

ELC 2018

Anatomy Educator SIG Survey

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Survey Development

- A survey was developed in response to questions that arose in 2 Anatomy Educator SIG meetings held at national conferences.
- The survey was developed (Qualtrics) with input from the Anatomy Educator SIG officers (3 iterations).
- The survey was distributed to a listserv comprised of educators who expressed interest in joining the Anatomy Educator SIG (n= 105). Return rate $43/105 = 41\%$

About the Institution

- Q1 - In what type of institution is your physical therapy program housed?

Answer	%	Count
Public	41.86%	18
Private Non Profit	46.51%	20
Private For Profit	11.63%	5
Total	100%	43

- Q2 - Does your institution also include a medical/osteopathic school?

Answer	%	Count
Yes	30.23%	13
No	69.77%	30
Total	100%	43

Cohort Size

- Q3 - How many physical therapy students are in one cohort in your program?

Answer	%	Count
20 - 30	27.9%	12
31 - 40	25.6%	11
41 - 50	23.3%	10
51 - 60	11.6%	5
60 - 72	9.3%	4
➤ Two cohorts (48, 32)		1

Cadaveric Instruction?

- Q4 - Do you include cadaveric instruction (cadaveric dissection and/or using prosected cadaveric materials) as part of your anatomy course in your curriculum?
- (If no, the survey is complete; thank you)

Answer	%	Count
Yes	93.02%	40
No	6.98%	3
Total	100%	43

Procuring Your Materials

- Q5 - What is the process used to procure your cadaveric materials? (Click all that apply)

Answer	%	Count
We are affiliated with a medical/osteopathic school, which manages cadaveric material procurement.	28.26%	13
Our physical therapy program manages cadaveric material procurement.	13.04%	6
Our Department (which may include other educational programs) manages cadaver procurement.	13.04%	6
We partner with another institution and they manage cadaveric material procurement.	34.78%	6
Other: Fill In	10.87%	5
Total	100%	46

Procuring Materials

- Q5: Other: Fill In

Other: Fill In

We purchased a plasticized cadaver

Our biology department procures cadavers from a nearby large university with a medical school

We partner with undergraduate anatomy and they procure the cadavers

Tx Approved Willed Body Program – State Anatomical Board

Biology Department Manages procurement for PT and Physician Assistant

Dissection / Prosection

- Q6 - Regarding your gross lab with cadaveric materials...(Click all that apply)

Answer	%	Count
We dissect a full body as part of our Anatomy course.	58.73%	37
We dissect particular body parts but do not have access to, or do not choose to dissect a full body in our Anatomy course.	0.00%	0
We teach from already prosected full body cadavers in our Anatomy course.	20.63%	13
We teach from already prosected limbs and/or body parts in our Anatomy course.	14.29%	9
Other: fill in	6.35%	4
Total	100%	63

Dissection / Prosection

- Q6 - Regarding your gross lab with cadaveric materials...

Other: Fill In

We are a PTA program and we go to the DPT school to view prosected full bodies.

We have two semesters of anatomy. The first semester the students learn from protected cadavers. Then during their 6th semester, they take anatomy dissection.

We do not dissect the face.

2 course sequence – students in 2nd course dissect cadavers that are used by students in 1st course.

Who Does the Prosections?

- Q7 - If you use already prosected materials in your cadaveric instruction, who does the prosections? (Click all that apply)

Answer	%	Count
The course instructor	31.25%	10
Lab teaching assistants	12.50%	4
We use materials from previous years that are stored	37.50%	12
Other: Fill In	18.75%	6
Total	100%	32

Who Does the Prosections?

- Q7 - If you use already prosected materials in your cadaveric instruction, who does the prosections? (Click all that apply)

Other: Fill In

2nd year DPT students (or upper classmen) as a component of their anatomy course (x 4)

Students who have taken anatomy can sign up for a dissection elective prior to the next cohort starting

Purchased prosected plasticized cadaver

Sharing the Lab

- Q8 - Do you share the gross lab space with other programs?

Answer	%	Count
Yes	85.37%	35
No	14.63%	6
Total	100%	41

- Q9 - If you share gross space with other programs, who are you sharing with? (Click all that apply)

Answer	%	Count
MD or DO	15.94%	11
PA	26.09%	18
OT	14.49%	10
RN/BSN	4.35%	3
Undergraduates	14.49%	10
Other: Fill In	24.64%	17
Total	100%	69

Sharing the Lab

- Q9 - If you share gross space with other programs, who are you sharing with?

Other: Fill In
Pharmacy Students (x 3)
Dental (x 3)
Optometry
Biology Department "owns" the lab
EMT, Respiratory, Dental Hygiene, Athletic Training
Athletic Training (x 3)
Prosthetics and Orthotics
All other programs requiring A&P
Undergrads
PA
Respiratory
MAT; PhD

Co-Teaching

- Q10 - Are your physical therapy students co-taught with other students in Anatomy lab?

Answer	%	Count
Yes	21.95%	9
No	78.05%	32
Total	100%	41

Co-Teaching

- Q11 - If your physical therapy students are co-taught in lab, who are the students?

Answer	%	Count
MD or DO	0.00%	0
PA	41.67%	5
OT	33.33%	4
RN/BSN	0.00%	0
Undergraduates	0.00%	0
Other: Fill In MAT, PhD; Respiratory; UG	25.00%	3
Total	100%	12

Personal Protective Equipment

- Q12 - What type of personal protective equipment (PPE) is REQUIRED in your cadaver lab? (click all that apply)

Answer	%	Count
Disposable full length arm gowns (for each session)	0.83%	1
Non-disposable lab coat	11.67%	14
Disposable apron (for each session)	3.33%	4
Gloves	34.17%	41
Scrubs	15.83%	19
Goggles	6.67%	8
Safety Glasses	20.00%	24
Protective Face Shield	0.83%	1
None; we do not require PPE	0.00%	0
Fill In:	6.67%	8
Total:	100%	120

Personal Protective Equipment

- Q12 - What type of personal protective equipment (PPE) is **REQUIRED** in your cadaver lab? (click all that apply)

Other: Fill In

Shoe Covers

Vinyl Reusable Aprons

Closed-toe shoes (2), we highly recommend the lab coat

Full Disposable Gown

Eye Protection is only required when bone saws are used

We provide bonnets and shoe covers and sleeve protectors (worn over lab coats), plus optional plastic aprons. Students wear either goggles, safety glasses, or full face shield, depending on the circumstances. We use an outside laundry service to manage laundry.

Non-disposable aprons

Required clothing under a gown?

- Q13 - Are students REQUIRED to wear scrubs or special clothing under a lab coat, apron, or disposable gown?

Answer	%	Count
Yes	44.74%	17
No	55.26%	21
Total	100%	38

- Q14 - If students are REQUIRED to wear scrubs or special clothing under a lab coat, apron, or disposable gown, are they required to wash clothing after each lab session?

Answer	%	Count
Yes	10.00%	2
No	90.00%	18
Total	100%	20

PPE Requirements

- Q15 - Who determines what personal protective equipment (PPE) is required? (click all that apply)

Answer	%	Count
The Physical Therapy Program	50.00%	22
The Medical/Osteopathic school in our institution	6.82%	3
The Department/Division/School in which the physical therapy program is housed	27.27%	12
Other: Fill In Text	15.91%	7
Total	100%	44

PPE Requirements

- Q15 - Who determines what personal protective equipment (PPE) is required? (click all that apply)

Other: Fill In

The laboratory director

University Laboratory Policies

Anatomy Department

The Anatomy Lab Director to comply with the University
Biosafety Officer

Division Housing Sciences

Facility we pay to use

We work with the University's Safety Officer

Training?

- Q16 - Are the students required to complete OSHA and/or Bloodborne Pathogen training specific to the anatomy laboratory processes and procedures?

Answer	%	Count
Yes	41.46%	17
No	58.54%	24
Total	100%	41

Chemicals Use (Fixative)

- Q17 - What type of chemical(s) are used to fix (chemical alteration to prevent tissue breakdown) your cadaveric materials? (Click all that apply)

Answer	%	Count
Glycerin	15.85%	13
Formalin	25.61%	21
Phenol	23.17%	19
Methanol (methyl alcohol)	7.32%	6
Ethanol (ethyl alcohol)	8.54%	7
Thymol	1.22%	1
Water	10.98%	9
Thiel Embalming Method (chloro-methylphenol, salt, boric acid, and ethylene glycol)	1.22%	1
Fill In:	6.1%	5
Total:	100%	82

Chemical Use (Fixative)

- Q17 - What type of chemical(s) are used to fix (chemical alteration to prevent tissue breakdown) your cadaveric materials? (Click all that apply)

Other: Fill In

Carolina Wetting Solution (wetting solution + mold inhibitor)

Isopropyl alcohol, anti fungal and 2% formaldehyde

Formaldehyde 3.5%

Alcohol, Glycol

A mixture of 3-4 of the above chemicals plus some other (proprietary) chemicals. Cadavers are certified to be viral/bacterial free.

Wetting Solution

- Q18 - What is used as a wetting solution to preserve your cadaver once the tissue is dissected, so it remains in good condition? (click on all that apply)

Answer	%	Count
Glycerin	8.70%	4
Formalin	6.52%	3
Alcohol	4.35%	2
Fabric Softener (e.g. Downy)	6.52%	3
Water	19.57%	9
King Wetting Solution	2.17%	1
Restorative (Dodge Co.)	13.04%	6
Wardsafe Solution	6.52%	3
Fill In:	32.61%	15
Total:	100%	46

Wetting Solution

- Q18 - What is used as a wetting solution to preserve your cadaver once the tissue is dissected, so it remains in good condition? (click on all that apply)

Other: Fill In

Infutrace

Carolina Wetting Solution

Carosafe

Biostat

Ethanol and Phenol

Mold inhibitor that contains formalin

Humectant

None required. Plasticized

Temple Wetting Solution

Phenol

Hospital Disinfectant Grade Solution

Lysol Solution

Fisher's Fresh Solution

Storage

- Q19 - What do you use to store your cadaver during the delivery of your Anatomy course? (click all that apply)

Answer	%	Count
Standard Dissection Table (with no cover)	29.41%	15
Covered Dissection Table	27.45%	14
Dissection Table that elevates with a Dip Tank	21.57%	11
Other: Fill In	21.57%	11
Total	100%	51

Storage

- Q19 - What do you use to store your cadaver during the delivery of your Anatomy course? (click all that apply)

Other: Fill In
Plastic, Linen, Body bag on a tray
Down Draft Table
We cover the cadavers with wetted towels and then a felt sheet
In Stainless Steel Tank
Body Bag
Covered by wet sheet then plastic then dry sheet and another piece of plastic
Heavy plastic zippered body bags
Bodies are double bagged and lowered into the tanks each day (there is no fluid in the 'dip' tank)
Downdraft tables
Custom built dissection tables
Cadavers are kept in the freezer outside of dissection times

Policy: Pregnancy

- Q20 - Does your institution have a policy related to pregnant students participating in cadaver lab?

Answer	%	Count
Yes	58.54%	24
No	41.46%	17
Total	100%	41

Q21 - If you answered yes, what is the policy related to a pregnant student participating in cadaver lab? (Click all that apply)

Answer	%	Count
The student is not allowed to participate in cadaver lab.	7.14%	3
The student is allowed to participate in cadaver lab with clearance from their physician.	42.86%	18
The student is allowed to participate in cadaver lab; we require no clearance from their physician.	2.38%	1
The student must sign a waiver form that holds the institution harmless.	7.14%	3
The student is REQUIRED to use a special respirator that is fit tested (e.g. half face respirator with formaldehyde cartridges).	11.90%	5
The student is given a special respirator that is fit tested (e.g. half face respirator with formaldehyde cartridges).	11.90%	5
The student is REQUIRED to use a paper mask.	0.00%	0
The Student is given the OPTION to use a paper mask.	4.76%	2

Policy: Pregnancy

- Q21 - If you answered yes, what is the policy related to a pregnant student participating in cadaver lab?

Other: Fill In

Elbow Length Gloves

Student is strongly encouraged to inform their MD and follow any special precautions recommended

We have never encountered this situation, but the policy is to fully inform the student of the potential risks and give them the option to seek medical advice and to use a paper mask

Student is required to use a respirator when in lab, however the participation in lab is optional and other arrangements can be made if student chooses to not attend the labs

Q22 - Does your institution have a policy related to lactating students participating in cadaver lab?

Answer	%	Count
The student is not allowed to participate in cadaver lab.	6.38%	3
The student is allowed to participate in cadaver lab with clearance from their physician.	27.66%	13
The student is allowed to participate in cadaver lab; we require no clearance from their physician.	12.77%	6
The student must sign a waiver form that holds the institution harmless.	8.51%	4
The student is REQUIRED to use a special respirator that is fit tested (e.g. half face respirator with formaldehyde cartridges).	8.51%	4
The student is given the OPTION of using a special respirator that is fit tested (e.g. half face respirator with formaldehyde cartridges)	6.38%	3
The student is REQUIRED to use a paper mask	0.00%	0
The student is given the OPTION to use a paper mask.	2.13%	1

Policy: Lactating Student

- Q22 - Does your institution have a policy related to lactating students participating in cadaver lab?

Other: Fill In

No Policy (5)

Elbow Length Gloves

Student is required to use a respirator when in lab, however participation in lab is optional and other arrangements can be made if student chooses to not attend the labs.

How is lab content mastered?

- Q23 - If the student does not participate in anatomy cadaver lab because they are pregnant or lactating, how is the laboratory content mastered?

Answer	%	Count
The student used models and/or computer software programs and is tested accordingly.	50.00%	9
Other: Fill In Text	50.00%	9
Total	100%	18

How is lab content mastered?

- Q23 - If the student does not participate in anatomy cadaver lab because they are pregnant or lactating, how is the laboratory content mastered?

Other: Fill In

Has not occurred

While it is a possibility, we have not encountered this scenario yet

If not able to participate they defer to the time they are

We do not have a written policy on this

Leave of absence

If we were to ever encounter the situation, and the student chose not to participate in the lab, we would use models and digital delivery systems

Course of Study

- If the student does not participate in cadaver lab when pregnant or lactating and alternate means of assessing student knowledge is unacceptable to your program, how does this affect the student's program of study?

Answer	%	Count
The student must step out of the class and join the class behind them and take the course including cadaver lab.	25.93%	7
The student is awarded a grade on lecture material only.	11.11%	3
Other: Fill In	62.96%	17
Total	100%	27

Course of Study

- If the student does not participate in cadaver lab when pregnant or lactating and alternate means of assessing student knowledge is unacceptable to your program, how does this affect the student's program of study?

Other: Fill In Text

The student is tested on pictures, models, and/or computer images of specimens

Has not occurred

No Policy

PowerPoint Practicals

N/A

We devise a photo image based practical exam replacement

Leave of Absence

Length of Time Materials are Kept

- Q25 - How long do you keep your cadaveric materials (click all that apply)

Answer	%	Count
Just for the duration of the course	20.83%	10
Up to one year	52.08%	25
Up to two years	12.50%	6
Indefinitely as long as the material is in good condition	10.42%	5
Other: Fill In Text	4.17%	2
Total	100%	48

Other: Fill In Text

Keep one for undergrads in kinesiology

We are allowed to keep longer provided donor family does not have any time stipulations

Demographics

- Q26 - Some questions about you. What is your age range?

Answer	%	Count
25-35	12.20%	5
36-46	21.95%	9
47-57	41.46%	17
Over 57	24.39%	10
Prefer not to say	0.00%	0
Total	100%	41

Demographics

- Q27 - What is your gender?

Answer	%	Count
Male	43.90%	18
Female	53.66%	22
Prefer not to say	2.44%	1
Total	100%	41

Degree Earned

- Q28 - What is your highest degree earned?

Answer	%	Count
Bachelor's of Science	0.00%	0
Master's of Science	2.33%	1
PhD, EdD, DSci	69.77%	30
DPT	25.58%	11
MD	0.00%	0
Other: Fill In*	2.33%	1
Total	100%	43

*Note: Other is Lab Assistant, not primary instructor for course.

Anatomy Degree?

- Q29 – Do you have a degree in Anatomy?

Answer	%	Count
Yes	21.95%	9
No	78.05%	32
Total	100%	41

Answer	%	Count
BS	0.00%	0
MS	0.00%	0
PhD	100%	9
Other: Fill In	0.00%	0
Total	100%	9

Years Teaching Cadaveric Instruction

- Q31 - How many years have you been teaching cadaveric instruction?

Answer	%	Count
Less than 5	20.51%	8
Between 5 and 10	28.21%	11
Between 10 and 20	28.21%	11
Over 20	23.08%	9
Total	100%	39

QUESTIONS?