Disentangling Moral Foundations & Political Orientation

Similar values, different applications

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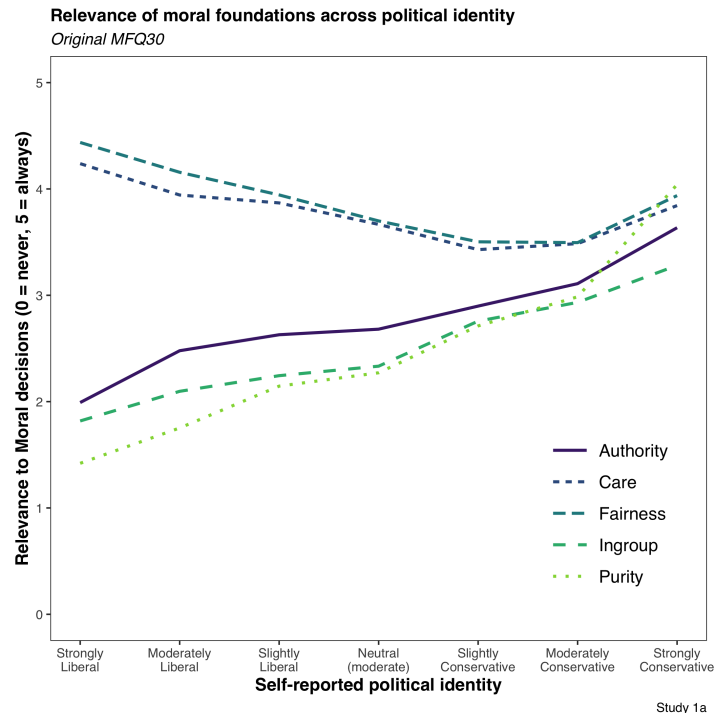
Moral Foundations Theory

Moral foundations theory is frequently used to describe and understand differences in morality across culture, class, and political coalitions.

Liberals value:

- Care/Harm
- Fairness/Equality

Conservatives value all five foundations more equally:

- Care/Harm (somewhat less than liberals do)
- Fairness/Equality (somewhat less than liberals do)
- Ingroup/Loyalty
- Authority/Respect
- Purity/Degradation

Relevance of moral foundations across political identity
Original MFQ30

Study 1a

These findings have been frequently interpreted as a fundamental difference in moral values between liberals and conservatives and an explanation for political division.

The most widely-used scale for MFT is the 30-item moral foundation questionnaire (MFQ30; Graham, Haidt, & Nosek, 2009; Graham et al., 2011; Haidt, 2012). The scale has two subscales, relevance and judgment, with three items for each of the five foundations.

Relevance: 0 = *not at all relevant* to 5 = *extremely relevant*

Judgment: 0 = *strongly disagree* to 5 = *strongly agree*

Examples of politically-charged items in the MFQ30

Many of the items in the MFQ may be re-measuring political ideology and thus exaggerating the differences between liberals and conservatives.

Foundation	Item	Problem
Authority	Whether or not someone conformed to the traditions of society	TRADITIONS is essentially another way of tapping into conservatism, given that conservatives are more concerned about preserving traditions and not changing society too quickly. DISOBEYAUTH is specifically about respecting / obeying authority, which is more relevant to the foundation of authority/respect.
Authority	Whether or not an action caused chaos or disorder	CHAOS is not clearly related to obedience to authority, but does seem to reflect a preference for order. This could elicit stronger responses from conservatives not because of anything about authority, but because conservatives are more sensitive to category deviance than liberals (Okimoto & Gromet, 2016). DISOBEYSUP changes "authority" to "their superior," possibly eliciting greater endorsement from liberals because "their superior" could be read as a context in which obedience to authority was more appropriate (e.g., in the workplace).
Authority	Men and women each have different roles to play in society.	SEXROLES is less clearly about respecting authority and more about traditionalism. It seems unlikely that someone would strongly agree with this item because they believed that men and women should occupy social roles that are distinct both from each other and from the roles they currently play. Conservatives tend to endorse both obedience to authority and separate/distinct gender roles (Ludeke, Johnson & Bouchard, 2013; also Duncan, Peterson & Winter, 1997; Whitley & Ægisdóttir, 2000).
Authority	If I were a soldier and disagreed with my commanding officer's orders, I would obey anyway because that is my duty.	SOLDIER is about obedience to an authority that conservatives are more likely to respect than liberals. There's work showing that if you change the target group mentioned in the MFQ items (without rewording them otherwise), liberals will endorse obeying liberal authorities more than conservatives, while conservatives endorse obeying conservative authorities more than liberals (Voelkel & Brandt, 2019).

Foundation	Item	Problem
Fairness	When the government makes laws, the number one principle should be ensuring that everyone is treated fairly.	FAIRLY pivots to government policy rather than interpersonal behavior, which is inconsistent with the majority of the items used in the MFQ.

Examples of politically-charged items in the MFQ30

Many of the items in the MFQ may be re-measuring political ideology and thus exaggerating the differences between liberals and conservatives.

Foundation	Item	Problem
Ingroup	Whether or not someone's action showed love for his or her country	LOVECOUNTRY is directly eliciting nationalism, which is associated with conservatism (Osborne, Milojev and Sibley, 2017).
Ingroup	I am proud of my country's history.	Like the LOVECOUNTRY in the relevance items, HISTORY is likely to tap into nationalism and be rated more highly by conservatives than liberals.

Foundation	Item	Problem
Purity	Whether or not someone acted in a way that God would approve of	GOD may not be tapping into attitudes about purity or disgust at all, but general religiosity, or even deference (with God as the authority). U.S. conservatives are more religious (Duriez, 2003; Baker & Smith, 2009), which further confounds this item. UNNATURAL is more closely related to disgust, and since it appears in the judgment subscale, we thought it was appropriate to use here as well.
Purity	Chastity is an important and valuable virtue.	In the U.S., abstinence education is far more common in states that are predominantly conservative than states that aren't, confounding the CHASTITY item. Chastity is also rooted in traditional belief systems, which conservatives endorse more than liberals.

Duncan, Peterson & Winter (1997); Hindman & Yan (2015); Ludeke, Johnson & Bouchard (2013); Monteiro, Pfeiler, et al. (2017); Okimoto & Gromet (2016); Osborne, Milojev and Sibley (2017); Voelkel & Brandt (2019); Whitley & Ægisdóttir (2000)

Hypothesis

Replacing the items that are politically biased with more neutral items should weaken the relationship between political orientation and foundation support.

Revised Politically Neutral Items

Foundation	Original Item	Revised Item
Fairness	When the government makes laws, the number one principle should be ensuring that everyone is treated fairly.	It is important to treat other people fairly.
Ingroup	Whether or not someone's action showed love for his or her country	Whether or not someone's action showed love for his or her group
Ingroup	I am proud of my country's history.	I am proud of my community
Authority	Whether or not someone conformed to the traditions of society	Whether or not someone disobeyed authority
Authority	Whether or not an action caused chaos or disorder	Whether or not someone disobeyed his or her superior
Authority	Respect for authority is something all children need to learn.	Society would be better if people were more obedient to authority
Authority	Men and women each have different roles to play in society.	People should always defer to their superiors.
Purity	Whether or not someone acted in a way that God would approve of	Whether or not someone did something unnatural
Purity	People should not do things that are disgusting, even if no one is harmed.	People should not do things that are disgusting.

Study

American adults were recruited on Amazon MTurk, managed by CloudResearch for increased quality control. Participants were compensated $0.50 for a 5-minute survey.

We recruited 540 participants from Amazon's Mechanical Turk (MTurk) platform, facilitated by CloudResearch, which provides additional data quality controls. Participants were compensated $0.50 for completing a brief survey (M_{Time} to complete survey was just under 6 minutes).

All participants filled out the standard MFQ30, supplemented by our 18 revised items. All analyses accounted for inter-item correlations between the original and replacement MFQ30 items.

Political identity was measured using a 7-point scale (1 = "Strongly liberal", 7 = "Strongly conservative").

Sample demographics

Variable	Level	n	Pct.	M	SD
Age		539		41.91	12.67
Political Identity		539		2.55	1.80
Gender	Prefer not to say	3	0.56		
Gender	Non-binary / third gender	4	0.74		
Gender	Male	266	49.35		
Gender	Female	266	49.35		
Education	Some high school or less	1	0.19		
Education	High school graduate	50	9.28		
Education	Graduate degree	108	20.04		
Education	Some college	139	25.79		
Education	Undergraduate degree	241	44.71		

MFQ Scores (original items)

Foundation	n	M	SD	Min	Max	SE
Care	539	3.80	0.80	0.67	5	0.03
Fairness	539	3.69	0.75	1.17	5	0.03
Ingroup	539	2.41	1.01	0.00	5	0.04
Authority	539	2.81	1.03	0.00	5	0.04
Purity	539	2.42	1.33	0.00	5	0.06

MFQ Scores (revised items)

Foundation	n	M	SD	Min	Max	SE
Care	539	3.97	0.74	0.83	5	0.03
Fairness	539	3.98	0.76	1.17	5	0.03
Ingroup	539	2.91	0.88	0.17	5	0.04
Authority	539	2.50	1.09	0.00	5	0.05
Purity	539	2.63	1.33	0.00	5	0.06

Correlation with Political Orientation

Because this was a within-subjects study, we used Hittner, May, and Silver's (2003) method[1] to account for overlapping correlations (i.e., both original and replacement items are correlated with the same measure of political orientation).

Original biased items vs. revised neutral items only

Foundation	Original r	Revised r	Original-Revised r	z	p	Estimate	CI lower	CI upper
Care	-0.30	-0.22	0.76	-2.67	0.004	-0.08	-0.13	-0.02
Fairness	-0.43	-0.47	0.56	1.08	0.859	0.05	-0.03	0.11
Ingroup	0.48	0.20	0.68	8.58	<0.001	0.31	0.21	0.34
Authority	0.51	0.42	0.80	3.75	<0.001	0.11	0.04	0.14
Purity	0.50	0.37	0.69	4.62	<0.001	0.17	0.08	0.20

Original MFQ vs. revised/retained items

Comparing the full original MFQ30 with a version comprised of a combination of the retained original items and the new politically neutral replacement items.

Foundation	Original r	Revised r	Original-Revised r	z	p	Estimate	CI lower	CI upper
Care	-0.30	-0.24	0.88	-2.66	0.004	-0.06	-0.10	-0.01
Fairness	-0.35	-0.34	0.91	-0.69	0.245	-0.01	-0.04	0.02
Ingroup	0.46	0.27	0.84	8.44	<0.001	0.22	0.15	0.24
Authority	0.51	0.42	0.87	4.69	<0.001	0.12	0.05	0.13
Purity	0.47	0.39	0.93	5.72	<0.001	0.10	0.06	0.12

[1] Hittner, May, and Silver's (2003) modification of Dunn and Clark's z (1969) using a backtransformed average Fisher's (1921) Z procedure. Confidence interval calculated with Zou's (2007) confidence interval. We used the `cocor` package (Didenhofen & Musch, 2015) to calculate analyze overlapping correlations.
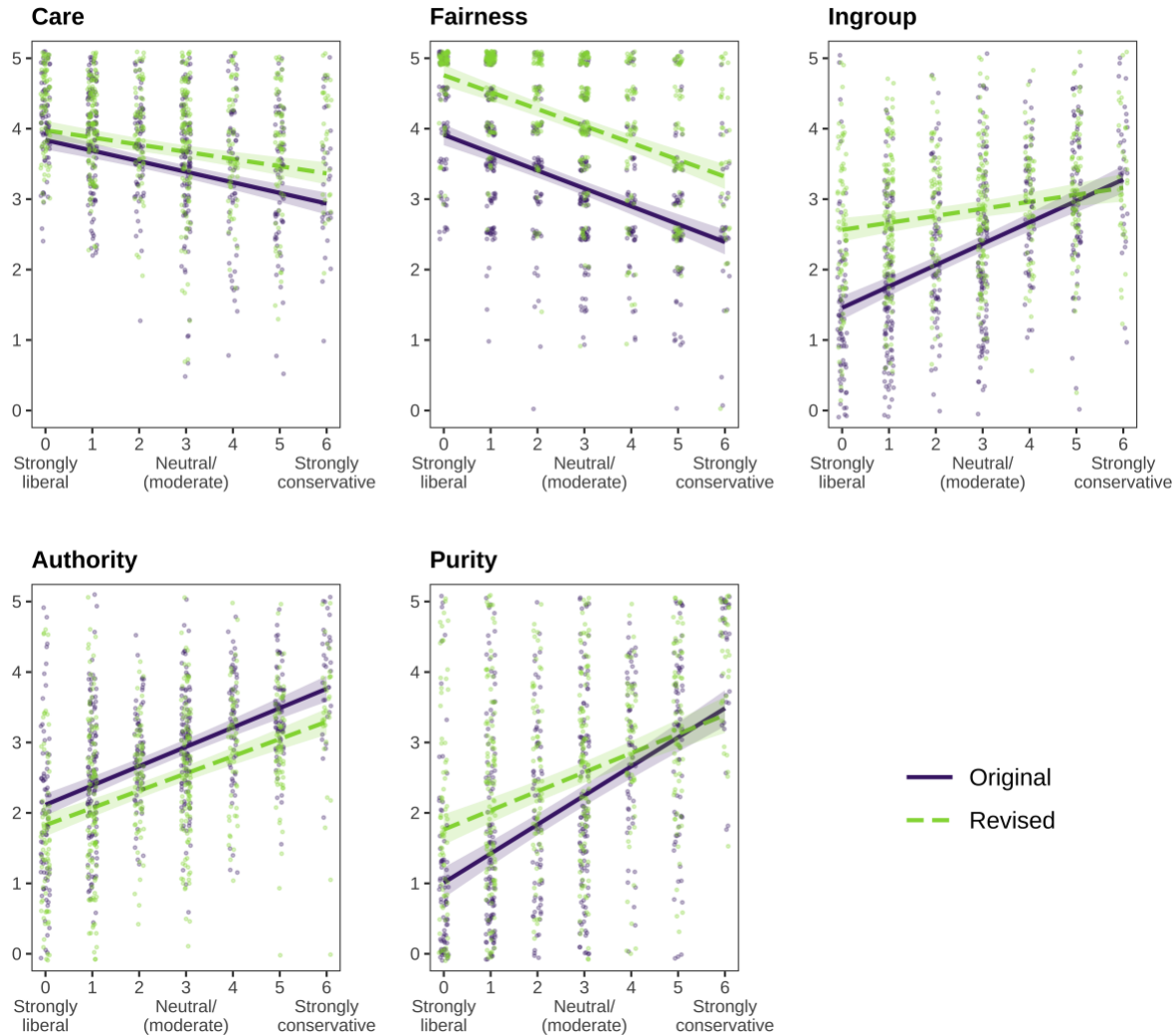
Mixed Linear Models

	Care	Fairness	Ingroup	Authority	Purity
Self-reported political identity	−0.137 (0.018)***	−0.145 (0.017)***	0.253 (0.021)***	0.287 (0.023)***	0.343 (0.029)***
	CI [−0.172, −0.103]	CI [−0.179, −0.111]	CI [0.211, 0.295]	CI [0.241, 0.332]	CI [0.285, 0.401]
MFQ30 Version (revised)	0.092 (0.029)**	0.282 (0.023)***	0.825 (0.038)***	−0.221 (0.041)***	0.365 (0.037)***
	CI [0.036, 0.149]	CI [0.236, 0.327]	CI [0.751, 0.899]	CI [−0.301, −0.141]	CI [0.292, 0.438]
Political identity : MFQ30 Version (revised)	0.032 (0.009)***	0.005 (0.007)	−0.128 (0.012)***	−0.037 (0.013)**	−0.063 (0.012)***
	CI [0.014, 0.050]	CI [−0.010, 0.019]	CI [−0.151, −0.104]	CI [−0.062, −0.011]	CI [−0.086, −0.039]
Age	0.005 (0.002)*	0.003 (0.002)	0.003 (0.003)	0.000 (0.003)	0.001 (0.004)
	CI [0.001, 0.010]	CI [−0.002, 0.007]	CI [−0.003, 0.009]	CI [−0.006, 0.006]	CI [−0.007, 0.009]
Gender (Female)	0.389 (0.060)***	0.182 (0.060)**	0.045 (0.073)	0.130 (0.078)	0.273 (0.102)**
	CI [0.271, 0.506]	CI [0.065, 0.300]	CI [−0.098, 0.189]	CI [−0.023, 0.284]	CI [0.073, 0.474]
Gender (prefer not to say)	−0.636 (0.401)	−0.702 (0.398)	−0.133 (0.487)	0.338 (0.523)	−0.368 (0.682)
	CI [−1.423, 0.151]	CI [−1.484, 0.080]	CI [−1.089, 0.823]	CI [−0.689, 1.365]	CI [−1.707, 0.971]
Education	−0.020 (0.034)	0.005 (0.034)	−0.009 (0.041)	−0.031 (0.045)	−0.062 (0.058)
	CI [−0.087, 0.047]	CI [−0.062, 0.071]	CI [−0.091, 0.072]	CI [−0.119, 0.056]	CI [−0.176, 0.052]
(Intercept)	3.806 (0.171)***	3.843 (0.170)***	1.660 (0.208)***	2.143 (0.223)***	1.626 (0.291)***
	CI [3.470, 4.142]	CI [3.509, 4.177]	CI [1.251, 2.069]	CI [1.704, 2.582]	CI [1.055, 2.197]
Log.Lik.	−830.349	−716.389	−1080.632	−1162.601	−1250.382
REMLcrit	1660.699	1432.777	2161.263	2325.202	2500.764

Note: * $p < .05$; ** $p < .01$; *** $p < .001$. Standard error terms in parentheses

## MFQ30: Original vs. Revised Items

Linear Models

Care

	Original	Revised
(Intercept)	3.290*** (0.220)	3.219*** (0.212)
	[2.857, 3.722]	[2.803, 3.634]
Self-reported political identity	−0.149*** (0.020)	−0.104*** (0.019)
	[−0.188, −0.110]	[−0.141, −0.066]
Age	0.006* (0.003)	0.004 (0.003)
	[0.000, 0.011]	[−0.001, 0.010]
Gender	0.313*** (0.065)	0.314*** (0.062)
	[0.186, 0.440]	[0.192, 0.435]
Education	−0.058 (0.040)	−0.016 (0.039)
	[−0.137, 0.021]	[−0.091, 0.060]
R2	0.136	0.099
R2 Adj.	0.129	0.092
F	20.944	14.609

Note: * p < .05; ** p < .01; *** p < .001

Care / Study 1
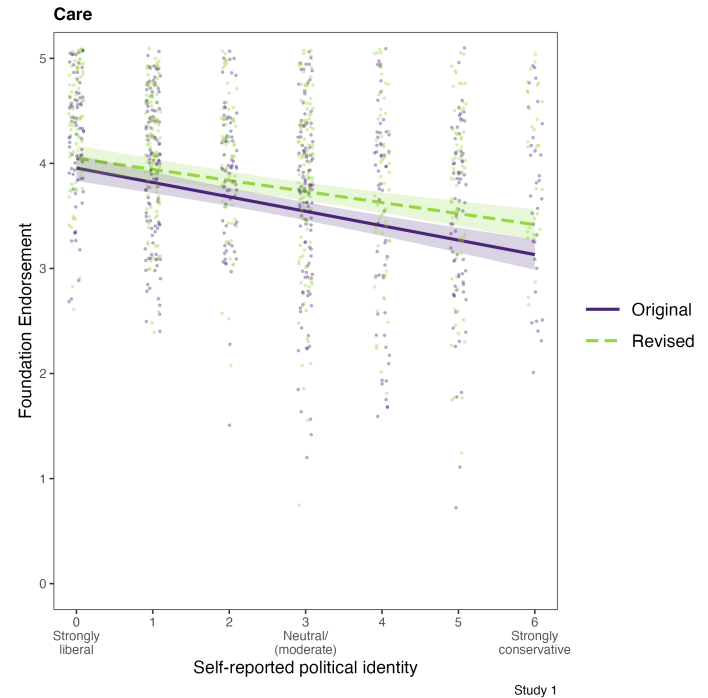
Linear Models

Fairness

	Original	Revised
(Intercept)	3.393*** (0.209)	3.552*** (0.211)
	[2.982, 3.804]	[3.137, 3.967]
Self-reported political identity	−0.141*** (0.019)	−0.150*** (0.019)
	[−0.178, −0.104]	[−0.187, −0.112]
Age	0.001 (0.003)	0.002 (0.003)
	[−0.004, 0.006]	[−0.003, 0.007]
Gender	0.154* (0.061)	0.136* (0.062)
	[0.033, 0.274]	[0.014, 0.257]
Education	−0.005 (0.038)	0.031 (0.039)
	[−0.080, 0.070]	[−0.044, 0.107]
R2	0.108	0.118
R2 Adj.	0.101	0.112
F	16.151	17.937

Note: * p < .05; ** p < .01; *** p < .001

Fairness

Study 1
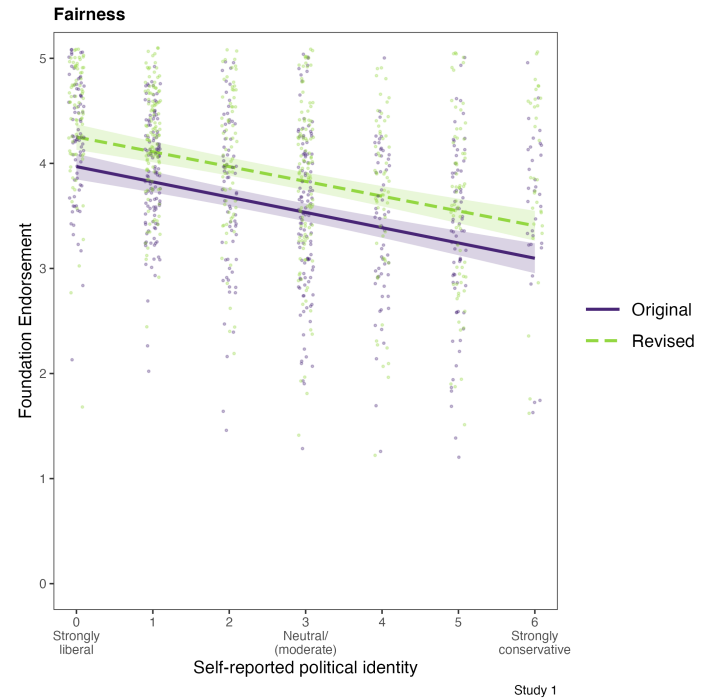
Linear Models

Ingroup

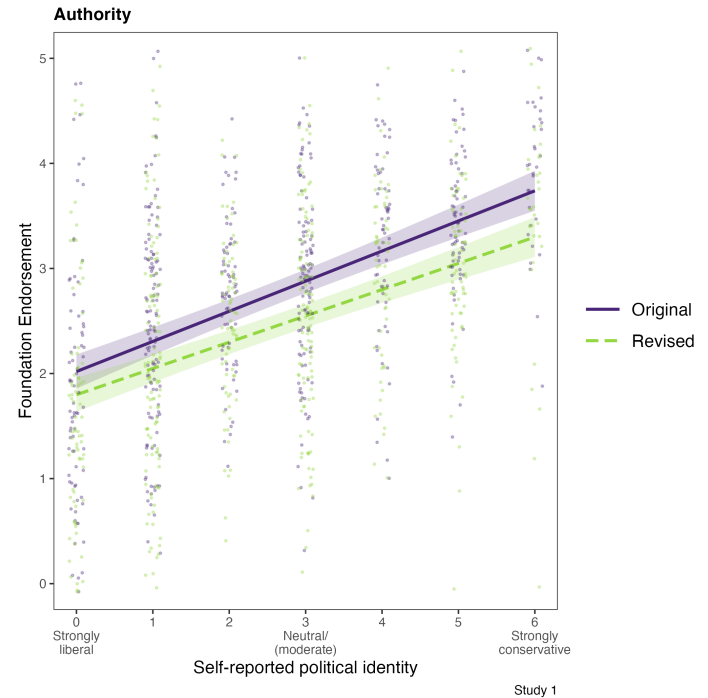|	Original	Revised
(Intercept)	1.266*** (0.255)	1.843*** (0.247)
	[0.764, 1.768]	[1.358, 2.328]
Self-reported political identity	0.266*** (0.023)	0.139*** (0.022)
	[0.220, 0.311]	[0.095, 0.183]
Age	0.003 (0.003)	0.003 (0.003)
	[−0.003, 0.010]	[−0.003, 0.009]
Gender	−0.022 (0.075)	0.033 (0.072)
	[−0.169, 0.125]	[−0.109, 0.175]
Education	−0.012 (0.047)	0.027 (0.045)
	[−0.104, 0.079]	[−0.061, 0.116]
R2	0.213	0.075
R2 Adj.	0.207	0.068
F	36.168	10.781

Ingroup

Study 1
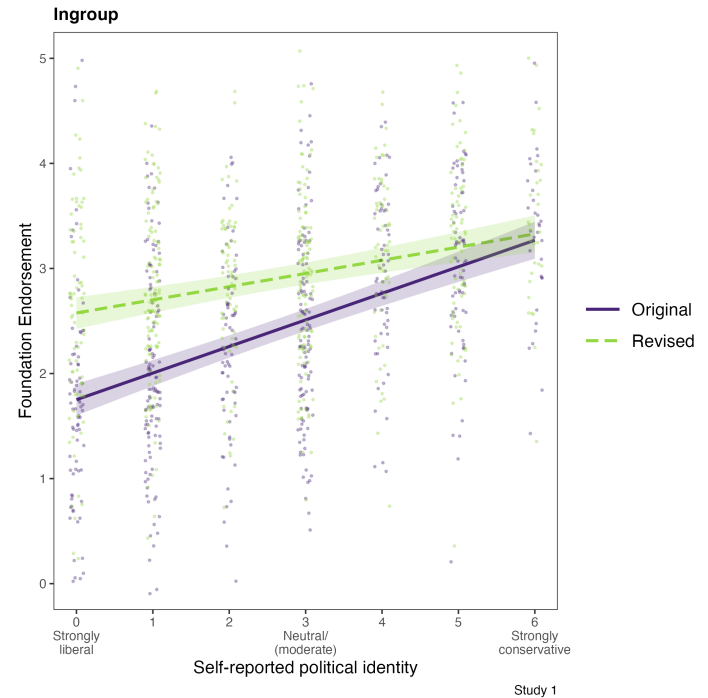
Linear Models

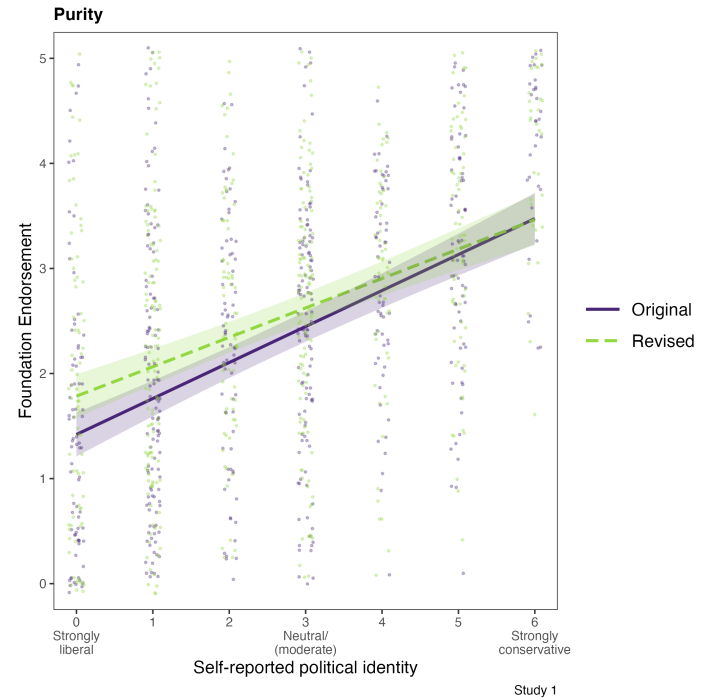### Authority

	Original	Revised
(Intercept)	1.643*** (0.256)	1.267*** (0.276)
	[1.141, 2.146]	[0.725, 1.808]
Self-reported political identity	0.294*** (0.023)	0.257*** (0.025)
	[0.248, 0.339]	[0.208, 0.306]
Age	0.002 (0.003)	−0.003 (0.004)
	[−0.004, 0.009]	[−0.010, 0.004]
Gender	0.052 (0.075)	0.197* (0.081)
	[−0.096, 0.199]	[0.039, 0.356]
Education	−0.039 (0.047)	−0.006 (0.050)
	[−0.131, 0.053]	[−0.104, 0.093]
R2	0.249	0.176
R2 Adj.	0.243	0.170
F	44.190	28.601

Authority

Study 1

Linear Models

Purity

	Original	Revised
(Intercept)	0.953** (0.324)	1.578*** (0.336)
	[0.316, 1.590]	[0.918, 2.239]
Self-reported political identity	0.334*** (0.029)	0.278*** (0.030)
	[0.276, 0.392]	[0.218, 0.338]
Age	0.001 (0.004)	0.001 (0.004)
	[−0.007, 0.009]	[−0.007, 0.010]
Gender	0.190* (0.095)	0.146 (0.098)
	[0.004, 0.377]	[−0.048, 0.339]
Education	−0.031 (0.059)	−0.088 (0.061)
	[−0.148, 0.085]	[−0.209, 0.032]
R2	0.210	0.153
R2 Adj.	0.204	0.147
F	35.531	24.110

Purity

Study 1

Morality as Cooperation

Foundations for MAC were derived from evolutionary game theory as applied to conflict resolution (Curry, 2016; Curry et al., 2019).

- Deference to authority
- Family loyalty
- Fairness
- Group loyalty
- Heroism
- Property rights
- Reciprocity

MAC Study 1

Study 1: Correlations between MAC-Q Foundations and Political Orientation

Foundation	r	p	CI lower	CI upper	n
Deference	0.47	<.001	0.39	0.54	447
Fairness	-0.06	.223	-0.15	0.04	447
Family	0.27	<.001	0.18	0.35	447
Group	0.11	.077	0.02	0.20	447
Heroism	0.27	<.001	0.19	0.36	447
Property	-0.11	.077	-0.20	-0.01	447
Reciprocity	0.10	.077	0.01	0.19	447

MAC Study 2

Study 2: Correlations between MAC-Q Foundations and Political Orientation

Foundation	r	p	CI lower	CI upper	n
Deference	0.51	<.001	0.44	0.58	453
Fairness	-0.07	.164	-0.16	0.03	453
Family	0.32	<.001	0.23	0.40	453
Group	0.08	.152	-0.01	0.17	453
Heroism	0.31	<.001	0.23	0.39	453
Property	-0.18	<.001	-0.27	-0.09	453
Reciprocity	0.13	.023	0.03	0.21	453

Monteiro, West, & Pizarro (manuscript in prep)

Conclusions

While there are clearly differences in terms of moral values between liberals and conservatives, these differences may not be at such a deep level as we thought.

These value differences may be less about the moral foundations and more about to whom these foundation and their associated moral concerns are applied.
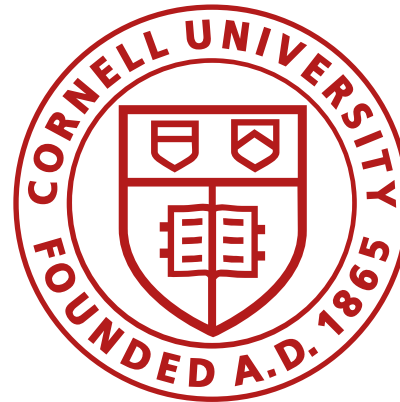
Thank you

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