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# Weapon of choice: a neoliberal institutional perspective on Italy's decision to procure a sixth generation fighter aircraft

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#### **ABSTRACT**

In 2018, Italy decided to join the British-led Team Tempest to develop a sixth generation fighter aircraft. This decision came at the expense of a rival project, the Future Combat Air System (FCAS), led by France and Germany. The Italian decision to join Tempest raises a theoretical question overlooked by the existing literature: when states have different cooperative procurement options, what makes them choose one rather than another? The aim of the article is to provide an analytically informed account of the process that led Italy to join Tempest. In doing so, we adopt a neo-institutionalist perspective, as it allows us to identify the actors and motivations that made this outcome possible. We argue that due to the peculiar Italian bureaucratic-institutional setting, no domestic actor was solely responsible for the final decision. The final decision to join Tempest was the result of a coalition between the Armed Forces and defence firms.

#### **KEYWORDS**

Tempest; FCAS; Italy; neo-institutionalism

# Introduction

In 2018, Italy was in a position to choose between two alternatives with regard to procuring its sixth-generation aircraft: the UK-led effort to develop Tempest and the Franco-German European Future Combat Air System (FCAS) (Analisi Difesa 2022; Matthews and Al-Saadi 2023). Both Tempest and FCAS involved entering into international partnerships. Both options remained on the table for several months. Only in September 2019, did the then Minister of Defence, Elisabetta Trenta, sign a memorandum of understanding with the UK committing Italy to working collaboratively on Tempest. This meant that the country would not take part in the development of FCAS. This choice had remarkable political implications: in fact, while Tempest and FCAS share similar features, they differ in terms of partner nations and manufacturers. Whilst taking part in Tempest would mean joining forces with the UK and Sweden, taking part in FCAS would have meant joining forces with France, Germany and Spain.

By focusing on Italy's decision to join Tempest instead of FCAS, we aim to account for an empirical puzzle. Italy's choice of Tempest meant that the country would participate in a UK-led consortium after Brexit. This is important because at the same time Italy was in favour of greater EU defence-industrial cooperation. Notably, this was reflected in Italy's backing, after Brexit, of EU defence initiatives such as the European Defence Fund (EDF) and PESCO (Cladi and Locatelli 2021; Marrone 2018). Italy did not abandon Europeanism (Croci 2008; Darnis 2003) by deciding not to participate in the procurement of the Franco-German led FCAS. We argue that Italy's choice of Tempest was the result of an alignment of interests between defence companies and military officers, whose combined leverage exceeded that of decision-makers. In a nutshell, Italy opted for continuity in terms of siding with the UK as a traditional defence partner, even after Brexit.

Attempts have been made to investigate the reasons why states do or do not enter partnerships with other states (for a comprehensive, albeit dated overview, see Thiem 2011). However, to the best of our knowledge, there have been no attempts to investigate the decision-making processes that lead states to choose to take part in one project instead of another. Due to the empirical relevance of this choice, the different costs and opportunities involved in the projects, and the complexity of the decision-making processes that eventually led Italy to join Team Tempest, it is worth investigating how and why things unfolded the way they did. The aim of this article is therefore to provide an analytically informed account of the process that led Italy to join Tempest. In doing so, our research design is an example of what Jack Levy (2008, 4) calls a theory-guided, ideographic case study. Simply put, we do not aim to generalize our findings beyond the Italian case, but we use theories to interpret the events under investigation. In other words, we develop what the late Joseph Lepgold (1998, 48) called Group II - Issue-oriented puzzles.

The article proceeds as follows. The next section lays out the research design, with a view to highlighting the rationale for case selection and the features that make Tempest and FCAS substitute goods. We then proceed with the empirical analysis, describing this policy dilemma from the perspective of policymakers, defence companies and the Armed Forces. We then account for this configuration through the theoretical lens of neoinstitutionalism and a theory-informed account of the Italian institutional weaponsprocurement setting. In the last section, we conclude our argument.

# Case study selection and analysis

When it comes to procurement policy, Italy has seldom been used before as a case study – the only exceptions being, to our knowledge, the works of Antonio Calcara (2019; Calcara 2020a, 2020b). This absence is quite peculiar, given Italy's standing in the defence market and involvement in cooperative projects. Since 2015, in fact, there has been a surge in defence spending in Italy, with most of the funding being allocated to the domestic defence industry: in particular, areas such as military electronics, weapons and naval shipbuilding have been recipients of state help (Janes 2021). Italy already has a very important and advanced defence-related industrial base. There are several firms operating in many areas such as defence electronics, space systems, fixed and rotary wing aircraft. They contribute directly and indirectly, to boosting the country's GDP and to fostering collaboration with other countries (Ministero della Difesa 2015). Therefore, it could be argued that Italy fits in between first-tier and second-tier military powers in Europe (Calcara and Simón 2021, 870). To corroborate this, Italy was in the top five in terms of European defence spending (IISS 2023).

In our analysis of the process that led Italy to join Team Tempest, we will try to draw a picture of the most relevant actors involved, with a view to outlining their interests and roles in the decision-making process. We are aware that this comes with some limitations. For instance, the Italian decision to join one project instead of another was taken less than five years ago, so relatively recently. Moreover, both FCAS and Tempest are under development and a lot of the information about them is classified. Still, we draw upon official documents, government papers, journalistic accounts and interviews with Italian policymakers and defence industry representatives, to provide the best possible account of the Italian decision to proceed with Tempest.

To begin with, for our test to be methodologically sound, we consider Tempest and FCAS as substitute goods (Balestrieri, Leao, and Izmalkov 2021). In other words, whilst there are differences between Tempest and FCAS, their timing and costs do not differ to the extent that one country could easily opt for one programme instead of another.

The information we have on the projects seems to confirm our working assumption: both Tempest and FCAS are aimed at developing next generation combat-air capabilities (Bronk 2021; Harper and Lee 2019). Back in 2014, France and the UK thought about developing a new combat aircraft capable of substituting the Eurofighter Typhoon and the Rafale, the fourth generation aircraft planned to be replaced by 2040 (Allison 2019; Dossi and Mashur 2021). However, as it was originally conceived, the FCAS lost momentum following the 2016 Brexit referendum, due to worries concerning possible UK retrenchment (Inagaki, Lewis, and Pfeifer 2022; Lokker 2021) but also as a result of project delays, changing requirements and, perhaps most importantly, issues concerning access to technology (Barrie and Giegerich 2019, 43). In 2017, President Emmanuel Macron decided to revitalize the programme and turned to Germany as his country's main partner (Bronk 2021; Hollinger 2017). Spain subsequently joined the project in June 2019 (Pfeifer and Buck 2019). In that way, the French, German and Spanish defence ministers announced a partnership between Dassault and Airbus, committing €4 billion to the development of FCAS (The Economist 2019). Whilst FCAS would be taken forward by participating states outside the framework of the EU through intergovernmental discussions and agreements, the EU identified the development of FCAS as an 'air superiority' priority (European Parliament 2021).

Likewise, Tempest is projected to substitute the fourth generation Eurofighter, currently in use, and to reach initial operational capability by 2035 (Episkopos 2021b). The programme was officially announced at the Farnborough Airshow in the UK in July 2018 (Allison 2018). The origins of Tempest are therefore fundamentally concurrent with those of FCAS. Speaking at the Farnborough Airshow, the then UK Defence Secretary, Gavin Williamson, said that the sixth-generation fighter jet was designed to maintain the UK's status as a 'tier one' military power after Brexit (Davies, 2018). Unsurprisingly, it has subsequently been called the 'jewel in the crown of Britain's £23bn (\$29bn) defence industry' (The Economist 2019). However, the UK could not develop Tempest unilaterally and did not hesitate to reach out to new partners. In fact, when the project was unveiled at the 2018 Farnborough Airshow, the Italian and British MoDs quickly signed a Statement of Intent signalling their

commitment to further cooperation in the security sector (Marrone and Nones 2019, 7). Eventually, on 21 December 2020, the UK signed a trilateral memorandum with Italy and Sweden for the development of Tempest (UK Parliament 2022). The memorandum comprised of leading defence companies from the three countries: UK's BAE Systems, Leonardo UK, Rolls-Royce and MBDA; Italy's Leonardo Italy, Elettronica, Avio Aero and MBDA, and Sweden's Saab and GKN Aerospace Sweden (Squires 2021).

FCAS and Tempest also have similarities in terms of operational capabilities: their design concept is based on a 'system of systems' principle, whose main components are the combat aircraft and swarming drones (HM Government 2021; Maulny 2019, 54–55). Nevertheless, they supposedly also feature high-tech solutions like a directed-energy weapons system, advanced Artificial Intelligence and an integrated sensors network. To date, Tempest is also projected to be available as an unmanned aerial vehicle (UAV) (Nicholls 2018; Sénat 2020). Admittedly, since both programmes are under development, most considerations on their specifications are merely speculative. The goals in terms of technological development are admittedly overly ambitious and it would not be surprising if the final products ended up featuring less disruptive assets. Nonetheless, both programmes are extremely expensive.<sup>3</sup>

Summing up, two separate European defence projects aimed at developing analogous sixth generation capabilities exist in Europe. Over the past few years, the projects have taken on a life of their own, increasing the chances of duplication (Machi 2021). Why would a European country decide to join one programme instead of another? In particular, why would Italy opt for the non-EU sponsored project, considering Italy's past efforts at promoting European defence integration initiatives? To attempt an answer to this question, we now turn to an account of the Italian decision to opt for Tempest instead of FCAS.

# The Italian choice of Tempest over FCAS

Until September 2019, Defence Minister, Elisabetta Trenta, believed that the FCAS option should not be ruled out. In her view, the political payoff of contributing to a project developed together with fellow EU member states had been dismissed too easily by the Armed Forces. For this reason, she held high-level meetings with her French and German counterparts during that summer. However, political and technological considerations eventually clashed: by September, she concluded that France and Germany were not willing to partner with Italy, so she quickly decided to adhere to Tempest (Elisabetta Trenta, interview with the authors, 12 December 2022). The reasons why negotiations failed is still a matter of speculation. It may have had to do with the cooperation model underlying FCAS. As one interviewee noted, both projects were based on the lead nation, or 'best athlete principle', which surely proved to be more effective in collaborative procurement as opposed to the fixed work-share/cost share. The problem with FCAS was that in the Franco-German tandem, Paris (and its companies) had already assumed they could be the lead nation, leaving Rome (again, and its companies) with a marginal role. London, in contrast, was more open to discussing the terms of its cooperation with Italy, so leaving more room for negotiation on the requirements and work share (anonymous interview 1, 24 February 2022). In the end,

therefore, Trenta concluded that waiting until the end of the summer would not prevent Italian industries from participating in the programme from the outset (Elisabetta Trenta, interview with the authors, 12 December 2022). In fact, she eventually signed a memorandum of understanding with the UK on Tempest, a few days before the end of her term of office.

Her successor, Lorenzo Guerini, followed in Trenta's footsteps. Guerini proceeded to ratify Italy's involvement in Tempest and he also included the sixth-generation aircraft among the few key assets Italy would need for the foreseeable future. Guerini explained the Italian decision to take part in Tempest as one that was very important from a technological point of view (Ministero della Difesa 2021b). The Ministry of Defence, in its programmes for 2021-2023 and 2022-2023 (Ministero della Difesa 2021a, 2022), asserted that participation in Tempest represented a commitment to technological and industrial development. To that end, it committed €2 billion to the programme in 2021, adding another €1.795 billion in 2022 (Ministero della Difesa 2021a, 57, 2022, 58). This level of expenditure suggests that Tempest will likely be the most expensive programme for the Italian armed forces in the long run (Di Feo, 2021).

However, FCAS will develop systems akin to Tempest, so - at least in the summer of 2019 - both programmes were comparable from a technological perspective. For policymakers in Rome, the main difference between the projects was mostly a matter of international alignments; opting for the UK-led project would mean working towards a non-EU sponsored initiative. In terms of security, choosing Tempest meant opting for a decisively Atlanticist stance to the possible detriment of the strengthening of a European pillar inside NATO (Ringsmose and Webber 2020). In other words, Italy seemed to weaken its commitment to European strategic autonomy, and eventually to compete with its Franco-German allies in terms of development of the next generation combat aircraft.

This point deserves to be explained in more detail. Indeed, over the past decade or so, Italy's disenchantment with the EU has been increasing for a variety of reasons, including the European debt crisis that began in 2008, changes in Italian public opinion and the entry into Parliament of parties with Eurosceptic views (Poli and Valentinier, 2014; Baldini and Giglioli 2020). The first Conte government, which led Italy from 2018 to early September 2019, just as the country took the decision to join Tempest, adopted negative attitudes to the Euro and a confrontational stance towards EU institutions (Di Quirico, 2021). Moreover, the Movimento Cinque Stelle (Five-star Movement, M5s) also embraced widespread popular scepticism towards military spending, as epitomized by the acrimonious debate on the F-35 fighter. Likewise, some kind of aversion to military issues was shared by the other major party in the governing coalition, Matteo Salvini's Lega (League), whose security concerns were focused mostly on the immigration issue (Stabile and Marrone and Nones 2019, 85-87). However, regardless of the anti-EU rhetoric advanced by the populist parties that made up the governing coalition, Prime Minister, Giuseppe Conte, ultimately sought to preserve and to prove Italy's credentials as a firm supporter of the deepening of European integration, especially in the realm of defence (Cladi and Locatelli 2021). So, when deciding what to do with the sixth generation aircraft, it is hard to find a well-defined governmental interest: only undersecretary Angelo Tofalo explicitly supported Tempest from the outset (Avionews 2018). Trenta and the Prime Minister were more cautious, while others were openly reluctant to invest in advanced weapons altogether.

Finally, FCAS epitomizes Franco-German cooperation and their leading role within the EU. The failure of FCAS would deal a huge blow to the Franco-German relationship and their ambition of spearheading a European defence union (Koenig and Wernert 2021; Pfeifer and White 2022). Put differently, there is an underlying political theme at the heart of FCAS, conceived as a European solution against non-European competitors. In a nutshell, FCAS is 'too big to fail' (Vogel 2021). For Italy, then, missing the opportunity to join FCAS involved the risk of political exclusion from the most important European defence project.

These considerations hold equally for Elisabetta Trenta and Lorenzo Guerini: both support EU defence integration, so it made perfect sense for them to lean towards FCAS. So, what made them opt for Tempest? As we will show below, the public governance system that Italy adheres to helps to explain how the decision was taken. In fact, it allowed the formation of a coalition between the Armed Forces and defence firms that was particularly influential and ultimately led policymakers to lean towards Tempest.

This leads to the question: why was Tempest a better fit for Italian defence firms? Why did the view of defence firms contrast with that of policymakers in Rome? Firstly, Leonardo, which is Italy's largest defence contractor, has established itself as a company in the UK too, so making technology transfer more straightforward (Camera dei deputati 2019). Pasquale di Bartolomeo, chief commercial officer of Leonardo, made this point during a hearing at the Italian parliament (Camera dei Deputati 2020). Secondly, for Leonardo, being part of Tempest means working with BAE Systems, which is, in turn, Europe's largest defence contractor and whose revenue totalled approx. \$23 billion in 2020. This means that BAE Systems' revenue is almost double the revenue of Airbus and six times that of Dassault (Defence News, 2021). Thirdly, taking part in Tempest would lead to a more favourable division of labour (Interview with defence industry representative, 8 November 2022). Fourthly, choosing Tempest instead of FCAS also made sense in light of Italy's experience of being a developer of the F-35 (Interview with defence industry representative, 8 November 2022). Italy, in fact, already had an established pattern of cooperation with the UK, which is a 'Level 1' partner in the F-35 programme (Episkopos 2021a). Finally, Italian involvement from a technological point of view is also noticeable. Thus, from summer 2018, Italian defence firms had a vested interest in joining the UK-led programme and were prepared to make the case assertively to policymakers.

As Rome's latest defence planning document shows, the investment in Tempest is very important not just from a military point of view, but because it allows the national industry to have access to technological know-how, making the most of industrial cooperation outside the EU (Ministero della Difesa 2022, 56). In this connection, our interviewees confirmed that the synergies between Italy and the UK were very important not just for their economic return, but also in technological and operational terms (anonymous interview 1, 24 February 2022); anonymous interview 2, 7 April 2022). This point was also made by Lt Col Davide Dentamaro of the Italian National Armaments Directorate's FCAS office, who explained that with FCAS national industries often battled one another into inefficiencies, whereas for Tempest there was complete synergy across industry and government partners (quoted in AntinozzI and Taylor 2022).

Likewise, as lamented by Trenta (Interview with the authors, 12 December 2022), the practice of joint training of Italian and British pilots has generated a bias among Italian officers in favour of the UK. Finally, as stated by Italian Air Force General Luca Goretti, Italy could play a more important role in Tempest compared to FCAS (Aviation Report 2021). For the Armed Forces, the choice of cooperation with the UK was therefore obvious in this respect.

Finally, one last consideration that brought together defence companies and the Armed Forces was their assessment of FCAS' limited chances of success. In fact, since its early phases, FCAS has been facing important limitations that impede progress: these relate, in particular, to lack of clarity concerning the division of labour, and the fact that French stakeholders tend to view FCAS as key to national security in a way that German stakeholders do not (Aboulafla 2022; Pannier and Schmitt 2019). In effect, the Armed Forces came to the conclusion that the FCAS was not a viable option, both because of France's dominant role in the joint venture, and because of the lack of a clear definition of the operational features of the project.

# A neo-institutionalist explanation

Having analysed how Italy concluded that Tempest was a better fit, we now turn to a theoretically based analysis of the reasons that led to that outcome. European states' choices in terms of collaborative defence procurement can be explained from a variety of perspectives (Neuman 2010, Neumann and Heikka 2005; Uttley and Wilkinson 2016). However, we believe that a neo-institutionalist perspective provides a better explanation than others because it allows us to unpack the nature of the decision-making process which, as we argue, played an important role in Italy's decision ultimately to proceed with Tempest instead of FCAS. We will therefore proceed to explain why a neo-institutionalist perspective is more promising compared to others such as the realist, social constructivist and liberal governmentalist perspectives.

When it comes to international cooperation, the realist perspective is arguably the most sceptical one (Jones 2007; Posen 2006; Rosato 2011). A recent realist attempt to explain European defence cooperation in the realm of procurement is the one developed by DeVore and Stai (2019), who argue that collaborative procurement is most likely among states that are united by shared alliance commitments. Alliances, in their view, are key for three reasons: 1) they mitigate the relative gains problem (see also Calcara 2018; Simón 2017), 2) they alleviate the risks of being dependent on other states; 3) they promote operational interoperability (see also Deni 2014; Pernin et al. 2019). For our purposes, however, this contribution is of little value for a variety of reasons. Firstly, it considers the state as a unitary actor, with little consideration for the domestic actors involved in the procurement process. Secondly, it would lead us to expect Italy to favour joining FCAS instead of Tempest, because of the country's traditionally favourable stance towards European defence integration projects and the strengthening of the European pillar within NATO. For these reasons, we need to turn to other approaches.

Social constructivism has been used in the past decade to account for collaborative procurement. As Checkel and Moravcsik (2001, 220) have argued, agents' behaviour in defence procurement is a result of preferences and identities that are in turn shaped by their interaction with one another. The causal process that makes it possible is socialization. People that work together tend to influence each other, so leading to convergence in their interests, identities, and role perceptions, irrespective of their institutional background. Ulrich Krotz (2011), for instance, has explained that the development of the French-German Tiger Helicopter was the result of previous cooperation in other domains. Following this argument, we might therefore expect the Italian decision over Tempest to have been guided by the fact that the country's civilian and military officers have more frequent and fruitful contacts with their British counterparts than with French and German officers. Apparently, then, this may be the ultimate reason why Tempest was favoured over FCAS. However, while it is true, as we have seen, that the Italian Air Force has established a practice of cooperation with the Royal Air Force (RAF), this fact alone is not sufficient to support the suggestion that the Armed Forces shaped the procurement process. Nor does it allow us to explain why the Europeanization of the political elite clearly embodied by then Minister of Defence, Elisabetta Trenta – did not play a major role in orienting the final decision towards FCAS.

We then turn to liberal intergovernmentalism. This perspective stresses the role of defence firms and their relationship to policymakers. As nicely captured by Jonathan Tucker (1991, 88-89), defence companies want to maximize their economic and technological turnover. This means that, as further elaborated by Andrew Moravcsik (1993, 132), in collaborative armaments projects 'firms seek to preserve two sorts of competitive assets: technological capabilities, which permit the production of sophisticated products and export market niches, which permit the amortization of costs over a large market'. So, according to Moravcsik, the economic interests of arms-producing firms remain decisive. He develops his argument using a two-level game model, with three main actors involved in the defence procurement process: chief executives, senior Ministry of Defence officials, and defence companies, whereby military actors are prone to international cooperation, firms are focused on interstate distributional issues, and the political leadership has merely an adjudicating role (Moravcsik 1993, 130-131). Since politicians are interested in domestic support, and defence companies are a powerful pressure group, Moravcsik concludes that as international negotiations proceed, and the terms of the agreement become clearer, government negotiators' bargaining power vis-à-vis armaments producers tends to fade. This explains why the French government ultimately abandoned the European Fighter Aircraft (EFA) project opting for their own fighter plane (the Rafale) and Germany withdrew from the Franco-German battle tank project.

The liberal inter-governmentalist approach has been further elaborated (see, among others, Fiott 2019; Moravcsik 1998) to argue that governments may actually increase their negotiating power vis-à-vis domestic stakeholders. So, it helps to explain why states seldom engage in collaborative procurement, even when the gains of cooperation seem obvious. However, as noted by Faure (2019a, 95), it 'overestimates the institutional distinction between the state and industry, by conceptualizing them as two strictly distinct entities'. So, in its evolution, liberal intergovernmentalism has come to focus almost exclusively on the competitive nature of state-industry relations, with a view to accounting for cooperative versus unilateral procurement projects.

These limits lead us to turn to our favoured strategy: approaching the issue from a neo-institutionalist perspective, Marc DeVore and Weiss (2014) have questioned Moravcsik's conclusion that defence companies have the upper hand vis-à-vis governments in the procurement process. With a focus on the production of fighter aircraft, they employ a varieties of capitalism approach to explain variations between French and British procurement policies. By focusing on the institutional setting underlying statefirm relations, DeVore and Weiss identify two polar political economy models - statist (the French case) and liberal (the UK). In the first case, 'strong informal elite networks result in firms and the government interpenetrating each another's decision-making processes' (DeVore and Weiss 2014, 506), with the end result of giving defence companies a substantial voice in the procurement process. In contrast, in a liberal market economy, the looser bond between policymakers and corporate actors insulates the government from the lobbying pressures of defence firms. In conclusion, statist states favour national projects, while liberal ones more likely opt for collaborative programmes.

In summary, this approach amends liberal intergovernmentalism, as it accounts for different policy outcomes in the presence of similarly powerful economic actors. It can do so because it focuses on the institutional setting in which the procurement process takes place. We believe that the varieties of capitalism approach offers a valid starting point in ascertaining the role that domestic actors play in the decision to enact the procurement policy. However, it also has its limits: in particular, it does not take into proper consideration the role of the Armed Forces, whose interests - as we have seen in the previous section - were clearly stated. In the next section, we will focus on the domestic configuration that characterizes Italy, in order to assess the relative leverage of the three major stakeholders and their actual impact on the procurement process.

# The Italian public governance system

To explain the decision-making process that led Italy to adopt Tempest, it is important to discuss the type of public governance system that Italy has. In fact, whether a state adopts one type or another has important repercussions for states' decisions to cooperate with others, and the ways in which they take decisions concerning defence procurement. Following Calcara's (2017, Calcara 2019, 2020b; Calcara and Marchetti 2022) terminology, in the industrial sector, we can make a distinction between private and public governance ecosystems. This terminology substantially overlaps with the statist/liberal dichotomy discussed above, since the UK qualifies as a private governance ecosystem, while France has a public governance ecosystem. To the best of our knowledge, however, only Calcara has used a neo-institutionalist perspective to study the Italian case, so we will stick to his categories.

Overall, the nature of the governance system impinges on the model of decisionmaking. Specifically, the impact of defence firms' interest is mediated by the institutional setting that underpins state-society relations. In the words of Calcara (2017, 530), 'different power configurations between governments and defence industries [...] produce different policies and incentives in defence-industrial policy-making'. Depending on the degree of influence that defence corporation elites have on procurement policies, it is therefore possible to identify two ideal-typical configurations: in public governance ecosystems, governments and industries have an informal relationship, so the decisionmaking process is collaborative and based on consensus; in contrast, in private governance ecosystems governments and industries rely on formal contracting.

Italy is among the countries with public governance systems. In such a system, the procurement agencies are highly centralized and enjoy a degree of autonomy from defence companies. Like France's Direction Générale de l'Armement, Italy's Segretario Generale della Difesa/Direzione Nazionale degli Armamenti (SGD/DNA) is in charge of R&D, procurement and cooperation with NATO and the EU (Calcara 2019, 76). Differences with its French counterpart amount to a more limited budget and a less centralized structure (see, for instance, Uiterwijk's, Soeters, and van Fenema 2013: 60] conclusions on the NH90 helicopter). All in all, however, the SGD/DNA's role in shaping the procurement process is clearly in line with a statist model (DeVore and Weiss 2014, 509). As for Law no. 25/1997, it is directly dependent on the Ministry of Defence and the Joint Chiefs of Staff, and it supervises the whole procurement process, from R&D to series production.

The second defining feature of a public governance system is that the government formally maintains control over defence firms. This is particularly the case of Fincantieri, Italy's second weapons producer (72% of its capital is owned by the governmentcontrolled CDP Equity SpA).<sup>5</sup> However, the same holds true for Leonardo: despite its higher level of internationalization, and the relatively limited public shareholdings (about 30%), no investor may legally hold more than 3% of the company's capital (Caruso and Locatelli 2013, 94). Most importantly, governmental control over these companies is granted by the prerogative to appoint their CEOs and board members (Calcara 2020b).

The third defining feature of a public governance system is a degree of interpenetration between the public and private establishments. Examples of the permeable quality of the borders between firms, Armed Forces and policymakers abound. Guido Crosetto, the current Minister of Defence, was previously chairman of AIAD (the Italian defence companies' interest group); Claudio Graziano, recently-appointed CEO of Fincantieri, was an Army General (incidentally, former chairman of the European Union Military Committee); Roberto Cingolani, former Minister for the environment in the Draghi government, has now been appointed as CEO of Leonardo by the current Meloni Government. Beyond this evidence, other studies (see, among others, Marrone and Ungaro 2014) confirm this feature of the Italian institutional setting. Moreover, in contrast with other European states, the Italian political setting is highly volatile: governing coalitions usually change between elections, meaning that cabinets are of limited duration: for this reason, elected officials tend to rely on more experienced military and civilian personnel within the Ministry of Defence (Marrone and Ungaro 2014, 18).

As a result, defence firms are able to 'capture' the state's decision-making processes to their own advantage. In Calcara's 2020a words: 'the fact that the state is able to control the activities of its defence firms translates, paradoxically, into a greater ability of corporate elites to influence Italian decision-making'. Put differently, their proximity to decisionmakers 'offers corporate elites greater chances to influence governments' preference' (Calcara 2019, 75). As a result, on the one hand, the fact that policymakers have a degree of control over 'national champions' can give them a degree of influence over defence procurement decisions; on the other hand, however, industrial actors and armed forces have bargaining space when they believe that policymakers' decisions have an impact upon companies' profits (Calcara 2019).

The final feature of a public governance system concerns the degree of protection that national defence companies enjoy compared to their peers in private governance

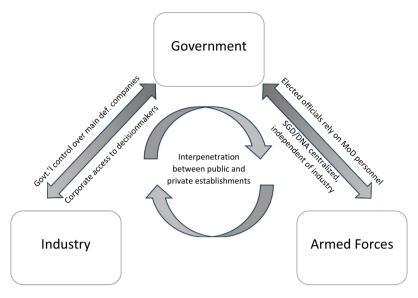


Figure 1. Public governance model in military procurement: actors and relationships.

systems. In fact, governments are concerned with the risks of supply-chain disruptions or the loss of technological advantages, so they protect their own industries via subsidies, offsets, or preferential treatment in their own procurement choices. Once again, Italy's policies fit this model: Rome's foreign and defence policy has been focused on investing in multilateral frameworks of cooperation with a view to protecting its political and industrial interests (Calcara 2019). Therefore, Italy counts as a 'state-influenced market economy' (Gualmini and Schmidt 2013, p. 346), where defence-industrial policymaking is aimed at making its 'national champions' (especially Leonardo) as competitive as possible in the international market (Calcara 2020b; Caruso and Locatelli 2013).

In the case of Italy, then, we can conclude that – due to substantial state control over Leonardo, national defence market structure, and autonomy of the national procurement agency from defence companies' influence (Calcara 2019) – the institutional setting qualifies as a public governance system. As a result, procurement decisions are significantly influenced by both military agencies and economic actors (see Figure 1). Yet, neither actor has alone the capacity to shape weapons procurement. So, contrary to the inter-governmental argument, defence companies are not sufficient to drive government choices towards one option or the other; likewise, neither can the Armed Forces oppose policymakers in the absence of external allies; finally, the government itself, as we have seen from the above, needs to take into account stakeholders like defence firms and/or military officers.

As a result, our argument is that different policy choices activate different domestic coalitions, whose members have self-interested goals. And the final decision will ultimately depend on which coalition leverages more bargaining power over the opposing side. The conclusion we can draw from this perspective is that Italy partnered up with the UK and chose Tempest because of an alignment of interests between the Armed Forces and defence firms. For the Armed Forces, it was the



favoured option due to the experience of operational cooperation with the RAF. For defence firms, it was an opportunity to consolidate an ongoing relationship between Leonardo and BAE systems and achieve a better work share within the consortium. This alignment eventually proved crucial to overcoming any pro-FCAS (i.e. pro-EU) preference.

### Conclusions

With the decision in September 2019 to participate in Team Tempest, Italy preferred to join the UK instead of its EU partners, Germany and France. This was a major development in collaborative defence procurement in Europe and it has not attracted much attention in the scholarly literature. So, in this article we have tried to fill this gap. We believe that the Italian decision to opt for Tempest instead of FCAS qualifies as an empirical puzzle and it offered a unique opportunity to conduct a single case-study analysis of collaborative procurement. To make sense of the reasons why Italy chose one cooperative configuration instead of another, we have developed an interpretative study and advanced a neo-institutional theoretical perspective.

In our analysis, we have described Italy as a public governance system, i.e. one where the weight of policymakers is constrained by other influential actors in the process, like the Armed Forces and defence firms. Consistently with a neo-institutional interpretation, these actors have similar, but not identical interests, forcing them to bargain over the final policy outcome. In the case of the sixth generation aircraft, due to their operational capabilities, cost and time of development, Tempest and FCAS can be considered as substitute goods: for this reason, entering one consortium was better than being left out for all domestic actors. However, while the British-led project was the first choice for the military and industrial establishment, this was not necessarily the case for policymakers. As we have tried to show in this article, industrial and military considerations in favour of Tempest were brought to bear over the political rationale in favour of FCAS. In short, defence companies and military officers aligned in order to leverage more bargaining power over decision makers.

In conclusion, this work has both theoretical and empirical relevance. Theoretically, it sheds light on an issue that has not received attention in the literature: when faced with multiple collaborative options, what actors and drivers are involved in procurement policy? As our analysis shows, multiple and sometimes diverging interests come to compete in this process. What made Tempest more appealing than FCAS was the alignment of interests between defence firms and the Armed Forces. As a result, economic and operational concerns trumped political considerations. In terms of empirical relevance, our work shows the limits of the EU initiatives aimed at fostering defence integration (see also Duke 2019): despite the fact that the EU has embarked upon an ambitious agenda aimed at fostering defence integration among its member states, the impacts on joint procurement have been – and are likely to remain – limited. The EU has tried to make use of economic incentives and its legal framework to promote cooperation. However, while these means may have an influence on policymakers, they have little impact on the interests of defence firms and the military. As a result, they should pay more attention to the military and economic dynamics at play in individual countries.



#### **Notes**

- 1. An earlier version of this article was presented to the British International Studies Association (BISA) conference in Newcastle upon Tyne, UK, on 17 June 2022. We wish to thank Antonio Calcara for his comments and suggestions. We are very grateful to the interviewees for contributing their time and expertise to the research project. Ethics approval of the interviews was obtained from the corresponding author's institution on 14 October 2022. A copy of the letter is available upon request. We would also like to thank Contemporary Italian Politics' anonymous reviewers for their helpful comments. We also extend our gratitude to Emma Cladi for her editorial assistance. The usual disclaimer
- 2. The UK-led BAE Systems Tempest merged with the Japanese Mitsubishi F-X in December 2022. Now called Global Combat Air Programme (GCAP), it involves a collaborative effort by the UK, Italy and Japan. At the time of writing, Sweden's presence as an additional partner in the GCAP is seen as unlikely (White 2023). This article will refer to Tempest because it seeks to develop an explanation of the events that led Italy to opt for the UK-led project in 2019, following its unveiling in 2018.
- 3. The FCAS project has an estimated cost of up to €80 billion (Sénat 2020)). The estimated cost of Tempest is still unknown, but the R&D phase alone is expected to cost about €25 billion.
- 4. So far, Leonardo's contribution to Team Tempest has been focused on integrated sensors and communications. In contrast, work shares are still a matter of contention between Dassault and Airbus. In 2021, negotiations stalled due to differences concerning the division of labour and intellectual property rights. The French wanted to assign the lead for developing the aircraft to Dassault based on the previously agreed 'best athlete' principle. The German side, represented by Airbus, feared that Dassault's tight grip on intellectual property rights would exclude it from the most costly and innovative elements of the project (Koenig and Wernert 2021).
- 5. https://www.fincantieri.com/it/investor-relations/investire-in-fincantieri/azionisti/. Last accessed: 2 May 2023.

#### Disclosure statement

No potential conflict of interest was reported by the author(s).

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## References

- Aboulafla, R. 2022. Why a Franco-German Fighter Jet is a Bad Idea. Foreign Policy, 15 February, https://foreignpolicy.com/2022/02/15/france-germany-fighter-jet-aviation-industry-europemiddle-east-sales/.
- Allison, G. 2018. "Boeing Would Be 'Thrilled' to Take Part in British Tempest Fighter Project." UK Defence Journal, July 20. https://ukdefencejournal.org.uk/boeing-would-be-thrilled-to-takepart-in-british-tempest-fighter-project/.
- Allison, G. 2019. "Airbus Hoping to Combine British Tempest Jet Project with Franco-German Effort." UK Defence Journal, November 26. https://ukdefencejournal.org.uk/airbus-hoping-tocombine-british-tempest-jet-project-with-franco-german-effort/.
- Analisi Difesa. (2022). Roma ha firmato l'accordo per lo sviluppo del Tempest con Londra e Stoccoloma. 4 gennaio. https://www.analisidifesa.it/2021/01/roma-ha-firmato-laccordo-peril-tempest-con-londra-e-stoccolma/.
- Antinozz, I., and T. Taylor. (2022). Italy in Tempest: an equal or equitable partner? 3 October. https://rusi.org/explore-our-research/publications/commentary/italy-tempest-equal-orequitable-partner.
- Aviation Report. (2021). Velivolo di sesta generazione Tempest: secondo il Gen. Goretti programma fondamentale e strategico per l'aeronautica militare ma che si potrà fondere con il FCAS europeo. 26 November. https://www.aviation-report.com/velivolo-di-sesta-generazionetempest-secondo-gen-goretti-programma-fondamentale-strategico-per-aeronautica-militarema-che-si-potra-fondere-con-fcas-europeo/.
- Avionews 2018 Tofalo: "Italia deve avere un ruolo di primo piano nel Tempest", https://www. avionews.it/it/item/1214661-avionews-a-cybertech-2-tofalo-italia-deve-avere-un-ruolo-diprimo-piano-nel-tempest.html.
- Baldini, G., and M. Giglioli. 2020. "Italy 2018: The Perfect Populist Storm?" Parliamentary Affairs 73 (2): 363–384. https://doi.org/10.1093/pa/gsy052.
- Balestrieri, F., J. Leao, and S. Izmalkov. 2021. "The Market for Surprises: Selling Substitute Goods Through Lotteries." Journal of the European Economic Association 19 (1): 509-535. https://doi. org/10.1093/jeea/jvaa021.
- Barrie, D., and B. Giegerich. 2019. "The United Kingdom." In Europe and the Future Combat Air System, Documenti IAI 19/02, edited by A. Marrone and M. Nones, 41-52. Rome: IAI.
- Bronk, J. 2021. FCAS: Is the Franco-German-Spanish Combat Air Programme Really in Trouble? Rusi Commentary. https://rusi.org/explore-our-research/publications/commentary/fcas-franco -german-spanish-combat-air-programme-really-trouble.
- Calcara, A. 2017. "State-Defence Industry Relations in the European Context: French and UK Interactions with the European Defence Agency." European Security 26 (4): 527-551. https:// doi.org/10.1080/09662839.2017.1384379.
- Calcara, A. 2018. "Cooperation and Conflict in the European Defence-Industrial Field: The Role of Relative Gains." Defence Studies 18 (4): 474-497. https://doi.org/10.1080/14702436.2018. 1487766.
- Calcara, A. 2019. "Differentiated Integration in the European Defence Field." European Review of *International Studies* 6 (2): 71–91.
- Calcara, A. 2020a. "Cooperation and Non Cooperation in European Defence Procurement." Journal of European Integration 42 (6): 799-915. https://doi.org/10.1080/07036337.2019. 1682567.
- Calcara, A. 2020b. European Defence Decision-Making Dilemmas of Collaborative Arms Procurement. London: Routledge.



- Calcara, A., and R. Marchetti. 2022. "State Industry Relations and Cybersecurity Governance in Europe." Review of International Political Economy 29 (4): 1237-1262. https://doi.org/10.1080/ 09692290.2021.1913438.
- Calcara, A., and L. Simón. 2021. "Market Size and the Political Economy of European Defense." Security Studies 30 (5): 860-892. https://doi.org/10.1080/09636412.2021.2023625.
- Camera dei deputati. 2019. 'Resoconto stenografico seduta n.4 di mercoledi 8 maggio 2019', https://www.camera.it/leg18/1079?idLegislatura=18&tipologia=indag&sottotipologia=c04 dife sa&anno=2019&mese=05&giorno=08&idCommissione=04&numero=0004&view=filtered& file=indice\_stenografico.
- Camera dei deputati. 2020. 'Resoconto stenografico seduta n.7 di mercoledi 18 novembre 2020', https://www.camera.it/leg18/1079?idLegislatura=18&tipologia=indag&sottotipologia=c04 dife sa&anno=2020&mese=11&giorno=18&idCommissione=04&numero=0007&view=filtered& file=indice stenografico.
- Caruso, R., and A. Locatelli. 2013. "Company Survey Series II: Finmeccanica Amid International Market and State Control: A Survey of Italian Defence Industry." Defence and Peace Economics 24 (1): 89–104. https://doi.org/10.1080/10242694.2011.635952.
- Checkel, J. T., and A. Moravcsik. 2001. "A Constructivist Research Program in EU Studies?" European Union Politics 2 (2): 219–249. https://doi.org/10.1177/1465116501002002004.
- Cladi, L., and A. Locatelli. 2021. "Explaining Italian Foreign Policy Adjustment After Brexit: A Neoclassical Realist Account." Journal of European Integration 43 (4): 459-473. https://doi. org/10.1080/07036337.2020.1800676.
- Croci, O. 2008. "Not a Zero-Sum Game: Atlanticism and Europeanism in Italian Foreign Policy." The International Spectator 43 (4): 137–155. https://doi.org/10.1080/03932720802486498.
- Darnis, J. P. 2003. "Atlanticism and Europeanism in Italy and France: A Critical Comparison." The International Spectator 38 (2): 105-117. https://doi.org/10.1080/03932720308457028.
- Davies, R. 2018. "UK Unveils New Tempest Fighter Jet to Replace Typhoon." The Guardian, July 16. Deni, J. 2014. "Maintaining Transatlantic Strategic, Operational and Tactical Interoperability in an Era of Austerity." International Affairs 90 (3): 583-600. https://doi.org/10.1111/1468-2346.
- DeVore, M., and N. Stai. 2019. "When Collaboration Works: High Politics and Realism's Renaissance in Arms Collaboration Studies." European Review of International Studies 6 (2): 18-42.
- DeVore, M., and M. Weiss. 2014. "Who's in the Cockpit? The Political Economy of Collaborative Aircraft Decisions." Review of International Political Economy 21 (2): 497–533. https://doi.org/ 10.1080/09692290.2013.787947.
- Di Feo, G. 2021. "Tempest, l'Italia stanzia due miliardi per il nuovo supercaccia." la Repubblica, August 5.
- Dossi, A., and N. Mashur. 2021. European Fighter Programs: A Preliminary Assessment, CSS Analyses in Security Policy 291, October, https://www.research-collection.ethz.ch/bitstream/ handle/20.500.11850/506452/CSSAnalyse291-EN.pdf?sequence=2&isAllowed=y.
- Duke, S. 2019. "The Competing Logics of EU Security and Defence." Survival 61 (2): 123-142. https://doi.org/10.1080/00396338.2019.1589092.
- The Economist. 2019. Britain's Tempest Warplane Heads for a Dogfight with an EU Rival. September 21.
- Episkopos, M. 2021a. 'Great Britain Bought the F-35s, but is Still Developing the Tempest fighter', The National Interest, 16 November, https://nationalinterest.org/blog/reboot/great-britainbought-f-35s-still-developing-tempest-fighter-196334.
- Episkopos, M. 2021b. 'Yes, There Will Be Two European Sixth-Generation Stealth fighters', The National Interest, Blog, 25 February, https://nationalinterest.org/blog/buzz/yes-there-will-betwo-european-sixth-generation-stealth-fighters-178827.
- European Parliament. 2021. 'Parliamentary questions', 28 June, https://www.europarl.europa.eu/ doceo/document/E-9-2021-001883-ASW\_EN.html.
- Faure, S. 2019. "The Choice for a Minilateral Europe." European Review of International Studies 6 (2): 92-114.



Fiott, D. 2019. Defence Industrial Cooperation in the European Union. The State, the Firm and Europe. London: Routledge.

Gualmini, E. and V. Schmidt 2013. "State transformation in Italy and France: Technocratic versus political leadership on the road from non-liberalism to neo-liberalism." In Resilient Liberalism in Europe's Political Economy, edited by V. Schmidt and M. Thatcher, 346-373. Cambridge: Cambridge University Press. https://doi.org/10.1017/CBO9781139857086.016.

Harper, J., and C. Lee. 2019. "Owning the skies." National Defense 104 (790): 44-49.

HM Government. (2021) 'Corporate Report: The Science Inside', 2 December, https://www.gov. uk/government/publications/dstl-the-science-inside/the-science-inside.

Hollinger, P. 2017. "Franco-German Fighter Jet Plans Threaten to Leave the UK Grounded." The Financial Times, July 23.

IISS. 2023. The Military Balance, 50-149. 'Chapter Four: Europe'.

Inagaki, K., L. Lewis, and S. Pfeifer. 2022. "The Fighter Jet That Could Create a New Alliance Between the UK and Japan." The Financial Times, November 27.

Janes. 2021. 'Italy's New Multiyear Planning Document Boosts Defence spending', 9 August, https://www.janes.com/defence-news/news-detail/italys-new-multiyear-planning-documentboosts-defence-spending.

Jones, S. 2007. The Rise of European Security Cooperation. Cambridge: University Press.

Koenig, N., and Y. Wernert. 2021. Can France and Germany Relaunch Europe's Security Agenda?. Hertie School: Jacques Delors Centre. https://opus4.kobv.de/opus4-hsog/frontdoor/deliver/ index/docId/3827/file/2010412\_Wernert\_Koenig\_EU\_Security.pdf.

Krotz, U. 2011. Flying Tiger International Relations Theory, and the Politics of Advanced Weapons Production. Oxford: Oxford University Press.

Lepgold, J. 1998. "Is Anyone Listening? International Relations Theory and the Problem of Policy Relevance." Political Science Quarterly 113 (1): 43-62. https://doi.org/10.2307/2657650.

Levy, J. 2008. "Case Studies: Types, Designs, and Logics of Inference." Conflict Management and Peace Science 25 (1): 1-18. https://doi.org/10.1080/07388940701860318.

Lokker, N. 2021. 'The Future Combat Air System and the Eu's Strategic Autonomy Malaise', https://cepa.org/the-future-combat-air-system-and-the-eus-strategic-autonomy-malaise/.

Machi, V. 2021. Will the FCAS and Tempest Jet Programmes Merge? Germany's Top Air Force Officer Hopes so, Defense News, 12 July, https://www.defensenews.com/industry/techwatch/2021/07/12/ will-the-fcas-and-tempest-jet-programs-merge-germanys-top-air-force-officer-hopes-so/.

Marrone, A. 2018. 'PeSco. The Italian Perspective', Ares Policy Paper, No. (30), September 20, http://www.iris-france.org/wp-content/uploads/2018/09/Ares-30.pdf.

Marrone, A., and M. Nones. 2019. eds. Europe and the Future Combat Air System, Documenti IAI 19|02. Rome: IAI.

Marrone, A., and A. Ungaro. 2014. "Relations Between the United States of America and Italy in the Post-Cold War Period: A Defense-Industrial Perspective." Cahiers de la Méditerranée 88 (88): 157–181. https://doi.org/10.4000/cdlm.7542.

Matthews, R., and R. Al-Saadi. 2023. "Organizational Complexity of the Eurofighter Typhoon Collaborative Supply Chain." Defence and Peace Economics 34 (2): 228–243. https://doi.org/10. 1080/10242694.2021.1987022.

Maulny, J. P. 2019. "France." In Europe and the Future Combat Air System, Documenti IAI 19/02, edited by A. Marrone and M. Nones, 54-65. Rome: IAI.

Ministero della Difesa. 2015. 'Libro bianco per la sicurezza internazionale e la difesa', https://www. difesa.it/Primo\_Piano/Documents/2015/04\_Aprile/LB\_2015.pdf.

Ministero della Difesa. 2021a. 'Documento programmatico pluriennale della difesa per il triennio 2021-2023', https://www.difesa.it/Content/Documents/20210804%20DPP%202021-2023%20-ult.pdf.

Ministero della Difesa. 2021b. 'Il ministro Guerini a Londra ha incontrato il Segretario di Stato alla difesa del Regno Unito Ben Wallace', https://www.difesa.it/Primo\_Piano/Pagine/Il-Ministro-Guerini-a-Londra-ha-%20incontrato-il-Segretario-di-Stato-alla-Difesa-Wallace.aspx.

Ministero della Difesa. 2022. 'Documento programmatico pluriennale della difesa per il triennio 2022-2024', https://www.difesa.it/Il\_Ministro/Documents/DPP\_2022\_2024.pdf.



- Moravcsik, A. 1993. "Armaments Among Allies: European Weapons Collaboration, 1975-1985." In Double-Edged Diplomacy: International Bargaining and Domestic Politics, edited by P. Evans, H. Jacobson, and R. Putnam, 128-167. Berkeley: University of California Press.
- Moravcsik, A. 1998. The Choice for Europe: Social Purpose and State Power from Messina to Maastricht. Ithaca NY: Cornell University Press.
- Neuman, S. 2010. "Power, Influence, and Hierarchy: Defense Industries in a Unipolar World." Defence and Peace Economics 21 (1): 105-134. https://doi.org/10.1080/10242690903105398.
- Neumann, I. B., and H. Heikka. 2005. "Grand Strategy, Strategic Culture, Practice: The Social Roots of Nordic Defence." Cooperation and Conflict 40 (1): 5-23. https://doi.org/10.1177/ 0010836705049731.
- Nicholls, D. 2018. "Unmanned Tempest jet unveiled as Britain's model for future warfare." The Daily Telegraph, July 16.
- Pannier, A., and O. Schmitt. 2019. "To Fight Another Day: France Between the Fight Against Terrorism and Future Warfare." International Affairs 95 (4): 897-916. https://doi.org/10.1093/ia/iiz050.
- Pernin, C. G., Hlavka, J. P., Boyer, M. E., Gordon IV, J., Lerario, M., Osburg, J., Shurkin, M., and Gibson, D. C. 2019. Targeted interoperability: a new imperative for multinational operations. https:// www.rand.org/content/dam/rand/pubs/research\_reports/RR2000/RR2075/RAND\_RR2075.pdf.
- Pfeifer, S., and T. Buck. 2019. 'Spain Joins Franco-German Alliance to Develop Fighter Jet', Financial Times, 17 June.
- Pfeifer, S., and S. White. 2022. "Divisions Risk Undermining Windfall for Europe's Defence Industry." The Financial Times, March 30.
- Posen, B. 2006. "European Union Security and Defense Policy: Response to Unipolarity?" Security Studies 15 (2): 149–186. https://doi.org/10.1080/09636410600829356.
- Ringsmose, J., and M. Webber. 2020. "Hedging Their Bets? The Case for a European Pillar in NATO." Defence Studies 20 (4): 295-317. https://doi.org/10.1080/14702436.2020.1823835.
- Rosato, S. 2011. Europe United: Power Politics and the Making of the European Community. Ithaca NY: Cornell University Press.
- Sénat. 2020. 'Information Report Drawn Up on Behalf of the Foreign Affairs, Defence and Armed Forces Committee (1) on the Future Combat Air System (FCAS)', https://www.senat.fr/rap/r19-642-2/r19-642-21.pdf.
- Simón, L. 2017. "Neorealism, Security Cooperation, and Europe's Relative Gains Dilemma." Security Studies 26 (2): 185–212. https://doi.org/10.1080/09636412.2017.1280297.
- Squires, M. 2021. 'Tempest: Innovation for UK Security and prosperity', https://www.baesystems. com/en/the-future-of-combat-air.
- Thiem, A. 2011. "Conditions of Intergovernmental Armaments Cooperation in Western Europe, 1996-2006." European Political Science Review 3 (1): 1-33. https://doi.org/10.1017/ S1755773910000251.
- Tucker, J. B. 1991. "Partners and Rivals: A Model of International Collaboration in Advanced Technology." International Organization 45 (1): 83-120. https://doi.org/10.1017/ S0020818300001405.
- Uiterwijk, D., J. Soeters, and P. van Fenema. 2013. "Aligning National "Logics" in a European Military Helicopter Program." Defense & Security Analysis 29 (1): 54-67. https://doi.org/10. 1080/14751798.2013.760248.
- UK Parliament. 2022. 'Combat air strategy update statement made on 19 July 2022', https:// questions-statements.parliament.uk/written-statements/detail/2022-07-19/hcws228.
- Uttley, M. R., and B. Wilkinson. 2016. "A Spin of the Wheel? Defence Procurement and Defence Industries in the Brexit Debates." International Affairs 92 (3): 569-586. https://doi.org/10.1111/
- Vogel, D. 2021. "Future combat air system: too big to fail." SWP Comment (2). https://www.swpberlin.org/publications/products/comments/2021C02\_FutureCombatAirSystem.pdf.
- White, A. 2023. 'Sweden joining UK-Japan-Italy fighter effort seen as unlikely by industry partners', Breaking Defense, https://breakingdefense.com/2023/03/sweden-joining-uk-japanitaly-fighter-effort-seen-as-unlikely-by-industry-partners/.