Georg Aichholzer Herbert Kubicek Lourdes Torres Editors

Evaluating e-Participation

Frameworks, Practice, Evidence



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July 2015

Georg Aichholzer, Vienna; Herbert Kubicek, Bremen; and Lourdes Torres, Saragossa

Acronyms and Abbreviations

ABC Attitude, behavior, and choice

CAHDE Ad hoc Committee on e-Democracy of the Council of Europe

CH₄ Methane

CIRCE Research Centre for Energy Resources and Consumption

CO₂ Carbon dioxide

CO_{2e} Carbon dioxide equivalents

CoM Covenant of Mayors

CRed Community Carbon Reduction Program DFG Deutsche Forschungsgemeinschaft

DG Directorate General
DVD Digital versatile disc
e-SQ Electronic service quality

ECRP European Collaborative Research Projects

EF Emission factor

eGEP eGovernment Economics Project

EIPA European Institute of Public Administration

EPSA European Public Sector Award ESF European Science Foundation

EST Energy Saving Trust
EU European Union
EVM Expected value model
FAQ Frequently asked questions
FWF Austrian Science Fund

GHG Greenhouse gas

GIS Geographic information system HCI Human–computer interaction

I = PAT Equation in environmental science (Human Impact on the environment

equals the product of Population, Affluence, and Technology)

ICLEI International Council for Local Environmental Initiatives

ICT Information and communications technology

IFEU Institute for Energy and Environmental Research in Heidelberg

IPCC Intergovernmental Panel on Climate Change

IT Information technology

kWh Kilowatt-hour

LCCN Low Carbon Communities Network

LED Light-emitting diode LFU Least frequently used MRT Media richness theory

MZES Mannheim Centre for European Social Research

N₂O Dinitrogen monoxide

NGO Nongovernmental organization

NOA Needs, opportunities, and abilities model

NPM New Public Management OC Online consultation

OECD Organisation for Economic Co-operation and Development

OGD Open Government Data PB Participatory budgeting

PTT Post, telephone, and telegraph companies

OCA Oualitative computerized analysis

RCT Rational choice theory
RFI Radiative forcing index
RSS Rich Site Summary
SD Standard deviation

SES Socio-economic status (model)

SMS Short Message Service

SPD Social Democratic Party of Germany TAM Technology Acceptance Model

UBA German Federal Environment Agency

UN United Nations

UNCED United Nations Conference on Environment and Development

UNECE United Nations Economic Commission for Europe

UNFCCC United Nations Framework Convention on Climate Change

UNIZAR University of Saragossa

UNPSA United Nations Public Service Award UNPSD United Nations Public Service Day

URL Uniform Resource Locator
WWF World Wide Fund for Nature

WWV World Wide Views

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Chapter 1 Introduction

Georg Aichholzer, Herbert Kubicek and Lourdes Torres

Abstract This book presents the results of a 3-year international research cooperation on concepts and methods to improve the evaluation of e-participation in the area of sustainable development and climate protection.

1.1 How It Began

In November 2007, the European Science Foundation (ESF) invited scholars from all over Europe to a research conference entitled "Electronic Democracy—Achievements and Challenges" held in a former monastery in Vadstena, Sweden. Under the moderation of Herbert Kubicek about 40 researchers, well known seniors and young PhD students, tried for 3 days to identify the theoretical and methodological challenges for the future research agenda in different subareas of e-democracy, for example, e-consultation, e-petitioning, e-movements, e-voting, and more. They agreed that the biggest challenge in all of these fields is the evaluation of the deployment, use, and impact of the new electronic tools in their respective context.¹

The biggest barrier to valid assessment is the lack of comparability in existing research, which is mostly case oriented, providing a set of highly heterogeneous cases. There is a need for international and interdisciplinary comparative empirical

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¹ See the conference report by Herbert Kubicek at http://www.ifib.de/publikationsdateien/ESF_e-democracy_Report_2008.pdf and the press release by the ESF www.esf.org/hosting-experts/scientific-review-groups/social-sciences-soc/news/ext-news-singleview/article/edemocracy-research-requires-all-inclusive-approach-esf-conference-told-397.html. Accessed July 27, 2015.

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research. As the effects of electronic tools are highly dependent on their context, it is necessary to compare similar tools in a similar context in order to detect success factors. Success can only be assessed and success factors can only be identified by comparing a number of cases with the same kind of participation on the same subject and by the same target group of participants.

The ESF offers the format of European Cooperation Research Projects (ECRP) for this kind of research under a two-step review process and with particular support for the cooperation between research teams from at least three different countries. It was during the conference that four researchers from Austria, Denmark, Germany, and the UK sat down together and started a discussion on what such a research cooperation might look like. We agreed that we were most interested in evaluating government-initiated processes of citizen consultation and collaboration. From previous research on this kind of participation, we knew that a salient issue and personal concern are the most important success factors for reaching a large number of participants. As this discussion coincided with the preparation of the UN Climate Change Conference in Copenhagen, we agreed that climate protection is an appropriate subject of individual concern and, at the same time, of European significance. In addition, the subject of fighting climate change has a methodological advantage because it allows the comparison of the impact of participation in a quantitative way via the measurement of the CO₂ reduction achieved².

We also felt that the four of us only covered the northwest of Europe and that we should get a partner from Southern Europe on board. We invited the research team at the University of Saragossa, Spain, to join us and they accepted. The group of six senior researchers, Georg Aichholzer (AT), Jens Hoff (DK), Herbert Kubicek (DE), Ann Macintosh (UK), and Lourdes Torres and Vicente Pina (ES) not only represented different countries but also different disciplines, and thereby permitted a comprehensive and interdisciplinary concept of evaluation. We met several times in order to elaborate a coordinated research plan for an ECRP, which was submitted to the ESF in April 2008. The official title is "Comparative Assessment of E-Participation in the Context of Sustainable Development and Climate Change." For outside communication we chose "e2democracy," meaning "electronic environmental democracy."

1.2 The Set Up

In order to assess the impact of electronic tools a quasi-experimental design seemed necessary, in which one group of citizens participated by traditional means (face-to-face, telephone, and mail) and a second group via the Internet. There should be more than only one project of this kind in each participating country. We agreed to find three local communities of different sizes in each of the participating countries. For the acquisition of cooperating local communities, the signatories of the Aalborg

 $^{^{2}}$ In this book we use the terms carbon dioxide (CO $_{2}$) and carbon dioxide equivalents (CO $_{2e}$) interchangeably.

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Commitments³ were considered to be the most promising, as they had committed themselves to having their citizens participate in the efforts of CO₂ reduction and to providing a regular monitoring. However, several of the signatories did not welcome the offer of a free evaluation of their activities and a complementary contribution to their monitoring, and it took some time for letters of intent to be included in an application for funding.

The joint application successfully passed the review process by the ESF, but an additional review by the national research funding organizations is necessary for the funding of each team. While the Austrian, German, and Spanish agencies; the Austrian Science Fund (Der Wissenschaftsfonds—FWF); The Deutsche Forschungsgemeinschaft—DFG; and the Ministry of Science and Innovation (Ministerio de Ciencia e Innovación) in Spain approved the funding, the Danish and the British agencies did not. Therefore, the remaining three teams had to take over the tasks assigned to the two excluded teams.

When the national research teams were established and the local communities which had provided letters of intent were informed, some were not willing or able to provide the necessary personal support for carrying out the project. In Germany, in particular, it turned out that the three cities which had signed the Aalborg Commitments and letters of intent to participate in the project had not conducted any kind of citizen participation in their initiatives against climate change, or any systematic monitoring including private households. Consequently, they were not able to raise the resources for setting up participation processes with their existing budgets or were afraid that they would not succeed in recruiting the desired number of 400 panelists. So, the search for participating communities had to start all over again. In Spain, the cities of Saragossa and Pamplona immediately upheld their commitment to the project. The third local administration which had signed a letter of intent, the Provincial Government of Biscay, was more interested in issues of water supply rather than CO₂ reduction when planning the details. The research team was willing to follow this priority but the results would not have been comparable. In Austria, an active involvement materialized for two of the contacts which had signed letters of intent to participate in the e2democracy (e2d) project. In the case of Bregenz, the definite agreement came about immediately, and in the case of Styria three regions had been considered for participation by the Regional Development Agency Styria⁴ (southeastern Styria, Schladming, and Mariazeller Land); the decision was finally made in favor of the latter within a rather short time span. Negotiations with our original third candidate, the city of Vienna, extended over several weeks, starting with the Local Agenda 21 Office which finally found it would be more appropriate the project be hosted by the city's Climate Protection Coordination Office. After several meetings of scoping the fit with the Coordination Office's strategies and activities it finally became clear that they preferred to pursue alternative formats of citizen participation and advice in energy efficiency as opposed to joining the e2d project. Initial attempts to continue the search for interested alternative candidate

³ See http://www.sustainablecities.eu/aalborg-process/commitments. Accessed July, 28, 2015

⁴ See http://www.landentwicklung-steiermark.at/. Accessed July, 28, 2015