Society of Systematic Zoology Presidential address Telling it like it is: the importance of naming in science

> Brian O'Meara brianomeara.info/evol2023.html @omearabrian@mastodon.social

Image from WallpapersDen.com

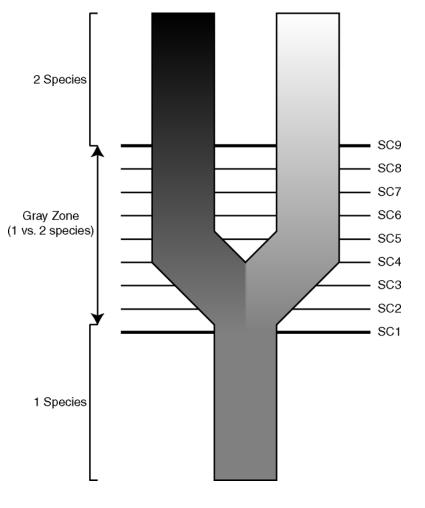
Sharing this content on social media is encouraged

Society of Systematic Biologists Presidential address Telling it like it is: the importance of naming in science

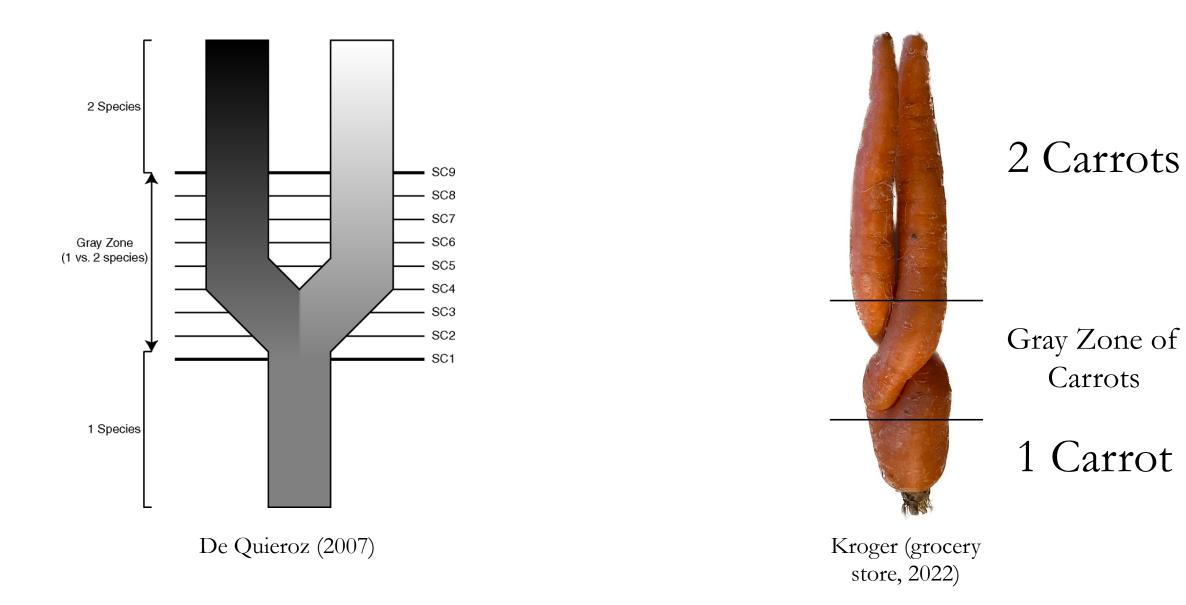
Brian O'Meara brianomeara.info/evol2023.html @omearabrian@mastodon.social

Sharing this content on social media is encouraged





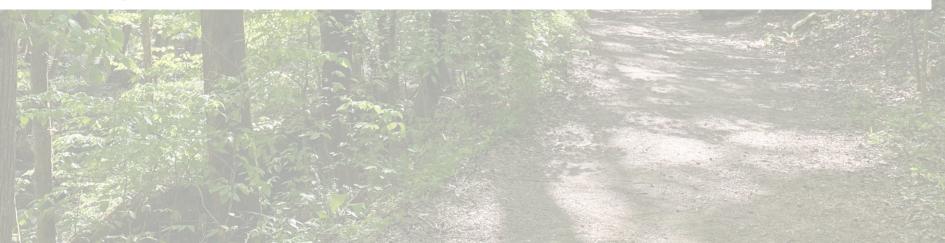
De Quieroz (2007)

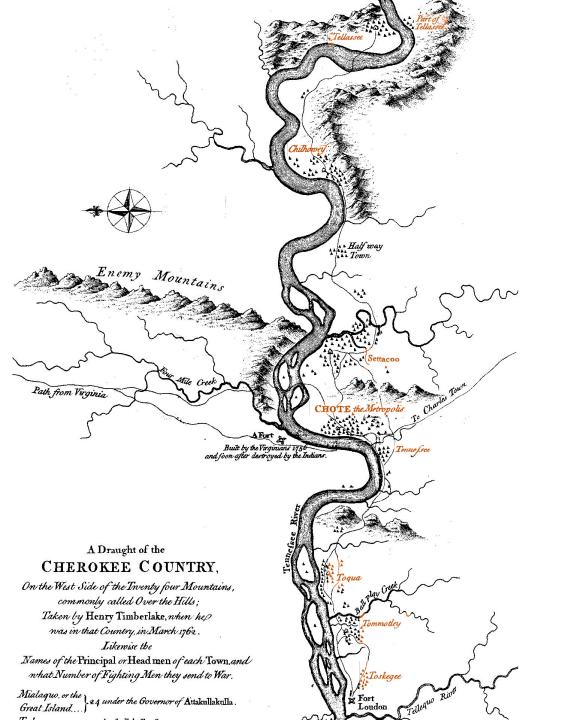


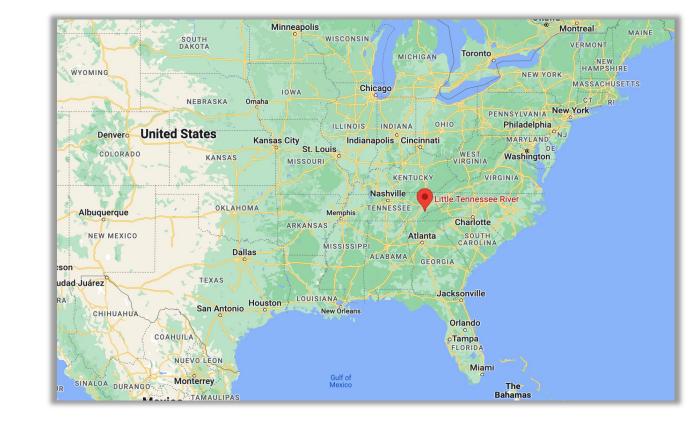
- Is this one species or two?
- Who should we name our new telescope after?
- Was that manslaughter or murder?
- Is this part of the Modern Synthesis or something new?
- What is a "gene"?

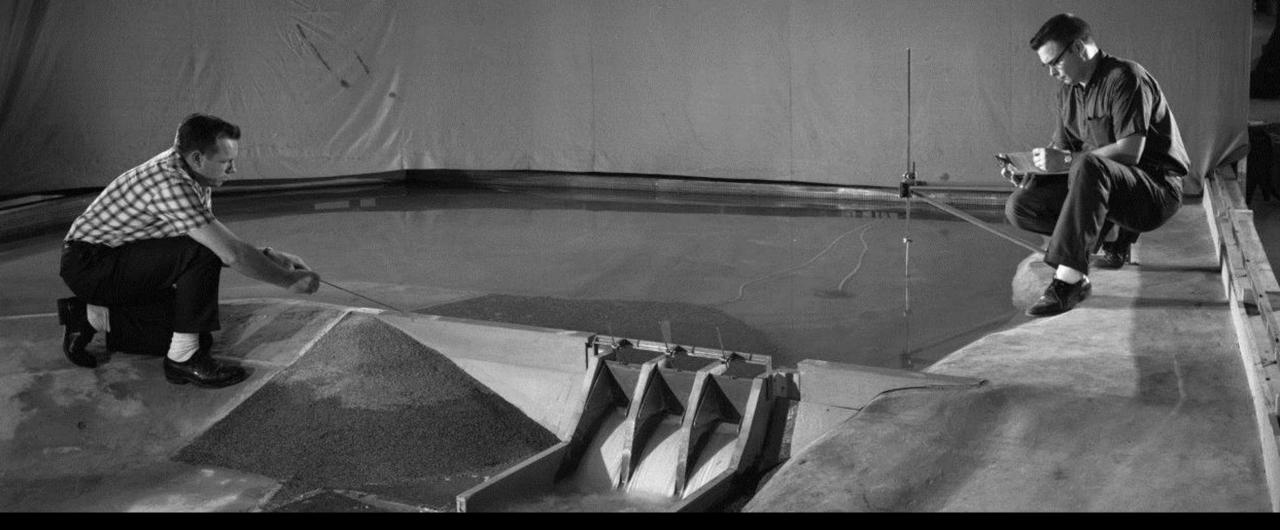
- Snail darter vs the dam
- Calling out **misconduct**
- Eponyms in our field
- Eugenics and our role in it

- Snail darter vs the dam
- Calling out **misconduct**
 - Eponyms in our field
 - Eugenics and our role in it









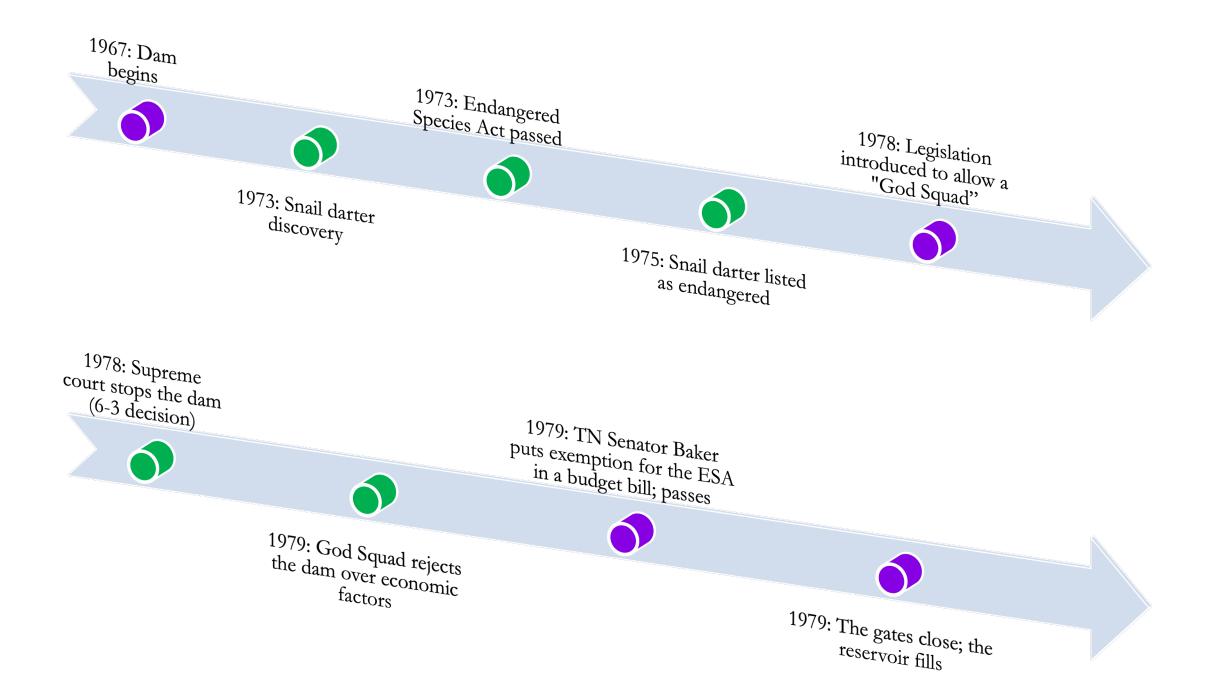
Tennessee Valley Authority





Taxonomic status: The population of saddle-backed Imostoma in the Little Tennessee River differs from known populations of P. uranidea in body width, paired fin length, saddle width, nuptial tubercle pattern, several aspects of pigmentation, number of anal and caudal fin rays, and probably vertebral number. I assume that genetic differences are responsible for most, if not all of this divergence. That this divergence is sufficiently large to justify recognition of the Little Tennessee River population as a distinct species is suggested by several sources of information besides the characters listed above. A useful clue to the probable taxonomic status of allopatric populations involves comparing the amount of divergence between such isolates with that between similar sympatric species in the same group. P. uranidea and P. ouachitae are sympatric in both the White and Saline river systems. The observable differences between these sympatric species (not recognized by modern ichthyologists as being distinct until 1970) are similar in magnitude to those between P. uranidea and P. tanasi. This indicates that striking differences are not prerequisite to maintenance of genetic isolation between sympatric Imostoma. Since the Wabash River population of P. uranidea does not display character states intermediate between those of Ozarkian populations and P. tanasi (Tables 1, 3, and 6), clinal differences are not involved.

Etnier 1976



Snail darter: pause of dam allowed time for transplantation; other populations found. Moved off endangered species list in 2022.



Snail darter: pause of dam allowed time for transplantation; other populations found. Moved off endangered species list in 2022.
Dam: still there. Cherokee village sites still under water.

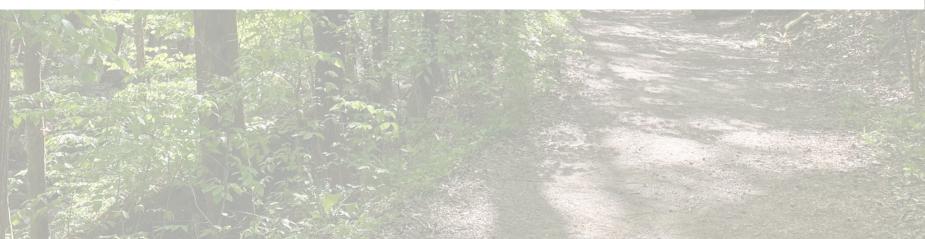
- Snail darter: pause of dam allowed time for transplantation; other populations found. Moved off endangered species list in 2022.
- Dam: still there. Cherokee village sites still under water.
- Proposed city and industry never built; three retirement communities built instead. Some have streets named after the flooded townsites.



- Snail darter: pause of dam allowed time for transplantation; other populations found. Moved off endangered species list in 2022.
- Dam: still there. Cherokee village sites still under water.
- Proposed city and industry never built; three retirement communities built instead. Some have streets named after the flooded townsites.
- Species describer Dave Etnier spent rest of career in Tennessee. Passed away in May 2023.

- Snail darter: pause of dam allowed time for transplantation; other populations found. Moved off endangered species list in 2022.
- Dam: still there. Cherokee village sites still under water.
- Proposed city and industry never built; three retirement communities built instead. Some have streets named after the flooded townsites.
- Species describer Dave Etnier spent rest of career in Tennessee. Passed away in May 2023.
- Assistant law professor Zygmunt Plater, who argued successfully before the US Supreme Court, failed to get tenure. Went on to a long, productive career at Boston College Law School.

- Snail darter vs the dam
- Calling out **misconduct**
- Eponyms in our field
- Eugenics and our role in it



Model 2: Survival ~ Age

Model 2: Survival ~ Age

Model 3: Survival ~ Age + Sex

Model 2: Survival ~ Age

Model 3: Survival ~ Age + Sex

Model 4: Survival ~ Age + Sex + Age*Sex

Model 1: Treatment ~ 1

Model 1: Treatment ~ 1

Model 2: Treatment ~ Merit

Model 1: Treatment ~ 1

Model 2: Treatment ~ Merit

Model 3: Treatment ~ Gender + Disability +
First language + Career stage + Sexual
orientation + Ethnicity + ... +
Gender*Disability + Gender*First language +

• • •



On social media:

1/n I had a wonderful time at <u>#evol2017</u>, but I had several painful experiences with sexist behavior and bigotry I feel compelled to share.

Suggestions to deal with harassment at meetings

There have been reports of harassment and similar problems at the Evolution 2017 meetings. We thank those doing the reporting and want to capture all the suggestions made in response to this. This form will aggregate and publicly display all the suggestions that come in. Note that there is a name field for follow up, but it is COMPLETELY OPTIONAL. Only include your own name.

Sign in to Google to save your progress. Learn more

Suggestion

Your answer

Name (optional) Note that this will be world readable.

Your answer

Submit

Clear form

If there were easier ways to report and spread the world among societies instead of Twitter <person> wouldn't have to be dealing with internet trolls. **Someone suggested creating a report button on the app** where the harassment is reported immediately to a safe group that can come and help.

> I met my spouse of ~20 years at a similar function at a similar meeting. What flirtation is bad flirtation? A microaggression slippery slope that IMO is silly to codify, and for adults to instruct other adults on. Let adults handle their own business, as in everywhere else that potential sexual partners meet. **Some people, of both sexes, like to hook up at meetings. Why make everything so awkward with formal, societal responses?** Each adult individual can handle situations as they see fit; <person's> was one way, and there are obviously many others.

Make reporting easier and make it easier for folks who have been harassed to chat with someone immediately to improve their safety and the quality of the reporting. It could be a Harassment Response Team of just a couple volunteers.

> Note: misspelled words corrected; emphasis mine

Report an incident

For a safer Evolution meeting we all need to speak OUT against harassment and other Inappropriate behaviors. If you need to report an incident of any unprofessional behavior by society members or other individuals affiliated with Evolution-sponsored activities (conference, workshop, publications, etc.), please contact directly our Evolution Safety Officer.

Safety Officer:

Kerrell Dunsmore evolutionsafetyofficer@gmail.com 480-609-3999

Detailed Reporting Procedures

Our safety officer will investigate reports of incidents that occur at an Evolution meeting, gather relevant information from all parties, consult confidentially with tri-society executive officers to determine appropriate sanctions and enforcement procedures, maintain records of all reported incidents, and **maintain confidentiality** of all parties at all times.

PROCEDURES FOR DEALING WITH INAPPROPRIATE BEHAVIOR AT ASN/SSE/SSB-SPONSORED MEETINGS

Enforcement procedures for dealing with violations of the Evolution Meeting

Contents of this document:

Regina Baucom, PhD, ASN Diversity Committee, Member of the Code of Conduct Committee

D. Steps for sanctioning inappropriate behavior by Executive Officers (pp. 7-8)

F. List of possible actions resulting in a request to stop the behavior (pg. 9)

H. List of possible actions resulting in ban from future meetings (pg. 9-10)

G. List of possible actions warranting expulsion from the current meeting (pg. 9)

B. Steps for following up on an incident witnessed first-hand or initiated with a complaint

Kelly Zamudio, PhD, SSB representative, Member of the Code of Conduct Committee

Andrea Case, PhD, SSE Executive VP, Chair of the Code of Conduct Committee

C. Steps for documenting and investigating incidents (pp. 6-7)

E. When to call security or emergency personnel (pp. 8-9)

Brian O'Meara, PhD, Member of the Code of Conduct Committee

Sherry Marts, PhD, President and CEO, S*Marts Consulting, LLC

Code of Conduct

PROCEDURES FOR DEALING WITH INAPPROPRIATE BEHAVIOR AT ASN/SSE/SSB-SPONSORED MEETINGS A. Context statements

1. All registered attendees, staff, sponsors, vendors, volunteers, and participants (here after 'participants') have agreed to abide by the Code of Conduct. Our official conference policies also protect the societies against liability, and grant the society Executive officers "...the right to enforce this code of conduct in any manner deemed appropriate" (See section I.2.)

- the Tri-societies (SSE, SSB and ASN) will contract with an on-site Safety Officer who is not an evolutionary biologist and does not have any direct personal or professional connection with members of any of the
- the Tri-society Executive Officers are ultimately responsible for determining sanctions based on the information and recommendation of the Safety Officer
- 2. The purpose of enforcing the Code of Conduct is to maintain a safe, welcoming, inclusive and productive environment for scientific exchange by all meeting
 - enforcement of the Code of Conduct is the responsibility of society Executive Officers with the assistance of the Safety Officer
 - however, reporting and intervention by meeting participants are essential components of enforcement; there should be no barriers to the reporting of potential violations of the Code of Conduct to the onsite Safety Officer and no barriers to prudent intervention in incidents of inappropriate behavior
 - incidents involving meeting participants that occur 'off-site' (e.g., bars, hotels) are subject to the Code of Conduct; a valid complaint can be made even if the incident does not happen at the conference center or
 - incidents involving non-participants are beyond the scope of this procedure and the meeting Code of Conduct
- participants are not expected to police or butt into others' private conversations, make assumptions about intent or response, or actively look for code violations, but anyone who sees something that looks like a potential violation of the Code of Conduct should say or do something (consult sections B, F-H and/or consult with the on-site Safety Officer) he purpose of this document is to provide guidelines for enforcing the Code of
 - it provides guidelines to the society Executive Officers on when and how to refer an incident to the Safety Officer and what steps to take if they witness an incident first hand or if someone comes to them with a
 - it provides guidelines to the Safety Officer on steps required to document and investigate incidents with all parties and make recommendations to the Executive Officers regarding sanctioning

2

UURES FOR DEALING WITH INAPPROPRIATE BEHAVIOR AT ASN/S • it provides guidance to society Execu possible sanctions based on informat the Safety Officer additional resources for dealing with ir auguing resources to accure to bystander intervention techniques) will and meeting participants, as appropriate As much as possible, when an incident occurs, kee composed at all times - the goal is always de-escale if anyone involved in an incident is intoxica

situation should be acknowledged immedia the time of the incident; it should be made c incident will be dealt with. The situation should effectively as possible, but reporting, discussion take place at a later time; waiting to <u>acknowled</u> s nuch as possible, everyone enforcing the Code of Con

nflicts of interest (COIs) with both complainants and the • note that investigations of all complaints will be ca Safety Officer, but sanctions are determined by the Officers upon recommendation by the Safety Officer as much as possible, sanctions will be determined ba reports of the details of the incident by the Safety Off Executive Officers, which should reduce COIs if a confidential report is not possible, all reasonable eff made to avoid COIs with the society Executive Officers in case of a clear and strong COI with an Executive Office In case or a crear and subject with an executive converse advisor, co-author, or familial relationship), that Executive

auvisor, cu-aucinor, or larring relationship, chartered not be consulted On an incident report or sanctioning n anonymous report means that the complainant's name i n anonymous reput integris the torrection of the solution of t Confidential report means that the Safety Officer and anyor onnaentiai report means that the safety onner and thy on olved in the situation will do their best to protect the identia olvea in the situation will do their best to protect with the situation will do their best to protect with the situation of the source of the situation of the propriate behavior may already know or may infer the iden propriate veriavior may an easy know or may mice the room

cuser, or an incluent may nave nappened in a public space ' is of utmost importance and will be maintained following th entiality is key in minimizing the potential for retaliation an

http://www.evolutionmeetings.org/conference-policies.html Contact information for the Safety Officer, Joint Meeting Committee, Society Executive Officers, security and emergency personnel: <Placeholder for contact information>

Additional considerations (pp. 10-11)

Templates for reports (pp. 12-17)

We gratefully acknowledge comments, edits and helpful discussion from the Evolution Joint Meeting Committee; Executive Officers and Council members of the Society for Study of Evolution (SSE), American Society of Naturalists (ASN), and the Society of Systematic Biologists (SSB); James Goldberg of Goldberg & Associates, PLLC. These procedures were approved by trisociety council votes on May 21, 2018.

Sources consulted in developing this document: https://us.pycon.org/2013/about/code-of-conduct/harassment-incidents-staff/ https://us.pycon.org/2013/about/code-of-conduct/harassment-incidents/ http://geekfeminism.wikia.com/wiki/Conference_anti-harassment/Responding_to_reports http://journal.frontiersin.org/article/10.3389/fmars.2016.00103/full

1

Unwelcome behaviors at the Evolution meetings: Survey results

Brian O'Meara (U of Tennessee, Knoxville), Andrea Case (Kent State U), Jodie Wiggins (U of Tennessee, Knoxville), Kelly Zamudio (Cornell), Regina Baucom (U of Michigan), Sharon Strauss (UC Davis)

Abstract

Anecdotal reports of unwelcome behaviors at previous Evolution meetings prompted SSE, ASN, and SSB to survey participants about meeting climate.

Big Picture

- 14% of 882 respondents report experiencing unwelcome behavior
- 3% included assault or harassment
- Undergraduates, LGBTQA+, women, pre-tenue faculty, and members from underrepresented groups experienced the most unwelcome behavior
- Targeted individuals primarily cited gender, age, and ethnicity

Introduction

- Science is full of unwelcome behaviors, including harassment, assault and more. This has been well documented, including in our field^{1,2,3,4}
- Incidents at Evolution 2017 strongly indicated that attention was merited
- The three societies formalized a robust Code of Conduct, as well as procedures for confidential reporting and the hiring of an external safety officer (Dr. Sherry Marts this year)
- They also approved an IRB-approved study of unwelcome behaviors.
- We sent out surveys to 5,116 unique addresses and received 882 responses.

Methods

- Study was approved by an institutional review board (UTK IRB-18-04442-XM)
- Invitations to the survey were sent to all 5,116 unique email addresses aggregated from membership and meeting attendee information from all three societies.
- Only those receiving the invitation directly were allowed to fill out the survey
- Survey responses were analyzed in R, using the packages drake, googledrive, knitr, plotly, ggplot2, plyr, Hmisc, superheat, RColorBrewer, gridExtra, xlsx, and kableExtra, as well as 42 functions in over 500 lines of code.
- Confidence intervals were calculated using Hmisc::binconf() with an alpha of 0.05.

Results

intervene

- Overall, 10% of Evolution respondents report being belittled, 6% were made to feel unwelcome, 2% report report being bullied, discriminated against, or harassed, and 1% report being assaulted.
- A total of 7 respondents reported assault; note that these assaults may have happened at the Evolution meeting over a multi-year span
- Individuals at higher risk: 18% of undergraduates attending a meeting report being harassed and/or assaulted, and the proportion of women experiencing unwelcome behavior is three times that of men at Evolution.
- Our members adjust their behavior base on this unwelcome behavior. 21% of women think about their personal safety more as a result of past experiences at Evolution (for men 1%)
 Across all members surveyed, 16% look for opportunities to

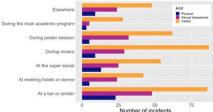


Figure 1: Location of unwelcome behaviors: number of responses for each. Physical harassment or assault is most common at local bars or similar and at the meeting-sponsored super social, even though these make up far less time than the main academic program.

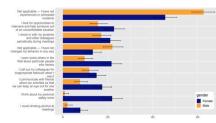


Figure 2: Percentage of individuals changing their behavior in response to past incidents at Evolution.

Topics for Discussion

- Harassment, assault, and other unwelcome behaviors are present at the Evolution meetings.
- Women, people from underrepresented ethnicities, and undergraduates, are far more likely to experience this than members of other groups.
- One unexpected finding is that LGBTQA+ individuals, while experiencing unwelcome behavior at an elevated rate, attribute this more to sex/gender or age than to their sexual orientation.
- Unwelcome behavior based on age was remarkably high across all groups.

One caveat is that we did not ask about all possible traits: the fact that overall there is not much perceived unwelcome behavior based on religion or disability, for example, does not mean it does not exist. It is possible that people with a particular religion or disability experience unwelcome behavior at a very high rate, but make up only a small component of the population, and so this signal cannot be detected using these data.

References

after-harassment-finding

- Balter, M. 2016. "From Texas to the Smithsonian, following a trail of sexual misconduct." https://www.theverge.com/2016/10/24/13359794/smithsonian-sexual-misconductinvestigation-miquel-pinto
- Break and Stand Stand
- Wolfen, Sulfier, Sunder, and Consequences in Reademic Sciences, Engineering, and Medicine. Washington, DC: The National Academics Press.
 Waldman, M. 2018. "Prominent geneticist out at UC Irvine after harassment finding. Science https://www.sciencemag.org/news/2018/06/prominent-geneticist-out-civine

Table 1: Survey responses and results. The first first two columns after "Number of people responding" reflect reported incidence of harassment or assault, percentage (lower, upper), in biology in general and at the Evolution meetings, respectively; the last column shows reports of any unvelcome behavior at the Evolution meetings. Note the large proportion of undergraduates experiencing harassment and assault at the meeting. For clarity, cells with a rounded average of zero were left blank.

Category	Selection	Number of people responding	Biology: Harassment/Assault	Evolution meetings: Harassment/Assault	Evolution meetings: Unwelcome behavio
All	All	882	15 (13, 17)%	3 (2, 4)%	14 (12, 17)%
	Straight or heterosexual	622	16 (14, 19)%	3 (2, 5)%	16 (13, 19)%
Orientation	Gay, lesbian, bisexual, pansexual, or asexual	68	29 (20, 41)%	4 (2, 12)%	26 (17, 38)%
	Female	360	28 (24, 33)%	5 (3, 8)%	25 (21, 30)%
	Male	340	6 (4, 9)%	1 (0, 3)%	8 (6, 11)%
Gender	Non-binary, fluid, neutral, or non- conforming	6	17 (1, 56)%		17 (1, 56)%
	White, non-Hispanic	564	16 (13, 20)%	3 (2, 5)%	16 (13, 20)%
Ethnicity	Other than White, non- Hispanic	77	22 (14, 33)%	3 (1, 9)%	23 (15, 34)%
	Undergraduate	11	36 (15, 65)%	18 (5, 48)%	27 (10, 57)%
	Graduate student	165	16 (11, 23)%	4 (2, 8)%	14 (9, 20)%
	Postdoc	160	16 (11, 23)%	3 (1, 7)%	19 (13, 26)%
	Pre-tenure faculty	101	19 (12, 28)%	4 (2, 10)%	24 (17, 33)%
Career stage	Non-tenure track faculty	33	12 (5, 27)%		15 (7, 31)%
	Tenured faculty	218	19 (14, 25)%	1 (0, 4)%	15 (11, 20)%
	Non-academic professional	11			18 (5, 48)%
	Academic professional	21	14 (5, 35)%		5 (0, 23)%

Table 2: Individual's perceptions of why they were targeted, percentage (lower, upper). Individual's are not part of any one category, and there can be interaction terms (someone presenting a gender that suffers discrimination, and an ethnicity that suffers discrimination, may suffer far more discrimination than someone in just one of these categories - this is also known as intersectionality). For example, women were eight times more likely to receive unwelcome behavior as a result of physical traits than men were. For clarity, cells with a rounded average of zero were left blank.

Category	Selection	Sex or gender	Sexual orientation	Age	Race ethnicity nationality	Physical traits	Real or perceived disability	Religion	Other
All	All	11 (9, 14)%		8 (6, 10)%	2 (2, 4)%	4 (2, 5)%		1 (0, 1)%	3 (2, 5)%
	Straight or heterosexual	13 (11, 16)%		9 (7, 11)%	3 (2, 5)%	4 (3, 6)%		1 (0, 2)%	4 (2, 5)%
Orientation	Gay, lesbian, bisexual, pansexual, or asexual	21 (13, 32)%	4 (2, 12)%	19 (12, 30)%	1 (0, 8)%	6 (2, 14)%	1 (0, 8)%		6 (2, 14)%
	Female	25 (21, 30)%	1 (0, 2)%	16 (13, 20)%	3 (2, 5)%	8 (5, 11)%	1 (0, 2)%		4 (2, 6)%
Gender	Male	1 (0, 3)%		3 (1, 5)%	3 (2, 5)%	1 (0, 3)%		1 (0, 3)%	4 (2, 6)%
Gender	Non-binary, fluid, neutral, or non-conforming	17 (1, 56)%		17 (1, 56)%					
	White, non-Hispanic	15 (12, 18)%	1 (0, 2)%	10 (8, 13)%		4 (3, 6)%		0 (0, 1)%	4 (2, 5)%
Ethnicity	Other than White, non- Hispanic	16 (9, 25)%			17 (10, 27)%	6 (3, 14)%	1 (0, 7)%	1 (0, 7)%	5 (2, 13)9
	Undergraduate	18 (5, 48)%		18 (5, 48)%		9 (0, 38)%			
	Graduate student	15 (10, 21)%	1 (0, 4)%		4 (2, 8)%	3 (1, 7)%			1 (0, 3)%
	Postdoc	14 (9, 20)%			2 (1, 6)%	6 (3, 10)%	1 (0, 3)%		5 (3, 10)9
	Pre-tenure faculty	18 (12, 26)%	1 (0, 5)%	11 (6, 18)%	4 (2, 10)%	7 (3, 14)%		2 (1, 7)%	9 (5, 16)9
Career stage	Non-tenure track faculty	6 (2, 20)%		3 (0, 15)%	3 (0, 15)%	3 (0, 15)%	3 (0, 15)%		9 (3, 24)9
	Tenured faculty	11 (8, 16)%		8 (5, 13)%	1 (0, 4)%	3 (1, 6)%		1 (0, 3)%	3 (1, 6)%
	Non-academic professional	18 (5, 48)%		18 (5, 48)%		9 (0, 38)%			
	Academic professional	10 (3, 29)%			5 (0, 23)%			5 (0, 23)%	

Category	Selection	Number of people responding	0,	9	Evolution meetings: Unwelcome behavior
All	All	882	15 (13, 17)%	3 (2, 4)%	14 (12, 17)%

Category	Selection	Number of people responding	Biology: Harassment/Assault	•	Evolution meetings: Unwelcome behavior
	Straight or heterosexual	622	16 (14, 19)%	3 (2, 5)%	16 (13, 19)%
Orientation	Gay, lesbian, bisexual, pansexual, or asexual	68	29 (20, 41)%	4 (2, 12)%	26 (17, 38)%

Category	Selection	Number of people responding	Biology: Harassment/Assault	Evolution meetings: Harassment/Assault	Evolution meetings: Unwelcome behavior
	Female	360	28 (24, 33)%	5 (3, 8)%	25 (21, 30)%
	Male	340	6 (4, 9)%	1 (0, 3)%	8 (6, 11)%
Gender	Non-binary, fluid, neutral, or non-	6	17 (1, 56)%		17 (1, 56)%

Category	Selection	Number of people responding	Biology: Harassment/Assault	Evolution meetings: Harassment/Assault	Evolution meetings: Unwelcome behavior
	White, non-Hispanic	564	16 (13, 20)%	3 (2, 5)%	16 (13, 20)%
Ethnicity	Other than White, non- Hispanic	77	22 (14, 33)%	3 (1, 9)%	23 (15, 34)%

Table 1: Survey responses and results. The first first two columns after "Number of people responding" reflect reported incidence of harassment or assault, percentage (lower, upper), in biology in general and at the Evolution meetings, respectively; the last column shows reports of any unwelcome behavior at the Evolution meetings. Note the large proportion of undergraduates experiencing harassment and assault at the meeting. For clarity, cells with a rounded average of zero were left blank.

Category	Selection	Number of people responding	Biology: Harassment/Assault	Evolution meetings: Harassment/Assault	Evolution meetings: Unwelcome behavior
	Undergraduate	11	36 (15, 65)%	18 (5, 48)%	27 (10, 57)%
	Undergraduate Graduate student	11 165	36 (15, 65)% 16 (11, 23)%	18 (5, 48)% 4 (2, 8)%	27 (10, 57)% 14 (9, 20)%
	-		<mark>36 (15, 65)%</mark> 16 (11, 23)% 16 (11, 23)%	18 (5, 48)% 4 (2, 8)% 3 (1, 7)%	27 (10, 57)% 14 (9, 20)% 19 (13, 26)%
	Graduate student	165	16 (11, 23)%	4 (2, 8)%	14 (9, 20)%
Career stage	Graduate student Postdoc	165 160	16 (11, 23)% 16 (11, 23)%	4 (2, 8)% 3 (1, 7)%	14 (9, 20)% 19 (13, 26)%
Career stage	Graduate student Postdoc Pre-tenure faculty	165 160 101	16 (11, 23)% 16 (11, 23)% 19 (12, 28)%	4 (2, 8)% 3 (1, 7)%	14 (9, 20)% 19 (13, 26)% 24 (17, 33)%
Career stage	Graduate student Postdoc Pre-tenure faculty Non-tenure track faculty	165 160 101 33	16 (11, 23)% 16 (11, 23)% 19 (12, 28)% 12 (5, 27)%	4 (2, 8)% 3 (1, 7)% 4 (2, 10)%	14 (9, 20)% 19 (13, 26)% 24 (17, 33)% 15 (7, 31)%

Table 1: Survey responses and results. The first first two columns after "Number of people responding" reflect reported incidence of harassment or assault, percentage (lower, upper), in biology in general and at the Evolution meetings, respectively; the last column shows reports of any unwelcome behavior at the Evolution meetings. Note the large proportion of undergraduates experiencing harassment and assault at the meeting. For clarity, cells with a rounded average of zero were left blank.

Category	Selection	Number of people responding	Biology: Harassment/Assault	Evolution meetings: Harassment/Assault	Evolution meetings: Unwelcome behavior
All	All	882	15 (13, 17)%	3 (2, 4)%	14 (12, 17)%
	Straight or heterosexual	622	16 (14, 19)%	3 (2, 5)%	16 (13, 19)%
Orientation	Gay, lesbian, bisexual, pansexual, or asexual	68	29 (20, 41)%	4 (2, 12)%	26 (17, 38)%
	Female	360	28 (24, 33)%	5 (3, 8)%	25 (21, 30)%
	Male	340	6 (4, 9)%	1 (0, 3)%	8 (6, 11)%
Gender	Non-binary, fluid, neutral, or non- conforming	6	17 (1, 56)%		17 (1, 56)%
	White, non-Hispanic	564	16 (13, 20)%	3 (2, 5)%	16 (13, 20)%
Ethnicity	Other than White, non- Hispanic	77	22 (14, 33)%	3 (1, 9)%	23 (15, 34)%
	Undergraduate	11	36 (15, 65)%	18 (5, 48)%	27 (10, 57)%
	Graduate student	165	16 (11, 23)%	4 (2, 8)%	14 (9, 20)%
	Postdoc	160	16 (11, 23)%	3 (1, 7)%	19 (13, 26)%
	Pre-tenure faculty	101	19 (12, 28)%	4 (2, 10)%	24 (17, 33)%
Career stage	Non-tenure track faculty	33	12 (5, 27)%		15 (7, 31)%
	Tenured faculty	218	19 (14, 25)%	1 (0, 4)%	15 (11, 20)%
	Non-academic professional	11			18 (5, 48)%
	Academic professional	21	14 (5, 35)%		5 (0, 23)%

Model 1: Treatment ~ 1

Model 2: Treatment ~ Merit

Model 3: Treatment ~ Gender + Disability +
First language + Career stage + Sexual
orientation + Ethnicity + ... +
Gender*Disability + Gender*First language +

• • •



2019 Evolution Meetings Code of Conduct Transparency Report Tri-Societies Code of Conduct Committee: Brian O'Meara & Kelly Zamudio (COD) Wang & Sharon Strauss (ASN), Jodie Winging & A

Every year, i incidents, co confidentiality respondents community wi process, if sur

> At Evolution 20 Safety Officer, sanctioning con to help with bys

Summary of re

Dr. Marts receiv incidents were remonth after the reincidents were at Anyone reporting submitted reports three cases, the tarecommendations incident was not bwas consulted. In a credible complaints sanctioning commit

> Reports of attendee sessions, one durint included at least two included discriminati not just Evo Allies) w

Code of Conduct Enforcement Report Evolution 2021 This was drafted by Brian O'Meara and Andrea Case extracting and summarizing from a more detailed report by Paula Brantner, Meeting Safety Officer. In past meetings we have had an Evo Allies program. We instead created a more focused "Conduct moderators" role for Virtual Evolution 2021 to help create a positive climate in online discussions and other activities. Meeting attendees who wished to serve as Conduct Moderators (CMs) during the Evolution Training of Safe Evolution Conduct Moderators weeting attendees who wished to serve as Conduct woderators (Civis) during the Evolution 2021 Virtual Meeting were asked to fill out a vetting form to determine whether there were any red flags related to their suitability for the task. Approximately 40 potential CMs volunteered and reu mays related to men sumaning for me task. Approximately 40 potential Citis volumeered a passed the initial vetting, reviewed by Paula Brantner and Sherry Marts (the former meeting safety officer who worked with Paula on the transition to the role.) Sherry conducted three Salety unicet who worked with Faula on the transition to the role.) Sherry conducted three 90-minute online trainings held on June 14-16, 202, covering how to spot and intervene when berlinning uning unings there on sume 14-10, 202, covering now to spot and intervene when harassment is observed or reported, and including breakout sessions with roleplay exercises to Participants were also provided with a Conduct Moderator Handbook to be used as a key refluctively were also provided with a conduct woderator Handbook to be used as a key resource. CMs were also invited to a private Slack channel where they could communicate about problems or ask questions, and were identified with a Conduct Moderator badge in the about problems of ask questions, and were identified with a Conduct woderator badge in the meeting profile. CMs were urged to sign up for multiple shifts to provide coverage at as many indexing prome. Civis were urged to sign up for multiple simils to provide coverage at as many individual sessions as possible, with special attention to identity group mixers, and it appeare Paula Brantner was available for most of the meeting; for a period when she would be trave that a vast majority of the sessions had CM coverage. trauia branuler was available for most of the meeting, for a period when she would be trave the past safety officer, Sherry Marts, took over the role but no incidents occurred during the There were three reported incidents; slack, twitter, and other channels were monitored d period.

Safe Evolution Transparency Report Submitted by the Evolution Meetings Code of Conduct committee: Andrea Case (chair), Brian O'Meara, Sharon Strauss, Jodie Wiggins, Kelly Zamudio The societies sponsoring the 2017 Evolution meeting in Portland and the 2018 Evolution Congress in Montpellier required all conference participants to agree to a meeting Code of Conduct. This transparency report serves to inform attendees and society members about reported incidents, general outcomes of those reports, and steps taken by the societies to further prevent inappropriate behavior at our meetings.

Code of Conduct Transparency Report Evolution 2022

This was drafted by Brian O'Meara and Andrea Case based on information from Kerrell Dunsmore, our safety officer.

For the virtual meetings, there were conduct moderators in every session (often doubling as session moderators) to help handle any issues (such as "Zoom bombing," though the meeting used XCD's proprietary system) as well as make reports. There was an on-site safety officer (Kerrell Dunsmore) for the in-person meeting, and she was also on call to handle issues in the online meeting.

Covid Safety

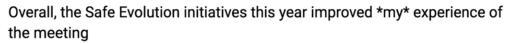
In order to reduce risks, all in-person meeting participants were required to provide proof of vaccination at the time of registration. All attendees were required to wear masks inside the convention center, with the exception of a dedicated room for coffee and for the speaker in large ballrooms.

While anyone could make reports about lack of compliance, we created a dedicated form so that Evo Allies, who have been trained to help create a safe environment, could report and also learn about repeat offenders (who would have been asked to leave). There were a handful of times people needed to be reminded but no actionable reports.

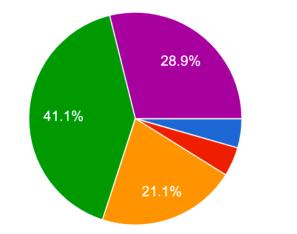
As a financial incentive for people who got covid to report this and choose not to attend (attending with active covid was also against the code of conduct), there was pro-rated reimbursement for registration costs for attendees who reported becoming positive for covid. This was used by multiple individuals.

Other Incidents

There were no actionable reports of potential misconduct to investigate at the virtual or at the in-person meeting. We also did not hear of any non-actionable reports (to be actionable, a report must not be made anonymously, but in past years there have been rumors of incidents on social media or similar that could indicate general issues).

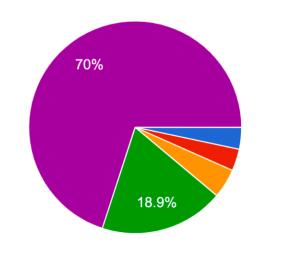


90 responses

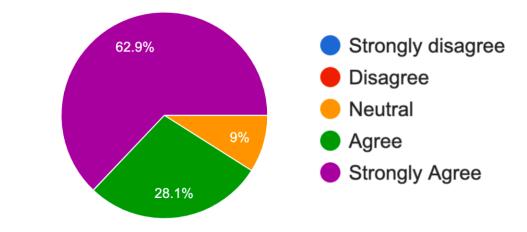


Overall, the Safe Evolution initiatives this year were something I was happy to see at the meeting

90 responses

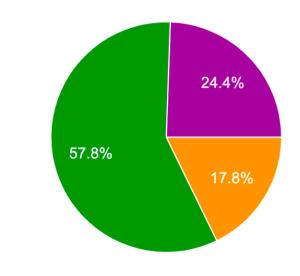


Evo Allies were visible throughout the meeting, including off site 89 responses



Reporting procedures were clear

90 responses



2019 survey results

Andrea Case



Code of Conduct:

- Conduct at meetings or other events
- Opted into each time someone registers

 Table 1: Survey responses and results. The first first two columns after "Number of people responding" reflect reported incidence of harassment or assault, percentage (lower, upper), in biology in general and at the Evolution meetings, respectively; the last column shows reports of any unwelcome behavior at the Evolution meetings. Note the large proportion of undergraduates experiencing harassment and assault at the meeting. For clarity, cells with a rounded average of zero were left blank.

Category	Selection	Number of people responding	Biology: Harassment/Assault		
All	All	882	15 (13, 17)%	3 (2, 4)%	
	Straight or heterosexual	622	16 (14, 19)%	3 (2, 5)%	
Orientation	Gay, lesbian, bisexual, pansexual, or asexual	68	29 (20, 41)%		
	Female	360	28 (24, 33)%	5 (3, 8)%	
	Male	340	6 (4, 9)%		
Gender	Non-binary, fluid, neutral, or non- conforming	6	17 (1, 56)%		
	White, non-Hispanic	564	16 (13, 20)%	3 (2, 5)%	
Ethnicity	Other than White, non- Hispanic	77	22 (14, 33)%		
	Undergraduate	11	36 (15, 65)%	18 (5, 48)%	
	Graduate student	165	16 (11, 23)%		
	Postdoc	160	16 (11, 23)%		
	Pre-tenure faculty	101	19 (12, 28)%		
Career stage	Non-tenure track faculty	33	12 (5, 27)%		
	Tenured faculty	218	19 (14, 25)%		
	Non-academic professional	11			
	Academic professional	21	14 (5, 35)%		

How can SSB best serve its members?

The percentage of respondents that identified the following strategies as necessary to address DEI among members and the percentage of respondents that believe SSB has already implemented them (top 8 shown):

Create formal policies around how to handle harassment/discrit 45%	mination	80%
Ensure all conferences are accessible for all participants 33%		76%
Invite diverse speakers at conferences, etc. 41%		75%
Create opportunities for historically excluded groups to serve in 16%	SSB leadership 65%	
Incorporate DEI into key strategic initiatives 24%	60%	
Implement a formal DEI strategy throughout the organization 22%	60%	
Implement tactics to increase council member diversity 20%	57%	
Address the history of scientific racism in EEB	57%	
Already Implemented Society "Must Have"		

2021 Climate Survey Results Summary

Code of Conduct:

- Conduct at meetings or other events
- Opted into each time someone registers

view	Michael James Clay	Brigham Young University	Faculty	Associate Professor	Social and Behavioral Sciences	Criminal Plea / Conviction	Resolved	2020	May 19, 2023
						No Longer Employed (includes Fired and Contract Non- renewal)			
view	Justin X. Carroll	Washington University – St. Louis	Administrator	Athletic Director, Dean		Criminal Plea / Conviction	Resolved	2019	Dec 13, 2022
						No Longer Employed (includes Fired and Contract Non- renewal)			
view	Paul Pavlich	Southern Oregon University	Faculty	Emeritus Professor	Social and Behavioral Sciences	Criminal Plea / Conviction	Resolved	2022	Dec 8, 2022

Libarkin Academic Sexual Misconduct Database

OPEN O ACCESS Freely available online

PLOS ONE

Survey of Academic Field Experiences (SAFE): Trainees Report Harassment and Assault

Kathryn B. H. Clancy¹*, Robin G. Nelson², Julienne N. Rutherford³, Katie Hinde⁴

1 University of Illinois, Urbana-Champaign, Department of Anthropology, Urbana, Illinois, United States of America, **2** Skidmore College, Department of Anthropology, Saratoga Springs, New York, United States of America, **3** University of Illinois, Chicago, Department of Women, Children, and Family Health Science, Chicago, Illinois, United States of America, **4** Harvard University, Department of Human Evolutionary Biology, Cambridge, Massachusetts, United States of America

Abstract

Little is known about the climate of the scientific fieldwork setting as it relates to gendered experiences, sexual harassment, and sexual assault. We conducted an internet-based survey of field scientists (N = 666) to characterize these experiences. Codes of conduct and sexual harassment policies were not regularly encountered by respondents, while harassment and assault were commonly experienced by respondents during trainee career stages. Women trainees were the primary argets; their perpetrators were predominantly senior to them professionally within the research team. Male trainees were more often targeted by their peers at the research site. Few respondents were aware of mechanisms to report incidents; most who did report were unsatisfied with the outcome. These findings suggest that policies emphasizing safety, inclusivity, and collegiality have the potential to improve field experiences of a diversity of researchers, especially during early career stages. These include better awareness of mechanisms for direct and oblique reporting of harassment and assault and, the implementation of productive response mechanisms when such behaviors are reported. Principal investigators are particularly well positioned to influence workplace culture at their field sites.

Clancy, Nelson, Rutherford, & Hinde 2014







Until now, our professional societies have operated with an uncodified understanding of professional and ethical conduct.

The problem with unstated rules is that different people can have a different understanding of what is appropriate.

https://www.evolutioncodeofethics.org/

Situation	Serve as society president?	Be editor of a journal?	Considered for an award?
Publicly fired for harassment	?	?	;
Resigned after allegations of smuggling specimens	?	?	?
Rumored to have punched a student	5	?	?

What information will be used in making this determination, what will the process be, and who has the authority to make a decision?







Part I: Statement of beliefs

Part II: Effective, fair enforcement

https://www.evolutioncodeofethics.org/

Anonymous



You've gone	Incognito
Now you can browse privately, and other people w However, downloads, bookmarks and reading list i	
Chrome won't save the following information: • Your browsing history • Cookies and site data • Information entered in forms	Your activity might still be visible to: • Websites you visit • Your employer or school • Your internet service provider
Block third-party cookies	

Block third-party cookies When on, sites can't use cookies that track you across the web. Features on some elses may break.

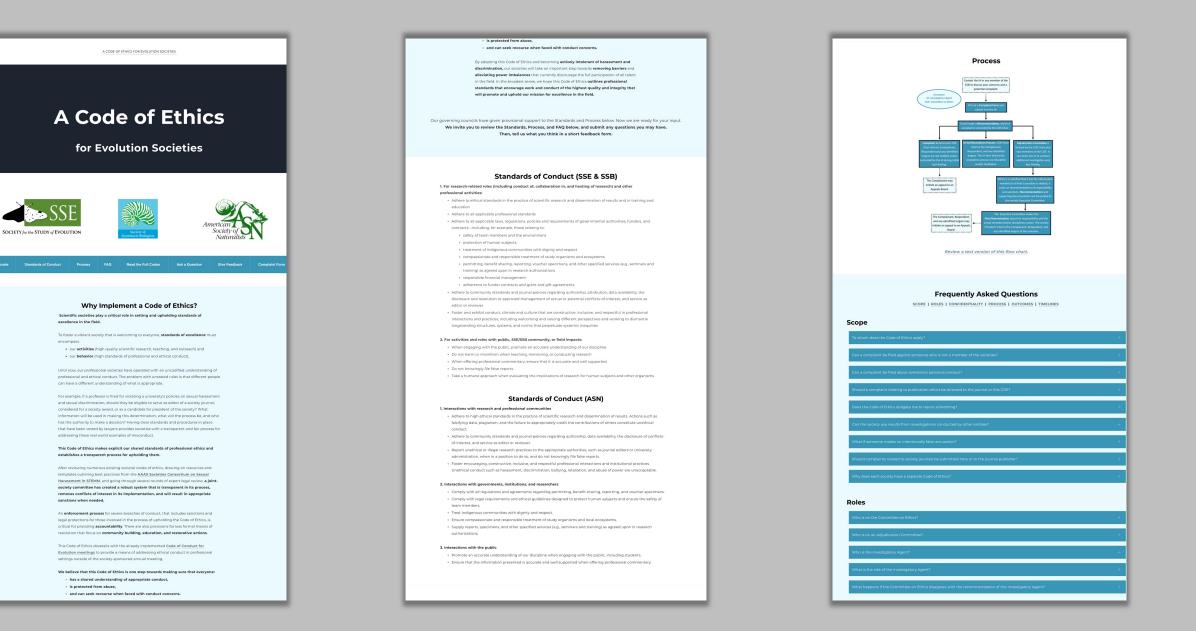
Confidential



Not actionable

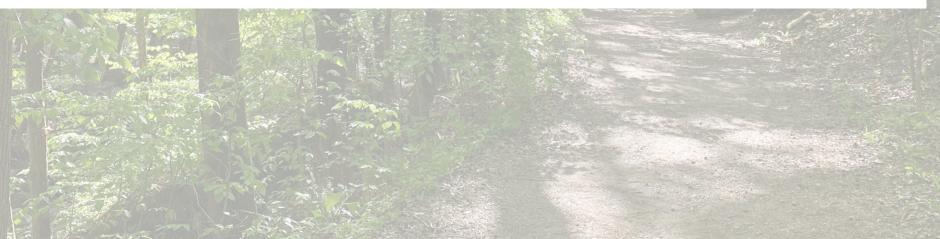
Can be investigated

https://www.evolutioncodeofethics.org/

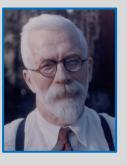


Naming

- Snail darter vs the dam
- Calling out **misconduct**
 - Eponyms in our field
 - Eugenics and our role in it



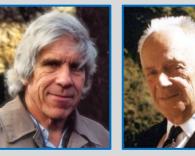
























Person	Society	Current	Born
Ernst Mayr	SSB	Y	US
Ronald Fisher	SSE	Ν	Britain
Stephen Jay Gould	SSE	Y	US
Richard Lewontin	SSE	Y	US
Thomas Henry Huxley	SSE	Y	Britain
WD Hamilton	SSE	Y	Egypt
Theodosius Dobzhansky	SSE	Y	Ukraine
Rosemary Grant	SSE	Y	Britain
Sewall Wright	ASN	Ν	US
EO Wilson	ASN	Ν	US
Jasper Loftus-Hills	ASN	Ν	Australia
Ruth Patrick	ASN	Ν	US
Julia Platt	ASN	Ν	US
Ed Ricketts	ASN	Ν	US
Don Abbott	ASN	Ν	US

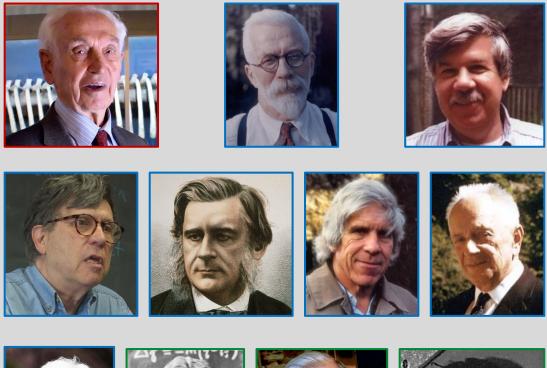






"Professional associations should scrutinize named awards as organizational artifacts that can suggest group dominance of gender or race and explore possibilities of changing named awards, adding additional named recognition, or adopting policies to revisit named awards after a certain period."

Bazner et al. (2021)



Gould: "I am, somehow, less interested in the weight and convolutions of Einstein's brain than in the near certainty that people of equal talent have lived and died in cotton fields and sweatshops."









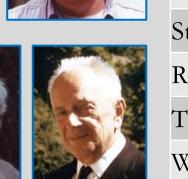






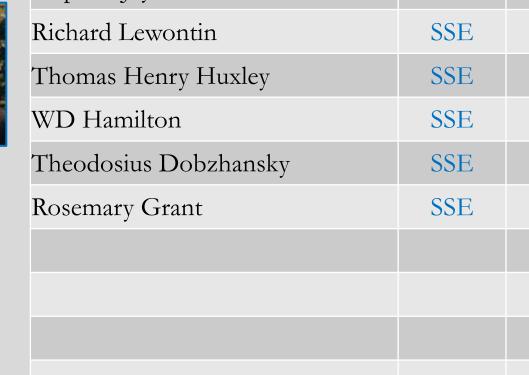






P

Е





erson	Society	Current	Born
Ernst Mayr	SSB	Y	US
tephen Jay Gould	SSE	Y	US
Cichard Lewontin	SSE	Y	US
Thomas Henry Huxley	SSE	Y	Britain
VD Hamilton	SSE	Y	Egypt
Theodosius Dobzhansky	SSE	Y	Ukraine
Rosemary Grant	SSE	Y	Britain

Follow us! 😏 🕇 📷 Search

ρ

The Society of Systematic Biologists

HOME MEMBERSHIP ABOUT MEETINGS JOURNALS AWARDS CONTACT

SSB Council Review of the Mayr Award and Award Names

In the summer of 2020, the SSB Council began a discussion about potentially renaming the Ernst Mayr Award in Systematic Biology at the request of society members. Since then, the SSB leadership have been working in conjunction with the Diversity, Equity, and Inclusion (DEI) Committee to learn more about the origin of named awards and their representation of the diverse membership within the society. Renaming the award is one step toward greater inclusivity within the society, as named awards often lead to feelings of exclusion among those who are members of underrepresented groups whose scientific contributions continue to remain unrecognized. At a council meeting following Virtual Evolution 2021, the Council voted to propose to all members an award name change, in conjunction with other actions intended to better recognize SSB's history and legacy.

The SSB Council proposes to rename the Ernst Mayr Award in Systematic Biology to the Outstanding Student Presentation Award in Systematic Biology. Our scientific community is more diverse than the cohort of early scientists with recognized contributions to systematics and science generally. Many current members do not see themselves reflected in awards that bear the names of these early scientists and can feel excluded as potential recipients as a result. In a field whose composition still does not reflect global human diversity, having an award named after a particular individual reinforces that members with other identities are outsiders. By proposing this name change, we hope to address this specific barrier to making our society more inclusive and welcoming. We, the SSB council, are made up of a diverse group of people who don't all view Mayr in the same light. This proposal is not intended to cast judgement on the legacy of Ernst Mayr, who was a prolific and profound scholar of evolutionary biology and a dedicated champion of students, nor are we intending to defend the contents of his writings which some find problematic. We are grateful for Mayr's generous gifts to our society, which created the endowment that allows us to support student research today.

The Council sees preservation of the society's history and increasing diversity, equity and inclusion as synergistic endeavors toward the improvement of our community. The proposed change continues our history of becoming more inclusive over time: for example, in the 1990s we changed from the Society for Systematic Zoology to the Society of Systematic Biologists (and changed the journal name as well) to welcome members of our community who do not study animals. Thus, SSB President Laura Kubatko has acted on the recommendation of the DEI Committee to form a new committee, the <u>SSB Legacy Committee</u>, that will be tasked with creating accessible content about our society's history (e.g., as a section on our website). The formation of this committee is intended as a way to acknowledge the contributions of past members to the existence of the society and to the field broadly. In this way, the legacy of the society may be understood by our membership more comprehensively than is possible through named awards, and we have the opportunity to celebrate the many people of various backgrounds who have made systematic is lology what it is today.

Because the award is named in our <u>Constitution</u>, the name can only be changed by a formal amendment to the Constitution. Following the procedure outlined in our Constitution, the SSB Council thus voted in August 2021 to propose an Amendment to the Constitution to be submitted to the SSB Membership for a vote. The Constitution specifies that the proposed Amendment will pass if at least 2/3 of the members vote in favor. This issue will be presented to the membership on the Spring 2022 ballot. The proposed amendment is shown below.

Proposed amendment

Original text:

1) The Ernst Mayr Award in Systematic Biology given for the outstanding paper presented at the Annual Meeting by a student member of the Society or a member who has received the Ph.D. degree within the last 15 months;

New text:

1) The Outstanding Student Presentation Award in Systematic Biology given for the outstanding paper presented at the Annual Meeting by a student member of the Society or a member who has received the Ph.D. degree within the last 15 months; "In a field whose composition still does not reflect global human diversity, having an award named after a particular individual reinforces that members with other identities are outsiders. By proposing this name change, we hope to address this specific barrier to making our society more inclusive and welcoming. We, the SSB council, are made up of a diverse group of people who don't all view Mayr in the same light. This proposal is not intended to cast judgement on the legacy of Ernst Mayr, who was a prolific and profound scholar of evolutionary biology and a dedicated champion of students, nor are we intending to defend the contents of his writings which some find problematic. We are grateful for Mayr's generous gifts to our society, which created the endowment that allows us to support student research today."

https://www.systbio.org/award-naming.html

Follow us! 🕑 🕇 🚵 Search

The Society of Systematic Biologists

Award Naming Discussion

The leadership and many members of SSB are disturbed by the vicious nature of some of the responses to the proposed award name change. It is possible to argue against a name change without, for instance, asserting ignorance of 'younger members', singling out individual members of our Society, or disparaging others based on racial or gender identity. As SSB leadership, we uniformly condemn such comments, which undermine the goal of making our Society inclusive and welcoming. We urge members who are negating in this harmful and negative behavior to stop.

As referred to in our previous communications, the award name change is motivated by good governance, practices of avoiding named awards, especially due to the naming's real exclusionary effect for people from historically excluded groups (see for instance, Pourret et al. (2021) and Bazner et al. (2020). In SSB's case, there is only one named award, but the council would have proposed the same action if we had dozens of named awards.

Knowing the affection many of our members have for the namesake of the Mayr award, and how in other societies awards have been renamed due to problematic namesakes, we mentioned Mayr in the statement to explain that this change was not about him per se. As stated above, our decision to move forward with the proposal of a change in the name of the award is based on named awards in general, rather than on any specific characteristics of Mayr himself.

Moving forward, we insist that any debate among SSB members be conducted with mutual respect and with the goal of reaching outcomes that will uphold the principles of the Society. We know this is challenging when opinions are strong, or when core aspects of identity and a diversity of lived experiences are being considered. There is a lot of hard work to do to improve SSB and the broader scientific community, beyond addressing named awards. We, therefore, hope that individuals will conduct themselves with kindness and sensitivity, and engage in further work to ensure that SSB and systematic biology become more diverse, equitable, and inclusive.

Signed

Brian O'Meara SSB President president@systematicbiologists.org

Laura Kubatko SSB Past-President past.president@systematicbiologists.org

David Baum SSB President-Elect president.elect@systematicbiologists.org

References and Further Information

Original statement explaining the proposal: https://www.systbio.org/award-naming.html

SSB Legacy Committee: https://www.systbio.org/legacy-committe.html

Bazner, K.J., J. Vaid, and C.A. Stanley. 2020. "Who is meritorious? Gendered and racialized discourse in named award descriptions in professional societies of higher education" Journal of Qualitative Studies in Education 34(2): 108-124. https://doi.org/10.1080/09518398.2020.1735559

Pourte, O., P. Anand, S. Andt, P. Bots, A. Dosseto, Z. Li, J.M. Carbonne, J. Middleton, B. Ngwenya, and A. J.V. Riches. 2021. "Diversity, equily, and inclusion: Tackling underrepresentation and recognition of talents in geochemistry and cosmochemistry" Geochimica et Cosmochimica Acta. 310: 363-371. https://doi.org/10.1016/j.gca.2021.05.054

For more on the early history of this award: Funk, V.A. and D. Cannatella. 1999. "The Society of Systematic Biologists' Awards in Systematics" Systematic Biology 48(4): 832-837. https://www.jstor.org/stable/2585349

For more on the early history of the Society of Systematic Biologists (in chronological order)

Savage, J.M. 2001. "Remembrances and Reflections: Early Days of the Society of Systematic Zoology" Systematic Biology 50(1): 4-6. https://doi.org/10.1080/10635150117515

Funk, V.A. 2001. "SSZ 1970–1989: A View of the Years of Conflict" Systematic Biology 50(2): 153-155. https://academic.oup.com/sysbio/article/50/2/153/1698252

Hillis, D.M. 2001. "The Emergence of Systematic Biology" Systematic Biology 50(3): 301-303. https://doi.org/10.1080/106351501300317923

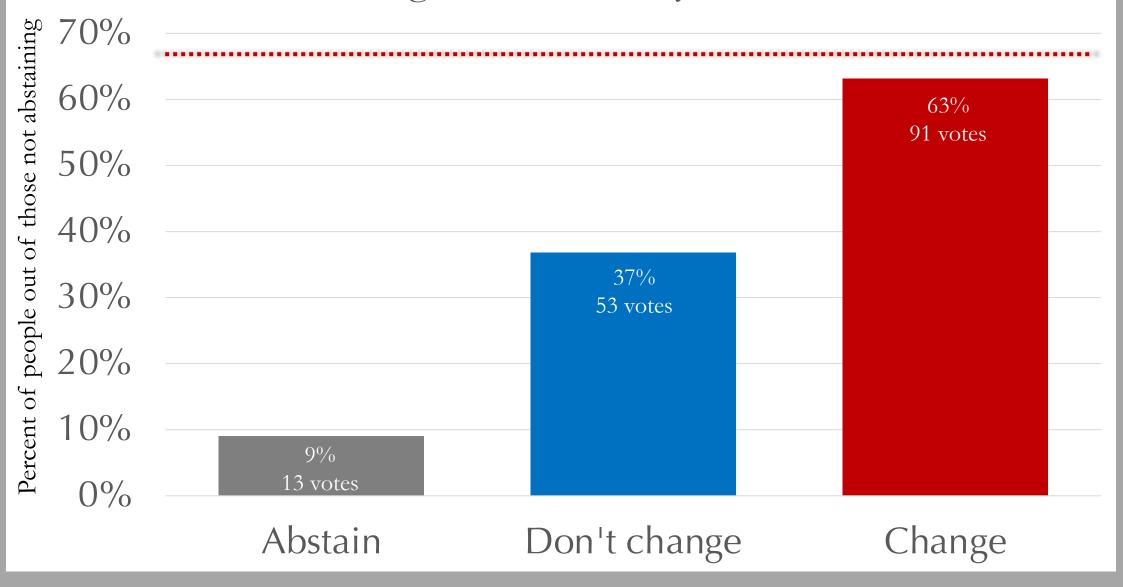
Felsenstein, J. 2001. "The Troubled Growth of Statistical Phylogenetics" Systematic Biology 50(4): 465-467. https://doi.org/10.1080/10635150119297

Donoghue, M.J. 2001. "A Wish List for Systematic Biology" Systematic Biology 50(6): 755-757. https://doi.org/10.1080/106351501753462795

The leadership and many members of SSB are disturbed by the vicious nature of some of the responses to the proposed award name change. It is possible to argue against a name change without, for instance, asserting ignorance of "younger members", singling out individual members of our Society, or disparaging others based on racial or gender identity. As SSB leadership, we uniformly condemn such comments, which undermine the goal of making our Society inclusive and welcoming. We urge members who are engaging in this harmful and negative behavior to stop.

https://www.systbio.org/award-naming-discussion.html

Change name of Mayr Award?



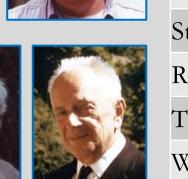






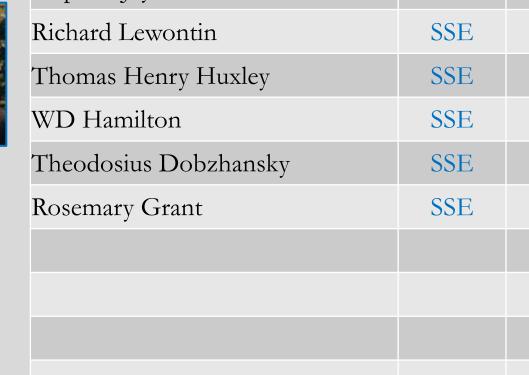






P

Е





erson	Society	Current	Born
Ernst Mayr	SSB	Y	US
tephen Jay Gould	SSE	Y	US
Cichard Lewontin	SSE	Y	US
Thomas Henry Huxley	SSE	Y	Britain
VD Hamilton	SSE	Y	Egypt
Theodosius Dobzhansky	SSE	Y	Ukraine
Rosemary Grant	SSE	Y	Britain

Naming

- Snail darter vs the dam
- Calling out **misconduct**
- Eponyms in our field
- Eugenics and our role in it



"The US eugenics movement began to lose power in the 1940s and was completely discredited following the horrors of Nazi Germany." Bouche & Rivard (2014)

FNIC

OVERNORS

"The scientific reputation of eugenics started to decline in the 1930s, a time when Ernst Rüdin used eugenics as a justification for the racial policies of Nazi Germany.... By the end of World War II, many eugenics laws were abandoned, having become associated with Nazi Germany." <u>https://en.wikipedia.org/wiki/Eugenics</u>

Belief

Those people encouraged eugenics

Eugenics ended in the US after WWII

It's over now, at least

EUGENICOR	
Belief	Reality
<i>Those</i> people encouraged eugenics	OUR scientific community encouraged eugenics
Eugenics ended in the US after WWII	It kept going on long after the war
It's over now, at least	It continues to have support, though people often try to dissociate it from its history by omitting the name

- 1883: Galton coins the term eugenics
- 1896: Connecticut bans marriage by anyone "epileptic, imbecile or feeble-minded"
- 1903: American Breeders Association (later American Genetics Association, Journal of Heredity)
- 1910: Eugenics Records Office formed
- 1924: Immigration Act of 1924: Prohibits immigration from Asia, prioritizes Western Europe, establishes Border Patrol
- 1927: Buck vs Bell Supreme Court case: "Three generations of imbeciles are enough"
- By 1937, 32 US states passed sterilization laws
- 60,000-70,000 people in the continental US were sterilized under eugenics laws
- Up to 1/3 of mothers age 20-49 in Puerto Rico were sterilized after 1937 (some consensually, some unknowingly, some coerced)
- After 1970, perhaps 25% of Native American women of childbearing age were sterilized (some consensually, some unknowingly, some coerced)
- 2005-2013: Of all sterilizations of women in California prisons, a quarter were done without informed consent during this time period
- 2017: A Tennessee judge offered to reduce sentences for inmates who got sterilized



"Positive eugenics" Choose some to pass on more genes

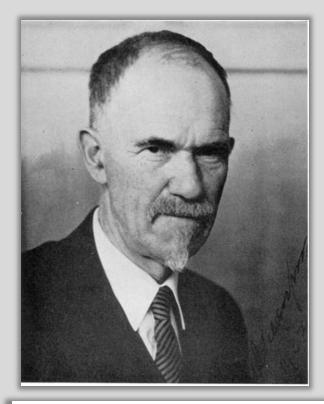


"Negative eugenics" Choose/force some to pass on fewer genes



Reality
OUR scientific community encouraged eugenics
It kept going on long after the war
It continues to have support, though people often try to dissociate it from its history by omitting the name

American Society of Naturalists President



Charles Davenport:

- Founder of Eugenics Records Office
- Elected member of National Academy of Sciences
- President of American Society of Naturalists

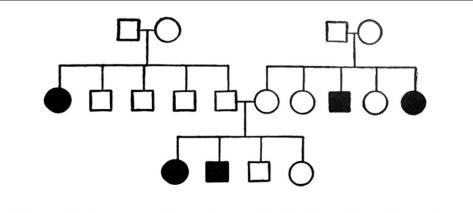


Figure 9. Davenport's pedigree of a family with astigmatism (Davenport, 1911, p. 123).

MUSEUM OF COMPARATIVE ZOOLOGY The Agassiz Museum



HARVARD UNIVERSITY CAMBRIDGE, MASSACHUSETTS 02138 TEL. 617 495-2466 April 14, 1971 Society of Systematic Zoology President American Society of Naturalists President

I have been favoring positive eugenics as far back as I can remember. As I get older, I find the objective as important as ever, but I appreciate also increasingly how difficult it is to achieve this goal, particularly in a democratic western society. Even if we could solve all the biological problems, and they are formidable, there still remains the problem of coping with the demand for "freedom of reproduction," a freedom which fortunately will have to be abolished anyhow if we are not drown in human bodies. The time will come, and perhaps sooner than we think, when parents will have to take out a license to produce a child. No one seems to question that it requires a license for such a harmless activity as driving a car, and yet such an important activity as influencing the gene pool of the next generation can be carried out unlicensed. A biologist will understand the logic of this argument, but how many non-biologists would? Obviously, then, we need massive education. Such education is going to be paralyzed at the very start if it gets mixed up with racist and anti-racist arguments. This is why the Academy has to disassociate itself from Shockley's arguments.

Sincerely yours,

Ernst Mayr

Society for the Study of Evolution President American Society of Naturalists President

But to pessimists protesting "What price progress then?" it must be pointed out that there is after all one and just one way of avoiding the fiasco of a full fledged resumption of ordinary natural selection. That method, whether we like it or not, is purposive control over reproduction, exercised in such wise as to anticipate and forestall the need for natural selection of the usual, externally imposed type.

When now we turn to the possibilities of intelligently directed selection we find the situation very different. In this case let us assume, as a limiting instance, that the individuals having the largest number of mutant genes are systematically chosen for elimination.

Muller, 1950, "Our Load of Mutations"

Journal	Papers	Years in corpus	Unique authors
American Naturalist	11,467	1900-2023	11,970
Evolution	11,229	1947-2023	14,934
Systematic Biology (includes Systematic Zoology)	3,589	1952-2023	5,367
Overall			

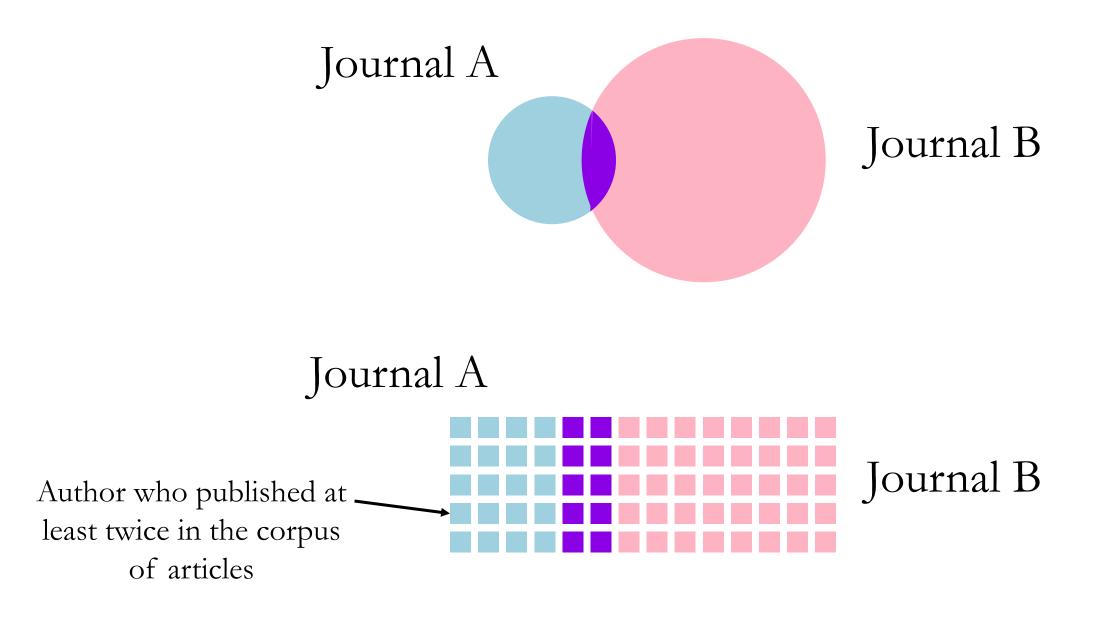
	Journal	Papers	Years in corpus	Unique authors
•	American Naturalist	11,467	1900-2023	11,970
	Eugenics journals (Annals of Eugenics, Eugenics Review, Eugenics Quarterly)	5,130	1909-1968	1,462
	Evolution	11,229	1947-2023	14,934
	Systematic Biology (includes Systematic Zoology)	3,589	1952-2023	5,367
		5,507		0,001

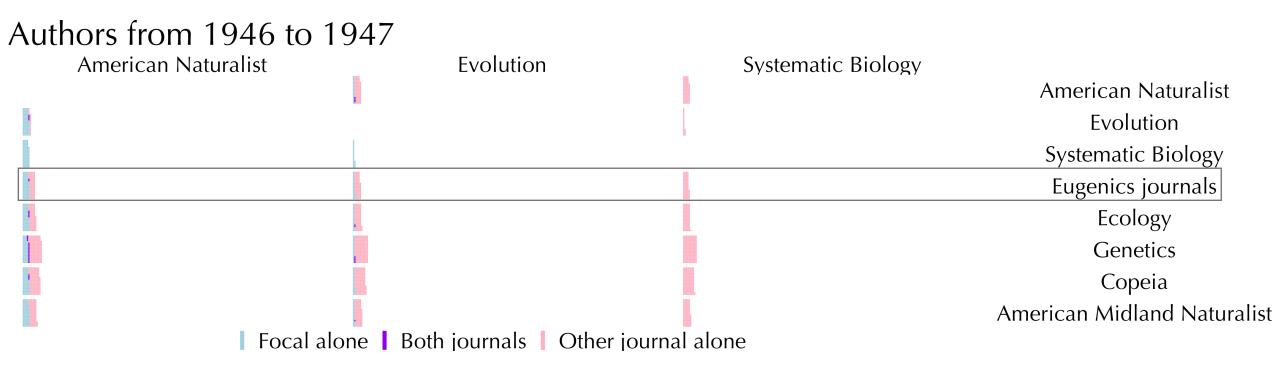
Overall

Journal	Papers	Years in corpus	Unique authors
American Naturalist	11,467	1900-2023	11,970
Annals Of Human Genetics (formerly Annals of Eugenics)	3,735	1954-2023	10,141
Biodemography And Social Biology (formerly Eugenics Quarterly and Social Biology)	221	2009-2023	660
Eugenics journals (Annals of Eugenics, Eugenics Review, Eugenics Quarterly)	5,130	1909-1968	1,462
Evolution	11,229	1947-2023	14,934
Journal Of Biosocial Science (formerly Eugenics Review)	3,286	1969-2023	4,824
Social Biology (formerly Eugenics Quarterly)	1,401	1969-2005	1,510
Systematic Biology (includes Systematic Zoology)	3,589	1952-2023	5,367

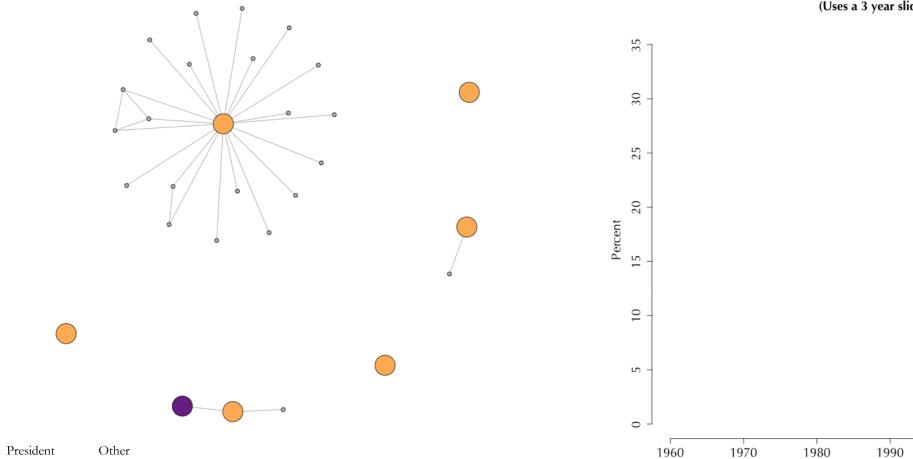
Overall

Journal	Papers	Years in corpus	Unique authors		
American Midland Naturalist	5,715	1945-2022	8,101		
American Naturalist	11,467	1900-2023	11,970		
Annals Of Human Genetics (formerly Annals of Eugenics)	3,735	1954-2023	10,141		
<i>Biodemography And Social Biology</i> (formerly <i>Eugenics Quarterly</i> and <i>Social Biology</i>)	221	2009-2023	660		
Copeia	8,365	1945-2020	8,428		
Ecology	17,704	1920-2023	28,116		
Eugenics journals (Annals of Eugenics, Eugenics Review, Eugenics Quarterly)	5,130	1909-1968	1,462		
Evolution	11,229	1947-2023	14,934		
Genetics	26,455	1916-2023	40,543		
Journal Of Biosocial Science (formerly Eugenics Review)	3,286	1969-2023	4,824		
Molecular Biology And Evolution	8,154	1983-2023	22,290		
Molecular Phylogenetics And Evolution	7,211	1992-2023	17,445		
Social Biology (formerly Eugenics Quarterly)	1,401	1969-2005	1,510		
Systematic Biology (includes Systematic Zoology)	3,589	1952-2023	5,367		
Systematic Botany	3,019	1977-2023	4,247		
Trends In Ecology And Evolution	5,415	1986-2023	8,978		
Overall	122,096	1900-2023	141,284		





Systematic Biology = Systematic Zoology (this time window) and Systematic Biology (later) Eugenics journals = Annals of Eugenics + Eugenics Review+ Eugenics Quarterly Presidents and coauthors 1961 to 1963



Percent of active SSB, SSE, or ASN presidents (purple) or their coauthors (green) who have published in a "Eugenics" journal after 1945. (Uses a 3 year sliding window)

President

≥1946

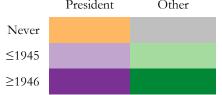
2000

Year at end of window

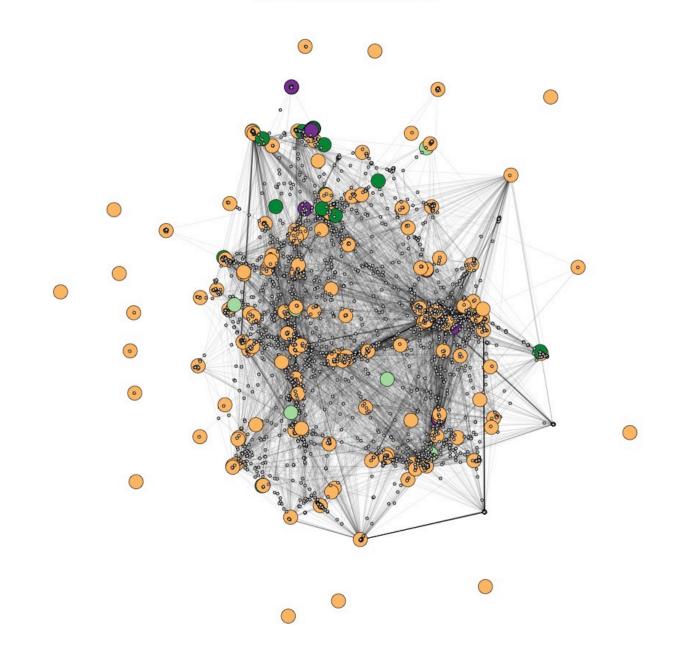
2010

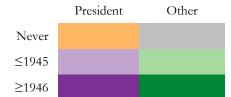
2020

Other



Presidents and coauthors, 1946-2023





EUGEDICC	
Belief	Reality
<i>Those</i> people encouraged eugenics	OUR scientific community encouraged eugenics
Eugenics ended in the US after WWII	It kept going on long after the war
It's over now, at least	It continues to have support, though people often try to dissociate it from its history by omitting the name

Mothers' lives obviously must be saved by Caesareans when necessary; but perhaps operations that are done in true necessity could be followed by an offer of a state reward for a pledge by the woman not to bear more children. It is undisputed that Margaret was not given any procedural protections before the sterilization occurred. Ruoff argues that even without procedural protections, the sterilization was justified. It is true that involuntary sterilization is not always unconstitutional if it is a narrowly tailored means to achieve a compelling government interest. See Buck v. Bell, 274 U.S. 200, 207-08, 47 S.Ct. 584, 71 L.Ed. 1000 (rejecting due process and equal protection challenges to compelled sterilization of mentally handicapped woman).

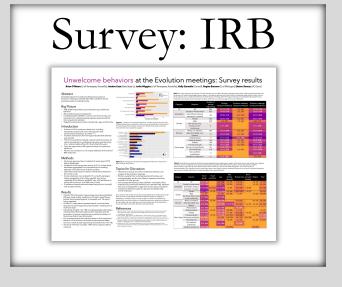
Vaughn vs Ruoff (2001, United States Court of Appeals, Eighth Circuit); emphasis mine

Thus, the preceding observations paint a rather stark picture. At least in highly industrialized societies, the impact of deleterious mutations is accumulating on a time scale that is approximately the same as that for scenarios associated with global warming—perhaps not of great concern over a span of one or two generations, but with very considerable consequences on time scales of tens of generations. Without a reduction in the germline transmission of deleterious mutations, the mean phenotypes of the residents of industrialized nations are likely to be rather different in just two or three centuries, with significant incapacitation at the morphological, physiological, and neurobiological levels. Ironically, the genetic future of mankind may reside predominantly in the gene pools of the least industrialized segments of society. Possible solutions to this problem, including multigenerational cryogenic storage and utilization of gametes and/or embryos, will raise significant ethical conflicts between short-term and long-term considerations.

Sur	vey	•	_	•	-	•	
	naviors at the Evolu						
<text><text><text><text></text></text></text></text>		Annual of the second se	M Provinsion of the second sec		Beneficial and a second s		And the Antional Section 2014 (1994)

Catching vertebrates: IACUC





Catching vertebrates: IACUC



Thus, even a moderate level of genetic screening can be quite effective in lowering the incidence of a major disease gene, but unless such culling is continuous, recurrent mutation will drive allele frequencies back to their prior levels....

A fitness decline of a few percent on the timescale of a century is on the order of the rate of global warming, and that is part of the problem. What will it take to promote serious discourse on the slowly emerging, long-term negative consequences of policies jointly promoted by political, social, and religious factors? Should such a discussion even be pursued or should the process of accelerated genetic change simply be allowed to run its course—a slow walk down the path to what Hamilton (2001) called "the great Planetary Hospital"?

Genetics 2016

Conclusions

- Naming can have major effects
 - Stopping (or at least slowing) harmful change
 - Promoting positive change

0

- Discouraging or encouraging involvement
- Connecting current ideas to their intellectual history and impact
- Small groups of individuals can have major impacts: societies can be a force multiplier

Acknowledgments

- Family members
- Andrea Case
- Sherry Marts & Melinda Grier
- Tri-Societies Code of Conduct Committee
- Tri-Societies Code of Ethics Committee
- Evolution meeting organizers
- Leadership & members of SSB, SSE, ASN
- Societies Consortium
- Evo Allies & Ento-Allies
- SSB Diversity, Equity, & Inclusion Committee
- O'Meara and Jeremy Beaulieu lab groups
- Funding: NSF, UTK, Google, SSB, SSE, ASN



brianomeara.info/evol2023.html