**Please note: The dataset and r-script used in the analysis can also be provided as supplementary materials.**

**Supplementary materials: Tables**

**Table 1: Previous studies of Ukrainian public opinion about Russia**

| **Study** | **Response variable(s), data** | **Language (native/convenience)** | **Identity/ ethnic identification** | **Region of residence** | **Settlement type (urban/rural)** | **Income/living standards** | **Religion/church attendance** | **Age** | **Gender** | **Level of education** | **Level of parental education** | **Occupation/employment status** | **Views on other political issues** | **English language ability** | **Personal travel/family abroad** | **Satisfaction with life** | ***Media use*** |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Kubicek  (2000) | Binary variables (‘Russia’/‘other’ and ‘USA and EU’/‘other’) based on question asking with which county Ukraine’s future was ‘most closely tied’.  Nationally representative surveys from 1992 & 1996 | - | Y | Y | - | Y | - | Y | N | N | - | - | - | - | - | - | - |
| O’Loughlin  (2001) | Binary variable (‘Russia’/‘other’) based on question asking with which county Ukraine’s future was ‘most closely tied’.  Nationally representative surveys from 1992 & 1996 | Y | Y | Y | Y | Y | Y | Y | - | - | - | Y | - | - | - | - | - |
| McAllister & White  (2002) | Scale of inclination to view NATO as a threat  Nationally representative survey from 2000 | - | - | - | Y | - | - | Y | Y | Y | - | - | Y | - | - | - | - |
| White et al  (2002) | Scale of support for the EU based on positive/negative impression of EU and desire to join.  Nationally representative survey from 2000 | - | Y | - | N | Y | - | Y | Y | N | - | - | - | - | Y | - | - |
| Barrington & Herron  (2004) | Scale of positive/negative stereotyping of ‘ethnic’ Russians and Ukrainians  Nationally representative survey from 1998 | N | Y | Y | N | Y | N | N | N | N | - | - | - | - | - | - | - |
| White et al  (2006) | Scale of support for NATO membership  Nationally representative survey from 2004 | - | - | Y | N | Y | - | Y | Y | N | - | - | Y | - | - | - | - |
| Munro  (2007) | Scale of support for CIS vs. Western Europe based on question asking ‘with which countries Ukraine’s future lies’.  Nationally representative survey from 2005 | Y | Y | Y | N | Y | N | Y | N | Y | - | - | Y | - | - | - | - |
| Barrington and Farranda  (2009) | Scale of attitude towards Russia based on six questions.  Nationally representative survey from 2005 | Y | Y | Y | N | N | Y | Y | Y | N | - | - | - | - | - | - | - |
| White et al.  (2010) | Scale combining support for NATO and EU membership and scale combining regret for USSR’s demise and support for CIS integration  Nationally representative survey from 2006 | Y | Y | - | - | Y | Y | Y | Y | Y | - | N | - | - | - | - | - |
| Kulyk  (2011) | Binary variable (yes/no) based on question asking whether Ukraine’s future lay in union with Russia and Belarus  Nationally representative survey from 2006 | Y | N | Y | Y | N | - | N | N | N | - | - | Y | - | - | - | - |
| Gentile  (2015) | Categorical variable (‘West-leaning’, ‘Russia-leaning’ and ‘neither’) based on support for joining the EU and/or NATO  Survey representative of Luhansk city population from 2013 | - | Y | - | - | - | - | Y | Y | Y | Y | Y | Y | Y | - | Y | - |
| Y = effect found in at least one model; N = no effect found; - = not investigated. Operationalisation of explanatory variables differed from study to study. | | | | | | | | | | | | | | | | | |

**Table 2: Frequency distributions of categorical predictor and control variables**

|  |  |  |
| --- | --- | --- |
| **Variables and response categories** | | ***n*** |
| Gender | Male | 458 |
|  | Female | 542 |
| Education | Incomplete secondary | 67 |
|  | Secondary | 609 |
|  | Higher | 321 |
|  | NA | 3 |
| Income | Lowest | 171 |
|  | Low | 383 |
|  | Middle | 352 |
|  | Higher | 77 |
|  | NA | 17 |
| Settlement type | Odesa | 441 |
|  | Other urban settlement | 242 |
|  | Village | 317 |
| Birthplace | Ukraine | 890 |
|  | Russia | 62 |
|  | Other | 43 |
|  | NA | 5 |
| Lived in Russia | Yes | 43 |
| (for at least 6 months in past 25 years) | No | 948 |
|  | NA | 9 |
| Friends or relatives in Russia | Yes | 246 |
| (with whom in regular contact) | No | 746 |
|  | NA | 8 |
| Travels regularly to Russia | Yes | 34 |
| (at least twice per year) | No | 955 |
|  | NA | 11 |
| Lived in ‘West’ | Yes | 29 |
| (for at least 6 months in past 25 years) | No | 962 |
|  | NA | 9 |
| Friends or relatives in ‘West’ | Yes | 152 |
| (with whom in regular contact) | No | 840 |
|  | NA | 8 |
| Travels to ‘West’ | Yes | 36 |
| (at least twice per year) | No | 953 |
|  | NA | 11 |
| Religious attendance | None | 644 |
| (at least once per month) | ROCMP | 189 |
|  | Other | 125 |
|  | NA | 42 |
| Discusses foreign affairs | Never/rarely | 406 |
|  | Sometimes | 290 |
|  | Often | 277 |
|  | NA | 27 |
| Prefers Russian-language broadcasts | Yes | 390 |
| (over Ukrainian-language or both) | No | 602 |
|  | NA | 8 |
| Time spent following news via | None | 141 |
| television | < 1 hour | 474 |
|  | > 1 hour | 374 |
|  | NA | 11 |
| Time spent following news via | None | 596 |
| internet | < 1 hour daily | 213 |
|  | > 1 hour daily | 184 |
|  | NA | 7 |

**Table 3: Proportion of Russian news sources (RNS), both narrowly and broadly defined, in news media repertoire**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  | **0** | **0 < RNS < 0.1** | **0.1 ≤ RNS < 0.2** | **0.2 ≤ RNS < 0.3** | **0.3 ≤ RNS < 0.4** | **0.4 ≤ RNS** | **NA** |
| #respondents  (narrow definition) | 788 | 12 | 49 | 40 | 18 | 21 | 72 |
| #respondents  (broad definition) | 587 | 16 | 97 | 99 | 59 | 70 | 72 |

***Table 4: ‘Problem definition’ questions used to assess narrative reception, with frequency distribution of responses***

|  |  |  |
| --- | --- | --- |
| ***Question*** | ***Response*** | ***n*** |
| The USA violates the sovereignty of other countries | It is not a real problem | 139 |
| There is some truth in it, but the problem is relatively not worrying | 313 |
| It is a real and worrying problem | 300 |
| NA/DK | 248 |
| Russia is showing imperialist tendencies | It is not a real problem | 149 |
| There is some truth in it, but the problem is relatively not worrying | 264 |
| It is a real and worrying problem | 298 |
| NA/DK | 289 |
| Western countries try to change regimes they dislike, using democracy promotion as an excuse | It is not a real problem | 176 |
| There is some truth in it, but the problem is relatively not worrying | 312 |
| It is a real and worrying problem | 200 |
| NA/DK | 312 |
| Russia is trying to destabilise Ukraine | It is not a real problem | 139 |
| There is some truth in it, but the problem is relatively not worrying | 217 |
| It is a real and worrying problem | 396 |
| NA/DK | 248 |
| The USA is seeking domination in international affairs | It is not a real problem | 95 |
| There is some truth in it, but the problem is relatively not worrying | 303 |
| It is a real and worrying problem | 358 |
| NA/DK | 244 |
| Russia is spreading false information about Ukraine | It is not a real problem | 113 |
| There is some truth in it, but the problem is relatively not worrying | 260 |
| It is a real and worrying problem | 380 |
| NA/DK | 247 |
| Countries of the West and Europe are losing interest in solving Ukraine’s problems | It is not a real problem | 170 |
| There is some truth in it, but the problem is relatively not worrying | 322 |
| It is a real and worrying problem | 221 |
| NA/DK | 287 |
| Russia is trying to stop Ukraine getting closer to Western countries and EU | It is not a real problem | 116 |
| There is some truth in it, but the problem is relatively not worrying | 260 |
| It is a real and worrying problem | 326 |
| NA/DK | 298 |
| The interviewer introduced the questions as follows: ‘I will now read you eight claims taken from various news media and politicians’ statements. Each statement is considered disputable to some degree and some of them may sound provocative… Now please tell me, in your opinion, which of the claims constitute real, worrying problems?’ | | |

***Table 5: ‘Causal’ and ‘solution’ questions used to assess narrative reception, with frequency distribution of responses***

|  |  |  |
| --- | --- | --- |
| **Question** | **Response** | ***n*** |
| The armed conflict in eastern Ukraine. Which is a bigger obstacle to solving the problem? | Continuing Russian support for the separatists | 233 |
| The unwillingness of the Ukrainian authorities to grant Donbas special status | 210 |
| Neither factor is important  OR Both factors matter equally | 351 |
| NA/DK | 206 |
| Strained relations between the European Union and Russia. Which is a bigger obstacle to solving the problem? | Antidemocratic tendencies in Russia which contradict European values | 188 |
| The influence of the USA, which wants to prevent partnership between Russia and European countries | 245 |
| Neither factor is important  OR Both factors matter equally | 279 |
| NA/DK | 288 |
| Unsatisfactory reform results in Ukraine since President Yanukovych left power. Which is a bigger obstacle to solving the problem? | Russia’s attempts to destabilise Ukraine | 120 |
| Inadequate actions by the Ukrainian leadership | 475 |
| Neither factor is important  OR Both factors matter equally | 246 |
| NA/DK | 159 |
| Which proposal seems better to you? | Countries like Russia and China should balance the power of Western countries in a more multi-polar world | 138 |
| Countries like Russia and China should democratise their political systems according to the model of Western countries | 176 |
| Neither proposal seems good to me | 179 |
| NA/DK | 507 |
| Which proposal seems better to you? | The USA and countries of Europe should continue their sanctions policy against Russia, so that the Russian authorities change their foreign policy | 295 |
| The USA and countries of Europe should cooperate more closely with Russia to solve global problems | 302 |
| Neither proposal seems good to me | 127 |
| NA/DK | 276 |
| Which proposal seems better to you? | Ukraine should strive to integrate with the EU for the sake of economic and political reforms | 281 |
| Ukraine should be wary of integration with the EU due to possible risks to the Ukrainian economy and traditional values | 333 |
| Neither proposal seems good to me | 124 |
| NA/DK | 262 |
| Which proposal seems better to you? | Ukraine should recognise the right of Donbas to strive for the closest relations with Russia | 132 |
| Ukraine should do everything to return Donbas under Kyiv’s control | 412 |
| Neither proposal seems good to me | 168 |
| NA/DK | 288 |
| Interviewers introduced the first three questions by saying: ‘I will now mention three political problems, and for each problem, two possible obstacles to solving the problem. In each case, please say which obstacle, in your opinion, is more important in preventing the problem being solved. At the same time, it is recognised that the problems are complicated and have various causes not mentioned here.’  Interviewers introduced the latter four questions by saying: ‘The last block of questions concerns possible paths to improving the situation in the world and in Ukraine. I will now read you four pairs of suggestions, again taken from the mass media and politicians’ statements. Of each pair, please choose the suggestion which seems better to you.’ | | |

**Table 6: Two-factor model of support for problem definitions from Ukrainian and Russian strategic narratives (pattern matrix)**

|  |  |  |  |
| --- | --- | --- | --- |
| **Item** | **Factor 1** | **Factor 2** | **Communality** |
| Russia is showing imperialist tendencies | **0.91** | *0.07* | 0.80 |
| Russia is trying to destabilise Ukraine | **0.91** | *-0.06* | 0.85 |
| Russia is spreading false information about Ukraine | **0.91** | *-0.02* | 0.83 |
| Russia is trying to stop Ukraine getting closer to Western countries and EU | **0.89** | *0.00* | 0.79 |
| The USA violates the sovereignty of other countries | *-0.04* | **0.97** | 0.97 |
| The USA is seeking domination in international affairs | *0.02* | **0.78** | 0.60 |
| Western countries try to change regimes they dislike using democracy promotion as an excuse | *0.08* | **0.62** | 0.37 |
| Sum of squared loadings | 3.27 | 1.94 |  |
| Cumulative variance explained | 0.47 | 0.74 |  |

**Table 7: Single-factor model of support for causal attributions and solutions from the Ukrainian strategic narrative rather than the Russian strategic narrative (pattern matrix)**

|  |  |  |
| --- | --- | --- |
| **Item** | **Factor 1** | **Communality** |
| The USA and EU should continue sanctions against Russia  (rather than cooperating more closely with Russia) | 0.81 | 0.65 |
| Russian support for separatists is a greater obstacle to peace in Donbas  (rather than Kyiv’s unwillingness to grant the region special status) | 0.80 | 0.64 |
| Antidemocratic trends in Russia are a greater obstacle to EU-Russia relations (rather than American influence on Europe) | 0.77 | 0.60 |
| Ukraine should strive for integration with the EU  (rather than beware of integration with the EU) | 0.69 | 0.48 |
| Russian efforts to destabilise Ukraine are greater obstacle to reform results (rather than shortcomings of Ukraine’s leadership) | 0.64 | 0.41 |
| Ukraine should do everything to regain control of Donbas  (rather than allow Donbas to strive for close relations with Russia) | 0.62 | 0.39 |
| Countries like Russia and China should democratise in line with the Western model (rather than balancing power of Western countries) | 0.42 | 0.18 |
| Sum of squared loadings | 3.35 |  |
| Variance explained | 0.48 |  |

**Table 8: Summary statistics for factor-based measures of narrative support (response variables)**

|  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  | **Min.** | **1st Qu.** | **Median** | **Mean** | **3rd Qu.** | **Max** | **NA** |
| RV1: Agreement with Ukrainian problem definitions | -1.86 | -0.45 | 0.25 | -0.01 | 0.92 | 1.03 | 162 |
| RV2: Agreement with Russian problem definitions | -1.95 | -0.40 | -0.17 | 0.00 | 0.66 | 1.31 | 179 |
| RV3: Agreement with Ukrainian (rather than Russian) causal attributions and solutions | -1.40 | -0.52 | 0.02 | -0.01 | 0.47 | 1.44 | 42 |

**Table 9: OLS regression models of support for Russian and Ukrainian strategic narratives**

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  | RV1: Agreement with Ukrainian (‘anti-Russian’) problem definitions | | RV2: Agreement with Russian (‘anti-Western’) problem definitions | | RV3: Agreement with Ukrainian (over Russian) causal claims and solutions | |
|  | **Model 1** | **Model 2** | **Model 3** | **Model 4** | **Model 5** | **Model 6** |
| Age (years) | -0.006\*\* [0.002]  (-0.009, -0.002) | -0.005\*\* [0.002]  (-0.009, -0.002) | 0.005\*\* [0.002]  (0.001, 0.009) | 0.005\*\* [0.002]  (0.001, 0.009) | -0.003\* [0.001]  (-0.006, -0.001) | -0.004\*\* [0.001]  (-0.006, -0.001) |
| Income (ref: lowest) |  | | | | | |
| Low | - | - | 0.202\* [0.088]  (0.008, 0.394) | 0.197\* [0.088]  (0.018, 0.380) | 0.151\* [0.061]  (0.024, 0.263) | 0.154\* [0.061]  (0.038, 0.265) |
| Middle | - | - | 0.218\* [0.092]  (0.016, 0.427) | 0.204\* [0.092]  (0.013, 0.406) | 0.156\* [0.065]  (0.026, 0.283) | 0.159\* [0.065]  (0.040, 0.278) |
| Higher | - | - | 0.067 [0.135]  (-0.185, 0.371) | 0.041 [0.135]  (-0.240, 0.346) | 0.333\*\* [0.096]  (0.152, 0.533) | 0.351\*\* [0.095]  (0.167, 0.540) |
| Birthplace (ref: Ukraine) |  | | | | | |
| Russia | - | - | - | - | - | - |
| Other | - | - | - | - | - | - |
| Regular communication with friends or relatives in Russia | - | - | 0.167\* [0.071]  (0.030, 0.302) | 0.164\* [0.071]  (0.018, 0.294) | -0.152\*\* [0.051]  (-0.243, -0.054) | -0.155\*\* [0.050]  (-0.262, -0.036) |
| Lived in Russia | - | - | - | - | - | - |
| Regular travel to Russia | -0.721\*\* [0.172]  (-1.092, -0.408) | -0.740\*\* [0.173]  (-1.130, -0.359) | 0.357\* [0.025]  (0.034, 0.666) | 0.353\* [0.158]  (0.044, 0.677) | -0.453\*\* [0.117]  (-0.644, -0.271) | -0.466\*\* [0.117]  (-0.677, -0.275) |
| Regular communication with friends or relatives in West | - | - | -0.216\*\* [0.086]  (-0.390, -0.033) | -0.227\*\* [0.086]  (-0.411, -0.068) | - | - |
| Lived in West | 0.399\* [0.190]  (0.076, 0.716) | 0.343 [0.189]  (0.030, 0.685) | - | - | 0.333\*\* [0.127]  (0.026, 0.637) | 0.301\* [0.127]  (-0.005, 0.580) |
| Regular travel to West | 0.514\* [0.207]  (0.059, 0.997) | 0.529\* [0.208]  (0.072, 0.913) | - | - | - | - |
| Religious attendance (ref: none) |  | | | | | |
| ROCMP | -0.271\*\* [0.077]  (-0.420, -0.128) | -0.276\*\* [0.077]  (-0.435, -0.108) | 0.156\* [0.076]  (0.019, 0.295) | 0.153\* [0.076]  (0.008, 0.286) | - | - |
| Other | -0.002 [0.097]  (-0.191, 0.198) | -0.008 [0.097]  (-0.185, 0.177) | -0.161 [0.096]  (-0.347, 0.028) | -0.162 [0.096]  (-0.338, 0.012) | - | - |
| Prefers TV in Russian language | -0.409\*\* [0.063]  (-0.538, -0.282) | -0.409\*\* [0.063]  (-0.544, -0.283) | 0.340\*\* [0.063]  (0.221, 0.464) | 0.340\*\* [0.062]  (0.210, 0.467) | -0.427\*\* [0.044]  (-0.519, -0.339) | -0.424\*\* [0.044]  (-0.519, -0.345) |
| Reliance on Russian news sources (narrowly defined) | -0.955\*\* [0.301]  (-1.557, -0.315) | - | 0.447 [0.262]  (-0.020, 0.886) | - | -0.630\*\* [0.186]  (-0.963, -0.331) | - |
| Reliance on Russian news sources (broadly defined) | - | -0.575\*\* [0.196]  (-0.984, -0.136) | - | 0.310 [0.171]  (0.015, 0.606) | - | -0.423\*\* [0.126]  (-0.648, -0.185) |
| Discusses international politics  (ref: rarely or never) |  | | | | | |
| Sometimes | 0.305\*\* [0.074]  (0.160, 0.454) | 0.297\*\* [0.073]  (0.160, 0.449) | - | - | 0.144\*\* [0.051]  (0.049, 0.248) | 0.136\*\* [0.051]  (0.024, 0.230) |
| Often | 0.350\*\* [0.077]  (0.204, 0.499) | 0.340\*\* [0.077]  (0.181, 0.490) | - | - | 0.175\*\* [0.054]  (0.070, 0.281) | 0.164\*\* [0.053]  (0.052, 0.289) |
| Time spent following news online (ref: none) |  | | | | | |
| Less than one hour daily | -0.221\*\* [0.083]  (-0.391, -0.050) | -0.137 [0.087]  (-0.327, 0.058) | - | - | -0.091 [0.059]  (-0.202, 0.033) | -0.028 [0.062]  (-0.145, 0.095) |
| More than one hour daily | -0.286\*\* [0.090]  (-0.461, -0.090) | -0.190\* [0.094]  (-0.388, -0.021) | - | - | -0.191\*\* [0.063]  (-0.322, -0.069) | -0.123 [0.066]  (0.038, 0.265) |
|  |  |  |  |  |  |  |
| *Intercept* | 0.371 | 0.367 | -0.582 | -0.601 | 0.202 | 0.203 |
| *Multiple R²* | 0.164 | 0.162 | 0.102 | 0.103 | 0.208 | 0.207 |
| *Adjusted R²* | 0.150 | 0.149 | 0.088 | 0.089 | 0.195 | 0.195 |
| \* *p* < 0.05; \*\* *p* < 0.01. Each cell shows OLS regression coefficient followed by [standard error] and (basic non-parametric bootstrapped confidence interval at 95% level) | | | | | | |