

A myriad of diplomacies has emerged through the recent scholarly output. With the European Science Diplomacy Agenda, the European Union (EU) leans towards interpreting science diplomacy as an intrinsic component of its existing repository of programs and instruments for European and international cooperation. This discussion paper explores how science diplomacy could be positioned amidst areal threads of diplomacy studies. This is a stock-taking exercise concerning some policy-relevant research debates to point toward some of the challenges and promising avenues identified so far in a research process revolving around the EU science diplomacy toward the European Southern Neighborhood (ESN).

The ESN Policy, launched in 2004 and reviewed in 2011 and 2015, aims to provide a coherent framework for political dialogue and to strengthen relations between the EU and its southern neighbours, namely, Algeria, Egypt, Israel, Jordan, Lebanon, Libya, Morocco, Palestine, Syria, and Tunisia. ESN is closely aligned with the EU values and its promoted political and economic reforms (Kwiecień 2016c, 2016b, 2016a; Ostrowska-Chałupa 2016; Żukrowska 2016b, 44, 2016a, 125-126; Stryjek 2016). Action Plan tailored for each neighbouring country is a typical European Neighbourhood Policy (ENP) document that carves out steps for transforming these goals into reality (Czachor 2019, 4; Radeljić 2014, 198). Issues related to the vast range of environment, climate, and sustainability are covered largely but not exclusively by the EU environment policy (Kurrer 2021; Mathis 2020). For instance, historically, the association agreements between the EU and Mediterranean Partner Countries have all had a section on the environment (Lesser 2009, 28). Industrial emissions, municipal waste, and urban wastewater have been among the prioritised environmental issues for the Mediterranean area (Lesser 2009, 33).

Detecting the diverse terminology employed to study the diplomatic dimension of the issues covered by the environmental policy is helpful in an attempt to get to grips with the vast literature relevant to a comprehensive study of resilience-building in the ESN over the past years and why it matters for the EU science diplomacy. The aim is to capture a constellation of interlinks between structural diplomacy, science diplomacy, and resilience to form conducive conceptual grounds for studying the role the EU-funded collaborative research brings in addressing the challenges faced by the ESN. Among the persistent core issues marring the ESN are the risk of violent conflicts, civil wars, diverse security threats emanating from weak governance and public discontent, political tensions, and continuous

evolution of authoritarian rule (Demmelhuber 2017, 177-178; Rivera Escartin 2020). Modeling a constellation between structural diplomacy, science diplomacy, and resilience based on a targeted and rapid literature review helps advance a broader research project to analyze the EU science diplomacy towards the ESN. Additionally, it is an exploratory process that identifies some nuances worth bringing to the attention of broader audiences.

The first part of the article introduces science diplomacy. The second outlines the EU structural diplomacy and circulation of knowledge. The third part elaborates on the multiple meanings of resilience and the thematic shift in the overall study of the EU approach towards resilience from building capacities in the neighborhood and elsewhere in the world to turning towards internal capabilities to withstand various challenges. The fourth part captures a concise overview of the vast terminology employed to study research-intense topics tied to the environment, climate, and sustainability that engage with a diplomatic point of view. The concluding part defines considerations and a constellation for the future research pathway.

### **Science Diplomacy as a Study and Policy**

Science diplomacy is the process by which states and groupings of states express themselves, make known their stances, and mediate their interests in the international arena with a pronounced component of advanced research, meaning the performance of scientific enquiry, application, and dissemination of findings (Turekian et al. 2014, 4). In the European context, science diplomacy involves policy and scholarly enquiry into various modalities and interlinks between science and diplomacy captured by the EU or EU-supported strategies, roadmaps, agendas, alliances, and flagships. The forthcoming European Science Diplomacy Agenda is envisaged to be anchored in the existing set-up of the EU-supported international research cooperation (Council of the European Union 2021, 13). It is part of the EU's global approach to research and innovation and is thus a promising component for the comprehensive study of EU structural diplomacy. Science diplomacy holds the potential to add more profundity to the ENP study by addressing specific dimensions of the role of collaborative research encounters that remain understudied.

An international grouping of scholars develops 'New Diplomatic History' to study state and non-state actors and their diplomatic practices, methods, and work environments in a global, international and transnational historical context. Following the 'New Diplomatic History' approach (Schemper 2019, 248), representatives of the research sector are implicit providers of a significant contribution to the EU external action that deserves more scholarly attention (Šime 2021c). Following the earlier calls for researchers to consider science diplomacy as their work (Leach 2014, 167), scientists are taken into account as a vast pool of potential tacit diplomats operating next to the classic diplomatic corps known in the science diplomacy literature as "dithering dandies" (Copeland 2014, 187).

European science diplomacy towards ESN as an implicit practice and subject of scholarly enquiry benefits from a dense layer of collaborative partnerships maintained over decades (Ben Abdallah, Perez-Porro, and Gual Soler 2021). It includes recent EU funding measures, programmes, and projects that are recommended to be made continuously available in the future (Fägersten 2022, 14; Lannon 2019). The active use of multilateral frameworks, including the EU offered research-intense collaborative initiatives, is a characteristic that science diplomacy of the chosen geographic area shares with other parts of the world.

Nationally anchored or jointly implemented science diplomacy initiatives under the auspices of international or regional forums provide diverse examples from, for instance, the Arctic (Berkman 2012; Berkman et al. 2017; Vylegzhanin, Young, and Berkman 2021, 8), Antarctic (Wilson 2014), Atlantic Ocean (Polejack, Gruber, and Wisz 2021), agriculture in New Zealand (Macindoe 2014; Goldson and Gluckman 2014), space exploration (Pozza 2014; Boutwell 2014, 210; Plamondon Emond 2019, C1), climate change (Milkoreit 2014). Furthermore, the list of science diplomacy topics includes oil and mining industries (Darby 2014), world health (Liu 2014), and colonial heritage institutions (Andersen, Clopot, and Ifversen 2020). Nuclear weapons are kept on the science diplomacy radar (Fihn, 2022). Last but not least, this thematic diversity of science diplomacy encompasses science and technology internationalisation aimed at tapping into brain circulation pursued by Portugal and Japan (Mourato Pinto 2022; Sunami, Hamachi, and Kitaba 2014; Davis and Patman 2014, 270), as well as bilateral support offered by the neighbouring countries to politically expelled students and researchers from Belarus (Panas and Gołębiowski 2021). The collaborative patterns and thematic partnerships are unique in each geographic area because scientific engagement follows context-specific needs and ambitions.

The national priorities in science diplomacy confirm that while valuing a joint European framework, some EU member states, such as France, Portugal and Spain, keep their unique national goals. At the same time, they do not shy away from complementarities with the EU thematic course whenever thematic intersections occur. Thus, whatever the actual contours of the European Science Diplomacy Agenda will be, its performance as one of the expressions of 'more Europe' should be tailored to various parts of the world. The overarching message should remain the same (Van Rompuy 2021, 2). Still, its relevance will depend on the capacity of the European science diplomacy proponents to act and articulate this message in a context-relevant manner. A customised approach would prove that European science diplomacy is not only an inspiring vision but also a framework to deliver tangible progress in specific issue areas.

Consequently, one aspect that deserves more attention is place-specific echoes of science diplomacy (Šime 2021a, 2022, 53-54). Historians of science and innovation policy have shown interest in the circulation of knowledge (Frank and Paillette 2016; Griset and Bouvier 2012, 37; Kaldewey and Schwauz 2018, 111). Increased international mobility and interactions brought by globalisation and affordability of travel, as well as international research support incentives, have generated diverse pathways for intellectual encounters and the creation of unique combinations of expertise.

This interest in the circulation of knowledge is a shared interest with historians of knowledge (Jacob 2017; Östling 2015; Östling, Olsen, and Heidenblad 2020; Ruud 2018).<sup>[1]</sup> Following some of the findings crafted among the history of knowledge research circles, European science diplomacy should not be viewed as simply diffused across the EU, its Neighborhood, and internationally. Instead, the local research circles and place-specific research legacies capture a diverse background where the European Science Diplomacy Agenda could be accommodated in tune with unique national, regional, and local settings (for context-sensitive recent research examples consult Olšáková 2020; Gamito-Marques 2020). Specific geographic, socio-economic, and academic situations capture various factors that could shape the future echoes of the European Science Diplomacy Agenda. A study of local uptake of the vision launched in Brussels would be relevant for further exploring how science contributes to the projection of the EU structural diplomacy.

The ENP sets conducive grounds for exploring EU structural diplomacy and its implicit

science diplomacy dimension. It is a policy that, at the inception of the European External Action Service, was proposed by Germany as one of the potential portfolios to be shuffled from the European Commission to the newly created entity responsible for the foreign affairs of the Union (Morgenstern-Pomorski 2018, 112). Thus, it is a promising area to study the intersections of the Community policies, such as the research one, with pronounced integrationist logic and external action. The 2011 ENP stated among its key aims “inclusive economic growth.” Whereas “strengthening state and societal resilience” is highlighted as the overarching goal in the EU Global Strategy (Kakachia and Lebanidze 2020, 3). This strategy serves as the key reference point for the 2015 ENP. The overall policy grounds of thematic complementarities between ENP and the EU Global Strategy set a good background for bringing into the analytical scope the existing body of literature on resilience and, along with it, the EU vulnerability (Fossum 2020, 37), as well as differentiated solidarity towards third countries (Michailidou and Trenz 2020, 138).

### **Structural Diplomacy**

Structural diplomacy adds a new layer to the rich European tradition of diplomacy and the analysis of its Southern European origins (Monod de Froideville and Verheul 2016; Mattingly 1937). Structural diplomacy is “a process of dialogue and negotiation with third countries and other regions aimed at influencing or shaping in a sustainable way the political, legal, socio-economic, security and other structures in these countries or regions” (Smith, Keukeleire, and Vanhoonacker 2015, 5-6). Traditional diplomacy is primarily dealing with establishing, negotiating, and maintaining relations. At the same time, a structural diplomacy is a form of engagement with the external environment that aims at shaping not only specific constellations of relationships but also the sustainable impact of such arrangements that would last well beyond the specific episode of interactions. Structural diplomacy is a valuable point of departure to explore both established and novel forms of the EU external action (Šime 2021b). The European Science Diplomacy Agenda is brought into the picture as a new policy component but not an altogether novel practice. This agenda deserves scholarly attention in the context of the overall EU diplomatic toolbox and the value science diplomacy brings to it.

The thinking of Susan Strange on structural power has sparked a myriad of ideas on how to adjust structural power for a contemporary study. This article focuses on the new

generation of scholars who build on her research on structural power (for example, David and Meersohn Schmidt 2019; Guzzini 1993; Pustovitovskij 2016; Tooze 2000, 282). The term 'structural power' refers to the intentional or unintentional ability to define the context and make one's preference prevail over outcomes (Story 2001, 440; Van de Graaf 2013, 160; Yoshizawa 2012, 2, 16). The capacity to control structures is noted as decisive (Azmanova 2018, 70). Recent reflections have elaborated on the prevalence of the structural power of the United States compared to other notable actors in international relations, such as China and the EU (Kitchen and Cox, 2019; Liu and Tsai, 2021; Malkin, 2022; Winecoff 2020).

In this article, the ultimate source of structural power is attributed to the key institutions of the EU. They are recognised in the literature as owning a hegemonic relationship with non-EU members and forming an internationally excelling centre of executive power (Egeberg and Trondal 2014, 174; Eriksen and Fossum 2014, 242; Fossum 2014, 162). Structural diplomacy is a means for sustained promotion of this power. EU-funded projects could be considered as one of the enabling forms to further structural power and diplomacy.

Structures are the overall economic, social, and political forces, including their potential to shape both agents and institutions (Bell 2012, 668). The study of research-intensive projects as temporary institutions that engage non-EU entities (Šime 2021c) benefits from a reinterpretation of a structure "as a fluid, emergent network of interactions and relations of the actors involved" (Pustovitovskij and Kremer 2011, 11). It brings multilateral considerations into the analytical horizon of what can constitute a structure and its implications in a network setting, as well as how that shapes the understanding of the much-debated degree of the EU's collective action (Eriksen 2014, 7), its multiple avenues.

## **Resilience**

Generally, resilience refers to the mastery of recuperating after a challenging episode. In other words, resilience refers to "the ability to cope with stress or, more precisely, to return to some form of normal condition after a period of stress" (Olsson et al. 2015, 1). It is a form of capacity to face a challenge or various challenges and recover after an encounter with endogenous or exogenous shock or shocks.

The resilience emanates from studies of psychology, ecological and biological notions (Gaub and Popescu 2017, 7; Rhinard 2017, 25; van Veen 2017, 38; Olsson et al. 2015, 1). The focus on the ecological or biological system to withstand and overcome shocks translates in social sciences as the study of social systems amidst unprecedented circumstances. To point out a noteworthy combination of these disciplines, the inceptions of resilience were translated in a recent study of the collective human resilience expressed through intellectual novelties invented during historical periods of climate alterations (Zhang et al. 2020).

Resilience has proved to be a catchy research topic internationally (Pospisil and Kühn 2016) and across a wide range of disciplines (Berbés-Blázquez et al. 2014; Corkery and Marshall 2018; Dou et al. 2020; Giske 2021; Weise et al. 2020). There have been attempts to quantify it, for example, with the Indicators of Resilience and Socio-Ecological Production Landscapes and Seascapes (Nishi, Natori, and Dublin 2021, 2). Thus, the term has benefited from both qualitative and quantitative inquiry.

The EU is considered a late adopter of the term ‘resilience’ (Juncos 2018, 654).<sup>[2]</sup> Attention is paid to the EU institutions and the supranational level dynamics. In the EU context, resilience refers to “the ability of an individual, a household, a community, a country or a region to prepare for, to withstand, to adapt, and to quickly recover from stresses and shocks without compromising long-term development prospects” (Carta 2021, 2). The EU approach is well-placed to take on board a comprehensive understanding of resilience. The EU Global Strategy emphasised resilience-building as a strategic priority of the EU’s external action (Badarin and Schumacher 2020, 66; Ferraro 2020, 100). It would be an action that serves in two ways – to strengthen the internal capacities to withstand shocks across the Union, as well as to help non-EU entities to improve their response measures to diverse challenges. Following principled pragmatism, resilience requires local ownership (Giumelli 2020, 117) and long-term commitment from the EU (Tocci 2016, 5). Scholarship on the resilience of the European neighborhood, including various volatilities, benefits from an acknowledgment of the role of different EU instruments (Bargués et al. 2020, 8; Olsen 2020, 103). Research-intense or research-oriented initiatives would be one example of the vast EU instrumentarium.

Policy-wise, resilience is a reference framework that is part of a broader sequence of shifts in the terminology used by consecutive Colleges of Commissioners (Bargués and Morillas

2021). An attempt to capture the multidimensionality of the EU foreign policy rests on the earlier aspirations to pursue a 'comprehensive approach' under the leadership of Baroness Catherine Ashton (Helwig 2014, 73; Koenig 2014, 164). Furthermore, the recent pivoting towards 'strategic autonomy' articulated by Josep Borrell is interpreted as an attempt to reenergize resilience (Bargués 2021, 10). It is well-placed to accommodate a more geo-strategic take that positions resilience as a capacity to safeguard sovereignty and independent decision-making against an excessive influence exerted by external power (Biscop 2021, 100). Thus, following this perspective on the policy evolution, the study of resilience should not capture only a specific episode and approach taken by one (former) High Representative of the Union for Foreign Affairs and Security Policy and Vice-President of the European Commission, namely, Federica Mogherini. Instead, it may entail a continuity of efforts and aspirations spanning several terms and individuals who have coordinated the EU external action with shifting nuances that are adjusted depending on the geopolitical context and preferences for a specific policy terminology. Arguably, the academic study of resilience has a broader resonance that spans beyond the service of one high-ranking EU official.

However, with the shift of the terminology that has certain connotations with resilience comes also a slightly different reading of the term and how it is attributed to the efforts of the EU. Resilience is associated not solely with the EU's aspirations to strengthen the capacity of its neighbors to withstand various challenges. There is more to it than the EU's self-interest in benefiting from a better governed and more adaptive neighborhood to the fast-paced landscape of contemporary challenges. In the most recent parlance, resilience is linked to the efforts of the EU itself to maintain a solid standing internationally and to articulate its interests beyond its borders. It acknowledges that interolarity emerges with unique implications for the EU and its capacity to forge fruitful relations and partnerships internationally (Biscop 2021, 45).

Researchers point toward the ESN suffering from a more pronounced lack of resilience than the East (Cadier, Capasso, and Eickhoff 2020, 27; Cusumano and Cooper 2020, 298) and to the Southern prioritization of socio-economic issues (Shikaki 2020). The prevalent focus has remained on the high-level statements and the interactions among the key EU institutions and prominent think tanks (Bargués-Pedreny 2019; Bauer 2015, 38; Cianciara 2020; Puglierin 2019, 8). However, interest in the long-term causes of insecurity not solely



symptoms of local instability (Amadio Viceré and Frontini 2020, 261),<sup>[3]</sup> has generated additional research threads that explore in greater nuance various challenges encountered by ESN countries in the post-Arab Spring setting (Bahri Korbi, Ben-Slimane, and Triki 2021; Boogaerts, Portela, and Drieskens 2016; Eltinay 2019; Gordner 2019, 17; Hill 2018) and challenges faced in the domain of migration governance (Ozcurumez 2021). In such a way, interlinks between long-term challenges and short-term risks “with a high spoiler potential in the short run” are also brought into the picture (Kakachia and Lebanidze 2020, 6), including through a typology of tipping points (Magen and Richemond-Barak 2021). Since the ESN is expected to suffer from severe climate change implications (Gaub and Popescu 2017, 8), it is a thematically appropriate context for exploring the growing variety of diplomacy studies and their myriad of parlance.

The EU assistance comes in various forms and measures to develop such a capacity. Projects funded by the Framework Programmes are a resourceful example of earlier noted but overall understudied means that convey the EU aspirations to strengthen the resilience and contribute to the development of local capacities in the neighborhood (Bargués-Pedreny et al. 2019, 13; Eickhoff and Stollenwerk 2018; Juncos 2017, 9; Kourtikakis and Turkina 2015; Wagner and Anholt 2016). The referenced literature includes publications of several projects, such as “Europe’s External Action and the Dual Challenges of Limited Statehood and Contested Orders” (EU-LISTCO) funded by Horizon 2020 to study resilience and the ENP, as well as articles that build on previous accomplishments of projects funded by the Framework Programmes (Huber and Woertz 2021, 1262-1263; Kakachia, Legucka, and Lebanidze 2021, 1339). However, a vast pool of other promising consortiums funded by the Framework Programmes has not only discussed resilience but also built tailored research-based capacities among European and ENP entities to withstand various challenges (Šime 2021c).

The overall complexity of the European resilience studies is brought by the fact that scholars and policymakers do not restrict the references to resilience to the ENP context alone. An inward-looking resilience approach has brought new considerations and topics addressed to strengthen the EU’s own ability to withstand various challenges (Borrell Fontelles 2021; Juncos 2021, 7; Ozoliņa 2016, 2). Resilience travels far and wide across diverse topics within the EU context. For example, economic resilience is studied across the urban-rural divide in the EU (Giannakis and Bruggeman 2020). The EU resilience is noted in

the Brexit context (Huhe, Naurin, and Thomson 2020). Resilience is referred to as a capacity to develop new industrial specializations after the 2008 economic crisis (Xiao, Boschma, and Andersson 2018). The EU military capabilities are mentioned to address internal and external challenges to maintain resilience (Zandee, Stoetman, and Deen 2021, 49-50). The Recovery and Resilience Facility of the Next Generation EU is an obvious example (Juncos 2021, 7). Furthermore, the EU institutions themselves are described as resilient in obtaining the desired powers and interinstitutional constellations (Servent and Tacea 2021). There is a potential to develop the intellectual inquiry into the EU approach towards resilience following several thematic sub-strands. It would help to distinguish the unique traits of resilience parlance in the ENP context from the other subjects of interest incorporated into the EU resilience radar.

The reviewed literature demonstrates that solutions requiring advanced research expertise to further European external action and diplomatic goals are not unique to the science diplomacy context. Resilience-building and literature on various dimensions of resilience prove that there is a vast repository of existing lessons upon which future European science diplomacy practices can build. There is a clear potential to foster complementarities between advanced research involved in building resilience in the ESN and future European science diplomacy routines intended to engage with the EU southern neighbours.

## **Abundance of Diplomacies**

Science diplomacy is praised for spurring more dynamic interactions between science policy and foreign policy. Nevertheless, the vast terminology employed in diplomacy studies proves that the study of this interlink is not without its challenges. Recognizing that boundaries between variously coined diplomacies are far from clear-cut, this article does not take up the Herculean task of suggesting a specific demarcation between science diplomacy and other types of diplomacies coined and used by the scholars when examining some topics related to the European context or the EU international engagement. Such intellectual exercise is not considered futile. However, a concise awareness-raising overview of the identified myriad of recently used diplomacies tied to environmental, climate, and sustainability considerations is a worthwhile attempt to outline the academic zest.

Conceptually, science diplomacy shares a blurry and poorly-defined relationship with several other diplomacies. There is no clear demarcation between the ‘innovation’ (Griset, Paillette, and Agid 2021, 925; Leijten 2017), ‘water’ (Siekiera 2021a; Tomalová et al. 2020) or ‘water-based public’ (Farnum 2018), ‘ocean’, ‘blue’ and ‘hydro-’ (Gutu 2016) diplomacies. Further down the line ‘green’ (Torney and Davis Cross 2018), ‘climate’ (Biedenkopf and Petri 2019; Oberthür and Dupont 2021; Özkaragöz Doğan, Uygun, and Akçomak 2021; Schunz 2021), ‘climate change’ (Siekiera 2020, 434), ‘forest’ and ‘sustainable development’ (Hoogeveen and Verkooijen 2010) diplomacies deserve mentioning. Moreover, ‘ozone’ (Özçelik 2021), as well as ‘health’ (Paillette 2021; Rasmussen 2016; D’Abramo 2021) diplomacies might serve as good concluding examples for this concise list of the myriad of diplomacies. Irrespective of whether all these diplomacies are swept under the science diplomacy rug or not (Siekiera 2021b, 15), what many of these authors have in common is an interest to highlight that expert-level interactions and research-intense inputs from scientists have had specific implications on intergovernmental and multilateral deliberations. Not all these diplomacies have thoroughly elaborated frameworks. Not enough thought is allocated to considering approximate demarcations between various thematic diplomacies. It seems that the word ‘diplomacy’ is placed in the title of the main body of the scholarly output to mark that domain-specific issues have a connection to international relations and high-level deliberations.

Focusing specifically on the ESN context, one of the latest policy frameworks has obtained its own diplomatic dimensions through the recently suggested ‘Green Deal diplomacy’ (Bennis 2021; Soler i Lecha and Huber 2021). This relatively recently coined diplomacy highlights the international dimension of the European Green Deal (Alcaro and Tocci 2021, 7). Engström (2022) proves that analysts commenting on the European Green Deal like to juggle the mentioned variety of diplomacies. All in all, the undefined academic conceptual boundaries and the growing number of diplomacies do not offer more lucidity of the distinct interlinks between science and diplomacy and its projection from Europe towards other parts of the world. Following the core logic of structural diplomacy, this rich baggage of domain-specific diplomacies does not set a conducive context for assessing the sustainability of the EU efforts and permanency of achieved results either. On the contrary, there is a risk that the recent academic ardor to come up with an increasing number of diplomacies creates more confusion than clarity. Perhaps these diplomacies circulate so freely and land in various research outputs because most of them do not have an elaborate framework and

specific conceptual anchor. It makes them easily applicable to diverse contexts, issues, and science domains.

### **Future of European Science Diplomacy**

Science diplomacy adds some additional dimensions to the study of EU structural diplomacy. Science diplomacy brings valuable considerations about the permanency of the dialogue and multilateral interactions process that spans well beyond the processes curated by the representatives of the traditional diplomatic corps. It allows bringing EU-funded projects into perspective and paying attention to the under-researched aspects and implicit diplomatic dimensions of these temporary encounters.

The dynamics explored by the circulation of knowledge bring place-specific aspects into the science diplomacy debate and fully appreciate the non-linearity of the present and future dissemination and echoes of the European Science Diplomacy Agenda. The richness of terminology associated with diplomacy studies provides especially promising avenues for the contemporary circulation of knowledge. This article captures a concise attempt to grasp its noteworthy dimensions. Whether this scholarly zeal for using an increasing array of terms associated with various thematic domains of diplomacy serves the goals and aspirations of a coherent European external action and the European Science Diplomacy Agenda more specifically is an altogether other matter. The density of terminology employed in the studies of diplomacy tied to the environmental, climate, and sustainability considerations shows the challenge of delineating science diplomacy from a list of other diplomacies. What both domain-specific diplomacies and resilience studies bring to the ongoing policy-related thinking on the future of European science diplomacy is that there are vast repositories of existing findings on the European track record in employing science-informed and research-intense solutions to tackle various challenges relevant to the external action context.

When placed in the structural diplomacy and resilience context, it is evident that the European Science Diplomacy Agenda does not start from a clean slate. The existing and continuously growing body of literature on European science diplomacy already elaborates

on some accomplishments from various angles and covers diverse periods. The EU science diplomacy approach is well anchored in the existing set-up of the EU programs and instruments. Thus, the history of science diplomacy and its implicit forms captured by the contemporary governance and implementation structures are already actively examined and provide reasonable grounds for future research avenues.

Resilience is a promising research companion to science diplomacy not only because of its prominence in the ENP setting. Resilience shares with science diplomacy an inward-looking dimension of promoting cohesiveness and attention paid to the EU's ability to withstand various externally emanating challenges through research-intense and technologically advanced means. Currently, both terms are actively discussed across several European and international scholarly circles. Bringing resilience-oriented findings into science diplomacy considerations helps to highlight the multifaceted role of scientific expertise and research intensity in tailoring responses to contemporary challenges. Among near-term topicalities would be climate change, demographic and international mobility dynamics, well-tailored life-long learning to keep the European and neighbouring economies competitive and well-equipped for the tertiary sector's future technological developments, and efficient and sustainable management of the industry.

To conclude, this article outlined how a study focusing on the EU science diplomacy toward the ESN could take advantage of some compartments of diplomacy studies and literature on resilience. It identified some avenues for building on earlier accomplishments and avoiding duplication of efforts. While not being free from the buzzword trap of an overextended meaning, diplomacy studies covering environmental policy domains and diverse resilience studies warn science diplomacy scholarship about the challenge to strike the right balance between attempting to demarcate a field of enquiry and leaving it sufficiently comprehensive and receptive to fresh influences.

## Endnotes

[1] Among them are the demarcation enthusiasts who reflect on the more nuanced relationship between the history of knowledge and the history of science (Daston 2017; Verburgt 2020) and other domains of relevant research enquiry (De Sio and Fangerau 2019; Dupré and Somsen 2019), as well as analysts of past crises that have affected the way the

history of knowledge advances in Northern Europe (Östh Gustafsson 2020).

[2] A clear distinction should be made between the national and EU level. National-level initiatives (examples: Bressan and Bergmaier 2021; Krüger 2019) are left outside of the scope of this article.

[3] Analysis of the Arab Spring brings more local dynamics of the neighbourhood into the overall discussion (Kamel and Huber 2015; Salamey 2015), including variations of the terminology, such as 'Jasmine Revolution' (Pinfari 2012), 'Awakened Youth', 'Arab Bitterness', 'Arab Awakening', 'Arab Winter', 'Islamist Winter' to highlight diverse sentiments that accompanied the wave of protests (Hashas, 2019; Huber and Kamel, 2015; Stetter, 2015, 72). Equally, Arab Spring is a helpful guidepost to distinguish an examination of the post-volatile phase of a neighbouring area from studies of regionalisation, regionalism and inter-regionalism in the Northern African context (Bojinović Fenko 2012), as well as comparative studies of regions (Holmén 2020). Khouri (2020) draws attention to the public discontent spanning well beyond the seasonality captured by the reference to the spring. All these strands of literature serve as a helpful background to grasp the multiple layers of the central topic addressed in this article.

## Bibliography

Alcaro, Riccardo, and Nathalie Tocci. 2021. "Navigating a Covid World: The European Union's Internal Rebirth and External Quest." *The International Spectator: Italian Journal of International Affairs* 56 (2): 1-18. <https://doi.org/10.1080/03932729.2021.1911128>.

Amadio Viceré, Maria Giulia, and Andrea Frontini. 2020. "Paths to Resilience: Examining EU and NATO Responses to the Tunisian and Egyptian Political Transitions." In *Projecting Resilience Across the Mediterranean*, edited by Eugenio Cusumano and Stefan Hofmaier, 247-68. Cham: Palgrave Macmillan. <https://doi.org/10.1007/978-3-030-23641-0>.

Andersen, Casper, Cristina Clopot, and Jan Ifversen. 2020. "Heritage and Interculturality in EU Science Diplomacy." *Humanities and Social Sciences Communications* 7 (175): 1-8.

<https://doi.org/10.1057/s41599-020-00668-8>.

Azmanova, Albena. 2018. "Relational, Structural and Systemic Forms of Power: The 'Right to Justification' Confronting Three Types of Domination." *Journal of Political Power* 11 (1): 68-78. <https://doi.org/10.1080/2158379X.2018.1433757>.

Badarin, Emile, and Tobias Schumacher. 2020. "The EU, Resilience and the Southern Neighbourhood After the Arab Uprisings." In *Projecting Resilience Across the Mediterranean*, edited by Eugenio Cusumano and Stefan Hofaier, 63-86. Cham: Palgrave Macmillan. <https://doi.org/10.1007/978-3-030-23641-0>.

Bahri Korbi, Fadia, Karim Ben-Slimane, and Dora Triki. 2021. "How Do International Joint Ventures Build Resilience to Navigate Institutional Crisis? The Case of a Tunisian-French IJV During the Arab-Spring." *Journal of Business Research* 129: 157-68. <https://doi.org/10.1016/j.jbusres.2021.02.059>.

Bargués-Pedreny, Pol. 2019. "Mogherini, the Queen of Resilience Reaches the End of Her Mandate." 604. CIDOB Opinion. Barcelona: Barcelona Centre for International Affairs (CIDOB). [https://www.cidob.org/en/publications/publication\\_series/opinion/europa/mogherini\\_the\\_queen\\_of\\_resilience\\_reaches\\_the\\_end\\_of\\_her\\_mandate](https://www.cidob.org/en/publications/publication_series/opinion/europa/mogherini_the_queen_of_resilience_reaches_the_end_of_her_mandate).

Bargués-Pedreny, Pol, Aurora Bergmaier, Federica Bicchi, Amelie Buchwald, Karoline Eickhoff, Pol Morillas, Gabriella Sanchez, and Anna Schmauder. 2019. "Does Resilience Permeate Foreign Policy? A Review of the Instruments of the EU, Germany, France, and Italy." *EU-LISTCO Working Paper No. 4*. <https://www.eu-listco.net/publications/does-resilience-permeate-foreign-policy>.

Bargués, Pol. 2021. "From 'Resilience' To Strategic Autonomy: A Shift In The Implementation Of The Global Strategy?" *EU-LISTCO Policy Papers Series No. 09*. <https://doi.org/10.5281/zenodo.4548133>.

Bargués, Pol, David Cadier, Lidia Gibadło, Pol Morillas, Luigi Narbone, Nicoletta Pirozzi, and Marcin Terlikowski. 2020. "Resilience and The EU's External Action Instruments:

- Towards Multiple, Sustained, and Indirect Actions." *EU-LISTCO Working Paper No. 7*.  
<https://www.eu-listco.net/publications/resilience-and-the-eus-external-action-instruments>.
- Bargués, Pol, and Pol Morillas. 2021. "From Democratization to Fostering Resilience: EU Intervention and the Challenges of Building Institutions, Social Trust, and Legitimacy in Bosnia and Herzegovina." *Democratization* 28 (7): 1319–37.  
<https://doi.org/10.1080/13510347.2021.1900120>.
- Bauer, Patricia. 2015. "The European Mediterranean Policy after the Arab Spring: Beyond Values and Interests." *Middle East Critique*.  
<https://doi.org/10.1080/19436149.2014.998922>.
- Bell, Stephen. 2012. "The Power of Ideas: The Ideational Shaping of the Structural Power of Business." *International Studies Quarterly* 56 (4): 661–73.  
<https://doi.org/10.1111/j.1468-2478.2012.00743.x>.
- Ben Abdallah, Itaf, Alicia Perez-Porro, and Marga Gual Soler. 2021. "Science and Innovation Diplomacy in the Mediterranean." *Take Away Ideas Report*. Barcelona: Union for the Mediterranean. <https://ufmsecretariat.org/publication-speech/take-away-ideas-report/>.
- Bennis, Amine. 2021. "Power Surge: How the European Green Deal Can Succeed in Morocco and Tunisia." Policy Brief.  
<https://ecfr.eu/publication/power-surge-how-the-european-green-deal-can-succeed-in-morocco-and-tunisia/>.
- Berbés-Blázquez, Marta, Jordan Sky Oestreicher, Frédéric Mertens, and Johanne Saint-Charles. 2014. "Ecohealth and Resilience Thinking: A Dialog from Experiences in Research and Practice." *Ecology and Society* 19 (2). <https://doi.org/10.5751/ES-06264-190224>.
- Berkman, Paul Arthur. 2012. "Our Common Future in the Arctic Ocean." *The Round Table: The Commonwealth Journal of International Affairs* 101 (2): 123–35.  
<https://doi.org/10.1080/00358533.2012.661527>.
- Berkman, Paul Arthur, Lars Kullerud, Allen Pope, Alexander N. Vylegzhanin, and Oran R.



Young. 2017. "The Arctic Science Agreement Propels Science Diplomacy." *Science* 358 (6363): 596–98. <https://doi.org/10.1126/science.aag0890>.

Biedenkopf, Katja, and Franziska Petri. 2019. "EU Delegations in European Union Climate Diplomacy: The Role of Links to Brussels, Individuals and Country Contexts." *Journal of European Integration* 41 (1): 47–63. <https://doi.org/10.1080/07036337.2018.1551389>.

Biscop, Sven. 2021. *Grand Strategy in 10 Words: A Guide to Great Power Politics in the 21st Century*. Bristol: Bristol University Press.

Bojinović Fenko, Ana. 2012. "Compatibility of Regionalizing Actors' Activities in the Mediterranean Region; What Kind of Opportunity for the European Union?" *Journal of Southeast European and Black Sea* 12 (3): 407–29. <https://doi.org/10.1080/14683857.2012.710487>.

Boogaerts, Andreas, Clara Portela, and Edith Drieskens. 2016. "One Swallow Does Not Make Spring: A Critical Juncture Perspective on the EU Sanctions in Response to the Arab Spring." *Mediterranean Politics* 21 (2): 205–25. <https://doi.org/10.1080/13629395.2015.1125285>.

Borrell Fontelles, Josep. 2021. *European Foreign Policy in Times of COVID-19*. Luxembourg: Publications Office of the European Union. [https://eeas.europa.eu/headquarters/headquarters-homepage/95376/book-european-foreign-policy-times-covid-19\\_en](https://eeas.europa.eu/headquarters/headquarters-homepage/95376/book-european-foreign-policy-times-covid-19_en).

Boutwell, Jeffrey. 2014. "Triangulating Science, Security and Society: Science Cooperation and International Security." In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S. Davis and Robert G. Patman, 201–17. Singapore: World Scientific Publishing. <https://doi.org/10.1142/8658>.

Bressan, Sarah, and Aurora Bergmaier. 2021. "From Conflict Early Warning to Fostering Resilience? Chasing Convergence in EU Foreign Policy." *Democratization* 28 (7): 1357–74. <https://doi.org/10.1080/13510347.2021.1918108>.

Cadier, David, Matteo Capasso, and Karoline Eickhoff. 2020. "Researching Resilience: Implications for Case Studies in Europe's Neighbourhoods." *EU-LISTCO Working Paper No. 5*. <https://www.eu-listco.net/publications/researching-resilience>.

Carta, Caterina. 2021. "Introduction: Cultural Diplomacy in Europe: Between the Domestic and the International." In *Cultural Diplomacy in Europe: Between the Domestic and the International*, edited by Caterina Carta and Richard Higgott, 1-16. Palgrave Macmillan. <https://doi.org/10.1007/978-3-030-21544-6>.

Cianciara, Agnieszka Katarzyna. 2020. *The Politics of the European Neighbourhood Policy*. *Routledge Studies in European Foreign Policy*. London; New York: Routledge.

Copeland, Daryl. 2014. "Science, Technology and WikiLeaks 'Cablegate': Implications for Diplomacy and International Relations." In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S. Davis and Robert G. Patman, 171-98. Singapore: World Scientific Publishing. <https://doi.org/10.1142/8658>.

Corkery, Linda, and Nancy Marshall. 2018. "Urban Parks and Open Space: Underpinning A City's Future Resilience." In *8th State of Australian Cities National Conference*, 1-9. Adelaide: Analysis & Policy Observatory. <https://doi.org/10.4225/50/5b2f28d76eecd>.

Council of the European Union. 2021. *Global Approach to Research and Innovation - Europe's Strategy for International Cooperation in a Changing World - Council Conclusions (Adopted on 28 September 2021)*. Vol. 12301/21. Brussels: Council of the European Union. <https://www.consilium.europa.eu/en/press/press-releases/2021/09/28/council-agrees-on-a-global-approach-to-research-and-innovation/>.

Cusumano, Eugenio, and Nathan Cooper. 2020. "Conclusions." In *Projecting Resilience Across the Mediterranean*, edited by Eugenio Cusumano and Stefan Hofmaier, 295-314. Cham: Palgrave Macmillan. <https://doi.org/10.1007/978-3-030-23641-0>.

Czachor, Rafal. 2019. "The European Neighbourhood Policy - A Critical Overview of Current Results." *Eastern Mediterranean Policy Note No. 39*. Cyprus Center for European and International Affairs, University of Nicosia.

<https://depot.ceon.pl/handle/123456789/17032?show=full>.

D'Abramo, Flavio. 2021. "The Past and Present of Pandemic Management: Health Diplomacy, International Epidemiological Surveillance, and COVID-19." *History and Philosophy of the Life Sciences* 43 (2): 1-6. <https://doi.org/10.1007/s40656-021-00416-4>.

Darby, Sefton. 2014. "The Emperor's New Clothes: A Failure of Diplomacy in the Oil and Mining Sectors." In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S. Davis and Robert G. Patman, 133-53. Singapore: World Scientific Publishing. <https://doi.org/10.1142/8658>.

Daston, Lorraine. 2017. "The History of Science and the History of Knowledge." *KNOW: A Journal on the Formation of Knowledge* 1 (1): 131-54. <https://doi.org/10.1086/691678>.

David, Matthew, and Cynthia Meersohn Schmidt. 2019. "Power and Counter-Power: Knowledge Structure and the Limits of Control." *Sociological Research Online* 24 (1): 21-37. <https://doi.org/10.1177/1360780418797717>.

Davis, Lloyd S., and Robert G. Patman. 2014. "New Day or False Dawn?" In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S. Davis and Robert G. Patman, 261-75. Singapore: World Scientific Publishing. <https://doi.org/10.1142/8658>.

Demmelhuber, Thomas. 2017. "The Challenges of a Changing Southern Neighbourhood." In *The Routledge Handbook on the European Neighbourhood Policy*, edited by Tobias Schumacher, Andreas Marchetti, and Thomas Demmelhuber, 177-85. London: Routledge. <https://doi.org/10.4324/9781315691244>.

De Sio, Fabio, and Heiner Fangerau. 2019. "The Obvious in a Nutshell: Science, Medicine, Knowledge, and History." *Berichte Zur Wissenschaftsgeschichte* 42: 167-85. <https://doi.org/10.1002/bewi.201900001>.

Dou, Yue, Peter J. Deadman, Marta Berbés-Blázquez, Nathan D. Vogt, and Oriana Almeida. 2020. "Pathways out of Poverty through the Lens of Development Resilience: An Agent-Based Simulation." *Ecology and Society* 25 (4). <https://doi.org/10.5751/ES-11842-250403>.

Dupré, Sven, and Geert Somsen. 2019. "The History of Knowledge and the Future of Knowledge Societies." *Berichte Zur Wissenschaftsgeschichte* 42: 186–99.  
<https://doi.org/10.1002/bewi.201900006>.

Egeberg, Morten, and Jarle Trondal. 2014. "National Administrative Sovereignty." In *The European Union's Non-Members: Independence under Hegemony?*, edited by Erik O. Eriksen and John Erik Fossum, 173–88. London: Routledge.  
<https://doi.org/10.4324/9781315751030>.

Eickhoff, Karoline, and Eric Stollenwerk. 2018. "Strengthening Resilience in the EU's Neighbourhood." 01. *EU-LISTCO Policy Papers Series No. 1*.  
<https://www.eu-listco.net/publications/strengthening-resilience>.

Eltinay, Nuha. 2019. "City-to-City Exchange: Redefining 'Resilience' in the Arab Region." *International Journal of Disaster Resilience in the Built Environment* 10 (4): 222–38.  
<https://doi.org/10.1108/IJDRBE-05-2019-0028>.

Engström, Mats. 2022. "A Green Deal, Open to the World." *European Policy Analysis 10epa*. Stockholm: Swedish Institute for European Policy Studies (Sieps).  
<https://sieps.se/en/publications/2022/a-green-deal-open-to-the-world/>.

Eriksen, Erik O. 2014. "Regional Cosmopolitanism: The EU in Search of Its Legitimation." *European Journal of Futures Research* 2 (1): 1–9.  
<https://doi.org/10.1007/s40309-014-0051-8>.

Eriksen, Erik O., and John Erik Fossum. 2014. "Hegemony by Association." In *The European Union's Non-Members: Independence under Hegemony?*, edited by Erik O. Eriksen and John Erik Fossum, 230–42. London: Routledge. <https://doi.org/10.4324/9781315751030>.

Fägersten, Björn. 2022. "Leveraging Science Diplomacy in an Era of Geo-Economic Rivalry: Towards a European Strategy." UI Report 1/2022. Stockholm: Swedish Institute of International Affairs (UI).  
<https://www.ui.se/globalassets/ui.se-eng/publications/ui-publications/2022/ui-report-no.-1-2022.pdf>.

Farnum, Rebecca L. 2018. "Drops of Diplomacy : Questioning the Scale of Hydro-Diplomacy Through Fog-Harvesting." *Journal of Hydrology* 562: 446-54.  
<https://doi.org/10.1016/j.jhydrol.2018.05.012>.

Ferraro, Giulia. 2020. "After the Crisis: The Role of Resilience in Coming Back Stronger." *Connections: The Quarterly Journal* 19 (4): 97-107.  
<https://doi.org/10.11610/connections.19.4.07>.

Fihn, Beatrice. 2022. "Foreword: How Science and Diplomacy Can Save the World." In *Colloquia on Science Diplomacy*, edited by Roberto Antonelli, Giorgio Parisi, and Wolfgango Plastino, XV-XXI. Istituto della Enciclopedia Italiana fondata da Giovanni Treccani S.p.A.  
<https://colloquia.treccani.it/>

Fossum, John Erik. 2014. "Representation under Hegemony?" In *The European Union's Non-Members: Independence under Hegemony?*, edited by Erik O. Eriksen and John Erik Fossum, 153-72. London: Routledge. <https://doi.org/10.4324/9781315751030>.

———. 2020. "The Institutional Make-up of Europe's Segmented Political Order." In *Towards a Segmented European Political Order: The European Union's Post-Crises Conundrum*, edited by Josef Batora and John Erik Fossum, 22-46. London: Routledge.

Frank, Robert, and Céline Paillette. 2016. "Éditorial." *Bulletin de l'Institut Pierre Renouvin* 2 (44): 11-20. <https://doi.org/10.3917/bipr1.044.0011>.

Gamito-Marques, Daniel. 2020. "Science for Competition among Powers: Geographical Knowledge, Colonial-Diplomatic Networks, and the Scramble for Africa." *Berichte Zur Wissenschaftsgeschichte* 43 (4): 473-92. <https://doi.org/10.1002/bewi.202000016>.

Gaub, Florence, and Nicu Popescu. 2017. "Introduction." In *After the EU Global Strategy: Building Resilience*, edited by Florence Gaub and Nicu Popescu, 7-9. Luxembourg: Publications Office of the European Union. <https://doi.org/10.2815/231619>.

Giannakis, Elias, and Adriana Bruggeman. 2020. "Regional Disparities in Economic Resilience in the European Union Across the Urban-Rural Divide." *Regional Studies* 54 (9):

1200-1213. <https://doi.org/10.1080/00343404.2019.1698720>.

Giske, Mathilde Tomine Eriksdatter. 2021. "Resilience in the Age of Crises." *NUPI Research Paper - 2/2021*. Oslo: Norwegian Institute of International Affairs (NUPI).  
[https://www.nupi.no/nupi\\_eng/Publications/CRISTin-Pub/Resilience-in-the-age-of-crises](https://www.nupi.no/nupi_eng/Publications/CRISTin-Pub/Resilience-in-the-age-of-crises).

Giumelli, Francesco. 2020. "Sanctions as a Regional Security Instrument: EU Restrictive Measures Examined." In *Projecting Resilience Across the Mediterranean*, edited by Eugenio Cusumano and Stefan Hofmaier, 103-24. Cham: Palgrave Macmillan.  
<https://doi.org/10.1007/978-3-030-23641-0>.

Goldson, Stephen L., and Peter D. Gluckman. 2014. "Science, Diplomacy and Trade: A View from a Small OECD Agricultural Economy." In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S. Davis and Robert G. Patman, 231-42. Singapore: World Scientific Publishing. <https://doi.org/10.1142/8658>.

Gordner, Matt. 2019. "Youth Politics in Tunisia: Comparing Land/Labor, Leftist Movements, and NGO-Ized Elites." In *Youth Politics in the Middle East and North Africa*, 14-19. *POMEPS Studies 36*. Washington, DC: The Project on Middle East Political Science.  
<https://pomeps.org/pomeps-studies-36-youth-politics-in-the-middle-east-and-north-africa>.

Griset, Pascal, and Yves Bouvier. 2012. "De l'histoire Des Techniques à l'histoire de l'innovation. Tendances de La Recherche Française En Histoire Contemporaine." *Histoire, Économie & Société* 31e année (2): 29-43. <https://doi.org/10.3917/hes.122.0029>.

Griset, Pascal, Céline Paillette, and Yves Agid. 2021. "La Genèse Des Neurosciences: Entre Technosciences et Diplomatie de l'innovation, Des Années 1940 Aux Années 1970." *M.S. Médecine Sciences* 37: 920-26. <https://doi.org/10.1051/medsci/2021139>.

Gutu, Ioana. 2016. "The Transatlantic Blue Diplomacy." *CES Working Papers* 8 (4): 666-80. <https://www.econstor.eu/bitstream/10419/198485/1/ceswp-v08-i4-p666-680.pdf>.

Guzzini, Stefano. 1993. "Structural Power: The Limits of Neorealist Power Analysis." *International Organization* 47 (3): 443-78. <https://doi.org/10.1017/S0020818300028022>.

Hashas, Mohammed. 2019. "The Arab Right to Difference: Taha Abderrahmane's Concept of the Awakened Youth and the Formation of Modern Arab Nationhood." In *Islam in International Relations: Politics and Paradigms*, edited by Nassef Manabilang Adiong, Raffaele Mauriello, and Deina Abdelkader, 39-61. Abingdon: Routledge.

Helwig, Niklas. 2014. "Legitimacy of the EEAS." In *The EU's External Action Service: Potentials for a One Voice Foreign Policy*, edited by Doris Dialer, Heinrich Neisser, and Anja Opitz, 67-78. Innsbruck University Press. [https://doi.org/10.26530/OAPEN\\_466610](https://doi.org/10.26530/OAPEN_466610).

Hill, Jonathan N.C. 2018. "Authoritarian Resilience in Morocco After the Arab Spring: A Critical Assessment of Educational Exchanges in Soft Power." *Journal of North African Studies* 23 (3): 399-417. <https://doi.org/10.1080/13629387.2017.1391946>.

Holmén, Janne. 2020. "Perception of the Baltic Sea and Mediterranean Regions Among Secondary School Students." *Journal of Baltic Studies* 51 (4): 513-32. <https://doi.org/10.1080/01629778.2020.1810723>.

Hoogeveen, Hans, and Patrick Verkooijen. 2010. *Transforming Sustainable Development Diplomacy: Lessons Learned from Global Forest Governance*. Wageningen: Wageningen University. <https://library.wur.nl/WebQuery/wurpubs/fulltext/16407>.

Huber, Daniela, and Lorenzo Kamel. 2015. "Arab Spring: The Role of the Peripheries." *Mediterranean Politics* 20 (2): 127-41. <https://doi.org/10.1080/13629395.2015.1033905>.

Huber, Daniela, and Eckart Woertz. 2021. "Resilience, Conflict and Areas of Limited Statehood in Iraq, Lebanon and Syria." *Democratization* 28 (7): 1261-79. <https://doi.org/10.1080/13510347.2021.1940967>.

Huhe, Narisong, Daniel Naurin, and Robert Thomson. 2020. "Don't Cry For Me Britannia: The Resilience of the European Union to Brexit." *European Union Politics* 21 (1): 152-72. <https://doi.org/10.1177/1465116519882096>.

Jacob, Christian. 2017. "Lieux de Savoir: Places and Spaces in the History of Knowledge." *KNOW: A Journal on the Formation of Knowledge* 1 (1): 85-102.

<https://doi.org/10.1086/692293>.

Juncos, Ana E. 2017. "Resilience as the New EU Foreign Policy Paradigm: A Pragmatist Turn?" *European Security* 26 (1): 1-18. <https://doi.org/10.1080/09662839.2016.1247809>.

———. 2021. "The EU Global Strategy and Diplomacy: Five Years On." *LEGOF Policy Brief 4/2021*. ARENA Centre for European Studies.

<https://www.sv.uio.no/arena/english/research/publications/arena-policy-briefs/2021/legof-policy-brief-4-2021-v2.pdf>.

———. E. 2018. "Resilience in Peacebuilding: Contesting Uncertainty, Ambiguity, and Complexity." *Contemporary Security Policy* 39 (4): 559-74.

<https://doi.org/10.1080/13523260.2018.1491742>.

Kakachia, Kornely, and Bidzina Lebanidze. 2020. "Responses to Global and Diffuse Risks." EU-LISTCO Policy Papers Series No. 05. <https://doi.org/10.5281/zenodo.3695259>.

Kakachia, Kornely, Agnieszka Legucka, and Bidzina Lebanidze. 2021. "Can the EU's New Global Strategy Make a Difference? Strengthening Resilience in the Eastern Partnership Countries." *Democratization* 28 (7): 1338-56.

<https://doi.org/10.1080/13510347.2021.1918110>.

Kaldewey, David, and Désirée Schwauz. 2018. "Transforming Pure Science Into Basic Research: The Language of Science Policy in the United States." In *Basic and Applied Research: The Language of Science Policy in the Twentieth Century*, edited by David Kaldewey and Désirée Schwauz, 104-40. Oxford, New York: Berghahn Books.

<https://www.berghahnbooks.com/title/KaldeweyBasic>.

Kamel, Lorenzo, and Daniela Huber. 2015. "Arab Spring: A Decentring Research Agenda." *Mediterranean Politics* 20 (2): 273-80. <https://doi.org/10.1080/13629395.2015.1033901>.

Khoury, Rami G. 2020. "Comprehensive, Contentious, Convulsive, and Continuing Some Observations on the 2010 - 2020 Arab Uprisings." *Journal of Middle East Politics and Policy* Spring: 8-14.



<https://jmepp.hkspublications.org/wp-content/uploads/sites/17/2020/03/Khoury.pdf>.

Kitchen, Nicholas, and Michael Cox. 2019. "Power, Structural Power, and American Decline." *Cambridge Review of International Affairs* 32 (6): 734–52.  
<https://doi.org/10.1080/09557571.2019.1606158>.

Koenig, Nicole. 2014. "Libya and the Challenges of Post-Lisbon Crisis Coordination." In *The EU's External Action Service: Potentials for a One Voice Foreign Policy*, edited by Doris Dialer, Heinrich Neisser, and Anja Opitz, 163–74. Innsbruck University Press.  
[https://doi.org/10.26530/OAPEN\\_466610](https://doi.org/10.26530/OAPEN_466610).

Kourtikakis, Kostas, and Ekaterina Turkina. 2015. "Civil Society Organizations in European Union External Relations: A Study of Interorganizational Networks in the Eastern Partnership and the Mediterranean." *Journal of European Integration* 37 (5): 587–609.  
<https://doi.org/10.1080/07036337.2015.1034275>.

Krüger, Marco. 2019. "Building Instead of Imposing Resilience: Revisiting the Relationship Between Resilience and the State." *International Political Sociology* 13 (1): 53–67.  
<https://doi.org/10.1093/ips/oly025>.

Kurrer, Christian. 2021. "Environment Policy: General Principles and Basic Framework." *Fact Sheet on the European Union*.  
<https://www.europarl.europa.eu/factsheets/en/sheet/71/environment-policy-general-principles-and-basic-framework>.

Kwiecień, Joanna. 2016a. "ENP in the Context of the EU's External Policy Framework: A Critical Examination of the ENP's Outcomes and Prospects." *Rocznik Instytutu Europy Środkowo - Wschodniej* 14 (6): 147–63.  
<https://www.ceeol.com/search/article-detail?id=579556>.

———. 2016b. "Processes of Deliberation and Negotiation in the Revamped ENP: Divergent Modes of Governance That Emerge at the Intersection of EaP/SoP and the EU and Its Member States." *Rocznik Instytutu Europy Środkowo - Wschodniej* 14 (6): 183–97.  
<http://bazekon.icm.edu.pl/bazekon/element/bwmeta1.element.ekon-element-000171504721>.

- . 2016c. "The Idea of the Southern Mediterranean and Its Role in Shaping the Logic behind the Southern Dimension of the ENP." *Rocznik Instytutu Europy Środkowo - Wschodniej* 14 (6): 87-105. <https://www.ceeol.com/search/article-detail?id=579547>.
- Lannon, Erwan. 2019. "La Coopération En Matière d'éducation, d'enseignement Supérieur et de Recherche et Le Développement d'un Diplomatie Scientifique et Technologique Euro-Méditerranéenne." In *10è Rencontre de Cybèle : "En Amont Du Sommet Des Deux Rives, Forum de La Méditerranée : Société Civile et Relance Euro-Méditerranéenne,"* 46-57. Association Euromed. <https://biblio.ugent.be/publication/8651370>.
- Leach, Joan. 2014. "The Role of Science Communication in International Diplomacy." In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S. Davis and Robert G. Patman, 155-69. Singapore: World Scientific Publishing. <https://doi.org/10.1142/8658>.
- Leijten, Jos. 2017. "Exploring the Future of Innovation Diplomacy." *European Journal of Futures Research* 5 (20): 1-13. <https://doi.org/10.1007/s40309-017-0122-8>.
- Lesser, Pamela. 2009. "Greening the Mediterranean: Europe's Environmental Policy toward Mediterranean Neighbors." *Mediterranean Quarterly* 20 (2): 26-39. <https://muse.jhu.edu/article/315035>.
- Liu, Edison T. 2014. "Global Health Research Diplomacy." In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S. Davis and Robert G. Patman, 219-29. Singapore: World Scientific Publishing. <https://doi.org/10.1142/8658>.
- Liu, Mingtang, and Kellee S. Tsai. 2021. "Structural Power, Hegemony, and State Capitalism: Limits to China's Global Economic Power." *Politics and Society* 49 (2): 235-67. <https://doi.org/10.1177/0032329220950234>.
- Macindoe, Sarah. 2014. "Managing Plant Genetic Resources for Food and Agriculture: International Efforts and Lessons from the New Zealand Experience." In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S. Davis and Robert G. Patman, 45-67. Singapore: World Scientific Publishing. <https://doi.org/10.1142/8658>.

- Magen, Amichai, and Daphné Richemond-Barak. 2021. "Anticipating Global and Diffuse Risks to Prevent Conflict and Governance Breakdown: Lessons from the EU's Southern Neighbourhood." *Democratization* 28 (7): 1239–60. <https://doi.org/10.1080/13510347.2021.1940968>.
- Malkin, Anton. 2022. "The Made in China Challenge to US Structural Power: Industrial Policy, Intellectual Property and Multinational Corporations." *Review of International Political Economy* 29 (2): 538–70. <https://doi.org/10.1080/09692290.2020.1824930>.
- Mathis, Charles-François. 2020. "European Environmental Policy." *Encyclopédie d'histoire Numérique de l'Europe*. <https://ehne.fr/en/node/12434>.
- Mattingly, Garrett. 1937. "The First Resident Embassies : Mediaeval Italian Origins of Modern Diplomacy." *Speculum* 12 (4): 423–39. <https://doi.org/10.2307/2849298>.
- Michailidou, Asimina, and Hans-Jörg Trenz. 2020. "European Solidarity in Times of Crisis: Towards Differentiated Integration." In *Towards a Segmented European Political Order: The European Union's Post-Crises Conundrum*, edited by Josef Bátora and John Erik Fossum, 132–51. London: Routledge.
- Milkoreit, Manjana. 2014. "Science and Climate Change Diplomacy: Cognitive Limits and the Need to Reinvent Science Communication." In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S. Davis and Robert G. Patman, 109–31. Singapore: World Scientific Publishing. <https://doi.org/10.1142/8658>.
- Monod de Froideville, Gilbert, and Mark Verheul. 2016. *An Experts' Guide to International Protocol: Best Practices in Diplomatic and Corporate Relations*. Amsterdam: Amsterdam University Press. <https://doi.org/10.5117/9789463727167>.
- Morgenstern-Pomorski, Jost Henrik. 2018. *The Contested Diplomacy of the European External Action Service: Inception, Establishment and Consolidation*. Routledge/UACES Contemporary European Studies. Abingdon: Routledge.
- Mourato Pinto, João. 2022. "Portuguese Science Diplomacy and the Networks of Portuguese

Professionals, Researchers and Graduate Students Abroad: From The Escape to The Circulation of Brains." *OBSERVARE - JANUS.NET e-Journal of International Relations* 13 (1): 98-116. <https://repositorio.ual.pt/handle/11144/5421>.

Nishi, Maiko, Yoji Natori, and Devon R Dublin. 2021. "Resilience in Landscapes & Seascapes: Building Back Better from COVID-19." *UNU-IAS Policy Brief No. 26*. Tokyo: United Nations University Institute for the Advanced Study of Sustainability (UNU-IAS). <https://ias.unu.edu/en/news/news/policy-brief-highlights-resilience-in-landscapes-seascapes-to-build-back-better.html>.

Oberthür, Sebastian, and Claire Dupont. 2021. "The European Union's International Climate Leadership: Towards a Grand Climate Strategy?" *Journal of European Public Policy* 28 (7): 1095-1114. <https://doi.org/10.1080/13501763.2021.1918218>.

Olšáková, Doubravka. 2020. "A Matter of Courtesy: The Role of Soviet Diplomacy and Soviet 'System Safeguards' in Maintaining Soviet Influence on Czechoslovak Science before and after 1968." *Berichte Zur Wissenschaftsgeschichte* 43: 542-59. <https://doi.org/10.1002/bewi.202000023>.

Olsen, Espen D.H. 2020. "What Kind of Crisis and How to Deal with It? The Segmented Border Logic in the European Migration Crisis." In *Towards a Segmented European Political Order: The European Union's Post-Crises Conundrum*, edited by Josef Batora and John Erik Fossum, 93-111. London: Routledge.

Olsson, Lennart, Anne Jerneck, Henrik Thoren, Johannes Persson, and David O'Byrne. 2015. "Why Resilience Is Unappealing to Social Science: Theoretical and Empirical Investigations of the Scientific Use of Resilience." *Science Advances* 1 (4): 1-11. <https://doi.org/10.1126/sciadv.1400217>.

Östh Gustafsson, Hampus. 2020. "Mobilising the Outsider: Crises and Histories of the Humanities in the 1970s Scandinavian Welfare States." In *Histories of Knowledge in Postwar Scandinavia*, edited by Johan Östling, Niklas Olsen, and David Larsson Heidenblad, 208-24. New York: Routledge. <https://www.taylorfrancis.com/books/e/9781003019275>.

Östling, Johan. 2015. "Vad Är Kunskapshistoria?" *Historisk Tidskrift* 135 (1): 109-19.  
[http://www.historisktidskrift.se/fulltext/2015-1/HT\\_2015\\_1\\_109-119\\_ostling.htm](http://www.historisktidskrift.se/fulltext/2015-1/HT_2015_1_109-119_ostling.htm).

Östling, Johan, Niklas Olsen, and David Larsson Heidenblad. 2020. "Introduction." In *Histories of Knowledge in Postwar Scandinavia: Actors, Arenas, and Aspirations*, edited by Johan Östling, Niklas Olsen, and David Larsson Heidenblad, 1-17. London: Routledge.  
<https://doi.org/10.4324/9781003019275>.

Ostrowska-Chałupa, Marta. 2016. "ENP after EEAS: Impact, Changes, Implications for Its Delivery." *Rocznik Instytutu Europy Środkowo - Wschodniej* 14 (6): 165-82.  
[https://ies.lublin.pl/wp-content/uploads/2020/08/riesw\\_1732-1395\\_14-6-302.pdf](https://ies.lublin.pl/wp-content/uploads/2020/08/riesw_1732-1395_14-6-302.pdf).

Özçelik, Sezai. 2021. "Ozone Diplomacy, Ozone Regime Negotiations, and the Arctic." *International Journal of Politics and Security* 3 (1): 74-98.  
<https://dergipark.org.tr/en/download/article-file/1465304>.

Ozcurumez, Saime. 2021. "The EU's Effectiveness in the Eastern Mediterranean Migration Quandary: Challenges to Building Societal Resilience." *Democratization* 28 (7): 1302-18.  
<https://doi.org/10.1080/13510347.2021.1918109>.

Özkaragöz Doğan, Elif, Zafer Uygün, and İbrahim Semih Akçomak. 2021. "Can Science Diplomacy Address the Global Climate Change Challenge?" *Environmental Policy and Governance* 31: 31-45. <https://doi.org/10.1002/eet.1911>.

Ozoliņa, Žaneta. 2016. "EU Global Strategy: Expert Opinion." *EU Global Strategy: Expert Opinion No. 33*. Paris: European Union Institute for Security Studies (EUISS).  
<https://www.iss.europa.eu/content/eu-global-strategy-expert-opinion-no33---žaneta-ozoliņa>.

Paillette, Céline. 2021. "L'action Sanitaire Extérieure de La France, 1949-1954. La Nostalgie de l'influence, Le Pragmatisme Multilatéral et Les Europe(s) de La Santé." *Bulletin de l'Institut Pierre Renouvin* 1 (52): 37-45. <https://doi.org/10.3917/bipr1.052.0037>.

Panas, Ewelina, and Marcin Gołębiowski. 2021. "Educational and Scientific Programmes for the Citizens of Belarus as an Example of Science Diplomacy - a Political and Legal

Analysis." *Rocznik Instytutu Europy Środkowo - Wschodniej* 19 (4): 243-64.  
<https://doi.org/10.36874/riesw.2021.4.12>.

Pinfari, Marco. 2012. "A Changing Mediterranean: Regional Organisations and North Africa during the Arab Spring." *International Spectator* 47 (1): 134-50.  
<https://doi.org/10.1080/03932729.2012.655014>.

Plamondon Emond, Étienne. 2019. "Un Concept Encore Largement Méconnu." *Le Devoir*, C1-2.  
<https://www.ledevoir.com/societe/science/565954/un-concept-encore-largement-meconnu-un-e-notion-negligee>.

Polejack, Andrei, Sigi Gruber, and Mary S. Wisz. 2021. "Atlantic Ocean Science Diplomacy in Action: The Pole-to-Pole All Atlantic Ocean Research Alliance." *Humanities and Social Sciences Communications* 8 (52): 1-11. <https://doi.org/10.1057/s41599-021-00729-6>.

Pospisil, Jan, and Florian P. Kühn. 2016. "The Resilient State: New Regulatory Modes in International Approaches to State Building?" *Third World Quarterly* 37 (1): 1-16.  
<https://doi.org/10.1080/01436597.2015.1086637>.

Pozza, Maria. 2014. "Diplomacy for Science: The SKA Project." In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S. Davis and Robert G. Patman, 87-106. Singapore: World Scientific Publishing. <https://doi.org/10.1142/8658>.

Puglierin, Jana. 2019. "Priorities for the EU's New Foreign Policy Agenda up to 2024." *DGAP Analysis No. 1*. Berlin: German Council on Foreign Relations (DGAP).  
[https://dgap.org/sites/default/files/article\\_pdfs/dgap\\_analysis\\_nr1-nov2019\\_web\\_0.pdf](https://dgap.org/sites/default/files/article_pdfs/dgap_analysis_nr1-nov2019_web_0.pdf).

Pustovitovskij, Andrej. 2016. "Reconceptualising Structural Power: A New Concept Made Out of Sterling Parts." *E-International Relations*.  
<https://www.e-ir.info/2016/12/18/reconceptualising-structural-power-a-new-concept-made-out-of-sterling-parts/>.

Pustovitovskij, Andrej, and Jan-Frederik Kremer. 2011. "Structural Power and International

Relations Analysis: 'Fill Your Basket, Get Your Preferences.'" *IEE Working Paper Volume 191*. Bochum: Ruhr-Universität Bochum.

<https://www.econstor.eu/bitstream/10419/183545/1/wp-191.pdf>.

Radeljić, Branislav. 2014. "The European Neighborhood Policy and Its Capacity to Manage Mobility and Migration." In *Territoriality and Migration in the E.U. Neighbourhood: Spilling over the Wall*, edited by Margaret Walton-Roberts and Jenna Hennebry, 1-254. Dordrecht: Springer Dordrecht. <https://doi.org/10.1007/978-94-007-6745-4>.

Rasmussen, Anne. 2016. "Documenter La Santé En Guerre : L'Internationale Sanitaire Interalliée, 1915-1919." *Bulletin de l'Institut Pierre Renouvin* N° 44 (2): 103. <https://doi.org/10.3917/bipr1.044.0103>.

Rhinard, Mark. 2017. "Mark Rhinard." In *After the EU Global Strategy: Building Resilience*, edited by Florence Gaub and Nicu Popescu, 25-27. Luxembourg: Publications Office of the European Union. <https://doi.org/10.2815/231619>.

Rivera Escartin, Adrià. 2020. "Populist Challenges to EU Foreign Policy in the Southern Neighbourhood: An Informal and Illiberal Europeanisation?" *Journal of European Public Policy* 27 (8): 1195-1214. <https://doi.org/10.1080/13501763.2020.1712459>.

Ruud, Camilla. 2018. "Materializing Circulation: A Gigantic Skeleton and a Danish Eighteen-Century Naturalist." In *Circulation of Knowledge: Explorations in the History of Knowledge*, edited by Johan Östling, Erling Sandmo, David Larsson Heidenblad, Anna Nilsson Hammar, and Kari Nordberg, 197-218. Lund: Nordic Academic Press. [https://portal.research.lu.se/portal/en/publications/circulation-of-knowledge\(a7665a5e-d60f-43f2-8bd0-8a7779717a55\).html](https://portal.research.lu.se/portal/en/publications/circulation-of-knowledge(a7665a5e-d60f-43f2-8bd0-8a7779717a55).html).

Salamey, Imad. 2015. "Post-Arab Spring: Changes and Challenges." *Third World Quarterly* 36 (1): 111-29. <https://doi.org/10.1080/01436597.2015.976025>.

Schemper, Lukas. 2019. "Science Diplomacy and the Making of the United Nations International Decade for Natural Disaster Reduction." *Diplomatica* 1: 243-67. <https://doi.org/10.1163/25891774-00102006>.

Schunz, Simon. 2021. "The European Union's Strategic Turn in Climate Diplomacy: 'Multiple Bilateralism' with Major Emitters." EU Diplomacy Paper No. 4. Bruges: College of Europe. <https://www.coleurope.eu/news/eu-diplomacy-paper-4/2021>.

Servent, Ariadna Ripoll, and Angela Tacea. 2021. "Resilient Institutions: The Impact of Rule Change on Policy Outputs in European Union Decision-making Processes." *Politics and Governance* 9 (3): 1-4. <https://doi.org/10.17645/pag.v9i3.4710>.

Shikaki, Khalil. 2020. "Stability vs. Democracy in the Post Arab-Spring: What Choice for the EU?" *EU-LISTCO Policy Papers Series No. 04*. <https://www.eu-listco.net/publications/stability-vs-democracy-in-the-post-arab-spring>.

Siekiera, Joanna. 2020. "Regional Integration in the South Pacific: Challenges for Public Governance." *Brazilian Journal of International Law* 17 (1): 433-42. <https://doi.org/10.5102/RDI.V17I1.6641>.

———. 2021a. "Ocean Diplomacy as a Promising Solution to Climate Change." *Science Diplomacy: India's Global Digest of Multidisciplinary Science* 4 (4): 8-10. <http://niscair.res.in/includes/images/sciencediplomacy/Science-Diplomacy-April-June-2021.pdf>.

———. 2021b. "Water Diplomacy: Science Diplomacy for Seeking Legal Solutions to Ocean Change." *Science Diplomacy Review* 3 (2): 15-23. <https://www.ris.org.in/sites/default/files/SDR9.pdf>.

Šime, Zane. 2021a. "Circulation of Science Diplomacy: Exploring the Motion of Ideas." *Science Diplomacy Review* 3 (1): 35-41. <https://www.ris.org.in/index.php/en/journals-n-newsletters/Science-Diplomacy-Review>.

———. 2021b. "EU-India Relations in the Multi-Vector Matrix of Science Diplomacy and Asia-Europe Meeting." *Research in Globalization* 3: 1-17. <https://doi.org/10.1016/j.resglo.2021.100057>.

———. 2021c. "European Union Science Diplomacy in the Southern Neighbourhood:



- Mapping the Field and Plurality of Resilience-Builders." 8. EU Diplomacy Paper. Bruges: College of Europe.  
<https://www.coleurope.eu/study/eu-international-relations-and-diplomacy-studies/research-publications/eu-diplomacy-papers>.
- . 2022. "Earth System Governance and Science Diplomacy: Commonalities of Emerging Shapers of Institutions." *Australian and New Zealand Journal of European Studies* 14 (1): 49-67. <https://openjournals.library.sydney.edu.au/index.php/ANZJES>.
- Smith, Michael, Stephan Keukeleire, and Sophie Vanhoonacker. 2015. "Introduction." In *The Diplomatic System of the European Union: Evolution, Change and Challenges*, edited by Michael Smith, Stephan Keukeleire, and Sophie Vanhoonacker, 1-8. London: Taylor & Francis Group. <https://doi.org/10.4324/9781315726342>.
- Soler i Lecha, Eduard, and Daniela Huber. 2021. "The EU's New Agenda for Its Southern Neighbourhood: The Case for a Green and Inclusive Review." *EU-LISTCO Working Paper no 11*.  
[https://www.cidob.org/en/publications/publication\\_series/project\\_papers/eu\\_listco/the\\_eu\\_s\\_new\\_agenda\\_for\\_its\\_southern\\_neighbourhood\\_the\\_case\\_for\\_a\\_green\\_and\\_inclusive\\_review](https://www.cidob.org/en/publications/publication_series/project_papers/eu_listco/the_eu_s_new_agenda_for_its_southern_neighbourhood_the_case_for_a_green_and_inclusive_review).
- Stetter, Stephan. 2015. "'2011': Middle East (R)Evolution." In *International Relations Theory and a Changing Middle East*, 71-72. Washington, DC: The Project on Middle East Political Science. <https://pomeps.org/international-relations-theory-and-a-new-middle-east>.
- Story, Christophe Jaquet. 2001. "Le Système Mondial de Susan Strange." *Politique Étrangère* 66 (2): 433-47. <https://doi.org/10.3406/polit.2001.5082>.
- Stryjek, Joanna. 2016. "The European Neighbourhood Policy and FDI: The Southern Dimension." *Rocznik Instytutu Europy Środkowo - Wschodniej* 14 (6): 49-68.  
<https://www.cceol.com/search/article-detail?id=579536>.
- Sunami, Atsushi, Tomoko Hamachi, and Shigeru Kitaba. 2014. "Japan's Science and Technology Diplomacy." In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S. Davis and Robert G. Patman, 243-58. Singapore: World Scientific Publishing.

<https://doi.org/10.1142/8658>.

Tocci, Nathalie. 2016. "Interview with Nathalie Tocci on the Global Strategy for the European Union's Foreign and Security Policy." *International Spectator* 51 (3): 1-8. <https://doi.org/10.1080/03932729.2016.1216744>.

Tomalová, Eliška, Eliška Černovská, Ewert Aukes, Jasper Montana, and Elke Dall. 2020. "Water Diplomacy and Its Future in the National, Regional, European and Global Environments." *Science Diplomacy in the Making: Case-Based Insights from the S4D4C Project (S4D4C)*. [https://www.s4d4c.eu/wp-content/uploads/2020/03/D3.2\\_2\\_Water\\_final.pdf](https://www.s4d4c.eu/wp-content/uploads/2020/03/D3.2_2_Water_final.pdf).

Tooze, Roger. 2000. "Susan Strange, Academic International Relations and the Study of International Political Economy." *New Political Economy* 5 (2): 280-89. <https://doi.org/10.1080/713687770>.

Torney, Diarmuid, and Mai'a K. Davis Cross. 2018. "Environmental and Climate Diplomacy: Building Coalitions Through Persuasion." In *European Union External Environmental Policy: Rules, Regulation and Governance Beyond Borders*, edited by Camilla Adelle, Katja Biedenkopf, and Diarmuid Torney, 39-58. Cham: Palgrave Macmillan.

Turekian, Vaughan, Sarah Macindoe, Daryl Copeland, Lloyd S. Davis, Robert G. Patman, and Maria Pozza. 2014. "The Emergence of Science Diplomacy." In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S Davis and Robert G. Patman, 3-24. Singapore: World Scientific Publishing. <https://doi.org/10.1142/8658>.

Van de Graaf, Thijs. 2013. "The 'Oil Weapon' Reversed? Sanctions Against Iran and U.S.-EU Structural Power." *Middle East Policy* 20 (3): 145-63. <https://doi.org/10.1111/mepo.12040>.

Van Rompuy, Herman. 2021. "Values Matter in the EU and in the World." *CIFE Policy Paper No 122*. Nice: Centre international de formation européenne. [https://www.cife.eu/Ressources/FCK/files/publications/policy paper/2021/CIFE\\_Herman\\_Van\\_Rompuy\\_November2021.pdf](https://www.cife.eu/Ressources/FCK/files/publications/policy%20paper/2021/CIFE_Herman_Van_Rompuy_November2021.pdf).

van Veen, Erwin. 2017. "Erwin van Veen." In *After the EU Global Strategy: Building*

- Resilience*, edited by Florence Gaub and Nicu Popescu, 37-39. Luxembourg: Publications Office of the European Union. <https://doi.org/10.2815/231619>.
- Verburgt, Lukas M. 2020. "The History of Knowledge and the Future History of Ignorance." *KNOW: A Journal on the Formation of Knowledge* 4 (1): 1-24. <https://doi.org/10.1086/708341>.
- Vylegzhanin, Alexander N., Oran R. Young, and Paul Arthur Berkman. 2021. "Russia in the Arctic Chair: Adapting the Arctic Governance System to Conditions Prevailing in the 2020s." *Polar Record* 57 (e37): 1-10. <https://doi.org/10.1017/S0032247421000553>.
- Wagner, Wolfgang, and Rosanne Anholt. 2016. "Resilience as the EU Global Strategy's New Leitmotif: Pragmatic, Problematic or Promising?" *Contemporary Security Policy* 37 (3): 414-30. <https://doi.org/10.1080/13523260.2016.1228034>.
- Weise, Hanna, Harald Auge, Cornelia Baessler, Ilona Bärlund, Elena M Bennett, Uta Berger, Friedrich Bohn, et al. 2020. "Resilience Trinity: Safeguarding Ecosystem Functioning and Services across Three Different Time Horizons and Decision Contexts." *Oikos*, 445-56. <https://doi.org/10.1111/oik.07213>.
- Wilson, Gary. 2014. "Antarctic Science: A Case for Extending Diplomacy for Science." In *Science Diplomacy: New Day or False Dawn?*, edited by Lloyd S. Davis and Robert G. Patman, 69-85. Singapore: World Scientific Publishing. <https://doi.org/10.1142/8658>.
- Winecoff, William Kindred. 2020. "'The Persistent Myth of Lost Hegemony,' Revisited: Structural Power as a Complex Network Phenomenon." *European Journal of International Relations* 26 (S1): 209-52. <https://doi.org/10.1177/1354066120952876>.
- Xiao, Jing, Ron Boschma, and Martin Andersson. 2018. "Resilience in the European Union: The Effect of the 2008 Crisis on the Ability of Regions in Europe to Develop New Industrial Specializations." *Industrial and Corporate Change* 27 (1): 15-47. <https://doi.org/10.1093/icc/dtx023>.
- Yoshizawa, Hikaru. 2012. "The Relational and Structural Power of the EU in Competition

Policy: Addressing Asymmetry." GR:EEN – GEM Doctoral Working Paper Series No. 28.  
<https://cris.unu.edu/relational-and-structural-power-eu-competition-policy-addressing-asymmetry>.

Zandee, Dick, Adája Stoetman, and Bob Deen. 2021. "The EU's Strategic Compass for Security and Defence: Squaring Ambition with Reality." *Clingendael Report*. The Hague Clingendael – Netherlands Institute of International Relations.  
<https://www.clingendael.org/publication/eus-strategic-compass-security-and-defence>.

Zhang, David D., Qing Pei, Harry F. Lee, C. Y. Jim, Guodong Li, Mandy Zhang, Jinbao Li, et al. 2020. "Climate Change Fostered Cultural Dynamics of Human Resilience in Europe in the Past 2500 Years." *Science of the Total Environment* 744 (140842): 1–10.  
<https://doi.org/10.1016/j.scitotenv.2020.140842>.

Żukrowska, Katarzyna. 2016a. "Ideas in the ENP. Conflicting Visions and Interests of the ENP between the EU Member States and Institutions?" *Rocznik Instytutu Europy Środkowo – Wschodniej* 14 (6): 121–45.  
<https://ies.lublin.pl/en/rocznik/yearbook-14-2016/issue-6/ideas-in-the-enp-conflicting-visions-and-interests-of-the-enp-between-the-eu-member-states-and-institutions-en-translation/>.

———. 2016b. "Testing the CEES' Model of Transformation in the ENP Framework: Challenges and Opportunities: The Southern Dimension." *Rocznik Instytutu Europy Środkowo – Wschodniej* 14 (6): 27–47.  
<https://www.ceeol.com/search/article-detail?id=579532>.