



Robert F. Wagner Graduate School of Public Service

Evidence-Based Management:
Trust the Evidence, Not Your Instincts

Course Syllabus
Spring 2016

Course teacher: Eric Barends, Ph.D.

COURSE CONTEXT

Practitioners across many fields such as medicine, criminology, education, policy-making and management are asking important questions about the extent to which decisions are based on evidence. In all these fields the answer typically is “yes”, decisions are based on evidence. But, in many cases this is true only to a very limited extent.

The idea of evidence-based decision-making has evolved in response to this problem, and is now being applied in several disciplines, with the goal of improving the effectiveness of practice. While this sounds sensible and straightforward, gathering, critically evaluating and using evidence are challenging in many ways and require a set of specific skills. While there are very many courses aimed at developing such skills in medicine and related fields, there are relatively few aimed at students or practitioners in schools of public policy and administration.

COURSE DESIGN

This course uses a blended learning approach that integrates traditional classroom sessions that can be attended in person and e-learning modules that can be completed online. In addition this course takes a problem-based approach: starting point are the practical issues (problems/opportunities) typically encountered by practitioners rather than the body of knowledge produced by academics.

COURSE INTRODUCTION

The specific skills this course aims to develop are: (1) critical thinking and reasoning; (2) identifying and gathering of the best available evidence; (3) critical appraisal of evidence; and, (4) applying evidence of different forms to decision-making. In the process of developing these skills the focus will be on evidence from scientific research. These are examples of the types of questions that will be addressed:

- What is evidence-based decision-making?
- Why do we need it?
- What are decisions in the domain of management and public policy currently based on?
- What do we mean by evidence?
- How can evidence be gathered and critically appraised?
- How can the trustworthiness of evidence be assessed?
- What does evidence-based decision-making look like in practice?
- How is this different from or similar to typical approaches in management and consultancy?
- How can leaders and policy-makers make decisions in a more evidence-based way?

By the end of the course you should be able provide considered answers to all these questions and more.

AIMS

The Course aims to:

- Introduce the concept of evidence-based decision-making
- Assess how decisions in the domain of management, leadership and public policy are currently made.
- Demonstrate how issues (problems/opportunities) can be approached from an evidence-based perspective
- Demonstrate how the trustworthiness of evidence from scientific research can be assessed.
- Give hands-on experience of what evidence-based decision-making entails
- Provide the opportunity to conduct a Critically Appraised Topic (CAT) focused on a practical issue (problem/opportunity).

LEARNING OUTCOMES

On completion of this course, students should be able to:

- Assess the strengths and weaknesses and costs and benefits of evidence-based decision-making.
- Assess the extent to which claims (made by managers, leaders or policy-makers) are supported by evidence
- Distinguish evidence from opinion, probability from certainty, and theory from dogma
- Conduct a CAT to inform decision-making

COURSE MATERIALS

There is no set course book but many articles on evidence-based decision-making and related topics will be discussed. All articles will be provided through the CEBMa website (www.cebma.org/articles) or NYU website. Other relevant materials for the lectures are described below. There are also additional books, articles and websites listed in the Resources section. Please note that you will be expected also to do your own research to identify relevant materials.

RELATION WITH OTHER COURSES

This course has some useful overlap with key concepts and principles from other courses. In particular, students will be familiar with sources of cognitive and social bias in management and policy decision-making (introduced in Managing Public Service Organizations and Microeconomics for Public Management). Similarly, they will have skills in assessing the reliability and validity of research from Statistical Methods for Public, Non-profit, and Health Management. Students also will be familiar with threats to evidence-based decision-making that stem from power and politics from other required courses (Introduction to Public Policy; Strategic Management). The proposed course will extend concepts and principles from these courses and, build students' ability to move from understanding threats to evidence-based decision-making to improving their skills to do so.

OVERVIEW OF TEACHING SESSIONS

<i>Date</i>	<i>Session</i>	<i>Form</i>	<i>Duration</i>	<i>Topic</i>
-	1	E-learning	100 min	Evidence-based decision-making, the basic principles
Feb 5th (Friday) 09:00 – 17:00	2	Workshop	100 min	Evidence-based decision-making: the basic principles
	3 & 4	Lecture & Workshop	100 min	Asking questions
	5	Practical	150 min	Literature review / searching for studies
	6	Lecture	100 min	Professional experience and judgment
Feb 10 th & 11 th (Wednesday & Thursday) 19:00 – 21:00	-	Walk-in hours: individual coaching and support		
Feb 12th (Friday) 09:00 – 12:00	7	Lecture	100 min	The 'best available' evidence
	8	Lecture	50 min	Aspects of scientific research
-	9 & 10	E-learning	250 min	Methodological appropriateness and quality - Evaluating scientific studies
Feb 26th (Friday) 13:00 – 17:00	11	Lecture	50 min	CATs, REAs and systematic reviews
	12	Workshop	50 min	Conducting CATs
	-	Self study: Individual research on your CAT		
Mar 2 nd & 3 rd (Wednesday & Thursday) 19:00 – 21:00	-	Walk-in hours: individual coaching and support		
Mar 4th (Friday) 09:00 – 14:00	14	Presentation	200 min	Presentation of your CAT
	15	Evaluation	50 min	Integrating the outcome of a CAT into the decision-making process, evaluation of the course.

Session 1**E-Learning: Evidence-based decision-making, the basic principles**

Description	What is evidence-based decision-making? What counts as evidence? Why do we need evidence-based practice? What sources of evidence should be taken into account? Why focus on 'the best available' evidence? Common misconceptions of evidence-based decision-making? What is the evidence for evidence-based practice?
Instruction 1	Before you start the online module, please think about your answers to the following questions: <ul style="list-style-type: none"> • Think about the last time you made a decision as a consumer (e.g., buying a new laptop, choosing a restaurant, purchasing a new TV). How did your decision making process look like? What evidence did you use? • Think about a management, business or policy decision you have been involved in making (or have observed closely). How did the decision making process look like? What evidence was available?
Instruction 2	Go to the Open Learning Initiative (OLI) website: https://oli.cmu.edu/ In the upper right hand corner of the site, click "Sign Up" and fill out the form. You will receive further instructions via email.
Required pre-session reading	None
Assignment 1	After completing the module, take the quiz

Session 2 - Feb 5th**Workshop: Evidence-based decision-making, the basic principles**

Description	How do we make decisions? How do managers, leaders and policy makers typically make decisions? Where did evidence-based decision-making come from? What are the limitations of evidence-based practice?
Instruction	Bring a popular management book (or buy one at the bookstore), and answer the following questions <ul style="list-style-type: none"> • What types of sources are cited? • Approximately what proportion of sources appears to be <ul style="list-style-type: none"> - personal or anecdotal - based on so-called "best-practices" of other companies - based on other business books or publications - scientific evidence? (check 3 citations in Google Scholar) • What is known about the author? (check Google and Google Scholar) • What is known about the proposed model / principles? (ditto) • Is the model/ principle generalizable to all types of organizations? • Does the book appear useful (explain why)?

Required pre-session reading	<ul style="list-style-type: none"> • Rousseau, D., & Barends, E. (2011). Becoming an evidence-based HR practitioner. <i>Human Resource Management Journal</i>, 21, 221–235. • Rynes, S. L., Brown, K. G., Colbert, A. E. (2002). Seven common misconceptions about human resource practices: Research findings versus practitioner beliefs. <i>Academy of Management Executive</i>, 18(3): 92–103.
Recommended supplementary readings	<ul style="list-style-type: none"> • <i>Oxford Handbook of EBMgt</i>: <ul style="list-style-type: none"> - Chapter 1: Envisioning Evidence-based Management - Chapter 2: Learning from Other Evidence-based Practices • Briner, R.B., Denyer, D., & Rousseau, D.M. (2009). Evidence-based management: Construct clean-up time? <i>Academy of Management Perspectives</i>, 23, 4, 19-32. • Pfeffer, J. & Sutton, R.I. (2006). Management half-truths and nonsense: How to practice evidence-based management. <i>California Management Review</i>, 48, 77–100. • Rousseau, D.M. (2006). Is There Such a Thing as “Evidence-Based Management”? <i>Academy of Management Review</i>, 31, 256–269. • Staw, B. M., & Epstein, L. D. (2000). What bandwagons bring: Effects of popular management techniques on corporate performance, reputation, and CEO pay. <i>Administrative Science Quarterly</i>, 45(3), 523-556.

Session 3 & 4: - Feb 5th Lecture and workshop: Asking Questions

Description	<p>Why asking critical questions? Solutions in search for a problem. Surfacing assumptions. What is a causal mechanism? Formulating an answerable question. Formulating a searchable question: PICOC.</p>
Instruction 1	<p>Think about a management, business or policy decision you have been involved in making (or have observed closely). This decision should be one which:</p> <ul style="list-style-type: none"> • Was reasonably important • Involved spending significant resources • Involved several or more people • Was made over a period of time (ie. weeks or months) <p>Ask yourself these questions and write down the responses – make them as detailed as possible:</p> <ul style="list-style-type: none"> • What exactly was the problem (or opportunity)? • How many alternative decision options were considered? • How much evidence was used, and from which sources (scientific, organizational, experience, crystal ball?) • Was any attempt made to explicitly evaluate its quality or trustworthiness?

Instruction 2	<ul style="list-style-type: none"> • Bring along a policy paper, project proposal, strategy document or change plan from an organization • Read the paper and underline all assumptions. • Determine the three most questionable or critical assumptions. • Make a suggestion on how these assumptions could be substantiated. <p>If you don't have (or are not able to acquire) a policy paper, project proposal, strategy document or change plan the course leader will provide you one.</p>
Required pre-session reading	None
Recommended supplementary readings	<ul style="list-style-type: none"> • Nutt, P. C. (1999). Surprising but true: Half the decisions in organizations fail. <i>The Academy of Management Executive</i>, 13(4), 75-90. • Heath, Chip, and Dan Heath. <i>Decisive: How to make better choices in life and work</i>. Random House, 2013. • Nutt, P. (2002). <i>Why decisions fail: Avoiding the blunders and traps that lead to debacles</i>. Berrett-Koehler Publishers.

Session 5: - Feb 5th Practical: Doing a literature review - searching for scientific studies

Description	Literature reviews. Peer reviewed journals. Types of research databases. Search strategies: shotgun, snowball and building blocks. Managing the scientific evidence found. Let the evidence find you!
Instruction	Please go to ProQuest ABI/Inform Global through the NYU library website and create a 'My research' account.
Required pre-session reading	<ul style="list-style-type: none"> • MacLeod, D. (2012). <i>How to Find Out Anything</i>. Chapter 3: The Ins and Outs of Google • Please go to the ProQuest Platform Training on Youtube (http://www.youtube.com/playlist?list=PL943D4F9759615B70) and watch: <ul style="list-style-type: none"> ✓ Basic search (1:24 min) ✓ Advanced search (1:49 min) ✓ My research (1:06)
Recommended supplementary readings	<ul style="list-style-type: none"> • <i>Oxford Handbook of EBMgt</i>, Chapter 15: Buried treasure: Finding Evidence Now • Dickersin, K. (1990). The existence of publication bias and risk factors for its occurrence. <i>Journal of American Medical Association</i>, 263, 1385-1389. • Sterling, T. (1959). Publication decisions and their possible effects on inferences drawn from tests of significance: Or vice versa. <i>Journal of the American Statistical Association</i>, 54(285), 30-34.

Assignment 2 (group)	<p>Conduct a CAT (on a topic provided during the session) and make a maximum five minute presentation (strictly timed) covering the following topics:</p> <ul style="list-style-type: none"> • What search strategy was used and why? • What types of study were considered relevant and why? • What are the findings? <p>The CAT's will be presented during session 7</p>
-----------------------------	--

Session 6: - Feb 5th

Lecture: Professional experience and judgment

Description	<p>Why are the insights and expertise of experienced professionals is an important source of knowledge? What are the boundaries of human rationality? What are cognitive biases? What are the most common biases? How can you use experiential evidence with due regard for the role played by cognitive biases?</p>
Required pre-session reading	<ul style="list-style-type: none"> • Please go to Youtube and watch 'Being Decisive' by Dan Heath • Schrage, M. (2003), Daniel Kahneman: The Thought Leader Interview. <i>Strategy & Business</i> issue 33 • Kahneman, D. (2011), Before You Make That Big Decision. <i>Harvard Business Review</i>, June • Olk, P and Rosenzweig, P. (2010). The Halo Effect and the Challenge of Management Inquiry. <i>Journal of Management Inquiry</i>. 19(1) 48–54 • Rynes, S. L., Colbert, A. E., & Brown, K. G. (2002). HR professionals' beliefs about effective human resource practices: Correspondence between research and practice. <i>Human Resource Management</i>, 41, 149–174
Recommended supplementary readings	<ul style="list-style-type: none"> • Dobelli, R. (2013) <i>The Art of Thinking Clearly</i>. Harper, London • Kahneman, D. (2011). <i>Thinking, Fast and Slow</i>. Penguin Group, London • Arieli, D. (2010) <i>Predictably Irrational, Revised and Expanded Edition: The Hidden Forces That Shape Our Decisions</i>, Harper • Yaniv, I., & Choshen-Hillel, S. (2011). Exploiting the Wisdom of Others to Make Better Decisions: Suspending Judgment Reduces Egocentrism and Increases Accuracy, <i>Journal of Behavioral Decision Making</i>, 2012; 25 (5) p 427–434 • Sturdy, A. (2004). The adoption of management ideas and practices, <i>Management Learning</i>, 35, 2, 155-179. • Sturdy, A. (2011). Consultancy's Consequences? A Critical Assessment of Management Consultancy's Impact on Management. <i>British Journal of Management</i>, 22, 517–530. • Tversky, A., & Kahneman, D. (1974). Judgment under uncertainty: Heuristics and biases. <i>Science</i>, 185(4157), 1124-1131. • Shermer, M. (2011). The believing brain. <i>Scientific American</i>, 305(1), 85-85.

Walk-in hours: Feb 10th & 11th

Description	This is an opportunity for you to receive individual coaching and support on how to write a literature review, how to search for scientific studies in research databases, asking critical questions, avoiding common biases, etc.
-------------	--

Session 7: Feb 12th Lecture: Best available evidence

Description	What is pseudoscience? What is methodological appropriateness? What is internal validity? What's the difference between correlation and causality? What is bias? What is confounding? What are the levels of internal validity? What is external validity?
Instructions	Think about the last time you were involved in a change-intervention And consider your answers to the following questions: <ul style="list-style-type: none"> • Did the intervention have an effect? • How do you know? How can you be certain that intervention A leads to outcome B?
Required pre-session reading	<ul style="list-style-type: none"> • Petticrew, M., & Roberts, H. (2003). Evidence, hierarchies and typologies: Horses for courses. <i>Journal of Epidemiology & Community Health</i>, 57, 527-529 • Barends, E., Janssen, B., ten Have, W., ten Have S (2014). Difficult But Doable: Increasing The Internal Validity of OCM Studies, <i>Journal of Applied Behavioral Science</i> • Shermer, Michael. "What is pseudoscience?." <i>Scientific American</i> 305.3 (2011): 92-92.
Recommended supplementary readings	<ul style="list-style-type: none"> • Barends, E., Janssen, B., ten Have, W., & ten Have, S. (2013). Effects of change interventions: What kind of evidence do we really have? <i>The Journal of Applied Behavioral Science</i> • Goldacre, Ben (2008). <i>Bad Science</i>, Harper Collins, London • Goldacre, Ben (2014). <i>I Think You'll Find It's a Bit More Complicated Than That</i>, Harper Collins, London

Session 8: Feb 8th Lecture: Aspects of scientific research

Description	What is a research design? What types of research designs are there? What are the basic elements of a research design? What is randomization? What is a control group? What are effect sizes? What is a confidence interval and why do we need it? How to determine the research design? How to determine a study's methodological quality? What are standard appraisal questions?
-------------	--

Required pre-session reading	None
Recommended supplementary readings	<ul style="list-style-type: none"> • Shadish, W., Cook, T., & Campbell, D. (2002). <i>Experimental and quasi-experimental designs for generalized causal inference</i>. Boston, MA: Houghton Mifflin Company. • McGrath, J. (1981). Dilemmatics, the study of research choices and dilemmas. <i>American Behavioral Scientist</i>, 25, 179-210. • McGrath, J., Martin, J., & Kulka, R. (1981). Some quasi-rules for making judgement calls in research. <i>American Behavioral Scientist</i>, 25, 180-221. • Edmondson, A. C., & McManus, S. E. (2007). Methodological fit in management field research. <i>Academy of Management Review</i>, 32, 1155-1179. • Schulz, K. F., & Grimes, D. A. (2002). Case-control studies: research in reverse. <i>Lancet</i>, 359(9304), 431-434.

Session 9 E-learning: Appraisal of scientific evidence

Description	Putting it all together: Methodological appropriateness; Methodological quality; Grading the level of trustworthiness; How to read an academic article.
Instructions	You will receive instructions via email.
Required pre-session reading	None
Recommended supplementary readings	<ul style="list-style-type: none"> • Shadish, W., Cook, T., & Campbell, D. (2002). <i>Experimental and quasi-experimental designs for generalized causal inference</i>. Boston, MA: Houghton Mifflin Company. • Crombie, I. K. (1997). <i>The pocket guide to critical appraisal</i>, BMJ Publishing Group • Guyatt, G. H., Oxman, A. D., Vist, G. E., Kunz, R., Falck-Ytter, Y., Alonso-Coello, P., & Schünemann, H. J. (2008). GRADE: an emerging consensus on rating quality of evidence and strength of recommendations. <i>Bmj</i>, 336(7650), 924-926.

Session 10 E-learning: Evaluating scientific studies

Description	Evaluating scientific studies: research appropriateness, research quality, overall trustworthiness
Instructions	You will receive instructions via email.

Assignment 3	Critically appraise the four LBD-1 studies
Assignment 4	Critically appraise the three LBD-2 studies
Assignment 5	Critically appraise the two DIGT studies
Required pre-session reading	None
Recommended supplementary readings	None
Exam	After completing the module, take the online exam (quiz).

Session 11: Feb 26th Lecture: CATs, REAs and systematic reviews

Description	What are CATs, REAs and systematic reviews? Where did they originate? What are the differences between CAT's, REA's and systematic reviews? What is their added value for managers, leaders or policy makers? What are the main steps involved in doing a REA and systematic review?
Required pre-session reading	<ul style="list-style-type: none"> Kovner and T. D'Aunno (in press), <i>Evidence-Based Management in Health Care</i>, 2nd edition. Chapter ... : Rapid Evidence Assessments in Management: An Example.
Recommended supplementary readings	<ul style="list-style-type: none"> <i>Oxford Handbook of EBMgt</i>, chapter 7: Systematic Review and Evidence Synthesis as a Practice and Scholarship Tool Rousseau, D., Manning, J. and Denyer, D. (2008). Evidence in Management and Organization Science: Assembling the Field's Full Weight of Scientific Knowledge Through Syntheses. <i>The Academy of Management Annals</i>, 2, 475–515. Petticrew, M., & Roberts, H. (2008). <i>Systematic reviews in the social sciences: A practical guide</i>. John Wiley & Sons. Gough, David, Sandy Oliver, and James Thomas, eds. An introduction to systematic reviews. Sage, 2012. Higgins, J. P. (Ed.). (2008). <i>Cochrane handbook for systematic reviews of interventions</i> (Vol. 5). Chichester, England: Wiley-Blackwell.

Session 12: Feb 26th Workshop: Conducting CAT's

Description	How do you conduct CATs? What are the key stages? How to identify a review question? What are appropriate search strategies? What information should be extracted for each study? What are some of the ways findings can be synthesized? How should the findings be reported?
Instructions	<ul style="list-style-type: none"> • Start to think about the CAT questions you are interested in addressing. • Write down these questions. • For each, describe why this question is important in practical terms. • Can you refine the questions to make them more specific and more answerable? What are the blocks or barriers (if any) to developing your CAT question(s).
Required pre-session reading	<ul style="list-style-type: none"> • Look through the UK Civil Service Rapid Evidence Assessment Toolkit: http://www.civilservice.gov.uk/networks/gsr/resources-and-guidance
Recommended supplementary readings	<ul style="list-style-type: none"> • Try to skim read some relevant CATs, REAs and systematic reviews.
CAT Report	Conduct a CAT on a topic relevant to management practice and present your findings in a report. More detailed instructions will be provided in class along with examples of CATs. You will be required to submit your CAT question and an outline of your report for formative assessment some weeks before the final deadline. See also 'CAT Report' below.

Self-study: Feb 26th Individual research on your CAT (support and advice available)

Description	This is an opportunity for you to work on your CAT. Please bring your laptop so you can do searches online and also bring any questions and queries you have about how you can progress your review. The course leader will be present throughout to help.
-------------	--

Walk-in hours: March 2nd & 3rd

Description	This is an opportunity for you to receive individual support on your CAT.
-------------	---

Session 14: March 4th Presentation of your CAT

Description	Each student will be required to give presentation covering the following topics: <ul style="list-style-type: none">• Background to the CAT question. How was it chosen? Why?• What is the question?• What types of study were considered relevant and why?• What search strategy was used and why?• What are the results?
Instruction	Please look at the three Critically Appraised Topic presentations on the CEBMA site: http://www.cebma.org/presentations/
Assignment 6	Prepare a ten-minute presentation (strictly timed) addressing the above topics. Email your presentation to xxx before 12:00 midday on xxx

Session 15: March 4th Evaluation

Description	Evaluation of the outcome of the CATs. Integrating its outcome into the decision-making process. Evaluation of the course.
Assignment 7	Please consider your answers to the following questions: <ul style="list-style-type: none">• What results came out of your CAT?• Are you surprised or is it what you expected?• How could you use these results to (help) make a decision?• How could this course be improved?• What did you like? What didn't you like?• What was missing? Email your answers to xxx before 12:00 midday on xxx

COURSE ASSESSMENT

The course is assessed in four ways:

1. Class participation (including the two e-learning modules) > 15%
2. Completion of the 7 assignments > 15%
3. Online exam > 30%
4. CAT report (assignment 4 and 5) > 40%

CAT REPORT

The course is partly assessed largely through a report of the results of a Critically Appraised Topic (CAT) you will conduct. Although this is an individual piece of work you are strongly advised to discuss each other's CATs as you plan and conduct them in order to check that your approach and

method make sense to other people (because you will learn a lot about the doing CATs through trying to provide advice to others).

More detailed instructions will be provided in class along with examples of CATs. You will be required to submit your CAT question and an outline of your review for formative assessment some weeks before the final deadline.

The basic structure of the report should broadly be as follows:

Background

- Background and context
- Rationale for the CAT

Objectives

- Statement of the CAT's primary objective
- Statement of main question to be answered

Criteria for considering studies for this CAT

- Type of population
- Type of intervention
- Type of outcome(s)
- Type of context
- Type of studies

Search strategy for identification of studies

- What databases and sources were searched?
- What time period?
- What search terms and key words were used?
- What search strategy was used?

Inclusion criteria

- What are inclusion/exclusion criteria for studies?

Assessment of methodological quality

- What instrument or scale or criteria was used to determine the level of trustworthiness?

Results and conclusion

- Based on the evidence reviewed, what is the answer to the review question?
- How much confidence can we have in the answer?
- What do we know in relation to the review question?
- What do we not know?
- Based on the evidence found, what would be your recommendation?

The assessment criteria for the CAT report

	Indicative marking	
	Fail / Margin / Good / V Good / Dist	
Extremely unclear, unfocused and in principle unanswerable review question(s) and review objective(s).		Extremely clear, focused and in principle answerable review question(s) and review objective(s).
No framework such as PICOC used to focus the review question		Framework such as PICOC used to focus the review question.
No explicit search strategy described and an explanation of how it is appropriate to the review question not provided.		An explicit search strategy described and an explanation of how it is appropriate to the review question provided.
No clear and explicit criteria appropriate to the review question used to systematically include and exclude studies.		Clear criteria and explicit appropriate to the review question used to systematically include and exclude studies.
No clear and explicit criteria appropriate to the review question used to systematically assess study quality.		Clear and explicit criteria appropriate to the review question used to systematically assess study quality.
Insufficient details presented for each of the studies included.		Sufficient details presented for each of the studies included.
Conclusions do not accurately reflect what is known and not known in relation to the review question.		Conclusions accurately reflect what is known and not known in relation to the review question.

RESOURCES

Please note that all the resources listed below are mostly just starting points. You will also need to do your own searches for relevant material. The resources and papers listed below appear in sections under various headings. These headings are for guidance only as many of the papers could appear under more than one heading and chapters from The Oxford Handbook of Evidence-Based Management could be added to almost every section. These are the headings:

- General evidence-based management books
- Some papers describing the principles of evidence-based management
- Relationships between academic and practitioner knowledge and action
- Teaching and training in evidence-based management
- Some critiques of evidence-based management
- Rapid Evidence Assessments, systematic reviews and research syntheses
- Evidence-based practice, REAs and systematic reviews in other fields
- Examples of systematic reviews and REAs relevant to HRM
- How to read research articles
- Website materials relevant to conducting REAs and systematic reviews
- Websites relevant to evidence-based management
- Websites relevant to evidence-based practice and REAs and systematic reviews in other fields

General evidence-based management books

- Rousseau, D.M. (2012). (Ed.) *The Oxford Handbook of Evidence-Based Management*. New York: Oxford University Press.
- Latham, G. P. (2009). *Becoming the Evidence-Based Manager: Making the Science of Management Work for You*. Boston, MA: Davies-Black.
- Locke, E. A. (2009). *Handbook of Principles of Organizational Behavior: Indispensable Knowledge for Evidence-Based Management*. New York: Wiley.
- Pearce, J. L. (2009). *Organizational behavior real research for real managers*. (2nd ed.) Irvine, CA: Melvin & Leigh.
- Pfeffer, J. and Sutton, R. (2006). *Hard Facts, Dangerous Half-Truths and Total Nonsense: Profiting from Evidence-Based Management*. Boston, MA: Harvard Business School Press.

Some papers describing the principles of evidence-based management

- Briner, R. B. (2000). Evidence-based human resource management. In L. Trinder & S. Reynolds (Eds.), *Evidence-based practice: A critical appraisal*. London: Blackwell Science.
- Briner, R.B. (2007). Is HRM evidence-based and does it matter? Institute for Employment Studies Opinion Paper: <http://www.employment-studies.co.uk/pdflibrary/op6.pdf>
- Briner, R.B. (2007). Tried and attested: Interview about evidence-based management. *People Management*, 1 November. http://assess-systems.com.au/blog/pdf/ebm_briner.pdf
- Briner, R.B., & Rousseau, D. (2011). Evidence-based I-O psychology: Not there yet but now a little nearer?. *Industrial and Organizational Psychology*, 4, 76–82
- Briner, R.B., & Rousseau, D. (2011). Evidence-based I-O psychology: Not there yet. *Industrial and Organizational Psychology*, 4, 3–22.
- Briner, R.B., Denyer, D., & Rousseau, D.M. (2009). Evidence-based management: Construct clean-up time? *Academy of Management Perspectives*, 23, 4, 19-32.
- Pfeffer, J. & Sutton, R.I. (2006). Management half-truths and nonsense: How to practice evidence-based management. *California Management Review*, 48, 77–100.
- Rousseau, D., & Barends, E. (2011). Becoming an evidence-based HR practitioner. *Human Resource Management Journal*, 21, 221–235.
- Rousseau, D.M. (2006). Is There Such a Thing as “Evidence-Based Management”? *Academy of Management Review*, 31, 256–269.

Relationships between academic and practitioner knowledge and action

- Anderson, N., Herriot, P., & Hodgkinson, G. (2001). The practitioner-researcher divide in industrial work and organizational (IWO) psychology: Where are we now and where do we go from here? *Journal of Occupational and Organizational Psychology*, 74, 391–411.
- Bansal, T., Bertels, S., Ewart, T., MacConnachie, P., & O'Brien, J. (2012). Bridging the research-practice gap. *Academy of Management Perspectives*, 26(1), 73–92.
- Bartunek, J. M. (2007). Academic-practitioner collaboration need not require joint or relevant research: towards a relational scholarship of integration. *Academy of Management Journal*, 50(6): 1323-1333.
- Bartunek, J. M., & Rynes, S. L. (2010). The construction and contributions of “implications for practice:” What’s in them and what might they offer? *Academy of Management Learning and Education*, 9, 100–117.
- Cascio, W.F. (2007). Evidence-based management and the marketplace for ideas. *Academy of Management Journal*, 50, 1009-1012.
- Cohen, D. J. (2007). The very separate worlds of academic and practitioner publications in human resource management: Reasons for the divide and concrete solutions for bridging the gap. *Academy of Management Journal*, 50(5), 1013–1019.

- Hodgkinson, G.P., & Rousseau, D.M. (2009). Bridging the rigour-relevance gap in management research: It's already happening! *Journal of Management Studies*, 46(3): 534-546.
- Lawler, E. (2007). Why HR Practices are not Evidence-Based, *Academy of Management Journal*, 50, 1033–36.
- Rynes, S. L., Bartunek, J., & Daft, R. 2001. Across the Great Divide: Knowledge Creation and Transfer between Practitioners and Academics. *Academy of Management Journal*, 44: 340 – 356.
- Rynes, S. L., Brown, K. G., Colbert, A. E. (2002). Seven common misconceptions about human resource practices: Research findings versus practitioner beliefs. *Academy of Management Executive*, 18(3): 92–103.
- Rynes, S. L., Colbert, A. E., & Brown, K. G. (2002). HR professionals' beliefs about effective human resource practices: Correspondence between research and practice. *Human Resource Management*, 41, 149–174
- Rynes, S. L., Giluk, T. L., & Brown, K. G. (2007). The very separate worlds of academic and practitioner periodicals in human resource management: Implications for evidence-based management. *Academy of Management Journal*, 50, 987-1008.
- Sanders, K., van Riemsdijk, M., & Groen, B. (2008). The gap between research and practice: A replication study of HR professionals' beliefs about effective human resource practices. *International Journal of Human Resource Management*, 19, 1976–1988.
- Shapiro, D. L., Kirkman, B. L., & Courtney, H. G. (2007). Perceived causes and solutions of the translation problem in management research. *Academy of Management Journal*, 50: 249–266.

Teaching and training in evidence-based management

- Burke, L. A., & Rau, B. (2010). The research-teaching gap in management. *Academy of Management Learning & Education*, 9, 132-143.
- Charlier, S., Brown, K. and Rynes, S. (2011). Teaching Evidence-Based-Management in MBA Programs: What Evidence is There?, *Academy of Management Learning and Education*, 10. 222–236.
- Graen, G. B. (2009). Educating new management specialists from an evidence-based perspective: A proposal. *Academy of Management Learning & Education*, 8, 255-258.
- Rousseau, D.M., and McCarthy, S. (2007). Educating Managers from an Evidence-Based Perspective. *Academy of Management Learning and Education*, 6, 84–101.
- Rynes, S. L., Rousseau, D. M., & Barends, E. (2014). From the guest editors: change the world: teach evidence-based practice!. *Academy of Management Learning & Education*, 13(3), 305-321.
- Briner, R. B., & Walshe, N. D. (2014). From passively received wisdom to actively constructed knowledge: teaching systematic review skills as a foundation of evidence-based management. *Academy of Management Learning & Education*, 13(3), 415-432.
- Barends, E. G., & Briner, R. B. (2014). Teaching Evidence-Based Practice: Lessons From the Pioneers An Interview With Amanda Burls and Gordon Guyatt. *Academy of Management Learning & Education*, 13(3), 476-483.

Some critiques of evidence-based management

- Learmonth, M. (2008). Evidence-Based Management: A Backlash Against Pluralism in Organizational Studies. *Organization*, 15, 283–291.
- Morrell, K. (2008). The Narrative of “Evidence Based” Management: A Polemic. *Journal of Management Studies*, 45, 613–635.
- Reay, T., Berta, W. and Kohn, K. (2009). What's the Evidence on Evidence-Based Management? *Academy of Management Perspectives*, 23, 5–18.
- Tourish, D. (2012). ‘Evidence Based Management’, or ‘Evidence Oriented Organizing’? A critical realist perspective. *Organization*,

Rapid Evidence Assessments, systematic reviews and research syntheses

Briner, R.B. & Denyer, D. (2012). Systematic review and evidence synthesis as a practice and scholarship tool. In D. Rousseau (Ed.), *Oxford Handbook of Evidence-Based Management*. New York: Oxford University Press.

Denyer, D., & Tranfield, D. (2009). Producing a systematic review. In D. A. Buchanan & A. Bryman (Eds.), *The SAGE handbook of organizational research methods* (pp. 671–689). London: Sage Publications Ltd.

Gough, D., Oliver, S., and Thomas, J. (2012). *An introduction to systematic reviews*. London: Sage.

Petticrew, M. and Roberts, H. (2006). *Systematic reviews in the social sciences: A practical guide*. Oxford: Blackwell Publishing.

<http://xa.yimg.com/kq/groups/18751725/462617161/name/manalysis.pdf>

Tranfield, D., Denyer, D., & Smart, P. (2003). Toward a methodology for developing evidence-informed management knowledge by means of systematic review. *British Journal of Management*, 14, 207–222.

Rousseau, D., Manning, J. and Denyer, D. (2008). Evidence in Management and Organization Science: Assembling the Field's Full Weight of Scientific Knowledge Through Syntheses. *The Academy of Management Annals*, 2, 475–515.

Evidence-based practice, REAs and systematic reviews in other fields

Glasziou, P., Irwig, L., Bain, C., and Colditz, G. (2001). *Systematic reviews in health care: A practical guide*. Cambridge: Cambridge University Press.

Higgins, J.P.T. and Green, S. (2008) (Eds). *Cochrane Handbook for Systematic Reviews of Interventions* [updated September 2009]. Retrieved April 29, 2010, from www.cochrane-handbook.org.

Kovner, A.R., Fine, D.R., & D'Aquila, R. (2009). *Evidence-based management in healthcare*. Chicago: Health Administration Press.

Pawson, R. (2006). *Evidence-based policy: A realist perspective*. London: Sage.

Sackett, D., Straus, S., Richardson, W., Rosenberg, W., & Haynes, R. (2000). *Evidence-based medicine: How to practice and teach EBM*. New York : Churchill Livingstone.

Littell, J.H., Corcoran J., and Pillai, V. (2008). *Systematic reviews and meta-analysis*. New York: Oxford University Press.

Examples of systematic reviews and REAs relevant to HRM

Rapid Evidence Assessment of Performance and Development Review (PDR) systems (2011). http://www.npia.police.uk/en/docs/PDR_review_summary_External.pdf

Egan, M., Bambra, C., Thomas, S., Petticrew, M., Whitehead, M., & Thomson, H. (2007). The psychosocial and health effects of workplace reorganisation 1: A systematic review of organisational-level interventions that aim to increase employee control. *Journal of Epidemiology and Community Health*, 61, 945-954.

Joyce, K., Pabayo, R., Critchley, J.A., & Bambra, C. (2010). Flexible working conditions and their effects on employee health and wellbeing. *Cochrane Database of Systematic Reviews* 2010, Issue 2. Art. No.: CD008009. DOI: 10.1002/14651858.CD008009.pub2.

Patterson M, Rick J, Wood S, Carroll C, Balain S, Booth A. (2010). Systematic review of the links between human resource management practices and performance. *Health Technology Assessment*, 14, 51. <http://www.hta.ac.uk/fullmono/mon1451.pdf>

Cho, Y., & Egan, T (2009) Action Learning Research: A Systematic Review and Conceptual Framework, *Human Resource Development Review*, 8(4) 431-462

Bamberger, S.G, Vinding, A.L. Larsen, A. et al. (2012). Impact of organisational change on mental health: a systematic review. *Occupational and Environmental Medicine*, 69, 592-598.

Skakon, J., Nielsen, K., Borg, V. & Guzman, J. (2010) Are leaders' well-being, behaviours and style associated with the affective well-being of their employees? A systematic review of three decades of research. *Work & Stress*, 24: 107-139.

Carr, S. C., MacLachlan, M., Clarke, M., Papola, T. S., Normand, C., Thomas, S., McAuliffe, E., & Leggatt-Cook, C. (2010). What is the evidence of the impact of increasing aid salaries on improving the performance of public servants, including teachers, nurses and judges? Massey University: New Zealand. http://www.dfid.gov.uk/R4D/PDF/Outputs/SystematicReviews/FINAL-Q17-Civil-Servant-Salaries-Protocol-DFID-Massey.doc_P1.pdf

How to read research articles

Some examples from other disciplines of general advice about reading articles

- <http://blizzard.cs.uwaterloo.ca/keshav/home/Papers/data/07/paper-reading.pdf>
- <http://www.eecs.harvard.edu/~michaelm/CS222/ReadPaper.pdf>
- <http://www.informatics.buu.ac.th/~krisana/presentation/HowToRead/How%20to%20Read%20a%20Scientific%20Research%20Paper--.htm>
- <http://www.rcjournal.com/contents/10.09/10.09.1366.pdf>
- <http://www.human.cornell.edu/pam/outreach/parenting/research/upload/How-20to-20Read-20a-20Research-20Article.pdf>
- <http://www.sfu.ca/~jeffpell/Ling480.08/Summaries.pdf>

Some examples from psychology

- <http://arts.uwaterloo.ca/~sspencer/psych253/readart.html>
- <http://www.uic.edu/classes/psych/psych242/Article.html>
- http://www.writingcenter.uconn.edu/pdf/How_to_read_a_research_article.pdf

Website materials relevant to conducting Rapid Evidence Assessments and systematic reviews

Examples of Critically Appraised Topics from a UBC Master of Rehabilitation Science programme:
http://www.mrsc.ubc.ca/site_page.asp?pageid=98

UK Civil Service Rapid Evidence Assessment Toolkit:
<http://www.civilservice.gov.uk/networks/gsr/resources-and-guidance>

Petticrew, M. and Roberts, H. (2006). *Systematic reviews in the social sciences: A practical guide*. Oxford: Blackwell Publishing.
<http://xa.yimg.com/kq/groups/18751725/462617161/name/manalysis.pdf>

Library pages for a course on Evidence-Based Management at Carnegie Mellon University
<http://guides.library.cmu.edu/content.php?pid=149531&sid=1270070>

Chapter on conducting literature reviews in management (including systematic reviews). Bryman, A. & Bell, E. (2011). *Business Research Methods 3e*. Oxford: Oxford University Press.

http://www.oup.com/uk/orc/bin/9780199202959/bryman3e_ch04.pdf

An overview of what systematic reviews are in medicine, healthcare and health economics

<http://www.medicine.ox.ac.uk/bandolier/painres/download/whatis/syst-review.pdf>

A five-step guide to conducting systematic reviews in medicine

<http://www.ncbi.nlm.nih.gov/pmc/articles/PMC539417/>

A presentation about SRs in medicine

http://www.rcn.org.uk/__data/assets/pdf_file/0008/318968/2010_RCN_research_workshop_5.pdf

EPPI-Centre Methods for Conducting Systematic Review

<http://eppi.ioe.ac.uk/cms/LinkClick.aspx?fileticket=hQBu8y4uVwl%3d&tabid=184&mid=6164>

Websites relevant to evidence-based management

The Center for Evidence-Based Management which is aimed at practitioners and managers

<http://www.cebma.org/>

Pfeffer & Sutton's site set up after their Hard Facts book

<http://evidence-basedmanagement.com/>

Article directed to managers about using research evidence with some useful links

<http://www.mbsportal.bl.uk/taster/subjareas/mgmt/bl/managersevidence.aspx>

Websites relevant to evidence-based practice and RAEs and systematic reviews in other fields

The Cochrane Collaboration - database of systematic reviews relevant to health care and resources for conducting systematic reviews

<http://www.cochrane.org/>

JMAAevidence "helps decision makers identify the best available evidence by providing guides to the systematic consideration of the validity, importance, and applicability of claims about the assessment of health problems and the outcomes of health care."

<http://www.jamaevidence.com/>

The Campbell Collaboration - library of systematic reviews related to education, crime and justice, and social welfare plus some guidance for conducting reviews

<http://www.campbellcollaboration.org/>

Evidence for Policy and Practice Information and Co-ordinating Centre part of the Social Science Research Unit at the Institute of Education, University of London – a library of systematic reviews relevant to education and social policy. Also has guidance about conducting reviews and systematic review software.

<http://eppi.ioe.ac.uk/cms/>

The Coalition for Evidence-Based Policy is a "nonprofit, nonpartisan organization, the Coalition seeks to increase government effectiveness through the use of rigorous evidence about what works."

<http://coalition4evidence.org/wordpress/>

Systematic reviews funded by the UK Government's Department for International Development relevant to evidence-based policy

<http://www.dfid.gov.uk/r4d/systematicreviews.aspx>

Online videos and presentations about evidence-based management

Most are collected here:

<http://www.cebma.org/presentations/>

Rob Briner discussing evidence-based management (2009)

<http://www.bbk.ac.uk/orgpsych/staff/academics/briner/evidence-based-management-video-interview-with-rob-briner>