The Value of Library and Information Services in Patient Care Study – UNC-CH Results

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Background

The goal of the research was to assess the value of the health sciences library, information services, and the librarian on patient care. The study replicates the approach taken in the well known "Rochester study" conducted in the Rochester, New York area (Marshall, 1992). The planning committee took into account changes in the health care and information technology environments in designing the new study.

Methods

A study planning group was involved during the entire study design and data collection process. Data collection methods included: 1) an initial focus groups of librarians; 2) a web survey of health professionals at 56 sites serving 118 hospitals; and 3) 24 additional telephone interviews of health professionals designed to further explore the value of the library and the librarian. The web survey was piloted at seven sites prior to the full launch. The survey used a critical incident technique in which health professionals were asked to base their responses on a recent situation in which they had searched for information for patient care that was not available in the patient record, EMR system or lab results. Respondents provided search details related to 16,122 critical incidents (5,379 from physicians, 2,123 from residents and 6,788 from nurses). The estimated response rate was 10%. Each site received a PowerPoint presentation with key results for their own site, their own dataset, and the study aggregate results for benchmarking purposes.

- **Participating sites by region**

Region	Libraries (n)
Middle Atlantic*	23
Greater Midwest	12
Southeastern Atlantic	7
Pacific Southwest	4
Pacific Northwest	3
South Central	2
Mid-Continental	1
Canada	4
Total	**56**

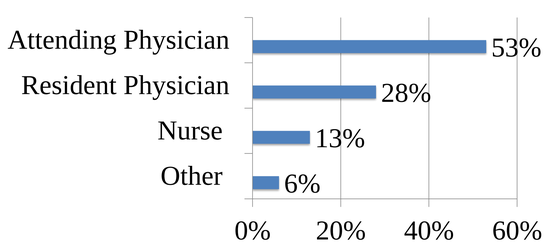
- **Age distribution of respondents**

	Percent
Under 25	**1%**
25-44	**58%**
45-64	**37%**
Over 64	**4%**

- **Participating site characteristics**

	Sites (n=56)
Council of Teaching Hospitals member	**77%**
Urban location	**86%**
Bed size:	
Less than 500	**45%**
500 or more	**54%**

- **Positions held by respondents**



Survey Results

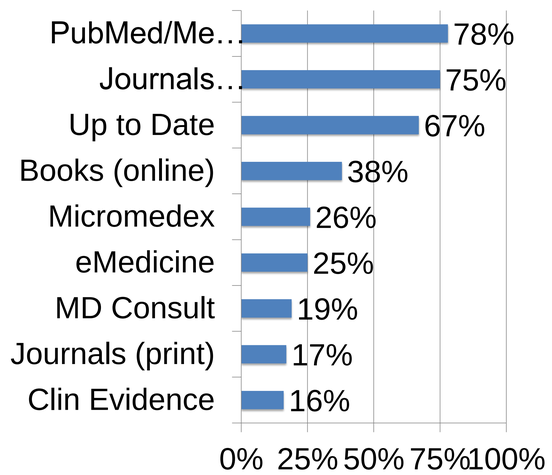
- **Handled the situation differently**

	Overall (n=406)
Definitely Yes	**48%**
Probably Yes	**44%**
Probably No	**7%**
Definitely No	**1%**

- **Information sources rated as important or very important**

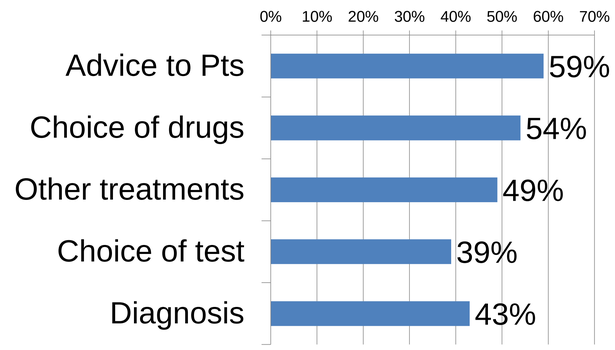
Source	Overall (n)
Library/Information resource	**98% (349)**
Discussion with colleagues	**92% (323)**
Lab tests	**91% (308)**
Diagnostic imaging	**80% (263)**

- **Library resources used***



*Respondents could check more than one resource.

- **Changes in patient care**



- **Value of information**

	% (n)
Resulted in a better informed clinical decision	**99% (354)**
Contributed to higher quality of care	**98% (355)**
Substantiated my prior knowledge or belief	**94% (349)**
Provided new knowledge	**95% (358)**
The information saved me time	**92% (343)**

- **Adverse events avoided**

	Overall (n=406)
Patient misunderstanding	**34%**
Additional tests	**38%**
Misdiagnosis	**26%**
Adverse drug reaction/interaction	**21%**
Medication error	**18%**
Patient mortality	**11%**

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