Education and training of chiropractic students and graduates: a scoping review

Coauthor instructional video:
Covidence Step 2 – Data Extraction

1

Need for Study and Purpose

- Need: A scoping review would provide evidence to inform the development of new training programs, policy decisions, and establish areas needing further research on chiropractic education.

- Purpose: to systematically map and synthesize the extent of the literature on chiropractic education and training globally.

2

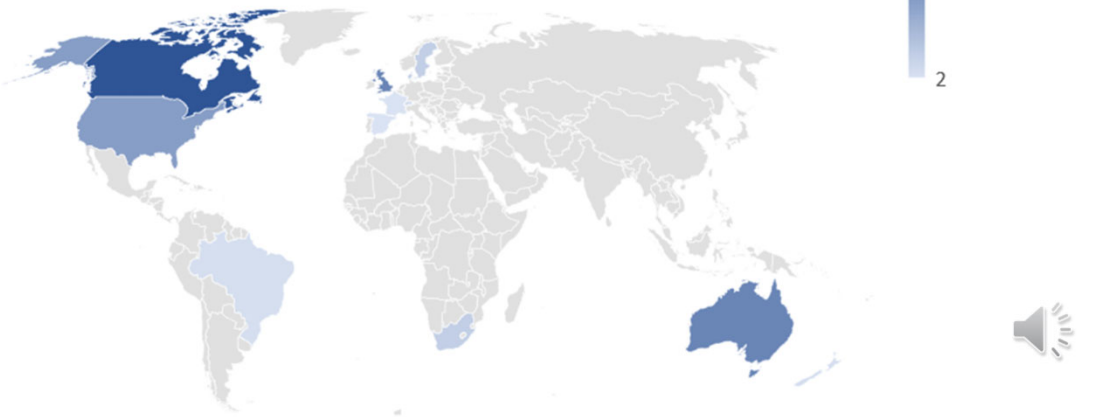
Questions this scoping review will answer

1. What is the state of research on chiropractic education and training for chiropractic students and graduate chiropractors?
2. What are the characteristics of chiropractic education research studies and literature reviews published in the indexed literature?

3

In our scoping review, we will report

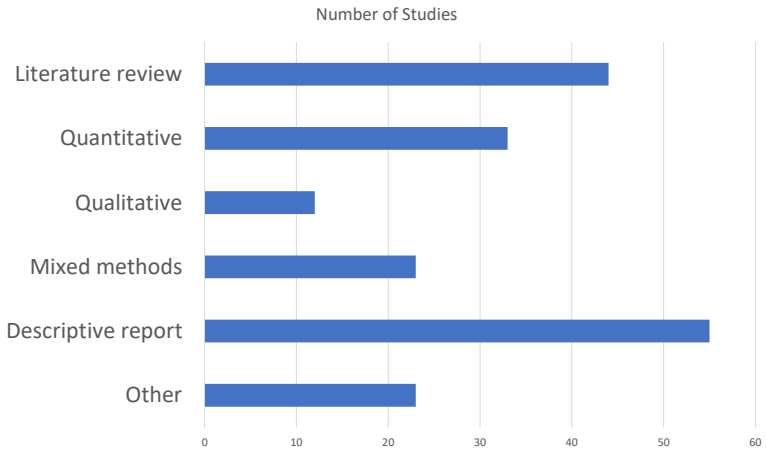
Regions where chiropractic education research is happening and where more needs to be done



4

In our scoping review, we will report

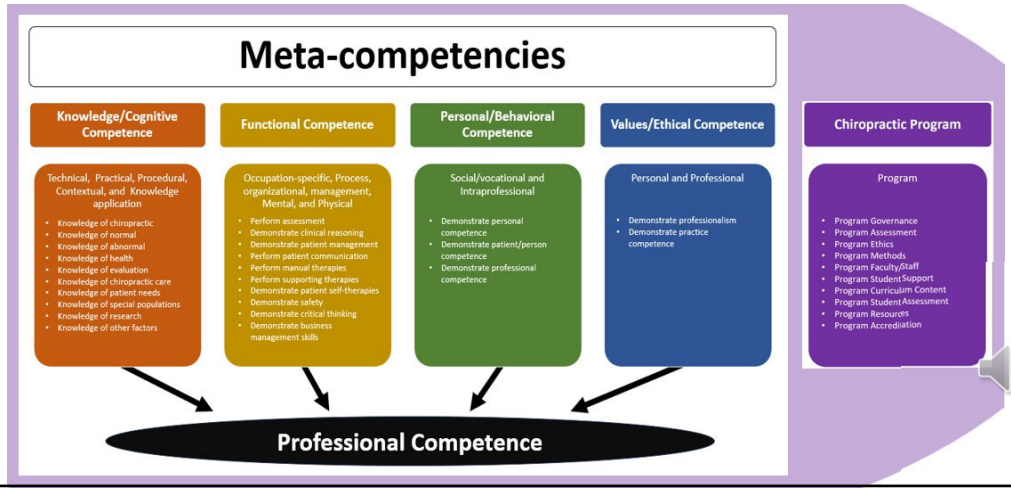
What types of study designs are being published



5

In our scoping review, we will report

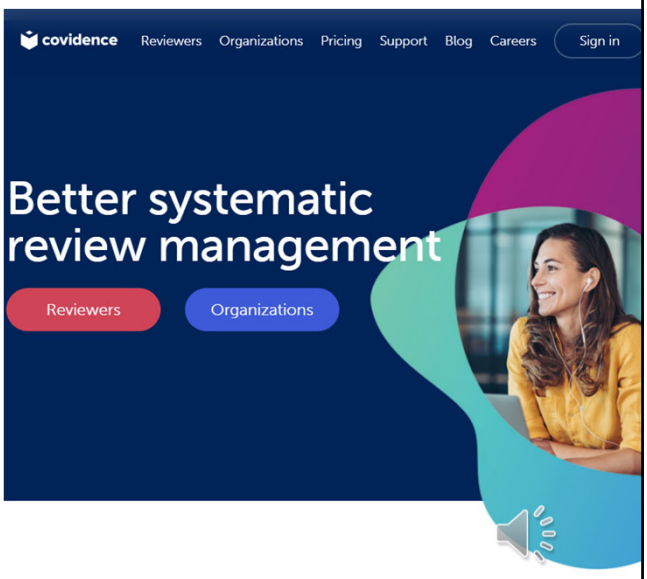
Evidence of research on the metacompetencies and program research, to show research emphasis and if there are any gaps



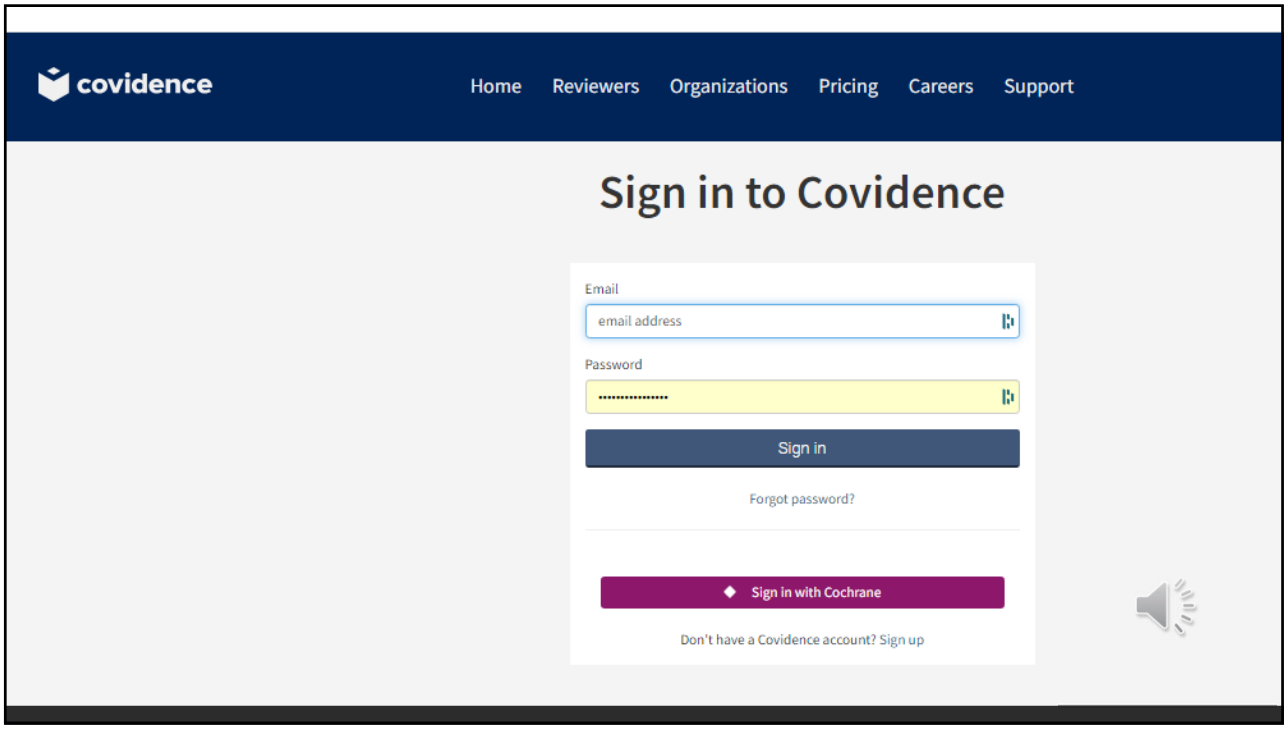
6

What is Covidence?

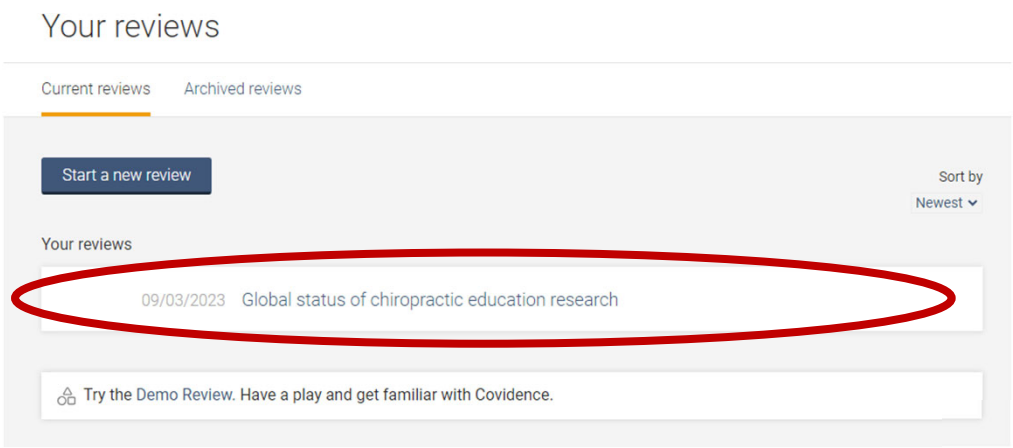
- Covidence is a proprietary online tool that allows people to do systematic and scoping reviews.
- Allows multiple users, is easy to access anywhere at any time
- Brighthall has covered the nominal fee for Covidence use for this project.



7



8



9

Warning! We ask that you please do not change the settings or click "archive"

Once you enter Covidence, you are accessing the main worksheet, not your personal worksheet. This means it is important that you do not change settings or controls.

The controls are active for the entire project, not just for your work.

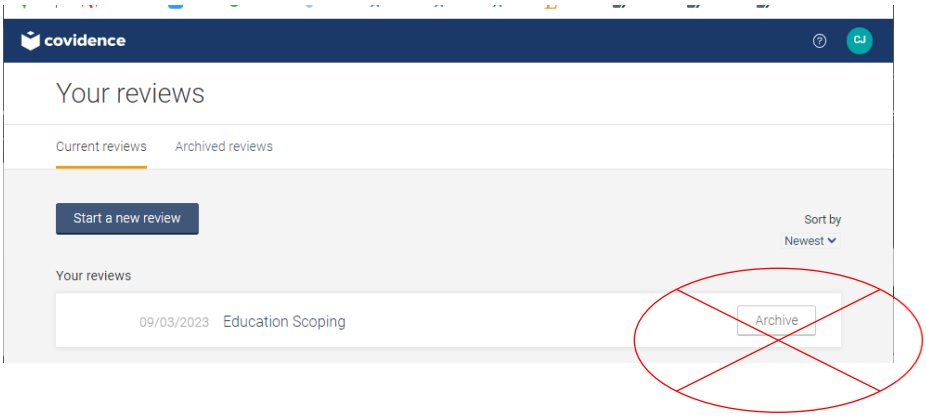
This means clicking on settings or controls will disrupt and possibly destroy the project.

Please do not click on or modify in any way the study outside of what you are being asked to do.

10

Please do not click on or modify in any way

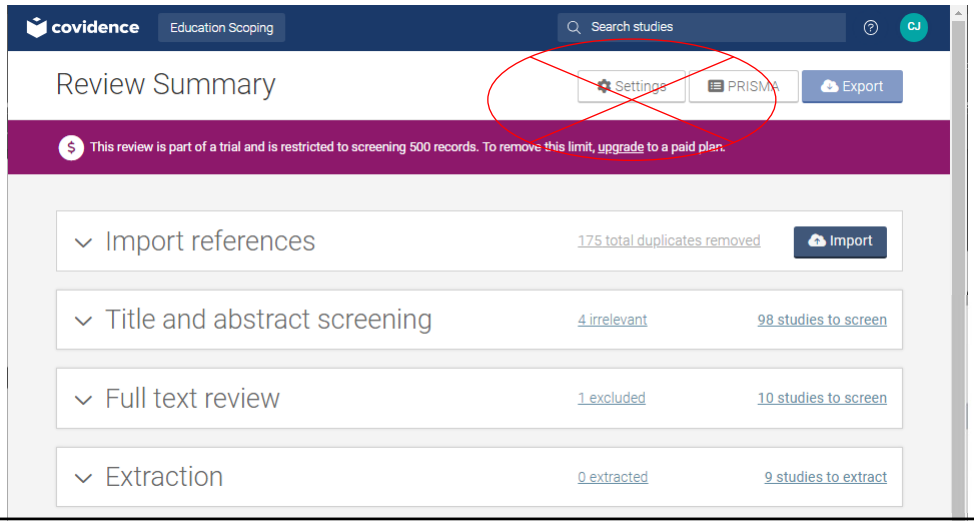
- **Do not click on the "Archive" button on the Your reviews tab**



11

Please do not click on or modify in any way

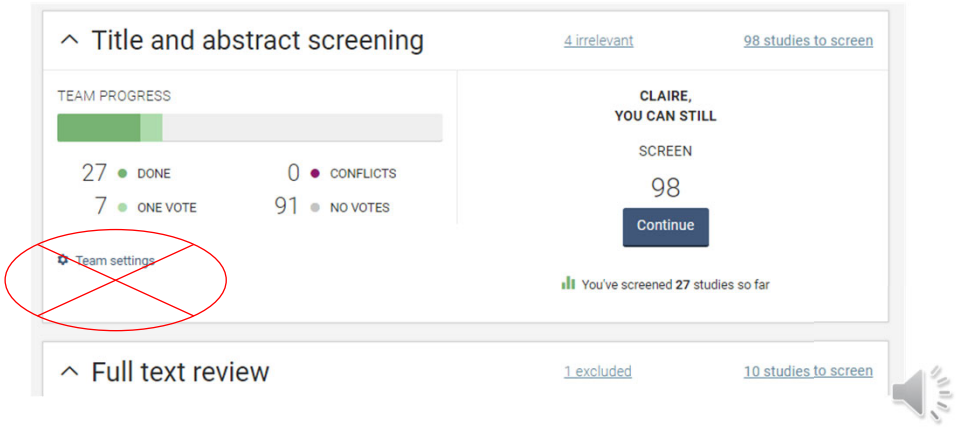
- **Do not click on the "Settings" button on your Review Summary page**



12

Please do not click on or modify in any way

- **Do not click on the "Team Settings" on any page**



13

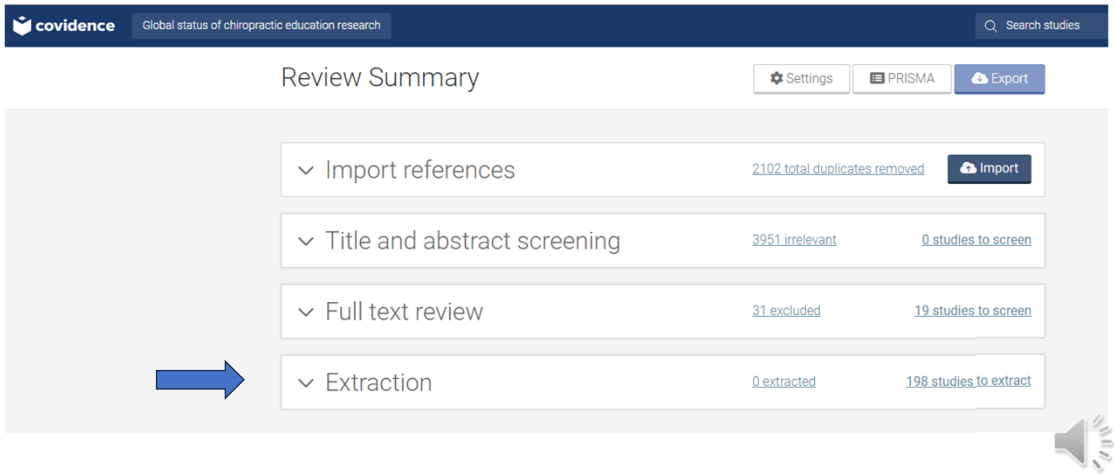
A general rule of thumb is that if you the action will change the study or delete something, do not do it.

If you are not sure, please ask Claire first.

Thank you!

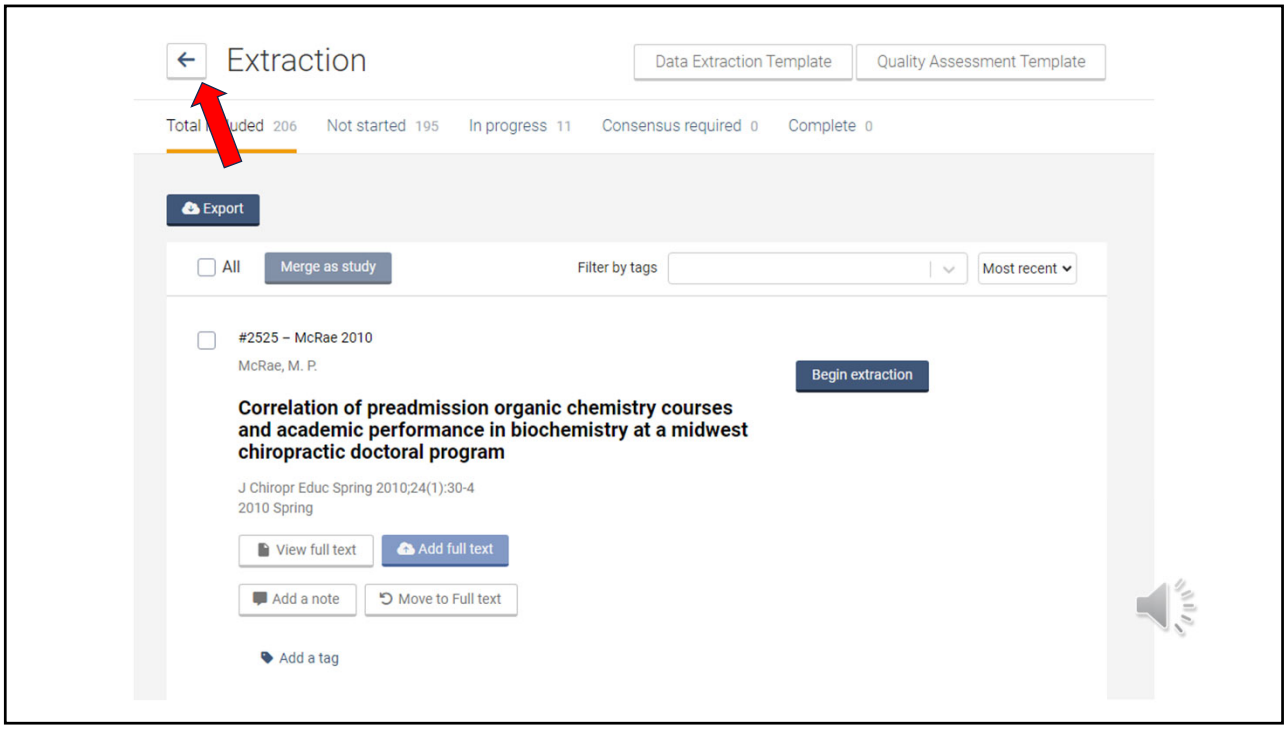
14

Data Extraction in Covidence

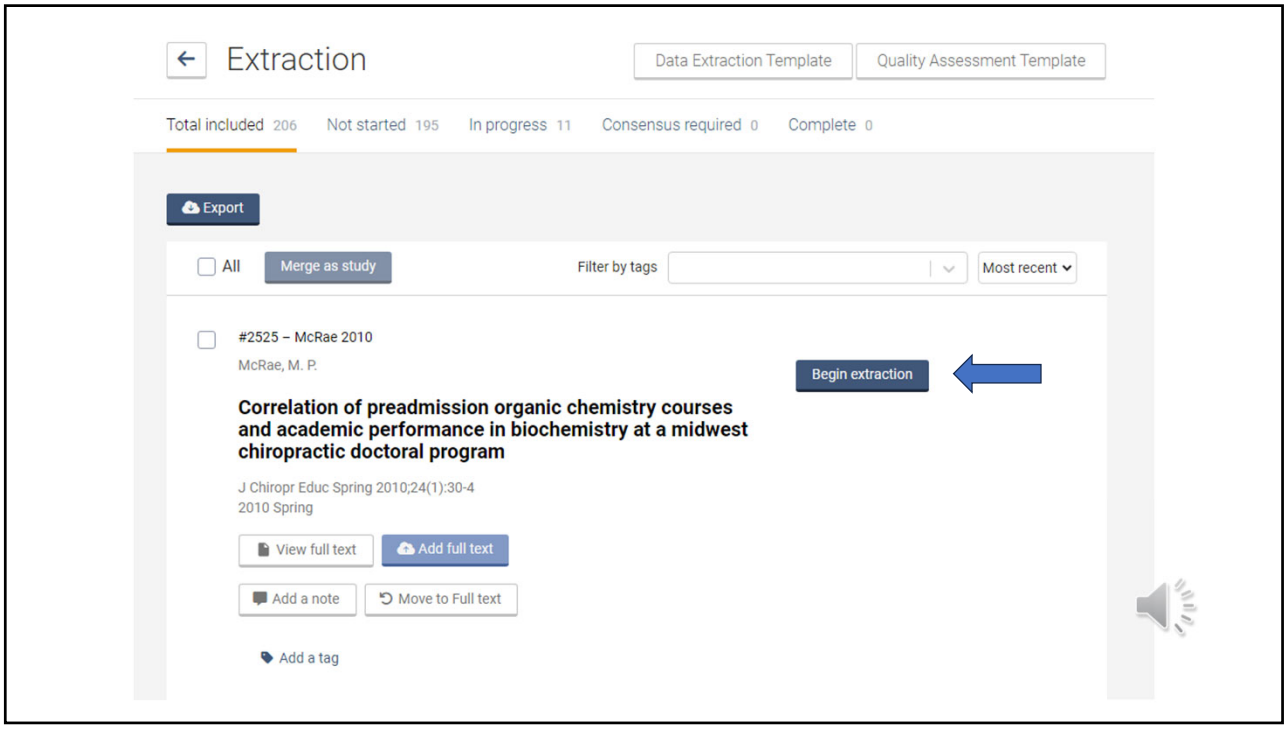


15

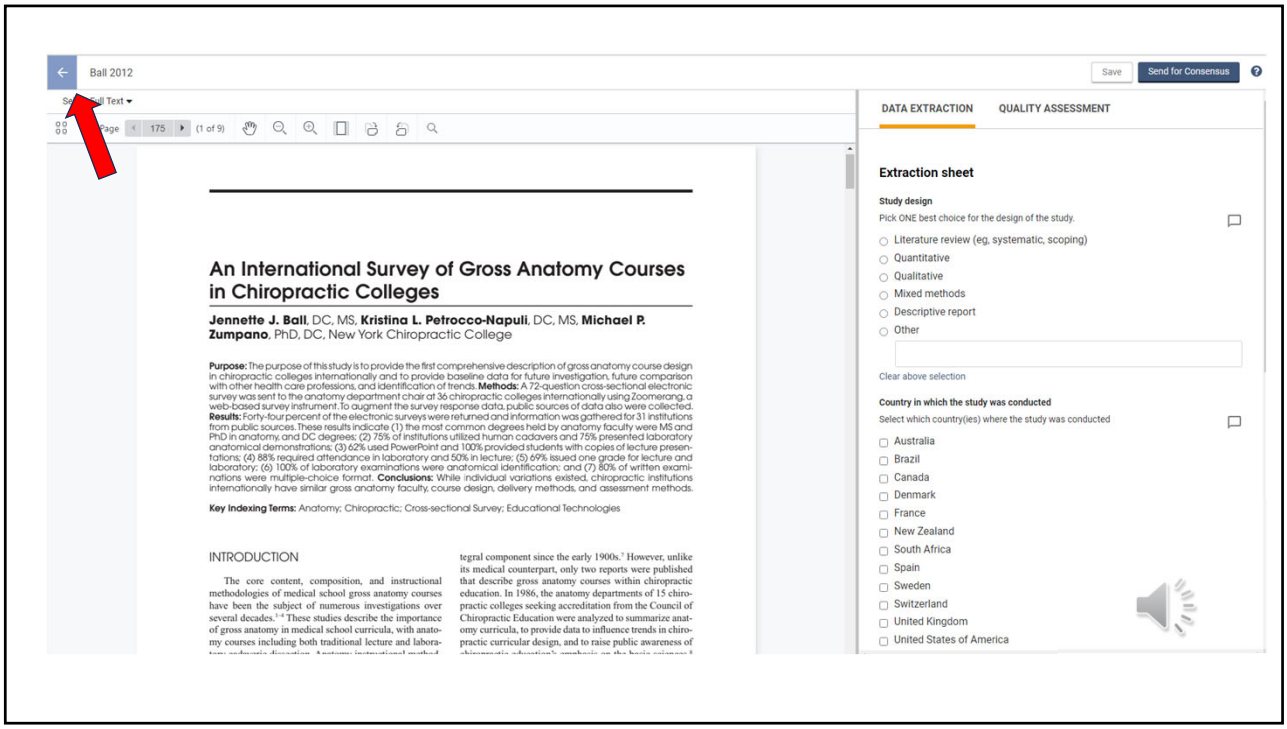
16


Extraction
Data Extraction Template
Quality Assessment Template
Total included 206
Not started 195
In progress 11
Consensus required 0
Complete 0
Export
All
Merge as study
Filter by tags
Most recent
#2525 – McRae 2010
McRae, M. P.
Begin extraction
Correlation of preadmission organic chemistry courses and academic performance in biochemistry at a midwest chiropractic doctoral program
J Chiropr Educ Spring 2010;24(1):30-4
2010 Spring
View full text
Add full text
Add a note
Move to Full text
Add a tag

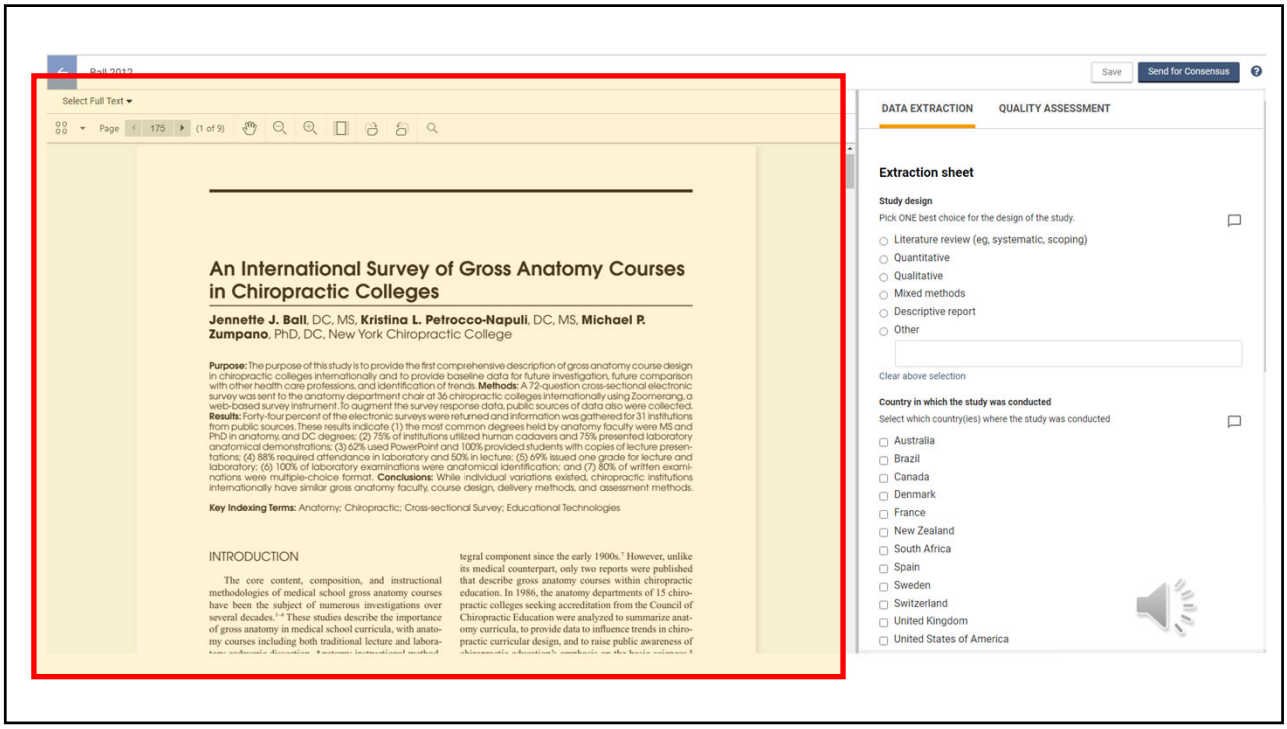
17


Extraction
Data Extraction Template
Quality Assessment Template
Total included 206
Not started 195
In progress 11
Consensus required 0
Complete 0
Export
All
Merge as study
Filter by tags
Most recent
#2525 – McRae 2010
McRae, M. P.
Begin extraction
Correlation of preadmission organic chemistry courses and academic performance in biochemistry at a midwest chiropractic doctoral program
J Chiropr Educ Spring 2010;24(1):30-4
2010 Spring
View full text
Add full text
Add a note
Move to Full text
Add a tag

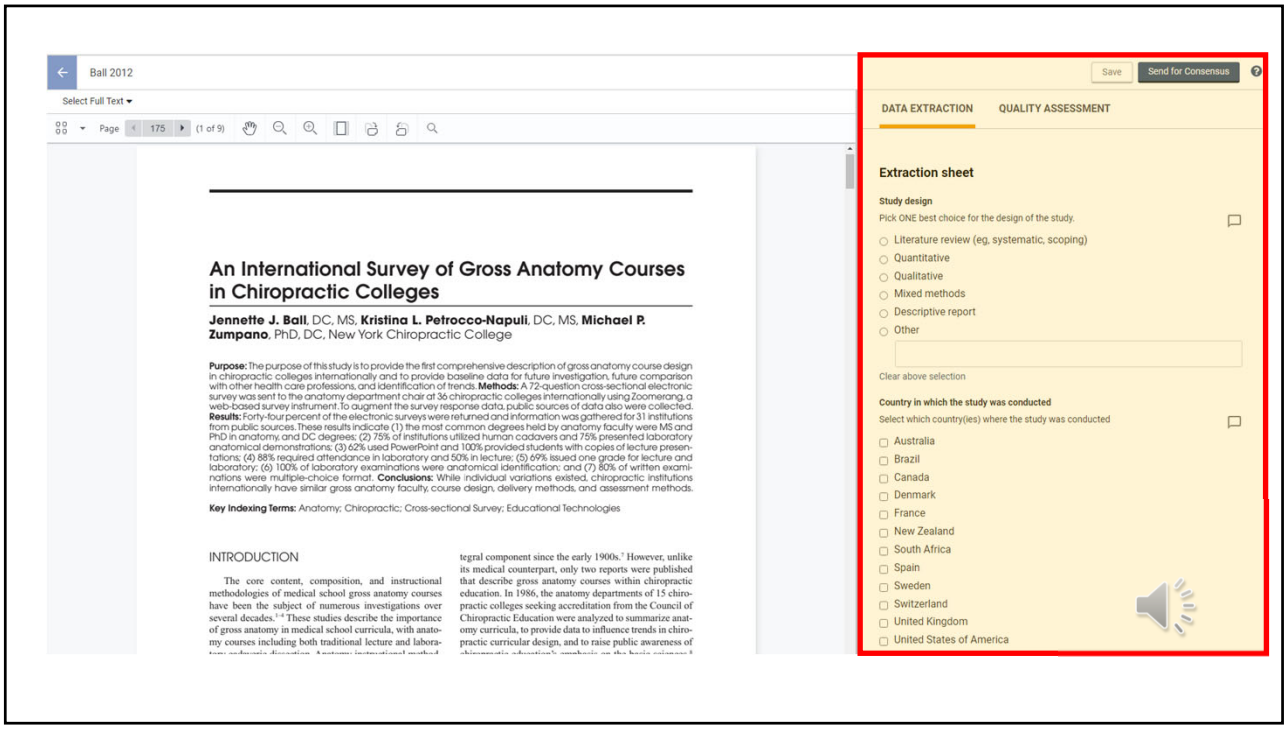
18


Ball 2012
Save
Send for Consensus
DATA EXTRACTION
QUALITY ASSESSMENT
Extraction sheet
Study design
Pick ONE best choice for the design of the study.
Literature review (eg, systematic, scoping)
Quantitative
Qualitative
Mixed methods
Descriptive report
Other
Clear above selection
Country in which the study was conducted
Select which country(ies) where the study was conducted
Australia
Brazil
Canada
Denmark
France
New Zealand
South Africa
Spain
Sweden
Switzerland
United Kingdom
United States of America
An International Survey of Gross Anatomy Courses in Chiropractic Colleges
Jennette J. Ball, DC, MS, Kristina L. Petrocco-Napuli, DC, MS, Michael P. Zumpano, PhD, DC, New York Chiropractic College
Purpose: The purpose of this study is to provide the first comprehensive description of gross anatomy course design in chiropractic colleges internationally and to provide baseline data for future investigation, future comparison with other health care professions, and identification of trends. Methods: A 72-question cross-sectional electronic survey was sent to the anatomy department chair at 36 chiropractic colleges internationally using Zoomerang, a web-based survey instrument. To augment the survey response data, public sources of data also were collected. Results: Forty-four percent of the electronic surveys were returned and information was gathered for 31 institutions from public sources. These results indicate (1) the most common degrees held by anatomy faculty were MS and PhD in anatomy, and DC degrees; (2) 75% of institutions utilized human cadavers and 75% presented laboratory anatomical demonstrations; (3) 62% used PowerPoint and 100% provided students with copies of lecture presentations; (4) 88% required attendance in laboratory and 50% in lecture; (5) 69% issued one grade for lecture and laboratory; (6) 100% of laboratory examinations were anatomical identification; and (7) 80% of written examinations were multiple-choice format. Conclusions: While individual variations existed, chiropractic institutions internationally have similar gross anatomy faculty, course design, delivery methods, and assessment methods.
Key Indexing Terms: Anatomy; Chiropractic; Cross-sectional Survey; Educational Technologies
INTRODUCTION
The core content, composition, and instructional methodologies of medical school gross anatomy courses have been the subject of numerous investigations over several decades.[1-4] These studies describe the importance of gross anatomy in medical school curricula, with anatomy courses including both traditional lecture and laboratory components since the early 1900s.[3] However, unlike its medical counterpart, only two reports were published that describe gross anatomy courses within chiropractic education. In 1986, the anatomy departments of 15 chiropractic colleges seeking accreditation from the Council of Chiropractic Education were analyzed to summarize anatomy curricula, to provide data to influence trends in chiropractic curricular design, and to raise public awareness of

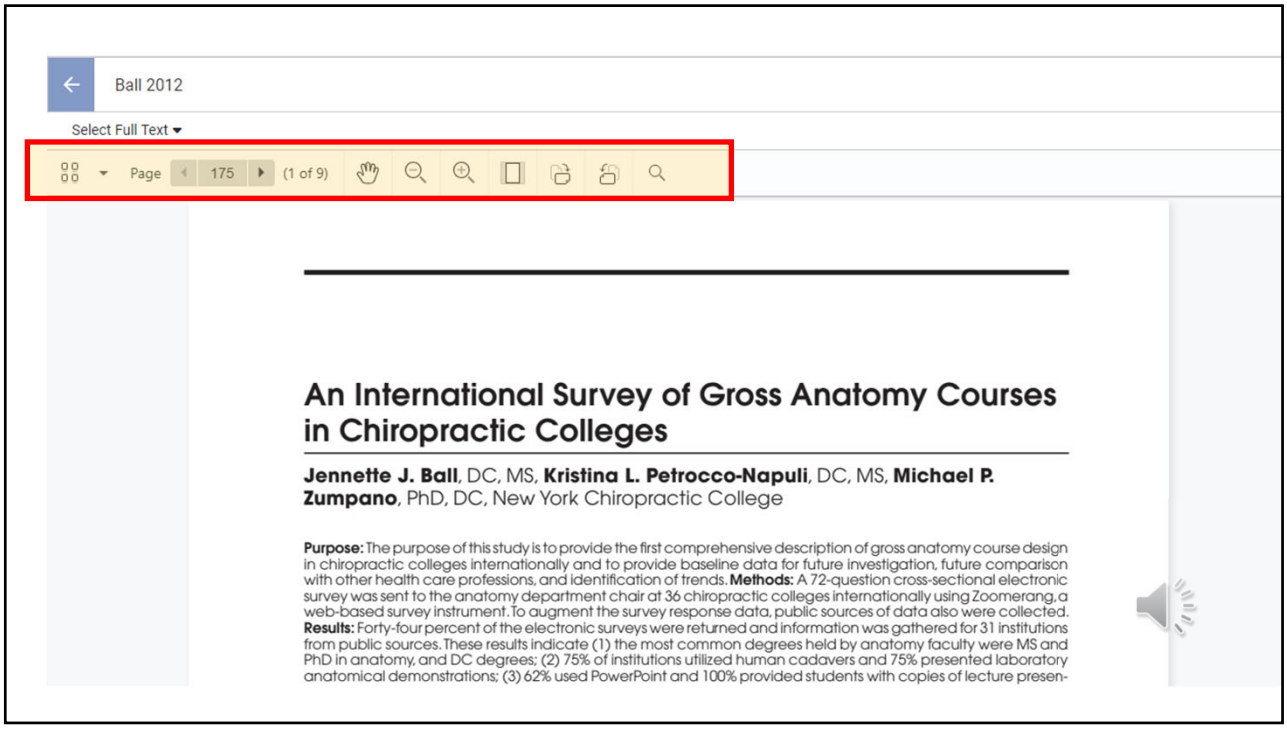
19


Ball 2012
Select Full Text
Save
Send for Consensus
DATA EXTRACTION
QUALITY ASSESSMENT
Extraction sheet
Study design
Pick ONE best choice for the design of the study.
Literature review (eg, systematic, scoping)
Quantitative
Qualitative
Mixed methods
Descriptive report
Other
Clear above selection
Country in which the study was conducted
Select which country(ies) where the study was conducted
Australia
Brazil
Canada
Denmark
France
New Zealand
South Africa
Spain
Sweden
Switzerland
United Kingdom
United States of America
An International Survey of Gross Anatomy Courses in Chiropractic Colleges
Jennette J. Ball, DC, MS, Kristina L. Petrocco-Napuli, DC, MS, Michael P. Zumpano, PhD, DC, New York Chiropractic College
Purpose: The purpose of this study is to provide the first comprehensive description of gross anatomy course design in chiropractic colleges internationally and to provide baseline data for future investigation, future comparison with other health care professions, and identification of trends. Methods: A 72-question cross-sectional electronic survey was sent to the anatomy department chair at 36 chiropractic colleges internationally using Zoomerang, a web-based survey instrument. To augment the survey response data, public sources of data also were collected. Results: Forty-four percent of the electronic surveys were returned and information was gathered for 31 institutions from public sources. These results indicate (1) the most common degrees held by anatomy faculty were MS and PhD in anatomy, and DC degrees; (2) 75% of institutions utilized human cadavers and 75% presented laboratory anatomical demonstrations; (3) 62% used PowerPoint and 100% provided students with copies of lecture presentations; (4) 88% required attendance in laboratory and 50% in lecture; (5) 69% issued one grade for lecture and laboratory; (6) 100% of laboratory examinations were anatomical identification; and (7) 80% of written examinations were multiple-choice format. Conclusions: While individual variations existed, chiropractic institutions internationally have similar gross anatomy faculty, course design, delivery methods, and assessment methods.
Key Indexing Terms: Anatomy; Chiropractic; Cross-sectional Survey; Educational Technologies
INTRODUCTION
The core content, composition, and instructional methodologies of medical school gross anatomy courses have been the subject of numerous investigations over several decades.[1-4] These studies describe the importance of gross anatomy in medical school curricula, with anatomy courses including both traditional lecture and laboratory components since the early 1900s.[3] However, unlike its medical counterpart, only two reports were published that describe gross anatomy courses within chiropractic education. In 1986, the anatomy departments of 15 chiropractic colleges seeking accreditation from the Council of Chiropractic Education were analyzed to summarize anatomy curricula, to provide data to influence trends in chiropractic curricular design, and to raise public awareness of

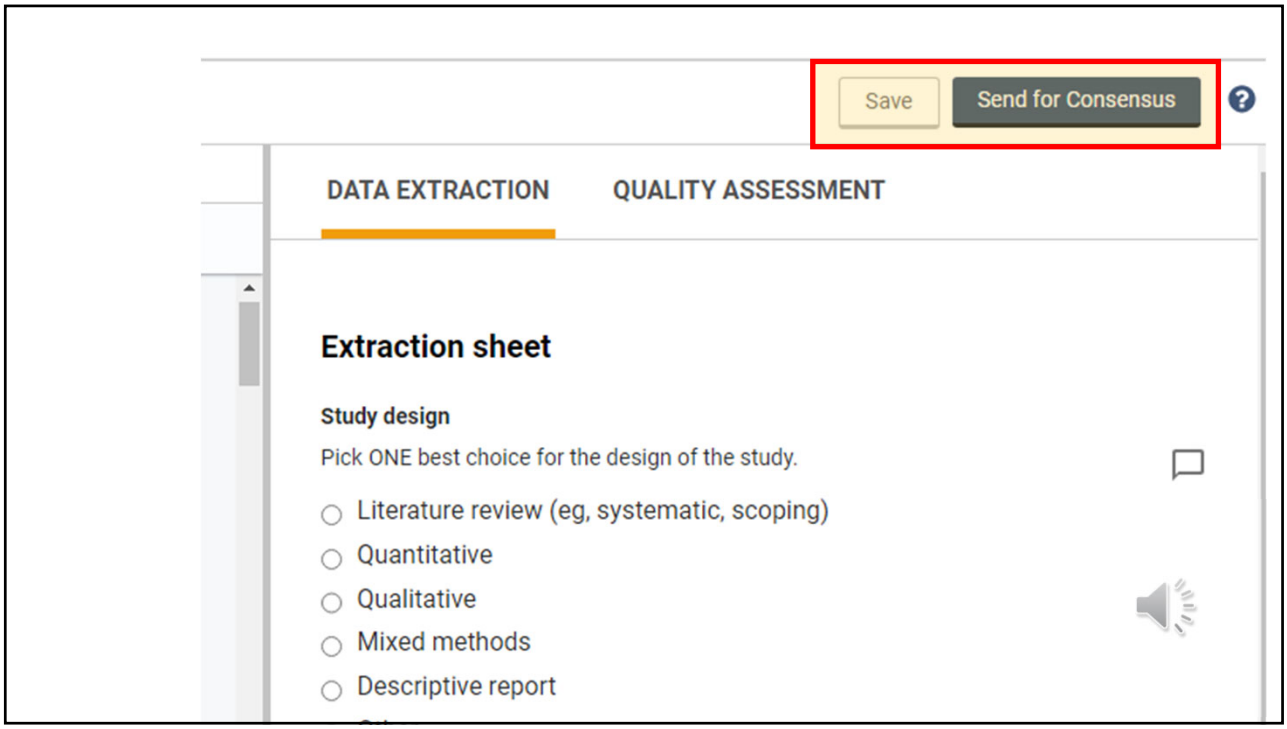
20


Ball 2012
Select Full Text
Page 175 (1 of 9)
An International Survey of Gross Anatomy Courses in Chiropractic Colleges
Jennette J. Ball, DC, MS, Kristina L. Petrocco-Napuli, DC, MS, Michael P. Zumpano, PhD, DC, New York Chiropractic College
Purpose: The purpose of this study is to provide the first comprehensive description of gross anatomy course design in chiropractic colleges internationally and to provide baseline data for future investigation, future comparison with other health care professions, and identification of trends. Methods: A 72-question cross-sectional electronic survey was sent to the anatomy department chair at 36 chiropractic colleges internationally using Zoomerang, a web-based survey instrument. To augment the survey response data, public sources of data also were collected. Results: Forty-four percent of the electronic surveys were returned and information was gathered for 31 institutions from public sources. These results indicate (1) the most common degrees held by anatomy faculty were MS and PhD in anatomy, and DC degrees; (2) 75% of institutions utilized human cadavers and 75% presented laboratory anatomical demonstrations; (3) 62% used PowerPoint and 100% provided students with copies of lecture presentations; (4) 88% required attendance in laboratory and 50% in lecture; (5) 69% issued one grade for lecture and laboratory; (6) 100% of laboratory examinations were anatomical identification; and (7) 80% of written examinations were multiple-choice format. Conclusions: While individual variations existed, chiropractic institutions internationally have similar gross anatomy faculty, course design, delivery methods, and assessment methods.
Key Indexing Terms: Anatomy; Chiropractic; Cross-sectional Survey; Educational Technologies
INTRODUCTION
The core content, composition, and instructional methodologies of medical school gross anatomy courses have been the subject of numerous investigations over several decades.[1-4] These studies describe the importance of gross anatomy in medical school curricula, with anatomy courses including both traditional lecture and laboratory
tegral component since the early 1900s.[1] However, unlike its medical counterpart, only two reports were published that describe gross anatomy courses within chiropractic education. In 1986, the anatomy departments of 15 chiropractic colleges seeking accreditation from the Council of Chiropractic Education were analyzed to summarize anatomy curricula, to provide data to influence trends in chiropractic curricular design, and to raise public awareness of
Save
Send for Consensus
DATA EXTRACTION
QUALITY ASSESSMENT
Extraction sheet
Study design
Pick ONE best choice for the design of the study.
Literature review (eg, systematic, scoping)
Quantitative
Qualitative
Mixed methods
Descriptive report
Other
Clear above selection
Country in which the study was conducted
Select which country(ies) where the study was conducted
Australia
Brazil
Canada
Denmark
France
New Zealand
South Africa
Spain
Sweden
Switzerland
United Kingdom
United States of America

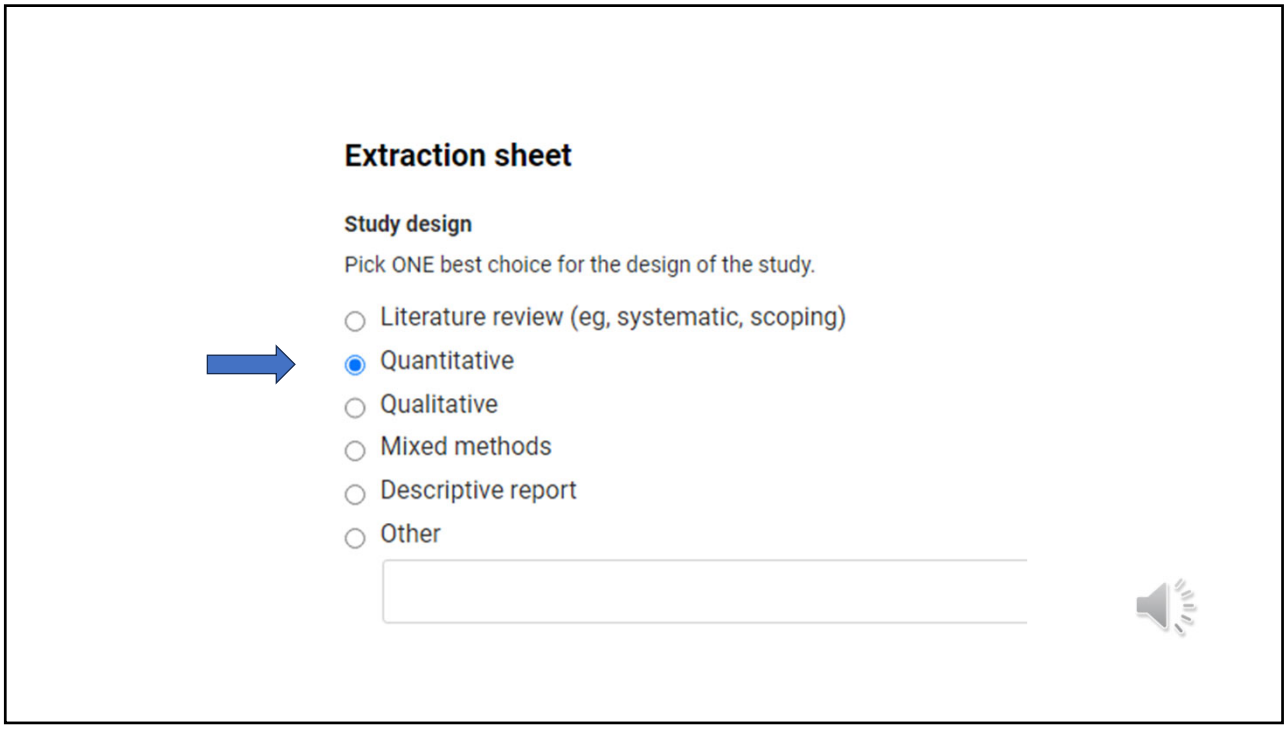
21


Ball 2012
Select Full Text
Page 175 (1 of 9)
An International Survey of Gross Anatomy Courses in Chiropractic Colleges
Jennette J. Ball, DC, MS, Kristina L. Petrocco-Napuli, DC, MS, Michael P. Zumpano, PhD, DC, New York Chiropractic College
Purpose: The purpose of this study is to provide the first comprehensive description of gross anatomy course design in chiropractic colleges internationally and to provide baseline data for future investigation, future comparison with other health care professions, and identification of trends. Methods: A 72-question cross-sectional electronic survey was sent to the anatomy department chair at 36 chiropractic colleges internationally using Zoomerang, a web-based survey instrument. To augment the survey response data, public sources of data also were collected. Results: Forty-four percent of the electronic surveys were returned and information was gathered for 31 institutions from public sources. These results indicate (1) the most common degrees held by anatomy faculty were MS and PhD in anatomy, and DC degrees; (2) 75% of institutions utilized human cadavers and 75% presented laboratory anatomical demonstrations; (3) 62% used PowerPoint and 100% provided students with copies of lecture presen-

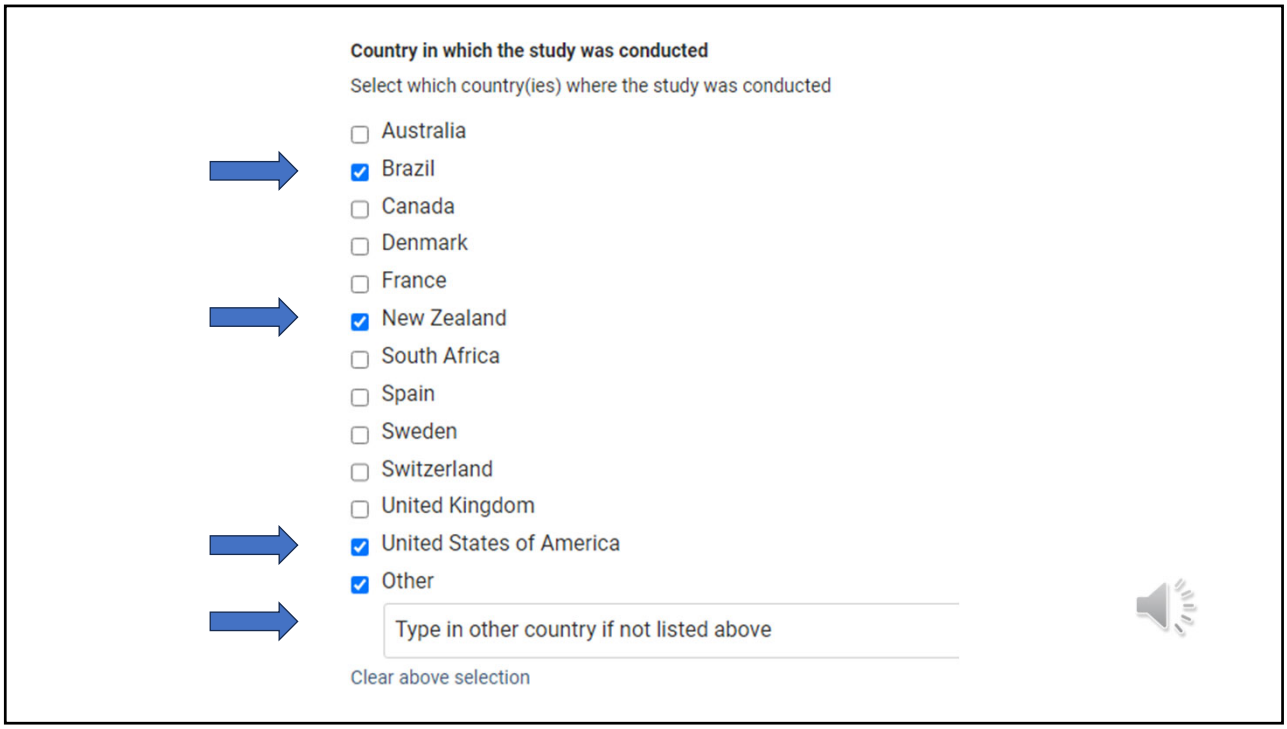
22


Save
Send for Consensus
DATA EXTRACTION
QUALITY ASSESSMENT
Extraction sheet
Study design
Pick ONE best choice for the design of the study.
Literature review (eg, systematic, scoping)
Quantitative
Qualitative
Mixed methods
Descriptive report

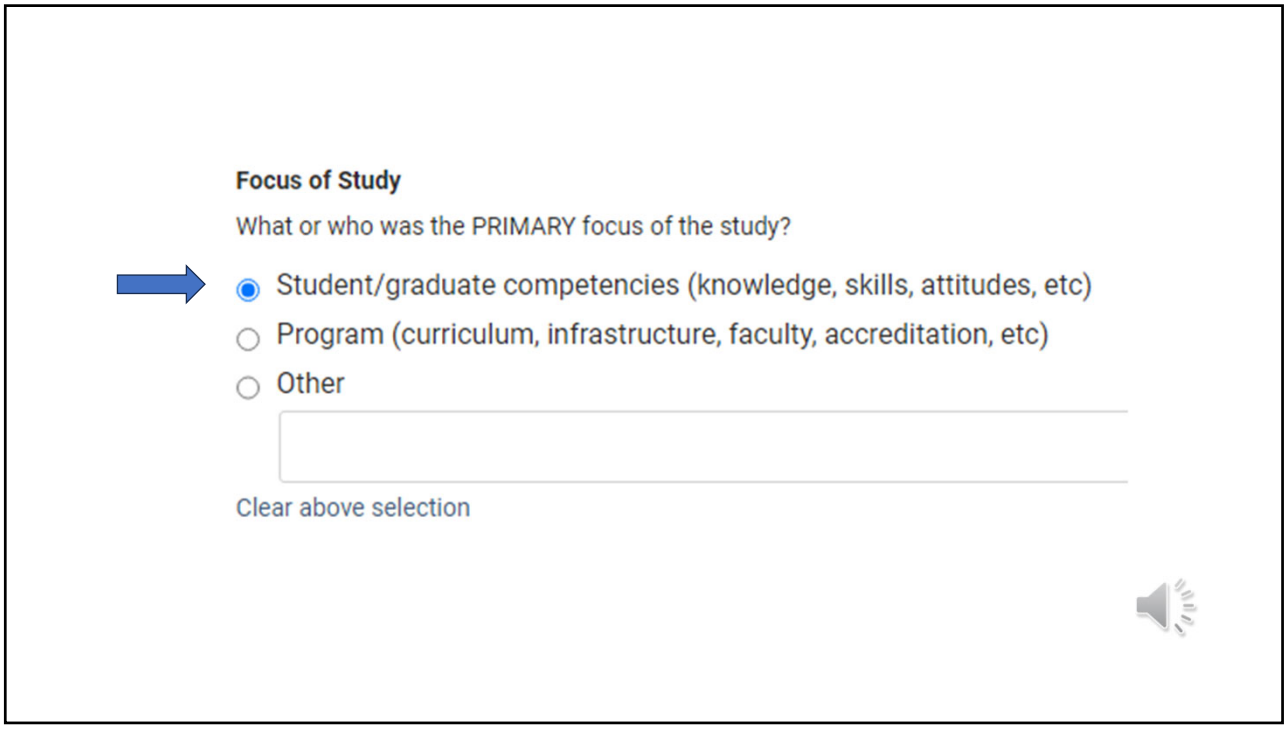
23


Extraction sheet
Study design
Pick ONE best choice for the design of the study.
Literature review (eg, systematic, scoping)
Quantitative
Qualitative
Mixed methods
Descriptive report
Other

24


Country in which the study was conducted
Select which country(ies) where the study was conducted
Australia
Brazil
Canada
Denmark
France
New Zealand
South Africa
Spain
Sweden
Switzerland
United Kingdom
United States of America
Other
Type in other country if not listed above
Clear above selection

25

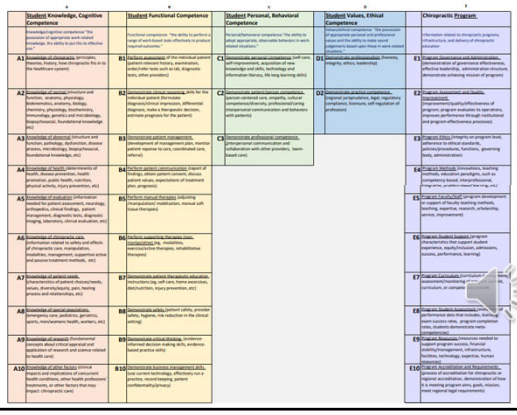

Focus of Study
What or who was the PRIMARY focus of the study?
Student/graduate competencies (knowledge, skills, attitudes, etc)
Program (curriculum, infrastructure, faculty, accreditation, etc)
Other
Clear above selection

26

Code

Type in ONE letter and ONE number from the topic tool that best fits the study. Only type in one letter and one number. If you provide a range or more than one answer, it will be marked as incorrect. Pleases use this Topic Tool https://www.brighthall.com/_files/ugd/4f1be9_e62220f8658f4b14a4ce0d0c7fcec202.pdf

B5

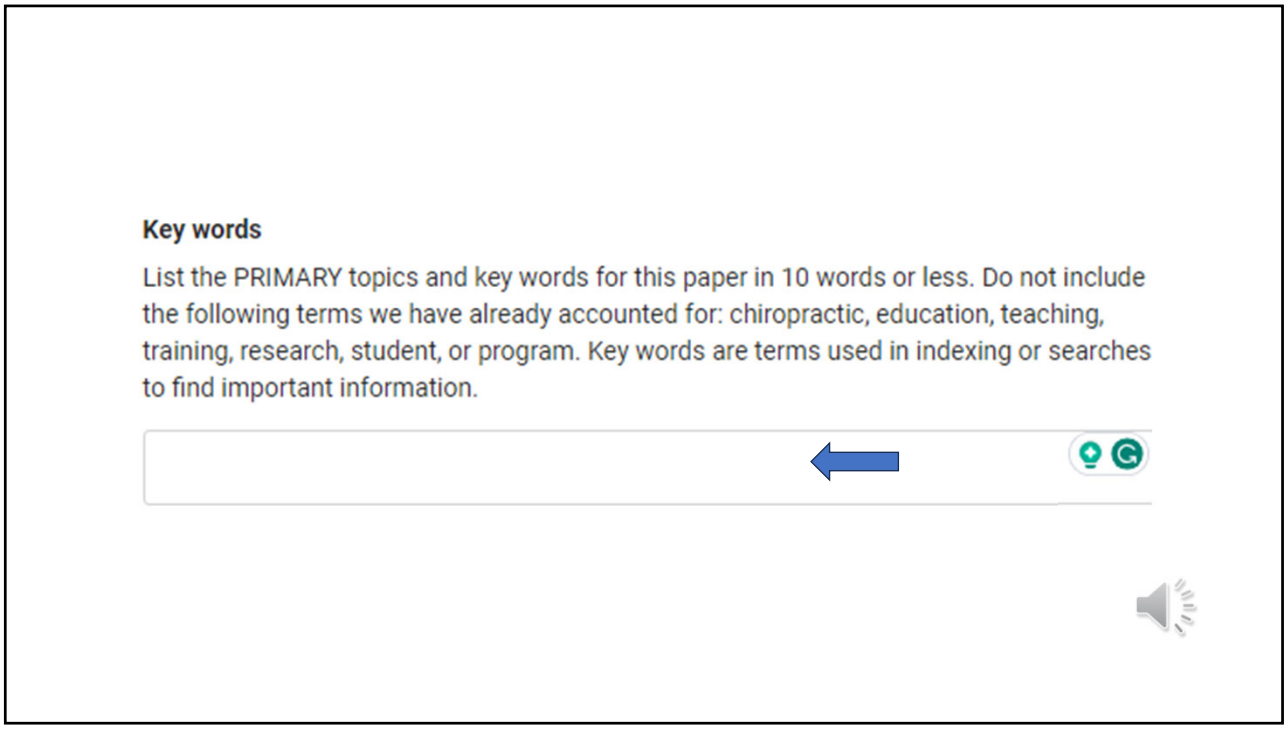


27

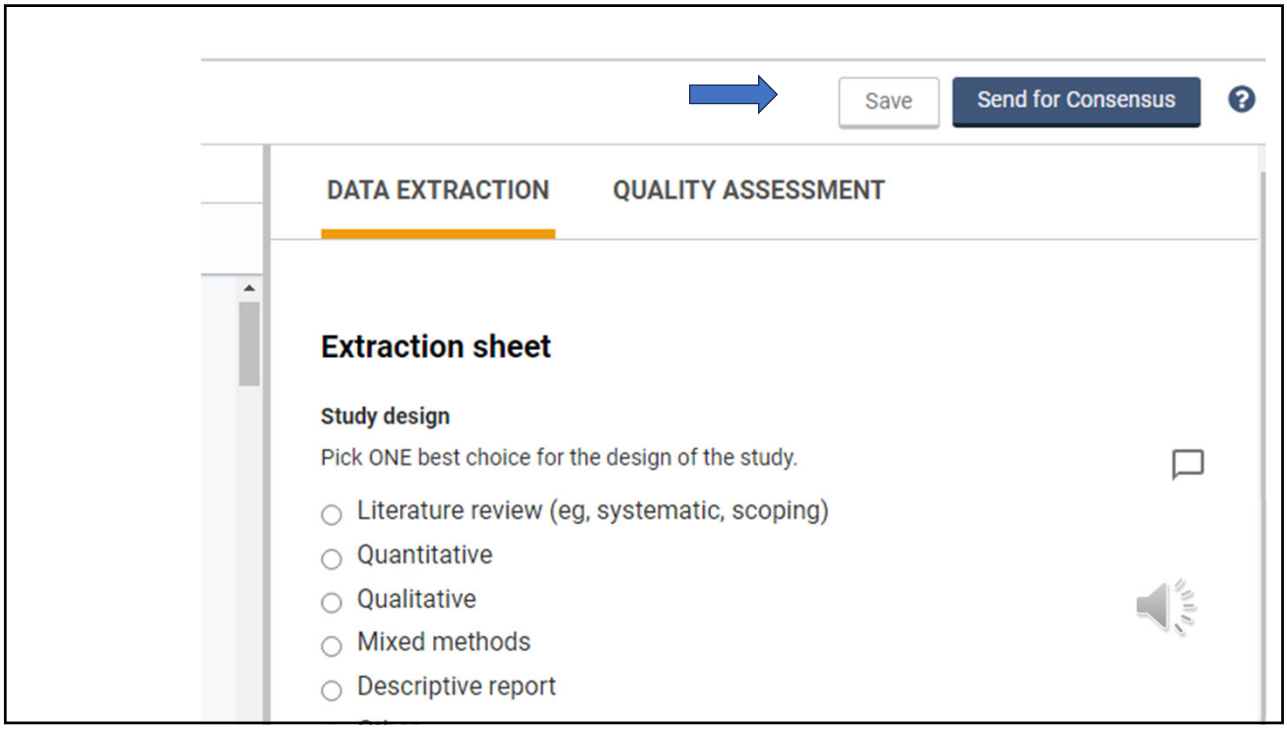
Conclusion/Findings

Summarize the PRIMARY findings/results of the paper in 40 words or less.

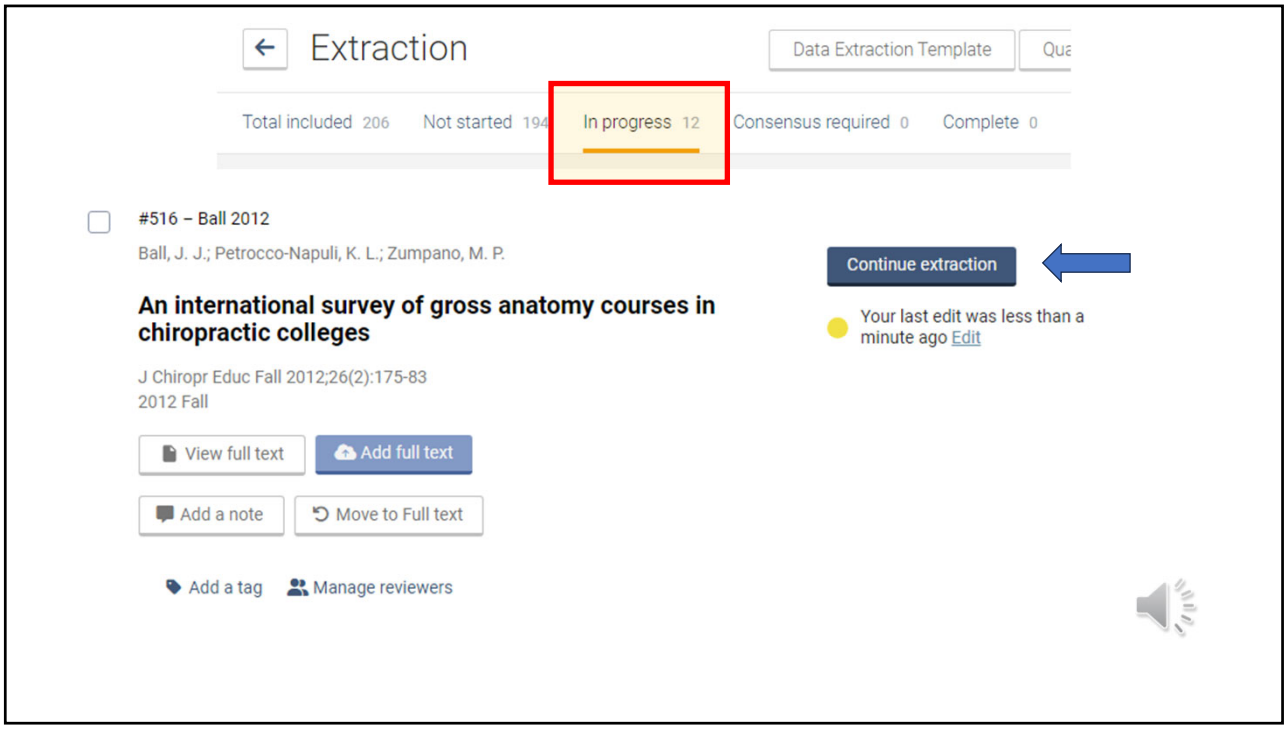
28


Key words
List the PRIMARY topics and key words for this paper in 10 words or less. Do not include the following terms we have already accounted for: chiropractic, education, teaching, training, research, student, or program. Key words are terms used in indexing or searches to find important information.

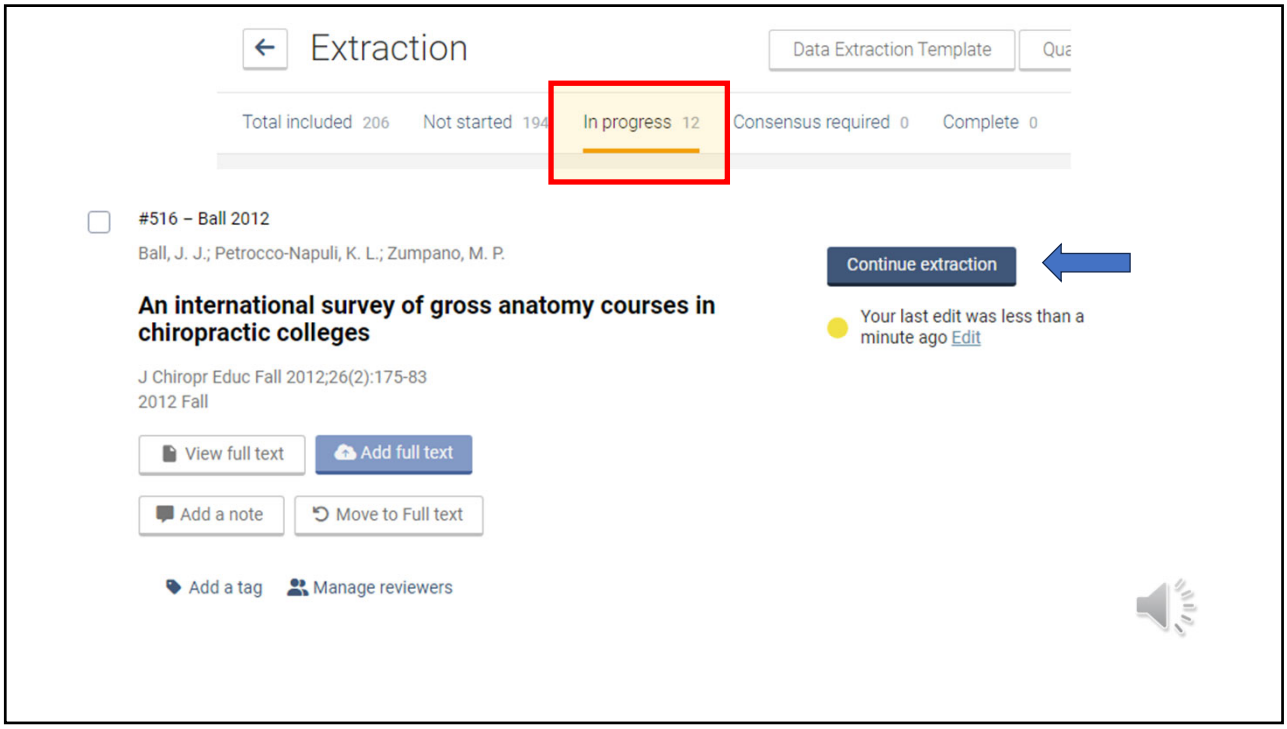
29


Save
Send for Consensus
DATA EXTRACTION
QUALITY ASSESSMENT
Extraction sheet
Study design
Pick ONE best choice for the design of the study.
Literature review (eg, systematic, scoping)
Quantitative
Qualitative
Mixed methods
Descriptive report

30


Extraction
Data Extraction Template
Qua
Total included 206
Not started 194
In progress 12
Consensus required 0
Complete 0
#516 – Ball 2012
Ball, J. J.; Petrocco-Napuli, K. L.; Zumpano, M. P.
An international survey of gross anatomy courses in chiropractic colleges
J Chiropr Educ Fall 2012;26(2):175-83
2012 Fall
View full text
Add full text
Add a note
Move to Full text
Add a tag
Manage reviewers
Continue extraction
Your last edit was less than a minute ago Edit

31


Extraction
Data Extraction Template
Qua
Total included 206
Not started 194
In progress 12
Consensus required 0
Complete 0
#516 – Ball 2012
Ball, J. J.; Petrocco-Napuli, K. L.; Zumpano, M. P.
An international survey of gross anatomy courses in chiropractic colleges
J Chiropr Educ Fall 2012;26(2):175-83
2012 Fall
View full text
Add full text
Add a note
Move to Full text
Add a tag
Manage reviewers
Continue extraction
Your last edit was less than a minute ago Edit

32

Helpful hints

- We are using 2 entry verification, this means for data extraction to be considered complete, 2 people must “send to consensus” their responses.
- If you start data extraction on a paper – please finish it within 24 hours, otherwise it gets stuck in the system.
- You can do as many or as few as you wish at a time. If you have a few minutes, log in and complete a few decisions. Or you can schedule a little more time when it is convenient to you to do more.
- When everyone is carrying their share of the work, this project will be completed easily.

33

Helpful hints

- We are using 2 entry verification, this means for data extraction to be considered complete, 2 people must “send to consensus” their responses.
- If you start data extraction on a paper – please finish it within 24 hours, otherwise it gets stuck in the system.
- You can do as many or as few as you wish at a time. If you have a few minutes, log in and complete a few decisions. Or you can schedule a little more time when it is convenient to you to do more.
- When everyone is carrying their share of the work, this project will be completed easily.

34

Helpful hints

- We are using 2 entry verification, this means for data extraction to be considered complete, 2 people must “send to consensus” their responses.
- If you start data extraction on a paper – please finish it within 24 hours, otherwise it gets stuck in the system.
- You can do as many or as few as you wish at a time. If you have a few minutes, log in and complete a few decisions. Or you can schedule a little more time when it is convenient to you to do more.
- When everyone is carrying their share of the work, this project will be completed easily.

35

Warning! We ask that you please do not change the settings or click “archive”

This is the main worksheet, not your personal worksheet.

The controls are active for the entire project, not just for your work.

This means clicking on settings or controls will disrupt and possibly destroy the project.

Please do not click on or modify in any way the pages.

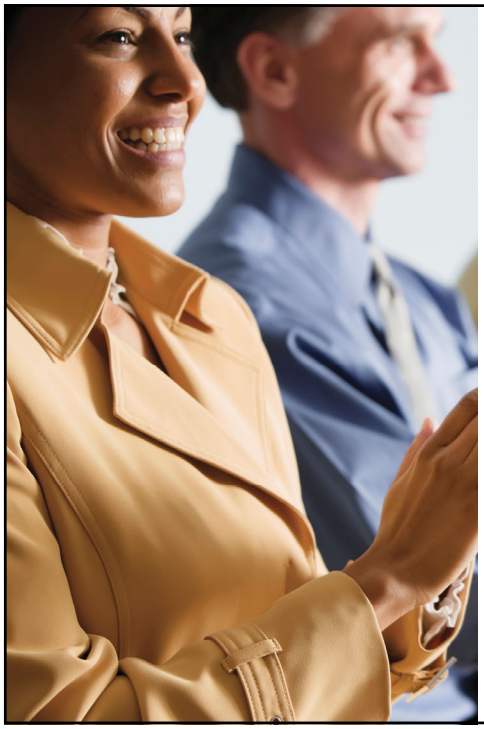
36

A general rule of thumb is that if you the action will change the study or delete something, do not do it.

If you are not sure, please ask Claire first.

Thank you!

37



Thank you for joining the authorship team

- This study will be possible by everyone participating
- Thank you!

38

Education and training of chiropractic students and graduates: a scoping review

Covidence Step 2 – Data Extraction

39