How Propaganda Works: Nationalism, Revenge and Empathy in Serbia

Supplementary File 1: Appendix

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Table of Contents

- 1. Survey Apparatus and Experimental Designs
 - a. English version
 - b. Serbian version
- 2. Inflammatory Messages: Propaganda Speech Treatments
- 3. Descriptive Statistics of Participants
- 4. Exploratory Factor Analysis
- 5. Bayesian Multiple Linear Regression Analyses with Interactions Terms
- 6. Developed SAS macro for analyses
 - 6.1 Bayesian Multiple Regression Analysis using PROC MCMC
 - 6.2 Bayesian Multiple Regression with Interaction Terms using PROC MCMC
- 7. References for Supporting Information in Supplementary File 1: Appendix

1. Survey Apparatus and Experimental Design

We present here the survey apparatus and experimental design used to investigate the effects of the nine types of propaganda (as harmful speech recognized by international criminal law), as presented to participants on Qualtrics. Note that items placed in brackets are meta descriptions of survey items and were not seen by participants. Note also that participants viewed the propaganda treatment prior to answering specific and general questions regarding propaganda content, and then demographic questions. Participants were randomly assigned to one of nine treatments. All questions before and after the propaganda treatment were randomized for counterbalancing.

1.a. English Version [Consent]

This is an international study of speech and national identity. The research is being carried out by Dr. Richard Wilson and Jordan Kiper of the University of Connecticut, USA. You are invited to participate by completing the following questionnaire. Filling out this questionnaire lasts about 15 minutes. This questionnaire does not entail any risk to you. Your participation will remain anonymous, and all information will be confidential. The results of this study will be used only for scientific purposes.

Your participation is voluntary. Questions about this questionnaire can be submitted to Richard Wilson, richard.wilson@uconn.edu or Jordan Kiper, jordan.kiper@uconn.edu. If you have any questions about your rights as a research participant, you can contact the University 8604868802. The institutional review committee protects the rights and well-being of research participants.

Thank you for your participation.

If you would like to participate in this study, please click the "accept" button.

I Accept >>

I Do Not Accept >>

[Personality Characteristics]

[Questions on Authoritarianism, Just World Beliefs, and Nationalism were scored on a six-point scale from "strongly disagree" to "strongly agree"]

[15 Questions on *Nationalism*]

It is nonsense that all nations are equal. Some peoples are more, some less honorable.

To be without a nation is like to be without a family.

It is not good to be too open towards other nations.

Every nation should live in its own State.

An important thing children should learn in schools is to love their nation.

One should be reserved and cautious towards other nations, even when they appear to be friendly.

One should respect his nation and its tradition.

All great deeds are inspired by national feeling.

In our country our nation should be privileged regarding employment.

One's most important characteristics come from his nationality.

One's destiny equals with the Nation's destiny.

Renewal of our national ideals is our most important task.

Putting our nation above others is nothing evil, it is just an expression of love for our people.

One should always put national interests above personal ones.

The national majority should always have more political rights than minorities.

[12 Questions on Authoritarianism]

A group member should do nothing that contradicts group norms or rules.

A group member may act differently from demands of group rules.

A group member should always obey group rules.

Sometimes a group member may counteract group rules.

A group member who has violated group rules should be punished

A group member should not necessarily be punished very hard if he has offended against group rules once.

A group member who has counteracted group norms should always be called to account.

If a group member has violated group rules, he or she does not necessarily have to be punished.

If a group has a leader, group members have to respect and obey him.

If a group member does not agree with decisions of a group leader, he or she should not follow his orders.

Instructions of group leaders should be obeyed under all circumstances.

A group member should only obey orders of his group leader if they match his own interests.

[10 Questions on Self Esteem]

I'm completely satisfied with myself.

From time to time I think I'm good at everything.

I think I have a number of good qualities.

I am able to do things like most other people.

I feel that I do not have much to be proud of.

Sometimes I feel useless.

I feel that I am a person of value, at least as much as others.

I wish I had more respect for myself.

All in all, I'm inclined to feel unsuccessful.

I have a positive attitude towards myself.

[6 Questions on Just World Beliefs]

I think basically the world is a just place.

I believe that, by and large, people deserve what they get.

I am confident that justice always prevails over injustice.

I am convinced that in the long run people will be compensated for injustices.

I firmly believe that injustices in all areas of life (e.g., professional, family, politic) are the exception rather than the rule.

I think people try to be fair when making important decisions.

[Participants were randomly assigned to a treatment; see "Propaganda Treatment" below]

[1 Check-Question for Filtering]

Please name one of the countries described in the paragraph:

[Outcome variables of interest divided into two sets of questions: General Questions on violence, law, revenge, and Specific Questions. All were measured on a five-point scale from "not at all" to "very much"]

[General Questions]

[Justifications of Violence]

[General Q1] Do you think that good people are capable of violent actions?

[General Q2] Do you think that it is ever acceptable to take the law into your own hands?

[General Q3] Do you think we can always trust the legal system to protect our interests?

[General Q4] Do you think revenge is ever justified?

[General Q5] Do you think that force is necessary to resolve certain problems?

[General Q6] Do you think violence can be justified?

[General Q7] Do you think people can commit violent acts for good moral reasons?

[General Q8] Do you think violent acts can be committed if they are morally justified?

[General Q9] Is it acceptable to sacrifice another person for the greater good of a group?

[General Q10] Is human sacrifice ever appropriate?

[Specific Questions]

[Perceptions of the Ingroup and Outgroup]

[Specific Q1] To what extent do you think you could understand West Margolian's point of view?

[Specific Q2] To what extent do you think you felt the emotions that West Margolians felt?

[Specific Q3] To what extent do you think you could understand East Margolian's point of view?

[Specific Q4] To what extent do you think you felt the emotions of East Margolian's felt?

[Specific Q5] How likely would you have been to behave similarly to West Margolian?

[Specific Q6] How likely would you have been to behave similarly to East Margolian?

[Specific Q7] How morally responsible are the East Margolians for their behavior?

[Specific Q8] How morally responsible are the West Margolians for their behavior?

[Specific Q9] How intentional are the acts of the East Margolians?

[Specific Q10] How intentional are the acts of the West Margolians?

[2 Questions on Engaging Violent Media]

[The following two questions were measured on a six-point scale from "I never play violent video games / watch violent TV shows or movies" to "7 or more hours a day"]

How often do you play violent video games? (e.g., first person shooter games like Call of Duty, Halo)

How often do you watch violent TV shows or movies?

[3 Questions on basic *Demographics*]

Please indicate your age: 18-29, 30-39, 40-49, 50-59, 60+

Please indicate your gender: male, female

Please indicate which religious affiliation best describes you: Roman Catholic, Buddhist, Hindu,

Protestant, Jewish, Muslim, Orthodox, I am not religious, other religion (please indicate)

[3 Questions on *Religious Strength*, measured on five-point scale from "not at all strongly" to "very strongly"]

How strongly do you affiliate with your religion?

How strongly do you hold your religious beliefs?

How strongly do you agree with the teaching of your religion?

[1 Question on Political Orientation]

Generally speaking, do you consider yourself to be: Very Liberal, Somewhat Liberal, In-Between, Somewhat Conservative, Very Conservative

[1 Question on Education]

Which of the following best describes the highest level of education that you have achieved so far? Unfinished elementary school, Primary school completed (8 years), Unfinished secondary school, Completed three-year secondary school, Completed four-year secondary school, Higher school, Faculty, Specialization, Master's or PhD

[1 Question on *Environment*]

Which of the following answers best describes the environment in which your household is located? Rural area or village; Small town or small town; Suburb of a city, city center

[1 Question on Regional Territory]

In which part of the territory of Serbia do you live? North Serbia, Central Serbia, Southern Serbia

[1 Question on *Income*]

How would you identify your income level? Low, Middle, High, Low-Middle, High-Middle [Debriefing]

Thank you for your participation and contribution to this project!!

The purpose of this study is to explore the effects different types of speeches have on opinions towards out groups, or people unlike yourself. Some of the speeches used in this study are negative and others are non-negative.

You have just read about the following groups: East Margolians and West Margolians.

These groups described are entirely fictional, including the names. The countries and locations described are also entirely fictional, including the names.

We used deception in this research in order to not alter your opinions towards real groups of people.

If you have any questions, please do not hesitate to contact the investigator at: richard.wilson@uconn.edu or jordan.kiper@uconn.edu

1.b. Serbian Version [Consent]

Ovo je međunarodna studija o govoru i nacionalnom identitetu. Istraživanje se sprovodi Dr. Richard Wilson i Jordan Kiper sa Univerziteta u Konektikatu, USA. Pozvani ste da učestvujete popunjavanjem priloženog upitnika. Popunjavanje upitnika traje oko 15 minuta. Ovaj upitnik ne podrazumeva nikakav rizik za vas. Vaše učešće će biti anonimno i sve informacije će biti poverljive. Rezultati ove studije će se koristiti samo u naučne svrhe.

Vaše učešće je dobrovoljno. Pitanja o ovom upitniku mogu biti postavljena Ričardu Vilsonu <u>richard.wilson@uconn.edu</u>, ili Jordan Kiper, <u>jordan.kiper@uconn.edu</u>. Ako imate bilo kakvih pitanja o vašim pravima kao učesnika u istraživanju možete kontaktirati na Univerzit 860-486-8802. Institucionalna pregled odbor štiti prava i dobrobit učesnika istraživanja. Hvala vam na učešću.

Ako želite da učestvujete u ovoj studiji, kliknite na dugme "Prihvatam".

Prihvatam >>

Ne prihvatam >>

[Personality Characteristics]

[Questions on Authoritarianism, Just World Beliefs, and Nationalism were scored on a six-point scale from "strongly disagree" to "strongly agree"]

[15 Questions on *Nationalism*]

Besmislica je da su svi narodi-nacije jednaki. Neki narodi su više časni, a neki manje.

Biti bez nacije-naroda je kao biti bez porodice.

Nije dobro biti previše otvoren prema drugim nacijama-narodima.

Svaki narod treba da živi u sopstvenoj državi.

Važna stvar koju deca treba da nauče u školi je da vole svoj-svoju narod-naciju.

Osećanje narodne-nacionalne vezanosti je jedna od najvrednijih osećanja koja se ikada mogu iskusiti.

Treba biti rezervisan i oprezan prema drugim narodima-nacijama, čak i kada izgleda da su prijateljski nastrojeni.

Treba poštovati svoj narod-naciju i njegovu-njenu tradiciju.

Sva velika dela su inspirisana nacionalnim osećanjem. U našoj zemlji naš narod treba da bude privilegovan u pogledu zapošljavanja.

Najvažnije karakteristike čoveka dolaze iz nacionalne pripadnosti.

Čovekova sudbina jednaka je sa sudbinom nacije.

Obnavljanje naših nacionalnih ideala je naš najvažniji zadatak.

Stavljanje sopstvenog-sopstvene naroda-nacije iznad ostalih nije ništa zlo, to je samo izraz ljubavi prema sopstvenom narodu.

Uvek treba staviti nacionalne interese iznad ličnih.

Nacionalna većina uvek treba da ima više političkih prava nego manjine.

[12 Questions on Authoritarianism]

Član grupe (t.j. zajednica ili narod) ne treba da radi ništa što je u suprotnosti sa normama ili pravilima grupe.

Član grupe može da se ponaša drugačije od onog što zahtevaju pravila grupe.

Član grupe uvek treba da poštuje pravila grupe.

Ponekad član grupe može da se ponaša različno od pravila grupe.

Član grupe koji je prekršio pravila grupe treba da bude kažnjen.

Nije neophodno kazniti člana grupe ako je prekršio pravila grupe samo jednom.

Član grupe koji je prekiršio pravila grupe mora biti pozvan na odgovornost.

Ako je član grupe prekršio pravila grupe, to ne znači da je neophodno da se on/ona kazni.

Ukoliko grupa ima vođu, članovi grupe moraju da ga/je poštuju i slušaju.

Ako se član grupe ne slaže sa odlukama vođe grupe, on/ona ne bi trebao/la da prate njegova/njena naređenja.

Uputstva vođe grupe se moraju poštovati u svim okolnostima.

Član grupe treba da izvršava naređenja vođe grupe samo ako se oni podudaraju sa njegovim/njenim interesima.

[10 Questions on Self Esteem]

U celini sam zadovoljna sobom.

S vremena na vrijeme mislim da sam dobar u svemu.

Mislim da imam jedan broj dobrih osobina.

Ja sam u stanju da uradim stvari kao i većinu drugih ljudi.

Osećam da nemam mnogo čime da se ponosim.

Ja se ponekad osećam beskorisno.

Osećam da sam osoba od vrednosti, barem na jednako koliko i drugi.

Voleo bih da imam više poštovanja za samog sebe.

Sve u svemu, ja sam sklon da se osećam neuspešno.

Imam pozitivan stav prema samom sebi.

[6 Questions on *Just World Beliefs*]

Ja mislim da je svet u suštini pravedan.

Verujem da ljudi manje-više zaslužuju ono što im se desi.

Uveren/a sam da pravda uvek pobeđuje nad nepravdom.

Uveren/a sam da će ljudima, kojima je učinjena nepravda, to biti nadoknađeno u dugoročnom pogledu.

Ja čvrsto verujem da je nepravda u razlicitim oblastima života (npr. profesionalne, porodične, političke) više izuzetak nego pravilo.

Mislim da ljudi pokušavaju da budu fer prilikom donošenja važnih odluka.

[Participants were randomly assigned to a treatment; see "Propaganda Treatment" below]

[1 Question for *Filtering*]

Наведите једну од земаља описаних у параграфу:

[Outcome variables of interest divided into two sets of questions: General Questions on violence, law, revenge, and Specific Questions. All were measured on a five-point scale from "not at all" to "very much"]

[General Questions]

[Justifications of Violence]

[General Q1] Da li mislite da su dobri ljudi sposobni za nasilje?

[General Q2] Da li mislite da je ikada prihvatljivo da uzmete zakon u svoje ruke?

[General Q3] Da li mislite da uvek možemo verovati da će pravni system zaštiti naše interese?

[General Q4] Da li mislite da je osveta ikada opravdana?

[General Q5] Da li mislite da je sila neophodna za rešavanje određenih problema?

[General Q6] Da li mislite da nasilje može da se opravda?

[General Q7] Da li mislite da ljudi mogu da čine nasilna dela iz moralnih razloga?

[General Q8] Da li mislite da nasilna dela mogu biti počinjena ako su moralno opravdana?

[General Q9] Da li je prihvatljivo žrtvovati nekoga za dobrobit grupe (t.j. zajednica ili narod)?

[General Q10] Da li je ljudske žrtve ikada prikladne?

[Specific Questions]

[Perceptions of the Ingroup and Outgroup]

[Specific Q1] U kojoj meri mislite da biste mogli razumeti tačku gledišta Zapadne Margolije?

[Specific Q2] U kojoj meri mislite da ste osetili emocije koje su ljudi Zapadne Margolije osećali?

[Specific Q3] U kojoj meri mislite da biste mogli razumeti tačku gledišta Istočne Margolije?

[Specific Q4] U kojoj meri mislite da ste osećali emocije koje su ljudi Istočne Margolije osećali?

[Specific Q5] Koliko je verovatno da biste postupili kao Zapadni Margolijanac?

[Specific Q6] Koliko je verovatno da biste postupili kao Istočni Margolijanac?

[Specific Q7] Koliko su Istočni Margolijanci moralno odgovorni za svoje ponašanje?

[Specific Q8] Koliko su Zapadni Margolijanci moralno odgovorni za svoje ponašanje?

[Specific Q9] Koliko su namerna dela Istočnih Margolijanaca?

[Specific Q10] Koliko su namerna dela Zapadnih Margolijanaca?

[2 Questions on Engaging Violent Media]

[The following two questions were measured on a six-point scale from "I never play violent video games / watch violent TV shows or movies" to "7 or more hours a day"]

Koliko često igrate nasilne video igrice? (npr. Pucačke igrice kao "Call of Duty," "Halo")?

Koliko često gledate nasilne TV emisije ili filmove?

[3 Questions on basic *Demographics*]

Molimo Vas navedite koliko godina imate: 18-29, 30-39, 40-49, 50-59, 60+

Molimo Vas navedite Vaš pol: Muški, Ženski

Molimo vas da navedete Vašu versku pripadnost: Rimokatolička, Budistička, Hinduistička, Protestantska, Jevrejska, Muslimanska, Pravoslavna, Nisam religiozan/religiozna, Druga religija (navedite, molimo Vas)

[3 Questions on *Religious Strength*, measured on five-point scale from "not at all strongly" to "very strongly"]

Koliko se identificirate sa svojom religijom?

Koliko su snažna Vaša religijska ubeđenja?

Koliko se slažete sa učenjima Vaše vere?

[1 Question on *Political Orientation*]

Generalno govoreći, da li sebe smatrate: Veoma liberalnim, Donekle liberalnim, Između, Donekle konzervativnim, Veoma konzervativnim

[1 Question on Education]

Šta od sledećeg najbolje opisuje najviši nivo obrazovanja koji ste do sada ostvarili? Nezavršena osnovna škola, Završena osnovna škola (8 godina), Nezavršena srednja škola, Završena trogodišnja srednja škola, Završena četvorogodišnja srednja škola, Viša škola, Fakultet, Specijalizacija, magistratura ili doktorat

[1 Question on *Environment*]

Koji od sledećih odgovora najbolje opisuje sredinu u kojoj se vaše domaćinstvo nalazi? Ruralna oblast ili selo; Mali grad ili grad srednje veličine; Predgrađe velikog grada, Veliki grad

[1 Question on Regional Territory]

Na kom delu teritorije Srbije živite? Vojvodina, Beograd, Centralna Srbija

[1 Question on *Income*]

Koliki je nivo Vaših prihoda? nisko, srednje nisko, srednje, srednje visoko, visoko

[Debriefing]

Hvala vam na učešću i doprinosu ka ovom projektu!!! Cilj ove studije je da se istraže efekti koje različite vrste iskaza govora mogu imati na vaša mišljenja o ljudima van grupe, ili o ljudima poput Vas. Neki od govora koji su korišteni u ovoj studiji su negativni, a drugi nisu. Upravo ste pročitali iskaze o sledećim grupama: Istočni Margolijanci i Zapadni Margolijanci. Obe opisane grupe su u

potpunosti izmišljene, uključujući i imena. Države i lokacije su potpuno izmišljenje, uključujući i imena. Time smo Vas obmanili u ovom istraživanju, kako ne bi promenili Vaše mišljenje prema stvarnim grupama ljudi. Ukoliko imate bilo kakvih pitanja u vezi sadržaja ankete, molimo Vas ne ustručavajte se da kontaktirate istraživača: richard.wilson@uconn.edu ili jordan.kiper@uconn.edu

2. Harmful Speeches as Types of Propaganda: Propaganda Speech Treatments

The following nine harmful messages served as propaganda treatments and were adapted from speech acts original made by the Serbian war criminal, Vojislav Šešelj. Critically, these messages were identified, coded, and rated by Anthony Oberschall (2006), an expert witness for the prosecution at the International Criminal Tribunal for Yugoslavia (ICTY), as potential speech crimes, which were submitted to the ICTY. The nine chosen here are exemplary speeches from each of the nine main types identified by Oberschall. We present below an abbreviated example of each composite speech, including its coded theme, as used in this study.

Revenge

"When it comes to revenge, you know, revenge is blind... if the West Margolians try to massacre us, the East Margolians will not forgive nor forget. Our revenge will be horrific...Let them just continue attacking our lives — and then we shall not only present them with the bill for current victims, but we shall collect the fee for the victims... Those who survived have no right to forgive in the name of the slaughtered."

Past atrocities

"Who started ethnic cleansing first? The West Margolians. They first started to pacify East Margolian territories with fire and sword! Remember our history, West Margolia expelled over 300,000 East Margolians from their territory. They became mass armed when the West Margolians imported weapons en masse. What was supposed to be done? Allow them to repeat mass violence against us? ... They marked their borders with East Margolian graves."

Direct threat

"The West Margolians will split up East Margolia. The West Margolians intend a horrible fate for us, and now we understand what kind of fate they intend. There's nothing to lose - we have to fight, decidedly, till the end...The East Margolian people are endangered... The West Margolians are planning our deaths; we only want to stop the genocide they envision."

Victimization

"There is a horrific propaganda war being led against the East Margolian people, in which all means are allowed. The West Margolians make us out to be Satan, so that the public opinion would justify all measures against the East Margolian people. These kinds of crimes, which the West Margolians have committed towards others, East Margolians have not committed... And the media only accuse us.

Nationalism

"In all East Margolian chests, there is a heroic heart beating. If we remain in concord and unity, there will be no war; there will be no bloodshed. It's enough for us for our enemies to look at us, in concord and unity as we are, and hide... This is the last lesson to the West Margolian people. We are less well armed than they are, but we have got a heart of a knight and an unbreakable will..."

Negative out-group stereotypes

"The West Margolians are not a nation, but the dregs of society... It's easy to recognize them. They are very primitive people. And you may find one literate guy among 100 West Margolians, and they do not even know they are not. They are a genocidal people although we know they are cowards on the battlefield and capable of nothing."

Dehumanization

"We, East Margolians, as a people, let a poisonous snake bite our heart three times after holding it in our arms. That poisonous snake, that's the West Margolians. This is the third time that poisonous snake has headed for us, and for the third time bit us in the heart. Now we need to smash its head, so it never bites anyone again."

Justice

"If one state treats a particular national minority a certain way that is non-civilized, outside of the legal norms, then international public law justifies a similar treatment of the neighbor state to the national minority of the previous state... If the West Margolians expelled 300,000 East Margolians from the Western Margolian land, what is more natural than to demand that they leave East Margolia as well?"

Religion

"...The West Margolians can push us out of the political scene, but they cannot deter us from our faith and service to the East Margolian nation. I greet you with our traditional greetings. Eastern Margolia is eternal, while her children are loyal to their faith in God and in the homeland. Our East Margolia must win!

3. Descriptive Statistics of Participants

Values below are based on original coding in the survey instrument (see above).

Participant Characteristics

	Gender ^a	Age ^b	Religion ^c	Religious Strength	Politics ^d	Income (SES) ^e	Violent Media ^f	Education ^g
N	399	399	399	399	399	399	399	399
Mean	1.44	1.93	8.38	2.97	2.39	2.48	1.78	5.79
Median	1.00	1.00	9.00	3.00	2.00	3.00	1.50	5.00
Std. Deviation	0.49	1.32	1.57	1.29	0.96	0.96	0.70	1.13

Note. ^a Gender is measured here as being male, were 2 = male and 1 = female. ^b Age is measured on scales of 1= 18-29, 2 = 30-39, 3 = 40-49, 4 = 50-59, 6 = 60+. ^c Religion was a categorical variable coded as Orthodox, Roman Catholic, Buddhist, Hindu, Protestant, Jewish, Muslim, Other, I am not religious. ^d Political orientation is measured as tending towards conservativism, where 1 = very liberal, 2 = somewhat liberal, 3 = in-between, 4 = somewhat conservative, 5 = very conservative. ^e Income was measured as 1 = low, 2 = middle, 3 = low-middle, 4 = high-middle, 5 = high. ^f Violent media was an indices measure comprised of two questions about the frequency of violent video game and TV consumption with values of 1 = never play violent video games, 2 = very rarely, 3 = a few times a week, 4 = 1-3 hours a day, 5 = 4-7 hours a day, 6 = 7 or more hours a day. ^g Education was on scales of 1 = unfinished elementary school, 2 = primary school completed (8 years), 3 = unfinished secondary school, 4 = completed three-year secondary school, 5 = completed four-year secondary school, 6 = higher school, 7 = faculty, 8 = specialization, Master's or PhD.

4. Exploratory Factor Analysis

We began our analyses by examining the factorability of twenty questions that initially comprised the following factors of interest: general questions regard the *justification of violence*, and specific questions about *perceptions of the ingroup and outgroup*. Because our central aim was to understand the effects of propaganda treatments on support for violence and against outgroups, we decided to remove three questions regarding support for the law and willingness to sacrifice human life (General Qs 3, 9, and 10), leaving us with seventeen questions of interest.

We then undertook an exploratory factor analysis to determine which rotation to use by adopting several well recognized criteria for the factorability of a correlation (see Field, 2012, pp. 665-719). First, we examined the descriptive variables by observing univariate descriptives, KMO and Bartlett's test of sphericity, and communalities (see below). Based on communalities, it was determined that all of the variables had an extraction value greater than 0.3, indicating that they were all appropriate for further analysis.

Descriptive Statistics

	Mean	Std. Deviation	N
General Q1	2.96	1.093	399
General Q2	2.89	1.109	399
General Q4	2.48	1.160	399
General Q5	2.33	1.202	399
General Q6	2.18	1.107	399
General Q7	2.51	1.160	399
General Q8	2.29	1.087	399
Specific Q1	2.22	1.009	399
Specific Q2	2.17	1.072	399
Specific Q3	3.06	1.094	399
Specific Q4	2.95	1.113	399
Specific Q5	1.90	1.016	399
Specific Q6	2.72	1.210	399
Specific Q7	3.29	1.148	399
Specific Q8	3.55	1.144	399
Specific Q9	3.28	1.127	399
Specific Q10	3.64	1.123	399

The initial Kaiser-Meyer-Olkin measure was 0.730, and the significance of the Bartlett's test (χ 2 (136) = 2966.68, p < .001).

Communalities

	Initial	Extraction
General Q1	1.00	0.334
General Q2	1.00	0.414
General Q4	1.00	0.640
General Q5	1.00	0.648
General Q6	1.00	0.689
General Q7	1.00	0.569
General Q8	1.00	0.640
Specific Q1	1.00	0.778
Specific Q2	1.00	0.713
Specific Q3	1.00	0.795
Specific Q4	1.00	0.824
Specific Q5	1.00	0.669
Specific Q6	1.00	0.726
Specific Q7	1.00	0.609
Specific Q8	1.00	0.616
Specific Q9	1.00	0.630
Specific Q8	1.00	0.589

Because the ultimate purpose of our factor analysis was to identify and compute composite scores for the factors underlying our initial interests, we undertook principal components analysis using an unrotated factor solution and scree plot with extraction based on Eigenvalues greater than 1. We also used Direct Oblimin rotation to determine which rotation was appropriate for our data. Critically, the components correlation matrix initially identified four factors, each of which had an absolute correlation value less than 0.32, indicating that a varimax rotation was the most appropriate factor analysis rotation for the variables of interest.

Component Matrix

	Component 1	Component 2	Component 3	Component 4
General Q1	.426	274	.277	.055
General Q2	.581	217	135	.106
General Q4	.736	273	068	.137
General Q5	.737	293	029	.136
General Q6	.759	287	086	.154
General Q7	.671	259	121	.193
General Q8	.757	143	198	.086
Specific Q1	.479	.172	.488	530
Specific Q2	.354	.238	.428	590
Specific Q3	.426	.623	449	155
Specific Q4	.314	.682	476	181
Specific Q5	.433	.109	.455	512
Specific Q6	.279	.509	581	227
Specific Q7	.170	.417	.535	.346

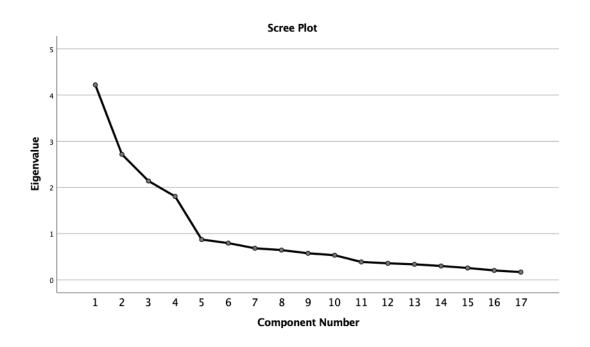
Specific Q8	.150	.592	.197	.453
Specific Q9	.233	.401	.499	.408
Specific Q10	.117	.608	.100	.443

For our next factor analysis, then, we used varimax rotation, and factor loadings of 0.3. As a result, factor loadings were sorted by size, identifying four factors that explained 64.03% of total variance and had strong Eigenvalues (>1).

Total Variance Explained

	Initial E	igenvalues	S		Extractio	n SS	R	otation SS	
		% of	Cumulative		% of	Cumulative		% of	Cumulative %
Componen	Total	Variance	%	Total	Variance	%	Total	Variance	
t									
1	4.221	24.830	24.830	4.221	24.830	24.830	3.801	22.357	22.357
2	2.718	15.985	40.816	2.718	15.985	40.816	2.529	14.875	37.232
3	2.140	12.588	53.403	2.140	12.588	53.403	2.289	13.464	50.696
4	1.807	10.628	64.031	1.807	10.628	64.031	2.267	13.336	64.031
5	.873	5.133	69.165						
6	.795	4.678	73.843						
7	.684	4.023	77.866						
8	.645	3.792	81.657						
9	.575	3.380	85.037						
10	.533	3.136	88.173						
11	.388	2.281	90.455						
12	.358	2.107	92.561						
13	.336	1.976	94.301						
14	.300	1.764	96.813						
15	.257	1.512	97.813						
16	.204	1.197	99.011						
17	.171	1.137	100.00						

Note extraction method is Principal Component Analysis



The rotated component matrix indicated which questions and their strength loaded under the four composite factors, which we use in our final analyses as indices of outcome variables, measured against propaganda type.

Rotated Component Matrix

	Component 1	Component 2	Component 3	Component 4
General Q6	.827			
General Q5	.798			
General Q4	.795			
General Q8	.765			
General Q7	.753			
General Q2	.638			
General Q1	.458			
Specific Q4		.893		
Specific Q3		.860		
Specific Q6		.848		
Specific Q9			.769	
Specific Q8			.758	
Specific Q7			.747	
Specific Q10			.711	
Specific Q1				.862
Specific Q2				.835
Specific Q5				.803

Note extraction method is Principal Component Analysis and the rotation method was Varimax with Kaiser Normalization rotating with convergence on 5 iterations.

Accordingly, we arrived at four main factors, using the underlying questions for each of the four composites identified by factor analysis. However, and very critical for our analysis, we decided not to analyze the third of the fourth component, which we characterized as ingroup and outgroup *intentions*. We consider this composite variable problematic insofar as it comprises both perceptions of the ingroup and the outgroup, including the responsibility and intentionality of both the ingroup and outgroup. We exclude this variable from the paper and our analyses because we do not know how to interpret it. Further, we suspect that the design of the study may have contributed to participants' confusion over how to answer questions related to the intentionality of an imagined ingroup as well as the intentionality of an imagined outgroup, and thus what they mean for our analysis. Hence, we focused on three composites that we identify as support for violence, ingroup empathy, and outgroup empathy.

5. Bayesian Multiple Linear Regression with Interaction Terms

When then undertook Bayesian regression analyses to determine whether there was a significant predictor for justification of violence, ingroup empathy, and outgroup empathy using a posterior estimate to be statistically significant at significance level 0.05 given the corresponding 95% PHD. After these analyses, we then examined a series of Bayesian regression analyses using interaction

terms, including the following, to determine whether nationalism, or other demographics, had significant interactions:

Posterior Summaries and Intervals						
Parameter	Mean	Standard	95% HPD Interval			
Constant	1.949	0.370	1.198	2.619		
Nationalism	0.799	1.014	-1.118	2.861		
National Composite	0.014	0.044	-0.073	0.098		
Interaction	-0.058	0.119	-0.285	0.182		

Posterior Summaries and Intervals							
Parameter	Mean	Standard	95% HPD Interval				
Constant	1.915	0.361	1.235	2.615			
Dehumanization	1.138	1.216	-1.205	3.506			
National Composite	0.022	0.043	-0.065	0.101			
Interaction	-0.136	0.147	-0.437	0.134			

Posterior Summaries and Intervals							
Parameter	Mean	Standard	95% HPD Interval				
Constant	2.012	0.356	1.319	2.701			
Religion	0.016	1.116	-2.211	2.120			
National Composite	0.007	0.042	-0.072	0.092			
Interaction	0.040	0.134	-0.206	0.312			

Posterior Summaries and Intervals							
Parameter Mean Standard 95% HPD Interval							
Constant	2.047	0.353	1.332	2.713			
Revenge	-0.023	1.072	-2.014	2.161			
National Composite	0.012	0.042	-0.069	0.097			
Interaction	-0.047	0.129	-0.300	0.205			

Posterior Summaries and Intervals							
Parameter Mean Standard 95% HPD Interval							
Constant	2.109	0.361	1.445	2.878			
Justice	-1.105	1.063	-3.234	0.915			
National Composite	0.001	0.043	-0.083	0.089			
Interaction	0.109	0.125	-0.137	0.356			

Posterior Summaries and Intervals					
Parameter	95% HPD	Interval			
Constant	2.114	0.346	1.452	2.787	
Stereotype	-1.181	1.292	-3.587	1.394	
National Composite	0.000	0.041	-0.078	0.082	

Interaction 0.121	0.155	-0.179	0.418	
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Posterior Summaries and Intervals					
Parameter Mean Standard 95% HPD Interval					
Constant	2.170	0.357	1.493	2.890	
PreViolence	-1.768	1.156	-3.999	0.600	
National Composite	-0.010	0.043	-0.092	0.075	
Interaction	0.223	0.140	-0.071	0.480	

Posterior Summaries and Intervals					
Parameter Mean Standard 95% HPD Interval					
Constant	1.994	0.361	1.299	2.715	
Threat	0.176	1.031	-1.837	2.125	
National Composite	0.012	0.043	-0.067	0.102	
Interaction	-0.021 0.124 -0.259 0.222				

Posterior Summaries and Intervals						
Parameter	Mean	Standard	95% HPD	Interval		
Constant	1.970	0.357	1.263	2.652		
Victimization	0.776	1.380	-1.996	3.377		
National Composite 0.014 0.043 -0.067 0.099						
Interaction	-0.084	0.163	-0.397	0.235		

	Posterior Su	mmaries and Interv	als	
Parameter	Mean	Standard	95% HPD	Interval
Constant	2.768	0.408	1.908	3.505
Nationalism	-1.232	1.179	-3.612	0.974
Self Esteem	-0.260	0.149	-0.537	0.040
Interaction	0.565	0.428	-0.284	1.394

	Posterior Summaries and Intervals				
Parameter	Mean	Standard	95% HPD	Interval	
Constant	1.879	0.140	1.596	2.140	
Nationalism	-0.320	0.418	-1.161	0.472	
Just World Beliefs	0.063	0.045	-0.024	0.152	
Interaction	0.210	0.133	-0.054	0.465	

Posterior Summaries and Intervals					
Parameter Mean Standard 95% HPD Interval				Interval	
Constant	2.022	0.124	1.774	2.258	
Nationalism	-0.679	0.387	-1.441	0.068	

Violent Media	0.022	0.065	-0.103	0.145
Interaction	0.539	0.196	0.158	0.923

Posterior Summaries and Intervals					
Parameter Mean Standard 95% HPD Interval					
Constant	2.069	0.115	1.860	2.308	
Nationalism	0.172	0.375	-0.555	0.925	
Religion Message	-0.002	0.036	-0.075	0.066	
Interaction	0.047	0.117	-0.180	0.283	

Posterior Summaries and Intervals					
Parameter Mean Standard 95% HPD Interval					
Constant	1.679	0.274	1.156	2.220	
Nationalism	1.352	0.783	-0.207	2.847	
Authority Message	0.103	0.073	-0.032	0.250	
Interaction	-0.278	0.205	-0.668	0.128	

6. Developed SAS macro for analyses

We provide here the code for Bayesian multiple regression analysis using PROC MCMC as well as Bayesian multiple regression with interaction terms using PROC MCMC.

6.1 Bayesian Multiple Regression Analysis using PROC MCMC

```
/* Bayesian Linear Regression created by Macro */
%macro BayesMLR(var);
proc mcmc data=test outpost=postout nmc=50000 nbi=5000 nthin=10 seed=1234
```

property=quanew DIC;

array beta[10];

parms beta:/T;

parms sigma2;

prior beta:~normal(0,var=10000);

prior sigma2~igamma(shape=0.01,scale=0.01);

xbeta=beta[1]+beta[2]*Dehumanization+beta[3]*ReligionT+beta[4]*Revenge+beta[5]*National ism+

beta[6]*Justice+beta[7]*Stereotype+beta[8]*PreViolence+beta[9]*Threat+beta[10]*Victi mization;

model &var.~normal(xbeta,var=sigma2);

run;

%mend BayesMLR;

6.2 Bayesian Multiple Regression with Interaction Terms using PROC MCMC

/* Bayesian Moderation Analyses */
%macro BayesMA(var1,var2,var3);
data test int;

```
set test;
inter=&var1.*&var2.;
run;
proc freq data=test int;
tables &var1.*&var2.;
run;
proc reg data=test int;
model &var3.=&var1. &var2. inter;
run;
proc glm data=test int;
model &var3.=&var1.|&var2.;
run;
proc mcmc data=test outpost=postout nmc=50000 nbi=5000 nthin=10 seed=1234
propcov=quanew DIC;
array beta[4];
  parms beta:/T;
parms sigma2;
prior beta:~normal(0,var=100);
prior sigma2~igamma(shape=2,scale=1);
xbeta=beta[1]+beta[2]*&var1.+beta[3]*&var2.+beta[4]*&var1.*&var2.;
  model &var3.~normal(xbeta,var=sigma2);
run;
%mend;
```

7. References for Supporting Information in Supplementary File 1: Appendix

Field, A. (2013). Discovering Statistics Using IBM SPSS Statistics, 4th Edition. London: Sage.

Oberschall, A. (2006). Vojislav Seselj's nationalist propaganda: Contents, techniques, aims and impacts, 1990-1994. United Nations.