**Supplementary Information**

The Zoom solution: Promoting effective cross-ideological communication online

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**This PDF file includes:**

Supplementary text

Tables S1 to S7

**Scheduling and Use of Confederates**

Four participants were scheduled for each experimental session, with two on each side of the issue. To accommodate for no-shows, two confederates were hidden in a breakout room of the Zoom call, ready to pose as participants. If a participant did not show, one of the participants on the other side of the issue was sent home, and confederates filled the role of the no-show and the sent-home participants. If two participants did not show, but were on opposing sides of the issue, confederates filled the role; otherwise, the session was rescheduled. As such, sessions were either run with 4 real participants, or with 2 real participants and two confederates (one real participant and confederate on each side of the issue).

Regardless of condition, all participants first had a conversation with an ingroup member. If confederates were used, each real participant’s ingroup conversation partner would be with a confederate. The CIC always consisted of two real participants talking to each other. In the *private* condition the instructions remained the same as when there were no confederates. However, in the *public* condition with confederates the participants were told that after the second conversation more instructions would follow. Once the CIC with real participants was over, one of the experimenters gave instructions that Pro 2 and Con 2 (the confederates) would be sent to a separate breakout room for a private conversation. Pro 1 and Con 1 (participants) were instructed to not leave the Zoom session as they would be given instructions for a post-study survey. The two confederates were moved to a breakout room as if another conversation were going to occur. After completion of the post-study survey participants were debriefed.

Confederates were extensively trained by watching videos from test sessions, mock conversations, and guidance on how to engage in the conversation without overbiasing the participant. It was strongly emphasized that confederates avoid introducing new ideas, and instead do their best to agree or expand upon the ideas the participant brought up during the ingroup conversation.

**Table S1.** *Demographic characteristics of participants*

|  |  |  |
| --- | --- | --- |
|  | *n = 122* | Sample % |
| Gender |  |  |
| Female | 59 | 48 |
| Male  Non-binary | 59  4 | 48  4 |
| Race/Ethnicity |  |  |
| African American/black | 12 | 9.8 |
| Asian | 9 | 7.4 |
| Hispanic/Latinx  White  Mixed race a | 11  79  10 | 9.0  64.8  8.2 |
| Other/Prefer not to answer | 1 | 0.8 |
| Political Ideology |  |  |
| Strongly Conservative | 6 | 4.9 |
| Conservative | 8 | 6.6 |
| Slightly Conservative | 14 | 11.5 |
| Moderate | 21 | 17.2 |
| Slightly Liberal | 10 | 8.2 |
| Liberal | 31 | 25.4 |
| Strongly Liberal | 32 | 26.2 |

*Note.* Participants age range 18-40 (*M* = 30.36, *SD* = 5.65).

a Mixed race participants included: African American/black and white (1), Asian and white (3), Hispanic/Latinx and Pacific Islander (1), and American Indian/Alaskan Native and White (4).

**Table S2**

*Forecasts about the CIC and oppositional conversation partner*

|  |  |
| --- | --- |
| Forecast | Abbreviation |
| What percentage of the time would you be in conflict with the person of the opposite opinion during this conversation | Conflict |
| What percentage of the time would you be getting along with the person of the opposite opinion during this conversation | Getting along |
| I feel this interaction would be enjoyable | Enjoy |
| I feel this interaction would be stressful | Stress |
| I would feel comfortable in this interaction | Comfort |
| I feel the interaction would be difficult to get through | Difficult |
| I think I would like them as a person | Like partner |
| I think I could respect their opinions | Respect |
| I believe their ideas would be valid | Valid |
| I believe their ideas would be convincing | Convinced |
| I believe their statements would be driven by emotion | Emotional |
| I believe their statements would be driven by logic | Logical |

*Note.* Conflict and getting along were assessed on a 0-100% scale. All other variables were measured from 1 (strongly disagree) to 7 (strongly agree). Questions are written as they were asked of individuals in the pre-study survey to gather their forecasts about the CIC. When participants reported on their CIC experience in the post-study survey, the same questions were asked, modified to be in past tense. For example, “I think I would like them as a person” was changed to “I liked them as a person”.

**Table S3**

*Dependent samples t-tests for Participants’ Forecasts vs Experience in the CIC (n = 106).*

|  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | Forecasted | | Experienced | | *t* | *p* | Cohen’s *d* | 95% CI | |
| *M* | *SD* | *M* | *SD* |  |  |
| Conflict | 54.44 | 25.54 | 23.26 | 26.95 | 9.85 | <.001 | -0.96 | | [-37.5, -24.9] |
| Getting along | 48.26 | 23.72 | 78.82 | 24.10 | 10.15 | <.001 | 0.99 | | [24.6, 36.5] |
| Enjoy | 3.60 | 1.59 | 5.72 | 1.39 | 13.44 | <.001 | 1.23 | | [1.80, 2.43] |
| Stress | 4.33 | 1.66 | 2.47 | 1.66 | 11.04 | <.001 | -1.01 | | [-2.19, -1.53] |
| Comfort | 4.25 | 1.64 | 5.70 | 1.32 | 9.44 | <.001 | 0.87 | | [1.14, 1.75] |
| Difficult | 4.08 | 1.66 | 2.65 | 1.65 | 7.94 | <.001 | -0.73 | | [-1.79, -1.08] |
| Like partner | 3.70 | 1.30 | 5.66 | 1.31 | 13.48 | <.001 | 1.31 | | [1.67, 2.25] |
| Respect | 4.82 | 1.63 | 5.95 | 1.25 | 7.29 | <.001 | 0.71 | | [0.82, 1.44] |
| Valid | 4.22 | 1.56 | 5.42 | 1.49 | 7.74 | <.001 | 0.75 | | [0.89, 1.51] |
| Convinced | 3.30 | 1.70 | 4.30 | 1.89 | 5.44 | <.001 | 0.53 | | [0.64, 1.36] |
| Emotional | 5.24 | 1.33 | 4.41 | 1.94 | 4.06 | <.001 | -0.40 | | [-1.24, -0.42] |
| Logical | 3.37 | 1.61 | 4.57 | 1.72 | 7.05 | <.001 | 0.69 | | [0.86, 1.54] |

*Note.* The mean difference is reported as experienced minus forecasted. Conflict and getting along were assessed on a 0-100% scale. All other variables were measured from 1 (strongly disagree) to 7 (strongly agree). Exact wording of questions is reported in Table S1.

**Affective Forecasting analyses for participants in the top quartile of experienced conflict**

One possible explanation for the large inaccuracies in participants’ forecasts may be that some participants may have had polite, nonconfrontational, and reasonable conversations that are atypical of the norm. To test this explanation, we look at individuals whose experienced conflict was in the top 25% of participants. These individuals experienced conflict in-line with their original expectations, and yet they still exhibited inaccurate forecasts in a number of domains (see Table S3). These ‘high conflict’ participants still found themselves having a more positive, and less negative experience in several domains. While not all factors remain significant, the robustness of more general affective experiences such as enjoyment, stress, and liking is remarkable, especially given the low statistical power that comes with the reduced sample size of *n* =26. Among the other factors, the mean differences show the same general direction as in the total sample, so it is possible that with a larger sample size of these ‘high conflict’ conversations these effects could be confirmed. This suggests that even for people who have a more conflict-filled interaction in line with their original expectations, the experience is still more positive than expected.

**Table S4**

*Dependent samples t-tests for Forecasts vs Experience in the CIC for participants in the top 25% of experienced conflict (n = 26).*

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | Forecasted | | Experienced | | *t* | *p* | | Cohen’s *d* | | 95% CI |
| *M* | *SD* | *M* | *SD* |  |  | |
| Conflict | 61.46 | 27.00 | 63.50 | 21.81 | 0.41 | .688 | 0.08 | | [-8.31, 12.39] | |
| Getting along | 45.46 | 25.77 | 49.58 | 26.58 | 0.67 | .510 | 0.13 | | [-8.55, 16.78] | |
| **Enjoy** | 3.57 | 1.91 | 5.10 | 1.88 | 3.97 | <.001 | 0.73 | | [0.74, 2.32] | |
| **Stress** | 4.13 | 2.03 | 3.13 | 2.00 | 2.61 | .014 | -0.48 | | [-1.78, -0.22] | |
| **Comfort** | 4.21 | 1.74 | 5.17 | 1.71 | 3.22 | .003 | 0.60 | | [0.35, 1.58] | |
| Difficult | 4.10 | 1.90 | 3.27 | 1.86 | 1.98 | .057 | -0.36 | | [-1.69, 0.03] | |
| **Like partner** | 3.65 | 1.47 | 4.96 | 1.78 | 4.25 | <.001 | 0.83 | | [0.68, 1.94] | |
| Respect | 4.73 | 1.56 | 5.27 | 1.61 | 1.90 | .070 | 0.37 | | [-0.05, 1.12] | |
| Valid | 3.88 | 1.66 | 4.58 | 1.72 | 2.06 | .050 | 0.40 | | [-0.01, 1.39] | |
| Convinced | 3.08 | 1.83 | 3.23 | 1.77 | 0.55 | .589 | 0.11 | | [-0.43, 0.73] | |
| Emotional | 5.15 | 1.54 | 4.88 | 1.93 | 0.74 | .464 | -0.15 | | [-1.01, 0.48] | |
| **Logical** | 3.04 | 1.66 | 3.73 | 1.91 | 2.09 | .047 | 0.41 | | [0.01, 1.38] | |

*Note.* The mean difference is reported as experienced minus forecasted. Conflict and getting along were assessed on a 0-100% scale. All other variables were measured from 1 (strongly disagree) to 7 (strongly agree). Exact wording of questions is reported in Table S1. Significance, indicated by bolded font, was reported at an alpha level of 0.05.

**Table S5**

*Dependent samples t-Tests for Issue-based attitudes and feelings, pre- to post-experiment (n = 122)*

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | Pre-CIC | | Post-CIC | | *t* | *p* | Cohen’s *d* | | | 95% CI |
| *M* | *SD* | *M* | *SD* |  |  | | |
| Attitude  Extremity | 2.36 | 0.75 | 2.15 | 0.78 | 2.49 | .014 | | -0.23 | [-0.38, -0.04] | |
| Informed | 2.79 | 0.78 | 3.10 | 0.64 | 4.88 | <.001 | | 0.44 | [0.19, 0.44] | |
| Caring | 3.00 | 0.90 | 3.24 | 0.72 | 3.01 | .003 | | 0.27 | [0.08, 0.38] | |
| Importance | 3.12 | 0.92 | 3.35 | 0.73 | 2.74 | .007 | | 0.25 | [0.06, 0.40] | |
| Correctness | 2.56 | 0.86 | 2.25 | 0.94 | 3.69 | <.001 | | -0.33 | [-0.47, -0.14] | |
| Outgroup  Warmth | 2.95 | 1.47 | 3.58 | 1.59 | 3.41 | <.001 | | 0.31 | [0.27, 1.00] | |

*Note.* The mean difference is reported as post-CIC minus pre-CIC. All variables were measured from 1 (strongly disagree) to 7 (strongly agree). Exact wording of questions is reported in Table S1.

**Table S6**

*Independent samples t-Tests for condition-based differences in the CIC (n = 122)*

|  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | Private | | Public | | *t* | *p* | Cohen’s *d* | | 95% CI |
| *M* | *SD* | *M* | *SD* |  |
| Conflict | 19.07 | 25.23 | 29.27 | 30.06 | 2.03 | .044 | 0.39 | [0.27, 27.14] | |
| Coder rated | 18.05 | 18.02 | 25.44 | 19.64 | 2.17 | .032 | 0.39 | [0.64, 14.14] | |
| Getting along | 82.25 | 22.87 | 72.81 | 28.00 | 2.04 | .043 | -0.37 | [-18.60, -0.29] | |
| Coder rated | 85.34 | 14.69 | 76.02 | 16.67 | 3.28 | .001 | -0.59 | [-14.95, -3.70] | |
| Difficult | 2.30 | 1.61 | 3.02 | 1.63 | 2.17 | .032 | 0.44 | [0.03, 0.61] | |
| Coder rated | 2.24 | 0.80 | 2.56 | 0.83 | 2.17 | .032 | 0.39 | [0.03, 0.61] | |
| Stress | 2.17 | 1.55 | 2.74 | 1.71 | 1.95 | .054 | 0.35 | [-0.01, 1.16] | |
| Coder rated | 2.11 | 0.71 | 2.56 | 0.78 | 3.40 | <.001 | 0.62 | [0.19, 0.72] | |
| Respect | 6.05 | 1.29 | 5.76 | 1.41 | 1.19 | .236 | -0.22 | [-0.78, 0.19] | |
| Coder rated | 5.83 | 0.89 | 5.41 | 0.91 | 2.55 | .012 | -0.46 | [-0.74, -0.09] | |

*Note.* Conflict and getting along were assessed on a 0-100% scale. All other variables were measured from 1 (strongly disagree) to 7 (strongly agree). Exact wording of questions is reported in Table S1.

**Table S7**

*Mixed subjects Analyses of Variance for liking of conversation partner*

Within Subjects Effects

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  | Sum of Squares | *df* | Mean Square | *F* | *p* | η2 |
| Partner | 6.399 | 1, 120 | 6.399 | 7.319 | 0.008 | .019 |
| Condition x Partner | 3.530 | 1, 120 | 3.530 | 4.038 | 0.047 | .011 |

*Note.* Type II Sum of Squares

Between Subjects Effects

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  | Sum of Squares | | *df* | Mean Square | *F* | *p* | η2 |
| Condition | 1.822 | 1, 120 | | 1.822 | 0.992 | 0.321 | .006 |

*Note.* Type II Sum of Squares

Simple comparisons paired samples t-Test

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | Ingroup Partner | | CIC Partner | | *t* | *p* | Cohen’s *d* | 95% CI |
| *M* | *SD* | *M* | *SD* |  |
| Private | 5.90 | 0.97 | 5.82 | 1.32 | 0.50 | .616 | -0.07 | [-0.25, 0.41] |
| **Public** | 5.97 | 0.94 | 5.40 | 1.36 | 3.26 | .002 | -0.41 | [0.22, 0.91] |

*Note.* In the *public* condition participants liked their ingroup partner more than the CIC partner, even after Bonferroni correction. No difference in liking of the conversation partner was found for the *private* condition.

Simple comparisons independent samples t-Test

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | Private | | Public | | *t* | *p* | Cohen’s *d* | 95% CI |
| *M* | *SD* | *M* | *SD* |  |
| Ingroup Partner | 5.90 | 0.97 | 5.97 | 0.94 | 0.39 | .696 | 0.07 | [-0.89, 0.07] |
| CIC partner | 5.82 | 1.32 | 5.40 | 1.36 | 1.70 | .091 | 0.31 | [-0.27, 0.41] |

*Note.* No significant difference between conditions for liking of the ingroup or CIC partner.