

Supplementary Materials

Figure SM1

Illustration of SERP features

(a) Featured Snippet

Van de asielzoekers in de opvang werd 3% verdacht van een misdrijf. Nationaliteiten met relatief veel verdachten zijn Algerijns (44%), Marokkaans (33%) en Tunesisch (31%). Dit en meer concludeert het WODC in zijn rapport. 26 Jun 2023

Rijksoverheid
<https://www.rijksoverheid.nl/nieuws/2023/06/26/ov...>
 Overlast en criminaliteit houdt gelijke tred met aantal ...
 Over samenvattingen Feedback

(b) Top Stories

Voorpaginanieuws :
 Nieuws over asielzoekers en België >

Kritiek op weren alleenstaande asielzoekers België: 'In...
 18 uur geleden

'Mannenverbod' in Belgische asielopvang is tegen de wet, maar de...
 16 uur geleden

Dat België tijdelijk geen opvang wil geven aan alleenstaande mannen...
 19 uur geleden

'Ook stoppen met opvang alleenstaande asielzoeker' | Wat U Zegt
 1 dag geleden

Ok in het nieuws

Een jaar na chaos Ter Apel: opvang lijkt beter georganiseerd
 1 uur geleden

Ruud Koopmans schreef De asielotterij: 'In dit rare, wrede asielsysteem...
 2 dagen geleden

Meer nieuws →

(c) Twitter (users masked for privacy)

https://twitter.com/search/immigratie :
 immigratie op Twitter

Nexit
 De EU staat voor CENSUUR, boeren-haat & landjepik! Nu willen ze ook nog eens 3 MILJARD (!) van ons zuurverdiende geld! Knettergek!
 Doe een ❤️ & RT als je een #NEXIT wilt!
 Twitter - 20 uur geleden

Het failliet van het vreemdelingenbeleid: Nederland mag geen mensen uitzetten naar India en Marokko die via Oekraïne kwamen. Nederland heeft niet de bereidheid hun opvang stop te zetten; dat zou aan EU zijn. Nul soevereiniteit als het gaat om immigratie. nos.nl/artikel/2488597-...
 Twitter - 19 uur geleden

Forum voor...
 Ons land wordt in de uitverkoop gezet door het immigratie- en klimaatbeleid van de gevestigde partijen. #FVD
 Twitter - 23 uur geleden

(d) Videos

Video's :

Noodopvang Malden bijna klaar voor 800 asielzoekers
 De Gelderlander
 1 week geleden

Knettergek: gemeente koopt dikke villa van 2 miljoen voo...
 YouTube - Omroep PowNed
 26 Jun 2023

Twee dodelijke ongevallen • Megadorp voor 800 asielzoek...
 De Gelderlander
 6 dagen geleden

Alle bekijken →

(e) Knowledge Panel

European Migrant Crisis 2015


 Meer afbeeldingen

Europese vluchtelingencrisis

Met de Europese vluchtelingencrisis, ook wel Europese migrantencrisis of Europese migratiecrisis genoemd, wordt primair bedoeld op de honderdduizenden migranten die sinds 2013 de Middellandse Zee oversteken richting de Europese Unie en de politieke reacties daarop. [Wikipedia](#)

Startdatum: 2015
Einddatum: 2016

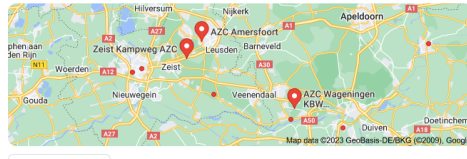
Mensen zoeken ook naar Nog 5+ tonen

[Brexit-
onderhand](#) [Europese
staatschu](#) [Syrische
Burgeroorl](#) [Kernramp
van
Fukushima](#)

Feedback

(f) Local Results

Plaatsen :



Openingsstijden ▾

AZC Amersfoort
 Geen reviews · Vluchtelingenkamp
 Amersfoort · 088 715 9200
 Geopend · Sluit om 23:00
[Website](#) [Route](#)

Zeist Kampweg AZC
 Geen reviews · Vluchtelingenkamp
 Zeist · 06 50199325
 24 uur geopend
[Website](#) [Route](#)

AZC Wageningen KBW (keijenbergseweg) (PrePOL)
 Geen reviews · Vluchtelingenkamp
 Wageningen · 088 715 5900
 Geopend · Sluit om 22:00
[Route](#)

Meer plaatsen →

Table SM1*Connection between research design and van Hoof et al. (2024)*

Issue	Condition	van Hoof et al. (2024)	
		Cluster ^a	Explanation
Immigration	Anti	Asylum	“[...] search for information on accommodation centres, crime and integration as well as use ‘asielzoeker’ (<i>asylum seeker</i>) over other terms. These factors characterise them as concerned about the consequences of incoming asylum applications rather than the immigrants themselves and their background. In fact, this group feels most negative towards immigration, which cannot be explained by their general political orientation, which suggests that their feelings about immigration are separate from their general political stance.” (p. 14).
	Pro	Refugees	“[...] explicitly does not use terms with negative connotations and all respondents in this class used ‘vluchteling’ (<i>refugee</i>) in at least one query. [...] They also search for the underlying reasons for migration (causes). [...] This search preference is reflected in their political profile. This type consists of people who are most positive towards immigration. Moreover, the regression results point out that this type is explained not solely by their positivity towards immigration, but also by their political leaning in general.” (p. 13)
Climate	Low	Consequences	“[...] mainly search for consequences of climate change, and rarely search for potential solutions, individual action, politics and policy or relevant actors. Notably, regarding the climate as a higher priority (combined with a pro-climate attitude) is related to search queries about the topics <i>other</i> than consequences of climate change. It seems probably the latter is probably the latter is more generic and will come to mind for those who do not regard it of high priority.” (p. 16–17)
		Politics & Information	“[...] enters queries about politics and policy as well as general climate change information (e.g. statistical or research related). Notably, they rarely search for solutions or individual behaviour, suggesting they view politics as responsible rather than themselves.” (p. 17)
	High	Factors & Actors	“[...] formulate queries about relevant actors (i.e. agriculture, industry, transport) and factors (i.e. carbon and nitrogen emissions), and expand climate change by searching for other environmental problems. They also have an above average probability for search queries about (renewable) energy and individual behaviour, which often go hand-in-hand.” (p. 17)
		Solutions	“[...] mainly formulate search queries about potential solutions to climate change, including actions they can take themselves (e.g., ‘eating less meat’).” (p. 18)

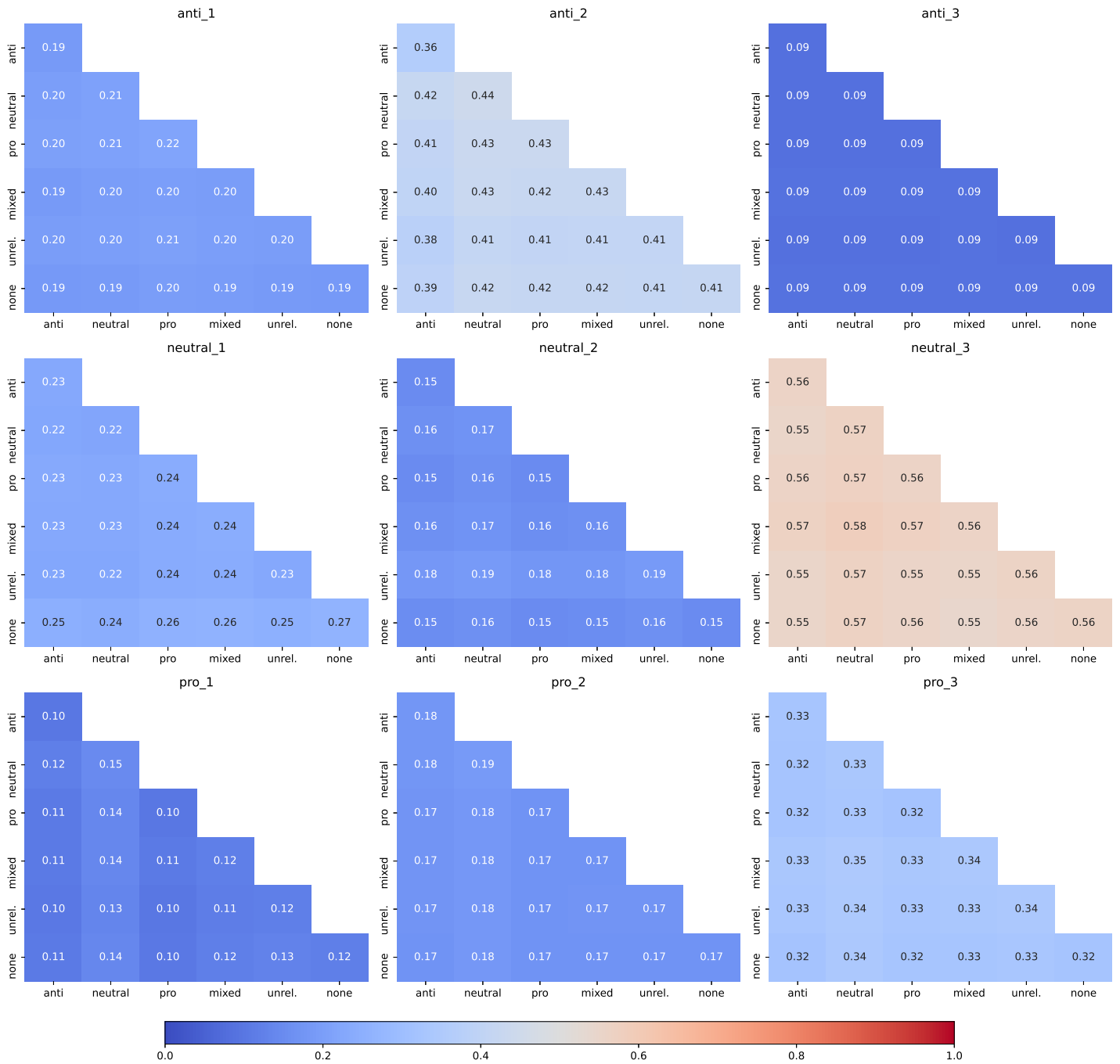
Note. ^a van Hoof et al. (2024) refers to these clusters as “searcher types.”

Table SM3*Climate training phase search terms per condition*

Low	Neutral	High	Mixed	Unrelated
opwarming; opwarming van de aarde; stijging zeespiegel; global warming; zeespiegel; ijskap; noordpool; ozonlaag; broeikas-effect; gevolgen klimaatverandering; smelten ijskap; klimaat gevolgen; het broeikas effect; broeikasgassen; weersverandering; zeespiegelstijging; smeltende ijskappen; poolijs; ijskappen; zuidpool; smelten ijs; noordpoolijs; verwarming aarde; hoe klimaatverandering nederland beïnvloedt; klimaat opwarming; opwarmen aarde	klimaatverandering; klimaat verandering; klimaatveranderingen; klimaat 2020	zonnepanelen; politiek klimaat; klimaattop; klimaat toekomst; klimaat en politiek; klimaatbeleid; groene stroom; kernenergie; klimaat discussie; klimaat doelstellingen; klimaat samenleving; klimaat akkoord; groene energie; klimaatdoelen nederland; klimaat cijfers; klimaatneutraal; verduurzamen; klimaatdoelstellingen; klimaatproblematiek; co2 uitstoot nederland; klimaat hoax; klimaat verdrag; energie besparen; wat kan ik doen aan klimaatverandering; biomassa; afval scheidend; van het gas af	opwarming; opwarming van de aarde; stijging zeespiegel; warming; zeespiegel; ijskap; noordpool; ozonlaag; broeikas-effect; gevolgen klimaatverandering; smelten ijskap; klimaat gevolgen; het broeikas effect; broeikasgassen; weersverandering; zeespiegelstijging; smeltende ijskappen; poolijs; ijskappen; zuidpool; smelten ijs; noordpoolijs; verwarming aarde; hoe klimaatverandering nederland beïnvloedt; klimaat opwarming; opwarmen aarde; zonnepanelen; politiek klimaat; klimaattop; klimaat toekomst; klimaat en politiek; klimaatbeleid; groene stroom; kernenergie; klimaat discussie; klimaat doelstellingen; klimaat samenleving; klimaat akkoord; groene energie; klimaatdoelen nederland; klimaat cijfers; klimaatneutraal; verduurzamen; klimaatdoelstellingen; klimaatproblematiek; co2 uitstoot nederland; klimaat hoax; klimaat verdrag; energie besparen; wat kan ik doen aan klimaatverandering; biomassa; afval scheiden	upo; nederland; rtl; duitsland; oekraïne; bbc; rusland; belgië; vs; sbs; europa; eu; china; psv; amsterdam; wk; rotterdam; suske en wiske; veronica; lezers; discovery; sudoku; poetin; national geographic

Figure SM2

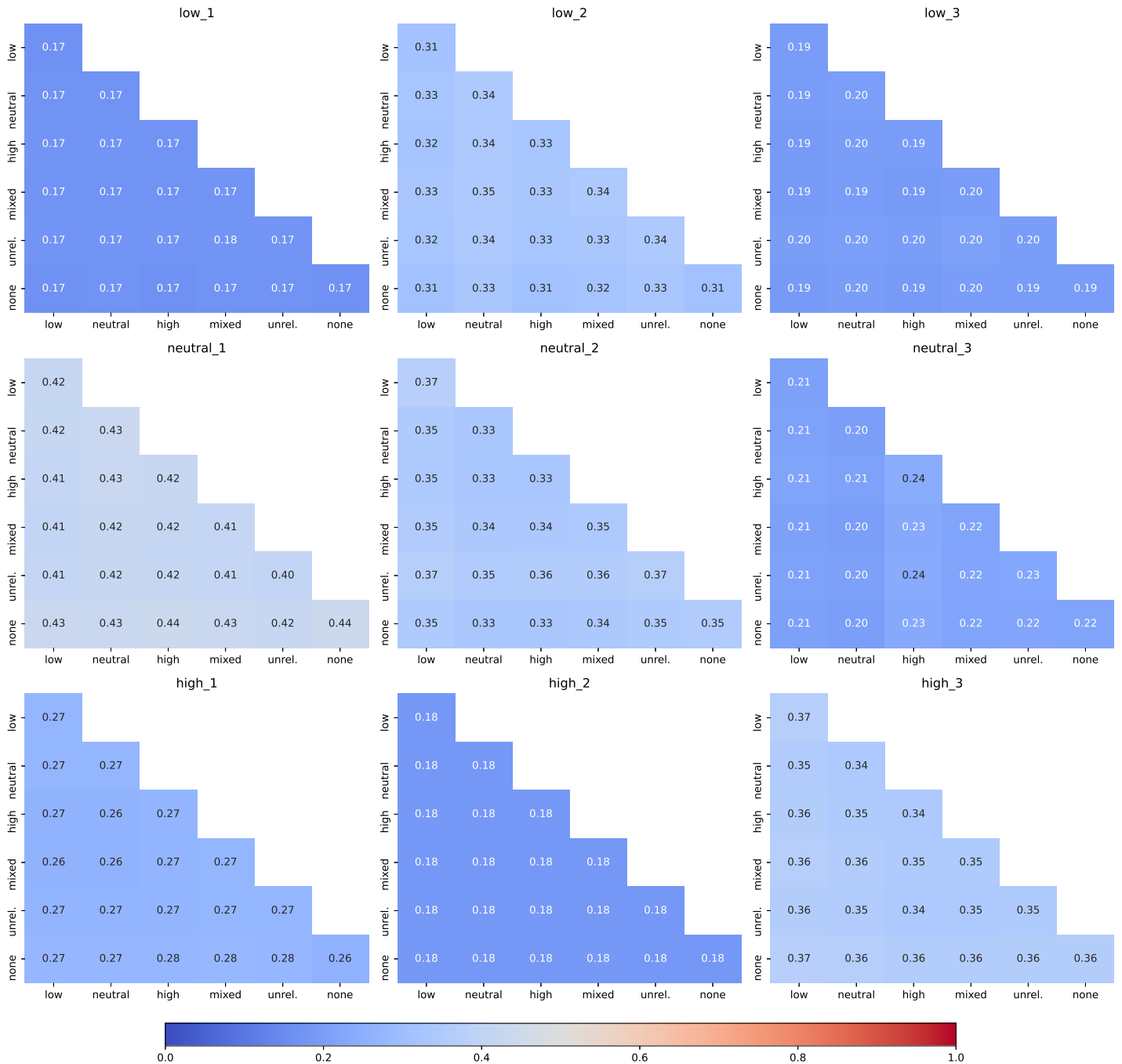
Immigration: Average dissimilarity of sources (IRBO ($p = 0.8$)) between algorithmic personalisation conditions per search query, grouped horizontally by user choice conditions



Note. Each subfigure displays the IRBO ($p = 0.8$) for each algorithmic personalisation-pair per search query, grouped vertically by user choice condition. The lack of variation within each subfigure indicates that close to zero variation is caused by algorithmic personalisation.

Figure SM3

Climate: Average dissimilarity of sources (IRBO ($p = 0.8$)) between algorithmic personalisation conditions per search query, grouped horizontally by user choice conditions



Note. Each subfigure displays the IRBO ($p = 0.8$) for each algorithmic personalisation-pair per search query, grouped vertically by user choice condition. The lack of variation within each subfigure indicates that close to zero variation is caused by algorithmic personalisation.

Table SM4*Immigration: Display of SERP features, grouped by search queries*

	<i>anti_1</i>	<i>anti_2</i>	<i>anti_3</i>	<i>neutral_1</i>	<i>neutral_2</i>	<i>neutral_3</i>	<i>pro_1</i>	<i>pro_2</i>	<i>pro_3</i>
Knowledge Panel	0.00	0.58	0.00	0.00	0.00	0.00	0.60	1.00	0.00
Local results	1.00	1.00	0.00	0.01	0.00	0.00	1.00	0.00	0.00
Top stories	1.00	0.89	0.00	0.00	0.00	0.00	1.00	0.00	0.00
Twitter	0.00	0.97	0.00	1.00	0.00	0.00	0.00	0.00	0.00
Videos	0.93	1.00	0.00	0.00	0.00	0.00	0.01	0.00	0.00
Featured snippet	0.00	0.00	1.00	0.00	0.00	0.00	0.00	0.00	0.00
Scholarly articles	0.00	0.00	1.00	0.00	0.00	0.00	0.00	0.00	0.00
Related searches	1.00	1.00	0.99	0.99	1.00	1.00	1.00	0.00	1.00
Images	0.02	0.00	0.00	0.00	0.05	0.00	0.00	0.01	0.00
Advertisements	0.00	0.09	0.04	0.00	0.00	0.00	0.08	0.00	0.04
People also ask	0.98	1.00	0.99	0.96	1.00	0.99	1.00	0.99	1.00

Note. The values indicate the share of SERPs containing a specific SERP feature under each condition.

Table SM5*Climate: Display of SERP features, grouped by search queries*

	<i>low_1</i>	<i>low_2</i>	<i>low_3</i>	<i>neutral_1</i>	<i>neutral_2</i>	<i>neutral_3</i>	<i>high_1</i>	<i>high_2</i>	<i>high_3</i>
Knowledge Panel	0.00	1.00	0.00	0.00	1.00	0.00	0.00	0.00	1.00
Local results	0.00	0.00	0.00	0.00	0.09	0.00	0.00	0.00	0.00
Top stories	0.00	0.00	0.00	1.00	0.00	0.00	0.19	0.00	0.00
Twitter	0.00	0.00	0.00	0.00	0.00	0.05	0.00	0.00	0.00
Videos	0.00	0.01	0.00	0.04	0.00	0.00	0.00	0.00	0.00
Featured snippet	0.00	0.00	1.00	0.00	0.00	0.62	0.00	0.00	0.00
Related searches	0.80	0.82	0.77	0.86	0.72	0.78	0.85	0.75	0.85
Images	0.00	0.00	0.96	0.00	0.00	0.21	0.00	0.00	0.00
Advertisements	0.30	0.01	0.25	0.01	0.01	0.32	0.04	0.03	0.03
People also ask	0.72	0.78	0.63	0.68	0.73	0.76	0.72	0.68	0.73

Note. The values indicate the share of SERPs containing a specific SERP feature under each condition.

Details on search query selection procedure

The search queries that inform our research design are derived from van Hoof et al. (2024). The search queries used were selected following a systematic procedure to ensure reliability and replicability. For each issue, we took the following steps:

1. Retrieve the full list of search queries as used by the groups. Immigration: *Pro*, *Anti*; Climate: *High*, *Low*; see Table SM1 for more detail on how these groups align with the clusters identified by van Hoof et al. (2024).
2. Removed “ineffective queries,” as labelled by the human coders for the study of van Hoof et al. (2024). This category refers to queries that are unrelated to the topic or do not resemble actual search queries (e.g., “something about climate change”).

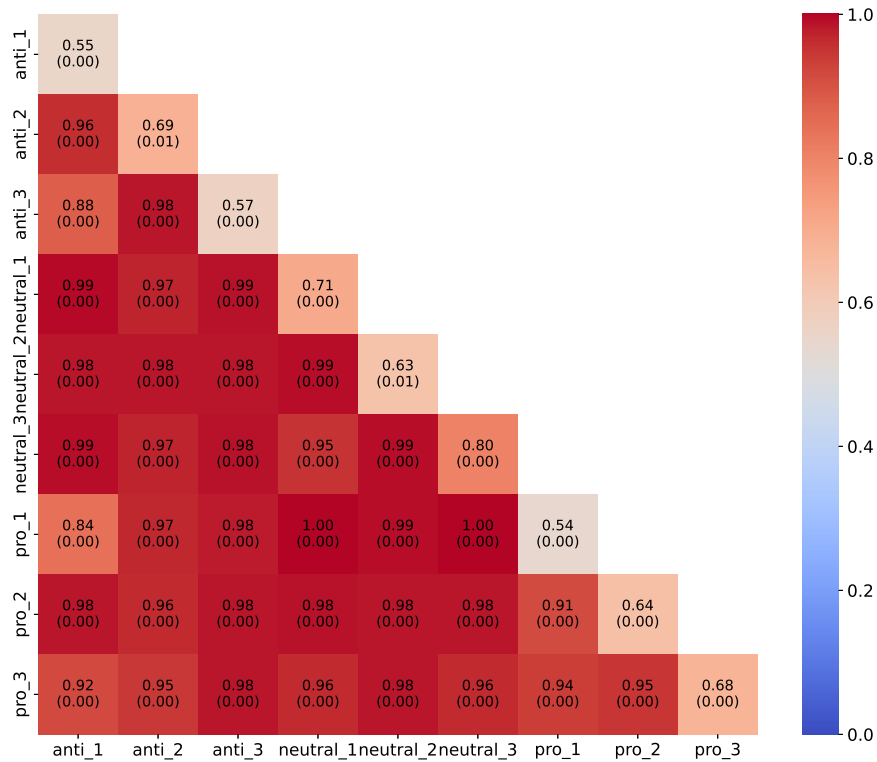
3. For each issue, identified the search queries that distinguish the two groups the most from the opposing group using the Frequency Profiling method (Rayson & Garside, 2000) (i.e., calculating the log-likelihood of observed and expected frequencies). Search query lists are sorted by frequency.
4. Selected search terms used at least three times by the members of the groups.
5. Created a *Mixed* list out of the Pro and Anti or High and Low. Both are equally represented in number of search queries. Where lists differ in length, the least frequent search terms are excluded from the longer list.
6. Created a *Neutral* search query list based on the most frequent search queries used across groups.
7. Manually checked for face validity: (a) *Pro* and *Anti* or *High* and *Low* search query lists reflect most aspects of the indicators identified by van Hoof et al. (2024) with at least one query. (b) None of the search queries on any list were significantly outdated.
8. From the *Pro* and *Anti* or *High* and *Low* lists, set three search queries aside used for *testing* (user choices in search queries), the most frequent, least frequent, and medium (middle of the list). The remainder is used for *training* (algorithmic personalisation).

Alternative metrics for dissimilarity

Inverted Ranked-Biased Overlap ($p = 0.95$)

Figure SM4

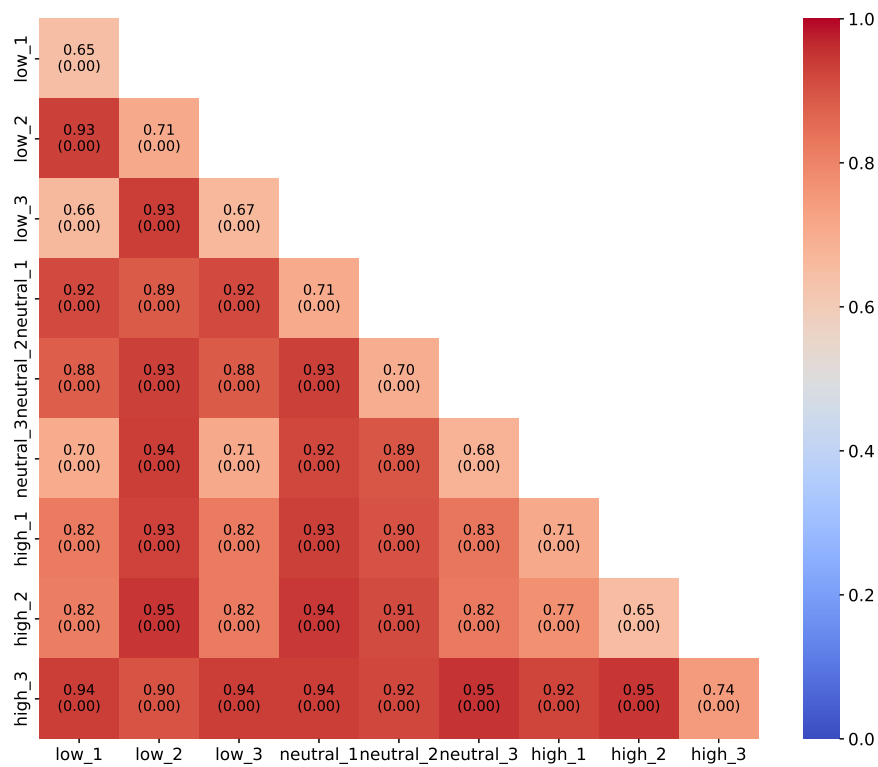
Immigration: Average dissimilarity of sources (IRBO ($p=0.95$)) between and within search queries



Note. Values represent the average IRBO ($p = 0.95$) for each search query-pair, grouped by user choice condition. The scores on the diagonal represent the dissimilarity within search queries, while the scores below the diagonal represent the similarity between search queries. Values in brackets represent the standard deviation of the mean dissimilarity scores for algorithmic personalisation conditions, grouped by search query pair. The standard deviations are close to zero, indicating little impact of algorithmic personalisation.

Figure SM5

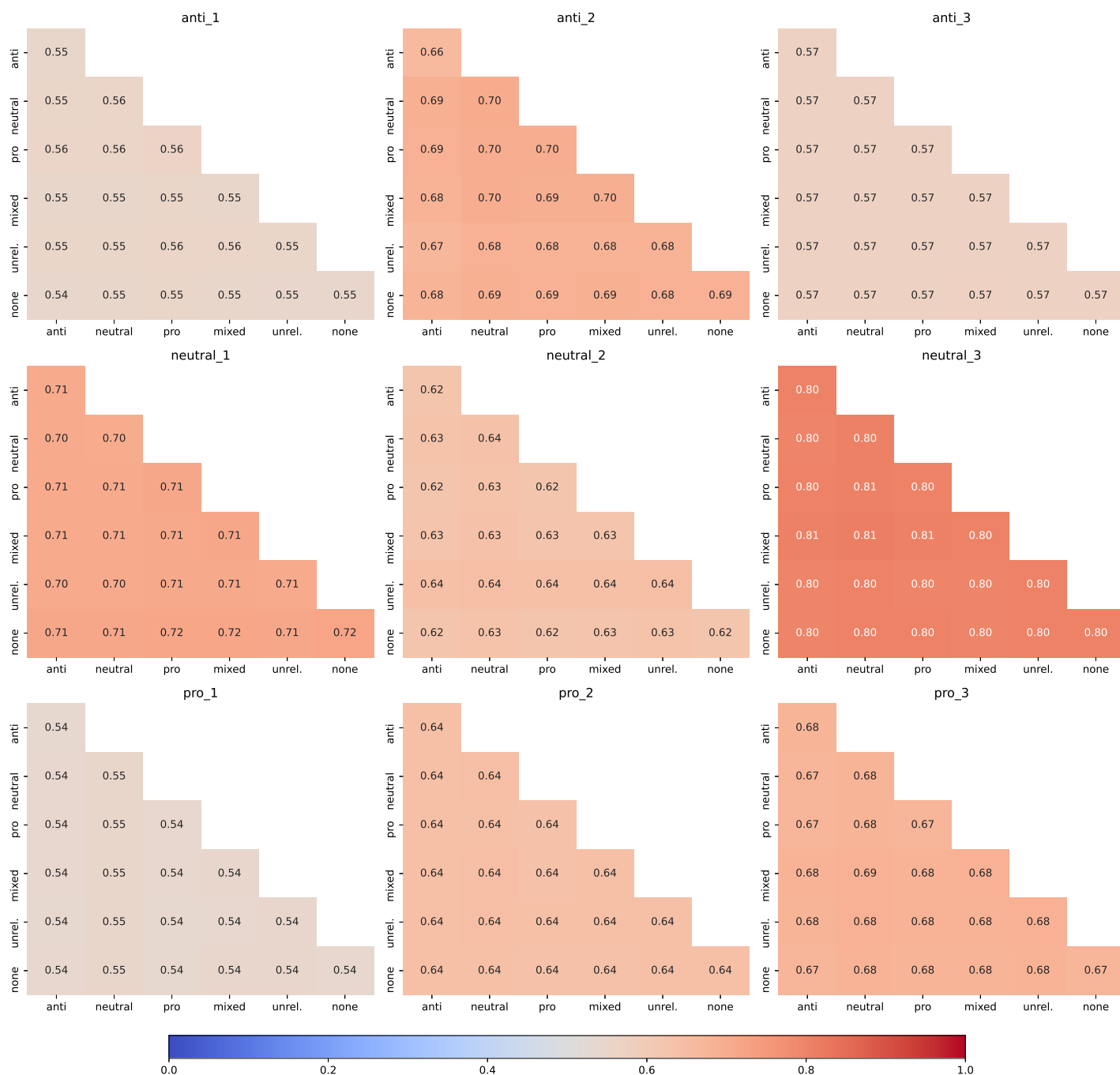
Climate: Average dissimilarity of sources (IRBO ($p=0.95$)) between and within search queries



Note. Values represent the average IRBO ($p = 0.95$) for each search query-pair, grouped by user choice condition. The scores on the diagonal represent the dissimilarity within search queries, while the scores below the diagonal represent the similarity between search queries. Values in brackets represent the standard deviation of the mean dissimilarity scores for algorithmic personalisation conditions, grouped by search query pair. The standard deviations are close to zero, indicating little impact of algorithmic personalisation.

Figure SM6

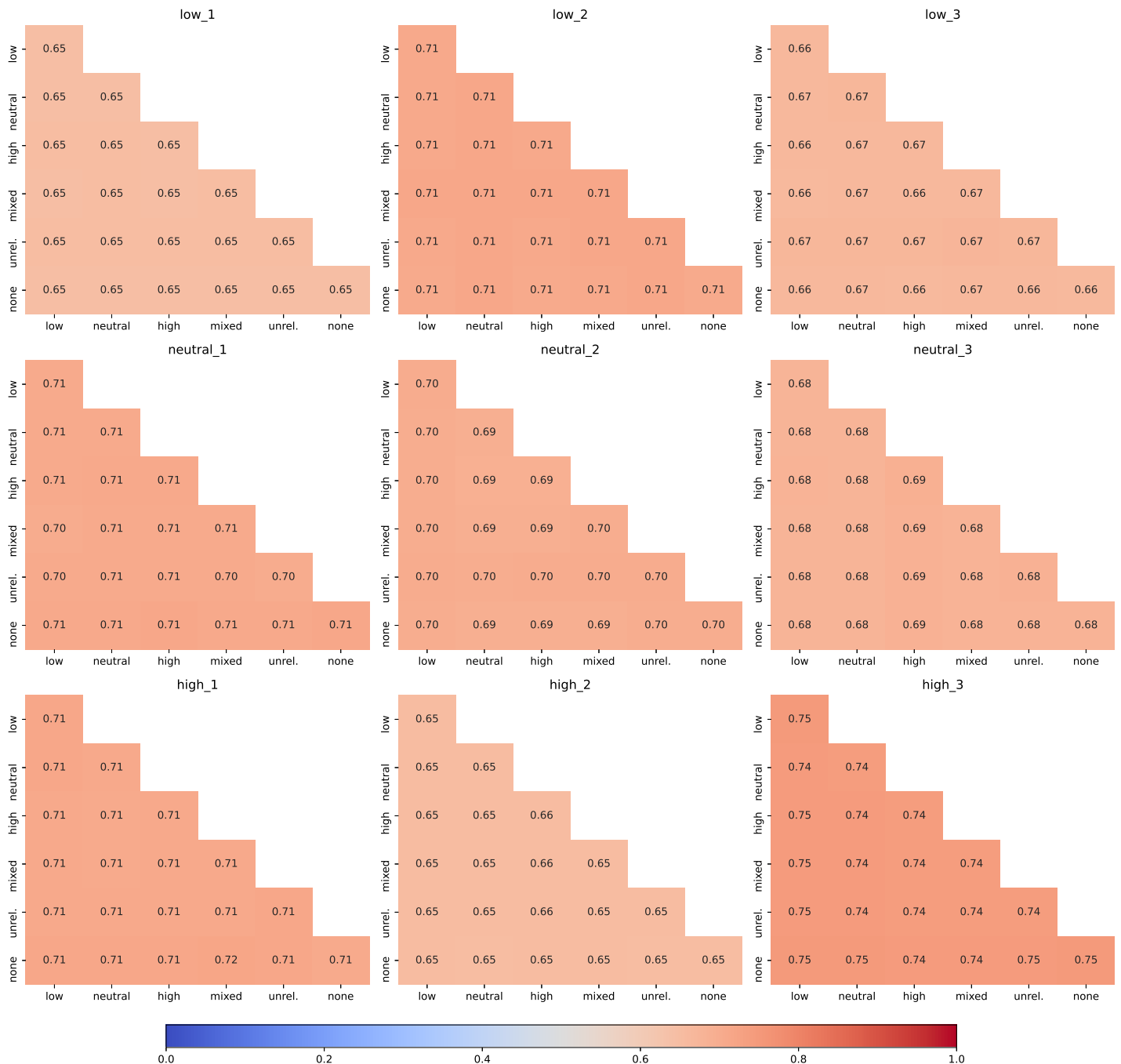
Immigration: Average dissimilarity of sources (IRBO ($p = 0.95$)) between algorithmic personalisation conditions per search query, grouped horizontally by user choice conditions



Note. Each subfigure displays the IRBO ($p = 0.95$) for each algorithmic personalisation-pair per search query, grouped vertically by user choice condition. The lack of variation within each subfigure indicates that close to zero variation is caused by algorithmic personalisation.

Figure SM7

Climate: Average dissimilarity of sources (IRBO ($p = 0.95$)) between algorithmic personalisation conditions per search query, grouped horizontally by user choice conditions

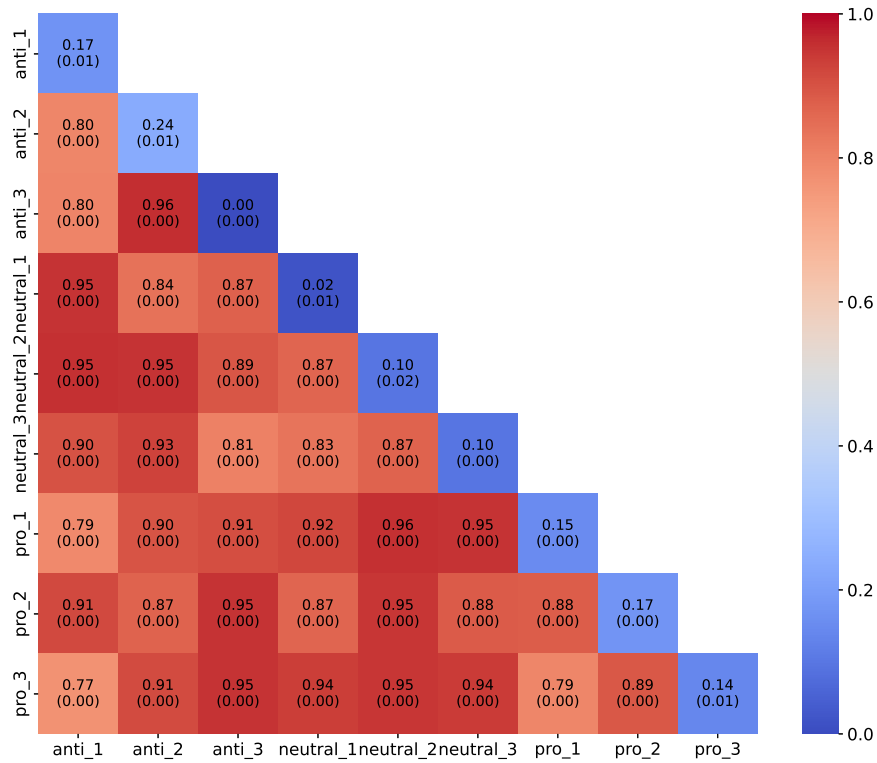


Note. Each subfigure displays the IRBO ($p = 0.95$) for each algorithmic personalisation-pair per search query, grouped vertically by user choice condition. The lack of variation within each subfigure indicates that close to zero variation is caused by algorithmic personalisation.

Inverted Jaccard Index

Figure SM8

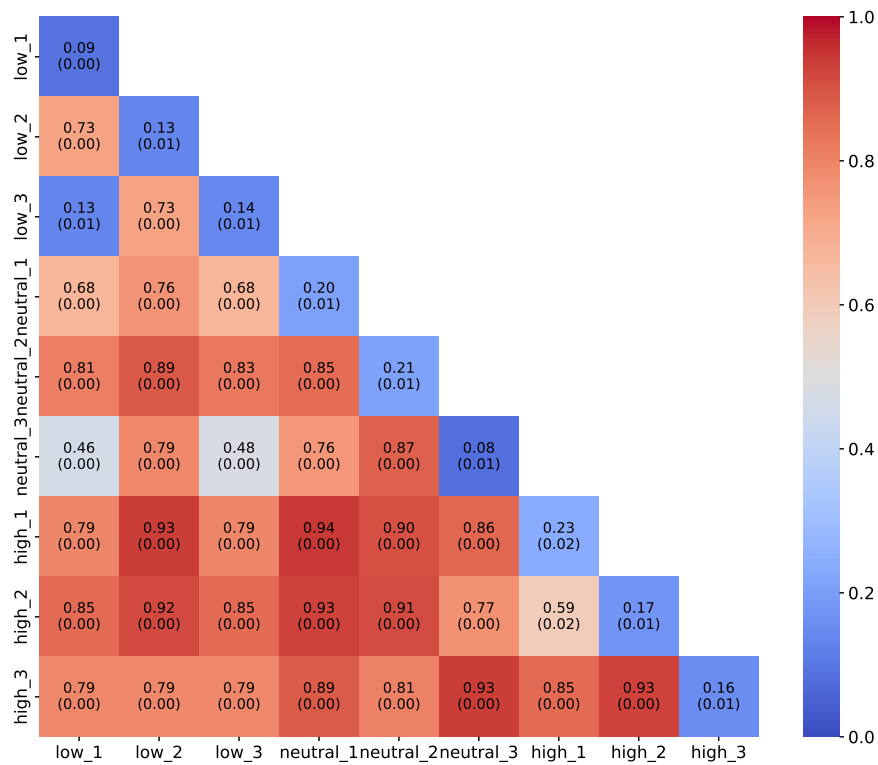
Immigration: Average dissimilarity of sources (Inverted Jaccard Index) between and within search queries



Note. Values represent the average Inverted Jaccard Index for each search query-pair, grouped by user choice condition. The scores on the diagonal represent the dissimilarity within search queries, while the scores below the diagonal represent the similarity between search queries. Values in brackets represent the standard deviation of the mean dissimilarity scores for algorithmic personalisation conditions, grouped by search query pair. The standard deviations are close to zero, indicating little impact of algorithmic personalisation.

Figure SM9

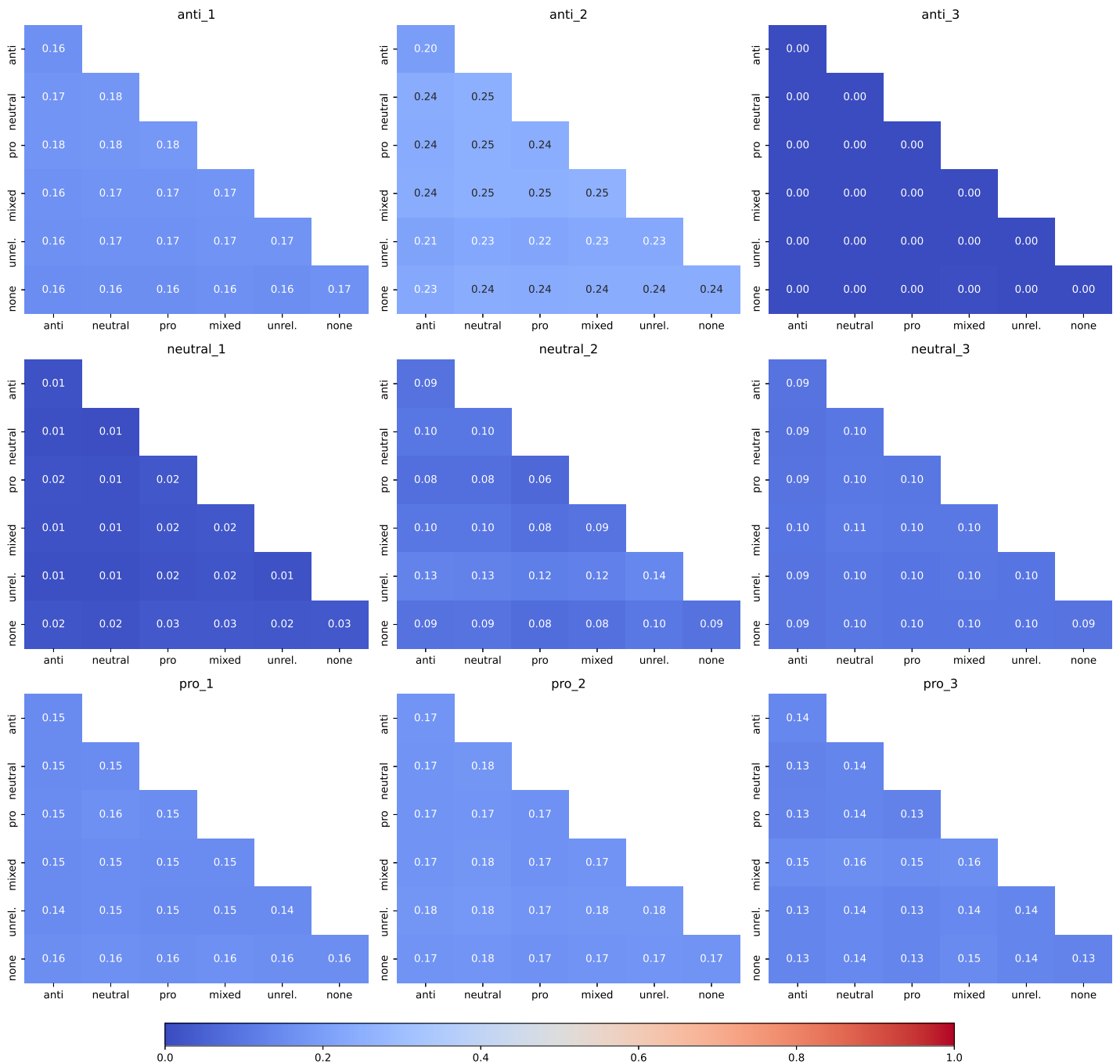
Climate: Average dissimilarity of sources (Inverted Jaccard Index) between and within search queries



Note. Values represent the average Inverted Jaccard Index for each search query-pair, grouped by user choice condition. The scores on the diagonal represent the dissimilarity within search queries, while the scores below the diagonal represent the similarity between search queries. Values in brackets represent the standard deviation of the mean dissimilarity scores for algorithmic personalisation conditions, grouped by search query pair. The standard deviations are close to zero, indicating little impact of algorithmic personalisation.

Figure SM10

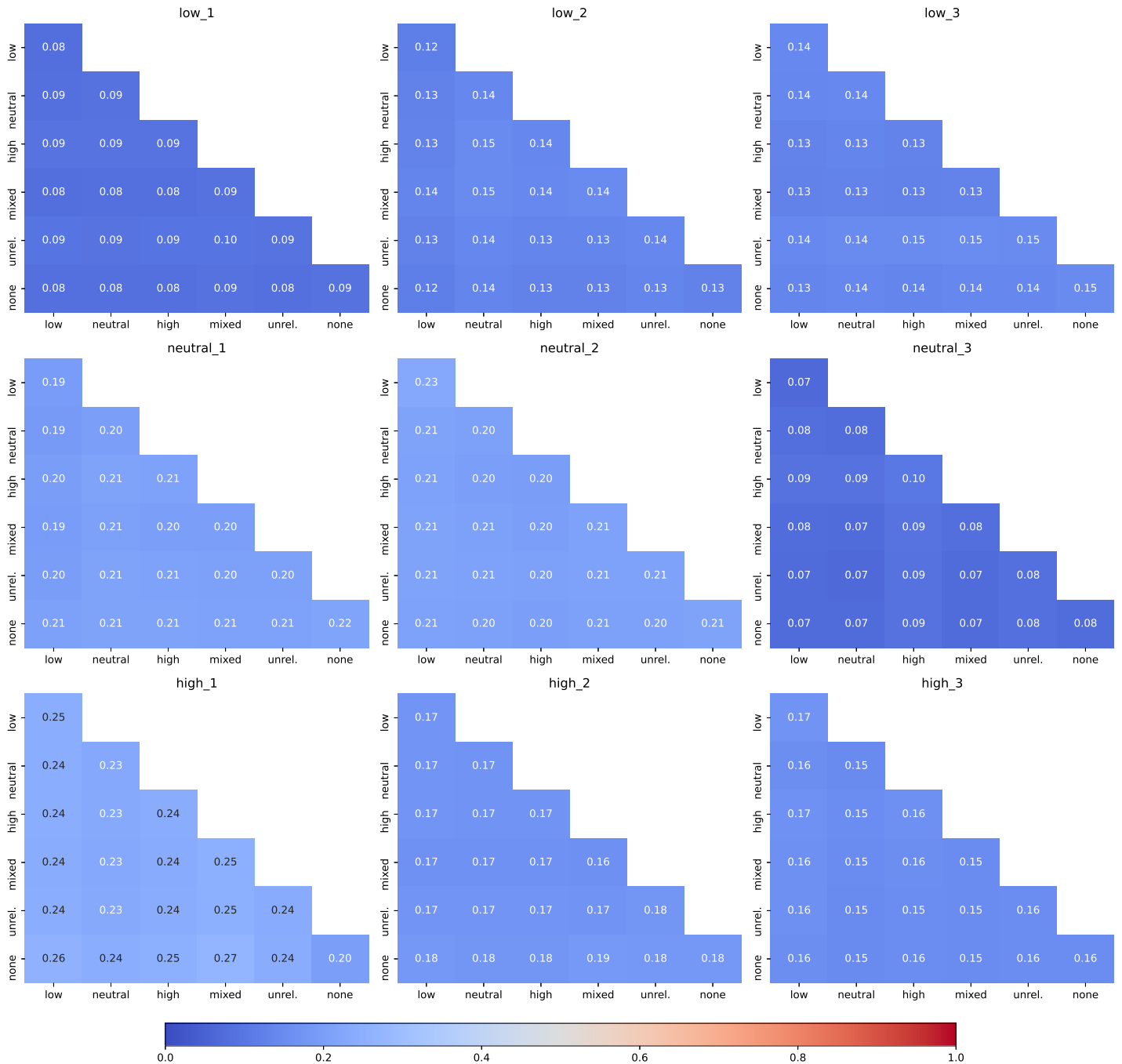
Immigration: Average dissimilarity of sources (Inverted Jaccard Index) between algorithmic personalisation conditions per search query, grouped horizontally by user choice conditions



Note. Each subfigure displays the Inverted Jaccard Index for each algorithmic personalisation-pair per search query, grouped vertically by user choice condition. The lack of variation within each subfigure indicates that close to zero variation is caused by algorithmic personalisation.

Figure SM11

Climate: Average dissimilarity of sources (Inverted Jaccard Index) between algorithmic personalisation conditions per search query, grouped horizontally by user choice conditions



Note. Each subfigure displays the Inverted Jaccard Index for each algorithmic personalisation-pair per search query, grouped vertically by user choice condition. The lack of variation within each subfigure indicates that close to zero variation is caused by algorithmic personalisation.