,942,400	519,276	822,820	14,279	10,302	49,460	47,697	26,414	28,729	8,999,546

Serials Control

Issues Checked In	97,897	100,000	26,880	15,000	3,300	3,189	20,000	13,500	5,350	7,000	292,116
Volumes Bound	19,092	7,500	4,150	0	0	424	1,150	2,200	750	1,100	36,366
Sub Total	116,989	107,500	31,030	15,000	3,300	3,613	21,150	15,700	6,100	8,100	328,482

Acquisitions

Orders	25,000	50,000	4,590	10,000	1,500	520	1,430	1,500	1,300	2,200	98,040
Receipts	25,000	50,000	4,590	10,000	1,500	520	1,430	1,500	1,300	2,200	98,040
Payments Posted	40,000	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	40,000
Vouchers Prepared	6,000	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	6,000
Sub Total	96,000	100,000	9,180	20,000	3,000	1,040	2,860	3,000	2,600	4,400	242,080
Totals	5,386,127	11,439,662	877,259	1,482,420	82,147	34,351	330,604	230,601	92,104	200,227	20,155,503
Grand Totals (X4)	21,544,508	45,758,652	3,509,036	5,929,680	328,588	137,404	1,322,416	922,404	368,416	800,908	80,522,012

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Estimated Simultaneous Users

It seems best to assume that all terminals and dial-up ports will always be busy, at least through Year Three, since it is not likely that libraries will be able to afford more than the minimum number. Terminal use by staff will be scheduled and public users will have to queue. Therefore, the maximum number of simultaneous users, i.e., terminals, is expected to be:

	<u>WSUL+</u>	<u>DALNET*</u>	<u>TOTAL</u>
Year One	69	183	252
Year Three	164	390	554
Year Five	328	451	779

* Installation begins six months after WSUL.

+ Includes dial-up ports.

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WSUL and DALNET

System Performance Requirements

Here are Sections 2.11 and 2.12 of the RFP which detail the performance requirements of the automated library system.

We, of course, would have the same performance requirements should the system be operated by the WSU Computing Services Center. The system reliability, availability, and response time requirements outlined should be able to be met, monitored, and tested for each alternative.

Wayne State University Libraries are open year round for these hours:

Monday - Thursday	8:00 a.m. - 11:00 p.m.
Friday	8:00 a.m. - 6:00 p.m.
Saturday	9:00 a.m. - 5:00 p.m.
Sunday	12:00 noon - 7:00 p.m.

Staff begins work two hours before the library opens, and continues at least one half hour past closing. The Law Library is open until 9:00 p.m. on Friday, from 11:00 a.m. to 10:00 p.m. on Sunday, and has longer hours during exam periods. The buildings are actually closed only six days a year, namely Christmas Day, New Year's Day, Memorial Day, the Fourth of July, Labor Day, and Thanksgiving Day.

It is expected that reports and backup will need to be run at night, e.g., from midnight to 6:00 a.m., even though the libraries are closed. It is desirable that search only access to the online catalog be provided when the libraries are closed, for dial-in users.

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