

Law Firm Legal Research Requirements for New Attorneys*

Patrick Meyer**

Mr. Meyer conducted a survey of law firm librarians in 2007 that identified the most important research tasks in the law firm setting and the proper format or formats in which those tasks should be performed. In addition to analyzing the results of that survey, he considers previous studies and surveys and concludes with some recommendations for the content of law school research courses.

Introduction	298
Prior Law Firm Research Surveys	302
Research Tasks Important to Law Firms	302
Surveys and Format: A Closer Look.	307
2007 Law Firm Survey	311
About the E-Survey	311
Most Important Research Tasks	311
Cost-Effective Research.	311
Case/Digest Research.	313
Secondary Source Research	314
Citor Services	314
Code Research	314
Required Print-Based Research Tasks.	314
Required Online Research Tasks	316
Required Database Knowledge	317
Format: Are Books Dead?	319
Respondent Comments Regarding Books.	319
Conclusion: Using the Survey Results to Implement Change	321
Appendix A: Research Questionnaire	322
Appendix B: Selected Comments on Legal Research.	326
Appendix C: Selected Comments on Excessive Online Research Costs.	329

* © Patrick Meyer, 2009.

** Associate Library Director and Adjunct Professor, Thomas Jefferson School of Law, San Diego, California. The author would like to thank Steve Barkan, Professor & Director of Library and Information Services, University of Wisconsin School of Law; Karla Castetter, Professor of Law & Library Director, Thomas Jefferson School of Law; Bruce Castetter, Chief of Appeals, U.S. Attorney Office, San Diego; and Paul Howard, Head of International Services, Pacific McGeorge School of Law, for their insightful comments in the preparation of this article.

Arthur Miller: Kathleen, does the ABA pay any attention to a research program at a law school in accreditation?

Kathleen Grove: Yes.

....

We do have ABA Standard 302, which requires an intensive legal writing experience before you have graduated from law school.

Mark Rosen: That's in the singular? One experience?

Kathleen Grove: Yes.

....

Peter Martin: And that's writing . . .

Kathleen Grove: Yes, it's a writing experience.

....

Mark Rosen: Can you just imagine a medical school saying, or the AMA saying, "In order to graduate from medical school you need to have had *a* clinical experience. You need to have treated *a* patient intensively, operated on *one* patient, and therefore you are licensed as a surgeon." Can you imagine that?¹

Introduction

¶1 The American Bar Association (ABA) has taken note of the legal research deficiencies of new graduates and considers legal research to be one of the five essential lawyering skills.² It ultimately modified ABA Standard 302 to read: "(a) A law school shall require that each student receive substantial instruction in . . . (2) legal analysis and reasoning, legal research . . ."³

¶2 Mark Rosen's comment quoted above is a condensed version of an argument made decades earlier by Mary Foote, who in a 1917 article noted that while the chemist trains quite diligently with chemicals, and while players must be taught football, and doctors spend years in practice as interns, law is "practically the only science which gives to its novice no training in the use of the tools which must furnish him his living."⁴

¶3 Foote wasn't the first to opine on the critical role that law schools should have in the process of teaching legal research. In 1884, Judge Simeon E. Baldwin noted that "a careful study of digests, and generally of reported cases, is indispensable . . ." and that "[o]ne great aim of legal education . . . must be to teach how best

1. GRAYLYN CONFERENCE REPORT 1990, at 98. (Donald Dunn ed., 1991). These remarks were made during a panel discussion, led by the Professor Arthur Miller, then of Harvard University Law School, and now professor at New York University School of Law; Kathleen Grove was Assistant Consultant on Legal Education to the American Bar Association; Mark Rosen was a partner at Mesirov, Gelman, Jaffee, Cramer & Jamieson, of Philadelphia; Peter Martin was former Dean and a Professor at Cornell Law School, where he is still a faculty member.

2. AM. BAR ASS'N SECTION OF LEGAL EDUC. & ADMISSIONS TO THE BAR, LEGAL EDUCATION AND PROFESSIONAL DEVELOPMENT—AN EDUCATIONAL CONTINUUM: REPORT OF THE TASK FORCE ON LAW SCHOOLS AND THE PROFESSION: NARROWING THE GAP 135 (1992) [hereinafter MACCRATE REPORT].

3. AM. BAR ASS'N, 2008–2009 STANDARDS AND RULES OF PROCEDURE FOR APPROVAL OF LAW SCHOOLS Standard 302, at 21, available at <http://www.abanet.org/legaled/standards/ABA%20Standards%20and%20Rules%20of%20Procedure%20Final.pdf>.

4. Mary S. Foote, *The Need for College Instruction in the Use of Law Books*, 10 LAW LIBR. J. 25, 28 (1917). Foote was arguing for a separate legal research course to be added to the law school curriculum.

to handle such books.”⁵ At the beginning of the twentieth century, attorney Edward Keasbey stated:

[I]t is absolutely necessary that lawyers should have the means of finding quickly and surely the cases that bear upon the point at issue . . . Digests and indexes of every kind are tools of the profession, and the proper use of these tools is one of the lessons that every law school should teach.⁶

¶4 The more direct practitioner comments about legal research expectations often look similar to those of this law firm partner:

At a minimum, you have to teach them some forms of basic skills. I think people expect them to have basic research skills coming out of law school. I think the public is entitled to rely upon the fact that law school has provided that much to them. There is a dichotomy between the academic research and all practical research when they get into the law firm.⁷

Other studies highlighting the importance of legal research in the law firm setting are numerous.⁸

¶5 The ABA describes legal research as, among other things, including a familiarity with, and relationship between, the following: case law; statutes; administrative regulations and decisions; rules of court; restatements; and secondary legal materials such as treatises, digests, annotated code compilations and loose-leaf services.⁹ Regarding secondary legal materials, the ABA determined that “a lawyer should have a general familiarity with the breadth, depth, detail, and currency of coverage . . . and the relative strengths and weaknesses . . . so that he or she can make an informed judgment about which source is most suitable for a particular research purpose.”¹⁰ The ABA also recognizes the need for new practitioners to be able to form a proper research plan, including the effective formulation of issues, identification of an appropriate research strategy, and the ability to implement the plan.¹¹

5. Simeon E. Baldwin, *Law School Libraries, and How to Use Them*, in AM. BAR ASS'N, REPORT OF THE SEVENTEENTH ANNUAL MEETING 431, 431 (1894). This quote, and the other historical quotes herein, are not meant to promote print resources over online resources, as the latter were of course far from being thought of at that time.

6. Edward Q. Keasbey, *Instruction in Finding Cases*, 1 AM. L. SCH. REV. 69, 71 (1902–1906).

7. GRAYLYN, *supra* note 1, at 95 (comments of Frederick Lipman, Partner, Blank, Rome, Comisky & McCauley, Philadelphia).

8. See, e.g., Leonard L. Baird, *A Survey of the Relevance of Legal Training to Law School Graduates*, 29 J. LEGAL EDUC. 264, 273 tbl.1 (1977–1978) (fifty-six percent of respondents viewed the ability to do research to be of “great importance”); Deedra Benthall-Nietzel, *An Empirical Investigation of the Relationship Between Lawyering Skills and Legal Education*, 63 KY. L.J. 373, 384 tbl.8 (1975) (respondents ranked legal research as the seventh (out of thirty) most important skill); Bryant G. Garth & Joanne Martin, *Law Schools and the Construction of Competence*, 43 J. LEGAL EDUC. 469, 483 tbl.6 (1993) (young attorneys rated “library legal research” (87%) and “computer legal research” (82%) to be the two most important skills out of seventeen listed skills in the general law school curriculum); Robert A.D. Schwartz, *The Relative Importance of Skills Used by Attorneys*, 3 GOLDEN GATE U. L. REV. 321, 325 (1973) (survey respondents selected legal research as the second most “essential” skill); Frances Kahn Zemans & Victor G. Rosenblum, *Preparation for the Practice of Law—The Views of the Practicing Bar*, 1980 AM. B. FOUND. RES. J. 1, 16 tbl.5 (1980) (ninety-one percent of respondents expected entry-level attorneys to be proficient in legal research).

9. MACCRATE REPORT, *supra* note 2, at 157–59.

10. *Id.* at 160.

11. *Id.* at 160–63.

¶6 Law firm librarians are in a unique position to assess the research abilities of associates, often playing a prominent role in firm-wide research and online database contract negotiation. Firm librarian comments have historically been pointed, and often mention the following deficiencies: lack of knowledge of civics, research strategy, cost-effective research, use of loose-leaf services, and administrative law.¹²

¶7 The long struggle to improve the legal research abilities of graduates is complicated because everyone *except* the sub-par researchers seems to realize their deficiencies. Ian Gallacher conducted a 2006 survey of 740 students who were about to enter law school and found that over 81% were either somewhat confident or very confident of their legal research abilities,¹³ which is in sharp contrast to how law firms rate their legal research competence.¹⁴ Burke, Hensiak, and Nixon found similar results when surveying 233 entering 1Ls in the fall of 2003.¹⁵ Seventy-one percent of the respondents viewed their research skills as at least “good” when compared to their fellow entering 1Ls.¹⁶ However, as the authors note, student responses to basic research questions strongly suggested a much lower level of competence.¹⁷ Although the reasons for this dichotomy are debatable, it appears that the problem with law student research skills starts before they take their first law school class, with an inaccurate assessment of their own legal research abilities. This, in turn, may very well affect the amount of attention paid to research instruction in their first year of law school: students are more likely to tune out instruction on a topic that they feel they have mastered.

¶8 Further, there are factors that limit the effectiveness of legal research training within law schools. Discussions of the problem include arguments that research training does not have the status of other courses in the law school curriculum¹⁸ and is frequently taught for little credit, often on a pass/fail or ungraded basis,

12. See Marie Wallace, *Fast Forward, or Legal Research in the Real World*, TRENDS L. LIBR. MGMT. & TECH., Oct. 1989, at 1, 2.

13. Ian Gallacher, “Who are Those Guys?": *The Results of a Survey Studying the Information Literacy of Incoming Law Students*, 44 CAL. W. L. REV. 151, 178 (2007–2008).

14. *Id.* (citing, among other articles, Joan S. Howland & Nancy J. Lewis, *The Effectiveness of Law School Legal Research Training Programs*, 40 J. LEGAL EDUC. 381, 383 (1990)).

15. Kathryn Hensiak, Stephanie Burke, & Donna Nixon, Final Technical Report (2003) (unpublished report; on file with author). A brief summary of the study can be found in *2003–2004 Completed Research Grant Projects: Assessing Information Literacy among First Year Law Students: A Survey to Measure Research Experiences and Perceptions*, 96 LAW LIBR. J. 867, 867, 2004 LAW LIBR. J. 54 ¶ 3.

16. Hensiak, Burke, & Nixon, *supra* note 15, at 2.

17. *Id.* at 2, 3. Answers to questions showed a deficiency in the following areas: the value of using indexes, the understanding of Boolean operators, knowledge of the limits of Internet searching for relevant legal materials, and knowledge of what a library catalog contains. More specifically, when asked how to update research on a topic covered in an article, 42% would choose to view a bibliography included with the article in an attempt to update that article's research, whereas only 32.5% of respondents indicated that they would use a citation index to update the article. In addition, fewer than 28% of respondents chose the appropriate Boolean operator in a hypothetical example (although more than 72% “appeared to know what Boolean operators” did); 45% of respondents indicated that they would search the Internet for scholarly articles (while 49% would use a periodical index); 40% did not know what the library catalog contained.

18. See Steven M. Barkan, *Should Legal Research Be Included on the Bar Exam? An Exploration of the Question*, 99 LAW LIBR. J. 403, 404, 2007 LAW LIBR. J. 23 ¶ 4.

which encourages students to focus on their graded courses.¹⁹ Full-time faculty often cannot be convinced to teach these courses because of status issues, the faculty reward system, or other factors,²⁰ so the courses are sometimes taught by student assistants, recent graduates, or librarians,²¹ giving the appearance that they are not as important as other courses. Additionally, this type of course is labor intensive if taught correctly,²² which frequently overwhelms available administrative resources.

¶9 Legal research in the law firm setting is a big deal. Research by ThomsonWest from 2007 found that on average, 45% of the new attorney's first year of practice and 30% of years two and three will be spent conducting legal research.²³ Further, it has been said that a poor researcher may not be in a position to make partner.²⁴

¶10 In order to adequately prepare our students for their first law firm job, it is essential that they understand the research skills they will need in the workplace. This article reviews the results of prior law firm surveys, both published and unpublished, that have described the research required of new hires. It also summarizes results from my recent survey, which determined the research tasks and formats (print or electronic) that law firms require new hires to be proficient in. These studies indicate a need for law schools to integrate the teaching of online and print-based research for the following federal and state-specific tasks: federal and state legislative codes, secondary source materials, reporters, administrative codes, and digests. There also should be a strong emphasis on the teaching of cost-effective research strategies.

19. Robin K. Mills, *Legal Research Instruction in Law Schools, The State of the Art or, Why Law School Graduates Do Not Know How to Find the Law*, 70 LAW LIBR. J. 343, 345 (1977); Joan S. Howland & Nancy J. Lewis, *The Effectiveness of Law School Legal Research Training Programs*, 40 J. LEGAL EDUC. 381, 390 (1990) (suggesting that legal research courses should be graded.).

20. Barkan, *supra* note 18, at 404, ¶ 4; I. Trotter Hardy, *Why Legal Research Training is So Bad: A Response to Howland and Lewis*, 41 J. LEGAL EDUC. 221, 223 (1991).

21. Barkan, *supra* note 18, at 404, ¶ 4; Mills, *supra* note 19, at 346. *See also* Howland & Lewis, *supra* note 19, at 390 (suggesting that the norm of non-tenure track status instructors is a problem).

22. Alan Holoch, *Legal Research: From the Blackboard to the Jungle*, 1 LEGAL PUB. PREVIEW 117, 121 (1989); Hardy, *supra* note 20, at 223.

23. Anne Ellis, Attorney and Student Research Skills: Ideal vs. Reality slide 3 (PowerPoint prepared for Thomson West Town Hall Meeting at AALL, n.d.), available at http://west.thomson.com/pdf/librarian/Atty_Research_Skills_AALL.pdf (last visited May 12, 2009). In addition, a large percentage of a new associate's time will be spent performing the related task of writing.

24. Ian Gallacher, *Forty-Two: The Hitchhiker's Guide to Teaching Legal Research to the Google Generation*, 39 AKRON L. REV. 151, 158 (2006). *See also* Ellis, *supra* note 23, at slide 12.

Prior Law Firm Research Surveys

Research Tasks Important to Law Firms

¶11 There have been several surveys that have determined which legal research tasks are important for new law firm associates; the survey results were similar whether the respondents were law firm librarians or attorneys.

¶12 Howland and Lewis conducted a survey of law firm librarians in 1987 and 1988, to which they received 458 valid responses.²⁵ Respondents were asked to rate the competency of first-year associates in using fourteen basic legal research sources, on a scale of one to five, with five being the highest level of competency.²⁶ The authors noted that firm librarians, who often play a prominent role in firm-wide research and research instruction, are in the best position to comment on the research abilities of law clerks and new hires because they work most closely with these groups on research projects.²⁷

¶13 One objective of the survey was to “determine the level of expertise in basic legal research tools and strategies.”²⁸ The survey revealed new associates to be deficient in research tasks such as developing a research plan and being an efficient researcher;²⁹ knowledge of subject-specific research resources;³⁰ the importance and uses of loose-leaf services, digests, and legal encyclopedias;³¹ being able to use the West Key Number System;³² using computerized research tools efficiently and cost-effectively;³³ and knowing how to integrate online with print research.³⁴ Other research tasks that elicited similar responses were state administrative materials, federal administrative materials, *U.S. Law Week*, U.S.C.C.A.N., federal codes, state codes, statutes, Shepard’s, court rules, and form books.³⁵

¶14 Do the same legal research tasks warrant attention today, or have the proliferation of available online database titles in subscription databases, the ubiquity of free legal information on the web, and the search habits of a new generation changed the game? Several recent studies indicate that law firm legal research

25. Howland & Lewis, *supra* note 19, at 382.

26. *Id.* at 385 tbl.2. For all fourteen sources, the average percentage of respondents ranking first year associate competency either 4 or 5 was about 16%. In contrast, for nine of the fourteen tasks, at least 40% of respondents gave the associates one of the two lowest scores for competence.

27. *Id.* at 382.

28. *Id.*

29. *Id.* at 383. Sixty-five percent of respondents noted that first-year associates were “less than satisfactory in their ability to attack a legal research problem efficiently.”

30. *Id.* Nearly half of first-year associates were deemed to possess “less than satisfactory abilities in determining appropriate research sources for a specific subject matter”

31. *Id.* at 384–85. The source scoring the highest in knowledge among first-year associates, legal encyclopedias, still only had thirty-three percent of respondents marking their skills as more than satisfactory.

32. *Id.* at 386. “Forty-four percent . . . rated first-year associates’ ability as less than satisfactory in this area”

33. *Id.* at 387. Only twenty-eight percent of respondents felt that first-year associates were satisfactory or better in this area.

34. *Id.* Forty-nine percent of respondents felt that new associates were less than satisfactory at this.

35. *Id.* at 385 tbl.2.

requirements have not materially changed over the two decades since the Howland and Lewis survey.

¶15 In 2004 I conducted a survey of law firm librarians, and received seventy-one valid responses.³⁶ Respondents identified the following legal research tasks to be the most important, regardless of format:

- locating and interpreting case law, including knowing how to use the topic and key number system, headnotes, print reporters, *Words and Phrases* volumes (50%);
- learning to use secondary sources/looseleaves/indices/finding aids (including digests); learning to identify and use the legal tools (online and print) required for each task (48.4%);
- locating and interpreting legislative codes/annotations/conversion tables (35.5%);
- locating and interpreting administrative codes (30.7%);
- Shepardizing and/or KeyCiting (24.2%);
- conducting cost-effective research (online or in print) (17%); and
- pulling a primary law source using a citation (15%).³⁷

¶16 Responses from firm librarians revealed the need to take an integrated approach to research (not relying solely on online research, but using print and online sources interchangeably) and to learn why and when to use secondary sources and finding aids. Respondent comments from this survey totaled several pages, including:

- “Teach them digests as a case finding tool.”
- “It’s not all about case law. Secondary sources are very important. New hires don’t have a clue about indexes, digests, encyclopedias, or case table volumes in hard copy.”
- “They don’t know the difference between statutes and regulations.”

Although this survey did not have a large number of respondents, it served as the basis for a more extensive survey I conducted in 2007, and which is discussed in detail below.³⁸

¶17 Bill Taylor conducted interviews with forty-nine attorneys, judges and librarians at various workplaces in 2005 to determine the research needs of younger lawyers.³⁹ Especially valuable was the extensive contact he had with respondents via

36. Patrick Meyer, Law Firm Legal Research Electronic Survey (2004) (unpublished survey; on file with author). The survey was administered to law firm and government librarians via the Southern California Association of Law Libraries (SCALL) listserv in September 2004, and via the AALL Private Law Library SIS (PLL-SIS) listserv in late December 2004. Law firm librarians Jennifer Berman (McDermott Will & Emory) and Jim Senter (Jones Day) assisted in proofreading the survey questions. The e-questionnaire offered electronic check boxes for ease of identifying and selecting specific tasks, and contained text boxes throughout as a means of providing ample opportunity to add information such as tasks not listed, opinions, comments, and suggestions.

37. *Id.*

38. See *infra* ¶¶ 43–71.

39. Bill Taylor, The Research Needs of Younger Lawyers: Report on Interviews, Recent Surveys, and Recent Articles 3 (2005) (unpublished paper; on file with author).

the interview process. Taylor noted that the following skills were frequently mentioned as being critical: “[u]nderstanding the importance of secondary sources,” “[u]nderstanding the research process and how to manage it,” and cost-effective research.⁴⁰

¶18 Respondents mentioned that “[y]ounger lawyers are better off if they turn to treatises, looseleaf services, and encyclopedias to get expert background information quickly and to identify the major sources of authority on a particular issue,”⁴¹ noting that “[i]n practice, unlike law school, original research is *not* required, and may even be a drawback.”⁴² Taylor’s respondents placed importance on “[k]nowing a few key steps that will apply to most research projects” and “[k]nowing how to manage and keep records of large, complex research projects.”⁴³

¶19 Taylor’s respondents frequently identified administrative law, business and corporate information, and legislative history as overlooked subject areas that are important in the practice setting.⁴⁴ Respondents noted that not only do most practice areas involve administrative law research, but that many new attorneys will be required to conduct administrative law research more than case law and statutory research.⁴⁵

¶20 The large law firm respondents in Taylor’s study also identified the importance of the other skills. New attorneys need to be comfortable with asking many questions—and must learn how to ask such questions—in order to clarify what is expected of them. And in addition to business and corporate information, new attorneys in large firms will need to find a variety of other non-legal information such as statistics and economic data.⁴⁶

¶21 Taylor noted that the similarities between all sizes of law firms were more plentiful than the differences.⁴⁷ There were, however, two general (and undoubtedly related) distinctions: in smaller-to-midsized firms attorneys must be more self-sufficient researchers, and these attorneys are also more likely than attorneys in larger firms to conduct all facets of a research project rather than being responsible for only parts of a project.⁴⁸

¶22 In 2005 and 2006, Young and Blanco surveyed judges and attorneys who had supervised law student externs, asking them to rate the “5 skills that you find students most lacking at the outset of the externship.”⁴⁹ This survey is valuable in that it is only one of two studies (along with the Greenberg study discussed below⁵⁰) where the respondents were all practitioners and judges. When their

40. *Id.* at 2.

41. *Id.*

42. *Id.*

43. *Id.*

44. *Id.*

45. *Id.*

46. *Id.* at 3, 4.

47. *Id.* at 5.

48. *Id.*

49. Carolyn R. Young & Barbara A. Blanco, *What Students Don’t Know Will Hurt Them: A Frank View From the Field on How to Better Prepare Our Clinic and Externship Students*, 14 *CLINICAL L. REV.* 105, 112–13 (2007).

50. See *infra* ¶ 26.

responses are compared to the responses of the studies that contained librarians (either wholly or in part), it serves to establish a sense of research validity.

¶23 The purposes of the Young and Blanco survey were to ascertain “what qualities supervisors hope to see in students, what abilities they want from students, and the level of competence they will accept.”⁵¹ Three research-related skills scored high on the list of answers: quality of research (35%); efficiency of research (32%); and “knowledge of available research resources” (21%).⁵² Respondent comments helped explain the meaning of the various skills labels. One respondent commented on research quality: “Students could be more thorough in their research, looking at more than just a few cases and making sure they understand how the law has developed. Students also need a better understanding of which sources are binding (as opposed to persuasive) authority.”⁵³ Another respondent commented on research efficiency, stating that “students need more practice in formulating complex searches in Lexis/Westlaw, making the most of terms and connectors.”⁵⁴

¶24 In 2006 and 2007, ThomsonWest conducted a series of law firm research roundtables and partner interviews with the purpose of identifying essential law firm research skills.⁵⁵ Results showed an unfamiliarity with available subject-specific resources; an inability to effectively use print resources and, in particular, in the use of indexes and tables of contents; an inability to perform a legislative history; and an inability to effectively use the following sources: C.F.R., digests, *Federal Register*, legal encyclopedias, treatises, U.S.C.C.A.N., and state administrative codes.⁵⁶ Respondents also believed that students and new associates did not understand the limits of online research, how to evaluate resources, “how or why” to use secondary sources, cost-effective print and online legal research strategies,⁵⁷ or how to perform integrated legal research.⁵⁸ It was noted that, although good “research skills do not help associates make partner . . . bad research skills can derail their careers.”⁵⁹

¶25 In 2007, Tom Gaylord surveyed Chicago law librarians on the research proficiency of newly hired attorneys.⁶⁰ Almost seventy-eight percent of respondents noted that new attorneys were not efficient or effective print resource researchers before going through in-house training, and 73.7% noted the same when asked about the electronic research acumen of new hires.⁶¹

51. *Id.* at 106-07 (emphasis omitted).

52. *Id.* at 117.

53. *Id.*

54. *Id.*

55. Results are summarized in Ellis, *supra* note 23.

56. *Id.* at slide 14. One half of all firm respondents believed that new associates possessed a low skill level in print research, with only about eighteen percent of law firm respondents rating the new associate as possessing moderate print research skills. *See id.* at slide 13.

57. *Id.* at slide 15.

58. *See id.* at slide 6. Thomson West found that seventy percent of new associates “need help using print and online research together.”

59. *Id.* at slide 12 (emphasis omitted).

60. Tom Gaylord, 2007 Librarian Survey (May 2007) (PowerPoint prepared for Back to the Future of Legal Research Symposium, Chicago Kent College of Law) (on file with author).

61. *Id.* at slide 9.

Other findings were as follows:

- 89.3% of new hires lacked the ability to “define or narrow issues with secondary sources”;
- 80.4% could not “find relevant sources efficiently”;
- 48.2% could not “update research accurately and efficiently”; and
- 39.3% could not “recognize irrelevant sources.”⁶²

¶26 Gaylord’s respondents identified many types of legal resources as being regularly used in law firms, including reporters, statutes, Shepard’s, topical loose-leaf services, treatises, administrative regulations, session laws, law reviews, current awareness services, and digests.⁶³

¶27 In 2007, Sanford Greenberg surveyed Chicago-area attorneys and received about 200 valid responses.⁶⁴ Interestingly, there were large percentage differences between Greenberg’s research results and Gaylord’s law librarian survey results even though both surveys were conducted in Chicago law firms. But although the degree of the problems differed greatly between the studies, the results of both pointed to the same research problems. Greenberg found:

- 26% of new attorneys are “seldom” or “never” able to conduct efficient print research prior to in-house training, (compared to 77.6% in the Gaylord survey⁶⁵), versus 19% who are “often” or “always” able to do so.⁶⁶
- 22% of new attorneys are “seldom” or “never” able to conduct efficient free online research prior to in-house training, versus 19% who are always or often able to do so.⁶⁷
- 14% of new attorneys are “seldom” or “never” able to conduct efficient fee-based online research prior to in-house training (compared to 73.7% in the Gaylord survey⁶⁸), versus 33% who are always or often able to do so.⁶⁹

This last finding is an indication that new attorneys are viewed by their superiors as being most proficient at fee-based online research (although admittedly 33% is still a very low percentage). Although the percentages in the Greenberg study are much kinder to new hires than are Gaylord’s findings, they are still indicative of a problem: only 19% are always or often able to conduct effective print-based or free web research; only 33% are always or often able to conduct fee-based research.

¶28 The difference in overall respondent percentages between the two Chicago studies may be attributable to who was surveyed. In the Gaylord study, respondents were law firm librarians; Greenberg’s survey was administered to practicing attorneys. Both groups are in a position to review the legal research skills of new associ-

62. *Id.* at slide 11.

63. *Id.* at slide 17.

64. Sanford Greenberg, Attorney Survey 2007 (May 2007) (PowerPoint prepared for Back to the Future of Legal Research Symposium, Chicago Kent College of Law) (on file with author).

65. Gaylord, *supra* note 60, at slide 9.

66. Greenberg, *supra* note 64, at slide 40.

67. *Id.* at slide 44.

68. Gaylord, *supra* note 60, at slide 9.

69. Greenberg, *supra* note 64, at slide 42.

ates. However, the librarian is likely to see abilities and deficiencies at the initial, raw stage of the research process, whereas supervisory attorneys are more likely to receive a polished product that has been refined with the help of a librarian or other colleagues.⁷⁰ Or perhaps firm librarians spend so much time honing their craft that they have become more critical than practitioners are.

¶29 Despite their differences, clear conclusions can be drawn from these seven law firm legal research surveys. Although there has been a proliferation of online titles and free legal web sites over the past two decades, studies still show that new attorneys need to develop more integrated print and online legal research skills. In addition, five out of the seven studies described in this section specifically mentioned research in secondary source treatises, loose-leaves, or encyclopedias as being necessary law firm research tasks, with multiple studies mentioning indices and tables of contents (which, of course, are integral to the use of secondary sources and other sources). Several other tasks were mentioned multiple times in these studies, including the need to know subject-specific resources, cost-effective research, citation services, the key number system/digests, legislative and administrative codes, and case law research.

Surveys and Format: A Closer Look

¶30 Contrary to popular opinion, books and other print resources are anything but extinct in the law firm setting. According to the most recent annual survey of AmLaw 200 law firms, the average print material budget increased more than \$210,000 between 2006 and 2007, to over \$1.7 million, whereas the average online budget decreased over \$700,000 to about \$3,183,000.⁷¹

¶31 As those who teach legal research can attest, mastering online legal research is different from learning how to perform print-based legal research. However, law firm survey results generally show that lawyers must be able to use both formats interchangeably. In addition, the balance of the research examined here strongly suggests that an integrated legal research approach—teaching online sources concurrently with print sources—is best.

¶32 In the early years of Westlaw and LexisNexis, an integrated approach to legal research training had not yet been developed. Mills noted in 1977 that the nearly universal thought among the law schools providing Westlaw and LexisNexis training was that online instruction should be preceded by instruction on how to use the books.⁷² The popular reasoning was that a premature introduction to online research would significantly detract from teaching students about the research pro-

70. See Howland & Lewis, *supra* note 19, at 382. Lewis was a law firm librarian, giving additional credence to this assumption.

71. Alan Cohen, *Competitive Advantage: Business Intelligence—Finding, Analyzing, and Leveraging It—Reshapes the Role of Law Librarians*, Law Firm, Inc., July/Aug. 2008, at 6, 8, available at http://pdfserver.amlaw.com/lfi/LFI_LibrariansSurvey.pdf. The survey was conducted in the spring of 2008; there were ninety-four valid responses. See *id.* at 16.

72. Mills, *supra* note 19, at 348; see also Mathew F. Dee & Ruth M. Kessler, *The Impact of Computerized Methods on Legal Research Courses: A Survey of LEXIS Experience and Some Probable Effects of WESTLAW*, 69 LAW LIBR. J. 164, 176 (1976); Kathleen Carrick, *Commentary: CALR in the Law School Curriculum*, 1 LEGAL PUB. PREVIEW 122, 123 (1989).

cess, which is best taught using print materials.⁷³ However, at least by the late 1980s, that philosophy was showing wear. Law librarians were pushing for the integration of online training into traditional first year legal writing and research courses.⁷⁴ Additionally, firms were questioning the ability of new hires to perform multi-format research: Howland and Lewis found that 49% of respondents felt first year associates were “less than satisfactory” at integrating online and print legal research.⁷⁵ The feeling by 1990 was that the computer was largely *replacing* print-based legal research. A method for teaching research in an integrated manner had not been properly established by that time.

¶33 One benefit of an integrated approach to teaching legal research is that new attorneys will be able to immediately use print resources that are either not in Westlaw or LexisNexis or otherwise not available online at their firms. In fact, a large proportion of print resources are not online: In a 1999 article, Penny Hazelton estimated that between 7.8 and 13% of the University of Washington School of Law’s print library collection was on either Westlaw or LexisNexis.⁷⁶ A more recent study I conducted found that less than 15% of all titles included in *Legal Looseleafs in Print 2004* could be found on either Westlaw or LexisNexis.⁷⁷

¶34 Even if a print-based resource is also available online, firms may *require* their attorneys to perform the research in the books. When asked which print-based research sources were considered “must knows” in a law firm setting, between 46% and 71% of all respondents in my 2004 survey⁷⁸ identified eight such sources:

- their state’s legislative codes (70.8%);
- their state’s case law reporters (67.7%);
- their state’s subject-specific loose-leaf sets or practice guides (67.7%);
- federal case law reporters (66.2%);
- federal legislative codes (66.2%);
- federal subject-specific loose-leaf sets or practice guides (58.5%);
- their state’s administrative codes (52.3%); and
- federal administrative codes (46.2%).

Whereas respondents found many print sources to be essential, aside from Westlaw and LexisNexis, the highest “must know” database was chosen by only 21.7% of respondents. When asked which legal research tasks should usually be conducted in books, a near unanimous 96% of respondents noted secondary sources, finding aids, and initial research.

73. See Wendy Elizabeth Ng, *Student’s Legal Research Skills: They Only Have Themselves to Blame*, 20 CAN. L. LIBR. 205, 206 (1995); see also Dee & Kessler, *supra* note 72, at 176.

74. Dan J. Freehling, *Problems and Solutions in Teaching Computer-Assisted Legal Research*, 1 INTEGRATED LEGAL RES. 9, 10–11 (1989); Carrick, *supra* note 72, at 123.

75. Howland & Lewis, *supra* note 19, at 387.

76. Penny A. Hazelton, *How Much of Your Print Collection is Really on WESTLAW or LEXIS-NEXIS?*, LEGAL REFERENCE SERVICES Q., no.1, 1999, at 3, 4 (13% if multiple copies of print titles were counted in the number of volumes duplicated online; 7.8% if only one copy of each print title was counted).

77. Patrick Meyer, *Think Before You Type: Observations of an Online Researcher*, 13 PERSPECTIVES: TEACHING LEGAL RES. & WRITING 19, 19 n.1 (2004).

78. See *supra* ¶¶ 15–16.

¶35 Comments about an integrated approach to legal research, such as the following, appeared throughout the survey results:

- “Books are an excellent starting point for a research project and sometimes there is never a need to research online.”
- “It’s not a war between print and online research. They should complement each other. Legal research is a strategy and young lawyers must recognize that.”
- “Make sure that they know not everything is on Westlaw/LexisNexis.”
- “Attorneys need to know how AND when to use online and/or print resources.”
- “Because students are offered free, unlimited online research in law schools, it’s hard for them to transition to a firm environment where even flat-rate usage is not free.”

¶36 Respondents to Taylor’s 2005 law practice interviews noted that they retain print materials because they were easy to use, less expensive, and because certain members of the firm preferred that format.⁷⁹ Taylor’s respondents also noted that the new attorney must know how to save on Westlaw/LexisNexis charges by knowing how and when to use free or less costly resources.⁸⁰

¶37 The high-profile American Bar Association Technology Report produced over 800 responses in 2008 regarding online legal research habits.⁸¹ The percentages of attorneys who regularly use online fee-based resources, free online resources, and print resources are quite similar—ranging from a high of 64.8% (online fee-based) to a low of 52.1% (free online resources) while 52.2% of respondents regularly use books to conduct research.⁸² Although many are likely surprised by the fact that most attorneys regularly use all three research formats, what may be even more surprising is how slowly online usage (free or fee-based) is rising. The percentage of regular fee-based online users has risen only 11.2% since the 2004–05 survey, and regular free online usage has risen only 8.6% during the same time period.⁸³ In contrast, regular print-based research usage has dropped 15.6% during the same period,⁸⁴ but at 52.2% still remains a major resource.

¶38 Gaylord’s 2007 survey of Chicago-area attorneys identified the following legal research materials used on an “ongoing basis,” by format (online/print):

- reporters (99.8%/50%);
- statutes (99.6%/75%);
- session laws/legislative services (84%/51%);
- administrative regulations (87%/54%);

79. Taylor, *supra* note 39, at 4.

80. *Id.* at 2.

81. LEGAL TECH. RESOURCE CTR., AM. BAR ASSOC., 2008 LEGAL TECHNOLOGY RESOURCE CENTER SURVEY REPORT, at V-iv (2008).

82. *Id.* at V-23.

83. LEGAL TECH. RESOURCE CTR., AM. BAR ASSOC., 2004–2005 LEGAL TECHNOLOGY RESOURCE CENTER SURVEY REPORT: ONLINE RESEARCH 66, 67 (2005).

84. *Id.*

- loose-leaf services (80%/90%);
- treatises (67%/92%);
- digests (70%/62%);
- current awareness services (84%/78%); and
- law reviews (88%/56%).⁸⁵

¶39 Gaylord noted that the most frequent recommendation by firm librarians is that law schools should teach print-based legal research. His respondents identified several trends over the past five years, including “too much reliance on electronic” research and “diminution of ability to use tools (e.g., index, digest).”⁸⁶

¶40 Greenberg’s respondents also had suggestions. One respondent noted that the benefit of print research is in the identification of “closely related issues . . . which would otherwise not be seen in an online query.” The respondent went on to indicate that law school students should be “taught to look beyond the narrowly worded query to uncover similar issues or strategies.”⁸⁷ Another respondent added that the increased “reliance on keyword database searching, and less resort to books [means that] . . . young associates often fail to develop concepts as a result of their myopic use of keywords.”⁸⁸ In fact, the strongest response to suggestions for legal research training was to “continue teaching print,” followed closely by “focus more on free online sources” and “constructing better, more targeted searches.”⁸⁹ My 2007 survey respondents made similar comments.⁹⁰

¶41 Although there is evidence that firms are relying more on online research with the passing years, several surveys call for an integrated research approach that focuses much more attention on print-based and free web resources.⁹¹ The typical pattern is to commence a research project in books, using secondary sources and finding aids, then perform case law research online, and finish by using the online citator services. Respondents are divided as to conducting statutory research online or in print. Because there is a need sometimes to use the opposite format for the same tasks, the need for an integrated approach is magnified. For examples of typical print-based resources by size of firm, see table 8.

¶42 Against this background of survey results, it is increasingly necessary to teach law students an integrated approach to legal research. Therefore, I felt it would be useful to expand and update my 2004 survey.

85. Gaylord, *supra* note 60, at slide 17.

86. *Id.*

87. Greenberg, *supra* note 64, at slide 16.

88. *Id.* at slide 5.

89. *Id.* at slide 14.

90. See *infra* appendix B for selected comments.

91. This is not a novel concept. See Patrick W. Spangler, *The New World Versus the Old World of Legal Research: Are Print Resources Completely a Thing of the Past?* 20 CBA RECORD 48, 49 (2006). Spangler noted the success that law schools at IIT Chicago-Kent and Loyola University of Chicago have had with integrating print, fee-based online, and free web site research training into a legal research course. This is the same approach that we use at Thomas Jefferson School of Law and which has been used at Loyola Law School (Los Angeles) for several years.

2007 Law Firm Survey

About the E-Survey

¶43 Over the first several months of 2007, I conducted a survey of law firm librarians in order to ascertain the research needs of law firms.⁹² Survey responses identified the most important research tasks in the law firm setting and the proper format or formats in which those tasks should usually be performed.

¶44 The survey was administered using an electronic questionnaire⁹³ and it consisted of fourteen questions. Lists with check boxes and radio buttons, as well as text boxes were used in an effort to elicit thorough, accurate, and complete responses. The survey also allowed for final comments. There were 162 valid responses. The breakdown of responses by firm size was as follows:

- 1 to 25 attorneys: 5 respondents
- 26 to 50 attorneys: 23 respondents
- 51 to 100 attorneys: 46 respondents
- 101 to 200 attorneys: 42 respondents
- Over 200 attorneys: 46 respondents

Because there were only 5 respondents from the 1 to 25 attorney category, those results are not included in the discussion here.

Most Important Research Tasks

¶45 Respondents were asked to indicate the most important research tasks (online or in print) that entry-level attorneys in their offices must know how to perform. Results are shown in table 1.

Cost-Effective Research

¶46 Cost-effective research was the “most important” research task—tallying a higher percentage of respondents than did case law research, and much higher than citator services and code research. The percentages were similar for the smallest three categories of firms but noticeably smaller for the largest firms, albeit still at a very high 75.6%. This quote is a typical one regarding cost-effective research:

Law students must be educated on what the real world costs are for CALR, and that, when in a firm setting, the client will likely be charged and that even a pro-rated dollar amount can be substantial. Also, despite what the CALR vendor says, future contract amounts WILL be based upon actual usage. Therefore, cost-effective techniques are essential skills.

92. See *infra* appendix A for the survey questions. All survey results are on file with the author.

93. The e-questionnaire was posted to the following American Association of Law Libraries listservs: Law Library Association of Greater New York (LLAGNY; primarily New York City), Law Librarians Society of Washington, D.C. (LLSDC), Southeastern Chapter of the American Association of Law Libraries (SEAALL; covers thirteen Southeastern states), Southern California Association of Law Libraries (SCALL), Northern California Association of Law Libraries (NOCALL), San Diego Area Law Libraries (SANDALL), and the Private Law Libraries Special Interest Section (PLL-SIS).

Table 1**Most Important Research Tasks (Regardless of Format)**

Task	Firm Size:	Firm Size:	Firm Size:	Firm Size:	Total
	26–50	51–100	101–200	over 200	
Cost effective research	91.3%	86.7%	92.5%	75.6%	84.8%
Case law/digest research	82.6%	84.4%	87.5%	73.3%	82.3%
Secondary source research	73.9%	73.3%	77.5%	57.8%	70.3%
Citator services	47.8%	57.8%	70%	51.1%	57%
Document retrieval by citation	60.9%	57.8%	65%	40%	54.4%
Legislative code research	56.5%	53.3%	55%	46.7%	53.2%
Administrative code research	26.1%	33.3%	35%	33.3%	33.5%
Legislative history research	13%	11.1%	10%	26.7%	16.5%

¶47 Law firms indicated that only about 3.6%—8 out of 223—of their so-called “flat rate” contracts are actually unlimited in scope, or truly flat-rate. Additionally, in a spring 2008 annual survey of AmLaw 200 law firms, 70% of firms responded that they recover between 61% and 100% of research costs from their clients.⁹⁴ These two factors mean that it nearly always matters how you perform online research. And, as noted in the previous quote, the number and types of functions that are used on this year’s plan will be taken into consideration when it is time to negotiate next year’s contract. See table 2 for a breakdown of firm pricing plans.

¶48 Typical responses to the question “what are the specific causes for entry-level attorneys . . . incurring excessive online research costs” were:

- not planning before going online;
- engaging in a fishing expedition;
- not using search language (truncation and synonyms) or connectors correctly;
- accessing databases outside of plan/ignorance of pricing plan particulars;
- reading online while using an hourly plan; and
- not starting with a broad search or failing to narrow original searches for free with “focus” or “locate.”⁹⁵

¶49 Based on prior law firm surveys, and buttressed by these results, cost-effective research should be stressed whenever possible. There are various means to achieve this objective: give a lecture on the basics of the pricing plans, include the estimated database search costs after students have completed research exercises, administer an online pricing plan quiz, or have students fill out time sheets as part of their take home assignments.

94. Cohen, *supra* note 71, at 12.

95. See *infra* appendix C for additional selected responses to question 14: “What are the specific causes for entry-level attorneys in your local office incurring excessive online research costs?”

Table 2
Types of Pricing Plans

<i>Westlaw</i>							
Firm Size	Flat Rate	Totally Unlimited	Limited Flat Rate	No Flat Rate Plan	Transactional Plan	Hourly Plan	Do Not Have Westlaw
26–50	56.5%	0%	56.5%	39.1%	47.8%	21.7%	0%
51–100	83.7%	2.3%	76.7%	16.3%	16.3%	18.6%	2.3%
101–200	72.2%	0%	72.2%	25%	33%	30.6%	5.6%
Over 200	79.1%	7%	69.8%	14%	27.9%	27.9%	4.7%

<i>LexisNexis</i>							
Firm Size	Flat Rate	Totally Unlimited	Limited Flat Rate	No Flat Rate Plan	Transactional Plan	Hourly Plan	Do Not Have LexisNexis
26–50	72.7%	0%	62.5%	18.2%	36.4%	31.8%	4.5%
51–100	84.1%	4.6%	79.5%	13.6%	25%	18.2%	2.3%
101–200	70%	0%	70%	25%	40%	30%	2.5%
Over 200	82.9%	4.9%	75.6%	14.6%	26.8%	17.1%	4.9%

Case/Digest Research

¶50 Of those groups who chose cases/digests as one of the most important tasks, respondents from the smaller firm groups answered with similar regularity:

- 26 to 50 attorneys (82.6%);
- 51 to 100 attorneys (84.4%);
- 101 to 200 attorneys (87.5%)

Again, the largest firms (over 200 attorneys) lagged behind—this time with 73.3%. There is no doubt that all research courses now include instruction on how to search case law databases. The same may not be true about digest searching. These results show that the digests should be given appropriate attention as being the only means to conduct systematic, subject-specific case law research. Students become more effective with online digest searching once they have been trained on the print digest sets. Learning how to use the print digests gives students an understanding of the case law research process, which includes identifying the appropriate headnotes in a case, noting relevant keywords from the headnotes and body of the case, finding cases with similar headnotes, and discovering related headnotes that may be of use by browsing the digest set. That, in turn, makes Westlaw digest searching (and thus case law research) more meaningful and productive. So although new associates may not be called on to use the print digests, having done so in law school may make them more effective online digest searchers.

Secondary Source Research

¶51 The respondent groups were remarkably similar in their choice of secondary source research as being a most important research task, with again the notable exception of the largest firms, whose percentage was more than fifteen points lower than any other group. The percentages were:

- 26 to 50 attorneys (73.9%)
- 51 to 100 attorneys (73.3%)
- 101 to 200 attorneys (77.5%)
- Over 200 attorneys (57.7%)

¶52 As more than seventy percent of respondents chose this task to be “most important,” academic law librarians should stress its importance even more than we generally do. Many students and entry-level attorneys do not know how to conduct secondary source research (or see the need to do so), yet the firms are requiring that they perform thorough secondary source research. Law firms are reporting with alarm that new associates have the dangerous tendency to start a research project in an unfamiliar area of law by searching primary law databases instead of first consulting a good practice guide in order to learn the law and language of a particular subject area. Here is a typical comment:

Most [new associates] do not know how to use a library catalog to find materials. Most of them do not know how to use an index. Most of them do not know the difference between the table of contents and the index. Most of them think that they need to go directly to researching case law online, and are unaware of how secondary resources should be used.

With this myopic approach, a researcher will not properly understand the law and may mistakenly rely on irrelevant case law.

Citator Services

¶53 The range of respondents who marked citator services as being a most important task spanned from 70% (firms of 101 to 200 attorneys) to slightly under 50% (firms of 26 to 50 attorneys). However, the percentages were fairly similar amongst all but the firms of 101 to 200 attorneys. Although that group had the highest percentage for six of the eight most important research tasks, never was the difference nearly as pronounced as in this instance.

Code Research

¶54 Only about ten percentage points separated all firm size groups for this most important research task. It is of note that the group with the lowest percentage here (firms of over 200 attorneys) also had the lowest percentage for five of the eight tasks mentioned in table 1—most by a significant amount. Such was the case here, as this group trailed the next lowest group by 6.6 percentage points.

Required Print-Based Research Tasks

¶55 When asked what print resources entry-level attorneys must know how to use, there were ten research tasks chosen by a high percentage of respondents (see table 3).

Table 3

What Print-Based Sources Must New Attorneys Know How to Perform?

Source	Firm Size: 26–50	Firm Size: 51–100	Firm Size: 101–200	Firm Size: over 200	Total:
Federal secondary sources	52.2%	53.5%	52.5%	50.0%	52.6%
Your state's secondary sources	43.5%	58.1%	55.0%	45.2%	51.3%
U.S. Code	56.5%	65.1%	77.5%	57.1%	65.1%
Your state's legislative code	69.6%	69.8%	80.0%	54.8%	67.8%
Your state's digest	52.2%	55.8%	55.0%	31.0%	47.4%
Your state's administrative code	48.8%	46.5%	47.5%	42.9%	46.1%
C.F.R.	34.8%	51.2%	50.0%	45.2%	47.4%
Your state's reporters	65.2%	51.2%	50.0%	38.1%	49.3%
Federal digests	43.5%	43.5%	50%	34.8%	44.7%
Federal reporters	56.5%	53.5%	62.5%	45.2%	53.9%
Your state's administrative law decisions	13%	21.7%	16.7%	15.2%	18.4%
Federal Administrative law decisions	13%	19.6%	11.9%	10.9%	15.1%
Regional reporters	17.4%	10.9%	9.5%	13%	12.5%

Federal secondary source percentages did not vary much based on firm size, ranging just 3.5%. A comparison of percentages for federal and state administrative codes also shows a similarity, with less than a 5% difference between three of the four groups. However, the range between groups for state secondary sources was nearly 15%, and was over 20% for federal and state legislative codes.

¶156 The percentages in the firms of over 200 attorneys were at or near the highest of all groups in the *availability* of print-based federal and state digests. However, this group's print digest "must-know" percentages were the lowest of all groups. Amongst all respondents, the "must know" average was near fifty percent for both federal and state digests.

¶157 In a few instances, such as for federal case law and federal digests for firms with 26 to 50 attorneys, and state legislative codes for firms with 51 to 100 attorneys, the "must know" percentages were larger than the accessibility percentages. So although a firm may not have a resource in print, new attorneys may still be expected to know how to use that material in print. The requirement of having to master a task in a format that a firm does not possess might be explained by the nearby availability of print materials outside of the firm setting, perhaps at a local law library.

¶158 The overall percentages for all of the "must know" print-based tasks were lower than for my 2004 survey. The federal and state reporter and the state second-

ary source percentages fell the most—ranging from 18.4% to 12.3%—but the overall percentages for those categories still remain high, above or near the 50% mark. Firms with over 200 attorneys nearly always had the lowest percentage of print-based “must knows” for each of the ten listed tasks.

¶59 Respondents were asked what research tasks should usually be conducted in print, and 85.8% chose secondary source research. Legislative code research (58.1%) and legislative history research (45.9%) also scored high. Of particular interest is that secondary source research—which scored near the top in important research tasks—scored highest amongst the tasks that should usually be conducted in the books. The complete results can be seen in table 4.

Table 4

What Research Tasks Should Usually Be Conducted in Books?

Task	Firm Size:	Firm Size:	Firm Size:	Firm Size:	Total:
	26–50	51–100	101–200	over 200	
Secondary source research	81.8%	83.7%	97.3%	81.4%	85.8%
Legislative code research	50.0%	62.8%	64.9%	51.2%	58.1%
Legislative history research	40.9%	39.5%	43.2%	55.8%	45.9%
Administrative code research	22.7%	41.9%	37.8%	30.2%	34.5%
Cost-effective research	22.7%	30.2%	40.5%	27.9%	30.4%
Case law/digest research	13.6%	25.6%	10.8%	16.3%	16.9%
Document retrieval by citation	0%	4.7%	0%	0%	2%
Shepard’s	0%	2.3%	0%	0%	.68%

¶60 The middle two groups—firms with 51 to 200 attorneys—had the highest percentages of respondents who felt that secondary source and legislative code research should usually be conducted in print. Although 82.3% of all respondents identified case law/digest research as a most important task, only 16.9% believe such research should usually be conducted using the books. In contrast, 65.6% felt this type of research should usually be conducted online.

¶61 These responses strongly suggest that print-based components for secondary source and legislative code research should be taught in all legal research courses. In addition, personal experience shows that online digest research is understood better, and therefore performed more efficiently, if first learned in the print format.

Required Online Research Tasks

¶62 When asked which research tasks should usually be conducted online, the most prevalent answer was citator service research, at 90.4%. Only one respondent chose print-based Shepardizing. Academics are often pressed to fit critical tasks into a limited amount of class time, and based on these findings it does not seem worthwhile to spend much, if any, time teaching Shepard’s in print. Not only is this

format seldom used in practice, but the skills needed to master Shepardizing in print do not translate in any meaningful way online (unlike those for digests). Instead, classroom time currently devoted to print citators could be spent on either expanding instruction on electronic citators or adding another more relevant research component to the course.

¶163 Over eighty percent of respondents indicated that document retrieval by citation should usually be conducted online and, as mentioned before, nearly two out of three respondents feel that case law and digest research should usually be conducted online.

¶164 A higher percentage of respondents from the larger law firms determined that secondary source and legislative code research should usually be conducted in print than did the smaller two groups. See table 5 for a more detailed breakdown of what tasks librarians believe should usually be conducted online.

Table 5

What Research Tasks Should Usually Be Conducted Online?

Task	Firm Size: 26-50	Firm Size: 51-100	Firm Size: 101-200	Firm Size: over 200	Total:
Shepard's/KeyCite	87.0%	90.9%	92.7%	93.2%	90.4%
Document retrieval by citation	73.9%	81.8%	85.4%	81.8%	80.1%
Case law/digest research	60.9%	65.9%	56.1%	72.7%	65.6%
Cost-effective research	52.2%	43.2%	29.3%	27.3%	36.3%
Legislative code research	26.1%	22.7%	12.2%	15.9%	18.5%
Administrative code research	26.1%	25%	9.8%	13.6%	17.8%
Legislative history research	26.1%	22.7%	7.3%	15.9%	17.2%
Secondary source research	13.0%	13.6%	4.9%	6.8%	9.6%

Required Database Knowledge

¶165 Law firms were asked exactly what databases their new hires had access to in their offices, and the results are shown in table 6. The most prevalent databases, as could be expected, were LexisNexis (95.6%) and Westlaw (93.1%). The largest percentage differences between groups were for the specialty databases of LivEdgar (43.5% to 80.4%) and RIA CheckPoint (34.8% to 70%). The database percentages generally rose as the number of attorneys in the firm rose.

¶166 In addition to the availability of databases, usage proficiency is also important. Table 7 shows which databases attorneys are expected to know how to use.

Table 6**What Databases Do New Attorneys Have Access to In Your Office?**

Database	Firm Size: 26–50	Firm Size: 51–100	Firm Size: 101–200	Firm Size: over 200	Total:
Westlaw	95.7%	89.1%	95.0%	95.7%	93.1%
LexisNexis	95.7%	95.7%	100.0%	93.5%	95.6%
Pacer	87.0%	84.8%	92.5%	79.5%	85%
CourtLink	65.2%	60.9%	80.0%	82.6%	72.5%
LivEdgar	43.5%	54.3%	72.5%	80.4%	63.8%
RIA CheckPoint	34.8%	43.5%	70.0%	65.2%	53.8%
Dun & Bradstreet	13%	8.7%	20%	30.4%	18.8%
LoisLaw	21.7%	26.1%	15.0%	10.9%	17.5%
ChoicePoint	4.3%	2.2%	17.5%	21.7%	12.5%

Table 7**What Databases Must New Attorneys Know How to Use in Your Office?**

Database	Firm Size: 26–50	Firm Size: 51–100	Firm Size: 101–200	Firm Size: over 200	Total:
LexisNexis	86.4%	91.1%	100.0%	91.1%	91.6%
Westlaw	95.5%	84.4%	92.3%	93.3%	90.3%
Pacer	40.9%	28.9%	20.5%	18.6%	25.8%
CourtLink	18.2%	11.1%	20.5%	15.6%	16.1%
RIA CheckPoint	9.1%	8.9%	12.8%	11.1%	11%
LivEdgar	9.1%	15.6%	7.7%	8.9%	10.3%
LoisLaw	18.2%	6.7%	5.1%	2.2%	6.5%
Dun & Bradstreet	4.5%	0%	5.1%	6.7%	3.9%
ChoicePoint	4.5%	2.2%	0%	4.4%	2.6%

¶67 It is helpful to directly compare database availability numbers to required proficiency numbers—thus showing what percentage of firms that provide a database expect the attorneys in the firm to be proficient in its use. Only for LexisNexis and Westlaw was there a general expectation that attorneys would be proficient in using the database:

- Westlaw (94%: i.e. 94% of firms who provide Westlaw access to their new hires require that they are proficient in Westlaw);
- LexisNexis (92.8%);
- LoisLaw (35.7%);
- Pacer (29.4%);
- CourtLink (21.6%);

- ChoicePoint (20%);
- Dun & Bradstreet (20%);
- RIA Checkpoint (19.8%); and
- LivEdgar (15.7%).

Based on the last two tables and the list directly above, it is a good idea to introduce law students to some of the databases listed here, in addition to Westlaw and LexisNexis.

Format: Are Books Dead?

¶68 As discussed above, prior survey results show that most firm libraries still have a significant supply of legal research books.⁹⁶ My 2007 survey indicated the same as well. According to the survey, about ninety percent of respondents still have federal and state secondary resources in the print format. These sources are followed closely by the *U.S. Code*, state legislative codes, state digests, state administrative codes, and the C.F.R., which all ranged from 75% to over 88%. Since my 2004 survey, there has been a decline in the number of firms that keep print reporters. Even so, the numbers from this 2007 survey are fairly high: state reporters (71%), federal reporters (59.3%), and regional reporters (19.75%). No respondent reported a total absence of books.

¶69 The larger the firm, the higher the percentage of *federal* secondary source materials kept in print format. The percentages ranged from 82.6% for the 26 to 50 attorney firm to over 95% in the 101 to 200 and over 200 attorney firms. Firms of 26 to 50 attorneys had the least number of *state* secondary source materials in print format, at 78.3%. The other three groups ranged between 91.3% and 93.5%.

¶70 The availability of print-based federal legislative codes, state legislative codes, federal digests, state digests, state administrative codes, the C.F.R., federal reporters, and state reporters showed a similar pattern of most often increasing when firm size increased. Of particular note are the percentages for the regional reporters—which many libraries have reportedly been withdrawing over the past few years. The over 200 attorney group had by far the highest percentage of respondents reporting that they still have some regional reporters, at 37%. Contrast that percentage with the totals from the other three firm sizes: 26–50 (17.4%), 51–100 (15.3%), and 101–200 (9.5%). For the total of print resources remaining in law firms, by type and firm size, see table 8.

Respondent Comments Regarding Books

¶71 Some representative comments follow:

- “Books are not obsolete. Many times, especially for newer associates, they are the best way to become acquainted with a topic area and terminology. This knowledge can then make online research more effective. . . . Also there needs to be an understanding that not everything will be available online.”

96. See *supra* ¶¶ 30–40 for more information on print materials in firms.

- “As the years pass, we now find that we have to teach new attorneys about the valuable material found in secondary treatises. We have to explain what a [table of contents] is and where to find it. [We have to] explain the use of an index. Repeat over and over that not everything is on the computer. Some research can still be done more efficiently in hardcopy or through a combination of hardcopy/electronic.”
- “At our law firm, we think print resources are best when an attorney is starting a new, unfamiliar project, or needs to see the ‘big picture’. Online is best when the attorney has a pretty good idea of what he/she is looking for. New attorneys seem too unfamiliar with print resources. Also, new attorneys don’t seem to be familiar with how to do legal research most cost-effectively.”
- “[A] major concern would be attorneys stopping their research when they get *any* answer as opposed to the best answer. Too many attorneys don’t know what they could be missing, appear to be unaware of the shortcomings of online research and don’t have familiarity with the organization of the print materials if they only use them [legal titles] online.”

Additionally, as discussed before, and as shown in table 3, a high percentage of respondents chose ten print-based research tasks as being law firm “must-knows.” Books are far from dead in the law firm setting.

Table 8

Print Resources Available

Resource	Firm Size: 26–50	Firm Size: 51–100	Firm Size: 101–200	Firm Size: over 200	Total:
Federal secondary sources	82.6%	87.0%	95.2%	95.7%	90.1%
Your state’s secondary sources	78.3%	93.5%	92.9%	91.3%	89.5%
U.S. Code	82.6%	84.8%	97.6%	91.3%	88.3%
Your state’s legislative code	87.0%	69.6%	97.6%	97.8%	87%
Your state’s digest	73.9%	73.9%	83.3%	89.1%	79%
Your state’s administrative code	65.2%	71.7%	85.7%	89.1%	79%
C.F.R.	56.5%	69.6%	83.3%	87.0%	75.3%
Your state’s reporters	69.6%	67.4%	71.4%	80.4%	71%
Federal digests	39.1%	63%	76.2%	76.1%	65.4%
Federal reporters	52.2%	56.5%	64.3%	65.2%	59.3%
Your state’s administrative law decisions	8.7%	30.4%	38.1%	54.3%	36.4%
Federal administrative law decisions	13%	38.5%	44.4%	60%	26.5%
Regional reporters	17.4%	15.3%	9.5%	37.0%	19.75%

Conclusion: Using the Survey Results to Implement Change

¶172 It is most useful to craft a law school research course according to the needs of law firms. Based on law firm responses, I integrate several print research components in my advanced legal research course. Components include federal and California secondary sources, digests, statutes, and administrative codes, with some attention also paid to court rules, pleadings, and court and practice forms. Instruction is given as to the use of indices and tables of contents, as well as to the different types and uses of secondary sources, so that students will know how to use these resources when in a law firm setting. In addition, each component of the course includes training on how and when to use free web-based resources. Great effort is expended on being sure that students have a thorough understanding of the database hierarchy, search query formulation, search strategy, and overall online navigation.

¶173 In addition, it is critical that law students be taught cost-effective research strategies. In doing so, students will be better trained to compete in the legal marketplace, where such knowledge will give them a crucial edge. It will take extra work to craft a practical course, but in doing this you are working toward solving the age-old problem of entry-level attorneys who are unprepared to conduct meaningful research.

Appendix A

Research Questionnaire

Thank you for participating in this short survey, which should take between ten and fifteen minutes to complete. Your answers will be submitted via an anonymous e-mail address to assure confidentiality. Results will be summarized to this listserv and answers will be used to train our law students how best to serve the legal community. In addition, an article is planned to be written that will compare and contrast these results with results from prior administrations of this survey. This is your chance to tell academia how we should teach legal research. When finished, hit the SUBMIT button at the bottom of the page.

1. **What type of office do you work in?**
 - Law Firm
 - Government
 - Academic
 - Business
 - Public Interest

2. **About how many attorneys are in your local office?**
 - 1–25
 - 26–50
 - 51–100
 - 101–200
 - Over 200

3. **What online legal research services do entry-level attorneys in your local office have access to? Check all that apply:**
 - Westlaw
 - LivEdgar
 - ChoicePoint
 - VersusLaw
 - LoisLaw
 - RIA Checkpoint
 - LexisNexis (excluding CourtLink)
 - CourtLink
 - Dun & Bradstreet
 - PACER

Other (please specify):

4. **What online legal research services *must* entry-level attorneys in your local office know how to use? Check all that apply:**
 - Westlaw
 - LivEdgar
 - ChoicePoint
 - VersusLaw

- LoisLaw
- RIA Checkpoint
- LexisNexis (excluding CourtLink)
- CourtLink
- Dun & Bradstreet
- PACER

Other (please specify):

5. **What print materials do entry-level attorneys in your local office have access to? Check all that apply:**

- Federal case law reporters
- Federal legislative codes
- Federal administrative codes
- Federal administrative law decisions
- Federal digests
- Federal loose-leaf treatises, practice guides, or encyclopedias
- Your state's case law reporters
- Your state's legislative code
- Your state's administrative code
- Your state's administrative law decisions
- Your state's digests
- Your state's loose-leaf treatises, practice guides or encyclopedias
- Regional reporters

Other (please specify):

6. **What print materials *must* entry-level attorneys in your local office know how to use? Check all that apply:**

- Federal case law reporters
- Federal legislative codes
- Federal administrative codes
- Federal administrative law decisions
- Federal digests
- Federal loose-leaf treatises, practice guides, or encyclopedias
- Your state's case law reporters
- Your state's legislative code
- Your state's administrative code
- Your state's administrative law decisions
- Your state's digests
- Your state's loose-leaf treatises, practice guides or encyclopedias
- Regional reporters

Other (please specify):

7. **What are the most important research tasks (online or in print) that entry-level attorneys in your local office must know how to perform?**

Check all that apply:

- Case law/digest research
- Legislative code research
- Administrative code research
- Shepard's/KeyCite
- Secondary source research
- Cost effective research
- Document retrieval by citation
- Legislative histories

Other (please specify):

8. **Based on your experience, what research tasks should usually be conducted in books as opposed to online? Check all that apply:**

- Case law/digest research
- Legislative code research
- Administrative code research
- Shepard's/KeyCite
- Secondary source research
- Cost effective research
- Document retrieval by citation
- Legislative histories

Other (please specify):

9. **Based on your experience, what research tasks should usually be conducted online as opposed to in books? Check all that apply:**

- Case law/digest research
- Legislative code research
- Administrative code research
- Shepard's/KeyCite
- Secondary source research
- Cost effective research
- Document retrieval by citation
- Legislative histories

Other (please specify):

10. **If your office subscribes to Westlaw, what contract plan or plans do you have? Check all that apply:**

- Flat-rate
- Transactional (pay-as-you-go)
- Hourly

Other (please specify):

11. **If your office subscribes to LexisNexis, what contract plan or plans do you have? Check all that apply:**

- Flat-rate
- Transactional (pay-as-you-go)
- Hourly

Other (please specify):

12. **If your office has a flat-rate plan from Westlaw, is it unlimited in scope or is it confined to a certain jurisdiction, where any research beyond that jurisdiction would result in extra costs?**

- We have no flat-rate plan
- Unlimited with a few exceptions
- Totally unlimited
- Confined by jurisdiction

Comments:

13. **If your office has a flat-rate plan from LexisNexis, is it unlimited in scope or is it confined to a certain jurisdiction, where any research beyond that jurisdiction would result in extra costs?**

- We have no flat-rate plan
- Unlimited with a few exceptions
- Totally unlimited
- Confined by jurisdiction

Comments:

14. **What are the specific causes for entry-level attorneys in your local office incurring excessive online research costs?**

What comments or concerns about legal research would you like to share?

Appendix B

Selected Comments on Legal Research

Comments were edited only for grammatical purposes; the substance of comments was not changed.

A lot of new associates depend solely on online resources to find answers. Sometimes a combination of online and book research is needed, and it is this ability that new associates seem to lack.

I take a contrarian view of this topic. Every profession (even librarianship) has a disconnect between what is taught and what is practiced. On-the-job training (after college or professional school) is the norm in many fields; to expect otherwise is foolishness unless one wants to start a school only for one's own employees (not likely!).

After having our West librarian relations rep do a legal research demo at our firm on some of our products available in print and online, we found that even if topics were somewhat touched on in school, the young attorneys still need some review of even simple researching. Students seem to need more print training in school than they do online training. Since it didn't cost them anything to use Westlaw/Lexis in school, it's what they are used to using.

An overall orientation on the resources available, both in print and online and understanding of the limitations of the available services.

Anything we can do to teach attorneys: (1) not to scorn books, (2) not to assume what they find on the free Internet is current and accurate, (3) that typing a generic subject into the ALLCASES database on Westlaw/Lexis does not provide the best results is a good thing.

Books are not obsolete. Many times, especially for newer associates, they are the best way to become acquainted with a topic area and terminology. This knowledge can then make online research more effective. And due to our hourly contracts, reading lots of information online is not the best way to spend their time or the client's money. Also there needs to be an understanding that not "everything" will be available online, and they may need to actually get up from behind their desks and come to the library to do some research. There also can be some reluctance to ask for assistance and to use the library staff for help. We try to stress that if they have been spinning their wheels for more than about ten to fifteen minutes they need to step back and ask for some assistance.

Conducting legal research is not just about knowing the law—it's about being cognizant of the best sources to use for various searches, both in terms of cost and depth of coverage.

Cost effective researching must be stressed! The free, total access student IDs from Lexis and Westlaw are a bane to us firm librarians. The new attorneys have a hard time making the transition to the firm IDs. I try to advise the summer associates about this, but the temptation is too great. Plus, they often receive a week's worth of free IDs from Westlaw or Lexis. Once those have expired, they tend to continue their carefree research ways with the firm IDs. I also try to teach them that if it is taking longer than ten minutes to find, they need to contact me. Most of them do not know how to use the print materials. They rely too heavily on online sources when the research can be done more effectively and cheaper by opening a book.

Do not know about statutes or regulations. The summers or fall associates just want to find case law, which is not what it's all about. Don't know how to use secondary/analytical sources. I had a new fall associate making a ridiculous amount of money who did not know what an index was or how to use it.

Every year we see a decline in the legal research capabilities of the incoming associates.

Few new associates seem to have any idea how to research federal administrative law or do legislative history research. Too much emphasis in law school seems to go to just case law, very little real world education. Also, they believe the myth that everything is on the web and can be obtained for free and in ten minutes. Would someone give them a reality pill, PLEASE!!!!

I think loose-leaf materials and other secondary sources that are often crucial in everyday practice get little or no attention in law schools.

I try to help them understand that fast research does not necessarily equate to good research.

I'm surprised when I find that new attorneys don't always understand the use of our print digests. It's difficult to get them to attend training sessions after their initial orientation (even with carrots like free food, CLE when possible, etc.).

In school these guys are given research projects with answers. Research done at big firms quite often doesn't have clear-cut answers. Students should be set research tasks with no clear answer and be taught that, sometimes, the answer is, "There's no clear answer." And to keep track of what they have used in their research and to know when to stop. Of course if they talked with a librarian before they started, they'd be given this advice. Advice that is not forthcoming if they sit in front of a computer typing aimlessly away. In mitigation, many of these new associates (especially summers) are driven to be successful quickly in a competitive environment. They think they will be seen as a success if they give an answer to a partner as quickly as possible; that's great, unless the answer is wrong (and I've seen that time and time again). It has been my experience that law students learn almost nothing when it comes to legal research in law school and do not fully utilize their law libraries or librarians.

It is not so much that the techniques of legal research are unknown to them as it is the inability to analyze the substance of the law. The perfect course would combine legal research, analysis of the law, and legal writing. Finding the law, digesting the law, writing about the law as an integrated approach. It seems that the skills of researching the law, long associated with part of legal professionalism, are now considered something to be farmed out to others, i.e., librarians, law clerks, outsource attorneys. Partners seem to fear alienating new associates by making them do research. As one told me recently, that's not why they became lawyers.

It is tragic that the modern recent graduate does not appreciate the techniques of good legal research and writing. Good writing, supported by research, will insure partnership but youngsters do not seem to understand this. The thought process involved in good research is a skill which needs constant honing and contributes to overall good lawyering.

I would say only 10% of summers/first years have even a basic grasp of legal research. They are truly unprepared in every way. Skills seem to decline every year. It doesn't help that I have yet to meet an academic librarian who understood law firm economics or how contracts are billed. I would be happier with young associates who had never touched a computer in law school but could actually use a book.

It seems that they think they know everything . . . although sometimes they do know more than I do. However, I think it would be important that law clerks be taught how to use the print and online sources together. Sometimes, especially if it is a topic that I have never heard about, the print legal encyclopedias are a better way to start and then go online (i.e., WL or LEXIS) to get more information.

The law schools have to be the place when some intervention needs to be done. And we have to hear this from managing partners/hiring partners/recruiters and not just the law firm and corporate and law school librarians. We've been screaming for many years.

Appendix C

Selected Comments on Excessive Online Research Costs

Comments were edited only for grammatical purposes. The substance of comments was not changed.

Not taking advantage of training opportunities; too much printing; using transactional option when should be in hourly or vice versa; using too large a file; incurring too many separate searches rather than using Focus or Locate.

Lack of cost-effective training in law school. Jumping online before fully comprehending the question being researched. Jumping online before considering available print resources.

Lack of knowledge of the databases. And not enough time for training.

Lack of knowledge regarding available stand-alone online products that firm subscribes to and can be used without incurring additional costs. Lack of knowledge regarding which database to use for research when logged on to LexisNexis or Westlaw. Lack of understanding between hourly versus transactional billing. Not taking the time prior to logging on as to the question at hand; must think through the question and decide what the absolute elements are prior to logging on and running unnecessary searches or spending too much time reviewing false hits.

Lack of training. We find it hard to get them to attend training programs. They will usually start with online research, regardless of whether that is the best approach.

Lack of understanding that book research could actually be cheaper and easier than online.

Limited experience with efficient search/retrieval/printing options in law school. Limited use of print resources and knowledge about when it is appropriate to use print or free Internet sources and which online sources may be outside our flat-rate agreements (nonbillable versus client-billable).

Lose track of time spent. Don't have a clear understanding of the way Lexis/Westlaw track time or number of searches. Are not clear on the billing policy of the firm. Refusal to ask for clarification or help.

Most begin in case law and then do keyword searches without considering the larger context. This leads to large bills and much frustration. They also have a bad habit of reading online and forgetting to log off when they are disturbed by a phone call or other issue.

No understanding of hourly versus transactional choices. Don't understand when they're refining an existing search versus starting a new search (in transactional). Don't really know what they're searching for—are “just fishing” online.

I think the biggest problem currently is lack of thought and planning that goes into search strategy. Some searchers sit down at the computer and pound words into a search box without much thought given to database selection (ALLFEDS or MEGANEWS must be the best—right?) or terminology or context. Little thought is given to which system (Lexis, Westlaw, Livedgar, etc.) might be the better, more efficient system for the current project. Online searchers need to spend some time learning the content of the databases.

Ignorance and inexperience usually shown by using an expensive database outside the plan, conducting broad-based research, and downloading or printing all/most of the results.

Inability to create an effective search and/or unwillingness to take the time to do so. Reading cases while on the hourly pricing plan. Changing databases and refining queries while on the transactional plan

Failure to use cost and time saving shortcuts such as Get a Document, Focus/Locate, Book Browse, or Table of Contents linking. Use of hourly ID and spending hours online. Printing many documents and using the Lexis or Westlaw print commands. Going out of contract.

They think that they are still in law school and can use online as long as possible. They have no idea on how to use print secondary sources to locate research and spend all of their time on the computer. They are unprepared and inexperienced in using online databases effectively and efficiently. They do not understand basic research tools like digests, law reviews, and restatements.

Basically, they don't know where to begin, so they start with natural language searches of case law, find nothing specific, then frantically enter terms and read hundreds of cases online.

Clicking on links and not understanding how much they cost. Also, starting their research project by searching online first rather than using secondary source material. Using bigger databases than necessary. Not understanding the difference between hourly and transactional searching.

Doing multiple searches instead of one broad search and then limiting or focusing the results. Looking in a large file or database instead of smaller ones.

Don't want to read the cases, don't know how to use the books, don't know the “bible” treatises for given practice areas, haven't asked the billing partner.