



IRSEM

INSTITUT DE RECHERCHE STRATÉGIQUE
DE L'ÉCOLE MILITAIRE

January 25, 2021

RESEARCH PAPER – No. 111

COVID-19 AS AN OPPORTUNITY FOR EUROPEAN ARMAMENT COOPERATION?

Dr Lucie BÉRAUD-SUDREAU

*Director, Arms and Military Expenditure Programme
Stockholm International Peace Research Institute (SIPRI)*

ABSTRACT

The Covid-19 health and related economic crises did not leave any sector of the economy unharmed. Although it may not be the first in line, the defence industry has also been impacted. This paper explores the various impacts of the Covid-19 on the defence industry in Europe, both on the short and long-term dimensions. After exploring the immediate and longer-term impacts of the crisis for the defence industry, the paper concludes by discussing whether the crisis could be an opportunity for further European armament cooperation. This IRSEM publication is based on Dr Béraud-Sudreau's personal research and does not relate to the SIPRI databases or annual data launches.

CONTENT

Introduction	2
Facts and figures: An apparent limited impact for defence firms	2
Short-term consequences: delays and supply chain concerns	5
Longer-term consequences: A shrinking pie for the defence industry	8
Conclusion: The Covid-19 crisis as opportunity for European armament cooperation?	10

INTRODUCTION

The Covid-19 health and related economic crises did not leave any sector of the economy unharmed. Although it may not be the first in line, the defence industry has also been impacted. This paper explores the various impacts of the Covid-19 on the defence industry in Europe, both on the short and long-term dimensions. For this purpose, the paper relies on two key categories sources. First two datasets specially built for this analysis: half-year 2020 results of the largest European defence companies, and projections for European Union member states' 2021 defence budgets.¹ Second, the paper also relies on interviews with industry representatives, from different countries (France, the UK, Sweden and Brussels) and sectors (aerospace; naval and missiles). These conversations can be put in the context of some initial data results on the consequences of the Covid-19 health and economic crises. After exploring the immediate and longer-term impacts of the crisis for the defence industry, the paper concludes by discussing whether the crisis could be an opportunity for further European armament cooperation.

FACTS AND FIGURES: AN APPARENT LIMITED IMPACT FOR DEFENCE FIRMS

Impact on the defence industry's revenue (half year results 2020)

The total sales of some of the largest European defence companies show those with a higher proportion of civilian revenue compared to military-derived revenue have been more impacted than companies who are more reliant on military products only (Figure 1).

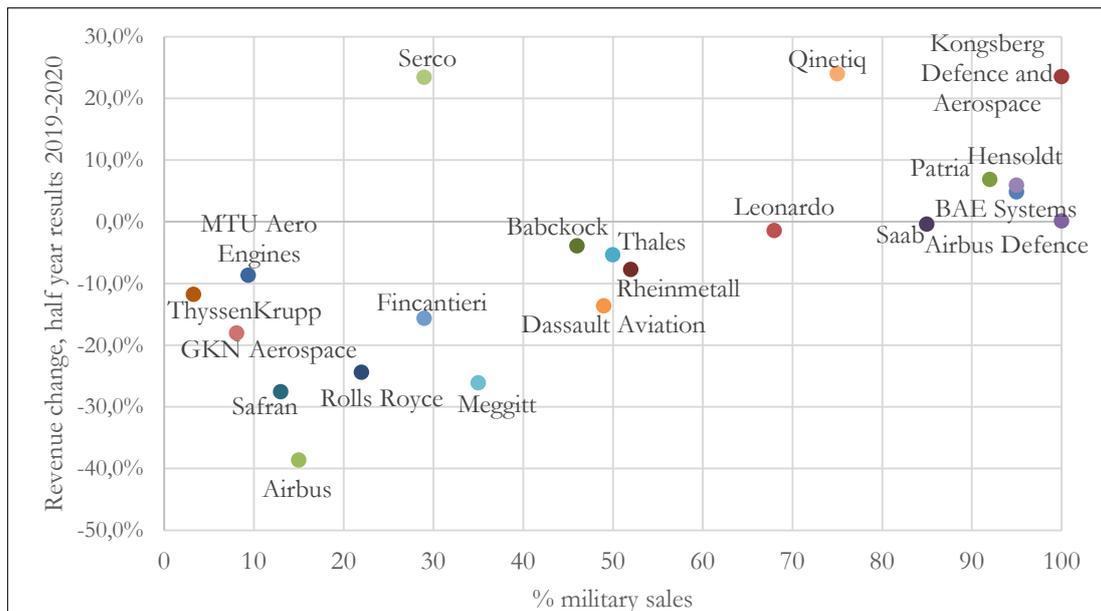
A good example is Airbus, who overall lost -38.6% of revenue in the first six months of 2020 compared to the same period in 2019. The Airbus Defence division however had positive result of +0.2%. Other companies who in part depend on the aerospace civilian sector had similar difficulties: -8.7% for MTU Aero Engines; -27.6% for Safran and -24.4% for Rolls-Royce.

On the contrary firms who are almost entirely dependent on the defence market had either positive or not so negative results: BAE Systems saw a growth of 4.8% of its revenue in its half year results of 2020; Patria +6.9% Hensoldt +9.5%.

1. *Disclaimer:* The data presented here is a first attempt at collecting 2021 defence budgets plans and defence companies revenue figures. The figures presented here are not tied to the SIPRI military expenditure database, arms industry database or any of SIPRI's annual data releases.

Figure 1

Half-year results 2020 of the largest arms-companies in Europe, compared to their proportion of military-derived revenue²



Data is based on company half-year reports; it should not be compared to the SIPRI arms industry database.

These numbers thus show that the defence sector has been less impacted than other industrial sectors, notably in commercial aerospace.

European defence budget plans for 2021

A number of European Union member states have published budgetary plans to pursue defence spending increases in 2021 (Figure 2).³ This allows us to look further ahead into the potential ramifications of the Covid-19 crisis for the defence industry in Europe.

The most spectacular planned increase comes from Finland, with an expected +54% increase (in current terms) between 2020 and 2021. This is due to planned procurement of combat aircraft.⁴ Slovenia and Czechia are also planning to increase their defence budgets in 2021, by 23.7% and 13% respectively, trying to move further to NATO's 2% of GDP goal.

Larger countries are also projecting increases in their defence budgets in 2021, with France looking to increase its budget by 4% and Germany by 3% next year.

2. Sources: Companies half-year results 2020. Thyssen Krupp: 9 months report Oct.-June. No data available for Naval Group; MBDA; CEA; KMW; Cobham; PGZ; Nexter; Navantia; Dhiel; CMI Groupe; Arquus; Lürssen; Damen Shipyards; Pilatus Aircraft and Nammo. The proportion of military sales is based on data from the SIPRI Top 100 Database (2018 figures, https://www.sipri.org/sites/default/files/2019-12/1912_fs_top_100_2018.pdf).

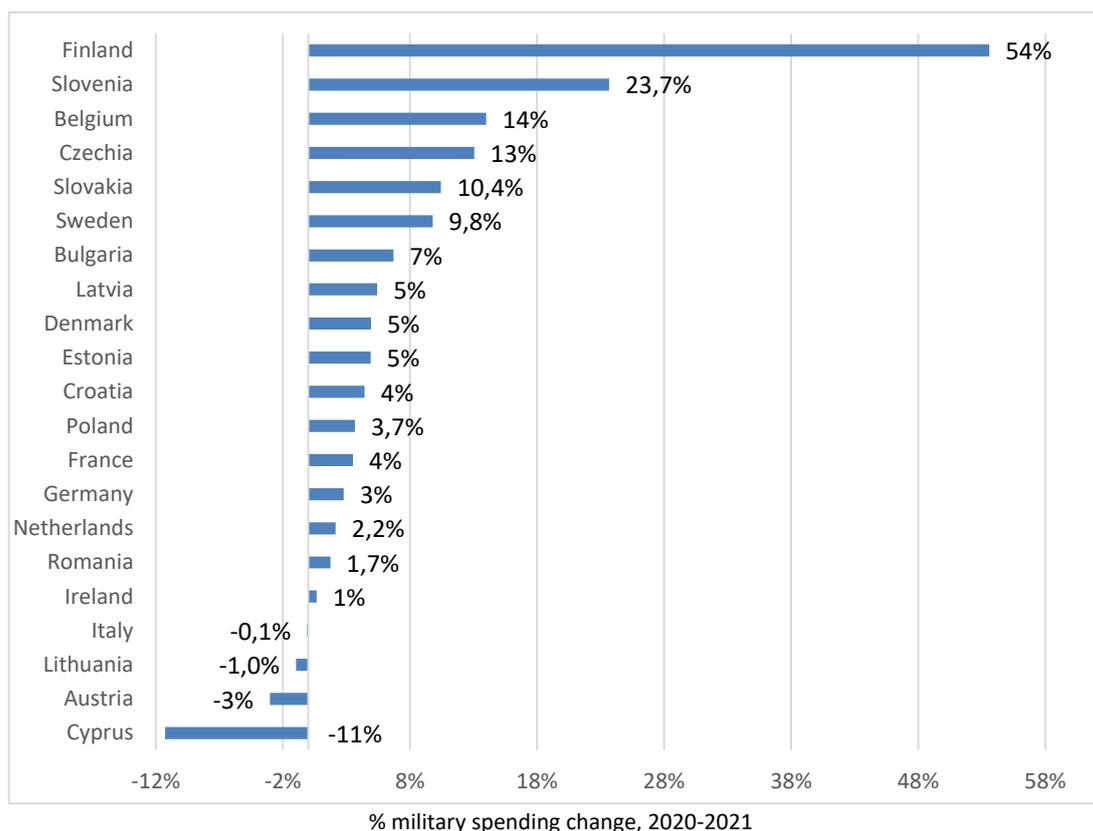
3. These numbers are based on a preliminary, raw, analysis of the military spending plans published by EDA member states for 2021 military spending.

4. Finnish Government, 'Fighter procurement will increase defence budget', 13 August 2020, <https://valtioneuvosto.fi/-/fighter-procurement-will-increase-defence-budget>.

The United Kingdom, no longer a member of the European Union, but nonetheless an important player in the European defence sector: +£16 billion have been announced for the next four years or, in other words, £7bn more than previous plans, according to the Institute of Fiscal Studies.⁵

What these plans tell us – to the extent that they are implemented as announced- is that European states plan to pursue investments in the sector in the coming year, which should again limit the impact of the pandemic’s aftermath on the defence industry in Europe.

Figure 2
Planned defence budget growth in Europe, 2020-2021⁶



Data is based on preliminary analysis of country budget documents; it should not be compared to the SIPRI military expenditure database.

These two sets of data, companies’ half-year results for 2020 on the one hand, and states’ preliminary spending plans for 2021 on the other, give us some indications of the *short-term impact* of the Covid-19 crisis on the European defence industry. It is limited, to some extent. Although there is more that lies beneath the surface, as shown when turning to *mid- and long-term impacts*.

5. D. Sabbagh and P. Butler, ‘[Boris Johnson agrees £16bn rise in defence spending](#)’, *The Guardian*, 18 November 2020; J. Beale, ‘[Defence funding boost ‘extends British influence](#)’, says PM’, *BBC*, 19 November 2020.

6. Sources: Available budget plans from national parliaments or ministries of finance. Data is provisional since most spending plans needed to be voted at the time of writing (end Nov. 2020).

SHORT-TERM CONSEQUENCES: DELAYS AND SUPPLY CHAIN CONCERNS

Direct practical consequences

Some of the immediate consequences of the health situation on the defence industry included, like for other sectors, an adaptation to health protection requirements. Working from home practices were put in place for support functions; which sometimes had temporary repercussions on the use of server connections.⁷ This was all the more problematic for the defence industry sector where secure servers have to be used.

There were also temporary impacts on production, with some sites initially closed, and then reopening with health protocols in place.⁸ For instance, by the fifth week of lockdown, MBDA France was manufacturing only one type of product; and Nexter announced that it could not be able to deliver all of the vehicles scheduled for delivery in 2020.⁹ French defence SMEs' productivity was under their normal level still in June 2020.¹⁰ Other impacts included the fact tests of products in countries under lockdown could not take place, which in turn led to delays in planning.¹¹ These will disrupt planning for the coming months and possibly years, given the long timeframes under which the sector operates.

Exports promotion or export related activities were particularly impacted with the difficulties for travel. Arms exhibitions have been cancelled or held virtually, meetings with customers have been put on hold.¹² Quarantine measures still apply in many countries, which complicates maintenance and services.¹³ There have also been delays in deliveries, although these were usually well understood by customers who were in similar situations.¹⁴

Variations in country reactions

These challenges were dealt with differently on a country-by-country level. Some states took more decisive measures to support their defence industry, whereas others, who have a more market-oriented approach to their defence sector, did not take similar steps.¹⁵ This is particularly true for Nordic countries, to which one can add the Netherlands. Companies in these states are concerned that, where the defence industry receives direct funding from their governments, they will get a competitive advantage over companies in other

7. Interview, Missile defence sector representative, Paris, 10 November 2020.

8. Interview, Missile defence sector representative, Paris, 10 November 2020.

9. Assemblée Nationale, Commission de la Défense Nationale et des Forces Armées, [Rapport d'information sur l'impact, la gestion et les conséquences de la pandémie Covid-19](#), 3 June 2020.

10. Ibid.

11. Interview, Missile defence sector representative, Paris, 10 November 2020.

12. Interview, Naval industry representatives, Paris, 17 November 2020.

13. Interview, Aeronautics and Defence industry representative, London, 18 November 2020; Interview, Naval industry representatives, Paris, 17 November 2020.

14. Interview, Naval industry representatives, Paris, 17 November 2020.

15. Interview, Aeronautics and Defense industry representative, Brussels, 19 November 2020; Interview, Defence Industry representative, Stockholm, 23 November 2020.

countries.¹⁶ As expressed in a report by the Swedish defence industry association, ‘in the long-term perspective there is a concern that the different measures states are taking to ensure the competitiveness of companies can have a negative, unhealthy impact by giving competitors advantages.’¹⁷ On the contrary, the French defence industry considered that in ‘southern European’ countries, by this meaning France, Spain and Italy, the industry had to completely stop their activities, while in the ‘north’ of Europe, including Germany from their perspective, similar disruptions did not occur to the same extent.¹⁸ Hence there seems to be a rather shared perception that things were always better in the neighbour’s backyard.

Nonetheless, there has indeed been different reactions. Overall, the largest European countries with a large arms-industrial base took strong measures to support the companies in this sector.

In Germany, the Bundeswehr identified contracts of services or material which could be moved forward by a few months.¹⁹ In the United Kingdom, the MoD was very forward to assist defence companies. There were procedures to expedite payments, to keep projects going. The defence industry activities were deemed essential which facilitated the circulation of defence companies’ personnel.²⁰ In France, the ministry of Defence prioritized maintenance for the armed forces in operations, and nuclear dissuasion.²¹ The DGA set up a ‘task force’ of a hundred people, to identify all the companies of the defence industry sector who would be in need of assistance.²² By mid-October, this ‘Task force’ ‘had met over 1,000 companies, some 10% of them needing remediation actions, carried out mostly in the form of payment acceleration to solve treasury problems, anticipation of already scheduled orders, or even new unscheduled orders when a need was there.’²³ There was indeed an acceleration of some of the planned deliveries to support the defence industry.²⁴ Some key announcements, such as that of the new generation aircraft carrier (PANG) were made and this was also seen as a way to show support for the defence industry and more generally as an instrument of economic recovery.²⁵ In Italy, ‘the defence industry has been considered one of the industrial drivers of economic recovery’.²⁶

These examples show that in the states with the largest defence sectors, strong measures were put in place to support this industry and help it weather the crisis.

16. Interview, Defence Industry representative, Stockholm, 23 Nov. 2020.

17. SOFF, Lagesbild: Pandemins Påverkan, Preliminär Analysis Av Säkerhets & Försvarsföretagen, 9 Apr. 2020, <https://soff.se/wp-content/uploads/2020/04/Pandemins-p%C3%A5verkan-200409.pdf>.

18. Assemblée Nationale, Commission de la Défense Nationale et des Forces Armées, [Rapport d’information sur l’impact, la gestion et les conséquences de la pandémie Covid-19](#).

19. G. Winter, ‘L’industrie de défense allemande, l’Etat et la crise du Covid-19 : premières conséquences’, *Défense&Industries*, no. 14, June 2020.

20. Aeronautics and Defence industry representative, London, 18 November 2020.

21. Defence company executive, Paris, interview 19 November 2020.

22. N. Gain, ‘Sauvegarde de la BITD: des entreprises “insauvables” et un soutien à pérenniser’, Forces Opérations, 19 November 2020.

23. P. Valpolini, ‘France: defence programmes and challenges, the DGA view’, *EDR Magazine*, 3 November 2020.

24. C. Mölling, S. Becker, T. Schütz, ‘Covid-19 and European Defense. Voices from the Capitals’, DGAP Report.

25. Interview, Naval industry representatives, 17 November 2020; ‘The Bulletin’, *A week in defense & aerospace*, ADIT, No. 509, 5 November 2020, p. 2.

26. C. Mölling, S. Becker, T. Schütz, ‘Covid-19 and European Defense. Voices from the Capitals’.

Impacts related to the supply chain

The crisis impacted the defence industry's supply chain in two ways. Firstly, by revealing dependencies on non-domestic or non-European suppliers; secondly by jeopardizing the survival of SMEs critical for the overall defence industry.

The first issue has been dealt with elsewhere, therefore it will not be presented in detail here.²⁷ Overall, it is important to note that the Covid-19 crisis raised awareness with regards to dependency to non-domestic or non-European suppliers.²⁸ For instance, according to the Swedish defence industry association, 'in some cases, production has been stopped because supply chains are broken.'²⁹ These were temporary effects, but it prompted a more long-term strategic thinking on vulnerabilities and external dependencies.

The second issue has been less discussed so far. The largest defence companies, even though some of them are losing revenue, are likely too big to fail. However, the defence industry relies on complex supply chains, where smaller companies are involved, and often active in both the military and civilian domain.³⁰ Those companies have been in some sectors severely impacted, and this is where the short-term impact is the harshest on the European defence sector. Delays in production led to delays and lower deliveries, which meant less money coming in, as payments were not made, leading in turn to cash flow problems.³¹

This was particularly true in the aerospace sector. SMEs involved in the aerospace domain, who often are both suppliers for the civilian as well as the military sectors, are vulnerable. These SMEs have a liquidity problem – and if they do not survive, there will be a broader impact on the defence industry as a whole.³²

The outlook for airlines is negative for the coming years. However, a driver for civilian aerospace manufacturing is the growth forecast from the aviation side. While airlines projected to increase their fleet before the Covid crisis, today orders are postponed or cancelled. No maintenance and no repair work is taking place, as air traffic is limited. Hence, order books in the aerospace sector in the short term and the long term are empty.³³

This has an impact for the defence supply chain, as some of the technology with which aircrafts fly serves both defence and commercial aircraft. As an SME with 60% of revenue coming from the civilian side and 40% from military, if the 60% go away, it is still extremely complicated to continue. This means that, overall, the short-term risks exist. There is less turnover, as well liquidity problems.³⁴ Further down in the technology readiness level,

27. D. Guan, et al., 'Global supply-chain effects of Covid-19 control measures', *Nature Human Behaviour*, Vol. 4, 2020, p. 577 -587; M. Hedwall, '[The ongoing impact of COVID-19 on global supply chains](#)', World Economic Forum, 22 June 2020.

28. Defence company executive, Paris, interview 19 November 2020.

29. SOFF, [Lägesbild: Pandemins Påverkan, Preliminär Analysis Av Säkerhets & Försvarsföretagen](#).

30. Sénat, Commission des affaires étrangères, de la défense et des forces armées, [Rapport d'information sur l'industrie de défense dans l'œil du cyclone](#), 8 July 2020.

31. Assemblée Nationale, Commission de la Défense Nationale et des Forces Armées, [Rapport d'information sur l'impact, la gestion et les conséquences de la pandémie Covid-19](#).

32. Interview, Aeronautics and Defense industry representative, Brussels, 19 November 2020.

33. Interview, Aeronautics and Defense industry representative, Brussels, 19 November 2020.

34. Interview, Aeronautics and Defense industry representative, Brussels, 19 November 2020.

more and more technologies have dual use applications. There is thus a risk of domino effect for the military aerospace sector.³⁵

The military shipbuilding sector is not as affected as aerospace.³⁶ Yet, a similar problem exists to some extent when it comes to SMEs in the supply chain involved in both civilian and military activities. The civilian part of the sector is hit, with passenger cruises halted and thus cruise ships construction.³⁷ Several shipyards in Europe are thus hit in the short term, with possible repercussions up to 2024-2025. The issue here, as for civilian aerospace, is that of future orders.³⁸ In particular some of the shipyards involved in civilian shipbuilding have expanded prior to the crisis and there is now an overcapacity issue. Military orders and programmes likely will not be capable of absorbing all this overcapacity and employment.³⁹

LONGER-TERM CONSEQUENCES: A SHRINKING PIE FOR THE DEFENCE INDUSTRY

For the time being, given the challenges in many sectors of the economy, defence still appears as a 'safe harbour', a 'stable oasis in the current chaos. But this is short term'.⁴⁰ Indeed, the defence industry sector traditionally takes the hit in economic crises with a delay compared to the rest of the economy, as was the case after the 2008 financial crisis.⁴¹ It is a 'consensus' in the sector that the crisis will truly arrive in the mid- to long term.⁴²

Possible defence budget cuts beyond 2021

These longer-term risks include first the decline in military spending after 2021. Although the budgets planned for 2021 do signal an increase, there is no guarantee as to their full implementation. Some countries did announce longer-term plans, such as France or the UK, among others. But it has happened in the past, that announcements made by governments in a given year, were not upheld later on. This can all the more so be the case when there are changes in governments and particularly hard economic decisions to make.

Besides, not every European country has made long-term commitments. According to a recent report from the DGAP, in the Czech Republic there is a potential threat of budget cuts

35. Interview, Aeronautics and Defense industry representative, Brussels, 19 November 2020; Sénat, Commission des affaires étrangères, de la défense et des forces armées, [Rapport d'information sur l'industrie de défense dans l'œil du cyclone](#).

36. 'The Bulletin', *A week in defense & aerospace*, ADIT, No. 509, 5 November 2020, p. 2.

37. Interview, Naval industry representatives, Paris, 17 November 2020.

38. Interview, Naval industry representatives, Paris, 17 November 2020.

39. Interview, Defence company executive, Paris, 19 November 2020.

40. Interview, Aeronautics and Defence industry representative, London, 18 November 2020.

41. L. Béraud-Sudreau, 'Dépenses militaires en Europe dans les années 2010 et leçons pour l'ère post-Covid 19', *Revue Défense Nationale*, No. 832, Summer 2020.

42. Interview, Defence company executive, Paris, 19 November 2020.

after 2021; the Netherlands forecast a decrease in 2022; and in Poland although increases are maintained, they occur at a lower pace than initially planned.⁴³

There are some disagreements about this view of decreased European military spending in the next couple of years. Some argue that threat perceptions are still high – higher than they were after the 2008 financial crisis for instance. Others see that the Russia threat is maybe decreasing and that the China threat is not seen as a military question for Europeans. Another question is whether the real threat, for European public opinion, is closer to home, with health and crisis management now seen as the priority. Military expenditure will come increasingly under the spotlight, with questions along the lines of: ‘do we really need 50 aircraft why not just 30?’⁴⁴ This pleads for a rationalised use of military spending across Europe.

Export markets: towards an intensified competition

In addition to possibly declining budgets at home, access to external markets may also be more difficult. The defence industry is generally reassessing its view of export markets compared to plans drafted prior to the Covid-19 crisis.⁴⁵ Overall, it may not be just European countries who will likely decrease their defence spending in the future, but other countries as well.

Even if some of the largest spenders chose not to decrease their military expenditure, they may still prefer to prioritise their local industry over off-the-shelf imports, even more so than they do today.⁴⁶ This could be the case of countries like Brazil, India or Australia who may increase their offset requirements. Such measures would to help governments in these states to justify the expenses made on arms imports, and increase the economic return of such procurements.⁴⁷

Overall, export markets risk being tougher.⁴⁸ This comes in a context where arms exports towards some controversial extra-EU customers are increasingly under the spotlight. This will likely further exacerbate intra-EU competition – which again pleads for a more rational and consolidated European defence industry, to avoid such competition and allow for European companies to play on the same level as their US competitors in particular.

43. C. Mölling, S. Becker, T. Schütz, ‘[Covid-19 and European Defense. Voices from the Capitals](#)’.

44. Interview, Aeronautics and Defence industry representative, London, 18 November 2020.

45. Interview, Aeronautics and Defence industry representative, London, 18 November 2020.

46. Interview, Naval industry representatives, Paris, 17 November 2020.

47. Interview, Aeronautics and Defence industry representative, London, 18 November 2020.

48. Interview, Aeronautics and Defense industry representative, Brussels, 19 November 2020.

CONCLUSION: THE COVID-19 CRISIS AS OPPORTUNITY FOR EUROPEAN ARMAMENT COOPERATION?

Based on these observations, two sets of recommendations can be made, leading to further European armament cooperation: common protection of vulnerable SMEs and the identification of long-term European armament cooperation.

Firstly, one of the key risks identified in this paper is that of the vulnerability of SMEs critical to the defence industry sector as a whole. In particular, with cash-flow issues, these companies are at risk of being taken over by hostile external actors.⁴⁹ This could be seen as an opportunity for the European Union to further strengthen its recent measures on foreign direct investments (FDI) screening – a regulation was implemented only in October 2020.⁵⁰ Some countries have taken stricter measures specifically during the Covid crisis. In France, the threshold for FDI authorization by the government has been lowered, down to 10% of the company capital, at least until 31 December 2020. However, this applies only to companies who are listed on the stock markets, which is not the case of many SMEs or start-ups.⁵¹ In Sweden, a report led by the agency for export controls and the defence research agency was recently published.⁵² Based on this report, one can say that the EU could already consider if not already the case, a strengthening of the regulation's measures, such as obliging member states to introduce national audit systems for FDI, and ensure that the notification mechanisms across EU member states are fully implemented. One can also discuss whether it is reasonable to wait until 2023 to review the implementation of this new regulation.

Going further, funds could come from the EU level to protect vulnerable strategic SMEs – provided that they supply products that contribute to EU defence capability priorities.⁵³ These have been identified through various existing mechanisms such as the Capability Development Plan (CDP) and Coordinated Annual Review on Defence (CARD).

Secondly, structural European armament cooperation programmes were identified by defence company executives interviewed for this paper as a crucial way forward. One aerospace industry representative for example identified three key lessons learned from the crisis. The first was critical mass – those companies who did not resist to the crisis did not have a critical mass to do so. A second one was the balance between civilian and defence activities. And the third is that in the crisis there is an opportunity, which is now to invest

49. AeroSpace and Defence Industries Association of Europe, Position Paper, 'COVID-19: Proposals for EU Relief Measures for Aerospace, Defence and Security Industries, 2 May 2020, <https://www.asd-europe.org/sites/default/files/atoms/files/ASD%20position%20paper%20COVID19%20%281%29.pdf>; 'Le Japon à l'affût de l'industrie aéronautique française, *Lettre A*, 28 November 2020, https://www.lalettrea.fr/entreprises_defense-et-aeronautique/2020/11/23/le-japon-a-l-affut-de-l-industrie-aeronautique-francaise,109622824-ar1.

50. European Union Commission, 'EU foreign investment screening mechanism becomes fully operational', 9 October 2020, https://ec.europa.eu/commission/presscorner/detail/en/ip_20_1867.

51. Assemblée Nationale, Commission de la Défense Nationale et des Forces Armées, [Rapport d'information sur l'impact, la gestion et les conséquences de la pandémie Covid-19](#).

52. M. Petersson, et al., 'Utländska direktinvesteringar i skyddsvärda branscher: En studie av risker, branscher och investerare', Totalförsvarets forskningsinstitut (FOI), 1 December 2020, <https://www.foi.se/rapportsammanfattning?reportNo=FOI-R--5069--SE>.

53. Interview, Defence company executive, Paris, 19 November 2020.

in the future. All these lessons imply more European cooperation, in a context where the European defence industry is divided.⁵⁴ Representatives from the naval sector, also considered European cooperation to be the way forward. They also noted, however, that consolidation would not occur without large-scale 'structural' capacity programmes.⁵⁵ They noted that the European Defence Industrial Development Programme (EDIDP) call for SEA-Defence, for €15m, which regrouped all the main naval shipyards in Europe, was a good sign that there is awareness for cooperation.⁵⁶ 'Capability-driven flagship programmes' was also a key priority for the Aerospace and Defense Industries Association of Europe, as a 'relief measure' for the European defence industry, in order to 'foster cross-border supply chains'.⁵⁷

In the wake of the Covid-19 crisis, such structural cooperation programmes thus appear necessary for the next stage of European armament cooperation and consolidation in the defence industry sector. The results of the first full CARD review identified focus areas which could drive such structural programmes.⁵⁸ This would allow Europeans to use this crisis as an opportunity not to be missed to deepen and accelerate their interdependence in this regard, while realising economies of scale and avoiding duplications ahead of times when budgetary resources may become increasingly scarce.

(This IRSEM publication is based on Dr Béraud-Sudreau's personal research and does not relate to the SIPRI databases or annual data launches.)

Dr Lucie Béraud-Sudreau joined the Stockholm International Peace Research Institute (SIPRI) in February 2020 as the Director of the Arms and Military Expenditure Programme. Her research interests focus on European and Asian arms trade, military spending and arms industry. She was previously a Research Fellow for Defence Economics and Procurements at the International Institute for Strategic Studies (IISS) and an analyst at the French ministry of Armed Forces.

Contact: lucie.beraudsudreau@sipri.org

54. Interview, Aerospace industry representative, Paris, 25 November 2020.

55. Interview, Naval industry representatives, Paris, 17 November 2020.

56. X. Vavasseur, '[Damen's Coordinating Role in EDIDP SEA Defence Project](#)', Naval News, 29 June 2020.

57. AeroSpace and Defence Industries Association of Europe, Position Paper, '[COVID-19: Proposals for EU Relief Measures for Aerospace, Defence and Security Industries](#)'.

58. European Defence Agency, '[Results of First Coordinated Annual Review on Defence](#)', Fact Sheet, 20 November 2020.