

Online Supplementary Appendix 1: List of search terms used on PubMed

Terms	Engine	Articles Found
((competenc*[Title/Abstract] OR skills[Title/Abstract])) AND (assessment[Title/Abstract] OR validation[Title/Abstract]) AND research[Title/Abstract]	PubMed	6,459
((research skills OR research development[MeSH Terms]) AND (professional competence OR competency-based education[MeSH Terms])) AND graduate medical education[MeSH Terms]	PubMed	2,457
((research[Title/Abstract] AND training[Title/Abstract] AND competencies[Title/Abstract] AND clinical)[Title/Abstract])	PubMed	625
((clinical research[Title/Abstract] OR medical research[Title/Abstract]) AND (competencies[Title/Abstract] OR skills[Title/Abstract]) AND (training[Title/Abstract] OR education[Title/Abstract]) AND (assessment[Title/Abstract] OR evaluation[Title/Abstract]))	PubMed	117
((("measurement of competency based research education"[Text Word] OR "self-assessment in research education"[Text Word] OR "research competencies"[Text Word] OR "assessing clinical research"[Text Word])) AND ("public health"[Text Word] OR "medical education"[Text Word] OR nursing[Text Word] OR pharmac*[Text Word] OR "public health"[Text Word] OR dentistry[Text Word] OR dental[Text Word])) AND (competence[Text Word] OR competencies[Text Word] OR "competency assessment"[Text Word] OR "educational measurement"[Text Word] OR "professional competence"[Text Word] OR "educational assessment"[Text Word] OR "learning assessment"[Text Word]))	PubMed	31
((clinical research OR research design [MeSH Terms]) AND (medical education OR research/education OR Educational Measurement OR Translational Medical Research/education OR education, graduate OR graduate medical education[MeSH Terms])) AND competency based education[MeSH Terms])	PubMed	799
"research competencies"[tw]	PubMed	69
((research[tw] AND training[tw] AND competencies[tw])))	PubMed	1,967
((Biomedical Research/education [MeSH Terms]) AND (professional competence OR Competency-Based Education/methods [MeSH Terms])) AND (Educational Measurement OR Program evaluation [MeSH Terms])	PubMed	564